

U.S. CENSUS OF AGRICULTURE : 1959

Final Report—Vol. IV

DRAINAGE PROJECTS • SIZE

TYPE • AREA SERVED

COST • WORKS

The United States

DRAINAGE OF AGRICULTURAL LANDS

Prepared under the supervision of
RAY HURLEY, Chief
Agriculture Division



U.S. DEPARTMENT OF COMMERCE

Luther H. Hodges, *Secretary*

BUREAU OF THE CENSUS

Richard M. Scammon, *Director (From May 1, 1961)*

Robert W. Burgess, *Director (To March 3, 1961)*





BUREAU OF THE CENSUS

RICHARD M. SCAMMON, *Director*

A. ROSS ECKLER, *Deputy Director*
HOWARD C. GRIEVES, *Assistant Director*
CONRAD TAEUBER, *Assistant Director*
 LOWELL T. GALT, *Special Assistant*
 HERMAN P. MILLER, *Special Assistant*
MORRIS H. HANSEN, *Assistant Director for Statistical Standards*
 JULIUS SHISKIN, *Chief Economic Statistician*
 JOSEPH F. DALY, *Chief Mathematical Statistician*
CHARLES B. LAWRENCE, JR., *Assistant Director for Operations*
WALTER L. KEHRES, *Assistant Director for Administration*
CALVERT L. DEDRICK, *Chief International Statistical Programs Office*
A. W. VON STRUVE, *Acting Public Information Officer*

Agriculture Division—

RAY HURLEY, *Chief*
WARDER B. JENKINS, *Assistant Chief*
ORVIN L. WILHITE, *Assistant Chief*

Field Division—

JEFFERSON D. MCPIKE, *Chief*
IVAN G. MUNRO, *Assistant Chief*

Machine Tabulation Division—

C. F. VAN AKEN, *Chief*
HENRY A. BLOOM, *Assistant Chief*

Administrative Service Division—EVERETT H. BURKE, *Chief*

Budget and Management Division—CHARLES H. ALEXANDER, *Chief*

Business Division—HARVEY KAILIN, *Chief*

Construction Statistics Division—SAMUEL J. DENNIS, *Chief*

Decennial Operations Division—GLEN S. TAYLOR, *Chief*

Demographic Surveys Division—ROBERT B. PEARL, *Chief*

Economic Operations Division—MARION D. BINGHAM, *Chief*

Electronic Systems Division—ROBERT F. DRURY, *Chief*

Foreign Trade Division—J. EDWARD ELY, *Chief*

Geography Division—WILLIAM T. FAY, *Chief*

Governments Division—ALLEN D. MANVEL, *Chief*

Housing Division—WAYNE F. DAUGHERTY, *Chief*

Industry Division—MAXWELL R. CONKLIN, *Chief*

Personnel Division—JAMES P. TAFF, *Chief*

Population Division—HOWARD G. BRUNSMAN, *Chief*

Statistical Methods Division—JOSEPH STEINBERG, *Chief*

Statistical Reports Division—EDWIN D. GOLDFIELD, *Chief*

Statistical Research Division—WILLIAM N. HURWITZ, *Chief*

Transportation Division—DONALD E. CHURCH, *Chief*

Statistics in this report supersede figures shown in Series AC59-1 and AC59-2,
Preliminary Reports

Library of Congress Catalog Card Number: A60-9482

SUGGESTED CITATION

U.S. Bureau of the Census. U.S. Census of Agriculture: 1959. Vol. IV,
Drainage of Agricultural Lands

U.S. Government Printing Office, Washington, D.C., 1961

For sale by the Superintendent of Documents, U.S. Government Printing Office, Washington 25, D.C.,
or any of the Field Offices of the Department of Commerce. Price \$2.25

PREFACE

Volume IV—Drainage of Agricultural Lands—presents the results of the 1960 Census of Drainage. Data were collected for both organized drainage projects and for individually owned tracts, provided 500 or more acres of land were benefited for agriculture by installed works. The information was collected by both mail and field enumeration from officials and records of organized projects, from county and court records, and from individuals who had knowledge of known projects.

The 1960 Census of Drainage was taken in conformity with the Act of Congress of August 31, 1954 (amended August 1957), which codified Title 13, United States Code.

The planning of the census and the compilation of the statistics, in large measure, were carried on by Hilton E. Robison, Drainage Statistician, under the supervision of Ray Hurley, Chief, Agriculture Division. Assistance was given by Warder B. Jenkins, Assistant Chief, William B. Kauffman, Henry A. Tucker, and Helen D. Turner. The field canvass was conducted under the supervision of Robert B. Voight, then Chief, Field Division, by enumerators trained by employees of the Agriculture Division. The maps were prepared under the supervision of William T. Fay, Geographer.

Acknowledgment is made of the technical assistance of a Special Federal Agency Committee—1959 Censuses of Irrigation and Drainage—and of the central office and local personnel of the United States Soil Conservation Service.

December 1961

III

UNITED STATES CENSUS OF AGRICULTURE: 1959

FINAL REPORTS

Volume I—Counties—A separate part for each State. Statistics on number of farms; farm characteristics; acreage in farms; cropland and other uses of land; land-use practices; irrigation; farm facilities and equipment; farm labor; farm expenditures; use of commercial fertilizer; number and kind of livestock; acres and production of crops; value of farm products; characteristics of commercial farms, farms classified by tenure, by size, type, and economic class; and comparative data from the 1954 Census of Agriculture.

Volume I is published in 54 parts as follows:

Part	State or States	Part	State or States	Part	State or States
1	New England States:	19	West North Central—Continued	38	Mountain:
2	Maine.	20	South Dakota.	39	Montana.
3	New Hampshire.	21	Nebraska.	40	Idaho.
4	Vermont.		Kansas.	41	Wyoming.
5	Massachusetts.	22	South Atlantic:	42	Colorado.
6	Rhode Island.	23	Delaware.	43	New Mexico.
	Connecticut.	24	Maryland.	44	Arizona.
	Middle Atlantic States:	25	Virginia.	45	Utah.
7	New York.	26	West Virginia.		Nevada.
8	New Jersey.	27	North Carolina.	46	Pacific:
9	Pennsylvania.	28	South Carolina.	47	Washington.
10	East North Central:	29	Georgia.	48	Oregon.
11	Ohio.		Florida.	49	California.
12	Indiana.	30	East South Central:	50	Alaska.
13	Illinois.	31	Kentucky.		Hawaii.
14	Michigan.	32	Tennessee.	51	Other Areas:
	Wisconsin.	33	Alabama.	52	American Samoa.
	West North Central:		Mississippi.	53	Guam.
15	Minnesota.		West South Central:	54	Puerto Rico.
16	Iowa.	34	Arkansas.		Virgin Islands.
17	Missouri.	35	Louisiana.		
18	North Dakota.	36	Oklahoma.		
		37	Texas.		

Volume II—General Report.—Statistics by Subjects, United States Census of Agriculture, 1959. Summary data and analyses of the data by States, for geographic divisions, and for the United States, by subjects, as illustrated by the chapter titles listed below:

Chapter	Title	Chapter	Title
I	Farms and Land in Farms.	VII	Field Crops and Vegetables.
II	Age, Residence, Years on Farm, Work Off Farm.	VIII	Fruits and Nuts, Horticultural Specialties, Forest Products.
III	Farm Facilities, Farm Equipment.	IX	Value of Farm Products.
IV	Farm Labor, Use of Fertilizer, Farm Expenditures, and Cash Rent.	X	Color, Race, and Tenure of Farm Operator.
V	Size of Farm.	XI	Economic Class of Farm.
VI	Livestock and Livestock Products.	XII	Type of Farm.

Volume III—Irrigation of Agricultural Lands. Western States (Dry Areas)—Data by States for drainage basins and a summary for the area, including number and types of irrigation organizations, source of water, expenditures for works and equipment since 1950, water used and acres served for irrigation purposes.

Volume IV—Drainage of Agricultural Lands. Data by States on land in drainage organizations, number and types of organizations, cost of drainage and drainage works.

Volume V—Special Reports, Part 1.—Horticultural Specialties. Statistics by States and a summary for the United States presenting number and kinds of operations; gross receipts and/or gross sales; sales of nursery products, flower seed, vegetables grown under glass, and propagated mushrooms; number of container-grown plants; inventory products; sales of bulb crops; employment; structures and equipment.

Titles of additional parts of this volume are not available as this report goes to press.

DRAINAGE OF AGRICULTURAL LANDS

CONTENTS

INTRODUCTION

THE 1960 CENSUS OF DRAINAGE

	Page
Presentation of data.....	IX
General discussion.....	IX
History of the Census of Drainage.....	X
Legal basis for the Census of Drainage.....	XI

ENUMERATION FORMS AND PROCEDURES

Preparatory work.....	XI
Scope of the 1960 Census of Drainage.....	XII
Pretest of questionnaire and procedures.....	XII
Advance listing of drainage projects.....	XII
Canvass of "irrigation enterprises".....	XIII
Soil Conservation Service canvass.....	XIII
The drainage questionnaire.....	XIII
Preparation of a drainage map.....	XIV
Mail canvass.....	XIV
Field enumeration.....	XIV
Completed counties.....	XIV

OFFICE PROCESSING

Editing.....	XV
Tabulation of data.....	XV
Preparation of maps.....	XV

DEFINITIONS AND EXPLANATIONS

General.....	XVI
Drainage.....	XVI
Drainage project.....	XVI
Intercounty projects.....	XVII
Superseded projects.....	XVII
Area in drainage projects.....	XVII
Total area in drainage projects.....	XVIII
Net area drained and used for agriculture.....	XVIII
Totals of areas of individual projects.....	XVIII
Area not used for agriculture or not drained.....	XVIII
Land by year drainage was established.....	XVIII
Area served by two or more projects.....	XIX
Approximate land area.....	XIX
Land in farms.....	XIX
Drainage operations, 1950-1959.....	XIX
Cost of all drainage works and services.....	XIX
New drainage works constructed, enlarged, or installed.....	XX
Costs of new works.....	XX
Cost of maintenance, operation, repair, and administration.....	XX
Drainage projects by size.....	XX
Drainage projects by type of organization.....	XX
Drains owned by one landowner.....	XX
Cooperative or mutual drains.....	XX
Legally organized public drains.....	XX
Drainage projects by year started or organized.....	XX

COMPARABILITY OF DATA

Continuity maintained despite changes.....	XX
Changes in enumerative procedures.....	XX
Elimination of superseded projects.....	XXI
Elimination of projects under 500 acres.....	XXI
One report for all drainage undertakings under same management.....	XXI
Elimination of irrigation drainage.....	XXI
Identification of nonagricultural and nondrained lands.....	XXI
Differences in reporting overlapped areas.....	XXII
"County-drain" States.....	XXII
"Drainage-district" States.....	XXII
"Irrigation" States.....	XXII
"Other" States.....	XXII

SUMMARY

Summary of drainage activities.....	XXII
-------------------------------------	------

MAPS AND TABLES

Map of conterminous United States showing location of land in drainage projects, 1960.....	Page 2
Summary Table—	
1.—Drainage projects—Number, area, cost, and works: Censuses of 1920 to 1960.....	3
2.—Drainage projects, by size: Census of 1960.....	4
3.—Drainage projects, by type of organization: Census of 1960.....	4
4.—Drainage projects, by year of organization: Census of 1960.....	4
5.—Drainage projects, area, size, and type of organization, 1960; and drainage operations, 1950 to 1959; by States.....	6
6.—Number of drainage projects, by States: Censuses of 1920 to 1960.....	10
7.—Land in drainage projects, and land in farms, by States: Censuses of 1920 to 1960.....	12
8.—Land in drainage projects, and total area of individual projects, 1920 to 1960; areas served by two or more projects, 1960; and overlapped areas, 1920 to 1950; by States.....	14
9.—Cost of drainage, by States: Censuses of 1920 to 1960.....	16
10.—Types of drainage works, by States: Censuses of 1920 to 1960.....	18
11.—Drainage projects by size, by States: Censuses of 1920 to 1960.....	22
12.—Drainage projects by type of organization, by States: Censuses of 1920 to 1960.....	26
13.—Area drained by year drainage was established, 1960; and drainage projects by year of organization, Censuses of 1920 to 1960; by States.....	28

39 Drainage States and State maps showing location of land in drainage projects.)

State Table—

- 1.—Drainage projects—Number, area, cost, and works, 1920 to 1960.
- 2.—Drainage projects, 1960, by size.
- 3.—Drainage projects, 1960, by type of organization.
- 4.—Drainage projects, 1960, by year of organization.

See page numbers in table below.

County Table—

- 1.—Drainage projects, 1960 and 1950; and operations, 1950-1959.

39 DRAINAGE STATES AND STATE MAPS

State	Map	State Table				County Table 1	State	Map	State Table				County Table 1
		1	2	3	4				1	2	3	4	
	Page	Page	Page	Page	Page	Page	Page	Page	Page	Page	Page	Page	Page
Alabama.....	32	73	74	74	74	76	Nebraska.....	52	241	242	242	242	244
Arkansas.....	33	77	78	78	78	80	Nevada.....	53	249	250	250	250	252
California.....	34	85	86	86	86	88	New Jersey.....	54	253	254	254	254	256
Colorado.....	35	93	94	94	94	96	New Mexico.....	55	257	258	258	258	260
Delaware.....	36	99	100	100	100	102	New York.....	56	261	262	262	262	264
Florida.....	37	103	104	104	104	106	North Carolina...	57	265	266	266	266	268
Georgia.....	38	111	112	112	112	114	North Dakota.....	58	275	276	276	276	278
Idaho.....	39	119	120	120	120	122	Ohio.....	59	281	282	282	282	284
Illinois.....	40	125	126	126	126	128	Oklahoma.....	60	291	292	292	292	294
Indiana.....	41	139	140	140	140	142	Oregon.....	61	297	298	298	298	300
Iowa.....	42	151	152	152	152	154	South Carolina...	62	303	304	304	304	306
Kansas.....	43	165	166	166	166	168	South Dakota.....	63	309	310	310	310	312
Kentucky.....	44	173	174	174	174	176	Tennessee.....	64	317	318	318	318	320
Louisiana.....	45	179	180	180	180	182	Texas.....	65	323	324	324	324	326
Maryland.....	46	189	190	190	190	192	Utah.....	66	331	332	332	332	334
Michigan.....	47	193	194	194	194	196	Virginia.....	67	335	336	336	336	338
Minnesota.....	48	203	204	204	204	206	Washington.....	68	339	340	340	340	342
Mississippi.....	49	215	216	216	216	218	Wisconsin.....	69	345	346	346	346	348
Missouri.....	50	225	226	226	226	228	Wyoming.....	70	353	354	354	354	356
Montana.....	51	235	236	236	236	238							

APPENDIX

1960 Census of Drainage Questionnaire (D1).....	Page 358
Letter used to accompany the drainage questionnaire (D1) in the mail canvass.....	360
Questionnaire used for survey of drainage of irrigated agricultural lands, 1960 (D2).....	361
Listing form used by Soil Conservation Service for reporting drainage projects undertaken since 1950 and accompanying letter to Work Unit Conservationists.....	362
Worksheet for Editing—Census of Drainage: 1960.....	364

INTRODUCTION

(VII)

INTRODUCTION

DRAINAGE OF AGRICULTURAL LANDS

Presentation of data.—This volume presents statistics on drainage of agricultural lands collected in the 1960 Census of Drainage. The 1960 Census included drainage projects that were benefiting 500 or more acres of agricultural land. The statistics are for areas benefited, 1960, and for drainage operations for the 10-year period, 1950 through 1959. In the presentation selected comparative data are included for earlier censuses. In general, the censuses of drainage have primarily covered community or public drainage undertakings although individual ownership undertakings have been included if the area benefited met the minimum acres requirement.

Data are presented for counties, for States, and for the combination of States, which comprise the conterminous United States, in which drainage enterprises were reported. Maps are utilized to show the approximate location and boundaries of the areas receiving drainage benefits, as ascertained in 1960. Data for the conterminous United States are first presented in a series of summary tables and in an overall map. Several summary tables include information for States. These summary tables and the general drainage map are followed by the tabular data and a map for each State. Each State presentation is accompanied by detailed information for individual counties.

General discussion.—Agricultural drainage refers to the removal, by artificial means, of excess water to improve the condition of land used or to be used for agriculture. Excess water either in or on the soil—whether a temporary or a permanent condition—influences farm production, farm income, and farm values. Too much water in the soil adversely affects crop growth and the timely performance of operations such as tillage, seeding, cultivating, and harvesting including pasturing. Accumulation of excess water may come about from heavy local precipitation; from runoff from upstream areas; from low-lying land in depressions, ponds, and lakebeds; from tidal action in coastal areas; from soil profiles which restrict subsoil drainage; from buildup of a high water table directly as a result of irrigation or from seepage; or from artesian or other underground movement of water.

Good management of land requires management of water. Drainage, irrigation, and flood control, all requiring management, often are interrelated. Large investments of capital have been made by the Federal government and other public or quasi-public organizations; by cooperating groups of individuals; or by single individuals to restrict, provide, or regulate water supplies. On the drainage side, Federal assistance has included measures which provide improved major drainage outlets which may be interrelated with flood control. Secondary drainage works and drainage improvements on private land have been usually undertaken by non-Federal interests, including private landowners. More recently, increased Federal drainage assistance has been available to local agencies, with some limitations, through the watershed protection and flood prevention program authorized under Public Law 566 of 1954 and amendments.

Drainage of land for agriculture has generally been recognized, directly or tacitly, as a public good. As a general rule, the drainage of an individual's land cannot be carried out without the construction of an artificial drain or the improvement of a natural watercourse which affects the land of other individuals. Usually, the improvement of an outlet drain benefits more than one farm

and the cost is greater than any individual wants to assume. Most States have passed laws permitting or encouraging the organization of public corporations or local improvement districts for this purpose.

Previous to the earliest acts for establishing public drains, a number of the States had recognized the right of every landowner to a drainage outlet by providing that an owner desiring drainage could apply to a designated official and upon payment of damages, if the necessity were proved, secure easement to construct and maintain a private drain across his neighbor's land. The drainage laws for the various States have given rise to two principal types of organization and to several minor types. The corporate district and the county drain are the principal types. The first is governed by its own officers, who either are elected by the residents or landowners of the district or are specially appointed by the authority which creates the enterprise. The county drain is established and constructed as any other public work or local improvement, the enterprise being managed by regular officers who have charge of all these enterprises in their county. Some enterprises are administered by a commission or board consisting of one or more officials of the county and one or more members selected by the owners of the land assessed for the cost of the drainage. The minor types of organizations include (1) township drains, which are similar in form to county drains but are controlled by officers of the townships; (2) State drainage projects, controlled by State officials, usually embracing some State land; (3) irrigation districts, similar in character to drainage districts, that have undertaken drainage of land in those districts; (4) commercial companies reclaiming and improving wetland for sale; (5) cooperative or mutual undertakings without formal corporate organization; and (6) individual landowners including farm partnerships and farm corporations.

Physiographic features and the amount of water that should be removed from both surface and subsoil have a direct bearing on the need for, and the nature of, drainage works. Drainage improvements can be in the nature of straightening and deepening natural water channels; construction or replacement of drains, both open and closed types; installation or use of pumps and drainage wells; construction or repair of levees, floodgates, culverts, and bridges; and land leveling. Millions of acres now in agricultural use have been fitted for crop or livestock production by one or more of the methods which hasten the removal of excess water. Some of the most productive lands of the Nation have been improved by drainage and the installation of a drainage work increases agricultural output.

Drainage problems still exist on many acres of farmland. Old or new techniques can make these lands more physically suitable for crops and pasture. A part of the lands still inadequately drained are interspersed with lands adequately provided with drainage. Often an organized drainage district or other collective drainage enterprise has provided the main channels and an outlet for water flow so that remaining works need only be installed by individual landowners. There are extensive areas of wetlands, without or within farm boundaries, without any artificial drainage, whatever, which can be physically improved for crops and pasture. It may be questionable whether it is advisable to make such lands fit for agriculture, or even to make all lands presently in farms fit for a higher type of agriculture,

by means of drainage. This is especially true in periods of farm surpluses. Often wildlife propagation and recreational activities may be more desirable alternative uses of wetlands. There are cases where the health of a community must be given consideration. No doubt the individual landowner usually visualizes some economic gain before he undertakes a drainage improvement. Economic as well as social factors need to be weighed to determine the feasibility and advisability of reclaiming land for farming. Prevailing costs and benefits have not always been sufficient to warrant the maintenance of drainage works after their installation. With the passage of time, it becomes difficult to say whether certain drainage works are still a benefit to agriculture.

History of the Census of Drainage.—Practically all drained agricultural lands lie within the boundaries of operated farms. Such lands may be either inside or outside the boundaries of an organized enterprise that provides drainage works for improving lands for agriculture. The drains and other works for control of water that a farmowner installs upon his own farm, either within or without the boundaries of an organized drainage enterprise, are likely to be either supplemental to or entirely independent of the works installed by an organized enterprise. Officials of an organized enterprise cannot be expected to know in detail the total acres drained or the nature of all drainage works, including those constructed by individual landowners, within the boundaries of their districts. Therefore, the first efforts at gathering information for drainage attempted the full coverage of drainage for farmlands, that is, drainage by both organized enterprises and by individual landowners.

Through the years, a varying amount of basic information has been obtained in respect to the amount and location of farmlands which have been improved by drainage, the type of organization under which drainage has been carried out, the kind of works installed, the purpose of the drainage, the adequacy of the drainage, the capital invested, and the financial situation of the enterprise established for carrying on drainage improvements. Recently, more emphasis is being placed on additions to the drained area in respect to acreage, physical works, and costs. It has been learned that many of the needed data concerning the extent and adequacy of drainage cannot be answered satisfactorily by local officials or individual landowners. Some organizations cease to function after the drainage work has been accomplished and, for farm drainage, the individual landowner either may be difficult to locate in the case of tenant-operated land or may not be in full possession of knowledge of drains long-established on his holdings.

The first census of drainage in the United States was taken in 1920. No provision for inquiries regarding drainage was made in any prior census. In 1920, some facts concerning drainage on farms were collected in the general census of agriculture, while those for drainage enterprises were obtained in a special canvass of those enterprises. Drainage enterprises were to comprise public and private corporations and local improvement districts organized to secure the drainage of land to be used for agricultural purposes; also government projects and other organizations engaged in extensive land drainage work. Questionnaires were obtained also for drainage undertakings, each to benefit 500 acres or more, by individual farmowners. Land furnished protection from overflow by levees, dikes, or embankments was not included unless some form of drainage works had been constructed on the protected land. The land in drainage enterprises was the acreage that had been or was to be benefited by drainage works constructed by the enterprises and, except in a few instances, was the land assessed to pay the cost of the enterprises. The exceptions were irrigation projects installing drains to benefit land damaged by seepage or by alkali as a result of the irrigation, and assessing the cost against the entire irrigation enterprise instead of against only the area needing drainage or protection. Under such circumstances the area thus assessed, but not need-

ing drainage, was omitted from the tabulations. Enterprise data were published for 34 States. No enterprises were found in Alabama, Virginia, West Virginia, or in the 11 States north of the Potomac River.

In 1930, a small amount of data was gathered from farm operators in the general census of agriculture in respect to drainage on farms. Figures were published for the number of farms reporting drainage and the acreage of farmland provided with drainage. A special questionnaire was utilized to cover organized drainage enterprises. Again, the term "drainage enterprise" was broadened to include a tract of farmland of 500 or more acres drained as a private undertaking without legal organization. The area of a drainage enterprise included all the land within the boundaries of the enterprise. It included all land assessed for the cost of the enterprise, and may have included land not assessed because exempted for special reasons. Where the drainage was performed by an irrigation district, that district was also the drainage enterprise. Drainage enterprise data were published for 35 States in 1930. These included Virginia in addition to the 34 States for which data were published in 1920.

Since 1930, no effort has been made to obtain drainage data on the general questionnaire for the census of agriculture. The acreage drained in a particular farm is largely a matter of opinion of the operator, particularly so in the case of a tenant-operator, as to the area actually benefited. The 1930 Drainage Report stated that both the number of farms reporting drainage and the acreage drained were doubtless too low, due to the fact that some enumerators failed to secure answers to the farm drainage questions on the general farm questionnaire.

The third census of drainage enterprises was taken in 1940. A drainage enterprise, for the 1940 Census of Drainage, was defined as the area (1) organized in one drainage district, or (2) assessed for the same public drain, or (3) in corporate or in private ownership drained by works operated as one undertaking. Privately owned enterprises draining less than 500 acres each were omitted from the census, but all enterprises established under State drainage laws were included. Drainage statistics were presented for 38 States. In addition to the 35 States for which enterprises had been found in the 1930 enumeration, enterprises were located in, and statistics were published for, Alabama, Delaware, and Maryland.

In the 1940 Census of Drainage Report, in the discussion of the classification by character of enterprise, mention was made of the difficulty of applying the definitions to distinguish between drainage districts and county drains in all States. In Iowa, for example, almost all of the enterprises were classed as county drains although by law they were named drainage districts. In several other States an enterprise with the term "district," as used locally or even in the statutes, was classified differently. It was said that the district form of organization, being under the management of its own officials, was generally considered more suited to the larger and more costly undertakings, as giving the landowners the greatest degree of local control. The county drain form, administered by county officials, was generally more economical in administrative costs for small enterprises in which the problems of engineering and financing are relatively simple. This form was most common in those States where drainage was promoted for improving land already in farms. The district form was general in those areas where reclamation and development of unimproved lands for making new farms had been an important consideration in promoting the drainage enterprises.

Prior to 1950, all organized drainage enterprises, regardless of size, were covered in each census of drainage. A report was obtained for each enterprise that had constructed drainage works which were still serving agricultural lands or that had contributed to the capital invested in existing works. All unorganized drainage operations on agricultural lands of 500 or more drained acres, conducted by individuals or cooperative groups, were also covered.

For 1950, it was decided to restrict the enumeration of drainage projects to drained agricultural areas of 500 acres or more, regardless of whether they were in an organized enterprise or represented a private operation. Consideration was given to both the expense and difficulty of gathering information for individuals or officials for small acreages of drained lands. These items are more pronounced for those enterprises which have been superseded. Many of the small enterprises had been superseded by later enterprises. For that reason it was decided, in advance of the 1950 Census date, to eliminate enterprises of less than 500 acres from the enumeration. For 1950, a special effort was made to obtain reports for cooperative or group drainage projects to which the Soil Conservation Service had rendered technical assistance.

The decision to limit the 1950 Census of Drainage to enterprises of 500 or more drained acres was based on the following facts. In 1940, there were 79,220 reports secured in the Census of Drainage. Many of these represented enterprises which had been superseded by later enterprises. Although these superseded enterprises were no longer in existence, the works which they had constructed were still serving to drain agricultural lands, or these enterprises had contributed to the capital invested in existing works. Of the 79,220 total, 41,690 were less than 500 acres in size. Of approximately 133 million acres in all enterprises in 1940, only 9 million acres were accounted for by enterprises under 500 acres. Thus, slightly more than half of the enterprises containing about seven percent of the land in enterprises were represented by these small operations. In 1940, about 87 million acres of land were drained. The difference between 133 million and 87 million represented lands which were drained by more than one enterprise. Considerably more than one-half of the land in enterprises of less than 500 acres was shown to be in overlapped enterprises. The exclusion of the very small enterprises had a material effect on the number of enterprises covered but had only a minor effect on the number of drained acres.

Prior to the 1950 Census of Drainage, a preliminary field test was conducted in Ohio, Indiana, and Illinois to determine whether a satisfactory method of enumerating overlapped drainage enterprises had been developed. It was learned that in most of the counties having county drains, there were county maps showing the land in drainage enterprises. These maps were usually prepared by the county engineer or other qualified person. The existing maps and the special knowledge of county engineers or surveyors as to the location of the drained lands could be used to best advantage if overlapped lands in enterprises could be eliminated from the enumeration. This elimination would greatly reduce the cost of both field and office work. It was decided to treat the drained lands of each county, in States having predominantly county drains, as a single enterprise. Thus, only one questionnaire would be filled per county in such States. Most of the overlapped enterprises, and also those under 500 acres, were in three States—Ohio, Indiana, and Michigan. The same economies which prompted the Census to use one questionnaire per county in these three States led to the use of a single questionnaire per county also in Delaware, Iowa, Kentucky, Minnesota, Oklahoma, North Dakota, and South Dakota. This group of ten States was designated as "county-drain" States, although in Delaware the predominant form of drainage organization was the drainage district. An abbreviated questionnaire was used in these "county-drain" States as contrasted with the reporting form used in the other so-called "drainage-district" States.

In 1950, the enumerators who were charged with the responsibility of securing a drainage questionnaire for irrigation enterprises having their own drainage were often unable to obtain the required information concerning the area and location of the lands benefited by drainage. They could not readily secure an allocation of cost, collections, and indebtedness for the drainage

works separately from the irrigation works. Because of this difficulty, the 1950 information concerning drained lands was supplemented by data secured on the questionnaire for the census of irrigation. In doing so, the restriction of 500 or more drained acres was not applied to irrigation enterprises having their own drainage.

Drainage enterprises were enumerated in 40 States in 1950. Enterprises were enumerated in New Jersey and New York for the first time. The eight States with no drainage enterprises, for the purpose of the census, were the six New England States, Pennsylvania, and West Virginia.

The 1960 Census of Drainage was the fifth of a nationwide series to obtain data in respect to removal of excess water from agricultural lands. After the 1950 experience, a change was considered necessary in the kind of data that could or should be secured in a drainage enumeration. Lands drained solely because of irrigation, to remove seepage water, or to prevent alkali accumulation, were excluded from the Census of Drainage. The theory underlying the change was that these irrigated lands were not first made available for agricultural use through the removal of excess water from naturally wetlands. (See discussion under "Scope of the 1960 Census of Drainage.")

Legal basis for the Census of Drainage.—Each of the five censuses of drainage has been authorized by an Act of Congress. "Title 13, United States Code—Census," codified in August 1954, and amended in August 1957, and September 1960, is now the legal basis for the censuses of agriculture and other censuses, and surveys conducted by the Bureau of the Census. Section 142, paragraph (b), made provision for the Census of Drainage, as follows:

"The Secretary shall, in conjunction with the census of agriculture directed to be taken in October 1959 and each tenth year thereafter, take a census of irrigation and drainage."

Section 5 of Title 13 made provision for the preparation of forms and questionnaires in this manner—

"The Secretary shall prepare schedules, and shall determine the inquiries, and the number, form and subdivision thereof, for the statistics, surveys, and censuses provided for in this title." Under authority granted by Section 4 of Title 13, the Secretary of Commerce delegated "the functions and duties imposed upon him by this title" to the Director of the Bureau of the Census.

ENUMERATION FORMS AND PROCEDURES

Preparatory work.—Within the framework of the Act providing for the 1960 Census of Drainage, the scope of the enumeration and the nature and content of the forms and procedures used for taking the census were determined by the staff of the Bureau. In making the decision as to which drainage projects to enumerate, the form of the questions to be asked, and the enumerative procedures to be followed, the staff gave consideration to the experience gained in earlier censuses and to the results of a pretest of the proposed questionnaire and procedures. Careful consideration was given to availability of data from other sources, the adequacy of the data that might be obtained, and the need for and the usefulness of the data.

Two special committees provided advice and counsel to the Bureau. A Special Federal Agency Committee, for the 1959 Censuses of Irrigation and Drainage, comprised representatives of the following agencies: Agricultural Conservation Program Service, Agricultural Research Service, Rural Electrification Administration, and Soil Conservation Service of the U.S. Department of Agriculture; Bureau of Indian Affairs and Bureau of Reclamation of the U.S. Department of the Interior; and the Bureau of the Census. A second Committee, the Special Advisory Committee for the 1959 Census of Agriculture, reviewed the later stages of the planning. This committee consisted of one repre-

sentative from each of the following: Agricultural Publishers Association; American Association of Land-Grant Colleges and State Universities; American Farm Bureau Federation; American Farm Economic Association; American Statistical Association; Farm Equipment Institute; National Association of Commissioners, Secretaries, and Directors of Agriculture; National Council of Farmer Cooperatives; National Farmers' Union; National Grange; Rural Sociological Society; and the U.S. Department of Agriculture. A representative of the Bureau of the Budget was in attendance at all meetings of this Committee.

Scope of the 1960 Census of Drainage.—Since drainage of irrigated lands for the purpose of controlling alkali or seepage from irrigation generally represents an integral part of the operations performed by irrigation enterprises, such drainage was excluded in the 1960 Census. The 1950 experience had indicated the impracticability of apportioning financial data to drainage, as distinct from irrigation. Drainage for control of alkali or seepage from irrigation was excluded even in instances where the drainage was handled by a separate organization from that which provided the irrigation. In such cases the drainage organization was often a subsidiary of the irrigation organization and, even when not subsidiary, the organizations often shared facilities. Part or all of the maintenance was frequently handled by the irrigation organization. An attempt was made, however, to include drainage operations benefiting naturally wetlands even though such lands may have been irrigated.

The 1950 experience also led to the inclusion in 1960 of inquiries designed to identify extensive contiguous tracts within the project area that were either not being used for agriculture or were receiving no drainage benefits from the facilities provided.

The principle established in 1950 for the "county-drain" States of obtaining one report for all drains under one management was extended in 1960 to all States. The 1950 plan for "county-drain" States was modified to require separate reports for drainage projects under separate management.

The 1960 enumeration, as in 1950, included all projects which provided drainage benefits to 500 or more acres of agricultural lands. A project might represent an undertaking by a legally organized drainage district; by a special district organized primarily to provide some other service; by some other governmental unit; by an individual landowner, farm partnership, or farm corporation; or by a cooperative group of landowners controlling a joint undertaking or carrying out their respective portions of one overall plan.

For intercounty projects separate reports, as in prior censuses, were required for each county part in order to provide drainage data at the county level.

Projects for which the drains still were functioning were included even though the organization responsible for the drains no longer existed. An exception was made for projects taken over by a later organization. If, however, there had been any drainage activity by the superseded organization during the 10-year period, 1950-1959, it was also included.

Information was obtained on the area of the project and for drainage activities for the 10-year period since the preceding census. Where possible, information obtained for the project in 1950, such as the area in 1950 and the mapping of this area, was utilized in 1960 and only the activities and changes since 1950 were recorded by the enumerator in the 1960 enumeration. However, if the 1950 Census records were incomplete, or indicated a need for verification, or if the recorded information was found to be incorrect, the enumerator was required to disregard any information given him for the 1950 Census and to obtain complete information for the project for 1960.

Pretest of questionnaire and procedures.—A pretest of the questionnaire and field procedures was conducted in July 1959. Four counties were selected to provide a fairly representative

cross-section of the problems expected in the enumeration. Vanderburgh County, Indiana, and Henderson County, Kentucky, represented county-drain systems with drains under control of county officials. The county surveyor was directly responsible for county-drain work in Vanderburgh County, Indiana, and a county Board of Drainage Commissioners was responsible for the county ditches in Henderson County, Kentucky. Indiana and Kentucky were enumerated in 1950 as "county-drain" States, one questionnaire being used to enumerate all drainage projects in each county. Massac County and Gallatin County, Illinois, were selected as representative of "drainage-district" areas. For these two counties, each drainage district had its own officials with varied connections with the county government. Massac County was selected particularly to test the effectiveness and adequacy of the questionnaire and procedures for handling projects that extend into two or more counties. [The 1950 enumeration included 618 such projects, in all areas, accounting for 1,292 of the 6,132 reports (other than "irrigation enterprises" enumerated in the Census of Drainage) included in the tabulations for that year.] Gallatin County had projects of several types of organization. It offered experience in handling problems involving overlapping of projects, in obtaining information from a variety of sources, and in obtaining information for projects for which there was no longer any active management or person responsible.

Advance listing of drainage projects.—Just prior to the field enumeration for the 1960 Census of Drainage, a listing of drainage projects was prepared to insure reasonably complete coverage. This listing included the following:

1. All projects included in the 1950 tabulations.
2. Additional projects, listed or enumerated in 1950 but excluded from the tabulations, where there was a possibility that such projects might qualify for inclusion in 1960. These additional projects included those in the planning stage in 1950, projects started but not completed, and projects reported inactive for many years but which might have been restored.
3. Special purpose districts included in the 1952 and 1957 Censuses of Governments where the name or listed functions of the district indicated that the district might be providing drainage services to agricultural lands.
4. Projects ascertained by a mail canvass of "irrigation enterprises" reporting 500 or more acres of drained lands in the 1950 Census of Irrigation. (See "Canvass of irrigation enterprises.")
5. Projects listed by the Soil Conservation Service as having been undertaken since 1950. (See "Soil Conservation Service canvass.")
6. Projects listed by the State of Missouri as having been organized since January 1, 1950. (The Soil Conservation Service could provide no information on drainage activities for 77 Missouri counties.)

For each of these listed projects, the name of the organization was entered on a 1960 Drainage Questionnaire. In most instances, the Bureau was also able to enter the name and address of one or more persons who could be contacted regarding that project. The person listed was generally an official of the organization, or some other person who would have knowledge of the project. These questionnaires were given to the enumerator, in the respective area, in advance of the enumeration.

The listing was considered to be reasonably complete. The 1950 Census provided a reliable listing of projects in existence as of that date. Officials of the Soil Conservation Service were of the opinion that the listing provided by that organization could be relied upon for coverage of additional projects since the 1950 Census. The Soil Conservation personnel had rendered technical assistance for many of these projects. Since the area served by each local office of the Soil Conservation Service generally consists of only one or two counties, the local officials should have had knowledge of any additional drainage operation in their area that would have sufficient size for inclusion in 1960.

Enumerators were instructed to be on the lookout, in the counties assigned, for additional drainage activities that might qualify for inclusion in the census.

For counties for which no projects were prelisted, and counties for which the enumeration was conducted by mail (see "Mail canvass"), the enumeration coverage depended wholly on the advance listing.

Canvass of "irrigation enterprises."—To determine which "irrigation enterprises" included in the 1950 Census of Drainage qualified for inclusion in the 1960 Census of Drainage, a special questionnaire (Form D2) was mailed to each enterprise for which 500 or more acres of land were reported as provided with artificial drainage. This questionnaire determined—

1. The individual or the organization responsible for the drainage.
2. Whether the need for drainage was solely because of irrigation, or was intended to improve naturally wetlands.
3. Whether 500 or more acres were drained by constructed works.

Although the 1950 Census of Drainage report carried data for "irrigation enterprises having their own drainage," the 1950 Census of Irrigation questionnaire did not determine whether the organization, group, or person responsible for the irrigation was also responsible for the drainage of the land.

The mailing list was compiled from the 1950 Census of Irrigation reports and from incomplete 1950 Census of Drainage questionnaires representing "irrigation enterprises" having their own drainage works. The 1950 Census of Drainage included 790 "irrigation enterprises" enumerated in the Irrigation Census, with 500 or more acres of irrigated land reported as provided with artificial drainage. The mailing list, compiled on a county basis, consisted of 960 listings to be accounted for. A total of 1,683 mailings was made, including followups for nonresponses, requests for further information, and requests to new respondents named as responsible for the drainage activities.

Satisfactory information was obtained for 87.9 percent of the listings. For most of the others the identification or address was not sufficient to find a satisfactory respondent. Of those for which satisfactory information was obtained, approximately two out of three did not qualify for inclusion in the 1960 Census. For over half (54.2 percent) of those qualifying for inclusion, the drainage was by separately organized drainage districts. Nearly all of these separately organized districts represented projects already listed. Only 99 projects qualifying for inclusion in the 1960 Census of Drainage, and not already listed from other sources, were found as a result of this canvass of "irrigation enterprises."

Soil Conservation Service canvass.—At the request of the Bureau, the officials of the Soil Conservation Service, Washington, D.C., asked each of the State conservationists to require that their work unit conservationists prepare a list of drainage operations for each county in their respective areas.

The work unit conservationists were instructed to include "only projects that provide drainage benefits for approximately 500 or more acres of land for agriculture" and to include only "jobs completed or started since January 1, 1950." They were requested to include "all projects—group, individual, and public—irrespective of whether they received technical assistance from the Soil Conservation Service."

The listing form provided for the inclusion of the name of the project; the approximate acres benefited; whether the project represented a single farm, a cooperative or mutual, or a legally organized project; and the name and address of the person or persons who might be contacted for information concerning the physical works and costs, and for maps or plats. Facsimiles of the listing form and of the covering memorandum are included in the appendix.

The projects for which lists were received totalled 4,602 for 610 counties. For each of the other counties, except for 77 counties in Missouri for which officials of the Soil Conservation Service were unable to provide information, either a listing form checked "No projects" or a memorandum stating there were no such projects, was received.

As a result of this prelisting of projects by the Soil Conservation Service, 2,935 projects were added to the Census lists. Of the 9,298 drainage projects (county count) in 1960, more than one-fourth (2,456) represented projects that had been added to the advance listing as a result of the Soil Conservation Service canvass. Of the 4,602 projects listed in the Soil Conservation Service canvass, 2,146 represented projects already listed by the Census, or projects that were found as not qualifying for inclusion.

In the field enumeration, further information obtained from the Soil Conservation Service local offices accounted for a large proportion of the 532 additional projects found by Census enumerators.

The drainage questionnaire.—For the 1960 Census, the same questionnaire form (D1) was used for all States. A facsimile of this questionnaire appears in the appendix.

In the arrangement and design of the questionnaire, consideration was given to the use of the form for self-enumeration, maximum use of 1950 information as a guide to the enumerator, simplification in the enumeration, and for the office processing of the data.

The name of the State and county were placed at the beginning of the questionnaire, since they assisted in the identification of a project. For intercounty projects, the portion in each county was enumerated separately and the inquiries, therefore, referred only to the portion within the specified county.

Section I provided for the identification and organization of the project. For all prelisted projects, the identification was entered in advance of the assignment for enumeration. Other inquiries related to the type of organization, the period in which the project or organization was started, and, if an intercounty project, the names of the other counties in which the project lands were situated.

Supplementary information, useful in the processing of the data, was sought through inquiries on whether there was active management of the project, and, if not, whether the project or organization had been dissolved, and whether the organization provided any major public service other than drainage.

Section II was designed to record the drainage activities during the decade, 1950–1959. A series of "No-Yes" questions described the various types of drainage activity and provided for skipping of the remainder of the section if there was no drainage activity. Data were requested for the cost of all drainage works and services, for the physical quantity of each major type of new works constructed, and for the cost of all new works. A descriptive entry was required for types of new works not listed. An inquiry on location of the outlet of the new drainage works helped to identify and locate the lands of the project.

Section III contained inquiries related to the area in the project, starting with the area in 1950. For projects included in the 1950 Census, the 1950 area was posted prior to the enumeration. This was followed by an inquiry on the area added since January 1, 1950, and on the area in 1960. This section also included inquiries to determine if any extensive portion of the land in the project area received no drainage benefits or was not being used for agriculture.

Section IV obtained information regarding areas overlapped by other projects. A distinction was made between land provided separate or supplemental service and land taken over by or from another project.

In Section V, provision was made for listing the name of the person, or persons, who supplied the information and the certification of the filled questionnaire by the enumerator and his supervisor.

Shaded squares on the questionnaire gave notice to the enumerator that additional information was required in respect to the project. Shaded squares opposite the area data indicated that

the location and approximate boundaries of these areas must be entered and identified on a map. When this additional work of enumeration was completed, an "X" was to be entered in the shaded square. A shaded square below the inquiry calling for a listing of the other counties involved in an intercounty project served as a reminder that the portion of each of these other counties must be enumerated also.

The questionnaire carried worksheets on the reverse side to facilitate the summarization of drainage activities for the 10-year period and for obtaining a breakdown by counties of data for intercounty projects. A township outline map, also on the back of the questionnaire, provided a place for sketching the location and approximate boundaries of the area served.

Preparation of a drainage map.—In addition to a filled questionnaire, the enumeration of a drainage project required the locating of each project on a map and the outlining of the approximate boundaries of the area served. For projects included in the 1950 Census, the enumerator was furnished a county map on which the location and approximate boundaries of these projects had been entered in the 1950 Census. Thus, the 1960 enumerator generally needed only to map projects not included in the 1950 Census and show changes in areas represented by projects already mapped. Of course, if he found the 1950 mapping to be in error he was expected to correct it. If desired, a separate map or tracing could be submitted, or a sketch drawn on the back of the questionnaire.

Mail canvass.—The listing of drainage projects by the Soil Conservation Service indicated that for 8 of the 48 conterminous States for which no drainage projects were found in the preceding drainage censuses, no drainage undertakings benefiting 500 or more acres of agricultural land had been undertaken during the 10-year period since 1950. Consequently, no further canvass was needed in these 8 States. These States were the New England States, Pennsylvania, and West Virginia.

In Alabama, Georgia, New Jersey, and New York, there were so few projects that a field canvass was not justified, from the standpoint of economy. A similar situation prevailed for Arizona, Colorado, Idaho, Montana, Nevada, New Mexico, Utah, and Wyoming where the need for much of the drainage had developed because of irrigation and the projects would not qualify for inclusion in the 1960 Census. The enumeration in these 12 States was conducted wholly by mail.

In the remaining States, a mail canvass was used for most of the counties for which there were less than 5 known drainage projects to be enumerated. Exceptions were made mostly for (1) "county-drain" States where several drains under the same management might be included in one report, (2) those instances where an enumerator would need to go into the county to complete the enumeration of intercounty projects, and (3) counties that involved a minimum of additional time and travel on the part of an enumerator assigned to an adjacent county. In several instances, enumerators were used to complete the enumeration initiated by mail canvass.

Of 1,336 counties requiring reports, 271 were completed by mail canvass and 1,065 by field enumeration. Of the 1,065 counties completed by field enumeration, the initial canvass in 34 counties was by mail, and in 61 other counties a part of the enumeration was by mail canvass. The 979 projects included in the mail canvass required 2,034 mailings, with the enumeration completed for 870 projects and with 109 projects assigned to enumerators for completion.

A facsimile of the letter used to accompany the mailed questionnaire is included in the appendix.

A mail followup was used to complete the enumeration in instances where the enumerator failed to obtain all the necessary information and the lacking information could not be estimated satisfactorily.

The local offices of the Soil Conservation Service provided assistance in numerous instances where there was difficulty in obtaining a satisfactory address or where the necessary information was incomplete. Projects for which assistance was asked were those for which the Soil Conservation Service had provided technical assistance, or legal organizations for which the information could be obtained readily from public records. Many of the legally organized projects, for which information was needed, had been inactive for years, or dissolved with no present management or organization. Dependence was placed, to a large extent, on the Soil Conservation Service for information for inactive or dissolved drainage projects for which no person who was ever associated with the organization could be found.

Field enumeration.—Enumerators for the Census of Drainage were selected from crew leaders and, in a few instances, from enumerators employed in the general 1959 Census of Agriculture. For the 1960 Census of Drainage, 156 enumerators and 21 supervisors were employed. The enumerator assignments averaged about 4½ weeks in duration.

The enumerators and supervisors were trained simultaneously at 10 training locations, selected to provide a minimum of combined travel. The training consisted of two days of technical instruction covering all phases of the enumeration with emphasis on problem situations that could be expected.

The unit of assignment was a county, with each enumerator generally assigned several counties. A drainage enumerator was paid \$1.95 for each authorized hour worked. He was allowed 7 cents per mile for the use of his automobile on official travel, and \$12.00 per diem for living expenses when overnight stops away from home were required.

There was no routine procedure for finding the information needed for the enumeration. The enumeration might require interviews with various individuals and public officials directly connected with specific drainage organizations, or who, because of their public office, might have knowledge of drainage undertakings in the area or records pertaining to such undertakings, or of the present condition and use of lands represented by projects mapped in the 1950 Census. The enumeration of a particular project often required interviews with several individuals and the examination of various public records and maps. Records pertaining to legally organized drainage projects were generally found among the county court records. Sometimes, records were in the hands of town or township officials, or with officials of the drainage organization. At times they were fragmentary. In a few cases records were nonexistent. The records were seldom in such form that the desired information could be taken off directly. When recorded information for an item was not available, the enumerator was instructed to obtain an estimate from a reliable respondent.

Of the 8,485 drainage projects for which data were tabulated in the 1960 Census, 2,348 were inactive throughout the 10-year period 1950-59. For many of these projects, the enumerator could find no person connected with the organization to furnish information regarding the project. In some instances, projects had been inactive over such a long period of time that few individuals could be found who knew that the project had ever existed. In other cases, the enumeration could be accomplished only through inquiry of local officials or affected landowners as to whether the area shown for the project in the 1950 enumeration included any extensive areas which were no longer receiving drainage benefits or were not being used for agriculture.

Completed counties.—As the enumeration of each county was completed, the enumerator turned over to his supervisor all enumerative materials for the county. The supervisor was required to review these materials, following an outline of checks provided for this purpose. After reviewing the materials for each county, the supervisor forwarded them to Washington for processing.

OFFICE PROCESSING

Editing.—Upon receipt in Washington, the drainage questionnaires and maps were examined for completeness and consistency in preparation for tabulation of the data and the reproduction of the maps. A check was made to see that all material for each county had been received including a filled questionnaire for each project. The list of projects that had been furnished prior to enumeration was reviewed for coverage. Omitted items of information were supplied, when available from records in the Bureau, or the figures could be estimated with reasonable accuracy. Inconsistencies between the areas stated in the reports and those mapped were reconciled, insofar as possible, on the basis of the information available. When the available information was insufficient to supply missing data, or to reconcile discrepancies, the needed additional information was obtained through correspondence.

For each intercounty project, the reports were checked to ascertain that complete and separate information was shown for each county part without duplication.

Questionnaires representing undertakings or organizations not qualifying for inclusion in the 1960 Census, as well as those representing duplications, were "rejected." In preparing the advance listing of drainage projects, the names of those for which there was insufficient information to determine whether they would meet the 1960 criteria were purposefully included. The enumerator did not make the decision whether a questionnaire should be filled for such projects. On the contrary, he was required to fill a questionnaire, thus providing documentary evidence as to why the project did not qualify. (For 1960 criteria, see "Definitions and Explanations.") Of 11,483 questionnaires returned in the enumeration, 2,072 were later rejected as not qualifying or because of duplication, and 113 were for projects which had been superseded by other projects during the 10-year period, 1950-1959.

All separate materials, including correspondence, sketch maps, etc.; the worksheets on the reverse of the questionnaire; and notations entered under "Remarks" or elsewhere on the enumerative materials, were examined for information that might be of assistance in the editing.

To check the mapping, the plat for each drainage project was identified on the county map. If a separate map, sketch, or tracing of a project was furnished, it was checked against the county map. If not already plotted, the project was entered on the county map; if in error, the plotting on the county map was corrected. The location, as shown on the map, was checked against any information as to location given on the questionnaire or other materials such as the name of the project, the location of the outlet, overlapping projects, land descriptions, and the like. The extent of the mapped area for each project was checked visually to see that it was reasonably consistent with the area reported on the questionnaire. Areas omitted from the questionnaire were obtained by planimeter measurement of the mapped areas. If the mapped and reported areas differed substantially, available information in the Bureau, including materials for the project from earlier censuses, were generally sufficient for making the necessary correction.

If extensive nondrained or nonagricultural areas were indicated on the questionnaire, but were not identified on the map, such areas could generally be identified by use of materials available in the Bureau such as aerial photographs and detailed maps showing current cultural and physical information. Likewise, if it was evident that an enumerator had omitted to indicate any extensive nonagricultural areas located within drainage projects, such as cities, airports, recreation areas, parks, military installations, wildlife refuges, State or National Forests, or commercial

woodlands, the nonagricultural portions were determined on the basis of these materials.

In checking the county map to the questionnaires, careful consideration was given to the delineation of overlapped areas. Often the extent of supersedence of a project by another, or the quantitative determination of areas served by two or more projects, could be determined only by careful plotting of the overlapping projects. In counties with extensive overlapping, the determination of the net area of land benefited by all projects generally, of necessity, had to be based almost entirely on the mapped areas. In fact, for most counties in the "county-drain" States, the net area serviced by county drains could be obtained only by plotting the separate drains, then measuring the overall mapped area. This had been the procedure for the "county-drain" States in 1950; therefore, only additions and deletions had to be considered in 1960.

After reconciling the questionnaires and the mapped areas, a determination of the area served in 1960, excluding any extensive areas not receiving drainage benefits from works of the project or not used for agriculture, was made for each project. The area served by a project included lands served jointly by it and other projects. Any portion of the project which had been taken over by some other project, however, was excluded. The 1960 area in individual drainage projects was used to tabulate the area of drainage projects by size of project, by type of organization, and by year of organization. That portion, if any, of the 1960 area which was provided separate or supplemental drainage service by one or more other drainage projects was also determined.

To obtain net acreage figures for land in drainage projects, counting only once the land in each project, a worksheet was prepared for each county. (A facsimile of this worksheet is included in the appendix.) Since the 1960 enumeration utilized 1950 Census information as a starting point for both the filling of a questionnaire and for performing the required map work, the worksheet also started with the 1950 information. The worksheet provided for posting (1) changes from the data reported in 1950, (2) areas of extensive nonbenefited or nonagricultural lands within drainage projects, and (3) areas served by two or more projects. For each of these categories, each tract of land was to be entered only once. In recording changes in areas since 1950, a distinction was made between lands for which drainage was established before 1950 and areas added in the 1950-1959 period.

To insure reasonable accuracy in the areas mapped, the net totals obtained from the worksheet were checked to planimeter measurements of the mapped areas in the county. A similar check against planimeter measurements had been made in 1950. If there were no substantial changes since 1950, no remeasurement was made for 1960.

Tabulation of data.—The county worksheets prepared in conjunction with the editing were used as a source for posting the total area in drainage projects, counting only once land served by two or more projects. This net area represented the land classified (1) on the basis of agricultural use, (2) by year when drainage was established, and (3) by number of projects providing drainage service. All other data were tabulated by adding the items as determined for each individual project.

Preparation of maps.—After reconciling the maps and questionnaires, a tracing was made of each county map outlining the overall areas in drainage projects, exclusive of any designated nondrained or nonagricultural portions and projects not qualifying under the 1960 criteria. These tracings of individual counties were then used for the preparation of the individual State and the United States drainage maps.

DEFINITIONS AND EXPLANATIONS

General.—Although the definitions and explanations which follow refer specifically to the 1960 Census of Drainage, many of them also apply to earlier censuses. Items for which the 1960 definitions and explanations are not adequate for earlier years are discussed further under "Comparability of data." Most of the definitions consist of a résumé of the questionnaire wording, supplemented by excerpts from instructions given to enumerators.

Drainage of agricultural lands, from the standpoint of adequacy, can represent varying degrees of improvement. Therefore, the term "drainage" is not subject to a precise definition. It can be defined only in general terms, subject to considerable variation in application by individual respondents and enumerators. In most instances, however, the resulting data have reasonable overall accuracy and usefulness. It should be kept in mind that in individual instances, had the information been obtained from other respondents or by other enumerators, the results could have been somewhat different. This situation helps to explain some of the differences in the results obtained in the different censuses. (See discussion of "Comparability of data.") There are many geographic areas for which the totals shown in 1960 for land with drains established before 1950 differ from the total areas in drainage projects as reported in the 1950 Census by amounts greater than can be explained by changes in definition.

The use in the 1960 enumeration of areas drained and mapped lands as obtained in the 1950 Census, undoubtedly, had some influence on the data tabulated for 1960 and for the mapped areas shown for 1960. A disadvantage of this procedure was the possible acceptance of the 1950 information in instances where more reliable data could have been obtained. The 1960 enumerator, however, was instructed to correct any errors found in the 1950 enumeration. It is likely, therefore, that the undetected errors were fewer than would have resulted in an enumeration that did not make use of information collected previously. On the whole, this practice probably did not influence the 1960 data appreciably.

Drainage.—The term "drainage" as used in this volume refers to agricultural drainage. Drainage is the removal, by artificial means, of excess water to improve the condition of the land for agricultural use. Drainage is accomplished by means of constructed works and may represent deepening, widening, or straightening of a natural channel; the construction of open ditches; the installation of underground tile or conduits; the construction of drainage wells; the installation of pumps for removal of water; or a combination of these methods, including associated works such as dikes or levees, floodgates, bridges and culverts, land leveling, and removal of snags, brush, or other obstructions which impede water flow.

Storm sewers, sanitary drains, highway ditches, and drains for industrial sites were not considered drainage works, for purposes of the census, unless they also accomplished improvement of agricultural lands.

The mere protection of land from flood waters or from surface runoff, with no drainage works provided to remove gravitational soil water from the protected lands, was not considered as drainage. Flood control works may involve (1) channel construction or improvement, (2) the inclusion of floodgates and outlet drains through the constructed levees so as not to impair natural drainage or drainage previously established, or (3) work on levees or ditches associated with drainage. As a consequence, it was sometimes difficult to distinguish between works serving for flood control only and those providing drainage benefits. Thus, some flood control projects of the U.S. Corps of Army Engineers, or portions thereof, were considered as providing drainage services and included in the 1960 Census. Examples include several channel improvements in the Delta and other

alluvial areas in the Mississippi River basin. These, generally, had been listed by the Soil Conservation Service as projects undertaken since 1950 that provided drainage benefits to 500 or more acres of agricultural land. Another example of borderline projects included were those for which construction or enlargement of levees was accomplished by the U.S. Corps of Army Engineers, but for which future maintenance was the responsibility of drainage districts.

Drainage works constructed solely for the removal of irrigation seepage water or for removal of alkali from the irrigated lands were excluded for the purposes of the 1960 Census. Similarly, when a drainage well or ditch served primarily as a source of irrigation water, with drainage no longer a problem, such projects were not to be included. Drainage established because of irrigation, generally, is so tied in with the irrigation works that it should be considered a part of the irrigation works and system rather than drainage. (See "Scope of the 1960 Census of Drainage.") Drainage operations benefiting naturally wetlands were to be included in the 1960 enumeration, even though such lands were also provided with irrigation. As with drainage coupled with flood control, there was evidence of lack of uniformity in determining when drainage of irrigated lands qualified for inclusion. In a few instances, conflicting information was obtained from different respondents for the same project.

Drainage project.—A drainage project is a plan undertaken as a unit to provide new construction, or to provide maintenance and operation of existing drainage works. A drainage project represents an undertaking under one control, supervision, or guidance.

A drainage project may be undertaken by a single landowner. Often, a farmowner cannot accomplish optimum drainage of his land, acting alone. Obtaining an outlet for his ditches may involve crossing some other owner's land. As a consequence, much of the drainage in the United States has been accomplished as community undertakings, participated in by landowners who have common drainage interests. The administrative structure set up to provide unified action for handling the drainage problem is referred to as its organization. All drainage activities under the direct supervision of one organization or management comprise one project. A drainage project may refer to an accomplished plan, i.e., the physical works have been provided and no further work or maintenance is anticipated on the part of the original organization.

For the 1960 Census, all drains constructed and/or operated by one organization were considered as one project even though they were noncontiguous and were constructed at various times. For example, all public drains under the administration of county officials, or under a special board set up to administer public drains in the county, are treated herein as one project. (See discussion of "County-drain" States.) Similarly, drainage sub-districts administered by the officials of the parent district were generally included with the parent district.

When identified, all drains, formerly but no longer under county jurisdiction and with no present organization responsible for their maintenance, were grouped together and included in one separate report. Such drainage "district" may have been discontinued through petition of the landowners or other legal action, or may no longer be considered as under county jurisdiction because of years of inactivity. The instructions to enumerators did not ask specifically for the identification of county drains that had been withdrawn from the county system. The enumeration instructions specified that for most counties in "county-drain" States, the net area had been satisfactorily determined and mapped in 1950 and, therefore, it would be necessary only to determine the area brought in by new drainage works since 1950. Thus, occasionally a 1960 report for county drains may have included some drains not identified as not being under county management in 1960.

For Delaware, which had been enumerated as a "county-drain" State in 1950, even though the predominant form of drainage organization was the drainage district (see discussion of "County-drain" and "Drainage-district" States), a similar procedure was followed even though each of the inactive drains, arbitrarily combined in the one report in 1960, had originally had its own separate organization. The extensive overlapping and super-sequence, which had occurred through years of drainage activity in the State and which had led to the use of a county questionnaire in 1950, was responsible for similar treatment of all inactive drains in 1960.

Only projects providing drainage benefits to 500 or more acres of agricultural land as of January 1, 1960, were included in the 1960 Census. (See definition of "Drainage.") Enumerators were instructed to consider as agricultural land all woodland and wasteland within farms. They were instructed *not* to consider as agricultural land any areas, used solely for the production of wood or timber, which were not a part of a farm.

A project need not provide complete drainage for the area served. Many projects, especially public drains, provided only the principal channel or outlet drain. The construction of the laterals and field drains, which were required to provide complete drainage of the land, may have been left to the individual farm owners. These supplemental drains, though providing drainage to the same area and necessary for the complete drainage system, were not included with the project for which they furnished supplemental works, but each was considered a separate project, and was separately enumerated if benefiting 500 or more acres.

For projects for which works had been taken over by another project (see "Superseded projects."), any portion not taken over was considered a separate project. If the entire project had been taken over, or if the portion not taken over was less than 500 acres, the project was excluded from the census.

The term "project," for describing the unit for enumeration in the 1960 Census, was usually used in preference to "enterprise" or "organization." "Project" more nearly indicates the physical works represented. "Enterprise" or "organization" refers more to the management and implies reference to all activities of the management which may include functions other than drainage. Furthermore, "organization" implies current active management of a group undertaking. The 1960 Census also included projects for which there was no longer an organization in addition to projects having a definite organization, and projects established by individual owners and cooperative groups without formal organization.

Intercounty projects.—For drainage projects extending into two or more counties, a separate report was obtained for the portion in each county. In presenting data by counties the portion in each county was treated as a separate project, but in presenting data by States the entire project was considered as a unit. Thus, the count of projects shown by counties in County Table 1 will not add to the count shown for the State. Differences in the "county count" and in the "State count" are shown in Summary Table 6. In the 1960 Census, 727 intercounty projects were reported with 1,564 county portions. Of these intercounty projects, 643 included land in two counties; 77, in three counties; 3, in four counties; 2, in five counties; 1, in seven counties; and 1, in eighteen counties.

For intercounty projects, the determination of whether the project qualified, from the standpoint of acreage, for inclusion in the 1960 Census was based on the entire project. For that reason, some county parts, treated as separate projects in the presentation of data by counties, represented fewer than 500 acres of drained agricultural lands.

If separate records of the drainage activities for each county part were not available for an intercounty project, the enumerator

was instructed to allocate on an area basis, or other equitable basis, the portion applicable to each county.

For intercounty drains represented in county-drain systems, the enumeration instructions required that the portion in each county be included in one report covering all county drains in the county. This procedure was to be followed irrespective of whether each county part was administered separately, or whether the entire project was administered wholly by one of the counties or jointly by the counties affected. (See "Drainage projects by size.")

Superseded project.—Many drainage organizations were established for a specific purpose such as to construct new drainage facilities, or to renovate or enlarge facilities established by an earlier organization. Upon accomplishment of its immediate objective, the organization often became inactive or was dissolved. When further work was needed, a new organization was established. The new project may have included the same land, more acreage, or less acreage. Over the years there has been extensive overlapping of drainage projects, only a portion of which may now have an active organization. (See "History of the Census of Drainage.")

Projects wholly superseded prior to 1950 were generally excluded from the 1960 enumeration. Those wholly superseded between 1950 and 1960 were always excluded from the 1960 count of drainage projects. If, however, a superseded project reported drainage operations during the decade, 1950-1959, such operations were included in the data presented for drainage operations, 1950-1959. (See Summary Table 6.) Occasionally, this resulted in a greater number of projects reporting operations during 1950-1959 than the total number of projects in 1960.

Control of a project may pass from one organization to another through court action. More often, change in control has occurred when an organization originally responsible for the construction and the maintenance merely ceased to actively operate the drainage works or to provide maintenance, and these functions were assumed by a new organization or management; or the old works were replaced or incorporated in the works of a new organization.

Whenever the area of a project with no active organization was overlapped by one with active organization, or by one more recently organized if neither project had active organization, the editing procedure required that the overlapped area be considered as having been taken over by the active or more recent organization. Projects of less than 500 acres and, therefore, not included in the Census, were never considered as having taken over works of another project.

Area in drainage projects.—The area in a drainage project is usually the area benefited by the drainage works. For a project undertaken by landowners, either individually or cooperatively, it is the area improved or benefited for agriculture as a result of the drainage facilities provided. For a legally organized drainage project, the area in the drainage project is the area established by the decree setting up the drainage district or project. If public drains are administered on a countywide basis, or on the basis of established political boundaries, it is the area directly benefited by the drainage works. In special districts organized primarily for purposes other than drainage, it is the entire area in the district even though only part may be benefited by the drainage works.

The area served by two or more projects was included in each project. The area taken over by one project from another was included in only one, usually the later project. (See discussion of "Superseded projects.")

Since the area of a legally organized project is that established by the court or other authority, it has definable boundaries. If special taxes were collected for the drainage, the area taxed can be considered as the area in the project. The 1930 Census made a distinction between total area and area assessed but the difference amounted to less than one-third of one percent. Changes in

area of a legally organized project may occur because of addition or deletion of land through action of the court or other authority responsible for the organization. Within the boundaries of a project there may be tracts that receive no drainage benefits or land not assessed. Such excluded areas may or may not have been shown in the mapping. This may account for some of the differences between reported and plotted areas.

Generally, the area in a public or legally organized drainage project represents the area benefited. In some instances, however, land liable as security for bonds or other obligations of a drainage organization may include some high or ridge lands with adequate natural drainage, or some wetlands not reclaimable. Also, the project area may include some benefited land not utilized for agriculture. The 1960 enumeration provided for the determination of any contiguous areas, totaling 500 or more acres, not used for agriculture or not benefited by the drainage works. (See "Area not used for agriculture or not drained.")

For organizations providing a major public service other than drainage, the area may include the entire district although the drainage service provided may benefit only a portion of it.

For projects owned by one landowner and projects representing drainage undertakings of two or more landowners cooperating without organization under statute law, the determination of the area was less precise and represented the judgment of the respondent as to the area improved or benefited. The area was often estimated by the Soil Conservation Service in the case of projects for which they provided technical assistance.

The presentation of the 1960 data includes several items relating to area in drainage projects for which a special explanation is considered necessary.

1. *Total area in drainage projects*, as presented in line 5 of County Table 1, line 4 of State Table 1, and Summary Tables 1 and 5, and *Land in drainage projects* as presented in column 1 of Summary Table 7 represents the total area of land, within the specified geographic unit, that was in drainage projects included in the 1960 Census. Land in two or more drainage projects was counted only once. This item includes some land not used for agriculture and some land not drained. (See "Area not used for agriculture or not drained.")

2. *Net area drained and used for agriculture*, as presented in line 8 of County Table 1, line 6 of State Table 1, and Summary Tables 1 and 5, and *Land in drainage projects* as presented in column 1 of Summary Tables 8 and 13, excluded extensive contiguous areas of land not used for agriculture and land not drained. (See "Area not used for agriculture or not drained.") Land in two or more projects is counted only once.

3. *Totals of areas of individual projects*, as presented in line 10 of Summary Tables 1 and 5, column 15 of Summary Table 8, and the area data for drainage projects classified by size of project, by type of organization, and by year started or organized (County Table 1, State Tables 1 through 4, and Summary Tables 1 through 5, and 11, 12, and 13) represent the sum of the areas in individual projects with no deduction for land included in two or more projects. Extensive contiguous areas of land not used for agriculture and land not drained were excluded from this item. (See "Area not used for agriculture or not drained.") The difference between this item and the preceding item is due to land served by two or more projects. (See "Area served by two or more projects.")

Area not used for agriculture or not drained.—The area in drainage projects frequently included land that was not being used for agriculture or land that was not receiving drainage benefits from works installed or operated by the project. (See definition of "Area in drainage projects.") Two questions (16 and 17) on the 1960 Drainage Questionnaire identified contiguous tracts of 500 or more acres of such land within the area reported for the project. The area not benefited might represent land for which the drainage works had completely deteriorated or land for which no drains had been provided. For a project which provided both drainage and flood protection, the questionnaires identified, for exclusion, any land protected from overflow with no drains provided. Land with drainage required solely because of irrigation was, likewise, identified and excluded.

Land within drainage project boundaries not used for agriculture might be wasteland, cutover land, residential or industrial areas, airports, military installations, public parks, wildlife refuges, State or National Forests, commercial woodland, or other lands in nonagricultural use.

Inquiries which served to identify areas of nonagricultural or nonbenefited lands within drainage projects could not be utilized advantageously to locate all such lands. For that reason, the effort was restricted to the determination of contiguous areas of 500 or more acres. In the application of this requirement, small scattered tracts of benefited agricultural lands, in extensive areas predominantly non drained or nonbenefited, were sometimes disregarded in the enumeration or in the office processing. Enumerators, also, occasionally failed to report areas, such as towns, airports, public parks, wastelands, etc., which obviously were nonagricultural or nonbenefited. This omission may have been due to misunderstanding as to the nature of the information available for the project from the 1950 Census. Information for lands not used for agriculture or not benefited was not obtained in 1950. The 1960 instructions had stressed the need for obtaining changes in operations since 1950. With no change in the situation, the enumerator may not have been aware of the need for this information. Whenever an omission was indicated, the nonagricultural or nonbenefited areas were determined through correspondence or from examination of maps and aerial photographs available in the Bureau.

The item identified in the tables as "Net area drained and used for agriculture" was obtained by subtracting, from the total area in drainage projects, only the included tracts of 500 or more contiguous acres reported as not used for agriculture or not drained. Thus, the area shown as drained and used for agriculture may include many acres of interspersed nonagricultural or non drained lands in tracts of less than 500 contiguous acres. This explains why the "Net area drained and used for agriculture" reported for a county sometimes exceeds the total land area in farms.

In the tables showing the total areas of individual projects classified by size, type of organization, and year started or organized, any contiguous tracts of 500 or more acres identified as being nonagricultural or non drained were excluded. If the total area served by an individual project, exclusive of such nonagricultural or nonbenefited lands, was less than 500 acres the project was "rejected" and excluded from the 1960 totals. For intercounty projects the determination was based on the entire area, and not on the portion in each county.

The exclusion of nonbenefited portions, in the presentation of area data for projects classified by size, by type of organization, and by year started or organized, resulted in the data for one Florida county showing one project with no acres. A major project reported for Florida extended into 18 counties several of which were reported as receiving no drainage benefits as of January 1, 1960, from works constructed or operated by the project. Much of the work done prior to the census date represented planning and engineering. Completed construction and costs for operation of drainage works were limited, as of January 1, 1960, to 9 of the 18 counties.

Land by year drainage was established.—The area drained and used for agriculture was classified, on the basis of when the drainage was established, into two groups, as follows: (1) *Drainage established before 1950* and (2) *area added 1950-1959*. If a project took over the works of another, or provided supplemental service to an area included in an earlier project, the land was usually classified on the basis of the drainage established by the earlier project. Thus, land reported as in drainage projects in the 1950 Census was, with few exceptions, classed as provided with drainage prior to 1950. Generally, for drainage projects reported as organized or started prior to 1950, all the land reported as in the project on January 1, 1950 (question 13 on the questionnaire) was classed as having drainage established before

1950. Land reported as added since January 1, 1950 (question 14 on the questionnaire) was considered as land with drainage established since 1950, provided new works were reported and the added area did not represent an overlapping of area included in the 1950 area of some other project. Additions to a project, which had been made because the lands were already receiving drainage benefits, were not considered as "area added 1950-1959."

For a project started in 1950 or later, the entire area, except for any portion overlapping an older project, was classed as having drainage established in the 1950-1959 period. Usually, the determination of drainage established for new areas was supported by reports of newly constructed drainage works. In a few instances, the drainage works reported for the newly drained lands consisted entirely of cleanout or restoration of old works. If the land had not been included in the 1950 Census, or in another project reported in 1960, the area was classed as having had its drainage established in the 1950-1959 period, on the assumption that the old works requiring renovation had ceased to provide the area with drainage benefits.

The assessed or taxed area of a project sometimes included land for which the drainage had not been established. In the case of an organization providing a public service, other than drainage, only a portion of the area of the project may have been receiving drainage benefits. For this reason, there were some instances where the 1950 area of a project included land for which drainage was actually first established since 1950.

Land classified on the basis of when drainage was established should not be confused with land reported for drainage projects classified on the basis of when the project or organization was started. (See Summary Table 13 and discussion of "Drainage projects by year started or organized.")

Area served by two or more projects.—The area served by two or more projects was obtained (1) through the questionnaire inquiries on overlapped area (Section IV of the questionnaire) and (2) by checking the mapped boundaries of each project. Careful determination of the overlapped areas was essential to the determination of the net land benefited by drainage projects and, for that reason, received special consideration in the editing process. A distinction was made between areas taken over and areas provided separate or supplemental service.

Usually, separate or supplemental service was the result of one project providing the outlet drainage facilities and another the laterals or branch drains. Or, each may have provided certain specified drainage works or services. Sometimes three or more projects provided service to the same area. As a general rule, the editing instructions considered that overlapped areas, as determined from the mapping of the lands in each project, represented dual service except when it was determined that one project had taken over the lands of another.

In making the determination of the area served by two or more projects, consideration was given to possible errors in mapping. If the plotted areas of two projects indicated overlapping, but the net area mapped for the two projects was equal to the sum of the areas reported for each without any deduction for overlap, the projects were considered as not having any area in common. A similar determination was made for adjoining projects when one did not provide an outlet for the other. The apparent overlap may have been indicated solely because the source materials for mapping did not reflect all revisions in the boundaries of each of the two projects.

In presenting the portion of the net land area in drainage projects represented by tracts served by two or more projects (line 11 of County Table 1, line 9 of State Table 1, and Summary Tables 1 and 5, and columns 7-10 of Summary Table 8), each tract served by two or more projects was counted only once. In presenting the portion of the totals of areas of individual projects provided with service by one or more other projects (column 3

of State Tables 2, 3, and 4; also column 3 of Summary Tables 2, 3, and 4) each tract receiving service from two or more projects was included for each of the projects. The differences in the totals shown for these two items were the result of the multiple counting, in the latter, of land served by two or more projects. Lands served by two projects were included in each of the two projects; lands served by three projects, in each of the three; etc. The total net area drained and used for agriculture, likewise, does not contain any duplication of land served by two or more projects but the totals of the areas of individual projects include multiple counting of the land included in more than one project.

Approximate land area.—The approximate land area comprises land in farms, cities, forests, swamps, deserts, etc., and the area occupied by streams, sloughs, estuaries, and canals less than one-eighth of a mile in width, and lakes, reservoirs, and ponds of less than 40 acres. Changes since 1940 reflect political changes in boundaries or actual changes in land area caused by changes in number and size of reservoirs, lakes, etc. The figures for 1940 represent a complete redetermination of the area and may differ from those shown for earlier years.

Land in farms.—The acreage designated under "Land in farms" was obtained in the census of agriculture. The "land in farms" figures, shown in the tables presenting data for the 1960 Census of Drainage, are from the 1959 Census of Agriculture taken in the fall of that year. "Land in farms" consists primarily of lands used for agriculture, but also includes considerable areas not actually under cultivation nor used for pasture or grazing. All woodlands and wastelands owned or rented by farm operators were included unless being held for nonagricultural purposes or unless the acreage was unusually large.

Drainage operations, 1950-1959.—For each project included in the 1960 Census, information was obtained for drainage activities for the 10-year period, 1950 to 1959, inclusive. The 10-year period could be on either a calendar- or fiscal-year basis. In either case a report was intended to include a full 10-year period. For convenience, a worksheet was provided for entering data for each of the 10 years.

Reports on drainage works and services during this 10-year period were required for all projects which, at any time during the period, provided drainage benefits to 500 or more acres which were being used for agriculture in 1960. The data for drainage works and services, therefore, include totals for some projects which had been taken over by another project prior to 1960.

When a project provided a major public service in addition to drainage, the enumerator was instructed to include with the drainage works ditches, pumps, or other works, or portions thereof, that accomplished drainage of agricultural lands even though these served primarily as storm sewers, sanitary drains, highway ditches, or for the drainage of residential or industrial sites, or for irrigation, or for some other special purpose. If no separate records were kept, costs and works were to be allocated to provide an equitable share to agricultural drainage. If the allocation was not made in the field enumeration, the allocation was made during office processing, unless the amounts involved were exceptionally large. In the latter case, the information was obtained through correspondence.

Cost of all drainage works and services.—The inquiry called for the total cost of all drainage works and services provided for the 10-year period, 1950-1959. The total was to include costs for all drainage activities of the organization, including construction or installation of new drainage works, enlargement or complete replacement of prior works, cleanout or restoration of old works, maintenance, operation, or repair of drainage works, and administration. The questionnaire required the inclusion of all costs relating to the works and services provided, regardless of when paid or to be paid. Specific mention was made of costs of organization, engineering, rights-of-way, legal services, and administration. Payments on principal or interest on bonds or notes were

not to be included. The enumeration instructions asked for the inclusion of all costs for physical works, materials, equipment, etc., regardless of the source of the funds used. Costs paid by a county, a State, or the United States Government, or by another drainage organization for use of facilities provided by the reporting organization were to be included.

New drainage works constructed, enlarged, or installed.—New drainage works referred to the digging or placement of drains where none existed before; the straightening, enlarging, widening, deepening, or relocation of natural channels or of prior ditches; or the installation or replacement of drainage pumps. The original construction of levees or dikes for the protection of lands provided with drainage, or their extension or enlargement, was, likewise, considered as new drainage construction. Maintenance, cleanout, or restoration of prior works, with no enlargement or change in the original works, were not considered new drainage construction.

The enumerators experienced some difficulty in determining when work on old drains was to be considered as new works.

For each of the three principal types of drainage works—*open ditches, tile or covered drains, and levees or dikes*—information was obtained as to the length of new construction; and for *pumps*, the number of newly installed pumps. New works represented by other structures such as drainage wells, sumps, flood or tide gates, bridges, culverts, wellhouses, and land leveling were to be reported under “*other*.” No information was obtained for these “*other*” new drainage works except their type. The data presented include only a count of the projects reporting “*other*” new works.

Costs of new works.—This part of the overall cost for drainage was obtained in a separate question by asking how much of the total cost of works and services represented the cost of new drainage works reported.

Cost of maintenance, operation, repair, and administration.—This was obtained by subtracting the costs of new works from the total costs reported for all drainage works and services.

Drainage projects by size.—Drainage projects were classified on the basis of the total acres of agricultural land receiving drainage benefits from works of the project. In the classification by size of project, the portion in two or more projects was included in each project. For intercounty projects, the determination of size was based on the total acres in the project, not on each county portion.

For a project comprising all drains under the jurisdiction of a given county, the area represented the combined total of the individual areas of drained land in the county that were administered by county officials, including portions of intercounty drains administered by other counties. Although projects with fewer than 500 total acres were excluded from the 1960 Census, the crediting of each portion of a county drain to the county in which located resulted in reports for county drains for two counties in 1960 showing less than 500 acres of drained agricultural lands. These two counties were Benton, Iowa, and Jerauld, South Dakota. In 1950, there were three such “county-drain” reports, the two counties mentioned above and Fulton, Kentucky.

For Delaware, all drainage projects for which there was no active organization at the time of the census were grouped into a single report for each county. This arbitrary procedure affected the data presented by size of project.

Drainage projects by type of organization.—Drainage projects were classed by type of organization into three groups:

1. **Drains owned by one landowner**—A landowner may be an individual, a partnership, an estate, a private corporation, or an institution.
2. **Cooperative or mutual drains** represent undertakings by two or more landowners cooperating without special organization under State drainage laws for the construction or operation of drainage works benefiting their lands. Many of the

cooperative or group drainage projects were undertaken under the guidance of the Soil Conservation Service.

3. **Legally organized public drains** represent community or public drainage undertakings accomplished through some form of governmental organization. These could be an organization administered by public officials of a county, a township, a State, an agency of the Federal government, or by specially elected or appointed officials or boards. A large variety of general or special State laws provide for equitable cooperation among landowners who will be benefited by a drainage undertaking. (A synopsis of drainage laws in the various States was included in the 1940 Census of Drainage report.)

Although legally organized drainage projects represent a large variety of types, most fall into two major groups. (1) County drains are governed by county officials or by a special official or board elected or appointed to administer public drainage undertakings in the county. In the 1960 Census all county drains in a county were treated as though they represented one project. (See “Drainage project,” “Intercounty projects,” and “County-drain” States.) (2) Drainage districts are governed by a special official or board elected or appointed for that particular project. (See “Drainage-district” States.)

Drainage projects by year started or organized.—The classification of projects by the year in which they were started or organized provides an indication of relative drainage activity in different periods of time. The drainage activity may not necessarily have represented construction of new works or the establishment of drainage on lands not previously benefited. Frequently the purpose of a new drainage project or organization was the restoration or improvement of existing drainage facilities, their extension, or the construction of supplemental works.

The classification of a project by year the project was started or organized should not be confused with the classification of the land by the year in which drainage was established. (See “Land by year drainage was established.”) A project started or organized prior to 1950 may include some lands for which drainage was first established since 1950 while a project started or organized since 1950 may include lands on which drainage had been established by a prior project. State Table 4 and Summary Table 4 provide data on land by the year drainage was established for projects started or organized before 1950, and those started or organized in the period 1950–1959, respectively.

COMPARABILITY OF DATA

Continuity maintained despite changes.—The scope and content of the Census of Drainage has varied considerably since the first Census of Drainage in 1920. Notwithstanding the variation, a reasonable degree of continuity has been maintained in the data collected and tabulated. In 1920, 1930, and 1940, emphasis was placed on the status of drainage facilities as of the census date while in 1950 and 1960, emphasis was placed on the drainage activities for the most recent 10-year period.

Changes in enumerative procedures.—The Census of Drainage has always been primarily a census of community or public drainage undertakings and of the larger private drainage undertakings. Variations in the methods employed and the scope of the census have had the most effect on the number of projects covered but have not greatly affected the comparability of other items. The major changes have been (1) the elimination, in the enumeration, of numerous projects which had been taken over by a later project; (2) the exclusion of projects of under 500 acres which, because of their small size and tendency to represent overlapped projects, had contributed very little to the overall drainage area; (3) the consolidation into a single report of undertakings under common management; (4) the elimination of drainage undertakings representing an integral part of irrigation with the drainage required solely because of the irrigation of the land; and (5) the identification of extensive contiguous areas, within drainage projects, that were not used for agriculture or not drained. It will be noted that the changes listed under (1) and (3) had no effect on

the net area or drainage facilities covered in the census; the change under (2) reduced greatly the number of reports without any substantial reduction in the area or drainage facilities covered; the effect of the change stated under (4) was restricted to irrigated areas for which there was no need for drainage prior to irrigation; and the effect of the change listed under (5) was to provide more accurate data for lands which had been improved for agriculture by drainage.

Elimination of superseded projects.—In the first three censuses an attempt was made to obtain reports for all public drainage organizations, regardless of size, which had contributed to the investment and to the physical works represented in public drainage undertakings in existence at the time of the census. Reports were required for some organizations which had been wholly superseded by later projects. Quite commonly, a drainage organization had been established to provide a particular service and was dissolved or discontinued upon completion of the specified undertaking. When additional work was required, a new organization was created. In some counties the same land had been covered several times. For example, in 1940 in Ohio the total of areas of individual projects was more than 3 times larger than the total land area represented by all drainage projects in the State. (See Summary Table 8.) In the 1940 Census of Drainage Report, a distinction was made between "number of reports" and "number of enterprises," the latter intended to represent projects that had not been superseded by later organizations. For all drainage States reported in that census, the number of reports totaled 79,220, of which nearly half represented projects that had been superseded by later projects. Only 42,363 of these reports, or 53.5 percent, represented projects that had not been superseded.

The change in 1950, requiring the reporting of drainage activities for the most recent 10-year period, in lieu of an inventory of all physical works and the total capital investment represented by these works, made possible the elimination of reports which had contributed to the drainage works and to capital investment, but which no longer provided any drainage services. The effect of this elimination, in respect to number of reports, is shown by a comparison of number of projects, 1940, and number of reports, 1940. (See Summary Table 6.)

Elimination of projects under 500 acres.—A large proportion of the reports obtained in the first three censuses of drainage represented very small public drainage undertakings whose combined contributions to the overall totals were negligible. In 1940, more than half of the reports were under 500 acres but these small reports contributed only 5 percent to the net land area represented by all drainage projects. The decision to exclude public drainage projects of under 500 acres in the 1950 Census enumeration did not appreciably reduce the census coverage of drainage facilities but did eliminate the necessity of obtaining large numbers of reports that would contribute little significance to the statistics collected. Privately owned drainage projects of under 500 acres have been excluded from all five Censuses of Drainage.

A comparison of the total number of reports in 1940 and the number in 1940 excluding those representing fewer than 500 acres, is presented in Summary Table 6. Summary Table 11 provides a comparison of the totals of the acres in individual projects for all reports obtained in 1940 and for those under 500 acres. In making a comparison of the total areas, it should be kept in mind that nearly one-half of the totals of the acres of individual projects of under 500 acres represented land overlapped in other projects.

In 1950, although projects of less than 500 acres were eliminated from the enumeration, the data include 8,286 reports and 604,757 acres representing reports of under 500 acres of drained irrigated land reported in the Census of Irrigation.

One report for all drainage undertakings under same management.—More than four-fifths of all reports obtained in each of the first three censuses of drainage were from three States—Ohio,

Indiana, and Michigan. In each of these States, most of the drains were administered by county officials.

The decision in the 1950 Census to use one questionnaire to cover all drainage activities in each county in these and 7 other States greatly simplified the enumeration. (See "History of the Census of Drainage" and "County-drain" States.) It was no longer necessary to plot the land for every successive drainage activity. If records in the county provided totals for all drainage activities, it was not necessary to search out the data for each individual undertaking.

In these three States the number of reports obtained in the enumeration was reduced from 64,881 in 1940 to 196 in 1950. (See Summary Table 6.) A disadvantage of the procedure followed in 1950 was its failure to provide separate information for projects that were not under county management. These projects had been arbitrarily included in 1950 in the one report obtained for each county.

In 1960, the procedure was modified to obtain separate information for each project having its own separate organization but required, in all States, one report for all drainage undertakings under the same management. (For further discussion of the effects on the statistics of this enumeration procedure see "County-drain" States.)

Elimination of irrigation drainage.—In taking the earlier censuses of drainage, considerable difficulty had been experienced in obtaining satisfactory data for irrigation projects having their own drainage. In 1950, the reporting on the drainage questionnaire was so incomplete that it was decided to use the more limited data secured in the Census of Irrigation for that year. The drainage data available from the irrigation census were limited to the area of irrigated lands provided with artificial drainage and the number of projects reporting drainage. Some downward adjustments were made in these irrigation census data to eliminate drainage activities of separately organized drainage districts. Adjustments were limited to Florida, Louisiana, and Texas. The replies received in the 1960 mail canvass for irrigation enterprises indicated that there had been additional duplication which had not been eliminated. The exact location of the drained land reported in the 1950 Census of Irrigation had not been required. Consequently, no satisfactory check for duplications in the drained areas reported in the 1950 Census of Irrigation and those reported in the Census of Drainage was possible.

The decision, in 1960, to eliminate coverage of drainage required solely because of irrigation resulted in the exclusion, in that year, of most of the 9,076 reports and much of the 4,119,059 acres of drained lands reported in the 1950 Census of Irrigation and included in the 1950 drained land totals. Of these totals from the Irrigation Census, 8,286 reports, with 604,757 acres, were eliminated because of the 500-acre limitation. In addition to drainage performed by irrigation enterprises, the 1950 Census of Drainage included 267 drainage enterprises, organized separately, for which the drainage was principally for the purpose of removal of alkali or seepage from irrigated land. These 267 enterprises accounted for 1,270,729 drained acres in the 1950 total. The 1960 reports for most of these projects again indicated that the drainage was required solely because of irrigation and, therefore, were excluded from the tabulations.

Identification of nonagricultural and nondrained lands.—In the 1950 Census of Drainage Report, the total land in drainage projects for 40 small geographic areas—22 parishes in Louisiana; 4 counties each in Florida and Michigan; 3 counties each in Minnesota, Ohio, and Texas; and 1 in Arkansas—exceeded the total land in farms by 20 percent or more. The excess for these 40 small geographic areas amounted to 10,150,825 acres, or 9.9 percent of the total land in drainage projects reported for all drainage States.

In 1960, the determination of extensive nonagricultural and nondrained tracts within all drainage projects resulted in the identification of 9,573,393 acres, or 9.4 percent of the land in drainage projects, as not being used for agriculture or not benefited by the drainage works provided. The inquiry, which allowed for the determination of such land, permitted the identification and exclusion of former drainage district lands which now represent special use areas, such as State forests, wildlife refuges, recreation areas, etc. Similarly, it aided in identifying lands which had been withdrawn from an existing district for one or more of these special uses. Also excluded from the total area were large areas of swamp or waste lands and other nonbenefited areas in so-called countywide drainage districts. In 1960 the enumeration procedure called for the inclusion of only the portion taxed, if special levies were made against landowners directly benefited, or the portion actually improved if the entire county was taxed. In 1950, the entire area of the county was included.

Differences in reporting overlapped areas.—The consolidation into a single report of two or more undertakings under common management did not allow for the reporting of areas provided with supplemental services.

The land area in drainage projects, counting only once land in two or more projects, was accomplished in 1920 and 1930 by determining for each project the area not represented in an earlier project, whereas, in 1940 and 1950, this was accomplished by determining the area not in a later project. In 1960, the determination was made through the use of a worksheet which provided for counting only once each piece of land represented in the plotting of the projects on the county map.

In Summary Table 8, which presents data on areas served by two or more projects, the 1960 area is that which was provided drainage services by two or more projects. The 1950 totals for overlapped areas were obtained by subtracting from the sum of the acres of individual projects the net land area represented by all projects. The 1940, 1930, and 1920 totals for overlapped areas were, likewise, obtained by difference and were further affected by the inclusion of projects which had been superseded by later projects. (See "Elimination of superseded projects.")

In Summary Tables 12 and 13, land in two or more projects was included in 1960 for each project, thus representing multiple counting of such lands. For 1950 and 1940, only land not taken over by a later project was included. For 1930 and 1920, only land not represented in an earlier project was counted. In Summary Table 13, the area presented by year the project was started or organized represents, for 1950 and 1940, the area by year of beginning of the most recent drainage undertaking, while the 1930 and 1920 data represent more nearly the year drainage was first established for the area.

"County-drain" States.—The grouping of States, similarly affected by changes in procedure, permits a better comparison of historical data. The group of States most affected by changes in procedure were the 10 States designated in the 1950 report as "county-drain" States.

The simplification of the 1950 questionnaire and the use of only one report in 1950 for each county, for these 10 States, resulted in the omission of inquiries on pump drainage, year and type of organization, and overlapping of drainage projects. In presenting drainage data in 1950, for these States, no count was shown for number of projects and no classification was shown for type of project, year of organization, or size of project. In this report, the count shown for 1950 is the number of counties for which a report was included. In the 1960 presentation, each of the 1950 county reports was considered as presenting a legally organized drainage project and was classified by size on the basis of the total acres reported for the county. The possible inclusion in the county report of undertakings of individual landowners or of cooperating groups of landowners without formal organization under State laws was disregarded.

In 1960, the determination of the year started or organized for a combined report represented the year the management was established, or the year the first drain was started if the management preceded the drainage activities. The determination of the land for which drainage had been established since 1950, however, provided a measure of new undertakings for organizations established before 1950.

Except for Delaware, the predominant type of drainage organization in the so-called "county-drain" States was the county drain. For most counties in these States, the 1960 procedure provided data very comparable to those in 1950. The change in procedure affected only counties having drainage organizations not classed as county drains. For Delaware, since the predominant type of drainage organization was the drainage district, under the 1960 procedure each district required a separate report. The combined report used in 1950 was retained in 1960, for Delaware, only for districts for which there was no organization in 1960. (See "Drainage projects by size.")

"Drainage-district" States.—This designation was used for all drainage States other than "county-drain" States. For these States, the predominant type was the drainage district and the 1960 and 1950 procedures more nearly paralleled those used in 1940. The most pronounced difference was in the reporting of irrigation drainage.

"Irrigation" States.—This designation is used for that group of "drainage-district" States for which the 1950 data included drained lands reported in the Irrigation Census. The effect on the data, of the exclusion in 1960 of drainage undertakings which had been required solely because of irrigation, was limited to these States and a few counties in the "county-drain" States.

"Other" States refer to those "drainage-district" States not affected by the method of handling irrigation drainage. These States were least affected by changes in procedures.

SUMMARY OF DRAINAGE ACTIVITIES

The total area in drainage projects serving agricultural lands, as determined in the 1960 Census, was 101,870,257 acres. This area, benefited by drainage projects of 500 or more acres, is less than the 102,688,331 acres reported in 1950 but actually represents an increase for comparable categories of land. The 1960 data did not include approximately 3 million acres of drained irrigated lands and about 6 million acres of swamp and waste lands counted in 1950 but excluded under the 1960 procedures.

Of the 1960 total area of 101,870,257 acres within drainage project boundaries, 9,573,393 acres represented extensive areas either not being used for agriculture or not benefited by drainage works established by the projects. The remaining 92,296,864 acres, after the exclusion of extensive nonagricultural and nondrained lands, represented the area predominantly agricultural which had been benefited by installed drainage works. However, this total contained an unknown amount of interspersed nonagricultural land. Drainage was reported, as newly established since 1950, on 5,336,593 acres. This newly established drainage area represented both improvement of lands already in agriculture and the reclamation of new lands for agriculture. One-third of these newly drained lands represented additions to drainage projects in existence in 1950 and two-thirds, lands for which drainage works were established by projects started since 1950.

Projects initiated since 1950 also included new works or services for 2,637,792 acres on which drainage had been previously established. A large proportion of these newly established projects were undertakings of groups of farmowners cooperating without legal organization or undertakings of individual farmowners. The acreage of benefited lands of individual landowners and cooperative groups was approximately $2\frac{3}{4}$ times that reported in 1950.

In 1960, projects started prior to 1950 accounted for 93.6 percent of the total agricultural lands reported as provided with drainage.

Three-fifths of these older projects reported drainage activity in the period 1950 to 1959, with one-fifth reporting construction of new drainage works. Approximately one-fifth of those providing new works since 1950 had extended their facilities to lands not previously drained. Two-fifths of the projects started before 1950 reported no maintenance or other drainage services provided since 1950. Maintenance work on public drains by individual landowners would not have been included in the reports for public drains.

The total cost of drainage works and services for the 10-year period amounted to \$416,875,865, of which \$185,688,673 was for new works. New facilities represented, principally, construction of 33,543 miles of open ditches; 2,192 miles of tile or covered drains; 2,017 miles of levees; and the installation of 957 pumps. Costs for maintenance and operation of established drains, exclusive of any maintenance for public drains by individual landowners, amounted to \$2.50 per acre drained, or 25 cents per acre per year.

The greatest portion of the agricultural land in drainage projects is located in the North Central States and lower Mississippi Valley. The States with the largest drained acreage in 1960 were Indiana with 11,053,446 acres, Minnesota with 10,560,808 acres, Michigan with 9,877,049 acres, Ohio with 8,809,415 acres, and Louisiana with 7,110,624 acres. These five States accounted for more than one-half of the total drained agricultural land. These

States were followed in order by Iowa with 6,871,339 acres, Texas with 5,691,130 acres, Illinois with 5,563,426 acres, and Florida with 4,855,327 acres.

Three States accounted for more than one-half of the land on which drainage had been newly established since January 1, 1950. These three States were Minnesota with 1,244,237 acres on which drainage had been newly established, Louisiana with 965,687 acres, and Florida with 548,956 acres. Other leading States were Texas with 318,198 acres, North Carolina with 254,482 acres, Mississippi with 249,368 acres, California with 244,352 acres, and Arkansas with 233,263 acres. These eight States accounted for more than three-fourths of the total land on which drainage had been established since January 1, 1950.

Florida led all States in the amount spent for agricultural drainage for the 10-year period, 1950 to 1959, with a total cost of \$91,627,636 for all drainage works and services. Of this total, \$68,012,516 represented an outlay for new construction. Florida accounted for more than one-fifth of the total reported by all States for drainage works and services and more than one-third of the total cost of new works. Louisiana reported a total expenditure of \$45,796,344, and Minnesota, \$41,809,993, with more than one-half of each total representing new works. Michigan followed with a total cost of \$37,186,074, of which \$32,402,708 was for maintenance, the largest amount of maintenance reported for any State.

SUMMARY

(1)

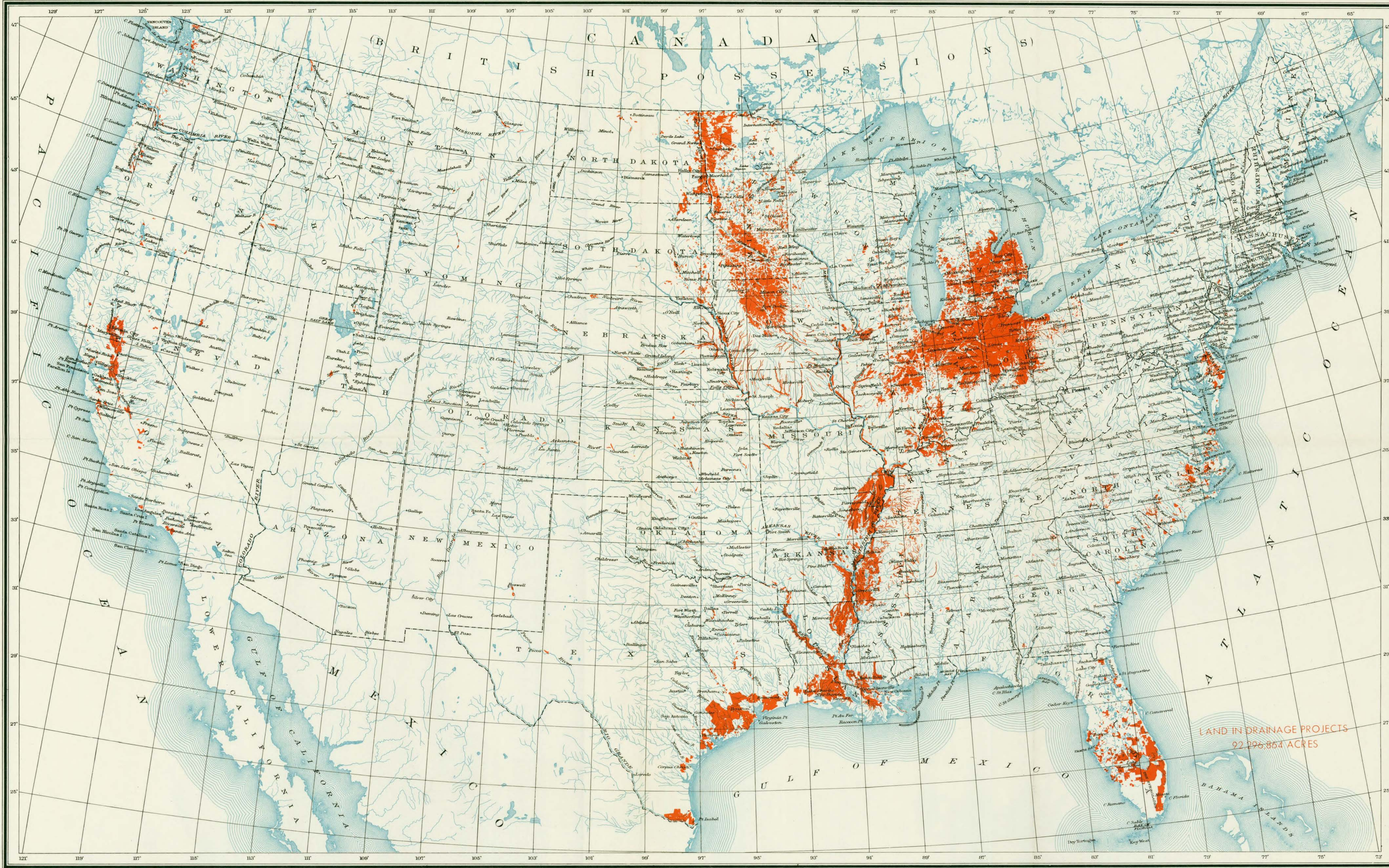
DRAINAGE OF AGRICULTURAL LANDS

CONTERMINOUS UNITED STATES—LOCATION OF LAND IN DRAINAGE PROJECTS, 1960
(Projects benefiting 500 or more acres of agricultural land)

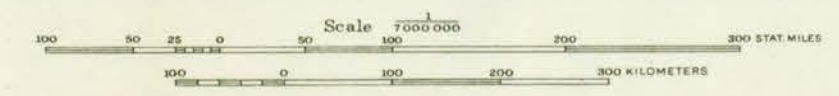
See inserted folded map

CONTERMINOUS UNITED STATES—LOCATION OF LAND IN DRAINAGE PROJECTS, 1960

(Projects benefiting 500 or more acres of agricultural land)



LAND IN DRAINAGE PROJECTS
92,296,864 ACRES



SUMMARY

Summary Table 1.—DRAINAGE PROJECTS—NUMBER, AREA, COST, AND WORKS: CENSUSES OF 1920 TO 1960

Item	1960 Census (39 States)	1950 Census (40 States)	1940 Census (38 States)	1930 Census (35 States)	1920 Census (34 States)
AREA					
Approximate land area.....acres...	1,744,413,440	1,819,123,840	1,785,136,000	1,743,699,840	1,717,932,160
Land in farms.....acres...	1,052,713,726	1,123,690,602	1,004,930,884	905,805,407	844,904,236
Drainage projects.....number	8,461	14,533	139,597	167,927	156,949
Total area in drainage projects.....acres served...	101,870,257	102,688,331	86,967,039	84,408,093	65,495,038
Area not used for agriculture or not drained.....acres served...	9,573,393	NA	NA	NA	NA
Net area drained and used for agriculture.....acres served...	92,296,864	NA	270,068,469	268,640,109	NA
Drainage established 10 years or more before Census date.....acres served...	86,960,271	NA	NA	NA	NA
Drainage established within 10 years of Census date.....acres served...	5,336,593	NA	NA	NA	NA
Area served by two or more projects.....acres served...	6,276,437	3,962,516	45,861,412	44,086,985	30,134,253
Total of areas of individual projects ³.....acres served...	99,098,430	106,650,847	132,828,451	128,495,078	95,629,291
PROJECTS BY SIZE					
Under 500 acres.....number of projects...	...	8,289	41,690	31,056	22,205
.....acres served...	...	606,031	9,065,810	7,348,844	6,374,640
500 to 999 acres.....number of projects...	2,847	1,593	15,855	15,765	10,712
.....acres served...	1,950,621	1,103,139	11,234,727	11,130,096	9,091,516
1,000 to 4,999 acres.....number of projects...	3,669	2,757	17,213	16,767	11,757
.....acres served...	7,764,699	6,201,930	35,069,097	34,074,009	29,522,536
1,000 to 1,999 acres.....number of projects...	2,081	1,412	10,467	...	...
.....acres served...	2,881,301	1,983,206	14,558,019	...	...
2,000 to 4,999 acres.....number of projects...	1,588	1,345	6,746	...	...
.....acres served...	4,883,398	4,218,724	20,511,078	...	...
5,000 to 9,999 acres.....number of projects...	728	679	2,357	2,291	1,472
.....acres served...	5,081,845	4,754,671	16,387,515	15,865,002	13,357,936
10,000 to 49,999 acres.....number of projects...	819	818	1,884	1,814	1,107
.....acres served...	16,758,378	17,098,296	36,721,074	35,075,951	23,826,149
10,000 to 19,999 acres.....number of projects...	499	484	1,228	...	...
.....acres served...	6,963,107	6,781,099	16,964,180	...	...
20,000 to 49,999 acres.....number of projects...	320	334	656	...	...
.....acres served...	9,795,271	10,317,197	19,756,894	...	...
50,000 to 99,999 acres.....number of projects...	152	145	159	168	115
.....acres served...	10,630,513	10,254,850	10,760,472	11,403,982	8,605,536
100,000 or more acres.....number of projects...	246	252	62	66	31
.....acres served...	56,912,374	66,631,930	13,589,756	13,597,194	4,850,978
PROJECTS BY TYPE OF ORGANIZATION					
Drains owned by one landowner.....number of projects...	1,817	4,551	NA	NA	NA
.....acres served ⁴ ...	4,162,544	41,382,830	6985,046	6854,880	6642,018
Cooperative or mutual drains.....number of projects...	2,469	4,893	(7)	(7)	(7)
.....acres served ⁴ ...	3,577,204	41,409,494	(7)	(7)	(7)
Legally organized public drains.....number of projects...	4,175	4,013	NA	NA	NA
.....acres served ⁴ ...	91,358,682	495,776,948	681,705,415	680,894,347	664,352,059
PROJECTS BY YEAR STARTED					
Started 10 years or more before Census date.....number of projects...	5,958	83,749	NA	NA	NA
.....acres served ⁵ ...	92,839,578	832,193,879	81,000,792	73,691,488	936,545,774
Started within 10 years of Census date.....number of projects...	2,503	81,263	NA	NA	NA
.....acres served ⁵ ...	6,258,852	814,351,738	5,966,247	10,716,605	928,719,717
DRAINAGE OPERATIONS, 10-YEAR PERIOD PRECEDING CENSUS DATE					
Cost of drainage works and services.....projects reporting...	6,137	43,810	NA	NA	NA
.....dollars...	416,875,865	179,033,770	NA	NA	NA
New drainage works constructed, enlarged, or installed.....projects reporting...	3,606	101,128	NA	NA	NA
.....cost, dollars...	185,688,673	1023,872,422	NA	NA	NA
Open ditches.....projects reporting...	3,333	1,200	NA	NA	NA
.....length, miles...	33,543.5	9,301	NA	NA	NA
Tile or covered drains.....projects reporting...	427	146	NA	NA	NA
.....length, miles...	2,192.1	581	NA	NA	NA
Levees or dikes.....projects reporting...	322	152	NA	NA	NA
.....length, miles...	2,016.9	1,020	NA	NA	NA
Pumps.....projects reporting...	357	NA	NA	NA	NA
.....number of pumps...	957	NA	NA	NA	NA
Other (see text).....projects reporting...	264	NA	NA	NA	NA
Cost of maintenance, operation, repair, and administration.....projects reporting...	4,042	NA	NA	NA	NA
.....dollars...	231,187,192	155,161,348	NA	NA	NA
STATUS ON CENSUS DATE					
Capital investment.....dollars...	NA	NA	691,724,519	680,250,255	372,273,567
Physical works:					
Open ditches.....length, miles...	NA	NA	146,152.3	138,673.0	107,468.2
Tile drains.....length, miles...	NA	NA	55,734.0	55,031.9	42,311.7
Levees and dikes.....length, miles...	NA	NA	6,792.9	6,539.5	3,509.8
Pumping units.....projects reporting...	NA	8369	353	292	210
.....number of units...	NA	81,146	1,284	1,028	453

NA Not available.

¹For 1950, the number includes irrigation enterprises reporting drained land in the Census of Irrigation; for the 10 "county-drain" States, all drainage projects in each county were enumerated as a unit. In 1940 and earlier, each drain was counted a separate project. For 1930 and 1920, the count represents the number of reports and includes projects wholly superseded by later projects and, for intercounty projects, the separate reports for each county. See Summary Table 6 and text. See Summary Table 11 for explanation of counts by size of project.

²Not fully comparable. See Summary Table 7 and text.

³Total of acres of individual projects with no deduction for land included in more than one project; for 1960, extensive contiguous areas not used for agriculture or not drained (line 5) were excluded. See Summary Table 7 and text.

⁴For 1950, figures exclude 9,076 projects and 4,119,059 acres in "irrigation enterprises"; for the 10 "county-drain" States, all drainage projects in each county (other than "irrigation enterprises" from Census of Irrigation) were included with county drains. See text.

⁵For 1960, sum of areas of individual projects (see footnote 3); for 1920 to 1950, land in two or more projects included only once; for 1950 and 1940, land in two or more projects was included only for the project last organized; for 1930 and 1920, for the project first organized.

⁶For 1940, figures exclude 4,240,578 acres in "irrigation enterprises" and 36,000 acres not identified by type; for 1930, figures exclude 2,644,674 acres in "irrigation enterprises" and 14,192 acres not identified by type; for 1920, figures exclude 462,599 acres in "irrigation enterprises" and 38,362 acres not identified by type. See Summary Table 12 and text.

⁷In 1940, 1930, and 1920, the classification by type of organization included drainage undertakings by two or more operators cooperating without organization under statute law with "individual ownership enterprises." One cooperative project of 10,000 acres in Georgia was identified in the text of the 1920 report. See Summary Table 12 and text.

⁸For 30 States only, exclusive of 9,064 projects and 4,109,573 acres in "irrigation enterprises"; year began and pumping units not reported for the 10 "county-drain" States. See Summary Tables 10 and 13 and text.

⁹Revised to equal sum of figures shown in 1920 by States; 1920 figures exclude 229,547 acres for which date of organization was not reported. See Summary Table 13.

¹⁰Cost of new works for lands not previously drained.

DRAINAGE OF AGRICULTURAL LANDS

Summary Table 2.—DRAINAGE PROJECTS,

[Data for

	Size of project (Based on area of agricultural land in project)	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total ¹ (acres)	Served by two or more projects ¹ (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres ¹	Projects reporting	Acres ¹
1	All projects.....	8,461	99,098,430	13,078,003	7,190	93,616,607	1,791	5,481,823
2	500 to 999 acres.....	2,847	1,950,621	723,167	2,140	1,449,315	823	501,306
3	1,000 to 1,999 acres.....	2,081	2,881,301	823,257	1,744	2,386,675	440	494,626
4	2,000 to 4,999 acres.....	1,588	4,883,398	1,010,151	1,431	4,308,074	238	575,324
5	5,000 to 9,999 acres.....	728	5,081,845	785,772	682	4,589,121	91	492,724
6	10,000 to 19,999 acres.....	499	6,963,107	1,171,097	484	6,608,196	45	354,911
7	20,000 to 49,999 acres.....	320	9,795,271	1,719,709	314	9,344,850	23	450,421
8	50,000 to 99,999 acres.....	152	10,630,513	1,612,601	150	9,796,395	33	834,118
9	100,000 or more acres.....	246	56,912,374	5,232,249	245	55,133,981	98	1,778,393

¹Areas served by two or more projects included in each project.

Summary Table 3.—DRAINAGE PROJECTS, BY

[Data for

	Type of organization	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total ¹ (acres)	Served by two or more projects ¹ (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres ¹	Projects reporting	Acres ¹
1	All projects.....	8,461	99,098,430	13,078,003	7,190	93,616,607	1,791	5,481,823
2	Drains owned by one landowner.....	1,817	4,162,544	1,794,051	1,360	3,286,656	569	875,888
3	Cooperative or mutual drains.....	2,469	3,577,204	1,244,573	1,768	2,338,334	895	1,238,870
4	Legally organized public drains.....	4,175	91,358,682	10,039,379	4,062	87,991,617	327	3,367,065

¹Areas served by two or more projects included in each project.

Summary Table 4.—DRAINAGE PROJECTS, BY

[Data for

	Year of organization	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total ¹ (acres)	Served by two or more projects ¹ (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres ¹	Projects reporting	Acres ¹
1	All projects.....	8,461	99,098,430	13,078,003	7,190	93,616,607	1,791	5,481,823
2	1960-1959.....	2,503	6,258,852	2,149,374	1,232	2,637,792	1,521	3,621,060
3	Prior to 1950.....	5,958	92,839,578	10,928,629	5,958	90,978,815	270	1,860,763

¹Areas served by two or more projects included in each project.

SUMMARY

BY SIZE: CENSUS OF 1960

39 States]

Cost of drainage works and services, 1950-1959				New works constructed, enlarged, or installed, 1950-1959									
Total		For new works		Open ditches		Tile or covered drains		Levees and dikes		Pumps		Other, projects reporting	
Projects reporting	Dollars	Projects reporting	Dollars	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Number		
6,137	416,875,865	3,606	185,688,673	3,333	33,543.5	427	2,192.1	322	2,016.9	357	957	264	1
2,044	13,104,350	1,573	8,180,769	1,493	5,255.6	145	426.6	90	250.5	90	169	72	2
1,421	16,647,121	887	8,496,226	824	5,263.0	92	198.8	75	258.8	86	162	68	3
1,123	32,430,117	519	14,452,400	466	4,378.7	48	132.8	82	484.7	89	229	55	4
527	28,697,412	197	8,724,035	171	2,022.3	17	30.2	30	174.3	35	77	22	5
384	34,240,516	129	11,002,856	106	2,267.9	11	15.3	25	239.0	30	200	21	6
256	31,434,415	78	8,399,809	70	2,831.9	14	23.3	10	113.0	9	33	6	7
139	41,950,143	64	16,303,136	58	3,904.0	15	199.2	6	76.7	11	55	9	8
243	218,371,791	159	110,129,442	145	7,620.1	85	1,165.9	4	419.9	7	32	11	9

TYPE OF ORGANIZATION: CENSUS OF 1960

39 States]

Cost of drainage works and services, 1950-1959				New works constructed, enlarged, or installed, 1950-1959									
Total		For new works		Open ditches		Tile or covered drains		Levees and dikes		Pumps		Other, projects reporting	
Projects reporting	Dollars	Projects reporting	Dollars	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Number		
6,137	416,875,865	3,606	185,688,673	3,333	33,543.5	427	2,192.1	322	2,016.9	357	957	264	1
1,635	39,803,405	1,366	21,315,822	1,332	17,517.1	65	355.9	200	1,102.7	212	667	63	2
1,736	11,694,288	1,426	8,872,991	1,355	3,552.4	159	296.4	32	77.2	24	34	88	3
2,766	365,378,172	814	155,499,860	646	12,474.0	203	1,539.8	90	837.0	121	256	113	4

YEAR OF ORGANIZATION: CENSUS OF 1960

39 States]

Cost of drainage works and services, 1950-1959				New works constructed, enlarged, or installed, 1950-1959									
Total		For new works		Open ditches		Tile or covered drains		Levees and dikes		Pumps		Other, projects reporting	
Projects reporting	Dollars	Projects reporting	Dollars	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Number		
6,137	416,875,865	3,606	185,688,673	3,333	33,543.5	427	2,192.1	322	2,016.9	357	957	264	1
2,503	53,884,348	2,348	44,197,206	2,273	15,466.3	207	538.1	147	654.5	108	266	133	2
3,634	362,991,517	1,258	141,491,467	1,060	18,077.2	220	1,654.0	175	1,362.4	249	691	131	3

DRAINAGE OF AGRICULTURAL LANDS

Summary Table 5.—DRAINAGE PROJECTS, AREA, SIZE,

Item and Census year	Total (39 States)	Alabama	Arkansas	California	Colorado	Delaware	Florida	Georgia
AREA								
1 Approximate land area.....acres...	1,744,413,440	32,678,400	33,599,360	100,206,720	66,485,760	1,265,920	34,721,280	37,295,360
2 Land in farms.....acres...	1,052,713,726	16,542,730	16,458,515	36,887,948	38,787,312	762,526	15,236,521	19,657,615
3 Drainage projects.....number...	8,461	11	598	356	16	60	516	52
4 Total area in drainage projects ¹.....acres served...	101,870,257	69,901	4,870,106	1,934,825	55,496	356,702	9,222,517	94,728
5 Area not used for agriculture or not drained.....acres served...	9,573,393	4,000	189,140	23,574	...	15,780	4,367,190	1,500
6 Net area drained and used for agriculture.....acres served...	92,296,864	65,901	4,680,966	1,911,251	55,496	340,922	4,855,327	93,228
7 Drainage established before 1950.....acres served...	86,960,271	64,851	4,447,703	1,666,899	55,496	340,066	4,306,371	67,982
8 Area added, 1950-1959.....acres served...	5,336,593	1,050	233,263	244,352	...	856	548,956	25,246
9 Area served by two or more projects.....acres served...	6,276,437	...	917,881	106,696	...	600	1,353,192	7,621
10 Total of areas of individual projects.....acres served ² ...	99,098,430	65,901	5,765,338	2,019,547	55,496	341,522	6,348,491	101,854
PROJECTS, 1960, BY SIZE								
11 500 to 999 acres.....number of projects...	2,847	6	230	104	4	18	148	21
12 acres served...	1,950,621	3,749	150,233	71,294	2,892	11,961	101,911	14,172
13 1,000 to 1,999 acres.....number of projects...	2,081	...	109	76	4	24	109	18
14 acres served...	2,881,301	...	144,769	101,939	5,930	31,948	147,268	26,533
15 2,000 to 4,999 acres.....number of projects...	1,588	3	76	75	4	14	107	10
16 acres served...	4,883,398	11,271	238,843	230,410	11,464	51,448	340,809	28,613
17 5,000 to 9,999 acres.....number of projects...	728	...	60	56	4	1	66	1
18 acres served...	5,081,845	...	439,295	381,682	35,210	6,346	473,168	9,846
19 10,000 to 19,999 acres.....number of projects...	499	...	54	27	...	1	38	2
20 acres served...	6,963,107	...	776,548	385,170	...	11,700	531,642	22,690
21 20,000 to 49,999 acres.....number of projects...	320	2	45	9	...	...	31	...
22 acres served...	9,795,271	50,881	1,388,425	234,240	...	...	851,598	...
23 50,000 to 99,999 acres.....number of projects...	152	...	12	8	...	...	13	...
24 acres served...	10,630,513	...	778,208	477,966	...	...	909,054	...
25 100,000 or more acres.....number of projects...	246	...	12	1	...	2	4	...
26 acres served...	56,912,374	...	1,849,017	136,846	...	228,119	2,993,041	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION								
27 Drains owned by one landowner.....number of projects...	1,817	1	167	157	3	...	388	11
28 acres served...	4,162,544	500	236,104	311,903	2,638	...	1,836,408	12,847
29 Cooperative or mutual drains.....number of projects...	2,469	6	202	45	3	1	36	17
30 acres served...	3,577,204	33,745	276,463	124,511	5,610	780	274,431	24,325
31 Legally organized public drains.....number of projects...	4,175	4	229	154	10	59	92	24
32 acres served...	91,358,682	31,656	5,252,771	1,583,133	47,248	340,742	4,237,652	64,682
PROJECTS, 1960, BY YEAR STARTED								
33 1950-1959.....number of projects...	2,503	1	338	87	...	10	197	14
34 acres served...	6,258,852	500	773,954	267,081	...	22,822	828,437	34,533
35 Prior to 1950.....number of projects...	5,958	10	260	269	16	50	319	38
36 acres served...	92,839,578	65,401	4,991,384	1,752,466	55,496	318,700	5,520,054	67,321
DRAINAGE OPERATIONS, 1950-1959 ³								
37 Cost of drainage works and services.....projects reporting...	6,137	6	471	344	15	48	450	23
38 dollars...	416,875,865	31,061	20,488,226	29,065,257	178,196	476,944	91,627,636	118,012
39 New drainage works constructed, enlarged, or installed.....projects reporting...	3,606	4	352	206	3	33	338	21
40 dollars...	185,688,673	25,812	9,044,351	4,525,825	3,750	399,511	68,012,516	109,012
41 Open ditches.....projects reporting...	3,333	4	347	167	1	33	327	21
42 length, miles...	33,543.5	15.3	1,796.0	812.9	0.3	215.7	10,554.6	52.4
43 Tile or covered drains.....projects reporting...	427	...	...	21	1	...	9	1
44 length, miles...	2,192.1	...	...	46.0	0.4	...	23.2	7.8
45 Levees or dikes.....projects reporting...	322	...	9	50	...	...	119	...
46 length, miles...	2,016.9	...	27.8	227.4	...	...	1,198.1	...
47 Pumps.....projects reporting...	357	...	3	74	1	...	139	...
48 number of pumps...	957	...	4	162	1	...	548	...
49 Other (see text).....projects reporting...	264	...	...	42	1	...	28	...
50 Cost of maintenance, operation, repair, and administration.....projects reporting...	4,042	5	169	289	14	25	312	3
51 dollars...	231,187,192	5,249	11,443,875	24,539,432	174,446	77,433	23,615,120	9,000

¹Land served by two or more projects counted only once.

²Total of acres of individual projects with no deduction for land included in more than one project; extensive contiguous areas not used for agriculture or not drained (line 5) were excluded.

³Includes projects taken over by another project prior to 1960. See text.

SUMMARY

AND TYPE OF ORGANIZATION, 1960; AND DRAINAGE OPERATIONS, 1950 TO 1959; BY STATES

Idaho	Illinois	Indiana	Iowa	Kansas	Kentucky	Louisiana	Maryland	Michigan	Minnesota	Mississippi	Missouri	
52,933,120	35,795,200	23,158,400	35,860,480	52,510,720	25,512,320	28,867,840	6,319,360	36,492,160	51,205,760	30,222,720	44,248,320	1
15,232,401	30,327,261	18,613,046	33,830,950	50,152,870	17,030,675	10,347,328	3,456,769	14,782,907	30,796,097	18,630,263	33,155,226	2
33	1,496	292	249	103	28	915	138	86	307	590	425	3
130,982	5,616,121	11,120,936	6,884,409	402,330	945,515	9,089,516	353,837	10,208,735	11,688,201	3,123,227	3,123,416	4
20,000	52,695	67,490	13,070	29,220	56,716	1,978,892	3,390	331,686	1,127,393	82,620	26,100	5
110,982	5,563,426	11,053,446	6,871,339	373,110	888,799	7,110,624	350,447	9,877,049	10,560,808	3,040,607	3,097,316	6
110,118	5,428,733	10,980,064	6,748,104	309,135	882,753	6,144,937	341,631	9,753,462	9,316,571	2,791,239	3,059,174	7
864	134,693	73,382	123,235	63,975	6,046	965,687	8,816	123,587	1,244,237	249,368	38,142	8
...	293,808	210,322	190,819	4,873	2,000	1,255,460	44,541	23,279	475,138	294,417	517,507	9
110,982	5,883,070	11,267,848	7,063,570	377,983	890,799	8,457,799	396,786	9,900,328	11,045,146	3,354,500	3,670,629	10
11	313	120	61	26	7	373	45	28	110	222	99	11
8,075	228,468	80,373	40,868	20,036	4,566	261,601	31,330	18,013	76,273	149,764	65,228	12
9	438	59	51	23	6	271	36	5	76	122	85	13
12,214	633,572	77,882	72,690	34,597	8,683	373,294	52,090	7,085	105,305	161,464	118,155	14
9	435	28	36	24	1	126	41	1	34	114	108	15
30,656	1,380,782	82,548	115,231	70,415	2,000	361,443	127,218	4,200	95,505	346,550	331,669	16
2	182	12	19	22	2	28	13	3	5	53	50	17
11,988	1,240,267	85,208	140,346	155,065	14,400	203,467	89,562	22,096	36,520	361,648	345,052	18
...	98	8	30	8	2	43	2	2	7	41	43	19
...	1,317,391	101,632	429,493	97,870	29,191	600,013	33,541	31,169	105,929	582,586	603,643	20
2	27	8	16	...	2	36	...	5	18	25	29	21
48,049	822,295	273,059	532,875	...	53,371	1,111,624	...	184,213	608,036	710,266	847,008	22
...	2	6	13	...	5	16	1	5	22	12	8	23
...	151,034	479,819	932,852	...	335,569	1,046,309	63,045	403,485	1,597,870	898,322	527,879	24
...	1	51	23	...	3	22	...	37	35	1	3	25
...	109,261	10,087,327	4,799,215	...	443,019	4,500,048	...	9,230,067	8,419,708	143,900	831,995	26
5	39	18	10	5	1	526	...	11	25	121	55	27
4,074	78,673	22,765	11,428	3,660	2,000	810,903	...	7,454	34,930	155,650	42,154	28
3	154	188	89	14	10	235	9	21	192	230	56	29
4,362	228,762	237,047	125,657	23,427	8,660	309,784	14,183	22,724	248,293	292,531	57,739	30
25	1,303	86	150	84	17	154	129	54	90	239	314	31
102,546	5,575,635	11,008,036	6,926,485	350,896	880,139	7,337,112	382,603	9,870,150	10,761,923	2,906,319	3,570,736	32
1	101	154	64	27	8	307	22	22	160	197	111	33
704	227,957	197,004	75,368	68,772	6,646	1,521,116	36,354	16,365	370,380	435,318	167,964	34
32	1,395	138	185	76	20	608	116	64	147	393	314	35
110,278	5,655,113	11,070,844	6,988,202	309,211	884,153	6,936,683	360,432	9,883,963	10,674,766	2,919,182	3,502,665	36
29	1,027	254	202	96	17	753	29	79	248	374	302	37
2,011,573	28,691,965	13,598,832	21,032,299	1,665,416	897,753	45,796,344	409,398	37,186,074	41,809,993	9,557,061	12,138,381	38
16	228	158	110	45	10	576	23	67	207	223	117	39
200,332	11,114,587	2,528,431	5,726,914	850,795	97,291	24,432,591	393,798	4,783,366	23,831,372	3,855,591	936,412	40
11	143	135	78	44	10	562	23	64	205	222	113	41
38.6	374.5	487.0	271.1	168.0	28.4	8,202.7	137.2	974.6	2,333.2	566.6	296.7	42
1	83	57	60	1	1	1	...	29	47	...	36	43
2.5	124.9	160.0	282.8	0.1	20.0	0.1	...	208.5	935.6	...	8.5	44
5	24	2	6	13	...	34	...	2	2	3	13	45
8.6	115.2	0.3	6.5	33.4	...	215.2	...	4.7	0.4	3.3	42.6	46
11	30	1	2	...	...	45	...	7	2	1	3	47
18	45	1	2	...	...	91	...	15	2	3	5	48
1	50	26	19	2	...	16	...	4	2	4	8	49
29	936	162	138	76	10	490	8	55	97	206	224	50
1,811,241	17,577,378	11,070,401	15,305,385	814,621	800,462	21,363,753	15,600	32,402,708	17,978,621	5,701,470	11,201,969	51

DRAINAGE OF AGRICULTURAL LANDS

Summary Table 5.—DRAINAGE PROJECTS, AREA, SIZE, AND TYPE OF ORGANIZATION,

Item and Census year	Montana	Nebraska	Nevada	New Jersey	New Mexico	New York	North Carolina	North Dakota
AREA								
1 Approximate land area.....acres...	93,271,040	49,031,680	70,264,320	4,813,440	77,766,400	30,680,960	31,402,880	44,452,480
2 Land in farms.....acres...	64,081,391	47,755,708	10,942,936	1,379,002	46,293,207	13,489,516	15,887,724	41,465,717
3 Drainage projects.....number...	20	103	2	9	5	19	564	161
4 Total area in drainage projects ¹.....acres served...	62,222	744,207	41,521	11,756	31,593	49,616	1,418,892	1,642,543
5 Area not used for agriculture or not drained.....acres served...	2,110	4,987	...	800	...	...	98,389	1,360
6 Net area drained and used for agriculture.....acres served...	60,112	739,220	41,521	10,956	31,593	49,616	1,320,503	1,641,183
7 Drainage established before 1950.....acres served...	49,656	697,914	41,521	6,106	30,293	45,165	1,066,021	1,517,023
8 Area added, 1950-1959.....acres served...	10,456	41,306	...	4,850	1,300	4,451	254,482	124,160
9 Area served by two or more projects.....acres served...	...	1,784	...	...	...	...	95,071	87,840
10 Total of areas of individual projects.....acres served ² ..	60,112	741,004	41,521	10,956	31,593	49,616	1,417,032	1,732,183
PROJECTS, 1960, BY SIZE								
11 500 to 999 acres.....number of projects...	11	14	...	5	1	14	304	78
12 .....acres served...	9,051	9,684	...	3,400	600	8,871	202,778	52,640
13 1,000 to 1,999 acres.....number of projects...	4	18	...	2	1	2	134	45
14 .....acres served...	4,921	27,781	...	2,600	1,000	2,351	179,749	62,610
15 2,000 to 4,999 acres.....number of projects...	3	28	1	2	...	...	72	19
16 .....acres served...	10,670	89,673	2,500	4,956	...	...	188,866	56,660
17 5,000 to 9,999 acres.....number of projects...	...	26	...	...	2	1	28	9
18 .....acres served...	...	187,135	...	...	15,018	8,500	190,996	63,648
19 10,000 to 19,999 acres.....number of projects...	1	12	...	...	1	2	12	1
20 .....acres served...	12,580	163,857	...	...	14,975	29,894	161,601	18,176
21 20,000 to 49,999 acres.....number of projects...	1	3	1	...	...	...	11	2
22 .....acres served...	22,890	95,508	39,021	...	...	...	303,597	87,228
23 50,000 to 99,999 acres.....number of projects...	...	2	...	...	...	...	3	1
24 .....acres served...	...	167,366	...	...	...	...	189,445	59,309
25 100,000 or more acres.....number of projects...	...	...	...	...	...	...	...	6
26 .....acres served...	...	...	...	...	...	...	...	1,331,912
PROJECTS, 1960, BY TYPE OF ORGANIZATION								
27 Drains owned by one landowner.....number of projects...	1	...	...	...	1	2	39	...
28 .....acres served...	640	...	...	...	600	1,300	65,426	...
29 Cooperative or mutual drains.....number of projects...	6	4	...	9	...	13	403	144
30 .....acres served...	4,685	6,940	...	10,956	...	20,071	485,339	200,630
31 Legally organized public drains.....number of projects...	13	99	2	...	4	4	122	17
32 .....acres served...	54,787	734,064	41,521	...	30,993	28,245	866,267	1,531,553
PROJECTS, 1960, BY YEAR STARTED								
33 1950-1959.....number of projects...	9	4	...	5	1	6	186	27
34 .....acres served...	8,847	33,300	...	4,650	600	4,451	322,432	55,550
35 Prior to 1950.....number of projects...	11	99	2	4	4	13	378	134
36 .....acres served...	51,265	707,704	41,521	6,306	30,993	45,165	1,094,600	1,676,633
DRAINAGE OPERATIONS, 1950-1959 ³								
37 Cost of drainage works and services.....projects reporting...	18	40	3	8	5	13	310	41
38 .....dollars...	721,491	1,388,581	219,902	40,617	127,433	202,013	2,959,290	1,672,790
39 New drainage works constructed, enlarged, or installed.....projects reporting...	11	12	1	7	2	7	219	37
40 .....dollars...	211,129	417,911	84,215	39,967	70,840	86,009	2,187,155	649,652
41 Open ditches.....projects reporting...	10	10	1	7	2	7	217	35
42 .....length, miles...	43.0	60.6	36.5	13.6	6.3	25.5	959.0	168.5
43 Tile or covered drains.....projects reporting...	1	...	...	3	...	2	1	...
44 .....length, miles...	2.2	...	...	5.0	...	19.8	4.1	...
45 Levees or dikes.....projects reporting...	...	...	...	...	...	1	3	1
46 .....length, miles...	...	...	...	...	...	5.5	20.7	3.5
47 Pumps.....projects reporting...	...	...	1	...	...	1	3	...
48 .....number of pumps...	...	...	4	...	...	2	7	...
49 Other (see text).....projects reporting...	1	4	...	...	...	1	5	2
50 Cost of maintenance, operation, repair, and administration.....projects reporting...	10	36	3	1	3	9	130	13
51 .....dollars...	510,362	970,670	135,687	650	56,593	116,004	772,135	1,023,138

¹Land served by two or more projects counted only once.

²Total of acres of individual projects with no deduction for land included in more than one project; extensive contiguous areas not used for agriculture or not drained (line 5) were excluded.

³Includes projects taken over by another project prior to 1960. See text.

SUMMARY

1960; AND DRAINAGE OPERATIONS, 1950 TO 1959; BY STATES--Continued

Ohio	Oklahoma	Oregon	South Carolina	South Dakota	Tennessee	Texas	Utah	Virginia	Washington	Wisconsin	Wyoming	
26,222,080	44,087,680	61,598,720	19,374,080	48,881,920	26,727,680	168,217,600	52,696,960	25,496,320	42,693,760	35,011,200	62,343,040	1
18,506,796	35,800,688	21,236,298	9,149,492	44,850,666	16,081,285	143,217,559	12,688,518	13,125,802	18,716,972	21,156,223	36,199,666	2
142	31	110	123	41	179	243	9	66	122	235	6	3
8,904,907	133,796	274,754	339,966	658,580	730,855	6,500,043	68,910	98,478	254,482	587,803	23,833	4
95,492	...	4,300	1,900	...	139,976	808,913	2,000	5,700	13,300	3,710	...	5
8,809,415	133,796	270,454	338,066	658,580	590,879	5,691,130	66,910	92,778	241,182	584,093	23,833	6
8,747,745	115,212	190,869	229,279	647,251	492,825	5,372,932	66,390	40,807	227,696	536,444	23,833	7
61,670	18,584	79,585	108,787	11,329	98,054	318,198	520	51,971	13,486	47,649	...	8
64,162	...	41,927	15,850	2,010	6,527	247,844	...	9,198	1,300	4,770	...	9
8,873,857	133,796	314,221	353,916	660,590	597,406	5,938,974	66,910	101,976	242,482	588,863	23,833	10
46	15	46	69	4	55	78	...	43	50	68	...	11
31,479	9,296	32,402	44,128	2,820	38,260	51,490	...	29,435	34,970	48,510	...	12
28	6	28	30	6	60	54	6	11	35	88	2	13
38,053	9,592	37,328	35,548	7,979	83,789	71,193	8,110	14,792	50,138	124,894	3,455	14
13	3	21	10	7	41	32	1	7	25	56	1	15
42,520	10,924	65,573	30,685	21,786	131,220	99,489	2,800	21,948	73,502	165,204	3,347	16
1	2	7	6	9	11	13	...	4	11	16	3	17
5,536	12,176	44,865	47,249	64,609	75,379	96,652	...	25,553	72,372	103,960	17,031	18
8	3	6	4	6	8	20	1	1	1	6	...	19
118,498	42,656	78,213	51,682	101,096	108,569	277,059	12,000	10,248	11,500	90,295	...	20
6	2	2	4	5	3	24	1	...	...	...	...	21
238,003	49,152	55,840	144,624	152,654	69,189	777,625	44,000	...	...	...	...	22
7	...	...	...	3	1	11	...	...	...	1	...	23
532,618	...	...	...	197,579	91,000	735,784	...	...	...	56,000	...	24
33	...	...	...	1	...	11	...	...	...	...	...	25
7,867,150	...	...	...	112,067	...	3,829,682	...	...	...	...	...	26
3	11	6	59	...	8	130	...	5	2	7	...	27
2,424	9,942	25,690	88,203	...	8,433	369,079	...	7,286	1,375	8,055	...	28
76	10	56	52	8	37	43	1	59	20	17	...	29
88,553	9,656	87,807	97,212	11,059	39,293	74,170	1,300	82,289	20,374	23,834	...	30
63	10	48	12	33	134	70	8	2	100	211	6	31
8,782,878	114,198	200,724	168,501	649,531	549,680	5,495,725	65,610	12,401	220,733	556,974	23,833	32
63	20	51	82	8	25	110	1	38	14	32	...	33
68,803	19,098	96,592	119,612	11,059	129,430	194,260	1,040	63,717	18,587	55,549	...	34
79	11	59	41	33	154	133	8	28	108	203	6	35
8,805,054	114,698	217,629	234,304	649,531	467,976	5,744,714	65,870	38,259	223,895	533,314	23,833	36
113	24	98	95	22	36	225	5	54	114	140	6	37
8,268,377	249,053	5,002,268	824,238	298,591	2,136,236	28,895,392	558,392	401,765	4,404,324	1,579,398	145,293	38
53	22	75	95	11	22	175	3	22	49	45	1	39
267,635	241,561	2,308,055	785,638	110,334	1,853,349	13,031,672	350,197	215,992	1,304,272	598,533	2,300	40
47	22	66	93	11	22	171	2	22	38	40	...	41
57.3	172.5	260.3	551.2	38.4	134.6	3,224.7	60.9	45.2	97.8	261.8	...	42
18	...	6	10	...	...	17	2	...	6	12	1	43
68.7	...	20.4	43.5	...	...	117.0	3.6	...	8.5	78.5	0.4	44
...	3	9	3	...	...	4	...	...	11	5	...	45
...	2.2	43.7	10.4	...	...	4.7	...	...	30.7	12.0	...	46
...	...	9	1	...	...	5	...	...	13	5	...	47
...	...	16	1	...	...	5	...	...	17	8	...	48
6	...	7	...	...	...	4	...	2	18	1	...	49
77	7	44	5	15	17	141	5	46	108	118	6	50
8,000,742	7,492	2,694,213	38,600	188,257	282,887	15,863,720	208,195	185,773	3,100,052	980,865	142,993	51

DRAINAGE OF AGRICULTURAL LANDS

Summary Table 6.--NUMBER OF DRAINAGE PROJECTS,

State	1960 Census			1950 Census, number of drainage projects in 1950		
	Number of drainage projects in 1960		Number of superseded projects reporting operations 1950-1959 ¹	State count	County count	Excluding irrigation enterprises reporting drainage ²
	State count	County count				
All drainage States.....	8,461	9,298	24	614,533	15,353	5,457
10 "county-drain" States.....	1,397	1,444	...	457	457	445
30 "drainage district" States.....	7,064	7,854	24	614,076	14,896	5,012
17 irrigation States.....	3,157	3,375	22	10,862	11,173	1,798
13 other States.....	3,907	4,479	2	3,214	3,723	3,214
Alabama.....	11	14	...	10	13	10
Arizona.....	...	...	...	25	25	2
Arkansas.....	598	647	1	844	883	267
California.....	356	391	1	2,047	2,097	163
Colorado.....	16	18	...	630	662	51
Delaware.....	60	60	...	2	2	2
Florida.....	516	565	2	1,889	1,926	238
Georgia.....	52	65	...	55	76	55
Idaho.....	33	34	...	379	396	44
Illinois.....	1,496	1,765	1	1,433	1,662	1,433
Indiana.....	292	299	...	79	79	79
Iowa.....	249	263	...	86	86	86
Kansas.....	103	116	5	121	132	84
Kentucky.....	28	31	...	18	18	18
Louisiana.....	915	948	4	922	946	411
Maryland.....	138	146	...	93	104	93
Michigan.....	86	88	...	54	54	54
Minnesota.....	307	325	...	82	82	82
Mississippi.....	590	676	...	441	514	441
Missouri.....	425	477	...	318	379	318
Montana.....	20	21	...	404	412	27
Nebraska.....	103	118	...	473	506	154
Nevada.....	2	2	1	82	86	5
New Jersey.....	9	11	...	5	6	5
New Mexico.....	5	5	...	223	230	5
New York.....	19	22	...	14	16	14
North Carolina.....	564	608	...	413	442	413
North Dakota.....	161	161	...	21	21	15
Ohio.....	142	144	...	63	63	63
Oklahoma.....	31	32	...	18	18	14
Oregon.....	110	114	1	1,087	1,094	55
South Carolina.....	123	135	...	45	52	45
South Dakota.....	41	41	...	34	34	32
Tennessee.....	179	228	1	151	205	151
Texas.....	243	257	1	543	569	97
Utah.....	9	9	...	471	474	36
Virginia.....	66	69	...	30	30	30
Washington.....	122	124	6	533	541	140
Wisconsin.....	235	263	...	206	224	206
Wyoming.....	6	6	...	189	194	19

Italics indicate States identified in 1950 as "county-drain" States. The other States were designated "drainage-district" States. For the "county-drain" States, in 1950, all drainage projects in each county were enumerated as a unit, therefore, the counts shown for that year represent the number of county reports. For 1940, 1930, and 1920, each drain was counted as a separate project. See text.

Boldface indicates States, other than "county-drain," for which the 1950 drainage data included drained lands in "irrigation enterprises" enumerated in the Census of Irrigation. See footnote 2 and text.

¹State count; one project (in Florida) reported operations, 1950-1959, in 10 counties.

²State count; the projects excluded represented "irrigation enterprises" enumerated in the 1950 Census of Irrigation which showed land drained. Such reports, from the 1950 Census of Irrigation, were included in the data presented for the 1950 Census of Drainage. See text.

³Includes number of drainage projects shown in 1940 Census of Drainage plus reports in the 1940 Census of Irrigation showing land drained. For "county-drain" States, no count of projects was carried in the 1950 report. See text.

⁴Number of reports include projects that had been wholly superseded by other projects and, for intercounty projects, the reports for each county. See text.

⁵The number of reports for 1920, as shown in the 1940 Census of Drainage report, differs from the number shown in the 1920 report with no explanation of the differences.

⁶Total number of projects shown in the 1950 report was 14,066 which total represented 30 "drainage-district" States. (No count was shown for 10 "county-drain" States.) That total was 10 fewer than the "30-State" total shown here due to interstate projects. In this table, an interstate project was counted in each State in which a part was located.

⁷Number shown on page 368 of the 1920 report; the sum of the numbers reported for the separate States equals 56,190.

⁸Not shown separately in 1920; combined total for this and 4 other States was shown as 18.

SUMMARY

BY STATES: CENSUSES OF 1920 TO 1960

State	1940 Census					1930 Census, number of reports ⁴	1920 Census, number of reports ⁴	
	Number of drainage projects in 1940			Number of reports in 1940 ⁴			As carried in 1920 Census of Drainage report	As carried in 1940 Census of Drainage report ³
	State count	County count	As carried in 1950 Census of Drainage report ³	Total	Excluding those for less than 500 acres			
All drainage States.....	39,597	42,363	(³)	79,220	37,530	67,927	756,949	47,399
10 "county-drain" States.....	34,596	36,630	(³)	72,993	32,151	62,391	52,962	44,172
30 "drainage district" States.....	5,001	5,733	9,403	6,227	5,379	5,536	3,228	3,227
17 irrigation States.....	1,747	1,926	6,147	2,140	2,020	2,119	906	905
13 other States.....	3,254	3,807	3,256	4,087	3,359	3,417	2,322	2,322
Alabama.....	1	2	1	2	2	...	...	...
Arizona.....	5	5	23	5	5	(⁸)	(⁸)	3
Arkansas.....	250	287	346	323	318	316	174	174
California.....	158	184	1,067	188	179	162	145	144
Colorado.....	56	67	297	67	65	58	24	24
Delaware.....	287	287	(³)	640	365	...	...	...
Florida.....	101	126	948	126	122	146	94	94
Georgia.....	52	78	52	78	50	59	46	46
Idaho.....	50	57	250	57	52	50	13	13
Illinois.....	1,695	1,961	1,695	2,080	1,793	1,919	1,365	1,365
Indiana.....	8,893	9,271	(³)	22,963	7,807	18,339	12,004	11,348
Iowa.....	3,180	3,439	(³)	3,804	2,519	3,730	2,883	2,883
Kansas.....	88	92	132	92	82	88	54	54
Kentucky.....	144	160	(³)	193	143	216	179	179
Louisiana.....	495	511	1,129	661	660	741	111	111
Maryland.....	126	126	126	131	96	...	...	...
Michigan.....	7,692	8,130	(³)	12,041	6,318	10,640	10,453	8,583
Minnesota.....	2,498	2,732	(³)	3,059	2,768	2,885	2,340	2,340
Mississippi.....	271	343	273	350	328	344	167	167
Missouri.....	286	338	286	384	367	367	238	238
Montana.....	34	39	239	40	37	27	17	17
Nebraska.....	125	145	195	152	142	138	123	123
Nevada.....	8	9	44	9	8	7	(⁸)	1
New Jersey.....	...	...	...	...	...	...	...	...
New Mexico.....	7	14	169	14	14	11	(⁸)	8
New York.....	...	...	...	...	...	...	...	...
North Carolina.....	246	288	246	371	271	130	104	104
North Dakota.....	141	145	(³)	164	164	152	137	137
Ohio.....	11,530	12,222	(³)	29,877	11,853	26,191	24,871	18,607
Oklahoma.....	29	29	(³)	29	29	33	(⁸)	5
Oregon.....	63	65	338	66	49	51	(⁸)	1
South Carolina.....	24	32	24	32	31	31	17	17
South Dakota.....	202	215	(³)	223	185	205	90	90
Tennessee.....	155	207	155	213	176	191	95	95
Texas.....	81	91	180	93	92	87	54	54
Utah.....	36	37	240	37	35	32	17	17
Virginia.....	2	2	2	2	2	3	...	...
Washington.....	165	169	375	182	133	172	52	52
Wisconsin.....	396	430	396	444	243	373	290	290
Wyoming.....	25	28	175	28	27	26	15	15

DRAINAGE OF AGRICULTURAL LANDS

Summary Table 7.—LAND IN DRAINAGE PROJECTS, AND LAND

State	Land in drainage projects ¹ (acres)									
	1960			1950		1940		1930		1920
	Total	Not used for agriculture or not drained ²	Net area drained and used for agriculture ³	Total	Excluding irrigation enterprises reporting drainage ⁴	Total	In occupied farms	Total	In occupied farms	
All drainage States.....	101,870,257	9,573,393	92,296,864	102,688,331	98,569,272	86,967,039	70,068,469	84,408,093	68,640,109	65,495,038
10 "county-drain" States	52,544,324	1,708,987	50,835,337	52,033,141	52,023,655	47,094,801	42,029,553	47,720,374	44,455,175	43,213,765
30 "drainage-district States".....	49,325,933	7,864,406	41,461,527	50,655,190	46,545,617	39,872,238	28,038,916	36,687,719	24,184,934	22,281,273
17 irrigation States.....	33,707,337	7,443,626	26,263,711	35,995,203	31,883,630	26,098,986	15,946,189	23,043,464	13,174,943	12,268,025
13 other States.....	15,618,596	420,780	15,197,816	14,659,987	14,659,987	13,773,252	12,092,727	13,644,255	11,009,991	10,013,248
Alabama.....	69,901	4,000	65,901	76,671	76,671	28,045	28,045	...	...	...
Arizona.....	...	...	...	197,268	3,385	298,633	296,276	318,931	304,802	39,640
Arkansas.....	4,870,106	189,140	4,680,966	4,701,095	4,606,628	4,592,738	3,100,342	4,631,155	2,940,035	3,479,591
California.....	1,934,825	23,574	1,911,251	2,554,576	1,453,537	2,667,194	2,551,036	2,233,714	2,024,446	1,108,319
Colorado.....	55,496	...	55,496	623,976	304,364	468,322	392,132	366,719	305,966	171,656
Delaware.....	356,702	15,780	340,922	352,547	352,547	395,014	394,164	...	...	...
Florida.....	9,222,517	4,367,190	4,855,327	6,083,676	5,933,918	5,699,022	614,220	5,954,934	398,200	1,637,073
Georgia.....	94,728	1,500	93,228	96,259	96,259	84,374	83,874	84,255	63,865	65,452
Idaho.....	130,982	20,000	110,982	366,171	143,577	659,136	650,135	375,464	362,303	64,642
Illinois.....	5,616,121	52,695	5,563,426	5,370,825	5,370,825	5,091,364	4,911,263	5,032,682	5,005,376	3,909,049
Indiana.....	11,120,936	67,490	11,053,446	11,017,709	11,017,709	10,121,952	9,703,805	10,214,014	10,150,221	9,087,183
Iowa.....	6,884,409	13,070	6,871,339	6,734,863	6,734,863	6,164,344	5,945,393	6,137,649	6,105,496	5,224,478
Kansas.....	402,330	29,220	373,110	356,988	355,089	258,113	250,455	257,169	253,845	93,856
Kentucky.....	945,515	888,799	56,716	959,892	959,892	465,270	464,963	585,625	515,101	358,480
Louisiana.....	9,089,516	1,978,892	7,110,624	12,161,665	12,077,915	4,219,624	2,512,250	3,655,483	2,571,531	2,266,328
Maryland.....	353,837	3,390	350,447	323,815	323,815	183,337	181,891	...	...	...
Michigan.....	10,208,735	331,686	9,877,049	10,194,439	10,194,439	8,978,386	7,796,979	9,180,851	8,826,265	9,729,171
Minnesota.....	11,688,201	1,127,393	10,560,808	11,269,962	11,269,962	10,990,409	8,397,586	11,474,683	8,782,323	9,232,709
Mississippi.....	3,123,227	82,620	3,040,607	3,023,744	3,023,744	2,890,618	2,182,729	2,988,496	2,092,899	1,601,444
Missouri.....	3,123,416	26,100	3,097,316	3,147,484	3,147,484	3,087,063	2,673,169	3,150,022	2,427,999	2,596,204
Montana.....	62,222	2,110	60,112	289,189	99,692	372,661	362,711	167,629	150,844	168,682
Nebraska.....	744,207	4,987	739,220	821,088	717,791	916,181	849,948	879,459	864,159	607,730
Nevada.....	41,521	...	41,521	251,154	128,095	153,373	148,617	162,980	155,491	15,940
New Jersey.....	11,756	800	10,956	11,206	11,206	...	...	...	...	...
New Mexico.....	31,593	...	31,593	244,961	52,113	305,885	286,890	176,292	151,516	140,219
New York.....	49,616	...	49,616	56,465	56,465	...	...	...	...	...
North Carolina.....	1,418,892	98,389	1,320,503	1,128,509	1,128,509	825,576	673,034	679,236	331,121	542,828
North Dakota.....	1,642,543	1,360	1,641,183	1,572,220	1,565,055	1,376,041	1,322,573	1,094,142	1,094,114	1,240,328
Ohio.....	8,904,907	95,492	8,809,415	8,923,362	8,923,362	7,729,267	7,173,937	8,165,494	8,132,973	8,107,204
Oklahoma.....	133,796	...	133,796	300,884	298,853	197,646	182,980	170,158	163,936	12,150
Oregon.....	274,754	4,300	270,454	418,858	178,493	348,825	302,870	211,182	146,576	4,000
South Carolina.....	339,966	1,900	338,066	249,011	249,011	204,366	202,002	208,249	94,744	140,031
South Dakota.....	658,580	...	658,580	707,263	706,973	676,472	647,173	697,758	684,746	222,062
Tennessee.....	730,855	139,976	590,879	615,838	615,838	601,592	579,283	593,560	413,791	363,671
Texas.....	6,500,043	808,913	5,691,130	5,794,786	5,321,147	4,218,850	2,819,775	2,883,356	1,893,486	2,166,128
Utah.....	68,910	2,000	66,910	302,158	150,193	202,058	140,148	156,052	109,518	113,823
Virginia.....	98,478	5,700	92,778	45,460	45,460	15,714	15,714	15,042	5,704	...
Washington.....	254,482	13,300	241,182	431,613	272,908	405,709	380,964	367,242	351,898	94,924
Wisconsin.....	587,803	3,710	584,093	514,700	514,700	761,203	561,723	892,713	574,892	794,569
Wyoming.....	23,833	...	23,833	325,981	86,785	312,662	287,420	245,703	188,327	95,474

Italics indicate States identified in 1950 as "county-drain" States. The other States were designated "drainage-district" States. For the "county-drain" States, all projects in each county were enumerated in 1950 with county drains, and handled as though they were one project. See text.

Boldface indicates States, other than "county-drain," for which the 1950 drainage data included drained lands in "irrigation enterprises" enumerated in the Census of Irrigation. See footnote 4 and text.

¹Land in two or more projects counted only once.

²Extensive contiguous areas not used for agriculture or not drained. See text.

³Interspersed nonagricultural or nonirrigated areas not excluded. See footnote 2 and text.

⁴The areas excluded represented drained land reported by "irrigation enterprises" enumerated in the 1950 Census of Irrigation. Such reports, from the 1950 Census of Irrigation, were included in the data presented for the 1950 Census of Drainage. See text.

⁵No drainage projects reported for year indicated.

IN FARMS, BY STATES: CENSUSES OF 1920 TO 1960

State	Land in farms (acres)					Approximate land area, 1960 (acres) (39 States)
	1960 (39 States)	1950 (40 States)	1940 (38 States)	1930 (35 States)	1920 (34 States)	
All drainage States.....	1,052,713,726	1,123,690,602	1,004,930,884	905,805,407	844,904,236	1,744,413,440
10 "county-drain" States.....	256,439,668	267,325,123	259,904,491	252,100,464	251,724,783	337,139,200
30 "drainage-district States.....	796,274,058	856,365,479	745,026,393	653,704,943	593,179,453	1,407,274,240
17 irrigation States.....	584,235,150	612,591,041	525,174,982	464,801,528	408,684,469	1,047,208,320
13 other States.....	212,038,908	243,774,438	219,852,411	188,903,415	184,494,984	360,065,920
Alabama.....	16,542,730	20,888,784	19,143,391	(⁵)	(⁵)	32,678,400
Arizona.....	39,916,440	(⁵)	25,651,092	10,526,627	5,802,126	(⁵)
Arkansas.....	16,458,515	18,871,244	18,044,542	16,052,962	17,456,750	33,599,360
California.....	36,887,948	36,613,291	30,524,324	30,442,581	29,365,667	100,206,720
Colorado.....	38,787,312	37,953,099	31,527,240	28,876,171	24,462,014	66,483,760
Delaware.....	762,526	851,291	895,507	(⁵)	(⁵)	1,265,920
Florida.....	15,236,521	16,527,536	8,337,708	5,026,617	6,046,691	34,721,280
Georgia.....	19,637,615	25,751,055	23,683,631	22,078,630	25,441,061	37,295,360
Idaho.....	15,232,401	13,224,192	10,297,745	9,346,908	8,375,873	52,933,120
Illinois.....	30,327,261	30,978,495	31,032,572	30,695,339	31,974,775	35,795,200
Indiana.....	18,613,046	19,658,677	19,800,778	19,688,675	21,063,332	23,158,400
Iowa.....	33,830,950	34,264,639	34,148,673	34,019,332	33,474,896	35,860,480
Kansas.....	50,152,870	48,611,366	48,173,635	46,975,647	45,510,720	52,510,720
Kentucky.....	17,030,675	19,441,774	20,294,016	19,927,286	21,612,772	25,512,320
Louisiana.....	10,347,328	11,202,278	9,996,108	9,355,437	10,019,822	28,867,840
Maryland.....	3,456,769	4,055,529	4,197,827	(⁵)	(⁵)	6,319,360
Michigan.....	14,782,507	17,269,992	18,037,995	17,118,951	19,032,961	36,492,160
Minnesota.....	30,796,097	32,883,163	32,606,962	30,913,367	30,221,758	51,205,760
Mississippi.....	18,630,263	20,710,770	19,156,058	17,332,195	18,196,979	30,222,720
Missouri.....	33,155,226	35,123,143	34,739,598	33,743,019	34,774,679	44,248,320
Montana.....	64,081,391	59,247,434	46,451,594	44,659,152	35,070,656	93,271,040
Nebraska.....	47,755,708	47,466,828	47,343,981	44,708,565	42,225,475	49,031,680
Nevada.....	10,942,936	7,063,525	3,785,106	4,080,906	2,397,163	70,264,320
New Jersey.....	1,379,002	1,725,441	(⁵)	(⁵)	(⁵)	4,813,440
New Mexico.....	46,293,327	47,521,809	38,860,427	30,822,034	24,409,633	77,766,400
New York.....	13,489,516	16,016,721	(⁵)	(⁵)	(⁵)	30,680,960
North Carolina.....	15,887,724	19,317,937	18,845,338	18,055,103	20,021,736	31,402,880
North Dakota.....	41,465,717	41,194,044	37,936,136	38,657,894	36,214,751	44,452,480
Ohio.....	18,506,796	20,969,411	21,907,523	21,514,059	23,515,888	26,222,080
Oklahoma.....	35,800,688	36,006,603	34,803,317	33,790,817	31,951,934	44,087,680
Oregon.....	21,236,298	20,327,683	17,988,307	16,548,678	13,542,318	61,598,720
South Carolina.....	9,149,492	11,878,793	11,238,697	10,393,113	12,426,675	19,374,080
South Dakota.....	44,850,666	44,785,529	39,473,584	36,470,083	34,636,491	48,881,920
Tennessee.....	16,081,285	18,534,380	18,492,898	18,003,241	19,510,856	26,727,680
Texas.....	143,217,559	145,389,014	137,683,372	124,707,130	114,020,621	168,217,600
Utah.....	12,688,518	10,865,165	7,302,007	5,613,101	5,050,410	52,696,960
Virginia.....	13,125,802	15,572,295	16,444,907	16,728,620	(⁵)	25,496,320
Washington.....	18,716,972	17,369,245	15,181,815	13,533,778	13,244,720	42,693,760
Wisconsin.....	21,156,223	23,221,095	22,876,494	21,874,155	22,148,223	35,011,200
Wyoming.....	36,199,666	34,420,892	28,025,979	23,525,234	11,809,351	62,343,040

DRAINAGE OF AGRICULTURAL LANDS

Summary Table 8.—LAND IN DRAINAGE PROJECTS, AND TOTAL AREA OF INDIVIDUAL PROJECTS, 1920 TO 1960;

State	Land in drainage projects ¹ (acres)					Areas served by two or more projects, 1960				
	1960	1950	1940	1930	1920	Number of projects with land served by other projects	Area with multiple service ¹ (acres)			
							Total	Served by two projects	Served by three projects	Served by four projects
All drainage States.....	92,296,864	102,688,331	86,967,039	84,408,093	65,495,038	3,031	6,276,437	5,769,168	489,409	17,860
<i>10 "county-drain" States.....</i>	<i>50,835,337</i>	<i>52,033,141</i>	<i>47,094,801</i>	<i>47,720,374</i>	<i>43,213,765</i>	<i>625</i>	<i>1,056,170</i>	<i>1,038,038</i>	<i>18,132</i>	<i>...</i>
<i>30 "drainage-district" States.....</i>	<i>41,461,527</i>	<i>50,655,190</i>	<i>39,872,238</i>	<i>36,687,719</i>	<i>22,281,273</i>	<i>2,406</i>	<i>5,220,267</i>	<i>4,731,130</i>	<i>471,277</i>	<i>17,860</i>
<i>17 Irrigation States.....</i>	<i>26,263,711</i>	<i>35,995,203</i>	<i>26,098,986</i>	<i>23,043,464</i>	<i>12,268,025</i>	<i>1,535</i>	<i>3,930,957</i>	<i>3,545,169</i>	<i>369,958</i>	<i>15,830</i>
<i>13 other States.....</i>	<i>15,197,816</i>	<i>14,659,987</i>	<i>13,773,252</i>	<i>13,644,255</i>	<i>10,013,248</i>	<i>871</i>	<i>1,289,310</i>	<i>1,185,961</i>	<i>101,319</i>	<i>2,030</i>
Alabama.....	65,901	76,671	28,045	...	...	...	...	...	...	...
Arizona.....	...	197,268	298,633	318,931	39,640	...	...	...	...	...
Arkansas.....	4,680,966	4,701,095	4,592,738	4,631,155	3,479,591	321	917,881	766,460	136,351	15,070
California.....	1,911,251	2,554,576	2,667,194	2,233,714	1,108,319	116	106,696	105,096	1,600	...
Colorado.....	55,496	623,976	468,322	366,719	171,656	...	...	...	...	...
Delaware.....	340,922	352,547	395,014	...	...	2	600	600	...	...
Florida.....	4,855,327	6,083,676	5,699,022	5,954,934	1,637,073	246	1,353,192	1,213,420	139,572	200
Georgia.....	93,228	96,259	84,374	84,255	65,452	10	7,621	6,616	1,005	...
Idaho.....	110,982	436,171	659,136	375,464	64,642	...	...	...	...	...
Illinois.....	5,563,426	5,370,825	5,091,364	5,032,682	3,909,049	199	293,808	267,972	25,836	...
Indiana.....	11,053,446	11,017,709	10,121,952	10,214,014	9,087,183	206	210,322	206,242	4,080	...
Iowa.....	6,871,339	6,734,863	6,164,344	6,137,649	5,224,478	58	190,819	189,407	1,412	...
Kansas.....	373,110	356,988	258,113	257,169	93,856	13	4,873	4,873	...	...
Kentucky.....	888,799	959,892	465,270	585,625	358,480	2	2,000	2,000	...	...
Louisiana.....	7,110,624	12,161,665	4,219,624	3,655,483	2,266,328	737	1,255,460	1,164,305	90,595	560
Maryland.....	350,447	323,815	183,337	...	...	38	44,541	42,743	1,798	...
Michigan.....	9,877,049	10,194,439	8,978,386	9,180,851	9,729,171	41	23,279	23,279	...	...
Minnesota.....	10,560,808	11,269,962	10,990,409	11,474,683	9,232,709	154	475,138	465,938	9,200	...
Mississippi.....	3,040,607	3,023,744	2,890,618	2,988,496	1,601,444	251	294,417	274,941	19,476	...
Missouri.....	3,097,316	3,147,484	3,087,063	3,150,022	2,596,204	210	517,507	463,731	51,746	2,030
Montana.....	60,112	289,189	372,661	167,629	168,682	...	...	...	...	...
Nebraska.....	739,220	821,088	916,181	879,459	607,730	6	1,784	1,784	...	...
Nevada.....	41,521	251,154	153,373	162,980	15,940	...	...	...	...	...
New Jersey.....	10,956	11,206	...	...	...	...	...	...	...	...
New Mexico.....	31,593	244,961	305,885	176,292	140,219	...	...	...	...	...
New York.....	49,616	56,465	...	...	...	...	...	...	...	...
North Carolina.....	1,320,503	1,128,509	825,576	679,236	542,828	120	95,071	93,613	1,458	...
North Dakota.....	1,641,183	1,572,220	1,376,041	1,094,142	1,240,328	84	87,840	84,680	3,160	...
Ohio.....	8,809,415	8,923,362	7,729,267	8,165,494	8,107,204	74	64,162	63,882	280	...
Oklahoma.....	133,796	300,884	197,646	170,158	12,150	...	...	...	...	...
Oregon.....	270,454	418,858	348,825	211,182	4,000	17	41,927	40,087	1,840	...
South Carolina.....	338,066	249,011	204,366	208,249	140,031	6	15,850	15,850	...	...
South Dakota.....	658,580	707,263	676,472	697,758	222,062	4	2,010	2,010	...	...
Tennessee.....	590,879	615,838	601,592	593,560	363,671	7	6,527	6,527	...	...
Texas.....	5,691,130	5,794,786	4,218,850	2,883,356	2,166,128	77	247,844	247,844	...	...
Utah.....	66,910	302,158	202,058	156,052	113,823	...	...	...	...	...
Virginia.....	92,778	45,460	15,714	15,042	...	18	9,198	9,198	...	...
Washington.....	241,182	431,613	405,709	367,242	94,924	2	1,300	1,300	...	...
Wisconsin.....	584,093	514,700	761,203	892,713	794,569	12	4,770	4,770	...	...
Wyoming.....	23,833	325,981	312,662	245,703	95,474	...	...	...	...	...

Italics indicate States identified in 1950 as "county-drain" States. The other States were designated "drainage-district" States. For the "county-drain" States all drainage projects in each county were enumerated as a unit. See footnote 5 and text.
Boldface indicates States, other than "county-drain," for which the 1950 drainage data included drained lands in "irrigation enterprises" enumerated in the Census of Irrigation.
¹Land in two or more projects included only once.
²Difference in the sum of individual projects and the land in drainage projects counting land included in two or more projects only once (see footnotes 1 and 3); land in three or more projects counted two or more times. This duplication in counting results in some totals of overlapped areas exceeding the total land in drainage projects.
³Land in two or more projects included in each project. Areas shown equal the sum of areas of individual projects, with no deduction for land included in more than one project.
⁴For 1940, 1930, and 1920, data include projects that had been superseded but had contributed to the investment and works of a later project.
⁵For "county-drain" States in 1950, all projects in each county were enumerated as a unit, therefore, no overlapped areas were reported for these States. See text.

SUMMARY

AREAS SERVED BY TWO OR MORE PROJECTS, 1960; AND OVERLAPPED AREAS, 1920 TO 1950; BY STATES

State	Overlapped areas, 1920 to 1950 ² (acres)				Totals of areas of individual projects ³ (acres)				
	1950	1940 ⁴	1930 ⁴	1920 ⁴	1960	1950	1940 ⁴	1930 ⁴	1920 ⁴
All drainage States.....	3,962,516	45,861,412	44,086,985	30,134,253	99,098,430	106,650,847	132,828,451	128,495,078	95,629,291
10 "county-drain" States.....	(⁵)	40,526,363	39,130,549	28,758,310	51,909,639	52,033,141	87,621,164	86,850,923	71,972,075
30 "Drainage-district" States.....	3,962,516	5,335,049	4,956,436	1,375,943	47,188,791	54,617,706	45,207,287	41,644,155	23,657,216
17 Irrigation States.....	2,582,562	2,834,894	3,096,189	673,068	30,596,286	38,377,765	28,933,880	26,139,653	12,941,093
13 other States.....	1,379,954	2,500,155	1,860,247	702,875	16,592,505	16,039,941	16,273,407	15,504,502	10,716,123
Alabama.....	...	...	...	...	65,901	76,671	28,045	...	...
Arizona.....	...	2,274	...	...	...	197,268	300,907	318,931	39,640
Arkansas.....	629,514	1,040,561	1,133,653	363,221	5,765,338	5,330,609	5,633,299	5,764,808	3,842,812
California.....	...	88,563	60,354	...	2,019,547	2,554,576	2,755,757	2,294,068	1,108,319
Colorado.....	1,080	972	640	...	55,496	625,056	469,294	367,359	171,656
Delaware.....	(⁵)	² 458,548	...	...	341,522	352,547	853,562	...	...
Florida.....	1,103,349	764,424	1,418,693	122,868	6,348,491	7,187,025	6,463,446	7,373,627	1,759,941
Georgia.....	...	...	...	...	101,854	96,259	84,374	84,255	65,452
Idaho.....	...	15,396	...	...	110,982	436,171	674,532	375,464	64,642
Illinois.....	299,963	805,760	709,234	181,550	5,883,070	5,670,788	5,897,124	5,741,916	4,090,599
Indiana.....	(⁵)	9,850,573	² 12,835,773	5,928,038	11,267,848	11,017,709	19,972,525	23,049,787	15,015,221
Iowa.....	(⁵)	1,380,587	1,259,995	681,265	7,063,570	6,734,863	7,544,931	7,397,644	5,905,743
Kansas.....	6,353	833	557	...	377,983	363,341	258,946	257,726	93,856
Kentucky.....	(⁵)	50,347	40,783	...	890,799	959,892	515,617	626,408	358,480
Louisiana.....	509,987	483,850	437,630	75,706	8,457,799	12,671,652	4,703,474	4,093,113	2,342,034
Maryland.....	41,853	7,585	...	...	396,786	365,668	190,922	...	...
Michigan.....	(⁵)	7,091,887	5,851,841	6,037,307	9,900,328	10,194,439	16,070,273	15,032,692	15,766,478
Minnesota.....	(⁵)	3,711,787	3,206,822	741,953	11,045,146	11,269,962	14,702,196	14,681,505	9,974,662
Mississippi.....	288,315	236,252	171,448	3,040	3,354,500	3,312,059	3,126,870	3,159,944	1,604,484
Missouri.....	671,651	1,347,916	961,548	508,685	3,670,629	3,819,135	4,434,979	4,111,570	3,104,889
Montana.....	3,336	1,528	...	...	60,112	292,525	374,189	167,629	168,682
Nebraska.....	157,413	89,360	14,440	100,720	741,004	978,501	1,005,541	893,899	708,450
Nevada.....	...	...	...	...	41,521	251,154	153,373	162,980	15,940
New Jersey.....	...	...	...	...	10,956	11,206	...	...	...
New Mexico.....	...	...	...	...	31,593	244,961	305,885	176,292	140,219
New York.....	...	...	...	...	49,616	56,465	...	...	...
North Carolina.....	63,304	74,272	9,200	9,600	1,417,032	1,191,813	899,848	688,436	552,428
North Dakota.....	(⁵)	464,740	89,240	...	1,732,183	1,572,220	1,840,781	1,183,382	1,240,328
Ohio.....	(⁵)	² 17,482,794	² 15,845,135	² 15,357,608	8,873,857	8,923,362	25,212,061	24,010,629	23,464,812
Oklahoma.....	(⁵)	...	960	...	133,796	300,884	197,646	171,118	12,150
Oregon.....	...	5,090	...	...	314,221	418,858	353,915	211,182	4,000
South Carolina.....	8,000	...	...	...	353,916	257,011	204,366	208,249	140,031
South Dakota.....	(⁵)	35,100	...	12,139	660,590	707,263	711,572	697,758	234,201
Tennessee.....	5,148	16,580	5,832	...	597,406	620,986	618,172	599,392	363,671
Texas.....	134,831	312,320	...	...	5,938,974	5,929,617	4,531,170	2,883,356	2,166,128
Utah.....	5,292	2,092	...	...	66,910	307,450	204,150	156,052	113,823
Virginia.....	...	...	...	...	101,976	45,460	15,714	15,042	...
Washington.....	30,907	27,631	27,609	10,553	242,482	462,520	433,340	394,851	105,477
Wisconsin.....	1,720	11,790	2,985	...	588,863	516,420	772,993	895,698	794,569
Wyoming.....	500	...	2,613	...	23,833	326,481	312,662	248,316	95,474

DRAINAGE OF AGRICULTURAL LANDS

Summary Table 9.—COST OF DRAINAGE,

State	Cost of drainage works and services, 10-year period preceding Census date				Cost of new drainage works			
	1950-1959 (1960 Census)		1940-1949 ² (1950 Census)		1950-1959 (1960 Census)		1940-1949 ² (1950 Census)	
	Projects reporting	Dollars	Projects reporting	Dollars	Projects reporting	Dollars	Projects reporting	Dollars
All drainage States.....	6,137	416,875,865	3,810	179,033,770	3,606	185,688,673	1,128	23,872,422
10 "county-drain" States.....	1,048	125,490,706	³ 384	68,802,080	708	38,636,067	³ 145	7,584,076
30 "drainage-district" States.....	5,089	291,385,159	3,426	110,231,690	2,898	147,052,606	983	16,288,346
17 irrigation States.....	2,672	232,295,724	1,460	76,033,098	1,865	124,850,751	402	12,518,129
13 other States.....	2,417	59,089,435	1,966	34,198,592	1,033	22,201,855	581	3,770,217
Alabama.....	6	31,061	8	70,223	4	25,812	7	58,768
Arizona.....	...	...	...	...	...	...	...	...
Arkansas.....	471	20,488,226	127	5,540,041	352	9,044,351	28	391,898
California.....	344	29,065,257	159	15,926,510	206	4,525,825	16	135,346
Colorado.....	15	178,196	47	773,236	3	3,750	5	23,445
Delaware.....	48	476,944	³ 2	173,300	33	399,511	³ 1	3,326
Florida.....	450	91,627,636	207	18,602,511	338	68,012,516	63	2,707,207
Georgia.....	23	118,012	22	132,354	21	109,012	22	107,104
Idaho.....	29	2,011,573	44	906,297	16	200,332	12	132,962
Illinois.....	1,027	28,691,965	892	16,860,472	228	11,114,587	103	1,217,157
Indiana.....	254	13,598,832	³ 75	8,206,459	158	2,528,431	³ 22	785,767
Iowa.....	202	21,032,299	³ 77	13,302,757	110	5,726,914	³ 25	2,143,433
Kansas.....	96	1,665,416	60	1,116,786	45	850,795	10	279,036
Kentucky.....	17	897,753	³ 14	711,162	10	97,291	³ 5	44,832
Louisiana.....	753	45,796,344	392	16,652,384	576	24,432,591	142	5,316,026
Maryland.....	29	409,398	28	183,309	23	393,798	22	129,578
Michigan.....	79	37,186,074	³ 51	20,235,636	67	4,783,366	³ 37	2,556,472
Minnesota.....	248	41,809,993	³ 71	18,210,583	207	23,831,372	30	1,594,914
Mississippi.....	374	9,597,061	345	5,702,914	223	3,855,591	156	441,404
Missouri.....	302	12,138,381	225	8,281,620	117	936,412	9	114,063
Montana.....	18	721,491	25	462,260	11	211,129	9	167,830
Nebraska.....	40	1,388,581	75	1,533,019	12	417,911	27	757,990
Nevada.....	3	219,302	5	193,919	1	84,215	2	62,292
New Jersey.....	8	40,617	5	39,357	7	39,967	5	34,407
New Mexico.....	5	127,433	5	74,636	2	70,840	...	...
New York.....	13	202,013	12	177,224	7	86,009	7	75,119
North Carolina.....	310	2,959,290	250	1,438,698	219	2,187,155	158	737,994
North Dakota.....	41	1,672,790	³ 13	890,373	37	649,652	³ 6	245,364
Ohio.....	113	8,268,377	³ 54	6,189,421	53	267,635	³ 8	147,941
Oklahoma.....	24	249,053	³ 10	299,114	22	241,561	³ 1	62,027
Oregon.....	98	5,002,268	50	2,175,816	75	2,308,055	17	476,561
South Carolina.....	95	824,238	33	319,486	95	785,638	27	206,956
South Dakota.....	22	298,591	³ 17	483,275	11	110,334	...	...
Tennessee.....	36	2,136,236	26	270,623	22	1,853,349	23	255,697
Texas.....	225	28,895,392	89	9,534,229	175	13,031,672	32	1,822,245
Utah.....	5	558,392	30	836,973	3	350,197	13	29,181
Virginia.....	54	401,765	28	111,394	22	215,992	27	95,794
Washington.....	114	4,404,324	131	1,541,318	49	1,304,272	24	203,873
Wisconsin.....	140	1,579,398	92	610,918	45	598,533	15	296,176
Wyoming.....	6	145,293	14	163,163	1	2,300	2	12,237

NA Not available.

Italics indicate States identified in 1950 as "county-drain" States. The other States were designated "drainage-district" States. For the "county-drain" States in 1950 all drainage projects in each county were enumerated as a unit. See text.

Boldface indicates States, other than "county-drain," for which the 1950 drainage data included drained lands in "irrigation enterprises" enumerated in the Census of Irrigation. See text.

¹Total cost of drainage works and services minus cost of new works.

²For 1950, Census data on costs of drainage works and services not available for 9,076 projects and 4,119,059 acres in "irrigation enterprises" enumerated in Census of Irrigation. For 1950, Census cost of new works reported for 1940-1949 relates to new works for lands not previously drained. See text.

³For 1950 Census for "county-drain" States, count of projects reporting represents counties reporting—in that year all drains in each county were enumerated as a unit. See text.

SUMMARY

BY STATES: CENSUSES OF 1920 TO 1960

State	Cost of maintenance, operation, repair, and administration ¹				Capital invested prior to Census date		
	1950-1959 (1960 Census)		1940-1949 ² (1950 Census)		1940 Census (dollars)	1930 Census (dollars)	1920 Census (dollars)
	Projects reporting	Dollars	Projects reporting	Dollars			
All drainage States.....	4,042	231,187,192	NA	155,161,348	691,724,519	680,250,255	372,273,567
10 "county-drain" States.....	599	86,854,639	³ 382	61,218,004	280,245,130	285,567,839	183,423,545
30 "drainage-district" States.....	3,443	144,332,553	NA	93,943,344	411,479,389	394,682,416	188,850,022
17 irrigation States.....	1,735	107,444,973	NA	63,514,969	246,416,528	228,456,363	105,366,376
13 other States.....	1,708	36,887,580	NA	30,428,375	165,062,861	166,226,053	83,483,646
Alabama.....	5	5,249	NA	11,455	410,000	...	...
Arizona.....	...	...	NA	...	1,119,242	1,875,100	414,425
Arkansas.....	169	11,443,875	NA	5,148,143	39,430,840	37,532,575	14,147,174
California.....	289	24,539,432	NA	15,791,164	70,144,044	66,451,698	47,687,153
Colorado.....	14	174,446	NA	749,791	4,890,317	4,358,866	1,081,875
Delaware.....	25	77,433	² 2	169,974	454,883	...	...
Florida.....	312	23,615,120	NA	15,895,304	43,356,692	45,487,795	13,846,807
Georgia.....	3	9,000	NA	2,064,840	1,918,525	1,918,525	794,385
Idaho.....	29	1,811,241	NA	773,335	7,567,032	5,112,444	1,668,569
Illinois.....	936	17,577,378	NA	15,643,315	72,567,174	74,565,923	43,595,069
Indiana.....	162	11,070,401	³ 75	7,420,692	47,540,385	54,110,854	31,147,682
Iowa.....	138	15,305,385	³ 77	11,159,324	75,374,497	77,478,893	49,627,304
Kansas.....	76	814,621	NA	837,750	3,733,919	2,701,082	936,508
Kentucky.....	10	800,462	³ 13	666,330	4,947,994	5,357,633	1,521,725
Louisiana.....	490	21,336,753	NA	11,336,358	23,361,758	20,752,645	9,021,991
Maryland.....	8	15,600	NA	53,731	43,914	...	...
Michigan.....	55	32,402,708	³ 51	17,679,164	40,412,251	37,677,084	24,683,715
Minnesota.....	97	17,978,621	³ 71	16,715,669	65,576,077	64,139,641	42,017,447
Mississippi.....	206	5,701,470	NA	5,261,510	23,259,677	23,601,443	7,076,164
Missouri.....	224	11,201,969	NA	8,167,557	49,050,414	47,340,174	20,723,128
Montana.....	10	510,362	NA	294,430	2,827,839	1,879,296	664,990
Nebraska.....	36	970,670	NA	775,029	7,578,999	6,847,070	4,588,578
Nevada.....	3	135,687	NA	131,627	1,337,647	1,349,774	117,851
New Jersey.....	1	650	NA	4,950	...	...	...
New Mexico.....	3	56,593	NA	74,636	5,722,121	3,279,371	1,710,796
New York.....	9	116,004	NA	102,105	...	...	...
North Carolina.....	130	772,135	NA	700,704	5,467,906	4,719,079	3,623,518
North Dakota.....	13	1,023,138	³ 13	645,009	3,673,336	3,148,919	2,208,049
Ohio.....	77	8,000,742	³ 53	6,041,480	35,215,586	36,836,449	30,680,145
Oklahoma.....	7	7,492	³ 10	237,087	1,971,350	2,283,598	76,415
Oregon.....	44	2,694,213	NA	1,699,255	5,482,012	4,165,549	200,000
South Carolina.....	5	38,600	NA	112,530	1,241,300	1,265,276	582,183
South Dakota.....	15	188,257	³ 17	483,275	5,078,771	4,534,768	1,461,063
Tennessee.....	17	282,887	NA	14,926	6,501,750	6,366,747	2,925,944
Texas.....	141	15,863,720	NA	7,711,984	14,047,181	12,002,949	5,700,805
Utah.....	5	208,195	NA	807,792	4,869,273	4,772,000	1,005,473
Virginia.....	46	185,773	NA	15,600	201,300	241,608	...
Washington.....	108	3,100,052	NA	1,337,445	5,332,842	4,637,576	1,397,419
Wisconsin.....	118	980,865	NA	314,742	4,254,586	6,207,278	4,163,055
Wyoming.....	6	142,993	NA	150,926	5,594,856	5,250,573	1,175,962

DRAINAGE OF AGRICULTURAL LANDS

Summary Table 10.—TYPES OF DRAINAGE WORKS,

State	Open ditches						
	Constructed, 1950-1959 (1960 Census)		Constructed, 1940-1949 ² (1950 Census)		Completed prior to Census date (miles)		
	Projects reporting	Miles	Projects reporting	Miles	1940 Census	1930 Census	1920 Census
All drainage States.....	3,333	33,543.5	1,200	9,301	146,152.3	138,673.0	107,468.2
10 "county-drain" States.....	640	4,746.7	³ 135	1,484	86,224.8	85,480.9	78,762.7
30 "drainage-district" States.....	2,693	28,796.8	1,065	7,817	59,927.5	53,192.1	28,705.5
17 irrigation States.....	1,759	25,363.2	487	6,009	37,033.9	32,367.3	14,517.8
13 other States.....	934	3,433.6	578	1,808	22,893.6	20,824.8	14,187.7
Alabama.....	4	15.3	7	66	42.3	...	...
Arizona.....	...	...	...	...	100.8	349.4	32.6
Arkansas.....	347	1,796.0	29	123	6,030.3	4,974.3	3,154.1
California.....	167	812.9	15	34	6,091.1	4,605.9	3,009.8
Colorado.....	1	0.3	4	11	972.9	814.9	132.5
Delaware.....	33	215.7	³ 1	2	1,482.3	...	...
Florida.....	327	10,554.6	145	2,263	5,022.1	5,112.6	1,990.8
Georgia.....	21	52.4	22	115	550.3	496.9	276.8
Idaho.....	11	38.6	19	59	968.1	651.2	274.5
Illinois.....	143	374.5	96	273	6,862.2	5,996.4	4,754.5
Indiana.....	135	487.0	³ 19	198	22,008.1	20,786.8	17,470.7
Iowa.....	78	271.1	³ 33	203	5,189.7	4,800.0	3,998.0
Kansas.....	44	168.0	9	48	381.4	324.7	138.4
Kentucky.....	10	28.4	³ 4	22	1,231.8	1,204.8	664.5
Louisiana.....	562	8,202.7	141	2,116	7,105.5	7,701.2	1,771.6
Maryland.....	23	137.2	26	138	461.3	...	...
Michigan.....	64	974.6	³ 34	554	19,608.6	17,188.5	16,023.8
Minnesota.....	205	2,333.2	³ 29	357	15,856.7	14,477.6	14,657.0
Mississippi.....	222	566.6	156	372	4,344.1	4,022.1	1,815.1
Missouri.....	113	296.7	8	30	5,191.5	4,960.5	3,438.7
Montana.....	10	43.0	8	40	420.9	284.2	102.1
Nebraska.....	10	60.6	28	167	1,406.7	1,202.3	734.5
Nevada.....	1	36.5	2	21	426.4	334.8	16.6
New Jersey.....	7	13.6	5	12	...	...	...
New Mexico.....	2	6.3	...	...	625.2	282.9	124.0
New York.....	7	25.5	7	31	...	...	...
North Carolina.....	217	959.0	158	403	1,846.6	1,483.5	1,171.3
North Dakota.....	35	168.5	³ 6	94	940.4	817.6	708.3
Ohio.....	47	57.3	³ 8	38	18,732.2	25,048.2	24,984.0
Oklahoma.....	22	172.5	³ 1	16	334.3	303.0	18.6
Oregon.....	66	260.3	17	90	780.1	495.1	...
South Carolina.....	93	551.2	28	128	459.9	423.0	262.7
South Dakota.....	11	38.4	...	...	840.7	854.4	237.8
Tennessee.....	22	134.6	23	105	1,508.0	1,413.0	777.3
Texas.....	171	3,224.7	33	948	4,906.3	3,661.8	2,728.5
Utah.....	2	60.9	12	29	267.8	304.3	120.3
Virginia.....	22	45.2	27	59	46.7	40.0	...
Washington.....	38	97.8	23	55	885.0	746.7	162.4
Wisconsin.....	40	261.8	15	76	1,580.7	1,989.4	1,691.3
Wyoming.....	...	...	2	5	643.3	521.0	25.1

See footnotes at end of table.

SUMMARY

BY STATES: CENSUSES OF 1920 TO 1960

State	Tile or covered drains						
	Constructed, 1950-1959 (1960 Census)		Constructed, 1940-1949 ² (1950 Census)		Completed prior to Census date (miles)		
	Projects reporting	Miles	Projects reporting	Miles	1940 Census	1930 Census	1920 Census
All drainage States.....	427	2,192.1	146	581	55,734.0	55,031.9	42,311.7
10 "county-drain" States.....	212	1,675.6	81	446	47,262.9	46,530.1	36,191.1
30 "drainage-district" States.....	215	516.5	65	135	8,471.1	8,501.8	6,120.6
17 Irrigation States.....	67	224.4	22	48	3,735.6	4,015.9	2,022.8
13 other States.....	148	292.1	43	87	4,735.5	4,485.9	4,097.8
Alabama.....	...	...	...	...	...	...	...
Arizona.....	...	...	...	...	8.8	14.3	1.0
Arkansas.....	...	...	...	...	10.8	0.1	20.4
California.....	21	46.0	2	11	326.2	486.2	85.6
Colorado.....	1	0.4	1	1	365.3	369.5	195.2
Delaware.....	...	...	...	...	...	...	...
Florida.....	9	23.2	4	16	...	...	...
Georgia.....	1	7.8	1	2	2.0	40.0	...
Idaho.....	1	2.5	2	2	174.6	19.9	1.8
Illinois.....	83	124.9	34	67	4,246.6	3,825.6	3,507.1
Indiana.....	57	160.0	13	48	10,754.7	10,438.7	8,227.6
Iowa.....	60	282.8	23	165	12,873.2	13,382.4	10,384.9
Kansas.....	1	0.1	...	...	210.5	212.1	213.0
Kentucky.....	1	20.0	1	1	2.0	71.0	86.2
Louisiana.....	1	0.1	...	...	6.0	2.0	0.2
Maryland.....	...	...	...	...	...	...	...
Michigan.....	29	208.5	28	145	3,229.5	3,490.2	2,173.9
Minnesota.....	47	935.6	11	80	9,893.4	9,451.3	5,924.6
Mississippi.....	...	...	...	...	34.1	43.5	238.8
Missouri.....	36	8.5	...	...	170.3	123.4	38.8
Montana.....	1	2.2	2	2	73.8	76.7	50.7
Nebraska.....	...	...	1	1	26.3	93.4	359.4
Nevada.....	...	...	...	...	...	4.0	4.0
New Jersey.....	3	5.0	2	2	...	...	...
New Mexico.....	...	...	...	...	308.9	305.4	282.2
New York.....	2	19.8	...	...	...	...	...
North Carolina.....	1	4.1	...	...	...	...	...
North Dakota.....	...	...	...	...	10.4	9.6	9.3
Ohio.....	18	68.7	5	7	10,163.9	9,371.6	9,205.3
Oklahoma.....	...	...	...	...	...	...	...
Oregon.....	6	20.4	2	2	150.6	42.5	13.0
South Carolina.....	10	43.5	3	6	...	150.0	101.5
South Dakota.....	...	...	...	...	335.8	315.3	179.3
Tennessee.....	...	...	...	...	...	...	0.3
Texas.....	17	117.0	1	4	14.1	8.5	...
Utah.....	2	3.6	3	5	1,618.6	1,944.5	599.1
Virginia.....	...	...	...	...	...	...	...
Washington.....	6	8.5	4	4	179.0	199.2	83.0
Wisconsin.....	12	78.5	3	10	282.5	303.4	211.3
Wyoming.....	1	0.4	...	...	262.1	237.6	114.2

DRAINAGE OF AGRICULTURAL LANDS

Summary Table 10.—TYPES OF DRAINAGE WORKS,

State	Levees or dikes						
	Constructed, 1950-1959 (1960 Census)		Constructed, 1940-1949 ² (1950 Census)		Completed prior to Census date (miles)		
	Projects reporting	Miles	Projects reporting	Miles	1940 Census	1930 Census	1920 Census
All drainage States.....	322	2,016.9	152	1,020	6,792.9	6,539.5	3,509.8
10 "county-drain" States.....	16	17.6	36	55	622.4	429.9	263.5
30 "drainage-district" States.....	306	1,999.3	146	965	6,170.5	6,109.6	3,246.3
17 irrigation States.....	254	1,789.6	134	925	4,088.1	3,770.3	2,049.0
13 other States.....	52	209.7	12	40	2,082.4	2,339.3	1,197.3
Alabama.....	...	...	...	...	...	...	...
Arizona.....	...	...	...	...	24.5	2.5	26.0
Arkansas.....	9	27.8	4	15	332.4	201.9	121.8
California.....	50	227.4	...	...	1,537.6	1,389.5	1,131.1
Colorado.....	...	...	1	1	...	...	...
Delaware.....	...	...	...	...	...	...	...
Florida.....	119	1,198.1	97	661	470.6	718.4	66.2
Georgia.....	...	...	...	...	5.0	...	...
Idaho.....	5	8.6	4	8	95.4	74.8	9.5
Illinois.....	24	115.2	5	19	1,197.8	1,108.4	650.2
Indiana.....	2	0.3	32	20	139.0	131.9	165.8
Iowa.....	6	6.5	34	35	456.8	113.4	45.2
Kansas.....	13	33.4	7	58	278.3	227.0	165.1
Kentucky.....	...	...	...	...	...	...	0.2
Louisiana.....	34	215.2	12	166	624.4	576.3	440.7
Maryland.....	...	...	...	...	...	...	...
Michigan.....	2	4.7	...	...	13.6	34.6	33.1
Minnesota.....	2	0.4	...	...	0.4	149.7	0.1
Mississippi.....	3	3.3	...	...	190.5	227.7	6.7
Missouri.....	13	42.6	4	17	687.1	931.4	456.9
Montana.....	...	...	...	...	0.8	...	...
Nebraska.....	...	...	1	...	230.3	116.8	26.8
Nevada.....	...	...	...	...	23.0	33.0	...
New Jersey.....	...	...	...	...	...	...	...
New Mexico.....	...	...	...	...	181.3	12.0	...
New York.....	1	5.5	1	2	...	...	...
North Carolina.....	3	20.7	1	1	4.0	22.0	33.5
North Dakota.....	1	3.5	...	...	...	...	2.1
Ohio.....	...	...	...	...	5.2	0.3	9.6
Oklahoma.....	3	2.2	...	...	...	...	5.0
Oregon.....	9	43.7	2	4	143.2	121.4	...
South Carolina.....	3	10.4	1	1	...	11.0	...
South Dakota.....	...	...	...	...	7.4	...	2.4
Tennessee.....	...	...	...	...	30.0	29.8	42.3
Texas.....	4	4.7	2	7	61.7	215.9	59.8
Utah.....	...	...	...	...	5.0	2.0	2.0
Virginia.....	...	...	...	...	...	...	...
Washington.....	11	30.7	4	4	72.4	78.8	...
Wisconsin.....	5	12.0	...	...	8.0	9.0	7.7
Wyoming.....	...	...	...	...	7.2	...	...

Italics indicate States identified in 1950 as "county-drain" States. The other States were designated "drainage-district" States. For the "county-drain" States in 1950 all drainage projects in each county were enumerated as a unit. See text.
Boldface indicates States, other than "county-drain," for which the 1950 drainage data included drained lands in "irrigation enterprises" enumerated in the Census of Irrigation. See text.

NA Not available.

¹Floodgates, culverts, bridges, drainage wells or pumps, land leveling, etc.

²For 1950 Census, data for drainage works not available for 9,076 projects and 4,119,059 acres of drained land in "irrigation enterprises" enumerated in Census of Irrigation; data for pumps not available for "county-drain" States. See text.

³For 1950, for "county-drain" States, count of projects reporting represents counties reporting—in that year all drains in each county were enumerated as a unit. See text.

⁴Data for this and other designated States not available individually but included in totals for all drainage States.

SUMMARY

BY STATES: CENSUSES OF 1920 TO 1960—Continued

State	Pumps										Other drainage works* constructed or installed, 1950-1959, projects reporting (1960 Census)
	Installed, 1950-1959 (1960 Census)		Installed prior to Census date								
	Projects reporting	Number	Projects reporting				Number of pumps				
			1950 Census ²	1940 Census	1930 Census	1920 Census	1950 Census ²	1940 Census	1930 Census	1920 Census	
All drainage States.....	357	957	NA	353	292	210	NA	1,284	1,028	453	264
10 "county-drain" States.....	12	20	NA	18	20	17	NA	28	37	NA	69
30 "drainage-district" States.....	245	937	369	335	272	193	1,146	1,256	991	NA	195
17 irrigation States.....	301	866	314	253	195	NA	1,015	NA	841	NA	124
13 other States.....	44	71	55	82	77	NA	131	NA	150	NA	71
Alabama.....	...	...	...	...	...	...	...	...	...	(⁴)	...
Arizona.....	...	...	...	2	2	1	...	33	175	...	...
Arkansas.....	3	4	2	2	2	...	5	5	5	...	...
California.....	74	162	120	135	105	94	382	763	426	(⁴)	42
Colorado.....	1	1	...	1	...	...	...	4	...	...	1
Delaware.....	...	...	NA	...	...	...	NA	...	...	(⁴)	...
Florida.....	139	548	99	14	12	2	354	68	37	(⁴)	28
Georgia.....	...	...	...	1	1	...	...	(⁴)	4	...	...
Idaho.....	11	18	21	26	23	4	54	73	37	6	1
Illinois.....	30	45	47	68	60	48	115	125	120	(⁴)	50
Indiana.....	1	1	NA	4	4	4	NA	5	7	(⁴)	36
Iowa.....	2	2	NA	11	11	6	NA	18	21	(⁴)	19
Kansas.....	...	...	...	2	1	1	...	4	2	(⁴)	2
Kentucky.....	...	...	NA	...	...	...	NA	...	...	...	...
Louisiana.....	45	91	30	22	18	29	102	59	52	71	16
Maryland.....	...	...	...	...	...	...	...	...	...	(⁴)	...
Michigan.....	7	15	NA	2	2	3	NA	2	3	(⁴)	4
Minnesota.....	2	2	NA	1	2	...	NA	3	5	(⁴)	2
Mississippi.....	1	3	...	1	3	1	...	(⁴)	5	(⁴)	4
Missouri.....	3	5	8	11	11	8	16	16	16	14	8
Montana.....	...	...	...	...	...	...	...	...	...	...	1
Nebraska.....	...	...	...	1	1	...	...	3	3	...	4
Nevada.....	1	4	...	1	1	...	...	3	2	...	...
New Jersey.....	...	...	...	...	...	...	...	...	...	...	...
New Mexico.....	...	...	...	...	...	...	...	...	...	...	...
New York.....	1	2	...	...	...	...	...	...	...	...	1
North Carolina.....	3	7	...	...	1	1	...	...	4	(⁴)	5
North Dakota.....	...	...	NA	...	...	...	NA	...	...	...	2
Ohio.....	...	...	NA	...	1	4	NA	...	1	(⁴)	6
Oklahoma.....	...	...	NA	...	...	...	NA	...	...	...	...
Oregon.....	9	16	23	26	17	...	70	56	31	...	7
South Carolina.....	1	1	...	...	...	(⁴)	...	...	...	(⁴)	...
South Dakota.....	...	...	NA	...	...	...	NA	...	...	...	...
Tennessee.....	...	...	...	...	...	...	...	...	...	...	...
Texas.....	5	5	4	4	2	...	5	11	53	...	4
Utah.....	...	...	...	...	...	(⁴)	...	...	...	(⁴)	...
Virginia.....	...	...	...	...	...	...	...	...	...	...	2
Washington.....	13	17	15	16	11	...	43	24	18	...	18
Wisconsin.....	5	8	...	1	1	1	...	(⁴)	1	(⁴)	1
Wyoming.....	...	...	...	1	...	...	...	(⁴)	...	...	...

DRAINAGE OF AGRICULTURAL LANDS

Summary Table 11.—DRAINAGE PROJECTS BY

State	All drainage projects ¹					Under 500 acres ²			
	1960	1950	1940 ³	1930 ³	1920 ³	1950 ⁴	1940 ³	1930 ³	1920 ³
All drainage States.....number...	8,461	14,533	79,220	67,927	47,399	8,289	⁵ 41,690	31,056	22,205
.....acres...	99,098,430	106,650,847	132,828,451	128,495,078	95,629,291	606,031	9,065,810	7,348,844	6,374,640
10 "county-drain States".....number...	⁶ 1,397	⁶ 4,57	⁶ 72,993	⁶ 62,391	⁶ 44,172	⁶ 613	⁶ 40,842	⁶ 30,489	⁶ 21,798
.....acres...	⁶ 51,909,639	⁶ 52,033,141	⁶ 87,621,164	⁶ 86,850,923	⁶ 71,972,075	⁶ 61,760	⁶ 8,820,957	⁶ 7,186,355	⁶ 6,263,133
30 "drainage-district" States.....number...	7,064	14,076	6,227	5,536	3,227	78,276	848	567	407
.....acres...	47,188,791	54,617,706	45,207,287	41,644,155	23,657,216	⁷ 604,271	244,853	162,489	111,507
17 irrigation States.....number...	3,157	10,862	2,140	2,119	905	8,276	120	93	41
.....acres...	30,596,286	38,577,765	28,933,880	26,139,653	12,941,093	604,271	34,474	26,757	13,375
Alabama.....number...	11	70	2	...	...	...	...	...	...
.....acres...	65,901	76,671	28,045	...	...	...	...	...	...
Arizona.....number...	...	25	5	7	3	...	...	...	...
.....acres...	...	197,268	300,907	318,931	39,640	2,359	...	...	...
Arkansas.....number...	598	844	323	316	174	560	5	...	3
.....acres...	5,765,338	5,330,609	5,633,299	5,764,808	3,842,812	83,548	1,369	1,148	1,140
California.....number...	356	2,047	188	162	144	1,659	9	4	5
.....acres...	2,019,547	2,554,576	2,755,757	2,294,068	1,108,319	152,728	2,609	1,816	1,677
Colorado.....number...	16	630	67	58	24	491	2	2	...
.....acres...	55,496	625,056	469,294	367,359	171,656	43,649	812	902	...
Delaware.....number...	⁶ 60	⁶ 2	⁶ 640	...	...	...	275	...	...
.....acres...	⁶ 341,522	⁶ 352,547	⁶ 853,562	...	...	...	76,337	...	...
Florida.....number...	516	1,889	126	146	94	1,588	4	2	...
.....acres...	6,348,491	7,187,025	6,463,446	7,373,627	1,759,941	61,246	1,505	824	...
Georgia.....number...	52	55	78	59	46	...	28	11	13
.....acres...	101,854	96,259	84,374	84,255	65,452	...	7,919	2,708	3,252
Idaho.....number...	33	379	57	50	13	284	5	...	...
.....acres...	110,982	436,171	674,532	375,464	64,642	24,271	1,061	562	...
Illinois.....number...	1,496	1,433	2,080	1,919	1,365	...	287	234	181
.....acres...	5,883,070	5,670,788	5,897,124	5,741,916	4,090,599	...	86,593	73,697	54,507
Indiana.....number...	⁶ 292	⁶ 79	⁶ 22,963	⁶ 18,339	⁶ 11,348	...	15,156	9,872	5,680
.....acres...	⁶ 11,267,848	⁶ 11,017,709	⁶ 19,972,525	⁶ 23,049,787	⁶ 15,015,221	...	2,843,563	2,157,441	1,474,777
Iowa.....number...	⁶ 249	⁶ 86	⁶ 3,804	⁶ 3,730	⁶ 2,883	...	1,285	1,207	918
.....acres...	⁶ 7,063,570	⁶ 6,734,863	⁶ 7,544,931	⁶ 7,397,644	⁶ 5,905,743	⁶ 410	344,033	323,198	254,035
Kansas.....number...	103	121	92	88	54	37	10	13	17
.....acres...	377,983	363,341	258,946	257,726	93,856	1,899	3,147	4,407	4,994
Kentucky.....number...	⁶ 28	⁶ 18	⁶ 193	⁶ 216	⁶ 179	...	50	29	61
.....acres...	⁶ 890,799	⁶ 959,892	⁶ 515,617	⁶ 626,408	⁶ 358,480	⁶ 384	15,727	8,331	18,188
Louisiana.....number...	915	922	661	741	111	486	1	...	...
.....acres...	8,457,799	12,671,652	4,703,474	4,093,113	2,342,034	30,156	462	...	...
Maryland.....number...	138	93	131	...	...	...	35	...	...
.....acres...	396,786	365,668	190,922	...	...	...	11,204	...	...
Michigan.....number...	⁶ 86	⁶ 64	⁶ 12,041	⁶ 10,640	⁶ 8,583	...	5,723	4,907	3,619
.....acres...	⁶ 9,900,328	⁶ 10,194,439	⁶ 16,070,275	⁶ 15,032,692	⁶ 15,766,478	...	1,454,436	1,272,745	1,122,310
Minnesota.....number...	⁶ 307	⁶ 82	⁶ 3,059	⁶ 2,885	⁶ 2,340	...	291	486	858
.....acres...	⁶ 11,045,146	⁶ 11,269,962	⁶ 14,702,196	⁶ 14,681,505	⁶ 9,974,662	...	90,140	133,983	227,928
Mississippi.....number...	590	441	350	344	167	...	22	23	6
.....acres...	3,354,500	3,312,059	3,126,870	3,159,944	1,604,484	...	7,109	7,359	1,894
Missouri.....number...	425	318	384	367	238	...	17	13	4
.....acres...	3,670,629	3,819,135	4,434,979	4,111,570	3,104,889	...	4,932	4,113	1,235
Montana.....number...	20	404	40	27	17	355	3	2	...
.....acres...	60,112	292,525	374,189	167,629	168,682	24,266	1,275	507	...
Nebraska.....number...	103	473	152	138	123	303	10	10	5
.....acres...	741,004	978,501	1,005,541	893,899	708,450	15,765	2,980	2,704	1,520
Nevada.....number...	2	82	9	7	1	44	1	...	...
.....acres...	41,521	251,154	153,373	162,980	15,940	8,224	400	...	...
New Jersey.....number...	9	5	...	...	...	...	...	...	...
.....acres...	10,956	11,206	...	...	...	...	...	...	...
New Mexico.....number...	5	223	14	11	8	194	...	...	...
.....acres...	31,593	244,961	305,885	176,292	140,219	20,681	...	...	...
New York.....number...	19	14	...	...	...	...	...	...	...
.....acres...	49,616	56,465	...	...	...	...	...	...	...
North Carolina.....number...	564	413	371	130	104	...	100	20	11
.....acres...	1,417,032	1,191,813	899,848	688,436	552,428	...	26,640	5,591	3,117
North Dakota.....number...	⁶ 161	⁶ 21	⁶ 164	⁶ 152	⁶ 137	5	...	...	...
.....acres...	⁶ 1,732,183	⁶ 1,572,220	⁶ 1,840,781	⁶ 1,183,382	⁶ 1,240,328	165	...	...	...
Ohio.....number...	⁶ 142	⁶ 63	⁶ 29,877	⁶ 26,191	⁶ 18,607	...	18,024	13,942	10,627
.....acres...	⁶ 8,873,857	⁶ 8,923,362	⁶ 25,212,061	⁶ 24,010,629	⁶ 23,464,812	...	3,985,626	3,278,132	3,154,949
Oklahoma.....number...	631	518	29	33	5	3	...	...	1
.....acres...	⁶ 133,796	⁶ 300,884	197,646	171,118	12,150	31	...	670	400
Oregon.....number...	110	1,087	66	51	1	995	17	11	...
.....acres...	314,221	418,858	353,915	211,182	4,000	34,389	4,754	2,471	...
South Carolina.....number...	123	45	32	31	17	...	1	2	1
.....acres...	353,916	257,011	204,366	208,249	140,031	...	40	535	40
South Dakota.....number...	41	⁶ 34	223	205	90	⁶ 3	38	44	34
.....acres...	⁶ 660,590	⁶ 707,263	711,572	697,758	234,201	⁶ 770	11,095	11,855	10,546
Tennessee.....number...	179	151	213	191	95	...	37	28	7
.....acres...	597,406	620,986	618,172	599,392	363,671	...	11,895	8,791	2,277
Texas.....number...	243	543	93	87	54	360	1	...	2
.....acres...	5,938,974	5,929,617	4,531,170	2,883,356	2,166,128	48,881	260	...	1,957
Utah.....number...	9	471	37	32	17	386	2	1	...
.....acres...	66,910	307,450	204,150	156,052	113,823	24,481	503	190	...
Virginia.....number...	66	30	2	3	...	...	(⁵)	...	...
.....acres...	101,976	45,460	15,714	15,042	...	...	...	...	...
Washington.....number...	122	533	182	172	52	...	49	40	8
.....acres...	242,482	462,520	433,340	394,851	105,477	14,043	13,112	11,226	1,947
Wisconsin.....number...	235	206	444	373	290	...	201	143	143
.....acres...	588,863	516,420	772,993	895,698	794,569	...	54,047	32,938	31,810
Wyoming.....number...	6	189	28	15	...	143	1	...	1
.....acres...	23,833	326,481	312,662	248,316	95,474	13,685	225	...	140

See footnotes at end of table.

SUMMARY

SIZE, BY STATES: CENSUSES OF 1920 TO 1960

500 to 999 acres					1,000 to 4,999 acres											
					Total					1,000 to 1,999 acres			2,000 to 4,999 acres			
1960	1950	1940 ³	1930 ³	1920 ³	1960	1950	1940 ³	1930 ³	1920 ³	1960	1950	1940 ³	1960	1950	1940 ³	
2,847	1,593	15,855	15,765	10,712	3,669	2,757	5,217,213	16,767	11,757	2,081	1,412	10,467	1,588	1,345	5,746	1
1,950,621	1,103,139	11,234,727	11,130,096	9,091,516	7,764,699	6,201,930	35,069,097	34,074,009	29,522,536	2,881,301	1,983,206	14,558,019	4,883,398	4,218,724	20,511,078	2
6487	65	14,499	14,472	10,197	6462	642	14,727	14,585	10,401	6206	614	9,242	6156	628	5,485	3
6328,289	63,690	10,280,792	10,219,725	8,722,780	6904,649	6120,210	29,382,117	29,075,041	26,338,669	6421,827	620,501	12,833,823	6482,822	699,709	16,548,294	4
2,360	1,588	1,356	1,293	515	3,207	72,715	2,486	2,182	1,356	1,775	71,398	1,225	1,432	71,317	1,261	5
1,622,332	71,099,449	953,935	910,371	368,736	6,860,050	76,081,720	5,686,980	4,998,968	3,183,867	2,459,474	71,962,705	1,724,196	4,400,576	74,119,015	3,962,784	6
1,096	753	900	616	95	1,282	707	1,045	707	655	749	559	330	533	486	377	7
754,239	521,490	345,711	421,716	65,106	2,655,531	2,324,590	1,644,869	1,491,159	769,484	1,023,937	781,859	455,958	1,631,594	1,542,731	1,188,911	8
6	4	...	...	...	3	3	...	...	...	...	...	...	...	...	...	9
3,749	2,199	...	...	...	11,271	12,051	...	...	...	...	...	...	11,271	12,051	...	10
...	1	...	...	...	...	2	3	...	...	...	...	...	...	...	...	11
...	610	...	640	640	...	3,385	5,659	5,691	...	...	3,385	3,385	...	...	2,274	12
230	37	19	17	5	185	68	93	91	39	109	25	30	76	43	63	13
150,233	24,199	14,523	12,060	3,669	383,612	169,293	238,621	235,900	103,001	144,769	33,065	39,084	238,843	136,228	199,537	14
104	129	14	15	15	151	164	78	69	60	76	81	28	75	83	50	15
71,294	87,405	9,928	10,359	10,059	332,349	368,156	200,131	178,776	155,747	101,939	109,470	40,137	230,410	258,686	159,994	16
2,892	48	13	9	5	8	64	28	25	11	4	32	9	4	32	19	17
2,883	32,883	9,154	5,986	3,396	17,394	144,573	68,815	59,784	21,260	5,930	46,213	12,415	11,464	98,360	56,400	18
818	(6)	137	...	...	838	(6)	201	...	...	824	(6)	128	814	(6)	73	19
811,961	(6)	97,758	...	...	83,396	(6)	403,065	...	...	831,948	(6)	183,183	851,448	(6)	219,882	20
148	85	3	4	5	216	124	36	40	29	109	69	14	107	55	22	21
101,911	59,903	2,510	2,980	3,370	488,077	271,122	93,942	101,486	63,157	147,268	93,103	20,060	340,809	178,019	73,882	22
21	24	31	22	16	28	28	17	23	14	18	10	10	10	7	7	23
14,172	18,158	22,399	15,704	11,750	55,146	52,790	36,525	40,043	25,205	26,533	31,946	15,822	28,613	20,844	20,703	24
11	31	12	8	18	4	49	22	6	6	9	22	5	9	27	17	25
8,075	22,646	9,517	5,632	2,472	42,870	119,375	61,296	60,005	15,210	12,214	30,870	6,367	30,656	88,505	54,929	26
313	278	463	441	290	873	849	1,038	942	675	438	415	529	435	509	27	27
228,468	201,239	330,937	320,566	210,371	2,014,354	1,944,745	2,345,828	2,160,720	1,547,003	633,572	586,223	747,972	1,380,782	1,358,522	1,598,036	28
6120	61	3,973	4,117	2,812	687	65	3,254	3,645	2,465	659	61	2,171	628	64	1,083	29
680,373	6768	2,806,651	2,896,966	2,098,534	6160,430	618,230	6,189,895	7,256,727	5,017,315	677,882	61,229	2,969,206	682,548	617,101	3,220,689	30
661	61	917	927	704	687	611	1,286	1,290	1,010	651	754	6	6	6	532	31
640,868	6819	650,436	663,537	500,458	6187,921	627,987	2,645,729	2,639,362	2,065,762	672,690	67,039	1,051,108	6115,231	620,948	1,594,621	32
26	16	23	21	16	47	41	40	24	16	23	24	24	24	17	16	33
20,366	11,837	16,783	15,227	11,944	105,012	90,238	80,945	78,425	33,086	34,597	36,970	34,216	70,415	53,268	46,729	34
67	(6)	37	55	33	67	64	81	99	67	66	42	42	(8)	(8)	39	35
64,566	(6)	27,088	36,505	23,143	610,683	65,933	176,366	202,222	130,176	68,683	65,933	56,749	62,000	(6)	119,617	36
373	167	327	454	4	397	160	173	146	25	271	106	126	54	68	37	37
261,601	115,041	219,183	309,076	2,269	734,737	310,669	348,202	258,698	64,063	373,294	143,618	137,499	361,443	167,051	210,703	38
45	19	34	...	...	77	58	58	...	...	36	22	28	21	30	30	39
31,330	13,826	25,675	...	...	179,308	146,856	128,407	...	...	52,090	36,23	40,662	127,418	110,643	87,745	40
628	(6)	2,911	2,656	2,133	2,928	62	2,631	2,674	2,674	65	61	1,863	61	61	1,065	41
618,013	(6)	2,073,240	1,866,876	1,849,136	611,285	66,340	5,823,875	5,193,743	7,902,624	67,085	61,820	2,601,894	64,200	64,520	3,221,981	42
6110	(6)	517	487	437	6110	61	1,546	1,235	610	76	757	6	6	(6)	789	43
676,273	(6)	386,722	356,396	307,812	6200,810	61,260	3,532,795	2,828,230	1,385,737	6105,305	61,260	1,084,817	695,505	(6)	2,447,978	44
222	135	25	28	13	236	173	156	143	84	122	84	67	114	89	89	45
149,764	91,316	18,630	19,705	9,789	508,014	393,698	392,968	347,762	201,240	161,464	118,377	94,085	346,550	275,321	298,883	46
99	26	37	37	18	193	157	163	149	98	85	53	55	108	104	108	47
65,228	20,759	28,045	28,667	13,154	449,824	410,708	412,987	373,337	239,414	118,155	81,053	82,679	331,669	329,655	330,308	48
11	11	7	6	2	7	25	19	13	10	4	13	12	3	12	7	49
9,051	7,380	5,336	4,093	1,307	15,591	56,160	39,412	34,157	23,711	4,921	16,828	17,267	10,670	39,332	22,145	50
14	29	17	23	22	46	88	75	58	63	18	38	28	28	50	47	51
9,684	21,045	12,894	15,649	14,570	117,454	222,490	188,656	139,639	173,192	27,781	56,581	42,039	89,673	165,909	146,617	52
...	10	1	...	...	1	19	2	3	...	...	10	...	...	...	...	53
...	6,917	600	...	...	2,500	38,169	6,940	7,740	...	...	15,028	...	2,300	23,141	6,940	54
5	1	...	...	...	4	4	...	...	...	2	1	...	...	...	...	55
3,400	790	...	...	...	7,556	10,456	...	...	...	2,600	1,200	...	4,956	9,256	...	56
1	12	...	...	...	1	8	2	3	...	1	5	...	...	...	...	57
600	8,347	...	...	...	1,000	15,818	8,267	8,740	...	1,000	7,300	...	...	8,518	8,267	58
14	8	...	...	...	2	2	...	...	...	2	2	...	...	...	...	59
8,871	4,827	...	...	...	2,351	2,300	...	...	...	2,351	2,300	...	...	...	...	60
304	209	111	26	23	206	161	120	...	...	134	106	81	72	...	...	61
202,778	132,493	72,318	17,924	15,928	368,615	293,695	224,665	117,907	96,026	179,749	137,059	109,235	188,866	156,636	115,430	62
678	(6)	1	3	1	64	62	59	62	50	845	(6)	12	619	62	47	63
652,640	(6)	720	2,120	640	6119,270	66,640	181,720	184,520	148,680	662,610	(6)	18,080	656,660	66,640	163,640	64
646	61	5,958	6,184	94,058	641	67	5,241	5,512	3,493	628	62	3,446	613	65	1,795	65
631,479	683	4,200,927	4,364,144	3,928,812	680,573	620,490	10,145,994	10,532,356	9,615,229	638,053	63,220	4,776,053	642,520	617,270	5,369,941	66
69,296	6720	...	...	750	620,516	610,632	42,381	46,576	5,000	69,592	(6)	1,593	610,924	610,632	40,788	67
46	25	8	7	...	49	46	23	21	1	28	31	12	21	15	11	69
32,402	16,717	5,941	5,052	...	102,901	92,031	51,349	42,697	4,000	37,328	42,451	15,984	65,573	49,580	35,365	70
69	16	7	...	...	40	16	11	11	8	30	10	6	6	6	5	71
44,128	10,933	5,458	3,655	2,198	66,233	32,571	25,760	27,109	19,793	35,548	12,310	7,736	30,685	20,261	18,024	72
64	81	48	43	18	613	87	117	92	30	66	(6)	68	67	67	49	73
62,820	6800	37,250	33,181	13,495	629,765	622,598	240,297	191,305	68,146	67,979	(6)	91,140	621,786	622,598	149,157	74
55	34	43	39	17	101	85	100	91	49	60	50	51	41	35	49	75
38,260	24,627	31,339	28,581	12,465	215,009	185,760	225,679	209,899	117,651	83,789	73,448	74,530	131,220	112,312		

DRAINAGE OF AGRICULTURAL LANDS

Summary Table 11.—DRAINAGE PROJECTS BY SIZE,

State	5,000 to 9,999 acres					10,000 to 49,999 acres				
						Total				
	1960	1950	1940 ³	1930 ³	1920 ³	1960	1950	1940 ³	1930 ³	1920 ³
All drainage States.....	number... 728	679	2,357	2,291	1,472	819	818	5,188	1,814	1,107
	acres... 5,081,845	4,754,671	16,387,515	15,865,002	13,357,936	16,758,378	17,098,296	536,721,074	35,075,951	23,826,149
10 "county-drain" States.....	number... 663	628	1,708	1,640	1,064	6132	6115	1,137	1,105	656
	acres... 6,450,885	6,215,942	11,844,795	11,380,140	10,537,608	63,168,131	62,980,509	20,874,066	20,306,960	14,402,437
30 "drainage-district" States.....	number... 665	7,651	649	651	408	687	703	747	709	451
	acres... 4,630,960	74,538,729	4,542,720	4,484,862	2,820,328	13,590,247	714,117,787	15,847,008	14,768,991	9,423,712
17 irrigation States.....	number... 300	291	272	259	153	367	386	431	394	243
	acres... 2,132,948	2,037,649	1,922,304	1,819,937	1,069,961	7,630,247	8,128,968	9,606,659	8,709,736	5,278,049
Alabama.....	number... ..	1	..	..	..	2	2	2	..	..
	acres... ..	7,540	..	..	..	50,881	54,881	28,045	..	..
Arizona.....	number... ..	1	..	..	1	..	3	(⁵)	1	1
	acres... ..	5,000	..	..	9,000	..	75,914	(⁵)	20,600	30,000
Arkansas.....	number... 60	47	70	67	39	99	110	112	111	68
	acres... 439,295	341,529	523,848	493,382	274,227	2,164,973	2,321,290	2,420,960	2,414,091	1,473,391
California.....	number... 56	48	34	32	30	36	34	44	34	33
	acres... 381,682	326,785	232,307	220,410	203,655	619,410	674,625	925,127	707,309	672,181
Colorado.....	number... 4	12	10	9	3	..	14	12	13	4
	acres... 35,210	81,865	75,300	73,941	26,000	..	269,086	205,969	226,746	71,000
Delaware.....	number... 81	(⁶)	14	..	..	81	(⁶)	13	..	..
	acres... 86,346	(⁶)	83,616	..	..	811,700	(⁶)	192,786	..	..
Florida.....	number... 66	35	23	28	18	69	44	39	46	30
	acres... 473,168	242,882	156,326	187,251	114,456	1,383,240	971,293	849,321	1,017,982	694,045
Georgia.....	number... 1	2	2	2	2	2	1	..	..	1
	acres... 9,846	15,046	17,531	15,800	15,245	22,690	10,265	(⁷)	10,000	10,000
Idaho.....	number... 2	8	7	8	1	2	6	8	6	2
	acres... 11,988	60,393	52,215	60,261	6,960	48,049	155,806	229,926	181,947	40,000
Illinois.....	number... 182	179	196	203	144	125	125	95	98	74
	acres... 1,240,267	1,231,412	1,342,317	1,360,351	976,666	2,139,686	2,113,490	1,692,968	1,728,101	1,239,719
Indiana.....	number... 612	63	341	397	229	616	612	217	274	144
	acres... 685,208	625,216	2,362,676	2,727,803	1,718,075	6374,691	6300,891	4,036,299	5,088,605	2,917,817
Iowa.....	number... 619	67	186	185	141	141	124	124	116	107
	acres... 6140,346	659,155	1,280,602	1,295,465	1,005,124	6962,368	6711,112	5,269,573	2,054,594	1,895,497
Kansas.....	number... 22	12	11	11	3	8	10	7	7	2
	acres... 155,065	125,555	73,361	74,962	22,792	97,870	133,812	84,710	84,705	21,040
Kentucky.....	number... 6	2	18	19	11	11	6	5	13	7
	acres... 614,400	614,400	130,760	122,746	79,592	682,562	665,871	58,070	200,998	107,381
Louisiana.....	number... 28	18	40	37	22	79	59	103	90	47
	acres... 203,467	135,583	291,267	259,448	159,161	1,711,637	1,203,875	2,260,132	2,044,993	1,037,196
Maryland.....	number... 13	13	4	..	..	2	2	..	..	..
	acres... 89,562	90,165	25,636	..	..	33,541	33,541	..	..	..
Michigan.....	number... 63	61	286	254	151	67	69	175	..	95
	acres... 622,096	67,930	1,951,253	1,743,097	3,251,318	6215,382	6283,436	3,110,113	3,281,204	1,072,885
Minnesota.....	number... 65	357	335	335	177	625	624	325	306	234
	acres... 636,520	623,936	2,519,891	2,388,231	1,250,804	6713,965	6728,576	6,339,013	5,968,444	4,630,974
Mississippi.....	number... 53	60	67	67	23	66	63	78	74	35
	acres... 361,648	394,409	429,877	462,954	157,416	1,292,852	1,270,559	1,532,535	1,558,578	664,285
Missouri.....	number... 50	52	64	64	48	72	72	95	85	60
	acres... 345,052	367,628	385,082	450,062	341,884	1,450,651	1,473,791	2,091,937	1,721,812	1,557,927
Montana.....	number... ..	7	3	2	3	2	5	7	4	1
	acres... ..	47,728	20,059	11,792	19,664	35,470	79,991	188,628	117,080	24,000
Nebraska.....	number... 26	30	25	23	17	15	20	22	21	14
	acres... 187,135	214,581	168,646	149,998	115,106	259,365	332,455	458,564	413,263	275,562
Nevada.....	number... ..	4	1	..	..	1	4	3	..	..
	acres... ..	21,650	7,551	..	..	39,021	125,595	60,598	77,956	15,940
New Jersey.....	number... ..	..	..	..	..	..	..	..	..	..
	acres... ..	..	..	..	..	..	..	..	..	..
New Mexico.....	number... 2	5	5	4	4	1	2	6	3	3
	acres... 15,018	37,196	37,590	29,450	34,579	14,975	30,655	163,018	54,102	31,640
New York.....	number... 1	1	..	..	..	2	3	..	..	..
	acres... 8,500	8,500	..	..	..	29,894	40,838	..	..	..
North Carolina.....	number... 28	19	19	12	11	23	21	20	19	14
	acres... 190,996	130,256	132,000	81,272	71,717	465,198	445,924	387,725	365,742	265,640
North Dakota.....	number... 69	62	39	53	51	63	64	63	32	32
	acres... 663,648	612,504	302,855	394,682	358,390	6105,406	693,864	1,205,806	479,500	501,377
Ohio.....	number... 61	61	448	373	300	614	615	201	175	122
	acres... 65,536	65,536	3,076,820	2,549,773	2,850,517	6356,501	6417,817	3,485,021	2,973,427	3,152,280
Oklahoma.....	number... 62	61	10	9	1	65	67	5	3	..
	acres... 612,176	65,376	70,393	60,381	6,000	691,808	6122,752	84,872	63,491	..
Oregon.....	number... 7	10	9	8	..	8	10	8	4	..
	acres... 44,865	60,821	55,341	51,451	..	134,053	163,545	180,930	109,511	..
South Carolina.....	number... 6	6	8	7	3	8	7	5	6	1
	acres... 47,249	48,627	56,398	44,628	20,400	196,306	164,880	5116,710	132,322	40,000
South Dakota.....	number... 69	68	9	15	3	11	10	9	9	5
	acres... 664,609	661,889	65,929	97,962	17,788	6253,750	6256,190	192,513	196,697	124,226
Tennessee.....	number... 11	17	21	17	13	11	15	12	16	9
	acres... 75,379	116,827	147,473	115,598	91,612	177,758	293,772	201,786	236,523	139,666
Texas.....	number... 13	14	10	8	4	44	48	48	43	30
	acres... 96,652	98,649	71,143	54,662	32,032	1,054,684	1,260,502	1,292,456	1,006,763	746,544
Utah.....	number... ..	8	2	3	..	2	6	5	4	3
	acres... ..	56,698	11,292	15,545	5,280	56,000	113,640	129,620	85,405	77,690
Virginia.....	number... ..	..	..	1	..	1	1	1	..	..
	acres... ..	25,553	..	9,538	..	10,248	13,568	13,568	..	..
Washington.....	number... 11	16	12	10	3	1	3	2	2	2
	acres... 72,372	102,818	85,877	74,317	19,649	11,500	43,750	35,223	47,808	21,900
Wisconsin.....	number... 16	14	13	19	11	6	5	8	16	14
	acres... 103,960	90,670	84,102	124,722	75,427	90,295	73,310	175,075	306,177	228,426
Wyoming.....	number... 3	11	9	..	..	..	8	5	5	2
	acres... 17,031	77,916	60,181	63,067	27,400	..	173,134	121,447	100,375	45,920

Italics indicate States identified in 1950 as "county-drain" States. The other States were designated "drainage-district" States. See footnote 6 and text.
 Boldface indicates States, other than "county-drain," for which the 1950 drainage data included drained lands in "irrigation enterprises." See footnote 4 and text.
 Land in two or more projects included in each project. Areas shown equal the sum of areas of individual projects with no deduction for land included in more than one project.
²In 1960, only projects of 500 or more acres were included. See footnote 6 and text.
³For 1940, 1930, and 1920, number refers to the total reports including projects wholly superseded by later projects. For 1920, data for number of projects, by size of project, were not available from the 1920 report. The counts presented for that year are those carried in the 1940 report (see Summary Table 6) and differ from the total count of projects reported in 1920.
⁴For 1950, projects under 500 acres include "irrigation enterprises" with drainage enumerated in the Census of Irrigation (see Summary Table 12) and 3 "county-drain" counties representing portions of intercounty drains (see footnote 6). The enumeration for the 1950 Census of Drainage included only drainage projects of 500 or more acres.
⁵Revised.

SUMMARY

BY STATES: CENSUSES OF 1920 TO 1960—Continued

10,000 to 49,999 acres—Continued ^d						50,000 to 99,999 acres					100,000 or more acres				
10,000 to 19,999 acres			20,000 to 49,999 acres												
1960	1950	1940 ³	1960	1950	1940 ³	1960	1950	1940 ³	1930 ³	1920 ³	1960	1950	1940 ³	1930 ³	1920 ³
499	484	1,228	320	334	566	152	145	5159	168	115	246	252	562	66	31
6,963,107	6,781,099	16,964,180	9,795,271	10,317,197	519,756,894	10,630,513	10,254,850	10,760,472	11,403,982	8,605,536	56,912,374	66,631,930	51,589,756	13,597,194	4,850,978
668	651	800	664	664	337	662	657	61	76	42	6191	6197	19	24	14
989,540	774,675	10,922,231	6,217,591	6,232,824	9,951,835	6,539,101	6,413,676	3,944,427	5,099,727	3,725,087	6,445,793,354	2,474,010	3,582,975	1,982,361	4
431	433	428	256	270	319	90	88	98	92	73	55	55	43	42	17
5,973,567	6,033,424	6,041,949	7,616,680	7,804,363	9,805,059	6,091,412	7,612,174	6,816,045	6,304,255	4,880,449	14,393,790	7,220,02,576	11,115,746	10,014,219	2,868,617
212	219	226	155	167	205	62	62	72	67	55	50	49	38	35	12
2,961,427	3,040,509	3,206,106	4,668,820	5,088,461	6,400,553	4,114,687	4,272,415	4,910,900	4,498,792	3,631,023	13,308,634	20,688,382	10,468,963	9,171,556	2,114,095
...	...	2	2	2	...	...	...	...	...	...	...	...	...	...	...
...	...	28,045	50,881	54,881	...	...	...	...	...	...	...	...	...	...	...
...
...	28,424	...	...	47,490	...	...	...	52,378	50,000	...	110,000	5242,870	242,000	...	...
...	63	66	45	47	46	12	13	16	18	16	12	9	8	8	4
776,548	890,690	975,512	1,388,425	1,430,600	1,445,448	778,208	933,322	1,087,472	1,228,710	1,162,120	1,849,017	1,457,428	1,346,506	1,379,517	825,264
27	20	14	9	14	26	8	12	5	4	1	1	1	4	4	...
385,170	259,547	353,899	234,240	415,078	571,228	477,966	740,077	401,973	285,542	65,000	136,846	204,800	983,682	889,856	...
...	...	9	...	4	3	...	1	2	...	1	...	...	...	...	...
...	138,831	115,483	...	130,255	90,486	...	53,000	109,244	...	50,000	...	...	...	...	...
...	...	11	(8)	(8)	2	(8)	(6)	...	...	...	82	62	...	...	...
11,700	(6)	135,532	(8)	(6)	57,254	(8)	(6)	...	...	...	8228,119	6352,547	...	...	...
38	22	22	31	22	17	13	7	10	11	10	4	6	11	15	20
531,642	303,173	319,224	851,598	668,120	530,097	909,054	505,069	709,654	732,777	604,913	2,993,041	5,075,510	4,650,188	5,330,327	280,000
2	1	...	...	...	...	...	...	...	...	...	...	...	...	...	...
22,690	10,265	...	...	...	(5)	...	...	...	...	...	...	...	...	...	...
...	2	2	2	4	6	...	1	2	1	...	...	...	...	...	...
...	25,635	29,775	48,049	130,171	200,151	...	53,680	121,760	67,057	...	...	198,757	...	...	...
98	100	73	27	25	22	2	1	1	1	1	1	1	...	...	...
1,317,391	1,356,455	1,008,760	822,295	757,035	684,208	151,034	69,902	98,481	98,481	62,333	109,261	110,000	...	...	...
...	...	154	67	67	66	66	67	16	27	13	651	651	6	7	5
101,632	65,280	2,070,077	6273,059	6235,611	1,966,222	6479,819	6555,344	1,022,024	1,878,090	1,032,904	610,087,327	610,117,160	711,417	1,044,155	755,799
630	617	97	16	14	27	27	67	5	4	3	623	623	1	...	...
429,493	6243,381	1,344,725	6532,875	6467,731	824,488	6932,852	6512,797	312,478	279,408	184,867	64,799,215	65,422,583	5242,080	142,080	...
8	10	7	...	...	...	...	...	...	...	...	...	...	...	...	...
97,870	133,812	84,710	...	...	...	...	...	...	...	...	...	...	...	...	...
62	62	5	62	61	...	...	64	2	...	...	...	...	...	...	...
29,191	632,591	58,070	653,371	633,280	...	6335,569	6283,009	107,606	55,606	...	6443,019	6590,295	...	...	...
43	32	51	36	27	52	16	8	12	11	10	22	24	5	3	36
600,013	456,721	729,869	1,111,624	747,154	1,530,263	1,046,309	604,461	762,667	664,813	628,385	4,500,048	10,271,867	821,561	556,985	450,960
2	2	...	...	...	...	1	1	...	...	...	...	...	...	...	...
33,541	33,541	...	...	...	...	63,045	81,280	...	...	...	...	...	...	...	...
62	62	120	65	67	55	65	65	12	7	91	637	637	6	8	41
31,169	28,316	1,598,807	6184,213	6255,120	1,511,306	6403,485	6428,560	769,674	445,530	568,205	69,230,067	69,478,173	887,682	1,229,497	...
67	67	211	618	617	114	622	619	17	28	15	635	635	3	8	43
105,929	6107,651	2,964,592	6608,036	6620,925	3,374,421	61,597,870	61,359,843	1,100,804	1,838,978	944,845	68,419,708	69,156,347	732,831	1,167,243	1,226,562
41	38	48	25	25	30	12	12	8	8	4	1	2	1	1	2
582,586	554,362	693,017	710,266	716,197	839,518	898,322	913,712	611,775	631,908	320,400	143,900	248,365	133,976	131,678	249,460
43	42	50	29	30	45	8	8	14	14	8	3	3	4	5	47
603,643	607,549	693,745	847,008	866,242	1,398,192	527,879	540,420	999,189	922,594	546,213	831,995	1,005,829	512,807	610,985	405,062
1	3	3	1	2	...	...	1	...	...	...	...	...	...	...	1
12,580	32,000	44,775	22,890	47,991	143,853	...	77,000	...	...	...	...	...	119,479	...	100,000
12	17	16	3	3	6	2	3	3	3	2	...	...	...	...	...
163,857	230,040	225,381	95,908	102,415	233,213	167,366	172,165	173,771	172,646	128,500	...	...	...	...	...
...	1	1	1	3	2	...	1	1	1	...	...	...	...	...	...
...	13,850	11,278	39,021	111,745	49,320	...	50,599	77,284	77,284	...	...	...	...	...	...
...
...	1	1	...	...	...	...	...	...	...	...	...	...	...	...	...
14,975	30,655	14,975	...	148,043	...	...	132,264	97,010	84,000	74,000	...	...	...	...	...
2	3	...	...	...	...	...	...	...	...	...	...	...	...	...	...
29,894	40,838	...	...	...	...	...	...	...	...	...	...	...	...	...	...
12	9	12	11	12	8	3	3	1	...	...	...	...	...	1	60
161,601	116,263	165,585	303,597	329,661	222,140	189,445	189,445	56,500	...	...	...	...	100,000	100,000	62
61	62	42	62	62	21	61	62	2	2	3	66	66	...	...	63
18,176	29,096	592,086	687,228	664,768	613,720	69,309	6114,017	149,680	122,560	231,241	61,331,912	61,345,030	...	...	64
68	68	152	66	69	49	67	66	5	5	97	633	633	...	...	65
118,498	65,198	2,058,764	6238,003	6332,619	1,426,257	6532,618	6473,784	317,673	312,797	763,025	67,867,150	68,005,152	...	...	66
63	63	4	62	62	1	(6)	63	...	...	...	(6)	(6)	...	...	67
642,656	673,600	49,880	649,152	649,152	34,992	(6)	6161,373	...	...	...	(6)	(6)	...	...	68
6	4	2	2	2	4	...	1	1	...	...	...	...	...	...	69
78,213	115,483	56,261	55,840	48,062	124,669	...	51,355	55,600	...	...	...	...	...	...	70
4	3	3	4	3	2	...	...	...	...	...	...	...	...	...	71
51,682	52,096	40,253	144,624	112,784	576,457	...	...	...	...	57,600	...	...	...	...	72
6	65	4	65	65	63	...	64	2	2	...	61	61	...	...	73
101,096	682,562	49,698	6152,654	6173,628	142,815	6197,579	6252,949	164,488	166,758	...	6112,067	...	...	...	74
8	9	9	3	6	3	1	...	...	...	...	...	...	...	...	75
108,569	134,670	132,240	69,189	159,102	69,546	91,000	...	...	...	...	...	...	...	...	76
20	16	12	24	32	36	11	11	16	14	14	11	8	6	4	77
277,059	252,721	174,768	777,625	1,007,781	1,117,688	735,784	801,243	1,156,660	994,527	918,105	3,829,682	3,568,777	1,973,920	772,871	457,871
1	4	2	1	2	3	...	...	...	...	...	...	...	...	...	79
12,000	47,640	22,259	44,000	66,000	107,361	...	...	...	...	...	...	...	...	...	80
1	1	1	...	...	...	...	...	...	...	...	...	...	...	...	81
10,248	13,568	13,568	...	...	...	...	...	...	...	...	...	...	...	...	82
1	1	1	...	1	1	...	1	...	...	...	...	...	1	...	83
11,500	21,750	10,392	...	22,000	24,831	...	98,180	...	90,000	...	...	...	132,000	...	84
6	4	...	...	...	4	1	1	2	2	4	...	...	...	...	85
90,295	73,310	60,630	...	...	114,445	56,000	56,000	139,200	152,480	262,880	...	...	...	...	86
...	5	3	...	3	2	...	...	2	1	...	...	...	...	...	87
...	59,535	37,545	...	113,599	83,902	...	...	105,427	51,436	...	...	...	...	...	88

^dIn 1960, all drains under county management were enumerated as a unit with each portion of intercounty projects credited to the county where located. In 1950, the procedure was similar for "county-drain" States but the county report included all projects in the county, including those not under county management. The 1960 data (500-999 acres) include reports for county-drains for two counties (Benton, Iowa, and Jerauld, S. Dak.) with less than 500 acres due to intercounty projects. The 1950 data (under 500 acres) include 3 such counties (Benton, Iowa, Fulton, Ky., and Jerauld, S. Dak.). In 1940, 1930, and 1920, each drain was considered a separate project.

^eTotals for 30 States shown for 1950 were based on interstate projects divided on State lines. The

DRAINAGE OF AGRICULTURAL LANDS

Summary Table 12.—DRAINAGE PROJECTS BY TYPE OF

State	All drainage projects					Drains owned by one landowner ¹				
	1960 ²	1950 ³	1940 ³	1930 ³	1920 ³	1960 ²	1950 ³	1940 ³	1930 ³	1920 ³
All drainage States.....	number... 8,461	14,533	39,597	67,927	56,949	1,817	551	NA	NA	NA
acres... 99,098,430	102,688,331	86,967,039	84,408,093	65,495,038	4,162,544	1,382,830	985,046	854,880	642,018	
10 "county-drain" States.....	number... 1,397	457	34,596	62,391	52,962	79	(6)	NA	NA	NA
acres... 51,909,639	52,033,141	47,094,801	47,720,374	43,213,765	90,943	(6)	101,226	70,223	NA	
30 "drainage-district" States.....	number... 7,064	14,076	5,001	5,536	3,228	1,738	551	NA	NA	NA
acres... 47,188,791	50,655,190	39,872,238	36,687,719	22,281,273	4,071,601	1,382,830	883,820	784,657	NA	
17 irrigation States.....	number... 3,157	10,862	1,747	2,119	906	1,391	427	NA	NA	NA
acres... 30,596,286	35,995,203	26,098,986	23,043,464	12,268,025	3,603,074	1,155,977	708,103	680,504	NA	
Alabama.....	number... 11	10	1	...	...	1	...	...	...	...
acres... 65,901	76,671	28,045	...	...	500	...	...	...	...
Arizona.....	number... ..	25	5	7	3	...	...	...	...	NA
acres... ..	197,268	298,633	318,931	39,640	...	...	...	...	...	(7)
Arkansas.....	number... 598	844	250	316	174	167	15	NA	NA	NA
acres... 5,765,338	4,701,095	4,592,738	4,631,155	3,479,591	236,104	67,790	84,358	40,660	26,900	
California.....	number... 356	2,047	158	162	145	157	48	NA	NA	NA
acres... 2,019,547	2,554,576	2,667,194	2,233,714	1,108,319	311,903	177,321	89,985	50,384	147,678	
Colorado.....	number... 16	630	56	58	24	3	8	NA	NA	NA
acres... 55,496	623,976	468,322	366,719	171,656	2,638	21,421	25,291	17,351	33,630	
Delaware.....	number... 60	2	287	...	...	...	(6)	...	...	...
acres... 341,522	352,547	395,014	...	...	...	(6)	...	...	...
Florida.....	number... 516	1,889	101	146	94	388	122	NA	NA	NA
acres... 6,348,491	6,083,676	5,699,022	5,954,934	1,637,073	1,836,408	385,291	22,640	105,533	118,890	
Georgia.....	number... 52	55	52	59	46	11	10	NA	NA	1
acres... 101,854	96,259	84,374	84,255	65,452	12,847	9,569	3,700	9,000	110,000	
Idaho.....	number... 33	379	50	50	13	5	4	NA	NA	NA
acres... 110,982	436,171	659,136	375,464	64,642	4,074	3,210	2,492	1,850	560	
Illinois.....	number... 1,496	1,433	1,695	1,919	1,365	39	16	NA	NA	NA
acres... 5,883,070	5,370,825	5,091,364	5,032,682	3,909,049	78,673	27,449	30,822	15,722	17,542	
Indiana.....	number... 292	79	8,893	18,339	12,004	18	(6)	NA	NA	NA
acres... 11,267,848	11,017,709	10,121,952	10,214,014	9,087,183	22,765	(6)	1,000	15,726	5,623	
Iowa.....	number... 249	86	3,180	3,730	2,883	10	(6)	NA	NA	NA
acres... 7,063,570	6,734,863	6,164,344	6,137,649	5,224,478	11,428	(6)	53,786	21,557	12,795	
Kansas.....	number... 103	121	88	88	54	5	...	NA	NA	NA
acres... 377,983	356,988	258,113	257,169	93,856	3,660	...	7,754	5,550	2,200	
Kentucky.....	number... 28	18	144	216	179	1	(6)	NA	NA	NA
acres... 890,799	959,892	465,270	585,625	358,480	2,000	(6)	3,150	3,500	6,400	
Louisiana.....	number... 915	922	495	741	111	526	199	NA	NA	NA
acres... 8,457,799	12,161,665	4,219,624	3,655,483	2,266,328	810,903	344,239	412,303	402,496	36,463	
Maryland.....	number... 138	93	126	...	...	...	...	...	...	...
acres... 396,786	323,815	183,337	...	...	...	...	...	...	...
Michigan.....	number... 86	54	7,692	10,640	10,453	11	(6)	NA	NA	NA
acres... 9,900,328	10,194,439	8,978,386	9,180,851	9,729,171	7,454	(6)	7,560	21,530	22,280	
Minnesota.....	number... 307	82	2,498	2,885	2,340	25	(6)	NA	NA	NA
acres... 11,045,146	11,269,962	10,990,409	11,474,683	9,232,709	34,930	(6)	35,730	1,800	800	
Mississippi.....	number... 590	441	271	344	167	121	65	NA	NA	NA
acres... 3,354,500	3,023,744	2,890,618	2,988,496	1,601,444	155,650	111,253	50,155	27,400	56,750	
Missouri.....	number... 425	318	286	367	238	55	1	NA	NA	NA
acres... 3,670,629	3,147,484	3,087,063	3,150,022	2,596,204	42,154	4,250	5,600	9,955	9,896	
Montana.....	number... 20	404	34	27	17	1	2	NA	NA	NA
acres... 60,112	289,189	372,661	167,629	168,682	640	3,260	7,000	8,100	13,650	
Nebraska.....	number... 103	473	125	138	123	...	...	...	...	NA
acres... 741,004	821,088	916,181	879,459	607,730	...	...	...	3,080	7,270	
Nevada.....	number... 2	82	8	7	1	...	...	NA	NA	NA
acres... 41,521	251,154	153,373	162,980	15,940	...	...	2,600	...	(7)	
New Jersey.....	number... 9	5	...	...	...	...	...	...	...	...
acres... 10,956	11,206	...	...	...	...	...	...	...	...
New Mexico.....	number... 5	223	7	11	8	1	...	...	...	NA
acres... 31,593	244,961	305,885	176,292	140,219	600	...	...	...	(7)	
New York.....	number... 19	14	...	...	...	2	5	...	...	...
acres... 49,616	56,465	...	...	...	1,300	2,638	...	...	...
North Carolina.....	number... 564	413	246	130	104	39	4	NA	NA	NA
acres... 1,417,032	1,128,509	825,576	679,236	542,828	65,426	16,342	58,700	17,370	59,851	
North Dakota.....	number... 161	21	141	152	137	...	(6)	...	...	...
acres... 1,732,183	1,572,220	1,376,041	1,094,142	1,240,328	...	(6)	...	...	...
Ohio.....	number... 142	63	11,530	26,191	24,871	3	(6)	...	...	NA
acres... 8,873,857	8,923,362	7,729,267	8,165,494	8,107,204	2,424	(6)	...	...	7,736	
Oklahoma.....	number... 31	18	29	33	5	11	(6)	...	...	NA
acres... 133,796	300,884	197,646	170,158	12,150	9,942	(6)	...	4,110	(7)	
Oregon.....	number... 110	1,087	63	51	1	6	2	...	...	NA
acres... 314,221	418,858	348,825	211,182	4,000	25,690	700	...	4,500	(7)	
South Carolina.....	number... 123	45	24	31	17	59	20	NA	NA	NA
acres... 353,916	249,011	204,366	208,249	140,031	88,203	52,477	21,940	15,092	25,200	
South Dakota.....	number... 41	34	202	205	90	...	(6)	...	...	...
acres... 660,590	707,263	676,472	697,758	222,062	...	(6)	...	2,000	...	
Tennessee.....	number... 179	151	155	191	95	8	2	NA	NA	...
acres... 597,406	615,838	601,592	593,560	363,671	8,433	2,175	1,200	600	...	
Texas.....	number... 243	543	81	87	54	130	22	NA	NA	NA
acres... 5,938,974	5,794,786	4,218,850	2,883,356	2,166,128	369,079	147,345	40,380	28,600	7,500	
Utah.....	number... 9	471	36	32	17	...	4	NA	NA	NA
acres... 66,910	302,158	202,058	156,052	113,823	...	4,120	12,020	11,200	8,304	
Virginia.....	number... 66	30	2	3	...	5	...	...	...	...
acres... 101,976	45,460	15,714	15,042	...	7,286	...	...	3,304	...	
Washington.....	number... 122	333	165	172	52	2	1	NA	NA	NA
acres... 242,482	431,613	405,709	367,242	94,924	1,375	1,280	1,200	1,200	1,100	
Wisconsin.....	number... 235	206	396	373	290	7	1	NA	NA	...
acres... 588,863	514,700	761,203	892,713	794,569	8,055	700	3,600	5,710	...	
Wyoming.....	number... 6	189	25	26	15	...	...	...	...	NA
acres... 23,833	325,981	312,662	245,703	95,474	...	...	...	...	500	

Italics indicate States identified in 1950 as "county-drain" States. The other States were designated "drainage-district" States. For the "county-drain" States in 1950 all projects in each county were enumerated as a unit; therefore, the counts shown for that year represent the number of county reports. For 1940, 1930, and 1920, each drain was counted as a separate project. See footnote 7 and text.

Boldface indicates States, other than "county-drain," for which the 1950 drainage data included drained lands in "irrigation enterprises." See footnote 4 and text.

NA Not available.

¹In 1940, 1930, and 1920, the classification by type of organization included drainage undertakings by two or more operators cooperating without organization under statute law with "individual ownership enterprises." One cooperative project of 10,000 acres in Georgia was identified in the text of the 1920 report.

²Land in two or more projects included in each project. Areas shown equal the sum of areas of individual projects with no deduction for land included in more than one project.

ORGANIZATION, BY STATES: CENSUSES OF 1920 TO 1960

Cooperative or mutual drains ¹		Legally organized public drains					Not identifiable under the 1960 classification								
							Irrigation enterprises with drainage ⁴				Other and not reported				
1960 ²	1950 ³	1960 ²	1950 ³	1940 ³	1930 ³	1920 ³	1950 ³	1940 ³	1930 ³	1920 ³	1940 ³	1930 ³	1920 ³		
2,469	893	4,175	4,013	NA	NA	NA	9,076	NA	NA	NA	NA	NA	NA		
3,577,204	1,409,494	91,358,682	95,776,948	81,705,415	80,894,347	64,352,059	4,119,059	4,240,578	2,644,674	462,599	36,000	14,192	38,362		
739	(6)	579	6445	NA	NA	NA	12	NA	NA	NA	...	...	NA
953,061	(6)	50,865,635	652,023,655	46,901,141	47,569,562	NA	9,486	92,434	80,589	NA	...	...	34,282
1,730	893	3,596	3,568	NA	NA	NA	9,064	NA	NA	NA	36,000	NA	NA		
2,624,143	1,409,494	40,493,047	43,753,293	34,804,274	33,324,785	NA	4,109,573	4,148,144	2,564,085	NA	NA	14,192	4,080		
668	200	1,098	1,171	NA	NA	NA	9,064	NA	NA	NA	...	...	...
1,213,864	455,058	25,779,348	30,274,595	21,242,739	19,784,683	NA	4,109,573	4,148,144	2,564,085	NA	...	14,192	...		
6	7	4	3	NA	...	...	...	...	...	...	...	...	...
33,745	40,735	31,656	35,936	28,045	...	...	...	...	...	...	...	...	...
...	...	...	2	NA	NA	...	...	...	...	...	...	...	...
...	...	...	3,385	5,659	26,931	(7)	193,883	292,974	292,000	(7)	...	...	...
...	...	...	229	229	...	...	577	...	...	...	...	...	...
276,463	32,398	5,252,771	4,506,440	4,508,380	4,590,495	3,452,691	94,467	...	...	...	...	...	...
45	13	154	102	701	NA	NA	1,884	...	...	...	...	...	...
124,511	73,266	1,583,133	1,202,950	1,168,701	1,167,139	795,441	1,101,039	1,408,508	1,016,191	165,200	...	...	...
3	4	10	39	NA	NA	NA	579	NA	NA	...	...	...	...
5,610	27,190	47,248	255,753	255,709	250,238	138,026	319,612	187,322	99,130	...	...	...	...
1	(6)	59	62	NA	...	...	...	...	...	...	...	...	...
780	(6)	340,742	6352,547	395,014	...	...	...	...	...	...	...	...	...
36	13	92	103	NA	NA	...	1,651	...	...	...	...	...	...
274,431	118,476	4,237,652	5,430,151	5,676,382	5,849,401	1,518,183	149,758	...	...	...	...	...	...
17	10	24	35	NA	NA	...	...	...	...	...	...	...	...
24,325	17,205	64,682	69,485	80,674	75,255	55,452	...	...	...	...	...	...	...
3	3	25	37	NA	NA	...	335	NA	NA	...	...	...	...
4,362	5,195	102,546	135,172	123,753	118,645	16,082	292,594	532,891	254,969	48,000	...	...	...
154	189	1,303	1,228	NA	NA	...	...	...	...	...	...	...	...
228,762	302,121	5,575,635	5,041,255	5,060,542	5,016,960	3,891,507	...	...	...	...	...	...	...
188	(6)	86	679	NA	NA	...	...	...	...	...	...	...	...
237,047	(6)	11,008,036	611,017,709	10,120,952	10,198,288	9,049,193	...	...	...	...	...	...	32,367
89	(6)	150	86	NA	NA	...	...	...	...	...	...	...	...
125,657	(6)	6,926,485	6,734,863	6,110,588	6,116,092	5,211,683	...	...	...	...	...	...	...
14	...	84	84	NA	NA	...	37	...	...	...	...	...	...
23,427	...	350,896	355,089	250,359	251,619	91,656	1,899	...	...	...	...	...	...
10	(6)	17	18	NA	NA	...	...	...	...	...	...	...	...
8,660	(6)	880,139	6959,892	462,120	582,125	352,080	...	...	...	...	...	...	...
235	95	154	117	NA	NA	...	511	NA	...	...	...	...	...
309,784	128,197	7,337,112	11,605,479	3,795,721	3,252,987	2,229,865	83,750	11,600	...	...	...	...	...
9	3	129	90	NA	...	...	...	...	...	...	...	...	...
14,183	4,333	382,603	319,482	183,337	...	...	...	...	...	...	...	...	...
21	(6)	54	654	NA	NA	...	...	...	...	...	...	...	...
22,724	(6)	9,870,150	610,194,439	8,970,826	9,159,321	9,706,891	...	...	...	...	...	...	...
192	(6)	90	82	NA	NA	...	...	...	...	...	...	...	...
248,293	(6)	10,761,923	611,269,962	10,954,679	11,472,883	9,231,909	...	...	...	...	...	...	...
230	127	239	249	NA	NA	...	...	...	...	...	...	...	...
292,531	140,006	2,906,319	2,772,485	2,840,463	2,961,096	1,544,694	...	...	...	...	...	...	...
56	2	314	315	NA	NA	...	...	...	...	...	...	...	...
57,739	5,290	3,570,736	3,137,944	3,081,463	3,140,067	2,586,308	...	...	...	...	...	...	...
6	3	13	22	NA	NA	...	377	NA	NA	...	...	...	...
4,685	2,260	54,787	94,172	53,418	39,984	129,432	189,497	312,243	119,545	25,600	...	...	...
4	5	99	149	NA	NA	...	319	NA	NA	...	...	...	...
6,940	3,970	734,064	713,821	721,986	696,994	591,772	103,297	194,195	179,385	8,688	...	...	...
...	1	2	4	NA	NA	...	77	NA	NA	...	...	...	...
...	2,500	41,521	125,595	24,398	80,756	(7)	123,059	126,375	82,224	(7)	...	...	...
9	4	...	1	...	...	...	...	...	...	...	...	...	...
10,956	6,906	...	4,300	...	...	...	...	...	...	...	...	...	...
...	4	...	5	NA	NA	...	218	NA	NA	...	...	...	...
...	...	30,993	52,113	172,796	59,837	(7)	192,848	133,089	116,455	(7)	...	...	...
13	5	4	4	...	...	...	...	...	...	...	...	...	...
20,071	25,582	28,245	28,245	...	...	...	...	...	...	...	...	...	...
403	287	122	122	NA	NA	...	...	...	...	...	...	...	...
485,339	332,356	866,267	779,811	766,876	661,866	482,977	...	...	...	...	...	...	...
144	(6)	17	615	NA	NA	...	6	NA	NA	...	...	...	...
200,630	(6)	1,531,553	61,565,055	1,356,113	1,088,053	1,240,328	7,165	19,928	6,089	...	...	...	...
76	(6)	63	63	NA	NA	...	...	...	...	...	...	...	...
88,555	(6)	8,782,878	68,923,362	7,729,267	8,165,494	8,097,553	...	...	...	...	...	...	...
10	(6)	14	614	NA	NA	...	4	...	...	...	...	...	...
9,556	(6)	114,198	7298,853	197,646	166,048	(7)	2,031	...	...	(7)	...	...	...
56	9	48	44	NA	NA	...	1,032	NA	NA	...	...	...	...
87,807	16,507	200,724	161,286	139,580	121,778	(7)	240,365	209,245	71,112	(7)	...	13,792	...		
52	11	12	14	NA	NA	...	...	...	...	...	...	...	...
97,212	28,540	168,501	167,994	182,426	193,157	114,831	...	...	...	...	...	...	...
8	(6)	33	632	NA	NA	...	2	NA	NA	...	...	...	...
11,059	(6)	649,531	6706,973	603,966	621,258	222,062	290	72,506	74,500	...	...	...	...
37	20	134	129	NA	NA	...	...	...	...	...	...	...	...
39,293	21,623	549,680	592,040	600,392	592,960	363,671	...	...	...	...	...	...	...
43	13	70	62	NA	NA	...	446	NA	NA	...	...	...	...
74,170	18,155	5,495,725	5,155,647	3,844,378	2,767,477	2,102,628	473,639	334,092	87,279	56,000	...	...	...
1	7	8	25	NA	NA	...	435	...	...	...	...	...	...
1,300	16,070	65,610	130,003	148,677	144,852	105,519	151,965	41,361	...	...	...	...	...
59	28	2	2	NA	NA	...	...	...	...	...	...	...	...
82,289	29,739	12,401	15,721	15,714	11,738	...	...	...	...	...	...	...	...
20	9	100	130	NA	NA	...	393	NA	NA	...	...	...	...
20,374	8,205	220,733	263,423	264,039	275,642	93,824	158,705	140,390	90,000	...	...	400	...
17	...	211	205	NA	NA	...	...	...	...	...	...	...	...
23,834	...	556,974	514,000	721,603	887,003	790,489	...	...	...	...	36,000	...	4,080
...	2	6	17	NA	NA	...	170	NA	NA	...	...	...	...
...	2,669	23,833	84,116	88,803	89,908	60,834	239,196	223,859	155,795	34,140	...	...	...

¹Land in two or more projects included only once. For 1950 and 1940, land in two or more projects included only for the project last organized; whereas, for 1930 and 1920, land in two or more projects included for the project first organized. The 1940, 1930, and 1920 reports also show, for the classification by type of organization, totals representing the sum of the areas of individual projects without deduction for land included in more than one project. Number, for 1930 and 1920, refers to the number of reports and includes projects wholly superseded by later projects and, for intercounty projects, the reports for each county. See text.

⁴Irrigation enterprises include both private and public drainage projects. In 1950, "irrigation enterprises" were from Census of Irrigation and represented reports of drained irrigated lands with no indication as to whether the irrigation organization was responsible for the drainage; in 1940, 1930, and 1920, "irrigation enterprises" having their own drainage were enumerated in the Census of Drainage.

²Number as shown on page 368 of the 1920 report; the sum of the numbers reported for the separate States equals 56,190.

³Data for this and 4 other States not available individually but included in totals for all drainage States.

⁴In 1950, for "county-drain" States, all drainage projects in each county (other than "irrigation enterprises" from Census of Irrigation) were enumerated with county-drains and are therefore shown under "legally organized public drains."

DRAINAGE OF AGRICULTURAL LANDS

Summary Table 13.—AREA DRAINED BY YEAR DRAINAGE WAS ESTABLISHED, 1960; AND

State	Area drained by year drainage was established, 1960 Census						Drainage projects by year organized		
	Land in drainage projects ¹			Totals of areas of individual projects ²			1960 Census ²		
	All projects	Drainage established 1950-1959	Drainage established before 1950	All projects	Drainage established 1950-1959	Drainage established before 1950	All projects	Organized, 1950-1959	Organized before 1950
All drainage States.....	8,461	NA	NA	8,461	1,791	7,190	8,461	2,503	5,958
acres...	92,296,864	5,326,593	86,960,271	99,098,430	5,481,823	93,616,607	99,098,430	6,258,852	92,839,578
10 "county-drain" States.....	1,397	NA	NA	1,397	443	1,177	1,397	536	861
acres...	50,835,337	1,787,086	49,048,251	51,909,639	1,795,253	50,114,386	51,909,639	843,095	51,066,544
30 "drainage-district" States.....	7,064	NA	NA	7,064	1,348	6,013	7,064	1,967	5,097
acres...	41,461,527	3,549,507	37,912,020	47,188,791	3,686,570	43,502,221	47,188,791	5,415,757	41,773,034
17 irrigation States.....	3,157	NA	NA	3,157	724	2,594	3,157	1,147	2,010
acres...	26,263,711	2,521,948	23,741,763	30,596,286	2,627,739	27,968,547	30,596,286	3,813,290	26,782,996
Alabama.....	11	NA	NA	11	4	10	11	1	10
acres...	65,901	1,050	64,851	65,901	1,050	64,851	65,901	500	65,401
Arizona.....	...	...	...	...	...	...	...	...	...
acres...	...	...	...	...	...	...	...	...	...
Arkansas.....	598	NA	NA	598	151	484	598	338	260
acres...	4,680,966	233,263	4,447,703	5,765,338	235,521	5,529,817	5,765,338	773,954	4,991,384
California.....	356	NA	NA	356	84	282	356	87	269
acres...	1,911,251	244,352	1,666,899	2,019,547	252,515	1,767,032	2,019,547	267,081	1,752,466
Colorado.....	16	...	NA	16	...	16	16	...	16
acres...	55,496	...	55,496	55,496	...	55,496	55,496	...	55,496
Delaware.....	60	NA	NA	60	2	59	60	10	50
acres...	340,922	856	340,066	341,522	856	340,666	341,522	22,822	318,700
Florida.....	516	NA	NA	516	152	398	516	197	319
acres...	4,855,327	548,956	4,306,371	6,348,491	565,295	5,783,196	6,348,491	828,437	5,520,054
Georgia.....	52	NA	NA	52	38	42	52	14	38
acres...	93,228	25,246	67,982	101,854	25,246	76,608	101,854	34,533	67,321
Idaho.....	33	NA	NA	33	2	32	33	1	32
acres...	110,982	864	110,118	110,982	864	110,118	110,982	704	110,278
Illinois.....	1,496	NA	NA	1,496	74	1,446	1,496	101	1,395
acres...	5,563,426	134,693	5,428,733	5,883,070	134,853	5,748,217	5,883,070	227,957	5,655,113
Indiana.....	292	NA	NA	292	265	138	292	138	154
acres...	11,053,446	73,382	10,980,064	11,267,848	73,382	11,194,466	11,267,848	197,004	11,070,844
Iowa.....	249	NA	NA	249	77	203	249	64	185
acres...	6,871,339	123,235	6,748,104	7,063,570	124,262	6,939,308	7,063,570	75,368	6,988,202
Kansas.....	103	NA	NA	103	26	81	103	27	76
acres...	373,110	63,975	309,135	377,983	64,075	313,908	377,983	68,772	309,211
Kentucky.....	28	NA	NA	28	7	21	28	8	20
acres...	888,799	6,046	882,753	890,799	6,046	884,753	890,799	6,646	884,153
Louisiana.....	915	NA	NA	915	116	835	915	307	608
acres...	7,110,624	965,687	6,144,937	8,457,799	1,032,655	7,425,144	8,457,799	1,521,116	6,936,683
Maryland.....	138	NA	NA	138	10	138	138	22	116
acres...	350,447	8,816	341,631	396,786	8,816	387,970	396,786	36,554	360,232
Michigan.....	86	NA	NA	86	42	83	86	22	64
acres...	9,877,049	123,587	9,753,462	9,900,328	123,587	9,776,741	9,900,328	16,365	9,883,963
Minnesota.....	307	NA	NA	307	161	233	307	160	147
acres...	10,560,808	1,244,237	9,316,571	11,045,146	1,251,377	9,793,769	11,045,146	370,380	10,674,766
Mississippi.....	590	NA	NA	590	137	487	590	197	393
acres...	3,040,607	249,368	2,791,239	3,354,500	252,407	3,102,093	3,354,500	435,318	2,919,182
Missouri.....	425	NA	NA	425	36	402	425	111	314
acres...	3,097,316	38,142	3,059,174	3,670,629	45,839	3,624,790	3,670,629	167,964	3,502,665
Montana.....	20	NA	NA	20	10	11	20	9	11
acres...	60,112	10,456	49,656	60,112	10,456	49,656	60,112	8,847	51,265
Nebraska.....	103	NA	NA	103	9	102	103	4	99
acres...	739,220	41,306	697,914	741,004	41,306	699,698	741,004	33,300	707,704
Nevada.....	2	...	NA	2	...	2	2	...	2
acres...	41,521	...	41,521	41,521	...	41,521	41,521	...	41,521
New Jersey.....	9	NA	NA	9	7	4	9	5	4
acres...	10,956	4,850	6,106	10,956	4,850	6,106	10,956	4,650	6,306
New Mexico.....	5	NA	NA	5	2	4	5	1	4
acres...	31,593	1,300	30,293	31,593	1,300	30,293	31,593	600	30,993
New York.....	19	NA	NA	19	6	13	19	6	13
acres...	49,616	4,451	45,165	49,616	4,451	45,165	49,616	4,451	45,165
North Carolina.....	564	NA	NA	564	153	434	564	186	378
acres...	1,320,503	254,482	1,066,021	1,417,032	254,482	1,162,550	1,417,032	322,432	1,094,600
North Dakota.....	161	NA	NA	161	29	144	161	27	134
acres...	1,641,183	124,160	1,517,023	1,732,183	124,160	1,608,023	1,732,183	55,550	1,676,633
Ohio.....	142	NA	NA	142	38	122	142	63	79
acres...	8,809,415	61,670	8,747,745	8,873,857	61,670	8,812,187	8,873,857	68,803	8,805,054
Oklahoma.....	31	NA	NA	31	19	12	31	20	11
acres...	133,796	18,584	115,212	133,796	18,584	115,212	133,796	19,098	114,698
Oregon.....	110	NA	NA	110	64	64	110	59	59
acres...	270,454	79,585	190,869	314,221	82,370	231,851	314,221	96,592	217,629
South Carolina.....	123	NA	NA	123	88	44	123	82	41
acres...	338,066	108,787	229,279	353,916	124,637	229,279	353,916	119,612	234,304
South Dakota.....	41	NA	NA	41	8	35	41	8	33
acres...	658,580	11,329	647,251	660,590	11,329	649,261	660,590	11,059	649,531
Tennessee.....	179	NA	NA	179	18	164	179	25	154
acres...	590,879	98,054	492,825	597,406	98,054	499,352	597,406	129,430	467,976
Texas.....	243	NA	NA	243	103	156	243	110	133
acres...	5,691,130	318,198	5,372,932	5,938,974	327,376	5,611,598	5,938,974	194,260	5,744,714
Utah.....	9	NA	NA	9	1	9	9	1	8
acres...	66,910	520	66,390	66,910	520	66,390	66,910	1,040	65,870
Virginia.....	66	NA	NA	66	37	36	66	38	28
acres...	92,778	51,971	40,807	101,976	56,497	45,479	101,976	63,717	38,259
Washington.....	122	NA	NA	122	17	112	122	14	108
acres...	241,182	13,486	227,696	242,482	13,486	228,996	242,482	18,587	223,895
Wisconsin.....	235	NA	NA	235	36	209	235	32	203
acres...	584,093	47,649	536,444	588,863	47,649	541,214	588,863	55,549	533,314
Wyoming.....	6	...	NA	6	...	6	6	...	6
acres...	23,833	...	23,833	23,833	...	23,833	23,833	...	23,833

Italics indicate States identified in 1950 as "county-drain" States. The other States were designated "drainage-district" States. For the "county-drain" States in 1950 all drainage projects in each county were enumerated as a unit; therefore, the counts shown for that year represent the number of county reports. For 1940, 1930, and 1920, each drain was counted a separate project. See footnote 4 and text.

Boldface indicates States, other than "county-drain," for which the 1950 drainage data included drained lands in "irrigation enterprises," enumerated in the Census of Irrigation. See footnote 4 and text.

NA Not available.

¹Land in two or more projects included only once.

²Land in two or more projects included in each project. Areas shown equal the sum of areas of individual projects with no deduction for land included in more than one project.

SUMMARY

DRAINAGE PROJECTS BY YEAR OF ORGANIZATION, CENSUSES OF 1920 TO 1960; BY STATES

Drainage projects by year organized—Continued													
1950 Census ³				1940 Census ³			1930 Census ³			1920 Census ³			
All projects	Organized, 1940-1949	Organized before 1940	Year not reported ⁴	All projects	Organized, 1930-1939	Organized before 1930	All projects	Organized, 1920-1929	Organized before 1920	All projects	Organized, 1910-1919	Organized before 1910	Year not reported
14,533	41,263	43,749	9,521	39,597	NA	NA	67,927	NA	NA	56,949	NA	NA	NA
102,688,331	14,351,738	32,193,879	56,142,714	86,967,039	5,966,247	81,000,792	84,408,093	10,716,605	73,691,488	65,495,038	28,719,717	636,545,774	229,547
457	(4)	(4)	457	34,596	NA	NA	62,391	NA	NA	52,962	NA	NA	NA
52,033,141	(4)	(4)	52,033,141	47,094,801	3,209,164	43,885,637	47,720,374	3,828,049	43,892,325	43,213,765	NA	NA	NA
14,076	1,263	3,749	9,064	5,001	NA	NA	5,536	NA	NA	3,228	NA	NA	NA
50,655,190	14,351,738	32,193,879	4,109,573	39,872,238	2,757,083	37,115,155	36,687,719	6,888,556	29,799,163	22,281,273	NA	NA	NA
10,862	636	1,162	9,064	1,747	NA	NA	2,119	NA	NA	906	NA	NA	NA
35,995,203	13,206,307	18,679,323	4,109,573	26,098,986	2,164,576	23,934,410	23,043,464	4,151,246	18,892,218	12,268,025	NA	NA	NA
10	7	3	...	1	...	NA	...	...	...	...	...	...	...
76,671	40,735	35,936	...	28,045	...	28,045	...	...	...	...	...	...	...
25	...	2	23	5	...	NA	7	...	...	3	NA	NA	...
197,268	...	3,385	193,883	298,633	...	298,633	318,931	24,891	294,040	39,640	(7)	(7)	...
844	32	235	577	250	NA	NA	316	NA	NA	174	NA	NA	...
4,701,095	130,269	4,476,359	94,467	4,592,738	109,297	4,483,441	4,631,155	741,744	3,889,411	3,479,591	2,561,950	869,641	48,000
2,047	21	142	1,884	158	NA	NA	162	NA	NA	145	NA	NA	...
2,554,576	53,454	1,400,083	1,101,039	2,667,194	42,723	2,624,471	2,233,714	479,954	1,753,760	1,108,319	566,114	471,396	70,809
630	3	48	579	56	NA	NA	58	NA	NA	24	NA	NA	...
623,976	12,190	292,174	319,612	468,322	74,959	393,363	366,719	191,233	175,486	171,656	...	...	...
2	(4)	(4)	2	287	NA	NA	...	...	...	...	...	...	...
352,547	(4)	(4)	352,547	395,014	114,382	280,632	...	...	...	...	...	...	...
1,889	131	107	1,651	101	NA	NA	146	NA	NA	94	NA	NA	...
6,083,676	501,908	5,432,410	149,758	5,699,022	20,136	5,678,886	5,954,934	516,448	5,438,486	1,637,073	1,630,103	6,970	...
55	...	39	...	52	...	NA	59	...	...	46	NA	NA	...
96,259	23,488	72,771	...	84,374	...	84,374	84,255	10,158	74,097	65,452	55,452	10,000	...
379	12	32	335	50	NA	NA	50	NA	NA	13	NA	NA	...
436,171	14,246	129,331	292,594	659,136	28,665	630,471	375,464	70,435	305,029	64,642	64,642	...	...
1,433	98	1,335	...	1,695	NA	NA	1,919	NA	NA	1,365	NA	NA	...
5,370,825	238,919	5,131,906	...	5,091,364	201,352	4,890,012	5,032,682	585,394	4,447,288	3,909,049	909,993	2,988,033	11,023
79	(4)	(4)	79	8,893	NA	NA	18,339	NA	NA	12,004	NA	NA	...
11,017,709	(4)	(4)	11,017,709	10,121,952	879,594	9,242,358	10,214,014	658,505	9,555,509	9,087,183	2,220,090	6,861,184	5,909
86	(4)	(4)	86	3,180	NA	NA	3,730	NA	NA	2,883	NA	NA	...
6,734,863	(4)	(4)	6,734,863	6,164,344	71,665	6,092,679	6,137,649	620,617	5,517,032	5,224,478	3,077,143	2,134,524	12,811
121	14	70	37	88	NA	NA	88	NA	NA	54	NA	NA	...
356,988	48,401	306,688	1,899	258,113	13,940	244,173	257,169	42,753	214,416	93,856	47,579	46,277	...
18	(4)	(4)	18	144	NA	NA	216	NA	NA	179	NA	NA	...
959,892	(4)	(4)	959,892	465,270	18,584	446,686	585,625	152,470	433,155	358,480	243,743	112,937	1,800
922	317	94	511	495	NA	NA	741	NA	NA	111	NA	NA	...
12,161,665	10,349,967	1,727,948	83,750	4,219,624	555,502	3,664,122	3,655,483	954,414	2,701,069	2,266,328	1,082,792	1,183,536	...
93	20	73	...	126	...	NA	...	...	...	...	...	...	...
323,815	57,525	266,290	...	183,337	125,865	57,472	...	...	...	...	...	...	...
54	(4)	(4)	54	7,692	NA	NA	10,640	NA	NA	10,453	NA	NA	...
10,194,439	(4)	(4)	10,194,439	8,978,386	701,872	8,276,514	9,180,851	844,770	8,336,081	9,729,171	3,435,274	6,273,912	19,985
82	(4)	(4)	82	2,498	NA	NA	2,885	NA	NA	2,340	NA	NA	...
11,269,962	(4)	(4)	11,269,962	10,990,409	73,384	10,917,025	11,474,683	809,517	10,665,166	9,232,709	5,633,290	3,585,208	14,211
441	178	263	...	271	...	NA	344	NA	NA	167	NA	NA	...
3,023,744	263,245	2,760,499	...	2,890,618	47,483	2,843,135	2,988,496	1,113,630	1,874,866	1,601,444	1,341,552	259,892	...
318	14	304	...	286	NA	NA	367	NA	NA	238	NA	NA	...
3,147,484	46,380	3,101,104	...	3,087,063	61,472	3,025,591	3,150,022	474,001	2,676,021	2,596,204	866,151	1,723,317	6,736
404	6	21	377	34	NA	NA	27	NA	NA	17	NA	NA	...
289,189	15,338	84,354	189,497	372,661	17,172	355,489	167,629	133,221	34,408	168,682	134,499	21,533	12,650
473	25	319	...	125	NA	NA	138	NA	NA	123	NA	NA	...
821,088	60,062	657,729	103,297	916,181	31,244	884,937	879,459	126,388	753,071	607,730	184,707	423,023	...
82	...	5	77	...	NA	NA	7	NA	NA	1	NA	NA	...
251,154	...	128,095	123,059	153,373	11,678	141,695	162,980	47,956	115,024	15,940	(7)	(7)	(7)
5	4	1	...	...	...	...	...	...	...	...	...	...	...
11,206	6,906	4,300	...	...	...	...	...	...	...	...	...	...	...
223	...	5	218	7	NA	NA	11	NA	NA	8	NA	NA	...
244,961	...	52,113	192,848	305,885	7,200	298,685	176,292	4,740	171,552	140,219	(7)	(7)	(7)
14	8	6	...	...	...	...	...	...	...	...	...	...	...
56,465	26,963	29,502	...	...	...	...	...	...	...	...	...	...	...
413	190	223	...	246	NA	NA	130	NA	NA	104	NA	NA	...
1,128,509	281,679	846,830	...	825,576	121,365	704,211	679,236	172,079	507,157	542,828	487,118	55,710	...
21	(4)	(4)	21	141	...	NA	152	NA	NA	137	NA	NA	...
1,572,220	(4)	(4)	1,572,220	1,376,041	...	1,376,041	1,094,142	29,719	1,064,423	1,240,328	365,274	875,054	...
63	(4)	(4)	63	11,530	NA	NA	26,191	NA	NA	24,871	NA	NA	...
8,923,362	(4)	(4)	8,923,362	7,729,267	1,324,363	6,404,904	8,165,494	380,508	7,784,986	8,107,204	943,200	7,161,648	2,356
18	(4)	(4)	18	29	NA	NA	33	NA	NA	5	NA	NA	...
300,884	(4)	(4)	300,884	197,646	25,320	172,326	170,158	70,850	99,308	12,150	(7)	(7)	(7)
1,087	11	44	1,032	63	NA	NA	51	NA	NA	1	NA	NA	...
418,858	20,266	158,227	240,365	348,825	76,543	272,282	211,182	87,681	123,501	4,000	(7)	(7)	(7)
45	26	19	...	24	...	...	31	NA	NA	17	NA	NA	...
249,011	68,076	180,935	...	204,366	...	204,366	208,249	131,778	76,471	140,031	140,031	...	...
34	(4)	(4)	34	202	...	...	205	NA	NA	90	NA	NA	...
707,263	(4)	(4)	707,263	676,472	...	676,472	697,758	261,093	436,665	222,062	162,616	59,446	...
151	19	132	...	155	NA	NA	191	NA	NA	95	NA	NA	...
615,838	22,590	593,248	...	601,592	28,160	573,432	593,560	106,730	486,830	363,671	363,671	...	...
543	38	59	446	81	NA	NA	87	NA	NA	54	NA	NA	...
5,794,786	1,965,642	3,355,505	473,639	4,218,850	1,158,388	3,060,462	2,883,356	516,632	2,366,724	2,166,128	1,272,147	893,981	...
471	8	28	435	36	NA	NA	32	NA	NA	17	NA	NA	...
302,158	7,884	142,309	151,965	202,058	2,303	199,755	156,052	25,564	130,488	113,823	113,073	750	...
30	27	3	...	2	...	...	3	NA	NA	...	...	...	...
45,460	25,939	19,521	...	15,714	...	15,714	15,042	11,738	3,304	...	...	...	...
533	16	124	393	165	NA	NA	172	NA	NA	52	NA	NA	...
431,613	24,411	248,497	158,705	405,709	14,826	390,883	367,242	78,643	288,599	94,924	45,258	43,166	6,500
206	20	186	...	396	NA	NA	373	NA	NA	290	NA	NA	...
514,700	42,986	471,714	...	761,203	6,810	754,393	892,713	131,802	760,911	794,569	329,526	462,696	2,347
189	2	17	170	25	...	...	26	NA	NA	15	NA	NA	...
325,981	2,669	84,116	239,196	312,662	...	312,662	245,703	108,549	137,154	95,474	95,474	...	...

³Land in two or more projects included only once. For 1950 and 1940, land in two or more projects included only for the project last organized; whereas, for 1930 and 1920, land in two or more projects included for the project first organized. The 1940, 1930, and 1920 reports also show, for the classification by year of organization, totals representing the sum of the areas of individual projects without deduction for land included in more than one project. Number, for 1930 and 1920, refers to the number of reports and includes projects wholly superseded by later projects and, for intercounty projects, the reports for each county. See text.

⁴Year of organization not obtained in 1950 for "irrigation enterprises" with drainage (from Census of Irrigation), or for "county-drain" States. See text.

⁵Number as shown on page 368 of the 1920 report; the sum of the numbers reported for the separate States equals 56,190.

⁶Revised to equal sum of data reported by States.

⁷Data for this and 4 other States not available individually but included in totals for all drainage States.

DRAINAGE MAPS

(31)

DRAINAGE OF AGRICULTURAL LANDS

ALABAMA—LOCATION OF LAND IN DRAINAGE PROJECTS, 1960
(Projects benefiting 500 or more acres of agricultural lands)



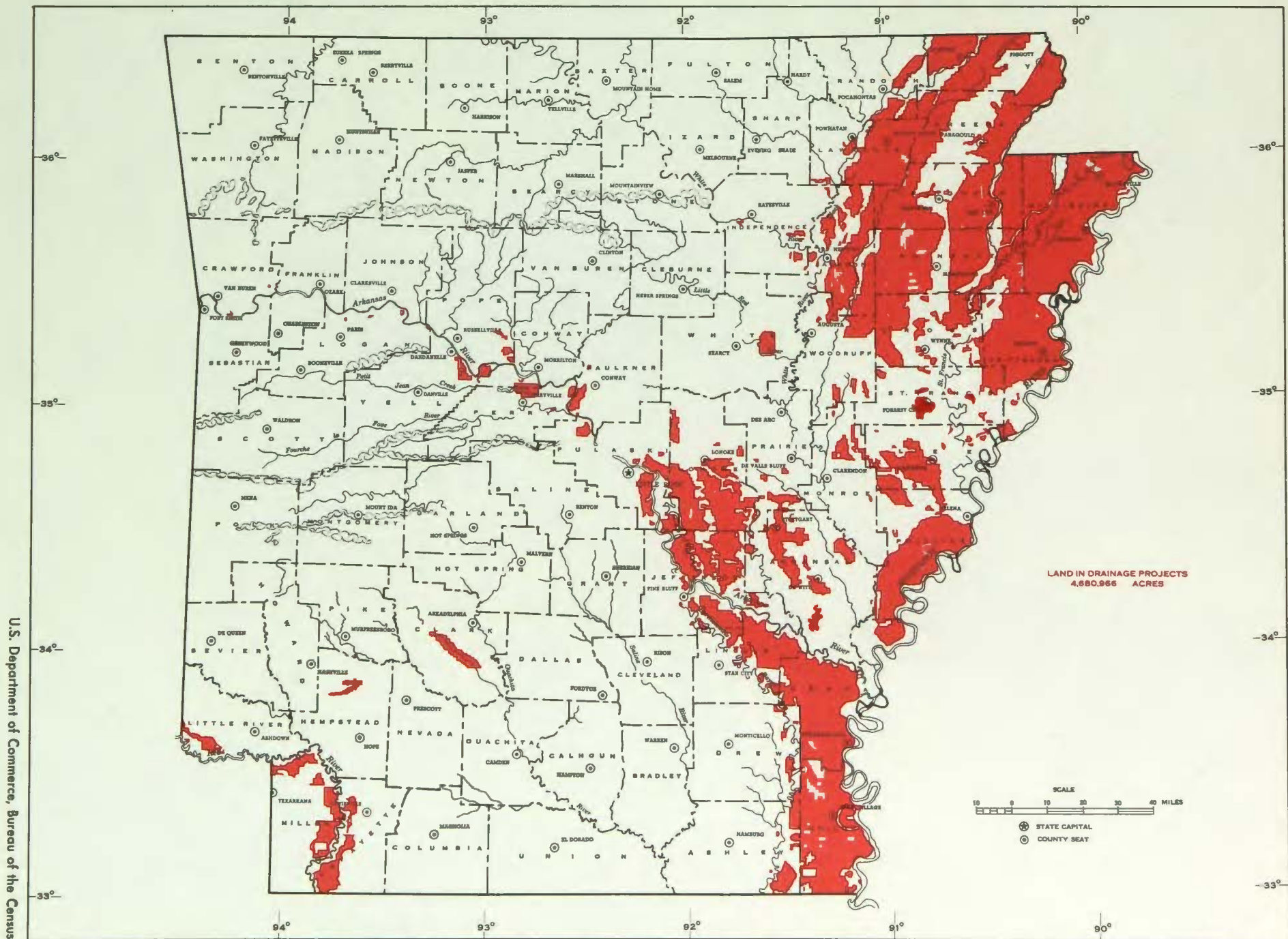
LAND IN DRAINAGE PROJECTS
65,901 ACRES

SCALE
0 10 20 30 40 MILES

★ STATE CAPITAL
● COUNTY SEAT

ARKANSAS—LOCATION OF LAND IN DRAINAGE PROJECTS, 1960

(Projects benefiting 500 or more acres of agricultural lands)

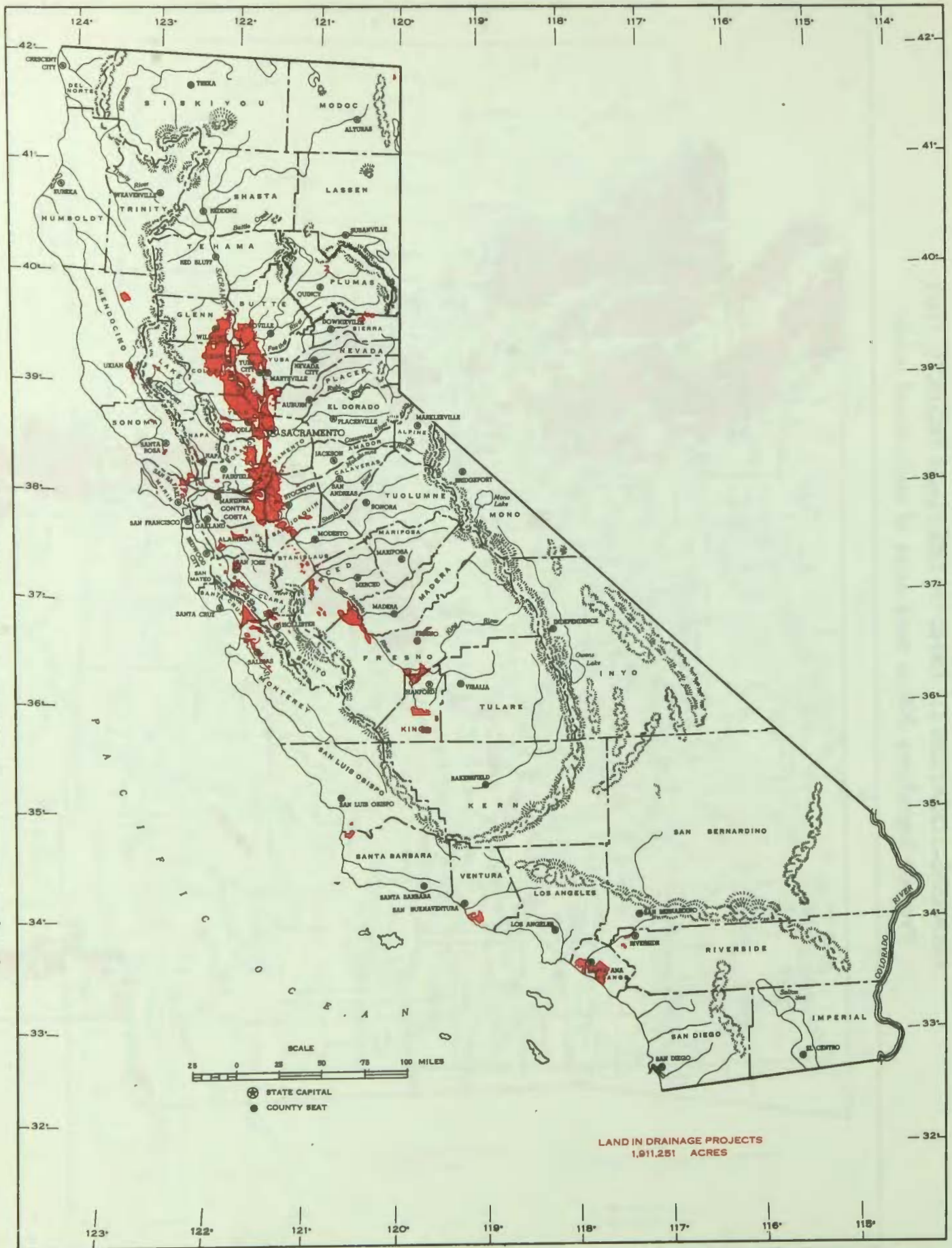


U.S. Department of Commerce, Bureau of the Census

DRAINAGE MAPS

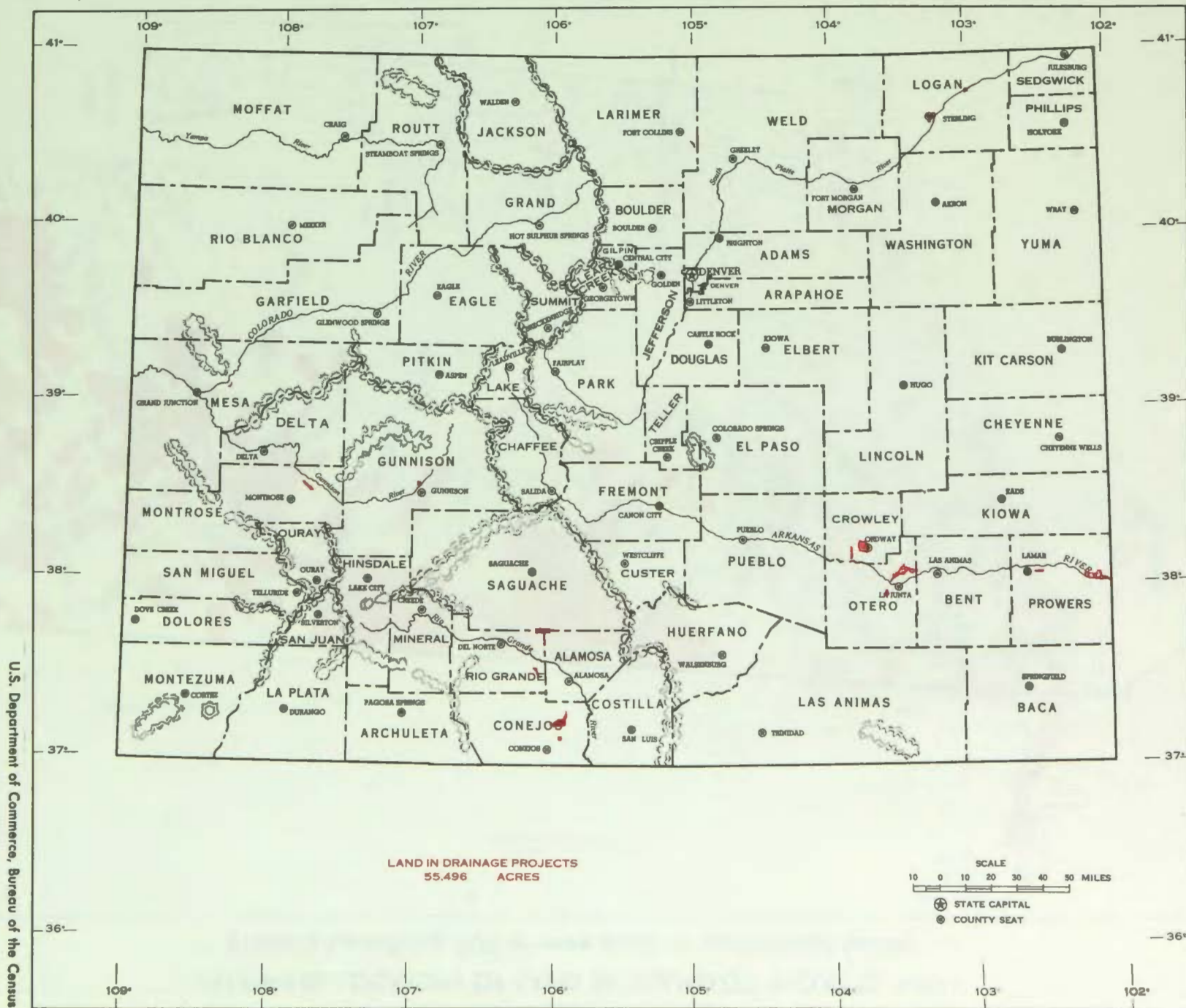
DRAINAGE OF AGRICULTURAL LANDS

CALIFORNIA—LOCATION OF LAND IN DRAINAGE PROJECTS, 1960
(Projects benefiting 500 or more acres of agricultural lands)



COLORADO—LOCATION OF LAND IN DRAINAGE PROJECTS, 1960

(Projects benefiting 500 or more acres of agricultural lands)

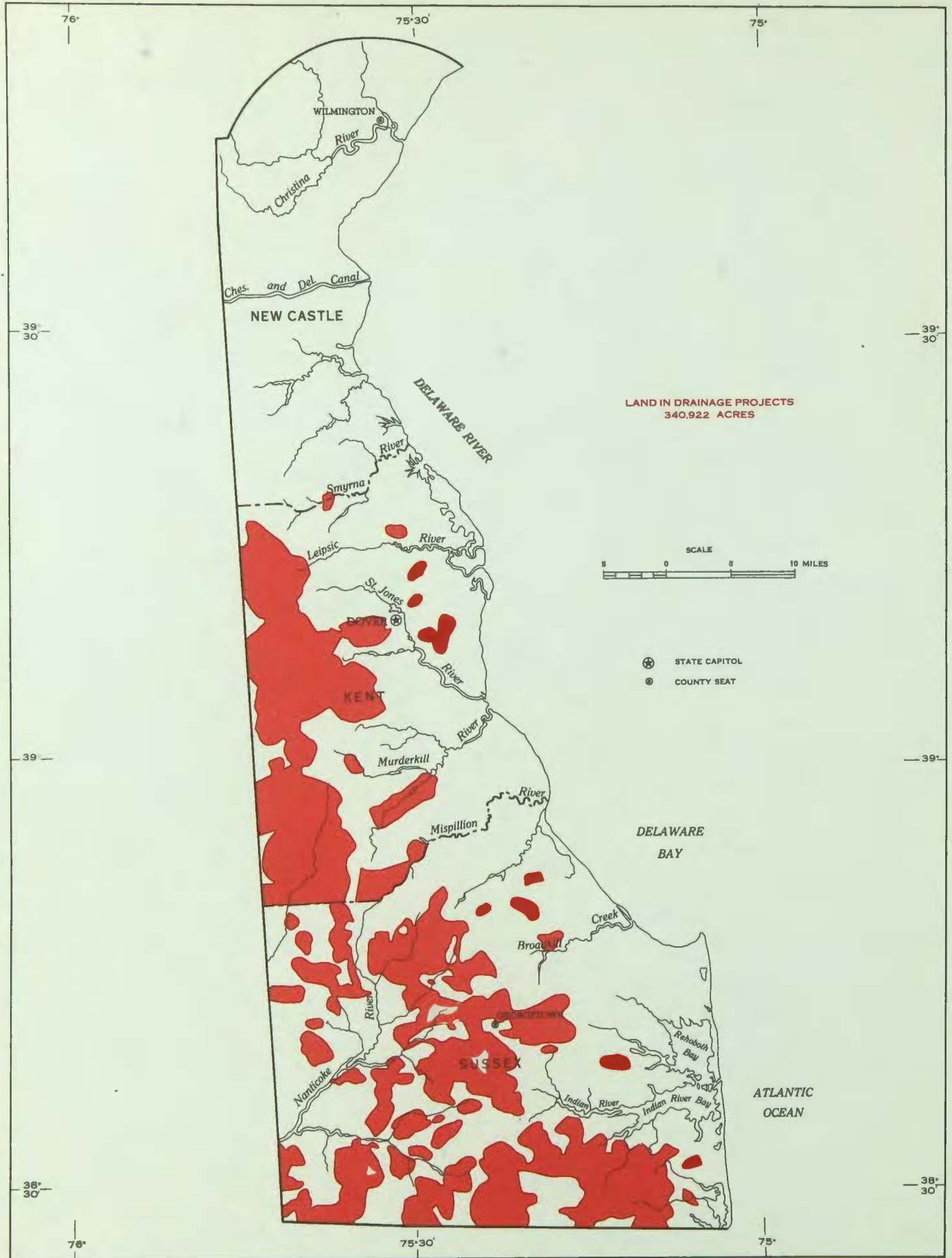


U.S. Department of Commerce, Bureau of the Census

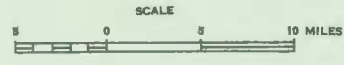
DRAINAGE MAPS

DRAINAGE OF AGRICULTURAL LANDS

DELAWARE—LOCATION OF LAND IN DRAINAGE PROJECTS, 1960
(Projects benefiting 500 or more acres of agricultural lands)



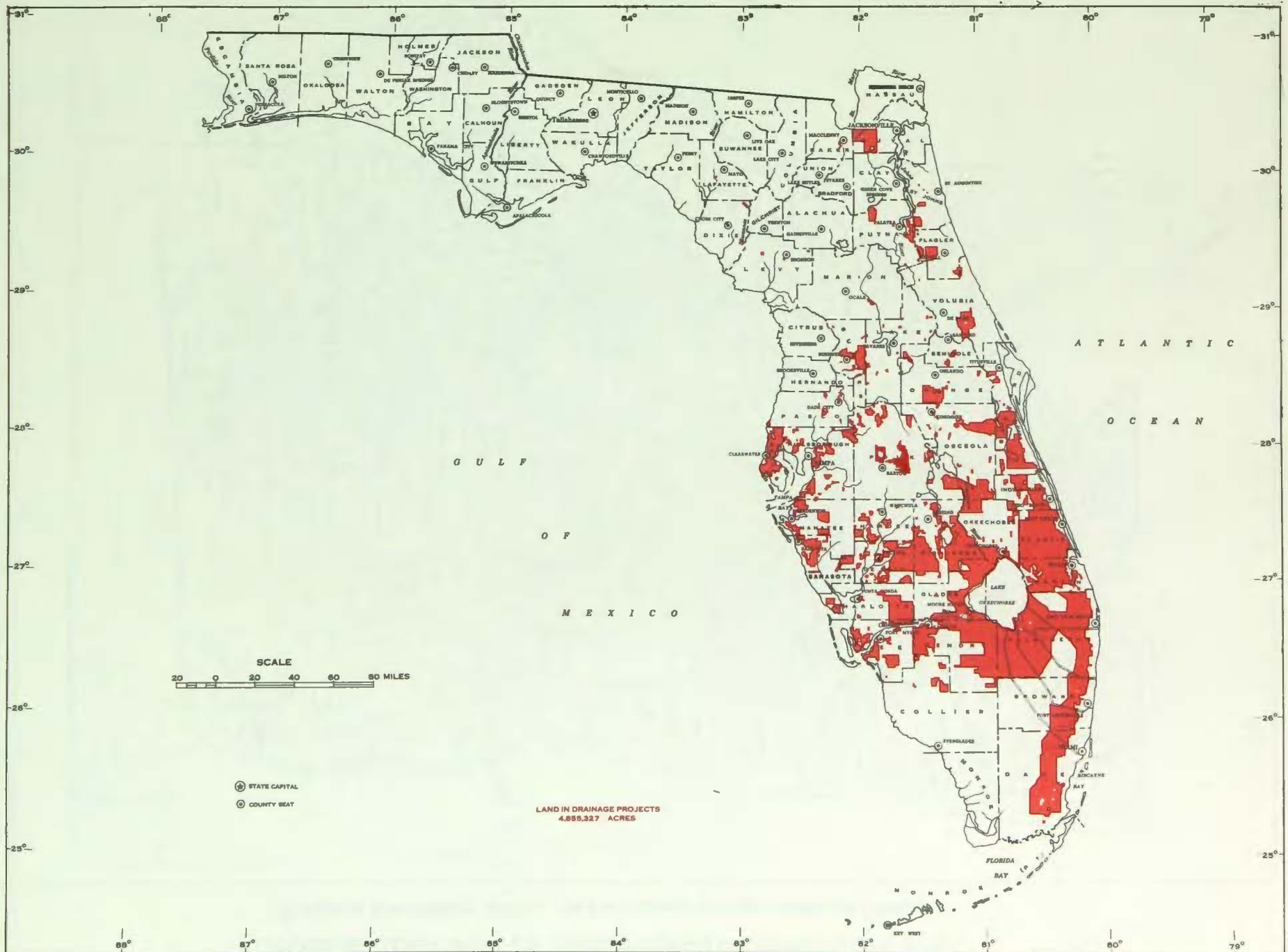
LAND IN DRAINAGE PROJECTS
340,922 ACRES



- ★ STATE CAPITOL
- ⊙ COUNTY SEAT

FLORIDA—LOCATION OF LAND IN DRAINAGE PROJECTS, 1960

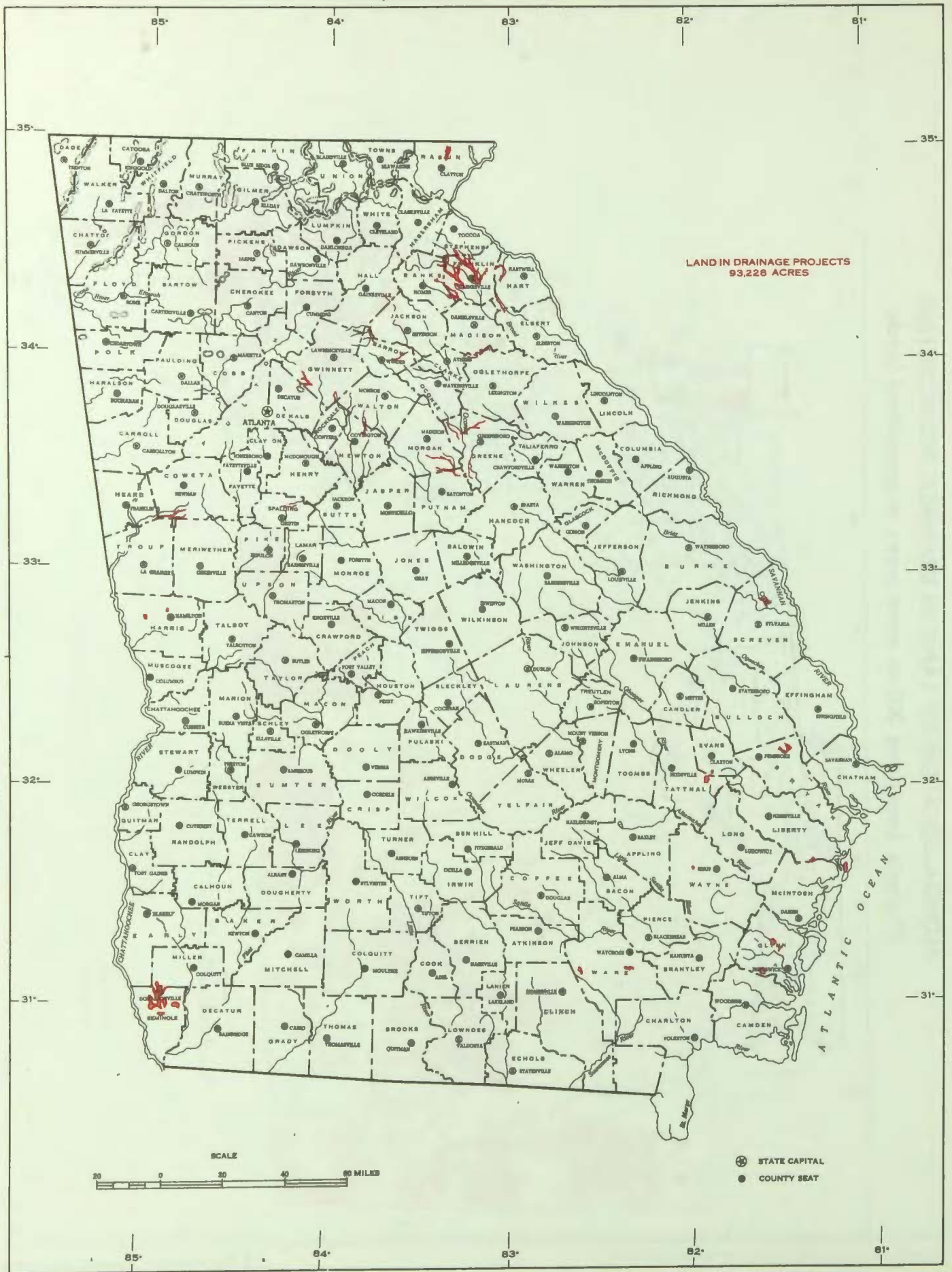
(Projects benefiting 500 or more acres of agricultural lands)



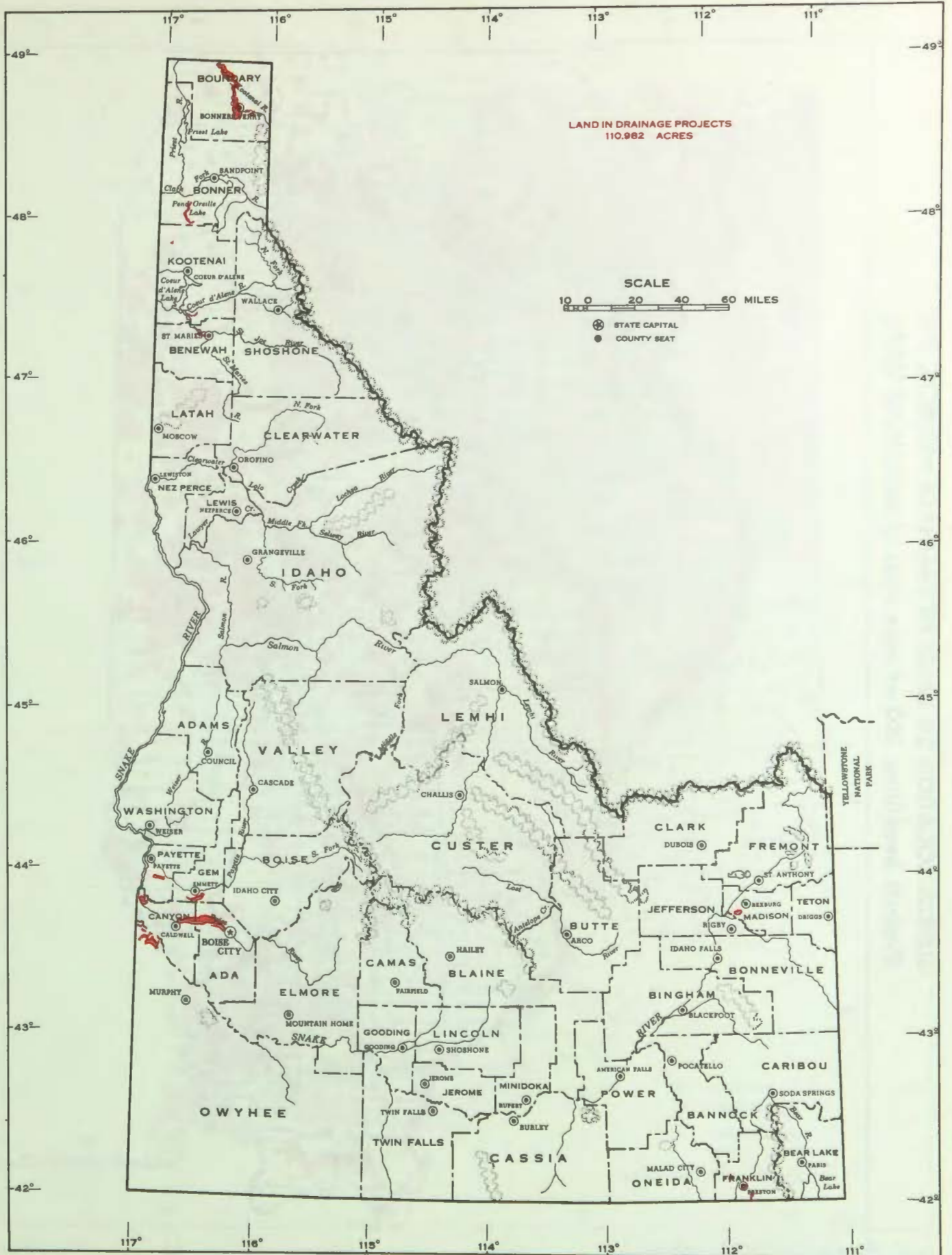
U.S. Department of Commerce, Bureau of the Census

DRAINAGE OF AGRICULTURAL LANDS

GEORGIA—LOCATION OF LAND IN DRAINAGE PROJECTS, 1960
(Projects benefiting 500 or more acres of agricultural lands)

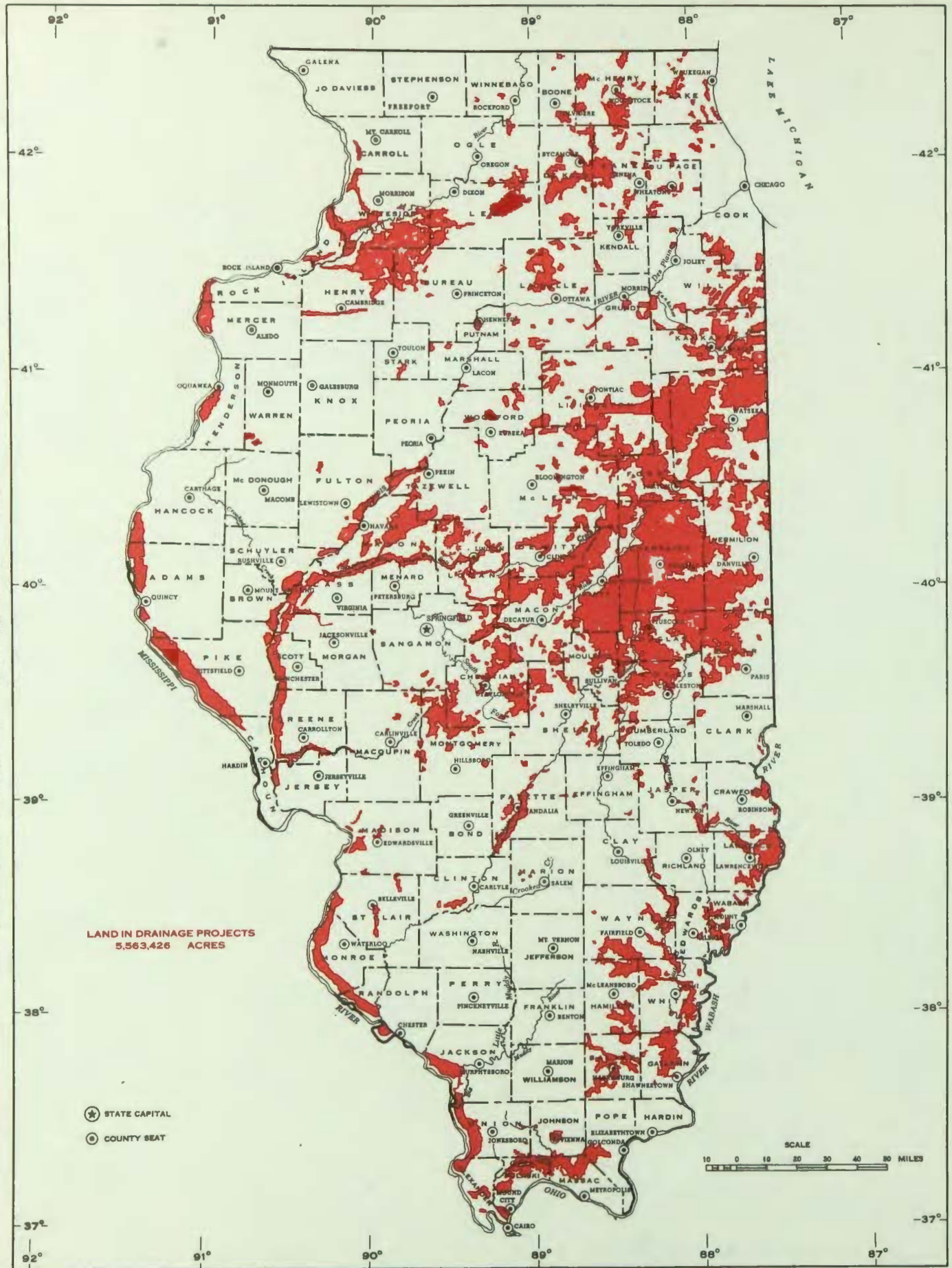


IDAHO--LOCATION OF LAND IN DRAINAGE PROJECTS, 1960
(Projects benefiting 500 or more acres of agricultural lands)

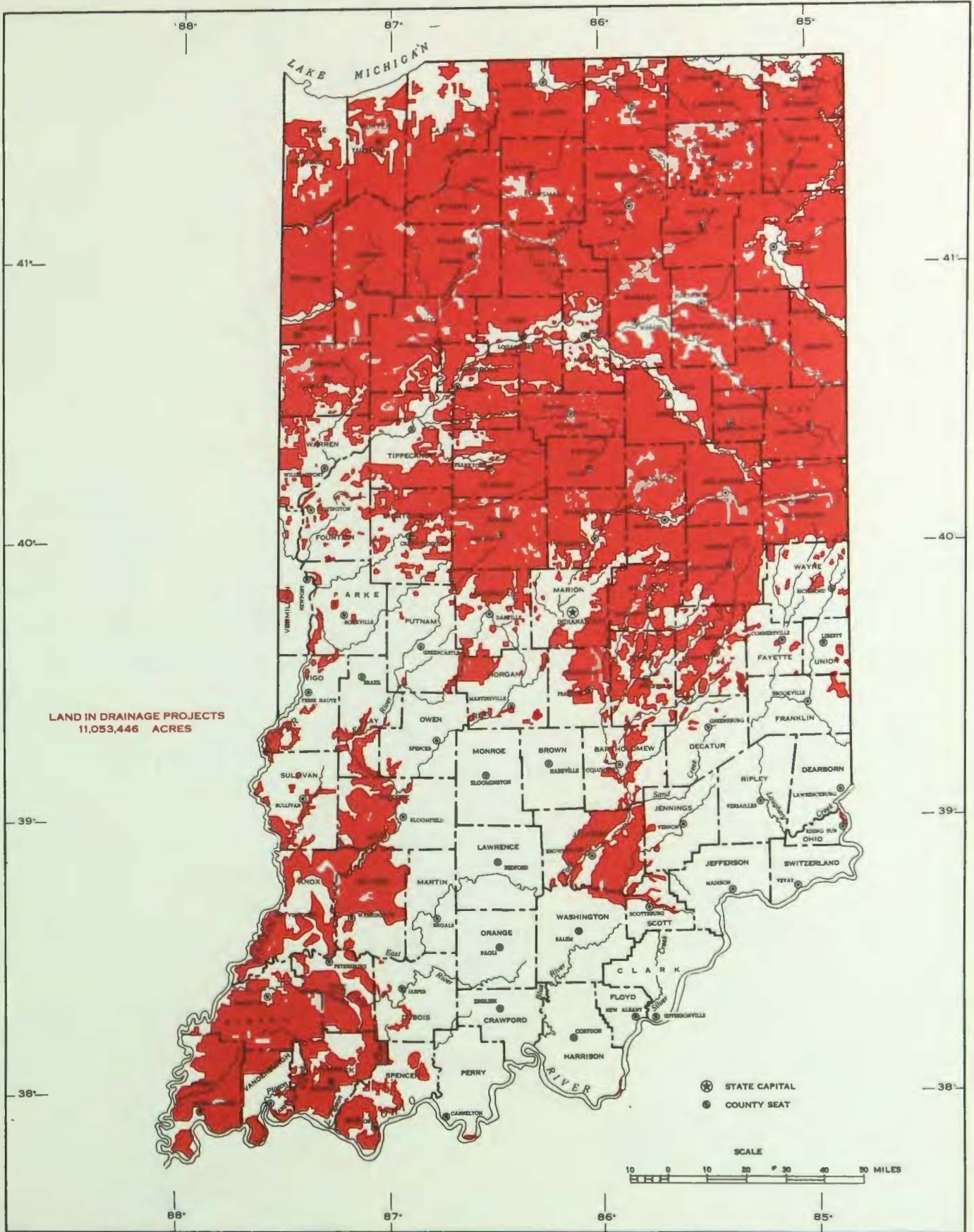


DRAINAGE OF AGRICULTURAL LANDS

ILLINOIS—LOCATION OF LAND IN DRAINAGE PROJECTS, 1960
(Projects benefiting 500 or more acres of agricultural lands)

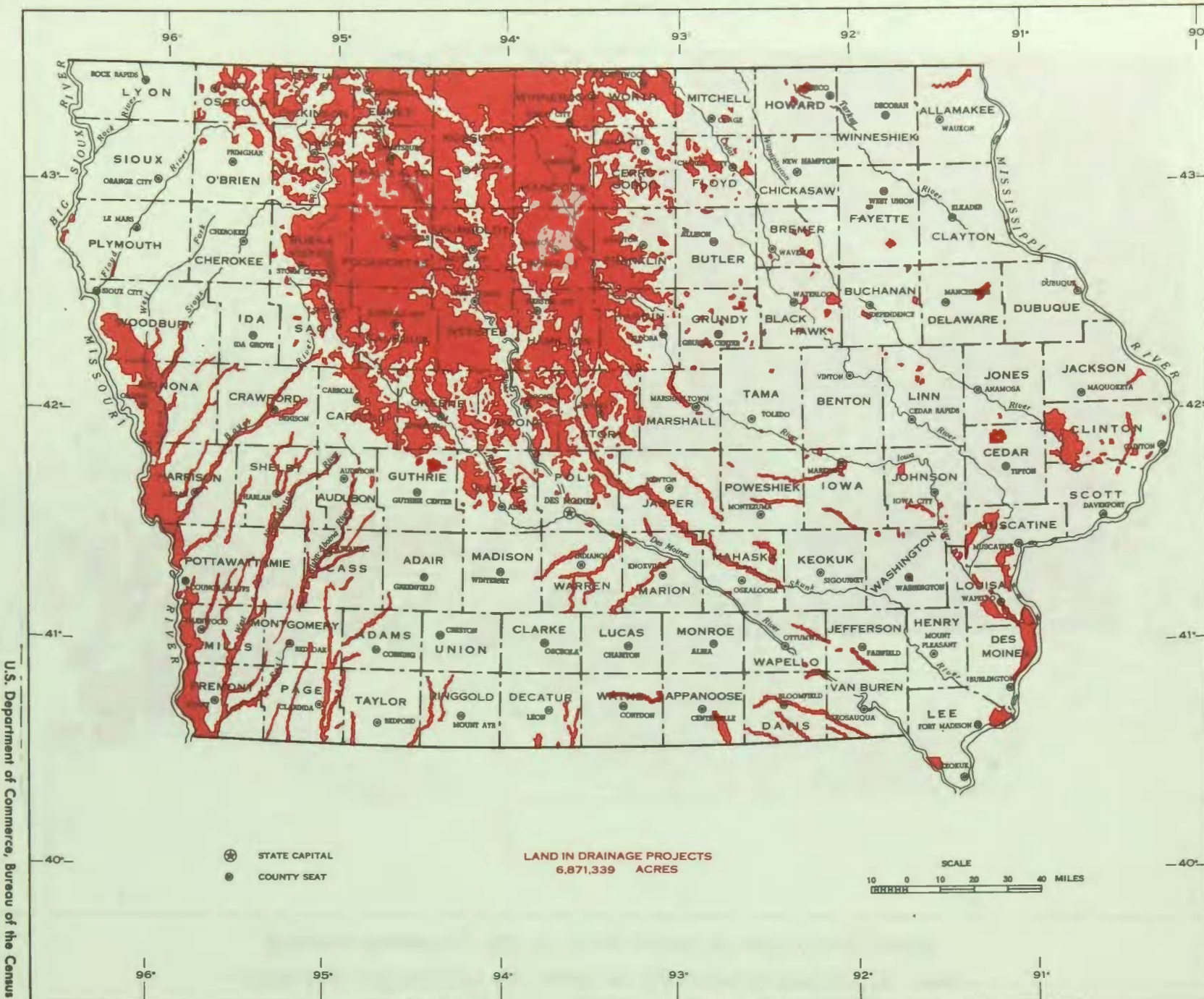


INDIANA—LOCATION OF LAND IN DRAINAGE PROJECTS, 1960
(Projects benefiting 500 or more acres of agricultural lands)



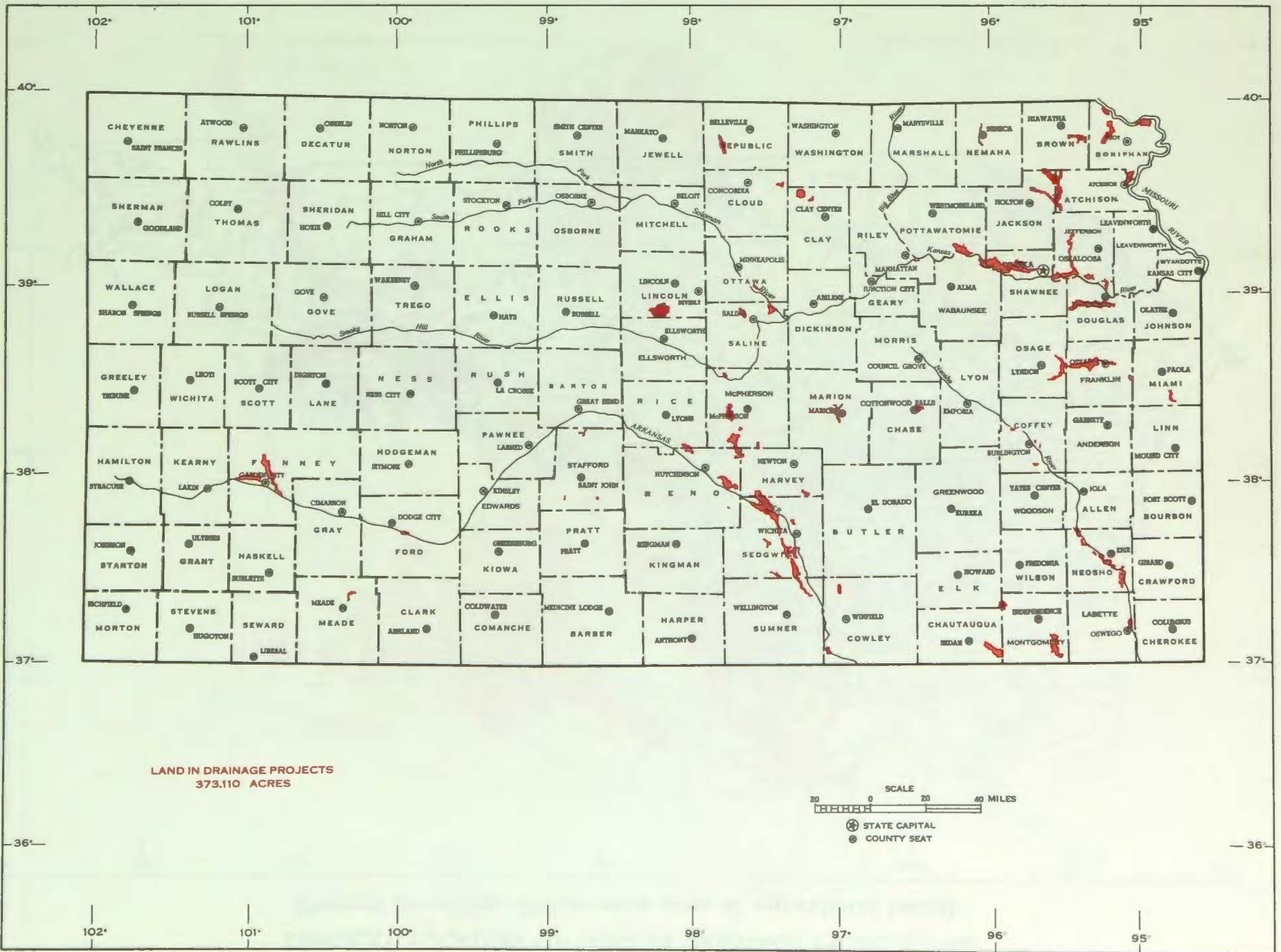
IOWA—LOCATION OF LAND IN DRAINAGE PROJECTS, 1960 (Projects benefiting 500 or more acres of agricultural lands)

DRAINAGE OF AGRICULTURAL LANDS



KANSAS—LOCATION OF LAND IN DRAINAGE PROJECTS, 1960

(Projects benefiting 500 or more acres of agricultural lands)

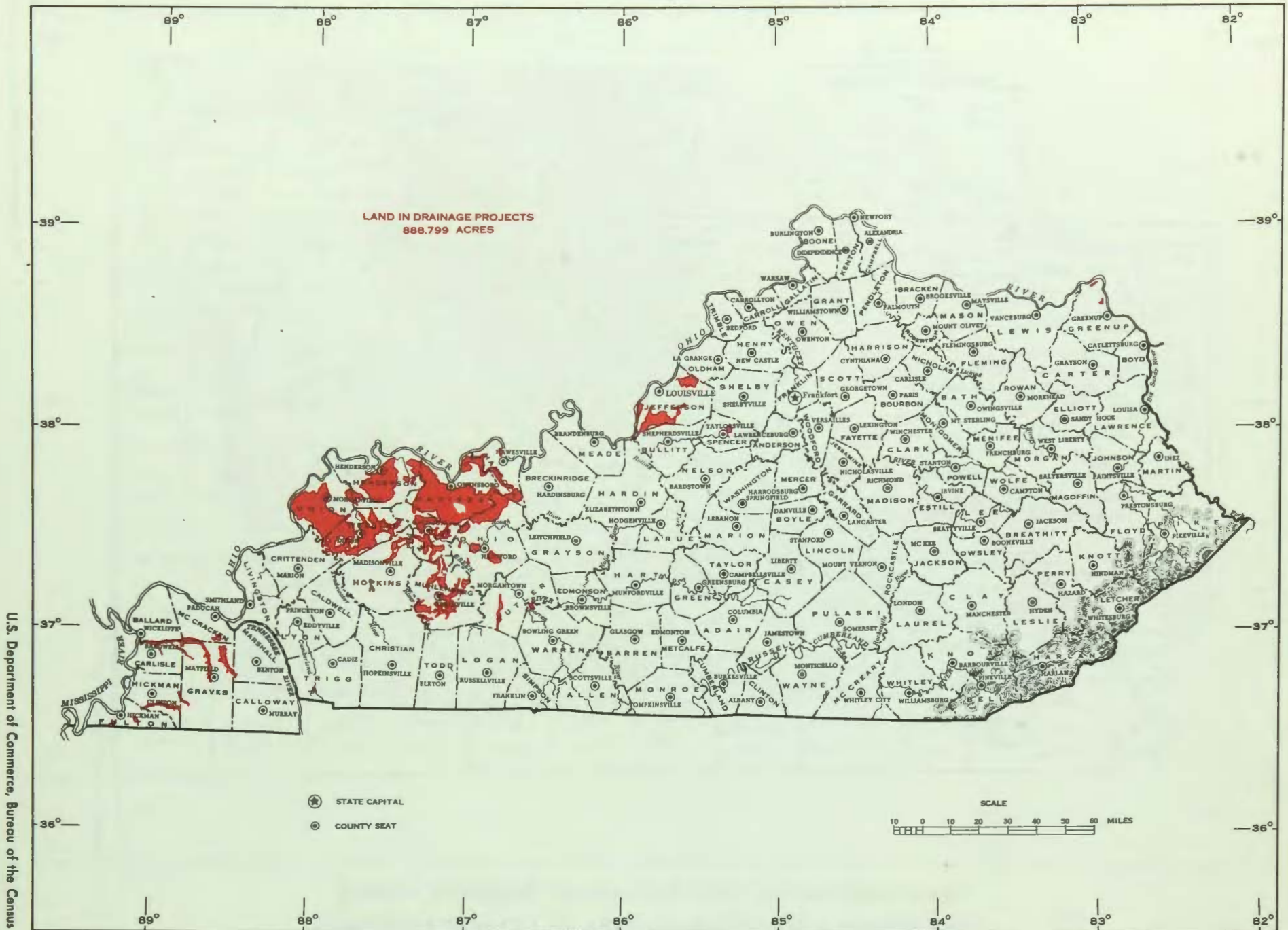


U.S. Department of Commerce, Bureau of the Census

DRAINAGE MAPS

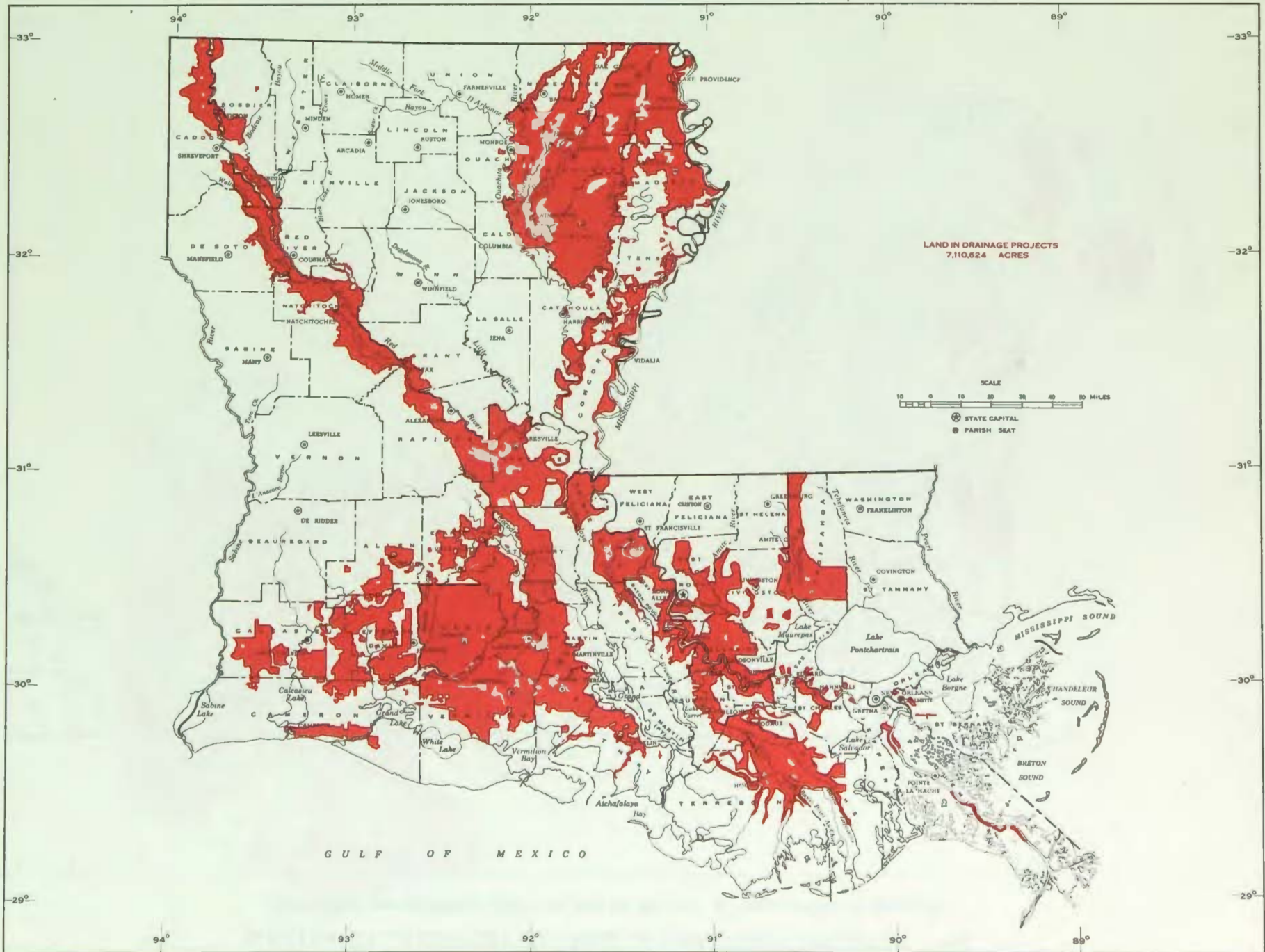
KENTUCKY—LOCATION OF LAND IN DRAINAGE PROJECTS, 1960

(Projects benefiting 500 or more acres of agricultural lands)



LOUISIANA—LOCATION OF LAND IN DRAINAGE PROJECTS, 1960

(Projects benefiting 500 or more acres of agricultural lands)

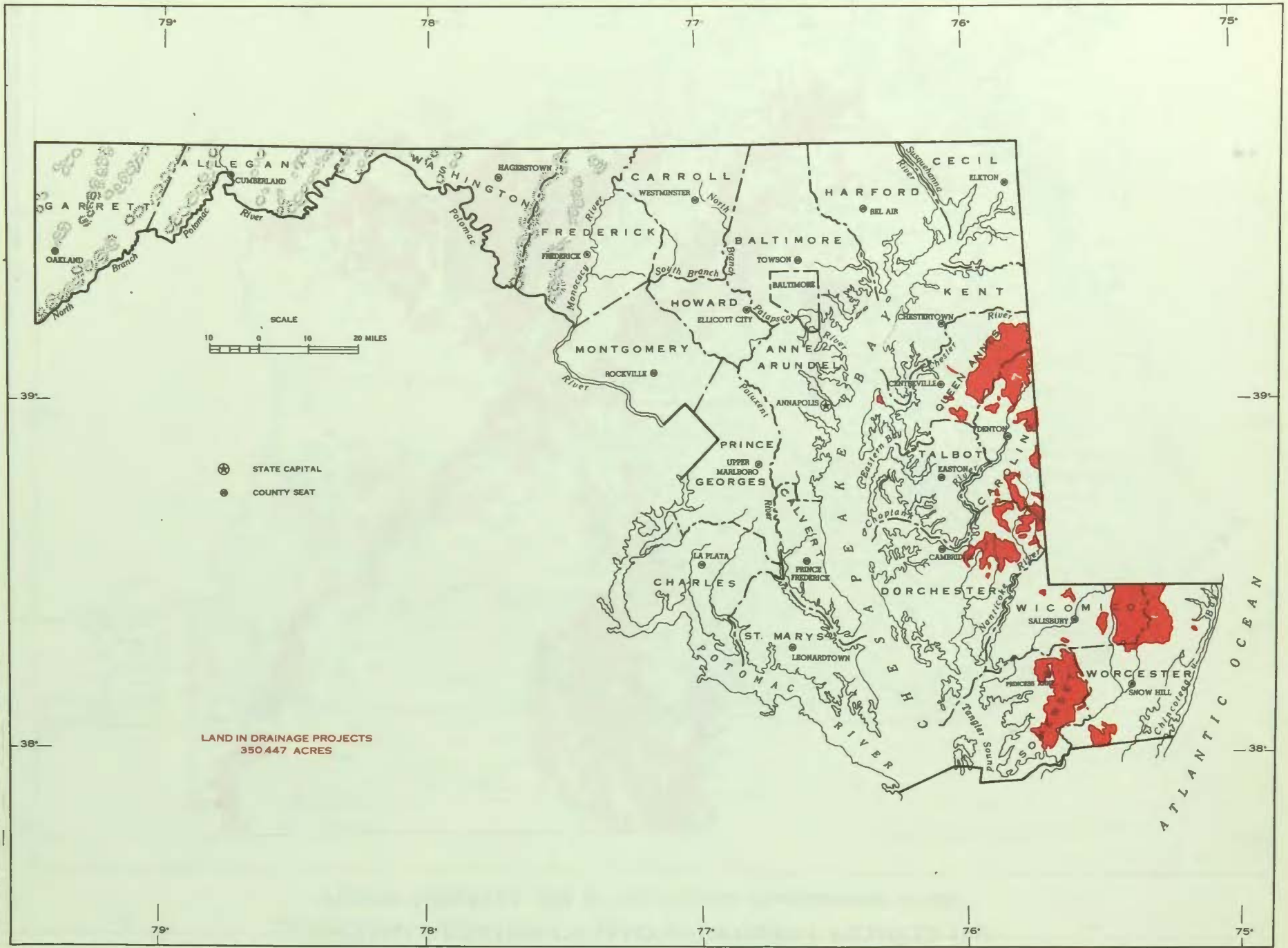


U.S. Department of Commerce, Bureau of the Census

DRAINAGE MAPS

MARYLAND—LOCATION OF LAND IN DRAINAGE PROJECTS, 1960 (Projects benefiting 500 or more acres of agricultural lands)

DRAINAGE OF AGRICULTURAL LANDS



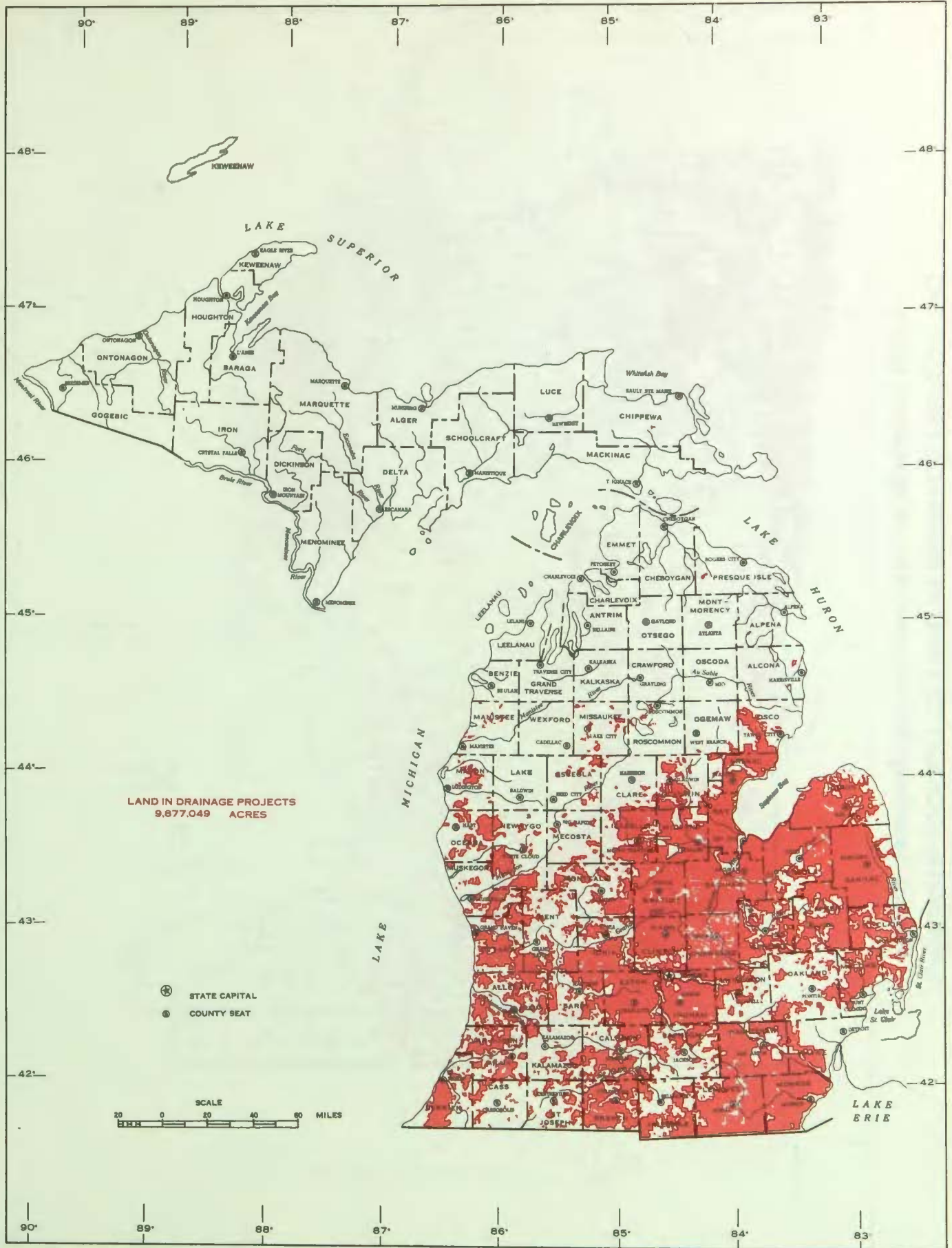
SCALE
10 0 10 20 MILES

- ⊗ STATE CAPITAL
- COUNTY SEAT

LAND IN DRAINAGE PROJECTS
350,447 ACRES

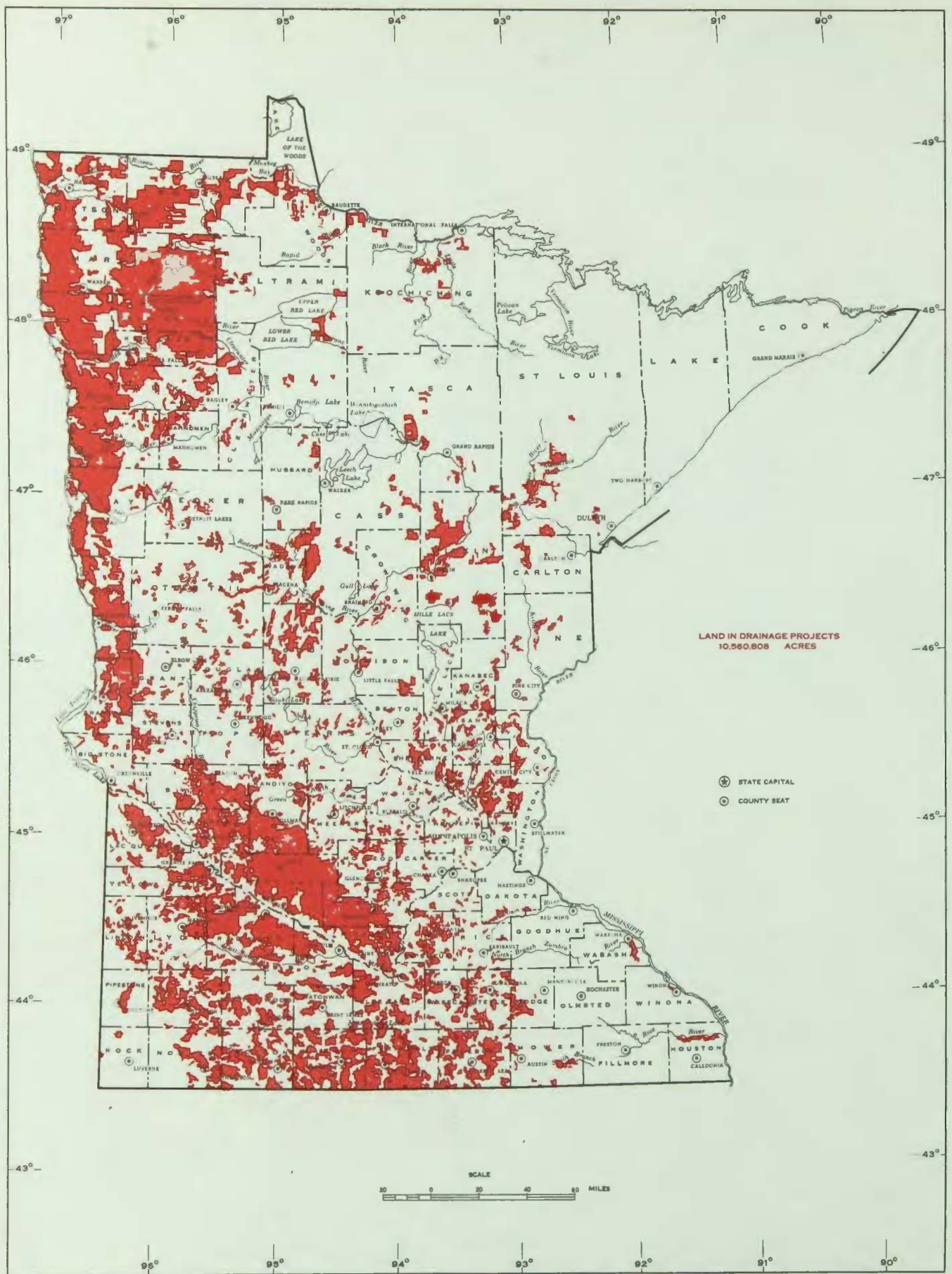
U.S. Department of Commerce, Bureau of the Census

MICHIGAN—LOCATION OF LAND IN DRAINAGE PROJECTS, 1960
(Projects benefiting 500 or more acres of agricultural lands)



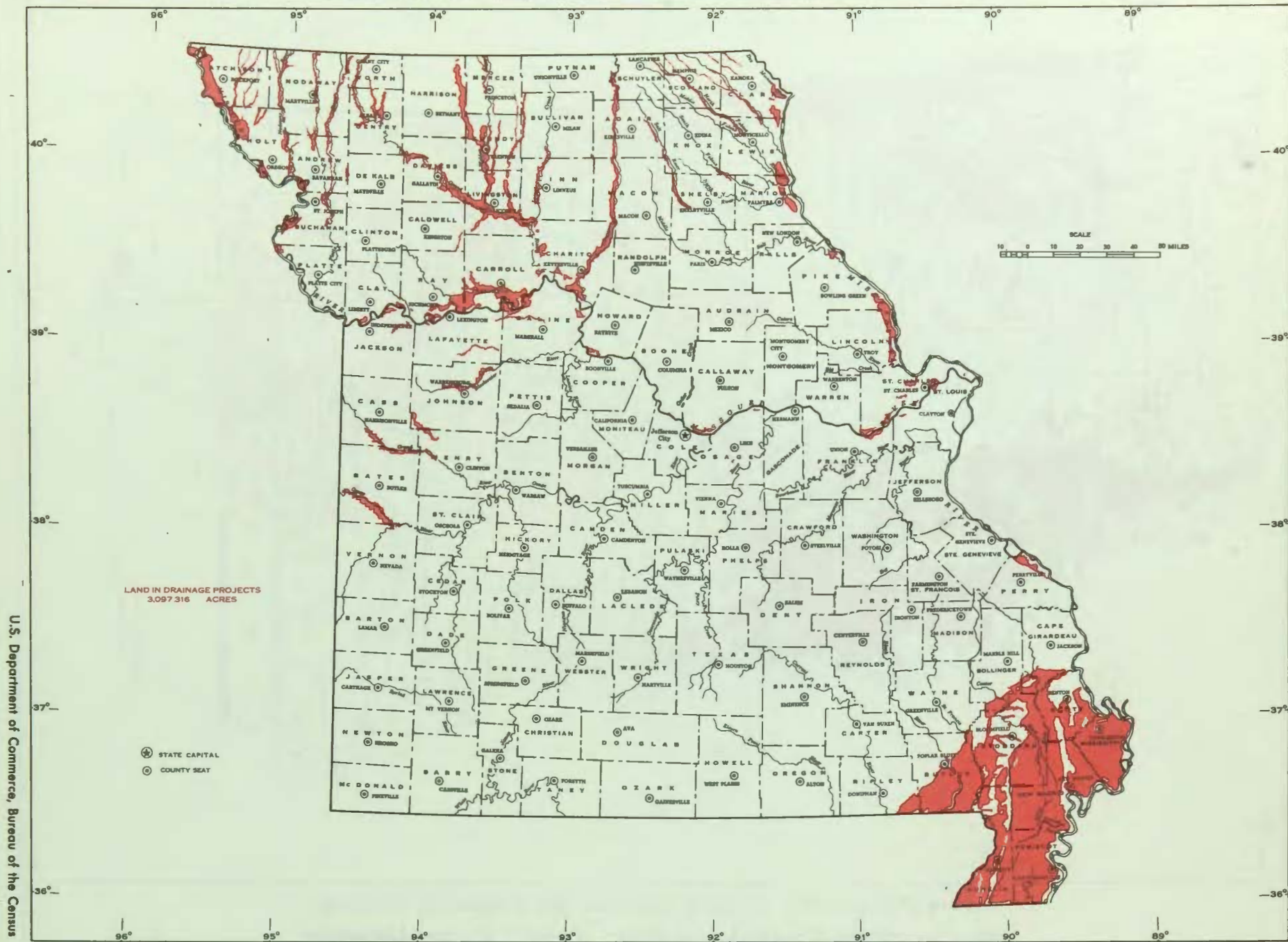
DRAINAGE OF AGRICULTURAL LANDS

MINNESOTA—LOCATION OF LAND IN DRAINAGE PROJECTS, 1960
(Projects benefiting 500 or more acres of agricultural lands)



MISSOURI—LOCATION OF LAND IN DRAINAGE PROJECTS, 1960 (Projects benefiting 500 or more acres of agricultural lands)

DRAINAGE OF AGRICULTURAL LANDS



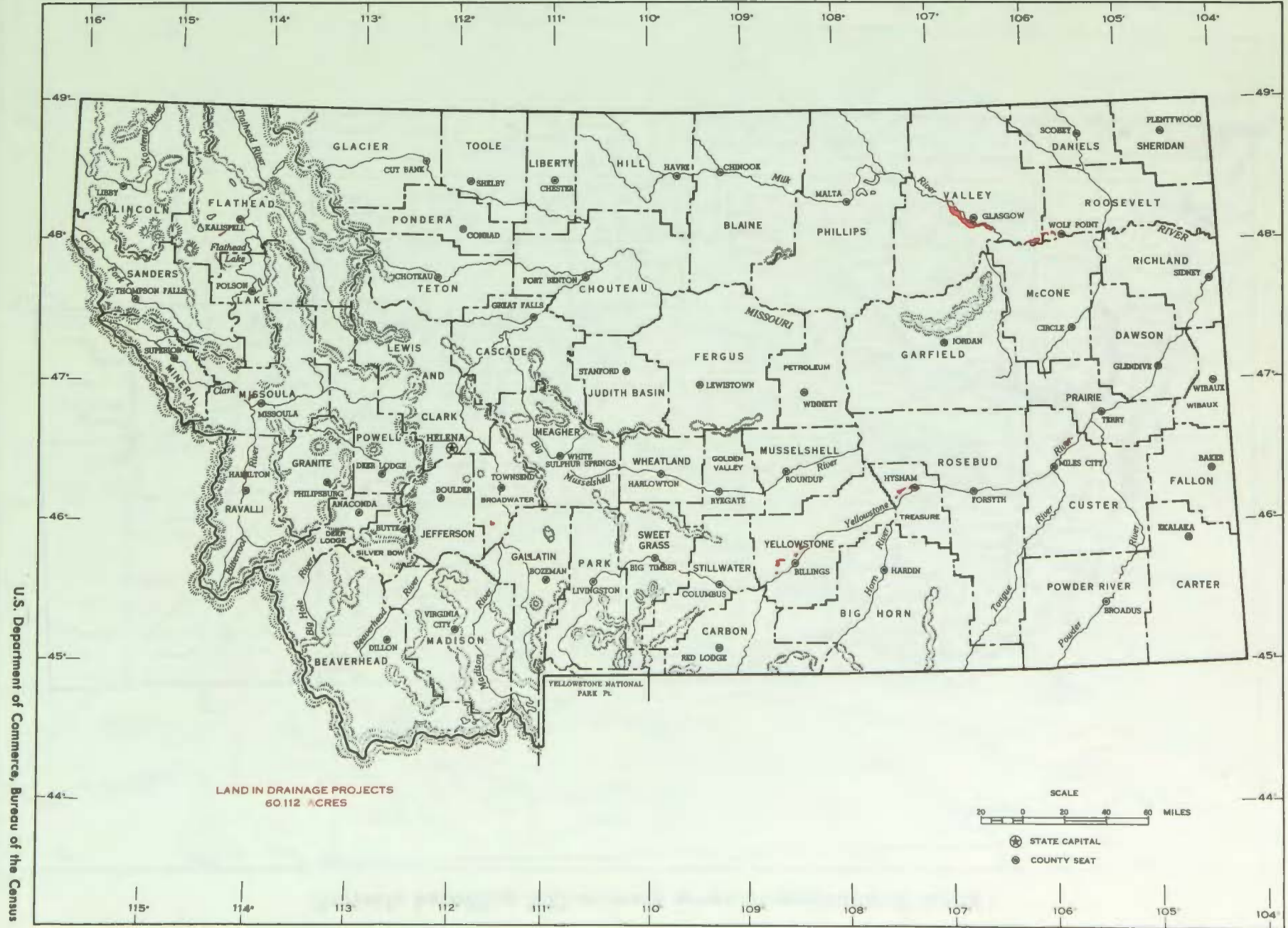
LAND IN DRAINAGE PROJECTS
3,097,316 ACRES

⊙ STATE CAPITAL
⊙ COUNTY SEAT

U.S. Department of Commerce, Bureau of the Census

MONTANA—LOCATION OF LAND IN DRAINAGE PROJECTS, 1960

(Projects benefiting 500 or more acres of agricultural lands)

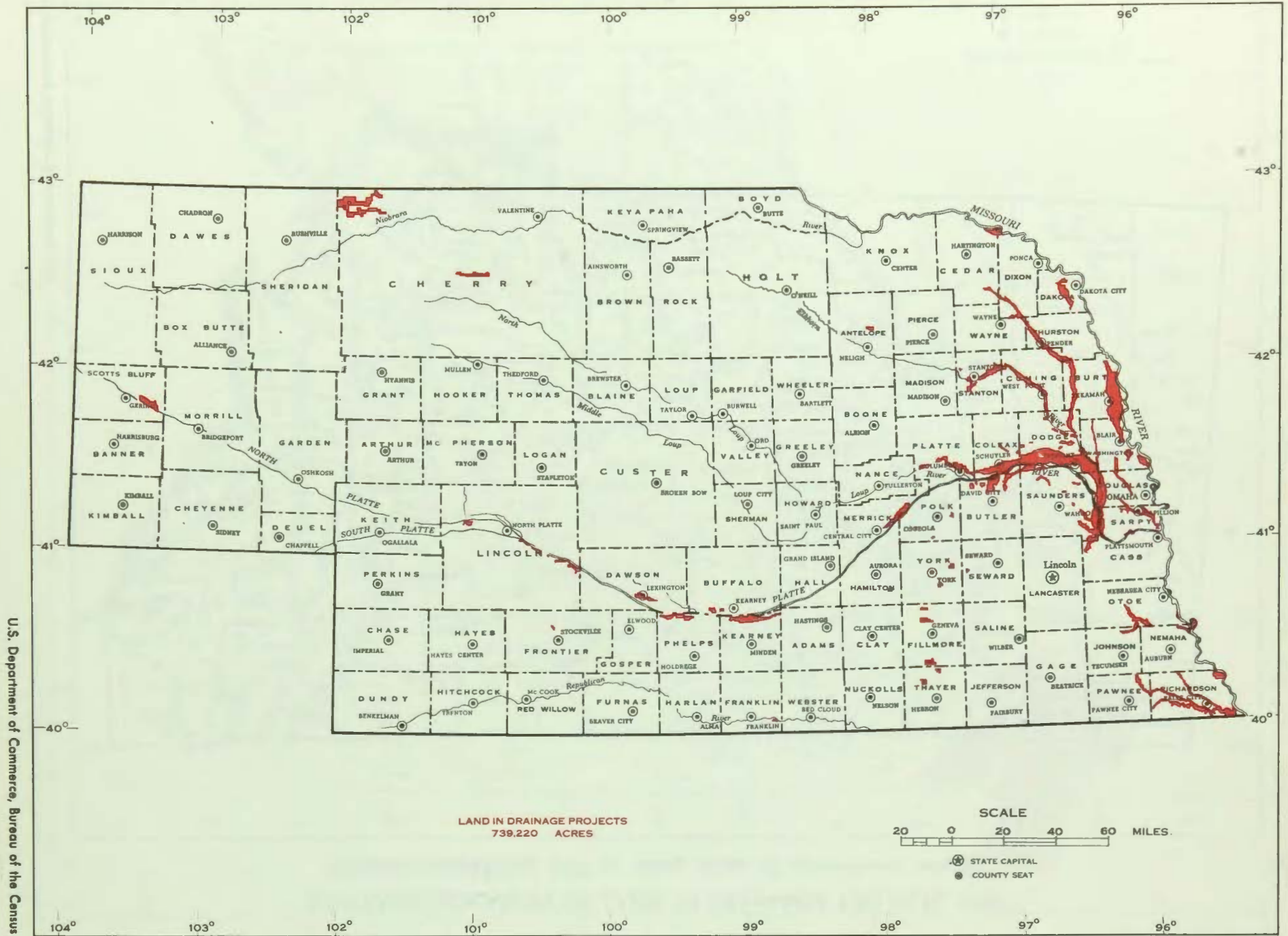


DRAINAGE MAPS

U.S. Department of Commerce, Bureau of the Census

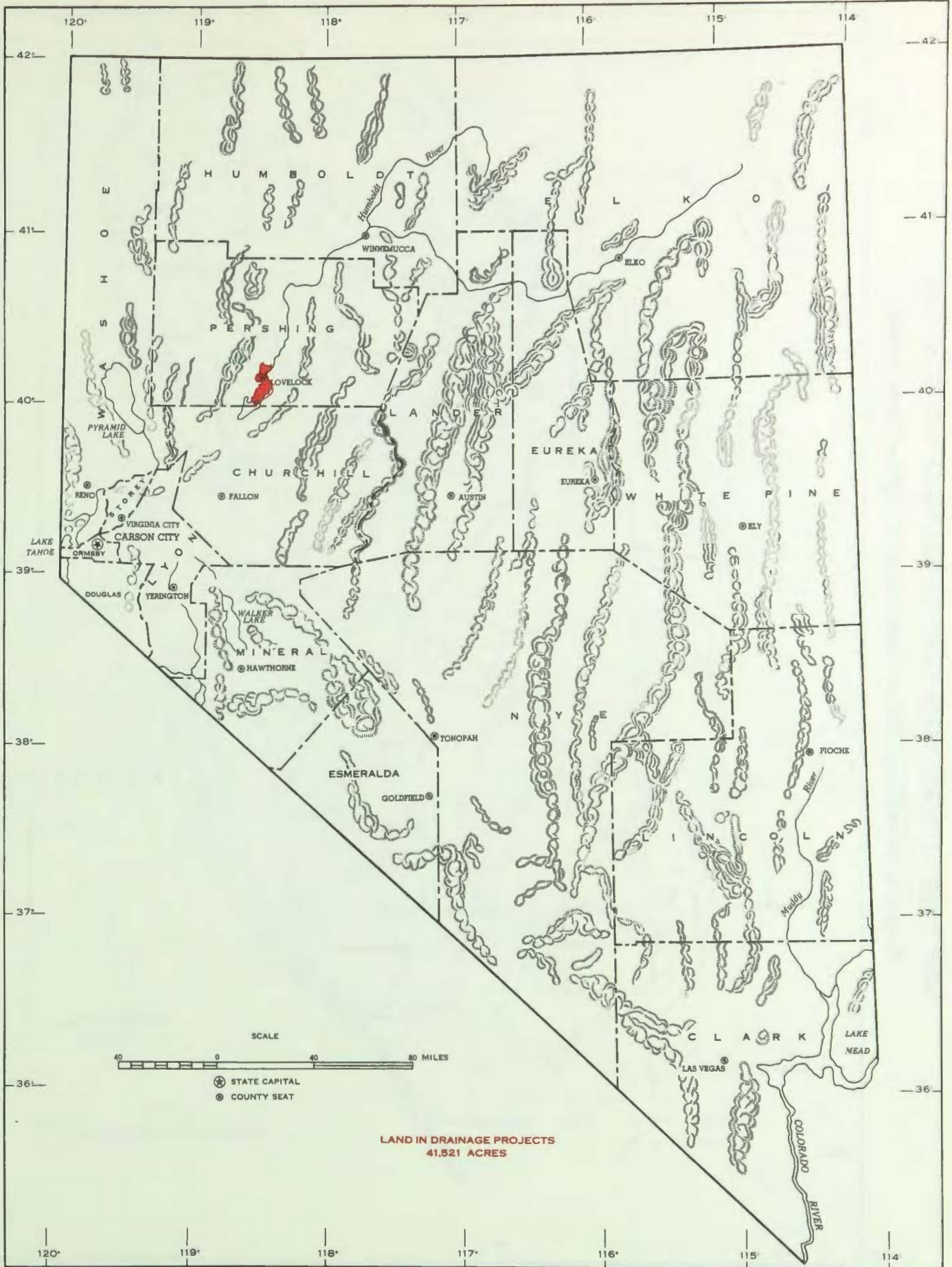
NEBRASKA—LOCATION OF LAND IN DRAINAGE PROJECTS, 1960

(Projects benefiting 500 or more acres of agricultural lands)



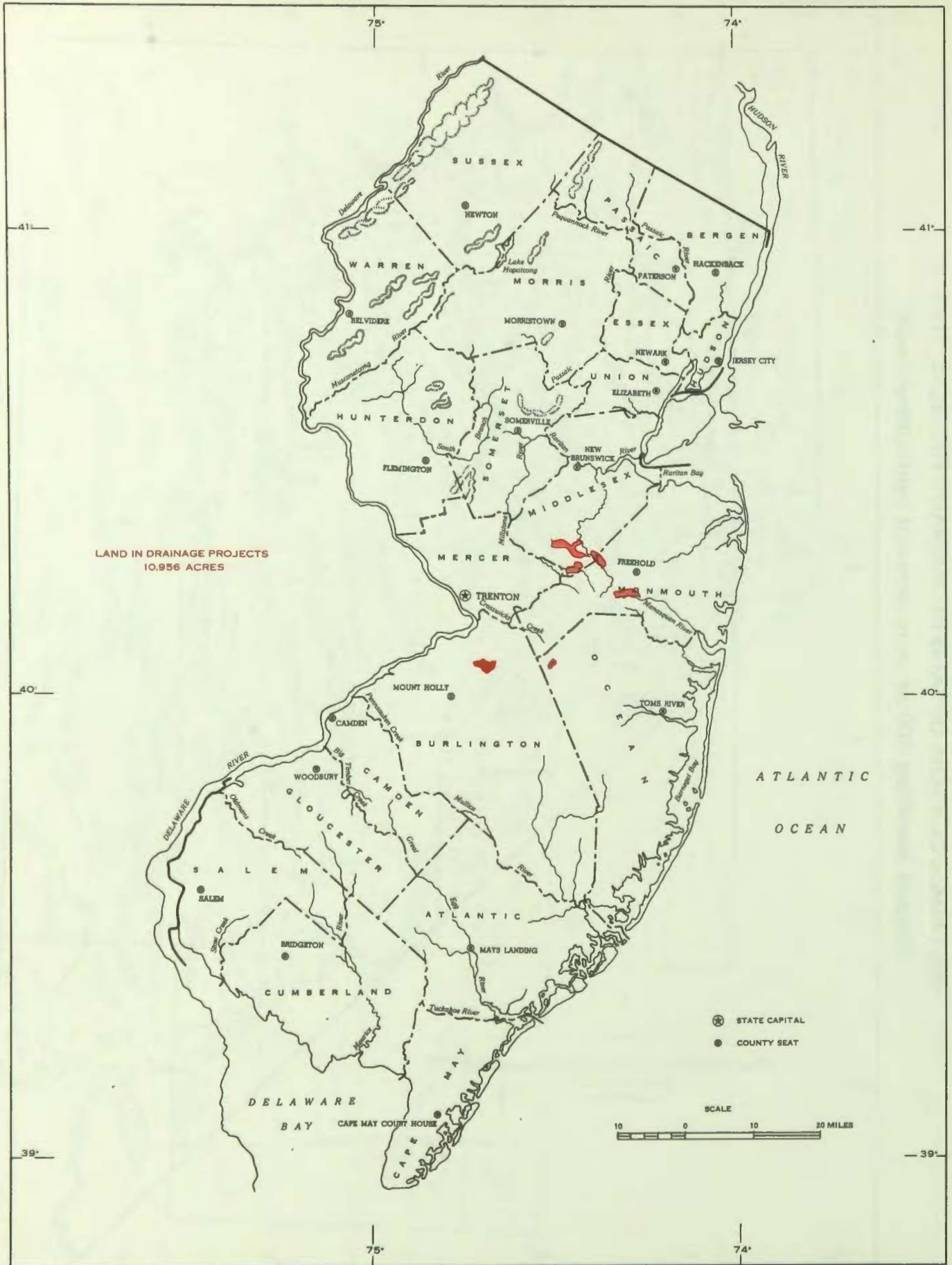
U.S. Department of Commerce, Bureau of the Census

NEVADA—LOCATION OF LAND IN DRAINAGE PROJECTS, 1960
(Projects benefiting 500 or more acres of agricultural lands)

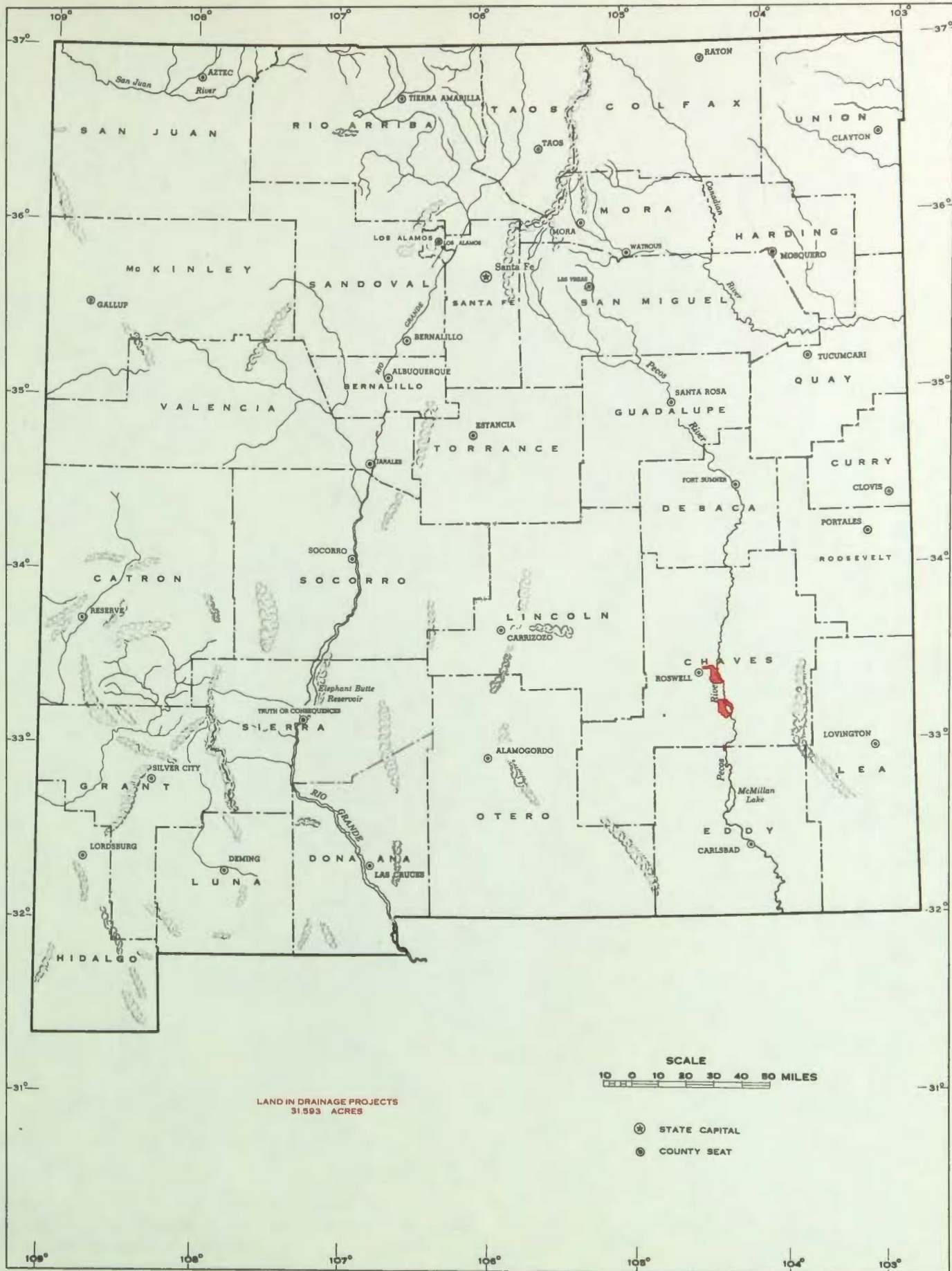


DRAINAGE OF AGRICULTURAL LANDS

NEW JERSEY—LOCATION OF LAND IN DRAINAGE PROJECTS, 1960
(Projects benefiting 500 or more acres of agricultural lands)

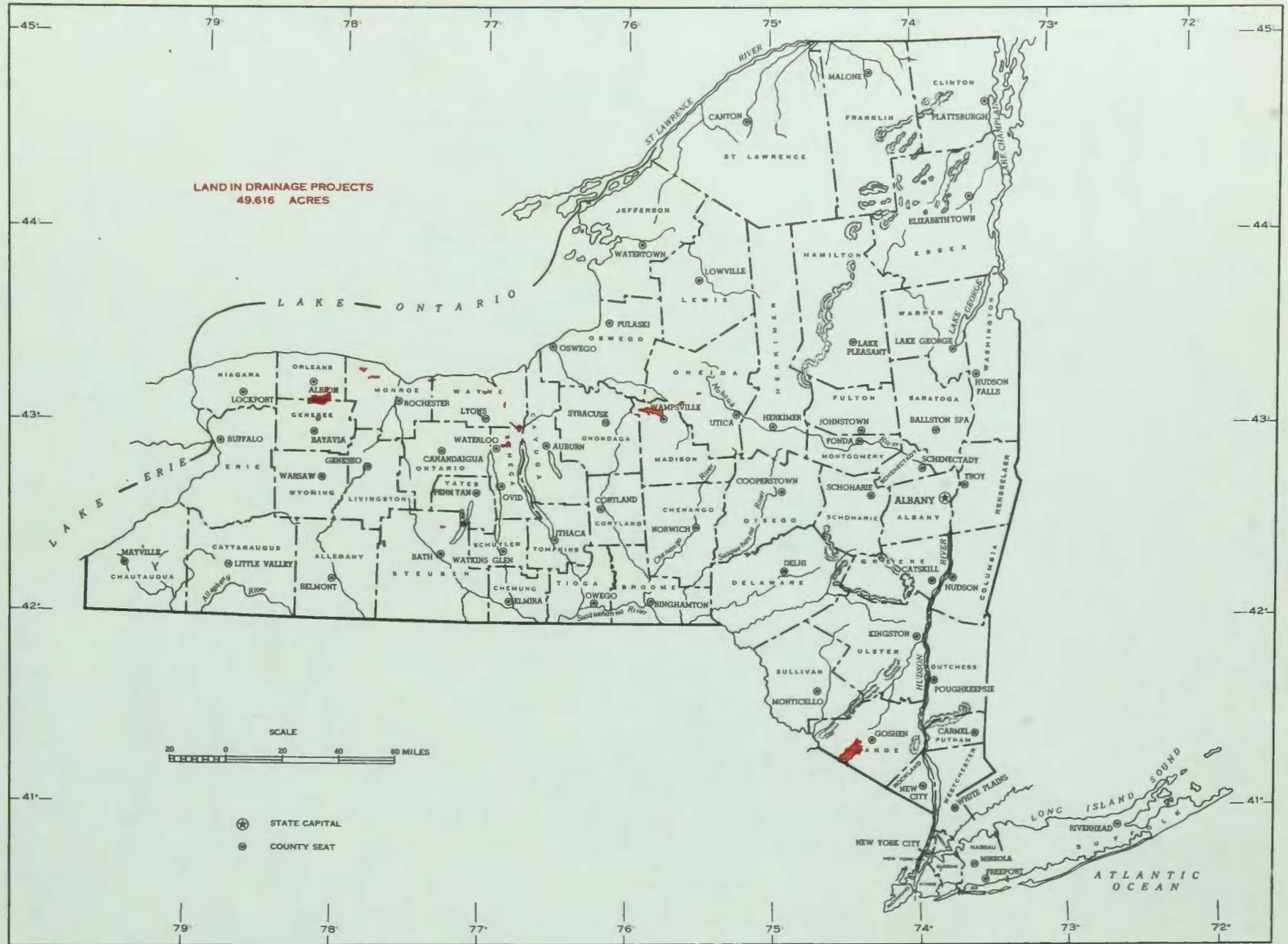


NEW MEXICO—LOCATION OF LAND IN DRAINAGE PROJECTS, 1960
(Projects benefiting 500 or more acres of agricultural lands)



NEW YORK—LOCATION OF LAND IN DRAINAGE PROJECTS, 1960 (Projects benefiting 500 or more acres of agricultural lands)

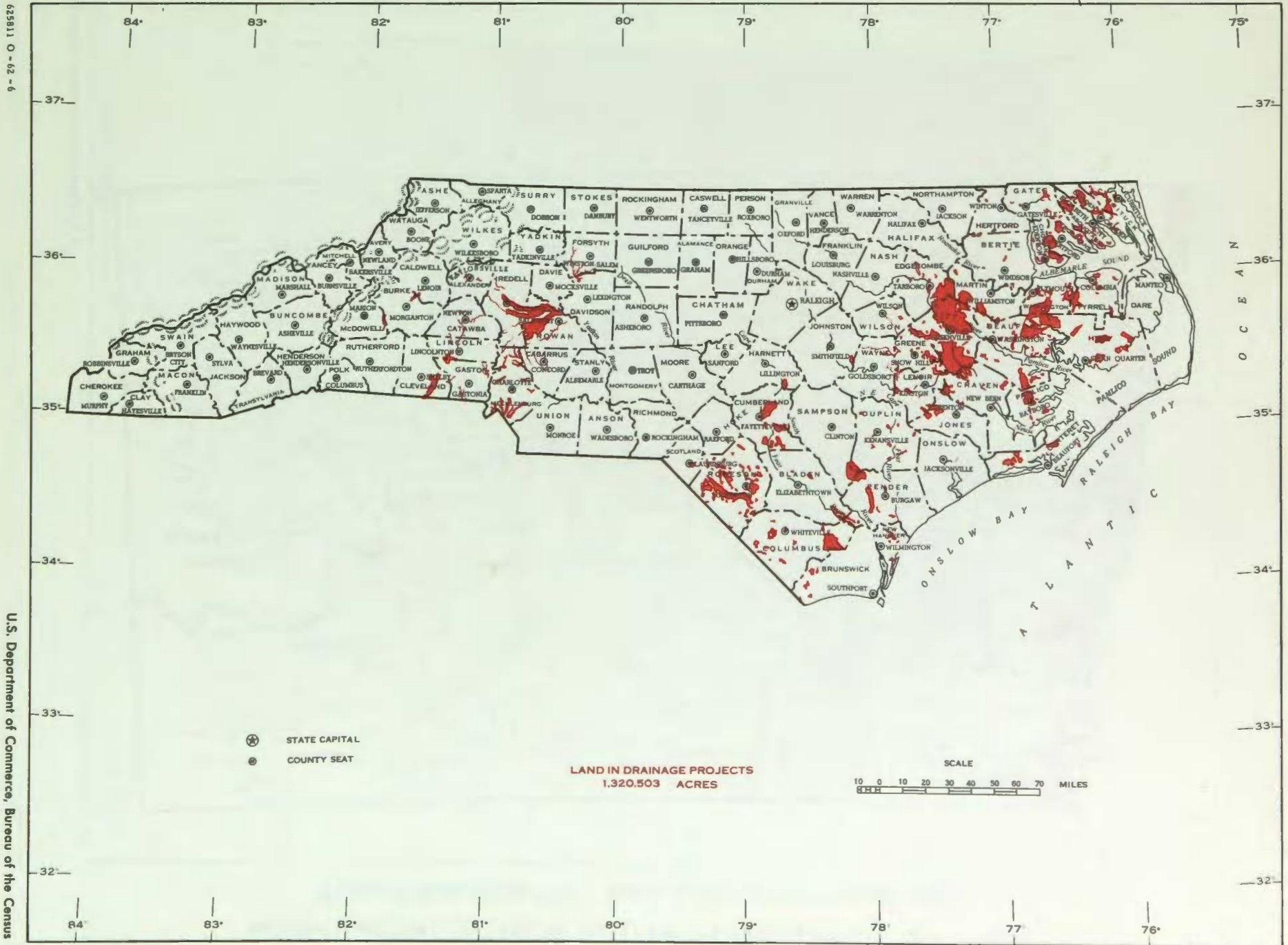
DRAINAGE OF AGRICULTURAL LANDS



U.S. Department of Commerce, Bureau of the Census

NORTH CAROLINA—LOCATION OF LAND IN DRAINAGE PROJECTS, 1960

(Projects benefiting 500 or more acres of agricultural lands)



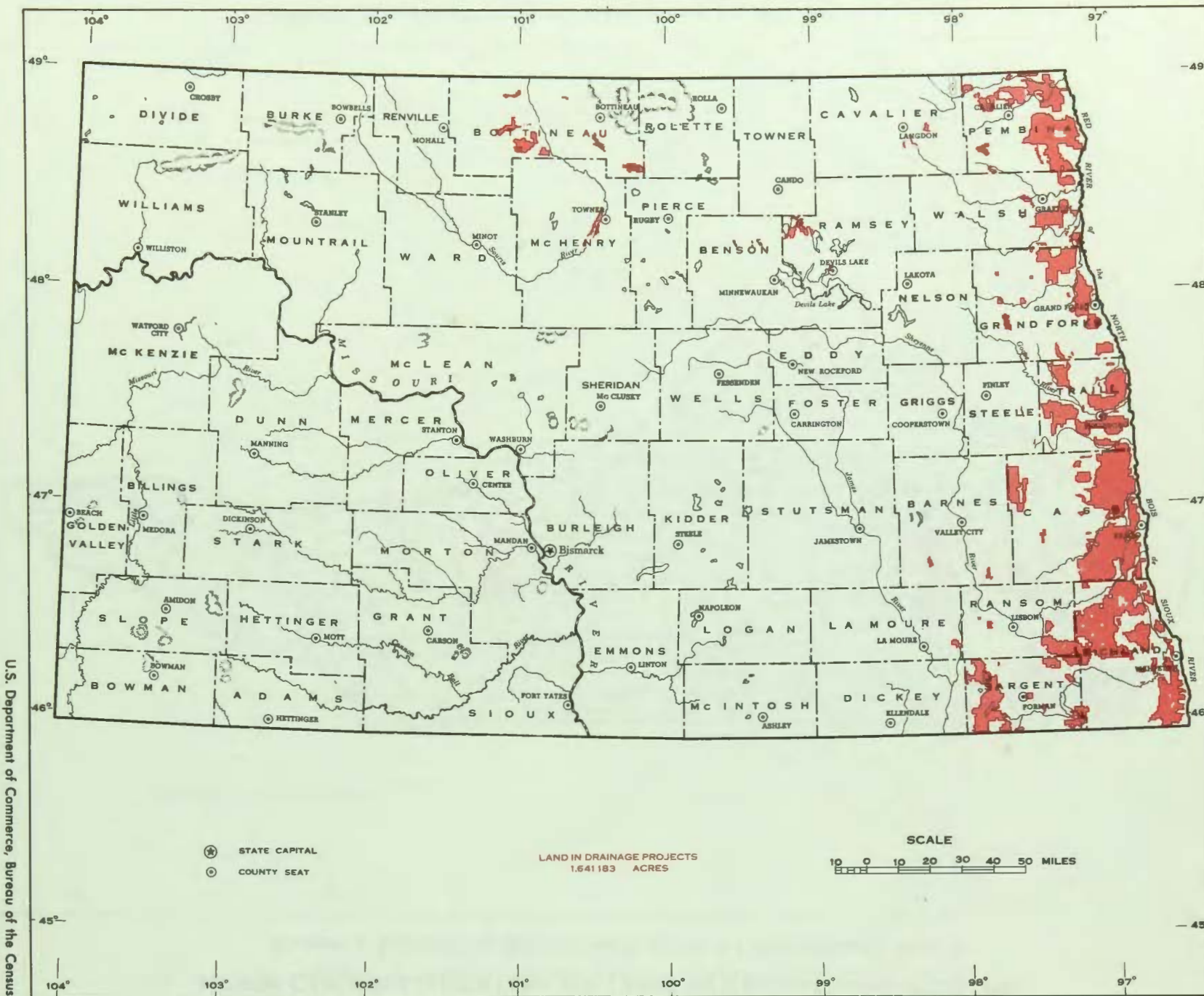
9 - 29 - 62

U.S. Department of Commerce, Bureau of the Census

DRAINAGE MAPS

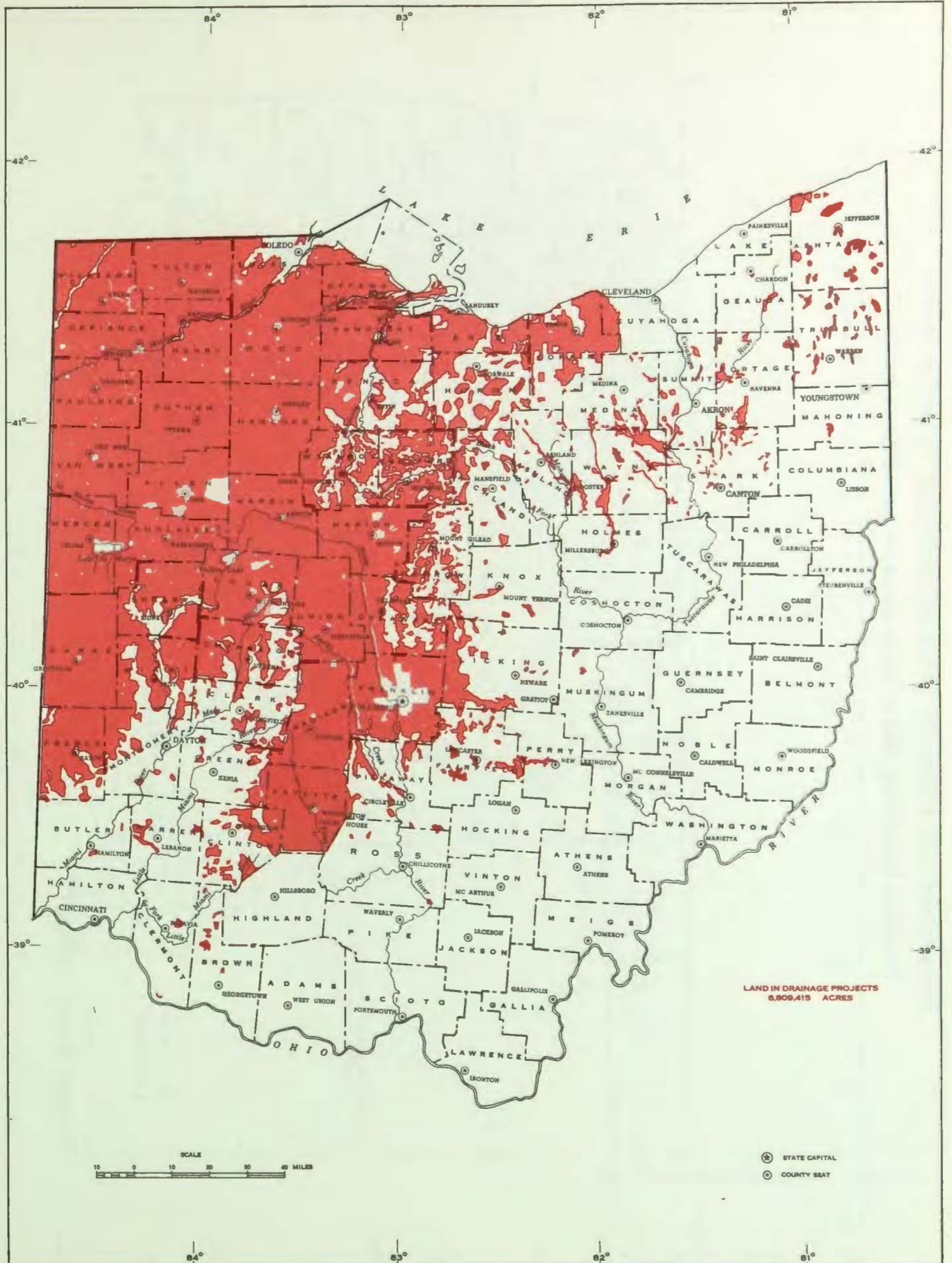
NORTH DAKOTA—LOCATION OF LAND IN DRAINAGE PROJECTS, 1960

(Projects benefiting 500 or more acres of agricultural lands)



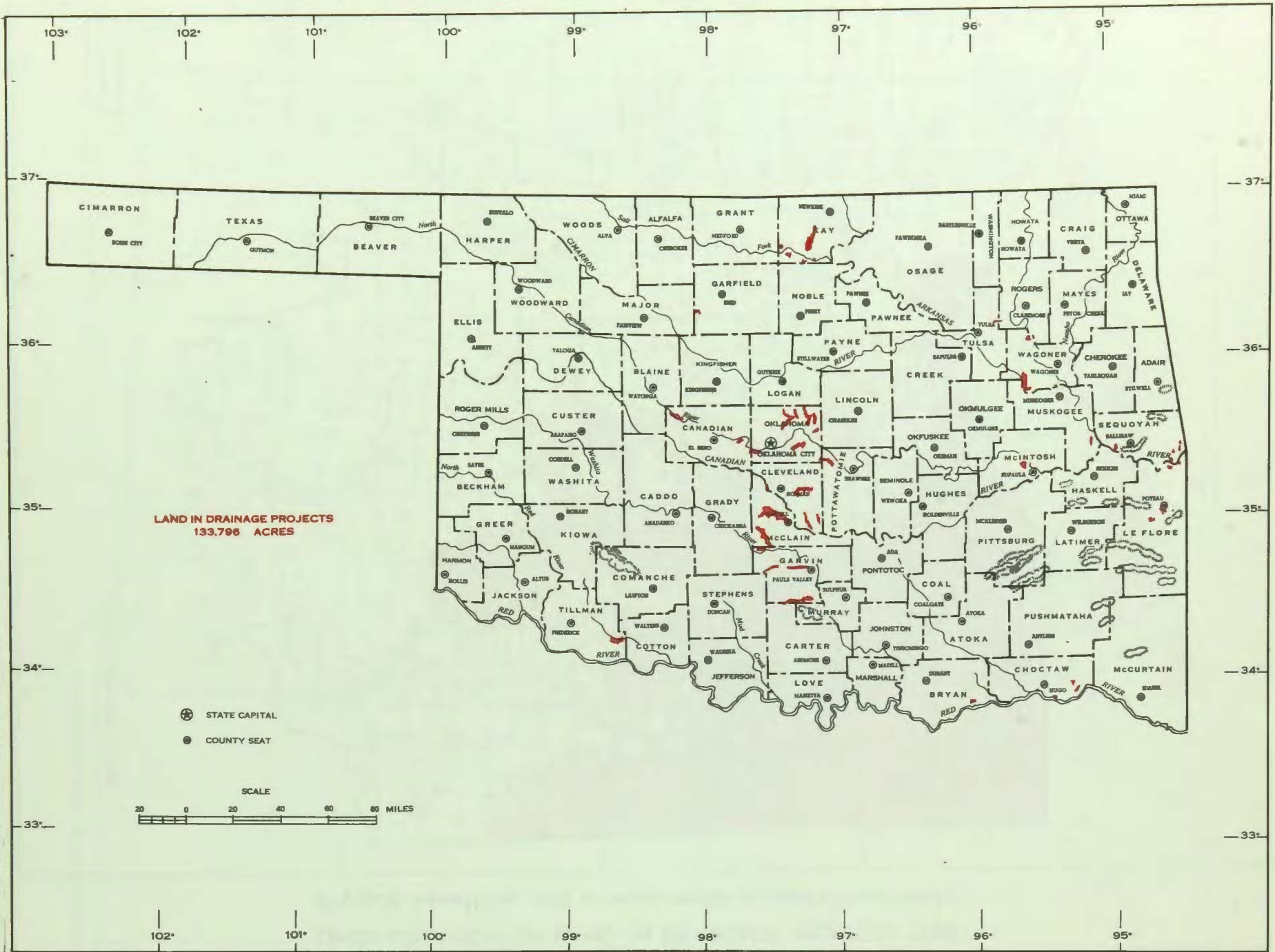
U.S. Department of Commerce, Bureau of the Census

OHIO-LOCATION OF LAND IN DRAINAGE PROJECTS, 1960
(Projects benefiting 500 or more acres of agricultural lands)



OKLAHOMA-LOCATION OF LAND IN DRAINAGE PROJECTS, 1960 (Projects benefiting 500 or more acres of agricultural lands)

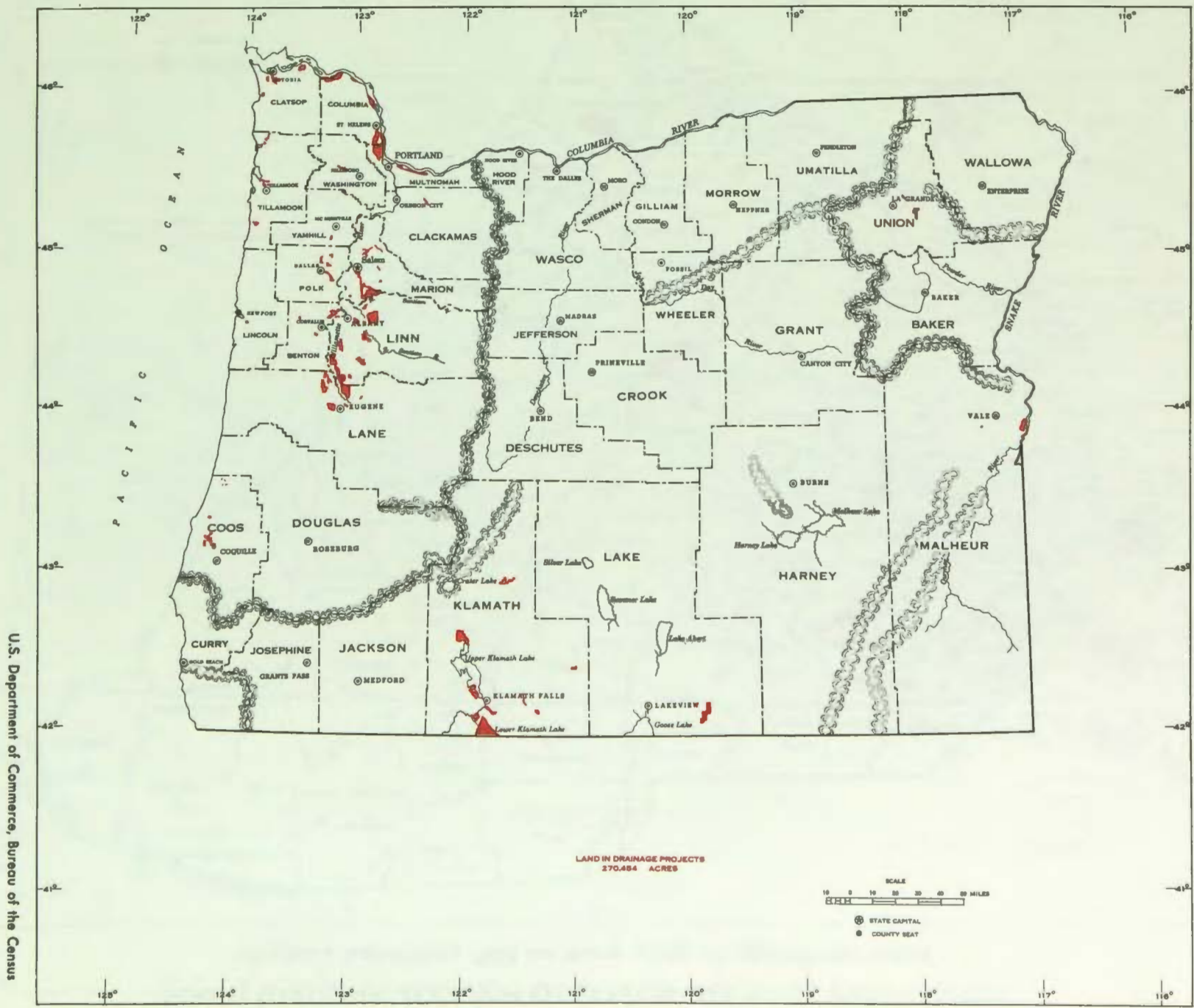
DRAINAGE OF AGRICULTURAL LANDS



U.S. Department of Commerce, Bureau of the Census

OREGON—LOCATION OF LAND IN DRAINAGE PROJECTS, 1960

(Projects benefiting 500 or more acres of agricultural lands)

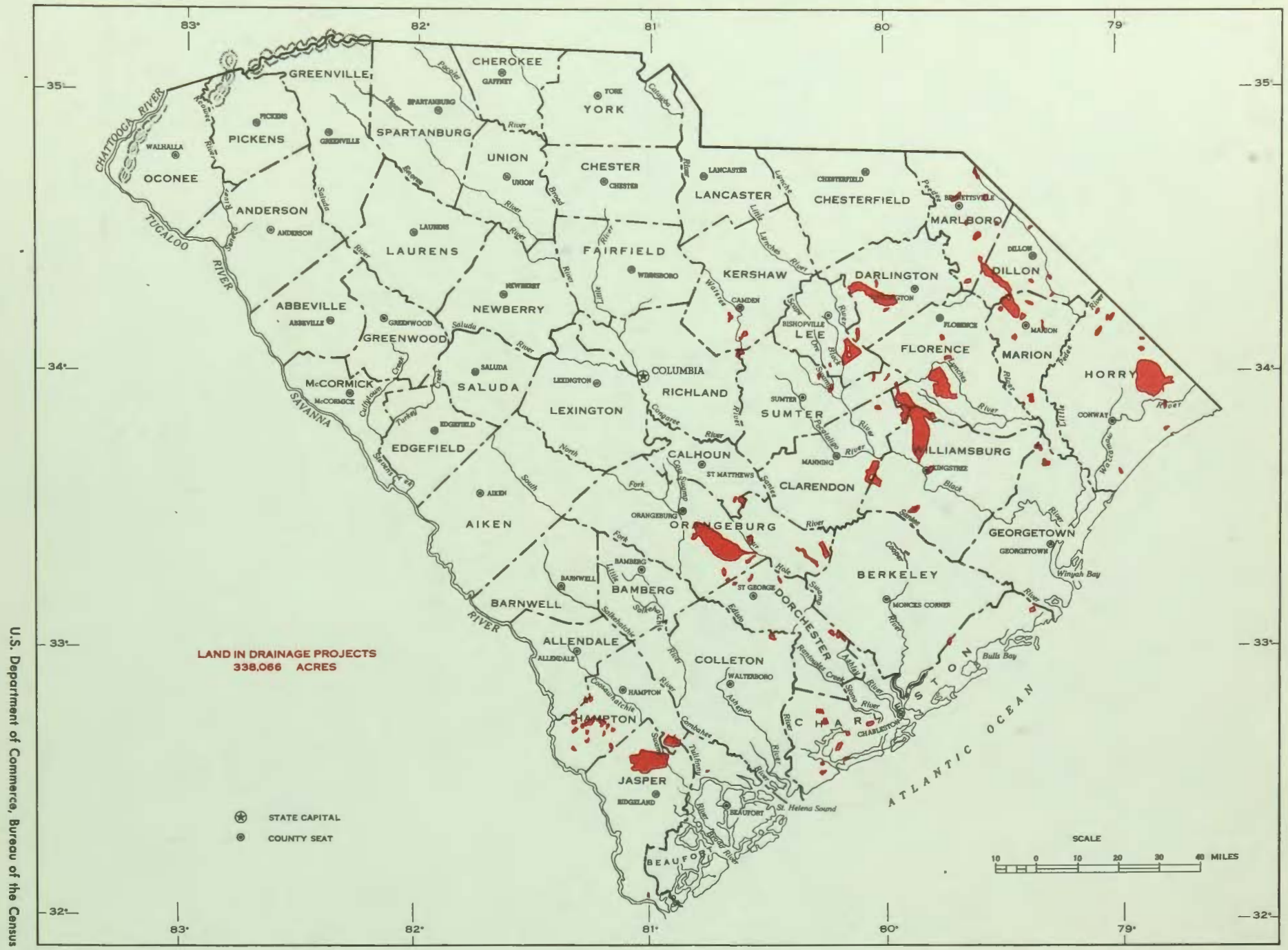


U.S. Department of Commerce, Bureau of the Census

DRAINAGE MAPS

SOUTH CAROLINA—LOCATION OF LAND IN DRAINAGE PROJECTS, 1960

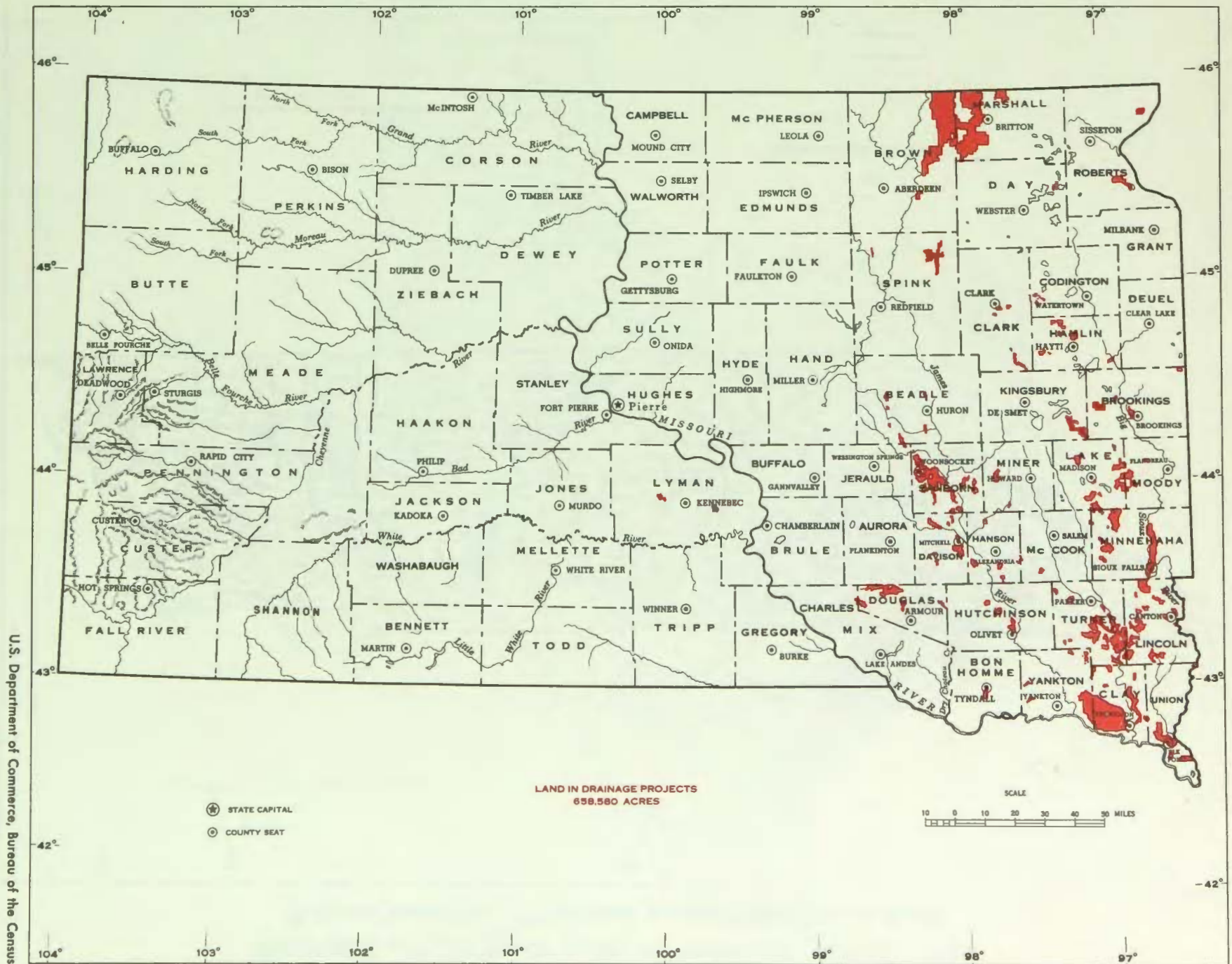
(Projects benefiting 500 or more acres of agricultural lands)



U.S. Department of Commerce, Bureau of the Census

SOUTH DAKOTA—LOCATION OF LAND IN DRAINAGE PROJECTS, 1960

(Projects benefiting 500 or more acres of agricultural lands)

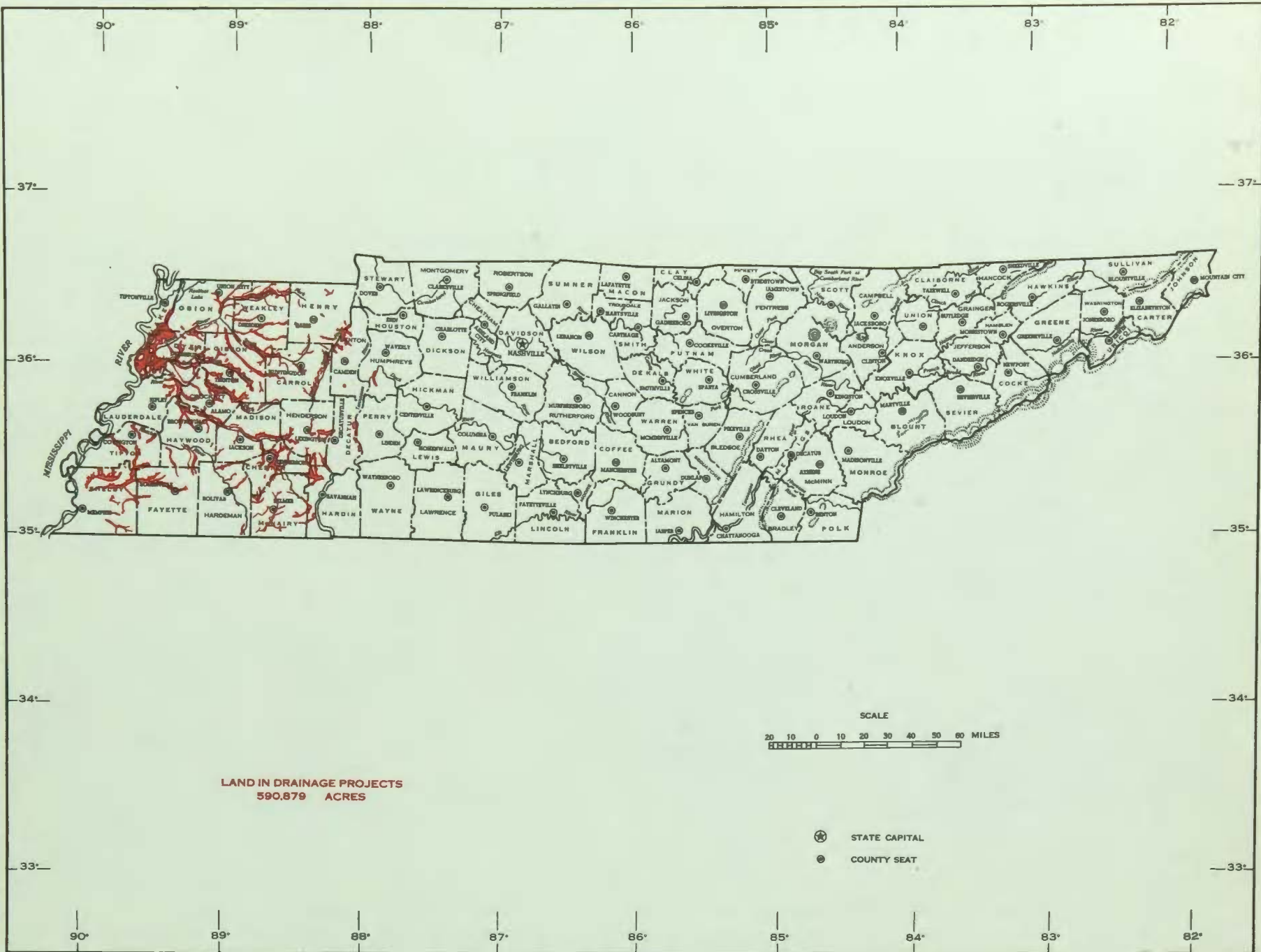


U.S. Department of Commerce, Bureau of the Census

DRAINAGE MAPS

TENNESSEE—LOCATION OF LAND IN DRAINAGE PROJECTS, 1960 (Projects benefiting 500 or more acres of agricultural lands)

DRAINAGE OF AGRICULTURAL LANDS



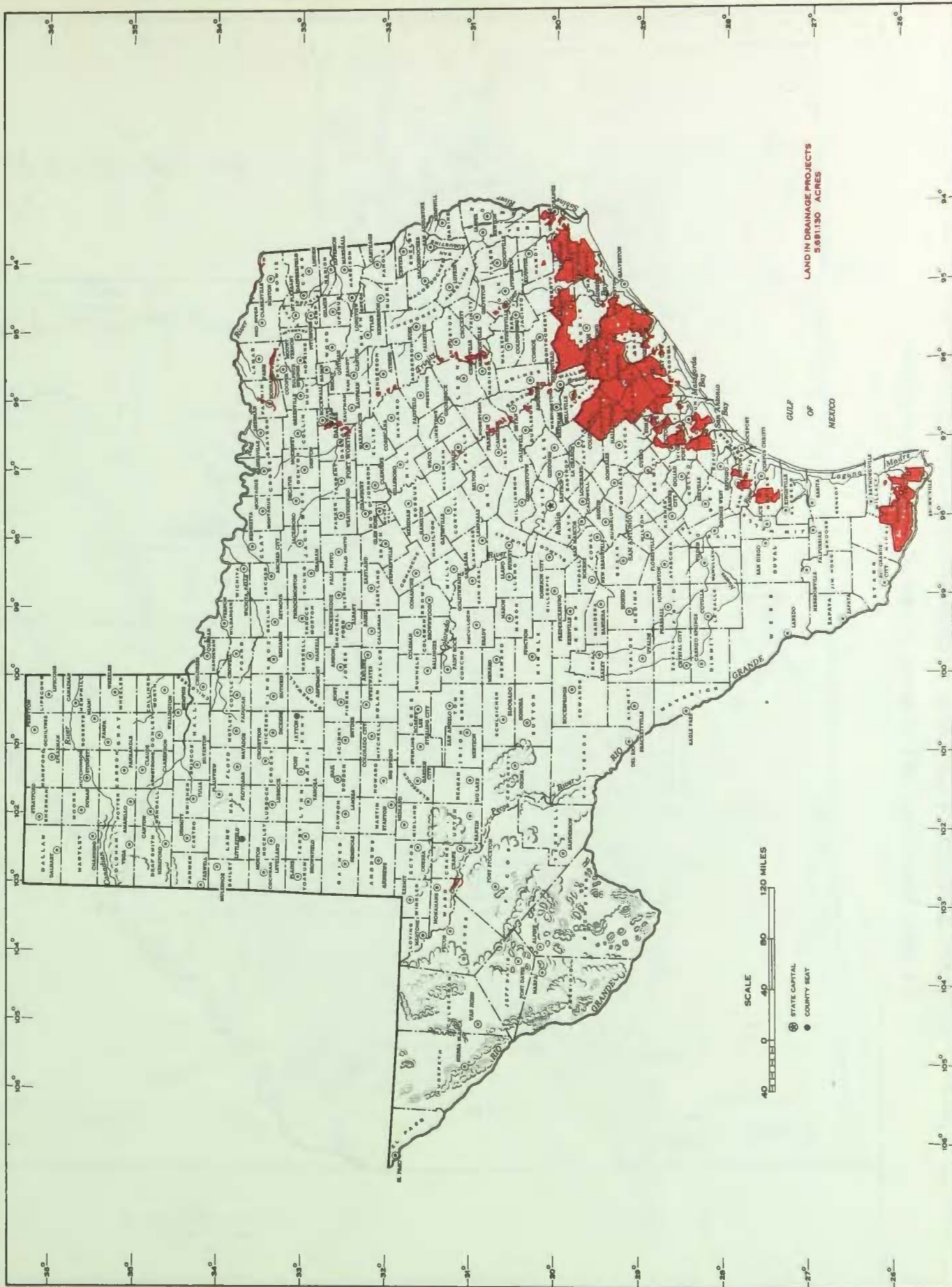
LAND IN DRAINAGE PROJECTS
590,879 ACRES



- ★ STATE CAPITAL
- COUNTY SEAT

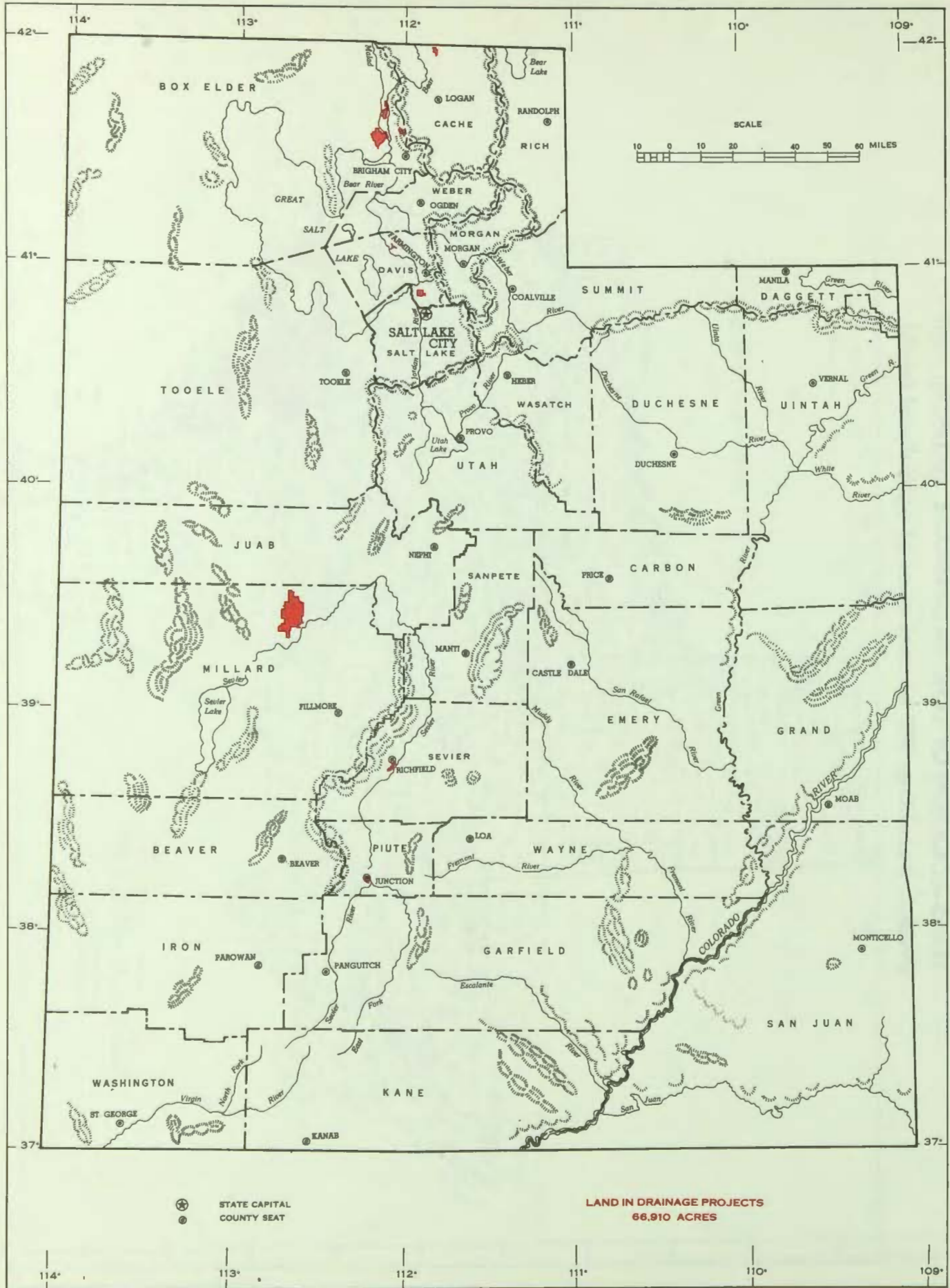
U.S. Department of Commerce, Bureau of the Census

TEXAS—LOCATION OF LAND IN DRAINAGE PROJECTS, 1960
(Projects benefiting 500 or more acres of agricultural lands)



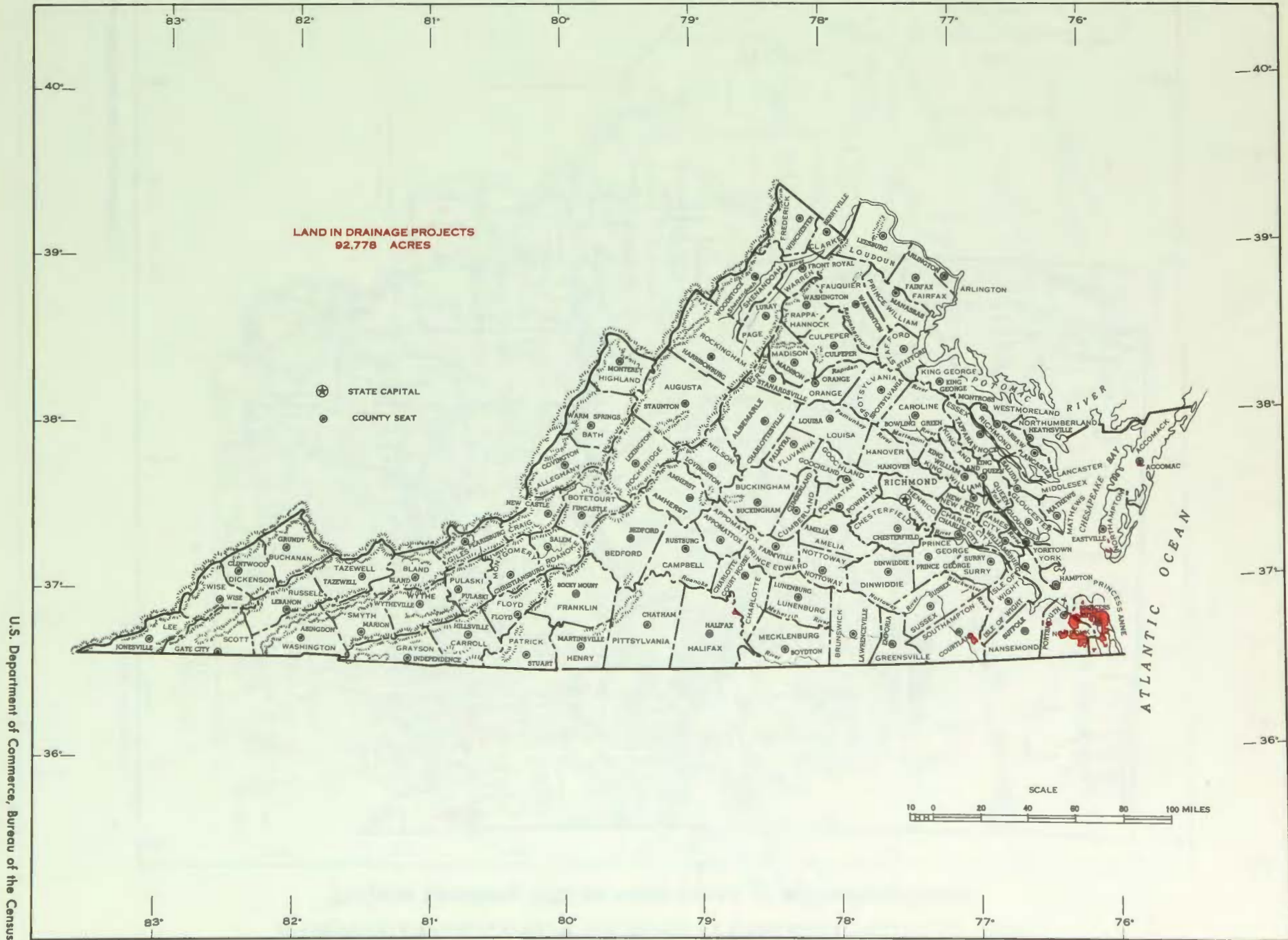
DRAINAGE OF AGRICULTURAL LANDS

UTAH—LOCATION OF LAND IN DRAINAGE PROJECTS, 1960
(Projects benefiting 500 or more acres of agricultural lands)

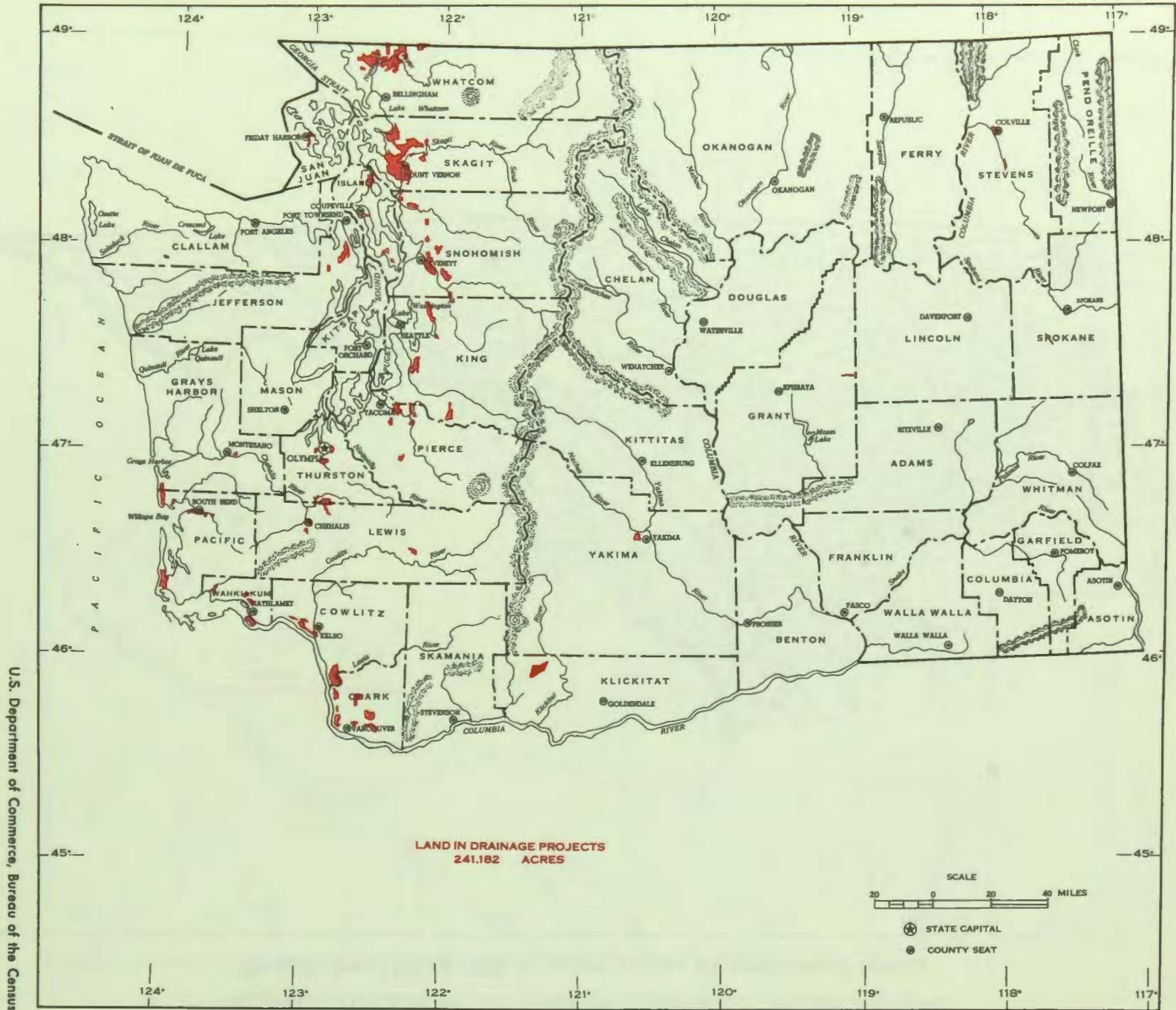


VIRGINIA—LOCATION OF LAND IN DRAINAGE PROJECTS, 1960

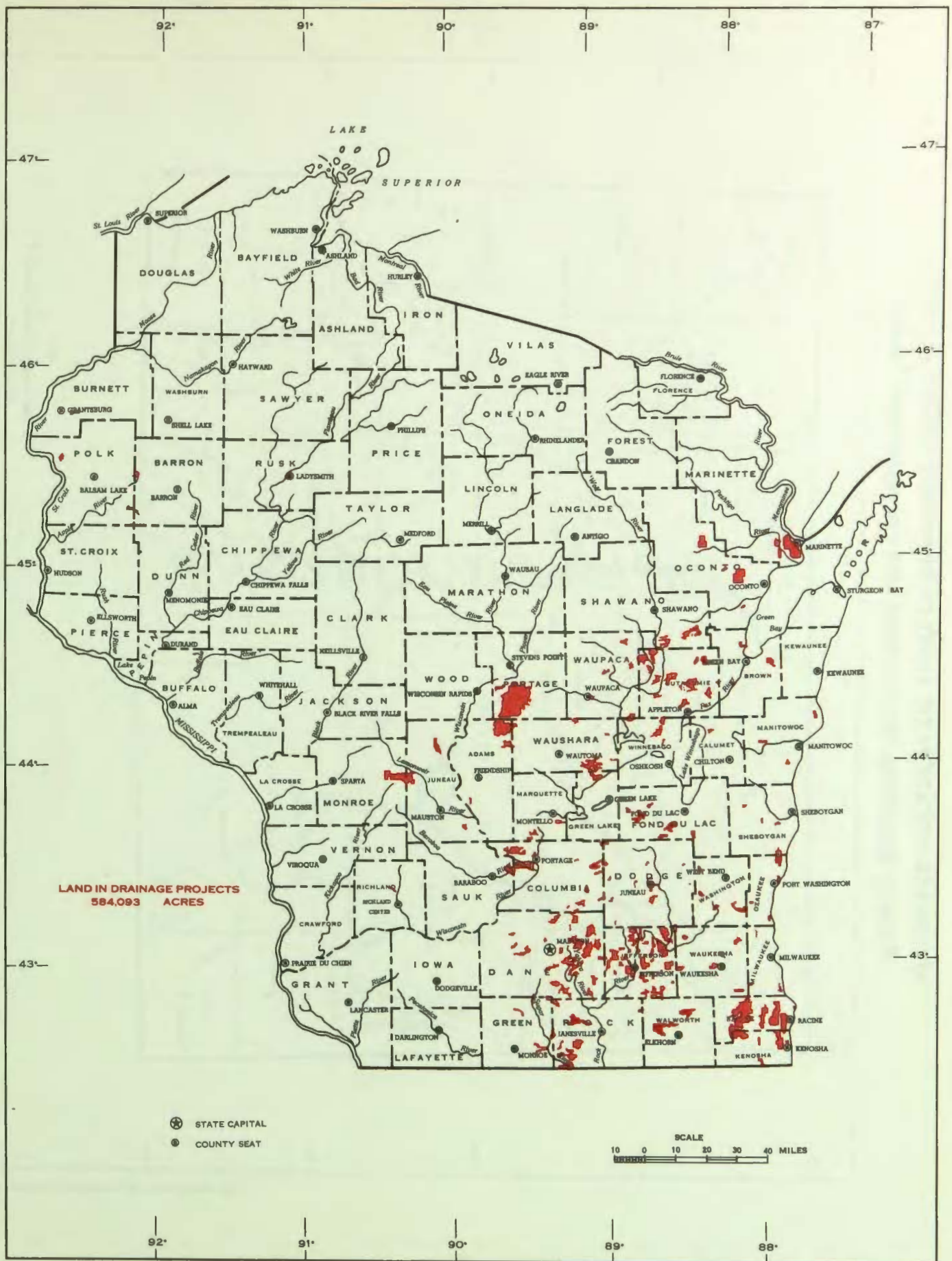
(Projects benefiting 500 or more acres of agricultural lands)



WASHINGTON—LOCATION OF LAND IN DRAINAGE PROJECTS, 1960
 (Projects benefiting 500 or more acres of agricultural lands)

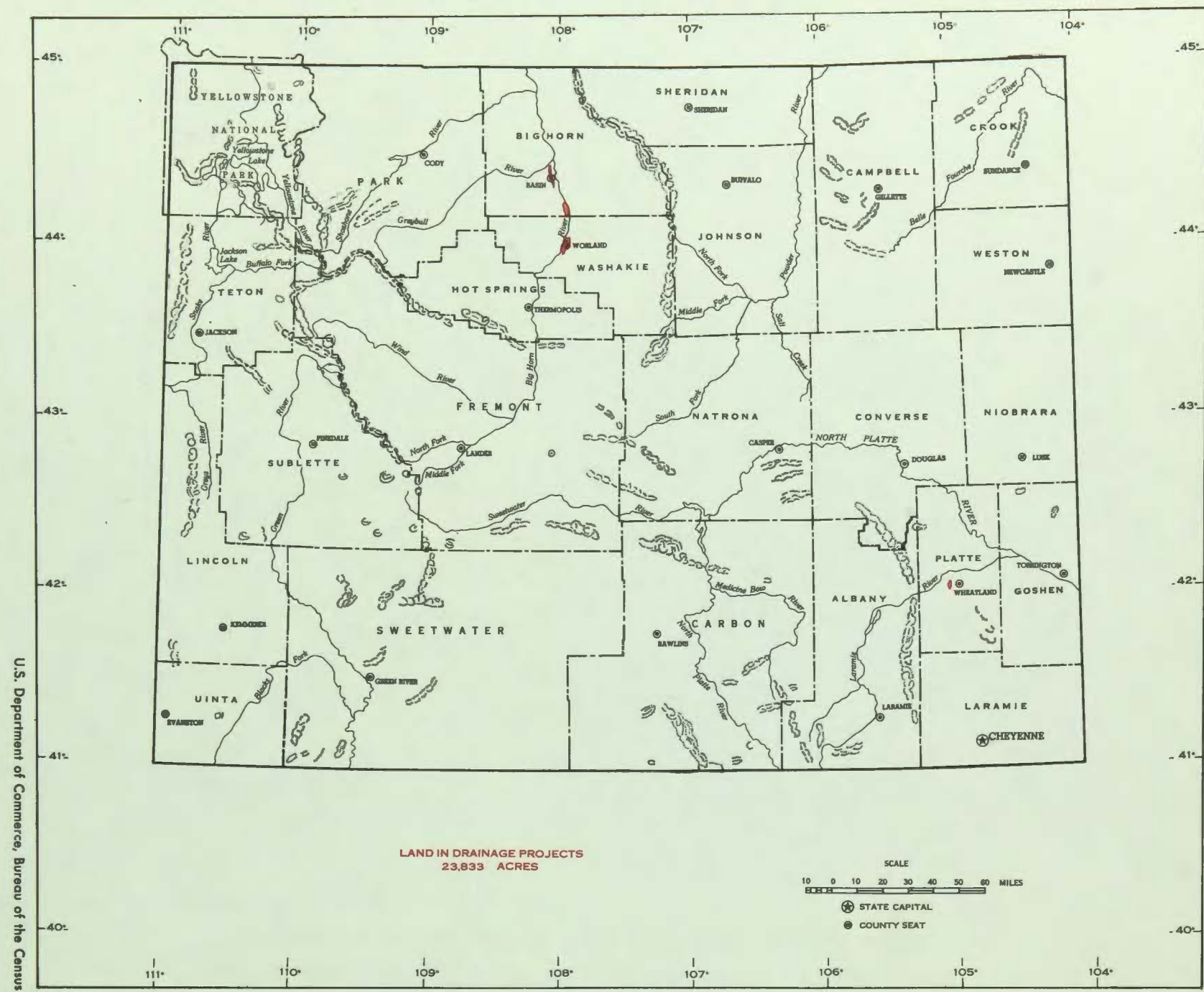


WISCONSIN-LOCATION OF LAND IN DRAINAGE PROJECTS, 1960
(Projects benefiting 500 or more acres of agricultural lands)



WYOMING—LOCATION OF LAND IN DRAINAGE PROJECTS, 1960 (Projects benefiting 500 or more acres of agricultural lands)

DRAINAGE OF AGRICULTURAL LANDS



U.S. Department of Commerce, Bureau of the Census

STATISTICS FOR STATES

(71)

State Table 1.—DRAINAGE PROJECTS—NUMBER, AREA, COST, AND WORKS, 1920 TO 1960

[See text for comparability of data.]

Item	1960 Census	1950 Census	1940 Census	1930 Census	1920 Census
AREA					
Approximate land area..... acres...	32,678,400	32,689,920	32,689,920	32,818,560	32,818,560
Land in farms..... acres...	16,542,730	20,888,784	19,143,391	17,554,635	19,576,856
Drainage projects..... number...	11	10	1	...	...
Total area in drainage projects..... acres served...	69,901	76,671	28,045	...	...
Area not used for agriculture or not drained..... acres served...	4,000	NA	...	...	...
Net area drained and used for agriculture..... acres served...	65,901	NA	28,045	...	...
Drainage established 10 years or more before Census date..... acres served...	64,851	NA	NA	...	...
Drainage established within 10 years of Census date..... acres served...	1,050	NA	NA	...	...
Area served by two or more projects..... acres served...	...	...	...	...	...
PROJECTS BY TYPE OF ORGANIZATION					
Drains owned by one landowner..... number of projects...	1	...	...	...	...
..... acres served...	500	...	...	...	...
Cooperative or mutual drains..... number of projects...	6	7	...	...	...
..... acres served...	33,745	40,735	...	...	...
Legally organized public drains..... number of projects...	4	3	1	...	...
..... acres served...	31,656	35,936	28,045	...	...
PROJECTS BY YEAR STARTED					
Started 10 years or more before Census date..... number of projects...	10	3	1	...	...
..... acres served...	65,401	35,936	28,045	...	...
Started within 10 years of Census date..... number of projects...	1	7	...	...	...
..... acres served...	500	40,735	...	...	...
OPERATIONS, 10-YEAR PERIOD PRECEDING CENSUS DATE					
Cost of drainage works and services..... projects reporting...	6	8	NA	...	...
..... dollars...	31,061	70,223	NA	...	...
New drainage works constructed, enlarged, or installed..... projects reporting...	4	27	NA	...	...
..... cost, dollars...	25,812	258,768	NA	...	...
Open ditches..... projects reporting...	4	7	NA	...	...
..... length, miles...	15.3	66	NA	...	...
Tile or covered drains..... projects reporting...	...	...	NA	...	...
..... length, miles...	...	...	NA	...	...
Levees or dikes..... projects reporting...	...	...	NA	...	...
..... length, miles...	...	...	NA	...	...
Pumps..... projects reporting...	...	NA	NA	...	...
..... number of pumps...	...	NA	NA	...	...
Other (see text)..... projects reporting...	...	NA	NA	...	...
Cost of maintenance, operation, repair, and administration..... projects reporting...	5	NA	NA	...	...
..... dollars...	5,249	11,455	NA	...	...
STATUS ON CENSUS DATE					
Capital investment..... dollars...	NA	NA	410,000	...	...
Physical works:					
Open ditches..... length, miles...	NA	NA	42.3	...	...
Tile drains..... length, miles...	NA	NA	...	...	...
Levees and dikes..... length, miles...	NA	NA	...	...	...
Pumping units..... number of units...	NA	...	...	...	...

NA Not available.

¹Not fully comparable. See text.

²Cost of new works for lands not previously drained.

DRAINAGE OF AGRICULTURAL LANDS

State Table 2.—DRAINAGE

Size of project (Based on area of agricultural land in project)	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
		Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
				Projects reporting	Acres	Projects reporting	Acres
1 All projects.....	11	65,901	...	10	64,851	4	1,050
2 500 to 999 acres.....	6	3,749	...	5	2,699	4	1,050
3 1,000 to 1,999 acres.....	...	...	...	...	...	...	...
4 2,000 to 4,999 acres.....	3	11,271	...	3	11,271	...	...
5 5,000 to 9,999 acres.....	...	...	...	...	...	...	...
6 10,000 to 19,999 acres.....	...	...	...	...	...	...	...
7 20,000 to 49,999 acres.....	2	50,881	...	2	50,881	...	...
8 50,000 to 99,999 acres.....	...	...	...	...	...	...	...
9 100,000 or more acres.....	...	...	...	...	...	...	...

State Table 3.—DRAINAGE PROJECTS, 1960,

Type of organization	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
		Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
				Projects reporting	Acres	Projects reporting	Acres
1 All projects.....	11	65,901	...	10	64,851	4	1,050
2 Drains owned by one landowner.....	1	500	...	...	...	1	500
3 Cooperative or mutual drains.....	6	33,745	...	6	33,195	3	550
4 Legally organized public drains.....	4	31,656	...	4	31,656	...	...

State Table 4.—DRAINAGE PROJECTS, 1960,

Year of organization	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
		Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
				Projects reporting	Acres	Projects reporting	Acres
1 All projects.....	11	65,901	...	10	64,851	4	1,050
2 1960-1959.....	1	500	...	...	...	1	500
3 Prior to 1950.....	10	65,401	...	10	64,851	3	550

DRAINAGE OF AGRICULTURAL LANDS

County Table 1. - DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data.]

Item and Census year	The State	Clay	Colbert	Fayette	Hale	Lamar	Madison	Marengo	Marion	Marshall	Mobile	Perry	Tusca- loosa
AREA													
1 Approximate land area.....acres 1960...	22,678,400	385,920	394,240	401,280	424,320	387,200	513,920	625,280	475,520	365,440	794,880	469,760	857,600
2 Land in farms.....acres 1959...	16,542,730	130,071	207,874	190,787	275,604	168,897	370,067	371,151	205,076	219,018	186,699	286,471	263,212
3 Drainage projects..... number 1960...	11	1	1	1	1	1	1	2	1	2	1	1	1
4 1950...	10	1	...	1	1	2	1	2	1	2	...	1	1
5 Total area in drainage projects ¹ acres served 1960...	69,901	849	3,200	14,045	11,596	14,000	500	15,680	3,911	1,400	500	3,720	500
6 1950...	76,671	599	...	14,045	11,596	17,980	500	15,680	3,911	1,100	...	3,720	7,540
7 Area not used for agriculture or not drained..... acres served 1960...	4,000	...	...	...	...	4,000	...	...	...	...	...	...	...
8 Net area drained and used for agriculture..... acres served 1960...	65,901	849	3,200	14,045	11,596	10,000	500	15,680	3,911	1,400	500	3,720	500
9 Drainage established before 1950..... acres served 1960...	64,851	599	3,200	14,045	11,596	10,000	500	15,680	3,911	1,100	...	3,720	500
10 Area added, 1950-1959..... acres served 1960...	1,050	250	...	...	...	...	...	...	...	300	500	...	...
11 Area served by two or more projects..... acres served 1960...	...	...	...	...	...	...	...	...	...	...	...	...	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION													
12 Drains owned by one landowner..... number of projects...	1	...	...	...	...	...	...	...	...	...	1	...	...
13 acres served ² ...	500	...	...	...	...	...	...	...	...	...	500	...	...
14 Cooperative or mutual drains..... number of projects...	6	1	...	...	1	...	1	2	...	2	...	1	...
15 acres served ² ...	33,745	849	...	...	11,596	...	500	15,680	...	1,400	...	3,720	...
16 Legally organized public drains..... number of projects...	4	...	1	1	...	1	...	...	1	...	...	...	1
17 acres served ² ...	31,656	...	3,200	14,045	...	10,000	...	...	3,911	...	...	...	500
PROJECTS, 1960, BY YEAR STARTED													
18 1950-1959..... number of projects...	1	...	...	...	...	...	...	...	...	...	1	...	...
19 acres served ² ...	500	...	...	...	...	...	...	...	...	...	500	...	...
20 Prior to 1950..... number of projects...	10	1	1	1	1	1	1	2	1	2	...	1	1
21 acres served ² ...	65,401	849	3,200	14,045	11,596	10,000	500	15,680	3,911	1,400	...	3,720	500
DRAINAGE OPERATIONS, 1950-1959 ³													
22 Cost of drainage works and services..... projects reporting...	6	1	1	1	...	1	...	...	...	2	1	...	...
23 dollars...	31,061	11,100	2,809	370	...	370	...	...	...	10,500	5,912	...	...
24 New drainage works constructed, enlarged, or installed..... projects reporting...	4	1	...	...	...	...	...	...	...	2	1	...	...
25 dollars...	25,812	11,000	...	...	...	...	...	...	...	9,500	5,312	...	...
26 Open ditches..... projects reporting...	4	1	...	...	...	...	...	...	...	2	1	...	...
27 length, miles...	15.3	5.0	...	...	...	...	...	...	...	8.0	2.3	...	...
28 Tile or covered drains..... projects reporting...	...	...	...	...	...	...	...	...	...	...	...	...	...
29 length, miles...	...	...	...	...	...	...	...	...	...	...	...	...	...
30 Levees or dikes..... projects reporting...	...	...	...	...	...	...	...	...	...	...	...	...	...
31 length, miles...	...	...	...	...	...	...	...	...	...	...	...	...	...
32 Pumps..... projects reporting...	...	...	...	...	...	...	...	...	...	...	...	...	...
33 number of pumps...	...	...	...	...	...	...	...	...	...	...	...	...	...
34 Other (see text)..... projects reporting...	...	...	...	...	...	...	...	...	...	...	...	...	...
35 Cost of maintenance, operation, repair, and administration..... projects reporting...	5	1	1	1	...	1	...	...	...	1	1	...	...
36 dollars...	5,249	100	2,809	370	...	370	...	...	...	1,000	600	...	...

¹Land served by two or more projects counted only once.²Acres served by two projects are included for each project. See text.³Includes projects taken over by another project prior to 1960. See text.

State Table 1.—DRAINAGE PROJECTS—NUMBER, AREA, COST, AND WORKS, 1920 TO 1960

[See text for comparability of data.]

Item	1960 Census	1950 Census	1940 Census	1930 Census	1920 Census
AREA					
Approximate land area..... acres...	33,599,360	33,712,000	33,744,000	33,616,000	33,616,000
Land in farms..... acres...	16,458,515	18,871,244	18,044,542	16,052,962	17,456,750
Drainage projects..... number...	598	844	250	NA	NA
Total area in drainage projects..... acres served...	4,870,106	4,701,095	4,592,738	4,631,155	3,479,591
Area not used for agriculture or not drained..... acres served...	189,140	NA	NA	NA	NA
Net area drained and used for agriculture..... acres served...	4,680,966	NA	¹ 3,100,342	² 2,940,035	NA
Drainage established 10 years or more before Census date..... acres served...	4,447,703	NA	NA	NA	NA
Drainage established within 10 years of Census date..... acres served...	233,263	NA	NA	NA	NA
Area served by two or more projects..... acres served...	917,881	629,514	1,040,561	1,133,653	363,221
PROJECTS BY TYPE OF ORGANIZATION					
Drains owned by one landowner..... number of projects...	167	² 15	NA	NA	NA
..... acres served...	236,104	² 67,790	84,358	40,660	26,900
Cooperative or mutual drains..... number of projects...	202	² 23	...	...	...
..... acres served...	276,463	² 32,398	...	...	...
Legally organized public drains..... number of projects...	229	² 229	NA	NA	NA
..... acres served...	5,252,771	² 4,506,440	4,508,380	4,590,495	3,452,691
PROJECTS BY YEAR STARTED					
Started 10 years or more before Census date..... number of projects...	260	² 235	NA	NA	NA
..... acres served...	4,991,384	² 4,476,359	4,483,441	3,889,411	³ 869,641
Started within 10 years of Census date..... number of projects...	338	² 32	NA	NA	NA
..... acres served...	773,954	² 130,269	109,297	741,744	³ 2,561,950
OPERATIONS, 10-YEAR PERIOD PRECEDING CENSUS DATE					
Cost of drainage works and services..... projects reporting...	471	² 127	NA	NA	NA
..... dollars...	20,488,226	5,540,041	NA	NA	NA
New drainage works constructed, enlarged, or installed..... projects reporting...	352	⁴ 28	NA	NA	NA
..... cost, dollars...	9,044,351	⁴ 391,898	NA	NA	NA
Open ditches..... projects reporting...	347	29	NA	NA	NA
..... length, miles...	1,796.0	123	NA	NA	NA
Tile or covered drains..... projects reporting...	...	...	NA	NA	NA
..... length, miles...	...	...	NA	NA	NA
Levees or dikes..... projects reporting...	9	4	NA	NA	NA
..... length, miles...	27.8	15	NA	NA	NA
Pumps..... projects reporting...	3	NA	NA	NA	NA
..... number of pumps...	4	NA	NA	NA	NA
Other (see text)..... projects reporting...	...	NA	NA	NA	NA
Cost of maintenance, operation, repair, and administration..... projects reporting...	169	NA	NA	NA	NA
..... dollars...	11,443,875	5,148,143	NA	NA	NA
STATUS ON CENSUS DATE					
Capital investment..... dollars...	NA	NA	39,450,754	37,532,575	14,147,174
Physical works:					
Open ditches..... length, miles...	NA	NA	6,030.3	4,974.3	3,154.1
Tile drains..... length, miles...	NA	NA	10.8	0.1	20.4
Levees and dikes..... length, miles...	NA	NA	332.4	201.9	121.8
Pumping units..... number of units...	NA	² 5	5	5	...

NA Not available.

¹Not fully comparable. See text.

²1950 figures exclude 577 projects and 94,467 acres in "irrigation enterprises."

³1920 figures exclude 48,000 acres for which date of organization was not reported.

⁴Cost of new works for lands not previously drained.

DRAINAGE OF AGRICULTURAL LANDS

State Table 2.—DRAINAGE

	Size of project (Based on area of agricultural land in project)	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	598	5,765,338	2,002,253	484	5,529,817	151	235,521
2	500 to 999 acres.....	230	150,233	80,415	165	101,004	81	49,229
3	1,000 to 1,999 acres.....	109	144,769	72,486	83	105,997	34	38,772
4	2,000 to 4,999 acres.....	76	238,843	59,541	59	175,702	23	63,141
5	5,000 to 9,999 acres.....	60	439,295	84,055	55	383,562	10	55,733
6	10,000 to 19,999 acres.....	54	776,548	208,856	53	747,902	3	28,646
7	20,000 to 49,999 acres.....	45	1,388,425	228,142	45	1,388,425	...	...
8	50,000 to 99,999 acres.....	12	778,208	201,802	12	778,208	...	...
9	100,000 or more acres.....	12	1,849,017	1,066,956	12	1,849,017	...	...

State Table 3.—DRAINAGE PROJECTS, 1960,

	Type of organization	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	598	5,765,338	2,002,253	484	5,529,817	151	235,521
2	Drains owned by one landowner.....	167	236,104	140,864	120	174,323	62	61,781
3	Cooperative or mutual drains.....	202	276,463	105,237	139	147,174	82	129,289
4	Legally organized public drains.....	229	5,252,771	1,756,152	225	5,208,320	7	44,451

State Table 4.—DRAINAGE PROJECTS, 1960,

	Year of organization	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	598	5,765,338	2,002,253	484	5,529,817	151	235,521
2	1960-1959.....	338	773,954	438,490	224	542,933	148	231,021
3	Prior to 1950.....	260	4,991,384	1,563,763	260	4,986,884	3	4,500

PROJECTS, 1960, BY SIZE

Cost of drainage works and services, 1950-1959				New works constructed, enlarged, or installed, 1950-1959									
Total		For new works		Open ditches		Tile or covered drains		Levees and dikes		Pumps		Other, projects reporting	
Projects reporting	Dollars	Projects reporting	Dollars	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Number		
471	20,488,226	352	9,044,351	347	1,796.0	...	...	9	27.8	3	4	...	1
214	679,067	205	648,914	205	525.9	...	...	3	3.8	1	2	...	2
89	566,556	83	532,268	83	306.7	...	...	...	...	...	...	...	3
49	566,238	34	396,718	33	161.8	...	...	1	6.0	...	...	...	4
33	933,089	17	449,440	15	137.2	...	...	3	12.5	...	...	...	5
32	1,968,781	8	616,231	6	109.2	...	...	2	5.5	1	1	...	6
33	4,361,112	1	477,000	1	300.0	...	...	...	...	...	...	...	7
9	1,571,221	1	189,750	1	54.3	...	...	...	...	...	...	...	8
12	9,842,162	3	5,734,030	3	200.9	...	...	...	...	1	1	...	9

BY TYPE OF ORGANIZATION

Cost of drainage works and services, 1950-1959				New works constructed, enlarged, or installed, 1950-1959									
Total		For new works		Open ditches		Tile or covered drains		Levees and dikes		Pumps		Other, projects reporting	
Projects reporting	Dollars	Projects reporting	Dollars	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Number		
471	20,488,226	352	9,044,351	347	1,796.0	...	...	9	27.8	3	4	...	1
164	2,229,404	157	1,386,737	157	1,045.1	...	...	1	1.5	1	2	...	2
183	822,130	173	794,557	173	382.4	...	...	2	2.3	...	...	...	3
124	17,436,692	22	6,863,057	17	368.5	...	...	6	24.0	2	2	...	4

BY YEAR OF ORGANIZATION

Cost of drainage works and services, 1950-1959				New works constructed, enlarged, or installed, 1950-1959									
Total		For new works		Open ditches		Tile or covered drains		Levees and dikes		Pumps		Other, projects reporting	
Projects reporting	Dollars	Projects reporting	Dollars	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Number		
471	20,488,226	352	9,044,351	347	1,796.0	...	...	9	27.8	3	4	...	1
338	9,195,066	326	7,908,320	325	1,262.0	...	...	5	10.3	1	2	...	2
133	11,293,160	26	1,136,031	22	534.0	...	...	4	17.5	2	2	...	3

DRAINAGE OF AGRICULTURAL LANDS

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	The State	Arkansas	Ashley	Chicot	Clark	Clay	Conway	Craighead
AREA								
1 Approximate land area.....acres 1960...	33,599,360	662,400	597,120	414,080	561,920	409,600	358,400	458,880
2 Land in farms.....acres 1959...	16,458,515	449,712	164,831	282,670	180,332	297,242	235,834	372,953
3 Drainage projects..... number 1960...	598	19	10	57	1	17	2	43
4 1950...	844	39	3	14	1	24	3	78
5 Total area in drainage projects ¹ acres served 1960...	4,870,106	114,466	50,692	352,885	26,071	267,230	7,400	332,603
6 1950...	4,701,095	125,221	33,684	347,206	26,071	280,798	22,724	352,265
7 Area not used for agriculture or not drained..... acres served 1960...	189,140	5,300	...	28,290	...	...	...	4,328
8 Net area drained and used for agriculture..... acres served 1960...	4,680,966	109,166	50,692	324,595	26,071	267,230	7,400	328,275
9 Drainage established before 1950..... acres served 1960...	4,447,703	109,166	32,540	317,141	26,071	267,230	6,900	327,135
10 Area added, 1950-1959..... acres served 1960...	233,263	...	18,152	7,454	...	...	500	1,140
11 Area served by two or more projects..... acres served 1960...	917,881	...	6,740	124,373	...	57,040	...	68,169
PROJECTS, 1960, BY TYPE OF ORGANIZATION								
12 Drains owned by one landowner..... number of projects...	167	1	4	29	...	...	...	4
13 acres served ² ...	236,104	800	3,310	26,524	...	...	...	2,480
14 Cooperative or mutual drains..... number of projects...	202	1	4	21	...	4	1	15
15 acres served ² ...	276,463	450	21,582	22,846	...	4,180	500	10,780
16 Legally organized public drains..... number of projects...	229	17	2	7	1	13	1	24
17 acres served ² ...	5,252,771	107,916	32,540	410,290	26,071	325,140	6,900	388,664
PROJECTS, 1960, BY YEAR STARTED								
18 1960-1969..... number of projects...	338	...	9	50	...	4	1	22
19 acres served ² ...	773,954	...	49,192	138,519	...	4,180	500	48,871
20 Prior to 1960..... number of projects...	260	19	1	7	1	13	1	21
21 acres served ² ...	4,991,384	109,166	8,240	321,141	26,071	325,140	6,900	353,053
DRAINAGE OPERATIONS, 1950-1959 ³								
22 Cost of drainage works and services..... projects reporting...	471	6	8	57	1	11	1	39
23 dollars...	20,488,226	20,701	65,886	2,051,610	36,230	224,392	24,500	1,819,385
24 New drainage works constructed, enlarged, or installed..... projects reporting...	352	1	8	51	...	5	1	21
25 dollars...	9,044,351	300	65,886	1,956,980	...	23,270	24,500	84,204
26 Open ditches..... projects reporting...	347	1	8	51	...	5	1	21
27 length, miles...	1,796.0	0.1	36.7	364.9	...	9.9	3.3	49.8
28 Tile or covered drains..... projects reporting...	...	...	...	...	...	...	...	...
29 length, miles...	...	...	...	...	...	...	...	...
30 Levees or dikes..... projects reporting...	9	...	...	...	...	...	...	4
31 length, miles...	27.8	...	...	...	...	...	...	14.5
32 Pumps..... projects reporting...	3	...	...	...	...	...	...	...
33 number of pumps...	4	...	...	...	...	...	...	...
34 Other (see text)..... projects reporting...	...	...	...	...	...	...	...	...
35 Cost of maintenance, operation, repair, and administration..... projects reporting...	169	6	...	27	1	7	...	20
36 dollars...	11,443,875	20,401	...	94,630	36,230	201,122	...	1,735,181

¹Land served by two or more projects counted only once.²Acres served by two projects are included for each project. See text.³Includes projects taken over by another project prior to 1960. See text.

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data.]

Item and Census year	Crawford	Crittenden	Cross	Desha	Drew	Faulkner	Greene	Hempstead
AREA								
1 Approximate land area..... acres 1960...	382,080	398,720	400,640	496,640	535,040	413,440	370,560	470,400
2 Land in farms..... acres 1959...	160,603	350,192	319,960	270,695	176,153	286,992	267,842	257,507
3 Drainage projects..... number 1960...	2	25	41	28	7	4	42	2
4 1950...	1	11	189	16	1	3	44	2
5 Total area in drainage projects ¹ acres served 1960...	1,860	268,337	173,325	335,875	17,200	13,899	207,544	9,104
6 1950...	920	260,337	156,782	308,322	3,440	9,169	207,057	9,104
7 Area not used for agriculture or not drained..... acres served 1960...	...	...	...	3,480	...	...	1,700	...
8 Net area drained and used for agriculture..... acres served 1960...	1,860	268,337	173,325	332,395	17,200	13,899	205,844	9,104
9 Drainage established before 1950..... acres served 1960...	...	259,897	130,575	328,195	4,040	13,899	199,544	9,104
10 Area added, 1950-1959..... acres served 1960...	1,860	8,440	42,750	4,200	13,160	...	6,300	...
11 Area served by two or more projects..... acres served 1960...	...	33,064	11,296	123,675	...	...	49,291	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION								
12 Drains owned by one landowner..... number of projects...	...	11	13	17	2	1	5	...
13 acres served ²...	...	7,560	17,863	47,356	3,260	529	4,840	...
14 Cooperative or mutual drains..... number of projects...	2	4	23	4	4	1	16	...
15 acres served ² ...	1,860	6,200	41,688	3,645	10,500	800	18,898	...
16 Legally organized public drains..... number of projects...	...	10	5	7	1	2	21	2
17 acres served ²...	...	289,241	125,070	435,476	3,440	12,570	237,102	9,104
PROJECTS, 1960, BY YEAR STARTED								
18 1960-1959..... number of projects...	2	16	30	16	5	1	21	...
19 acres served ² ...	1,860	43,104	54,534	121,068	11,200	529	34,978	...
20 Prior to 1960..... number of projects...	...	9	11	12	2	3	21	2
21 acres served ²...	...	259,897	130,087	365,409	6,000	13,370	225,862	9,104
DRAINAGE OPERATIONS, 1950-1959 ³								
22 Cost of drainage works and services..... projects reporting...	2	24	35	26	6	3	30	...
23 dollars...	15,715	1,344,322	210,563	4,539,015	59,468	25,982	450,697	...
24 New drainage works constructed, enlarged, or installed..... projects reporting...	2	13	32	22	6	1	23	...
25 dollars...	15,715	43,574	154,761	4,293,622	59,468	14,500	231,499	...
26 Open ditches..... projects reporting...	2	13	32	22	6	...	21	...
27 length, miles...	5.1	23.6	93.5	310.2	31.2	...	36.4	...
28 Tile or covered drains..... projects reporting...	...	...	...	...	...	...	...	...
29 length, miles...	...	...	...	...	...	...	...	...
30 Levees or dikes..... projects reporting...	...	...	...	...	...	1	2	...
31 length, miles...	...	...	...	...	...	0.6	11.0	...
32 Pumps..... projects reporting...	...	...	...	...	...	...	...	...
33 number of pumps...	...	...	...	...	...	...	...	...
34 Other (see text)..... projects reporting...	...	...	...	...	...	...	...	...
35 Cost of maintenance, operation, repair, and administration..... projects reporting...	...	11	6	10	...	3	8	...
36 dollars...	...	1,300,748	55,802	245,393	...	11,482	219,198	...

¹Land served by two or more projects counted only once.
²Acres served by two projects are included for each project. See text.
³Includes projects taken over by another project prior to 1960. See text.

DRAINAGE OF AGRICULTURAL LANDS

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1960 data.]

Item and Census year	Independence	Jackson	Jefferson	Lafayette	Lawrence	Lee	Lincoln	Little River
AREA								
1 Approximate land area.....acres 1960...	483,200	407,680	569,600	336,640	378,880	396,800	361,600	348,160
2 Land in farms.....acres 1959...	305,090	348,913	311,941	130,861	279,132	272,618	223,175	182,247
3 Drainage projects..... number 1960...	12	35	43	4	28	25	18	4
4 1950...	10	56	34	4	33	21	9	1
5 Total area in drainage projects ¹ acres served 1960...	15,494	195,867	202,841	51,460	180,246	112,637	110,684	24,560
6 1960...	28,866	181,679	218,942	41,034	199,423	107,702	101,424	10,892
7 Area not used for agriculture or not drained..... acres served 1960...	3,950	...	18,800	...	...	8,320	...	2,880
8 Net area drained and used for agriculture..... acres served 1960...	11,544	195,867	184,041	51,460	180,246	104,317	110,684	21,680
9 Drainage established before 1950..... acres served 1960...	7,676	175,736	167,846	41,414	178,971	93,972	104,924	8,012
10 Area added, 1950-1959..... acres served 1960...	3,868	20,131	16,195	10,046	1,275	10,345	5,760	13,668
11 Area served by two or more projects..... acres served 1960...	...	11,920	37,230	...	13,471	5,285	17,645	5,292
PROJECTS, 1960, BY TYPE OF ORGANIZATION								
12 Drains owned by one landowner..... number of projects...	...	10	11	1	4	10	2	2
13 acres served ²...	...	10,906	9,875	6,000	2,706	9,215	12,400	1,500
14 Cooperative or mutual drains..... number of projects...	9	6	14	...	13	6	7	...
15 acres served ² ...	7,098	5,456	10,920	...	12,780	4,945	8,335	...
16 Legally organized public drains..... number of projects...	3	19	18	3	11	9	9	2
17 acres served ² ...	4,446	192,541	212,856	65,460	178,801	95,442	107,594	26,012
PROJECTS, 1960, BY YEAR STARTED								
18 1950-1959..... number of projects...	4	17	26	1	17	14	8	3
19 acres served ² ...	3,868	28,319	26,555	10,046	15,486	13,530	8,900	19,500
20 Prior to 1950..... number of projects...	8	18	17	3	11	11	10	1
21 acres served ² ...	7,676	180,584	207,096	41,414	178,801	96,072	119,429	8,012
DRAINAGE OPERATIONS, 1950-1959 ³								
22 Cost of drainage works and services..... projects reporting...	5	24	36	2	18	22	12	3
23 dollars...	32,458	315,732	481,206	173,814	88,951	148,548	102,881	329,200
24 New drainage works constructed, enlarged, or installed..... projects reporting...	4	18	26	1	17	16	9	3
25 dollars...	31,458	200,976	131,514	104,230	51,231	49,433	63,313	329,200
26 Open ditches..... projects reporting...	4	18	26	1	17	16	9	3
27 length, miles...	16.0	61.3	58.0	8.0	23.8	35.7	21.5	29.8
28 Tile or covered drains..... projects reporting...	...	...	...	...	...	...	...	...
29 length, miles...	...	...	...	...	...	...	...	...
30 Levees or dikes..... projects reporting...	...	...	...	...	...	...	...	1
31 length, miles...	...	...	...	...	...	...	...	0.5
32 Pumps..... projects reporting...	...	...	1	...	...	...	...	...
33 number of pumps...	...	...	2	...	...	...	...	...
34 Other (see text)..... projects reporting...	...	...	...	...	...	...	...	...
35 Cost of maintenance, operation, repair, and administration..... projects reporting...	1	8	10	1	1	8	4	...
36 dollars...	1,000	114,756	349,692	69,584	37,720	99,115	39,568	...

¹Land served by two or more projects counted only once.²Acres served by two projects are included for each project. See text.³Includes projects taken over by another project prior to 1960. See text.

County Table 1. --DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	Logan	Lonoke	Miller	Mississippi	Monroe	Perry	Phillips	Poinsett
AREA								
1 Approximate land area.....acres 1960...	463,360	512,000	401,280	589,440	394,880	353,920	450,560	487,680
2 Land in farms.....acres 1959...	265,214	377,698	188,850	533,421	201,508	98,122	305,315	404,318
8 Drainage projects..... number 1960...	4	20	8	21	9	3	30	31
4 1950...	1	99	8	11	15	3	9	10
5 Total area in drainage projects ¹ acres served 1960...	2,720	219,269	86,069	499,678	29,046	15,560	261,678	396,700
6 1960...	1,301	238,885	86,069	516,687	30,565	14,728	113,404	404,190
7 Area not used for agriculture or not drained..... acres served 1960...	...	9,492	15,000	17,000	700	...	6,420	51,380
8 Net area drained and used for agriculture..... acres served 1960...	2,720	209,777	71,069	482,678	28,346	15,560	255,258	345,320
9 Drainage established before 1960..... acres served 1960...	...	209,727	71,069	480,691	24,040	14,720	253,238	345,320
10 Area added, 1950-1959..... acres served 1960...	2,720	50	...	1,987	4,306	840	2,020	...
11 Area served by two or more projects..... acres served 1960...	...	11,734	1,920	204,424	320	...	115,497	7,430
PROJECTS, 1960, BY TYPE OF ORGANIZATION								
12 Drains owned by one landowner..... number of projects...	3	3	...	4	2	...	15	12
13 acres served ² ...	2,200	3,342	...	33,700	1,306	...	13,400	6,735
14 Cooperative or mutual drains..... number of projects...	1	2	...	7	4	1	9	11
15 acres served ² ...	520	4,000	...	5,150	4,050	840	18,013	8,337
16 Legally organized public drains..... number of projects ³...	...	15	8	10	3	2	6	8
17 acres served ²...	...	214,169	72,989	729,572	23,310	14,720	350,863	337,788
PROJECTS, 1960, BY YEAR STARTED								
18 1960-1959..... number of projects...	4	1	...	11	5	1	21	23
19 acres served ² ...	2,720	850	...	55,450	5,036	840	19,496	15,072
20 Prior to 1960..... number of projects...	...	19	8	10	4	2	9	8
21 acres served ²...	...	220,661	72,989	712,972	23,630	14,720	362,780	337,788
DRAINAGE OPERATIONS, 1950-1959 ³								
22 Cost of drainage works and services..... projects reporting...	4	9	6	21	7	1	30	27
23 dollars...	15,386	81,717	60,360	4,772,808	18,391	3,349	851,488	1,803,808
24 New drainage works constructed, enlarged, or installed..... projects reporting...	4	2	...	9	5	1	23	23
25 dollars...	15,386	7,221	...	507,609	14,962	3,349	308,068	88,509
26 Open ditches..... projects reporting...	4	2	...	9	5	1	23	23
27 length, miles...	4.1	7.8	...	320.8	9.9	3.5	122.1	48.9
28 Tile or covered drains..... projects reporting...	...	...	...	...	...	...	...	...
29 length, miles...	...	...	...	...	...	...	...	...
30 Levees or dikes..... projects reporting...	...	...	...	...	...	...	...	...
31 length, miles...	...	...	...	...	...	...	...	...
32 Pumps..... projects reporting...	...	...	...	...	...	...	...	1
33 number of pumps...	...	...	...	...	...	...	...	1
34 Other (see text)..... projects reporting...	...	...	...	...	...	...	...	...
35 Cost of maintenance, operation, repair, and administration..... projects reporting...	...	9	6	13	2	...	10	7
36 dollars...	...	74,496	60,360	4,265,199	3,429	...	543,420	1,715,299

¹Land served by two or more projects counted only once.
²Acres served by two projects are included for each project. See text.
³Includes projects taken over by another project prior to 1960. See text.

DRAINAGE OF AGRICULTURAL LANDS

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	Pope	Prairie	Pulaski	Randolph	St. Francis	White	Woodruff	Yell
AREA								
1 Approximate land area.....acres 1960...	521,600	431,360	490,880	414,080	407,040	666,880	378,880	597,120
2 Land in farms.....acres 1959...	207,467	256,528	184,824	257,088	344,465	419,362	267,116	208,747
3 Drainage projects..... number 1960...	4	8	11	5	12	1	9	2
4 1950...	5	62	7	5	23	1	25	2
5 Total area in drainage projects ¹ acres served 1960...	7,480	28,523	62,831	53,251	55,583	17,569	46,509	15,360
6 1950...	8,838	37,803	31,951	53,251	47,285	17,569	48,867	16,640
7 Area not used for agriculture or not drained..... acres served 1960...	...	7,740	2,160	...	700	...	1,500	...
8 Net area drained and used for agriculture..... acres served 1960...	7,480	20,783	60,671	53,251	54,883	17,569	45,009	15,360
9 Drainage established before 1950..... acres served 1960...	6,280	20,783	43,031	53,251	43,219	17,569	39,417	15,360
10 Area added, 1950-1959..... acres served 1960...	1,200	...	17,640	...	11,664	...	5,592	...
11 Area served by two or more projects..... acres served 1960...	...	850	1,600	...	7,623	...	1,992	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION								
12 Drains owned by one landowner..... number of projects...	...	2	1	...	2	...	...	...
13 acres served ²...	...	1,800	4,400	...	2,097	...	...	...
14 Cooperative or mutual drains..... number of projects...	1	4	5	...	6	...	5	...
15 acres served ² ...	1,200	5,330	17,419	...	12,111	...	6,030	...
16 Legally organized public drains..... number of projects...	3	2	5	5	4	1	4	2
17 acres served ² ...	6,280	14,503	40,452	53,251	48,298	17,569	40,971	15,360
PROJECTS, 1960, BY YEAR STARTED								
18 1960-1959..... number of projects...	1	...	4	...	7	...	5	...
19 acres served ² ...	1,200	...	19,303	...	11,664	...	7,584	...
20 Prior to 1950..... number of projects...	3	8	7	5	5	1	4	2
21 acres served ² ...	6,280	21,633	42,968	53,251	50,842	17,569	39,417	15,360
DRAINAGE OPERATIONS, 1950-1959 ³								
22 Cost of drainage works and services..... projects reporting...	1	4	6	2	8	...	5	1
23 dollars...	2,882	15,399	69,508	10,641	147,004	...	35,405	38,824
24 New drainage works constructed, enlarged, or installed..... projects reporting...	1	...	5	...	7	...	5	1
25 dollars...	2,882	...	52,498	...	40,004	...	35,405	38,824
26 Open ditches..... projects reporting...	1	...	4	...	7	...	5	...
27 length, miles...	1.3	...	9.2	...	27.4	...	12.2	...
28 Tile or covered drains..... projects reporting...	...	...	...	...	...	...	...	...
29 length, miles...	...	...	...	...	...	...	...	...
30 Levees or dikes..... projects reporting...	...	...	...	...	...	...	...	1
31 length, miles...	...	...	...	...	...	...	...	1.2
32 Pumps..... projects reporting...	...	...	1	...	...	...	...	...
33 number of pumps...	...	...	1	...	...	...	...	...
34 Other (see text)..... projects reporting...	...	...	...	...	...	...	...	...
35 Cost of maintenance, operation, repair, and administration..... projects reporting...	...	4	2	2	1	...	...	...
36 dollars...	...	15,399	17,010	10,641	107,000	...	...	...

¹Land served by two or more projects counted only once.
²Acres served by two projects are included for each project. See text.
³Includes projects taken over by another project prior to 1960. See text.

State Table 1.—DRAINAGE PROJECTS—NUMBER, AREA, COST, AND WORKS, 1920 TO 1960

[See text for comparability of data.]

Item	1960 Census	1950 Census	1940 Census	1930 Census	1920 Census
AREA					
Approximate land area..... acres...	100,206,720	100,313,600	100,353,920	99,617,280	99,617,280
Land in farms..... acres...	36,887,948	36,613,291	30,524,324	30,442,581	29,365,667
Drainage projects..... number...	356	2,047	158	NA	NA
Total area in drainage projects..... acres served...	1,934,825	2,554,576	2,667,194	2,233,714	1,108,319
Area not used for agriculture or not drained..... acres served...	23,574	NA	NA	NA	NA
Net area drained and used for agriculture..... acres served...	1,911,251	NA	² 2,551,036	² 2,024,446	NA
Drainage established 10 years or more before Census date..... acres served...	1,666,899	NA	NA	NA	NA
Drainage established within 10 years of Census date..... acres served...	244,352	NA	NA	NA	NA
Area served by two or more projects..... acres served...	106,696	...	88,563	60,354	...
PROJECTS BY TYPE OF ORGANIZATION					
Drains owned by one landowner..... number of projects...	157	² 48	NA	NA	NA
acres served...	311,903	² 177,321	² 89,985	² 90,384	² 147,678
Cooperative or mutual drains..... number of projects...	45	² 13	...	...	...
acres served...	124,511	² 73,266	...	...	...
Legally organized public drains..... number of projects...	154	² 102	NA	NA	NA
acres served...	1,583,133	² 1,202,950	² 1,168,701	² 1,167,139	² 795,441
PROJECTS BY YEAR STARTED					
Started 10 years or more before Census date..... number of projects...	269	² 142	NA	NA	NA
acres served...	1,752,466	² 1,400,083	2,624,471	1,753,766	³ 471,396
Started within 10 years of Census date..... number of projects...	87	² 21	NA	NA	NA
acres served...	267,081	² 53,454	42,723	479,954	³ 566,114
OPERATIONS, 10-YEAR PERIOD PRECEDING CENSUS DATE					
Cost of drainage works and services..... projects reporting...	344	² 159	NA	NA	NA
dollars...	29,065,257	15,926,510	NA	NA	NA
New drainage works constructed, enlarged, or installed..... projects reporting...	206	⁴ 16	16	NA	NA
cost, dollars...	4,525,825	⁴ 135,346	NA	NA	NA
Open ditches..... projects reporting...	167	15	NA	NA	NA
length, miles...	812.9	34	NA	NA	NA
Tile or covered drains..... projects reporting...	21	2	NA	NA	NA
length, miles...	46.0	11	NA	NA	NA
Levees or dikes..... projects reporting...	50	...	NA	NA	NA
length, miles...	227.4	...	NA	NA	NA
Pumps..... projects reporting...	74	NA	NA	NA	NA
number of pumps...	162	NA	NA	NA	NA
Other (see text)..... projects reporting...	42	NA	NA	NA	NA
Cost of maintenance, operation, repair, and administration..... projects reporting...	289	NA	NA	NA	NA
dollars...	24,539,432	15,791,164	NA	NA	NA
STATUS ON CENSUS DATE					
Capital investment..... dollars...	NA	NA	70,144,044	66,451,698	47,687,153
Physical works:					
Open ditches..... length, miles...	NA	NA	6,091.1	4,605.9	3,009.8
Tile drains..... length, miles...	NA	NA	326.2	486.2	85.6
Levees and dikes..... length, miles...	NA	NA	1,537.6	1,389.5	1,131.1
Pumping units..... number of units...	NA	² 382	763	426	NA

NA Not available.

¹Not fully comparable. See text.

²1950 figures exclude 1,884 projects and 1,101,039 acres in "irrigation enterprises"; 1940 figures exclude 1,408,508 acres in "irrigation enterprises"; 1930 figures exclude 1,016,191 acres in "irrigation enterprises"; 1920 figures exclude 165,200 acres in "irrigation enterprises."

³1920 figures exclude 70,809 acres for which date of organization was not reported.

⁴Cost of new works for lands not previously drained.

DRAINAGE OF AGRICULTURAL LANDS

State Table 2.—DRAINAGE

	Size of project (Based on area of agricultural land in project)	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	356	2,019,547	214,992	282	1,767,032	84	252,515
2	500 to 999 acres.....	104	71,294	23,895	67	45,447	39	25,847
3	1,000 to 1,999 acres.....	76	101,939	26,164	57	75,458	20	26,481
4	2,000 to 4,999 acres.....	75	230,410	47,543	67	204,634	10	25,776
5	5,000 to 9,999 acres.....	56	381,682	55,813	49	320,334	10	61,348
6	10,000 to 19,999 acres.....	27	385,170	24,073	24	329,130	4	56,040
7	20,000 to 49,999 acres.....	9	234,240	14,297	9	234,240	...	...
8	50,000 to 99,999 acres.....	8	477,966	20,838	8	420,943	1	57,023
9	100,000 or more acres.....	1	136,846	2,369	1	136,846	...	...

State Table 3.—DRAINAGE PROJECTS, 1960,

	Type of organization	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	356	2,019,547	214,992	282	1,767,032	84	252,515
2	Drains owned by one landowner.....	157	311,903	85,783	129	272,280	33	39,623
3	Cooperative or mutual drains.....	45	124,511	15,328	15	38,652	32	85,859
4	Legally organized public drains.....	154	1,583,133	113,881	138	1,456,100	19	127,033

State Table 4.—DRAINAGE PROJECTS, 1960,

	Year of organization	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	356	2,019,547	214,992	282	1,767,032	84	252,515
2	1960-1959.....	87	267,081	31,365	13	15,501	81	251,580
3	Prior to 1950.....	269	1,752,466	183,627	269	1,751,531	3	935

¹Includes projects taken over by another project prior to 1960. See text.

PROJECTS, 1960, BY SIZE

Cost of drainage works and services, 1950-1959				New works constructed, enlarged, or installed, 1950-1959									
Total		For new works		Open ditches		Tile or covered drains		Levees and dikes		Pumps		Other, projects reporting	
Projects reporting	Dollars	Projects reporting	Dollars	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Number		
344	29,065,257	206	4,525,825	167	812.9	21	46.0	50	227.4	74	162	42	1
102	1,367,077	78	662,786	69	204.6	6	13.6	20	55.4	18	29	11	2
72	1,863,853	43	604,837	35	118.0	8	9.2	14	43.2	12	13	13	3
72	5,896,932	38	1,232,258	26	168.5	4	8.5	9	56.9	19	40	10	4
55	6,703,709	27	689,709	21	195.2	2	11.5	4	29.4	12	29	4	5
26	4,437,840	14	544,595	12	93.3	...	...	2	19.0	8	23	3	6
8	2,490,090	2	112,587	1	10.0	1	3.2	...	...	2	8	...	7
8	6,105,756	4	679,053	3	23.3	...	...	1	23.5	3	20	1	8
1	200,000	...	...	...	...	...	...	...	...	...	...	...	9

BY TYPE OF ORGANIZATION

Cost of drainage works and services, 1950-1959				New works constructed, enlarged, or installed, 1950-1959									
Total		For new works		Open ditches		Tile or covered drains		Levees and dikes		Pumps		Other, projects reporting	
Projects reporting	Dollars	Projects reporting	Dollars	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Number		
344	29,065,257	206	4,525,825	167	812.9	21	46.0	50	227.4	74	162	42	1
155	4,444,461	103	1,046,141	96	488.1	6	4.8	28	100.8	34	61	26	2
41	1,341,852	37	665,387	29	124.2	10	25.4	3	5.9	2	3	7	3
148	23,278,944	66	2,814,297	42	200.6	5	15.8	19	120.7	38	98	9	4

BY YEAR OF ORGANIZATION

Cost of drainage works and services, 1950-1959				New works constructed, enlarged, or installed, 1950-1959									
Total		For new works		Open ditches		Tile or covered drains		Levees and dikes		Pumps		Other, projects reporting	
Projects reporting	Dollars	Projects reporting	Dollars	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Number		
344	29,065,257	206	4,525,825	167	812.9	21	46.0	50	227.4	74	162	42	1
188	3,664,379	87	2,304,476	79	350.2	12	25.9	22	90.1	9	29	22	2
256	25,400,878	119	2,221,349	88	462.7	9	20.1	28	137.3	65	133	20	3

DRAINAGE OF AGRICULTURAL LANDS

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data.]

Item and Census year	The State	Alameda	Butte	Colusa	Contra Costa	Fresno	Glenn	Kings	Lake
AREA									
1 Approximate land area.....acres 1960...	100,206,720	469,120	1,064,320	737,920	469,760	3,816,960	842,880	892,800	803,840
2 Land in farms.....acres 1959...	36,887,948	311,139	670,119	491,128	287,927	2,286,381	648,569	678,005	252,310
3 Drainage projects..... number 1960...	356	9	12	30	44	5	12	8	4
4 1950...	2,047	11	120	65	54	26	60	15	30
5 Total area in drainage projects ¹ acres served 1960...	1,934,825	26,400	129,421	252,892	56,809	79,888	106,372	59,231	2,542
6 1950...	2,554,576	1,776	156,665	258,742	56,930	86,627	147,132	27,981	2,518
7 Area not used for agriculture or not drained..... acres served 1960...	23,574	...	...	...	...	...	...	...	...
8 Net area drained and used for agriculture..... acres served 1960...	1,911,251	26,400	129,421	252,892	56,809	79,888	106,372	59,231	2,542
9 Drainage established before 1950..... acres served 1960...	1,666,899	12,400	129,421	252,042	56,809	79,888	104,370	59,231	1,992
10 Area added, 1950-1959..... acres served 1960...	244,352	14,000	...	850	...	...	2,002	...	550
11 Area served by two or more projects..... acres served 1960...	106,696	1,000	7,754	21,548	28,209	...	2,234	...	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION									
12 Drains owned by one landowner..... number of projects...	157	...	3	18	30	...	3	...	...
13 acres served ² ...	311,903	...	2,126	45,867	30,845	...	4,555	...	...
14 Cooperative or mutual drains..... number of projects...	45	2	...	1	...	...	...	...	1
15 acres served ² ...	124,511	2,500	...	2,300	...	...	...	...	550
16 Legally organized public drains..... number of projects...	154	7	9	11	14	5	9	8	3
17 acres served ² ...	1,583,133	24,900	136,649	226,273	54,173	79,888	104,051	59,231	1,992
PROJECTS, 1960, BY YEAR STARTED									
18 1960-1959..... number of projects...	87	7	...	2	1	...	2	...	1
19 acres served ² ...	267,081	14,000	...	1,493	1,657	...	4,280	...	550
20 Prior to 1960..... number of projects...	269	2	12	28	43	5	10	8	3
21 acres served ² ...	1,752,466	13,400	138,775	272,947	83,361	79,888	104,326	59,231	1,992
DRAINAGE OPERATIONS, 1950-1959 ³									
22 Cost of drainage works and services.....projects reporting...	344	8	12	29	44	5	10	6	4
23 dollars...	29,065,257	294,146	753,274	1,853,987	1,934,651	603,524	192,600	705,947	162,034
24 New drainage works constructed, enlarged, or installed.....projects reporting...	206	7	1	15	18	1	5	...	4
25 dollars...	4,525,825	216,146	150	217,288	161,878	27,569	51,500	...	47,010
26 Open ditches.....projects reporting...	167	7	...	15	15	1	5	...	4
27 length, miles...	812.9	24.5	...	62.9	92.0	4.0	10.0	...	3.5
28 Tile or covered drains.....projects reporting...	21	...	...	...	...	...	...	...	...
29 length, miles...	46.0	...	...	...	...	...	...	...	...
30 Levees or dikes.....projects reporting...	50	5	...	4	1	...	1	...	2
31 length, miles...	227.4	22.1	...	14.0	6.0	...	1.7	...	0.6
32 Pumps.....projects reporting...	74	...	...	4	6	1	1	...	2
33 number of pumps...	162	...	...	6	11	6	3	...	4
34 Other (see text).....projects reporting...	42	...	1	7	1	...	3	...	...
35 Cost of maintenance, operation, repair, and administration.....projects reporting...	289	1	12	28	44	5	9	6	3
36 dollars...	24,539,432	78,000	753,124	1,636,699	1,772,773	575,955	141,100	705,947	115,024

¹Land served by two or more projects counted only once.
²Acres served by two projects are included for each project. See text.
³Includes projects taken over by another project prior to 1960. See text.

County Table 1. --DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959--Continued

[See text for comparability of 1960 and 1950 data]

Item and Census year	Marin	Mendocino	Merced	Modoc	Monterey	Napa	Orange	Placer	Plumas
AREA									
1 Approximate land area.....acres 1960...	332,800	2,244,480	1,268,480	2,618,880	2,127,360	485,120	500,480	911,360	1,644,800
2 Land in farms.....acres 1959...	227,450	1,057,226	969,504	1,035,911	1,612,991	296,112	345,689	258,825	95,465
3 Drainage projects..... number 1960...	9	2	8	1	5	3	8	5	5
4 1950...	5	12	76	10	35	10	33	14	5
5 Total area in drainage projects ¹ acres served 1960...	8,677	21,600	45,713	3,000	26,955	2,206	87,687	3,776	16,760
6 1950...	4,445	21,804	148,602	33,429	11,619	1,574	91,373	2,140	426
7 Area not used for agriculture or not drained..... acres served 1960...	...	...	...	...	...	...	6,824	...	...
8 Net area drained and used for agriculture..... acres served 1960...	8,677	21,600	45,713	3,000	26,955	2,206	80,863	3,776	16,760
9 Drainage established before 1950..... acres served 1960...	7,157	21,600	43,089	3,000	7,000	...	80,863	2,526	...
10 Area added, 1950-1959..... acres served 1960...	1,520	...	2,624	...	19,955	2,206	...	1,250	16,760
11 Area served by two or more projects..... acres served 1960...	...	...	...	...	...	...	1,000	...	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION									
12 Drains owned by one landowner..... number of projects...	9	...	...	1	2	...	2	4	3
13 acres served ² ..	8,677	...	...	3,000	3,455	...	52,037	1,776	2,600
14 Cooperative or mutual drains..... number of projects...	...	...	4	...	2	3	...	...	2
15 acres served ²..	...	...	5,162	...	18,800	2,206	...	...	14,160
16 Legally organized public drains..... number of projects...	...	2	4	...	1	...	6	1	...
17 acres served ²..	...	21,600	40,551	...	4,700	...	29,826	2,000	...
PROJECTS, 1960, BY YEAR STARTED									
18 1950-1959..... number of projects...	2	...	2	...	3	3	...	2	5
19 acres served ² ..	1,325	...	2,624	...	19,955	2,206	...	1,250	16,760
20 Prior to 1950..... number of projects...	7	2	6	1	2	...	8	3	...
21 acres served ² ..	7,352	21,600	43,089	3,000	7,000	...	81,863	2,526	...
DRAINAGE OPERATIONS, 1950-1959 ³									
22 Cost of drainage works and services..... projects reporting...	9	1	5	(⁴)	5	3	8	5	5
23 dollars...	169,009	32,000	492,238	(⁴)	245,184	120,000	439,632	36,602	75,255
24 New drainage works constructed, enlarged, or installed..... projects reporting...	7	...	5	...	3	3	3	3	4
25 dollars...	115,332	...	110,284	...	22,120	110,000	134,967	3,985	62,255
26 Open ditches..... projects reporting...	7	...	4	...	3	3	1	3	4
27 length, miles...	61.1	...	6.7	...	8.2	9.5	3.1	2.7	18.1
28 Tile or covered drains..... projects reporting...	...	...	1	...	...	...	2	...	...
29 length, miles...	...	...	3.2	...	...	...	13.5	...	...
30 Levees or dikes..... projects reporting...	7	...	...	...	1	1	...	...	1
31 length, miles...	29.0	...	...	...	3.5	0.5	...	...	1.4
32 Pumps..... projects reporting...	5	...	2	...	1	...	1	...	...
33 number of pumps...	13	...	5	...	2	...	3	...	...
34 Other (see text)..... projects reporting...	2	...	1	...	2	...	...	1	2
35 Cost of maintenance, operation, repair, and administration..... projects reporting...	6	1	4	(⁴)	2	1	7	3	5
36 dollars...	53,677	32,000	381,954	(⁴)	223,064	10,000	304,665	32,617	13,000

¹Land served by two or more projects counted only once.
²Acres served by two projects are included for each project. See text.
³Includes projects taken over by another project prior to 1960. See text.
⁴Included in State total only.

DRAINAGE OF AGRICULTURAL LANDS

County Table 1.—DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959—Continued

[See text for comparability of 1960 and 1950 data]

Item and Census year	Riverside	Sacramento	San Benito	San Joaquin	San Luis Obispo	Santa Barbara	Santa Clara	Santa Cruz	Sierra
AREA									
1 Approximate land area.....acres 1960...	4,593,280	629,120	893,440	¹ 901,760	2,122,240	1,752,320	833,280	280,960	613,120
2 Land in farms.....acres 1959...	801,430	546,988	750,447	¹ 924,893	1,687,216	937,523	529,489	108,984	92,189
3 Drainage projects.....number 1960...	3	25	6	59	2	1	10	2	1
4.....1950...	14	254	5	251	18	22	19	34	2
5 Total area in drainage projects ².....acres served 1960...	2,900	119,173	7,839	183,914	2,205	5,230	48,111	60,000	6,000
6.....1950...	11,914	160,652	110	329,572	7,608	5,881	5,514	3,140	600
7 Area not used for agriculture or not drained.....acres served 1960...	...	...	...	...	...	...	7,250	1,100	...
8 Net area drained and used for agriculture.....acres served 1960...	2,900	119,173	7,839	183,914	2,205	5,230	40,861	58,900	6,000
9 Drainage established before 1950.....acres served 1960...	1,800	117,863	650	176,835	2,205	5,230	13,626	1,877	...
10 Area added, 1950-1959.....acres served 1960...	1,100	1,310	7,189	7,079	...	...	27,235	57,023	6,000
11 Area served by two or more projects.....acres served 1960...	...	3,506	1,150	6,826	...	...	...	1,877	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION									
12 Drains owned by one landowner.....number of projects...	1	7	1	33	1	1	2	...	1
13.....acres served ³ ...	1,000	6,164	639	70,356	420	5,230	8,685	...	6,000
14 Cooperative or mutual drains.....number of projects...	1	2	5	2	...	...	1	...	...
15.....acres served ³ ...	1,100	1,310	8,350	3,185	...	...	12,500	...	...
16 Legally organized public drains.....number of projects...	1	16	...	24	1	...	7	2	...
17.....acres served ³ ...	800	115,205	...	117,199	1,785	...	19,676	60,777	...
PROJECTS, 1960, BY YEAR STARTED									
18 1950-1959.....number of projects...	1	2	5	3	...	...	8	1	1
19.....acres served ³ ...	1,100	1,310	8,339	6,779	...	...	27,235	58,900	6,000
20 Prior to 1950.....number of projects...	2	23	1	56	2	1	2	1	...
21.....acres served ³ ...	1,800	121,369	650	183,961	2,205	5,230	13,626	1,877	...
DRAINAGE OPERATIONS, 1950-1959 ⁴									
22 Cost of drainage works and services.....projects reporting...	3	23	5	58	2	1	9	2	(⁵)
23.....dollars...	43,248	2,830,121	34,562	5,827,009	191,759	40,000	936,261	1,398,679	(⁵)
24 New drainage works constructed, enlarged, or installed.....projects reporting...	(⁵)	12	5	28	...	...	8	1	(⁵)
25.....dollars...	(⁵)	153,011	34,262	516,458	...	...	746,211	327,768	(⁵)
26 Open ditches.....projects reporting...	...	4	5	20	...	...	8	1	(⁵)
27.....length, miles...	...	3.5	9.6	152.8	...	...	18.4	14.2	(⁵)
28 Tile or covered drains.....projects reporting...	(⁵)	1	...	2	...	...	2	...	...
29.....length, miles...	(⁵)	1.3	...	0.2	...	...	1.1	...	...
30 Levees or dikes.....projects reporting...	...	2	...	9	...	...	4	1	...
31.....length, miles...	...	1.8	...	77.0	...	...	12.5	23.5	...
32 Pumps.....projects reporting...	...	7	...	21	...	...	...	1	...
33.....number of pumps...	...	8	...	45	...	...	...	12	...
34 Other (see text).....projects reporting...	...	2	...	2	...	...	2	1	(⁵)
35 Cost of maintenance, operation, repair, and administration.....projects reporting...	3	21	1	58	2	1	3	2	(⁵)
36.....dollars...	8,409	2,677,110	300	5,310,551	191,759	40,000	190,050	1,070,911	(⁵)

¹The excess of farm acreage over approximate land area is due to the fact that the entire acreage of a farm is tabulated as in the county in which the headquarters is located, even though a part of the farm may be situated in an adjoining county.

²Land served by two or more projects counted only once.

³Acres served by two projects are included for each project. See text.

⁴Includes projects taken over by another project prior to 1960. See text.

⁵Included in State total only.

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959--Continued

[See text for comparability of 1960 and 1950 data.]

Item and Census year	Solano	Sanoma	Stanislaus	Sutter	Ventura	Yolo	Yuba	All other counties ¹
AREA								
1 Approximate land area.....acres 1960...	529,280	1,010,560	960,000	388,480	1,184,640	661,760	407,680	58,418,560
2 Land in farms.....acres 1959...	477,975	763,847	847,395	406,563	449,265	566,199	261,589	14,512,659
3 Drainage projects.....number 1960...	30	13	10	22	4	30	3	...
4 1950...	53	20	35	278	122	88	26	275
5 Total area in drainage projects ².....acres served 1960...	91,657	16,411	13,981	196,504	20,404	194,286	36,281	...
6 1950...	74,872	3,981	178,736	265,973	41,412	198,434	38,523	173,871
7 Area not used for agriculture or not drained.....acres served 1960...	1,920	...	...	...	500	3,100	2,880	...
8 Net area drained and used for agriculture.....acres served 1960...	89,737	16,411	13,981	196,504	19,904	191,186	33,401	...
9 Drainage established before 1950.....acres served 1960...	58,613	14,896	3,105	193,434	19,904	162,072	33,401	...
10 Area added, 1950-1959.....acres served 1960...	31,124	1,515	10,876	3,070	...	29,114	...	...
11 Area served by two or more projects.....acres served 1960...	10,418	...	...	7,582	800	12,792	...	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION								
12 Drains owned by one landowner.....number of projects...	14	10	...	8	1	9	...	...
13 acres served ³ ...	16,582	9,238	...	10,759	800	21,092	...	...
14 Cooperative or mutual drains.....number of projects...	3	1	10	2	...	5	...	...
15 acres served ³ ...	23,640	673	13,981	3,180	...	10,914	...	...
16 Legally organized public drains.....number of projects...	13	2	...	12	3	16	3	...
17 acres served ³ ...	59,933	6,500	...	190,147	19,904	171,972	33,401	...
PROJECTS, 1960, BY YEAR STARTED								
18 1950-1959.....number of projects...	15	2	8	4	...	11	...	...
19 acres served ² ...	40,667	1,515	10,876	3,830	...	34,430	...	...
20 Prior to 1950.....number of projects...	15	11	2	18	4	19	3	...
21 acres served ³ ...	59,488	14,896	3,105	200,256	20,704	169,548	33,401	...
DRAINAGE OPERATIONS, 1950-1959 ⁴								
22 Cost of drainage works and services.....projects reporting...	31	13	10	22	4	29	3	...
23 dollars...	1,836,849	184,877	269,764	2,681,217	318,150	3,859,568	468,110	...
24 New drainage works constructed, enlarged, or installed.....projects reporting...	26	13	9	11	1	18	1	...
25 dollars...	373,934	130,568	240,114	417,869	12,000	196,493	58,064	...
26 Open ditches.....projects reporting...	22	13	2	10	...	16	...	...
27 length, miles...	127.9	53.6	3.3	30.6	...	91.7	...	...
28 Tile or covered drains.....projects reporting...	...	...	9	2	1	...	...	...
29 length, miles...	...	...	23.4	0.3	1.0	...	...	...
30 Levees or dikes.....projects reporting...	2	8	...	...	...	1	...	...
31 length, miles...	8.5	21.7	...	...	...	3.6	...	...
32 Pumps.....projects reporting...	8	8	1	2	...	5	1	...
33 number of pumps...	11	11	1	5	...	14	2	...
34 Other (see text).....projects reporting...	1	4	3	4	...	2	...	...
35 Cost of maintenance, operation, repair, and administration.....projects reporting...	24	9	6	20	4	22	3	...
36 dollars...	1,462,915	54,309	29,650	2,263,348	306,150	3,663,075	410,046	...

¹Includes Alpine, Calaveras, Del Norte, El Dorado, Humboldt, Imperial, Inyo, Kern, Lassen, Los Angeles, Madera, Mono, Nevada, San Bernardino, San Diego, San Mateo, Shasta, Siskiyou, Tehama, Trinity, and Tulare counties.

²Land served by two or more projects counted only once.

³Acres served by two projects are included for each project. See text.

⁴Includes projects taken over by another project prior to 1960. See text.

State Table 1.—DRAINAGE PROJECTS—NUMBER, AREA, COST, AND WORKS, 1920 TO 1960

[See text for comparability of data]

Item	1960 Census	1950 Census	1940 Census	1930 Census	1920 Census
AREA					
Approximate land area.....acres...	66,485,760	66,510,080	66,538,880	66,341,120	66,341,120
Land in farms.....acres...	38,787,312	37,953,099	31,527,240	28,876,171	24,462,014
Drainage projects.....number...	16	630	56	NA	NA
Total area in drainage projects.....acres served...	55,496	623,976	468,322	366,719	171,656
Area not used for agriculture or not drained.....acres served...	...	NA	NA	NA	NA
Net area drained and used for agriculture.....acres served...	55,496	NA	¹ 392,132	¹ 305,966	NA
Drainage established 10 years or more before Census date.....acres served...	55,496	NA	NA	NA	NA
Drainage established within 10 years of Census date.....acres served...	...	NA	NA	NA	NA
Area served by two or more projects.....acres served...	...	1,080	972	640	...
PROJECTS BY TYPE OF ORGANIZATION					
Drains owned by one landowner.....number of projects...	3	² 8	NA	NA	NA
acres served...	2,638	² 21,421	² 25,291	² 17,351	33,630
Cooperative or mutual drains.....number of projects...	3	² 4	...	...	...
acres served...	5,610	² 27,190	...	...	...
Legally organized public drains.....number of projects...	10	² 39	NA	NA	NA
acres served...	47,248	² 255,753	² 255,709	² 250,238	138,026
PROJECTS BY YEAR STARTED					
Started 10 years or more before Census date.....number of projects...	16	² 48	NA	NA	...
acres served...	55,496	² 292,174	393,363	175,486	...
Started within 10 years of Census date.....number of projects...	...	² 3	NA	NA	NA
acres served...	...	² 12,190	74,959	191,233	171,656
OPERATIONS, 10-YEAR PERIOD PRECEDING CENSUS DATE					
Cost of drainage works and services.....projects reporting...	15	² 47	NA	NA	NA
dollars...	178,196	773,236	NA	NA	NA
New drainage works constructed, enlarged, or installed.....projects reporting...	3	³ 5	NA	NA	NA
cost, dollars...	3,750	³ 23,445	NA	NA	NA
Open ditches.....projects reporting...	1	4	NA	NA	NA
length, miles...	0.3	11	NA	NA	NA
Tile or covered drains.....projects reporting...	1	1	NA	NA	NA
length, miles...	0.4	1	NA	NA	NA
Levees or dikes.....projects reporting...	...	1	NA	NA	NA
length, miles...	...	1	NA	NA	NA
Pumps.....projects reporting...	1	NA	NA	NA	NA
number of pumps...	1	NA	NA	NA	NA
Other (see text).....projects reporting...	1	NA	NA	NA	NA
Cost of maintenance, operation, repair, and administration.....projects reporting...	14	NA	NA	NA	NA
dollars...	174,446	749,791	NA	NA	NA
STATUS ON CENSUS DATE					
Capital investment.....dollars...	NA	NA	4,890,317	4,358,866	1,081,875
Physical works:					
Open ditches.....length, miles...	NA	NA	972.9	814.9	132.5
Tile drains.....length, miles...	NA	NA	365.3	369.5	195.2
Levees and dikes.....length, miles...	NA	NA	...	...	...
Pumping units.....number of units...	NA	(²)	4	...	...

NA Not available.

¹Not fully comparable. See text.

²1950 figures exclude 579 projects and 319,612 acres in "irrigation enterprises"; 1940 figures exclude 187,322 acres in "irrigation enterprises"; 1930 figures exclude 99,130 acres in "irrigation enterprises."

³Cost of new works for lands not previously drained.

DRAINAGE OF AGRICULTURAL LANDS

State Table 2.—DRAINAGE

	Size of project (Based on area of agricultural land in project)	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	16	55,496	...	16	55,496	...	...
2	500 to 999 acres.....	4	2,892	...	4	2,892	...	...
3	1,000 to 1,999 acres.....	4	5,930	...	4	5,930	...	...
4	2,000 to 4,999 acres.....	4	11,464	...	4	11,464	...	...
5	5,000 to 9,999 acres.....	4	35,210	...	4	35,210	...	...
6	10,000 to 19,999 acres.....	...	...	...	...	...	...	...
7	20,000 to 49,999 acres.....	...	...	...	...	...	...	...
8	50,000 to 99,999 acres.....	...	...	...	...	...	...	...
9	100,000 or more acres.....	...	...	...	...	...	...	...

State Table 3.—DRAINAGE PROJECTS, 1960,

	Type of organization	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	16	55,496	...	16	55,496	...	...
2	Drains owned by one landowner.....	3	2,638	...	3	2,638	...	...
3	Cooperative or mutual drains.....	3	5,610	...	3	5,610	...	...
4	Legally organized public drains.....	10	47,248	...	10	47,248	...	...

State Table 4.—DRAINAGE PROJECTS, 1960,

	Year of organization	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	16	55,496	...	16	55,496	...	...
2	1950-1959.....	...	...	...	...	...	...	...
3	Prior to 1950.....	16	55,496	...	16	55,496	...	...

PROJECTS, 1960, BY SIZE

Cost of drainage works and services, 1950-1959				New works constructed, enlarged, or installed, 1950-1959									
Total		For new works		Open ditches		Tile or covered drains		Levees and dikes		Pumps		Other, projects reporting	
Projects reporting	Dollars	Projects reporting	Dollars	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Number		
15	178,196	3	3,750	1	0.3	1	0.4	...	...	1	1	1	1
4	14,297	2	3,000	1	0.3	1	0.4	...	...	1	1	...	2
3	10,229	1	750	...	...	...	...	...	...	...	...	1	3
4	45,500	...	...	...	...	...	...	...	...	...	...	...	4
4	108,170	...	...	...	...	...	...	...	...	...	...	...	5
...	...	...	...	...	...	...	...	...	...	...	...	...	6
...	...	...	...	...	...	...	...	...	...	...	...	...	7
...	...	...	...	...	...	...	...	...	...	...	...	...	8
...	...	...	...	...	...	...	...	...	...	...	...	...	9

BY TYPE OF ORGANIZATION

Cost of drainage works and services, 1950-1959				New works constructed, enlarged, or installed, 1950-1959									
Total		For new works		Open ditches		Tile or covered drains		Levees and dikes		Pumps		Other, projects reporting	
Projects reporting	Dollars	Projects reporting	Dollars	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Number		
15	178,196	3	3,750	1	0.3	1	0.4	...	...	1	1	1	1
3	6,269	1	500	1	0.3	...	...	...	...	...	...	...	2
2	20,297	...	...	...	...	...	...	...	...	...	...	...	3
10	151,630	2	3,250	...	...	1	0.4	...	...	1	1	1	4

BY YEAR OF ORGANIZATION

Cost of drainage works and services, 1950-1959				New works constructed, enlarged, or installed, 1950-1959									
Total		For new works		Open ditches		Tile or covered drains		Levees and dikes		Pumps		Other, projects reporting	
Projects reporting	Dollars	Projects reporting	Dollars	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Number		
15	178,196	3	3,750	1	0.3	1	0.4	...	...	1	1	1	1
...	...	...	...	...	...	...	...	...	...	...	...	...	2
15	178,196	3	3,750	1	0.3	1	0.4	...	...	1	1	1	3

DRAINAGE OF AGRICULTURAL LANDS

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	The State	Alamosa	Conejos	Crowley	Gunnison	Larimer	Logan
AREA							
1 Approximate land area.....acres 1960...	66,485,760	460,800	812,160	513,920	2,072,320	1,672,960	1,169,280
2 Land in farms.....acres 1959...	38,787,312	429,526	574,943	424,904	251,640	770,520	1,088,862
3 Drainage projects..... number 1960...	16	1	2	2	1	1	2
4	630	29	31	24	27	36	13
5 Total area in drainage projects ¹ acres served 1960...	55,496	640	10,590	12,463	758	3,000	3,161
6	623,976	26,086	53,151	52,294	3,514	9,267	13,020
7 Area not used for agriculture or not drained..... acres served 1960...	...	...	...	...	...	...	...
8 Net area drained and used for agriculture..... acres served 1960...	55,496	640	10,590	12,463	758	3,000	3,161
9 Drainage established before 1950..... acres served 1960...	55,496	640	10,590	12,463	758	3,000	3,161
10 Area added, 1950-1959..... acres served 1960...	...	...	...	...	...	...	...
11 Area served by two or more projects..... acres served 1960...	...	...	...	...	...	...	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION							
12 Drains owned by one landowner..... number of projects...	3	...	...	...	1	...	...
13	2,638	...	...	...	758	...	...
14 Cooperative or mutual drains..... number of projects...	3	...	...	...	...	1	1
15	5,610	...	...	...	...	3,000	960
16 Legally organized public drains..... number of projects...	10	1	2	2	...	...	1
17	47,248	640	10,590	12,463	...	...	2,201
PROJECTS, 1960, BY YEAR STARTED							
18 1960-1959..... number of projects...	...	...	...	...	...	...	...
19 .....	...	...	...	...	...	...	...
20 Prior to 1960..... number of projects...	16	1	2	2	1	1	2
21	55,496	640	10,590	12,463	758	3,000	3,161
DRAINAGE OPERATIONS, 1950-1959 ³							
22 Cost of drainage works and services..... projects reporting...	15	1	2	2	(4)	(4)	(4)
23	178,196	5,000	35,545	41,770	(4)	(4)	(4)
24 New drainage works constructed, enlarged, or installed..... projects reporting...	3	...	...	...	(4)	...	...
25	3,750	...	...	...	(4)	...	...
26 Open ditches..... projects reporting...	1	...	...	...	(4)	...	...
27	0.3	...	...	...	(4)	...	...
28 Tile or covered drains..... projects reporting...	1	...	...	...	...	...	...
29	0.4	...	...	...	...	...	...
30 Levees or dikes..... projects reporting...	...	...	...	...	...	...	...
31 .....	...	...	...	...	...	...	...
32 Pumps..... projects reporting...	1	...	...	...	...	...	...
33	1	...	...	...	...	...	...
34 Other (see text)..... projects reporting...	1	...	...	...	...	...	...
35 Cost of maintenance, operation, repair, and administration..... projects reporting...	14	1	2	2	...	(4)	(4)
36	174,446	5,000	35,545	41,770	...	(4)	(4)

¹Land served by two or more projects counted only once.²Acres served by two projects are included for each project. See text.³Includes projects taken over by another project prior to 1960. See text.⁴Included in State total only.

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1960 data]

Item and Census year	Mesa	Montrose	Otero	Prowers	Rio Grande	Saguache	All other counties ¹
AREA							
1 Approximate land area.....acres 1960...	2,119,680	1,432,960	² 810,880	1,040,640	586,240	2,012,160	36,108,160
2 Land in farms.....acres 1959...	713,603	585,145	² 842,944	924,330	206,064	502,599	20,778,262
3 Drainage projects..... number 1960...	1	1	2	2	2	1	...
4 1950...	14	18	17	41	24	29	359
5 Total area in drainage projects ³ acres served 1960...	574	1,650	10,020	8,600	2,440	1,600	...
6 1950...	100,447	29,365	39,708	64,860	99,829	47,888	84,547
7 Area not used for agriculture or not drained..... acres served 1960...	...	...	...	...	...	...	...
8 Net area drained and used for agriculture..... acres served 1960...	574	1,650	10,020	8,600	2,440	1,600	...
9 Drainage established before 1950..... acres served 1960...	574	1,650	10,020	8,600	2,440	1,600	...
10 Area added, 1950-1959..... acres served 1960...	...	...	...	...	...	...	...
11 Area served by two or more projects..... acres served 1960...	...	...	...	...	...	...	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION							
12 Drains owned by one landowner..... number of projects...	...	...	...	1	1	...	...
13 acres served ⁴...	...	...	...	600	1,280	...	...
14 Cooperative or mutual drains..... number of projects...	...	1	...	...	...	...	...
15 acres served ⁴...	...	1,650	...	...	...	...	...
16 Legally organized public drains..... number of projects...	1	...	2	1	1	1	...
17 acres served ⁴ ...	574	...	10,020	8,000	1,160	1,600	...
PROJECTS, 1960, BY YEAR STARTED							
18 1950-1959..... number of projects...	...	...	...	...	...	...	...
19 acres served ⁴...	...	...	...	...	...	...	...
20 Prior to 1950..... number of projects...	1	1	2	2	2	1	...
21 acres served ⁴ ...	574	1,650	10,020	8,600	2,440	1,600	...
DRAINAGE OPERATIONS, 1950-1959⁵							
22 Cost of drainage works and services.....projects reporting...	1	...	2	(⁶)	(⁶)	1	...
23 dollars...	9,500	...	32,315	(⁶)	(⁶)	5,000	...
24 New drainage works constructed, enlarged, or installed.....projects reporting...	1	...	1	...	...	...	...
25 dollars...	2,500	...	750	...	...	...	...
26 Open ditches.....projects reporting...	...	...	...	...	...	...	...
27 length, miles...	...	...	...	...	...	...	...
28 Tile or covered drains.....projects reporting...	1	...	...	...	...	...	...
29 length, miles...	0.4	...	...	...	...	...	...
30 Levees or dikes.....projects reporting...	...	...	...	...	...	...	...
31 length, miles...	...	...	...	...	...	...	...
32 Pumps.....projects reporting...	1	...	...	...	...	...	...
33 number of pumps...	1	...	...	...	...	...	...
34 Other (see text).....projects reporting...	...	...	1	...	...	...	...
35 Cost of maintenance, operation, repair, and administration.....projects reporting...	1	...	2	(⁶)	(⁶)	1	...
36 dollars...	7,000	...	31,565	(⁶)	(⁶)	5,000	...

¹Includes Adams, Arapahoe, Archuleta, Bent, Boulder, Chaffee, Costilla, Custer, Delta, Denver, Dolores, Eagle, El Paso, Fremont, Garfield, Grand, Huerfano, Jackson, Jefferson, La Plata, Las Animas, Moffat, Montezuma, Morgan, Ouray, Pitkin, Pueblo, Rio Blanco, Routt, Summit, Washington, and Weld counties.
²The excess of farm acreage over approximate land area is due to the fact that the entire acreage of a farm is tabulated as in the county in which the headquarters is located, even though a part of the farm may be situated in an adjoining county.
³Land served by two or more projects counted only once.
⁴Acres served by two projects are included for each project. See text.
⁵Includes projects taken over by another project prior to 1960. See text.
⁶Included in State total only.

State Table 1.—DRAINAGE PROJECTS—NUMBER, AREA, COST, AND WORKS, 1920 TO 1960

[See text for comparability of data]

Item	1960 Census	1950 Census	1940 Census	1930 Census	1920 Census
AREA					
Approximate land area.....acres...	1,265,920	1,265,920	1,265,920	1,257,600	1,257,600
Land in farms.....acres...	762,526	851,291	895,507	900,815	944,511
Drainage projects.....number...	60	¹ 2	287	...	...
Total area in drainage projects.....acres served...	356,702	352,547	395,014	...	...
Area not used for agriculture or not drained.....acres served...	15,780	NA	NA	...	...
Net area drained and used for agriculture.....acres served...	340,922	NA	² 394,164	...	...
Drainage established 10 years or more before Census date.....acres served...	340,066	NA	NA	...	...
Drainage established within 10 years of Census date.....acres served...	856	NA	NA	...	...
Area served by two or more projects.....acres served...	600	NA	458,548	...	...
PROJECTS BY TYPE OF ORGANIZATION					
Drains owned by one landowner.....number of projects...	...	(¹)	...	...	...
acres served...	...	(¹)	...	...	...
Cooperative or mutual drains.....number of projects...	1	(¹)	...	...	...
acres served...	780	(¹)	...	...	...
Legally organized public drains.....number of projects...	59	¹ 2	...	...	...
acres served...	340,742	¹ 352,547	395,014	...	...
PROJECTS BY YEAR STARTED					
Started 10 years or more before Census date.....number of projects...	50	NA	NA	...	...
acres served...	318,700	NA	280,632	...	...
Started within 10 years of Census date.....number of projects...	10	NA	NA	...	...
acres served...	22,822	NA	114,382	...	...
OPERATIONS, 10-YEAR PERIOD PRECEDING CENSUS DATE					
Cost of drainage works and services.....projects reporting...	48	2	NA	...	...
dollars...	476,944	173,300	NA	...	...
New drainage works constructed, enlarged, or installed.....projects reporting...	33	³ 1	NA	...	...
cost, dollars...	399,511	³ 3,326	NA	...	...
Open ditches.....projects reporting...	33	1	NA	...	...
length, miles...	215.7	2	NA	...	...
Tile or covered drains.....projects reporting...	...	...	NA	...	...
length, miles...	...	...	NA	...	...
Levees or dikes.....projects reporting...	...	...	NA	...	...
length, miles...	...	...	NA	...	...
Pumps.....projects reporting...	...	NA	NA	...	...
number of pumps...	...	NA	NA	...	...
Other (see text).....projects reporting...	...	NA	NA	...	...
Cost of maintenance, operation, repair, and administration.....projects reporting...	25	2	NA	...	...
dollars...	77,433	169,974	NA	...	...
STATUS ON CENSUS DATE					
Capital investment.....dollars...	NA	NA	454,883	...	...
Physical works:					
Open ditches.....length, miles...	NA	NA	1,482.3	...	...
Tile drains.....length, miles...	NA	NA	...	...	...
Levees and dikes.....length, miles...	NA	NA	...	...	...
Pumping units.....number of units...	NA	NA	...	...	...

NA Not available.

¹In 1950 all drains within a county were counted as one combined project. See text.

²Not fully comparable. See text.

³Cost of new works for lands not previously drained.

DRAINAGE OF AGRICULTURAL LANDS

State Table 2.—DRAINAGE

	Size of project (Based on area of agricultural land in project)	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	60	341,522	1,200	59	340,666	2	856
2	500 to 999 acres.....	18	11,961	600	17	11,371	1	590
3	1,000 to 1,999 acres.....	24	31,948	...	24	31,682	1	266
4	2,000 to 4,999 acres.....	14	51,448	600	14	51,448	...	...
5	5,000 to 9,999 acres.....	1	6,346	...	1	6,346	...	...
6	10,000 to 19,999 acres.....	1	11,700	...	1	11,700	...	...
7	20,000 to 49,999 acres.....	...	...	...	...	...	...	...
8	50,000 to 99,999 acres.....	...	...	...	...	...	...	...
9	100,000 or more acres.....	12	228,119	...	2	228,119	...	...

¹The area within each county served by drains for which there is now no active management, was counted as one combined project. See text.

State Table 3.—DRAINAGE PROJECTS, 1960,

	Type of organization	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	60	341,522	1,200	59	340,666	2	856
2	Drains owned by one landowner.....	...	...	...	...	...	...	...
3	Cooperative or mutual drains.....	1	780	...	1	780	...	...
4	Legally organized public drains.....	59	340,742	1,200	58	339,886	2	856

State Table 4.—DRAINAGE PROJECTS, 1960,

	Year of organization	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	60	341,522	1,200	59	340,666	2	856
2	1950-1959.....	10	22,822	...	9	22,232	1	590
3	Prior to 1950.....	50	318,700	1,200	50	318,434	1	266

DRAINAGE OF AGRICULTURAL LANDS

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year		The State	Kent	Sussex	Item and Census year		The State	Kent	Sussex
AREA					PROJECTS, 1960, BY YEAR STARTED				
1	Approximate land area.....acres 1960...	1,265,920	380,800	605,440	18	1950-1959.....number of projects...	10	3	7
2	Land in farms.....acres 1959...	762,526	251,934	380,942	19	acres served ² ..	22,822	8,996	13,826
3	Drainage projects.....number 1960...	60	7	53	20	Prior to 1950.....number of projects...	50	4	46
4	1950...	2	1	1	21	acres served ² ..	318,700	125,793	192,907
PROJECTS, 1960, BY TYPE OF ORGANIZATION					DRAINAGE OPERATIONS, 1950-1959 ³				
5	Total area in drainage projects ¹.....acres served 1960...	356,702	134,789	221,913	22	Cost of drainage works and services.....projects reporting...	48	6	42
6	1950...	352,547	133,129	219,418	23	dollars...	476,944	111,546	365,398
7	Area not used for agriculture or not drained.....acres served 1960...	15,780	...	15,780	24	New drainage works constructed, enlarged, or installed.....projects reporting...	33	6	27
8	Net area drained and used for agriculture.....acres served 1960...	340,922	134,789	206,133	25	dollars...	399,511	106,156	293,355
9	Drainage established before 1950.....acres served 1960...	340,066	134,789	205,277	26	Open ditches.....projects reporting...	33	6	27
10	Area added, 1950-1959.....acres served 1960...	856	...	856	27	length, miles...	215.7	45.6	170.1
11	Area served by two or more projects.....acres served 1960...	600	...	600	28	Tile or covered drains.....projects reporting...	...	...	...
					29	length, miles...	...	...	...
					30	Levees or dikes.....projects reporting...	...	...	...
					31	length, miles...	...	...	...
12	Drains owned by one landowner.....number of projects...	...	...	...	32	Pumps.....projects reporting...	...	...	...
13	acres served ²..	...	...	...	33	number of pumps...	...	...	...
14	Cooperative or mutual drains.....number of projects...	1	1	...	34	Other (see text).....projects reporting...	...	...	...
15	acres served ² ..	780	780	...	35	Cost of maintenance, operation, repair, and administration.....projects reporting...	25	2	23
16	Legally organized public drains.....number of projects...	59	6	53	36	dollars...	77,433	5,390	72,043
17	acres served ² ..	340,742	134,009	206,733					

¹Land served by two or more projects counted only once.²Acres served by two projects are included for each project. See text.³Includes projects taken over by another project prior to 1960. See text.

State Table 1.—DRAINAGE PROJECTS—NUMBER, AREA, COST, AND WORKS, 1920 TO 1960

[See text for comparability of data]

Item	1960 Census	1950 Census	1940 Census	1930 Census	1920 Census
AREA					
Approximate land area.....acres...	34,721,280	34,727,680	34,727,680	35,111,040	35,111,040
Land in farms.....acres...	15,236,521	16,527,536	8,337,708	5,026,617	6,046,691
Drainage projects.....number...	516	1,889	101	NA	NA
Total area in drainage projects.....acres served...	9,222,517	6,083,676	5,699,022	5,954,934	1,637,073
Area not used for agriculture or not drained.....acres served...	4,367,190	NA	NA	NA	NA
Not area drained and used for agriculture.....acres served...	4,855,327	NA	¹ 614,220	¹ 398,200	NA
Drainage established 10 years or more before Census date.....acres served...	4,306,371	NA	NA	NA	NA
Drainage established within 10 years of Census date.....acres served...	548,956	NA	NA	NA	NA
Area served by two or more projects.....acres served...	1,353,192	1,103,349	764,424	1,418,693	122,868
PROJECTS BY TYPE OF ORGANIZATION					
Drains owned by one landowner.....number of projects...	388	² 122	NA	NA	NA
acres served...	1,836,408	² 385,291	22,640	105,533	118,890
Cooperative or mutual drains.....number of projects...	36	² 13	...	...	...
acres served...	274,431	² 118,476	...	...	...
Legally organized public drains.....number of projects...	92	² 103	NA	NA	NA
acres served...	4,237,652	² 5,430,151	5,676,382	5,849,401	1,518,183
PROJECTS BY YEAR STARTED					
Started 10 years or more before Census date.....number of projects...	319	² 107	NA	NA	NA
acres served...	5,520,054	² 5,432,410	5,678,886	5,438,486	6,970
Started within 10 years of Census date.....number of projects...	197	² 131	NA	NA	NA
acres served...	828,437	² 501,508	20,136	516,448	1,630,103
OPERATIONS, 10-YEAR PERIOD PRECEDING CENSUS DATE					
Cost of drainage works and services.....projects reporting...	450	² 207	NA	NA	NA
dollars...	91,627,636	18,602,511	NA	NA	NA
New drainage works constructed, enlarged, or installed.....projects reporting...	338	³ 63	NA	NA	NA
cost, dollars...	68,012,516	³ 2,707,207	NA	NA	NA
Open ditches.....projects reporting...	327	145	NA	NA	NA
length, miles...	10,554.6	2,263	NA	NA	NA
Tile or covered drains.....projects reporting...	9	4	NA	NA	NA
length, miles...	23.2	16	NA	NA	NA
Levees or dikes.....projects reporting...	119	97	NA	NA	NA
length, miles...	1,198.1	661	NA	NA	NA
Pumps.....projects reporting...	139	NA	NA	NA	NA
number of pumps...	548	NA	NA	NA	NA
Other (see text).....projects reporting...	28	NA	NA	NA	NA
Cost of maintenance, operation, repair, and administration.....projects reporting...	312	NA	NA	NA	NA
dollars...	23,615,120	15,895,304	NA	NA	NA
STATUS ON CENSUS DATE					
Capital investment.....dollars...	NA	NA	43,356,692	45,487,795	13,846,807
Physical works:					
Open ditches.....length, miles...	NA	NA	5,022.1	5,112.6	1,990.8
Tile drains.....length, miles...	NA	NA	...	...	...
Levees and dikes.....length, miles...	NA	NA	470.6	718.4	66.2
Pumping units.....number of units...	NA	² 354	68	37	NA

NA Not available.

¹Not fully comparable. See text.

²1950 figures exclude 1,651 projects and 149,758 acres in "irrigation enterprises."

³Cost of new works for lands not previously drained.

DRAINAGE OF AGRICULTURAL LANDS

State Table 2.—DRAINAGE

	Size of project (Based on area of agricultural land in project)	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	516	6,348,491	2,846,356	398	5,783,196	152	565,295
2	500 to 999 acres.....	148	101,911	51,503	99	69,467	53	32,444
3	1,000 to 1,999 acres.....	109	147,268	69,044	78	103,931	40	43,337
4	2,000 to 4,999 acres.....	107	340,809	158,109	85	253,420	28	87,389
5	5,000 to 9,999 acres.....	66	473,168	158,720	57	372,429	15	100,739
6	10,000 to 19,999 acres.....	38	531,642	224,744	35	468,666	8	62,976
7	20,000 to 49,999 acres.....	31	851,598	290,451	28	768,398	4	83,200
8	50,000 to 99,999 acres.....	13	909,054	257,828	12	757,044	3	152,010
9	100,000 or more acres.....	4	2,993,041	1,635,957	4	2,989,841	1	3,200

State Table 3.—DRAINAGE PROJECTS, 1960,

	Type of organization	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	516	6,348,491	2,846,356	398	5,783,196	152	565,295
2	Drains owned by one landowner.....	388	1,836,408	616,229	285	1,426,544	129	409,864
3	Cooperative or mutual drains.....	36	274,431	113,125	24	184,798	18	89,633
4	Legally organized public drains.....	92	4,237,652	2,117,002	89	4,171,854	5	65,798

State Table 4.—DRAINAGE PROJECTS, 1960,

	Year of organization	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	516	6,348,491	2,846,356	398	5,783,196	152	565,295
2	1950-1959.....	197	828,437	321,438	79	326,869	132	501,568
3	Prior to 1950.....	319	5,520,054	2,524,918	319	5,456,327	20	63,727

PROJECTS, 1960, BY SIZE

Cost of drainage works and services, 1950-1959				New works constructed, enlarged, or installed, 1950-1959									
Total		For new works		Open ditches		Tile or covered drains		Levees and dikes		Pumps		Other, projects reporting	
Projects reporting	Dollars	Projects reporting	Dollars	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Number		
450	91,627,636	338	68,012,516	327	10,554.6	9	23.2	119	1,198.1	139	548	28	1
133	2,728,241	100	1,226,231	96	1,004.6	4	2.6	29	115.4	37	86	4	2
98	2,657,519	80	1,344,155	79	1,702.7	1	0.1	24	114.9	36	89	8	3
95	5,432,495	81	2,996,804	79	1,999.4	3	20.4	37	249.2	36	129	5	4
54	4,040,408	31	1,778,360	31	934.6	1	0.1	13	90.7	12	32	2	5
32	4,921,366	21	2,156,192	20	674.4	...	...	6	85.0	7	136	4	6
23	6,705,785	16	2,955,627	14	1,529.0	...	...	7	82.8	6	21	...	7
11	6,347,074	7	2,701,107	6	2,390.9	...	...	2	52.0	4	31	4	8
4	58,794,748	2	52,854,040	2	319.0	...	...	1	408.1	1	24	1	9

BY TYPE OF ORGANIZATION

Cost of drainage works and services, 1950-1959				New works constructed, enlarged, or installed, 1950-1959									
Total		For new works		Open ditches		Tile or covered drains		Levees and dikes		Pumps		Other, projects reporting	
Projects reporting	Dollars	Projects reporting	Dollars	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Number		
450	91,627,636	338	68,012,516	327	10,554.6	9	23.2	119	1,198.1	139	548	28	1
351	20,403,349	296	12,781,246	292	9,564.4	7	23.0	110	763.3	123	492	21	2
29	795,766	23	485,027	21	173.4	2	0.2	7	25.7	6	9	4	3
70	70,428,521	19	54,746,243	14	816.8	...	...	2	409.1	10	47	3	4

BY YEAR OF ORGANIZATION

Cost of drainage works and services, 1950-1959				New works constructed, enlarged, or installed, 1950-1959									
Total		For new works		Open ditches		Tile or covered drains		Levees and dikes		Pumps		Other, projects reporting	
Projects reporting	Dollars	Projects reporting	Dollars	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Number		
450	91,627,636	338	68,012,516	327	10,554.6	9	23.2	119	1,198.1	139	548	28	1
197	8,318,425	189	6,316,478	187	5,306.0	4	20.3	59	333.0	56	174	18	2
253	83,309,211	149	61,696,038	140	5,248.6	5	2.9	60	865.1	83	374	10	3

DRAINAGE OF AGRICULTURAL LANDS

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	The State	Baker	Brevard	Broward	Charlotte	Collier	Dade	De Soto
AREA								
1 Approximate land area.....acres 1960...	34,721,280	374,400	660,480	779,520	451,200	1,300,480	1,314,560	459,520
2 Land in farms.....acres 1959...	15,236,521	43,662	264,457	80,821	235,056	316,424	128,550	294,261
3 Drainage projects..... number 1960...	516	2	14	25	6	5	9	24
4 1950...	1,889	2	93	55	14	5	16	65
5 Total area in drainage projects ¹ acres served 1960...	9,222,517	2,274	659,840	314,520	120,140	34,400	647,680	170,058
6 1950...	6,083,676	2,274	100,781	740,564	106,791	350,491	1,097,162	26,214
7 Area not used for agriculture or not drained..... acres served 1960...	4,367,190	...	478,322	140,520	2,200	...	376,680	2,720
8 Net area drained and used for agriculture..... acres served 1960...	4,855,327	2,274	181,518	174,000	117,940	34,400	271,000	167,338
9 Drainage established before 1950..... acres served 1960...	4,306,371	2,274	147,708	174,000	94,020	1,000	271,000	143,838
10 Area added, 1950-1959..... acres served 1960...	548,956	...	33,810	...	23,920	33,400	...	23,500
11 Area served by two or more projects..... acres served 1960...	1,353,192	...	...	89,204	...	...	271,000	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION								
12 Drains owned by one landowner..... number of projects...	388	2	11	20	5	5	4	16
13 acres served ² ...	1,836,408	2,274	116,410	29,949	114,300	24,400	23,493	142,688
14 Cooperative or mutual drains..... number of projects...	36	...	...	...	...	...	1	2
15 acres served ² ...	274,431	...	...	...	...	...	700	12,500
16 Legally organized public drains..... number of projects...	92	...	3	5	1	...	4	6
17 acres served ² ...	4,237,652	...	65,108	237,800	3,640	...	550,789	12,150
PROJECTS, 1960, BY YEAR STARTED								
18 1950-1959..... number of projects...	197	...	4	5	2	4	2	4
19 acres served ² ...	828,437	...	32,970	8,891	23,920	20,640	1,280	13,890
20 Prior to 1950..... number of projects...	319	2	10	20	4	1	7	20
21 acres served ² ...	5,520,054	2,274	148,548	258,858	94,020	13,760	573,702	153,448
DRAINAGE OPERATIONS, 1950-1959 ³								
22 Cost of drainage works and services..... projects reporting...	450	2	13	21	5	5	10	18
23 dollars...	91,627,636	(⁴)	5,003,057	6,914,162	36,500	96,222	5,038,389	210,500
24 New drainage works constructed, enlarged, or installed..... projects reporting...	338	2	10	15	3	5	5	15
25 dollars...	68,012,516	(⁴)	3,030,091	5,769,650	31,000	56,499	3,302,347	103,750
26 Open ditches..... projects reporting...	327	2	10	13	3	5	5	15
27 length, miles...	10,554.6	(⁴)	2,179.1	180.1	50.0	139.5	67.8	589.0
28 Tile or covered drains..... projects reporting...	9	...	1	...	...	...	...	...
29 length, miles...	23.2	...	2.0	...	...	...	...	...
30 Levees or dikes..... projects reporting...	119	...	7	6	...	2	3	...
31 length, miles...	1,198.1	...	84.6	63.8	...	33.0	16.8	...
32 Pumps..... projects reporting...	139	...	7	12	...	2	3	...
33 number of pumps...	548	...	29	34	...	14	5	...
34 Other (see text)..... projects reporting...	28	...	...	...	...	...	1	...
35 Cost of maintenance, operation, repair, and administration..... projects reporting...	312	1	10	19	3	2	9	14
36 dollars...	23,615,120	(⁴)	1,972,966	1,144,512	5,500	39,723	1,736,042	106,750

¹Land served by two or more projects counted only once.²Acres served by two projects are included for each project. See text.³Includes projects taken over by another project prior to 1960. See text.⁴Included in State total only.

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data.]

Item and Census year	Dixie	Duval	Flagler	Glades	Hardee	Hendry	Highlands	Hillsborough
AREA								
1 Approximate land area.....acres 1960...	440,320	497,280	309,120	477,440	403,200	759,680	666,240	¹ 665,600
2 Land in farms.....acres 1959...	168,944	78,130	172,620	332,397	325,717	641,483	415,854	¹ 773,468
3 Drainage projects..... number 1960...	3	1	3	33	13	36	34	23
4 1950...	1	3	14	17	239	11	21	140
5 Total area in drainage projects ² acres served 1960...	15,360	57,600	62,996	477,440	48,325	759,680	442,875	116,605
6 1950...	640	57,662	120,065	304,487	27,883	423,064	163,612	84,463
7 Area not used for agriculture or not drained..... acres served 1960...	...	3,720	27,191	267,846	...	376,182	107,352	13,300
8 Net area drained and used for agriculture..... acres served 1960...	15,360	53,880	35,805	209,594	48,325	383,498	335,523	103,305
9 Drainage established before 1950..... acres served 1960...	640	53,880	35,805	208,480	45,375	356,115	275,150	83,087
10 Area added, 1950-1959..... acres served 1960...	14,720	...	...	1,114	2,950	27,383	60,373	20,218
11 Area served by two or more projects..... acres served 1960...	...	...	...	119,242	...	120,844	125,601	4,550
PROJECTS, 1960, BY TYPE OF ORGANIZATION								
12 Drains owned by one landowner..... number of projects...	...	...	...	27	6	25	28	14
13 acres served ³...	...	...	...	74,403	8,215	138,726	220,160	22,899
14 Cooperative or mutual drains..... number of projects...	2	...	...	1	5	4	4	1
15 acres served ³ ...	14,720	...	...	2,000	22,110	53,773	62,755	20,960
16 Legally organized public drains..... number of projects...	1	1	3	5	2	7	2	8
17 acres served ³ ...	640	53,880	35,805	268,227	18,000	321,873	216,901	63,996
PROJECTS, 1960, BY YEAR STARTED								
18 1950-1959..... number of projects...	2	...	...	12	3	23	16	13
19 acres served ³ ...	14,720	...	...	24,156	2,950	116,421	91,010	20,078
20 Prior to 1950..... number of projects...	1	1	3	21	10	13	18	10
21 acres served ³ ...	640	53,880	35,805	320,474	45,375	397,951	408,806	87,777
DRAINAGE OPERATIONS, 1950-1959 ⁴								
22 Cost of drainage works and services..... projects reporting...	3	...	1	34	5	37	33	18
23 dollars...	13,267	...	10,000	3,794,191	36,965	3,762,944	2,502,931	503,579
24 New drainage works constructed, enlarged, of installed..... projects reporting...	2	...	...	26	4	29	31	16
25 dollars...	11,800	...	...	2,857,054	27,865	2,911,096	1,863,935	308,579
26 Open ditches..... projects reporting...	2	...	...	25	4	29	31	16
27 length, miles...	7.9	...	...	604.0	45.5	451.0	777.3	217.0
28 Tile or covered drains..... projects reporting...	...	...	...	...	...	...	1	...
29 length, miles...	...	...	...	...	...	...	0.1	...
30 Levees or dikes..... projects reporting...	...	...	...	13	...	17	11	1
31 length, miles...	...	...	...	92.4	...	123.5	71.5	3.0
32 Pumps..... projects reporting...	...	...	...	13	...	15	9	2
33 number of pumps...	...	...	...	29	...	37	27	8
34 Other (see text)..... projects reporting...	...	...	...	2	...	2	7	...
35 Cost of maintenance, operation, repair, and administration..... projects reporting...	3	...	1	26	2	27	16	4
36 dollars...	1,467	...	10,000	937,137	9,100	851,848	638,996	195,000

¹The excess of farm acreage over approximate land area is due to the fact that the entire acreage of a farm is tabulated as in the county in which the headquarters is located, even though a part of the farm may be situated in an adjoining county.

²Land served by two or more projects counted only once.

³Acres served by two projects are included for each project. See text.

⁴Includes projects taken over by another project prior to 1960. See text.

DRAINAGE OF AGRICULTURAL LANDS

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	Indian River	Lafayette	Lake	Lee	Levy	Manatee	Marion	Martin
AREA								
1 Approximate land area.....acres 1960...	327,040	347,520	637,440	503,040	705,920	440,320	1,034,880	357,760
2 Land in farms.....acres 1959...	197,751	107,549	329,186	142,509	307,766	252,812	538,857	126,618
3 Drainage projects..... number 1960...	17	1	15	20	3	16	1	45
4 1950...	188	...	23	74	...	292	4	13
5 Total area in drainage projects ¹ acres served 1960...	318,640	1,000	13,174	244,088	1,600	76,838	2,500	341,500
6 1950...	123,333	...	1,341	51,740	...	78,691	687	217,386
7 Area not used for agriculture or not drained..... acres served 1960...	180,796	...	...	129,030	...	1,820	...	123,744
8 Net area drained and used for agriculture..... acres served 1960...	137,844	1,000	13,174	115,058	1,600	75,018	2,500	217,756
9 Drainage established before 1950..... acres served 1960...	122,745	...	6,074	83,618	...	74,039	2,500	183,521
10 Area added, 1950-1959..... acres served 1960...	15,099	1,000	7,100	31,440	1,600	979	...	34,235
11 Area served by two or more projects..... acres served 1960...	29,580	...	...	...	...	1,150	...	109,889
PROJECTS, 1960, BY TYPE OF ORGANIZATION								
12 Drains owned by one landowner..... number of projects...	13	1	13	16	2	1	1	40
13 acres served ² ...	67,519	1,000	11,074	83,770	1,100	365	2,500	156,802
14 Cooperative or mutual drains..... number of projects...	...	...	2	2	...	...	...	2
15 acres served ²...	...	...	2,100	8,640	...	...	...	21,220
16 Legally organized public drains..... number of projects...	4	...	...	2	1	15	...	3
17 acres served ² ...	99,905	...	...	22,648	500	75,803	...	158,903
PROJECTS, 1960, BY YEAR STARTED								
18 1950-1959..... number of projects...	6	1	8	3	3	1	...	26
19 acres served ² ...	10,860	1,000	4,900	31,440	1,600	979	...	72,716
20 Prior to 1950..... number of projects...	11	...	7	17	...	15	1	19
21 acres served ² ...	156,564	...	8,274	83,618	...	75,189	2,500	264,209
DRAINAGE OPERATIONS, 1950-1959 ³								
22 Cost of drainage works and services..... projects reporting...	16	1	14	14	3	13	1	43
23 dollars...	1,758,101	(⁴)	241,700	340,271	14,100	333,447	(⁴)	2,982,443
24 New drainage works constructed, enlarged, or installed..... projects reporting...	9	1	14	8	3	1	1	41
25 dollars...	362,200	(⁴)	170,240	120,915	11,750	2,500	(⁴)	2,052,065
26 Open ditches..... projects reporting...	9	1	14	8	3	1	1	41
27 length, miles...	173.0	(⁴)	140.5	81.5	7.1	2.0	(⁴)	1,571.9
28 Tile or covered drains..... projects reporting...	...	...	1	4	...	...	...	...
29 length, miles...	...	...	0.1	20.7	...	...	...	...
30 Levees or dikes..... projects reporting...	5	...	8	4	1	...	1	19
31 length, miles...	52.0	...	21.3	19.0	1.5	...	(⁴)	142.8
32 Pumps..... projects reporting...	6	...	7	1	1	...	...	12
33 number of pumps...	24	...	10	7	1	...	...	130
34 Other (see text)..... projects reporting...	...	...	...	1	...	...	...	7
35 Cost of maintenance, operation, repair, and administration..... projects reporting...	12	1	10	10	3	12	1	25
36 dollars...	1,395,901	(⁴)	71,460	219,356	2,350	330,947	(⁴)	930,378

¹Land served by two or more projects counted only once.²Acres served by two projects are included for each project. See text.³Includes projects taken over by another project prior to 1960. See text.⁴Included in State total only.

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	Monroe	Nassau	Okeechobee	Orange	Osceola	Palm Beach	Pasco	Pinellas
AREA								
1 Approximate land area..... acres 1960...	636,160	416,000	499,200	586,240	848,000	1,265,920	480,640	168,960
2 Land in farms..... acres 1959...	904	87,225	367,832	349,007	814,959	372,408	309,807	57,052
3 Drainage projects..... number 1960...	1	2	15	10	21	84	8	1
4 1950...	1	2	3	19	7	167	8	12
5 Total area in drainage projects ¹ acres served 1960...	126,400	12,020	499,200	372,380	848,000	1,097,920	17,400	168,960
6 1950...	115,200	11,523	85,700	10,372	105	1,133,278	20,310	29,097
7 Area not used for agriculture or not drained..... acres served 1960...	126,400	...	382,362	305,600	680,085	199,200	...	81,160
8 Not area drained and used for agriculture..... acres served 1960...	(²)	12,020	116,838	66,780	167,915	898,720	17,400	87,800
9 Drainage established before 1950..... acres served 1960...	...	11,520	112,241	62,300	92,600	898,720	16,800	28,800
10 Area added, 1950-1959..... acres served 1960...	...	500	4,597	4,480	75,315	...	600	59,000
11 Area served by two or more projects..... acres served 1960...	...	...	13,940	...	...	383,133	...	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION								
12 Drains owned by one landowner..... number of projects...	...	1	13	7	19	66	7	...
13 acres served ³...	...	500	77,938	7,120	167,315	163,506	16,750	...
14 Cooperative or mutual drains..... number of projects...	...	...	...	...	1	4	...	...
15 acres served ³...	...	...	...	...	600	7,080	...	...
16 Legally organized public drains..... number of projects...	1	1	2	3	1	14	1	1
17 acres served ³ ...	(²)	11,520	54,980	59,660	...	1,132,072	650	87,800
PROJECTS, 1960, BY YEAR STARTED								
18 1950-1959..... number of projects...	...	1	9	6	11	15	1	1
19 acres served ³...	...	500	14,477	6,080	67,200	90,436	600	87,800
20 Prior to 1950..... number of projects...	1	1	6	4	10	69	7	...
21 acres served ³ ...	(²)	11,520	118,441	60,700	100,715	1,212,222	16,800	...
DRAINAGE OPERATIONS, 1950-1959 ⁴								
22 Cost of drainage works and services..... projects reporting...	1	1	16	8	21	77	5	1
23 dollars...	11,500	(⁵)	307,396	571,388	1,005,910	51,189,151	40,439	512,000
24 New drainage works constructed, enlarged, or installed..... projects reporting...	...	1	11	6	16	39	4	1
25 dollars...	...	(⁵)	92,423	32,558	664,238	42,250,732	14,237	75,000
26 Open ditches..... projects reporting...	...	1	11	6	16	31	4	1
27 length, miles...	...	(⁵)	126.7	36.6	1,452.3	711.3	7.5	33.0
28 Tile or covered drains..... projects reporting...	...	...	...	...	3	...	...	...
29 length, miles...	...	...	...	...	0.3	...	...	...
30 Levees or dikes..... projects reporting...	...	...	2	...	7	11	2	...
31 length, miles...	...	...	11.0	...	16.0	382.3	12.1	...
32 Pumps..... projects reporting...	...	...	3	...	6	32	...	...
33 number of pumps...	...	...	5	...	31	127	...	...
34 Other (see text)..... projects reporting...	...	...	2	...	1	8	...	...
35 Cost of maintenance, operation, repair, and administration..... projects reporting...	1	1	11	3	16	74	2	1
36 dollars...	11,500	(⁵)	214,973	538,830	341,672	8,938,419	26,202	437,000

¹Land served by two or more projects counted only once.
²Intercounty project with no benefited land in this county in 1960. See text.
³Acres served by two projects are included for each project. See text.
⁴Includes projects taken over by another project prior to 1960. See text.
⁵Included in State total only.

DRAINAGE OF AGRICULTURAL LANDS

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	Polk	Putnam	St. Johns	St. Lucie	Sarasota	Seminole	Sumter	Volusia	All other counties ¹
AREA									
1 Approximate land area.....acres 1960...	1,191,040	513,920	389,760	376,320	338,560	205,440	359,040	713,600	1,591,040
2 Land in farms.....acres 1959...	1,060,384	222,516	91,308	306,293	165,648	210,908	197,513	262,897	777,638
3 Drainage projects..... number 1960...	21	9	4	13	11	3	9	4	...
4 1950...	61	16	50	165	47	43	8	10	17
5 Total area in drainage projects ² acres served 1960...	412,127	46,687	16,655	376,320	91,210	56,540	62,297	89,268	...
6 1950...	133,575	61,394	24,137	184,035	77,599	13,534	24,876	78,205	1,405
7 Area not used for agriculture or not drained..... acres served 1960...	245,480	...	...	34,800	7,500	46,300	...	26,880	...
8 Net area drained and used for agriculture..... acres served 1960...	166,647	46,687	16,655	341,520	83,710	10,240	62,297	62,388	...
9 Drainage established before 1950..... acres served 1960...	129,283	42,437	15,526	341,520	65,480	10,240	51,647	62,388	...
10 Area added, 1950-1959..... acres served 1960...	37,364	4,250	1,129	...	18,230	...	10,650	...	...
11 Area served by two or more projects..... acres served 1960...	3,360	...	...	79,009	2,690	...	...	...	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION									
12 Drains owned by one landowner..... number of projects...	13	3	2	10	7	...	6	...	...
13 acres served ³ ...	78,408	3,040	1,129	33,310	20,920	...	14,425	...	...
14 Cooperative or mutual drains..... number of projects...	1	2	...	...	1	...	1	1	...
15 acres served ³ ...	8,960	3,775	...	...	29,000	...	3,000	538	...
16 Legally organized public drains..... number of projects...	7	4	2	3	3	3	2	3	...
17 acres served ³ ...	83,303	39,872	15,526	392,259	36,480	10,240	44,872	61,850	...
PROJECTS, 1960, BY YEAR STARTED									
18 1960-1959..... number of projects...	4	4	2	...	7	...	5	...	...
19 acres served ³ ...	32,364	4,890	1,129	...	20,920	...	7,620	...	...
20 Prior to 1950..... number of projects...	17	5	2	13	4	3	4	4	...
21 acres served ³ ...	138,307	41,797	15,526	425,569	65,480	10,240	54,677	62,388	...
DRAINAGE OPERATIONS, 1950-1959 ⁴									
22 Cost of drainage works and services.....projects reporting...	13	7	4	13	8	3	7	3	...
23 dollars...	524,894	94,517	193,319	2,486,566	730,608	55,750	43,539	55,590	...
24 New drainage works constructed, enlarged, or installed.....projects reporting...	6	5	3	10	7	...	7	...	...
25 dollars...	367,400	51,462	32,800	892,483	442,608	...	42,239	...	...
26 Open ditches.....projects reporting...	6	5	3	8	7	...	7	...	...
27 length, miles...	47.8	47.1	14.1	185.5	530.0	...	59.0	...	...
28 Tile or covered drains.....projects reporting...	...	...	...	...	...	...	...	...	...
29 length, miles...	...	...	...	...	...	...	...	...	...
30 Levees or dikes.....projects reporting...	3	...	...	1	...	...	...	...	...
31 length, miles...	13.5	...	...	35.0	...	...	...	...	...
32 Pumps.....projects reporting...	2	...	...	7	...	...	1	...	...
33 number of pumps...	4	...	...	25	...	...	1	...	...
34 Other (see text).....projects reporting...	...	1	...	2	...	...	...	...	...
35 Cost of maintenance, operation, repair, and administration.....projects reporting...	9	3	2	12	1	3	1	3	...
36 dollars...	157,494	43,055	160,519	1,594,083	288,000	55,750	1,300	55,590	...

¹Includes Alachua, Clay, Gadsden, and Hernando counties.
²Land served by two or more projects counted only once.
³Acres served by two projects are included for each project. See text.
⁴Includes projects taken over by another project prior to 1960. See text.

State Table 1.—DRAINAGE PROJECTS—NUMBER, AREA, COST, AND WORKS, 1920 TO 1960

[See text for comparability of data]

Item	1960 Census	1950 Census	1940 Census	1930 Census	1920 Census
AREA					
Approximate land area..... acres...	37,295,360	37,429,120	37,451,520	37,584,000	37,584,000
Land in farms..... acres...	19,657,615	25,751,055	23,683,631	22,078,630	25,441,061
Drainage projects..... number...	22	55	52	NA	NA
Total area in drainage projects..... acres served...	94,728	96,259	84,374	84,255	65,452
Area not used for agriculture or not drained..... acres served...	1,500	NA	NA	NA	NA
Net area drained and used for agriculture..... acres served...	93,228	NA	¹ 83,874	¹ 63,865	NA
Drainage established 10 years or more before Census date..... acres served...	67,982	NA	NA	NA	NA
Drainage established within 10 years of Census date..... acres served...	25,246	NA	NA	NA	NA
Area served by two or more projects..... acres served...	7,621	...	...	...	...
PROJECTS BY TYPE OF ORGANIZATION					
Drains owned by one landowner..... number of projects...	11	10	NA	NA	...
acres served...	12,847	9,569	3,700	9,000	...
Cooperative or mutual drains..... number of projects...	17	10	...	...	1
acres served...	24,325	17,205	...	...	10,000
Legally organized public drains..... number of projects...	24	35	NA	NA	NA
acres served...	64,682	69,485	80,674	75,255	55,452
PROJECTS BY YEAR STARTED					
Started 10 years or more before Census date..... number of projects...	38	39	NA	NA	NA
acres served...	67,321	72,771	84,374	74,097	10,000
Started within 10 years of Census date..... number of projects...	14	16	...	NA	NA
acres served...	34,533	23,488	...	10,158	55,452
OPERATIONS, 10-YEAR PERIOD PRECEDING CENSUS DATE					
Cost of drainage works and services..... projects reporting...	23	22	NA	NA	NA
dollars...	118,012	132,354	NA	NA	NA
New drainage works constructed, enlarged, or installed..... projects reporting...	21	² 22	NA	NA	NA
cost, dollars...	109,012	² 107,104	NA	NA	NA
Open ditches..... projects reporting...	21	22	NA	NA	NA
length, miles...	52.4	115	NA	NA	NA
Tile or covered drains..... projects reporting...	1	1	NA	NA	NA
length, miles...	7.8	2	NA	NA	NA
Levees or dikes..... projects reporting...	...	...	NA	NA	NA
length, miles...	...	...	NA	NA	NA
Pumps..... projects reporting...	...	NA	NA	NA	NA
number of pumps...	...	NA	NA	NA	NA
Other (see text)..... projects reporting...	...	NA	NA	NA	NA
Cost of maintenance, operation, repair, and administration..... projects reporting...	3	NA	NA	NA	NA
dollars...	9,000	25,250	NA	NA	NA
STATUS ON CENSUS DATE					
Capital investment..... dollars...	NA	NA	2,064,840	1,918,525	794,585
Physical works:					
Open ditches..... length, miles...	NA	NA	550.3	496.9	276.8
Tile drains..... length, miles...	NA	NA	2.0	40.0	...
Levees and dikes..... length, miles...	NA	NA	5.0	...	...
Pumping units..... number of units...	NA	...	NA	4	...

NA Not available.

¹Not fully comparable. See text.

²Cost of new works for lands not previously drained.

DRAINAGE OF AGRICULTURAL LANDS

State Table 2.—DRAINAGE

Size of project (Based on area of agricultural land in project)	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
		Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
				Projects reporting	Acres	Projects reporting	Acres
1 All projects.....	52	101,854	16,247	42	76,608	18	25,246
2 500 to 999 acres.....	21	14,172	3,115	18	12,117	5	2,055
3 1,000 to 1,999 acres.....	18	26,533	3,495	14	19,159	8	7,374
4 2,000 to 4,999 acres.....	10	28,613	2,016	7	18,106	4	10,507
5 5,000 to 9,999 acres.....	1	9,846	...	1	9,846	...	...
6 10,000 to 19,999 acres.....	2	22,690	7,621	2	17,380	1	5,310
7 20,000 to 49,999 acres.....	...	...	...	...	...	...	...
8 50,000 to 99,999 acres.....	...	...	...	...	...	...	...
9 100,000 or more acres.....	...	...	...	...	...	...	...

State Table 3.—DRAINAGE PROJECTS, 1960,

Type of organization	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
		Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
				Projects reporting	Acres	Projects reporting	Acres
1 All projects.....	52	101,854	16,247	42	76,608	18	25,246
2 Drains owned by one landowner.....	11	12,847	1,980	7	7,877	4	4,970
3 Cooperative or mutual drains.....	17	24,325	6,646	13	14,412	10	9,913
4 Legally organized public drains.....	24	64,682	7,621	22	54,319	4	10,363

State Table 4.—DRAINAGE PROJECTS, 1960,

Year of organization	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
		Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
				Projects reporting	Acres	Projects reporting	Acres
1 All projects.....	52	101,854	16,247	42	76,608	18	25,246
2 1960-1959.....	14	34,533	11,182	4	10,676	14	23,857
3 Prior to 1960.....	38	67,321	5,065	38	65,932	4	1,389

PROJECTS, 1960, BY SIZE

Cost of drainage works and services, 1950-1959				New works constructed, enlarged, or installed, 1950-1959									
Total		For new works		Open ditches		Tile or covered drains		Levees and dikes		Pumps		Other, projects reporting	
Projects reporting	Dollars	Projects reporting	Dollars	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Number		
23	118,012	21	109,012	21	52.4	1	7.8	...	...	...	...	...	1
8	25,550	7	18,300	7	10.4	...	...	...	...	...	...	...	2
9	36,189	8	34,439	8	23.4	...	...	...	...	...	...	...	3
5	42,773	5	42,773	5	16.4	1	7.8	...	...	...	...	...	4
...	...	...	...	...	...	...	...	...	...	...	...	...	5
1	13,500	1	13,500	1	2.2	...	...	...	...	...	...	...	6
...	...	...	...	...	...	...	...	...	...	...	...	...	7
...	...	...	...	...	...	...	...	...	...	...	...	...	8
...	...	...	...	...	...	...	...	...	...	...	...	...	9

BY TYPE OF ORGANIZATION

Cost of drainage works and services, 1950-1959				New works constructed, enlarged, or installed, 1950-1959									
Total		For new works		Open ditches		Tile or covered drains		Levees and dikes		Pumps		Other, projects reporting	
Projects reporting	Dollars	Projects reporting	Dollars	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Number		
23	118,012	21	109,012	21	52.4	1	7.8	...	...	...	...	...	1
6	25,845	6	20,845	6	14.0	...	...	...	...	...	...	...	2
13	64,967	11	60,967	11	28.2	1	7.8	...	...	...	...	...	3
4	27,200	4	27,200	4	10.2	...	...	...	...	...	...	...	4

BY YEAR OF ORGANIZATION

Cost of drainage works and services, 1950-1959				New works constructed, enlarged, or installed, 1950-1959									
Total		For new works		Open ditches		Tile or covered drains		Levees and dikes		Pumps		Other, projects reporting	
Projects reporting	Dollars	Projects reporting	Dollars	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Number		
23	118,012	21	109,012	21	52.4	1	7.8	...	...	...	...	...	1
14	56,858	14	56,858	14	36.6	...	...	...	...	...	...	...	2
9	61,154	7	52,154	7	15.8	1	7.8	...	...	...	...	...	3

DRAINAGE OF AGRICULTURAL LANDS

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	The State	Banks	Barrow	Bryan	Coweta	Evans	Franklin	Glynn
AREA								
1 Approximate land area.....acres 1960...	37,295,360	147,840	109,440	280,960	283,520	119,040	172,160	270,720
2 Land in farms.....acres 1959...	19,657,615	74,998	66,689	42,753	140,108	80,545	116,670	29,129
3 Drainage projects..... number 1960...	52	2	2	3	1	2	5	4
4 1950...	55	5	3	2	1	1	5	1
5 Total area in drainage projects ¹ acres served 1960...	94,728	880	933	3,064	3,389	970	23,479	8,997
6 1950...	96,259	3,697	2,028	2,264	3,389	450	23,479	1,686
7 Area not used for agriculture or not drained..... acres served 1960...	1,500	...	...	...	...	...	...	...
8 Net area drained and used for agriculture..... acres served 1960...	93,228	880	933	3,064	3,389	970	23,479	8,997
9 Drainage established before 1950..... acres served 1960...	67,982	880	933	2,764	3,389	450	23,479	...
10 Area added, 1950-1959..... acres served 1960...	25,246	...	...	300	...	520	...	8,997
11 Area served by two or more projects..... acres served 1960...	7,621	...	...	...	...	...	...	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION								
12 Drains owned by one landowner..... number of projects...	11	...	...	1	...	2	...	...
13 acres served ² ...	12,847	...	...	500	...	970	...	...
14 Cooperative or mutual drains..... number of projects...	17	...	1	...	...	...	...	2
15 acres served ² ...	24,325	...	305	...	...	...	...	4,244
16 Legally organized public drains..... number of projects...	24	2	1	2	1	...	5	2
17 acres served ² ...	64,682	880	628	2,564	3,389	...	23,479	4,753
PROJECTS, 1960, BY YEAR STARTED								
18 1950-1959..... number of projects...	14	...	...	...	...	1	...	4
19 acres served ² ...	34,533	...	...	...	...	520	...	8,997
20 Prior to 1950..... number of projects...	38	2	2	3	1	1	5	...
21 acres served ² ...	67,321	880	933	3,064	3,389	450	23,479	...
DRAINAGE OPERATIONS, 1950-1959 ³								
22 Cost of drainage works and services.....projects reporting...	23	...	(⁴)	2	...	(⁴)	...	4
23 dollars...	118,012	...	(⁴)	22,500	...	(⁴)	...	11,713
24 New drainage works constructed, enlarged, or installed.....projects reporting...	21	...	...	2	...	(⁴)	...	4
25 dollars...	109,012	...	...	17,500	...	(⁴)	...	11,713
26 Open ditches.....projects reporting...	21	...	...	2	...	(⁴)	...	4
27 length, miles...	52.4	...	...	3.2	...	(⁴)	...	9.0
28 Tile or covered drains.....projects reporting...	1	...	...	...	...	...	...	...
29 length, miles...	7.8	...	...	...	...	...	...	...
30 Levees or dikes.....projects reporting...	...	...	...	...	...	...	...	...
31 length, miles...	...	...	...	...	...	...	...	...
32 Pumps.....projects reporting...	...	...	...	...	...	...	...	...
33 number of pumps...	...	...	...	...	...	...	...	...
34 Other (see text).....projects reporting...	...	...	...	...	...	...	...	...
35 Cost of maintenance, operation, repair, and administration.....projects reporting...	3	...	(⁴)	1	...	...	...	...
36 dollars...	9,000	...	(⁴)	5,000	...	...	...	...

¹Land served by two or more projects counted only once.²Acres served by two projects are included for each project. See text.³Includes projects taken over by another project prior to 1960. See text.⁴Included in State total only.

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	Greene	Gwinnett	Hall	Harris	Hart	Jackson	Liberty	Madison
AREA								
1 Approximate land area.....acres 1960...	257,920	279,040	250,880	297,600	164,480	215,680	326,400	179,840
2 Land in farms.....acres 1959...	129,951	118,695	113,056	116,359	103,563	133,709	88,424	110,742
3 Drainage projects..... number 1960...	3	2	1	1	2	1	2	1
4 1950...	3	3	1	...	2	2	...	1
5 Total area in drainage projects ¹ acres served 1960...	2,898	2,541	700	2,000	3,509	400	3,300	639
6 1950...	2,898	2,668	700	...	3,509	950	...	639
7 Area not used for agriculture or not drained..... acres served 1960...	...	...	...	...	...	...	...	...
8 Net area drained and used for agriculture..... acres served 1960...	2,898	2,541	700	2,000	3,509	400	3,300	639
9 Drainage established before 1950..... acres served 1960...	2,898	2,541	700	2,000	3,509	400	...	639
10 Area added, 1950-1959..... acres served 1960...	...	...	...	...	...	...	3,300	...
11 Area served by two or more projects..... acres served 1960...	...	...	...	...	...	...	...	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION								
12 Drains owned by one landowner..... number of projects...	...	...	...	1	...	...	2	...
13 acres served ²...	...	...	...	2,000	...	...	3,300	...
14 Cooperative or mutual drains..... number of projects...	...	...	...	...	...	1	...	...
15 acres served ²...	...	...	...	...	...	400	...	...
16 Legally organized public drains..... number of projects...	3	2	1	...	2	...	...	1
17 acres served ² ...	2,898	2,541	700	...	3,509	...	...	639
PROJECTS, 1960, BY YEAR STARTED								
18 1960-1959..... number of projects...	...	...	...	...	...	...	2	...
19 acres served ²...	...	...	...	...	...	...	3,300	...
20 Prior to 1960..... number of projects...	3	2	1	1	2	1	...	1
21 acres served ² ...	2,898	2,541	700	2,000	3,509	400	...	639
DRAINAGE OPERATIONS, 1950-1959 ³								
22 Cost of drainage works and services.....projects reporting...	...	...	...	...	...	(⁴)	(⁴)	...
23 dollars...	...	...	...	...	...	(⁴)	(⁴)	...
24 New drainage works constructed, enlarged, or installed.....projects reporting...	...	...	...	...	...	...	(⁴)	...
25 dollars...	...	...	...	...	...	...	(⁴)	...
26 Open ditches.....projects reporting...	...	...	...	...	...	...	(⁴)	...
27 length, miles...	...	...	...	...	...	...	(⁴)	...
28 Tile or covered drains.....projects reporting...	...	...	...	...	...	...	...	...
29 length, miles...	...	...	...	...	...	...	...	...
30 Levees or dikes.....projects reporting...	...	...	...	...	...	...	...	...
31 length, miles...	...	...	...	...	...	...	...	...
32 Pumps.....projects reporting...	...	...	...	...	...	...	...	...
33 number of pumps...	...	...	...	...	...	...	...	...
34 Other (see text).....projects reporting...	...	...	...	...	...	...	...	...
35 Cost of maintenance, operation, repair, and administration.....projects reporting...	...	...	...	...	...	(⁴)	...	...
36 dollars...	...	...	...	...	...	(⁴)	...	...

¹Land served by two or more projects counted only once.
²Acres served by two projects are included for each project. See text.
³Includes projects taken over by another project prior to 1960. See text.
⁴Included in State total only.

DRAINAGE OF AGRICULTURAL LANDS

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	Miller	Morgan	Newton	Oglethorpe	Putnam	Rabun	Screven	Seminole
AREA								
1 Approximate land area.....acres 1960...	183,680	228,480	174,720	276,480	218,240	236,160	416,640	162,560
2 Land in farms.....acres 1959...	149,057	155,243	97,564	124,392	96,227	31,604	304,009	126,945
3 Drainage projects..... number 1960...	4	1	1	1	1	1	2	14
4..... 1950...	1	1	3	2	1	1	2	9
5 Total area in drainage projects ¹ acres served 1960...	1,685	2,200	752	45	200	2,500	2,316	18,205
6..... 1950...	145	2,200	2,046	692	200	2,500	1,756	14,635
7 Area not used for agriculture or not drained..... acres served 1960...	...	...	500	...	...	...	...	1,000
8 Net area drained and used for agriculture..... acres served 1960...	1,685	2,200	252	45	200	2,500	2,316	17,205
9 Drainage established before 1960..... acres served 1960...	145	2,200	252	45	200	2,500	1,756	9,170
10 Area added, 1950-1959..... acres served 1960...	1,540	...	...	...	...	...	560	8,035
11 Area served by two or more projects..... acres served 1960...	...	...	...	...	...	...	...	7,621
PROJECTS, 1960, BY TYPE OF ORGANIZATION								
12 Drains owned by one landowner..... number of projects...	1	...	...	...	...	...	...	4
13..... acres served ² ...	145	...	...	...	...	...	...	3,130
14 Cooperative or mutual drains..... number of projects...	3	...	...	...	...	1	2	9
15..... acres served ² ...	1,540	...	...	...	...	2,500	2,316	10,276
16 Legally organized public drains..... number of projects...	...	1	1	1	1	...	...	1
17..... acres served ²...	...	2,200	252	45	200	...	...	12,425
PROJECTS, 1960, BY YEAR STARTED								
18 1950-1959..... number of projects...	3	...	...	...	...	...	...	6
19..... acres served ² ...	1,540	...	...	...	...	...	...	18,711
20 Prior to 1950..... number of projects...	1	1	1	1	1	1	2	8
21..... acres served ² ...	145	2,200	252	45	200	2,500	2,316	7,120
DRAINAGE OPERATIONS, 1950-1959 ³								
22 Cost of drainage works and services..... projects reporting...	3	...	...	...	...	(⁴)	2	7
23..... dollars...	5,620	...	...	...	...	(⁴)	3,500	28,625
24 New drainage works constructed, enlarged, or installed..... projects reporting...	3	...	...	...	...	(⁴)	2	6
25..... dollars...	5,620	...	...	...	...	(⁴)	3,500	26,875
26 Open ditches..... projects reporting...	3	...	...	...	...	(⁴)	2	6
27..... length, miles...	3.0	...	...	...	...	(⁴)	7.0	11.9
28 Tile or covered drains..... projects reporting...	...	...	...	...	...	(⁴)	...	...
29..... length, miles...	...	...	...	...	...	(⁴)	...	...
30 Levees or dikes..... projects reporting...	...	...	...	...	...	...	...	...
31..... length, miles...	...	...	...	...	...	...	...	...
32 Pumps..... projects reporting...	...	...	...	...	...	...	...	...
33..... number of pumps...	...	...	...	...	...	...	...	...
34 Other (see text)..... projects reporting...	...	...	...	...	...	...	...	...
35 Cost of maintenance, operation, repair, and administration..... projects reporting...	...	...	...	...	...	...	...	1
36..... dollars...	...	...	...	...	...	...	...	1,750

¹Land served by two or more projects counted only once.²Acres served by two projects are included for each project. See text.³Includes projects taken over by another project prior to 1960. See text.⁴Included in State total only.

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	Spalding	Stephens	Tattnall	Walton	Ware	Wayne	All other counties ¹
AREA							
1 Approximate land area.....acres 1960...	128,640	115,200	315,520	211,200	583,680	413,440	1,965,440
2 Land in farms.....acres 1969...	72,907	42,323	201,055	139,695	134,969	119,955	1,060,917
3 Drainage projects..... number 1960...	1	2	1	1	2	1	...
4 1950...	1	2	1	3	1	1	17
5 Total area in drainage projects ² acres served 1960...	650	2,280	2,252	650	2,744	550	...
6 1950...	650	2,280	2,252	3,111	750	550	14,135
7 Area not used for agriculture or not drained acres served 1960...	...	...	...	...	...	...	...
8 Net area drained and used for agriculture acres served 1960...	650	2,280	2,252	650	2,744	550	...
9 Drainage established before 1950 acres served 1960...	650	2,200	2,252	650	750	550	...
10 Area added, 1950-1959 acres served 1960...	...	...	...	...	1,994	...	...
11 Area served by two or more projects..... acres served 1960...	...	...	...	...	...	...	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION							
12 Drains owned by one landowner number of projects...	...	...	1	...	...	1	...
13 acres served ³..	...	...	2,252	...	...	550	...
14 Cooperative or mutual drains..... number of projects...	...	...	...	...	2	...	...
15 acres served ³..	...	...	...	...	2,744	...	...
16 Legally organized public drains..... number of projects...	1	2	...	1	...	...	...
17 acres served ³ ..	650	2,280	...	650	...	...	...
PROJECTS, 1960, BY YEAR STARTED							
18 1950-1959 number of projects...	...	...	...	...	1	...	...
19 acres served ³..	...	...	...	...	1,465	...	...
20 Prior to 1950..... number of projects...	1	2	1	1	1	1	...
21 acres served ³ ..	650	2,280	2,252	650	1,279	550	...
DRAINAGE OPERATIONS, 1950-1959 ⁴							
22 Cost of drainage works and services projects reporting...	...	...	...	...	2	(⁵)	...
23 dollars...	...	...	...	...	13,294	(⁵)	...
24 New drainage works constructed, enlarged, or installed..... projects reporting...	...	...	...	...	2	(⁵)	...
25 dollars...	...	...	...	...	13,294	(⁵)	...
26 Open ditches..... projects reporting...	...	...	...	...	2	(⁵)	...
27 length, miles...	...	...	...	...	5.5	(⁵)	...
28 Tile or covered drains..... projects reporting...	...	...	...	...	...	...	...
29 length, miles...	...	...	...	...	...	...	...
30 Levees or dikes..... projects reporting...	...	...	...	...	...	...	...
31 length, miles...	...	...	...	...	...	...	...
32 Pumps..... projects reporting...	...	...	...	...	...	...	...
33 number of pumps...	...	...	...	...	...	...	...
34 Other (see text) projects reporting...	...	...	...	...	...	...	...
35 Cost of maintenance, operation, repair, and administration..... projects reporting...	...	...	...	...	...	...	...
36 dollars...	...	...	...	...	...	...	...

¹Includes Bartow, Cherokee, Clarke, Clayton, Cobb, Fayette, Henry, Oconee, Paulding, and Thomas counties.

²Land served by two or more projects counted only once.

³Acres served by two projects are included for each project. See text.

⁴Includes projects taken over by another project prior to 1960. See text.

⁵Included in State total only.

State Table 1.—DRAINAGE PROJECTS—NUMBER, AREA, COST, AND WORKS, 1920 TO 1960

[See text for comparability of data]

Item	1960 Census	1950 Census	1940 Census	1930 Census	1920 Census
AREA					
Approximate land area..... acres...	52,933,120	52,972,160	52,997,120	53,346,560	53,346,560
Land in farms..... acres...	15,232,401	13,224,192	10,297,745	9,346,908	8,375,873
Drainage projects..... number...	33	379	50	NA	NA
Total area in drainage projects..... acres served...	130,982	436,171	659,136	375,464	64,642
Area not used for agriculture or not drained..... acres served...	20,000	NA	NA	NA	NA
Net area drained and used for agriculture..... acres served...	110,982	NA	¹ 650,135	¹ 362,303	NA
Drainage established 10 years or more before Census date..... acres served...	110,118	NA	NA	NA	NA
Drainage established within 10 years of Census date..... acres served...	864	NA	NA	NA	NA
Area served by two or more projects..... acres served...	...	...	15,396	...	...
PROJECTS BY TYPE OF ORGANIZATION					
Drains owned by one landowner..... number of projects...	5	² 4	NA	NA	NA
acres served...	4,074	² 3,210	² 2,492	² 1,850	² 560
Cooperative or mutual drains..... number of projects...	3	² 3	...	...	...
acres served...	4,362	² 5,195	...	...	...
Legally organized public drains..... number of projects...	25	² 37	NA	NA	NA
acres served...	102,546	² 135,172	² 123,753	² 118,645	² 16,082
PROJECTS BY YEAR STARTED					
Started 10 years or more before Census date..... number of projects...	32	² 32	NA	NA	...
acres served...	110,278	² 129,331	630,471	305,029	...
Started within 10 years of Census date..... number of projects...	1	² 12	NA	NA	NA
acres served...	704	² 14,246	28,665	70,435	64,642
OPERATIONS, 10-YEAR PERIOD PRECEDING CENSUS DATE					
Cost of drainage works and services..... projects reporting...	29	² 44	NA	NA	NA
dollars...	2,011,573	906,297	NA	NA	NA
New drainage works constructed, enlarged, or installed..... projects reporting...	16	³ 12	NA	NA	NA
cost, dollars...	200,332	³ 132,962	NA	NA	NA
Open ditches..... projects reporting...	11	19	NA	NA	NA
length, miles...	38.6	59	NA	NA	NA
Tile or covered drains..... projects reporting...	1	2	NA	NA	NA
length, miles...	2.5	2	NA	NA	NA
Levees or dikes..... projects reporting...	5	4	NA	NA	NA
length, miles...	8.6	8	NA	NA	NA
Pumps..... projects reporting...	11	NA	NA	NA	NA
number of pumps...	18	NA	NA	NA	NA
Other (see text)..... projects reporting...	1	NA	NA	NA	NA
Cost of maintenance, operation, repair, and administration..... projects reporting...	29	NA	NA	NA	NA
dollars...	1,811,241	773,335	NA	NA	NA
STATUS ON CENSUS DATE					
Capital investment..... dollars...	NA	NA	7,567,032	5,112,444	1,668,569
Physical works:					
Open ditches..... length, miles...	NA	NA	968.1	651.2	274.5
Tile drains..... length, miles...	NA	NA	174.6	19.9	1.8
Levees and dikes..... length, miles...	NA	NA	95.4	74.8	9.5
Pumping units..... number of units...	NA	² 54	73	37	6

NA Not available.

¹Not fully comparable. See text.²1950 figures exclude 335 projects and 292,594 acres in "irrigation enterprises"; 1940 figures exclude 532,891 acres in "irrigation enterprises"; 1930 figures exclude 254,969 acres in "irrigation enterprises"; 1920 figures exclude 48,000 acres in "irrigation enterprises."³Cost of new works for lands not previously drained.

DRAINAGE OF AGRICULTURAL LANDS

State Table 2.—DRAINAGE

	Size of project (Based on area of agricultural land in project)	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	33	110,982	...	32	110,118	2	864
2	500 to 999 acres.....	11	8,075	...	10	7,371	1	704
3	1,000 to 1,999 acres.....	9	12,214	...	9	12,054	1	160
4	2,000 to 4,999 acres.....	9	30,656	...	9	30,656	...	...
5	5,000 to 9,999 acres.....	2	11,988	...	2	11,988	...	...
6	10,000 to 19,999 acres.....	...	...	...	...	...	...	...
7	20,000 to 49,999 acres.....	2	48,049	...	2	48,049	...	...
8	50,000 to 99,999 acres.....	...	...	...	...	...	...	...
9	100,000 or more acres.....	...	...	...	...	...	...	...

State Table 3.—DRAINAGE PROJECTS, 1960,

	Type of organization	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	33	110,982	...	32	110,118	2	864
2	Drains owned by one landowner.....	5	4,074	...	4	3,210	2	864
3	Cooperative or mutual drains.....	3	4,362	...	3	4,362	...	...
4	Legally organized public drains.....	25	102,546	...	25	102,546	...	...

State Table 4.—DRAINAGE PROJECTS, 1960,

	Year of organization	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	33	110,982	...	32	110,118	2	864
2	1950-1959.....	1	704	...	...	...	1	704
3	Prior to 1950.....	32	110,278	...	32	110,118	1	160

PROJECTS, 1960, BY SIZE

Cost of drainage works and services, 1950-1959				New works constructed, enlarged, or installed, 1950-1959									
Total		For new works		Open ditches		Tile or covered drains		Levees and dikes		Pumps		Other, projects reporting	
Projects reporting	Dollars	Projects reporting	Dollars	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Number		
29	2,011,573	16	200,332	11	38.6	1	2.5	5	8.6	11	18	1	1
9	228,435	5	64,795	3	13.7	...	...	3	5.5	4	6	...	2
8	530,608	7	57,078	5	13.6	...	...	2	3.1	5	7	...	3
8	825,923	3	54,709	2	4.3	...	...	...	...	2	5	1	4
2	185,621	...	...	...	...	...	...	...	...	...	...	...	5
...	...	...	...	...	...	...	...	...	...	...	...	...	6
2	240,986	1	23,750	1	7.0	1	2.5	...	...	...	...	...	7
...	...	...	...	...	...	...	...	...	...	...	...	...	8
...	...	...	...	...	...	...	...	...	...	...	...	...	9

BY TYPE OF ORGANIZATION

Cost of drainage works and services, 1950-1959				New works constructed, enlarged, or installed, 1950-1959									
Total		For new works		Open ditches		Tile or covered drains		Levees and dikes		Pumps		Other, projects reporting	
Projects reporting	Dollars	Projects reporting	Dollars	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Number		
29	2,011,573	16	200,332	11	38.6	1	2.5	5	8.6	11	18	1	1
5	127,117	4	49,000	4	16.3	...	...	3	3.1	2	3	...	2
...	...	...	...	...	...	...	...	...	...	...	...	...	3
24	1,884,456	12	151,332	7	22.3	1	2.5	2	5.5	9	15	1	4

BY YEAR OF ORGANIZATION

Cost of drainage works and services, 1950-1959				New works constructed, enlarged, or installed, 1950-1959									
Total		For new works		Open ditches		Tile or covered drains		Levees and dikes		Pumps		Other, projects reporting	
Projects reporting	Dollars	Projects reporting	Dollars	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Number		
29	2,011,573	16	200,332	11	38.6	1	2.5	5	8.6	11	18	1	1
1	34,300	1	28,000	1	8.7	...	...	1	0.5	1	2	...	2
28	1,977,273	15	172,332	10	29.9	1	2.5	4	8.1	10	16	1	3

DRAINAGE OF AGRICULTURAL LANDS

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	The State	Ada	Benewah	Bonner	Boundary	Canyon
AREA						
1 Approximate land area.....acres 1960...	52,933,120	666,880	506,240	1,107,840	816,000	371,200
2 Land in farms.....acres 1959...	15,232,401	314,976	202,523	240,592	115,206	352,382
3 Drainage projects..... number 1960...	33	2	4	1	16	2
4 1950...	379	45	4	2	16	58
5 Total area in drainage projects ¹ acres served 1960...	130,982	21,661	3,223	1,474	33,010	13,380
6 1950...	436,171	74,821	3,223	1,574	32,920	149,956
7 Area not used for agriculture or not drained..... acres served 1960...	20,000	...	...	...	...	...
8 Net area drained and used for agriculture..... acres served 1960...	110,982	21,661	3,223	1,474	33,010	13,380
9 Drainage established before 1950..... acres served 1960...	110,118	21,661	3,223	1,474	32,850	13,380
10 Area added, 1950-1959..... acres served 1960...	864	...	...	...	160	...
11 Area served by two or more projects..... acres served 1960...	...	...	...	...	...	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION						
12 Drains owned by one landowner..... number of projects...	5	...	2	...	1	...
13 acres served ² ..	4,074	...	1,810	...	1,060	...
14 Cooperative or mutual drains..... number of projects...	3	...	...	...	...	...
15 acres served ² ..	4,362	...	...	...	...	...
16 Legally organized public drains..... number of projects...	25	2	2	1	15	2
17 acres served ² ..	102,546	21,661	1,413	1,474	31,950	13,380
PROJECTS, 1960, BY YEAR STARTED						
18 1950-1959..... number of projects...	1	...	...	...	...	...
19 acres served ² ..	704	...	...	...	...	...
20 Prior to 1950..... number of projects...	32	2	4	1	16	2
21 acres served ² ..	110,278	21,661	3,223	1,474	33,010	13,380
DRAINAGE OPERATIONS, 1950-1959 ³						
22 Cost of drainage works and services..... projects reporting...	29	2	4	1	16	2
23 dollars...	2,011,573	155,517	85,807	1,800	1,550,122	86,219
24 New drainage works constructed, enlarged, or installed..... projects reporting...	16	...	3	...	9	...
25 dollars...	200,332	...	35,000	...	104,873	...
26 Open ditches..... projects reporting...	11	...	2	...	5	...
27 length, miles...	38.6	...	8.0	...	12.6	...
28 Tile or covered drains..... projects reporting...	1	...	...	...	...	...
29 length, miles...	2.5	...	...	...	...	...
30 Levees or dikes..... projects reporting...	5	...	1	...	2	...
31 length, miles...	8.6	...	3.0	...	3.1	...
32 Pumps..... projects reporting...	11	...	2	...	8	...
33 number of pumps...	18	...	3	...	13	...
34 Other (see text)..... projects reporting...	1	...	...	...	1	...
35 Cost of maintenance, operation, repair, and administration..... projects reporting...	29	2	4	1	16	2
36 dollars...	1,811,241	155,517	50,807	1,800	1,445,249	86,219

¹Land served by two or more projects counted only once.²Acres served by two projects are included for each project. See text.³Includes projects taken over by another project prior to 1960. See text.

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	Franklin	Gem	Kootenai	Madison	Owyhee	Payette	All other counties ¹
AREA							
1 Approximate land area.....acres 1960...	426,880	² 355,200	803,840	² 302,720	4,888,960	257,920	24,728,960
2 Land in farms.....acres 1959...	275,447	² 363,029	268,643	² 357,361	690,055	194,450	8,555,728
3 Drainage projects..... number 1960...	3	1	2	1	1	1	...
4 1950...	33	29	1	3	10	47	148
5 Total area in drainage projects ³ acres served 1960...	2,782	6,800	1,204	3,000	40,000	4,448	...
6 1950...	11,906	25,714	500	3,150	19,514	43,883	69,010
7 Area not used for agriculture or not drained..... acres served 1960...	...	...	...	...	20,000	...	...
8 Net area drained and used for agriculture..... acres served 1960...	2,782	6,800	1,204	3,000	20,000	4,448	...
9 Drainage established before 1950..... acres served 1960...	2,782	6,800	500	3,000	20,000	4,448	...
10 Area added, 1950-1959..... acres served 1960...	...	...	704	...	...	...	...
11 Area served by two or more projects..... acres served 1960...	...	...	...	...	...	...	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION							
12 Drains owned by one landowner..... number of projects...	...	...	2	...	...	...	...
13 acres served ⁴..	...	...	1,204	...	...	...	...
14 Cooperative or mutual drains..... number of projects...	2	...	...	1	...	...	...
15 acres served ⁴ ..	1,362	...	...	3,000	...	...	...
16 Legally organized public drains..... number of projects...	1	1	...	...	1	1	...
17 acres served ⁴ ..	1,420	6,800	...	...	20,000	4,448	...
PROJECTS, 1960, BY YEAR STARTED							
18 1950-1959..... number of projects...	...	...	1	...	...	...	...
19 acres served ⁴..	...	...	704	...	...	...	...
20 Prior to 1950..... number of projects...	3	1	1	1	1	1	...
21 acres served ⁴ ..	2,782	6,800	500	3,000	20,000	4,448	...
DRAINAGE OPERATIONS, 1950-1959 ⁵							
22 Cost of drainage works and services.....projects reporting...	...	1	(6)	...	1	1	...
23 dollars...	...	18,200	(6)	...	32,750	34,858	...
24 New drainage works constructed, enlarged, or installed.....projects reporting...	...	...	(6)	...	1	1	...
25 dollars...	...	...	(6)	...	23,750	2,709	...
26 Open ditches.....projects reporting...	...	...	(6)	...	1	1	...
27 length, miles...	...	...	(6)	...	7.0	0.3	...
28 Tile or covered drains.....projects reporting...	...	...	...	...	1	...	...
29 length, miles...	...	...	...	...	2.5	...	...
30 Levees or dikes.....projects reporting...	...	...	(6)	...	...	...	...
31 length, miles...	...	...	(6)	...	...	...	...
32 Pumps.....projects reporting...	...	...	(6)	...	...	...	...
33 number of pumps...	...	...	(6)	...	...	...	...
34 Other (see text).....projects reporting...	...	...	...	...	...	...	...
35 Cost of maintenance, operation, repair, and administration.....projects reporting...	...	1	(6)	...	1	1	...
36 dollars...	...	18,200	(6)	...	9,000	32,149	...

¹Includes Adams, Bannock, Bear Lake, Bingham, Blaine, Boise, Bonneville, Camas, Caribou, Cassia, Elmore, Fremont, Gooding, Jefferson, Jerome, Lemhi, Minidoka, Oneida, Teton, Twin Falls, Valley, and Washington counties.

²The excess of farm acreage over approximate land area is due to the fact that the entire acreage of a farm is tabulated as in the county in which the headquarters is located, even though a part of the farm may be situated in an adjoining county.

³Land served by two or more projects counted only once.

⁴Acres served by two projects are included for each project. See text.

⁵Includes projects taken over by another project prior to 1960. See text.

⁶Included in State total only.

State Table 1.—DRAINAGE PROJECTS—NUMBER, AREA, COST, AND WORKS, 1920 TO 1960

[See text for comparability of data.]

Item	1960 Census	1950 Census	1940 Census	1930 Census	1920 Census
AREA					
Approximate land area..... acres...	35,795,200	35,798,400	35,806,080	35,867,520	35,867,520
Land in farms..... acres...	30,327,261	30,978,495	31,032,572	30,695,339	31,974,775
Drainage projects..... number...	1,496	1,433	1,695	NA	NA
Total area in drainage projects..... acres served...	5,616,121	5,370,825	5,091,364	5,032,682	3,909,049
Area not used for agriculture or not drained..... acres served...	52,695	NA	NA	NA	NA
Net area drained and used for agriculture..... acres served...	5,563,426	NA	¹ 4,911,263	¹ 5,005,376	NA
Drainage established 10 years or more before Census date..... acres served...	5,428,733	NA	NA	NA	NA
Drainage established within 10 years of Census date..... acres served...	134,693	NA	NA	NA	NA
Area served by two or more projects..... acres served...	293,808	299,963	805,760	709,234	181,550
PROJECTS BY TYPE OF ORGANIZATION					
Drains owned by one landowner..... number of projects...	39	16	NA	NA	NA
acres served...	78,673	27,449	30,822	15,722	17,542
Cooperative or mutual drains..... number of projects...	154	189	...	...	...
acres served...	228,762	302,121	...	...	...
Legally organized public drains..... number of projects...	1,303	1,228	NA	NA	NA
acres served...	5,575,635	5,041,255	5,060,542	5,016,960	3,891,507
PROJECTS BY YEAR STARTED					
Started 10 years or more before Census date..... number of projects...	1,395	1,335	NA	NA	NA
acres served...	5,655,113	5,131,906	4,890,012	4,447,288	² 2,988,033
Started within 10 years of Census date..... number of projects...	101	98	NA	NA	NA
acres served...	227,957	238,919	201,352	585,394	² 909,993
OPERATIONS, 10-YEAR PERIOD PRECEDING CENSUS DATE					
Cost of drainage works and services..... projects reporting...	1,027	892	NA	NA	NA
dollars...	28,691,965	16,860,472	NA	NA	NA
New drainage works constructed, enlarged, or installed..... projects reporting...	228	³ 103	NA	NA	NA
cost, dollars...	11,114,587	³ 1,217,157	NA	NA	NA
Open ditches..... projects reporting...	143	96	NA	NA	NA
length, miles...	374.5	273	NA	NA	NA
Tile or covered drains..... projects reporting...	83	34	NA	NA	NA
length, miles...	124.9	67	NA	NA	NA
Levees or dikes..... projects reporting...	24	5	NA	NA	NA
length, miles...	115.2	19	NA	NA	NA
Pumps..... projects reporting...	30	NA	NA	NA	NA
number of pumps...	45	NA	NA	NA	NA
Other (see text)..... projects reporting...	50	NA	NA	NA	NA
Cost of maintenance, operation, repair, and administration..... projects reporting...	936	NA	NA	NA	NA
dollars...	17,577,378	15,643,315	NA	NA	NA
STATUS ON CENSUS DATE					
Capital investment.....dollars...	NA	NA	72,567,174	74,565,923	43,595,069
Physical works:					
Open ditches..... length, miles...	NA	NA	6,862.2	5,996.4	4,754.5
Tile drains..... length, miles...	NA	NA	4,246.6	3,825.6	3,507.1
Levees and dikes..... length, miles...	NA	NA	1,157.8	1,108.4	650.2
Pumping units..... number of units...	NA	115	125	120	NA

NA Not available.

¹Not fully comparable. See text.²1920 figures exclude 11,023 acres for which date of organization was not reported.³Cost of new works for lands not previously drained.

DRAINAGE OF AGRICULTURAL LANDS

State Table 2.—DRAINAGE

	Size of project (Based on area of agricultural land in project)	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	1,496	5,883,070	613,452	1,446	5,748,217	74	134,853
2	500 to 999 acres.....	313	228,468	25,748	292	212,393	29	16,075
3	1,000 to 1,999 acres.....	438	633,572	38,076	417	601,899	27	31,673
4	2,000 to 4,999 acres.....	435	1,380,782	96,127	429	1,351,060	13	29,722
5	5,000 to 9,999 acres.....	182	1,240,267	124,647	180	1,224,247	3	16,020
6	10,000 to 19,999 acres.....	98	1,317,391	109,355	98	1,317,391	...	...
7	20,000 to 49,999 acres.....	27	822,295	106,487	27	818,019	1	4,276
8	50,000 to 99,999 acres.....	2	151,034	46,940	2	113,947	1	37,087
9	100,000 or more acres.....	1	109,261	66,072	1	109,261	...	...

State Table 3.—DRAINAGE PROJECTS, 1960,

	Type of organization	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	1,496	5,883,070	613,452	1,446	5,748,217	74	134,853
2	Drains owned by one landowner.....	39	78,673	16,261	30	68,975	12	9,698
3	Cooperative or mutual drains.....	154	228,762	30,845	129	188,964	34	39,798
4	Legally organized public drains.....	1,303	5,575,635	566,346	1,287	5,490,278	28	85,357

State Table 4.—DRAINAGE PROJECTS, 1960,

	Year of organization	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	1,496	5,883,070	613,452	1,446	5,748,217	74	134,853
2	1950-1959.....	101	227,957	96,634	51	102,593	67	125,364
3	Prior to 1950.....	1,395	5,655,113	516,818	1,395	5,645,624	7	9,489

PROJECTS, 1960, BY SIZE

Cost of drainage works and services, 1950-1959				New works constructed, enlarged, or installed, 1950-1959									
Total		For new works		Open ditches		Tile or covered drains		Levees and dikes		Pumps		Other, projects reporting	
Projects reporting	Dollars	Projects reporting	Dollars	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Number		
1,027	28,691,965	228	11,114,587	143	374.5	83	124.9	24	115.2	30	45	50	1
173	694,824	65	431,465	52	110.0	17	18.7	3	8.7	4	4	7	2
262	1,647,913	58	599,351	34	65.6	31	60.8	3	3.0	5	6	12	3
319	8,195,487	57	4,652,527	31	101.0	22	33.5	14	58.3	12	20	14	4
151	5,711,441	22	1,731,117	13	27.3	5	4.9	1	10.0	5	5	8	5
92	8,343,081	19	2,513,314	11	37.6	4	5.6	2	33.0	4	10	6	6
27	2,557,031	6	203,773	1	7.0	4	1.4	1	2.2	...	...	3	7
2	1,309,567	1	983,040	1	26.0	...	...	...	...	...	...	...	8
1	232,621	...	...	...	...	...	...	...	...	...	...	...	9

BY TYPE OF ORGANIZATION

Cost of drainage works and services, 1950-1959				New works constructed, enlarged, or installed, 1950-1959									
Total		For new works		Open ditches		Tile or covered drains		Levees and dikes		Pumps		Other, projects reporting	
Projects reporting	Dollars	Projects reporting	Dollars	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Number		
1,027	28,691,965	228	11,114,857	143	374.5	83	124.9	24	115.2	30	45	50	1
33	379,868	27	195,738	21	72.4	8	20.3	5	3.6	3	6	4	2
83	457,558	59	386,907	44	84.6	14	16.9	3	15.2	7	7	8	3
911	27,854,539	142	10,531,942	78	217.5	61	87.7	16	96.4	20	32	38	4

BY YEAR OF ORGANIZATION

Cost of drainage works and services, 1950-1959				New works constructed, enlarged, or installed, 1950-1959									
Total		For new works		Open ditches		Tile or covered drains		Levees and dikes		Pumps		Other, projects reporting	
Projects reporting	Dollars	Projects reporting	Dollars	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Number		
1,027	28,691,965	228	11,114,587	143	374.5	83	124.9	24	115.2	30	45	50	1
101	2,338,093	98	2,215,879	81	213.6	25	66.9	9	18.9	12	14	13	2
926	26,353,872	130	8,898,708	62	160.9	58	58.0	15	96.3	18	31	37	3

DRAINAGE OF AGRICULTURAL LANDS

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1960 data.]

Item and Census year	The State	Adams	Alexander	Boone	Brown	Bureau	Calhoun	Carroll	Cass
AREA									
1 Approximate land area.....acres 1960...	35,795,200	554,240	143,360	181,120	196,480	555,520	165,760	299,520	236,800
2 Land in farms.....acres 1959...	30,327,261	476,178	83,046	172,534	168,139	525,217	130,704	258,471	216,067
3 Drainage projects.....number 1960...	1,496	5	9	4	2	20	5	3	17
4.....1950...	1,433	5	6	4	1	16	2	3	16
5 Total area in drainage projects ¹.....acres served 1960...	5,616,121	40,717	29,129	12,830	5,931	65,365	7,818	4,630	47,732
6.....1950...	5,370,825	42,887	29,084	13,150	4,320	59,893	7,824	4,630	46,333
7 Area not used for agriculture or not drained.....acres served 1960...	52,695	...	...	...	...	...	...	...	...
8 Net area drained and used for agriculture.....acres served 1960...	5,563,426	40,717	29,129	12,830	5,931	65,365	7,818	4,630	47,732
9 Drainage established before 1950.....acres served 1960...	5,428,733	40,717	27,849	12,830	5,931	65,365	7,818	4,630	46,576
10 Area added, 1950-1959.....acres served 1960...	134,693	...	1,280	...	...	...	...	...	1,156
11 Area served by two or more projects.....acres served 1960...	293,808	2,170	2,380	...	...	1,040	5,208	500	3,460
PROJECTS, 1960, BY TYPE OF ORGANIZATION									
12 Drains owned by one landowner.....number of projects...	39	...	1	...	...	...	...	...	...
13.....acres served ² ...	78,673	...	1,880	...	...	...	...	...	...
14 Cooperative or mutual drains.....number of projects...	154	...	2	3	...	2	3	...	...
15.....acres served ² ...	228,762	...	1,780	11,370	...	3,037	2,600	...	...
16 Legally organized public drains.....number of projects...	1,303	5	6	1	2	18	2	3	17
17.....acres served ² ...	5,575,635	42,887	27,849	1,460	5,931	63,368	10,426	5,130	51,192
PROJECTS, 1960, BY YEAR STARTED									
18 1960-1959.....number of projects...	101	...	3	...	...	...	3	...	1
19.....acres served ² ...	227,957	...	3,660	...	...	...	2,600	...	1,156
20 Prior to 1950.....number of projects...	1,395	5	6	4	2	20	2	3	16
21.....acres served ² ...	5,655,113	42,887	27,849	12,830	5,931	66,405	10,426	5,130	50,036
DRAINAGE OPERATIONS, 1950-1959 ³									
22 Cost of drainage works and services.....projects reporting...	1,027	5	9	...	1	16	5	3	16
23.....dollars...	28,691,965	1,126,152	2,315,326	...	65,777	349,168	68,607	80,104	479,042
24 New drainage works constructed, enlarged, or installed.....projects reporting...	228	2	6	...	...	4	3	1	6
25.....dollars...	11,114,587	334,897	2,195,157	...	...	113,500	20,400	5,000	91,242
26 Open ditches.....projects reporting...	143	1	3	...	...	2	3	...	5
27.....length, miles...	374.5	5.5	8.0	...	...	0.7	6.8	...	10.5
28 Tile or covered drains.....projects reporting...	83	1	...	...	...	...	...	...	1
29.....length, miles...	124.9	1.1	...	...	...	...	...	...	0.3
30 Levees or dikes.....projects reporting...	24	...	3	...	...	2	...	...	...
31.....length, miles...	115.2	...	17.0	...	...	23.5	...	...	...
32 Pumps.....projects reporting...	30	1	...	...	...	...	2	1	1
33.....number of pumps...	45	3	...	...	...	...	2	1	1
34 Other (see text).....projects reporting...	50	1	...	...	...	...	...	...	2
35 Cost of maintenance, operation, repair, and administration.....projects reporting...	936	5	6	...	1	16	3	3	15
36.....dollars...	17,577,378	791,255	120,169	...	65,777	235,668	48,207	75,104	387,800

¹Land served by two or more projects counted only once.²Acres served by two projects are included for each project. See text.³Includes projects taken over by another project prior to 1960. See text.

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	Champaign	Christian	Clark	Clay	Clinton	Coles	Cook	Crawford	Cumberland
AREA									
1 Approximate land area.....acres 1960...	640,000	453,760	323,200	296,960	318,720	324,480	610,560	282,880	221,440
2 Land in farms.....acres 1959...	600,519	415,508	289,755	244,150	262,731	291,014	130,937	229,101	191,587
3 Drainage projects..... number 1960...	97	81	6	1	4	60	19	6	9
4 1950...	96	75	6	1	4	59	20	6	7
5 Total area in drainage projects ¹ acres served 1960...	502,042	138,137	6,528	6,330	8,855	106,636	43,863	19,362	9,739
6 1950...	501,844	130,934	20,680	6,330	8,855	101,968	50,283	19,962	7,845
7 Area not used for agriculture or not drained..... acres served 1960...	8,150	...	...	...	...	...	3,570	640	...
8 Net area drained and used for agriculture..... acres served 1960...	493,892	138,137	6,528	6,330	8,855	106,636	40,293	18,722	9,739
9 Drainage established before 1960..... acres served 1960...	492,792	138,137	5,848	6,330	8,855	103,767	40,293	18,722	8,239
10 Area added, 1960-1959..... acres served 1960...	1,100	...	680	...	...	2,869	...	...	1,500
11 Area served by two or more projects..... acres served 1960...	1,940	...	...	...	...	4,092	...	...	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION									
12 Drains owned by one landowner..... number of projects...	1	1	2	...	...	1	1	...	...
13 acres served ² ...	1,100	1,770	1,844	...	...	1,326	127	...	...
14 Cooperative or mutual drains..... number of projects...	7	...	1	...	...	1	...	...	1
15 acres served ² ...	11,113	...	1,190	...	...	1,294	...	...	1,500
16 Legally organized public drains..... number of projects...	89	80	3	1	4	58	18	6	8
17 acres served ² ...	483,619	136,367	3,494	6,330	8,855	108,108	40,166	18,722	8,239
PROJECTS, 1960, BY YEAR STARTED									
18 1960-1959..... number of projects...	2	1	1	...	...	1	...	...	1
19 acres served ² ...	2,090	700	680	...	...	2,869	...	...	1,500
20 Prior to 1960..... number of projects...	95	80	5	1	4	59	19	6	8
21 acres served ² ...	498,742	137,437	5,848	6,330	8,855	107,859	40,293	18,722	8,239
DRAINAGE OPERATIONS, 1950-1959 ³									
22 Cost of drainage works and services..... projects reporting...	79	47	2	...	4	29	15	5	6
23 dollars...	788,386	123,426	5,028	...	51,421	156,281	119,270	27,467	22,163
24 New drainage works constructed, enlarged, or installed..... projects reporting...	5	1	1	...	...	2	1	1	1
25 dollars...	39,424	15,000	5,000	...	...	33,000	5,000	3,000	2,400
26 Open ditches..... projects reporting...	2	1	1	...	...	...	...	...	1
27 length, miles...	2.7	0.8	2.0	...	...	...	...	...	2.0
28 Tile or covered drains..... projects reporting...	3	1	...	...	...	2	1	...	...
29 length, miles...	3.8	2.5	...	...	...	6.0	2.0	...	...
30 Levees or dikes..... projects reporting...	...	...	...	...	...	1	...	...	...
31 length, miles...	...	...	...	...	...	0.1	...	...	...
32 Pumps..... projects reporting...	...	...	...	...	...	1	...	...	...
33 number of pumps...	...	...	...	...	...	1	...	...	...
34 Other (see text)..... projects reporting...	2	...	...	...	...	1	...	1	...
35 Cost of maintenance, operation, repair, and administration..... projects reporting...	76	46	1	...	4	28	15	5	5
36 dollars...	748,962	108,426	28	...	51,421	123,281	114,270	24,467	19,763

¹Land served by two or more projects counted only once.²Acres served by two projects are included for each project. See text.³Includes projects taken over by another project prior to 1960. See text.

DRAINAGE OF AGRICULTURAL LANDS

County Table 1. --DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data.]

Item and Census year	Jackson	Jasper	Jersey	Johnson	Kane	Kankakee	Kendall	Lake	La Salle
AREA									
1 Approximate land area.....acres 1960...	385,920	316,800	239,360	220,800	330,240	435,200	204,800	292,480	737,920
2 Land in farms.....acres 1959...	253,987	278,521	202,722	121,861	275,207	378,632	192,965	139,127	666,951
3 Drainage projects..... number 1960...	5	12	3	4	25	44	5	18	38
4 1950...	3	11	3	3	27	44	5	20	35
5 Total area in drainage projects ¹ acres served 1960...	41,340	19,210	10,717	14,092	63,275	144,198	12,830	33,951	85,759
6 1950...	26,670	18,700	10,717	12,198	64,885	133,298	12,650	31,895	81,025
7 Area not used for agriculture or not drained..... acres served 1960...	...	...	...	...	...	1,320	...	...	...
8 Net area drained and used for agriculture..... acres served 1960...	41,340	19,210	10,717	14,092	63,275	142,878	12,830	33,951	85,759
9 Drainage established before 1950..... acres served 1960...	41,340	18,700	10,717	13,592	63,275	131,968	12,830	33,951	81,980
10 Area added, 1950-1959..... acres served 1960...	...	510	...	500	...	10,910	...	...	3,779
11 Area served by two or more projects..... acres served 1960...	17,624	...	...	...	...	...	...	...	760
PROJECTS, 1960, BY TYPE OF ORGANIZATION									
12 Drains owned by one landowner..... number of projects...	...	...	...	1	5	...	...	...	...
13 acres served ²...	...	...	...	500	4,209	...	...	...	...
14 Cooperative or mutual drains..... number of projects...	...	6	...	...	...	2	...	...	8
15 acres served ²...	...	6,073	...	...	...	4,300	...	...	11,632
16 Legally organized public drains..... number of projects...	5	6	3	3	20	42	5	18	30
17 acres served ² ...	58,964	13,137	10,717	13,592	59,066	138,578	12,830	33,951	74,887
PROJECTS, 1960, BY YEAR STARTED									
18 1950-1959..... number of projects...	...	1	...	1	...	3	...	...	2
19 acres served ²...	...	510	...	500	...	11,880	...	...	3,314
20 Prior to 1950..... number of projects...	5	11	3	3	25	41	5	18	36
21 acres served ² ...	58,964	18,700	10,717	13,592	63,275	130,998	12,830	33,951	83,205
DRAINAGE OPERATIONS, 1950-1959 ³									
22 Cost of drainage works and services.....projects reporting...	5	11	3	3	10	34	5	9	13
23 dollars...	328,862	60,182	202,900	17,992	121,105	386,519	70,533	70,182	99,356
24 New drainage works constructed, enlarged, or installed.....projects reporting...	1	3	1	1	3	10	...	3	4
25 dollars...	3,000	7,692	16,000	5,000	42,060	176,500	...	24,450	51,911
26 Open ditches.....projects reporting...	1	3	1	1	1	8	...	1	3
27 length, miles...	3.0	8.9	8.0	6.6	7.5	26.5	...	1.0	10.8
28 Tile or covered drains.....projects reporting...	...	...	...	...	2	3	...	1	3
29 length, miles...	...	...	...	...	1.4	9.0	...	3.0	5.5
30 Levees or dikes.....projects reporting...	...	...	...	1	...	...	...	...	...
31 length, miles...	...	...	...	1.0	...	...	...	...	...
32 Pumps.....projects reporting...	...	...	...	...	...	...	...	...	...
33 number of pumps...	...	...	...	...	...	...	...	...	...
34 Other (see text).....projects reporting...	...	...	...	...	...	...	...	1	...
35 Cost of maintenance, operation, repair, and administration.....projects reporting...	5	10	3	2	8	32	5	8	10
36 dollars...	325,862	52,490	186,900	12,992	79,045	210,019	70,533	45,732	47,445

¹Land served by two or more projects counted only once.²Acres served by two projects are included for each project. See text.³Includes projects taken over by another project prior to 1960. See text.

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	Lawrence	Lee	Livingston	Logan	McHenry	McLean	Macon	Macoupin	Madison
AREA									
1 Approximate land area.....acres 1960...	239,360	466,560	667,520	398,080	391,040	750,720	368,640	558,080	467,840
2 Land in farms.....acres 1959...	172,299	436,999	637,716	384,481	316,645	722,554	329,714	496,470	354,024
3 Drainage projects.....number 1960...	14	15	52	17	16	39	70	11	7
4 1950...	14	14	52	14	16	36	75	8	7
5 Total area in drainage projects ¹.....acres served 1960...	76,996	89,165	157,979	103,572	55,669	173,643	115,977	12,293	34,267
6 1950...	82,324	89,130	118,638	49,022	55,135	165,512	105,618	9,593	26,567
7 Area not used for agriculture or not drained.....acres served 1960...	3,000	...	...	...	...	...	500	...	13,630
8 Net area drained and used for agriculture.....acres served 1960...	73,996	89,165	157,979	103,572	55,669	173,643	115,477	12,293	20,637
9 Drainage established before 1960.....acres served 1960...	73,996	89,165	121,532	103,572	55,669	169,248	112,312	10,893	20,637
10 Area added, 1960-1959.....acres served 1960...	...	...	36,447	...	...	4,395	3,165	1,400	...
11 Area served by two or more projects.....acres served 1960...	25,889	698	3,636	...	...	...	320	77	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION									
12 Drains owned by one landowner.....number of projects...	...	...	1	1	...	...	...	...	...
13 acres served ²...	...	...	2,241	30,388	...	...	...	...	...
14 Cooperative or mutual drains.....number of projects...	...	...	10	3	...	5	9	4	...
15 acres served ²...	...	...	10,900	6,450	...	12,018	8,135	3,560	...
16 Legally organized public drains.....number of projects...	14	15	41	13	16	34	61	7	7
17 acres served ² ...	101,705	89,863	148,474	66,734	55,669	161,625	107,662	8,810	20,637
PROJECTS, 1960, BY YEAR STARTED									
18 1960-1959.....number of projects...	...	...	1	...	...	3	4	1	...
19 acres served ²...	...	...	41,120	...	...	4,395	3,485	1,400	...
20 Prior to 1960.....number of projects...	14	15	51	17	16	36	66	10	7
21 acres served ² ...	101,705	89,863	120,495	103,572	55,669	169,248	112,312	10,970	20,637
DRAINAGE OPERATIONS, 1950-1959 ³									
22 Cost of drainage works and services.....projects reporting...	13	13	29	14	5	26	45	8	7
23 dollars...	413,612	392,920	702,959	160,571	33,883	435,225	231,008	32,975	3,088,730
24 New drainage works constructed, enlarged, or installed.....projects reporting...	3	...	4	4	...	9	11	...	2
25 dollars...	154,325	...	637,973	10,450	...	131,370	83,571	...	2,780,000
26 Open ditches.....projects reporting...	1	...	3	3	...	6	6	...	1
27 length, miles...	0.3	...	22.6	5.1	...	6.1	15.4	...	7.0
28 Tile or covered drains.....projects reporting...	...	...	2	1	...	4	10	...	1
29 length, miles...	...	...	2.2	1.2	...	2.8	14.5	...	1.0
30 Levees or dikes.....projects reporting...	2	...	...	...	...	...	...	...	1
31 length, miles...	2.8	...	...	...	...	...	...	...	21.0
32 Pumps.....projects reporting...	...	...	...	...	...	...	...	...	2
33 number of pumps...	...	...	...	...	...	...	...	...	8
34 Other (see text).....projects reporting...	...	...	1	...	...	8	6	...	1
35 Cost of maintenance, operation, repair, and administration.....projects reporting...	13	13	28	12	5	25	42	8	7
36 dollars...	259,287	392,920	64,986	150,121	33,883	303,855	147,437	32,975	308,730

¹Land served by two or more projects counted only once.²Acres served by two projects are included for each project. See text.³Includes projects taken over by another project prior to 1960. See text.

DRAINAGE OF AGRICULTURAL LANDS

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	Marion	Marshall	Mason	Massac	Menard	Mercer	Monroe	Montgomery	Morgan
AREA									
1 Approximate land area.....acres 1960...	371,200	252,800	346,240	157,440	199,680	355,840	243,200	451,840	361,600
2 Land in farms.....acres 1959...	292,232	228,175	302,272	107,360	188,659	336,234	216,705	409,682	342,085
3 Drainage projects..... number 1960...	3	4	19	1	3	2	10	60	9
4 1950...	...	4	18	1	3	2	9	55	7
5 Total area in drainage projects ¹ acres served 1960...	1,900	6,565	110,749	36,847	11,264	20,963	60,009	73,919	15,677
6 1950...	...	6,565	110,749	38,847	11,264	20,963	56,331	69,936	15,599
7 Area not used for agriculture or not drained..... acres served 1960...	...	...	...	2,048	...	...	...	...	...
8 Net area drained and used for agriculture..... acres served 1960...	1,900	6,565	110,749	34,799	11,264	20,963	60,009	73,919	15,677
9 Drainage established before 1950..... acres served 1960...	...	6,565	110,749	34,799	11,264	20,963	57,209	73,919	15,117
10 Area added, 1950-1959..... acres served 1960...	1,900	...	...	...	...	...	2,800	...	560
11 Area served by two or more projects..... acres served 1960...	...	...	5,988	...	2,644	...	17,257	5,930	3,100
PROJECTS, 1960, BY TYPE OF ORGANIZATION									
12 Drains owned by one landowner..... number of projects...	...	...	...	...	...	...	...	...	1
13 acres served ²...	...	...	...	...	...	...	...	...	560
14 Cooperative or mutual drains..... number of projects...	3	...	...	...	...	...	...	6	...
15 acres served ² ...	1,900	...	...	...	...	...	...	5,690	...
16 Legally organized public drains..... number of projects...	...	4	19	1	3	2	10	54	8
17 acres served ²...	...	6,565	116,737	34,799	13,908	20,963	77,266	74,159	18,217
PROJECTS, 1960, BY YEAR STARTED									
18 1950-1959..... number of projects...	3	...	...	...	...	...	1	...	2
19 acres served ² ...	1,900	...	...	...	...	...	2,800	...	1,820
20 Prior to 1950..... number of projects...	...	4	19	1	3	2	9	60	7
21 acres served ²...	...	6,565	116,737	34,799	13,908	20,963	74,466	79,849	16,957
DRAINAGE OPERATIONS, 1950-1959 ³									
22 Cost of drainage works and services..... projects reporting...	3	2	15	1	3	2	10	48	7
23 dollars...	2,599	6,234	349,586	224,208	33,818	581,787	476,726	97,909	141,622
24 New drainage works constructed, enlarged, or installed..... projects reporting...	3	...	...	...	1	1	2	...	1
25 dollars...	2,599	...	...	...	1,400	70,000	104,200	...	5,000
26 Open ditches..... projects reporting...	3	...	...	...	...	...	2	...	1
27 length, miles...	5.2	...	...	...	...	...	3.0	...	3.0
28 Tile or covered drains..... projects reporting...	...	...	...	...	...	...	2	...	...
29 length, miles...	...	...	...	...	...	...	0.2	...	...
30 Levees or dikes..... projects reporting...	...	...	...	...	...	...	1	...	...
31 length, miles...	...	...	...	...	...	...	4.0	...	...
32 Pumps..... projects reporting...	...	...	...	...	1	...	1	...	...
33 number of pumps...	...	...	...	...	1	...	1	...	...
34 Other (see text)..... projects reporting...	...	...	...	...	...	1	...	...	...
35 Cost of maintenance, operation, repair, and administration..... projects reporting...	...	2	15	1	3	2	10	48	7
36 dollars...	...	6,234	349,586	224,208	32,418	511,787	372,526	97,909	136,622

¹Land served by two or more projects counted only once.²Acres served by two projects are included for each project. See text.³Includes projects taken over by another project prior to 1960. See text.

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	Moultrie	Ogle	Peoria	Piatt	Pike	Pope	Pulaekl	Putnam	Randolph
AREA									
1 Approximate land area.....acres 1960...	220,800	484,480	399,360	279,680	530,560	243,840	130,560	106,240	380,160
2 Land in farms.....acres 1959...	205,096	460,208	322,019	275,720	469,337	109,935	92,307	92,318	316,417
3 Drainage projects..... number 1960...	40	4	4	52	21	2	6	1	5
4	38	4	4	51	12	3	5	1	5
5 Total area in drainage projects ¹ acres served 1960...	74,576	13,360	7,994	185,883	108,673	14,119	45,643	2,556	33,780
6	71,353	13,127	9,354	180,806	107,229	15,579	45,523	2,525	33,780
7 Area not used for agriculture or not drained..... acres served 1960...	...	...	...	...	...	...	1,200	...	...
8 Net area drained and used for agriculture..... acres served 1960...	74,576	13,360	7,994	185,883	108,673	14,119	44,443	2,556	33,780
9 Drainage established before 1950..... acres served 1960...	74,576	13,360	7,994	183,999	108,673	14,119	44,323	2,556	33,780
10 Area added, 1950-1959..... acres served 1960...	...	...	...	1,884	...	...	120	...	...
11 Area served by two or more projects..... acres served 1960...	713	...	...	4,435	58,694	...	480	...	2,525
PROJECTS, 1960, BY TYPE OF ORGANIZATION									
12 Drains owned by one landowner..... number of projects...	...	...	...	1	3	...	...	...	...
13 .....	...	...	...	1,000	6,081	...	...	...	...
14 Cooperative or mutual drains..... number of projects...	3	...	...	6	4	...	1	...	...
15	3,530	...	...	7,670	10,192	...	600	...	...
16 Legally organized public drains..... number of projects...	37	4	4	45	14	2	5	1	5
17	71,759	13,360	7,994	181,648	161,940	14,119	44,323	2,556	36,305
PROJECTS, 1960, BY YEAR STARTED									
18 1950-1959..... number of projects...	1	...	...	2	8	...	1	...	...
19	713	...	...	1,884	22,004	...	600	...	...
20 Prior to 1950..... number of projects...	39	4	4	50	13	2	5	1	5
21	74,576	13,360	7,994	188,434	156,209	14,119	44,323	2,556	36,305
DRAINAGE OPERATIONS, 1950-1959 ³									
22 Cost of drainage works and services.....projects reporting...	35	2	3	44	21	2	5	1	5
23	217,712	34,326	167,150	555,754	905,766	16,115	132,726	180,648	110,271
24 New drainage works constructed, enlarged, or installed.....projects reporting...	5	...	...	9	9	...	1	1	...
25	45,742	...	...	36,774	281,983	...	3,180	65,000	...
26 Open ditches.....projects reporting...	3	...	...	5	3	...	1	...	...
27	1.7	...	...	8.7	9.0	...	1.4	...	...
28 Tile or covered drains.....projects reporting...	3	...	...	7	2	...	...	...	...
29	0.7	...	...	5.0	0.2	...	...	...	...
30 Levees or dikes.....projects reporting...	...	...	...	...	4	...	...	...	...
31 .....	...	...	...	...	4.5	...	...	...	...
32 Pumps.....projects reporting...	...	...	...	...	8	...	...	1	...
33 .....	...	...	...	...	11	...	...	1	...
34 Other (see text).....projects reporting...	...	...	...	2	6	...	...	1	...
35 Cost of maintenance, operation, repair, and administration.....projects reporting...	34	2	3	42	19	2	4	1	5
36	171,970	34,326	167,150	518,980	623,783	16,115	129,546	115,648	110,271

¹Land served by two or more projects counted only once.
²Acres served by two projects are included for each project. See text.
³Includes projects taken over by another project prior to 1960. See text.

DRAINAGE OF AGRICULTURAL LANDS

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	Richland	Rock Island	St. Clair	Saline	Sangamon	Schuyler	Scott	Shelby	Stark	Tazewell
AREA										
1 Approximate land area.....acres 1960...	232,960	268,800	428,800	245,760	563,200	277,760	160,640	494,080	186,240	417,920
2 Land in farms.....acres 1959...	208,682	220,435	316,109	149,486	499,137	249,143	155,885	438,702	179,257	359,893
3 Drainage projects..... number 1960...	2	9	6	18	15	4	7	41	1	11
4..... 1950...	2	9	6	16	11	4	5	38	1	11
5 Total area in drainage projects ¹ acres served 1960...	4,020	25,714	18,579	75,400	29,903	14,788	29,687	64,288	3,598	38,034
6..... 1950...	4,020	26,539	16,749	59,600	21,343	15,803	29,687	63,259	3,598	36,166
7 Area not used for agriculture or not drained..... acres served 1960...	...	1,100	...	2,860	2,957	...	...	...	...	...
8 Net area drained and used for agriculture..... acres served 1960...	4,020	24,614	18,579	72,540	26,946	14,788	29,687	64,288	3,598	38,034
9 Drainage established before 1950..... acres served 1960...	4,020	24,614	18,579	72,540	26,306	14,788	29,687	63,168	3,598	35,999
10 Area added, 1950-1959..... acres served 1960...	...	...	...	...	640	...	...	1,120	...	2,035
11 Area served by two or more projects..... acres served 1960...	...	...	...	1,000	400	...	700	1,959	...	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION										
12 Drains owned by one landowner..... number of projects...	...	...	...	...	3	...	...	...	...	1
13..... acres served ²...	...	...	...	...	5,280	...	...	...	...	561
14 Cooperative or mutual drains..... number of projects...	...	1	...	1	2	...	1	9	...	1
15..... acres served ²...	...	3,950	...	800	1,475	...	660	7,454	...	2,035
16 Legally organized public drains..... number of projects...	2	8	6	17	10	4	6	32	1	9
17..... acres served ² ...	4,020	20,664	18,579	72,740	20,591	14,788	29,727	58,793	3,598	35,438
PROJECTS, 1960, BY YEAR STARTED										
18 1950-1959..... number of projects...	...	...	...	...	1	...	2	2	...	1
19..... acres served ²...	...	...	...	...	640	...	700	1,120	...	2,035
20 Prior to 1950..... number of projects...	2	9	6	18	14	4	5	39	1	10
21..... acres served ² ...	4,020	24,614	18,579	73,540	26,706	14,788	29,687	65,127	3,598	35,999
DRAINAGE OPERATIONS, 1950-1959 ³										
22 Cost of drainage works and services..... projects reporting...	...	7	5	7	6	3	7	27	1	9
23..... dollars...	...	332,209	149,740	164,467	28,488	426,293	491,892	63,646	1,800	703,458
24 New drainage works constructed, enlarged, or installed..... projects reporting...	...	1	1	...	1	2	3	2	...	3
25..... dollars...	...	3,000	112,000	...	2,000	104,000	78,710	15,320	...	67,100
26 Open ditches..... projects reporting...	...	1	1	...	1	1	3	1	...	2
27..... length, miles...	...	0.5	3.6	...	0.6	2.0	1.8	1.3	...	2.4
28 Tile or covered drains..... projects reporting...	...	...	1	...	...	1	...	1	...	1
29..... length, miles...	...	...	0.2	...	...	2.0	...	3.4	...	0.4
30 Levees or dikes..... projects reporting...	...	...	...	...	...	1	...	...	...	1
31..... length, miles...	...	...	...	...	...	4.0	...	...	...	1.5
32 Pumps..... projects reporting...	...	...	...	...	...	2	1	...	...	...
33..... number of pumps...	...	...	...	...	...	2	2	...	...	...
34 Other (see text)..... projects reporting...	...	...	...	...	...	...	1	1	...	1
35 Cost of maintenance, operation, repair, and administration..... projects reporting...	...	7	5	7	5	3	6	25	1	8
36..... dollars...	...	329,209	37,740	164,467	26,488	322,293	413,182	48,326	1,800	636,358

¹Land served by two or more projects counted only once.²Acres served by two projects are included for each project. See text.³Includes projects taken over by another project prior to 1960. See text.

State Table 1.—DRAINAGE PROJECTS—NUMBER, AREA, COST, AND WORKS, 1920 TO 1960

[See text for comparability of data]

Item	1960 Census	1950 Census	1940 Census	1930 Census	1920 Census
AREA					
Approximate land area..... acres...	23,158,400	23,171,200	23,171,200	23,068,800	23,068,800
Land in farms..... acres...	18,613,046	19,658,677	19,800,778	19,688,675	21,063,332
Drainage projects..... number...	292	79	¹ 8,893	NA	NA
Total area in drainage projects..... acres served...	11,120,936	11,017,709	10,121,952	10,214,014	9,087,183
Area not used for agriculture or not drained..... acres served...	67,490	NA	NA	NA	NA
Net area drained and used for agriculture..... acres served...	11,053,446	NA	² 9,703,805	² 10,150,221	NA
Drainage established 10 years or more before Census date..... acres served...	10,980,064	NA	NA	NA	NA
Drainage established within 10 years of Census date..... acres served...	73,382	NA	NA	NA	NA
Area served by two or more projects..... acres served...	210,322	NA	9,850,573	12,835,773	5,928,038
PROJECTS BY TYPE OF ORGANIZATION					
Drains owned by one landowner..... number of projects...	18	⁽³⁾	NA	NA	NA
acres served...	22,765	⁽³⁾	1,000	15,726	⁴ 5,623
Cooperative or mutual drains..... number of projects...	188	⁽³⁾
acres served...	237,047	⁽³⁾
Legally organized public drains..... number of projects...	86	³ 79	NA	NA	NA
acres served...	11,008,036	³ 11,017,709	10,120,952	10,198,288	⁴ 9,049,193
PROJECTS BY YEAR STARTED					
Started 10 years or more before Census date..... number of projects...	138	NA	NA	NA	NA
acres served...	11,070,844	NA	9,242,358	9,555,509	⁴ 6,861,184
Started within 10 years of Census date..... number of projects...	154	NA	NA	NA	NA
acres served...	197,004	NA	879,594	658,505	⁴ 2,220,090
OPERATIONS, 10-YEAR PERIOD PRECEDING CENSUS DATE					
Cost of drainage works and services..... projects reporting...	254	75	NA	NA	NA
dollars...	13,598,832	8,206,459	NA	NA	NA
New drainage works constructed, enlarged, or installed..... projects reporting...	158	⁵ 22	NA	NA	NA
cost, dollars...	2,528,431	⁵ 785,767	NA	NA	NA
Open ditches..... projects reporting...	135	19	NA	NA	NA
length, miles...	487.0	198	NA	NA	NA
Tile or covered drains..... projects reporting...	57	13	NA	NA	NA
length, miles...	160.0	48	NA	NA	NA
Levees or dikes..... projects reporting...	2	2	NA	NA	NA
length, miles...	0.3	20	NA	NA	NA
Pumps..... projects reporting...	1	NA	NA	NA	NA
number of pumps...	1	NA	NA	NA	NA
Other (see text)..... projects reporting...	36	NA	NA	NA	NA
Cost of maintenance, operation, repair, and administration..... projects reporting...	162	75	NA	NA	NA
dollars...	11,070,401	7,420,692	NA	NA	NA
STATUS ON CENSUS DATE					
Capital investment..... dollars...	NA	NA	47,540,385	54,110,854	31,147,682
Physical works:					
Open ditches..... length, miles...	NA	NA	22,008.1	20,786.8	17,470.7
Tile drains..... length, miles...	NA	NA	10,754.7	10,438.7	8,227.6
Levees and dikes..... length, miles...	NA	NA	139.0	131.9	165.8
Pumping units..... number of units...	NA	NA	5	7	NA

NA Not available.

¹In 1940 each county drain was counted as a separate project. See text.²Not fully comparable. See text.³All projects in 1950 included with county drains. See text.⁴1920 figures exclude 32,367 acres for which type was not reported; and 5,909 acres for which date of organization was not reported.⁵Cost of new works for lands not previously drained.

DRAINAGE OF AGRICULTURAL LANDS

State Table 2.—DRAINAGE

	Size of project (Based on area of agricultural land in project)	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	292	11,267,848	424,724	265	11,194,466	60	73,382
2	500 to 999 acres.....	120	80,373	57,258	100	62,216	34	18,157
3	1,000 to 1,999 acres.....	59	77,882	58,743	53	64,252	16	13,630
4	2,000 to 4,999 acres.....	28	82,548	55,037	27	75,878	3	6,670
5	5,000 to 9,999 acres.....	12	85,208	33,664	12	85,208	...	...
6	10,000 to 19,999 acres.....	8	101,632	12,500	8	101,632	...	...
7	20,000 to 49,999 acres.....	8	273,059	19,379	8	273,059	...	...
8	50,000 to 99,999 acres.....	6	479,819	9,196	6	479,819	...	...
9	100,000 or more acres.....	51	10,087,327	178,947	51	10,052,402	7	34,925

State Table 3.—DRAINAGE PROJECTS, 1960,

	Type of organization	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	292	11,267,848	424,724	265	11,194,466	60	73,382
2	Drains owned by one landowner.....	18	22,765	16,755	16	16,755	5	6,010
3	Cooperative or mutual drains.....	188	237,047	182,647	163	204,600	48	32,447
4	Legally organized public drains.....	86	11,008,036	225,322	86	10,973,111	7	34,925

State Table 4.—DRAINAGE PROJECTS, 1960,

	Year of organization	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	292	11,267,848	424,724	265	11,194,466	60	73,382
2	1960-1959.....	154	197,004	136,857	127	160,397	49	36,607
3	Prior to 1950.....	138	11,070,844	287,867	138	11,034,069	11	36,775

PROJECTS, 1960, BY SIZE

Cost of drainage works and services, 1950-1959				New works constructed, enlarged, or installed, 1950-1959									
Total		For new works		Open ditches		Tile or covered drains		Levees and dikes		Pumps		Other, projects reporting	
Projects reporting	Dollars	Projects reporting	Dollars	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Number		
254	13,598,832	158	2,528,431	135	487.0	57	160.0	2	0.3	1	1	36	1
105	438,302	81	350,284	67	88.0	20	17.4	...	...	...	...	22	2
50	289,573	33	171,858	31	41.5	10	8.4	1	0.1	1	1	5	3
23	190,766	9	78,396	9	19.5	...	...	1	0.2	...	...	3	4
8	91,920	3	31,078	3	19.5	...	...	...	...	...	...	...	5
5	291,804	...	...	...	...	...	...	...	...	...	...	...	6
7	240,673	2	8,281	2	3.3	2	0.4	...	...	...	...	1	7
6	180,343	1	9,651	1	3.1	1	0.6	...	...	...	...	1	8
50	11,875,451	29	1,878,883	22	312.1	24	133.2	...	...	...	...	4	9

BY TYPE OF ORGANIZATION

Cost of drainage works and services, 1950-1959				New works constructed, enlarged, or installed, 1950-1959									
Total		For new works		Open ditches		Tile or covered drains		Levees and dikes		Pumps		Other, projects reporting	
Projects reporting	Dollars	Projects reporting	Dollars	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Number		
254	13,598,832	158	2,528,431	135	487.0	57	160.0	2	0.3	1	1	36	1
13	89,798	7	56,608	7	10.7	...	...	...	...	1	1	...	2
168	828,565	119	575,008	103	157.8	30	25.8	2	0.3	...	...	30	3
73	12,680,469	32	1,896,815	25	318.5	27	134.2	...	...	...	...	6	4

BY YEAR OF ORGANIZATION

Cost of drainage works and services, 1950-1959				New works constructed, enlarged, or installed, 1950-1959									
Total		For new works		Open ditches		Tile or covered drains		Levees and dikes		Pumps		Other, projects reporting	
Projects reporting	Dollars	Projects reporting	Dollars	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Number		
254	13,598,832	158	2,528,431	135	487.0	57	160.0	2	0.3	1	1	36	1
153	821,884	115	575,843	100	156.9	27	22.5	1	0.1	...	...	27	2
101	12,776,948	43	1,952,588	35	330.1	30	137.5	1	0.2	1	1	9	3

DRAINAGE OF AGRICULTURAL LANDS

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	The State	Adams	Allen	Barthol- omew	Benton	Blackford	Boone	Carroll	Cass
AREA									
1 Approximate land area.....acres 1960...	23,158,400	220,800	428,800	256,640	261,760	106,880	273,280	239,360	265,600
2 Land in farms.....acres 1959...	18,613,046	205,464	336,029	192,708	252,328	91,619	246,619	230,248	241,290
3 Drainage projects..... number 1960...	292	11	10	1	21	1	2	6	15
4 1950...	79	1	1	1	1	1	1	1	1
5 Total area in drainage projects ¹ acres served 1960...	11,120,936	191,360	347,976	36,096	194,199	103,168	246,571	174,265	175,068
6 1950...	11,017,709	191,360	349,056	36,096	190,244	103,168	231,496	172,825	172,288
7 Area not used for agriculture or not drained..... acres served 1960...	67,490	...	4,160	...	...	1,040	...	...	...
8 Net area drained and used for agriculture..... acres served 1960...	11,053,446	191,360	343,816	36,096	194,199	102,128	246,571	174,265	175,068
9 Drainage established before 1950..... acres served 1960...	10,980,064	191,360	343,216	36,096	188,984	102,128	231,496	174,265	173,268
10 Area added, 1950-1959..... acres served 1960...	73,382	...	600	...	5,215	...	15,075	...	1,800
11 Area served by two or more projects..... acres served 1960...	210,322	7,538	6,680	...	15,321	...	5,500	7,670	12,884
PROJECTS, 1960, BY TYPE OF ORGANIZATION									
12 Drains owned by one landowner..... number of projects...	18	...	...	...	1	...	...	1	...
13 acres served ² ...	22,765	...	...	...	1,250	...	...	3,500	...
14 Cooperative or mutual drains..... number of projects...	188	10	9	...	19	...	1	4	14
15 acres served ² ...	237,047	7,538	7,280	...	20,261	...	5,500	5,610	15,184
16 Legally organized public drains..... number of projects...	86	1	1	1	1	1	1	1	1
17 acres served ² ...	11,008,036	191,360	343,216	36,096	188,009	102,128	246,571	172,825	172,768
PROJECTS, 1960, BY YEAR STARTED									
18 1950-1959..... number of projects...	154	10	9	...	9	...	1	4	9
19 acres served ² ...	197,004	7,538	7,280	...	10,007	...	5,500	5,910	10,664
20 Prior to 1950..... number of projects...	138	1	1	1	12	1	1	2	6
21 acres served ² ...	11,070,844	191,360	343,216	36,096	199,513	102,128	246,571	176,025	177,288
DRAINAGE OPERATIONS, 1950-1959 ³									
22 Cost of drainage works and services..... projects reporting...	254	11	10	1	14	1	2	6	15
23 dollars...	13,598,832	348,317	639,420	8,696	196,092	270,717	358,377	205,466	347,423
24 New drainage works constructed, enlarged, or installed..... projects reporting...	158	10	9	...	12	...	2	6	6
25 dollars...	2,528,431	25,565	26,006	...	151,819	...	110,069	151,419	86,015
26 Open ditches..... projects reporting...	135	10	8	...	12	...	1	5	2
27 length, miles...	487.0	15.4	13.8	...	44.5	...	8.0	4.4	22.3
28 Tile or covered drains..... projects reporting...	57	...	1	...	2	...	1	3	6
29 length, miles...	160.0	...	0.4	...	0.2	...	10.6	19.5	24.8
30 Levees or dikes..... projects reporting...	2	...	...	...	...	...	...	1	...
31 length, miles...	0.3	...	...	...	...	...	...	0.2	...
32 Pumps..... projects reporting...	1	...	...	...	...	...	...	...	...
33 number of pumps...	1	...	...	...	...	...	...	...	...
34 Other (see text)..... projects reporting...	36	...	...	...	5	...	...	3	...
35 Cost of maintenance, operation, repair, and administration..... projects reporting...	162	1	1	1	8	1	1	6	14
36 dollars...	11,070,401	322,752	613,434	8,696	44,273	270,717	248,308	54,047	261,408

¹Land served by two or more projects counted only once.²Acres served by two projects are included for each project. See text.³Includes projects taken over by another project prior to 1960. See text.

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	Clay	Clinton	Davless	Decatur	De Kalb	Delaware	Dubois	Elkhart	Fayette
AREA									
1 Approximate land area.....acres 1960...	232,960	260,480	277,120	236,800	233,600	254,720	277,120	299,520	137,600
2 Land in farms.....acres 1959...	176,438	247,355	243,247	220,507	210,958	200,950	219,488	234,575	120,871
3 Drainage projects..... number 1960...	4	5	1	2	1	1	2	2	2
4 1950...	1	1	1	1	1	1	1	1	1
5 Total area in drainage projects ¹ acres served 1960...	36,736	205,824	153,600	4,852	212,736	218,624	9,219	212,736	12,858
6 1950...	34,976	205,824	153,600	4,352	212,736	218,624	8,704	212,736	11,878
7 Area not used for agriculture or not drained..... acres served 1960...	...	...	2,720	...	...	...	...	...	...
8 Net area drained and used for agriculture..... acres served 1960...	36,736	205,824	150,880	4,852	212,736	218,624	9,219	212,736	12,858
9 Drainage established before 1950..... acres served 1960...	34,976	205,824	150,880	4,352	212,736	218,624	8,704	212,736	11,878
10 Area added, 1950-1959..... acres served 1960...	1,760	...	...	500	...	...	515	...	980
11 Area served by two or more projects..... acres served 1960...	1,000	4,092	...	...	...	...	...	600	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION									
12 Drains owned by one landowner..... number of projects...	2	...	...	...	...	...	...	...	...
18 acres served ² ...	2,760	...	...	...	...	...	...	...	...
14 Cooperative or mutual drains..... number of projects...	...	4	...	1	...	...	1	1	1
15 acres served ²...	...	4,092	...	500	...	...	515	600	980
16 Legally organized public drains..... number of projects...	2	1	1	1	1	1	1	1	1
17 acres served ² ...	34,976	205,824	150,880	4,352	212,736	218,624	8,704	212,736	11,878
PROJECTS, 1960, BY YEAR STARTED									
18 1950-1959..... number of projects...	1	4	...	1	...	...	1	...	1
19 acres served ² ...	1,760	4,092	...	500	...	...	515	...	980
20 Prior to 1950..... number of projects...	3	1	1	1	1	1	1	2	1
21 acres served ² ...	35,976	205,824	150,880	4,352	212,736	218,624	8,704	213,336	11,878
DRAINAGE OPERATIONS, 1950-1959³									
22 Cost of drainage works and services.....projects reporting...	4	5	1	(⁴)	1	1	1	2	2
23 dollars...	120,646	162,784	298,886	(⁴)	384,073	314,918	6,597	82,406	36,054
24 New drainage works constructed, enlarged, or installed.....projects reporting...	(⁴)	5	1	(⁴)	...	...	1	1	1
25 dollars...	(⁴)	126,510	47,394	(⁴)	...	...	6,597	20,572	17,592
26 Open ditches.....projects reporting...	(⁴)	5	1	...	...	...	1	1	...
27 length, miles...	(⁴)	6.1	47.0	...	...	...	3.3	4.7	...
28 Tile or covered drains.....projects reporting...	...	2	...	(⁴)	...	...	...	...	1
29 length, miles...	...	19.5	...	(⁴)	...	...	...	...	2.0
30 Levees or dikes.....projects reporting...	...	...	...	...	...	...	...	...	...
31 length, miles...	...	...	...	...	...	...	...	...	...
32 Pumps.....projects reporting...	(⁴)	...	...	...	...	...	...	...	...
33 number of pumps...	(⁴)	...	...	...	...	...	...	...	...
34 Other (see text).....projects reporting...	...	4	...	...	...	...	...	...	...
35 Cost of maintenance, operation, repair, and administration.....projects reporting...	3	5	1	...	1	1	...	2	1
36 dollars...	103,546	36,274	251,492	...	384,073	314,918	...	61,834	18,462

¹Land served by two or more projects counted only once.

²Acres served by two projects are included for each project. See text.

³Includes projects taken over by another project prior to 1960. See text.

⁴Included in State total only.

DRAINAGE OF AGRICULTURAL LANDS

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	Fountain	Franklin	Fulton	Gibson	Grant	Greene	Hamilton	Hancock	Harrison
AREA									
1 Approximate land area.....acres 1960...	254,080	252,160	234,880	319,360	269,440	351,360	256,640	195,200	306,560
2 Land in farms.....acres 1959...	234,029	215,804	223,161	256,183	223,877	247,729	216,917	190,543	224,652
3 Drainage projects..... number 1960...	8	1	3	3	1	1	2	1	1
4 1950...	1	1	1	1	1	1	1	1	...
5 Total area in drainage projects ¹ acres served 1960...	31,798	9,216	219,110	240,000	224,398	134,179	180,642	137,856	1,905
6 1950...	27,892	9,216	219,110	240,000	224,398	131,979	180,642	137,856	...
7 Area not used for agriculture or not drained..... acres served 1960...	...	...	...	1,040	6,560	1,440	...	...	...
8 Net area drained and used for agriculture..... acres served 1960...	31,798	9,216	219,110	238,960	217,838	132,739	180,642	137,856	1,905
9 Drainage established before 1950..... acres served 1960...	27,892	9,216	219,110	238,960	217,838	132,739	180,642	137,856	1,905
10 Area added, 1950-1959..... acres served 1960...	3,906	...	...	...	...	...	...	...	...
11 Area served by two or more projects..... acres served 1960...	579	...	2,650	...	...	...	650	...	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION									
12 Drains owned by one landowner..... number of projects...	...	...	...	...	...	...	1	...	...
13 acres served ²...	...	...	...	...	...	...	650	...	...
14 Cooperative or mutual drains..... number of projects...	7	...	2	...	...	...	...	...	...
15 acres served ² ...	6,065	...	2,650	...	...	...	...	...	...
16 Legally organized public drains..... number of projects...	1	1	1	3	1	1	1	1	1
17 acres served ² ...	26,312	9,216	219,110	238,960	217,838	132,739	180,642	137,856	1,905
PROJECTS, 1960, BY YEAR STARTED									
18 1950-1959..... number of projects...	4	...	2	2	...	...	1	...	...
19 acres served ² ...	4,146	...	2,650	23,300	...	...	650	...	...
20 Prior to 1950..... number of projects...	4	1	1	1	1	1	1	1	1
21 acres served ² ...	28,231	9,216	219,110	215,660	217,838	132,739	180,642	137,856	1,905
DRAINAGE OPERATIONS, 1950-1959 ³									
22 Cost of drainage works and services.....projects reporting...	7	1	3	3	1	1	2	1	...
23 dollars...	43,425	5,065	570,462	135,339	540,000	195,149	295,263	315,652	...
24 New drainage works constructed, enlarged, or installed.....projects reporting...	6	...	3	...	...	...	...	1	...
25 dollars...	36,766	...	44,929	...	...	...	...	5,751	...
26 Open ditches.....projects reporting...	6	...	3	...	...	...	...	...	...
27 length, miles...	9.6	...	8.1	...	...	...	...	...	...
28 Tile or covered drains.....projects reporting...	2	...	2	...	...	...	...	1	...
29 length, miles...	0.7	...	1.1	...	...	...	...	1.2	...
30 Levees or dikes.....projects reporting...	...	...	...	...	...	...	...	...	...
31 length, miles...	...	...	...	...	...	...	...	...	...
32 Pumps.....projects reporting...	...	...	...	...	...	...	...	...	...
33 number of pumps...	...	...	...	...	...	...	...	...	...
34 Other (see text).....projects reporting...	6	...	1	...	...	...	...	...	...
35 Cost of maintenance, operation, repair, and administration.....projects reporting...	2	1	2	3	1	1	2	1	...
36 dollars...	6,659	5,065	525,533	135,339	540,000	195,149	295,263	309,901	...

¹Land served by two or more projects counted only once.
²Acres served by two projects are included for each project. See text.
³Includes projects taken over by another project prior to 1960. See text.

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data.]

Item and Census year	Hendricks	Henry	Howard	Huntington	Jackson	Jasper	Jay	Jennings	Johnson
AREA									
1 Approximate land area.....acres 1960...	266,880	256,000	186,880	249,600	332,800	359,040	247,040	241,280	201,600
2 Land in farms.....acres 1959...	242,126	226,027	171,755	220,036	229,781	328,935	221,508	170,205	166,150
3 Drainage projects.....number 1960...	5	2	1	2	1	12	1	1	1
4	1	1	1	1	1	1	1	1	1
5 Total area in drainage projects ¹.....acres served 1960...	96,505	226,303	171,136	182,400	168,192	340,762	243,778	4,352	70,912
6	96,205	220,288	171,136	182,400	168,192	340,301	243,778	4,352	70,912
7 Area not used for agriculture or not drained.....acres served 1960...	...	...	...	1,400	...	...	...	...	1,160
8 Net area drained and used for agriculture.....acres served 1960...	96,505	226,303	171,136	181,000	168,192	340,762	243,778	4,352	69,752
9 Drainage established before 1950.....acres served 1960...	96,205	225,843	171,136	181,000	168,192	340,301	243,778	4,352	69,752
10 Area added, 1950-1959.....acres served 1960...	300	460	...	...	...	461	...	...	...
11 Area served by two or more projects.....acres served 1960...	4,818	750	...	200	...	20,071	...	...	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION									
12 Drains owned by one landowner.....number of projects...	...	...	...	...	...	3	...	...	...
13 .....	...	...	...	...	...	6,300	...	...	...
14 Cooperative or mutual drains.....number of projects...	4	1	...	1	...	8	...	...	...
15	5,118	750	...	200	...	14,232	...	...	...
16 Legally organized public drains.....number of projects...	1	1	1	1	1	1	1	1	1
17	96,205	226,303	171,136	181,000	168,192	340,301	243,778	4,352	69,752
PROJECTS, 1960, BY YEAR STARTED									
18 1950-1959.....number of projects...	3	1	...	1	...	6	...	...	...
19	2,618	750	...	200	...	9,110	...	...	...
20 Prior to 1950.....number of projects...	2	1	1	1	1	6	1	1	1
21	98,705	226,303	171,136	181,000	168,192	351,723	243,778	4,352	69,752
DRAINAGE OPERATIONS, 1950-1959 ³									
22 Cost of drainage works and services.....projects reporting...	5	2	1	2	1	10	1	...	1
23	36,718	180,442	276,192	42,057	30,074	135,548	103,705	...	73,706
24 New drainage works constructed, enlarged, or installed.....projects reporting...	...	2	1	1	...	4	...	...	...
25 .....	...	120,442	6,470	717	...	31,267	...	...	...
26 Open ditches.....projects reporting...	...	2	...	1	...	3	...	...	...
27 .....	...	13.8	...	0.2	...	8.2	...	...	...
28 Tile or covered drains.....projects reporting...	...	2	1	...	...	1	...	...	...
29 .....	...	2.5	1.0	...	...	1.0	...	...	...
30 Levees or dikes.....projects reporting...	...	...	...	...	...	...	...	...	...
31 .....	...	...	...	...	...	...	...	...	...
32 Pumps.....projects reporting...	...	...	...	...	...	...	...	...	...
33 .....	...	...	...	...	...	...	...	...	...
34 Other (see text).....projects reporting...	...	1	...	...	...	...	...	...	...
35 Cost of maintenance, operation, repair, and administration.....projects reporting...	5	1	1	1	1	7	1	...	1
36	36,718	60,000	269,722	41,340	30,074	104,281	103,705	...	73,706

¹Land served by two or more projects counted only once.
²Acres served by two projects are included for each project. See text.
³Includes projects taken over by another project prior to 1960. See text.

DRAINAGE OF AGRICULTURAL LANDS

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	Knox	Kosciusko	Lagrange	Lake	La Porte	Madison	Marion	Marshall	Miami
AREA									
1 Approximate land area.....acres 1960...	330,880	344,320	242,560	328,960	389,120	289,920	257,280	284,160	243,200
2 Land in farms.....acres 1959...	302,364	302,391	213,985	191,081	305,954	246,700	105,941	261,353	213,876
3 Drainage projects..... number 1960...	1	1	1	8	1	12	1	1	2
4 1950...	1	1	1	1	1	1	1	1	1
5 Total area in drainage projects ¹ acres served 1960...	196,380	305,421	181,813	158,057	203,504	226,944	85,891	249,421	121,212
6 1950...	196,380	305,421	181,813	158,057	203,184	226,944	71,251	247,501	107,512
7 Area not used for agriculture or not drained..... acres served 1960...	1,440	1,600	1,600	1,134	5,820	...	11,040	...	2,940
8 Net area drained and used for agriculture..... acres served 1960...	194,940	303,821	180,213	156,923	197,684	226,944	74,851	249,421	118,272
9 Drainage established before 1950..... acres served 1960...	194,940	303,821	180,213	156,923	197,684	226,944	74,851	247,501	105,292
10 Area added, 1950-1959..... acres served 1960...	...	...	...	...	...	...	...	1,920	12,980
11 Area served by two or more projects..... acres served 1960...	...	...	...	8,360	...	11,525	...	...	420
PROJECTS, 1960, BY TYPE OF ORGANIZATION									
12 Drains owned by one landowner..... number of projects...	...	...	...	...	...	...	...	...	...
13 acres served ²..	...	...	...	...	...	...	...	...	...
14 Cooperative or mutual drains..... number of projects...	...	...	...	7	...	11	...	...	1
15 acres served ²..	...	...	...	8,360	...	11,525	...	...	520
16 Legally organized public drains..... number of projects...	1	1	1	1	1	1	1	1	1
17 acres served ² ..	194,940	303,821	180,213	156,923	197,684	226,944	74,851	249,421	118,172
PROJECTS, 1960, BY YEAR STARTED									
18 1950-1959..... number of projects...	...	...	...	6	...	11	...	...	1
19 acres served ²..	...	...	...	5,760	...	11,525	...	...	520
20 Prior to 1950..... number of projects...	1	1	1	2	1	1	1	1	1
21 acres served ² ..	194,940	303,821	180,213	159,523	197,684	226,944	74,851	249,421	118,172
DRAINAGE OPERATIONS, 1950-1959 ³									
22 Cost of drainage works and services.....projects reporting...	1	1	1	8	1	12	1	1	2
23 dollars...	440,719	296,911	130,695	161,465	44,309	96,934	6,121	268,785	343,041
24 New drainage works constructed, enlarged, or installed.....projects reporting...	...	1	1	4	1	11	...	1	2
25 dollars...	...	8,054	130,695	75,187	43,309	49,812	...	83,729	142,688
26 Open ditches.....projects reporting...	...	...	1	4	...	10	...	1	2
27 length, miles...	...	...	31.7	11.3	...	18.2	...	38.2	16.0
28 Tile or covered drains.....projects reporting...	...	1	1	1	1	3	...	...	1
29 length, miles...	...	0.9	3.0	0.3	0.1	1.7	...	...	16.4
30 Levees or dikes.....projects reporting...	...	...	...	...	...	...	...	...	...
31 length, miles...	...	...	...	...	...	...	...	...	...
32 Pumps.....projects reporting...	...	...	...	...	...	...	...	...	...
33 number of pumps...	...	...	...	...	...	...	...	...	...
34 Other (see text).....projects reporting...	...	...	...	...	1	...	...	...	...
35 Cost of maintenance, operation, repair, and administration.....projects reporting...	1	1	...	5	1	1	1	1	1
36 dollars...	440,719	288,857	...	86,278	1,000	47,122	6,121	185,056	200,353

¹Land served by two or more projects counted only once.
²Acres served by two projects are included for each project. See text.
³Includes projects taken over by another project prior to 1960. See text.

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	Montgomery	Morgan	Newton	Noble	Ohio	Owen	Parke	Perry	Pike
AREA									
1 Approximate land area.....acres 1960...	324,480	259,840	263,040	262,400	55,680	246,400	288,640	245,760	214,400
2 Land in farms.....acres 1959...	295,284	182,835	233,631	240,511	46,182	156,162	229,105	137,066	120,411
3 Drainage projects.....number 1960...	16	1	26	3	1	1	1	1	1
4	1	1	1	1	1	1	1	1	1
5 Total area in drainage projects ¹.....acres served 1960...	142,897	41,344	239,624	188,704	1,229	4,608	15,616	768	122,178
6	136,478	41,344	238,464	187,904	1,229	4,608	15,616	768	123,238
7 Area not used for agriculture or not drained.....acres served 1960...	...	...	1,200	...	...	...	...	...	...
8 Net area drained and used for agriculture.....acres served 1960...	142,897	41,344	238,424	188,704	1,229	4,608	15,616	768	122,178
9 Drainage established before 1960.....acres served 1960...	137,838	41,344	238,424	187,904	1,229	4,608	15,616	768	122,178
10 Area added, 1950-1959.....acres served 1960...	5,059	...	...	800	...	...	...	...	...
11 Area served by two or more projects.....acres served 1960...	9,276	...	25,554	1,300	...	...	...	...	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION									
12 Drains owned by one landowner.....number of projects...	1	...	5	...	...	...	...	...	...
13	1,000	...	2,805	...	...	...	...	...	...
14 Cooperative or mutual drains.....number of projects...	14	...	20	2	...	...	...	...	...
15	13,895	...	26,529	2,100	...	...	...	...	...
16 Legally organized public drains.....number of projects...	1	1	1	1	1	1	1	1	1
17	137,278	41,344	237,724	187,904	1,229	4,608	15,616	768	122,178
PROJECTS, 1960, BY YEAR STARTED									
18 1950-1959.....number of projects...	13	...	14	2	...	...	...	...	...
19	11,095	...	17,649	2,100	...	...	...	...	...
20 Prior to 1950.....number of projects...	3	1	12	1	1	1	1	1	1
21	141,078	41,344	249,409	187,904	1,229	4,608	15,616	768	122,178
DRAINAGE OPERATIONS, 1950-1959³									
22 Cost of drainage works and services.....projects reporting...	14	1	18	3	...	...	...	...	...
23	227,212	28,932	144,403	127,701	...	...	...	...	...
24 New drainage works constructed, enlarged, or installed.....projects reporting...	9	...	9	3	...	...	...	...	...
25	71,208	...	87,094	21,456	...	...	...	...	...
26 Open ditches.....projects reporting...	6	...	9	3	...	...	...	...	...
27	7.8	...	20.8	5.9	...	...	...	...	...
28 Tile or covered drains.....projects reporting...	4	...	1	1	...	...	...	...	...
29	5.2	...	0.1	2.0	...	...	...	...	...
30 Levees or dikes.....projects reporting...	...	...	...	...	...	...	...	...	...
31 .....	...	...	...	...	...	...	...	...	...
32 Pumps.....projects reporting...	...	...	...	...	...	...	...	...	...
33 .....	...	...	...	...	...	...	...	...	...
34 Other (see text).....projects reporting...	1	...	5	...	...	...	...	...	...
35 Cost of maintenance, operation, repair, and administration.....projects reporting...	8	1	11	1	...	...	...	...	...
36	156,004	28,932	57,309	106,245	...	...	...	...	...

¹Land served by two or more projects counted only once.

²Acres served by two projects are included for each project. See text.

³Includes projects taken over by another project prior to 1960. See text.

DRAINAGE OF AGRICULTURAL LANDS

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data.]

Item and Census year	Porter	Posey	Pulaski	Putnam	Randolph	Rush	St. Joseph	Scott	Shelby
AREA									
1 Approximate land area.....acres 1960...	272,000	264,960	277,120	312,320	292,480	261,760	298,880	123,520	261,760
2 Land in farms.....acres 1959...	206,571	230,799	252,659	264,434	271,672	255,010	206,408	83,480	234,689
3 Drainage projects..... number 1960...	1	2	1	1	1	1	4	1	1
4 1950...	1	1	1	1	1	1	1	1	1
5 Total area in drainage projects ¹ acres served 1960...	189,440	199,424	251,366	12,698	251,854	141,176	263,012	12,544	96,707
6 1950...	189,440	199,424	251,366	12,698	249,728	137,856	263,012	12,544	92,800
7 Area not used for agriculture or not drained..... acres served 1960...	3,080	...	...	...	...	...	7,280	...	...
8 Net area drained and used for agriculture..... acres served 1960...	186,360	199,424	251,366	12,698	251,854	141,176	255,732	12,544	96,707
9 Drainage established before 1950..... acres served 1960...	186,360	199,424	251,366	12,698	251,584	137,856	255,732	12,544	96,707
10 Area added, 1950-1959..... acres served 1960...	...	...	...	...	270	3,320	...	...	...
11 Area served by two or more projects..... acres served 1960...	...	600	...	...	...	...	19,764	...	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION									
12 Drains owned by one landowner..... number of projects...	...	...	...	...	...	...	...	...	...
13 acres served ²...	...	...	...	...	...	...	...	...	...
14 Cooperative or mutual drains..... number of projects...	...	1	...	...	...	...	3	...	...
15 acres served ²...	...	600	...	...	...	...	19,764	...	...
16 Legally organized public drains..... number of projects...	1	1	1	1	1	1	1	1	1
17 acres served ² ...	186,360	199,424	251,366	12,698	251,854	141,176	255,732	12,544	96,707
PROJECTS, 1960, BY YEAR STARTED									
18 1950-1959..... number of projects...	...	1	...	...	...	...	2	...	...
19 acres served ²...	...	600	...	...	...	...	15,125	...	...
20 Prior to 1950..... number of projects...	1	1	1	1	1	1	2	1	1
21 acres served ² ...	186,360	199,424	251,366	12,698	251,854	141,176	260,371	12,544	96,707
DRAINAGE OPERATIONS, 1950-1959 ³									
22 Cost of drainage works and services..... projects reporting...	1	2	1	...	1	1	4	1	1
23 dollars...	42,811	24,144	230,055	...	436,025	283,772	407,311	500	54,199
24 New drainage works constructed, enlarged, or installed..... projects reporting...	1	...	1	...	1	1	3	...	...
25 dollars...	18,742	...	39,996	...	73,364	97,343	140,935	...	...
26 Open ditches..... projects reporting...	...	...	1	...	1	1	3	...	...
27 length, miles...	...	...	6.2	...	8.2	8.9	41.1	...	...
28 Tile or covered drains..... projects reporting...	1	...	1	...	1	1	1	...	...
29 length, miles...	2.6	...	2.9	...	7.7	9.2	13.0	...	...
30 Levees or dikes..... projects reporting...	...	...	...	...	...	...	...	...	...
31 length, miles...	...	...	...	...	...	...	...	...	...
32 Pumps..... projects reporting...	...	...	...	...	...	...	...	...	...
33 number of pumps...	...	...	...	...	...	...	...	...	...
34 Other (see text)..... projects reporting...	...	...	...	...	...	...	...	...	...
35 Cost of maintenance, operation, repair, and administration..... projects reporting...	1	2	1	...	1	1	3	1	1
36 dollars...	24,069	24,144	190,059	...	362,661	186,429	266,376	500	54,199

¹Land served by two or more projects counted only once.²Acres served by two projects are included for each project. See text.³Includes projects taken over by another project prior to 1960. See text.

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	Spencer	Starke	Steuben	Sullivan	Tiptecanoe	Tipton	Union	Vanderburgh	Vermillion
AREA									
1 Approximate land area.....acres 1960...	253,440	199,040	198,400	292,480	320,640	167,040	107,520	154,240	168,320
2 Land in farms.....acres 1959...	201,308	163,844	169,997	223,712	280,727	163,571	98,514	100,713	131,585
8 Drainage projects..... number 1960...	3	1	1	3	17	1	2	2	3
4 1950...	1	1	1	1	1	1	1	1	1
5 Total area in drainage projects ¹ acres served 1960...	83,040	190,065	142,336	39,456	155,415	167,040	4,341	64,476	7,296
6 1950...	83,040	190,065	142,336	39,456	147,584	167,040	3,789	64,336	7,296
7 Area not used for agriculture or not drained..... acres served 1960...	...	...	...	...	1,920	720	...	6,616	...
8 Net area drained and used for agriculture..... acres served 1960...	83,040	190,065	142,336	39,456	153,495	166,320	4,341	57,860	7,296
9 Drainage established before 1950..... acres served 1960...	83,040	190,065	142,336	39,456	149,214	166,320	3,789	57,860	7,296
10 Area added, 1950-1959..... acres served 1960...	...	...	...	...	4,281	...	552	...	...
11 Area served by two or more projects..... acres served 1960...	...	...	...	15,000	11,432	...	...	...	2,800
PROJECTS, 1960, BY TYPE OF ORGANIZATION									
12 Drains owned by one landowner..... number of projects...	...	...	...	...	...	...	...	...	...
18 acres served ²...	...	...	...	...	...	...	...	...	...
14 Cooperative or mutual drains..... number of projects...	2	...	...	...	16	...	1	...	2
15 acres served ² ...	11,648	...	...	...	20,263	...	552	...	2,800
16 Legally organized public drains..... number of projects...	1	1	1	3	1	1	1	2	1
17 acres served ² ...	71,392	190,065	142,336	54,456	145,664	166,320	3,789	57,860	7,296
PROJECTS, 1960, BY YEAR STARTED									
18 1960-1959..... number of projects...	...	...	...	...	8	...	1	...	1
19 acres served ²...	...	...	...	...	8,942	...	552	...	1,000
20 Prior to 1960..... number of projects...	3	1	1	3	9	1	1	2	2
21 acres served ² ...	83,040	190,065	142,336	54,456	156,985	166,320	3,789	57,860	9,096
DRAINAGE OPERATIONS, 1950-1959 ³									
22 Cost of drainage works and services..... projects reporting...	1	1	1	3	17	1	2	2	2
23 dollars...	15,226	61,988	116,581	262,297	346,641	38,978	9,442	108,187	6,750
24 New drainage works constructed, enlarged, or installed..... projects reporting...	...	1	...	...	12	...	(⁴)	1	1
25 dollars...	...	26,064	...	...	204,159	...	(⁴)	3,130	2,500
26 Open ditches..... projects reporting...	...	1	...	...	12	...	...	1	1
27 length, miles...	...	25.0	...	...	11.9	...	...	0.2	0.2
28 Tile or covered drains..... projects reporting...	...	1	...	...	4	...	(⁴)	1	1
29 length, miles...	...	1.0	...	...	4.1	...	(⁴)	0.1	0.1
30 Levees or dikes..... projects reporting...	...	...	...	...	...	...	...	...	1
31 length, miles...	...	...	...	...	...	...	...	...	0.1
32 Pumps..... projects reporting...	...	...	...	...	...	...	...	...	...
33 number of pumps...	...	...	...	...	...	...	...	...	...
34 Other (see text)..... projects reporting...	...	...	...	...	4	...	...	...	1
35 Cost of maintenance, operation, repair, and administration..... projects reporting...	1	1	1	3	13	1	1	2	2
36 dollars...	15,226	35,924	116,581	262,297	142,482	38,978	3,152	105,057	4,250

¹Land served by two or more projects counted only once.
²Acres served by two projects are included for each project. See text.
³Includes projects taken over by another project prior to 1960. See text.
⁴Included in State total only.

DRAINAGE OF AGRICULTURAL LANDS

County Table 1. --DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	Vigo	Wabash	Warren	Warrick	Washing- ton	Wayne	Wells	White	Whitley
AREA									
1 Approximate land area.....acres 1960...	265,600	269,440	235,520	250,240	330,240	259,200	235,520	318,080	215,040
2 Land in farms.....acres 1959...	179,274	246,582	209,853	145,104	266,323	225,442	222,221	296,318	195,272
3 Drainage projects..... number 1960...	6	5	17	3	1	1	2	4	1
4	1950...	1	1	1	1	1	1	1	1
5 Total area in drainage projects ¹ acres served 1960...	35,862	172,928	79,240	143,104	12,544	23,885	206,029	264,464	206,251
6	1950...	31,962	172,928	76,800	143,104	12,544	23,885	206,029	206,251
7 Area not used for agriculture or not drained..... acres served 1960...	800	...	...	...	...	...	780	...	...
8 Net area drained and used for agriculture..... acres served 1960...	35,062	172,928	79,240	143,104	12,544	23,885	205,249	264,464	206,251
9 Drainage established before 1950..... acres served 1960...	31,162	172,928	70,912	143,104	12,544	23,885	205,249	264,064	206,251
10 Area added, 1950-1959..... acres served 1960...	3,900	...	8,328	...	...	...	...	400	...
11 Area served by two or more projects..... acres served 1960...	2,800	2,390	4,378	1,520	...	...	400	1,800	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION									
12 Drains owned by one landowner..... number of projects...	2	...	...	...	...	...	...	3	...
13	acres served ² ...	2,300	...	...	...	...	...	2,200	...
14 Cooperative or mutual drains..... number of projects...	3	4	16	2	...	...	1	...	...
15	acres served ² ...	4,400	2,390	12,706	1,520	...	400	...	...
16 Legally organized public drains..... number of projects...	1	1	1	1	1	1	1	1	1
17	acres served ² ...	31,162	172,928	70,912	143,104	12,544	23,885	205,249	264,064
PROJECTS, 1960, BY YEAR STARTED									
18 1960-1959..... number of projects...	5	4	14	2	...	...	1	3	...
19	acres served ² ...	6,700	2,390	10,756	1,520	...	400	2,200	...
20 Prior to 1950..... number of projects...	1	1	3	1	1	1	1	1	1
21	acres served ² ...	31,162	172,928	72,862	143,104	12,544	23,885	205,249	264,064
DRAINAGE OPERATIONS, 1950-1959 ³									
22 Cost of drainage works and services.....projects reporting...	5	5	14	3	...	1	2	4	1
23	dollars...	26,425	223,739	48,571	152,689	...	10,328	98,542	1,083,730
24 New drainage works constructed, enlarged, or installed.....projects reporting...	2	4	11	...	...	...	(⁴)	4	...
25	dollars...	5,250	7,876	34,861	...	...	(⁴)	115,786	...
26 Open ditches.....projects reporting...	2	3	9	...	...	...	(⁴)	4	...
27	length, miles...	1.7	2.2	7.9	...	...	(⁴)	13.3	...
28 Tile or covered drains.....projects reporting...	...	1	2	...	...	...	...	1	...
29	length, miles...	...	0.4	1.0	...	...	...	1.7	...
30 Levees or dikes.....projects reporting...	...	...	...	...	...	...	...	...	...
31	length, miles...	...	...	...	...	...	...	...	...
32 Pumps.....projects reporting...	...	...	...	...	...	...	...	...	...
33	number of pumps...	...	...	...	...	...	...	...	...
34 Other (see text).....projects reporting...	...	...	5	...	...	...	...	...	...
35 Cost of maintenance, operation, repair, and administration.....projects reporting...	4	1	7	3	...	1	1	1	1
36	dollars...	21,175	215,863	13,710	152,689	...	10,328	97,846	967,944

¹Land served by two or more projects counted only once.²Acres served by two projects are included for each project. See text.³Includes projects taken over by another project prior to 1960. See text.⁴Included in State total only.

State Table 1.—DRAINAGE PROJECTS—NUMBER, AREA, COST, AND WORKS, 1920 TO 1960

[See text for comparability of data.]

Item	1960 Census	1950 Census	1940 Census	1930 Census	1920 Census
AREA					
Approximate land area.....acres...	35,860,480	35,868,800	35,831,040	35,575,040	35,575,040
Land in farms.....acres...	33,830,950	34,264,639	34,148,673	34,019,332	33,474,896
Drainage projects.....number...	249	86	¹ 3,180	NA	NA
Total area in drainage projects.....acres served...	6,884,409	6,734,863	6,164,344	6,137,649	5,224,478
Area not used for agriculture or not drained.....acres served...	13,070	NA	NA	NA	NA
Net area drained and used for agriculture.....acres served...	6,871,339	NA	² 5,945,393	² 6,105,496	NA
Drainage established 10 years or more before Census date.....acres served...	6,748,104	NA	NA	NA	NA
Drainage established within 10 years of Census date.....acres served...	123,235	NA	NA	NA	NA
Area served by two or more projects.....acres served...	190,819	NA	1,380,587	1,259,995	681,265
PROJECTS BY TYPE OF ORGANIZATION					
Drains owned by one landowner.....number of projects...	10	(³)	NA	NA	NA
.....acres served...	11,428	(³)	53,786	21,557	12,795
Cooperative or mutual drains.....number of projects...	89	(³)	...	...	...
.....acres served...	125,657	(³)	...	...	...
Legally organized public drains.....number of projects...	150	³ 86	NA	NA	NA
.....acres served...	6,926,485	³ 6,734,863	6,110,558	6,116,092	5,211,683
PROJECTS BY YEAR STARTED⁴					
Started 10 years or more before Census date.....number of projects...	185	NA	NA	NA	NA
.....acres served...	6,988,202	NA	6,092,679	5,517,032	⁴ 2,134,524
Started within 10 years of Census date.....number of projects...	64	NA	NA	NA	NA
.....acres served...	¹ 75,368	NA	71,665	620,617	⁴ 3,077,143
OPERATIONS, 10-YEAR PERIOD PRECEDING CENSUS DATE					
Cost of drainage works and services.....projects reporting...	202	77	NA	NA	NA
.....dollars...	21,032,299	13,302,757	NA	NA	NA
New drainage works constructed, enlarged, or installed.....projects reporting...	110	⁵ 35	NA	NA	NA
.....cost, dollars...	5,726,914	⁵ 2,143,433	NA	NA	NA
Open ditches.....projects reporting...	78	33	NA	NA	NA
.....length, miles...	271.1	203	NA	NA	NA
Tile or covered drains.....projects reporting...	60	23	NA	NA	NA
.....length, miles...	282.8	165	NA	NA	NA
Levees or dikes.....projects reporting...	6	4	NA	NA	NA
.....length, miles...	6.5	35	NA	NA	NA
Pumps.....projects reporting...	2	NA	NA	NA	NA
.....number of pumps...	2	NA	NA	NA	NA
Other (see text).....projects reporting...	19	NA	NA	NA	NA
Cost of maintenance, operation, repair, and administration.....projects reporting...	138	77	NA	NA	NA
.....dollars...	15,305,385	11,159,324	NA	NA	NA
STATUS ON CENSUS DATE					
Capital investment.....dollars...	NA	NA	75,374,497	77,478,893	49,627,304
Physical works:					
Open ditches.....length, miles...	NA	NA	5,189.7	4,800.0	3,998.0
Tile drains.....length, miles...	NA	NA	12,873.2	13,382.4	10,384.9
Levees and dikes.....length, miles...	NA	NA	456.8	113.4	45.2
Pumping units.....number of units...	NA	NA	18	21	NA

NA Not available.

¹In 1940 each county drain was counted as a separate project. See text.²Not fully comparable. See text.³All projects in 1950 included with county drains. See text.⁴1920 figures exclude 12,811 acres for which date of organization was not reported.⁵Cost of new works for lands not previously drained.

DRAINAGE OF AGRICULTURAL LANDS

State Table 2.—DRAINAGE

	Size of project (Based on area of agricultural land in project)	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	249	7,063,570	383,050	203	6,939,308	77	124,262
2	500 to 999 acres.....	61	40,868	8,224	33	21,808	31	19,060
3	1,000 to 1,999 acres.....	51	72,690	12,500	38	52,784	16	19,906
4	2,000 to 4,999 acres.....	36	115,231	12,652	31	97,849	7	17,382
5	5,000 to 9,999 acres.....	19	140,346	2,500	19	139,746	1	600
6	10,000 to 19,999 acres.....	30	429,493	11,749	30	427,883	1	1,610
7	20,000 to 49,999 acres.....	16	532,875	3,960	16	532,875	...	...
8	50,000 to 99,999 acres.....	13	932,852	268,999	13	928,154	4	4,698
9	100,000 or more acres.....	23	4,799,215	62,506	23	4,738,209	17	61,006

State Table 3.—DRAINAGE PROJECTS, 1960,

	Type of organization	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	249	7,063,570	383,050	203	6,939,308	77	124,262
2	Drains owned by one landowner.....	10	11,428	2,935	3	4,215	8	7,213
3	Cooperative or mutual drains.....	89	125,657	29,441	50	76,522	46	49,135
4	Legally organized public drains.....	150	6,926,485	350,674	150	6,858,571	23	67,914

State Table 4.—DRAINAGE PROJECTS, 1960,

	Year of organization	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	249	7,063,570	383,050	203	6,939,308	77	124,262
2	1950-1959.....	64	75,368	20,751	18	19,724	52	55,644
3	Prior to 1950.....	185	6,988,202	362,299	185	6,919,584	25	68,618

PROJECTS, 1960, BY SIZE

Cost of drainage works and services, 1950-1959				New works constructed, enlarged, or installed, 1950-1959									
Total		For new works		Open ditches		Tile or covered drains		Levees and dikes		Pumps		Other, projects reporting	
Projects reporting	Dollars	Projects reporting	Dollars	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Number		
202	21,032,299	110	5,726,914	78	271.1	60	282.8	6	6.5	2	2	19	1
50	255,517	38	241,123	20	22.0	25	51.5	1	1.5	1	1	3	2
40	186,667	22	120,577	18	27.6	8	26.6	1	0.6	...	...	7	3
31	518,510	13	129,947	11	26.0	4	7.7	1	0.1	...	...	2	4
14	161,245	3	30,279	2	10.3	1	0.8	...	...	...	...	...	5
20	2,111,382	4	237,336	4	7.2	...	...	3	4.3	...	...	3	6
11	1,748,754	2	122,532	2	20.4	...	...	...	...	...	...	...	7
13	3,735,017	7	1,160,903	4	39.8	3	4.2	...	...	1	1	2	8
23	12,315,207	21	3,684,217	17	117.8	19	192.0	...	...	...	...	2	9

BY TYPE OF ORGANIZATION

Cost of drainage works and services, 1950-1959				New works constructed, enlarged, or installed, 1950-1959									
Total		For new works		Open ditches		Tile or covered drains		Levees and dikes		Pumps		Other, projects reporting	
Projects reporting	Dollars	Projects reporting	Dollars	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Number		
202	21,032,299	110	5,726,914	78	271.1	60	282.8	6	6.5	2	2	19	1
10	78,749	10	75,749	4	6.1	7	20.0	1	1.5	1	1	1	2
67	425,094	61	410,626	44	66.1	29	65.1	2	0.7	...	...	10	3
125	20,528,456	39	5,240,539	30	198.9	24	197.7	3	4.3	1	1	8	4

BY YEAR OF ORGANIZATION

Cost of drainage works and services, 1950-1959				New works constructed, enlarged, or installed, 1950-1959									
Total		For new works		Open ditches		Tile or covered drains		Levees and dikes		Pumps		Other, projects reporting	
Projects reporting	Dollars	Projects reporting	Dollars	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Number		
202	21,032,299	110	5,726,914	78	271.1	60	282.8	6	6.5	2	2	19	1
64	442,370	64	437,340	45	66.2	32	75.3	1	0.1	...	...	9	2
138	20,589,929	46	5,289,574	33	204.9	28	207.5	5	6.4	2	2	10	3

DRAINAGE OF AGRICULTURAL LANDS

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	The State	Adair	Adams	Allamakee	Appanoose	Audubon	Benton	Black Hawk	Boone
AREA									
1 Approximate land area.....acres 1960...	35,860,480	364,160	272,640	408,960	334,720	286,720	459,520	362,880	366,720
2 Land in farms.....acres 1959...	33,830,950	353,983	260,160	357,225	303,805	277,950	441,685	329,100	349,566
3 Drainage projects..... number 1960...	249	1	1	2	1	5	1	4	2
4 1950...	86	1	1	1	1	1	1	1	1
5 Total area in drainage projects ¹ acres served 1960...	6,884,409	3,328	13,751	9,355	14,336	21,826	410	12,647	147,477
6 1950...	6,734,863	3,328	13,751	9,355	14,336	15,622	410	10,322	144,691
7 Area not used for agriculture or not drained..... acres served 1960...	13,070	...	...	...	...	...	...	...	2,240
8 Net area drained and used for agriculture..... acres served 1960...	6,871,339	3,328	13,751	9,355	14,336	21,826	410	12,647	145,237
9 Drainage established before 1950..... acres served 1960...	6,748,104	3,328	13,751	9,355	14,336	21,186	410	10,322	142,451
10 Area added, 1950-1959..... acres served 1960...	123,235	...	...	...	...	640	...	2,325	2,786
11 Area served by two or more projects..... acres served 1960...	190,819	...	...	...	...	...	...	...	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION									
12 Drains owned by one landowner..... number of projects...	10	...	...	...	...	1	...	...	...
13 acres served ² ...	11,428	...	...	...	...	640	...	...	...
14 Cooperative or mutual drains..... number of projects...	89	...	...	...	...	3	...	3	1
15 acres served ² ...	125,657	...	...	...	...	5,564	...	2,325	506
16 Legally organized public drains..... number of projects...	150	1	1	2	1	1	1	1	1
17 acres served ² ...	6,926,485	3,328	13,751	9,355	14,336	15,622	410	10,322	144,731
PROJECTS, 1960, BY YEAR STARTED									
18 1950-1959..... number of projects...	64	...	...	...	...	1	...	3	1
19 acres served ² ...	75,368	...	...	...	...	640	...	2,325	506
20 Prior to 1950..... number of projects...	185	1	1	2	1	4	1	1	1
21 acres served ² ...	6,988,202	3,328	13,751	9,355	14,336	21,186	410	10,322	144,731
DRAINAGE OPERATIONS, 1950-1959 ³									
22 Cost of drainage works and services.....projects reporting...	202	1	...	1	...	2	...	4	2
23 dollars...	21,032,299	3,385	...	17,499	...	8,412	...	28,427	130,875
24 New drainage works constructed, enlarged, or installed.....projects reporting...	110	...	...	1	...	2	...	3	2
25 dollars...	5,726,914	...	...	14,918	...	6,434	...	25,544	46,207
26 Open ditches.....projects reporting...	78	...	...	1	...	2	...	3	...
27 length, miles...	271.1	...	...	7.0	...	1.5	...	3.8	...
28 Tile or covered drains.....projects reporting...	60	...	...	...	...	...	...	2	2
29 length, miles...	282.8	...	...	...	...	...	...	3.8	6.7
30 Levees or dikes.....projects reporting...	6	...	...	...	...	...	...	...	...
31 length, miles...	6.5	...	...	...	...	...	...	...	...
32 Pumps.....projects reporting...	2	...	...	...	...	...	...	...	...
33 number of pumps...	2	...	...	...	...	...	...	...	...
34 Other (see text).....projects reporting...	19	...	...	...	...	1	...	...	1
35 Cost of maintenance, operation, repair, and administration.....projects reporting...	138	1	...	1	...	1	...	1	1
36 dollars...	15,305,385	3,385	...	2,581	...	1,978	...	2,883	84,668

¹Land served by two or more projects counted only once.²Acres served by two projects are included for each project. See text.³Includes projects taken over by another project prior to 1960. See text.

County Table 1. - DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	Bremer	Buchanan	Buena Vista	Butler	Calhoun	Carroll	Cass	Cedar	Cerro Gordo
AREA									
1 Approximate land area.....acres 1960...	280,960	364,160	366,720	372,480	366,080	367,360	357,760	374,400	368,640
2 Land in farms.....acres 1959...	264,952	350,406	358,595	356,218	355,559	364,756	349,904	352,107	340,504
3 Drainage projects..... number 1960...	1	4	2	3	1	2	4	1	8
4 1950...	1	1	1	1	1	1	1	1	1
5 Total area in drainage projects ¹ acres served 1960...	8,678	5,457	237,450	2,719	285,471	117,962	41,205	10,354	132,771
6 1950...	8,078	3,277	237,450	819	285,471	117,962	26,705	10,354	124,974
7 Area not used for agriculture or not drained..... acres served 1960...	...	...	...	...	...	1,080	1,200	...	1,760
8 Net area drained and used for agriculture..... acres served 1960...	8,678	5,457	237,450	2,719	285,471	116,882	40,005	10,354	131,011
9 Drainage established before 1950..... acres served 1960...	8,078	3,277	237,450	819	285,471	116,882	40,005	10,354	123,214
10 Area added, 1950-1959..... acres served 1960...	600	2,180	...	1,900	...	...	...	...	7,797
11 Area served by two or more projects..... acres served 1960...	...	...	520	...	...	73,143	...	...	360
PROJECTS, 1960, BY TYPE OF ORGANIZATION									
12 Drains owned by one landowner..... number of projects...	...	...	...	...	...	...	...	...	1
13 acres served ²...	...	...	...	...	...	...	...	...	1,100
14 Cooperative or mutual drains..... number of projects...	...	2	1	2	...	...	3	...	6
15 acres served ²...	...	2,180	520	1,900	...	...	14,000	...	6,016
16 Legally organized public drains..... number of projects...	1	2	1	1	1	2	1	1	1
17 acres served ² ...	8,678	3,277	237,450	819	285,471	190,025	26,005	10,354	124,255
PROJECTS, 1960, BY YEAR STARTED									
18 1950-1959..... number of projects...	...	2	1	2	...	...	...	...	6
19 acres served ²...	...	2,180	520	1,900	...	...	...	...	5,912
20 Prior to 1950..... number of projects...	1	2	1	1	1	2	4	1	2
21 acres served ² ...	8,678	3,277	237,450	819	285,471	190,025	40,005	10,354	125,459
DRAINAGE OPERATIONS, 1950-1959 ³									
22 Cost of drainage works and services..... projects reporting...	1	4	2	2	1	2	...	1	7
23 dollars...	6,533	5,687	731,628	5,095	742,312	648,064	...	7,866	163,185
24 New drainage works constructed, enlarged, or installed..... projects reporting...	1	2	2	2	...	...	...	...	7
25 dollars...	4,361	4,160	246,633	5,095	...	...	...	...	89,572
26 Open ditches..... projects reporting...	...	2	1	2	...	...	...	...	4
27 length, miles...	...	2.6	5.2	1.2	...	...	...	...	4.3
28 Tile or covered drains..... projects reporting...	1	...	2	1	...	...	...	...	6
29 length, miles...	0.8	...	38.5	0.7	...	...	...	...	8.1
30 Levees or dikes..... projects reporting...	...	...	...	...	...	...	...	...	...
31 length, miles...	...	...	...	...	...	...	...	...	...
32 Pumps..... projects reporting...	...	...	...	...	...	...	...	...	...
33 number of pumps...	...	...	...	...	...	...	...	...	...
34 Other (see text)..... projects reporting...	...	...	...	1	...	...	...	...	3
35 Cost of maintenance, operation, repair, and administration..... projects reporting...	1	2	1	...	1	2	...	1	1
36 dollars...	2,172	1,527	484,995	...	742,312	648,064	...	7,866	73,613

¹Land served by two or more projects counted only once.
²Acres served by two projects are included for each project. See text.
³Includes projects taken over by another project prior to 1960. See text.

DRAINAGE OF AGRICULTURAL LANDS

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	Chickasaw	Clay	Clinton	Crawford	Dallas	Davis	Deostur	Delaware	Des Moines
AREA									
1 Approximate land area.....acres 1960...	323,200	365,440	444,800	458,240	382,080	325,760	339,200	366,720	261,760
2 Land in farms.....acres 1959...	306,559	343,215	418,064	439,662	354,014	294,228	301,269	351,162	235,442
3 Drainage projects..... number 1960...	1	2	4	1	1	2	1	1	3
4 1950...	...	1	1	1	1	1	1	1	1
5 Total area in drainage projects ¹ acres served 1960...	347	139,535	86,220	40,632	91,234	32,131	19,001	1,575	35,041
6 1950...	...	132,987	82,176	40,632	90,588	32,131	19,001	1,575	32,768
7 Area not used for agriculture or not drained..... acres served 1960...	...	...	...	...	1,280	...	...	...	...
8 Net area drained and used for agriculture..... acres served 1960...	347	139,535	86,220	40,632	89,954	32,131	19,001	1,575	35,041
9 Drainage established before 1950..... acres served 1960...	...	132,987	82,176	40,632	89,308	32,131	19,001	1,575	35,041
10 Area added, 1950-1959..... acres served 1960...	347	6,548	4,044	...	646	...	...	...	...
11 Area served by two or more projects..... acres served 1960...	...	...	...	...	...	...	...	...	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION									
12 Drains owned by one landowner..... number of projects...	...	...	...	...	...	...	...	...	...
13 acres served ²..	...	...	...	...	...	...	...	...	...
14 Cooperative or mutual drains..... number of projects...	1	1	3	...	...	...	...	1	...
15 acres served ² ..	347	660	4,044	...	...	...	...	1,575	...
16 Legally organized public drains..... number of projects...	...	1	1	1	1	2	1	...	3
17 acres served ²..	...	138,875	82,176	40,632	89,954	32,131	19,001	...	35,041
PROJECTS, 1960, BY YEAR STARTED									
18 1950-1959..... number of projects...	1	1	3	...	...	...	...	...	...
19 acres served ² ..	347	660	4,044	...	...	...	...	...	...
20 Prior to 1950..... number of projects...	...	1	1	1	1	2	1	1	3
21 acres served ²..	...	138,875	82,176	40,632	89,954	32,131	19,001	1,575	35,041
DRAINAGE OPERATIONS, 1950-1959 ³									
22 Cost of drainage works and services..... projects reporting...	1	2	4	1	1	2	...	...	3
23 dollars...	5,300	215,317	259,838	83,083	37,724	8,256	...	...	688,465
24 New drainage works constructed, enlarged, or installed..... projects reporting...	1	2	4	...	1	...	...	...	...
25 dollars...	5,300	168,485	84,618	...	29,069	...	...	...	...
26 Open ditches..... projects reporting...	...	2	3	...	...	...	...	...	...
27 length, miles...	...	5.2	11.1	...	...	...	...	...	...
28 Tile or covered drains..... projects reporting...	1	1	2	...	1	...	...	...	...
29 length, miles...	1.9	15.6	0.9	...	3.7	...	...	...	...
30 Levees or dikes..... projects reporting...	...	...	...	...	...	...	...	...	...
31 length, miles...	...	...	...	...	...	...	...	...	...
32 Pumps..... projects reporting...	...	...	...	...	...	...	...	...	...
33 number of pumps...	...	...	...	...	...	...	...	...	...
34 Other (see text)..... projects reporting...	...	...	...	...	1	...	...	...	...
35 Cost of maintenance, operation, repair, and administration..... projects reporting...	...	1	1	1	1	2	...	...	3
36 dollars...	...	46,832	175,220	83,083	8,655	8,256	...	...	688,465

¹Land served by two or more projects counted only once.²Acres served by two projects are included for each project. See text.³Includes projects taken over by another project prior to 1960. See text.

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	Dickinson	Dubuque	Emmet	Fayette	Floyd	Franklin	Fremont	Greene	Grundy
AREA									
1 Approximate land area.....acres 1960...	240,640	389,120	252,800	465,920	321,920	375,040	334,720	364,160	320,640
2 Land in farms.....acres 1959...	237,704	343,185	240,384	447,708	304,207	363,684	311,881	354,548	319,596
3 Drainage projects..... number 1960...	1	1	1	3	3	17	11	3	14
4 1950...	1	1	1	1	1	1	1	1	1
5 Total area in drainage projects ¹ acres served 1960...	127,379	1,475	185,699	4,683	41,808	166,236	111,446	156,389	22,478
6 1950...	126,979	1,475	184,650	3,113	39,538	159,517	111,446	153,139	10,748
7 Area not used for agriculture or not drained..... acres served 1960...	...	...	...	...	...	...	...	560	...
8 Net area drained and used for agriculture..... acres served 1960...	127,379	1,475	185,699	4,683	41,808	166,236	111,446	155,829	22,478
9 Drainage established before 1950..... acres served 1960...	126,979	1,475	184,650	3,113	39,538	160,207	111,446	152,579	11,282
10 Area added, 1950-1959..... acres served 1960...	400	...	1,049	1,570	2,270	6,029	...	3,250	11,196
11 Area served by two or more projects..... acres served 1960...	...	...	...	...	...	516	37,066	...	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION									
12 Drains owned by one landowner..... number of projects...	...	...	...	...	...	...	...	1	3
13 acres served ²...	...	...	...	...	...	...	...	690	2,093
14 Cooperative or mutual drains..... number of projects...	...	...	...	2	2	3	4	...	10
15 acres served ²...	...	...	...	1,570	2,270	2,958	3,890	...	11,668
16 Legally organized public drains..... number of projects...	1	1	1	1	1	14	7	2	1
17 acres served ² ...	127,379	1,475	185,699	3,113	39,538	163,794	146,034	155,139	8,717
PROJECTS, 1960, BY YEAR STARTED									
18 1950-1959..... number of projects...	...	...	...	2	2	2	4	1	10
19 acres served ²...	...	...	...	1,570	2,270	2,268	3,890	690	10,492
20 Prior to 1950..... number of projects...	1	1	1	1	1	15	7	2	4
21 acres served ² ...	127,379	1,475	185,699	3,113	39,538	164,484	146,034	155,139	11,986
DRAINAGE OPERATIONS, 1950-1959 ³									
22 Cost of drainage works and services.....projects reporting...	1	1	1	3	3	17	10	3	13
23 dollars...	106,099	5,000	208,655	3,737	58,334	355,749	670,417	576,455	62,108
24 New drainage works constructed, enlarged, or installed.....projects reporting...	1	...	1	2	2	3	5	2	12
25 dollars...	15,000	...	10,083	2,652	9,005	97,570	50,787	137,829	61,807
26 Open ditches.....projects reporting...	...	...	1	2	2	1	5	1	4
27 length, miles...	...	...	1.5	1.5	1.6	0.2	26.3	1.8	2.9
28 Tile or covered drains.....projects reporting...	1	...	1	...	...	3	1	2	10
29 length, miles...	1.5	...	3.7	...	...	13.1	0.1	13.1	13.2
30 Levees or dikes.....projects reporting...	...	...	...	...	...	...	...	...	...
31 length, miles...	...	...	...	...	...	...	...	...	...
32 Pumps.....projects reporting...	...	...	...	...	...	...	...	...	...
33 number of pumps...	...	...	...	...	...	...	...	...	...
34 Other (see text).....projects reporting...	...	...	...	...	2	...	1	...	1
35 Cost of maintenance, operation, repair, and administration.....projects reporting...	1	1	1	1	1	15	6	2	1
36 dollars...	91,099	5,000	198,572	1,085	49,329	258,179	619,630	438,626	301

¹Land served by two or more projects counted only once.

²Acres served by two projects are included for each project. See text.

³Includes projects taken over by another project prior to 1960. See text.

DRAINAGE OF AGRICULTURAL LANDS

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	Guthrie	Hamilton	Hancock	Hardin	Harrison	Howard	Humboldt	Iowa	Jackson
AREA									
1 Approximate land area.....acres 1960...	381,440	369,280	364,800	367,360	444,800	301,440	278,400	373,760	412,160
2 Land in farms.....acres 1959...	347,101	363,877	352,728	352,136	414,419	292,276	277,040	356,426	368,918
3 Drainage projects..... number 1960...	1	3	3	1	7	2	2	3	1
4 1950...	1	1	1	1	1	1	1	1	1
5 Total area in drainage projects ¹ acres served 1960...	15,104	265,793	312,559	162,388	142,579	7,901	204,220	21,459	5,018
6 1950...	15,104	261,348	306,318	150,032	139,379	7,737	203,290	19,169	8,448
7 Area not used for agriculture or not drained..... acres served 1960...	...	500	...	...	...	...	850	1,200	...
8 Net area drained and used for agriculture..... acres served 1960...	15,104	265,293	312,559	162,388	142,579	7,901	203,370	20,259	5,018
9 Drainage established before 1950..... acres served 1960...	15,104	260,848	306,318	152,632	139,379	7,737	203,290	18,649	5,018
10 Area added, 1950-1959..... acres served 1960...	...	4,445	6,241	9,756	3,200	164	80	1,610	...
11 Area served by two or more projects..... acres served 1960...	...	2,660	700	...	1,200	...	500	...	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION									
12 Drains owned by one landowner..... number of projects...	...	...	...	...	...	...	...	...	...
13 acres served ²...	...	...	...	...	...	...	...	...	...
14 Cooperative or mutual drains..... number of projects...	...	2	2	...	1	1	1	2	...
15 acres served ²...	...	2,660	1,278	...	1,200	164	500	1,863	...
16 Legally organized public drains..... number of projects...	1	1	1	1	6	1	1	1	1
17 acres served ² ...	15,104	265,293	311,981	162,388	142,579	7,737	203,370	18,396	5,018
PROJECTS, 1960, BY YEAR STARTED									
18 1950-1959..... number of projects...	...	...	1	...	1	1	...	...	...
19 acres served ²...	...	...	700	...	1,200	164	...	...	...
20 Prior to 1950..... number of projects...	1	3	2	1	6	1	2	3	1
21 acres served ² ...	15,104	267,953	312,559	162,388	142,579	7,737	203,870	20,259	5,018
DRAINAGE OPERATIONS, 1950-1959 ³									
22 Cost of drainage works and services..... projects reporting...	1	2	1	1	7	1	1	2	1
23 dollars...	14,547	587,419	767,695	271,012	1,720,901	4,798	441,971	66,337	17,892
24 New drainage works constructed, enlarged, or installed..... projects reporting...	...	2	1	1	3	...	1	1	...
25 dollars...	...	216,892	302,023	144,201	1,023,454	...	54,466	62,302	...
26 Open ditches..... projects reporting...	...	1	1	1	2	...	1	1	...
27 length, miles...	...	0.9	16.2	7.3	10.5	...	1.0	1.7	...
28 Tile or covered drains..... projects reporting...	...	1	1	1	...	...	1	...	...
29 length, miles...	...	26.1	13.8	19.5	...	...	3.4	...	...
30 Levees or dikes..... projects reporting...	...	...	...	...	...	...	...	1	...
31 length, miles...	...	...	...	...	...	...	...	1.5	...
32 Pumps..... projects reporting...	...	...	...	...	1	...	...	...	...
33 number of pumps...	...	...	...	...	1	...	...	...	...
34 Other (see text)..... projects reporting...	...	1	1	...	...	...	...	1	...
35 Cost of maintenance, operation, repair, and administration..... projects reporting...	1	2	1	1	7	1	1	2	1
36 dollars...	14,547	370,527	465,672	126,811	697,447	4,798	387,505	4,035	17,892

¹Land served by two or more projects counted only once.²Acres served by two projects are included for each project. See text.³Includes projects taken over by another project prior to 1960. See text.

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	Jasper	Jefferson	Johnson	Jones	Kossuth	Lee	Linn	Louisa	Madison
AREA									
1 Approximate land area.....acres 1960...	471,040	279,040	394,880	374,400	626,560	334,080	456,320	257,920	361,600
2 Land in farms.....acres 1959...	442,029	255,595	354,829	351,133	612,854	294,451	405,781	235,354	343,784
3 Drainage projects..... number 1960...	2	1	1	1	8	3	1	8	1
4 1950...	1	1	1	1	1	1	1	1	1
5 Total area in drainage projects ¹ acres served 1960...	55,992	9,339	13,824	1,311	476,591	26,180	4,864	53,320	1,040
6 1950...	66,816	9,339	13,824	1,311	475,136	13,824	4,864	52,330	1,040
7 Area not used for agriculture or not drained..... acres served 1960...	...	...	...	...	...	...	...	...	...
8 Net area drained and used for agriculture..... acres served 1960...	55,992	9,339	13,824	1,311	476,591	26,180	4,864	53,320	1,040
9 Drainage established before 1960..... acres served 1960...	55,992	9,339	13,824	1,311	474,816	26,180	4,864	51,970	1,040
10 Area added, 1950-1959..... acres served 1960...	...	...	...	...	1,775	...	...	1,350	...
11 Area served by two or more projects..... acres served 1960...	...	...	...	...	5,342	535	...	...	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION									
12 Drains owned by one landowner..... number of projects...	...	...	...	...	1	1	...	...	...
13 acres served ²...	...	...	...	...	3,480	535	...	...	...
14 Cooperative or mutual drains..... number of projects...	1	...	...	...	5	...	...	1	...
15 acres served ² ...	3,000	...	...	...	4,917	...	...	1,350	...
16 Legally organized public drains..... number of projects...	1	1	1	1	2	2	1	7	1
17 acres served ² ...	52,992	9,339	13,824	1,311	473,536	26,180	4,864	51,970	1,040
PROJECTS, 1960, BY YEAR STARTED									
18 1960-1959..... number of projects...	...	...	...	...	3	...	...	1	...
19 acres served ²...	...	...	...	...	2,887	...	...	1,350	...
20 Prior to 1960..... number of projects...	2	1	1	1	5	3	1	7	1
21 acres served ² ...	55,992	9,339	13,824	1,311	479,046	26,715	4,864	51,970	1,040
DRAINAGE OPERATIONS, 1960-1959 ³									
22 Cost of drainage works and services.....projects reporting...	1	...	...	1	7	2	1	7	...
23 dollars...	6,098	...	...	1,489	605,138	243,800	2,795	385,637	...
24 New drainage works constructed, enlarged, of installed.....projects reporting...	...	...	...	...	5	2	...	2	...
25 dollars...	...	...	...	...	49,657	85,500	...	102,950	...
26 Open ditches.....projects reporting...	...	...	...	...	3	2	...	2	...
27 length, miles...	...	...	...	...	2.9	5.0	...	3.5	...
28 Tile or covered drains.....projects reporting...	...	...	...	...	4	...	...	...	...
29 length, miles...	...	...	...	...	5.6	...	...	...	...
30 Levees or dikes.....projects reporting...	...	...	...	...	...	2	...	1	...
31 length, miles...	...	...	...	...	...	1.8	...	2.5	...
32 Pumps.....projects reporting...	...	...	...	...	...	1	...	...	...
33 number of pumps...	...	...	...	...	...	1	...	...	...
34 Other (see text).....projects reporting...	...	...	...	...	1	...	...	1	...
35 Cost of maintenance, operation, repair, and administration.....projects reporting...	1	...	...	1	4	1	1	6	...
36 dollars...	6,098	...	...	1,489	555,481	158,300	2,795	282,687	...

¹Land served by two or more projects counted only once.
²Acres served by two projects are included for each project. See text.
³Includes projects taken over by another project prior to 1960. See text.

DRAINAGE OF AGRICULTURAL LANDS

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	Maheaska	Marion	Marshall	Mills	Mitchell	Monona	Montgomery	Muscatine	O'Brien
AREA									
1 Approximate land area.....acres 1960...	366,080	363,520	367,360	285,440	298,880	446,080	270,080	280,960	368,000
2 Land in farms.....acres 1959...	354,292	334,963	353,779	265,606	283,982	418,442	266,481	257,629	357,178
3 Drainage projects..... number 1960...	3	2	2	13	2	4	2	2	1
4 1950...	1	1	1	1	1	1	1	1	1
5 Total area in drainage projects ¹ acres served 1960...	37,519	21,966	20,480	75,040	12,579	155,566	25,225	31,523	20,019
6 1950...	37,519	22,300	20,480	74,411	12,579	155,566	23,405	31,523	20,019
7 Area not used for agriculture or not drained..... acres served 1960...	...	...	...	...	...	...	...	...	...
8 Net area drained and used for agriculture..... acres served 1960...	37,519	21,966	20,480	75,040	12,579	155,566	25,225	31,523	20,019
9 Drainage established before 1950..... acres served 1960...	37,519	21,966	20,480	74,411	12,579	155,566	25,225	31,523	20,019
10 Area added, 1950-1959..... acres served 1960...	...	...	...	629	...	...	...	...	...
11 Area served by two or more projects..... acres served 1960...	...	...	...	6,574	...	45,364	...	...	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION									
12 Drains owned by one landowner..... number of projects...	...	...	...	...	...	...	...	...	...
13 acres served ²..	...	...	...	...	...	...	...	...	...
14 Cooperative or mutual drains..... number of projects...	2	1	...	7	...	...	1	...	...
15 acres served ² ..	2,120	600	...	8,483	...	...	1,820	...	...
16 Legally organized public drains..... number of projects...	1	1	2	6	2	4	1	2	1
17 acres served ² ..	35,399	21,366	20,480	73,131	12,579	200,930	23,405	31,523	20,019
PROJECTS, 1960, BY YEAR STARTED									
18 1950-1959..... number of projects...	...	...	...	4	...	...	...	...	...
19 acres served ²..	...	...	...	5,403	...	...	...	...	...
20 Prior to 1950..... number of projects...	3	2	2	9	2	4	2	2	1
21 acres served ² ..	37,519	21,966	20,480	76,211	12,579	200,930	25,225	31,523	20,019
DRAINAGE OPERATIONS, 1950-1959 ³									
22 Cost of drainage works and services.....projects reporting...	1	...	2	13	2	4	...	2	1
23 dollars...	13,867	...	585	506,986	1,269	2,957,767	...	203,157	9,481
24 New drainage works constructed, enlarged, or installed.....projects reporting...	...	...	...	6	...	1	...	...	...
25 dollars...	...	...	...	35,502	...	1,184,818	...	...	...
26 Open ditches.....projects reporting...	...	...	...	6	...	1	...	...	...
27 length, miles...	...	...	...	16.3	...	20.0	...	...	...
28 Tile or covered drains.....projects reporting...	...	...	...	...	...	...	...	...	...
29 length, miles...	...	...	...	...	...	...	...	...	...
30 Levees or dikes.....projects reporting...	...	...	...	2	...	...	...	...	...
31 length, miles...	...	...	...	0.7	...	...	...	...	...
32 Pumps.....projects reporting...	...	...	...	...	...	...	...	...	...
33 number of pumps...	...	...	...	...	...	...	...	...	...
34 Other (see text).....projects reporting...	...	...	...	...	...	...	...	...	...
35 Cost of maintenance, operation, repair, and administration.....projects reporting...	1	...	2	11	2	4	...	2	1
36 dollars...	13,867	...	585	471,484	1,269	1,772,949	...	203,157	9,481

¹Land served by two or more projects counted only once.²Acres served by two projects are included for each project. See text.³Includes projects taken over by another project prior to 1960. See text.

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data.]

Item and Census year	Osceola	Page	Palo Alto	Plymouth	Pocahontas	Polk	Pottawat- tamie	Poweshiek	Ringgold
AREA									
1 Approximate land area.....acres 1960...	254,080	342,400	359,040	552,320	371,200	380,160	616,960	376,960	344,320
2 Land in farms.....acres 1959...	251,279	331,593	353,597	535,809	358,421	297,321	568,626	364,398	331,318
3 Drainage projects..... number 1960...	2	3	6	1	3	1	5	3	1
4 1950...	1	1	1	1	1	1	1	1	1
5 Total area in drainage projects ¹ acres served 1960...	83,871	49,152	253,715	6,502	314,220	62,796	102,760	16,608	16,043
6 1950...	83,680	49,152	236,593	6,502	306,460	62,796	102,440	17,749	16,043
7 Area not used for agriculture or not drained..... acres served 1960...	...	...	...	...	...	1,760	...	...	...
8 Net area drained and used for agriculture..... acres served 1960...	83,871	49,152	253,715	6,502	314,220	61,036	102,760	16,608	16,043
9 Drainage established before 1950..... acres served 1960...	83,330	49,152	236,593	6,502	309,265	61,036	102,440	16,608	16,043
10 Area added, 1950-1959..... acres served 1960...	532	...	17,122	...	4,955	...	320	...	...
11 Area served by two or more projects..... acres served 1960...	2,035	...	4,470	...	900	...	6,760	...	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION									
12 Drains owned by one landowner..... number of projects...	...	...	...	...	...	...	...	...	...
13 acres served ²...	...	...	...	...	...	...	...	...	...
14 Cooperative or mutual drains..... number of projects...	1	...	5	...	2	...	...	2	...
15 acres served ² ...	2,035	...	10,830	...	1,300	...	...	9,749	...
16 Legally organized public drains..... number of projects...	1	3	1	1	1	1	5	1	1
17 acres served ² ...	83,871	49,152	247,355	6,502	313,820	61,036	109,520	6,859	16,043
PROJECTS, 1960, BY YEAR STARTED									
18 1960-1959..... number of projects...	1	...	5	...	...	...	...	...	...
19 acres served ² ...	2,035	...	10,830	...	...	...	...	...	...
20 Prior to 1950..... number of projects...	1	3	1	1	3	1	5	3	1
21 acres served ² ...	83,871	49,152	247,355	6,502	315,120	61,036	109,520	16,608	16,043
DRAINAGE OPERATIONS, 1950-1959 ³									
22 Cost of drainage works and services.....projects reporting...	2	3	6	1	1	1	5	1	...
23 dollars...	42,118	247,496	557,270	5,256	1,317,738	63,226	399,170	30	...
24 New drainage works constructed, enlarged, or installed.....projects reporting...	2	2	6	...	1	...	2	...	...
25 dollars...	8,323	123,461	239,094	...	400,012	...	9,551	...	...
26 Open ditches.....projects reporting...	1	2	4	...	1	...	1	...	...
27 length, miles...	3.0	16.3	24.4	...	27.9	...	4.7	...	...
28 Tile or covered drains.....projects reporting...	1	...	3	...	1	...	1	...	...
29 length, miles...	0.4	...	11.5	...	16.1	...	0.7	...	...
30 Levees or dikes.....projects reporting...	...	...	...	...	...	...	...	...	...
31 length, miles...	...	...	...	...	...	...	...	...	...
32 Pumps.....projects reporting...	...	...	...	...	...	...	...	...	...
33 number of pumps...	...	...	...	...	...	...	...	...	...
34 Other (see text).....projects reporting...	...	...	1	...	...	...	1	...	...
35 Cost of maintenance, operation, repair, and administration.....projects reporting...	1	3	1	1	1	1	5	1	...
36 dollars...	33,795	124,035	318,176	5,256	917,726	63,226	389,619	30	...

¹Land served by two or more projects counted only once.
²Acres served by two projects are included for each project. See text.
³Includes projects taken over by another project prior to 1960. See text.

DRAINAGE OF AGRICULTURAL LANDS

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	Sao	Scott	Shelby	Story	Tama	Taylor	Van Buren	Wepello	Warren
AREA									
1 Approximate land area.....acres 1960...	369,920	289,920	375,680	363,520	460,800	337,920	311,680	279,680	366,080
2 Land in farms.....acres 1959...	358,707	258,024	363,940	348,341	438,238	330,398	281,416	248,356	337,612
3 Drainage projects..... number 1960...	5	1	1	2	1	1	1	5	1
4 1950...	1	1	1	1	1	1	1	1	1
5 Total area in drainage projects ¹ acres served 1960...	121,412	1,638	43,090	168,757	2,611	14,757	13,198	8,645	48,469
6 1950...	117,842	1,638	43,090	168,757	2,611	14,757	13,198	9,696	48,469
7 Area not used for agriculture or not drained..... acres served 1960...	...	...	...	...	...	...	...	...	...
8 Net area drained and used for agriculture..... acres served 1960...	121,412	1,638	43,090	168,757	2,611	14,757	13,198	8,645	48,469
9 Drainage established before 1950..... acres served 1960...	117,842	1,638	43,090	168,757	2,611	14,757	13,198	8,645	48,469
10 Area added, 1950-1959..... acres served 1960...	3,570	...	...	...	...	...	...	...	...
11 Area served by two or more projects..... acres served 1960...	...	...	...	...	...	...	...	...	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION									
12 Drains owned by one landowner..... number of projects...	1	...	...	...	...	...	...	...	...
13 acres served ² ...	1,490	...	...	...	...	...	...	...	...
14 Cooperative or mutual drains..... number of projects...	3	...	...	...	...	...	...	...	...
15 acres served ² ...	2,080	...	...	...	...	...	...	...	...
16 Legally organized public drains..... number of projects...	1	1	1	2	1	1	1	5	1
17 acres served ² ...	117,842	1,638	43,090	168,757	2,611	14,757	13,198	8,645	48,469
PROJECTS, 1960, BY YEAR STARTED									
18 1960-1959..... number of projects...	4	...	...	...	...	...	...	...	...
19 acres served ² ...	3,570	...	...	...	...	...	...	...	...
20 Prior to 1960..... number of projects...	1	1	1	2	1	1	1	5	1
21 acres served ² ...	117,842	1,638	43,090	168,757	2,611	14,757	13,198	8,645	48,469
DRAINAGE OPERATIONS, 1950-1959 ³									
22 Cost of drainage works and services.....projects reporting...	5	1	...	2	1	...	...	4	...
23 dollars...	681,347	4,000	...	62,619	4,201	...	...	8,754	...
24 New drainage works constructed, enlarged, or installed.....projects reporting...	5	...	...	...	...	...	...	...	...
25 dollars...	27,770	...	...	...	...	...	...	...	...
26 Open ditches.....projects reporting...	4	...	...	...	...	...	...	...	...
27 length, miles...	9.5	...	...	...	...	...	...	...	...
28 Tile or covered drains.....projects reporting...	2	...	...	...	...	...	...	...	...
29 length, miles...	3.0	...	...	...	...	...	...	...	...
30 Levees or dikes.....projects reporting...	...	...	...	...	...	...	...	...	...
31 length, miles...	...	...	...	...	...	...	...	...	...
32 Pumps.....projects reporting...	...	...	...	...	...	...	...	...	...
33 number of pumps...	...	...	...	...	...	...	...	...	...
34 Other (see text).....projects reporting...	...	...	...	...	...	...	...	...	...
35 Cost of maintenance, operation, repair, and administration.....projects reporting...	1	1	...	2	1	...	...	4	...
36 dollars...	653,577	4,000	...	62,619	4,201	...	...	8,754	...

¹Land served by two or more projects counted only once.²Acres served by two projects are included for each project. See text.³Includes projects taken over by another project prior to 1960. See text.

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	Washington	Wayne	Webster	Winneshago	Woodbury	Worth	Wright
AREA							
1 Approximate land area.....acres 1960...	363,520	340,480	459,520	256,640	557,440	256,000	369,280
2 Land in farms.....acres 1959...	339,969	317,926	437,017	250,977	502,527	249,285	362,797
3 Drainage projects..... number 1960...	2	1	3	13	3	4	1
4	1950...	1	1	1	1	1	1
5 Total area in drainage projects ¹ acres served 1960...	3,755	13,000	320,660	213,765	101,253	129,507	266,320
6	1950...	3,755	13,000	319,318	209,818	101,253	265,120
7 Area not used for agriculture or not drained..... acres served 1960...	...	...	640	...	...	...	...
8 Net area drained and used for agriculture..... acres served 1960...	3,755	13,000	320,020	213,765	101,253	129,507	266,320
9 Drainage established before 1960..... acres served 1960...	3,755	13,000	318,118	209,818	101,253	124,647	265,120
10 Area added, 1960-1959..... acres served 1960...	...	...	1,902	3,947	...	4,860	1,200
11 Area served by two or more projects..... acres served 1960...	1,000	...	...	274	...	900	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION							
12 Drains owned by one landowner..... number of projects...	...	...	...	...	...	1	...
13	acres served ²..	...	...	...	...	1,400	...
14 Cooperative or mutual drains.....number of projects...	1	...	2	2	...	2	...
15	acres served ² ..	1,000	...	1,767	...	3,848	...
16 Legally organized public drains..... number of projects...	1	1	1	11	3	1	1
17	acres served ² ..	3,755	13,000	318,920	212,272	101,253	266,320
PROJECTS, 1960, BY YEAR STARTED							
18 1950-1959..... number of projects...	...	...	...	2	...	3	...
19	acres served ²..	...	...	1,767	...	5,248	...
20 Prior to 1950..... number of projects...	2	1	3	11	3	1	1
21	acres served ² ..	4,755	13,000	320,020	212,272	101,253	266,320
DRAINAGE OPERATIONS, 1950-1959 ³							
22 Cost of drainage works and services.....projects reporting...	1	...	1	12	3	4	1
23	dollars...	4,500	...	856,297	510,328	918,904	424,955
24 New drainage works constructed, enlarged, or installed.....projects reporting...	1	...	1	4	...	4	1
25	dollars...	2,900	...	150,241	182,137	54,066	152,465
26 Open ditches.....projects reporting...	1	...	1	4	...	3	1
27	length, miles...	1.3	...	0.6	8.6	3.6	8.2
28 Tile or covered drains.....projects reporting...	1	...	1	2	...	2	1
29	length, miles...	1.8	...	13.9	22.8	12.2	6.6
30 Levees or dikes.....projects reporting...	...	...	...	...	...	...	...
31	length, miles...	...	...	...	...	...	...
32 Pumps.....projects reporting...	...	...	...	...	...	...	...
33	number of pumps...	...	...	...	...	...	...
34 Other (see text).....projects reporting...	...	...	...	1	...	...	...
35 Cost of maintenance, operation, repair, and administration.....projects reporting...	1	...	1	10	3	1	1
36	dollars...	1,600	...	706,056	328,191	918,904	272,490

¹Land served by two or more projects counted only once.
²Acres served by two projects are included for each project. See text.
³Includes projects taken over by another project prior to 1960. See text.

State Table 1.—DRAINAGE PROJECTS—NUMBER, AREA, COST, AND WORKS, 1920 TO 1960

[See text for comparability of data.]

Item	1960 Census	1950 Census	1940 Census	1930 Census	1920 Census
AREA					
Approximate land area..... acres	52,510,720	52,549,120	52,552,320	52,335,360	52,335,360
Land in farms..... acres	50,152,870	48,611,366	48,173,635	46,975,647	45,425,179
Drainage projects..... number	103	121	88	NA	NA
Total area in drainage projects..... acres served	402,330	356,988	258,113	257,169	93,856
Area not used for agriculture or not drained..... acres served	29,220	NA	NA	NA	NA
Not area drained and used for agriculture..... acres served	373,110	NA	¹ 250,455	¹ 253,845	NA
Drainage established 10 years or more before Census date..... acres served	309,135	NA	NA	NA	NA
Drainage established within 10 years of Census date..... acres served	63,975	NA	NA	NA	NA
Area served by two or more projects..... acres served	4,873	6,353	833	557	...
PROJECTS BY TYPE OF ORGANIZATION					
Drains owned by one landowner..... number of projects	5	(²)	NA	NA	NA
acres served...	3,660	(²)	7,754	5,550	2,200
Cooperative or mutual drains..... number of projects	14	(²)	...	...	...
acres served...	23,427	(²)	...	...	...
Legally organized public drains..... number of projects	84	² 84	NA	NA	NA
acres served...	350,896	² 355,089	250,359	251,619	91,656
PROJECTS BY YEAR STARTED					
Started 10 years or more before Census date..... number of projects	76	² 70	NA	NA	NA
acres served...	309,211	² 306,688	244,173	214,416	46,277
Started within 10 years of Census date..... number of projects	27	² 14	NA	NA	NA
acres served...	68,772	² 48,401	13,940	42,753	47,579
OPERATIONS, 10-YEAR PERIOD PRECEDING CENSUS DATE					
Cost of drainage works and services..... projects reporting	96	² 60	NA	NA	NA
dollars...	1,665,416	1,116,786	NA	NA	NA
New drainage works constructed, enlarged, or installed..... projects reporting	45	³ 10	NA	NA	NA
cost, dollars...	850,795	³ 279,036	NA	NA	NA
Open ditches..... projects reporting	44	9	NA	NA	NA
length, miles...	168.0	48	NA	NA	NA
Tile or covered drains..... projects reporting	1	...	NA	NA	NA
length, miles...	0.1	...	NA	NA	NA
Levees or dikes..... projects reporting	13	7	NA	NA	NA
length, miles...	33.4	58	NA	NA	NA
Pumps..... projects reporting	...	NA	NA	NA	NA
number of pumps...	...	NA	NA	NA	NA
Other (see text)..... projects reporting	2	NA	NA	NA	NA
Cost of maintenance, operation, repair, and administration..... projects reporting	76	NA	NA	NA	NA
dollars...	814,621	837,750	NA	NA	NA
STATUS ON CENSUS DATE					
Capital investment..... dollars	NA	NA	3,733,919	2,701,082	936,508
Physical works:					
Open ditches..... length, miles	NA	NA	381.4	324.7	138.4
Tile drains..... length, miles	NA	NA	210.5	212.1	213.0
Levees and dikes..... length, miles	NA	NA	278.3	227.0	165.1
Pumping units..... number of units	NA	(²)	4	2	NA

NA Not available.

¹Not fully comparable. See text.

²1950 figures exclude 37 projects and 1,899 acres in "irrigation enterprises."

³Cost of new works for lands not previously drained.

DRAINAGE OF AGRICULTURAL LANDS

State Table 2.—DRAINAGE

	Size of project (Based on area of agricultural land in project)	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	103	377,983	9,746	81	313,908	26	64,075
2	500 to 999 acres.....	26	20,036	3,273	13	10,319	13	9,717
3	1,000 to 1,999 acres.....	23	34,597	2,233	20	29,787	3	4,810
4	2,000 to 4,999 acres.....	24	70,415	1,400	22	59,065	4	11,350
5	5,000 to 9,999 acres.....	22	155,065	2,020	19	128,867	5	26,198
6	10,000 to 19,999 acres.....	8	97,870	820	7	85,870	1	12,000
7	20,000 to 49,999 acres.....	...	...	...	...	...	...	...
8	50,000 to 99,999 acres.....	...	...	...	...	...	...	...
9	100,000 or more acres.....	...	...	...	...	...	...	...

State Table 3.—DRAINAGE PROJECTS, 1960,

	Type of organization	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	103	377,983	9,746	81	313,908	26	64,075
2	Drains owned by one landowner.....	5	3,660	...	...	...	5	3,660
3	Cooperative or mutual drains.....	14	23,427	1,660	4	5,060	10	18,367
4	Legally organized public drains.....	84	350,896	8,086	77	308,848	11	42,048

¹Includes projects taken over by another project prior to 1960. See text.

State Table 4.—DRAINAGE PROJECTS, 1960,

	Year of organization	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	103	377,983	9,746	81	313,908	26	64,075
2	1950-1959.....	27	68,772	1,920	5	7,687	24	61,085
3	Prior to 1950.....	76	309,211	7,826	76	306,221	2	2,990

¹Includes projects taken over by another project prior to 1960. See text.

PROJECTS, 1960, BY SIZE

Cost of drainage works and services, 1950-1959				New works constructed, enlarged, or installed, 1950-1959									
Total		For new works		Open ditches		Tile or covered drains		Levees and dikes		Pumps		Other, projects reporting	
Projects reporting	Dollars	Projects reporting	Dollars	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Number		
96	1,665,416	45	850,795	44	168.0	1	0.1	13	33.4	...	...	2	1
26	90,481	17	62,513	17	39.1	...	...	2	1.4	...	...	...	2
21	144,274	5	53,900	5	19.5	...	...	2	2.3	...	...	...	3
22	350,755	9	125,591	9	36.2	...	...	3	9.4	...	...	1	4
20	637,243	11	429,272	11	35.2	1	0.1	4	11.0	...	...	1	5
7	442,663	3	179,519	2	38.0	...	...	2	9.3	...	...	...	6
...	...	...	...	...	...	...	...	...	...	...	...	...	7
...	...	...	...	...	...	...	...	...	...	...	...	...	8
...	...	...	...	...	...	...	...	...	...	...	...	...	9

BY TYPE OF ORGANIZATION

Cost of drainage works and services, 1950-1959				New works constructed, enlarged, or installed, 1950-1959									
Total		For new works		Open ditches		Tile or covered drains		Levees and dikes		Pumps		Other, projects reporting	
Projects reporting	Dollars	Projects reporting	Dollars	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Number		
96	1,665,416	45	850,795	44	168.0	1	0.1	13	33.4	...	...	2	1
5	25,300	5	18,500	5	15.2	...	...	1	0.4	...	...	...	2
16	97,595	12	78,295	12	35.4	...	...	2	2.3	...	...	...	3
75	1,542,521	28	754,000	27	117.4	1	0.1	10	30.7	...	...	2	4

BY YEAR OF ORGANIZATION

Cost of drainage works and services, 1950-1959				New works constructed, enlarged, or installed, 1950-1959									
Total		For new works		Open ditches		Tile or covered drains		Levees and dikes		Pumps		Other, projects reporting	
Projects reporting	Dollars	Projects reporting	Dollars	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Number		
96	1,665,416	45	850,795	44	168.0	1	0.1	13	33.4	...	...	2	1
31	485,909	29	443,540	29	105.7	1	0.1	8	20.6	...	...	2	2
65	1,179,507	16	407,255	15	62.3	...	...	5	12.8	...	...	...	3

DRAINAGE OF AGRICULTURAL LANDS

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	The State	Aitchison	Brown	Chase	Chautauqua	Clay	Cloud	Coffey
AREA								
1 Approximate land area.....acres 1960...	52,510,720	269,440	369,920	495,360	414,080	421,120	455,040	419,840
2 Land in farms.....acres 1959...	50,152,870	257,740	358,783	490,673	399,565	415,736	424,135	386,980
3 Drainage projects..... number 1960...	103	3	1	1	1	2	1	4
4 1950...	121	3	1	1	1	1	...	...
5 Total area in drainage projects ¹ acres served 1960...	402,330	17,986	5,129	1,720	7,742	6,480	2,005	3,920
6 1950...	356,988	16,241	5,129	1,720	7,742	1,700	...	...
7 Area not used for agriculture or not drained..... acres served 1960...	29,220	...	...	...	...	...	...	...
8 Net area drained and used for agriculture..... acres served 1960...	373,110	17,986	5,129	1,720	7,742	6,480	2,005	3,920
9 Drainage established before 1950..... acres served 1960...	309,135	17,986	5,129	1,720	7,742	1,700	2,005	...
10 Area added, 1950-1959..... acres served 1960...	63,975	...	...	...	...	4,780	...	3,920
11 Area served by two or more projects..... acres served 1960...	4,873	...	...	...	...	...	...	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION								
12 Drains owned by one landowner..... number of projects...	5	...	...	...	...	...	...	2
13 acres served ² ...	3,660	...	...	...	...	...	...	1,600
14 Cooperative or mutual drains..... number of projects...	14	...	...	...	...	...	...	2
15 acres served ² ...	23,427	...	...	...	...	...	...	2,320
16 Legally organized public drains..... number of projects...	84	3	1	1	1	2	1	...
17 acres served ² ...	350,896	17,986	5,129	1,720	7,742	6,480	2,005	...
PROJECTS, 1960, BY YEAR STARTED								
18 1950-1959..... number of projects...	27	...	...	...	...	1	1	4
19 acres served ² ...	68,772	...	...	...	...	4,780	2,005	3,920
20 Prior to 1950..... number of projects...	76	3	1	1	1	1	...	...
21 acres served ² ...	309,211	17,986	5,129	1,720	7,742	1,700	...	...
DRAINAGE OPERATIONS, 1950-1959 ³								
22 Cost of drainage works and services..... projects reporting...	96	1	1	...	1	2	1	4
23 dollars...	1,665,416	75,000	2,307	...	8,759	33,844	2,048	23,800
24 New drainage works constructed, enlarged, or installed..... projects reporting...	45	...	...	...	...	1	1	3
25 dollars...	850,795	...	...	...	...	27,876	1,182	12,500
26 Open ditches..... projects reporting...	44	...	...	...	...	1	1	3
27 length, miles...	168.0	...	...	...	...	4.0	0.5	13.1
28 Tile or covered drains..... projects reporting...	1	...	...	...	...	...	...	...
29 length, miles...	0.1	...	...	...	...	...	...	...
30 Levees or dikes..... projects reporting...	13	...	...	...	...	...	1	...
31 length, miles...	33.4	...	...	...	...	...	3.0	...
32 Pumps..... projects reporting...	...	...	...	...	...	...	...	...
33 number of pumps...	...	...	...	...	...	...	...	...
34 Other (see text)..... projects reporting...	2	...	...	...	...	1	...	...
35 Cost of maintenance, operation, repair, and administration..... projects reporting...	76	1	1	...	1	2	1	3
36 dollars...	814,621	75,000	2,307	...	8,759	5,968	866	11,300

¹Land served by two or more projects counted only once.²Acres served by two projects are included for each project. See text.³Includes projects taken over by another project prior to 1960. See text.

County Table 1. --DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1960 data]

Item and Census year	Cowley	Doniphan	Douglas	Finney	Ford	Franklin	Harvey	Jackson
AREA								
1 Approximate land area.....acres 1960..	727,040	242,560	299,520	833,280	1,693,120	369,280	1,345,600	419,840
2 Land in farms.....acres 1959...	695,318	234,838	277,698	776,519	1,762,812	344,178	1,347,255	379,150
3 Drainage projects..... number 1960...	2	5	4	2	1	4	5	3
4 1950...	3	3	9	1	1	3	3	3
5 Total area in drainage projects ² acres served 1960...	3,120	16,907	16,039	18,520	700	15,260	7,020	9,340
6 1950...	4,120	12,040	27,559	25	10	12,680	5,280	9,638
7 Area not used for agriculture or not drained..... acres served 1960...	...	...	...	...	...	...	...	...
8 Net area drained and used for agriculture..... acres served 1960...	3,120	16,907	16,039	18,520	700	15,260	7,020	9,340
9 Drainage established before 1950..... acres served 1960...	3,120	16,907	16,039	...	...	14,860	5,920	9,340
10 Area added, 1950-1959..... acres served 1960...	...	...	...	18,520	700	400	1,100	...
11 Area served by two or more projects..... acres served 1960...	...	1,400	...	...	...	820	...	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION								
12 Drains owned by one landowner..... number of projects...	...	...	...	...	...	...	...	...
13 acres served ³..	...	...	...	...	...	...	...	...
14 Cooperative or mutual drains..... number of projects...	1	...	...	...	1	2	...	...
15 acres served ³ ..	1,500	...	...	...	700	1,220	...	...
16 Legally organized public drains..... number of projects...	1	5	4	2	...	2	5	3
17 acres served ³ ..	1,620	18,307	16,039	18,520	...	14,860	7,020	9,340
PROJECTS, 1960, BY YEAR STARTED								
18 1950-1959..... number of projects...	...	...	...	2	1	1	2	...
19 acres served ³..	...	...	...	18,520	700	400	1,740	...
20 Prior to 1950..... number of projects...	2	5	4	...	...	3	3	3
21 acres served ³ ..	3,120	18,307	16,039	...	...	15,680	5,280	9,340
DRAINAGE OPERATIONS, 1950-1959 ⁴								
22 Cost of drainage works and services..... projects reporting...	1	4	4	2	1	3	3	1
23 dollars...	2,000	82,476	23,397	84,621	2,400	11,700	35,210	2,071
24 New drainage works constructed, enlarged, or installed..... projects reporting...	...	1	1	2	1	(⁵)	2	...
25 dollars...	...	1,000	1,600	84,621	2,400	(⁵)	33,050	...
26 Open ditches..... projects reporting...	...	1	1	2	1	(⁵)	2	...
27 length, miles...	...	0.6	0.7	23.0	1.2	(⁵)	4.3	...
28 Tile or covered drains..... projects reporting...	...	...	...	...	...	...	...	...
29 length, miles...	...	...	...	...	...	...	...	...
30 Levees or dikes..... projects reporting...	...	...	...	...	...	...	1	...
31 length, miles...	...	...	...	...	...	...	2.0	...
32 Pumps..... projects reporting...	...	...	...	...	...	...	...	...
33 number of pumps...	...	...	...	...	...	...	...	...
34 Other (see text)..... projects reporting...	...	...	...	...	...	...	...	...
35 Cost of maintenance, operation, repair, and administration..... projects reporting...	1	4	4	...	...	(⁵)	2	1
36 dollars...	2,000	81,476	21,797	...	...	(⁵)	2,160	2,071

¹The excess of farm acreage over approximate land area is due to the fact that the entire acreage of a farm is tabulated as in the county in which the headquarters is located, even though a part of the farm may be situated in an adjoining county.

²Land served by two or more projects counted only once.
³Acres served by two projects are included for each project. See text.
⁴Includes projects taken over by another project prior to 1960. See text.
⁵Included in State total only.

DRAINAGE OF AGRICULTURAL LANDS

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	Jefferson	Labette	Lincoln	McPherson	Marion	Meade	Miami	Montgomery
AREA								
1 Approximate land area.....acres 1960...	351,360	418,560	464,640	572,800	¹ 613,760	¹ 624,640	378,240	415,360
2 Land in farms.....acres 1959...	314,650	399,600	453,196	¹ 595,373	¹ 624,939	¹ 628,334	341,730	361,050
3 Drainage projects..... number 1960...	7	1	1	8	1	1	3	5
4 1950...	9	1	...	4	1	...	...	5
5 Total area in drainage projects ² acres served 1960...	22,580	3,880	8,800	18,870	5,060	2,400	3,207	15,887
6 1950...	16,582	3,880	...	14,970	5,060	...	...	17,047
7 Area not used for agriculture or not drained..... acres served 1960...	...	...	...	...	...	...	...	...
8 Net area drained and used for agriculture..... acres served 1960...	22,580	3,880	8,800	18,870	5,060	2,400	3,207	15,887
9 Drainage established before 1950..... acres served 1960...	16,872	3,880	...	17,890	5,060	...	...	15,887
10 Area added, 1950-1959..... acres served 1960...	5,708	...	8,800	980	...	2,400	3,207	...
11 Area served by two or more projects..... acres served 1960...	1,080	...	...	...	...	...	...	640
PROJECTS, 1960, BY TYPE OF ORGANIZATION								
12 Drains owned by one landowner..... number of projects...	...	...	...	...	...	...	1	...
13 acres served ³...	...	...	...	...	...	...	960	...
14 Cooperative or mutual drains..... number of projects...	...	...	1	1	...	...	2	1
15 acres served ³...	...	...	8,800	2,100	...	...	2,247	640
16 Legally organized public drains..... number of projects...	7	1	...	7	1	1	...	4
17 acres served ³ ...	23,660	3,880	...	16,770	5,060	2,400	...	15,887
PROJECTS, 1960, BY YEAR STARTED								
18 1960-1959..... number of projects...	1	...	1	3	...	1	3	1
19 acres served ³ ...	6,300	...	8,800	3,080	...	2,400	3,207	640
20 Prior to 1960..... number of projects...	6	1	...	5	1	...	...	4
21 acres served ³ ...	17,360	3,880	...	15,790	5,060	...	...	15,887
DRAINAGE OPERATIONS, 1950-1959 ⁴								
22 Cost of drainage works and services..... projects reporting...	12	1	(⁵)	8	1	1	3	3
23 dollars...	122,032	5,000	(⁵)	49,930	26,474	18,578	46,275	8,910
24 New drainage works constructed, enlarged, or installed..... projects reporting...	8	...	(⁵)	4	1	1	3	(⁵)
25 dollars...	79,093	...	(⁵)	20,150	4,000	15,828	42,675	(⁵)
26 Open ditches..... projects reporting...	8	...	(⁵)	4	1	1	3	(⁵)
27 length, miles...	26.8	...	(⁵)	4.8	0.8	4.5	10.8	(⁵)
28 Tile or covered drains..... projects reporting...	1	...	...	...	...	...	...	...
29 length, miles...	0.1	...	...	...	...	...	...	...
30 Levees or dikes..... projects reporting...	1	...	...	1	1	1	2	...
31 length, miles...	1.0	...	...	0.8	0.5	0.6	1.7	...
32 Pumps..... projects reporting...	...	...	...	...	...	...	...	...
33 number of pumps...	...	...	...	...	...	...	...	...
34 Other (see text)..... projects reporting...	1	...	...	...	...	...	...	...
35 Cost of maintenance, operation, repair, and administration..... projects reporting...	6	1	...	8	1	1	2	(⁵)
36 dollars...	42,939	5,000	...	29,780	22,474	2,750	3,600	(⁵)

¹The excess of farm acreage over approximate land area is due to the fact that the entire acreage of a farm is tabulated as in the county in which the headquarters is located, even though a part of the farm may be situated in an adjoining county.

²Land served by two or more projects counted only once.

³Acres served by two projects are included for each project. See text.

⁴Includes projects taken over by another project prior to 1960. See text.

⁵Included in State total only.

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1960 data]

Item and Census year	Nemaha	Neosho	Osage	Ottawa	Pottawatomie	Reno	Republic	Rice
AREA								
1 Approximate land area.....acres 1960...	453,760	375,680	461,440	462,720	544,000	803,200	460,160	¹ 461,440
2 Land in farms.....acres 1959...	449,355	339,784	454,898	419,706	466,236	788,940	442,324	¹ 466,857
3 Drainage projects..... number 1960...	1	16	1	1	2	4	2	1
4 1950...	1	16	1	...	2	1	2	1
5 Total area in drainage projects ² acres served 1960...	2,859	19,247	7,012	700	10,920	15,520	4,727	1,600
6 1950...	2,859	20,247	7,012	...	10,920	3,840	4,727	320
7 Area not used for agriculture or not drained..... acres served 1960...	...	...	...	...	...	...	...	...
8 Net area drained and used for agriculture..... acres served 1960...	2,859	19,247	7,012	700	10,920	15,520	4,727	1,600
9 Drainage established before 1950..... acres served 1960...	2,859	19,247	7,012	...	10,920	13,840	4,727	320
10 Area added, 1950-1959..... acres served 1960...	...	...	...	700	...	1,680	...	1,280
11 Area served by two or more projects..... acres served 1960...	...	833	...	...	...	...	...	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION								
12 Drains owned by one landowner..... number of projects...	...	...	...	...	...	...	...	...
13 acres served ³...	...	...	...	...	...	...	...	...
14 Cooperative or mutual drains..... number of projects...	...	...	...	1	...	...	...	...
15 acres served ³...	...	...	...	700	...	...	...	...
16 Legally organized public drains..... number of projects...	1	16	1	...	2	4	2	1
17 acres served ³ ...	2,859	20,080	7,012	...	10,920	15,520	4,727	1,600
PROJECTS, 1960, BY YEAR STARTED								
18 1950-1959..... number of projects...	...	...	...	1	...	2	...	...
19 acres served ³...	...	...	...	700	...	1,680	...	...
20 Prior to 1950..... number of projects...	1	16	1	...	2	2	2	1
21 acres served ³ ...	2,859	20,080	7,012	...	10,920	13,840	4,727	1,600
DRAINAGE OPERATIONS, 1950-1959 ⁴								
22 Cost of drainage works and services..... projects reporting...	...	15	...	(⁵)	2	4	2	1
23 dollars...	...	35,135	...	(⁵)	59,621	55,865	5,453	15,000
24 New drainage works constructed, enlarged, or installed..... projects reporting...	...	2	...	(⁵)	1	3	...	1
25 dollars...	...	7,700	...	(⁵)	2,000	43,350	...	12,000
26 Open ditches..... projects reporting...	...	2	...	(⁵)	...	3	...	1
27 length, miles...	...	5.5	...	(⁵)	...	8.5	...	3.5
28 Tile or covered drains..... projects reporting...	...	...	...	...	...	...	...	...
29 length, miles...	...	...	...	...	...	...	...	...
30 Levees or dikes..... projects reporting...	...	...	...	...	1	2	...	...
31 length, miles...	...	...	...	...	0.7	4.0	...	...
32 Pumps..... projects reporting...	...	...	...	...	...	...	...	...
33 number of pumps...	...	...	...	...	...	...	...	...
34 Other (see text)..... projects reporting...	...	...	...	...	...	...	...	...
35 Cost of maintenance, operation, repair, and administration..... projects reporting...	...	15	...	...	2	3	2	1
36 dollars...	...	27,435	...	...	57,621	12,515	5,453	3,000

¹The excess of farm acreage over approximate land area is due to the fact that the entire acreage of a farm is tabulated as in the county in which the headquarters is located, even though a part of the farm may be situated in an adjoining county.

²Land served by two or more projects counted only once.

³Acres served by two projects are included for each project. See text.

⁴Includes projects taken over by another project prior to 1960. See text.

⁵Included in State total only.

DRAINAGE OF AGRICULTURAL LANDS

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	Riley	Saline	Sedgwick	Shawnee	Stafford	Sumner	Wabaunsee	All other counties ¹
AREA								
1 Approximate land area.....acres 1960...	399,360	460,800	639,360	348,800	508,160	756,480	² 506,240	6,108,160
2 Land in farms.....acres 1959...	338,172	415,160	601,019	312,253	505,183	741,083	² 510,389	6,097,906
3 Drainage projects..... number 1960...	1	2	8	4	4	2	1	...
4 1950...	3	3	6	5	...	2	2	34
5 Total area in drainage projects ³ acres served 1960...	760	6,583	63,090	35,840	2,700	17,700	500	...
6 1950...	792	7,350	55,584	41,240	...	17,700	2,300	30,674
7 Area not used for agriculture or not drained..... acres served 1960...	...	...	10,220	7,000	...	12,000	...	...
8 Net area drained and used for agriculture..... acres served 1960...	760	6,583	52,870	28,840	2,700	5,700	500	...
9 Drainage established before 1950..... acres served 1960...	760	6,583	45,770	28,840	...	5,700	500	...
10 Area added, 1950-1959..... acres served 1960...	...	...	7,100	...	2,700	...	...	...
11 Area served by two or more projects..... acres served 1960...	...	...	...	...	100	...	...	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION								
12 Drains owned by one landowner..... number of projects...	...	...	...	...	2	...	...	...
13 acres served ⁴..	...	...	...	...	1,100	...	...	...
14 Cooperative or mutual drains..... number of projects...	...	...	1	...	2	...	...	...
15 acres served ⁴..	...	...	1,500	...	1,700	...	...	...
16 Legally organized public drains..... number of projects...	1	2	7	4	...	2	1	...
17 acres served ⁴ ..	760	6,583	51,370	28,840	...	5,700	500	...
PROJECTS, 1960, BY YEAR STARTED								
18 1950-1959..... number of projects...	...	...	2	...	4	...	...	...
19 acres served ⁴..	...	...	7,100	...	2,800	...	...	...
20 Prior to 1950..... number of projects...	1	2	6	4	...	2	1	...
21 acres served ⁴ ..	760	6,583	45,770	28,840	...	5,700	500	...
DRAINAGE OPERATIONS, 1950-1959 ⁵								
22 Cost of drainage works and services.....projects reporting...	...	2	8	4	4	2	1	...
23 dollars...	...	4,706	437,481	346,550	10,000	5,000	8,273	...
24 New drainage works constructed, enlarged, or installed.....projects reporting...	...	...	3	4	4	...	1	...
25 dollars...	...	...	220,470	209,300	10,000	...	500	...
26 Open ditches.....projects reporting...	...	...	3	3	4	...	...	...
27 length, miles...	...	...	32.5	4.2	7.6	...	...	...
28 Tile or covered drains.....projects reporting...	...	...	...	...	...	...	...	...
29 length, miles...	...	...	...	...	...	...	...	...
30 Levees or dikes.....projects reporting...	...	...	3	2	...	...	1	...
31 length, miles...	...	...	13.5	5.5	...	...	0.1	...
32 Pumps.....projects reporting...	...	...	...	...	...	...	...	...
33 number of pumps...	...	...	...	...	...	...	...	...
34 Other (see text).....projects reporting...	...	...	...	...	...	...	...	...
35 Cost of maintenance, operation, repair, and administration.....projects reporting...	...	2	7	4	...	2	1	...
36 dollars...	...	4,706	217,011	137,250	...	5,000	7,773	...

¹Includes Barton, Greenwood, Haskell, Kearny, Lyon, Ness, Osborne, Pawnee, Scott, Sheridan, and Trego counties.²The excess of farm acreage over approximate land area is due to the fact that the entire acreage of a farm is tabulated as in the county in which the headquarters is located, even though a part of the farm may be situated in an adjoining county.³Land served by two or more projects counted only once.⁴Acres served by two projects are included for each project. See text.⁵Includes projects taken over by another project prior to 1960. See text.

DRAINAGE OF AGRICULTURAL LANDS

State Table 2.—DRAINAGE

	Size of project (Based on area of agricultural land in project)	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	28	890,799	4,000	21	884,753	7	6,046
2	500 to 999 acres.....	7	4,566	...	2	1,270	5	3,296
3	1,000 to 1,999 acres.....	6	8,683	...	4	5,933	2	2,750
4	2,000 to 4,999 acres.....	1	2,000	2,000	1	2,000	...	...
5	5,000 to 9,999 acres.....	2	14,400	..	2	14,400	...	...
6	10,000 to 19,999 acres.....	2	29,191	...	2	29,191	...	...
7	20,000 to 49,999 acres.....	2	53,371	...	2	53,371	...	...
8	50,000 to 99,999 acres.....	5	335,569	2,000	5	335,569	...	...
9	100,000 or more acres.....	3	443,019	...	3	443,019	...	...

State Table 3.—DRAINAGE PROJECTS, 1960,

	Type of organization	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	28	890,799	4,000	21	884,753	7	6,046
2	Drains owned by one landowner.....	1	2,000	2,000	1	2,000	...	...
3	Cooperative or mutual drains.....	10	8,660	...	3	2,614	7	6,046
4	Legally organized public drains.....	17	880,139	2,000	17	880,139	...	...

State Table 4.—DRAINAGE PROJECTS, 1960,

	Year of organization	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	28	890,799	4,000	21	884,753	7	6,046
2	1960-1969.....	8	6,646	...	1	600	7	6,046
3	Prior to 1960.....	20	884,153	4,000	20	884,153	...	...

PROJECTS, 1960, BY SIZE

Cost of drainage works and services, 1950-1959				New works constructed, enlarged, or installed, 1950-1959									
Total		For new works		Open ditches		Tile or covered drains		Levees and dikes		Pumps		Other, projects reporting	
Projects reporting	Dollars	Projects reporting	Dollars	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Number		
17	897,753	10	97,291	10	28.4	1	20.0	...	...	...	...	...	1
6	34,483	6	34,383	6	15.3	...	...	...	...	...	...	...	2
2	14,600	2	14,600	2	9.0	...	...	...	...	...	...	...	3
1	45,000	1	35,000	1	1.1	1	20.0	...	...	...	...	...	4
1	565	...	...	...	...	...	...	...	...	...	...	...	5
1	3,500	...	...	...	...	...	...	...	...	...	...	...	6
...	...	...	...	...	...	...	...	...	...	...	...	...	7
3	469,787	...	...	...	...	...	...	...	...	...	...	...	8
3	329,818	1	13,308	1	3.0	...	...	...	...	...	...	...	9

BY TYPE OF ORGANIZATION

Cost of drainage works and services, 1950-1959				New works constructed, enlarged, or installed, 1950-1959									
Total		For new works		Open ditches		Tile or covered drains		Levees and dikes		Pumps		Other, projects reporting	
Projects reporting	Dollars	Projects reporting	Dollars	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Number		
17	897,753	10	97,291	10	28.4	1	20.0	...	...	...	...	...	1
1	45,000	1	35,000	1	1.1	1	20.0	...	...	...	...	...	2
8	49,083	8	48,983	8	24.3	...	...	...	...	...	...	...	3
8	803,670	1	13,308	1	3.0	...	...	...	...	...	...	...	4

BY YEAR OF ORGANIZATION

Cost of drainage works and services, 1950-1959				New works constructed, enlarged, or installed, 1950-1959									
Total		For new works		Open ditches		Tile or covered drains		Levees and dikes		Pumps		Other, projects reporting	
Projects reporting	Dollars	Projects reporting	Dollars	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Number		
17	897,753	10	97,291	10	28.4	1	20.0	...	...	...	...	...	1
8	49,083	8	48,983	8	24.3	...	...	...	...	...	...	...	2
9	848,670	2	48,308	2	4.1	1	20.0	...	...	...	...	...	3

DRAINAGE OF AGRICULTURAL LANDS

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	The State	Ballard	Butler	Carlisle	Daviess	Fulton	Graves	Greenup
AREA								
1 Approximate land area.....acres 1960...	25,512,320	165,760	283,520	125,440	298,240	131,200	358,400	224,000
2 Land in farms.....acres 1959...	17,030,675	123,221	161,430	90,547	244,254	111,438	256,907	116,479
3 Drainage projects..... number 1960...	28	1	1	1	1	2	2	2
4 1950...	18	...	1	...	1	1	1	...
5 Total area in drainage projects ¹ acres served 1960...	945,515	2,873	6,720	6,670	203,200	2,300	21,720	1,246
6 1950...	959,892	...	6,720	...	203,200	384	16,335	...
7 Area not used for agriculture or not drained..... acres served 1960...	56,716	...	...	...	4,000	...	...	...
8 Net area drained and used for agriculture..... acres served 1960...	888,799	2,873	6,720	6,670	199,200	2,300	21,720	1,246
9 Drainage established before 1950..... acres served 1960...	882,753	2,873	6,720	6,670	199,200	...	21,720	...
10 Area added, 1950-1959..... acres served 1960...	6,046	...	...	...	...	2,300	...	1,246
11 Area served by two or more projects..... acres served 1960...	2,000	...	...	...	...	...	...	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION								
12 Drains owned by one landowner..... number of projects...	1	...	...	...	...	...	...	...
13 acres served ² ...	2,000	...	...	...	...	...	...	...
14 Cooperative or mutual drains..... number of projects...	10	...	...	...	...	2	...	2
15 acres served ² ...	8,660	...	...	...	...	2,300	...	1,246
16 Legally organized public drains..... number of projects...	17	1	1	1	1	...	2	...
17 acres served ² ...	880,139	2,873	6,720	6,670	199,200	...	21,720	...
PROJECTS, 1960, BY YEAR STARTED								
18 1960-1969..... number of projects...	8	...	...	...	...	2	...	2
19 acres served ² ...	6,646	...	...	...	...	2,300	...	1,246
20 Prior to 1950..... number of projects...	20	1	1	1	1	...	2	...
21 acres served ² ...	884,153	2,873	6,720	6,670	199,200	...	21,720	...
DRAINAGE OPERATIONS, 1950-1959 ³								
22 Cost of drainage works and services..... projects reporting...	17	...	...	...	1	(⁴)	1	2
23 dollars...	897,753	...	...	...	231,010	(⁴)	3,500	8,433
24 New drainage works constructed, enlarged, or installed..... projects reporting...	10	...	...	...	...	(⁴)	...	2
25 dollars...	97,291	...	...	...	...	(⁴)	...	8,433
26 Open ditches..... projects reporting...	10	...	...	...	...	(⁴)	...	2
27 length, miles...	28.4	...	...	...	...	(⁴)	...	3.2
28 Tile or covered drains..... projects reporting...	1	...	...	...	...	...	...	...
29 length, miles...	20.0	...	...	...	...	...	...	...
30 Levees or dikes..... projects reporting...	...	...	...	...	...	...	...	...
31 length, miles...	...	...	...	...	...	...	...	...
32 Pumps..... projects reporting...	...	...	...	...	...	...	...	...
33 number of pumps...	...	...	...	...	...	...	...	...
34 Other (see text)..... projects reporting...	...	...	...	...	...	...	...	...
35 Cost of maintenance, operation, repair, and administration..... projects reporting...	10	...	...	...	1	...	1	...
36 dollars...	800,462	...	...	...	231,010	...	3,500	...

¹Land served by two or more projects counted only once.²Acres served by two projects are included for each project. See text.³Includes projects taken over by another project prior to 1960. See text.⁴Included in State total only.

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data.]

Item and Census year	Hancock	Henderson	Hickman	Hopkins	Jefferson	McCracken	McLean	Marshall
AREA								
1 Approximate land area.....acres 1960...	119,680	281,600	158,720	355,200	240,000	160,640	164,480	193,920
2 Land in farms.....acres 1959...	79,935	238,540	120,762	201,870	98,383	87,032	125,251	112,067
3 Drainage projects..... number 1960...	1	2	1	3	1	2	1	1
4 1950...	1	1	1	1	1	1	1	1
5 Total area in drainage projects ¹ acres served 1960...	33,280	99,776	7,680	18,256	99,264	6,936	58,432	1,024
6 1950...	33,280	101,376	7,680	16,256	99,264	1,773	58,432	1,024
7 Area not used for agriculture or not drained..... acres served 1960...	...	...	...	3,400	38,016	...	2,600	...
8 Net area drained and used for agriculture..... acres served 1960...	33,280	99,776	7,680	14,856	61,248	6,936	55,832	1,024
9 Drainage established before 1950..... acres served 1960...	33,280	99,776	7,680	12,856	61,248	6,936	55,832	1,024
10 Area added, 1950-1959..... acres served 1960...	...	...	...	2,000	...	...	...	...
11 Area served by two or more projects..... acres served 1960...	...	2,000	...	...	...	...	...	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION								
12 Drains owned by one landowner..... number of projects...	...	1	...	...	...	...	...	...
13 acres served ²...	...	2,000	...	...	...	...	...	...
14 Cooperative or mutual drains..... number of projects...	...	...	...	2	...	...	...	...
15 acres served ²...	...	...	...	2,000	...	...	...	...
16 Legally organized public drains..... number of projects...	1	1	1	1	1	2	1	1
17 acres served ² ...	33,280	99,776	7,680	12,856	61,248	6,936	55,832	1,024
PROJECTS, 1960, BY YEAR STARTED								
18 1960-1959..... number of projects...	...	...	...	2	...	...	...	...
19 acres served ²...	...	...	...	2,000	...	...	...	...
20 Prior to 1960..... number of projects...	1	2	1	1	1	2	1	1
21 acres served ² ...	33,280	101,776	7,680	12,856	61,248	6,936	55,832	1,024
DRAINAGE OPERATIONS, 1950-1959 ³								
22 Cost of drainage works and services.....projects reporting...	...	(4)	1	2	1	...	1	...
23 dollars...	...	(4)	565	4,950	428,120	...	5,500	...
24 New drainage works constructed, enlarged, or installed.....projects reporting...	...	(4)	...	2	...	...	...	...
25 dollars...	...	(4)	...	4,950	...	...	...	...
26 Open ditches.....projects reporting...	...	(4)	...	2	...	...	...	...
27 length, miles...	...	(4)	...	8.0	...	...	...	...
28 Tile or covered drains.....projects reporting...	...	(4)	...	...	...	...	...	...
29 length, miles...	...	(4)	...	...	...	...	...	...
30 Levees or dikes.....projects reporting...	...	...	...	...	...	...	...	...
31 length, miles...	...	...	...	...	...	...	...	...
32 Pumps.....projects reporting...	...	...	...	...	...	...	...	...
33 number of pumps...	...	...	...	...	...	...	...	...
34 Other (see text).....projects reporting...	...	...	...	...	...	...	...	...
35 Cost of maintenance, operation, repair, and administration.....projects reporting...	...	(4)	1	...	1	...	1	...
36 dollars...	...	(4)	565	...	428,120	...	5,500	...

¹Land served by two or more projects counted only once.
²Acres served by two projects are included for each project. See text.
³Includes projects taken over by another project prior to 1960. See text.
⁴Included in State total only.

DRAINAGE OF AGRICULTURAL LANDS

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	Muhlenberg	Ohio	Spencer	Trigg	Union	Warren	Webster
AREA							
1 Approximate land area.....acres 1960...	308,480	381,440	123,520	292,480	219,520	349,440	216,960
2 Land in farms.....acres 1959...	155,350	198,622	117,598	167,590	167,555	296,567	153,130
3 Drainage projects.....number 1960...	1	2	1	1	1	1	2
4	1	1	1	...	1	1	1
5 Total area in drainage projects ¹.....acres served 1960...	59,457	65,856	1,792	500	136,116	1,344	111,073
6	59,457	65,856	1,792	...	166,116	1,344	119,603
7 Area not used for agriculture or not drained.....acres served 1960...	6,000	...	...	...	...	...	2,700
8 Net area drained and used for agriculture.....acres served 1960...	53,457	65,856	1,792	500	136,116	1,344	108,373
9 Drainage established before 1950.....acres served 1960...	53,457	65,856	1,792	...	136,116	1,344	108,373
10 Area added, 1950-1959.....acres served 1960...	...	...	...	500	...	...	...
11 Area served by two or more projects.....acres served 1960...	...	...	...	...	...	...	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION							
12 Drains owned by one landowner.....number of projects...	...	...	...	...	...	...	...
13 .....	...	...	...	...	...	...	...
14 Cooperative or mutual drains.....number of projects...	...	1	...	1	...	1	1
15 .....	...	600	...	500	...	1,344	670
16 Legally organized public drains.....number of projects...	1	1	1	...	1	...	1
17	53,457	65,256	1,792	...	136,116	...	107,703
PROJECTS, 1960, BY YEAR STARTED							
18 1950-1959.....number of projects...	...	1	...	1	...	...	...
19 .....	...	600	...	500	...	...	...
20 Prior to 1950.....number of projects...	1	1	1	...	1	1	2
21	53,457	65,256	1,792	...	136,116	1,344	108,373
DRAINAGE OPERATIONS, 1950-1959 ³							
22 Cost of drainage works and services.....projects reporting...	...	1	...	1	1	...	1
23 .....	...	1,600	...	10,000	58,808	...	40,000
24 New drainage works constructed, enlarged, of installed.....projects reporting...	...	1	...	1	1	...	...
25 .....	...	1,500	...	10,000	13,308	...	...
26 Open ditches.....projects reporting...	...	1	...	1	1	...	...
27 .....	...	1.0	...	3.1	3.0	...	...
28 Tile or covered drains.....projects reporting...	...	...	...	...	...	...	...
29 .....	...	...	...	...	...	...	...
30 Levees or dikes.....projects reporting...	...	...	...	...	...	...	...
31 .....	...	...	...	...	...	...	...
32 Pumps.....projects reporting...	...	...	...	...	...	...	...
33 .....	...	...	...	...	...	...	...
34 Other (see text).....projects reporting...	...	...	...	...	...	...	...
35 Cost of maintenance, operation, repair, and administration.....projects reporting...	...	1	...	...	1	...	1
36 .....	...	100	...	...	45,500	...	40,000

¹Land served by two or more projects counted only once.²Acres served by two projects are included for each project. See text.³Includes projects taken over by another project prior to 1960. See text.

State Table 1.—DRAINAGE PROJECTS—NUMBER, AREA, COST, AND WORKS, 1920 TO 1960

[See text for comparability of data.]

Item	1960 Census	1950 Census	1940 Census	1930 Census	1920 Census
AREA					
Approximate land area..... acres...	28,867,840	28,903,680	28,913,280	29,061,760	29,061,760
Land in farms..... acres...	10,347,328	11,202,278	9,996,108	9,355,437	10,019,822
Drainage projects..... number...	915	922	495	NA	NA
Total area in drainage projects..... acres served...	9,089,516	12,161,665	4,219,624	3,655,483	2,266,328
Area not used for agriculture or not drained..... acres served...	1,978,892	NA	NA	NA	NA
Net area drained and used for agriculture..... acres served...	7,110,624	NA	¹ 2,512,250	¹ 2,571,531	NA
Drainage established 10 years or more before Census date..... acres served...	6,144,937	NA	NA	NA	NA
Drainage established within 10 years of Census date..... acres served...	965,687	NA	NA	NA	NA
Area served by two or more projects..... acres served...	1,255,460	509,987	483,850	437,630	75,706
PROJECTS BY TYPE OF ORGANIZATION					
Drains owned by one landowner..... number of projects...	526	² 199	NA	NA	NA
acres served...:	810,903	² 344,239	² 412,303	402,496	36,463
Cooperative or mutual drains..... number of projects...	235	² 95	...	...	...
acres served...:	309,784	² 128,197	...	...	...
Legally organized public drains..... number of projects...	154	² 117	NA	NA	NA
acres served...:	7,337,112	² 11,605,479	² 3,795,721	3,252,987	2,229,865
PROJECTS BY YEAR STARTED					
Started 10 years or more before Census date..... number of projects...	608	² 94	NA	NA	NA
acres served...:	6,936,683	² 1,727,948	3,664,122	2,701,069	1,183,536
Started within 10 years of Census date..... number of projects...	307	² 317	NA	NA	NA
acres served...:	1,521,116	² 10,349,967	555,502	954,414	1,082,792
OPERATIONS, 10-YEAR PERIOD PRECEDING CENSUS DATE					
Cost of drainage works and services..... projects reporting...	753	² 392	NA	NA	NA
dollars...:	45,796,344	16,652,384	NA	NA	NA
New drainage works constructed, enlarged, or installed..... projects reporting...	576	³ 142	NA	NA	NA
cost, dollars...:	24,432,591	³ 5,316,026	NA	NA	NA
Open ditches..... projects reporting...	562	141	NA	NA	NA
length, miles...:	8,202.7	2,116	NA	NA	NA
Tile or covered drains..... projects reporting...	1	...	NA	NA	NA
length, miles...:	0.1	...	NA	NA	NA
Levees or dikes..... projects reporting...	34	12	NA	NA	NA
length, miles...:	215.2	166	NA	NA	NA
Pumps..... projects reporting...	45	NA	NA	NA	NA
number of pumps...:	91	NA	NA	NA	NA
Other (see text)..... projects reporting...	16	NA	NA	NA	NA
Cost of maintenance, operation, repair, and administration..... projects reporting...	490	NA	NA	NA	NA
dollars...:	21,363,753	11,336,358	NA	NA	NA
STATUS ON CENSUS DATE					
Capital investment..... dollars...	NA	NA	23,361,758	20,752,645	9,021,991
Physical works:					
Open ditches..... length, miles...	NA	NA	7,105.5	7,701.2	1,771.6
Tile drains..... length, miles...	NA	NA	6.0	2.0	0.2
Levees and dikes..... length, miles...	NA	NA	624.4	576.3	440.7
Pumping units..... number of units...	NA	² 102	59	52	71

NA Not available.

¹Not fully comparable. See text.²1950 figures exclude 511 projects and 83,750 acres in "irrigation enterprises"; 1940 figures exclude 634 projects and 11,600 acres in "irrigation enterprises."³Cost of new works for lands not previously drained.

DRAINAGE OF AGRICULTURAL LANDS

State Table 2.—DRAINAGE

	Size of project (Based on area of agricultural land in project)	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	915	8,457,799	2,602,635	835	7,425,144	116	1,032,655
2	500 to 999 acres.....	373	261,601	222,648	337	235,582	41	26,019
3	1,000 to 1,999 acres.....	271	373,294	298,830	241	330,512	36	42,782
4	2,000 to 4,999 acres.....	126	361,443	256,476	117	326,851	16	34,592
5	5,000 to 9,999 acres.....	28	203,467	69,580	27	184,138	3	19,329
6	10,000 to 19,999 acres.....	43	600,013	180,205	42	567,883	5	32,130
7	20,000 to 49,999 acres.....	36	1,111,624	425,471	34	876,938	7	234,686
8	50,000 to 99,999 acres.....	16	1,046,309	223,134	16	815,289	4	231,020
9	100,000 or more acres.....	22	4,500,048	926,291	21	4,087,951	4	412,097

¹Includes projects taken over by another project prior to 1960. See text.

State Table 3.—DRAINAGE PROJECTS, 1960,

	Type of organization	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	915	8,457,799	2,602,635	835	7,425,144	116	1,032,655
2	Drains owned by one landowner.....	526	810,903	633,143	475	742,851	67	68,052
3	Cooperative or mutual drains.....	235	309,784	220,164	213	244,786	26	64,998
4	Legally organized public drains.....	154	7,337,112	1,749,328	147	6,437,507	23	899,605

State Table 4.—DRAINAGE PROJECTS, 1960,

	Year of organization	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	915	8,457,799	2,602,635	835	7,425,144	116	1,032,655
2	1950-1959.....	307	1,521,116	364,792	227	574,051	99	947,065
3	Prior to 1950.....	608	6,936,683	2,237,843	608	6,851,093	17	85,590

PROJECTS, 1960, BY SIZE

Cost of drainage works and services, 1950-1959				New works constructed, enlarged, or installed, 1950-1959									
Total		For new works		Open ditches		Tile or covered drains		Levees and dikes		Pumps		Other, projects reporting	
Projects reporting	Dollars	Projects reporting	Dollars	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Number		
753	45,796,344	576	24,432,591	562	8,202.7	1	0.1	34	215.2	45	91	16	1
296	1,925,457	242	940,607	238	1,302.3	...	...	7	14.3	11	18	2	2
220	3,913,099	180	1,842,346	175	1,539.3	1	0.1	10	52.7	15	27	5	3
104	4,187,877	77	1,791,698	74	811.4	...	...	8	62.3	12	23	5	4
19	2,385,162	10	870,357	9	31.7	...	...	2	5.8	1	1	1	5
41	2,799,965	16	1,161,952	15	245.5	...	...	3	44.0	5	21	1	6
35	3,481,859	16	2,705,867	16	473.5	...	...	2	28.0	...	...	1	7
15	5,649,731	13	3,441,239	13	799.6	...	...	1	0.1	1	1	...	8
123	21,453,194	22	11,678,525	22	2,999.4	...	...	1	8.0	...	...	1	9

BY TYPE OF ORGANIZATION

Cost of drainage works and services, 1950-1959				New works constructed, enlarged, or installed, 1950-1959									
Total		For new works		Open ditches		Tile or covered drains		Levees and dikes		Pumps		Other, projects reporting	
Projects reporting	Dollars	Projects reporting	Dollars	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Number		
753	45,796,344	576	24,432,591	562	8,202.7	1	0.1	34	215.2	45	91	16	1
448	8,115,096	358	2,749,601	352	3,329.3	...	...	29	174.3	34	79	4	2
167	755,852	142	608,543	142	412.6	...	...	...	...	1	2	1	3
138	36,925,396	76	21,074,447	68	4,460.8	1	0.1	5	40.9	10	10	11	4

BY YEAR OF ORGANIZATION

Cost of drainage works and services, 1950-1959				New works constructed, enlarged, or installed, 1950-1959									
Total		For new works		Open ditches		Tile or covered drains		Levees and dikes		Pumps		Other, projects reporting	
Projects reporting	Dollars	Projects reporting	Dollars	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Number		
753	45,796,344	576	24,432,591	562	8,202.7	1	0.1	34	215.2	45	91	16	1
306	10,912,946	299	8,412,567	295	3,120.8	1	0.1	9	72.0	10	12	7	2
447	34,883,398	277	16,020,024	267	5,081.9	...	...	25	143.2	35	79	9	3

DRAINAGE OF AGRICULTURAL LANDS

Parish Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	The State	Acadia	Allen	Ascension	Assumption	Avoyelles	Bossier	Caddo
AREA								
1 Approximate land area.....acres 1960...	28,867,840	423,680	496,000	192,000	228,480	528,640	536,960	568,320
2 Land in farms.....acres 1959...	10,347,328	338,824	149,993	89,755	94,831	229,613	232,423	268,970
3 Drainage projects..... number 1960...	915	47	13	22	29	32	31	26
4	1950...	922	52	7	8	8	24	15
5 Total area in drainage projects ¹ acres served 1960...	9,089,516	423,680	74,602	142,232	61,002	380,000	119,080	170,000
6	1950...	12,161,665	423,680	36,742	101,784	34,215	528,640	101,010
7 Area not used for agriculture or not drained..... acres served 1960...	1,978,892	2,500	1,490	4,700	1,900	91,000	17,760	18,000
8 Net area drained and used for agriculture..... acres served 1960...	7,110,624	421,180	73,112	137,532	59,102	289,000	101,320	152,000
9 Drainage established before 1950..... acres served 1960...	6,144,937	421,180	34,279	137,532	59,102	221,160	101,320	152,000
10 Area added, 1950-1959..... acres served 1960...	965,687	...	38,833	...	...	67,840	...	...
11 Area served by two or more projects..... acres served 1960...	1,255,460	273,766	7,653	21,353	9,605	33,293	35,614	28,153
PROJECTS, 1960, BY TYPE OF ORGANIZATION								
12 Drains owned by one landowner..... number of projects...	526	1	1	19	19	17	25	25
13	acres served ² ...	810,903	598	620	19,853	28,272	21,088	32,144
14 Cooperative or mutual drains..... number of projects...	235	34	11	1	6	14	4	...
15	acres served ² ...	309,784	58,043	46,486	1,500	8,878	12,205	4,230
16 Legally organized public drains..... number of projects...	154	12	1	2	4	1	2	1
17	acres served ² ...	7,337,112	695,356	33,659	137,532	31,557	289,000	100,560
PROJECTS, 1960, BY YEAR STARTED								
18 1960-1959..... number of projects...	307	17	11	5	7	12	6	2
19	acres served ² ...	1,521,116	33,766	46,486	4,976	8,090	12,483	4,737
20 Prior to 1950..... number of projects...	608	30	2	17	22	20	25	24
21	acres served ² ...	6,936,683	720,231	34,279	153,909	60,617	309,810	132,197
DRAINAGE OPERATIONS, 1950-1959 ³								
22 Cost of drainage works and services..... projects reporting...	753	36	12	22	27	15	29	26
23	dollars...	45,796,344	2,465,655	101,916	1,211,916	802,477	721,985	1,003,759
24 New drainage works constructed, enlarged, or installed..... projects reporting...	576	19	11	14	13	15	19	7
25	dollars...	24,432,591	1,315,294	80,932	541,362	132,718	275,545	344,405
26 Open ditches..... projects reporting...	562	19	11	14	13	15	18	7
27	length, miles...	8,202.7	223.6	33.4	270.8	197.9	127.2	119.0
28 Tile or covered drains..... projects reporting...	1	...	...	...	...	...	...	...
29	length, miles...	0.1	...	...	...	...	...	...
30 Levees or dikes..... projects reporting...	34	...	...	...	2	...	3	1
31	length, miles...	215.2	...	...	9.0	...	13.3	0.4
32 Pumps..... projects reporting...	45	...	...	...	4	...	2	...
33	number of pumps...	91	...	...	4	...	2	...
34 Other (see text)..... projects reporting...	16	...	...	...	...	...	2	1
35 Cost of maintenance, operation, repair, and administration..... projects reporting...	490	18	1	22	23	1	28	24
36	dollars...	21,363,753	1,150,361	20,984	670,554	669,759	446,440	659,354
37	dollars...	21,363,753	1,150,361	20,984	670,554	669,759	446,440	659,354

¹Land served by two or more projects counted only once.²Acres served by two projects are included for each project. See text.³Includes projects taken over by another project prior to 1960. See text.

Parish Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	Calcasieu	Caldwell	Cameron	Catahoula	Concordia	De Soto	East Baton Rouge	East Carroll
AREA								
1 Approximate land area.....acres 1960...	706,560	352,000	924,160	467,200	453,760	570,880	295,680	275,840
2 Land in farms.....acres 1959...	468,350	68,325	216,476	124,733	208,445	296,834	150,702	179,002
3 Drainage projects.....number 1960...	14	7	22	8	22	1	7	45
4 1950...	46	2	26	7	10	1	6	17
5 Total area in drainage projects ¹.....acres served 1960...	403,284	54,357	142,947	9,738	200,000	19,840	124,146	231,000
6 1950...	706,560	1,830	142,345	5,995	16,028	19,840	79,689	276,480
7 Area not used for agriculture or not drained.....acres served 1960...	158,160	...	25,800	...	48,000	...	23,500	33,000
8 Net area drained and used for agriculture.....acres served 1960...	245,124	54,357	117,147	9,738	152,000	19,840	100,646	198,000
9 Drainage established before 1950.....acres served 1960...	232,644	1,830	102,991	8,844	11,288	19,840	57,933	198,000
10 Area added, 1950-1959.....acres served 1960...	12,480	52,527	14,156	894	140,712	...	42,713	...
11 Area served by two or more projects.....acres served 1960...	4,742	2,819	2,700	...	33,353	...	1,800	62,731
PROJECTS, 1960, BY TYPE OF ORGANIZATION								
12 Drains owned by one landowner.....number of projects...	6	4	14	1	20	...	1	35
13 acres served ² ...	8,724	2,325	55,495	700	24,292	...	1,800	49,895
14 Cooperative or mutual drains.....number of projects...	...	2	3	7	...	...	...	9
15 acres served ²...	...	1,830	10,152	9,038	...	...	...	13,436
16 Legally organized public drains.....number of projects...	8	1	5	...	2	1	6	1
17 acres served ² ...	241,142	53,021	54,200	...	164,000	19,840	100,646	198,000
PROJECTS, 1960, BY YEAR STARTED								
18 1950-1959.....number of projects...	5	5	4	1	12	...	5	15
19 acres served ² ...	173,960	55,346	5,979	894	175,045	...	87,960	17,836
20 Prior to 1950.....number of projects...	9	2	18	7	10	1	2	30
21 acres served ² ...	75,906	1,830	113,868	8,844	13,247	19,840	14,486	243,495
DRAINAGE OPERATIONS, 1950-1959 ³								
22 Cost of drainage works and services.....projects reporting...	9	5	17	6	21	1	7	39
23 dollars...	332,199	65,751	285,675	15,918	973,189	16,921	1,376,291	537,931
24 New drainage works constructed, enlarged, or installed.....projects reporting...	6	5	16	5	21	1	6	36
25 dollars...	289,731	65,751	243,290	11,491	973,189	8,837	888,291	249,343
26 Open ditches.....projects reporting...	6	5	14	5	21	1	6	36
27 length, miles...	25.1	49.1	81.6	13.7	538.8	9.0	55.8	320.9
28 Tile or covered drains.....projects reporting...	...	...	...	...	...	...	...	...
29 length, miles...	...	...	...	...	...	...	...	...
30 Levees or dikes.....projects reporting...	...	...	8	...	...	...	...	...
31 length, miles...	...	...	63.1	...	...	...	...	...
32 Pumps.....projects reporting...	1	...	4	...	...	...	...	...
33 number of pumps...	1	...	6	...	...	...	...	...
34 Other (see text).....projects reporting...	...	...	1	...	...	...	1	...
35 Cost of maintenance, operation, repair, and administration.....projects reporting...	6	...	13	3	...	1	5	34
36 dollars...	42,468	...	42,385	4,427	...	8,084	488,000	288,588

¹Land served by two or more projects counted only once.
²Acres served by two projects are included for each project. See text.
³Includes projects taken over by another project prior to 1960. See text.

DRAINAGE OF AGRICULTURAL LANDS

Parish Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1960 data]

Item and Census year	Evangeline	Franklin	Grant	Iberia	Iberville	Jefferson	Jefferson Davis	Lafayette
AREA								
1 Approximate land area..... acres 1960...	433,280	411,520	423,680	376,320	401,920	261,760	421,120	181,120
2 Land in farms..... acres 1959...	215,806	307,262	80,037	138,846	120,271	16,796	355,999	141,672
3 Drainage projects..... number 1960...	41	17	3	4	27	2	37	4
4	74	5	...	17	3	5	80	31
5 Total area in drainage projects ¹ acres served 1960...	138,788	411,520	29,000	189,000	223,920	91,132	237,913	181,120
6	132,288	414,720	...	376,320	401,920	46,068	187,977	181,120
7 Area not used for agriculture or not drained..... acres served 1960...	1,600	46,720	...	39,000	137,920	87,632	17,560	4,320
8 Net area drained and used for agriculture..... acres served 1960...	137,188	364,800	29,000	150,000	86,000	3,500	220,353	176,800
9 Drainage established before 1950..... acres served 1960...	122,617	364,800	29,000	150,000	86,000	3,500	155,709	176,800
10 Area added, 1950-1959..... acres served 1960...	14,571	...	...	...	...	...	64,644	...
11 Area served by two or more projects..... acres served 1960...	9,980	16,700	2,000	55,125	28,298	...	14,044	4,985
PROJECTS, 1960, BY TYPE OF ORGANIZATION								
12 Drains owned by one landowner..... number of projects...	10	5	...	...	24	...	10	3
13	9,709	5,093	...	...	27,588	...	19,725	4,985
14 Cooperative or mutual drains..... number of projects...	17	11	2	...	2	...	16	...
15	14,791	12,257	2,000	...	1,240	...	26,934	...
16 Legally organized public drains..... number of projects...	14	1	1	4	1	2	11	1
17	122,668	364,800	29,000	209,192	86,000	3,500	187,738	176,800
PROJECTS, 1960, BY YEAR STARTED								
18 1950-1959..... number of projects...	5	8	...	...	23	1	13	...
19	16,466	6,625	...	...	23,341	1,000	106,537	...
20 Prior to 1950..... number of projects...	36	9	3	4	4	1	24	4
21	130,702	375,525	31,000	209,192	91,487	2,500	127,860	181,785
DRAINAGE OPERATIONS, 1950-1959 ³								
22 Cost of drainage works and services..... projects reporting...	21	10	3	4	27	2	21	1
23	313,088	3,057,162	24,745	2,114,286	1,775,479	64,735	888,125	1,292,537
24 New drainage works constructed, enlarged, or installed..... projects reporting...	5	10	3	2	26	...	15	1
25	134,191	2,057,162	12,845	1,850,000	1,175,314	...	801,011	561,049
26 Open ditches..... projects reporting...	5	10	3	2	26	...	15	1
27	45.8	250.7	20.4	163.9	682.4	...	84.0	406.7
28 Tile or covered drains..... projects reporting...	...	...	...	...	...	...	...	...
29 .....	...	...	...	...	...	...	...	...
30 Levees or dikes..... projects reporting...	...	...	1	...	1	...	1	...
31 .....	...	...	17.0	...	0.1	...	6.8	...
32 Pumps..... projects reporting...	...	...	...	...	...	...	1	...
33 .....	...	...	...	...	...	...	1	...
34 Other (see text)..... projects reporting...	...	...	1	...	...	...	...	...
35 Cost of maintenance, operation, repair, and administration..... projects reporting...	16	1	3	3	20	2	13	1
36	178,897	1,000,000	11,900	264,286	600,165	64,735	87,114	731,488

¹Land served by two or more projects counted only once.²Acres served by two projects are included for each project. See text.³Includes projects taken over by another project prior to 1960. See text.

Parish Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1960 data]

Item and Census year	Lafourche	Livingston	Madison	Morehouse	Natchitoches	Orleans	Ouachita	Plaquemines	Pointe Coupee
AREA									
1 Approximate land area.....acres 1960...	740,480	425,600	423,680	512,640	827,520	127,360	408,320	629,760	360,960
2 Land in farms.....acres 1959...	236,254	66,774	206,893	210,251	268,776	7,487	122,821	39,284	233,263
3 Drainage projects..... number 1960...	27	1	24	24	38	1	5	7	58
4 1950...	1	8	8	11	30	1	2	4	12
5 Total area in drainage projects ¹ acres served 1960...	317,000	425,600	292,580	200,700	248,200	11,500	181,680	30,710	266,960
6 1950...	740,480	26	423,680	514,560	153,200	11,500	410,880	629,760	360,960
7 Area not used for agriculture or not drained..... acres served 1960...	75,000	297,600	68,600	..	2,560	10,315	45,400	12,310	16,000
8 Net area drained and used for agriculture..... acres served 1960...	242,000	128,000	223,980	200,700	245,640	1,185	136,280	18,400	250,960
9 Drainage established before 1950..... acres served 1960...	242,000	..	222,980	200,700	158,509	1,185	136,280	18,400	250,960
10 Area added, 1950-1959..... acres served 1960...	..	128,000	1,000	..	87,131	..	..	..	..
11 Area served by two or more projects..... acres served 1960...	66,553	..	33,894	22,935	46,564	..	3,688	..	96,925
PROJECTS, 1960, BY TYPE OF ORGANIZATION									
12 Drains owned by one landowner..... number of projects...	20	..	20	9	31	..	3	..	56
13 acres served ² ...	56,002	..	33,607	9,290	42,959	..	3,688	..	81,925
14 Cooperative or mutual drains..... number of projects...	1	..	3	14	4	..	..	..	..
15 acres served ² ...	700	..	2,687	13,645	3,605	..	..	..	..
16 Legally organized public drains..... number of projects...	6	1	1	1	3	1	2	7	2
17 acres served ² ...	251,851	128,000	221,580	200,700	245,640	1,185	136,280	18,400	265,960
PROJECTS, 1960, BY YEAR STARTED									
18 1950-1959..... number of projects...	1	1	11	6	6	..	2	4	..
19 acres served ² ...	800	128,000	7,965	9,085	98,610	..	2,198	10,746	..
20 Prior to 1950..... number of projects...	26	..	13	18	32	1	3	3	58
21 acres served ² ...	307,753	..	249,909	214,550	193,594	1,185	137,770	7,654	347,885
DRAINAGE OPERATIONS, 1950-1959 ³									
22 Cost of drainage works and services..... projects reporting...	29	1	14	24	35	1	4	7	49
23 dollars...	2,018,136	1,352,689	389,003	969,218	532,451	502,748	486,041	2,812,510	1,578,914
24 New drainage works constructed, enlarged, or installed..... projects reporting...	13	1	14	11	28	1	4	7	43
25 dollars...	263,789	1,127,689	190,883	436,069	343,012	150,000	314,241	1,884,500	1,085,159
26 Open ditches..... projects reporting...	11	1	14	11	28	1	3	1	43
27 length, miles...	62.7	335.5	153.6	134.8	216.2	1.0	90.6	4.8	685.4
28 Tile or covered drains..... projects reporting...	..	..	..	..	..	..	..	1	..
29 length, miles...	..	..	..	..	..	..	..	0.1	..
30 Levees or dikes..... projects reporting...	1	..	..	..	2	..	..	1	..
31 length, miles...	0.1	..	..	..	19.0	..	..	4.8	..
32 Pumps..... projects reporting...	4	..	..	..	..	..	1	7	..
33 number of pumps...	11	..	..	..	..	..	1	7	..
34 Other (see text)..... projects reporting...	..	..	..	..	1	..	..	7	1
35 Cost of maintenance, operation, repair, and administration..... projects reporting...	28	1	1	23	29	1	2	7	36
36 dollars...	1,754,347	225,000	198,120	533,149	189,439	352,748	171,800	928,010	493,755

¹Land served by two or more projects counted only once.
²Acres served by two projects are included for each project. See text.
³Includes projects taken over by another project prior to 1960. See text.

DRAINAGE OF AGRICULTURAL LANDS

Parish Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	Rapides	Red River	Richland	St. Bernard	St. Charles	St. James	St. John the Baptist	St. Landry	St. Martin
AREA									
1 Approximate land area.....acres 1960...	842,240	264,320	368,640	326,400	194,560	159,360	144,000	595,200	461,440
2 Land in farms.....acres 1959...	261,111	150,355	253,558	12,797	43,901	52,785	32,677	310,826	97,751
3 Drainage projects..... number 1960...	25	8	12	2	9	26	10	31	8
4 1950...	4	4	7	3	4	1	7	40	2
5 Total area in drainage projects ¹ acres served 1960...	215,000	91,000	368,640	74,000	41,427	159,360	12,727	307,639	187,648
6 1950...	850,560	91,000	368,640	226,895	32,842	75	13,509	266,099	461,440
7 Area not used for agriculture or not drained..... acres served 1960...	17,900	...	48,896	69,600	...	77,360	...	...	37,376
8 Net area drained and used for agriculture..... acres served 1960...	197,100	91,000	319,744	4,400	41,427	82,000	12,727	307,639	150,272
9 Drainage established before 1950..... acres served 1960...	197,100	91,000	319,744	4,400	34,777	3,318	9,448	254,465	150,272
10 Area added, 1950-1959..... acres served 1960...	...	...	...	...	6,650	78,682	3,279	53,174	...
11 Area served by two or more projects..... acres served 1960...	24,922	11,950	8,794	...	3,168	23,654	...	53,547	57,398
PROJECTS, 1960, BY TYPE OF ORGANIZATION									
12 Drains owned by one landowner..... number of projects...	23	5	2	...	5	24	9	6	2
18 acres served ² ..	24,297	10,700	2,048	...	6,818	23,654	9,654	7,457	3,913
14 Cooperative or mutual drains..... number of projects...	1	1	9	...	...	1	...	6	1
15 acres served ² ..	625	1,250	6,746	...	...	2,957	...	2,975	1,500
16 Legally organized public drains..... number of projects...	1	2	1	2	4	1	1	19	5
17 acres served ² ..	197,100	91,000	319,744	4,400	37,777	82,000	3,073	351,254	220,718
PROJECTS, 1960, BY YEAR STARTED									
18 1960-1959..... number of projects...	15	2	4	...	3	22	3	6	...
19 acres served ² ..	15,175	4,600	2,993	...	3,568	105,293	3,279	55,062	...
20 Prior to 1960..... number of projects...	10	6	8	2	6	4	7	25	8
21 acres served ² ..	206,847	98,350	325,545	4,400	41,027	3,318	9,448	306,624	226,131
DRAINAGE OPERATIONS, 1950-1959 ³									
22 Cost of drainage works and services.....projects reporting...	22	7	5	1	8	26	9	24	7
23 dollars...	919,470	89,748	1,760,306	150,000	769,525	1,404,823	225,366	686,658	1,119,538
24 New drainage works constructed, enlarged, or installed.....projects reporting...	21	6	5	1	5	24	7	7	3
25 dollars...	425,468	48,261	410,306	100,000	165,926	927,480	60,802	142,316	680,315
26 Open ditches.....projects reporting...	21	6	5	1	5	24	7	7	3
27 length, miles...	167.1	80.0	129.2	8.0	149.9	363.8	116.6	90.6	270.6
28 Tile or covered drains.....projects reporting...	...	...	...	...	...	...	...	...	...
29 length, miles...	...	...	...	...	...	...	...	...	...
30 Levees or dikes.....projects reporting...	...	...	...	...	...	...	...	...	1
31 length, miles...	...	...	...	...	...	...	...	...	4.0
32 Pumps.....projects reporting...	...	...	...	...	...	...	...	...	1
33 number of pumps...	...	...	...	...	...	...	...	...	2
34 Other (see text).....projects reporting...	...	...	...	...	...	...	...	...	1
35 Cost of maintenance, operation, repair, and administration.....projects reporting...	6	5	1	1	7	23	9	17	6
36 dollars...	494,002	41,487	1,350,000	50,000	603,599	477,343	164,564	544,342	439,223

¹Land served by two or more projects counted only once.
²Acres served by two projects are included for each project. See text.
³Includes projects taken over by another project prior to 1960. See text.

Parish Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	St. Mary	Tangipahoa	Tensas	Terrebonne	Vermillion	West Baton Rouge	West Carroll	West Feliciana
AREA								
1 Approximate land area.....acres 1960...	387,200	513,920	398,720	890,240	783,360	128,000	227,840	262,400
2 Land in farms.....acres 1959...	139,947	184,455	245,166	100,537	386,801	54,057	183,945	137,984
3 Drainage projects..... number 1960...	15	3	30	11	57	10	44	1
4	2	89	23	3	215	1	4	...
5 Total area in drainage projects ¹ acres served 1960...	260,501	291,192	125,958	194,000	407,199	77,154	227,840	15,000
6	387,200	122,323	49,768	890,240	480,256	128,640	227,840	...
7 Area not used for agriculture or not drained..... acres served 1960...	179,000	64,352	41,140	64,000	44,652	23,269	20,000	3,000
8 Net area drained and used for agriculture..... acres served 1960...	81,501	226,840	84,818	130,000	362,547	53,885	207,840	12,000
9 Drainage established before 1950..... acres served 1960...	81,501	121,855	33,152	130,000	360,797	53,885	207,840	12,000
10 Area added, 1950-1959..... acres served 1960...	...	104,985	51,666	...	1,750	...	...	...
11 Area served by two or more projects..... acres served 1960...	17,282	...	8,144	24,151	58,788	12,493	31,896	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION								
12 Drains owned by one landowner..... number of projects...	14	...	23	10	29	9	...	1
13	17,783	...	27,297	24,151	60,108	12,493	...	12,000
14 Cooperative or mutual drains.....number of projects...	...	...	4	...	12	...	43	...
15 .....	...	...	3,336	...	14,842	...	31,896	...
16 Legally organized public drains..... number of projects...	1	3	3	1	16	1	1	...
17	81,000	226,840	62,329	130,000	348,345	53,885	207,840	...
PROJECTS, 1960, BY YEAR STARTED								
18 1960-1959.....number of projects...	6	2	13	...	7	...	39	...
19	3,852	182,840	65,622	...	9,371	...	29,296	...
20 Prior to 1950.....number of projects...	9	1	17	11	50	10	5	1
21	94,931	44,000	27,340	154,151	413,924	66,378	210,440	12,000
DRAINAGE OPERATIONS, 1950-1959³								
22 Cost of drainage works and services.....projects reporting...	15	2	22	11	45	10	40	1
23	1,599,547	1,485,598	370,989	1,612,942	1,269,741	807,070	382,976	100,000
24 New drainage works constructed, enlarged, or installed.....projects reporting...	13	2	22	7	36	8	40	1
25	476,800	934,598	364,369	91,814	701,786	350,017	125,343	12,000
26 Open ditches.....projects reporting...	11	2	22	7	36	8	40	1
27	221.7	167.8	323.4	25.3	341.8	165.9	88.9	22.7
28 Tile or covered drains.....projects reporting...	...	...	...	...	...	...	...	...
29 .....	...	...	...	...	...	...	...	...
30 Levees or dikes.....projects reporting...	1	...	...	...	12	...	...	...
31	2.0	...	...	...	75.6	...	...	...
32 Pumps.....projects reporting...	3	...	...	...	16	...	...	1
33	5	...	...	...	47	...	...	4
34 Other (see text).....projects reporting...	...	...	...	...	...	...	...	...
35 Cost of maintenance, operation, repair, and administration.....projects reporting...	15	1	2	11	30	10	1	1
36	1,122,747	551,000	6,620	1,521,128	567,955	457,053	257,633	88,000

¹Land served by two or more projects counted only once.

²Acres served by two projects are included for each project. See text.

³Includes projects taken over by another project prior to 1960. See text.

State Table 1.—DRAINAGE PROJECTS—NUMBER, AREA, COST, AND WORKS, 1920 TO 1960

[See text for comparability of data]

Item	1960 Census	1950 Census	1940 Census	1930 Census	1920 Census
AREA					
Approximate land area.....acres...	6,319,360	6,323,840	6,327,680	6,362,240	6,362,240
Land in farms.....acres...	3,456,769	4,055,529	4,197,827	4,374,398	4,757,999
Drainage projects.....number...	138	93	126	...	...
Total area in drainage projects.....acres served...	353,837	323,815	183,337	...	...
Area not used for agriculture or not drained.....acres served...	3,390	NA	NA	...	...
Not area drained and used for agriculture.....acres served...	350,447	NA	¹ 181,891	...	...
Drainage established 10 years or more before Census date.....acres served...	341,631	NA	NA	...	...
Drainage established within 10 years of Census date.....acres served...	8,816	NA	NA	...	...
Area served by two or more projects.....acres served...	44,541	41,853	7,585	...	...
PROJECTS BY TYPE OF ORGANIZATION					
Drains owned by one landowner.....number of projects...	...	...	...	...	...
.....acres served...	...	...	...	...	...
Cooperative or mutual drains.....number of projects...	9	3	...	...	...
.....acres served...	14,183	4,333	...	...	...
Legally organized public drains.....number of projects...	129	90	NA	...	...
.....acres served...	382,603	319,482	183,337	...	...
PROJECTS BY YEAR STARTED					
Started 10 years or more before Census date.....number of projects...	116	73	NA	...	...
.....acres served...	360,432	266,290	57,472	...	...
Started within 10 years of Census date.....number of projects...	22	20	NA	...	...
.....acres served...	36,354	57,525	125,865	...	...
OPERATIONS, 10-YEAR PERIOD PRECEDING CENSUS DATE					
Cost of drainage works and services.....projects reporting...	29	28	NA	...	...
.....dollars...	409,308	183,309	NA	...	...
New drainage works constructed, enlarged, or installed.....projects reporting...	23	² 22	NA	...	...
.....cost, dollars...	393,798	² 129,578	NA	...	...
Open ditches.....projects reporting...	23	26	NA	...	...
.....length, miles...	137.2	138	NA	...	...
Tile or covered drains.....projects reporting...	...	...	NA	...	...
.....length, miles...	...	...	NA	...	...
Levees or dikes.....projects reporting...	...	...	NA	...	...
.....length, miles...	...	...	NA	...	...
Pumps.....projects reporting...	...	NA	NA	...	...
.....number of pumps...	...	NA	NA	...	...
Other (see text).....projects reporting...	...	NA	NA	...	...
Cost of maintenance, operation, repair, and administration.....projects reporting...	8	NA	NA	...	...
.....dollars...	15,600	53,731	NA	...	...
STATUS ON CENSUS DATE					
Capital investment.....dollars...	NA	NA	43,914	...	...
Physical works:					
Open ditches.....length, miles...	NA	NA	461.3	...	...
Tile drains.....length, miles...	NA	NA	...	...	...
Levees and dikes.....length, miles...	NA	NA	...	...	...
Pumping units.....number of units...	NA	...	...	...	...

NA Not available.

¹Not fully comparable. See text.

²Cost of new works for lands not previously drained.

DRAINAGE OF AGRICULTURAL LANDS

State Table 2.—DRAINAGE

	Size of project (Based on area of agricultural land in project)	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	138	396,786	90,880	128	387,970	10	8,816
2	500 to 999 acres.....	45	31,330	8,155	38	26,788	7	4,542
3	1,000 to 1,999 acres.....	36	52,090	9,863	33	47,816	3	4,274
4	2,000 to 4,999 acres.....	41	127,218	14,970	41	127,218	...	...
5	5,000 to 9,999 acres.....	13	89,562	21,173	13	89,562	...	...
6	10,000 to 19,999 acres.....	2	33,541	22,943	2	33,541	...	...
7	20,000 to 49,999 acres.....	...	...	...	...	...	...	...
8	50,000 to 99,999 acres.....	1	63,045	13,776	1	63,045	...	...
9	100,000 or more acres.....	...	...	...	...	...	...	...

State Table 3.—DRAINAGE PROJECTS, 1960,

	Type of organization	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	138	396,786	90,880	128	387,970	10	8,816
2	Drains owned by one landowner.....	...	...	...	...	...	...	...
3	Cooperative or mutual drains.....	9	14,183	2,234	6	12,349	3	1,834
4	Legally organized public drains.....	129	382,603	88,646	122	375,621	7	6,982

State Table 4.—DRAINAGE PROJECTS, 1960,

	Year of organization	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	138	396,786	90,880	128	387,970	10	8,816
2	1960-1959.....	22	36,354	3,152	12	27,538	10	8,816
3	Prior to 1960.....	116	360,432	87,728	116	360,432	...	...

DRAINAGE OF AGRICULTURAL LANDS

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data.]

Item and Census year	The State	Caroline	Dorchester	Queen Annes	Somerset	Wicomico	Worcester
AREA							
1 Approximate land area.....acres 1960...	6,319,360	204,800	371,200	238,720	212,480	243,200	309,120
2 Land in farms.....acres 1959...	3,456,769	156,771	157,050	182,772	85,528	131,363	146,847
3 Drainage projects..... number 1960...	1138	35	27	33	28	14	9
4 1950...	193	27	19	23	20	8	7
5 Total area in drainage projects ² acres served 1960...	353,837	56,076	52,268	66,921	73,821	55,430	49,321
6 1950...	323,815	50,938	43,922	64,183	64,118	52,429	48,225
7 Area not used for agriculture or not drained..... acres served 1960...	3,390	...	...	...	2,452	...	938
8 Net area drained and used for agriculture..... acres served 1960...	350,447	56,076	52,268	66,921	71,369	55,430	48,383
9 Drainage established before 1950..... acres served 1960...	341,631	53,691	52,268	65,009	70,210	53,166	47,287
10 Area added, 1950-1959..... acres served 1960...	8,816	2,385	...	1,912	1,159	2,264	1,096
11 Area served by two or more projects..... acres served 1960...	44,541	8,365	1,575	20,825	...	13,776	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION							
12 Drains owned by one landowner..... number of projects...	...	...	...	...	...	...	...
13 acres served ³...	...	...	...	...	...	...	...
14 Cooperative or mutual drains..... number of projects...	9	...	...	...	5	4	...
15 acres served ³ ...	14,183	...	...	...	9,175	5,008	...
16 Legally organized public drains..... number of projects...	1129	35	27	33	23	10	9
17 acres served ³ ...	382,603	64,441	53,843	89,544	62,194	64,198	48,383
PROJECTS, 1960, BY YEAR STARTED							
18 1950-1959..... number of projects...	22	3	...	5	5	4	5
19 acres served ³ ...	36,354	3,102	...	3,847	9,175	2,764	17,466
20 Prior to 1950..... number of projects...	1116	32	27	28	23	10	4
21 acres served ³ ...	360,432	61,339	53,843	85,697	62,194	66,442	30,917
DRAINAGE OPERATIONS, 1950-1959 ⁴							
22 Cost of drainage works and services.....projects reporting...	29	7	...	5	6	7	4
23 dollars...	409,398	107,603	...	65,956	46,335	24,541	164,963
24 New drainage works constructed, enlarged, or installed.....projects reporting...	23	6	...	5	4	4	4
25 dollars...	393,798	107,360	...	65,956	42,150	13,369	164,963
26 Open ditches.....projects reporting...	23	6	...	5	4	4	4
27 length, miles...	137.2	37.1	...	18.2	14.6	14.8	52.5
28 Tile or covered drains.....projects reporting...	...	...	...	...	...	...	...
29 length, miles...	...	...	...	...	...	...	...
30 Levees or dikes.....projects reporting...	...	...	...	...	...	...	...
31 length, miles...	...	...	...	...	...	...	...
32 Pumps.....projects reporting...	...	...	...	...	...	...	...
33 number of pumps...	...	...	...	...	...	...	...
34 Other (see text).....projects reporting...	...	...	...	...	...	...	...
35 Cost of maintenance, operation, repair, and administration.....projects reporting...	8	1	...	...	2	5	...
36 dollars...	15,600	243	...	...	4,185	11,172	...

¹An intercounty project is counted in each county in which a part is located. It is counted only once in the State total.²Land served by two or more projects counted only once.³Acres served by two projects are included for each project. See text.⁴Includes projects taken over by another project prior to 1960. See text.

State Table 1.—DRAINAGE PROJECTS—NUMBER, AREA, COST, AND WORKS, 1920 TO 1960

[See text for comparability of data.]

Item	1960 Census	1950 Census	1940 Census	1930 Census	1920 Census
AREA					
Approximate land area..... acres...	36,492,160	36,494,080	36,494,080	36,787,200	36,787,200
Land in farms..... acres...	14,782,507	17,269,992	18,037,995	17,118,951	19,032,961
Drainage projects..... number...	86	54	¹ 7,692	NA	NA
Total area in drainage projects..... acres served...	10,208,735	10,194,439	8,978,386	9,180,851	9,729,171
Area not used for agriculture or not drained..... acres served...	331,686	NA	NA	NA	NA
Net area drained and used for agriculture..... acres served...	9,877,049	NA	² 7,796,979	² 8,826,265	NA
Drainage established 10 years or more before Census date..... acres served...	9,753,462	NA	NA	NA	NA
Drainage established within 10 years of Census date..... acres served...	123,587	NA	NA	NA	NA
Area served by two or more projects..... acres served...	23,279	NA	7,091,887	5,851,841	6,037,307
PROJECTS BY TYPE OF ORGANIZATION					
Drains owned by one landowner..... number of projects...	11	(³)	NA	NA	NA
acres served ³ ..	7,454	(³)	7,560	21,530	22,280
Cooperative or mutual drains..... number of projects...	21	(³)	...	...	...
acres served ³ ..	22,724	(³)	...	...	...
Legally organized public drains..... number of projects...	54	³ 54	NA	NA	NA
acres served ³ ..	9,870,150	³ 10,194,439	8,970,826	9,159,321	9,706,891
PROJECTS BY YEAR STARTED					
Started 10 years or more before Census date..... number of projects...	64	NA	NA	NA	NA
acres served...	9,883,963	NA	8,276,514	8,336,081	⁴ 6,273,912
Started within 10 years of Census date..... number of projects...	22	NA	NA	NA	NA
acres served...	16,365	NA	701,872	844,770	⁴ 3,435,274
OPERATIONS, 10-YEAR PERIOD PRECEDING CENSUS DATE					
Cost of drainage works and services..... projects reporting...	79	51	NA	NA	NA
dollars...	37,186,074	20,235,636	NA	NA	NA
New drainage works constructed, enlarged, or installed..... projects reporting...	67	⁵ 37	NA	NA	NA
cost, dollars...	4,783,366	⁵ 2,556,472	NA	NA	NA
Open ditches..... projects reporting...	64	34	NA	NA	NA
length, miles...	974.6	554	NA	NA	NA
Tile or covered drains..... projects reporting...	29	28	NA	NA	NA
length, miles...	208.5	145	NA	NA	NA
Levees or dikes..... projects reporting...	2	...	NA	NA	NA
length, miles...	4.7	...	NA	NA	NA
Pumps..... projects reporting...	7	NA	NA	NA	NA
number of pumps...	15	NA	NA	NA	NA
Other (see text)..... projects reporting...	4	NA	NA	NA	NA
Cost of maintenance, operation, repair, and administration..... projects reporting...	55	51	NA	NA	NA
dollars...	32,402,708	17,679,164	NA	NA	NA
STATUS ON CENSUS DATE					
Capital investment..... dollars...	NA	NA	40,412,251	37,677,084	24,683,715
Physical works:					
Open ditches..... length, miles...	NA	NA	19,608.6	17,188.5	16,023.8
Tile drains..... length, miles...	NA	NA	3,229.5	3,490.2	2,173.9
Levees and dikes..... length, miles...	NA	NA	13.6	34.6	33.1
Pumping units..... number of units...	NA	NA	2	3	NA

NA Not available.

¹In 1940, each county drain was counted as a separate project. See text.

²Not fully comparable. See text.

³All projects in 1950 included with county drains. See text.

⁴1920 figures exclude 19,985 acres for which date of organization was not reported.

⁵Cost of new works for lands not previously drained.

DRAINAGE OF AGRICULTURAL LANDS

State Table 2.—DRAINAGE

	Size of project (Based on area of agricultural land in project)	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	86	9,900,328	46,558	83	9,776,741	42	123,587
2	500 to 999 acres.....	28	18,013	11,114	25	13,353	11	4,660
3	1,000 to 1,999 acres.....	5	7,085	3,765	5	7,085	...	...
4	2,000 to 4,999 acres.....	1	4,200	600	1	4,200	...	...
5	5,000 to 9,999 acres.....	3	22,096	8,850	3	22,096	...	...
6	10,000 to 19,999 acres.....	2	31,169	...	2	31,169	...	...
7	20,000 to 49,999 acres.....	5	184,213	1,108	5	184,213	...	...
8	50,000 to 99,999 acres.....	5	403,485	...	5	403,035	1	450
9	100,000 or more acres.....	37	9,230,067	21,121	37	9,111,590	30	118,477

State Table 3.—DRAINAGE PROJECTS, 1960,

	Type of organization	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	86	9,900,328	46,558	83	9,776,741	42	123,587
2	Drains owned by one landowner.....	11	7,454	4,864	11	6,054	4	1,400
3	Cooperative or mutual drains.....	21	22,724	18,415	18	19,234	7	3,490
4	Legally organized public drains.....	54	9,870,150	23,279	54	9,751,453	31	118,697

State Table 4.—DRAINAGE PROJECTS, 1960,

	Year of organization	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	86	9,900,328	46,558	83	9,776,741	42	123,587
2	1950-1959.....	22	16,365	10,205	19	11,705	11	4,660
3	Prior to 1950.....	64	9,883,963	36,353	64	9,765,036	31	118,927

PROJECTS, 1960, BY SIZE

Cost of drainage works and services, 1950-1959				New works constructed, enlarged, or installed, 1950-1959									
Total		For new works		Open ditches		Tile or covered drains		Levees and dikes		Pumps		Other, projects reporting	
Projects reporting	Dollars	Projects reporting	Dollars	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Number		
79	37,186,074	67	4,783,366	64	974.6	29	208.5	2	4.7	7	15	4	1
25	311,587	24	264,987	22	37.2	9	157.0	1	0.7	2	5	2	2
4	55,731	4	55,731	4	7.4	1	15.0	1	4.0	1	2	1	3
1	1,700	...	...	...	...	...	...	...	...	...	...	...	4
2	175,896	2	3,896	1	0.2	...	...	...	...	1	3	...	5
2	27,983	...	...	...	...	...	...	...	...	...	...	...	6
3	139,109	1	7,100	1	0.5	...	...	...	...	...	...	...	7
5	581,023	1	19,480	1	1.0	1	0.1	...	...	...	...	...	8
37	35,893,045	35	4,432,172	35	928.3	18	36.4	...	...	3	5	1	9

BY TYPE OF ORGANIZATION

Cost of drainage works and services, 1950-1959				New works constructed, enlarged, or installed, 1950-1959									
Total		For new works		Open ditches		Tile or covered drains		Levees and dikes		Pumps		Other, projects reporting	
Projects reporting	Dollars	Projects reporting	Dollars	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Number		
79	37,186,074	67	4,783,366	64	974.6	29	208.5	2	4.7	7	15	4	1
9	247,500	9	222,300	8	19.2	7	154.7	1	0.7	1	4	...	2
20	244,818	19	51,418	17	21.4	2	2.3	...	...	2	4	3	3
50	36,693,756	39	4,509,648	39	934.0	20	51.5	1	4.0	4	7	1	4

BY YEAR OF ORGANIZATION

Cost of drainage works and services, 1950-1959				New works constructed, enlarged, or installed, 1950-1959									
Total		For new works		Open ditches		Tile or covered drains		Levees and dikes		Pumps		Other, projects reporting	
Projects reporting	Dollars	Projects reporting	Dollars	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Number		
79	37,186,074	67	4,783,366	64	974.6	29	208.5	2	4.7	7	15	4	1
22	270,068	22	270,068	22	30.5	7	116.9	2	4.7	2	6	3	2
57	36,916,006	45	4,513,298	42	944.1	22	91.6	...	...	5	9	1	3

DRAINAGE OF AGRICULTURAL LANDS

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	The State	Alcona	Allegan	Alpena	Arenac	Barry	Bay	Berrien	Branch	Calhoun
AREA										
1 Approximate land area.....acres 1960...	36,492,160	433,280	530,560	363,520	235,520	351,360	285,440	371,200	323,840	453,760
2 Land in farms.....acres 1959...	14,782,507	99,803	323,225	135,133	108,956	244,336	193,555	263,926	280,603	335,479
3 Drainage projects..... number 1960...	86	2	1	...	1	5	2	1	1	1
4 1950...	54	1	1	1	1	1	1	1	1	1
5 Total area in drainage projects ¹ acres served 1960...	10,208,735	4,200	238,017	...	171,868	160,862	255,634	153,185	239,504	224,464
6 1950...	10,194,439	4,520	238,017	40,525	171,868	159,252	253,184	152,640	219,424	222,967
7 Area not used for agriculture or not drained..... acres served 1960...	331,686	...	920	...	...	...	12,320	...	...	...
8 Net area drained and used for agriculture..... acres served 1960...	9,877,049	4,200	237,097	...	171,868	160,862	243,314	153,185	239,504	224,464
9 Drainage established before 1950..... acres served 1960...	9,753,462	4,200	237,097	...	171,868	159,252	240,864	152,640	219,424	222,967
10 Area added, 1950-1959..... acres served 1960...	123,587	...	...	...	...	1,610	2,450	545	20,080	1,497
11 Area served by two or more projects..... acres served 1960...	23,279	600	...	...	...	1,800	580	...	...	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION										
12 Drains owned by one landowner..... number of projects...	11	...	...	...	...	...	...	...	...	...
13 acres served ² ...	7,454	...	...	...	...	...	...	...	...	...
14 Cooperative or mutual drains..... number of projects...	21	1	...	...	...	4	1	...	...	...
15 acres served ² ...	22,724	600	...	...	...	2,770	580	...	...	...
16 Legally organized public drains..... number of projects...	54	1	1	...	1	1	1	1	1	1
17 acres served ² ...	9,870,150	4,200	237,097	...	171,868	159,892	243,314	153,185	239,504	224,464
PROJECTS, 1960, BY YEAR STARTED										
18 1950-1959..... number of projects...	22	1	...	...	...	4	...	...	...	...
19 acres served ² ...	16,365	600	...	...	...	2,770	...	...	...	...
20 Prior to 1950..... number of projects...	64	1	1	...	1	1	2	1	1	1
21 acres served ² ...	9,883,963	4,200	237,097	...	171,868	159,892	243,894	153,185	239,504	224,464
DRAINAGE OPERATIONS, 1950-1959 ³										
22 Cost of drainage works and services.....projects reporting...	79	2	1	...	1	5	2	1	1	1
23 dollars...	37,186,074	3,550	321,663	...	19,673	155,892	1,119,431	637,768	675,088	565,565
24 New drainage works constructed, enlarged, or installed.....projects reporting...	67	1	1	...	1	5	1	1	1	1
25 dollars...	4,783,366	1,850	10,720	...	3,944	78,940	502,250	13,600	128,839	48,394
26 Open ditches.....projects reporting...	64	1	1	...	1	5	1	1	1	1
27 length, miles...	974.6	1.3	7.3	...	1.4	20.4	132.9	3.9	35.7	13.0
28 Tile or covered drains.....projects reporting...	29	...	...	...	...	1	1	1	1	1
29 length, miles...	208.5	...	...	...	...	0.9	1.4	0.1	3.5	1.1
30 Levees or dikes.....projects reporting...	2	...	...	...	...	...	...	...	...	...
31 length, miles...	4.7	...	...	...	...	...	...	...	...	...
32 Pumps.....projects reporting...	7	...	...	...	...	...	1	...	1	...
33 number of pumps...	15	...	...	...	...	...	3	...	1	...
34 Other (see text).....projects reporting...	4	...	...	...	...	...	...	...	...	1
35 Cost of maintenance, operation, repair, and administration.....projects reporting...	55	1	1	...	1	1	2	1	1	1
36 dollars...	32,402,708	1,700	310,943	...	15,729	76,952	617,181	624,168	546,249	517,171

¹Land served by two or more projects counted only once.²Acres served by two projects are included for each project. See text.³Includes projects taken over by another project prior to 1960. See text.

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	Cass	Chippewa	Clare	Clinton	Eaton	Genesee	Gladwin	Gratiot	Hillsdale
AREA									
1 Approximate land area.....acres 1960...	312,320	1,011,200	366,080	365,440	362,880	411,520	321,920	362,240	384,640
2 Land in farms.....acres 1959...	225,148	122,334	118,290	324,364	310,342	239,291	126,629	321,737	321,249
3 Drainage projects..... number 1960...	3	1	2	1	1	1	1	2	1
4 1950...	1	...	1	1	1	1	1	1	1
5 Total area in drainage projects ¹ acres served 1960...	49,675	960	19,542	316,230	324,150	274,418	105,827	338,320	192,038
6 1950...	49,675	...	22,202	315,656	323,200	272,417	117,637	335,320	188,488
7 Area not used for agriculture or not drained..... acres served 1960...	...	...	...	1,220	800	13,000	...	...	...
8 Net area drained and used for agriculture..... acres served 1960...	49,675	960	19,542	315,010	323,350	261,418	105,827	338,320	192,038
9 Drainage established before 1950..... acres served 1960...	49,675	...	19,002	314,436	322,400	259,417	105,377	335,320	188,488
10 Area added, 1950-1959..... acres served 1960...	...	960	540	574	950	2,001	450	3,000	3,550
11 Area served by two or more projects..... acres served 1960...	1,108	...	...	...	...	...	...	510	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION									
12 Drains owned by one landowner..... number of projects...	2	...	...	...	...	...	...	...	...
13 acres served ² ...	1,108	...	...	...	...	...	...	...	...
14 Cooperative or mutual drains..... number of projects...	...	1	1	...	...	...	...	1	...
15 acres served ²...	...	960	540	...	...	...	...	510	...
16 Legally organized public drains..... number of projects...	1	...	1	1	1	1	1	1	1
17 acres served ² ...	49,675	...	19,002	315,010	323,350	261,418	105,827	338,320	192,038
PROJECTS, 1960, BY YEAR STARTED									
18 1950-1959..... number of projects...	...	1	1	...	...	...	...	1	...
19 acres served ²...	...	960	540	...	...	...	...	510	...
20 Prior to 1950..... number of projects...	3	...	1	1	1	1	1	1	1
21 acres served ² ...	50,783	...	19,002	315,010	323,350	261,418	105,827	338,320	192,038
DRAINAGE OPERATIONS, 1950-1959 ³									
22 Cost of drainage works and services..... projects reporting...	3	(⁴)	2	1	1	1	1	2	1
23 dollars...	181,203	(⁴)	22,860	146,155	1,076,717	1,402,869	26,889	4,353,954	409,363
24 New drainage works constructed, enlarged, or installed..... projects reporting...	3	(⁴)	1	1	1	1	1	2	1
25 dollars...	42,100	(⁴)	1,365	3,658	233,700	68,959	8,900	255,372	109,193
26 Open ditches..... projects reporting...	3	(⁴)	1	1	1	1	1	2	1
27 length, miles...	11.2	(⁴)	0.9	1.3	26.7	10.3	2.6	20.5	23.2
28 Tile or covered drains..... projects reporting...	2	...	...	...	1	...	...	2	1
29 length, miles...	47.5	...	...	...	3.2	...	...	3.4	10.9
30 Levees or dikes..... projects reporting...	...	...	...	...	...	...	...	...	...
31 length, miles...	...	...	...	...	...	...	...	...	...
32 Pumps..... projects reporting...	...	...	...	...	...	...	...	...	...
33 number of pumps...	...	...	...	...	...	...	...	...	...
34 Other (see text)..... projects reporting...	...	...	...	...	...	...	...	...	...
35 Cost of maintenance, operation, repair, and administration..... projects reporting...	3	...	1	1	1	1	1	1	1
36 dollars...	139,103	...	21,495	142,497	843,017	1,333,910	17,989	4,098,582	300,170

¹Land served by two or more projects counted only once.

²Acres served by two projects are included for each project. See text.

³Includes projects taken over by another project prior to 1960. See text.

⁴Included in State total only.

DRAINAGE OF AGRICULTURAL LANDS

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	Huron	Ingham	Ionia	Iosco	Isabella	Jackson	Kalamazoo	Kent	Lapeer
AREA									
1 Approximate land area.....acres 1960...	526,080	357,760	368,000	350,080	366,080	451,200	362,880	551,680	420,480
2 Land in farms.....acres 1959...	467,163	282,030	306,679	84,126	271,007	305,839	223,062	311,605	321,801
3 Drainage projects..... number 1960...	1	3	1	1	2	1	1	1	6
4 1950...	1	1	1	1	1	1	1	1	1
5 Total area in drainage projects ¹ acres served 1960...	386,969	315,197	209,387	92,716	233,344	156,200	64,328	190,137	308,541
6 1950...	378,169	330,824	209,387	96,666	227,328	175,022	65,128	188,569	287,539
7 Area not used for agriculture or not drained..... acres served 1960...	...	...	...	...	2,520	4,480	...	9,000	...
8 Net area drained and used for agriculture..... acres served 1960...	386,969	315,197	209,387	92,716	230,824	151,720	64,328	181,137	308,541
9 Drainage established before 1950..... acres served 1960...	375,520	314,997	209,387	92,266	226,088	151,020	64,328	179,569	287,539
10 Area added, 1950-1959..... acres served 1960...	11,449	200	...	450	4,736	700	...	1,568	21,002
11 Area served by two or more projects..... acres served 1960...	...	540	...	...	600	...	...	...	1,350
PROJECTS, 1960, BY TYPE OF ORGANIZATION									
12 Drains owned by one landowner..... number of projects...	...	1	...	...	...	...	...	...	2
13 acres served ²..	...	800	...	...	...	...	...	...	1,400
14 Cooperative or mutual drains..... number of projects...	...	1	...	...	1	...	...	...	3
15 acres served ²..	...	540	...	...	600	...	...	...	1,989
16 Legally organized public drains..... number of projects...	1	1	1	1	1	1	1	1	1
17 acres served ² ..	386,969	314,397	209,387	92,716	230,824	151,720	64,328	181,137	306,502
PROJECTS, 1960, BY YEAR STARTED									
18 1960-1959..... number of projects...	...	1	...	...	1	...	...	...	2
19 acres served ²..	...	540	...	...	600	...	...	...	1,170
20 Prior to 1950..... number of projects...	1	2	1	1	1	1	1	1	4
21 acres served ² ..	386,969	315,197	209,387	92,716	230,824	151,720	64,328	181,137	308,721
DRAINAGE OPERATIONS, 1950-1959 ³									
22 Cost of drainage works and services.....projects reporting...	1	2	1	1	2	1	1	1	6
23 dollars...	1,253,451	3,103,655	367,544	20,755	442,237	695,006	215,609	377,071	430,608
24 New drainage works constructed, enlarged, or installed.....projects reporting...	1	2	1	1	2	1	...	1	6
25 dollars...	210,150	140,802	3,949	19,480	51,700	67,456	...	17,691	124,426
26 Open ditches.....projects reporting...	1	2	1	1	2	1	...	1	5
27 length, miles...	37.0	12.1	0.6	1.0	12.1	5.4	...	8.2	29.4
28 Tile or covered drains.....projects reporting...	1	1	1	1	1	...	...	...	1
29 length, miles...	0.3	2.4	0.4	0.1	2.5	...	...	...	7.6
30 Levees or dikes.....projects reporting...	...	...	...	...	...	...	...	...	...
31 length, miles...	...	...	...	...	...	...	...	...	...
32 Pumps.....projects reporting...	1	...	...	...	...	...	...	...	...
33 number of pumps...	1	...	...	...	...	...	...	...	...
34 Other (see text).....projects reporting...	...	...	...	...	...	...	...	...	1
35 Cost of maintenance, operation, repair, and administration.....projects reporting...	1	1	1	1	1	1	1	1	3
36 dollars...	1,043,301	2,962,853	363,595	1,275	390,537	627,550	215,609	359,380	306,182

¹Land served by two or more projects counted only once.²Acres served by two projects are included for each project. See text.³Includes projects taken over by another project prior to 1960. See text.

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data.]

Item and Census year	Lenawee	Livingston	Macomb	Manistee	Washtenaw	Mecosta	Midland	Missaukee	Monroe
AREA									
1 Approximate land area.....acres 1960...	482,560	365,440	307,840	357,120	315,520	360,320	332,800	361,600	359,680
2 Land in farms.....acres 1959...	427,353	229,492	151,229	80,398	124,653	191,324	129,644	130,922	280,742
8 Drainage projects..... number 1960...	1	2	2	1	1	1	1	1	1
4 1950...	1	1	1	1	1	1	1	1	1
5 Total area in drainage projects ¹ acres served 1960...	376,988	144,437	220,960	13,767	46,461	27,725	262,507	27,525	352,564
6 1950...	375,168	142,414	219,054	13,767	46,461	27,725	262,372	27,525	356,324
7 Area not used for agriculture or not drained..... acres served 1960...	...	1,280	55,000	1,600	2,300	...	5,480	4,200	13,240
8 Net area drained and used for agriculture..... acres served 1960...	376,988	143,157	165,960	12,167	44,161	27,725	257,027	23,325	339,324
9 Drainage established before 1960..... acres served 1960...	376,668	139,214	164,054	12,167	44,161	27,725	255,812	23,325	339,324
10 Area added, 1950-1959..... acres served 1960...	320	3,943	1,906	...	...	...	1,215	...	...
11 Area served by two or more projects..... acres served 1960...	...	...	240	...	...	...	...	...	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION									
12 Drains owned by one landowner..... number of projects...	...	...	...	...	...	...	...	...	...
13 acres served ²...	...	...	...	...	...	...	...	...	...
14 Cooperative or mutual drains..... number of projects...	...	1	1	...	...	...	...	...	...
15 acres served ²...	...	160	500	...	...	...	...	...	...
16 Legally organized public drains..... number of projects...	1	1	1	1	1	1	1	1	1
17 acres served ² ...	376,988	142,997	165,700	12,167	44,161	27,725	257,027	23,325	339,324
PROJECTS, 1960, BY YEAR STARTED									
18 1950-1959..... number of projects...	...	1	1	...	...	...	...	...	...
19 acres served ²...	...	160	500	...	...	...	...	...	...
20 Prior to 1950..... number of projects...	1	1	1	1	1	1	1	1	1
21 acres served ² ...	376,988	142,997	165,700	12,167	44,161	27,725	257,027	23,325	339,324
DRAINAGE OPERATIONS, 1950-1959 ³									
22 Cost of drainage works and services.....projects reporting...	1	2	2	1	1	1	1	...	1
23 dollars...	749,767	442,033	167,351	6,488	12,224	3,682	102,689	...	1,033,015
24 New drainage works constructed, enlarged, or installed.....projects reporting...	1	(4)	2	...	...	...	1	...	...
25 dollars...	7,000	(4)	18,370	...	...	...	85,309	...	...
26 Open ditches.....projects reporting...	1	(4)	2	...	...	...	1	...	...
27 length, miles...	1.9	(4)	3.8	...	...	...	8.7	...	...
28 Tile or covered drains.....projects reporting...	...	...	...	...	...	...	1	...	...
29 length, miles...	...	...	...	...	...	...	1.5	...	...
30 Levees or dikes.....projects reporting...	...	...	...	...	...	...	...	...	...
31 length, miles...	...	...	...	...	...	...	...	...	...
32 Pumps.....projects reporting...	...	...	...	...	...	...	...	...	...
33 number of pumps...	...	...	...	...	...	...	...	...	...
34 Other (see text).....projects reporting...	...	...	...	...	...	...	...	...	...
35 Cost of maintenance, operation, repair, and administration.....projects reporting...	1	(4)	1	1	1	1	1	...	1
36 dollars...	742,767	(4)	148,981	6,488	12,224	3,682	17,380	...	1,033,015

¹Land served by two or more projects counted only once.
²Acres served by two projects are included for each project. See text.
³Includes projects taken over by another project prior to 1960. See text.
⁴Included in State total only.

DRAINAGE OF AGRICULTURAL LANDS

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	Montcalm	Muskegon	Newaygo	Oakland	Oceana	Ogemaw	Oseola	Ottawa	Presque Isle	Roscommon
AREA										
1 Approximate land area.....acres 1960...	455,680	322,560	548,480	561,280	343,040	367,360	371,840	360,960	418,560	333,440
2 Land in farms.....acres 1959...	321,688	97,524	184,058	165,110	170,963	126,943	199,230	217,558	138,772	12,212
3 Drainage projects..... number 1960...	1	1	1	1	1	2	1	1	1	1
4	1	1	1	1	1	1	1	1	1	1
5 Total area in drainage projects ¹ acres served 1960...	164,024	95,194	140,352	206,259	86,968	8,120	41,007	190,122	1,820	6,486
6	152,704	96,704	139,392	202,419	86,903	7,930	41,007	190,722	1,820	14,549
7 Area not used for agriculture or not drained..... acres served 1960...	...	2,880	...	60,000	6,000	720	1,680	...	...	...
8 Net area drained and used for agriculture..... acres served 1960...	164,024	92,314	140,352	146,259	80,968	7,400	39,327	190,122	1,820	6,486
9 Drainage established before 1950..... acres served 1960...	152,704	92,314	139,392	142,419	80,968	7,210	39,327	189,922	1,820	6,486
10 Area added, 1950-1959..... acres served 1960...	11,320	...	960	3,840	...	190	...	200	...	...
11 Area served by two or more projects..... acres served 1960...	...	...	...	...	...	450	...	...	...	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION										
12 Drains owned by one landowner..... number of projects...	...	...	...	...	...	1	...	...	...	...
13 .....	...	...	...	...	...	640	...	...	...	...
14 Cooperative or mutual drains..... number of projects...	...	...	...	...	...	...	...	...	...	...
15 .....	...	...	...	...	...	...	...	...	...	...
16 Legally organized public drains..... number of projects...	1	1	1	1	1	1	1	1	1	1
17	164,024	92,314	140,352	146,259	80,968	7,210	39,327	190,122	1,820	6,486
PROJECTS, 1960, BY YEAR STARTED										
18 1950-1959..... number of projects...	...	...	...	...	...	1	...	...	...	...
19 .....	...	...	...	...	...	640	...	...	...	...
20 Prior to 1950..... number of projects...	1	1	1	1	1	1	1	1	1	1
21	164,024	92,314	140,352	146,259	80,968	7,210	39,327	190,122	1,820	6,486
DRAINAGE OPERATIONS, 1950-1959 ³										
22 Cost of drainage works and services..... projects reporting...	1	1	1	1	1	(⁴)	...	1	...	1
23	309,113	170,752	193,863	250,950	32,214	(⁴)	...	316,160	...	896
24 New drainage works constructed, enlarged, or installed..... projects reporting...	1	...	1	1	...	(⁴)	...	1	...	1
25	178,000	...	68,695	153,572	...	(⁴)	...	69,865	...	896
26 Open ditches..... projects reporting...	1	...	1	1	...	(⁴)	...	1	...	1
27	60.5	...	4.8	3.3	...	(⁴)	...	5.7	...	0.2
28 Tile or covered drains..... projects reporting...	...	...	1	1	...	(⁴)	...	1	...	...
29 .....	...	...	1.5	0.7	...	(⁴)	...	1.1	...	...
30 Levees or dikes..... projects reporting...	...	...	...	...	...	...	...	...	...	...
31 .....	...	...	...	...	...	...	...	...	...	...
32 Pumps..... projects reporting...	...	...	...	...	...	...	...	...	...	...
33 .....	...	...	...	...	...	...	...	...	...	...
34 Other (see text)..... projects reporting...	...	...	...	...	...	...	...	...	...	...
35 Cost of maintenance, operation, repair, and administration..... projects reporting...	1	1	1	1	1	...	...	1	...	...
36	131,113	170,752	125,168	97,378	32,214	...	...	246,295	...	...

¹Land served by two or more projects counted only once.²Acres served by two projects are included for each project. See text.³Includes projects taken over by another project prior to 1960. See text.⁴Included in State total only.

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	Saginaw	St. Clair	St. Joseph	Sanilac	Shiawassee	Tuscola	Van Buren	Washtenaw	Wayne
AREA									
1 Approximate land area..... acres 1960...	519,680	473,600	325,120	615,040	345,600	522,240	388,480	458,240	388,480
2 Land in farms..... acres 1959...	402,060	309,987	255,655	537,716	296,723	404,433	265,471	320,097	84,744
3 Drainage projects..... number 1960...	5	4	1	1	1	3	2	4	1
4 1950...	1	1	1	1	1	1	1	1	1
5 Total area in drainage projects ¹ acres served 1960...	462,268	254,808	73,159	487,559	281,132	422,583	190,022	364,196	234,009
6 1950...	459,968	242,127	73,159	480,889	278,112	421,373	190,022	364,196	234,009
7 Area not used for agriculture or not drained..... acres served 1960...	5,200	12,797	...	...	...	5,280	...	14,000	95,769
8 Net area drained and used for agriculture..... acres served 1960...	457,068	242,011	73,159	487,559	281,132	417,303	190,022	350,196	138,240
9 Drainage established before 1950..... acres served 1960...	453,268	229,330	73,159	486,889	278,112	416,093	190,022	350,196	138,240
10 Area added, 1950-1959..... acres served 1960...	3,800	12,681	...	670	3,020	1,210	...	...	...
11 Area served by two or more projects..... acres served 1960...	9,250	1,130	...	...	...	1,500	176	3,445	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION									
12 Drains owned by one landowner..... number of projects...	1	3	...	...	...	1	1	...	...
13 acres served ² ...	640	1,790	...	...	...	900	176	...	...
14 Cooperative or mutual drains..... number of projects...	2	...	...	...	...	1	...	3	...
15 acres served ² ...	8,930	...	...	...	...	600	...	3,445	...
16 Legally organized public drains..... number of projects...	2	1	1	1	1	1	1	1	1
17 acres served ² ...	456,748	241,351	73,159	487,559	281,132	417,303	190,022	350,196	138,240
PROJECTS, 1960, BY YEAR STARTED									
18 1960-1969..... number of projects...	2	3	...	...	...	...	...	3	...
19 acres served ² ...	2,140	1,790	...	...	...	...	...	3,445	...
20 Prior to 1960..... number of projects...	3	1	1	1	1	3	2	1	1
21 acres served ² ...	464,178	241,351	73,159	487,559	281,132	418,803	190,198	350,196	138,240
DRAINAGE OPERATIONS, 1950-1959 ³									
22 Cost of drainage works and services..... projects reporting...	5	4	1	1	1	1	2	4	1
23 dollars...	4,120,646	814,260	141,693	1,122,660	805,170	2,001,602	540,361	636,508	5,143,351
24 New drainage works constructed, enlarged, or installed..... projects reporting...	5	4	...	1	1	1	(⁴)	3	1
25 dollars...	277,068	296,844	...	1,120,931	123,344	84,560	(⁴)	8,653	12,948
26 Open ditches..... projects reporting...	3	4	...	1	1	1	(⁴)	3	1
27 length, miles...	49.4	56.2	...	290.7	20.3	17.7	(⁴)	3.4	5.0
28 Tile or covered drains..... projects reporting...	2	3	...	...	1	...	(⁴)	...	...
29 length, miles...	55.0	56.0	...	...	0.6	...	(⁴)	...	...
30 Levees or dikes..... projects reporting...	1	1	...	...	...	...	...	...	...
31 length, miles...	4.0	0.7	...	...	...	...	...	...	...
32 Pumps..... projects reporting...	3	1	...	...	...	...	...	...	...
33 number of pumps...	6	4	...	...	...	...	...	...	...
34 Other (see text)..... projects reporting...	...	...	...	...	...	...	...	2	...
35 Cost of maintenance, operation, repair, and administration..... projects reporting...	3	1	1	1	1	1	(⁴)	1	1
36 dollars...	3,843,578	517,416	141,693	1,729	681,826	1,917,042	(⁴)	627,855	5,130,403

¹Land served by two or more projects counted only once.
²Acres served by two projects are included for each project. See text.
³Includes projects taken over by another project prior to 1960. See text.
⁴Included in State total only.

State Table 1.—DRAINAGE PROJECTS—NUMBER, AREA, COST, AND WORKS, 1920 TO 1960

[See text for comparability of data]

Item	1960 Census	1950 Census	1940 Census	1930 Census	1920 Census
AREA					
Approximate land area..... acres.....	51,205,760	51,205,760	51,205,760	51,749,120	51,749,120
Land in farms..... acres.....	30,796,097	32,883,163	32,606,962	30,913,367	30,221,758
Drainage projects..... number.....	307	82	¹ 2,498	NA	NA
Total area in drainage projects..... acres served.....	11,688,201	11,269,962	10,990,409	11,474,683	9,232,709
Area not used for agriculture or not drained..... acres served.....	1,127,393	NA	NA	NA	NA
Net area drained and used for agriculture..... acres served.....	10,560,808	NA	² 8,397,586	² 8,782,323	NA
Drainage established 10 years or more before Census date..... acres served.....	9,316,571	NA	NA	NA	NA
Drainage established within 10 years of Census date..... acres served.....	1,244,237	NA	NA	NA	NA
Area served by two or more projects..... acres served.....	475,138	NA	³ 711,787	³ 206,822	⁴ 741,953
PROJECTS BY TYPE OF ORGANIZATION					
Drains owned by one landowner..... number of projects.....	25	⁽³⁾	NA	NA	NA
acres served.....	34,930	⁽³⁾	35,730	1,800	800
Cooperative or mutual drains..... number of projects.....	192	⁽³⁾
acres served.....	248,293	⁽³⁾
Legally organized public drains..... number of projects.....	90	³ 82	NA	NA	NA
acres served.....	10,761,923	³ 11,269,962	10,954,679	11,472,883	9,231,909
PROJECTS BY YEAR STARTED					
Started 10 years or more before Census date..... number of projects.....	147	NA	NA	NA	NA
acres served.....	10,674,766	NA	10,917,025	10,665,166	⁴ 3,585,208
Started within 10 years of Census date..... number of projects.....	160	NA	NA	NA	NA
acres served.....	370,380	NA	⁷ 73,384	809,517	⁴ 5,633,290
OPERATIONS, 10-YEAR PERIOD PRECEDING CENSUS DATE					
Cost of drainage works and services..... projects reporting.....	248	71	NA	NA	NA
dollars.....	41,809,993	18,310,583	NA	NA	NA
New drainage works constructed, enlarged, or installed..... projects reporting.....	207	⁵ 30	NA	NA	NA
cost, dollars.....	23,831,372	⁵ 1,594,914	NA	NA	NA
Open ditches..... projects reporting.....	205	29	NA	NA	NA
length, miles.....	2,333.2	357	NA	NA	NA
Tile or covered drains..... projects reporting.....	47	11	NA	NA	NA
length, miles.....	935.6	80	NA	NA	NA
Levees or dikes..... projects reporting.....	2	...	NA	NA	NA
length, miles.....	0.4	...	NA	NA	NA
Pumps..... projects reporting.....	2	NA	NA	NA	NA
number of pumps.....	2	NA	NA	NA	NA
Other (see text)..... projects reporting.....	2	NA	NA	NA	NA
Cost of maintenance, operation, repair, and administration..... projects reporting.....	97	71	NA	NA	NA
dollars.....	17,978,621	16,715,669	NA	NA	NA
STATUS ON CENSUS DATE					
Capital investment..... dollars.....	NA	NA	65,576,077	64,139,641	42,017,447
Physical works:					
Open ditches..... length, miles.....	NA	NA	15,856.7	14,477.6	14,657.0
Tile drains..... length, miles.....	NA	NA	9,893.4	9,451.3	5,924.6
Levees and dikes..... length, miles.....	NA	NA	0.4	149.7	0.1
Pumping units..... number of units.....	NA	NA	3	5	...

NA Not available.

¹In 1940 each county drain was counted as a separate project. See text.²Not fully comparable. See text.³All projects in 1950 included with county drains. See text.⁴1920 figures exclude 14,211 acres for which date of organization was not reported.⁵Cost of new works for lands not previously drained.

DRAINAGE OF AGRICULTURAL LANDS

State Table 2.—DRAINAGE

	Size of project (Based on area of agricultural land in project)	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	307	11,045,146	959,476	233	9,793,769	161	1,251,377
2	500 to 999 acres.....	110	76,273	30,715	68	42,195	56	34,078
3	1,000 to 1,999 acres.....	76	105,305	41,065	53	65,380	39	39,925
4	2,000 to 4,999 acres.....	34	95,505	33,442	25	46,932	22	48,573
5	5,000 to 9,999 acres.....	5	36,520	8,980	5	31,180	2	5,340
6	10,000 to 19,999 acres.....	7	105,929	120	7	98,281	3	7,648
7	20,000 to 49,999 acres.....	18	608,036	18,840	18	587,096	4	20,940
8	50,000 to 99,999 acres.....	22	1,597,870	124,600	22	1,477,986	10	119,884
9	100,000 or more acres.....	35	8,419,708	701,714	35	7,444,719	25	974,989

State Table 3.—DRAINAGE PROJECTS, 1960,

	Type of organization	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	307	11,045,146	959,476	233	9,793,769	161	1,251,377
2	Drains owned by one landowner.....	25	34,930	24,420	19	25,340	13	9,590
3	Cooperative or mutual drains.....	192	248,293	86,802	124	132,927	105	115,366
4	Legally organized public drains.....	90	10,761,923	848,254	90	9,635,502	43	1,126,421

State Table 4.—DRAINAGE PROJECTS, 1960,

	Year of organization	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	307	11,045,146	959,476	233	9,793,769	161	1,251,377
2	1950-1959.....	160	370,380	212,672	86	211,772	118	158,608
3	Prior to 1950.....	147	10,674,766	746,804	147	9,581,997	43	1,092,769

PROJECTS, 1960, BY SIZE

Cost of drainage works and services, 1950-1959				New works constructed, enlarged, or installed, 1950-1959									
Total		For new works		Open ditches		Tile or covered drains		Levees and dikes		Pumps		Other, projects reporting	
Projects reporting	Dollars	Projects reporting	Dollars	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Number		
248	41,809,993	207	23,831,372	205	2,333.2	47	935.6	2	0.4	2	2	2	1
84	246,055	80	232,448	80	148.2	9	12.2	...	...	...	...	...	2
61	287,916	56	267,963	55	143.0	8	24.3	...	...	1	1	...	3
30	290,737	27	267,734	27	118.3	4	8.8	...	...	...	...	1	4
4	103,721	2	13,500	2	23.0	...	...	...	...	...	...	...	5
4	197,351	3	132,589	2	7.6	2	4.2	...	...	...	...	...	6
13	561,499	3	214,607	3	26.0	3	8.4	...	...	...	...	...	7
18	3,903,405	10	2,958,699	10	156.9	4	82.3	1	0.1	...	...	...	8
34	36,219,309	26	19,743,832	26	1,710.2	17	795.4	1	0.3	1	1	...	9

BY TYPE OF ORGANIZATION

Cost of drainage works and services, 1950-1959				New works constructed, enlarged, or installed, 1950-1959									
Total		For new works		Open ditches		Tile or covered drains		Levees and dikes		Pumps		Other, projects reporting	
Projects reporting	Dollars	Projects reporting	Dollars	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Number		
248	41,809,993	207	23,831,372	205	2,333.2	47	935.6	2	0.4	2	2	2	1
24	59,265	24	59,265	24	90.6	...	...	...	...	...	...	...	2
149	772,779	138	716,380	137	331.9	21	45.3	...	...	1	1	2	3
75	40,977,949	45	23,055,727	44	1,910.7	26	890.3	2	0.4	1	1	...	4

BY YEAR OF ORGANIZATION

Cost of drainage works and services, 1950-1959				New works constructed, enlarged, or installed, 1950-1959									
Total		For new works		Open ditches		Tile or covered drains		Levees and dikes		Pumps		Other, projects reporting	
Projects reporting	Dollars	Projects reporting	Dollars	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Number		
248	41,809,993	207	23,831,372	205	2,333.2	47	935.6	2	0.4	2	2	2	1
160	2,361,562	159	2,162,895	159	470.7	19	44.1	...	...	...	...	2	2
88	39,448,431	48	21,668,477	46	1,862.5	28	891.5	2	0.4	2	2	...	3

DRAINAGE OF AGRICULTURAL LANDS

County Table 1. - DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	The State	Aitkin	Anoka	Becker	Beltrami	Benton	Big Stone	Blue Earth	Brown
AREA									
1 Approximate land area.....acres 1960...	51,205,760	1,167,360	272,000	841,600	1,610,880	258,560	326,400	473,600	392,320
2 Land in farms.....acres 1959...	30,796,097	232,046	142,629	499,138	260,747	227,972	310,208	456,255	375,610
3 Drainage projects.....number 1960...	307	2	1	5	6	1	1	3	2
4 1950...	82	1	1	1	1	1	1	1	1
5 Total area in drainage projects ¹.....acres served 1960...	11,688,201	262,116	99,968	52,602	297,475	16,840	29,625	176,616	128,115
6 1950...	11,269,962	407,522	99,968	48,102	374,835	16,840	29,625	145,036	88,435
7 Area not used for agriculture or not drained.....acres served 1960...	1,127,393	7,000	...	...	194,691	...	...	...	...
8 Net area drained and used for agriculture.....acres served 1960...	10,560,808	255,116	99,968	52,602	102,784	16,840	29,625	176,616	128,115
9 Drainage established before 1950.....acres served 1960...	9,316,571	255,116	99,968	48,102	100,864	16,840	29,625	145,036	88,435
10 Area added, 1950-1959.....acres served 1960...	1,244,237	...	...	4,500	1,920	...	...	31,580	39,680
11 Area served by two or more projects.....acres served 1960...	475,138	640	...	460	36,996	...	...	...	815
PROJECTS, 1960, BY TYPE OF ORGANIZATION									
12 Drains owned by one landowner.....number of projects...	25	1	...	...	...	...	...	...	...
13 acres served ² ..	34,930	640	...	...	...	...	...	...	...
14 Cooperative or mutual drains.....number of projects...	192	...	...	4	4	...	...	2	1
15 acres served ² ..	248,293	...	...	4,960	3,460	...	...	4,800	815
16 Legally organized public drains.....number of projects...	90	1	1	1	2	1	1	1	1
17 acres served ² ..	10,761,923	255,116	99,968	48,102	136,320	16,840	29,625	171,816	128,115
PROJECTS, 1960, BY YEAR STARTED									
18 1950-1959.....number of projects...	160	1	...	4	4	...	...	2	...
19 acres served ² ..	370,380	640	...	4,960	3,460	...	...	4,800	...
20 Prior to 1950.....number of projects...	147	1	1	1	2	1	1	1	2
21 acres served ² ..	10,674,766	255,116	99,968	48,102	136,320	16,840	29,625	171,816	128,930
DRAINAGE OPERATIONS, 1950-1959 ³									
22 Cost of drainage works and services.....projects reporting...	248	2	1	4	5	...	1	3	2
23 dollars...	41,809,993	7,065	27,502	18,878	75,418	...	29,303	865,376	2,288,382
24 New drainage works constructed, enlarged, or installed.....projects reporting...	207	1	...	4	4	...	...	3	2
25 dollars...	23,831,372	2,065	...	17,922	7,808	...	...	504,084	1,224,569
26 Open ditches.....projects reporting...	205	1	...	4	4	...	...	3	2
27 length, miles...	2,333.2	2.0	...	14.8	6.2	...	...	48.6	104.5
28 Tile or covered drains.....projects reporting...	47	...	...	...	...	...	...	3	1
29 length, miles...	935.6	...	...	...	...	...	...	36.9	62.0
30 Levees or dikes.....projects reporting...	2	...	...	...	...	...	...	...	...
31 length, miles...	0.4	...	...	...	...	...	...	...	...
32 Pumps.....projects reporting...	2	...	...	...	...	...	...	...	...
33 number of pumps...	2	...	...	...	...	...	...	...	...
34 Other (see text).....projects reporting...	2	...	...	2	...	...	...	...	...
35 Cost of maintenance, operation, repair, and administration.....projects reporting...	97	1	1	2	1	...	1	3	2
36 dollars...	17,978,621	5,000	27,502	956	67,610	...	29,303	361,292	1,063,813

¹Land served by two or more projects counted only once.
²Acres served by two projects are included for each project. See text.
³Includes projects taken over by another project prior to 1960. See text.

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	Carlton	Carver	Cass	Chippewa	Chisago	Clay	Clearwater	Cottonwood	Crow Wing
AREA									
1 Approximate land area.....acres 1960...	550,400	229,120	1,313,920	372,480	268,160	672,000	643,200	409,600	639,360
2 Land in farms.....acres 1959...	196,325	213,745	250,849	350,579	210,672	625,866	253,193	407,270	181,678
3 Drainage projects.....number 1960...	1	1	1	1	2	12	2	1	1
4 1950...	1	1	1	1	1	1	1	1	1
5 Total area in drainage projects ¹.....acres served 1960...	20,080	28,026	90,379	183,709	42,684	274,415	98,330	142,510	40,672
6 1950...	65,280	18,546	90,379	149,709	41,984	266,470	59,930	137,830	40,672
7 Area not used for agriculture or not drained.....acres served 1960...	1,520	...	...	...	...	...	47,040	...	...
8 Net area drained and used for agriculture.....acres served 1960...	18,560	28,026	90,379	183,709	42,684	274,415	51,290	142,510	40,672
9 Drainage established before 1950.....acres served 1960...	18,560	18,546	90,379	149,709	41,984	265,355	51,290	137,830	40,672
10 Area added, 1960-1959.....acres served 1960...	...	9,480	...	34,000	700	9,060	...	4,680	...
11 Area served by two or more projects.....acres served 1960...	...	...	...	...	...	5,925	16,960	...	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION									
12 Drains owned by one landowner.....number of projects...	...	...	...	...	...	...	...	...	...
13 acres served ²...	...	...	...	...	...	...	...	...	...
14 Cooperative or mutual drains.....number of projects...	...	...	...	...	1	11	...	...	...
15 acres served ²...	...	...	...	...	700	10,990	...	...	...
16 Legally organized public drains.....number of projects...	1	1	1	1	1	1	2	1	1
17 acres served ² ...	18,560	28,026	90,379	183,709	41,984	269,350	68,250	142,510	40,672
PROJECTS, 1960, BY YEAR STARTED									
18 1950-1959.....number of projects...	...	...	...	...	1	2	...	...	...
19 acres served ²...	...	...	...	...	700	1,340	...	...	...
20 Prior to 1950.....number of projects...	1	1	1	1	1	10	2	1	1
21 acres served ² ...	18,560	28,026	90,379	183,709	41,984	279,000	68,250	142,510	40,672
DRAINAGE OPERATIONS, 1950-1959 ³									
22 Cost of drainage works and services.....projects reporting...	1	1	...	1	2	3	2	1	...
23 dollars...	5,000	125,446	...	996,327	19,232	265,258	19,902	283,050	...
24 New drainage works constructed, enlarged, or installed.....projects reporting...	...	...	...	1	1	3	1	1	...
25 dollars...	...	...	...	478,780	7,300	76,022	12,038	50,648	...
26 Open ditches.....projects reporting...	...	...	...	1	1	3	1	1	...
27 length, miles...	...	...	...	67.4	3.0	24.3	15.0	7.1	...
28 Tile or covered drains.....projects reporting...	...	...	...	1	...	...	...	1	...
29 length, miles...	...	...	...	26.4	...	...	...	0.6	...
30 Levees or dikes.....projects reporting...	...	...	...	...	...	...	...	...	...
31 length, miles...	...	...	...	...	...	...	...	...	...
32 Pumps.....projects reporting...	...	...	...	...	...	...	...	...	...
33 number of pumps...	...	...	...	...	...	...	...	...	...
34 Other (see text).....projects reporting...	...	...	...	...	...	...	...	...	...
35 Cost of maintenance, operation, repair, and administration.....projects reporting...	1	1	...	1	1	1	2	1	...
36 dollars...	5,000	125,446	...	517,547	11,932	189,236	7,864	232,402	...

¹Land served by two or more projects counted only once.

²Acres served by two projects are included for each project. See text.

³Includes projects taken over by another project prior to 1960. See text.

DRAINAGE OF AGRICULTURAL LANDS

County Table 1.—DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	Dakota	Dodge	Douglas	Faribault	Freeborn	Grant	Hennepin	Houston	Hubbard
AREA									
1 Approximate land area.....acres 1960...	365,440	278,400	407,680	456,320	449,280	356,480	361,600	361,600	596,480
2 Land in farms.....acres 1959...	298,074	267,835	358,331	446,588	431,991	331,081	188,665	321,072	167,543
3 Drainage projects..... number 1960...	2	12	1	1	16	2	3	1	1
4 1950...	1	1	1	1	1	1	1	1	1
5 Total area in drainage projects ¹ acres served 1960...	10,885	37,580	78,950	270,626	194,214	69,606	42,832	14,528	27,213
6 1950...	7,936	30,771	78,950	259,866	140,544	65,203	41,252	14,528	27,213
7 Area not used for agriculture or not drained..... acres served 1960...	...	...	560	...	...	...	4,600	...	...
8 Net area drained and used for agriculture..... acres served 1960...	10,885	37,580	78,390	270,626	194,214	69,606	38,232	14,528	27,213
9 Drainage established before 1950..... acres served 1960...	7,936	28,890	78,390	259,866	142,064	65,203	38,232	14,528	27,213
10 Area added, 1950-1959..... acres served 1960...	2,949	8,690	...	10,760	52,150	4,403	...	...	...
11 Area served by two or more projects..... acres served 1960...	120	1,480	...	...	2,860	480	...	...	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION									
12 Drains owned by one landowner..... number of projects...	...	...	...	...	...	...	...	...	...
13 acres served ²...	...	...	...	...	...	...	...	...	...
14 Cooperative or mutual drains..... number of projects...	1	11	...	...	15	1	1	...	...
15 acres served ² ...	569	12,240	...	...	22,650	1,380	600	...	...
16 Legally organized public drains..... number of projects...	1	1	1	1	1	1	2	1	1
17 acres served ² ...	10,436	26,820	78,390	270,626	174,424	68,706	37,632	14,528	27,213
PROJECTS, 1960, BY YEAR STARTED									
18 1950-1959..... number of projects...	1	9	...	...	13	1	...	...	...
19 acres served ² ...	569	9,050	...	...	19,910	1,380	...	...	...
20 Prior to 1950..... number of projects...	1	3	1	1	3	1	3	1	1
21 acres served ² ...	10,436	30,010	78,390	270,626	177,164	68,706	38,232	14,528	27,213
DRAINAGE OPERATIONS, 1950-1959 ³									
22 Cost of drainage works and services..... projects reporting...	2	11	1	1	16	2	...	...	...
23 dollars...	103,070	120,312	12,784	1,089,910	1,056,571	73,429	...	...	...
24 New drainage works constructed, enlarged, or installed..... projects reporting...	2	10	...	1	14	2	...	...	...
25 dollars...	80,670	110,032	...	198,823	523,814	53,158	...	...	...
26 Open ditches..... projects reporting...	2	10	...	1	14	2	...	...	...
27 length, miles...	7.4	17.7	...	19.8	68.0	4.2	...	...	...
28 Tile or covered drains..... projects reporting...	1	3	...	1	7	...	...	...	...
29 length, miles...	3.8	1.5	...	26.2	30.7	...	...	...	...
30 Levees or dikes..... projects reporting...	...	...	...	...	...	...	...	...	...
31 length, miles...	...	...	...	...	...	...	...	...	...
32 Pumps..... projects reporting...	...	...	...	...	...	...	...	...	...
33 number of pumps...	...	...	...	...	...	...	...	...	...
34 Other (see text)..... projects reporting...	...	...	...	...	...	...	...	...	...
35 Cost of maintenance, operation, repair, and administration..... projects reporting...	1	4	1	1	7	1	...	...	...
36 dollars...	22,400	10,280	12,784	891,087	532,757	20,271	...	...	...

¹Land served by two or more projects counted only once.²Acres served by two projects are included for each project. See text.³Includes projects taken over by another project prior to 1960. See text

County Table 1. - DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data.]

Item and Census year	Isanti	Itasca	Jackson	Kanabec	Kandiyohi	Kittson	Koochiching	Lac qui Parle	Lake of the Woods
AREA									
1 Approximate land area.....acres 1960...	282,880	1,704,320	446,720	336,000	527,360	719,360	2,002,560	494,720	837,120
2 Land in farms.....acres 1959...	210,859	175,952	436,655	208,695	458,323	512,299	116,591	477,920	130,459
3 Drainage projects..... number 1960...	3	1	2	2	2	42	2	1	4
4 1950...	1	1	1	1	1	1	1	1	1
5 Total area in drainage projects ¹ acres served 1960...	62,984	71,239	193,472	41,600	268,768	354,104	192,400	157,795	323,500
6 1950...	61,184	123,955	188,172	41,600	201,728	318,464	604,672	85,555	322,660
7 Area not used for agriculture or not drained..... acres served 1960...	...	16,932	...	...	...	57,600	111,500	...	235,308
8 Net area drained and used for agriculture..... acres served 1960...	62,984	54,307	193,472	41,600	268,768	296,504	80,900	157,795	88,192
9 Drainage established before 1950..... acres served 1960...	62,984	54,307	188,352	41,600	201,728	260,864	79,580	85,555	87,352
10 Area added, 1950-1959..... acres served 1960...	...	...	5,120	...	67,040	35,640	1,320	72,240	840
11 Area served by two or more projects..... acres served 1960...	...	...	40	...	160	40,780	...	...	2,000
PROJECTS, 1960, BY TYPE OF ORGANIZATION									
12 Drains owned by one landowner..... number of projects...	...	...	...	...	...	21	...	...	1
13 acres served ²..	...	...	...	...	...	31,430	...	...	840
14 Cooperative or mutual drains.....number of projects...	2	...	1	1	1	20	1	...	2
15 acres served ² ..	1,800	...	220	1,600	160	38,550	1,320	...	2,000
16 Legally organized public drains..... number of projects...	1	1	1	1	1	1	1	1	1
17 acres served ² ..	61,184	54,307	193,292	40,000	268,768	269,824	79,580	157,795	87,352
PROJECTS, 1960, BY YEAR STARTED									
18 1950-1959.....number of projects...	...	...	...	...	1	41	1	...	3
19 acres served ²..	...	...	...	...	160	69,980	1,320	...	2,840
20 Prior to 1950.....number of projects...	3	1	2	2	1	1	1	1	1
21 acres served ² ..	62,984	54,307	193,512	41,600	268,768	269,824	79,580	157,795	87,352
DRAINAGE OPERATIONS, 1950-1959³									
22 Cost of drainage works and services.....projects reporting...	3	...	1	1	2	42	1	1	3
23 dollars...	6,059	...	749,446	495	897,376	381,760	1,100	1,767,752	8,013
24 New drainage works constructed, enlarged, or installed.....projects reporting...	2	...	1	...	2	42	1	1	3
25 dollars...	3,300	...	144,144	...	390,893	155,314	1,100	1,340,958	8,013
26 Open ditches.....projects reporting...	2	...	1	...	2	42	1	1	3
27 length, miles...	3.7	...	13.2	...	38.4	149.4	4.3	103.5	9.3
28 Tile or covered drains.....projects reporting...	...	...	1	...	1	...	...	1	...
29 length, miles...	...	...	18.2	...	9.6	...	...	44.9	...
30 Levees or dikes.....projects reporting...	...	...	...	...	...	...	...	1	...
31 length, miles...	...	...	...	...	...	...	...	0.3	...
32 Pumps.....projects reporting...	...	...	...	...	...	...	...	...	...
33 number of pumps...	...	...	...	...	...	...	...	...	...
34 Other (see text).....projects reporting...	...	...	...	...	...	...	...	...	...
35 Cost of maintenance, operation, repair, and administration.....projects reporting...	1	...	1	1	1	1	...	1	...
36 dollars...	2,759	...	605,302	495	506,483	226,446	...	426,794	...

¹Land served by two or more projects counted only once.
²Acres served by two or more projects are included for each project. See text.
³Includes projects taken over by another project prior to 1960. See text.

DRAINAGE OF AGRICULTURAL LANDS

County Table 1. --DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	Le Sueur	Lincoln	Lyon	McLeod	Mahnomen	Marshall	Martin	Meeker	Mille Lacs
AREA									
1 Approximate land area.....acres 1960...	282,240	345,600	456,320	318,720	367,360	1,152,000	452,480	396,800	363,520
2 Land in farms.....acres 1959...	266,540	329,854	435,247	301,111	220,862	800,186	452,344	366,741	200,131
3 Drainage projects..... number 1960...	1	1	3	4	4	6	2	2	2
4 1950...	1	1	1	1	1	1	1	1	1
5 Total area in drainage projects ¹ acres served 1960...	91,167	58,906	127,601	82,090	50,600	779,036	287,746	64,767	21,504
6 1950...	64,285	58,906	105,711	70,790	44,800	823,450	277,504	56,064	20,864
7 Area not used for agriculture or not drained..... acres served 1960...	...	...	...	...	...	99,256	...	...	...
8 Net area drained and used for agriculture..... acres served 1960...	91,167	58,906	127,601	82,090	50,600	679,780	287,746	64,767	21,504
9 Drainage established before 1950..... acres served 1960...	64,285	58,906	105,711	71,650	44,800	663,450	277,504	60,264	20,864
10 Area added, 1950-1959..... acres served 1960...	26,882	...	21,890	10,440	5,800	16,330	10,242	4,503	640
11 Area served by two or more projects..... acres served 1960...	...	...	...	2,660	100	1,420	...	840	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION									
12 Drains owned by one landowner..... number of projects...	...	...	...	...	...	1	...	...	...
13 acres served ²...	...	...	...	...	...	900	...	...	...
14 Cooperative or mutual drains..... number of projects...	...	...	2	3	3	4	1	1	1
15 acres served ²...	...	...	4,440	3,520	5,900	4,290	1,660	840	640
16 Legally organized public drains..... number of projects...	1	1	1	1	1	1	1	1	1
17 acres served ² ...	91,167	58,906	123,161	81,230	44,800	676,010	286,086	64,767	20,864
PROJECTS, 1960, BY YEAR STARTED									
18 1950-1959..... number of projects...	...	...	2	...	3	5	...	1	1
19 acres served ²...	...	...	4,440	...	5,900	5,190	...	840	640
20 Prior to 1950..... number of projects...	1	1	1	4	1	1	2	1	1
21 acres served ² ...	91,167	58,906	123,161	84,750	44,800	676,010	287,746	64,767	20,864
DRAINAGE OPERATIONS, 1950-1959 ³									
22 Cost of drainage works and services..... projects reporting...	1	1	3	2	4	6	2	2	2
23 dollars...	442,598	85,172	1,223,540	289,742	25,690	666,296	1,121,211	52,343	7,784
24 New drainage works constructed, enlarged, or installed..... projects reporting...	1	...	3	1	3	6	2	2	(⁴)
25 dollars...	355,224	...	716,785	162,582	11,859	39,628	104,274	38,568	(⁴)
26 Open ditches..... projects reporting...	1	...	3	1	3	6	1	2	(⁴)
27 length, miles...	38.4	...	60.7	16.3	6.8	18.4	12.5	6.9	(⁴)
28 Tyle or covered drains..... projects reporting...	1	...	3	1	...	...	2	...	...
29 length, miles...	9.1	...	47.6	0.7	...	...	17.5	...	...
30 Levees or dikes..... projects reporting...	1	...	...	...	...	...	...	...	...
31 length, miles...	0.1	...	...	...	...	...	...	...	...
32 Pumps..... projects reporting...	...	...	...	...	...	...	...	...	...
33 number of pumps...	...	...	...	...	...	...	...	...	...
34 Other (see text)..... projects reporting...	...	...	...	...	...	...	...	...	...
35 Cost of maintenance, operation, repair, and administration..... projects reporting...	1	1	2	2	1	1	1	1	(⁴)
36 dollars...	87,374	85,172	506,755	127,160	13,831	626,668	1,016,937	13,775	(⁴)

¹Land served by two or more projects counted only once.²Acres served by two projects are included for each project. See text.³Includes projects taken over by another project prior to 1960. See text.⁴Included in State total only.

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	Morrison	Mower	Murray	Nicollet	Nobles	Norman	Otter Tail	Pennington	Pine
AREA									
1 Approximate land area.....acres 1960...	727,040	449,920	453,120	293,760	455,680	566,400	1,280,000	398,080	903,680
2 Land in farms.....acres 1959...	516,413	431,685	424,114	270,169	436,042	502,739	1,073,848	303,489	375,289
3 Drainage projects..... number 1960...	1	5	1	2	1	23	2	13	1
4 1950...	1	1	1	1	1	1	1	1	1
5 Total area in drainage projects ¹ acres served 1960...	59,957	27,500	176,718	142,077	109,436	285,331	114,171	341,555	37,274
6 1950...	59,163	17,320	176,718	101,527	108,211	265,139	114,011	336,765	37,274
7 Area not used for agriculture or not drained..... acres served 1960...	...	...	...	...	...	500	...	...	6,960
8 Net area drained and used for agriculture..... acres served 1960...	59,957	27,500	176,718	142,077	109,436	284,831	114,171	341,555	30,314
9 Drainage established before 1950..... acres served 1960...	59,163	17,320	176,718	101,527	108,211	266,649	114,011	336,765	30,314
10 Area added, 1950-1959..... acres served 1960...	794	10,180	...	40,550	1,225	18,182	160	4,790	...
11 Area served by two or more projects..... acres served 1960...	...	...	...	1,000	...	63,260	...	137,552	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION									
12 Drains owned by one landowner..... number of projects...	...	...	...	...	...	...	...	...	...
13 acres served ²..	...	...	...	...	...	...	...	...	...
14 Cooperative or mutual drains..... number of projects...	...	4	...	1	...	21	1	11	...
15 acres served ²..	...	2,920	...	1,000	...	16,740	1,180	14,772	...
16 Legally organized public drains..... number of projects...	1	1	1	1	1	2	1	2	1
17 acres served ² ..	59,957	24,580	176,718	142,077	109,436	332,041	112,991	467,785	30,314
PROJECTS, 1960, BY YEAR STARTED									
18 1960-1959..... number of projects...	...	4	...	1	...	12	1	11	...
19 acres served ²..	...	2,920	...	1,000	...	78,582	1,180	14,772	...
20 Prior to 1950..... number of projects...	1	1	1	1	1	11	1	2	1
21 acres served ² ..	59,957	24,580	176,718	142,077	109,436	270,199	112,991	467,785	30,314
DRAINAGE OPERATIONS, 1950-1959 ³									
22 Cost of drainage works and services.....projects reporting...	1	5	1	2	1	13	2	13	...
23 dollars...	4,672	97,455	256,090	1,787,546	45,916	1,222,508	36,456	1,225,999	...
24 New drainage works constructed, enlarged, or installed.....projects reporting...	1	5	...	2	1	12	...	13	...
25 dollars...	4,672	74,146	...	1,168,589	15,174	650,859	...	929,844	...
26 Open ditches.....projects reporting...	1	5	...	2	1	12	...	13	...
27 length, miles...	1.9	13.0	...	210.2	2.0	50.2	...	71.4	...
28 Tile or covered drains.....projects reporting...	...	1	...	2	1	...	...	...	...
29 length, miles...	...	0.3	...	51.9	1.5	...	...	...	...
30 Levees or dikes.....projects reporting...	...	...	...	...	...	...	...	...	...
31 length, miles...	...	...	...	...	...	...	...	...	...
32 Pumps.....projects reporting...	...	...	...	...	...	...	...	...	...
33 number of pumps...	...	...	...	...	...	...	...	...	...
34 Other (see text).....projects reporting...	...	...	...	...	...	...	...	...	...
35 Cost of maintenance, operation, repair, and administration.....projects reporting...	...	2	1	2	1	1	2	2	...
36 dollars...	...	23,309	256,090	618,957	30,742	571,649	36,456	296,155	...

¹Land served by two or more projects counted only once.

²Acres served by two projects are included for each project. See text.

³Includes projects taken over by another project prior to 1960. See text.

DRAINAGE OF AGRICULTURAL LANDS

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	Pipestone	Polk	Pope	Ramsey	Red Lake	Redwood	Renville	Rice	Rock
AREA									
1 Approximate land area.....acres 1960...	296,960	1,287,680	435,840	102,400	276,480	559,360	627,200	316,800	310,400
2 Land in farms.....acres 1959...	292,290	1,158,841	366,812	13,125	221,799	538,168	606,071	295,713	291,589
3 Drainage projects..... number 1960...	1	14	2	1	6	7	1	3	1
4 1950...	1	1	1	1	1	1	1	1	1
5 Total area in drainage projects ¹.....acres served 1960...	22,514	756,780	35,532	11,593	152,176	309,350	468,838	33,328	6,760
6 1950...	22,514	729,120	35,532	11,343	137,216	229,530	284,134	29,370	6,760
7 Area not used for agriculture or not drained.....acres served 1960...	...	16,560	...	...	...	...	...	...	...
8 Net area drained and used for agriculture.....acres served 1960...	22,514	740,220	35,532	11,593	152,176	309,350	468,838	33,328	6,760
9 Drainage established before 1950.....acres served 1960...	22,514	716,980	35,532	11,343	151,296	221,466	284,134	29,370	6,760
10 Area added, 1950-1959.....acres served 1960...	...	23,240	...	250	880	87,884	184,704	3,958	...
11 Area served by two or more projects.....acres served 1960...	...	90,180	160	...	48,210	200	...	...	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION									
12 Drains owned by one landowner..... number of projects...	...	...	...	...	...	1	...	...	...
13 acres served ²...	...	...	...	...	...	1,120	...	...	...
14 Cooperative or mutual drains..... number of projects...	...	11	1	...	4	5	...	2	...
15 acres served ²...	...	8,840	160	...	2,880	6,440	...	878	...
16 Legally organized public drains..... number of projects...	1	3	1	1	2	1	1	1	1
17 acres served ² ...	22,514	821,560	35,532	11,593	198,656	301,990	468,838	32,450	6,760
PROJECTS, 1960, BY YEAR STARTED									
18 1950-1959..... number of projects...	...	7	1	...	4	...	...	2	...
19 acres served ²...	...	84,720	160	...	2,880	...	...	878	...
20 Prior to 1950..... number of projects...	1	7	1	1	2	7	1	1	1
21 acres served ² ...	22,514	745,680	35,532	11,593	198,656	309,550	468,838	32,450	6,760
DRAINAGE OPERATIONS, 1950-1959 ³									
22 Cost of drainage works and services.....projects reporting...	1	10	2	1	6	2	1	3	1
23 dollars...	13,127	1,784,742	6,387	39,162	743,565	4,027,655	4,791,478	193,960	221
24 New drainage works constructed, enlarged, or installed.....projects reporting...	...	9	1	1	5	2	1	3	...
25 dollars...	...	977,023	1,387	1,800	597,611	2,755,391	2,654,491	107,030	...
26 Open ditches.....projects reporting...	...	9	1	...	5	2	1	3	...
27 length, miles...	...	37.2	0.8	...	20.7	178.0	247.1	13.4	...
28 Tile or covered drains.....projects reporting...	...	...	...	1	...	2	1	3	...
29 length, miles...	...	...	...	0.4	...	124.0	128.9	10.7	...
30 Levees or dikes.....projects reporting...	...	...	...	...	...	...	...	...	...
31 length, miles...	...	...	...	...	...	...	...	...	...
32 Pumps.....projects reporting...	...	...	...	...	...	2	...	...	...
33 number of pumps...	...	...	...	...	...	2	...	...	...
34 Other (see text).....projects reporting...	...	...	...	...	...	...	...	...	...
35 Cost of maintenance, operation, repair, and administration.....projects reporting...	1	3	1	1	2	1	1	1	1
36 dollars...	13,127	807,719	5,000	37,362	145,954	1,272,264	2,136,987	86,930	221

¹Land served by two or more projects counted only once.²Acres served by two projects are included for each project. See text.³Includes projects taken over by another project prior to 1960. See text.

County Table 1. --DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	Roseau	St. Louis	Scott	Sherburne	Sibley	Stearns	Steele	Stevens	Swift	Todd
AREA										
1 Approximate land area..... acres 1960...	1,072,640	4,019,840	225,280	280,320	371,840	867,840	272,000	364,800	478,080	606,080
2 Land in farms..... acres 1959...	544,544	306,612	203,574	199,741	361,317	788,398	265,040	349,687	443,703	510,033
3 Drainage projects..... number 1960...	5	2	1	1	7	1	18	3	2	1
4 1950...	1	1	1	1	1	1	1	1	1	1
5 Total area in drainage projects ¹ acres served 1960...	625,414	227,034	15,452	68,506	252,320	74,240	75,715	69,268	193,980	157,601
6 1950...	680,704	231,834	10,554	68,506	118,016	74,240	48,154	64,768	121,754	157,601
7 Area not used for agriculture or not drained..... acres served 1960...	225,926	98,000	...	...	...	...	...	...	800	...
8 Net area drained and used for agriculture..... acres served 1960...	399,488	129,034	15,452	68,506	252,320	74,240	75,715	69,268	193,180	157,601
9 Drainage established before 1950..... acres served 1960...	365,558	129,034	10,554	68,506	118,016	74,240	47,954	69,268	121,514	157,601
10 Area added, 1950-1959..... acres served 1960...	33,930	...	4,898	...	134,304	...	27,761	...	71,666	...
11 Area served by two or more projects..... acres served 1960...	4,130	...	...	...	1,760	...	730	...	760	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION										
12 Drains owned by one landowner..... number of projects...	...	...	...	...	...	...	...	...	...	...
13 acres served ²..	...	...	...	...	...	...	...	...	...	...
14 Cooperative or mutual drains..... number of projects...	2	...	...	...	6	...	17	2	1	...
15 acres served ² ..	2,300	...	...	...	5,700	...	19,161	4,500	760	...
16 Legally organized public drains..... number of projects...	3	2	1	1	1	1	1	1	1	1
17 acres served ² ..	401,318	129,034	15,452	68,506	248,380	74,240	57,284	64,768	193,180	157,601
PROJECTS, 1960, BY YEAR STARTED										
18 1950-1959..... number of projects...	4	...	...	...	...	...	11	...	1	...
19 acres served ² ..	7,340	...	...	...	...	...	13,171	...	760	...
20 Prior to 1950..... number of projects...	1	2	1	1	7	1	7	3	1	1
21 acres served ² ..	396,278	129,034	15,452	68,506	254,080	74,240	63,274	69,268	193,180	157,601
DRAINAGE OPERATIONS, 1950-1959 ³										
22 Cost of drainage works and services..... projects reporting...	5	2	1	1	2	1	15	2	2	...
23 dollars...	525,896	151,717	59,561	47,485	3,384,540	5,960	519,437	80,368	1,582,981	...
24 New drainage works constructed, enlarged, or installed..... projects reporting...	5	...	1	...	1	...	12	...	2	...
25 dollars...	86,436	...	59,561	...	2,444,851	...	320,737	...	1,505,486	...
26 Open ditches..... projects reporting...	5	...	1	...	1	...	12	...	2	...
27 length, miles...	24.0	...	4.2	...	246.8	...	32.6	...	73.8	...
28 Tile or covered drains..... projects reporting...	...	...	...	...	1	...	2	...	...	...
29 length, miles...	...	...	...	...	60.7	...	26.6	...	...	...
30 Levees or dikes..... projects reporting...	...	...	...	...	...	...	...	...	...	...
31 length, miles...	...	...	...	...	...	...	...	...	...	...
32 Pumps..... projects reporting...	...	...	...	...	...	...	...	...	...	...
33 number of pumps...	...	...	...	...	...	...	...	...	...	...
34 Other (see text)..... projects reporting...	...	...	...	...	...	...	...	...	...	...
35 Cost of maintenance, operation, repair, and administration..... projects reporting...	1	2	...	1	2	1	7	2	1	...
36 dollars...	439,460	151,717	...	47,485	939,689	5,960	198,700	80,368	77,495	...

¹Land served by two or more projects counted only once.
²Acres served by two projects are included for each project. See text.
³Includes projects taken over by another project prior to 1960. See text.

DRAINAGE OF AGRICULTURAL LANDS

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	Traverse	Wabaaha	Wadena	Waseca	Washing- ton	Watsonwan	Wilkin	Winona	Wright	Yellow Medicine
AREA										
1 Approximate land area.....acres 1960...	366,080	333,440	343,040	265,600	249,600	277,120	481,280	398,720	429,440	485,120
2 Land in farms.....acres 1959...	346,685	305,343	222,723	262,595	195,107	269,140	444,149	343,883	395,944	470,757
3 Drainage projects.....number 1960...	2	1	2	5	1	1	18	1	1	1
4 ".....1950...	1	1	1	1	1	1	1	1	1	1
5 Total area in drainage projects ¹.....acres served 1960...	169,434	9,240	85,714	62,448	18,520	63,253	266,868	1,260	42,598	158,571
6 ".....1950...	155,414	9,240	85,184	38,600	18,520	63,053	254,618	1,260	42,598	105,907
7 Area not used for agriculture or not drained.....acres served 1960...	...	...	...	800	...	...	1,840	...	...	...
8 Net area drained and used for agriculture.....acres served 1960...	169,434	9,240	85,714	61,648	18,520	63,253	265,028	1,260	42,598	158,571
9 Drainage established before 1950.....acres served 1960...	155,414	9,240	85,184	37,800	18,520	63,053	254,888	1,260	42,598	105,907
10 Area added, 1950-1959.....acres served 1960...	14,020	...	530	23,848	...	200	10,140	...	...	52,664
11 Area served by two or more projects.....acres served 1960...	640	...	20	...	...	...	11,800	...	...	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION										
12 Drains owned by one landowner.....number of projects...	...	...	...	...	...	...	...	...	...	...
13 ".....acres served ²..	...	...	...	...	...	...	...	...	...	...
14 Cooperative or mutual drains.....number of projects...	1	...	1	4	...	...	16	...	...	...
15 ".....acres served ² ..	1,720	...	550	2,888	...	...	24,800	...	...	...
16 Legally organized public drains.....number of projects...	1	1	1	1	1	1	2	1	1	1
17 ".....acres served ² ..	168,354	9,240	85,184	58,760	18,520	63,253	253,418	1,260	42,598	158,571
PROJECTS, 1960, BY YEAR STARTED										
18 1950-1959.....number of projects...	1	...	1	4	...	...	11	...	...	...
19 ".....acres served ² ..	1,720	...	550	2,888	...	...	18,740	...	...	...
20 Prior to 1950.....number of projects...	1	1	1	1	1	1	7	1	1	1
21 ".....acres served ² ..	168,354	9,240	85,184	58,760	18,520	63,253	259,478	1,260	42,598	158,571
DRAINAGE OPERATIONS, 1950-1959 ³										
22 Cost of drainage works and services.....projects reporting...	2	...	2	4	...	1	13	1	1	1
23 ".....dollars...	479,385	...	9,481	661,262	...	185,491	357,861	164	27,805	2,245,068
24 New drainage works constructed, enlarged, of installed.....projects reporting...	2	...	(⁴)	4	...	1	12	...	...	1
25 ".....dollars...	393,101	...	(⁴)	610,826	...	157,447	148,602	...	...	1,343,493
26 Open ditches.....projects reporting...	2	...	(⁴)	4	...	1	12	...	...	1
27 ".....length, miles...	30.3	...	(⁴)	22.7	...	10.3	37.6	...	...	109.0
28 Tile or covered drains.....projects reporting...	...	...	...	4	...	...	...	...	...	1
29 ".....length, miles...	...	...	...	49.9	...	...	...	...	...	145.0
30 Levees or dikes.....projects reporting...	...	...	...	...	...	...	...	...	...	...
31 ".....length, miles...	...	...	...	...	...	...	...	...	...	...
32 Pumps.....projects reporting...	...	...	...	...	...	...	...	...	...	...
33 ".....number of pumps...	...	...	...	...	...	...	...	...	...	...
34 Other (see text).....projects reporting...	...	...	...	...	...	...	...	...	...	...
35 Cost of maintenance, operation, repair, and administration.....projects reporting...	1	...	(⁴)	1	...	1	3	1	1	1
36 ".....dollars...	86,284	...	(⁴)	50,436	...	28,044	209,259	164	27,805	901,575

¹Land served by two or more projects counted only once.²Acres served by two projects are included for each project. See text.³Includes projects taken over by another project prior to 1960. See text.⁴Included in State total only.

State Table 1.—DRAINAGE PROJECTS—NUMBER, AREA, COST, AND WORKS, 1920 TO 1960

[See text for comparability of data.]

Item	1960 Census	1950 Census	1940 Census	1930 Census	1920 Census
AREA					
Approximate land area..... acres...	30,222,720	30,238,720	30,348,800	29,671,680	29,671,680
Land in farms..... acres...	18,630,263	20,710,770	19,156,058	17,332,195	18,196,979
Drainage projects..... number...	590	441	271	NA	NA
Total area in drainage projects..... acres served...	3,123,227	3,023,744	2,890,618	2,988,496	1,601,444
Area not used for agriculture or not drained..... acres served...	82,620	NA	NA	NA	NA
Net area drained and used for agriculture..... acres served...	3,040,607	NA	¹ 2,182,729	¹ 2,092,899	NA
Drainage established 10 years or more before Census date..... acres served...	2,791,239	NA	NA	NA	NA
Drainage established within 10 years of Census date..... acres served...	249,368	NA	NA	NA	NA
Area served by two or more projects..... acres served...	294,417	288,315	236,252	171,448	3,040
PROJECTS BY TYPE OF ORGANIZATION					
Drains owned by one landowner..... number of projects...	121	65	NA	NA	NA
..... acres served...	155,650	111,253	50,155	27,400	56,750
Cooperative or mutual drains..... number of projects...	230	127	...	...	...
..... acres served...	292,531	140,006	...	...	...
Legally organized public drains..... number of projects...	239	249	NA	NA	NA
..... acres served...	2,906,319	2,772,485	2,840,463	2,961,096	1,544,694
PROJECTS BY YEAR STARTED					
Started 10 years or more before Census date..... number of projects...	393	263	NA	NA	NA
..... acres served...	2,919,182	2,760,499	2,843,135	1,874,866	259,892
Started within 10 years of Census date..... number of projects...	197	178	NA	NA	NA
..... acres served...	435,318	263,245	47,483	1,113,630	1,341,552
OPERATIONS, 10-YEAR PERIOD PRECEDING CENSUS DATE					
Cost of drainage works and services..... projects reporting...	374	345	NA	NA	NA
..... dollars...	9,557,061	5,702,914	NA	NA	NA
New drainage works constructed, enlarged, or installed..... projects reporting...	223	² 156	NA	NA	NA
..... cost, dollars...	3,855,591	² 441,404	NA	NA	NA
Open ditches..... projects reporting...	222	156	NA	NA	NA
..... length, miles...	566.6	372	NA	NA	NA
Tile or covered drains..... projects reporting...	...	...	NA	NA	NA
..... length, miles...	...	...	NA	NA	NA
Levees or dikes..... projects reporting...	3	...	NA	NA	NA
..... length, miles...	3.3	...	NA	NA	NA
Pumps..... projects reporting...	1	NA	NA	NA	NA
..... number of pumps...	3	NA	NA	NA	NA
Other (see text)..... projects reporting...	4	NA	NA	NA	NA
Cost of maintenance, operation, repair, and administration..... projects reporting...	206	NA	NA	NA	NA
..... dollars...	5,701,470	5,261,510	NA	NA	NA
STATUS ON CENSUS DATE					
Capital investment..... dollars...	NA	NA	23,259,677	23,601,443	7,076,164
Physical works:					
Open ditches..... length, miles...	NA	NA	4,344.1	4,022.1	1,815.1
Tile drains..... length, miles...	NA	NA	34.1	43.5	238.8
Levees and dikes..... length, miles...	NA	NA	190.5	227.7	6.7
Pumping units..... number of units...	NA	...	NA	5	NA

NA Not available.

¹Not fully comparable. See text.²Cost of new works for lands not previously drained.

DRAINAGE OF AGRICULTURAL LANDS

State Table 2.—DRAINAGE

	Size of project (Based on area of agricultural land in project)	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	590	3,354,500	608,310	487	3,102,093	137	252,407
2	500 to 999 acres.....	222	149,764	45,973	165	109,478	70	40,286
3	1,000 to 1,999 acres.....	122	161,464	40,059	93	122,576	34	38,888
4	2,000 to 4,999 acres.....	114	346,550	53,251	101	292,260	25	54,290
5	5,000 to 9,999 acres.....	53	361,648	69,967	50	334,835	6	26,813
6	10,000 to 19,999 acres.....	41	582,586	120,700	41	582,586	...	...
7	20,000 to 49,999 acres.....	25	710,266	111,632	25	704,136	1	6,130
8	50,000 to 99,999 acres.....	12	898,322	160,248	11	812,322	1	86,000
9	100,000 or more acres.....	1	143,900	6,480	1	143,900	...	...

State Table 3.—DRAINAGE PROJECTS, 1960,

	Type of organization	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	590	3,354,500	608,310	487	3,102,093	137	252,407
2	Drains owned by one landowner.....	121	155,650	33,656	78	111,694	52	43,956
3	Cooperative or mutual drains.....	230	292,531	80,671	174	194,452	77	98,079
4	Legally organized public drains.....	239	2,906,319	493,983	235	2,795,947	8	110,372

State Table 4.—DRAINAGE PROJECTS, 1960,

	Year of organization	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	590	3,354,500	608,310	487	3,102,093	137	252,407
2	1950-1959.....	197	435,318	138,188	94	195,039	125	240,279
3	Prior to 1950.....	393	2,919,182	470,122	393	2,907,054	12	12,128

PROJECTS, 1960, BY SIZE

Cost of drainage works and services, 1950-1959				New works constructed, enlarged, or installed, 1950-1959									
Total		For new works		Open ditches		Tile or covered drains		Levees and dikes		Pumps		Other, projects reporting	
Projects reporting	Dollars	Projects reporting	Dollars	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Number		
374	9,557,061	223	3,855,591	222	566.6	...	...	3	3.3	1	3	4	1
131	298,643	117	248,558	117	151.2	...	...	1	1.0	...	...	1	2
78	251,548	55	186,807	55	106.3	...	...	1	1.5	1	3	...	3
65	698,423	27	231,262	27	96.7	...	...	...	...	...	...	2	4
34	709,637	7	104,020	7	37.0	...	...	...	...	...	...	...	5
33	1,915,198	6	1,006,498	5	36.0	...	...	1	0.8	...	...	1	6
20	2,368,179	7	777,250	7	71.4	...	...	...	...	...	...	...	7
12	2,844,698	4	1,301,196	4	68.0	...	...	...	...	...	...	...	8
1	470,735	...	...	...	...	...	...	...	...	...	...	...	9

BY TYPE OF ORGANIZATION

Cost of drainage works and services, 1950-1959				New works constructed, enlarged, or installed, 1950-1959									
Total		For new works		Open ditches		Tile or covered drains		Levees and dikes		Pumps		Other, projects reporting	
Projects reporting	Dollars	Projects reporting	Dollars	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Number		
374	9,557,061	223	3,855,591	222	566.6	...	...	3	3.3	1	3	4	1
102	504,483	77	224,924	77	123.4	...	...	2	2.5	1	3	1	2
134	436,062	121	412,827	121	225.8	...	...	...	...	...	...	1	3
138	8,616,516	25	3,217,840	24	217.4	...	...	1	0.8	...	...	2	4

BY YEAR OF ORGANIZATION

Cost of drainage works and services, 1950-1959				New works constructed, enlarged, or installed, 1950-1959									
Total		For new works		Open ditches		Tile or covered drains		Levees and dikes		Pumps		Other, projects reporting	
Projects reporting	Dollars	Projects reporting	Dollars	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Number		
374	9,557,061	223	3,855,591	222	566.6	...	...	3	3.3	1	3	4	1
197	3,989,985	179	3,344,481	179	436.2	...	...	1	1.5	1	3	2	2
177	5,567,076	44	511,110	43	130.4	...	...	2	1.8	...	...	2	3

DRAINAGE OF AGRICULTURAL LANDS

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	The State	Adams	Alcorn	Attala	Benton	Bolivar	Calhoun	Carroll	Chickasaw
AREA									
1 Approximate land area.....acres 1960...	30,222,720	286,720	259,200	463,360	263,680	586,880	378,880	408,320	323,840
2 Land in farms.....acres 1959...	18,630,263	160,610	178,810	271,995	143,131	468,180	242,010	279,345	242,520
3 Drainage projects..... number 1960...	590	2	18	1	1	32	55	16	13
4	1950...	441	1	28	5	3	26	36	12
5 Total area in drainage projects ¹ acres served 1960...	3,123,227	700	50,062	1,000	6,881	375,740	96,338	36,884	31,090
6	1950...	3,023,744	15,413	75,912	16,319	9,722	356,201	79,173	27,852
7 Area not used for agriculture or not drained..... acres served 1960...	82,620	...	2,300	...	4,040	1,500	...	...	1,150
8 Net area drained and used for agriculture..... acres served 1960...	3,040,607	700	47,762	1,000	2,841	374,240	96,338	36,884	29,940
9 Drainage established before 1950..... acres served 1960...	2,791,239	600	47,762	1,000	2,841	371,800	84,478	36,884	29,740
10 Area added, 1950-1959..... acres served 1960...	249,368	100	...	...	...	2,440	11,860	...	200
11 Area served by two or more projects..... acres served 1960...	294,417	...	...	...	...	91,845	9,520	3,230	1,005
PROJECTS, 1960, BY TYPE OF ORGANIZATION									
12 Drains owned by one landowner..... number of projects...	121	2	5	...	...	1	3	3	...
13	acres served ² ..	155,650	700	12,875	...	1,000	1,650	1,895	...
14 Cooperative or mutual drains..... number of projects...	230	...	4	1	...	3	45	8	2
15	acres served ² ..	292,531	...	10,000	1,000	...	3,040	46,460	9,400
16 Legally organized public drains..... number of projects...	239	...	9	...	1	28	7	5	11
17	acres served ² ..	2,906,319	...	24,887	...	2,841	469,485	57,848	28,819
PROJECTS, 1960, BY YEAR STARTED									
18 1950-1959..... number of projects...	197	2	...	...	...	5	19	2	1
19	acres served ² ..	435,318	700	...	...	4,540	26,088	1,680	720
20 Prior to 1950..... number of projects...	393	...	18	1	1	27	36	14	12
21	acres served ² ..	2,919,182	...	47,762	1,000	2,841	468,985	79,870	38,434
DRAINAGE OPERATIONS, 1950-1959 ³									
22 Cost of drainage works and services..... projects reporting...	374	2	11	...	...	29	22	8	2
23	dollars...	9,557,061	1,980	106,400	...	549,964	96,345	58,081	12,725
24 New drainage works constructed, enlarged, or installed..... projects reporting...	223	2	...	...	...	5	18	3	1
25	dollars...	3,855,591	1,980	...	...	20,366	19,373	25,315	2,725
26 Open ditches..... projects reporting...	222	2	...	...	...	5	18	3	1
27	length, miles...	566.6	1.5	...	...	7.1	17.9	3.7	2.5
28 Tile or covered drains..... projects reporting...	...	...	...	...	...	...	...	...	...
29	length, miles...	...	...	...	...	...	...	...	...
30 Levees or dikes..... projects reporting...	3	...	...	...	...	1	...	1	...
31	length, miles...	3.3	...	...	...	1.5	...	0.5	...
32 Pumps..... projects reporting...	1	...	...	...	...	1	...	...	...
33	number of pumps...	3	...	...	...	3	...	...	...
34 Other (see text)..... projects reporting...	4	...	...	...	...	...	...	...	...
35 Cost of maintenance, operation, repair, and administration..... projects reporting...	206	...	11	...	...	24	5	6	1
36	dollars...	5,701,470	...	106,400	...	529,598	76,972	32,766	10,000

¹Land served by two or more projects counted only once.²Acres served by two projects are included for each project. See text.³Includes projects taken over by another project prior to 1960. See text.

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data.]

Item and Census year	Choctaw	Clay	Coahoma	De Soto	Grenada	Hancock	Harrison	Holmes	Humphreys
AREA									
1 Approximate land area.....acres 1960...	266,880	264,960	364,800	283,520	277,120	310,400	374,400	488,960	262,400
2 Land in farms.....acres 1959...	148,571	197,476	323,464	271,044	174,408	60,350	73,695	396,704	216,496
3 Drainage projects..... number 1960...	5	11	47	7	2	1	1	11	17
4 1960...	11	11	48	6	10	1	1	3	6
5 Total area in drainage projects ¹ acres served 1960...	10,864	40,482	197,518	52,464	10,320	875	12,200	17,073	194,255
6 1960...	19,503	40,312	184,281	44,014	19,279	875	12,200	86,256	179,845
7 Area not used for agriculture or not drained..... acres served 1960...	...	...	2,770	...	...	...	...	...	...
8 Net area drained and used for agriculture..... acres served 1960...	10,864	40,482	194,748	52,464	10,320	875	12,200	17,073	194,255
9 Drainage established before 1960..... acres served 1960...	10,864	40,332	189,553	44,014	10,320	875	12,200	12,403	191,315
10 Area added, 1960-1959..... acres served 1960...	...	150	5,195	8,450	...	...	...	4,670	2,940
11 Area served by two or more projects..... acres served 1960...	...	620	27,326	950	...	...	...	650	17,104
PROJECTS, 1960, BY TYPE OF ORGANIZATION									
12 Drains owned by one landowner..... number of projects...	...	2	28	...	...	1	...	7	4
13 acres served ²..	...	2,320	65,538	...	...	875	...	4,640	3,587
14 Cooperative or mutual drains..... number of projects...	...	3	3	3	1	...	...	1	6
15 acres served ²..	...	4,673	3,850	2,100	4,944	...	...	750	6,812
16 Legally organized public drains..... number of projects...	5	6	16	4	1	...	1	3	7
17 acres served ² ..	10,864	34,109	152,776	51,314	5,376	...	12,200	12,333	202,665
PROJECTS, 1960, BY YEAR STARTED									
18 1960-1959..... number of projects...	...	...	5	4	...	...	...	8	11
19 acres served ²..	...	...	5,520	17,372	...	...	...	5,320	17,699
20 Prior to 1960..... number of projects...	5	11	42	3	2	1	1	3	6
21 acres served ² ..	10,864	41,102	216,644	36,042	10,320	875	12,200	12,403	195,365
DRAINAGE OPERATIONS, 1950-1959³									
22 Cost of drainage works and services.....projects reporting...	...	3	36	5	1	...	...	9	15
23 dollars...	...	5,500	503,677	200,101	11,042	...	...	27,133	619,290
24 New drainage works constructed, enlarged, or installed.....projects reporting...	...	2	14	4	1	...	...	8	13
25 dollars...	...	2,700	59,279	27,343	9,133	...	...	20,494	254,045
26 Open ditches.....projects reporting...	...	2	13	4	1	...	...	8	13
27 length, miles...	...	8.0	29.2	9.9	0.3	...	...	9.4	31.4
28 Tile or covered drains.....projects reporting...	...	...	...	...	...	...	...	...	...
29 length, miles...	...	...	...	...	...	...	...	...	...
30 Levees or dikes.....projects reporting...	...	...	...	...	1	...	...	...	...
31 length, miles...	...	...	...	...	0.3	...	...	...	...
32 Pumps.....projects reporting...	...	...	...	...	...	...	...	...	...
33 number of pumps...	...	...	...	...	...	...	...	...	...
34 Other (see text).....projects reporting...	...	...	1	...	...	...	...	...	...
35 Cost of maintenance, operation, repair, and administration.....projects reporting...	...	2	33	3	1	...	...	1	3
36 dollars...	...	2,800	444,398	172,758	1,909	...	...	6,639	365,245

¹Land served by two or more projects counted only once.
²Acres served by two projects are included for each project. See text.
³Includes projects taken over by another project prior to 1960. See text.

DRAINAGE OF AGRICULTURAL LANDS

County Table 1. - DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	Issaquena	Itawamba	Jefferson	Lafayette	Leake	Lee	Leflore	Madison	Marion
AREA									
1 Approximate land area.....acres 1960...	265,600	346,240	332,800	387,840	375,040	291,200	376,320	480,640	352,000
2 Land in farms.....acres 1959...	113,337	181,891	205,243	254,277	221,164	212,117	334,196	348,355	217,746
3 Drainage projects..... number 1960...	2	11	1	2	2	18	33	1	2
4 1950...	1	8	...	2	3	17	11	1	....
5 Total area in drainage projects ¹ acres served 1960...	79,500	32,111	1,000	6,610	6,202	47,891	103,765	2,225	1,470
6 1950...	15,500	25,111	...	11,099	8,962	49,017	81,086	2,080	...
7 Area not used for agriculture or not drained..... acres served 1960...	1,320	3,600	...	2,500	...	...	...	...	...
8 Net area drained and used for agriculture..... acres served 1960...	78,180	28,511	1,000	4,110	6,202	47,891	103,765	2,225	1,470
9 Drainage established before 1950..... acres served 1960...	14,180	26,511	...	4,110	6,202	47,891	79,185	2,080	...
10 Area added, 1950-1959..... acres served 1960...	64,000	2,000	1,000	...	...	...	24,580	145	1,470
11 Area served by two or more projects..... acres served 1960...	...	1,046	...	...	...	3,381	7,516	...	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION									
12 Drains owned by one landowner..... number of projects...	...	...	1	...	...	1	11	...	1
13 acres served ²..	...	...	1,000	...	...	320	8,891	...	620
14 Cooperative or mutual drains..... number of projects...	...	2	...	...	...	1	12	1	1
15 acres served ²..	...	7,000	...	...	...	1,000	18,755	2,225	850
16 Legally organized public drains..... number of projects...	2	9	...	2	2	16	10	...	...
17 acres served ² ..	78,180	22,557	...	4,110	6,202	49,952	83,635	...	...
PROJECTS, 1960, BY YEAR STARTED									
18 1950-1959..... number of projects...	1	2	1	...	...	1	23	...	2
19 acres served ² ..	64,000	2,266	1,000	...	...	1,000	27,646	...	1,470
20 Prior to 1950..... number of projects...	1	9	...	2	2	17	10	1	...
21 acres served ² ..	14,180	27,291	...	4,110	6,202	50,272	83,635	2,225	...
DRAINAGE OPERATIONS, 1950-1959 ³									
22 Cost of drainage works and services.....projects reporting...	2	4	1	...	1	6	33	1	2
23 dollars...	659,728	36,284	3,961	...	3,000	71,100	228,985	3,235	2,514
24 New drainage works constructed, enlarged, or installed.....projects reporting...	2	2	1	...	...	2	14	1	2
25 dollars...	635,696	32,500	3,961	...	...	3,200	47,455	3,235	2,514
26 Open ditches.....projects reporting...	2	2	1	...	...	2	14	1	2
27 length, miles...	22.2	8.7	3.0	...	...	2.0	19.6	2.5	1.7
28 Tile or covered drains.....projects reporting...	...	...	...	...	...	...	...	...	...
29 length, miles...	...	...	...	...	...	...	...	...	...
30 Levees or dikes.....projects reporting...	...	...	...	...	...	...	...	...	...
31 length, miles...	...	...	...	...	...	...	...	...	...
32 Pumps.....projects reporting...	...	...	...	...	...	...	...	...	...
33 number of pumps...	...	...	...	...	...	...	...	...	...
34 Other (see text).....projects reporting...	...	1	...	...	...	1	...	...	...
35 Cost of maintenance, operation, repair, and administration.....projects reporting...	1	2	...	...	1	4	19	...	...
36 dollars...	24,032	3,784	...	...	3,000	67,900	181,530	...	...

¹Land served by two or more projects counted only once.²Acres served by two projects are included for each project. See text.³Includes projects taken over by another project prior to 1960. See text.

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	Marshall	Monroe	Montgomery	Newton	Noxubee	Oktibbeha	Panola	Pearl River	Pontotoc
AREA									
1 Approximate land area..... acres 1960...	443,520	492,160	257,920	371,200	444,800	290,560	438,400	529,920	320,640
2 Land in farms..... acres 1959...	336,147	320,027	182,875	218,195	387,402	215,641	374,614	203,122	237,023
3 Drainage projects..... number 1960...	1	9	8	4	7	2	30	2	10
4	4	7	8	4	...	2	27	...	12
5 Total area in drainage projects ¹ acres served 1960...	19,038	11,429	7,556	14,363	5,932	14,350	111,973	1,960	23,116
6	19,038	10,429	13,726	14,363	...	14,350	111,889	...	20,381
7 Area not used for agriculture or not drained..... acres served 1960...	...	...	...	1,000	...	...	...	...	...
8 Net area drained and used for agriculture..... acres served 1960...	19,038	11,429	7,556	13,363	5,932	14,350	111,973	1,960	23,116
9 Drainage established before 1950..... acres served 1960...	19,038	10,429	7,006	13,363	...	14,350	105,943	...	20,581
10 Area added, 1950-1959..... acres served 1960...	...	1,000	550	...	5,932	...	6,030	1,960	2,535
11 Area served by two or more projects..... acres served 1960...	...	960	...	...	...	100	19,330	...	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION									
12 Drains owned by one landowner..... number of projects...	...	1	...	...	5	...	6	...	...
13 .....	...	500	...	...	3,652	...	4,200	...	...
14 Cooperative or mutual drains..... number of projects...	...	1	7	1	2	...	12	2	3
15 .....	...	500	5,850	860	2,280	...	12,609	1,960	2,000
16 Legally organized public drains..... number of projects...	1	7	1	3	...	2	12	...	7
17	19,038	11,389	1,706	12,503	...	14,450	116,844	...	21,116
PROJECTS, 1960, BY YEAR STARTED									
18 1960-1959..... number of projects...	1	2	1	...	7	...	4	2	1
19	19,038	1,000	550	...	5,932	...	7,350	1,960	7,000
20 Prior to 1950..... number of projects...	...	7	7	4	...	2	26	...	9
21 .....	...	11,389	7,006	13,363	...	14,450	126,303	...	16,116
DRAINAGE OPERATIONS, 1950-1959 ³									
22 Cost of drainage works and services..... projects reporting...	1	3	1	3	7	1	20	2	2
23	80,850	20,400	4,125	15,750	8,697	1,132	127,659	2,767	165,263
24 New drainage works constructed, enlarged, or installed..... projects reporting...	...	2	1	...	7	...	14	2	1
25 .....	...	2,600	4,125	...	8,197	...	29,525	2,767	20,020
26 Open ditches..... projects reporting...	...	2	1	...	7	...	14	2	1
27 .....	...	2.1	2.7	...	5.9	...	13.3	4.2	17.0
28 Tile or covered drains..... projects reporting...	...	...	...	...	...	...	...	...	...
29 .....	...	...	...	...	...	...	...	...	...
30 Levees or dikes..... projects reporting...	...	...	...	...	...	...	...	...	...
31 .....	...	...	...	...	...	...	...	...	...
32 Pumps..... projects reporting...	...	...	...	...	...	...	...	...	...
33 .....	...	...	...	...	...	...	...	...	...
34 Other (see text)..... projects reporting...	...	...	...	...	...	...	...	...	...
35 Cost of maintenance, operation, repair, and administration..... projects reporting...	1	1	...	3	2	1	6	...	2
36	80,850	17,800	...	15,750	500	1,132	98,134	...	145,243

¹Land served by two or more projects counted only once.
²Acres served by two projects are included for each project. See text.
³Includes projects taken over by another project prior to 1960. See text.

DRAINAGE OF AGRICULTURAL LANDS

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	Prentiss	Quitman	Scott	Sharkey	Sunflower	Tallahatchie	Tate	Tippah	Tishomingo
AREA									
1 Approximate land area.....acres 1960...	267,520	263,680	393,600	279,040	¹ 443,520	412,160	245,120	296,960	288,640
2 Land in farms.....acres 1959...	191,386	234,363	217,353	144,240	¹ 449,994	336,764	225,315	210,509	130,451
3 Drainage projects..... number 1960...	18	34	1	9	60	22	9	14	3
4 1950...	17	18	2	5	49	14	9	14	3
5 Total area in drainage projects ² acres served 1960...	27,528	187,430	3,260	112,246	172,249	200,346	49,807	23,048	4,456
6 1950...	27,574	185,430	10,619	101,586	164,011	190,098	49,707	21,901	4,456
7 Area not used for agriculture or not drained..... acres served 1960...	1,300	...	...	10,100	...	7,800	...	1,800	...
8 Net area drained and used for agriculture..... acres served 1960...	26,228	187,430	3,260	102,146	172,249	192,546	49,807	21,248	4,456
9 Drainage established before 1950..... acres served 1960...	26,228	185,430	3,260	91,486	160,481	188,418	49,707	19,904	4,456
10 Area added, 1950-1959..... acres served 1960...	...	2,000	...	10,660	11,768	4,128	100	1,344	...
11 Area served by two or more projects..... acres served 1960...	1,386	37,320	...	7,600	11,887	7,968	1,260	...	180
PROJECTS, 1960, BY TYPE OF ORGANIZATION									
12 Drains owned by one landowner..... number of projects...	1	1	...	...	6	4	...	...	...
13 acres served ³ ...	320	254	...	...	4,480	6,903	...	...	...
14 Cooperative or mutual drains..... number of projects...	...	14	...	2	37	8	3	...	...
15 acres served ³...	...	13,700	...	760	37,443	7,778	2,180	...	...
16 Legally organized public drains..... number of projects...	17	19	1	7	17	10	6	14	3
17 acres served ³ ...	27,294	213,927	3,260	108,986	142,213	185,833	48,887	21,248	4,636
PROJECTS, 1960, BY YEAR STARTED									
18 1950-1959..... number of projects...	1	16	...	4	11	9	1	1	...
19 acres served ³ ...	1,046	42,680	...	18,260	21,060	12,696	1,360	1,344	...
20 Prior to 1950..... number of projects...	17	18	1	5	49	13	8	13	3
21 acres served ³ ...	26,568	185,201	3,260	91,486	163,076	187,818	49,707	19,904	4,636
DRAINAGE OPERATIONS, 1950-1959 ⁴									
22 Cost of drainage works and services..... projects reporting...	14	28	1	8	25	17	6	5	2
23 dollars...	49,072	814,755	1,150	566,527	310,950	323,034	91,550	79,923	7,250
24 New drainage works constructed, enlarged, or installed..... projects reporting...	2	16	...	4	11	10	...	...	...
25 dollars...	15,100	638,361	...	440,396	77,442	80,968	...	...	...
26 Open ditches..... projects reporting...	2	16	...	4	11	10	...	...	...
27 length, miles...	5.0	58.1	...	17.4	24.9	24.6	...	...	...
28 Tile or covered drains..... projects reporting...	...	...	...	...	...	...	...	...	...
29 length, miles...	...	...	...	...	...	...	...	...	...
30 Levees or dikes..... projects reporting...	...	...	...	...	...	...	...	...	...
31 length, miles...	...	...	...	...	...	...	...	...	...
32 Pumps..... projects reporting...	...	...	...	...	...	...	...	...	...
33 number of pumps...	...	...	...	...	...	...	...	...	...
34 Other (see text)..... projects reporting...	...	...	...	...	1	...	...	...	...
35 Cost of maintenance, operation, repair, and administration..... projects reporting...	12	12	1	4	14	8	6	5	2
36 dollars...	33,972	176,394	1,150	126,131	233,508	242,066	91,550	79,923	7,250

¹The excess of farm acreage over approximate land area is due to the fact that the entire acreage of a farm is tabulated as in the county in which the headquarters is located, even though a part of the farm may be situated in an adjoining county.

²Land served by two or more projects counted only once.

³Acres served by two projects are included for each project. See text.

⁴Includes projects taken over by another project prior to 1960. See text.

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	Tunica	Union	Warren	Washington	Webster	Winston	Yalobusha	Yazoo	All other counties ¹
AREA									
1 Approximate land area.....acres 1960...	293,120	270,080	362,240	465,920	266,240	387,840	315,520	600,320	1,159,040
2 Land in farms.....acres 1959...	208,984	183,900	221,347	377,815	165,974	219,507	193,187	422,092	615,039
3 Drainage projects..... number 1960...	25	11	2	15	14	3	3	48	...
4 1950...	9	1	2	7	10	3	5	9	8
5 Total area in drainage projects ² acres served 1960...	130,941	41,202	1,300	375,009	16,322	17,067	4,794	130,985	...
6 1950...	102,345	835	1,300	369,361	14,933	17,067	16,821	103,445	45,432
7 Area not used for agriculture or not drained..... acres served 1960...	...	...	...	9,960	...	...	...	31,480	...
8 Net area drained and used for agriculture..... acres served 1960...	130,941	41,202	1,300	365,049	16,322	17,067	4,794	99,505	...
9 Drainage established before 1950..... acres served 1960...	102,185	38,797	1,300	351,009	13,642	17,067	4,794	75,225	...
10 Area added, 1950-1959..... acres served 1960...	28,756	2,405	...	14,040	2,680	...	...	24,280	...
11 Area served by two or more projects..... acres served 1960...	3,914	500	...	9,350	600	...	...	27,869	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION									
12 Drains owned by one landowner..... number of projects...	1	...	...	1	3	...	...	26	...
13 acres served ³ ...	500	...	...	750	1,560	...	...	26,620	...
14 Cooperative or mutual drains..... number of projects...	18	...	2	7	6	1	...	15	...
15 acres served ³ ...	48,197	...	1,300	11,890	4,320	1,200	...	13,540	...
16 Legally organized public drains..... number of projects...	6	11	...	7	5	2	3	7	...
17 acres served ³ ...	86,158	41,702	...	361,759	11,042	15,867	4,794	91,874	...
PROJECTS, 1960, BY YEAR STARTED									
18 1950-1959..... number of projects...	16	2	...	8	5	...	...	37	...
19 acres served ³ ...	42,237	3,574	...	23,390	2,680	...	...	45,140	...
20 Prior to 1950..... number of projects...	9	9	2	7	9	3	3	11	...
21 acres served ³ ...	92,618	38,128	1,300	351,009	14,242	17,067	4,794	86,894	...
DRAINAGE OPERATIONS, 1950-1959⁴									
22 Cost of drainage works and services.....projects reporting...	21	4	...	14	5	...	1	48	...
23 dollars...	87,886	825,217	...	1,942,747	6,958	...	1,650	820,704	...
24 New drainage works constructed, enlarged, or installed.....projects reporting...	14	2	...	8	5	...	...	45	...
25 dollars...	56,274	41,000	...	563,553	6,958	...	...	696,991	...
26 Open ditches.....projects reporting...	14	2	...	8	5	...	...	45	...
27 length, miles...	29.9	6.5	...	51.2	3.3	...	...	119.9	...
28 Tile or covered drains.....projects reporting...	...	...	...	...	...	...	...	...	...
29 length, miles...	...	...	...	...	...	...	...	...	...
30 Levees or dikes.....projects reporting...	...	...	...	...	...	...	...	1	...
31 length, miles...	...	...	...	...	...	...	...	1.0	...
32 Pumps.....projects reporting...	...	...	...	...	...	...	...	...	...
33 number of pumps...	...	...	...	...	...	...	...	...	...
34 Other (see text).....projects reporting...	...	...	...	...	...	...	...	...	...
35 Cost of maintenance, operation, repair, and administration.....projects reporting...	9	4	...	8	...	...	1	32	...
36 dollars...	31,612	784,217	...	1,379,194	...	...	1,650	123,713	...

¹Includes Franklin, Neshoba, and Wilkinson counties.

²Land served by two or more projects counted only once.

³Acres served by two projects are included for each project. See text.

⁴Includes projects taken over by another project prior to 1960. See text.

State Table 1.—DRAINAGE PROJECTS—NUMBER, AREA, COST, AND WORKS, 1920 TO 1960

[See text for comparability of data.]

Item	1960 Census	1950 Census	1940 Census	1930 Census	1920 Census
AREA					
Approximate land area.....acres...	44,248,320	44,304,640	44,332,800	43,985,280	43,985,280
Land in farms.....acres...	33,155,226	35,123,143	34,739,598	33,743,019	34,774,679
Drainage projects.....number...	425	318	286	NA	NA
Total area in drainage projects.....acres served...	3,123,416	3,147,484	3,087,063	3,150,022	2,596,204
Area not used for agriculture or not drained.....acres served...	26,100	NA	NA	NA	NA
Net area drained and used for agriculture.....acres served...	3,097,316	NA	¹ 2,673,169	¹ 2,427,599	NA
Drainage established 10 years or more before Census date.....acres served...	3,059,174	NA	NA	NA	NA
Drainage established within 10 years of Census date.....acres served...	38,142	NA	NA	NA	NA
Area served by two or more projects.....acres served...	517,507	671,651	1,347,916	961,548	508,685
PROJECTS BY TYPE OF ORGANIZATION					
Drains owned by one landowner.....number of projects...	55	1	NA	NA	NA
acres served...	42,154	4,250	5,600	9,955	9,896
Cooperative or mutual drains.....number of projects...	56	2	...	...	...
acres served...	57,739	5,290	...	...	...
Legally organized public drains.....number of projects...	314	315	NA	NA	NA
acres served...	3,570,736	3,137,944	3,081,463	3,140,067	2,586,308
PROJECTS BY YEAR STARTED					
Started 10 years or more before Census date.....number of projects...	314	304	NA	NA	NA
acres served...	3,502,665	3,101,104	3,025,591	2,676,021	² 1,723,317
Started within 10 years of Census date.....number of projects...	111	14	NA	NA	NA
acres served...	167,964	46,380	61,472	474,001	² 866,151
OPERATIONS, 10-YEAR PERIOD PRECEDING CENSUS DATE					
Cost of drainage works and services.....projects reporting...	302	225	NA	NA	NA
dollars...	12,138,381	8,281,620	NA	NA	NA
New drainage works constructed, enlarged, or installed.....projects reporting...	117	³ 9	NA	NA	NA
cost, dollars...	936,412	³ 114,063	NA	NA	NA
Open ditches.....projects reporting...	113	8	NA	NA	NA
length, miles...	296.7	30	NA	NA	NA
Tile or covered drains.....projects reporting...	36	...	NA	NA	NA
length, miles...	8.5	...	NA	NA	NA
Levees or dikes.....projects reporting...	13	4	NA	NA	NA
length, miles...	42.6	17	NA	NA	NA
Pumps.....projects reporting...	3	NA	NA	NA	NA
number of pumps...	5	NA	NA	NA	NA
Other (see text).....projects reporting...	8	NA	NA	NA	NA
Cost of maintenance, operation, repair, and administration.....projects reporting...	224	NA	NA	NA	NA
dollars...	11,201,969	8,167,557	NA	NA	NA
STATUS ON CENSUS DATE					
Capital investment.....dollars...	NA	NA	49,050,414	47,340,174	20,723,128
Physical works:					
Open ditches.....length, miles...	NA	NA	5,191.5	4,960.5	3,438.7
Tile drains.....length, miles...	NA	NA	170.3	123.4	38.8
Levees and dikes.....length, miles...	NA	NA	687.1	931.4	456.9
Pumping units.....number of units...	NA	16	16	16	14

NA Not available.

¹Not fully comparable. See text.

²1920 figures exclude 6,736 acres for which date of organization was not reported.

³Cost of new works for lands not previously drained.

DRAINAGE OF AGRICULTURAL LANDS

State Table 2.—DRAINAGE

Size of project (Based on area of agricultural land in project)	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
		Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
				Projects reporting	Acres	Projects reporting	Acres
1 All projects.....	425	3,670,629	1,090,820	402	3,624,790	36	45,839
2 500 to 999 acres.....	99	65,228	41,329	91	59,856	12	5,372
3 1,000 to 1,999 acres.....	85	118,155	36,513	74	102,757	15	15,398
4 2,000 to 4,999 acres.....	108	331,669	87,416	105	322,232	4	9,437
5 5,000 to 9,999 acres.....	50	345,052	46,421	49	338,071	2	6,981
6 10,000 to 19,999 acres.....	43	603,643	165,130	43	600,939	2	2,704
7 20,000 to 49,999 acres.....	29	847,008	300,235	29	847,008	...	...
8 50,000 to 99,999 acres.....	8	527,879	166,323	8	521,932	1	5,947
9 100,000 or more acres.....	3	831,995	247,453	3	831,995	...	...

State Table 3.—DRAINAGE PROJECTS, 1960,

Type of organization	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
		Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
				Projects reporting	Acres	Projects reporting	Acres
1 All projects.....	425	3,670,629	1,090,820	402	3,624,790	36	45,839
2 Drains owned by one landowner.....	55	42,154	33,504	48	35,864	8	6,290
3 Cooperative or mutual drains.....	56	57,739	37,292	45	44,434	19	13,305
4 Legally organized public drains.....	314	3,570,736	1,020,024	309	3,544,492	9	26,244

State Table 4.—DRAINAGE PROJECTS, 1960,

Year of organization	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
		Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
				Projects reporting	Acres	Projects reporting	Acres
1 All projects.....	425	3,670,629	1,090,820	402	3,624,790	36	45,839
2 1950-1959.....	111	167,964	129,510	88	126,679	32	41,285
3 Prior to 1950.....	314	3,502,665	961,310	314	3,498,111	4	4,554

PROJECTS, 1960, BY SIZE

Cost of drainage works and services, 1950-1959				New works constructed, enlarged, or installed, 1950-1959									
Total		For new works		Open ditches		Tile or covered drains		Levees and dikes		Pumps		Other, projects reporting	
Projects reporting	Dollars	Projects reporting	Dollars	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Number		
302	12,138,381	117	936,412	113	296.7	36	8.5	13	42.6	3	5	8	1
79	266,622	69	224,347	69	147.7	24	2.4	3	7.2	...	...	...	2
55	384,468	27	184,131	27	86.1	9	5.8	4	14.7	1	2	3	3
71	1,038,074	11	134,933	10	38.2	2	0.2	4	6.8	...	...	2	4
29	708,351	7	167,875	5	16.0	1	0.1	2	13.9	...	...	2	5
31	1,438,395	2	25,126	1	1.2	...	...	...	...	1	2	...	6
27	2,248,600	...	...	...	...	...	...	...	...	...	...	...	7
7	1,672,515	1	200,000	1	7.5	...	...	...	...	1	1	1	8
3	4,381,356	...	...	...	...	...	...	...	...	...	...	...	9

BY TYPE OF ORGANIZATION

Cost of drainage works and services, 1950-1959				New works constructed, enlarged, or installed, 1950-1959									
Total		For new works		Open ditches		Tile or covered drains		Levees and dikes		Pumps		Other, projects reporting	
Projects reporting	Dollars	Projects reporting	Dollars	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Number		
302	12,138,381	117	936,412	113	296.7	36	8.5	13	42.6	3	5	8	1
55	249,713	52	205,748	52	150.9	16	6.5	3	7.2	...	...	1	2
55	279,271	48	211,849	48	101.0	20	2.0	3	10.6	1	2	1	3
192	11,609,397	17	518,815	13	44.8	...	...	7	24.8	2	3	6	4

BY YEAR OF ORGANIZATION

Cost of drainage works and services, 1950-1959				New works constructed, enlarged, or installed, 1950-1959									
Total		For new works		Open ditches		Tile or covered drains		Levees and dikes		Pumps		Other, projects reporting	
Projects reporting	Dollars	Projects reporting	Dollars	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Number		
302	12,138,381	117	936,412	113	296.7	36	8.5	13	42.6	3	5	8	1
111	1,113,511	105	823,778	105	271.3	36	8.5	9	31.2	2	3	5	2
191	11,024,870	12	112,634	8	25.4	...	...	4	11.4	1	2	3	3

DRAINAGE OF AGRICULTURAL LANDS

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data.]

Item and Census year	The State	Adair	Andrew	Atchison	Bates	Bollinger	Boone	Buchanan	Butler	Caldwell
AREA										
1 Approximate land area.....acres 1960...	44,248,320	367,360	278,400	351,360	538,240	395,520	437,120	258,560	456,960	275,200
2 Land in farms.....acres 1959...	33,155,226	323,702	257,607	318,812	480,928	253,254	349,579	213,482	258,621	258,010
3 Drainage projects..... number 1960...	425	5	12	23	2	1	1	3	5	2
4 1950...	318	4	12	19	2	1	1	4	6	2
5 Total area in drainage projects ¹ acres served 1960...	3,123,416	20,414	26,403	80,802	48,933	27,820	519	25,767	238,471	3,462
6 1950...	3,147,484	12,065	32,143	71,355	48,933	35,219	519	15,992	238,471	3,462
7 Area not used for agriculture or not drained..... acres served 1960...	26,100	...	...	...	...	5,500	...	...	900	...
8 Net area drained and used for agriculture..... acres served 1960...	3,097,316	20,414	26,403	80,802	48,933	22,320	519	25,767	237,571	3,462
9 Drainage established before 1950..... acres served 1960...	3,059,174	20,414	25,203	74,855	48,933	22,320	519	25,767	237,571	3,462
10 Area added, 1950-1959..... acres served 1960...	38,142	...	1,200	5,947	...	...	...	...	...	...
11 Area served by two or more projects..... acres served 1960...	517,507	...	400	57,499	...	...	...	...	2,160	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION										
12 Drains owned by one landowner..... number of projects...	55	...	1	...	...	...	...	...	...	...
13 acres served ² ...	42,154	...	600	...	...	...	...	...	...	...
14 Cooperative or mutual drains..... number of projects...	56	...	1	...	...	...	...	...	...	...
15 acres served ² ...	57,739	...	1,000	...	...	...	...	...	...	...
16 Legally organized public drains..... number of projects...	314	5	10	23	2	1	1	3	5	2
17 acres served ² ...	3,570,736	20,414	25,203	139,201	48,933	22,320	519	25,767	239,731	3,462
PROJECTS, 1960, BY YEAR STARTED										
18 1960-1959..... number of projects...	111	...	2	3	...	...	...	...	...	...
19 acres served ² ...	167,964	...	1,600	59,214	...	...	...	...	...	...
20 Prior to 1950..... number of projects...	314	5	10	20	2	1	1	3	5	2
21 acres served ² ...	3,502,665	20,414	25,203	79,987	48,933	22,320	519	25,767	239,731	3,462
DRAINAGE OPERATIONS, 1950-1959 ³										
22 Cost of drainage works and services.....projects reporting...	302	1	7	11	2	1	...	3	4	...
23 dollars...	12,138,381	12,000	42,168	506,170	6,580	124,239	...	97,451	681,937	...
24 New drainage works constructed, enlarged, or installed.....projects reporting...	117	...	3	4	...	...	...	...	...	...
25 dollars...	936,412	...	14,668	208,000	...	...	...	...	...	...
26 Open ditches.....projects reporting...	113	...	3	4	...	...	...	...	...	...
27 length, miles...	296.7	...	5.6	15.5	...	...	...	...	...	...
28 Tile or covered drains.....projects reporting...	36	...	...	...	...	...	...	...	...	...
29 length, miles...	8.5	...	...	...	...	...	...	...	...	...
30 Levees or dikes.....projects reporting...	13	...	1	...	...	...	...	...	...	...
31 length, miles...	42.6	...	5.0	...	...	...	...	...	...	...
32 Pumps.....projects reporting...	3	...	...	1	...	...	...	...	...	...
33 number of pumps...	5	...	...	1	...	...	...	...	...	...
34 Other (see text).....projects reporting...	8	...	...	1	...	...	...	...	...	...
35 Cost of maintenance, operation, repair, and administration.....projects reporting...	224	1	6	10	2	1	...	3	4	...
36 dollars...	11,201,969	12,000	27,500	298,170	6,580	124,239	...	97,451	681,937	...

¹Land served by two or more projects counted only once.²Acres served by two projects are included for each project. See text.³Includes projects taken over by another project prior to 1960. See text.

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	Callaway	Cape Girardeau	Carroll	Cass	Chariton	Clark	Clay	Davless	De Kalb	Dunklin
AREA										
1 Approximate land area.....acres 1960...	534,400	368,640	444,160	446,720	485,760	325,760	264,320	360,320	270,720	347,520
2 Land in farms.....acres 1959...	416,390	306,651	411,900	398,600	418,576	290,241	207,232	328,020	247,738	309,990
3 Drainage projects..... number 1960...	5	12	8	1	14	11	2	8	2	40
4 1960...	5	3	6	1	15	9	1	3	2	26
5 Total area in drainage projects ¹ acres served 1960...	6,040	45,060	81,649	15,385	60,536	38,120	5,891	38,528	3,100	261,254
6 1960...	6,040	47,350	78,972	15,385	62,266	35,600	5,183	38,478	3,000	265,957
7 Area not used for agriculture or not drained..... acres served 1960...	...	...	12,800	...	...	...	...	...	...	...
8 Net area drained and used for agriculture..... acres served 1960...	6,040	45,060	68,849	15,385	60,536	38,120	5,891	38,528	3,100	261,254
9 Drainage established before 1960..... acres served 1960...	6,040	43,495	66,172	15,385	60,536	35,600	5,183	38,478	3,000	259,234
10 Area added, 1950-1959..... acres served 1960...	...	1,565	2,677	...	...	2,520	708	50	100	2,020
11 Area served by two or more projects..... acres served 1960...	...	8,948	28,965	...	7,264	...	...	4,215	...	73,621
PROJECTS, 1960, BY TYPE OF ORGANIZATION										
12 Drains owned by one landowner..... number of projects...	...	...	...	...	...	1	...	...	...	2
13 acres served ²...	...	...	...	...	...	1,360	...	...	...	1,240
14 Cooperative or mutual drains..... number of projects...	...	9	...	...	...	1	...	5	2	12
15 acres served ²...	...	7,915	...	...	...	1,160	...	4,265	3,100	13,210
16 Legally organized public drains..... number of projects...	5	3	8	1	14	9	2	3	...	26
17 acres served ² ...	6,040	46,093	97,814	15,385	67,800	35,600	5,891	38,478	...	333,905
PROJECTS, 1960, BY YEAR STARTED										
18 1960-1959..... number of projects...	...	9	2	...	...	2	1	5	...	14
19 acres served ²...	...	7,915	2,677	...	...	2,520	708	4,265	...	14,450
20 Prior to 1960..... number of projects...	5	3	6	1	14	9	1	3	2	26
21 acres served ² ...	6,040	46,093	95,137	15,385	67,800	35,600	5,183	38,478	3,100	333,905
DRAINAGE OPERATIONS, 1950-1959 ³										
22 Cost of drainage works and services.....projects reporting...	3	11	8	1	10	4	2	6	(⁴)	40
23 dollars...	13,883	270,330	256,178	10,310	546,864	218,677	99,933	27,047	(⁴)	1,087,684
24 New drainage works constructed, enlarged, or installed.....projects reporting...	...	9	2	...	1	3	1	3	(⁴)	13
25 dollars...	...	53,946	69,376	...	8,500	27,147	8,496	13,000	(⁴)	63,900
26 Open ditches.....projects reporting...	...	9	2	...	1	2	1	3	(⁴)	13
27 length, miles...	...	19.8	9.7	...	0.5	2.5	1.6	5.2	(⁴)	42.6
28 Tile or covered drains.....projects reporting...	...	3	...	...	...	...	...	...	...	10
29 length, miles...	...	0.3	...	...	...	...	...	...	...	1.0
30 Levees or dikes.....projects reporting...	...	...	2	...	1	1	...	...	...	...
31 length, miles...	...	...	6.8	...	0.5	2.0	...	...	...	...
32 Pumps.....projects reporting...	...	...	...	...	...	2	...	...	...	...
33 number of pumps...	...	...	...	...	...	4	...	...	...	...
34 Other (see text).....projects reporting...	...	...	2	...	1	...	...	...	...	...
35 Cost of maintenance, operation, repair, and administration.....projects reporting...	3	4	8	1	10	4	1	6	...	27
36 dollars...	13,883	216,384	186,802	10,310	538,364	191,530	91,437	14,047	...	1,023,784

¹Land served by two or more projects counted only once.

²Acres served by two projects are included for each project. See text.

³Includes projects taken over by another project prior to 1960. See text.

⁴Included in State total only.

DRAINAGE OF AGRICULTURAL LANDS

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	Franklin	Gentry	Crunty	Harrison	Henry	Holt	Howard	Jackson	Johnson	Knox
AREA										
1 Approximate land area.....acres 1960...	596,480	312,320	278,400	460,800	471,680	296,960	300,160	385,920	528,640	327,680
2 Land in farms.....acres 1959...	401,964	292,671	251,343	427,462	401,370	254,160	262,472	230,898	456,253	300,616
3 Drainage projects..... number 1960...	2	5	12	6	2	10	2	4	3	5
4 1950...	1	4	12	3	2	9	3	4	3	5
5 Total area in drainage projects ¹ acres served 1960...	5,380	27,759	57,627	23,318	11,513	43,161	4,012	9,090	28,262	7,365
6 1950...	4,380	27,759	57,627	22,718	11,513	42,229	5,579	9,551	28,262	7,365
7 Area not used for agriculture or not drained..... acres served 1960...	...	...	...	...	...	...	...	...	...	...
8 Net area drained and used for agriculture..... acres served 1960...	5,380	27,759	57,627	23,318	11,513	43,161	4,012	9,090	28,262	7,365
9 Drainage established before 1950..... acres served 1960...	4,380	27,759	57,627	22,718	11,513	43,161	4,012	9,090	28,262	7,365
10 Area added, 1950-1959..... acres served 1960...	1,000	...	...	600	...	...	...	...	...	...
11 Area served by two or more projects..... acres served 1960...	...	...	...	...	...	...	...	...	1,250	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION										
12 Drains owned by one landowner..... number of projects...	1	1	...	1	...	...	...	...	...	...
13 acres served ² ...	1,000	670	...	640	...	...	...	...	...	...
14 Cooperative or mutual drains..... number of projects...	...	...	...	2	...	...	...	1	...	...
15 acres served ²...	...	...	...	1,240	...	...	...	1,500	...	...
16 Legally organized public drains..... number of projects...	1	4	12	3	2	10	2	3	3	5
17 acres served ² ...	4,380	27,089	57,627	21,438	11,513	43,161	4,012	7,590	29,512	7,365
PROJECTS, 1960, BY YEAR STARTED										
18 1960-1959..... number of projects...	1	...	...	3	...	1	...	...	...	...
19 acres served ² ...	1,000	...	...	1,880	...	7,086	...	...	...	...
20 Prior to 1960..... number of projects...	1	5	12	3	2	9	2	4	3	5
21 acres served ² ...	4,380	27,759	57,627	21,438	11,513	36,075	4,012	9,090	29,512	7,365
DRAINAGE OPERATIONS, 1950-1959 ³										
22 Cost of drainage works and services.....projects reporting...	2	(⁴)	...	3	...	5	2	3	2	3
23 dollars...	75,969	(⁴)	...	20,500	...	298,430	16,394	103,122	6,723	4,100
24 New drainage works constructed, enlarged, or installed.....projects reporting...	1	(⁴)	...	3	...	1	...	...	...	...
25 dollars...	7,469	(⁴)	...	20,500	...	1,000	...	...	...	...
26 Open ditches.....projects reporting...	1	(⁴)	...	3	...	1	...	...	...	...
27 length, miles...	2.3	(⁴)	...	8.2	...	1.0	...	...	...	...
28 Tile or covered drains.....projects reporting...	...	...	...	...	...	...	...	...	...	...
29 length, miles...	...	...	...	...	...	...	...	...	...	...
30 Levees or dikes.....projects reporting...	...	(⁴)	...	...	...	...	...	...	...	...
31 length, miles...	...	(⁴)	...	...	...	...	...	...	...	...
32 Pumps.....projects reporting...	...	...	...	...	...	...	...	...	...	...
33 number of pumps...	...	...	...	...	...	...	...	...	...	...
34 Other (see text).....projects reporting...	1	...	...	...	...	...	...	...	...	...
35 Cost of maintenance, operation, repair, and administration.....projects reporting...	1	...	...	...	...	5	2	3	2	3
36 dollars...	68,500	...	...	...	...	297,430	16,394	103,122	6,723	4,100

¹Land served by two or more projects counted only once.²Acres served by two projects are included for each project. See text.³Includes projects taken over by another project prior to 1960. See text.⁴Included in State total only.

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	Lafayette	Lewis	Lincoln	Linn	Livingston	Macon	Marion	Mercer	Mississippi	New Madrid
AREA										
1 Approximate land area.....acres 1960...	405,760	323,200	402,560	399,360	341,120	520,960	281,600	291,840	263,040	434,560
2 Land in farms.....acres 1959...	372,740	288,850	308,600	358,003	305,742	442,904	252,620	262,481	227,676	365,779
3 Drainage projects..... number 1960...	6	7	8	2	5	3	8	7	13	23
4 1950...	5	7	7	3	5	3	3	6	11	27
5 Total area in drainage projects ¹ acres served 1960...	12,662	20,836	27,244	17,718	88,095	27,737	24,223	18,118	228,793	368,596
6 1950...	10,219	20,836	27,244	17,735	88,175	27,737	23,173	18,118	238,820	388,315
7 Area not used for agriculture or not drained..... acres served 1960...	...	...	...	...	...	...	...	...	1,900	...
8 Net area drained and used for agriculture..... acres served 1960...	12,662	20,836	27,244	17,718	88,095	27,737	24,223	18,118	226,893	368,596
9 Drainage established before 1950..... acres served 1960...	10,073	20,836	27,244	17,718	88,095	27,737	23,173	18,118	226,893	368,596
10 Area added, 1950-1959..... acres served 1960...	2,589	...	...	...	...	...	1,050	...	...	...
11 Area served by two or more projects..... acres served 1960...	...	...	764	...	...	...	4,060	900	103,249	130,258
PROJECTS, 1960, BY TYPE OF ORGANIZATION										
12 Drains owned by one landowner..... number of projects...	...	...	1	...	...	...	5	1	...	...
13 acres served ²...	...	...	764	...	...	...	5,110	500	...	...
14 Cooperative or mutual drains..... number of projects...	...	...	...	...	...	...	...	...	...	3
15 acres served ²...	...	...	...	...	...	...	...	...	...	5,047
16 Legally organized public drains..... number of projects...	6	7	7	2	5	3	3	6	13	20
17 acres served ² ...	12,662	20,836	27,244	17,718	88,095	27,737	23,173	18,518	349,652	511,103
PROJECTS, 1960, BY YEAR STARTED										
18 1960-1959..... number of projects...	1	...	1	...	...	...	5	1	...	3
19 acres served ² ...	2,589	...	764	...	...	...	5,110	500	...	5,047
20 Prior to 1950..... number of projects...	5	7	7	2	5	3	3	6	13	20
21 acres served ² ...	10,073	20,836	27,244	17,718	88,095	27,737	23,173	18,518	349,652	511,103
DRAINAGE OPERATIONS, 1950-1959 ³										
22 Cost of drainage works and services..... projects reporting...	5	4	8	...	...	...	8	3	13	20
23 dollars...	43,323	73,100	179,960	...	...	...	273,020	4,200	299,289	1,918,807
24 New drainage works constructed, enlarged, or installed..... projects reporting...	2	1	1	...	...	...	4	(⁴)	1	3
25 dollars...	35,579	1,873	14,478	...	...	...	31,500	(⁴)	3,600	16,520
26 Open ditches..... projects reporting...	1	...	1	...	...	...	4	(⁴)	1	3
27 length, miles...	3.4	...	11.8	...	...	...	23.5	(⁴)	0.7	13.0
28 Tile or covered drains..... projects reporting...	...	1	...	...	...	...	2	...	...	2
29 length, miles...	...	0.1	...	...	...	...	5.1	...	...	0.2
30 Levees or dikes..... projects reporting...	2	...	...	...	...	...	...	(⁴)	...	...
31 length, miles...	10.4	...	...	...	...	...	...	(⁴)	...	...
32 Pumps..... projects reporting...	...	...	...	...	...	...	...	...	...	...
33 number of pumps...	...	...	...	...	...	...	...	...	...	...
34 Other (see text)..... projects reporting...	...	1	...	...	...	...	...	...	...	...
35 Cost of maintenance, operation, repair, and administration..... projects reporting...	5	4	7	...	...	...	6	2	13	17
36 dollars...	7,744	71,227	165,482	...	...	...	241,520	200	295,689	1,902,287

¹Land served by two or more projects counted only once.
²Acres served by two projects are included for each project. See text.
³Includes projects taken over by another project prior to 1960. See text.
⁴Included in State total only.

DRAINAGE OF AGRICULTURAL LANDS

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	Nodaway	Osage	Pemiscot	Perry	Pettis	Pike	Platte	Putnam	Ray	Ripley
AREA										
1 Approximate land area.....acres 1960...	561,280	384,640	312,320	304,640	434,560	435,840	268,800	331,520	367,360	408,960
2 Land in farms.....acres 1959...	544,796	331,842	289,786	255,426	403,797	371,254	219,789	297,327	314,601	162,578
3 Drainage projects..... number 1960...	16	2	47	1	...	4	2	3	10	3
4 1950...	15	2	14	1	1	4	2	3	7	3
5 Total area in drainage projects ¹ acres served 1960...	51,682	1,701	275,790	18,480	...	16,912	7,329	1,700	32,183	22,359
6 1950...	50,763	1,701	274,090	18,480	2,000	16,912	7,638	1,700	24,598	22,359
7 Area not used for agriculture or not drained..... acres served 1960...	...	...	...	...	...	...	...	...	...	...
8 Net area drained and used for agriculture..... acres served 1960...	51,682	1,701	275,790	18,480	...	16,912	7,329	1,700	32,183	22,359
9 Drainage established before 1950..... acres served 1960...	50,682	1,701	274,090	18,480	...	16,912	7,329	1,700	25,814	22,359
10 Area added, 1950-1959..... acres served 1960...	1,000	...	1,700	...	...	...	...	...	6,369	...
11 Area served by two or more projects..... acres served 1960...	...	...	43,322	...	...	...	...	...	...	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION										
12 Drains owned by one landowner..... number of projects...	...	...	25	...	...	1	...	...	...	...
13 acres served ²..	...	...	15,380	...	...	1,050	...	...	...	...
14 Cooperative or mutual drains..... number of projects...	1	...	8	...	...	1	...	...	...	...
15 acres served ² ..	1,000	...	4,850	...	...	2,290	...	...	...	...
16 Legally organized public drains..... number of projects...	15	2	14	1	...	2	2	3	10	3
17 acres served ² ..	50,682	1,701	301,802	18,480	...	13,572	7,329	1,700	32,183	22,359
PROJECTS, 1960, BY YEAR STARTED										
18 1950-1959..... number of projects...	1	...	32	...	...	...	...	...	2	...
19 acres served ² ..	1,000	...	19,730	...	...	...	...	...	6,369	...
20 Prior to 1950..... number of projects...	15	2	15	1	...	4	2	3	8	3
21 acres served ² ..	50,682	1,701	302,302	18,480	...	16,912	7,329	1,700	25,814	22,359
DRAINAGE OPERATIONS, 1950-1959 ³										
22 Cost of drainage works and services.....projects reporting...	3	1	45	1	...	4	2	1	8	...
23 dollars...	11,250	7,081	2,177,652	18,416	...	91,600	44,300	3,500	229,986	...
24 New drainage works constructed, enlarged, or installed.....projects reporting...	(4)	...	32	...	...	...	...	...	2	...
25 dollars...	(4)	...	55,212	...	...	...	...	...	115,230	...
26 Open ditches.....projects reporting...	(4)	...	32	...	...	...	...	...	2	...
27 length, miles...	(4)	...	45.8	...	...	...	...	...	7.4	...
28 Tile or covered drains.....projects reporting...	(4)	...	15	...	...	...	...	...	...	...
29 length, miles...	(4)	...	1.5	...	...	...	...	...	...	...
30 Levees or dikes.....projects reporting...	(4)	...	...	...	...	...	...	...	2	...
31 length, miles...	(4)	...	...	...	...	...	...	...	4.9	...
32 Pumps.....projects reporting...	...	...	...	...	...	...	...	...	...	...
33 number of pumps...	...	...	...	...	...	...	...	...	...	...
34 Other (see text).....projects reporting...	...	...	...	...	...	...	...	...	1	...
35 Cost of maintenance, operation, repair, and administration.....projects reporting...	3	1	23	1	...	4	2	1	7	...
36 dollars...	3,750	7,081	2,122,440	18,416	...	91,600	44,300	3,500	114,756	...

¹Land served by two or more projects counted only once.²Acres served by two projects are included for each project. See text.³Includes projects taken over by another project prior to 1960. See text.⁴Included in State total only.

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	St. Charles	St. Louis	Saline	Schuyler	Scotland	Scott	Shelby	Stoddard	Sullivan	Worth
AREA										
1 Approximate land area.....acres 1960...	359,040	318,080	485,760	195,840	282,240	267,520	321,280	535,680	418,560	170,880
2 Land in farms.....acres 1959...	271,667	118,096	442,953	173,234	255,948	247,760	297,780	417,967	391,558	159,234
3 Drainage projects..... number 1960...	11	2	7	4	8	12	5	44	2	4
4 1950...	7	3	11	4	9	12	3	29	2	2
5 Total area in drainage projects ¹ acres served 1960...	26,888	2,967	29,250	9,125	21,330	151,025	11,382	339,066	11,282	13,302
6 1950...	25,588	11,933	45,073	9,125	21,330	151,368	9,632	335,641	11,282	12,526
7 Area not used for agriculture or not drained..... acres served 1960...	...	...	...	...	...	...	...	5,000	...	...
8 Net area drained and used for agriculture..... acres served 1960...	26,888	2,967	29,250	9,125	21,330	151,025	11,382	334,066	11,282	13,302
9 Drainage established before 1950..... acres served 1960...	25,588	1,967	29,250	9,125	21,330	150,768	9,632	331,326	11,282	13,302
10 Area added, 1950-1959..... acres served 1960...	1,300	1,000	...	...	...	257	1,750	2,740	...	...
11 Area served by two or more projects..... acres served 1960...	1,300	...	520	...	...	14,158	2,350	31,754	...	550
PROJECTS, 1960, BY TYPE OF ORGANIZATION										
12 Drains owned by one landowner..... number of projects...	1	...	...	...	...	...	1	13	...	...
13 acres served ² ...	500	...	...	...	...	...	600	12,740	...	...
14 Cooperative or mutual drains..... number of projects...	3	1	...	...	...	...	1	4	...	1
15 acres served ² ...	2,100	1,000	...	...	...	...	1,750	5,762	...	550
16 Legally organized public drains..... number of projects...	7	1	7	4	8	12	3	27	2	3
17 acres served ² ...	25,588	1,967	29,770	9,125	21,330	165,183	11,382	349,018	11,282	13,302
PROJECTS, 1960, BY YEAR STARTED										
18 1960-1959..... number of projects...	4	1	...	...	...	...	2	16	...	1
19 acres served ² ...	2,600	1,000	...	...	...	...	2,350	17,040	...	550
20 Prior to 1960..... number of projects...	7	1	7	4	8	12	3	28	2	3
21 acres served ² ...	25,588	1,967	29,770	9,125	21,330	165,183	11,382	350,480	11,282	13,302
DRAINAGE OPERATIONS, 1950-1959 ³										
22 Cost of drainage works and services.....projects reporting...	8	1	6	1	...	12	5	35	...	1
23 dollars...	52,771	12,125	128,600	9,000	...	505,378	33,400	1,474,494	...	4,500
24 New drainage works constructed, enlarged, or installed.....projects reporting...	4	1	1	...	...	1	3	15	...	1
25 dollars...	16,055	12,125	15,635	...	...	2,179	30,300	60,624	...	2,000
26 Open ditches.....projects reporting...	4	1	...	...	...	1	3	15	...	1
27 length, miles...	5.9	3.6	...	...	...	0.5	5.5	50.0	...	2.0
28 Tile or covered drains.....projects reporting...	1	1	...	...	...	...	...	...	...	...
29 length, miles...	0.1	0.1	...	...	...	...	...	...	...	...
30 Levees or dikes.....projects reporting...	...	1	1	...	...	...	...	...	...	...
31 length, miles...	...	3.6	2.2	...	...	...	...	...	...	...
32 Pumps.....projects reporting...	...	...	...	...	...	...	...	...	...	...
33 number of pumps...	...	...	...	...	...	...	...	...	...	...
34 Other (see text).....projects reporting...	...	1	1	...	...	...	...	...	...	...
35 Cost of maintenance, operation, repair, and administration.....projects reporting...	4	...	6	1	...	12	3	22	...	1
36 dollars...	36,656	...	112,965	9,000	...	503,199	3,100	1,413,870	...	2,500

¹Land served by two or more projects counted only once.

²Acres served by two projects are included for each project. See text.

³Includes projects taken over by another project prior to 1960. See text.

State Table 1.—DRAINAGE PROJECTS—NUMBER, AREA, COST, AND WORKS, 1920 TO 1960

[See text for comparability of data.]

Item	1960 Census	1950 Census	1940 Census	1930 Census	1920 Census
AREA					
Approximate land area.....acres...	93,271,040	93,361,920	93,642,240	93,523,840	93,523,840
Land in farms.....acres...	64,081,391	59,247,434	46,451,594	44,659,152	35,070,656
Drainage projects.....number...	20	404	34	NA	NA
Total area in drainage projects.....acres served...	62,222	289,189	372,661	167,629	168,682
Area not used for agriculture or not drained.....acres served...	2,110	NA	NA	NA	NA
Net area drained and used for agriculture.....acres served...	60,112	NA	¹ 362,711	¹ 150,844	NA
Drainage established 10 years or more before Census date.....acres served...	49,656	NA	NA	NA	NA
Drainage established within 10 years of Census date.....acres served...	10,456	NA	NA	NA	NA
Area served by two or more projects.....acres served...	...	3,336	1,528	...	...
PROJECTS BY TYPE OF ORGANIZATION					
Drains owned by one landowner.....number of projects...	1	² 2	NA	NA	NA
acres served...	640	² 3,260	² 7,000	² 8,100	² 13,650
Cooperative or mutual drains.....number of projects...	6	² 3	...	...	...
acres served...	4,685	² 2,260	...	...	...
Legally organized public drains.....number of projects...	13	² 22	NA	NA	NA
acres served...	54,787	² 94,172	² 53,418	² 39,984	² 129,432
PROJECTS BY YEAR STARTED					
Started 10 years or more before Census date.....number of projects...	11	² 21	NA	NA	NA
acres served...	51,265	² 84,354	355,489	34,408	³ 21,533
Started within 10 years of Census date.....number of projects...	9	² 6	NA	NA	NA
acres served...	8,847	² 15,338	17,172	133,221	³ 134,499
OPERATIONS, 10-YEAR PERIOD PRECEDING CENSUS DATE					
Cost of drainage works and services.....projects reporting...	18	² 25	NA	NA	NA
dollars...	721,491	462,260	NA	NA	NA
New drainage works constructed, enlarged, or installed.....projects reporting...	11	⁴ 9	NA	NA	NA
cost, dollars...	211,129	⁴ 167,830	NA	NA	NA
Open ditches.....projects reporting...	10	8	NA	NA	NA
length, miles...	43.0	40	NA	NA	NA
Tile or covered drains.....projects reporting...	1	2	NA	NA	NA
length, miles...	2.2	2	NA	NA	NA
Levees or dikes.....projects reporting...	...	...	NA	NA	NA
length, miles...	...	...	NA	NA	NA
Pumps.....projects reporting...	...	NA	NA	NA	NA
number of pumps...	...	NA	NA	NA	NA
Other (see text).....projects reporting...	1	NA	NA	NA	NA
Cost of maintenance, operation, repair, and administration.....projects reporting...	10	NA	NA	NA	NA
dollars...	510,362	294,430	NA	NA	NA
STATUS ON CENSUS DATE					
Capital investment.....dollars...	NA	NA	2,827,839	1,879,296	664,990
Physical works:					
Open ditches.....length, miles...	NA	NA	420.9	284.2	102.1
Tile drains.....length, miles...	NA	NA	73.8	76.7	50.7
Levees and dikes.....length, miles...	NA	NA	0.8	...	...
Pumping units.....number of units...	NA	(²)	...	...	...

NA Not available.

¹Not fully comparable. See text.²1950 figures exclude 377 projects and 189,497 acres in "irrigation enterprises"; 1940 figures exclude 312,243 acres in "irrigation enterprises"; 1930 figures exclude 119,545 acres in "irrigation enterprises"; 1920 figures exclude 25,600 acres in "irrigation enterprises."³1920 figures exclude 12,650 acres for which date of organization was not reported.⁴Cost of new works for lands not previously drained.

DRAINAGE OF AGRICULTURAL LANDS

State Table 2.—DRAINAGE

Size of project (Based on area of agricultural land in project)	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
		Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
				Projects reporting	Acres	Projects reporting	Acres
1 All projects.....	20	60,112	...	11	49,656	10	10,456
2 500 to 999 acres.....	11	9,051	...	4	3,854	7	5,197
3 1,000 to 1,999 acres.....	4	4,921	...	3	3,921	1	1,000
4 2,000 to 4,999 acres.....	3	10,670	...	2	8,020	1	2,650
5 5,000 to 9,999 acres.....	...	...	...	...	...	...	...
6 10,000 to 19,999 acres.....	1	12,580	...	1	10,971	1	1,609
7 20,000 to 49,999 acres.....	1	22,890	...	1	22,890	...	...
8 50,000 to 99,999 acres.....	...	...	...	...	...	...	...
9 100,000 or more acres.....	...	...	...	...	...	...	...

State Table 3.—DRAINAGE PROJECTS, 1960,

Type of organization	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
		Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
				Projects reporting	Acres	Projects reporting	Acres
1 All projects.....	20	60,112	...	11	49,656	10	10,456
2 Drains owned by one landowner.....	1	640	...	...	...	1	640
3 Cooperative or mutual drains.....	6	4,685	...	2	1,760	4	2,925
4 Legally organized public drains.....	13	54,787	...	9	47,896	5	6,891

State Table 4.—DRAINAGE PROJECTS, 1960,

Year of organization	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
		Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
				Projects reporting	Acres	Projects reporting	Acres
1 All projects.....	20	60,112	...	11	49,656	10	10,456
2 1950-1959.....	9	8,847	...	...	...	9	8,847
3 Prior to 1950.....	11	51,265	...	11	49,656	1	1,609

PROJECTS, 1960, BY SIZE

Cost of drainage works and services, 1950-1959				New works constructed, enlarged, or installed, 1950-1959									
Total		For new works		Open ditches		Tile or covered drains		Levees and dikes		Pumps		Other, projects reporting	
Projects reporting	Dollars	Projects reporting	Dollars	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Number		
18	721,491	11	211,129	10	43.0	1	2.2	...	...	...	...	1	1
10	212,412	7	131,326	6	17.3	1	2.2	...	...	...	...	1	2
3	35,885	1	25,000	1	3.9	...	...	...	...	...	...	...	3
3	64,107	1	32,303	1	11.9	...	...	...	...	...	...	...	4
...	...	...	...	...	...	...	...	...	...	...	...	...	5
1	34,087	1	12,500	1	4.9	...	...	...	...	...	...	...	6
1	375,000	1	10,000	1	5.0	...	...	...	...	...	...	...	7
...	...	...	...	...	...	...	...	...	...	...	...	...	8
...	...	...	...	...	...	...	...	...	...	...	...	...	9

BY TYPE OF ORGANIZATION

Cost of drainage works and services, 1950-1959				New works constructed, enlarged, or installed, 1950-1959									
Total		For new works		Open ditches		Tile or covered drains		Levees and dikes		Pumps		Other, projects reporting	
Projects reporting	Dollars	Projects reporting	Dollars	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Number		
18	721,491	11	211,129	10	43.0	1	2.2	...	...	...	...	1	1
1	6,000	1	6,000	1	1.9	...	...	...	...	...	...	...	2
4	67,373	3	42,873	3	9.4	...	...	...	...	...	...	1	3
13	648,118	7	162,256	6	31.7	1	2.2	...	...	...	...	...	4

BY YEAR OF ORGANIZATION

Cost of drainage works and services, 1950-1959				New works constructed, enlarged, or installed, 1950-1959									
Total		For new works		Open ditches		Tile or covered drains		Levees and dikes		Pumps		Other, projects reporting	
Projects reporting	Dollars	Projects reporting	Dollars	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Number		
18	721,491	11	211,129	10	43.0	1	2.2	...	...	...	...	1	1
9	161,587	8	137,087	8	33.1	...	...	...	...	...	...	1	2
9	559,904	3	74,042	2	9.9	1	2.2	...	...	...	...	...	3

DRAINAGE OF AGRICULTURAL LANDS

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	The State	Broadwater	Ouster	Flathead	Gallatin	Missoula	Powell
AREA							
1 Approximate land area.....acres 1960...	93,271,040	766,720	12,409,600	3,289,600	1,610,880	1,672,320	1,495,680
2 Land in farms.....acres 1959...	64,081,391	463,977	12,414,699	507,227	990,321	373,333	804,356
3 Drainage projects..... number 1960...	20	1	1	1	1	1	1
4 1950...	404	5	5	8	11	6	29
5 Total area in drainage projects ² acres served 1960...	62,222	1,060	1,440	600	700	900	640
6 1950...	289,189	1,546	5,765	3,599	10,235	322	1,335
7 Area not used for agriculture or not drained..... acres served 1960...	2,110	...	760	...	...	...	...
8 Net area drained and used for agriculture..... acres served 1960...	60,112	1,060	680	600	700	900	640
9 Drainage established before 1950..... acres served 1960...	49,656	1,060	...	...	700	...	...
10 Area added, 1950-1959..... acres served 1960...	10,456	...	680	600	...	900	640
11 Area served by two or more projects..... acres served 1960...	...	...	...	...	...	...	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION							
12 Drains owned by one landowner..... number of projects...	1	...	...	...	...	...	1
13 acres served ³ ..	640	...	...	...	...	...	640
14 Cooperative or mutual drains..... number of projects...	6	1	1	1	1	1	...
15 acres served ³ ..	4,685	1,060	680	600	700	900	...
16 Legally organized public drains..... number of projects...	13	...	...	...	...	...	...
17 acres served ³ ..	54,787	...	...	...	...	...	...
PROJECTS, 1960, BY YEAR STARTED							
18 1950-1959..... number of projects...	9	...	1	1	...	1	1
19 acres served ³ ..	8,847	...	680	600	...	900	640
20 Prior to 1950..... number of projects...	11	1	...	...	1	...	...
21 acres served ³ ..	51,265	1,060	...	...	700	...	...
DRAINAGE OPERATIONS, 1950-1959 ⁴							
22 Cost of drainage works and services.....projects reporting...	18	...	1	1	...	1	1
23 dollars...	721,491	...	35,000	24,500	...	4,044	6,000
24 New drainage works constructed, enlarged, or installed.....projects reporting...	11	...	1	...	...	1	1
25 dollars...	211,129	...	35,000	...	...	4,044	6,000
26 Open ditches.....projects reporting...	10	...	1	...	...	1	1
27 length, miles...	43.0	...	6.1	...	...	2.1	1.9
28 Tile or covered drains.....projects reporting...	1	...	...	...	...	...	...
29 length, miles...	2.2	...	...	...	...	...	...
30 Levees or dikes.....projects reporting...	...	...	...	...	...	...	...
31 length, miles...	...	...	...	...	...	...	...
32 Pumps.....projects reporting...	...	...	...	...	...	...	...
33 number of pumps...	...	...	...	...	...	...	...
34 Other (see text).....projects reporting...	1	...	...	...	...	...	...
35 Cost of maintenance, operation, repair, and administration.....projects reporting...	10	...	...	1	...	...	...
36 dollars...	510,362	...	...	24,500	...	...	...

¹The excess of farm acreage over approximate land area is due to the fact that the entire acreage of a farm is tabulated as in the county in which the headquarters is located, even though a part of the farm may be situated in an adjoining county.

²Land served by two or more projects counted only once.

³Acres served by two projects are included for each project. See text.

⁴Includes projects taken over by another project prior to 1960. See text.

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	Ravalli	Richland	Roosevelt	Sweet Grass	Treasure	Valley	Yellowstone	All other counties ¹
AREA								
1 Approximate land area.....acres 1960...	1,525,760	1,321,600	1,526,400	1,181,440	629,760	3,175,040	² 1,686,400	47,386,880
2 Land in farms.....acres 1959...	378,523	1,220,742	1,297,937	873,413	567,962	2,293,143	² 1,778,452	31,631,018
3 Drainage projects..... number 1960...	1	1	1	1	3	2	6	...
4 1950...	67	3	6	3	4	10	39	216
5 Total area in drainage projects ³ acres served 1960...	4,880	700	3,145	745	4,582	33,075	9,755	...
6 1950...	15,430	5,429	2,078	145	2,871	28,230	73,383	138,821
7 Area not used for agriculture or not drained..... acres served 1960...	...	...	...	...	...	750	600	...
8 Net area drained and used for agriculture..... acres served 1960...	4,880	700	3,145	745	4,582	32,325	9,155	...
9 Drainage established before 1950..... acres served 1960...	4,880	...	2,743	...	...	31,118	9,155	...
10 Area added, 1950-1959..... acres served 1960...	...	700	402	745	4,582	1,207	...	...
11 Area served by two or more projects..... acres served 1960...	...	...	...	...	...	...	...	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION								
12 Drains owned by one landowner..... number of projects...	...	...	...	...	...	...	...	...
13 acres served ⁴..	...	...	...	...	...	...	...	...
14 Cooperative or mutual drains..... number of projects...	...	...	...	1	...	...	...	...
15 acres served ⁴..	...	...	...	745	...	...	...	...
16 Legally organized public drains..... number of projects...	1	1	1	...	3	2	6	...
17 acres served ⁴ ..	4,880	700	3,145	...	4,582	32,325	9,155	...
PROJECTS, 1960, BY YEAR STARTED								
18 1950-1959..... number of projects...	...	1	...	1	3	...	...	...
19 acres served ⁴..	...	700	...	745	4,582	...	...	...
20 Prior to 1950..... number of projects...	1	...	1	...	...	2	6	...
21 acres served ⁴ ..	4,880	...	3,145	...	...	32,325	9,155	...
DRAINAGE OPERATIONS, 1950-1959⁵								
22 Cost of drainage works and services.....projects reporting...	1	1	1	1	3	2	6	...
23 dollars...	13,549	19,911	8,522	3,829	68,303	400,565	137,268	...
24 New drainage works constructed, enlarged, of installed.....projects reporting...	...	1	1	1	3	2	1	...
25 dollars...	...	19,911	3,125	3,829	68,303	19,375	51,542	...
26 Open ditches.....projects reporting...	...	1	1	1	3	2	...	...
27 length, miles...	...	2.2	1.2	1.2	19.6	8.7	...	...
28 Tile or covered drains.....projects reporting...	...	...	...	...	...	...	1	...
29 length, miles...	...	...	...	...	...	...	2.2	...
30 Levees or dikes.....projects reporting...	...	...	...	...	...	...	...	...
31 length, miles...	...	...	...	...	...	...	...	...
32 Pumps.....projects reporting...	...	...	...	...	...	...	...	...
33 number of pumps...	...	...	...	...	...	...	...	...
34 Other (see text).....projects reporting...	...	...	...	1	...	...	...	...
35 Cost of maintenance, operation, repair, and administration.....projects reporting...	1	...	1	...	...	2	6	...
36 dollars...	13,549	...	5,397	...	...	381,190	85,726	...

¹Includes Beaverhead, Big Horn, Blaine, Carbon, Cascade, Dawson, Garfield, Golden Valley, Granite, Hill, Jefferson, Lake, Lewis and Clark, Lincoln, Madison, Meagher, Musselshell, Park, Petroleum, Phillips, Rosebud, Sanders, Silver Bow, Stillwater, Teton, and Wheatland counties.

²The excess of farm acreage over approximate land area is due to the fact that the entire acreage of a farm is tabulated as in the county in which the headquarters is located, even though a part of the farm may be situated in an adjoining county.

³Land served by two or more projects counted only once.

⁴Acrees served by two projects are included for each project. See text.

⁵Includes projects taken over by another project prior to 1960. See text.

State Table 1.—DRAINAGE PROJECTS—NUMBER, AREA, COST, AND WORKS, 1920 TO 1960

[See text for comparability of data.]

Item	1960 Census	1950 Census	1940 Census	1930 Census	1920 Census
AREA					
Approximate land area.....acres...	49,031,680	49,064,320	49,057,920	49,157,120	49,157,120
Land in farms.....acres...	47,755,708	47,466,828	47,343,981	44,708,565	42,225,475
Drainage projects.....number...	103	473	125	NA	NA
Total area in drainage projects.....acres served...	744,207	821,088	916,181	879,459	607,730
Area not used for agriculture or not drained.....acres served...	4,987	NA	NA	NA	NA
Net area drained and used for agriculture.....acres served...	739,220	NA	¹ 849,948	¹ 864,159	NA
Drainage established 10 years or more before Census date.....acres served...	697,914	NA	NA	NA	NA
Drainage established within 10 years of Census date.....acres served...	41,306	NA	NA	NA	NA
Area served by two or more projects.....acres served...	1,784	157,413	89,360	14,440	100,720
PROJECTS BY TYPE OF ORGANIZATION					
Drains owned by one landowner.....number of projects...	...	(²)	NA	NA	NA
.....acres served...	...	(²)	(²)	² 3,080	² 7,270
Cooperative or mutual drains.....number of projects...	4	² 5	...	...	...
.....acres served...	6,940	² 3,970	...	...	...
Legally organized public drains.....number of projects...	99	² 149	NA	NA	NA
.....acres served...	734,064	² 713,821	² 721,986	² 696,994	² 591,772
PROJECTS BY YEAR STARTED					
Started 10 years or more before Census date.....number of projects...	99	² 129	NA	NA	NA
.....acres served...	707,704	² 657,729	884,937	753,071	423,023
Started within 10 years of Census date.....number of projects...	4	² 25	NA	NA	NA
.....acres served...	33,300	² 60,062	³ 1,244	126,388	184,707
OPERATIONS, 10-YEAR PERIOD PRECEDING CENSUS DATE					
Cost of drainage works and services.....projects reporting...	40	² 75	NA	NA	NA
.....dollars...	1,388,581	1,533,019	NA	NA	NA
New drainage works constructed, enlarged, or installed.....projects reporting...	12	³ 27	NA	NA	NA
.....cost, dollars...	417,911	³ 757,990	NA	NA	NA
Open ditches.....projects reporting...	10	28	NA	NA	NA
.....length, miles...	60.6	167	NA	NA	NA
Tile or covered drains.....projects reporting...	...	1	NA	NA	NA
.....length, miles...	...	1	NA	NA	NA
Levees or dikes.....projects reporting...	...	1	NA	NA	NA
.....length, miles...	...	1	NA	NA	NA
Pumps.....projects reporting...	...	NA	NA	NA	NA
.....number of pumps...	...	NA	NA	NA	NA
Other (see text).....projects reporting...	4	NA	NA	NA	NA
Cost of maintenance, operation, repair, and administration.....projects reporting...	36	NA	NA	NA	NA
.....dollars...	970,670	775,029	NA	NA	NA
STATUS ON CENSUS DATE					
Capital investment.....dollars...	NA	NA	7,578,999	6,847,070	4,588,578
Physical works:					
Open ditches.....length, miles...	NA	NA	1,406.7	1,202.3	734.5
Tile drains.....length, miles...	NA	NA	26.3	93.4	³ 99.4
Levees and dikes.....length, miles...	NA	NA	230.3	116.8	26.8
Pumping units.....number of units...	NA	(²)	3	3	...

NA Not available.

¹Not fully comparable. See text.

²1950 figures exclude 319 projects and 103,297 acres in "irrigation enterprises"; 1940 figures exclude 194,195 acres in "irrigation enterprises"; 1930 figures exclude 179,385 acres in "irrigation enterprises"; 1920 figures exclude 8,688 acres in "irrigation enterprises."

³Cost of new works for lands not previously drained.

DRAINAGE OF AGRICULTURAL LANDS

State Table 2.—DRAINAGE

	Size of project (Based on area of agricultural land in project)	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	103	741,004	3,568	102	699,698	9	41,306
2	500 to 999 acres.....	14	9,684	...	14	9,684	...	...
3	1,000 to 1,999 acres.....	18	27,781	1,464	18	27,781	...	...
4	2,000 to 4,999 acres.....	28	89,673	640	28	89,313	1	360
5	5,000 to 9,999 acres.....	26	187,135	...	25	159,565	6	27,570
6	10,000 to 19,999 acres.....	12	163,857	1,464	12	154,281	1	9,576
7	20,000 to 49,999 acres.....	3	95,508	...	3	95,508	...	...
8	50,000 to 99,999 acres.....	2	167,366	...	2	163,566	1	3,800
9	100,000 or more acres.....	...	...	...	...	...	...	...

State Table 3.—DRAINAGE PROJECTS, 1960,

	Type of organization	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	103	741,004	3,568	102	699,698	9	41,306
2	Drains owned by one landowner.....	...	...	...	...	...	...	...
3	Cooperative or mutual drains.....	4	6,940	...	4	6,940	...	...
4	Legally organized public drains.....	99	734,064	3,568	98	692,758	9	41,306

State Table 4.—DRAINAGE PROJECTS, 1960,

	Year of organization	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	103	741,004	3,568	102	699,698	9	41,306
2	1950-1959.....	4	33,300	1,064	3	3,604	4	29,696
3	Prior to 1950.....	99	707,704	2,504	99	696,094	5	11,610

DRAINAGE OF AGRICULTURAL LANDS

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	The State	Antelope	Buffalo	Burt	Butler	Cass	Cedar	Cherry
AREA								
1 Approximate land area.....acres 1960...	49,031,680	545,920	609,280	309,760	372,480	354,560	475,520	3,828,480
2 Land in farms.....acres 1959...	47,755,708	533,929	602,435	300,066	363,397	327,920	462,005	3,689,084
3 Drainage projects..... number 1960...	103	1	3	5	4	1	3	5
4 1950...	473	3	43	6	9	1	3	4
5 Total area in drainage projects ¹ acres served 1960...	744,207	1,760	2,460	75,120	21,674	4,720	6,572	49,320
6 1950...	821,088	1,793	5,558	72,520	19,734	1,580	6,572	28,229
7 Area not used for agriculture or not drained..... acres served 1960...	4,987	...	...	...	...	...	...	...
8 Net area drained and used for agriculture..... acres served 1960...	739,220	1,760	2,460	75,120	21,674	4,720	6,572	49,320
9 Drainage established before 1950..... acres served 1960...	697,914	1,760	2,460	75,120	19,394	4,720	6,572	49,320
10 Area added, 1950-1959..... acres served 1960...	41,306	...	...	...	2,280	...	...	...
11 Area served by two or more projects..... acres served 1960...	1,784	...	...	...	320	...	...	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION								
12 Drains owned by one landowner..... number of projects...	...	...	...	...	...	...	...	...
13 acres served ²...	...	...	...	...	...	...	...	...
14 Cooperative or mutual drains..... number of projects...	4	...	3	...	...	...	...	1
15 acres served ² ...	6,940	...	2,460	...	...	...	...	4,480
16 Legally organized public drains..... number of projects...	99	1	...	5	4	1	3	4
17 acres served ² ...	734,064	1,760	...	75,120	21,994	4,720	6,572	44,840
PROJECTS, 1960, BY YEAR STARTED								
18 1960-1959..... number of projects...	4	...	...	...	...	...	...	...
19 acres served ² ...	33,300	...	...	...	...	...	...	...
20 Prior to 1960..... number of projects...	99	1	3	5	4	1	3	5
21 acres served ² ...	707,704	1,760	2,460	75,120	21,994	4,720	6,572	49,320
DRAINAGE OPERATIONS, 1960-1959 ³								
22 Cost of drainage works and services..... projects reporting...	40	...	...	1	3	...	...	...
23 dollars...	1,388,581	...	...	294,496	26,516	...	...	...
24 New drainage works constructed, enlarged, or installed..... projects reporting...	12	...	...	...	1	...	...	...
25 dollars...	417,911	...	...	...	2,973	...	...	...
26 Open ditches..... projects reporting...	10	...	...	...	1	...	...	...
27 length, miles...	60.6	...	...	...	3.0	...	...	...
28 Tile or covered drains..... projects reporting...	...	...	...	...	...	...	...	...
29 length, miles...	...	...	...	...	...	...	...	...
30 Levees or dikes..... projects reporting...	...	...	...	...	...	...	...	...
31 length, miles...	...	...	...	...	...	...	...	...
32 Pumps..... projects reporting...	...	...	...	...	...	...	...	...
33 number of pumps...	...	...	...	...	...	...	...	...
34 Other (see text)..... projects reporting...	4	...	...	...	1	...	...	...
35 Cost of maintenance, operation, repair, and administration..... projects reporting...	36	...	...	1	3	...	...	...
36 dollars...	970,670	...	...	294,496	23,543	...	...	...

¹Land served by two or more projects counted only once.
²Acres served by two projects are included for each project. See text.
³Includes projects taken over by another project prior to 1960. See text.

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1960 data.]

Item and Census year	Colfax	Cuming	Dakota	Dawson	Dixon	Dodge	Douglas	Fillmore
AREA								
1 Approximate land area.....acres 1960...	259,200	365,440	163,200	¹ 626,560	307,200	338,560	213,120	369,280
2 Land in farms.....acres 1959...	250,469	360,331	154,945	¹ 676,505	284,347	326,619	154,657	356,024
3 Drainage projects..... number 1960...	2	6	2	1	4	2	3	3
4 1950...	11	6	2	45	4	36	6	6
5 Total area in drainage projects ² acres served 1960...	41,317	34,646	12,290	6,216	14,760	97,870	40,720	9,580
6 1950...	38,423	18,906	12,290	26,574	14,760	88,922	59,281	9,679
7 Area not used for agriculture or not drained..... acres served 1960...	...	...	...	...	...	...	3,267	...
8 Net area drained and used for agriculture..... acres served 1960...	41,317	34,646	12,290	6,216	14,760	97,870	37,453	9,580
9 Drainage established before 1950..... acres served 1960...	41,317	19,826	12,290	6,216	14,760	94,070	37,453	9,580
10 Area added, 1950-1959..... acres served 1960...	...	14,820	...	...	...	3,800	...	...
11 Area served by two or more projects..... acres served 1960...	...	...	400	...	...	...	...	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION								
12 Drains owned by one landowner..... number of projects...	...	...	...	...	...	...	...	...
13 acres served ³...	...	...	...	...	...	...	...	...
14 Cooperative or mutual drains..... number of projects...	...	...	...	...	...	...	...	...
15 acres served ³...	...	...	...	...	...	...	...	...
16 Legally organized public drains..... number of projects...	2	6	2	1	4	2	3	3
17 acres served ³ ...	41,317	34,646	12,690	6,216	14,760	97,870	37,453	9,580
PROJECTS, 1960, BY YEAR STARTED								
18 1960-1950..... number of projects...	...	3	...	...	...	...	...	...
19 acres served ³...	...	17,200	...	...	...	...	...	...
20 Prior to 1950..... number of projects...	2	3	2	1	4	2	3	3
21 acres served ³ ...	41,317	17,446	12,690	6,216	14,760	97,870	37,453	9,580
DRAINAGE OPERATIONS, 1950-1959 ⁴								
22 Cost of drainage works and services.....projects reporting...	2	4	2	1	...	1	...	...
23 dollars...	4,311	105,198	188,530	11,117	...	88,632	...	...
24 New drainage works constructed, enlarged, or installed.....projects reporting...	...	3	...	...	...	1	...	...
25 dollars...	...	58,716	...	...	...	87,900	...	...
26 Open ditches.....projects reporting...	...	3	...	...	...	1	...	...
27 length, miles...	...	18.8	...	...	...	14.3	...	...
28 Tile or covered drains.....projects reporting...	...	...	...	...	...	...	...	...
29 length, miles...	...	...	...	...	...	...	...	...
30 Levees or dikes.....projects reporting...	...	...	...	...	...	...	...	...
31 length, miles...	...	...	...	...	...	...	...	...
32 Pumps.....projects reporting...	...	...	...	...	...	...	...	...
33 number of pumps...	...	...	...	...	...	...	...	...
34 Other (see text).....projects reporting...	...	1	...	...	...	...	...	...
35 Cost of maintenance, operation, repair, and administration.....projects reporting...	2	3	2	1	...	1	...	...
36 dollars...	4,311	46,482	188,530	11,117	...	732	...	...

¹The excess of farm acreage over approximate land area is due to the fact that the entire acreage of a farm is tabulated as in the county in which the headquarters is located, even though part of the farm may be situated in an adjoining county.

²Land served by two or more projects counted only once.

³Acres served by two projects are included for each project. See text.

⁴Includes projects taken over by another project prior to 1960. See text.

DRAINAGE OF AGRICULTURAL LANDS

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	Franklin	Frontier	Hamilton	Johnson	Kearney	Lincoln	Merrick	Nemaha
AREA								
1 Approximate land area.....acres 1960...	369,920	618,240	346,240	241,280	1,327,680	1,614,720	298,880	255,360
2 Land in farms.....acres 1959...	350,288	600,753	341,412	224,475	1,329,813	1,571,031	288,375	252,095
3 Drainage projects..... number 1960...	1	1	1	1	1	4	2	2
4 1950...	2	1	8	1	9	23	14	2
5 Total area in drainage projects ² acres served 1960...	1,285	720	520	2,880	15,000	13,162	14,496	3,640
6 1950...	1,375	720	247	2,880	15,294	43,738	14,887	5,844
7 Area not used for agriculture or not drained..... acres served 1960...	...	...	...	...	...	...	...	...
8 Net area drained and used for agriculture..... acres served 1960...	1,285	720	520	2,880	15,000	13,162	14,496	3,640
9 Drainage established before 1950..... acres served 1960...	1,285	720	520	2,880	15,000	12,272	14,496	3,640
10 Area added, 1950-1959..... acres served 1960...	...	...	...	...	...	890	...	...
11 Area served by two or more projects..... acres served 1960...	...	...	...	...	...	...	...	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION								
12 Drains owned by one landowner..... number of projects...	...	...	...	...	...	...	...	...
13 acres served ³...	...	...	...	...	...	...	...	...
14 Cooperative or mutual drains..... number of projects...	...	...	...	...	...	...	...	...
15 acres served ³...	...	...	...	...	...	...	...	...
16 Legally organized public drains..... number of projects...	1	1	1	1	1	4	2	2
17 acres served ³ ...	1,285	720	520	2,880	15,000	13,162	14,496	3,640
PROJECTS, 1960, BY YEAR STARTED								
18 1960-1959..... number of projects...	...	...	...	...	...	...	...	...
19 acres served ³...	...	...	...	...	...	...	...	...
20 Prior to 1950..... number of projects...	1	1	1	1	1	4	2	2
21 acres served ³ ...	1,285	720	520	2,880	15,000	13,162	14,496	3,640
DRAINAGE OPERATIONS, 1950-1959 ⁴								
22 Cost of drainage works and services..... projects reporting...	...	...	1	1	1	3	1	2
23 dollars...	...	...	172	16,293	8,000	17,400	1,250	52,505
24 New drainage works constructed, enlarged, or installed..... projects reporting...	...	...	...	...	1	2	...	...
25 dollars...	...	...	...	...	7,500	13,800	...	...
26 Open ditches..... projects reporting...	...	...	...	...	1	2	...	...
27 length, miles...	...	...	...	...	1.8	3.0	...	...
28 Tile or covered drains..... projects reporting...	...	...	...	...	...	...	...	...
29 length, miles...	...	...	...	...	...	...	...	...
30 Levees or dikes..... projects reporting...	...	...	...	...	...	...	...	...
31 length, miles...	...	...	...	...	...	...	...	...
32 Pumps..... projects reporting...	...	...	...	...	...	...	...	...
33 number of pumps...	...	...	...	...	...	...	...	...
34 Other (see text)..... projects reporting...	...	...	...	...	...	...	...	...
35 Cost of maintenance, operation, repair, and administration..... projects reporting...	...	...	1	1	1	1	1	2
36 dollars...	...	...	172	16,293	500	3,600	1,250	52,505

¹The excess of farm acreage over approximate land area is due to the fact that the entire acreage of a farm is tabulated as in the county in which the headquarters is located, even though part of the farm may be situated in an adjoining county.

²Land served by two or more projects counted only once.

³Acres served by two projects are included for each project. See text.

⁴Includes projects taken over by another project prior to 1960. See text.

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	Otoe	Pawnee	Phelps	Platte	Polk	Richardson	Sarpy	Saunders
AREA								
1 Approximate land area.....acres 1960...	394,880	277,120	348,800	430,080	¹ 277,120	350,720	151,040	483,840
2 Land in farms.....acres 1959...	382,368	248,994	341,170	404,301	¹ 284,272	326,599	128,361	461,104
3 Drainage projects.....number 1960...	2	1	1	2	3	8	7	13
4 1950...	3	1	4	4	11	3	8	14
5 Total area in drainage projects ².....acres served 1960...	15,260	7,180	7,840	18,727	2,480	58,044	24,270	47,255
6 1950...	15,780	7,180	3,295	18,987	3,067	38,255	24,940	54,815
7 Area not used for agriculture or not drained.....acres served 1960...	...	...	...	...	...	...	1,720	...
8 Net area drained and used for agriculture.....acres served 1960...	15,260	7,180	7,840	18,727	2,480	58,044	22,550	47,255
9 Drainage established before 1950.....acres served 1960...	15,260	7,180	3,200	18,727	2,480	58,044	22,550	47,255
10 Area added, 1950-1959.....acres served 1960...	...	...	4,640	...	...	...	...	...
11 Area served by two or more projects.....acres served 1960...	...	...	...	...	...	...	...	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION								
12 Drains owned by one landowner.....number of projects...	...	...	...	...	...	...	...	...
13 acres served ³...	...	...	...	...	...	...	...	...
14 Cooperative or mutual drains.....number of projects...	...	...	...	...	...	...	...	...
15 acres served ³...	...	...	...	...	...	...	...	...
16 Legally organized public drains.....number of projects...	2	1	1	2	3	8	7	13
17 acres served ³ ...	15,260	7,180	7,840	18,727	2,480	58,044	22,550	47,255
PROJECTS, 1960, BY YEAR STARTED								
18 1950-1959.....number of projects...	...	...	...	...	...	...	...	...
19 acres served ³...	...	...	...	...	...	...	...	...
20 Prior to 1950.....number of projects...	2	1	1	2	3	8	7	13
21 acres served ³ ...	15,260	7,180	7,840	18,727	2,480	58,044	22,550	47,255
DRAINAGE OPERATIONS, 1950-1959 ⁴								
22 Cost of drainage works and services.....projects reporting...	2	...	1	2	...	2	3	3
23 dollars...	133,545	...	44,015	6,259	...	21,131	71,528	61,257
24 New drainage works constructed, enlarged, or installed.....projects reporting...	1	...	1	...	...	...	...	1
25 dollars...	65,603	...	44,015	...	...	...	...	10,000
26 Open ditches.....projects reporting...	1	...	1	...	...	...	...	...
27 length, miles...	1.0	...	8.5	...	...	...	...	...
28 Tile or covered drains.....projects reporting...	...	...	...	...	...	...	...	...
29 length, miles...	...	...	...	...	...	...	...	...
30 Levees or dikes.....projects reporting...	...	...	...	...	...	...	...	...
31 length, miles...	...	...	...	...	...	...	...	...
32 Pumps.....projects reporting...	...	...	...	...	...	...	...	...
33 number of pumps...	...	...	...	...	...	...	...	...
34 Other (see text).....projects reporting...	...	...	...	...	...	...	...	1
35 Cost of maintenance, operation, repair, and administration.....projects reporting...	2	...	...	2	...	2	3	3
36 dollars...	67,942	...	...	6,259	...	21,131	71,528	51,257

¹The excess of farm acreage over approximate land area is due to the fact that the entire acreage of a farm is tabulated as in the county in which the headquarters is located, even though part of the farm may be situated in an adjoining county.
²Land served by two or more projects counted only once.
³Acres served by two projects are included for each project. See text.
⁴Includes projects taken over by another project prior to 1960. See text.

DRAINAGE OF AGRICULTURAL LANDS

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	Scotts Bluff	Seward	Stanton	Thayer	Thurston	Washington	Wayne	York	All other counties ¹
AREA									
1 Approximate land area.....acres 1960...	2,464,640	366,080	275,840	369,280	248,320	247,680	283,520	369,280	12,503,040.
2 Land in farms.....acres 1959...	2,534,706	357,246	264,815	362,162	217,281	239,042	275,176	357,835	11,993,014
3 Drainage projects..... number 1960...	1	1	6	2	4	6	1	2	...
4 1950...	14	3	4	3	4	5	1	8	171
5 Total area in drainage projects ² acres served 1960...	11,233	2,300	18,920	4,520	15,740	35,120	1,560	3,030	...
6 1950...	90,539	2,390	6,184	4,580	15,740	23,940	1,560	3,145	16,885
7 Area not used for agriculture or not drained..... acres served 1960...	...	...	...	...	...	...	...	...	...
8 Net area drained and used for agriculture..... acres served 1960...	11,233	2,300	18,920	4,520	15,740	35,120	1,560	3,030	...
9 Drainage established before 1950..... acres served 1960...	11,233	2,300	10,544	4,520	15,740	28,620	1,560	3,030	...
10 Area added, 1950-1959..... acres served 1960...	...	...	8,376	...	...	6,500	...	...	...
11 Area served by two or more projects..... acres served 1960...	...	...	1,064	...	...	...	...	...	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION									
12 Drains owned by one landowner..... number of projects...	...	...	...	...	...	...	...	...	...
13 acres served ⁴...	...	...	...	...	...	...	...	...	...
14 Cooperative or mutual drains..... number of projects...	...	...	...	...	...	...	...	...	...
15 acres served ⁴...	...	...	...	...	...	...	...	...	...
16 Legally organized public drains..... number of projects...	1	1	6	2	4	6	1	2	...
17 acres served ⁴ ...	11,233	2,300	19,984	4,520	15,740	35,120	1,560	3,030	...
PROJECTS, 1960, BY YEAR STARTED									
18 1950-1959..... number of projects...	...	...	1	...	...	1	...	...	...
19 acres served ⁴...	...	...	9,600	...	...	6,500	...	...	...
20 Prior to 1960..... number of projects...	1	1	5	2	4	5	1	2	...
21 acres served ⁴ ...	11,233	2,300	10,384	4,520	15,740	28,620	1,560	3,030	...
DRAINAGE OPERATIONS, 1950-1959⁵									
22 Cost of drainage works and services.....projects reporting...	1	1	2	...	...	3	...	1	...
23 dollars...	7,638	117	115,266	...	...	111,205	...	2,200	...
24 New drainage works constructed, enlarged, or installed.....projects reporting...	...	...	1	...	...	1	...	...	...
25 dollars...	...	...	107,306	...	...	20,098	...	...	...
26 Open ditches.....projects reporting...	...	...	1	...	...	...	...	...	...
27 length, miles...	...	...	10.2	...	...	...	...	...	...
28 Tile or covered drains.....projects reporting...	...	...	...	...	...	...	...	...	...
29 length, miles...	...	...	...	...	...	...	...	...	...
30 Levees or dikes.....projects reporting...	...	...	...	...	...	...	...	...	...
31 length, miles...	...	...	...	...	...	...	...	...	...
32 Pumps.....projects reporting...	...	...	...	...	...	...	...	...	...
33 number of pumps...	...	...	...	...	...	...	...	...	...
34 Other (see text).....projects reporting...	...	...	...	...	...	1	...	...	...
35 Cost of maintenance, operation, repair, and administration.....projects reporting...	1	1	1	...	...	3	...	1	...
36 dollars...	7,638	117	7,960	...	...	91,107	...	2,200	...

¹Includes Adams, Boone, Box Butte, Clay, Custer, Dawes, Gage, Garden, Hall, Harlan, Howard, Keith, Kimball, Morrill, Nuckolls, Red Willow, Saline, Sherman, Sioux, and Valley counties.
²The excess of farm acreage over approximate land area is due to the fact that the entire acreage of a farm is tabulated as in the county in which the headquarters is located, even though part of the farm may be situated in an adjoining county.
³Land served by two or more projects counted only once.
⁴Acres served by two projects are included for each project. See text.
⁵Includes projects taken over by another project prior to 1960. See text.

State Table 1.—DRAINAGE PROJECTS—NUMBER, AREA, COST, AND WORKS, 1920 TO 1960

[See text for comparability of data]

Item	1960 Census	1950 Census	1940 Census	1930 Census	1920 Census
AREA					
Approximate land area.....acres...	70,264,320	70,264,960	70,273,280	70,285,440	70,285,440
Land in farms.....acres...	10,942,936	7,063,525	3,785,106	4,080,906	2,397,163
Drainage projects.....number...	2	82	8	NA	NA
Total area in drainage projects.....acres served...	41,521	251,154	153,373	162,980	15,940
Area not used for agriculture or not drained.....acres served...	...	NA	NA	NA	NA
Net area drained and used for agriculture.....acres served...	41,521	NA	¹ 148,617	¹ 155,491	NA
Drainage established 10 years or more before Census date.....acres served...	41,521	NA	NA	NA	NA
Drainage established within 10 years of Census date.....acres served...	...	NA	NA	NA	NA
Area served by two or more projects.....acres served...	...	...	...	...	...
PROJECTS BY TYPE OF ORGANIZATION					
Drains owned by one landowner.....number of projects...	...	(²)	NA	NA	NA
acres served...	...	(²)	2,600	(²)	NA
Cooperative or mutual drains.....number of projects...	...	21	...	...	...
acres served...	...	2,500	...	...	...
Legally organized public drains.....number of projects...	2	24	NA	NA	NA
acres served...	41,521	² 125,595	² 24,398	² 80,756	NA
PROJECTS BY YEAR STARTED					
Started 10 years or more before Census date.....number of projects...	2	25	NA	NA	NA
acres served...	41,521	² 128,095	141,695	115,024	NA
Started within 10 years of Census date.....number of projects...	...	(²)	NA	NA	NA
acres served...	...	(²)	11,678	47,956	NA
OPERATIONS, 10-YEAR PERIOD PRECEDING CENSUS DATE					
Cost of drainage works and services.....projects reporting...	33	25	NA	NA	NA
dollars...	219,902	193,919	NA	NA	NA
New drainage works constructed, enlarged, or installed.....projects reporting...	1	42	NA	NA	NA
cost, dollars...	84,215	462,292	NA	NA	NA
Open ditches.....projects reporting...	1	2	NA	NA	NA
length, miles...	36.5	21	NA	NA	NA
Tile or covered drains.....projects reporting...	...	...	NA	NA	NA
length, miles...	...	...	NA	NA	NA
Levees or dikes.....projects reporting...	...	...	NA	NA	NA
length, miles...	...	...	NA	NA	NA
Pumps.....projects reporting...	1	NA	NA	NA	NA
number of pumps...	4	NA	NA	NA	NA
Other (see text).....projects reporting...	...	NA	NA	NA	NA
Cost of maintenance, operation, repair, and administration.....projects reporting...	3	NA	NA	NA	NA
dollars...	135,687	131,627	NA	NA	NA
STATUS ON CENSUS DATE					
Capital investment.....dollars...	NA	NA	1,337,647	1,349,774	117,851
Physical works:					
Open ditches.....length, miles...	NA	NA	426.4	334.8	16.6
Tile drains.....length, miles...	NA	NA	...	4.0	4.0
Levees and dikes.....length, miles...	NA	NA	23.0	33.0	...
Pumping units.....number of units...	NA	(²)	3	2	...

NA Not available.
¹Not fully comparable. See text.
²1950 figures exclude 77 projects and 123,059 acres in "irrigation enterprises"; 1940 figures exclude 126,375 acres in "irrigation enterprises"; 1930 figures exclude 82,224 acres in "irrigation enterprises."
³Includes projects taken over by another project prior to 1960. See text.
⁴Cost of new works for lands not previously drained.

DRAINAGE OF AGRICULTURAL LANDS

State Table 2.—DRAINAGE

	Size of project (Based on area of agricultural land in project)	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	2	41,521	...	2	41,521	...	...
2	800 to 999 acres.....	...	...	...	...	...	...	...
3	1,000 to 1,999 acres.....	...	...	...	...	...	...	...
4	2,000 to 4,999 acres.....	1	2,500	...	1	2,500	...	...
5	5,000 to 9,999 acres.....	...	...	...	...	...	...	...
6	10,000 to 19,999 acres.....	...	...	...	...	...	...	...
7	20,000 to 49,999 acres.....	1	39,021	...	1	39,021	...	...
8	50,000 to 99,999 acres.....	...	...	...	...	...	...	...
9	100,000 or more acres.....	...	...	...	...	...	...	...

¹Includes projects taken over by another project prior to 1960. See text.

State Table 3.—DRAINAGE PROJECTS, 1960,

	Type of organization	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	2	41,521	...	2	41,521	...	...
2	Drains owned by one landowner.....	...	...	...	...	...	...	...
3	Cooperative or mutual drains.....	...	...	...	...	...	...	...
4	Legally organized public drains.....	2	41,521	...	2	41,521	...	...

¹Includes projects taken over by another project prior to 1960. See text.

State Table 4.—DRAINAGE PROJECTS, 1960,

	Year of organization	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	2	41,521	...	2	41,521	...	...
2	1950-1959.....	...	...	...	...	...	...	...
3	Prior to 1950.....	2	41,521	...	2	41,521	...	...

¹Includes projects taken over by another project prior to 1960. See text.

PROJECTS, 1960, BY SIZE

Cost of drainage works and services, 1950-1959				New works constructed, enlarged, or installed, 1950-1959									
Total		For new works		Open ditches		Tile or covered drains		Levees and dikes		Pumps		Other, projects reporting	
Projects reporting	Dollars	Projects reporting	Dollars	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Number		
13	219,902	1	84,215	1	36.5	...	...	...	...	1	4	...	1
...	...	...	...	...	...	...	...	...	...	...	...	...	2
...	...	...	...	...	...	...	...	...	...	...	...	...	3
1	3,914	...	...	...	...	...	...	...	...	...	...	...	4
...	...	...	...	...	...	...	...	...	...	...	...	...	5
...	...	...	...	...	...	...	...	...	...	...	...	...	6
12	215,988	1	84,215	1	36.5	...	...	...	...	1	4	...	7
...	...	...	...	...	...	...	...	...	...	...	...	...	8
...	...	...	...	...	...	...	...	...	...	...	...	...	9

BY TYPE OF ORGANIZATION

Cost of drainage works and services, 1950-1959				New works constructed, enlarged, or installed, 1950-1959									
Total		For new works		Open ditches		Tile or covered drains		Levees and dikes		Pumps		Other, projects reporting	
Projects reporting	Dollars	Projects reporting	Dollars	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Number		
13	219,902	1	84,215	1	36.5	...	...	...	...	1	4	...	1
...	...	...	...	...	...	...	...	...	...	...	...	...	2
...	...	...	...	...	...	...	...	...	...	...	...	...	3
13	219,902	1	84,215	1	36.5	...	...	...	...	1	4	...	4

BY YEAR OF ORGANIZATION

Cost of drainage works and services, 1950-1959				New works constructed, enlarged, or installed, 1950-1959									
Total		For new works		Open ditches		Tile or covered drains		Levees and dikes		Pumps		Other, projects reporting	
Projects reporting	Dollars	Projects reporting	Dollars	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Number		
13	219,902	1	84,215	1	36.5	...	...	...	...	1	4	...	1
...	...	...	...	...	...	...	...	...	...	...	...	...	2
13	219,902	1	84,215	1	36.5	...	...	...	...	1	4	...	3

DRAINAGE OF AGRICULTURAL LANDS

County Table 1. --DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	The State	Pershing	Washoe	All other counties ¹
AREA				
1 Approximate land area.....acres 1960...	70,264,320	3,835,520	4,019,840	51,651,200
2 Land in farms.....acres 1959...	10,942,936	882,936	1,237,291	7,860,797
3 Drainage projects..... number 1960...	2	1	1	...
4 1950...	82	12	12	62
5 Total area in drainage projects ² acres served 1960...	41,521	39,021	2,500	...
6 1950...	251,154	64,164	8,252	178,738
7 Area not used for agriculture or not drained..... acres served 1960...	...	...	...	...
8 Net area drained and used for agriculture..... acres served 1960...	41,521	39,021	2,500	...
9 Drainage established before 1950..... acres served 1960...	41,521	39,021	2,500	...
10 Area added, 1950-1959..... acres served 1960...	...	...	...	...
11 Area served by two or more projects..... acres served 1960...	...	...	...	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION				
12 Drains owned by one landowner..... number of projects...	...	...	...	...
13 acres served ³..	...	...	...	...
14 Cooperative or mutual drains..... number of projects...	...	...	...	...
15 acres served ³..	...	...	...	...
16 Legally organized public drains..... number of projects...	2	1	1	...
17 acres served ³ ..	41,521	39,021	2,500	...
PROJECTS, 1960, BY YEAR STARTED				
18 1950-1959..... number of projects...	...	...	...	...
19 acres served ³..	...	...	...	...
20 Prior to 1950..... number of projects...	2	1	1	...
21 acres served ³ ..	41,521	39,021	2,500	...
DRAINAGE OPERATIONS, 1950-1959 ⁴				
22 Cost of drainage works and services.....projects reporting...	3	2	1	...
23 dollars...	219,902	215,988	3,914	...
24 New drainage works constructed, enlarged, or installed.....projects reporting...	1	1	...	...
25 dollars...	84,215	84,215	...	...
26 Open ditches.....projects reporting...	1	1	...	...
27 length, miles...	36.5	36.5	...	...
28 Tile or covered drains.....projects reporting...	...	...	...	...
29 length, miles...	...	...	...	...
30 Levees or dikes.....projects reporting...	...	...	...	...
31 length, miles...	...	...	...	...
32 Pumps.....projects reporting...	1	1	...	...
33 number of pumps...	4	4	...	...
34 Other (see text).....projects reporting...	...	...	...	...
35 Cost of maintenance, operation, repair, and administration.....projects reporting...	3	2	1	...
36 dollars...	135,687	131,773	3,914	...

¹ Includes Churchill, Clark, Douglas, Elko, Esmeralda, Humboldt, Lander, Lincoln, Lyon, Nye, Ormsby, and Storey counties.² Land served by two or more projects counted only once.³ Acres served by two projects are included for each project. See text.⁴ Includes projects taken over by another project prior to 1960. See text.

State Table 1.—DRAINAGE PROJECTS—NUMBER, AREA, COST, AND WORKS, 1920 TO 1960

[See text for comparability of data.]

Item	1960 Census	1950 Census	1940 Census	1930 Census	1920 Census
AREA					
Approximate land area..... acres...	4,813,440	4,814,080	4,814,080	4,808,960	4,808,960
Land in farms..... acres...	1,379,002	1,725,441	1,874,402	1,758,027	2,282,585
Drainage projects..... number...	9	5	...	...	...
Total area in drainage projects..... acres served...	11,756	11,206	...	...	...
Area not used for agriculture or not drained..... acres served...	800	NA	...	...	...
Net area drained and used for agriculture..... acres served...	10,956	NA	...	...	...
Drainage established 10 years or more before Census date..... acres served...	6,106	NA	...	...	...
Drainage established within 10 years of Census date..... acres served...	4,850	NA	...	...	...
Area served by two or more projects..... acres served...	...	...	...	...	...
PROJECTS BY TYPE OF ORGANIZATION					
Drains owned by one landowner..... number of projects...	...	...	...	...	...
acres served...	...	...	...	...	...
Cooperative or mutual drains..... number of projects...	9	4	...	...	...
acres served...	10,956	6,906	...	...	...
Legally organized public drains..... number of projects...	...	1	...	...	...
acres served...	...	4,300	...	...	...
PROJECTS BY YEAR STARTED					
Started 10 years or more before Census date..... number of projects...	4	1	...	...	...
acres served...	6,306	4,300	...	...	...
Started within 10 years of Census date..... number of projects...	5	4	...	...	...
acres served...	4,650	6,906	...	...	...
OPERATIONS, 10-YEAR PERIOD PRECEDING CENSUS DATE					
Cost of drainage works and services..... projects reporting...	8	5	...	...	...
dollars...	40,617	39,357	...	...	...
New drainage works constructed, enlarged, or installed..... projects reporting...	7	15	...	...	...
cost, dollars...	39,967	¹ 34,407	...	...	...
Open ditches..... projects reporting...	7	5	...	...	...
length, miles...	13.6	12	...	...	...
Tile or covered drains..... projects reporting...	3	2	...	...	...
length, miles...	5.0	2	...	...	...
Levees or dikes..... projects reporting...	...	...	...	...	...
length, miles...	...	...	...	...	...
Pumps..... projects reporting...	...	NA	...	...	...
number of pumps...	...	NA	...	...	...
Other (see text)..... projects reporting...	...	NA	...	...	...
Cost of maintenance, operation, repair, and administration..... projects reporting...	1	NA	...	...	...
dollars...	650	4,950	...	...	...
STATUS ON CENSUS DATE					
Capital investment..... dollars...	NA	NA	...	...	...
Physical works:					
Open ditches..... length, miles...	NA	NA	...	...	...
Tile drains..... length, miles...	NA	NA	...	...	...
Levees and dikes..... length, miles...	NA	NA	...	...	...
Pumping units..... number of units...	NA	...	...	...	...

NA Not available.

¹Cost of new works for lands not previously drained.

DRAINAGE OF AGRICULTURAL LANDS

State Table 2.—DRAINAGE

	Size of project (Based on area of agricultural land in project)	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	9	10,956	...	4	6,106	7	4,850
2	500 to 999 acres.....	5	3,400	...	1	750	4	2,650
3	1,000 to 1,999 acres.....	2	2,600	...	2	2,400	2	200
4	2,000 to 4,999 acres.....	2	4,956	...	1	2,956	1	2,000
5	5,000 to 9,999 acres.....	...	...	...	...	...	...	...
6	10,000 to 19,999 acres.....	...	...	...	...	...	...	...
7	20,000 to 49,999 acres.....	...	...	...	...	...	...	...
8	50,000 to 99,999 acres.....	...	...	...	...	...	...	...
9	100,000 or more acres.....	...	...	...	...	...	...	...

State Table 3.—DRAINAGE PROJECTS, 1960,

	Type of organization	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	9	10,956	...	4	6,106	7	4,850
2	Drains owned by one landowner.....	...	...	...	...	...	...	...
3	Cooperative or mutual drains.....	9	10,956	...	4	6,106	7	4,850
4	Legally organized public drains.....	...	...	...	...	...	...	...

State Table 4.—DRAINAGE PROJECTS, 1960,

	Year of organization	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	9	10,956	...	4	6,106	7	4,850
2	1960-1959.....	5	4,650	...	...	...	5	4,650
3	Prior to 1950.....	4	6,306	...	4	6,106	2	200

PROJECTS, 1960, BY SIZE

Cost of drainage works and services, 1950-1959				New works constructed, enlarged, or installed, 1950-1959									
Total		For new works		Open ditches		Tile or covered drains		Levees and dikes		Pumps		Other, projects reporting	
Projects reporting	Dollars	Projects reporting	Dollars	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Number		
8	40,617	7	39,967	7	13.6	3	5.0	...	...	...	...	...	1
4	19,118	4	19,118	4	5.6	1	1.0	...	...	...	...	...	2
2	7,500	2	7,500	2	3.5	1	1.0	...	...	...	...	...	3
2	13,999	1	13,349	1	4.5	1	3.0	...	...	...	...	...	4
...	...	...	...	...	...	...	...	...	...	...	...	...	5
...	...	...	...	...	...	...	...	...	...	...	...	...	6
...	...	...	...	...	...	...	...	...	...	...	...	...	7
...	...	...	...	...	...	...	...	...	...	...	...	...	8
...	...	...	...	...	...	...	...	...	...	...	...	...	9

BY TYPE OF ORGANIZATION

Cost of drainage works and services, 1950-1959				New works constructed, enlarged, or installed, 1950-1959									
Total		For new works		Open ditches		Tile or covered drains		Levees and dikes		Pumps		Other, projects reporting	
Projects reporting	Dollars	Projects reporting	Dollars	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Number		
8	40,617	7	39,967	7	13.6	3	5.0	...	...	...	...	...	1
...	...	...	...	...	...	...	...	...	...	...	...	...	2
8	40,617	7	39,967	7	13.6	3	5.0	...	...	...	...	...	3
...	...	...	...	...	...	...	...	...	...	...	...	...	4

BY YEAR OF ORGANIZATION

Cost of drainage works and services, 1950-1959				New works constructed, enlarged, or installed, 1950-1959									
Total		For new works		Open ditches		Tile or covered drains		Levees and dikes		Pumps		Other, projects reporting	
Projects reporting	Dollars	Projects reporting	Dollars	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Number		
8	40,617	7	39,967	7	13.6	3	5.0	...	...	...	...	...	1
5	32,467	5	32,467	5	10.1	2	4.0	...	...	...	...	...	2
3	8,150	2	7,500	2	3.5	1	1.0	...	...	...	...	...	3

DRAINAGE OF AGRICULTURAL LANDS

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	The State	Bergen	Burlington	Middlesex	Monmouth	Ocean
AREA						
1 Approximate land area.....acres 1960...	4,813,440	149,120	524,160	199,680	305,280	408,960
2 Land in farms.....acres 1959...	1,379,002	7,456	184,727	42,764	105,548	28,395
3 Drainage projects..... number 1960...	9	...	1	6	3	1
4 1950...	5	1	1	1	2	1
5 Total area in drainage projects ¹ acres served 1960...	11,756	...	2,956	5,050	3,900	750
6 1950...	11,206	4,300	2,956	400	2,800	750
7 Area not used for agriculture or not drained..... acres served 1960...	800	...	...	...	800	...
8 Net area drained and used for agriculture..... acres served 1960...	10,956	...	2,956	5,050	2,200	750
9 Drainage established before 1950..... acres served 1960...	6,106	...	2,956	400	2,000	750
10 Area added, 1950-1959..... acres served 1960...	4,850	...	...	4,650	200	...
11 Area served by two or more projects..... acres served 1960...	...	...	...	...	...	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION						
12 Drains owned by one landowner..... number of projects...	...	...	...	...	...	...
13 acres served ²..	...	...	...	...	...	...
14 Cooperative or mutual drains..... number of projects...	9	...	1	6	3	1
15 acres served ² ..	10,956	...	2,956	5,050	2,200	750
16 Legally organized public drains..... number of projects...	...	...	...	...	...	...
17 acres served ²..	...	...	...	...	...	...
PROJECTS, 1960, BY YEAR STARTED						
18 1960-1959..... number of projects...	5	...	...	5	1	...
19 acres served ² ..	4,650	...	...	4,600	50	...
20 Prior to 1960..... number of projects...	4	...	1	1	2	1
21 acres served ² ..	6,306	...	2,956	450	2,150	750
DRAINAGE OPERATIONS, 1950-1959 ³						
22 Cost of drainage works and services..... projects reporting...	8	...	1	6	3	...
23 dollars...	40,617	...	650	34,117	5,850	...
24 New drainage works constructed, enlarged, or installed..... projects reporting...	7	...	...	6	3	...
25 dollars...	39,967	...	...	34,117	5,850	...
26 Open ditches..... projects reporting...	7	...	...	6	3	...
27 length, miles...	13.6	...	...	11.0	2.6	...
28 Tile or covered drains..... projects reporting...	3	...	...	2	1	...
29 length, miles...	5.0	...	...	4.0	1.0	...
30 Levees or dikes..... projects reporting...	...	...	...	...	...	...
31 length, miles...	...	...	...	...	...	...
32 Pumps..... projects reporting...	...	...	...	...	...	...
33 number of pumps...	...	...	...	...	...	...
34 Other (see text)..... projects reporting...	...	...	...	...	...	...
35 Cost of maintenance, operation, repair, and administration..... projects reporting...	1	...	1	...	...	...
36 dollars...	650	...	650	...	...	...

¹Land served by two or more projects counted only once.²Acres served by two projects are included for each project. See text.³Includes projects taken over by another project prior to 1960. See text.

State Table 1.—DRAINAGE PROJECTS—NUMBER, AREA, COST, AND WORKS, 1920 TO 1960

[See text for comparability of data.]

Item	1960 Census	1950 Census	1940 Census	1930 Census	1920 Census
AREA					
Approximate land area..... acres...	77,766,400	77,767,040	77,767,040	78,401,920	78,401,920
Land in farms..... acres...	46,293,207	47,521,809	38,860,427	30,822,034	24,409,633
Drainage projects..... number...	5	223	7	NA	NA
Total area in drainage projects..... acres served...	31,593	244,961	305,885	176,292	140,219
Area not used for agriculture or not drained..... acres served...	...	NA	NA	NA	NA
Net area drained and used for agriculture..... acres served...	31,593	NA	¹ 286,890	¹ 151,516	NA
Drainage established 10 years or more before Census date..... acres served...	30,293	NA	NA	NA	NA
Drainage established within 10 years of Census date..... acres served...	1,300	NA	NA	NA	NA
Area served by two or more projects..... acres served...	...	...	...	...	...
PROJECTS BY TYPE OF ORGANIZATION					
Drains owned by one landowner..... number of projects...	1	(²)	NA	NA	NA
acres served...	600	(²)	(²)	(²)	NA
Cooperative or mutual drains..... number of projects...	...	(²)	...	...	...
acres served...	...	(²)	...	...	...
Legally organized public drains..... number of projects...	4	² 5	NA	NA	NA
acres served...	30,993	² 52,113	² 172,796	² 59,837	NA
PROJECTS BY YEAR STARTED					
Started 10 years or more before Census date..... number of projects...	4	² 5	NA	NA	NA
acres served...	30,993	² 52,113	298,685	171,552	NA
Started within 10 years of Census date..... number of projects...	1	(²)	NA	NA	NA
acres served...	600	(²)	7,200	4,740	NA
OPERATIONS, 10-YEAR PERIOD PRECEDING CENSUS DATE					
Cost of drainage works and services..... projects reporting...	5	² 5	NA	NA	NA
dollars...	127,433	74,636	NA	NA	NA
New drainage works constructed, enlarged, or installed..... projects reporting...	2	...	NA	NA	NA
cost, dollars...	70,840	...	NA	NA	NA
Open ditches..... projects reporting...	2	...	NA	NA	NA
length, miles...	6.3	...	NA	NA	NA
Tile or covered drains..... projects reporting...	...	...	NA	NA	NA
length, miles...	...	...	NA	NA	NA
Levees or dikes..... projects reporting...	...	...	NA	NA	NA
length, miles...	...	...	NA	NA	NA
Pumps..... projects reporting...	...	NA	NA	NA	NA
number of pumps...	...	NA	NA	NA	NA
Other (see text)..... projects reporting...	...	NA	NA	NA	NA
Cost of maintenance, operation, repair, and administration..... projects reporting...	3	NA	NA	NA	NA
dollars...	56,593	74,636	NA	NA	NA
STATUS ON CENSUS DATE					
Capital investment..... dollars...	NA	NA	5,722,121	3,279,371	1,710,796
Physical works:					
Open ditches..... length, miles...	NA	NA	625.2	282.9	124.0
Tile drains..... length, miles...	NA	NA	308.9	305.4	282.2
Levees and dikes..... length, miles...	NA	NA	181.3	12.0	...
Pumping units..... number of units...	NA	(²)	...	...	...

NA Not available.

¹Not fully comparable. See text.²1950 figures exclude 218 projects and 192,848 acres in "irrigation enterprises"; 1940 figures exclude 133,089 acres in "irrigation enterprises"; 1930 figures exclude 116,455 acres in "irrigation enterprises."

DRAINAGE OF AGRICULTURAL LANDS

State Table 2.—DRAINAGE

Size of project (Based on area of agricultural land in project)	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
		Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
				Projects reporting	Acres	Projects reporting	Acres
1 All projects.....	5	31,593	...	4	30,293	2	1,300
2 500 to 999 acres.....	1	600	...	...	...	1	600
3 1,000 to 1,999 acres.....	1	1,000	...	1	300	1	700
4 2,000 to 4,999 acres.....	...	...	...	...	...	...	...
5 5,000 to 9,999 acres.....	2	15,018	...	2	15,018	...	...
6 10,000 to 19,999 acres.....	1	14,975	...	1	14,975	...	...
7 20,000 to 49,999 acres.....	...	...	...	...	...	...	...
8 50,000 to 99,999 acres.....	...	...	...	...	...	...	...
9 100,000 or more acres.....	...	...	...	...	...	...	...

State Table 3.—DRAINAGE PROJECTS, 1960,

Type of organization	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
		Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
				Projects reporting	Acres	Projects reporting	Acres
1 All projects.....	5	31,593	...	4	30,293	2	1,300
2 Drains owned by one landowner.....	1	600	...	...	...	1	600
3 Cooperative or mutual drains.....	...	...	...	...	...	...	...
4 Legally organized public drains.....	4	30,993	...	4	30,293	1	700

State Table 4.—DRAINAGE PROJECTS, 1960,

Year of organization	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
		Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
				Projects reporting	Acres	Projects reporting	Acres
1 All projects.....	5	31,593	...	4	30,293	2	1,300
2 1950-1959.....	1	600	...	...	...	1	600
3 Prior to 1950.....	4	30,993	...	4	30,293	1	700

DRAINAGE OF AGRICULTURAL LANDS

County Table 1. --DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	The State	Chaves	Eddy	Valencia	All other counties ¹
AREA					
1 Approximate land area.....acres 1960...	77,766,400	3,900,160	2,664,320	3,620,480	44,256,640
2 Land in farms.....acres 1959...	46,293,207	2,824,518	1,156,260	2,589,724	23,308,134
3 Drainage projects..... number 1960...	5	3	1	1	...
4..... 1950...	223	147	16	3	64
5 Total area in drainage projects ² acres served 1960...	31,593	29,993	600	1,000	...
6..... 1950...	244,961	74,912	21,952	23,428	124,669
7 Area not used for agriculture or not drained..... acres served 1960...	...	...	...	...	...
8 Net area drained and used for agriculture..... acres served 1960...	31,593	29,993	600	1,000	...
9 Drainage established before 1950..... acres served 1960...	30,293	29,993	...	300	...
10 Area added, 1950-1959..... acres served 1960...	1,300	...	600	700	...
11 Area served by two or more projects..... acres served 1960...	...	...	...	...	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION					
12 Drains owned by one landowner..... number of projects...	1	...	1	...	...
13..... acres served ³ ..	600	...	600	...	...
14 Cooperative or mutual drains..... number of projects...	...	...	...	...	...
15..... acres served ³..	...	...	...	...	...
16 Legally organized public drains..... number of projects...	4	3	...	1	...
17..... acres served ³ ..	30,993	29,993	...	1,000	...
PROJECTS, 1960, BY YEAR STARTED					
18 1960-1959..... number of projects...	1	...	1	...	...
19..... acres served ³ ..	600	...	600	...	...
20 Prior to 1950..... number of projects...	4	3	...	1	...
21..... acres served ³ ..	30,993	29,993	...	1,000	...
DRAINAGE OPERATIONS, 1950-1959 ⁴					
22 Cost of drainage works and services..... projects reporting...	5	3	1	1	...
23..... dollars...	127,433	56,593	(⁵)	(⁵)	...
24 New drainage works constructed, enlarged, or installed..... projects reporting...	2	...	(⁵)	(⁵)	...
25..... dollars...	70,840	...	(⁵)	(⁵)	...
26 Open ditches..... projects reporting...	2	...	(⁵)	(⁵)	...
27..... length, miles...	63	...	(⁵)	(⁵)	...
28 Tile or covered drains..... projects reporting...	...	...	...	...	...
29..... length, miles...	...	...	...	...	...
30 Levees or dikes..... projects reporting...	...	...	...	...	...
31..... length, miles...	...	...	...	...	...
32 Pumps..... projects reporting...	...	...	...	...	...
33..... number of pumps...	...	...	...	...	...
34 Other (see text)..... projects reporting...	...	...	...	...	...
35 Cost of maintenance, operation, repair, and administration..... projects reporting...	3	3	...	...	...
36..... dollars...	56,593	56,593	...	...	...

¹Includes Bernalillo, Colfax, Curry, De Baca, Dona Ana, Lincoln, Luna, McKinley, Mora, Otero, Rio Arriba, Sandoval, San Juan, San Miguel, Santa Fe, Sierra, Socorro, and Taos counties.

²Land served by two or more projects counted only once.

³Acres served by two projects are included for each project. See text.

⁴Includes projects taken over by another project prior to 1960. See text.

⁵Included in State total only.

State Table 1.—DRAINAGE PROJECTS—NUMBER, AREA, COST, AND WORKS, 1920 TO 1960

[See text for comparability of data.]

Item	1960 Census	1950 Census	1940 Census	1930 Census	1920 Census
AREA					
Approximate land area..... acres ...	30,680,960	30,684,160	30,674,560	30,498,560	30,498,560
Land in farms..... acres ...	13,489,516	16,016,721	17,170,337	17,979,633	20,632,803
Drainage projects..... number ...	19	14	...	...	...
Total area in drainage projects..... acres served ...	49,616	56,465	...	...	...
Area not used for agriculture or not drained..... acres served ...	...	NA	...	...	...
Not area drained and used for agriculture..... acres served ...	49,616	NA	...	...	...
Drainage established 10 years or more before Census date..... acres served ...	45,165	NA	...	...	...
Drainage established within 10 years of Census date..... acres served ...	4,451	NA	...	...	...
Area served by two or more projects..... acres served ...	...	...	...	...	...
PROJECTS BY TYPE OF ORGANIZATION					
Drains owned by one landowner..... number of projects ...	2	5	...	...	...
acres served ...	1,300	2,638	...	...	...
Cooperative or mutual drains..... number of projects ...	13	5	...	...	...
acres served ...	20,071	25,582	...	...	...
Legally organized public drains..... number of projects ...	4	4	...	...	...
acres served ...	28,245	28,245	...	...	...
PROJECTS BY YEAR STARTED					
Started 10 years or more before Census date..... number of projects ...	13	6	...	...	...
acres served ...	45,165	29,502	...	...	...
Started within 10 years of Census date..... number of projects ...	6	8	...	...	...
acres served ...	4,451	26,963	...	...	...
OPERATIONS, 10-YEAR PERIOD PRECEDING CENSUS DATE					
Cost of drainage works and services..... projects reporting ...	13	12	...	...	...
dollars ...	202,013	177,224	...	...	...
New drainage works constructed, enlarged, or installed..... projects reporting ...	7	17	...	...	...
cost, dollars ...	86,009	¹ 75,119	...	...	...
Open ditches..... projects reporting ...	7	7	...	...	...
length, miles ...	25.5	31	...	...	...
Tile or covered drains..... projects reporting ...	2	...	...	...	...
length, miles ...	19.8	...	...	...	...
Levees or dikes..... projects reporting ...	1	1	...	...	...
length, miles ...	5.5	2	...	...	...
Pumps..... projects reporting ...	1	NA	...	...	...
number of pumps ...	2	NA	...	...	...
Other (see text)..... projects reporting ...	1	NA	...	...	...
Cost of maintenance, operation, repair, and administration..... projects reporting ...	9	NA	...	...	...
dollars ...	116,004	102,105	...	...	...
STATUS ON CENSUS DATE					
Capital investment..... dollars ...	NA	NA	...	...	...
Physical works:					
Open ditches..... length, miles ...	NA	NA	...	...	...
Tile drains..... length, miles ...	NA	NA	...	...	...
Levees and dikes..... length, miles ...	NA	NA	...	...	...
Pumping units..... number of units ...	NA	...	...	...	...

NA Not available.

¹Cost of new works for lands not previously drained.

DRAINAGE OF AGRICULTURAL LANDS

State Table 2.—DRAINAGE

	Size of project (Based on area of agricultural land in project)	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	19	49,616	...	13	45,165	6	4,451
2	500 to 999 acres.....	14	8,871	...	9	5,771	5	3,100
3	1,000 to 1,999 acres.....	2	2,351	...	1	1,000	1	1,351
4	2,000 to 4,999 acres.....	...	...	...	...	...	...	...
5	5,000 to 9,999 acres.....	1	8,500	...	1	8,500	...	...
6	10,000 to 19,999 acres.....	2	29,894	...	2	29,894	...	...
7	20,000 to 49,999 acres.....	...	...	...	...	...	...	...
8	50,000 to 99,999 acres.....	...	...	...	...	...	...	...
9	100,000 or more acres.....	...	...	...	...	...	...	...

State Table 3.—DRAINAGE PROJECTS, 1960,

	Type of organization	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	19	49,616	...	13	45,165	6	4,451
2	Drains owned by one landowner.....	2	1,300	...	...	...	2	1,300
3	Cooperative or mutual drains.....	13	20,071	...	9	16,920	4	3,151
4	Legally organized public drains.....	4	28,245	...	4	28,245	...	...

State Table 4.—DRAINAGE PROJECTS, 1960,

	Year of organization	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	19	49,616	...	13	45,165	6	4,451
2	1950-1959.....	6	4,451	...	...	...	6	4,451
3	Prior to 1950.....	13	45,165	...	13	45,165	...	...

PROJECTS, 1960, BY SIZE

Cost of drainage works and services, 1950-1959				New works constructed, enlarged, or installed, 1950-1959									
Total		For new works		Open ditches		Tile or covered drains		Levees and dikes		Pumps		Other, projects reporting	
Projects reporting	Dollars	Projects reporting	Dollars	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Number		
13	202,013	7	86,009	7	25.5	2	19.8	1	5.5	1	2	1	1
8	97,411	5	73,686	5	16.0	2	19.8	...	...	...	...	1	2
2	39,745	2	12,323	2	9.5	...	...	1	5.5	1	2	...	3
...	...	...	...	...	...	...	...	...	...	...	...	...	4
1	14,400	...	...	...	...	...	...	...	...	...	...	...	5
2	50,457	...	...	...	...	...	...	...	...	...	...	...	6
...	...	...	...	...	...	...	...	...	...	...	...	...	7
...	...	...	...	...	...	...	...	...	...	...	...	...	8
...	...	...	...	...	...	...	...	...	...	...	...	...	9

BY TYPE OF ORGANIZATION

Cost of drainage works and services, 1950-1959				New works constructed, enlarged, or installed, 1950-1959									
Total		For new works		Open ditches		Tile or covered drains		Levees and dikes		Pumps		Other, projects reporting	
Projects reporting	Dollars	Projects reporting	Dollars	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Number		
13	202,013	7	86,009	7	25.5	2	19.8	1	5.5	1	2	1	1
2	24,765	2	24,765	2	3.8	1	0.8	...	...	...	...	1	2
9	126,848	5	61,244	5	21.7	1	19.0	1	5.5	1	2	...	3
2	50,400	...	...	...	...	...	...	...	...	...	...	...	4

BY YEAR OF ORGANIZATION

Cost of drainage works and services, 1950-1959				New works constructed, enlarged, or installed, 1950-1959									
Total		For new works		Open ditches		Tile or covered drains		Levees and dikes		Pumps		Other, projects reporting	
Projects reporting	Dollars	Projects reporting	Dollars	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Number		
13	202,013	7	86,009	7	25.5	2	19.8	1	5.5	1	2	1	1
6	64,231	5	43,009	5	12.5	1	0.8	1	5.5	1	2	1	2
7	137,782	2	43,000	2	13.0	1	19.0	...	...	...	...	...	3

DRAINAGE OF AGRICULTURAL LANDS

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	The State	Franklin	Genesee	Madison	Monroe	Oneida	Orange	Orleans	Seneca	Steuben	Wayne
AREA											
1 Approximate land area.....acres 1960...	30,680,960	1,078,400	320,640	423,040	430,720	785,280	530,560	253,440	211,200	901,120	388,480
2 Land in farms.....acres 1959...	13,489,516	244,054	239,333	302,334	215,900	408,853	235,153	175,732	132,005	567,380	275,357
3 Drainage projects..... number 1960...	19	1	2	1	3	2	1	2	3	2	5
4	14	...	1	1	1	3	1	2	1	2	4
5 Total area in drainage projects ¹ acres served 1960...	49,616	600	5,137	8,500	1,375	1,670	18,200	8,132	2,395	1,257	2,350
6	56,465	...	4,437	8,500	175	2,970	18,200	8,132	10,944	1,257	1,850
7 Area not used for agriculture or not drained..... acres served 1960...	...	...	...	...	...	...	...	...	...	...	...
8 Net area drained and used for agriculture..... acres served 1960...	49,616	600	5,137	8,500	1,375	1,670	18,200	8,132	2,395	1,257	2,350
9 Drainage established before 1950..... acres served 1960...	45,165	...	4,437	8,500	175	1,670	18,200	8,132	944	1,257	1,850
10 Area added, 1950-1959..... acres served 1960...	4,451	600	700	...	1,200	...	...	...	1,451	...	500
11 Area served by two or more projects..... acres served 1960...	...	...	...	...	...	...	...	...	...	...	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION											
12 Drains owned by one landowner..... number of projects...	2	1	1	...	...	...	...	...	...	...	...
13	1,300	600	700	...	...	...	...	...	...	...	...
14 Cooperative or mutual drains..... number of projects...	13	...	1	...	3	1	...	1	3	2	5
15	20,071	...	4,437	...	1,375	1,000	...	7,257	2,395	1,257	2,350
16 Legally organized public drains..... number of projects...	4	...	...	1	...	1	1	1	...	...	...
17	28,245	...	...	8,500	...	670	18,200	875	...	...	...
PROJECTS, 1960, BY YEAR STARTED											
18 1950-1959..... number of projects...	6	1	1	...	2	...	...	...	2	...	1
19	4,451	600	700	...	1,200	...	...	...	1,451	...	500
20 Prior to 1950..... number of projects...	13	...	1	1	1	2	1	2	1	2	4
21	45,165	...	4,437	8,500	175	1,670	18,200	8,132	944	1,257	1,850
DRAINAGE OPERATIONS, 1950-1959 ³											
22 Cost of drainage works and services..... projects reporting...	13	(⁴)	(⁴)	1	2	(⁴)	1	(⁴)	2	(⁴)	2
23	202,013	(⁴)	(⁴)	14,400	7,921	(⁴)	36,000	(⁴)	21,280	(⁴)	10,765
24 New drainage works constructed, enlarged, or installed..... projects reporting...	7	(⁴)	(⁴)	...	2	(⁴)	...	...	1	(⁴)	(⁴)
25	86,009	(⁴)	(⁴)	...	7,921	(⁴)	...	...	6,503	(⁴)	(⁴)
26 Open ditches..... projects reporting...	7	(⁴)	(⁴)	...	2	(⁴)	...	...	1	(⁴)	(⁴)
27	25.5	(⁴)	(⁴)	...	3.2	(⁴)	...	...	3.2	(⁴)	(⁴)
28 Tile or covered drains..... projects reporting...	2	...	(⁴)	...	...	...	...	...	...	(⁴)	...
29	19.8	...	(⁴)	...	...	...	...	...	...	(⁴)	...
30 Levees or dikes..... projects reporting...	1	...	...	...	...	...	...	...	1	...	(⁴)
31	5.5	...	...	...	...	...	...	...	3.2	...	(⁴)
32 Pumps..... projects reporting...	1	...	...	...	...	...	...	...	...	...	(⁴)
33	2	...	...	...	...	...	...	...	...	...	(⁴)
34 Other (see text)..... projects reporting...	1	...	1	...	...	...	...	...	...	...	...
35 Cost of maintenance, operation, repair, and administration..... projects reporting...	9	...	1	1	...	1	1	1	2	2	2
36	116,004	...	5,122	14,400	...	10,000	36,000	9,335	14,777	19,425	6,945

¹Land served by two or more projects counted only once.²Acres served by two projects are included for each project. See text.³Includes projects taken over by another project prior to 1960. See text.⁴Included in State total only.

DRAINAGE OF AGRICULTURAL LANDS

State Table 2.—DRAINAGE

	Size of project (Based on area of agricultural land in project)	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	564	1,417,032	191,600	434	1,162,550	153	254,482
2	500 to 999 acres.....	304	202,778	40,607	229	151,664	79	51,114
3	1,000 to 1,999 acres.....	134	179,749	21,724	102	136,660	37	43,089
4	2,000 to 4,999 acres.....	72	188,866	34,224	59	153,469	20	35,397
5	5,000 to 9,999 acres.....	28	190,996	22,316	21	127,430	11	63,566
6	10,000 to 19,999 acres.....	12	161,601	12,345	9	100,285	6	61,316
7	20,000 to 49,999 acres.....	11	303,597	39,486	11	303,597	...	...
8	50,000 to 99,999 acres.....	3	189,445	20,898	3	189,445	...	...
9	100,000 or more acres.....	...	...	...	...	...	...	...

State Table 3.—DRAINAGE PROJECTS, 1960,

	Type of organization	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	564	1,417,032	191,600	434	1,162,550	153	254,482
2	Drains owned by one landowner.....	39	65,426	12,975	22	29,514	22	35,912
3	Cooperative or mutual drains.....	403	485,339	78,714	305	348,840	112	136,499
4	Legally organized public drains.....	122	866,267	99,911	107	784,196	19	82,071

State Table 4.—DRAINAGE PROJECTS, 1960,

	Year of organization	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	564	1,417,032	191,600	434	1,162,550	153	254,482
2	1950-1959.....	186	322,432	52,182	56	77,135	141	245,297
3	Prior to 1950.....	378	1,094,600	139,418	378	1,085,415	12	9,185

DRAINAGE OF AGRICULTURAL LANDS

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	The State	Alexander	Beaufort	Bertie	Bladen	Brunswick	Burke	Cabarrus	Caldwell
AREA									
1 Approximate land area.....acres 1960...	31,402,880	163,200	531,840	443,520	562,560	558,720	323,840	230,400	304,640
2 Land in farms.....acres 1959...	15,887,724	101,237	245,766	227,569	246,423	115,384	87,462	144,822	94,337
3 Drainage projects..... number 1960...	564	4	66	8	6	6	2	5	1
4 1950...	413	4	49	...	4	3	2	5	1
5 Total area in drainage projects ¹ acres served 1960...	1,418,892	3,200	107,389	5,350	14,053	5,320	575	4,192	1,250
6 1950...	1,128,509	3,200	115,136	...	13,036	2,000	575	4,192	1,250
7 Area not used for agriculture or not drained..... acres served 1960...	98,389	...	16,140	...	700	...	...	...	...
8 Net area drained and used for agriculture..... acres served 1960...	1,320,503	3,200	91,249	5,350	13,353	5,320	575	4,192	1,250
9 Drainage established before 1950..... acres served 1960...	1,066,021	3,200	85,484	...	11,453	2,000	575	4,192	1,250
10 Area added, 1950-1959..... acres served 1960...	254,482	...	5,765	5,350	1,900	3,320	...	...	...
11 Area served by two or more projects..... acres served 1960...	95,071	...	20,948	...	...	...	...	...	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION									
12 Drains owned by one landowner..... number of projects...	39	...	1	4	1	...	...	...	...
13 acres served ² ..	65,426	...	510	2,600	800	...	...	...	...
14 Cooperative or mutual drains.....number of projects...	403	...	59	4	2	6	...	...	...
15 acres served ² ..	485,339	...	66,027	2,750	2,780	5,320	...	...	...
16 Legally organized public drains..... number of projects...	122	4	6	...	3	...	2	5	1
17 acres served ² ..	866,267	3,200	45,878	...	9,773	...	575	4,192	1,250
PROJECTS, 1960, BY YEAR STARTED									
18 1960-1959.....number of projects...	186	...	13	8	2	3	...	...	...
19 acres served ² ..	322,432	...	11,973	5,350	1,900	3,320	...	...	...
20 Prior to 1950.....number of projects...	378	4	53	...	4	3	2	5	1
21 acres served ² ..	1,094,600	3,200	100,442	...	11,453	2,000	575	4,192	1,250
DRAINAGE OPERATIONS, 1950-1959 ³									
22 Cost of drainage works and services.....projects reporting...	310	...	38	8	4	3	...	...	...
23 dollars...	2,959,290	...	166,840	29,500	86,185	15,727	...	...	...
24 New drainage works constructed, enlarged, or installed.....projects reporting...	219	...	20	8	4	3	...	...	...
25 dollars...	2,187,155	...	80,628	29,500	42,185	14,227	...	...	...
26 Open ditches.....projects reporting...	217	...	20	8	4	3	...	...	...
27 length, miles...	959.0	...	34.9	13.2	31.0	6.7	...	...	...
28 Tile or covered drains.....projects reporting...	1	...	...	...	...	...	...	...	...
29 length, miles...	4.1	...	...	...	...	...	...	...	...
30 Levees or dikes.....projects reporting...	3	...	...	...	...	...	...	...	...
31 length, miles...	20.7	...	...	...	...	...	...	...	...
32 Pumps.....projects reporting...	3	...	...	...	...	...	...	...	...
33 number of pumps...	7	...	...	...	...	...	...	...	...
34 Other (see text).....projects reporting...	5	...	...	...	...	...	...	...	...
35 Cost of maintenance, operation, repair, and administration.....projects reporting...	130	...	20	...	2	2	...	...	...
36 dollars...	772,135	...	86,212	...	44,000	1,500	...	...	...

¹Land served by two or more projects counted only once.²Acres served by two projects are included for each project. See text.³Includes projects taken over by another project prior to 1960. See text.

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data.]

Item and Census year	Canden	Carteret	Catawba	Chowan	Cleveland	Columbus	Craven	Cumberland	Currituck
AREA									
1 Approximate land area.....acres 1960...	152,960	340,480	259,840	115,200	298,240	600,960	464,000	423,040	174,720
2 Land in farms.....acres 1959...	51,712	47,008	144,630	67,945	206,087	304,035	142,559	196,617	66,542
3 Drainage projects..... number 1960...	21	9	4	9	1	14	17	13	13
4	18	4	4	2	1	6	15	8	10
5 Total area in drainage projects ¹ acres served 1960...	42,730	28,310	3,792	19,431	14,502	52,977	35,517	45,420	26,875
6	41,710	4,650	3,792	5,650	14,502	40,157	21,613	36,105	15,709
7 Area not used for agriculture or not drained..... acres served 1960...	14,980	6,000	...	1,000	...	...	9,856	...	9,704
8 Net area drained and used for agriculture..... acres served 1960...	27,750	22,310	3,792	18,431	14,502	52,977	25,661	45,420	17,171
9 Drainage established before 1960..... acres served 1960...	26,730	6,150	3,792	5,650	14,502	40,157	25,661	37,005	17,171
10 Area added, 1960-1959..... acres served 1960...	1,020	16,160	...	12,781	...	12,820	...	8,415	...
11 Area served by two or more projects..... acres served 1960...	7,395	1,950	...	...	...	...	700	1,300	900
PROJECTS, 1960, BY TYPE OF ORGANIZATION									
12 Drains owned by one landowner..... number of projects...	1	2	...	...	...	2	...	...	2
13	500	5,510	...	...	...	3,100	...	...	1,285
14 Cooperative or mutual drains..... number of projects...	18	7	...	2	...	10	12	10	9
15	31,545	18,750	...	1,840	...	13,453	10,815	16,205	9,422
16 Legally organized public drains..... number of projects...	2	...	4	7	1	2	5	3	2
17	3,100	...	3,792	16,591	14,502	36,424	15,546	30,515	7,364
PROJECTS, 1960, BY YEAR STARTED									
18 1960-1959..... number of projects...	3	3	...	7	...	8	...	4	2
19	2,070	17,510	...	12,781	...	12,820	...	9,150	1,285
20 Prior to 1960..... number of projects...	18	6	4	2	1	6	17	9	11
21	33,075	6,750	3,792	5,650	14,502	40,157	26,361	37,570	16,786
DRAINAGE OPERATIONS, 1960-1959 ³									
22 Cost of drainage works and services.....projects reporting...	7	8	...	8	...	8	10	11	8
23	37,886	111,091	...	46,857	...	66,650	41,357	75,850	16,946
24 New drainage works constructed, enlarged, or installed.....projects reporting...	4	7	...	5	...	8	4	9	3
25	29,086	87,517	...	26,108	...	66,650	25,370	63,850	4,300
26 Open ditches.....projects reporting...	4	7	...	5	...	8	4	9	3
27	10.1	80.3	...	8.8	...	26.0	14.8	21.5	5.6
28 Tile or covered drains.....projects reporting...	...	...	...	...	...	...	...	...	...
29 .....	...	...	...	...	...	...	...	...	...
30 Levees or dikes.....projects reporting...	...	...	...	...	...	...	...	...	...
31 .....	...	...	...	...	...	...	...	...	...
32 Pumps.....projects reporting...	...	...	...	...	...	...	...	...	...
33 .....	...	...	...	...	...	...	...	...	...
34 Other (see text).....projects reporting...	...	...	...	...	...	...	...	...	...
35 Cost of maintenance, operation, repair, and administration.....projects reporting...	4	4	...	3	...	...	8	6	7
36	8,800	23,574	...	20,749	...	...	15,987	12,000	12,646

¹Land served by two or more projects counted only once.
²Acres served by two projects are included for each project. See text.
³Includes projects taken over by another project prior to 1960. See text.

DRAINAGE OF AGRICULTURAL LANDS

County Table 1. - DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	Davidson	Duplin	Edgecombe	Forsyth	Gaston	Gates	Greene	Harnett	Hertford
AREA									
1 Approximate land area.....acres 1960...	349,440	526,080	327,040	271,360	229,120	219,520	172,160	387,840	227,840
2 Land in farms.....acres 1959...	191,376	324,829	261,636	130,077	102,984	98,401	122,323	235,178	113,803
3 Drainage projects..... number 1960...	1	12	14	2	4	8	16	1	4
4 1950...	1	9	11	2	4	4	6	1	...
5 Total area in drainage projects ¹ acres served 1960...	480	21,052	60,294	3,650	3,873	11,865	20,045	6,286	2,650
6 1950...	480	18,872	58,234	3,650	3,873	4,960	11,437	6,286	...
7 Area not used for agriculture or not drained..... acres served 1960...	...	...	3,500	...	...	2,500	...	...	...
8 Net area drained and used for agriculture..... acres served 1960...	480	21,052	56,794	3,650	3,873	9,365	20,045	6,286	2,650
9 Drainage established before 1950..... acres served 1960...	480	18,872	54,594	3,650	3,873	5,810	11,437	6,286	...
10 Area added, 1950-1959..... acres served 1960...	...	2,180	2,200	...	...	3,555	8,608	...	2,650
11 Area served by two or more projects..... acres served 1960...	...	...	141	...	...	...	...	...	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION									
12 Drains owned by one landowner..... number of projects...	...	...	...	...	...	...	...	...	4
13 acres served ²...	...	...	...	...	...	...	...	...	2,650
14 Cooperative or mutual drains..... number of projects...	...	11	10	...	...	7	9	...	...
15 acres served ²...	...	9,110	15,535	...	...	6,035	7,518	...	...
16 Legally organized public drains..... number of projects...	1	1	4	2	4	1	7	1	...
17 acres served ² ...	480	11,942	41,400	3,650	3,873	3,330	12,527	6,286	...
PROJECTS, 1960, BY YEAR STARTED									
18 1950-1959..... number of projects...	...	3	4	...	...	3	10	...	4
19 acres served ²...	...	2,180	5,200	...	...	3,385	8,608	...	2,650
20 Prior to 1950..... number of projects...	1	9	10	2	4	5	6	1	...
21 acres served ² ...	480	18,872	51,735	3,650	3,873	5,980	11,437	6,286	...
DRAINAGE OPERATIONS, 1950-1959 ³									
22 Cost of drainage works and services..... projects reporting...	...	4	6	...	...	5	10	...	4
23 dollars...	...	12,100	35,057	...	...	25,476	42,424	...	4,000
24 New drainage works constructed, enlarged, or installed..... projects reporting...	...	3	3	...	...	4	10	...	4
25 dollars...	...	11,600	3,810	...	...	10,708	42,424	...	4,000
26 Open ditches..... projects reporting...	...	3	3	...	...	4	10	...	4
27 length, miles...	...	3.9	1.6	...	...	7.2	19.1	...	2.5
28 Tile or covered drains..... projects reporting...	...	...	...	...	...	...	...	...	...
29 length, miles...	...	...	...	...	...	...	...	...	...
30 Levees or dikes..... projects reporting...	...	...	...	...	...	...	...	...	...
31 length, miles...	...	...	...	...	...	...	...	...	...
32 Pumps..... projects reporting...	...	...	...	...	...	...	...	...	...
33 number of pumps...	...	...	...	...	...	...	...	...	...
34 Other (see text)..... projects reporting...	...	...	...	...	...	...	...	...	...
35 Cost of maintenance, operation, repair, and administration..... projects reporting...	...	1	3	...	...	2	...	...	...
36 dollars...	...	500	31,247	...	...	14,768	...	...	...

¹Land served by two or more projects counted only once.²Acres served by two projects are included for each project. See text.³Includes projects taken over by another project prior to 1960. See text.

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	Hoke	Hyde	Iredell	Johnston	Jones	Lenoir	Lincoln	McDowell	Martin
AREA									
1 Approximate land area..... acres 1960...	243,840	405,760	378,240	508,800	298,880	250,240	197,120	282,880	307,840
2 Land in farms..... acres 1959...	110,403	79,530	250,786	388,977	105,114	202,180	126,667	65,030	190,287
3 Drainage projects..... number 1960...	1	20	13	1	3	17	3	1	8
4	1	17	12	...	2	7	3	1	2
5 Total area in drainage projects ¹ acres served 1960...	900	50,220	35,771	1,678	13,845	29,304	6,678	985	43,885
6	900	32,454	34,397	...	1,100	14,039	6,678	985	1,000
7 Area not used for agriculture or not drained..... acres served 1960...	...	...	...	...	...	...	...	...	1,500
8 Net area drained and used for agriculture..... acres served 1960...	900	50,220	35,771	1,678	13,845	29,304	6,678	985	42,385
9 Drainage established before 1950..... acres served 1960...	900	37,095	35,771	...	...	14,039	6,678	985	1,000
10 Area added, 1950-1959..... acres served 1960...	...	13,125	...	1,678	13,845	15,265	...	...	41,385
11 Area served by two or more projects..... acres served 1960...	...	5,180	...	...	...	...	...	...	700
PROJECTS, 1960, BY TYPE OF ORGANIZATION									
12 Drains owned by one landowner..... number of projects...	...	1	...	...	...	...	...	...	1
13 .....	...	7,000	...	...	...	...	...	...	1,700
14 Cooperative or mutual drains..... number of projects...	1	15	...	1	2	13	...	...	2
15	900	21,078	...	1,678	9,070	20,540	...	...	3,700
16 Legally organized public drains..... number of projects...	...	4	13	...	1	4	3	1	5
17 .....	...	28,162	35,771	...	4,775	8,764	6,678	985	37,685
PROJECTS, 1960, BY YEAR STARTED									
18 1950-1959..... number of projects...	...	7	...	1	3	10	...	...	6
19 .....	...	23,272	...	1,678	13,845	15,265	...	...	41,385
20 Prior to 1950..... number of projects...	1	13	13	...	...	7	3	1	2
21	900	32,968	35,771	...	...	14,039	6,678	985	1,700
DRAINAGE OPERATIONS, 1950-1959 ³									
22 Cost of drainage works and services.....projects reporting...	(⁴)	17	...	(⁴)	3	13	...	...	6
23	(⁴)	374,508	...	(⁴)	129,266	80,449	...	...	267,407
24 New drainage works constructed, enlarged, or installed.....projects reporting...	...	8	...	(⁴)	3	11	...	...	6
25 .....	...	317,279	...	(⁴)	129,266	76,604	...	...	267,407
26 Open ditches.....projects reporting...	...	6	...	(⁴)	3	11	...	...	6
27 .....	...	48.4	...	(⁴)	12.6	26.8	...	...	49.7
28 Tile or covered drains.....projects reporting...	...	...	...	...	...	...	...	...	...
29 .....	...	...	...	...	...	...	...	...	...
30 Levees or dikes.....projects reporting...	...	2	...	...	...	...	...	...	...
31 .....	...	13.7	...	...	...	...	...	...	...
32 Pumps.....projects reporting...	...	2	...	...	...	...	...	...	...
33 .....	...	5	...	...	...	...	...	...	...
34 Other (see text).....projects reporting...	...	5	...	...	...	...	...	...	...
35 Cost of maintenance, operation, repair, and administration.....projects reporting...	(⁴)	14	...	...	...	3	...	...	...
36	(⁴)	57,229	...	...	...	3,845	...	...	...

¹Land served by two or more projects counted only once.
²Acres served by two projects are included for each project. See text.
³Includes projects taken over by another project prior to 1960. See text.
⁴Included in State total only.

DRAINAGE OF AGRICULTURAL LANDS

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data.]

Item and Census year	Mecklenburg	New Hanover	Pamlico	Pasquotank	Pender	Perquimans	Pitt	Robeson
AREA								
1 Approximate land area.....acres 1960...	346,880	124,160	218,240	146,560	548,480	167,040	419,840	604,160
2 Land in farms.....acres 1959...	141,165	17,912	61,781	71,196	138,542	87,611	304,500	387,700
3 Drainage projects..... number 1960...	1	10	15	24	8	16	75	67
4 1950...	22	...	8	23	6	14	49	51
5 Total area in drainage projects ¹ acres served 1960...	41,374	7,900	18,958	22,602	27,299	35,002	217,102	108,197
6 1950...	37,649	...	11,481	20,373	25,779	30,385	200,731	95,620
7 Area not used for agriculture or not drained..... acres served 1960...	8,867	...	...	...	...	1,000	...	...
8 Net area drained and used for agriculture..... acres served 1960...	32,507	7,900	18,958	22,602	27,299	34,002	217,102	108,197
9 Drainage established before 1950..... acres served 1960...	32,507	...	12,014	21,913	25,779	24,020	200,731	92,430
10 Area added, 1950-1959..... acres served 1960...	...	7,900	6,944	689	1,520	9,982	16,371	15,767
11 Area served by two or more projects..... acres served 1960...	...	...	...	5,856	...	...	32,366	500
PROJECTS, 1960, BY TYPE OF ORGANIZATION								
12 Drains owned by one landowner..... number of projects...	...	...	1	2	1	1	6	...
13 acres served ²..	...	...	1,400	3,900	520	900	4,210	...
14 Cooperative or mutual drains..... number of projects...	...	10	11	18	1	12	48	62
15 acres served ²..	...	7,900	13,101	15,092	900	15,902	42,083	65,129
16 Legally organized public drains..... number of projects...	1	...	3	4	6	3	21	5
17 acres served ² ..	32,507	...	4,457	9,466	25,879	17,200	203,575	43,568
PROJECTS, 1960, BY YEAR STARTED								
18 1950-1959..... number of projects...	...	10	6	3	2	6	26	16
19 acres served ²..	...	7,900	6,944	2,731	1,420	11,642	35,617	15,305
20 Prior to 1950..... number of projects...	1	...	9	21	6	10	49	51
21 acres served ² ..	32,507	...	12,014	25,727	25,879	22,360	214,251	93,392
DRAINAGE OPERATIONS, 1950-1959 ³								
22 Cost of drainage works and services.....projects reporting...	1	10	8	9	4	7	38	21
23 dollars...	227,275	77,800	48,057	13,180	32,700	33,630	241,354	100,510
24 New drainage works constructed, enlarged, or installed.....projects reporting...	1	10	6	5	3	6	30	17
25 dollars...	48,000	77,800	46,557	9,863	14,500	32,130	205,482	99,560
26 Open ditches.....projects reporting...	1	10	6	5	3	6	30	17
27 length, miles...	3.0	48.2	19.4	8.4	13.8	14.8	80.0	53.0
28 Tile or covered drains.....projects reporting...	...	...	...	...	...	...	...	...
29 length, miles...	...	...	...	...	...	...	...	...
30 Levees or dikes.....projects reporting...	...	...	...	...	...	...	...	...
31 length, miles...	...	...	...	...	...	...	...	...
32 Pumps.....projects reporting...	...	...	...	...	...	...	...	...
33 number of pumps...	...	...	...	...	...	...	...	...
34 Other (see text).....projects reporting...	...	...	...	...	...	...	...	...
35 Cost of maintenance, operation, repair, and administration.....projects reporting...	1	...	2	4	1	1	10	4
36 dollars...	179,275	...	1,500	3,317	18,200	1,500	35,872	950

¹Land served by two or more projects counted only once.²Acres served by two projects are included for each project. See text.³Includes projects taken over by another project prior to 1960. See text.

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	Rowan	Sampson	Scotland	Tyrrell	Washington	Wayne	Wilson
AREA							
1 Approximate land area.....acres 1960...	330,880	616,320	202,880	255,360	215,040	355,200	238,720
2 Land in farms.....acres 1959...	188,436	379,782	90,200	37,641	107,938	258,955	190,678
3 Drainage projects..... number 1960...	6	1	2	13	35	4	3
4 1950...	7	1	2	16	19	2	3
5 Total area in drainage projects ¹ acres served 1960...	76,838	14,436	1,850	25,522	87,523	6,281	3,664
6 1950...	79,629	14,436	1,850	17,842	61,228	5,220	3,664
7 Area not used for agriculture or not drained..... acres served 1960...	...	...	...	5,000	17,642	...	...
8 Net area drained and used for agriculture..... acres served 1960...	76,838	14,436	1,850	20,522	69,881	6,281	3,664
9 Drainage established before 1950..... acres served 1960...	76,838	14,436	1,850	12,022	56,155	5,220	3,664
10 Area added, 1950-1959..... acres served 1960...	...	...	...	8,500	13,726	1,061	...
11 Area served by two or more projects..... acres served 1960...	640	...	...	...	16,495	...	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION							
12 Drains owned by one landowner..... number of projects...	...	...	...	...	9	...	...
13 acres served ²...	...	...	...	...	28,841	...	...
14 Cooperative or mutual drains.....number of projects...	...	...	2	10	22	2	2
15 acres served ²...	...	...	1,850	16,880	29,506	1,061	1,864
16 Legally organized public drains..... number of projects...	6	1	...	3	4	2	1
17 acres served ² ...	77,478	14,436	...	3,642	28,029	5,220	1,800
PROJECTS, 1960, BY YEAR STARTED							
18 1950-1959.....number of projects...	...	...	...	4	15	2	...
19 acres served ²...	...	...	...	4,500	39,685	1,061	...
20 Prior to 1950.....number of projects...	6	1	2	9	20	2	3
21 acres served ² ...	77,478	14,436	1,850	16,022	46,691	5,220	3,664
DRAINAGE OPERATIONS, 1950-1959³							
22 Cost of drainage works and services.....projects reporting...	1	...	2	8	26	3	1
23 dollars...	600	...	1,100	156,084	342,600	9,055	1,000
24 New drainage works constructed, enlarged, or installed.....projects reporting...	...	...	...	5	12	2	...
25 dollars...	...	...	...	77,670	227,250	7,555	...
26 Open ditches.....projects reporting...	...	...	...	5	12	2	...
27 length, miles...	...	...	...	29.1	259.0	3.8	...
28 Tile or covered drains.....projects reporting...	...	...	...	...	1	...	...
29 length, miles...	...	...	...	...	4.1	...	...
30 Levees or dikes.....projects reporting...	...	...	...	...	1	...	...
31 length, miles...	...	...	...	...	7.0	...	...
32 Pumps.....projects reporting...	...	...	...	...	1	...	...
33 number of pumps...	...	...	...	...	2	...	...
34 Other (see text).....projects reporting...	...	...	...	...	...	...	...
35 Cost of maintenance, operation, repair, and administration.....projects reporting...	1	...	2	5	19	1	1
36 dollars...	600	...	1,100	78,414	115,350	1,500	1,000

¹Land served by two or more projects counted only once.
²Acres served by two projects are included for each project. See text.
³Includes projects taken over by another project prior to 1960. See text.

State Table 1.—DRAINAGE PROJECTS—NUMBER, AREA, COST, AND WORKS, 1920 TO 1960

[See text for comparability of data]

Item	1960 Census	1950 Census	1940 Census	1930 Census	1920 Census
AREA					
Approximate land area.....acres...	44,452,480	44,836,480	44,834,560	44,917,120	44,917,120
Land in farms.....acres...	41,465,717	41,194,044	37,936,136	38,657,894	36,214,751
Drainage projects.....number...	161	21	¹ 141	NA	NA
Total area in drainage projects.....acres served...	1,642,543	1,572,220	1,376,041	1,094,142	1,240,328
Area not used for agriculture or not drained.....acres served...	1,360	NA	NA	NA	NA
Net area drained and used for agriculture.....acres served...	1,641,183	NA	² 1,322,573	² 1,094,114	NA
Drainage established 10 years or more before Census date.....acres served...	1,517,023	NA	NA	NA	NA
Drainage established within 10 years of Census date.....acres served...	124,160	NA	NA	NA	NA
Area served by two or more projects.....acres served...	87,840	NA	464,740	89,240	...
PROJECTS BY TYPE OF ORGANIZATION					
Drains owned by one landowner.....number of projects...	...	(³)	NA	NA	...
.....acres served...	...	(³)	(³)	(³)	...
Cooperative or mutual drains.....number of projects...	144	(³)	...	...	...
.....acres served...	200,630	(³)	...	...	...
Legally organized public drains.....number of projects...	17	³ 15	NA	NA	NA
.....acres served...	1,531,553	³ 1,565,055	³ 1,356,113	³ 1,088,053	1,240,328
PROJECTS BY YEAR STARTED					
Started 10 years or more before Census date.....number of projects...	134	NA	NA	NA	NA
.....acres served...	1,676,633	NA	1,376,041	1,064,423	875,054
Started within 10 years of Census date.....number of projects...	27	NA	...	NA	NA
.....acres served...	55,550	NA	...	29,719	365,274
OPERATIONS, 10-YEAR PERIOD PRECEDING CENSUS DATE					
Cost of drainage works and services.....projects reporting...	41	13	NA	NA	NA
.....dollars...	1,672,790	890,373	NA	NA	NA
New drainage works constructed, enlarged, or installed.....projects reporting...	37	⁴ 6	NA	NA	NA
.....cost, dollars...	649,652	⁴ 245,364	NA	NA	NA
Open ditches.....projects reporting...	35	6	NA	NA	NA
.....length, miles...	168.5	94	NA	NA	NA
Tile or covered drains.....projects reporting...	...	...	NA	NA	NA
.....length, miles...	...	...	NA	NA	NA
Levees or dikes.....projects reporting...	1	...	NA	NA	NA
.....length, miles...	3.5	...	NA	NA	NA
Pumps.....projects reporting...	...	NA	NA	NA	NA
.....number of pumps...	...	NA	NA	NA	NA
Other (see text).....projects reporting...	2	NA	NA	NA	NA
Cost of maintenance, operation, repair, and administration.....projects reporting...	13	13	NA	NA	NA
.....dollars...	1,023,138	645,009	NA	NA	NA
STATUS ON CENSUS DATE					
Capital investment.....dollars...	NA	NA	3,673,336	3,148,919	2,208,049
Physical works:					
Open ditches.....length, miles...	NA	NA	940.4	817.6	708.3
Tile drains.....length, miles...	NA	NA	10.4	9.6	9.3
Levees and dikes.....length, miles...	NA	NA	...	...	2.1
Pumping units.....number of units...	NA	NA	...	...	...

NA Not available.

¹In 1940, each county drain was counted as a separate project. See text.

²Not fully comparable. See text.

³In 1950, all projects included with county drains except 6 counties and 7,165 acres from Census of Irrigation; in 1940, figures exclude 19,928 acres in "irrigation enterprises"; in 1930, figures exclude 6,089 acres in "irrigation enterprises."

⁴Cost of new works for land not previously drained.

DRAINAGE OF AGRICULTURAL LANDS

State Table 2.—DRAINAGE

	Size of project (Based on area of agricultural land in project)	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	161	1,732,183	178,840	144	1,608,023	29	124,160
2	500 to 999 acres.....	78	52,640	22,690	67	45,090	11	7,550
3	1,000 to 1,999 acres.....	45	62,610	23,680	43	57,170	4	5,440
4	2,000 to 4,999 acres.....	19	56,660	31,670	16	46,940	4	9,720
5	5,000 to 9,999 acres.....	9	63,648	14,400	8	47,428	3	16,220
6	10,000 to 19,999 acres.....	1	18,176	...	1	18,176	...	...
7	20,000 to 49,999 acres.....	2	87,228	2,800	2	69,820	1	17,408
8	50,000 to 99,999 acres.....	1	59,309	1,440	1	59,069	1	240
9	100,000 or more acres.....	6	1,331,912	82,160	6	1,264,330	5	67,582

State Table 3.—DRAINAGE PROJECTS, 1960,

	Type of organization	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	161	1,732,183	178,840	144	1,608,023	29	124,160
2	Drains owned by one landowner.....	...	...	...	...	...	...	...
3	Cooperative or mutual drains.....	144	200,630	89,680	128	169,880	18	30,750
4	Legally organized public drains.....	17	1,531,553	89,160	16	1,438,143	11	93,410

State Table 4.—DRAINAGE PROJECTS, 1960,

	Year of organization	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	161	1,732,183	178,840	144	1,608,023	29	124,160
2	1960-1969.....	27	55,550	13,960	10	19,080	21	36,470
3	Prior to 1960.....	134	1,676,633	164,880	134	1,588,943	8	87,690

PROJECTS, 1960, BY SIZE

Cost of drainage works and services, 1950-1959				New works constructed, enlarged, or installed, 1950-1959									
Total		For new works		Open ditches		Tile or covered drains		Levees and dikes		Pumps		Other, projects reporting	
Projects reporting	Dollars	Projects reporting	Dollars	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Number		
41	1,672,790	37	649,652	35	168.5	...	...	1	3.5	...	...	2	1
15	40,845	15	40,645	15	30.2	...	...	...	...	...	...	...	2
6	21,944	4	18,244	4	11.2	...	...	...	...	...	...	...	3
6	27,648	6	27,648	6	23.0	...	...	...	...	...	...	...	4
5	125,443	3	80,996	3	21.4	...	...	...	...	...	...	...	5
1	22,340	1	20,000	...	...	...	...	...	...	...	...	...	6
1	62,731	1	58,637	1	20.7	...	...	...	...	...	...	...	7
1	14,893	1	6,059	1	4.7	...	...	...	...	...	...	...	8
6	1,356,946	6	397,423	5	57.3	...	...	1	3.5	...	...	1	9

BY TYPE OF ORGANIZATION

Cost of drainage works and services, 1950-1959				New works constructed, enlarged, or installed, 1950-1959									
Total		For new works		Open ditches		Tile or covered drains		Levees and dikes		Pumps		Other, projects reporting	
Projects reporting	Dollars	Projects reporting	Dollars	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Number		
41	1,672,790	37	649,652	35	168.5	...	...	1	3.5	...	...	2	1
...	...	...	...	...	...	...	...	...	...	...	...	...	2
26	113,219	24	109,319	24	68.7	...	...	...	...	...	...	...	3
15	1,559,571	13	540,333	11	99.8	...	...	1	3.5	...	...	2	4

BY YEAR OF ORGANIZATION

Cost of drainage works and services, 1950-1959				New works constructed, enlarged, or installed, 1950-1959									
Total		For new works		Open ditches		Tile or covered drains		Levees and dikes		Pumps		Other, projects reporting	
Projects reporting	Dollars	Projects reporting	Dollars	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Number		
41	1,672,790	37	649,652	35	168.5	...	...	1	3.5	...	...	2	1
27	158,137	27	157,937	27	82.3	...	...	...	...	...	...	...	2
14	1,514,653	10	491,715	8	86.2	...	...	1	3.5	...	...	2	3

DRAINAGE OF AGRICULTURAL LANDS

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	The State	Barnes	Benson	Bottineau	Cass	Cavalier	Grand Forks	LaMoure	McHenry	
AREA										
1	Approximate land area.....acres 1960...	44,452,480	945,920	903,680	1,087,360	1,119,360	968,320	920,320	727,680	1,209,600
2	Land in farms.....acres 1959...	41,465,717	927,852	811,326	1,003,165	1,101,422	929,113	865,313	718,172	1,113,455
3	Drainage projects..... number 1960...	161	1	2	1	45	1	18	1	1
4	..... 1950...	21	1	...	1	1	1	1	1	1
5	Total area in drainage projects ¹ acres served 1960...	1,642,543	5,420	1,100	46,592	384,238	5,504	149,164	3,680	6,724
6	..... 1950...	1,572,220	2,960	...	50,688	336,918	5,504	137,472	3,680	10,920
7	Area not used for agriculture or not drained..... acres served 1960...	1,360	...	...	...	1,360	...	...	...	...
8	Net area drained and used for agriculture..... acres served 1960...	1,641,183	5,420	1,100	46,592	382,878	5,504	149,164	3,680	6,724
9	Drainage established before 1950..... acres served 1960...	1,517,023	2,960	...	29,184	334,628	5,504	137,472	3,680	6,724
10	Area added, 1950-1959..... acres served 1960...	124,160	2,460	1,100	17,408	48,250	...	11,692	...	...
11	Area served by two or more projects..... acres served 1960...	87,840	...	...	...	45,520	...	12,360	...	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION										
12	Drains owned by one landowner..... number of projects...	...	...	...	...	...	...	...	...	...
13	..... acres served ²..	...	...	...	...	...	...	...	...	...
14	Cooperative or mutual drains.....number of projects...	144	...	2	...	44	...	16	...	...
15	..... acres served ² ..	200,630	...	1,100	...	98,070	...	21,530	...	...
16	Legally organized public drains..... number of projects...	17	1	...	1	1	1	2	1	1
17	..... acres served ² ..	1,531,553	5,420	...	46,592	332,248	5,504	141,234	3,680	6,724
PROJECTS, 1960, BY YEAR STARTED										
18	1950-1959..... number of projects...	27	...	2	...	8	...	7	...	...
19	..... acres served ² ..	55,550	...	1,100	...	25,420	...	8,280	...	...
20	Prior to 1950..... number of projects...	134	1	...	1	37	1	11	1	1
21	..... acres served ² ..	1,676,633	5,420	...	46,592	404,898	5,504	154,484	3,680	6,724
DRAINAGE OPERATIONS, 1950-1959³										
22	Cost of drainage works and services.....projects reporting...	41	1	2	1	9	1	9	...	1
23	..... dollars...	1,672,790	9,596	1,814	62,731	376,437	12,764	159,678	...	31,683
24	New drainage works constructed, enlarged, or installed.....projects reporting...	37	1	2	1	9	...	8	...	...
25	..... dollars...	649,652	9,596	1,614	58,637	276,099	...	75,678	...	...
26	Open ditches.....projects reporting...	35	1	2	1	9	...	8	...	...
27	..... length, miles...	168.5	3.5	1.3	20.7	53.5	...	23.3	...	...
28	Tile or covered drains.....projects reporting...	...	...	...	...	...	...	...	...	...
29	..... length, miles...	...	...	...	...	...	...	...	...	...
30	Levees or dikes.....projects reporting...	1	...	...	...	...	...	...	...	...
31	..... length, miles...	3.5	...	...	...	...	...	...	...	...
32	Pumps.....projects reporting...	...	...	...	...	...	...	...	...	...
33	..... number of pumps...	...	...	...	...	...	...	...	...	...
34	Other (see text).....projects reporting...	2	...	...	...	...	...	...	...	...
35	Cost of maintenance, operation, repair, and administration.....projects reporting...	13	...	1	1	1	1	2	...	1
36	..... dollars...	1,023,138	...	200	4,094	100,338	12,764	84,000	...	31,683

¹Land served by two or more projects counted only once.
²Acres served by two projects are included for each project. See text.
³Includes projects taken over by another project prior to 1960. See text.

County Table 1. --DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	Femina	Ramsey	Ransom	Richland	Sargent	Steele	Traill	Walsh	All other counties ¹
AREA									
1 Approximate land area.....acres 1960...	719,360	776,960	552,320	928,000	547,200	454,400	551,040	823,680	8,651,520
2 Land in farms.....acres 1959...	690,735	752,948	476,584	853,270	514,375	441,175	531,713	816,445	7,943,567
3 Drainage projects.....number 1960...	5	1	5	36	3	2	25	14	...
4 1950...	1	1	1	1	1	...	1	1	7
5 Total area in drainage projects ².....acres served 1960...	255,959	18,176	41,216	305,114	158,451	1,400	193,006	66,799	...
6 1950...	243,139	18,176	41,216	291,234	158,451	...	177,816	63,329	30,717
7 Area not used for agriculture or not drained.....acres served 1960...	...	...	...	...	...	...	...	...	...
8 Net area drained and used for agriculture.....acres served 1960...	255,959	18,176	41,216	305,114	158,451	1,400	193,006	66,799	...
9 Drainage established before 1950.....acres served 1960...	243,139	18,176	41,216	293,834	158,451	...	177,816	64,239	...
10 Area added, 1950-1959.....acres served 1960...	12,820	...	...	11,280	...	1,400	15,190	2,560	...
11 Area served by two or more projects.....acres served 1960...	1,000	...	2,800	14,560	640	...	9,360	1,600	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION									
12 Drains owned by one landowner.....number of projects...	...	...	...	...	...	...	...	...	...
13 acres served ³..	...	...	...	...	...	...	...	...	...
14 Cooperative or mutual drains.....number of projects...	4	...	4	35	2	2	22	13	...
15 acres served ³ ..	4,640	...	3,380	39,190	1,240	1,400	20,990	9,090	...
16 Legally organized public drains.....number of projects...	1	1	1	1	1	...	3	1	...
17 acres served ³ ..	252,319	18,176	40,636	280,484	157,851	...	181,376	59,309	...
PROJECTS, 1960, BY YEAR STARTED									
18 1960-1959.....number of projects...	...	...	...	2	...	2	4	2	...
19 acres served ³..	...	...	...	5,120	...	1,400	11,910	2,320	...
20 Prior to 1950.....number of projects...	5	1	5	34	3	...	21	12	...
21 acres served ³ ..	256,959	18,176	44,016	314,554	159,091	...	190,456	66,079	...
DRAINAGE OPERATIONS, 1960-1959 ⁴									
22 Cost of drainage works and services.....projects reporting...	1	1	...	3	1	2	6	3	...
23 dollars...	488,272	22,340	...	195,265	2,998	5,999	281,501	21,712	...
24 New drainage works constructed, enlarged, or installed.....projects reporting...	1	1	...	3	1	2	5	3	...
25 dollars...	47,024	20,000	...	42,473	2,998	5,999	96,656	12,878	...
26 Open ditches.....projects reporting...	1	...	...	3	...	2	5	3	...
27 length, miles...	15.2	...	...	13.9	...	5.0	23.5	8.6	...
28 Tile or covered drains.....projects reporting...	...	...	...	...	...	...	...	...	...
29 length, miles...	...	...	...	...	...	...	...	...	...
30 Levees or dikes.....projects reporting...	...	...	...	...	1	...	...	...	...
31 length, miles...	...	...	...	...	3.5	...	...	...	...
32 Pumps.....projects reporting...	...	...	...	...	...	...	...	...	...
33 number of pumps...	...	...	...	...	...	...	...	...	...
34 Other (see text).....projects reporting...	...	1	...	...	1	...	...	...	...
35 Cost of maintenance, operation, repair, and administration.....projects reporting...	1	1	...	1	...	...	2	1	...
36 dollars...	441,248	2,340	...	152,792	...	...	184,845	8,834	...

¹Includes Divide, Grant, McKenzie, Morton, Mountreil, Ward, and Williams counties.

²Land served by two or more projects counted only once.

³Acres served by two projects are included for each project. See text.

⁴Includes projects taken over by another project prior to 1960. See text.

State Table 1.—DRAINAGE PROJECTS—NUMBER, AREA, COST, AND WORKS, 1920 TO 1960

[See text for comparability of data.]

Item	1960 Census	1950 Census	1940 Census	1930 Census	1920 Census
AREA					
Approximate land area.....acres...	26,222,080	26,240,000	26,318,080	26,073,600	26,073,600
Land in farms.....acres...	18,506,796	20,969,411	21,907,523	21,514,059	23,515,888
Drainage projects.....number...	142	63	¹ 11,530	NA	NA
Total area in drainage projects.....acres served...	8,904,907	8,923,362	7,729,267	8,165,494	8,107,204
Area not used for agriculture or not drained.....acres served...	95,492	NA	NA	NA	NA
Net area drained and used for agriculture.....acres served...	8,809,415	NA	² 7,173,937	² 8,132,973	NA
Drainage established 10 years or more before Census date.....acres served...	8,747,745	NA	NA	NA	NA
Drainage established within 10 years of Census date.....acres served...	61,670	NA	NA	NA	NA
Area served by two or more projects.....acres served...	64,162	NA	17,482,794	15,845,135	15,357,608
PROJECTS BY TYPE OF ORGANIZATION					
Drains owned by one landowner.....number of projects...	3	³	...	...	NA
acres served ⁴ ..	2,424	³	...	...	⁴ 7,736
Cooperative or mutual drains.....number of projects...	76	³	...	...	...
acres served ⁵ ..	88,555	³	...	...	...
Legally organized public drains.....number of projects...	63	³ 63	NA	NA	NA
acres served ⁵ ..	8,782,878	³ 8,923,362	7,729,267	8,165,494	⁴ 8,097,553
PROJECTS BY YEAR STARTED					
Started 10 years or more before Census date.....number of projects...	79	NA	NA	NA	NA
acres served...	8,805,054	NA	6,404,904	7,784,986	⁵ 7,161,648
Started within 10 years of Census date.....number of projects...	63	NA	NA	NA	NA
acres served...	68,803	NA	1,324,363	380,508	⁵ 943,200
OPERATIONS, 10-YEAR PERIOD PRECEDING CENSUS DATE					
Cost of drainage works and services.....projects reporting...	113	54	NA	NA	NA
dollars...	8,268,377	6,189,421	NA	NA	NA
New drainage works constructed, enlarged, or installed.....projects reporting...	53	⁶ 8	NA	NA	NA
cost, dollars...	267,635	⁶ 147,941	NA	NA	NA
Open ditches.....projects reporting...	47	8	NA	NA	NA
length, miles...	57.3	38	NA	NA	NA
Tile or covered drains.....projects reporting...	18	5	NA	NA	NA
length, miles...	68.7	7	NA	NA	NA
Levees or dikes.....projects reporting...	...	...	NA	NA	NA
length, miles...	...	...	NA	NA	NA
Pumps.....projects reporting...	...	NA	NA	NA	NA
number of pumps...	...	NA	NA	NA	NA
Other (see text).....projects reporting...	6	NA	NA	NA	NA
Cost of maintenance, operation, repair, and administration.....projects reporting...	77	53	NA	NA	NA
dollars...	8,000,742	6,041,480	NA	NA	NA
STATUS ON CENSUS DATE					
Capital investment.....dollars...	NA	NA	35,215,586	36,836,449	30,680,145
Physical works:					
Open ditches.....length, miles...	NA	NA	18,732.2	25,048.2	24,984.0
Tile drains.....length, miles...	NA	NA	10,163.9	9,371.6	9,205.3
Levees and dikes.....length, miles...	NA	NA	5.2	0.3	9.6
Pumping units.....number of units...	NA	NA	...	1	NA

NA Not available.

¹In 1940, each county drain was counted as a separate project. See text.²Not fully comparable. See text.³All projects in 1950 included with county drains. See text.⁴1920 figures exclude 1,915 acres for which type of organization was not reported.⁵1920 figures exclude 2,356 acres for which date of organization was not reported.⁶Cost of new works for lands not previously drained.

DRAINAGE OF AGRICULTURAL LANDS

State Table 2.—DRAINAGE

	Size of project (Based on area of agricultural land in project)	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	142	8,873,857	128,604	122	8,812,187	38	61,670
2	500 to 999 acres.....	46	31,479	19,244	32	21,537	18	9,942
3	1,000 to 1,999 acres.....	28	38,053	26,658	23	30,623	7	7,430
4	2,000 to 4,999 acres.....	13	42,520	18,540	12	39,520	2	3,000
5	5,000 to 9,999 acres.....	1	5,536	...	1	5,536	...	...
6	10,000 to 19,999 acres.....	8	118,498	...	8	117,818	1	680
7	20,000 to 49,999 acres.....	6	238,003	9,880	6	232,474	2	5,529
8	50,000 to 99,999 acres.....	7	532,618	10,171	7	519,504	2	13,114
9	100,000 or more acres.....	33	7,867,150	44,111	33	7,845,175	6	21,975

State Table 3.—DRAINAGE PROJECTS, 1960,

	Type of organization	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	142	8,873,857	128,604	122	8,812,187	38	61,670
2	Drains owned by one landowner.....	3	2,424	1,924	3	2,424	...	...
3	Cooperative or mutual drains.....	76	88,555	62,518	56	68,183	27	20,372
4	Legally organized public drains.....	63	8,782,878	64,162	63	8,741,580	11	41,298

State Table 4.—DRAINAGE PROJECTS, 1960,

	Year of organization	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	142	8,873,857	128,604	122	8,812,187	38	61,670
2	1950-1959.....	63	68,803	47,911	43	49,411	25	19,392
3	Prior to 1950.....	79	8,805,054	80,693	79	8,762,776	13	42,278

PROJECTS, 1960, BY SIZE

Cost of drainage works and services, 1950-1959				New works constructed, enlarged, or installed, 1950-1959									
Total		For new works		Open ditches		Tile or covered drains		Levees and dikes		Pumps		Other, projects reporting	
Projects reporting	Dollars	Projects reporting	Dollars	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Number		
113	8,268,377	53	267,635	47	57.3	18	68.7	...	...	...	...	6	1
36	211,169	29	141,975	27	34.0	9	58.7	...	...	...	...	4	2
24	65,459	16	30,665	15	14.1	1	1.0	...	...	...	...	1	3
7	33,667	2	7,740	1	0.6	2	0.7	...	...	...	...	...	4
...	...	...	...	...	...	...	...	...	...	...	...	...	5
2	267,672	...	...	...	...	...	...	...	...	...	...	...	6
4	124,744	1	6,402	1	1.4	1	0.1	...	...	...	...	...	7
7	252,009	1	22,500	1	6.0	1	1.7	...	...	...	...	...	8
33	7,313,657	4	58,353	2	1.2	4	6.5	...	...	...	...	1	9

BY TYPE OF ORGANIZATION

Cost of drainage works and services, 1950-1959				New works constructed, enlarged, or installed, 1950-1959									
Total		For new works		Open ditches		Tile or covered drains		Levees and dikes		Pumps		Other, projects reporting	
Projects reporting	Dollars	Projects reporting	Dollars	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Number		
113	8,268,377	53	267,635	47	57.3	18	68.7	...	...	...	...	6	1
2	76,900	2	40,900	2	2.3	1	37.7	...	...	...	...	...	2
65	233,395	45	139,480	41	46.4	11	22.7	...	...	...	...	5	3
46	7,958,082	6	87,255	4	8.6	6	8.3	...	...	...	...	1	4

BY YEAR OF ORGANIZATION

Cost of drainage works and services, 1950-1959				New works constructed, enlarged, or installed, 1950-1959									
Total		For new works		Open ditches		Tile or covered drains		Levees and dikes		Pumps		Other, projects reporting	
Projects reporting	Dollars	Projects reporting	Dollars	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Number		
113	8,268,377	53	267,635	47	57.3	18	68.7	...	...	...	...	6	1
62	220,250	44	139,300	40	45.4	11	22.7	...	...	...	...	5	2
51	8,048,127	9	128,335	7	11.9	7	46.0	...	...	...	...	1	3

DRAINAGE OF AGRICULTURAL LANDS

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	The State	Allen	Ashland	Ash- hula	Auglaize	Brown	Butler	Cham- paign	Clark
AREA									
1 Approximate land area.....acres 1960...	26,222,080	262,400	267,520	451,840	256,000	314,240	301,440	277,120	257,280
2 Land in farms.....acres 1959...	18,506,796	206,047	214,151	243,120	232,589	269,075	219,987	247,776	211,762
8 Drainage projects..... number 1960...	142	1	1	1	2	6	2	9	6
4 1950...	63	1	1	1	1	1	1	1	1
5 Total area in drainage projects ¹ acres served 1960...	8,904,907	215,018	11,059	45,000	247,223	8,005	4,581	174,245	43,958
6 1950...	8,923,362	227,520	11,059	45,000	247,223	4,059	3,941	165,376	31,248
7 Area not used for agriculture or not drained..... acres served 1960...	95,492	...	...	2,880	...	...	...	...	...
8 Net area drained and used for agriculture..... acres served 1960...	8,809,415	215,018	11,059	42,120	247,223	8,005	4,581	174,245	43,958
9 Drainage established before 1950..... acres served 1960...	8,747,745	215,018	11,059	42,120	247,223	4,059	3,941	168,046	35,173
10 Area added, 1950-1959..... acres served 1960...	61,670	...	...	...	...	3,946	640	6,199	8,785
11 Area served by two or more projects..... acres served 1960...	64,162	...	...	...	600	...	...	10,482	500
PROJECTS, 1960, BY TYPE OF ORGANIZATION									
12 Drains owned by one landowner..... number of projects...	3	...	...	...	...	...	...	...	...
18 acres served ² ...	2,424	...	...	...	...	...	...	...	...
14 Cooperative or mutual drains..... number of projects...	76	...	...	...	1	5	1	8	5
15 acres served ² ...	88,555	...	...	...	600	3,946	640	13,492	5,296
16 Legally organized public drains..... number of projects...	63	1	1	1	1	1	1	1	1
17 acres served ² ...	8,782,878	215,018	11,059	42,120	247,223	4,059	3,941	171,235	39,162
PROJECTS, 1960, BY YEAR STARTED									
18 1960-1969..... number of projects...	63	...	...	...	1	5	1	5	4
19 acres served ² ...	68,803	...	...	...	600	3,946	640	5,662	3,611
20 Prior to 1960..... number of projects...	79	1	1	1	1	1	1	4	2
21 acres served ² ...	8,805,054	215,018	11,059	42,120	247,223	4,059	3,941	179,065	40,847
DRAINAGE OPERATIONS, 1950-1959 ³									
22 Cost of drainage works and services.....projects reporting...	113	1	1	...	2	5	(⁴)	9	6
23 dollars...	8,268,377	408,095	257,626	...	215,048	15,327	(⁴)	59,772	91,481
24 New drainage works constructed, enlarged, or installed.....projects reporting...	53	...	...	...	(⁴)	5	(⁴)	4	5
25 dollars...	267,635	...	...	...	(⁴)	15,327	(⁴)	11,779	10,750
26 Open ditches.....projects reporting...	47	...	...	...	...	5	(⁴)	3	5
27 length, miles...	57.3	...	...	...	...	11.4	(⁴)	2.2	3.7
28 Tile or covered drains.....projects reporting...	18	...	...	...	(⁴)	...	...	2	2
29 length, miles...	68.7	...	...	...	(⁴)	...	...	2.2	5.0
30 Levees or dikes.....projects reporting...	...	...	...	...	...	...	...	...	...
31 length, miles...	...	...	...	...	...	...	...	...	...
32 Pumps.....projects reporting...	...	...	...	...	...	...	...	...	...
33 number of pumps...	...	...	...	...	...	...	...	...	...
34 Other (see text).....projects reporting...	6	...	...	...	(⁴)	...	...	...	...
35 Cost of maintenance, operation, repair, and administration.....projects reporting...	77	1	1	...	(⁴)	...	...	9	4
36 dollars...	8,000,742	408,095	257,626	...	(⁴)	...	...	47,993	80,731

¹Land served by two or more projects counted only once.²Acres served by two projects are included for each project. See text.³Includes projects taken over by another project prior to 1960. See text.⁴Included in State total only.

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	Clermont	Clinton	Crawford	Cuyahoga	Darke	Defiance	Delaware	Erie	Fairfield
AREA									
1 Approximate land area.....acres 1960...	293,120	263,040	258,560	291,840	387,200	262,400	281,600	168,960	323,200
2 Land in farms.....acres 1959...	174,283	237,121	234,868	19,889	359,523	235,195	235,397	114,018	267,340
8 Drainage projects..... number 1960...	1	3	3	1	1	1	4	1	3
4 1950...	1	1	1	1	1	1	1	1	1
5 Total area in drainage projects ¹ acres served 1960...	2,130	96,882	157,472	16,640	387,200	253,952	189,440	125,512	48,890
6 1950...	2,130	96,882	152,072	33,280	387,200	241,152	189,056	128,512	46,365
7 Area not used for agriculture or not drained..... acres served 1960...	...	...	680	...	1,400	...	...	...	2,080
8 Net area drained and used for agriculture..... acres served 1960...	2,130	96,882	156,792	16,640	385,800	253,952	189,440	125,512	46,810
9 Drainage established before 1950..... acres served 1960...	2,130	96,882	150,392	16,640	385,800	253,952	189,056	125,512	46,810
10 Area added, 1950-1959..... acres served 1960...	...	...	6,400	...	...	...	384	...	...
11 Area served by two or more projects..... acres served 1960...	...	2,454	3,274	...	...	...	2,724	...	2,700
PROJECTS, 1960, BY TYPE OF ORGANIZATION									
12 Drains owned by one landowner..... number of projects...	...	...	1	...	...	...	...	...	...
13 acres served ²...	...	...	824	...	...	...	...	...	...
14 Cooperative or mutual drains..... number of projects...	...	2	1	...	...	...	3	...	2
15 acres served ²...	...	2,454	2,450	...	...	...	3,004	...	2,700
16 Legally organized public drains..... number of projects...	1	1	1	1	1	1	1	1	1
17 acres served ² ...	2,130	96,882	156,792	16,640	385,800	253,952	189,440	125,512	46,810
PROJECTS, 1960, BY YEAR STARTED									
18 1950-1959..... number of projects...	...	2	1	...	...	...	1	...	1
19 acres served ²...	...	2,454	2,450	...	...	...	1,700	...	1,200
20 Prior to 1950..... number of projects...	1	1	2	1	1	1	3	1	2
21 acres served ² ...	2,130	96,882	157,616	16,640	385,800	253,952	190,744	125,512	48,310
DRAINAGE OPERATIONS, 1950-1959 ³									
22 Cost of drainage works and services..... projects reporting...	...	3	2	...	1	1	2	1	1
23 dollars...	...	32,861	104,634	...	38,000	155,178	35,999	53,414	2,925
24 New drainage works constructed, enlarged, or installed..... projects reporting...	...	3	...	...	...	...	...	...	...
25 dollars...	...	28,642	...	...	...	...	...	...	...
26 Open ditches..... projects reporting...	...	3	...	...	...	...	...	...	...
27 length, miles...	...	7.6	...	...	...	...	...	...	...
28 Tile or covered drains..... projects reporting...	...	1	...	...	...	...	...	...	...
29 length, miles...	...	1.7	...	...	...	...	...	...	...
30 Levees or dikes..... projects reporting...	...	...	...	...	...	...	...	...	...
31 length, miles...	...	...	...	...	...	...	...	...	...
32 Pumps..... projects reporting...	...	...	...	...	...	...	...	...	...
33 number of pumps...	...	...	...	...	...	...	...	...	...
34 Other (see text)..... projects reporting...	...	...	...	...	...	...	...	...	...
35 Cost of maintenance, operation, repair, and administration..... projects reporting...	...	1	2	...	1	1	2	1	1
36 dollars...	...	4,219	104,634	...	38,000	155,178	35,999	53,414	2,925

¹Land served by two or more projects counted only once.²Acres served by two projects are included for each project. See text.³Includes projects taken over by another project prior to 1960. See text.

DRAINAGE OF AGRICULTURAL LANDS

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data.]

Item and Census year	Fayette	Franklin	Fulton	Geauga	Greene	Hancock	Hardin	Henry	Holmes
AREA									
1 Approximate land area.....acres 1960...	259,840	343,680	260,480	260,480	266,240	340,480	298,880	266,240	270,720
2 Land in farms.....acres 1959...	251,643	198,660	245,550	115,563	218,783	323,038	262,170	250,069	222,446
3 Drainage projects..... number 1960...	1	1	1	1	5	1	2	1	1
4 1950...	1	1	1	1	1	1	1	1	1
5 Total area in drainage projects ¹ acres served 1960...	252,992	290,300	256,371	4,397	46,489	335,083	298,880	264,140	5,536
6 1950...	252,992	292,860	256,371	4,397	43,804	335,883	298,880	264,140	5,536
7 Area not used for agriculture or not drained..... acres served 1960...	1,600	27,872	...	...	...	...	1,760	...	...
8 Net area drained and used for agriculture..... acres served 1960...	251,392	262,428	256,371	4,397	46,489	335,083	297,120	264,140	5,536
9 Drainage established before 1950..... acres served 1960...	251,392	262,428	256,371	4,397	45,674	335,083	297,120	264,140	5,536
10 Area added, 1950-1959..... acres served 1960...	...	...	...	...	815	...	...	...	...
11 Area served by two or more projects..... acres served 1960...	...	...	...	...	6,680	...	1,100	...	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION									
12 Drains owned by one landowner..... number of projects...	...	...	...	...	...	...	...	...	...
13 acres served ² ..	...	...	...	...	...	...	...	...	...
14 Cooperative or mutual drains..... number of projects...	...	...	...	...	4	...	1	...	...
15 acres served ² ..	...	...	...	...	7,450	...	1,100	...	...
16 Legally organized public drains..... number of projects...	1	1	1	1	1	1	1	1	1
17 acres served ² ..	251,392	262,428	256,371	4,397	45,719	335,083	297,120	264,140	5,536
PROJECTS, 1960, BY YEAR STARTED									
18 1960-1959..... number of projects...	...	...	...	...	2	...	1	...	...
19 acres served ² ..	...	...	...	...	2,200	...	1,100	...	...
20 Prior to 1950..... number of projects...	1	1	1	1	3	1	1	1	1
21 acres served ² ..	251,392	262,428	256,371	4,397	50,969	335,083	297,120	264,140	5,536
DRAINAGE OPERATIONS, 1950-1959 ³									
22 Cost of drainage works and services.....projects reporting...	1	1	1	...	3	1	2	1	...
23 dollars...	61,950	62,914	358,762	...	16,650	349,499	250,456	256,716	...
24 New drainage works constructed, enlarged, or installed.....projects reporting...	...	...	...	...	3	...	2	...	...
25 dollars...	...	...	...	...	11,402	...	3,992	...	...
26 Open ditches.....projects reporting...	...	...	...	...	3	...	...	...	...
27 length, miles...	...	...	...	...	3.9	...	...	...	...
28 Tile or covered drains.....projects reporting...	...	...	...	...	1	...	1	...	...
29 length, miles...	...	...	...	...	0.1	...	0.7	...	...
30 Levees or dikes.....projects reporting...	...	...	...	...	...	...	...	...	...
31 length, miles...	...	...	...	...	...	...	...	...	...
32 Pumps.....projects reporting...	...	...	...	...	...	...	...	...	...
33 number of pumps...	...	...	...	...	...	...	...	...	...
34 Other (see text).....projects reporting...	...	...	...	...	...	...	2	...	...
35 Cost of maintenance, operation, repair, and administration.....projects reporting...	1	1	1	...	1	1	1	1	...
36 dollars...	61,950	62,914	358,762	...	5,248	349,499	246,464	256,716	...

¹Land served by two or more projects counted only once.²Acres served by two projects are included for each project. See text.³Includes projects taken over by another project prior to 1960. See text.

County Table 1. - DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data.]

Item and Census year	Huron	Knox	Licking	Logan	Lorain	Lucas	Madison	Mahoning	Marion
AREA									
1 Approximate land area..... acres 1960...	318,080	334,720	439,040	295,040	316,800	219,520	296,960	268,160	259,200
2 Land in farms..... acres 1959...	271,221	267,942	322,017	247,875	192,656	100,885	277,601	120,877	225,069
3 Drainage projects..... number 1960...	6	1	3	3	2	1	5	1	4
4 1950...	1	1	1	1	1	1	1	1	1
5 Total area in drainage projects ¹ acres served 1960...	99,509	13,286	79,283	246,871	190,165	178,843	270,216	1,720	248,472
6 1950...	98,584	13,286	79,283	246,871	190,165	178,843	261,216	1,720	246,392
7 Area not used for agriculture or not drained..... acres served 1960...	...	...	...	...	9,600	36,440	...	...	1,440
8 Net area drained and used for agriculture..... acres served 1960...	99,509	13,286	79,283	246,871	180,565	142,403	270,216	1,720	247,032
9 Drainage established before 1950..... acres served 1960...	98,984	13,286	79,283	246,871	180,565	142,403	270,216	1,720	244,952
10 Area added, 1950-1959..... acres served 1960...	525	...	...	...	...	...	...	...	2,080
11 Area served by two or more projects..... acres served 1960...	2,837	...	1,850	4,345	850	...	3,150	...	1,882
PROJECTS, 1960, BY TYPE OF ORGANIZATION									
12 Drains owned by one landowner..... number of projects...	...	...	...	...	...	...	...	...	...
13 acres served ²...	...	...	...	...	...	...	...	...	...
14 Cooperative or mutual drains..... number of projects...	5	...	2	2	1	...	4	...	3
15 acres served ² ...	3,362	...	1,850	4,345	850	...	3,150	...	1,882
16 Legally organized public drains..... number of projects...	1	1	1	1	1	1	1	1	1
17 acres served ² ...	98,984	13,286	79,283	246,871	180,565	142,403	270,216	1,720	247,032
PROJECTS, 1960, BY YEAR STARTED									
18 1950-1959..... number of projects...	5	...	2	2	1	...	4	...	...
19 acres served ² ...	3,362	...	1,850	4,345	850	...	3,150	...	...
20 Prior to 1950..... number of projects...	1	1	1	1	1	1	1	1	4
21 acres served ² ...	98,984	13,286	79,283	246,871	180,565	142,403	270,216	1,720	248,914
DRAINAGE OPERATIONS, 1950-1959 ³									
22 Cost of drainage works and services..... projects reporting...	6	...	3	3	2	1	5	...	1
23 dollars...	98,024	...	22,143	172,988	110,379	927,528	121,201	...	141,369
24 New drainage works constructed, enlarged, or installed..... projects reporting...	2	...	...	...	(⁴)	...	4	...	...
25 dollars...	9,900	...	...	...	(⁴)	...	27,079	...	...
26 Open ditches..... projects reporting...	2	...	...	...	(⁴)	...	3	...	...
27 length, miles...	0.9	...	...	...	(⁴)	...	1.8	...	...
28 Tile or covered drains..... projects reporting...	1	...	...	...	...	...	2	...	...
29 length, miles...	9.1	...	...	...	...	...	2.3	...	...
30 Levees or dikes..... projects reporting...	...	...	...	...	...	...	...	...	...
31 length, miles...	...	...	...	...	...	...	...	...	...
32 Pumps..... projects reporting...	...	...	...	...	...	...	...	...	...
33 number of pumps...	...	...	...	...	...	...	...	...	...
34 Other (see text)..... projects reporting...	...	...	...	...	...	...	...	...	...
35 Cost of maintenance, operation, repair, and administration..... projects reporting...	4	...	3	3	(⁴)	1	2	...	1
36 dollars...	88,124	...	22,143	172,988	(⁴)	927,528	94,122	...	141,369

¹Land served by two or more projects counted only once.²Acres served by two projects are included for each project. See text.³Includes projects taken over by another project prior to 1960. See text.⁴Included in State total only.

DRAINAGE OF AGRICULTURAL LANDS

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	Medina	Mercer	Miami	Montgomery	Morrow	Muskingum	Ottawa	Paulding	Perry
AREA									
1 Approximate land area.....acres 1960...	271,360	290,560	260,480	297,600	258,560	424,320	168,320	266,240	261,760
2 Land in farms.....acres 1959...	174,970	280,793	220,429	174,466	223,076	276,555	120,097	244,117	138,392
3 Drainage projects..... number 1960...	1	4	2	6	1	1	1	1	1
4..... 1950...	1	1	1	1	1	1	1	1	1
5 Total area in drainage projects ¹ acres served 1960...	16,825	287,060	189,176	61,260	82,179	1,500	138,583	262,690	2,743
6..... 1950...	17,355	287,060	185,344	60,160	80,859	1,500	139,993	262,690	2,743
7 Area not used for agriculture or not drained..... acres served 1960...	...	...	...	...	...	...	...	...	...
8 Net area drained and used for agriculture..... acres served 1960...	16,825	287,060	189,176	61,260	82,179	1,500	138,583	262,690	2,743
9 Drainage established before 1950..... acres served 1960...	16,825	287,060	185,344	60,160	80,859	1,500	138,583	262,690	2,743
10 Area added, 1950-1959..... acres served 1960...	...	...	3,832	1,100	1,320	...	...	...	...
11 Area served by two or more projects..... acres served 1960...	...	1,979	...	3,030	...	...	...	...	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION									
12 Drains owned by one landowner..... number of projects...	...	...	...	1	...	...	...	...	...
13..... acres served ²..	...	...	...	1,100	...	...	...	...	...
14 Cooperative or mutual drains..... number of projects...	...	3	1	4	...	...	...	...	...
15..... acres served ²..	...	1,979	600	3,030	...	...	...	...	...
16 Legally organized public drains..... number of projects...	1	1	1	1	1	1	1	1	1
17..... acres served ² ..	16,825	287,060	188,576	60,160	82,179	1,500	138,583	262,690	2,743
PROJECTS, 1960, BY YEAR STARTED									
18 1950-1959..... number of projects...	...	1	1	5	...	...	...	...	...
19..... acres served ²..	...	578	600	4,130	...	...	...	...	...
20 Prior to 1950..... number of projects...	1	3	1	1	1	1	1	1	1
21..... acres served ² ..	16,825	288,461	188,576	60,160	82,179	1,500	138,583	262,690	2,743
DRAINAGE OPERATIONS, 1950-1959 ³									
22 Cost of drainage works and services.....projects reporting...	...	2	2	6	1	...	1	1	...
23..... dollars...	...	530,031	98,964	36,670	21,505	...	106,509	233,370	...
24 New drainage works constructed, enlarged, or installed.....projects reporting...	...	...	(⁴)	5	...	...	...	...	...
25..... dollars...	...	...	(⁴)	15,170	...	...	...	...	...
26 Open ditches.....projects reporting...	...	...	(⁴)	5	...	...	...	...	...
27..... length, miles...	...	...	(⁴)	4.7	...	...	...	...	...
28 Tile or covered drains.....projects reporting...	...	...	...	...	...	...	...	...	...
29..... length, miles...	...	...	...	...	...	...	...	...	...
30 Levees or dikes.....projects reporting...	...	...	...	...	...	...	...	...	...
31..... length, miles...	...	...	...	...	...	...	...	...	...
32 Pumps.....projects reporting...	...	...	...	...	...	...	...	...	...
33..... number of pumps...	...	...	...	...	...	...	...	...	...
34 Other (see text).....projects reporting...	...	...	...	1	...	...	...	...	...
35 Cost of maintenance, operation, repair, and administration.....projects reporting...	...	2	(⁴)	1	1	...	1	1	...
36..... dollars...	...	530,031	(⁴)	21,500	21,505	...	106,509	233,370	...

¹Land served by two or more projects counted only once.²Acres served by two projects are included for each project. See text.³Includes projects taken over by another project prior to 1960. See text.⁴Included in State total only.

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	Pickaway	Portage	Preble	Putnam	Richland	Ross	Sandusky	Seneca	Shelby
AREA									
1 Approximate land area.....acres 1960...	324,480	322,560	273,280	311,040	318,080	439,680	262,400	352,640	261,760
2 Land in farms.....acres 1959...	306,774	162,106	239,417	294,286	215,858	324,268	233,981	324,987	233,617
8 Drainage projects..... number 1960...	5	1	3	1	1	5	1	1	7
4 1960...	1	1	1	1	1	1	1	1	1
5 Total area in drainage projects ¹ acres served 1960...	50,146	21,646	216,384	311,040	57,614	3,033	243,776	207,104	207,872
6 1960...	44,646	21,146	216,384	386,753	45,820	583	243,776	207,104	207,872
7 Area not used for agriculture or not drained..... acres served 1960...	...	600	720	...	500	...	720	...	...
8 Net area drained and used for agriculture..... acres served 1960...	50,146	21,046	215,664	311,040	57,114	3,033	243,056	207,104	207,872
9 Drainage established before 1960..... acres served 1960...	44,646	21,046	215,664	311,040	45,320	583	243,056	207,104	207,872
10 Area added, 1960-1959..... acres served 1960...	5,500	...	...	...	11,794	2,450	...	...	...
11 Area served by two or more projects..... acres served 1960...	...	...	2,732	...	...	...	...	...	8,499
PROJECTS, 1960, BY TYPE OF ORGANIZATION									
12 Drains owned by one landowner..... number of projects...	...	...	...	...	...	...	...	...	...
18 acres served ² ..	...	...	...	...	...	...	...	...	...
14 Cooperative or mutual drains..... number of projects...	4	...	2	...	...	4	...	...	6
15 acres served ² ..	7,000	...	2,732	...	...	2,450	...	...	8,499
16 Legally organized public drains..... number of projects...	1	1	1	1	1	1	1	1	1
17 acres served ² ..	43,146	21,046	215,664	311,040	57,114	583	243,056	207,104	207,872
PROJECTS, 1960, BY YEAR STARTED									
18 1960-1959..... number of projects...	4	...	2	...	...	4	...	...	6
19 acres served ² ..	7,000	...	2,732	...	...	2,450	...	...	8,499
20 Prior to 1960..... number of projects...	1	1	1	1	1	1	1	1	1
21 acres served ² ..	43,146	21,046	215,664	311,040	57,114	583	243,056	207,104	207,872
DRAINAGE OPERATIONS, 1950-1959 ³									
22 Cost of drainage works and services.....projects reporting...	4	1	3	1	1	4	1	1	7
23 dollars...	12,940	32,000	14,403	297,881	52,787	8,010	326,179	374,657	246,058
24 New drainage works constructed, enlarged, or installed.....projects reporting...	4	...	2	...	...	4	...	...	2
25 dollars...	12,940	...	5,291	...	...	8,010	...	...	27,798
26 Open ditches.....projects reporting...	3	...	2	...	...	4	...	...	2
27 length, miles...	1.6	...	2.3	...	...	5.2	...	...	0.5
28 Tile or covered drains.....projects reporting...	2	...	...	...	...	...	...	...	1
29 length, miles...	0.7	...	...	...	...	...	...	...	2.8
30 Levees or dikes.....projects reporting...	...	...	...	...	...	...	...	...	...
31 length, miles...	...	...	...	...	...	...	...	...	...
32 Pumps.....projects reporting...	...	...	...	...	...	...	...	...	...
33 number of pumps...	...	...	...	...	...	...	...	...	...
34 Other (see text).....projects reporting...	...	...	...	...	...	1	...	...	...
35 Cost of maintenance, operation, repair, and administration.....projects reporting...	...	1	3	1	1	...	1	1	7
36 dollars...	...	32,000	9,112	297,881	52,787	...	326,179	374,657	218,260

¹Land served by two or more projects counted only once.²Acres served by two projects are included for each project. See text.³Includes projects taken over by another project prior to 1960. See text.

DRAINAGE OF AGRICULTURAL LANDS

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	Stark	Summit	Trumbull	Union	Van Wert	Warren	Wayne	Williams	Wood	Wyandot
AREA										
1 Approximate land area.....acres 1960...	366,720	264,320	396,800	277,760	261,760	261,120	352,640	269,440	395,520	259,840
2 Land in farms.....acres 1959...	204,003	50,149	182,776	252,079	250,238	188,023	298,938	242,814	339,989	239,651
3 Drainage projects.....number 1960...	1	1	1	3	1	4	1	1	1	1
4 1950...	1	1	1	1	1	1	1	1	1	1
5 Total area in drainage projects ¹.....acres served 1960...	14,224	21,990	18,918	277,100	257,610	11,896	58,016	245,696	385,739	143,327
6 1950...	14,384	21,310	18,918	277,100	257,610	10,196	58,016	245,696	385,739	139,307
7 Area not used for agriculture or not drained.....acres served 1960...	...	4,640	...	...	...	...	...	...	2,560	...
8 Net area drained and used for agriculture.....acres served 1960...	14,224	17,350	18,918	277,100	257,610	11,896	58,016	245,696	383,179	143,327
9 Drainage established before 1950.....acres served 1960...	14,224	16,670	18,918	277,100	257,610	10,696	58,016	245,696	383,179	139,307
10 Area added, 1950-1959.....acres served 1960...	...	680	...	...	...	1,200	...	...	...	4,020
11 Area served by two or more projects.....acres served 1960...	...	...	...	2,494	...	...	...	...	...	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION										
12 Drains owned by one landowner.....number of projects...	...	...	...	...	...	1	...	...	...	...
13 acres served ²..	...	...	...	...	...	500	...	...	...	...
14 Cooperative or mutual drains.....number of projects...	...	...	...	2	...	2	...	...	...	...
15 acres served ²..	...	...	...	2,494	...	1,200	...	...	...	...
16 Legally organized public drains.....number of projects...	1	1	1	1	1	1	1	1	1	1
17 acres served ² ..	14,224	17,350	18,918	277,100	257,610	10,196	58,016	245,696	383,179	143,327
PROJECTS, 1960, BY YEAR STARTED										
18 1950-1959.....number of projects...	...	...	...	2	...	2	...	...	...	...
19 acres served ²..	...	...	...	2,494	...	1,200	...	...	...	...
20 Prior to 1950.....number of projects...	1	1	1	1	1	2	1	1	1	1
21 acres served ² ..	14,224	17,350	18,918	277,100	257,610	10,696	58,016	245,696	383,179	143,327
DRAINAGE OPERATIONS, 1950-1959 ³										
22 Cost of drainage works and services.....projects reporting...	...	1	...	3	1	3	1	1	1	1
23 dollars...	...	10,046	...	123,609	376,774	97,500	41,056	168,485	518,495	110,752
24 New drainage works constructed, enlarged, or installed.....projects reporting...	...	...	...	2	...	3	...	...	...	...
25 dollars...	...	...	...	3,079	...	56,500	...	...	...	...
26 Open ditches.....projects reporting...	...	...	...	2	...	3	...	...	...	...
27 length, miles...	...	...	...	1.7	...	3.7	...	...	...	...
28 Tile or covered drains.....projects reporting...	...	...	...	1	...	3	...	...	...	...
29 length, miles...	...	...	...	0.1	...	43.4	...	...	...	...
30 Levees or dikes.....projects reporting...	...	...	...	...	...	...	...	...	...	...
31 length, miles...	...	...	...	...	...	...	...	...	...	...
32 Pumps.....projects reporting...	...	...	...	...	...	...	...	...	...	...
33 number of pumps...	...	...	...	...	...	...	...	...	...	...
34 Other (see text).....projects reporting...	...	...	...	1	...	...	...	...	...	...
35 Cost of maintenance, operation, repair, and administration.....projects reporting...	...	1	...	1	1	2	1	1	1	1
36 dollars...	...	10,046	...	120,530	376,774	41,000	41,056	168,485	518,495	110,752

¹Land served by two or more projects counted only once.
²Acres served by two projects are included for each project. See text.
³Includes projects taken over by another project prior to 1960. See text.

State Table 1.—DRAINAGE PROJECTS—NUMBER, AREA, COST, AND WORKS, 1920 TO 1960

[See text for comparability of data.]

Item	1960 Census	1950 Census	1940 Census	1930 Census	1920 Census
AREA					
Approximate land area..... acres...	44,087,680	44,179,840	44,341,120	44,424,960	44,424,960
Land in farms..... acres...	35,800,688	36,006,603	34,803,317	33,790,817	31,951,934
Drainage projects..... number...	31	18	¹ 29	NA	NA
Total area in drainage projects..... acres served...	133,796	300,884	197,646	170,158	12,150
Area not used for agriculture or not drained..... acres served...	...	NA	NA	NA	NA
Net area drained and used for agriculture..... acres served...	133,796	NA	² 182,980	² 163,936	NA
Drainage established 10 years or more before Census date..... acres served...	115,212	NA	NA	NA	NA
Drainage established within 10 years of Census date..... acres served...	18,584	NA	NA	NA	NA
Area served by two or more projects..... acres served...	...	NA	...	960	...
PROJECTS BY TYPE OF ORGANIZATION					
Drains owned by one landowner..... number of projects...	11	⁽³⁾	...	NA	NA
acres served ³ ..	9,942	⁽³⁾	...	4,110	NA
Cooperative or mutual drains..... number of projects...	10	⁽³⁾
acres served ³ ..	9,656	⁽³⁾
Legally organized public drains..... number of projects...	10	³ 14	NA	NA	NA
acres served ³ ..	114,198	³ 298,853	197,646	166,048	NA
PROJECTS BY YEAR STARTED					
Started 10 years or more before Census date..... number of projects...	11	NA	NA	NA	NA
acres served...	114,698	NA	172,326	99,308	NA
Started within 10 years of Census date..... number of projects...	20	NA	NA	NA	NA
acres served...	19,098	NA	25,320	70,850	NA
OPERATIONS, 10-YEAR PERIOD PRECEDING CENSUS DATE					
Cost of drainage works and services..... projects reporting...	24	10	NA	NA	NA
dollars...	249,053	299,114	NA	NA	NA
New drainage works constructed, enlarged, or installed..... projects reporting...	22	⁴ 1	NA	NA	NA
cost, dollars...	241,561	⁴ 62,027	NA	NA	NA
Open ditches..... projects reporting...	22	1	NA	NA	NA
length, miles...	172.5	16	NA	NA	NA
Tile or covered drains..... projects reporting...	...	...	NA	NA	NA
length, miles...	...	...	NA	NA	NA
Levees or dikes..... projects reporting...	3	...	NA	NA	NA
length, miles...	2.2	...	NA	NA	NA
Pumps..... projects reporting...	...	NA	NA	NA	NA
number of pumps...	...	NA	NA	NA	NA
Other (see text)..... projects reporting...	...	NA	NA	NA	NA
Cost of maintenance, operation, repair, and administration..... projects reporting...	7	10	NA	NA	NA
dollars...	7,492	237,087	NA	NA	NA
STATUS ON CENSUS DATE					
Capital investment.....dollars...	NA	NA	1,971,350	2,283,598	76,415
Physical works:					
Open ditches..... length, miles...	NA	NA	334.3	303.0	18.6
Tile drains..... length, miles...	NA	NA	...	...	...
Levees and dikes..... length, miles...	NA	NA	...	...	5.0
Pumping units..... number of units...	NA	NA	...	...	...

NA Not available.

¹In 1940, each county drain was counted as a separate project. See text.

²Not fully comparable. See text.

³All projects for 1950 included with county drains, except 4 counties and 2,031 acres from Census of Irrigation. See text.

⁴Cost of new works for lands not previously drained.

DRAINAGE OF AGRICULTURAL LANDS

State Table 2.—DRAINAGE

	Size of project (Based on area of agricultural land in project)	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	31	133,796	...	12	115,212	19	18,584
2	500 to 999 acres.....	15	9,296	...	2	1,014	13	8,282
3	1,000 to 1,999 acres.....	6	9,592	...	1	1,790	5	7,802
4	2,000 to 4,999 acres.....	3	10,924	...	2	8,424	1	2,500
5	5,000 to 9,999 acres.....	2	12,176	...	2	12,176	...	...
6	10,000 to 19,999 acres.....	3	42,656	...	3	42,656	...	...
7	20,000 to 49,999 acres.....	2	49,152	...	2	49,152	..	...
8	50,000 to 99,999 acres.....	...	...	...	...	...	...	...
9	100,000 or more acres.....	...	...	...	...	...	...	...

State Table 3.—DRAINAGE PROJECTS, 1960,

	Type of organization	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	31	133,796	...	12	115,212	19	18,584
2	Drains owned by one landowner.....	11	9,942	...	2	1,014	9	8,928
3	Cooperative or mutual drains.....	10	9,656	...	...	...	10	9,656
4	Legally organized public drains.....	10	114,198	...	10	114,198	...	...

State Table 4.—DRAINAGE PROJECTS, 1960,

	Year of organization	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	31	133,796	...	12	115,212	19	18,584
2	1960-1959.....	20	19,098	...	1	514	19	18,584
3	Prior to 1950.....	11	114,698	...	11	114,698	...	...

DRAINAGE OF AGRICULTURAL LANDS

County Table 1. --DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	The State	Bryan	Canadian	Choctaw	Cleveland	Garfield	Garvin	Kay	Le Flore	McClain
AREA										
1 Approximate land area.....acres 1960...	44,087,680	570,240	566,400	494,080	350,080	1,674,560	520,320	604,160	1,004,160	357,760
2 Land in farms.....acres 1959...	35,800,688	443,290	547,719	330,144	257,905	1,687,747	415,649	556,930	440,356	310,410
3 Drainage projects.....number 1960...	31	1	1	4	2	1	1	3	3	1
4	1950...	18	...	1	...	1	1	1	...	1
5 Total area in drainage projects ².....acres served 1960...	133,796	1,792	5,376	2,478	12,716	700	17,536	15,188	4,850	26,624
6	1950...	300,884	...	5,376	...	12,032	1	17,536	17,408	26,624
7 Area not used for agriculture or not drained.....acres served 1960...	...	...	...	...	...	...	...	...	...	...
8 Net area drained and used for agriculture.....acres served 1960...	133,796	1,792	5,376	2,478	12,716	700	17,536	15,188	4,850	26,624
9 Drainage established before 1950.....acres served 1960...	115,212	...	5,376	...	12,032	...	17,536	13,088	...	26,624
10 Area added, 1950-1959.....acres served 1960...	18,584	1,792	...	2,478	684	700	...	2,100	4,850	...
11 Area served by two or more projects.....acres served 1960...	...	...	...	...	...	...	...	...	...	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION										
12 Drains owned by one landowner.....number of projects...	11	...	...	4	...	1	...	...	3	...
13	acres served ³ ...	9,942	...	2,478	...	700	...	...	4,850	...
14 Cooperative or mutual drains.....number of projects...	10	1	...	...	1	...	...	2	...	...
15	acres served ³ ...	9,656	1,792	...	...	684	...	2,100	...	...
16 Legally organized public drains.....number of projects...	10	...	1	...	1	...	1	1	...	1
17	acres served ³ ...	114,198	...	5,376	...	12,032	...	17,536	13,088	26,624
PROJECTS, 1960, BY YEAR STARTED										
18 1950-1959.....number of projects...	20	1	...	4	1	1	...	2	3	...
19	acres served ³ ...	19,098	1,792	...	2,478	684	700	2,100	4,850	...
20 Prior to 1950.....number of projects...	11	...	1	...	1	...	1	1	...	1
21	acres served ³ ...	114,698	...	5,376	...	12,032	...	17,536	13,088	26,624
DRAINAGE OPERATIONS, 1950-1959 ⁴										
22 Cost of drainage works and services.....projects reporting...	24	(⁵)	1	4	(⁵)	(⁵)	...	2	3	...
23	dollars...	249,053	(⁵)	140	29,822	(⁵)	(⁵)	6,174	118,916	...
24 New drainage works constructed, enlarged, or installed.....projects reporting...	22	(⁵)	...	4	(⁵)	(⁵)	...	2	3	...
25	dollars...	241,561	(⁵)	...	28,122	(⁵)	(⁵)	6,174	118,916	...
26 Open ditches.....projects reporting...	22	(⁵)	...	4	(⁵)	(⁵)	...	2	3	...
27	length, miles...	172.5	(⁵)	...	28.5	(⁵)	(⁵)	4.4	75.3	...
28 Tile or covered drains.....projects reporting...	...	...	...	...	...	...	...	...	...	...
29	length, miles...	...	...	...	...	...	...	...	...	...
30 Levees or dikes.....projects reporting...	3	...	...	...	...	...	...	1	1	...
31	length, miles...	2.2	...	...	...	...	...	0.1	1.8	...
32 Pumps.....projects reporting...	...	...	...	...	...	...	...	...	...	...
33	number of pumps...	...	...	...	...	...	...	...	...	...
34 Other (see text).....projects reporting...	...	...	...	...	...	...	...	...	...	...
35 Cost of maintenance, operation, repair, and administration.....projects reporting...	7	(⁵)	1	2	(⁵)	...	...	...	...	...
36	dollars...	7,492	(⁵)	140	1,700	(⁵)	...	...	...	...

¹The excess of farm acreage over approximate land area is due to the fact that the entire acreage of a farm is tabulated as in the county in which the headquarters is located, even though a part of the farm may be situated in an adjoining county.

²Land served by two or more projects counted only once.

³Acres served by two projects are included for each project. See text.

⁴Includes projects taken over by another project prior to 1960. See text.

⁵Included in State total only.

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	McIntosh	Muskogee	Oklahoma	Pottawatomie	Rogers	Sequoyah	Tillman	Tulsa	Wagoner	All other counties ¹
AREA										
1 Approximate land area.....acres 1960...	457,600	524,800	451,200	510,080	456,320	446,080	² 551,040	366,080	360,320	3,626,880
2 Land in farms.....acres 1959...	320,448	375,890	276,230	378,022	352,376	268,376	² 552,302	357,332	285,612	3,309,813
3 Drainage projects..... number 1960...	1	1	1	1	1	5	1	1	3	...
4 1950...	...	1	1	1	...	...	1	1	1	6
5 Total area in drainage projects ³ acres served 1960...	1,790	583	22,528	3,560	800	4,497	4,864	100	7,814	...
6 1950...	...	15,872	22,528	53,474	...	...	4,864	10,752	55,552	58,865
7 Area not used for agriculture or not drained..... acres served 1960...	...	...	...	...	...	...	...	...	...	...
8 Net area drained and used for agriculture..... acres served 1960...	1,790	583	22,528	3,560	800	4,497	4,864	100	7,814	...
9 Drainage established before 1950..... acres served 1960...	1,790	...	22,528	3,560	...	...	4,864	...	7,814	...
10 Area added, 1950-1959..... acres served 1960...	...	583	...	...	800	4,497	...	100	...	...
11 Area served by two or more projects..... acres served 1960...	...	...	...	...	...	...	...	...	...	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION										
12 Drains owned by one landowner..... number of projects...	...	...	...	...	1	...	...	1	2	...
13 acres served ⁴...	...	...	...	...	800	...	...	100	1,014	...
14 Cooperative or mutual drains..... number of projects...	...	1	...	...	...	5	...	...	...	...
15 acres served ⁴...	...	583	...	...	...	4,497	...	...	...	...
16 Legally organized public drains..... number of projects...	1	...	1	1	...	...	1	...	1	...
17 acres served ⁴ ...	1,790	...	22,528	3,560	...	...	4,864	...	6,800	...
PROJECTS, 1960, BY YEAR STARTED										
18 1950-1959..... number of projects...	...	1	...	...	1	5	...	1	1	...
19 acres served ⁴...	...	583	...	...	800	4,497	...	100	514	...
20 Prior to 1950..... number of projects...	1	...	1	1	...	...	1	...	2	...
21 acres served ⁴ ...	1,790	...	22,528	3,560	...	...	4,864	...	7,300	...
DRAINAGE OPERATIONS, 1950-1959 ⁵										
22 Cost of drainage works and services..... projects reporting...	...	(⁶)	...	...	(⁶)	5	1	(⁶)	3	...
23 dollars...	...	(⁶)	...	...	(⁶)	16,203	1,100	(⁶)	20,028	...
24 New drainage works constructed, enlarged, or installed..... projects reporting...	...	(⁶)	...	...	(⁶)	5	...	(⁶)	3	...
25 dollars...	...	(⁶)	...	...	(⁶)	16,203	...	(⁶)	17,876	...
26 Open ditches..... projects reporting...	...	(⁶)	...	...	(⁶)	5	...	(⁶)	3	...
27 length, miles...	...	(⁶)	...	...	(⁶)	10.5	...	(⁶)	11.9	...
28 Tile or covered drains..... projects reporting...	...	...	...	...	...	...	...	...	...	...
29 length, miles...	...	...	...	...	...	...	...	...	...	...
30 Levees or dikes..... projects reporting...	...	...	...	...	(⁶)	...	...	...	...	...
31 length, miles...	...	...	...	...	(⁶)	...	...	...	...	...
32 Pumps..... projects reporting...	...	...	...	...	...	...	...	...	...	...
33 number of pumps...	...	...	...	...	...	...	...	...	...	...
34 Other (see text)..... projects reporting...	...	...	...	...	...	...	...	...	...	...
35 Cost of maintenance, operation, repair, and administration..... projects reporting...	...	...	...	...	...	...	1	...	1	...
36 dollars...	...	...	...	...	...	...	1,100	...	2,152	...

¹Includes Alfalfa, Caddo, Jackson, Kingfisher, Lincoln, and Stephens counties.
²The excess of farm acreage over approximate land area is due to the fact that the entire acreage of a farm is tabulated as in the county in which the headquarters is located, even though a part of the farm may be situated in an adjoining county.
³Land served by two or more projects counted only once.
⁴Acres served by two or more projects are included for each project. See text.
⁵Includes projects taken over by another project prior to 1960. See text.
⁶Included in State total only.

State Table 1.—DRAINAGE PROJECTS—NUMBER, AREA, COST, AND WORKS, 1920 TO 1960

[See text for comparability of data.]

Item	1960 Census	1950 Census	1940 Census	1930 Census	1920 Census
AREA					
Approximate land area..... acres...	61,598,720	61,641,600	61,664,000	61,188,480	61,188,480
Land in farms..... acres...	21,236,298	20,327,683	17,988,307	16,548,678	13,542,318
Drainage projects.....number...	110	1,087	63	NA	NA
Total area in drainage projects.....acres served...	274,754	418,858	348,825	211,182	4,000
Area not used for agriculture or not drained.....acres served...	4,300	NA	NA	NA	NA
Net area drained and used for agriculture.....acres served...	270,454	NA	¹ 302,870	¹ 146,576	NA
Drainage established 10 years or more before Census date.....acres served...	190,869	NA	NA	NA	NA
Drainage established within 10 years of Census date.....acres served...	79,585	NA	NA	NA	NA
Area served by two or more projects.....acres served...	41,927	...	5,090	...	...
PROJECTS BY TYPE OF ORGANIZATION					
Drains owned by one landowner.....number of projects...	6	22	NA	NA	NA
acres served...	25,690	² 700	(²)	² 4,500	NA
Cooperative or mutual drains.....number of projects...	56	29	...	...	...
acres served...	87,807	² 16,507	...	...	...
Legally organized public drains.....number of projects...	48	244	NA	NA	NA
acres served...	200,724	² 161,286	² 139,580	² 121,778	NA
PROJECTS BY YEAR STARTED					
Started 10 years or more before Census date.....number of projects...	59	244	NA	NA	NA
acres served...	217,629	² 158,227	272,282	123,501	NA
Started within 10 years of Census date.....number of projects...	51	² 11	NA	NA	NA
acres served...	96,592	² 20,266	76,543	87,681	NA
OPERATIONS, 10-YEAR PERIOD PRECEDING CENSUS DATE					
Cost of drainage works and services.....projects reporting...	98	² 50	NA	NA	NA
dollars...	5,002,268	2,175,816	NA	NA	NA
New drainage works constructed, enlarged, or installed.....projects reporting...	75	³ 17	NA	NA	NA
cost, dollars...	2,308,055	³ 476,561	NA	NA	NA
Open ditches.....projects reporting...	66	17	NA	NA	NA
length, miles...	260.3	90	NA	NA	NA
Tile or covered drains.....projects reporting...	6	2	NA	NA	NA
length, miles...	20.4	2	NA	NA	NA
Levees or dikes.....projects reporting...	9	2	NA	NA	NA
length, miles...	43.7	4	NA	NA	NA
Pumps.....projects reporting...	9	NA	NA	NA	NA
number of pumps...	16	NA	NA	NA	NA
Other (see text).....projects reporting...	7	NA	NA	NA	NA
Cost of maintenance, operation, repair, and administration.....projects reporting...	44	NA	NA	NA	NA
dollars...	2,694,213	1,699,255	NA	NA	NA
STATUS ON CENSUS DATE					
Capital investment.....dollars...	NA	NA	5,482,012	4,165,549	200,000
Physical works:					
Open ditches.....length, miles...	NA	NA	780.1	495.1	...
Tile drains.....length, miles...	NA	NA	150.6	42.5	13.0
Levees and dikes.....length, miles...	NA	NA	143.2	121.4	...
Pumping units.....number of units...	NA	² 70	56	31	...

NA Not available.

¹Not fully comparable. See text.

²1950 figures exclude 1,032 projects and 240,365 acres in "irrigation enterprises"; 1940 figures exclude 209,245 acres in "irrigation enterprises"; 1930 figures exclude 71,112 acres in "irrigation enterprises" and 13,792 acres classed as "other."

³Cost of new works for lands not previously drained.

DRAINAGE OF AGRICULTURAL LANDS

State Table 2.—DRAINAGE

	Size of project (Based on area of agricultural land in project)	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	110	314,221	85,694	64	231,851	51	82,370
2	500 to 999 acres.....	46	32,402	3,644	20	14,049	26	18,353
3	1,000 to 1,999 acres.....	28	37,328	3,486	21	28,315	9	9,013
4	2,000 to 4,999 acres.....	21	65,573	7,137	10	36,042	12	29,531
5	5,000 to 9,999 acres.....	7	44,865	9,572	6	33,392	3	11,473
6	10,000 to 19,999 acres.....	6	78,213	12,975	5	64,213	1	14,000
7	20,000 to 49,999 acres.....	2	55,840	48,880	2	55,840	...	...
8	50,000 to 99,999 acres.....	...	...	...	...	...	...	...
9	100,000 or more acres.....	...	...	...	...	...	...	...

¹Includes projects taken over by another project prior to 1960. See text.

State Table 3.—DRAINAGE PROJECTS, 1960,

	Type of organization	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	110	314,221	85,694	64	231,851	51	82,370
2	Drains owned by one landowner.....	6	25,690	...	4	24,600	2	1,090
3	Cooperative or mutual drains.....	56	87,807	15,715	15	25,007	45	62,800
4	Legally organized public drains.....	48	200,724	69,979	45	182,244	4	18,480

State Table 4.—DRAINAGE PROJECTS, 1960,

	Year of organization	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	110	314,221	85,694	64	231,851	51	82,370
2	1950-1959.....	51	96,592	20,912	5	15,982	48	80,610
3	Prior to 1950.....	59	217,629	64,782	59	215,869	3	1,760

¹Includes projects taken over by another project prior to 1960. See text.

PROJECTS, 1960, BY SIZE

Cost of drainage works and services, 1950-1959				New works constructed, enlarged, or installed, 1950-1959									
Total		For new works		Open ditches		Tile or covered drains		Levees and dikes		Pumps		Other, projects reporting	
Projects reporting	Dollars	Projects reporting	Dollars	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Number		
98	5,002,268	75	2,308,055	66	260.3	6	20.4	9	43.7	9	16	7	1
38	337,786	30	262,740	27	49.6	4	15.4	2	5.5	1	1	3	2
24	763,352	15	337,866	11	39.1	...	...	3	2.2	1	2	1	3
122	763,303	19	486,831	18	75.6	...	...	2	17.0	3	5	1	4
7	2,037,129	6	1,046,210	6	39.0	2	5.0	1	1.0	2	5	1	5
5	618,198	4	54,408	3	37.0	...	...	1	18.0	2	3	1	6
2	462,500	1	120,000	1	20.0	...	...	...	...	...	...	...	7
...	...	...	...	...	...	...	...	...	...	...	...	...	8
...	...	...	...	...	...	...	...	...	...	...	...	...	9

BY TYPE OF ORGANIZATION

Cost of drainage works and services, 1950-1959				New works constructed, enlarged, or installed, 1950-1959									
Total		For new works		Open ditches		Tile or covered drains		Levees and dikes		Pumps		Other, projects reporting	
Projects reporting	Dollars	Projects reporting	Dollars	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Number		
98	5,002,268	75	2,308,055	66	260.3	6	20.4	9	43.7	9	16	7	1
6	92,755	5	16,255	4	11.5	1	10.3	1	0.7	1	1	...	2
52	637,974	51	589,124	49	143.4	3	5.1	2	2.5	1	1	2	3
40	4,271,539	19	1,702,676	13	105.4	2	5.0	6	40.5	7	14	5	4

BY YEAR OF ORGANIZATION

Cost of drainage works and services, 1950-1959				New works constructed, enlarged, or installed, 1950-1959									
Total		For new works		Open ditches		Tile or covered drains		Levees and dikes		Pumps		Other, projects reporting	
Projects reporting	Dollars	Projects reporting	Dollars	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Number		
98	5,002,268	75	2,308,055	66	260.3	6	20.4	9	43.7	9	16	7	1
152	386,435	52	344,709	50	158.2	4	15.4	...	...	...	...	2	2
46	4,615,833	23	1,963,346	16	102.1	2	5.0	9	43.7	9	16	5	3

DRAINAGE OF AGRICULTURAL LANDS

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	The State	Benton	Clackamas	Clatsop	Columbia	Coos
AREA						
1 Approximate land area.....acres 1960...	61,598,720	427,520	1,207,680	524,800	413,440	1,031,040
2 Land in farms.....acres 1959...	21,236,298	205,340	319,048	55,082	104,090	254,460
3 Drainage projects..... number 1960...	110	7	1	6	11	6
4	1,087	11	91	9	75	73
5 Total area in drainage projects ¹ acres served 1960...	274,754	8,487	1,156	7,347	22,829	7,104
6	418,858	108	1,288	5,933	26,192	6,773
7 Area not used for agriculture or not drained..... acres served 1960...	4,300	...	...	...	...	...
8 Net area drained and used for agriculture..... acres served 1960...	270,454	8,487	1,156	7,347	22,829	7,104
9 Drainage established before 1950..... acres served 1960...	190,869	...	1,156	7,347	22,349	7,104
10 Area added, 1950-1959..... acres served 1960...	79,585	8,487	...	...	480	...
11 Area served by two or more projects..... acres served 1960...	41,927	778	...	...	...	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION						
12 Drains owned by one landowner..... number of projects...	6	...	...	...	...	...
13	25,690	...	...	...	...	...
14 Cooperative or mutual drains..... number of projects...	56	7	...	...	...	1
15	87,807	9,265	...	...	...	1,300
16 Legally organized public drains..... number of projects...	48	...	1	6	11	5
17	200,724	...	1,156	7,347	22,829	5,804
PROJECTS, 1960, BY YEAR STARTED						
18 1950-1959..... number of projects...	51	7	...	...	...	...
19	96,592	9,265	...	...	...	...
20 Prior to 1950..... number of projects...	59	...	1	6	11	6
21	217,629	...	1,156	7,347	22,829	7,104
DRAINAGE OPERATIONS, 1950-1959 ²						
22 Cost of drainage works and services..... projects reporting...	98	7	1	4	11	3
23	5,002,268	48,467	2,515	33,774	930,567	168,000
24 New drainage works constructed, enlarged, or installed..... projects reporting...	75	7	...	...	3	3
25	2,308,055	48,467	...	...	97,343	80,000
26 Open ditches..... projects reporting...	66	6	...	...	1	1
27	260.3	12.9	...	...	0.6	5.0
28 Tile or covered drains..... projects reporting...	6	1	...	...	...	...
29	20.4	2.9	...	...	...	...
30 Levees or dikes..... projects reporting...	9	...	...	...	...	1
31	43.7	...	...	...	...	2.0
32 Pumps..... projects reporting...	9	...	...	...	2	2
33	16	...	...	...	2	5
34 Other (see text)..... projects reporting...	7	...	...	...	2	1
35 Cost of maintenance, operation, repair, and administration..... projects reporting...	44	...	1	4	11	2
36	2,694,213	...	2,515	33,774	833,224	88,000

¹Land served by two or more projects counted only once.²Acres served by two projects are included for each project. See text.³Includes projects taken over by another project prior to 1960. See text.

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	Klamath	Lake	Lane	Lincoln	Linn	Malheur	Marion
AREA							
1 Approximate land area.....acres 1960...	3,822,080	5,292,160	2,918,400	630,400	1,464,320	6,316,800	750,720
2 Land in farms.....acres 1959...	1,172,577	1,057,780	365,310	77,707	490,060	1,523,214	351,397
3 Drainage projects..... number 1960...	11	2	17	1	17	1	10
4 1950...	71	8	36	3	33	53	226
5 Total area in drainage projects ¹ acres served 1960...	67,510	15,500	28,555	979	43,180	5,449	20,432
6 1950...	187,450	19,477	12,311	997	13,673	78,018	4,178
7 Area not used for agriculture or not drained..... acres served 1960...	600	...	1,000	...	...	...	...
8 Net area drained and used for agriculture..... acres served 1960...	66,910	15,500	27,555	979	43,180	5,449	20,432
9 Drainage established before 1960..... acres served 1960...	66,910	15,000	17,047	979	13,642	5,449	...
10 Area added, 1950-1959..... acres served 1960...	...	500	10,508	...	29,538	...	20,432
11 Area served by two or more projects..... acres served 1960...	24,440	...	10,572	...	6,137	...	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION							
12 Drains owned by one landowner..... number of projects...	3	1	1	...	...	...	1
13 acres served ² ...	9,600	15,000	550	...	...	...	540
14 Cooperative or mutual drains..... number of projects...	3	1	14	...	16	...	7
15 acres served ² ...	4,500	500	20,413	...	36,317	...	4,892
16 Legally organized public drains..... number of projects...	5	...	2	1	1	1	2
17 acres served ² ...	77,250	...	19,004	979	13,000	5,449	15,000
PROJECTS, 1960, BY YEAR STARTED							
18 1960-1959..... number of projects...	...	1	13	...	15	...	10
19 acres served ²...	...	500	22,360	...	35,675	...	20,432
20 Prior to 1960..... number of projects...	11	1	4	1	2	1	...
21 acres served ² ...	91,350	15,000	17,607	979	13,642	5,449	...
DRAINAGE OPERATIONS, 1950-1959 ³							
22 Cost of drainage works and services..... projects reporting...	10	(⁴)	15	...	15	1	10
23 dollars...	604,095	(⁴)	336,134	...	101,019	50,000	88,367
24 New drainage works constructed, enlarged, or installed..... projects reporting...	9	(⁴)	15	...	15	1	10
25 dollars...	199,595	(⁴)	314,656	...	101,019	30,000	48,367
26 Open ditches..... projects reporting...	8	(⁴)	15	...	15	1	9
27 length, miles...	56.5	(⁴)	40.4	...	52.5	5.0	37.9
28 Tile or covered drains..... projects reporting...	...	(⁴)	...	...	...	1	2
29 length, miles...	...	(⁴)	...	...	...	3.0	10.7
30 Levees or dikes..... projects reporting...	4	...	...	...	...	...	...
31 length, miles...	34.2	...	...	...	...	...	...
32 Pumps..... projects reporting...	2	...	...	...	...	1	...
33 number of pumps...	3	...	...	...	...	1	...
34 Other (see text)..... projects reporting...	...	(⁴)	...	...	...	...	1
35 Cost of maintenance, operation, repair, and administration..... projects reporting...	7	(⁴)	2	...	...	1	1
36 dollars...	404,500	(⁴)	21,478	...	...	20,000	40,000

¹Land served by two or more projects counted only once.
²Acres served by two projects are included for each project. See text.
³Includes projects taken over by another project prior to 1960. See text.
⁴Included in State total only.

DRAINAGE OF AGRICULTURAL LANDS

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data.]

Item and Census year	Miltnomah	Polk	Tillamook	Union	Washington	Yamhill	All other counties ¹
AREA							
1 Approximate land area.....acres 1960...	271,360	472,960	713,600	1,300,480	458,240	453,760	29,888,000
2 Land in farms.....acres 1959...	89,379	232,683	68,467	527,355	211,108	260,673	12,218,531
3 Drainage projects..... number 1960...	5	4	8	3	2	2	...
4 1950...	22	20	29	11	100	50	173
5 Total area in drainage projects ² acres served 1960...	22,851	6,560	6,555	5,560	3,650	1,050	...
6 1950...	23,638	450	5,927	4,253	6,210	1,491	20,491
7 Area not used for agriculture or not drained..... acres served 1960...	2,700	...	...	...	...	...	...
8 Net area drained and used for agriculture..... acres served 1960...	20,151	6,560	6,555	5,560	3,650	1,050	...
9 Drainage established before 1950..... acres served 1960...	20,151	...	6,555	3,280	3,650	250	...
10 Area added, 1950-1959..... acres served 1960...	...	6,560	...	2,280	...	800	...
11 Area served by two or more projects..... acres served 1960...	...	...	...	...	...	...	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION							
12 Drains owned by one landowner..... number of projects...	...	...	...	...	...	...	...
13 acres served ³...	...	...	...	...	...	...	...
14 Cooperative or mutual drains..... number of projects...	...	3	...	3	1	2	...
15 acres served ³...	...	3,560	...	5,560	450	1,050	...
16 Legally organized public drains..... number of projects...	5	1	8	...	1	...	...
17 acres served ³ ...	20,151	3,000	6,555	...	3,200	...	...
PROJECTS, 1960, BY YEAR STARTED							
18 1950-1959..... number of projects...	...	4	...	1	...	1	...
19 acres served ³...	...	6,560	...	1,000	...	800	...
20 Prior to 1950..... number of projects...	5	...	8	2	2	1	...
21 acres served ³ ...	20,151	...	6,555	4,560	3,650	250	...
DRAINAGE OPERATIONS, 1950-1959 ⁴							
22 Cost of drainage works and services.....projects reporting...	5	5	6	3	2	(⁵)	...
23 dollars...	2,272,704	78,683	149,942	52,582	25,000	(⁵)	...
24 New drainage works constructed, enlarged, or installed.....projects reporting...	3	5	1	3	...	(⁵)	...
25 dollars...	1,145,500	76,957	125,000	34,582	...	(⁵)	...
26 Open ditches.....projects reporting...	1	5	...	3	...	(⁵)	...
27 length, miles...	10.0	21.8	...	14.7	...	(⁵)	...
28 Tile or covered drains.....projects reporting...	1	...	...	...	...	...	...
29 length, miles...	2.0	...	...	...	...	...	...
30 Levees or dikes.....projects reporting...	2	...	1	1	...	...	...
31 length, miles...	2.0	...	3.5	2.0	...	...	...
32 Pumps.....projects reporting...	1	...	...	1	...	...	...
33 number of pumps...	4	...	...	1	...	...	...
34 Other (see text).....projects reporting...	2	...	...	...	...	...	...
35 Cost of maintenance, operation, repair, and administration.....projects reporting...	5	1	6	2	2	(⁵)	...
36 dollars...	1,127,204	1,726	24,942	18,000	25,000	(⁵)	...

¹Includes Baker, Crook, Curry, Douglas, Grant, Harney, Hood River, Jackson, Jefferson, Josephine, Morrow, Umatilla, Wallowa, Wasco, and Wheeler counties.

²Land served by two or more projects counted only once.

³Acres served by two projects are included for each project. See text.

⁴Includes projects taken over by another project prior to 1960. See text.

⁵Included in State total only.

DRAINAGE OF AGRICULTURAL LANDS

State Table 2.—DRAINAGE

	Size of project (Based on area of agricultural land in project)	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	123	353,916	31,700	44	229,279	88	124,637
2	500 to 999 acres.....	69	44,128	850	19	11,783	56	32,345
3	1,000 to 1,999 acres.....	30	35,548	1,000	9	10,424	21	25,124
4	2,000 to 4,999 acres.....	10	30,685	7,000	5	15,618	7	15,067
5	5,000 to 9,999 acres.....	6	47,249	7,000	4	26,988	3	20,261
6	10,000 to 19,999 acres.....	4	51,682	...	4	51,682	...	...
7	20,000 to 49,999 acres.....	4	144,624	15,850	3	112,784	1	31,840
8	50,000 to 99,999 acres.....	...	...	...	...	...	...	...
9	100,000 or more acres.....	...	...	...	...	...	...	...

State Table 3.—DRAINAGE PROJECTS, 1960,

	Type of organization	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	123	353,916	31,700	44	229,279	88	124,637
2	Drains owned by one landowner.....	59	88,203	...	24	53,868	43	34,335
3	Cooperative or mutual drains.....	52	97,212	31,700	8	6,910	45	90,302
4	Legally organized public drains.....	12	168,501	...	12	168,501	...	...

State Table 4.—DRAINAGE PROJECTS, 1960,

	Year of organization	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	123	353,916	31,700	44	229,279	88	124,637
2	1960-1959.....	82	119,612	31,700	3	1,800	81	117,812
3	Prior to 1960.....	41	234,304	...	41	227,479	7	6,825

PROJECTS, 1960, BY SIZE

Cost of drainage works and services, 1950-1959				New works constructed, enlarged, or installed, 1950-1959									
Total		For new works		Open ditches		Tile or covered drains		Levees and dikes		Pumps		Other, projects reporting	
Projects reporting	Dollars	Projects reporting	Dollars	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Number		
95	824,238	95	785,638	93	551.2	10	43.5	3	10.4	1	1	...	1
59	329,794	59	302,194	58	280.0	2	1.6	2	8.4	1	1	...	2
25	170,500	25	170,500	24	146.7	4	12.0	1	2.0	...	...	...	3
7	130,718	7	128,718	7	70.0	2	20.2	...	...	...	...	...	4
3	67,531	3	66,531	3	20.9	1	4.1	...	...	...	...	...	5
...	...	...	...	...	...	...	...	...	...	...	...	...	6
1	125,695	1	117,695	1	33.6	1	5.6	...	...	...	...	...	7
...	...	...	...	...	...	...	...	...	...	...	...	...	8
...	...	...	...	...	...	...	...	...	...	...	...	...	9

BY TYPE OF ORGANIZATION

Cost of drainage works and services, 1950-1959				New works constructed, enlarged, or installed, 1950-1959									
Total		For new works		Open ditches		Tile or covered drains		Levees and dikes		Pumps		Other, projects reporting	
Projects reporting	Dollars	Projects reporting	Dollars	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Number		
95	824,238	95	785,638	93	551.2	10	43.5	3	10.4	1	1	...	1
47	304,284	47	274,684	46	299.2	2	2.2	3	10.4	1	1	...	2
48	519,954	48	510,954	47	252.0	8	41.3	...	...	...	...	...	3
...	...	...	...	...	...	...	...	...	...	...	...	...	4

BY YEAR OF ORGANIZATION

Cost of drainage works and services, 1950-1959				New works constructed, enlarged, or installed, 1950-1959									
Total		For new works		Open ditches		Tile or covered drains		Levees and dikes		Pumps		Other, projects reporting	
Projects reporting	Dollars	Projects reporting	Dollars	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Number		
95	824,238	95	785,638	93	551.2	10	43.5	3	10.4	1	1	...	1
79	752,626	79	721,626	80	510.8	9	38.4	3	10.4	1	1	...	2
16	71,612	16	64,012	13	40.4	1	5.1	...	...	...	...	...	3

DRAINAGE OF AGRICULTURAL LANDS

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	The State	Beaufort	Berkeley	Calhoun	Charleston	Clarendon	Colleton	Darlington
AREA								
1 Approximate land area.....acres 1960...	19,374,080	376,320	704,000	241,280	604,800	382,720	670,720	348,800
2 Land in farms.....acres 1959...	9,149,492	105,230	160,735	162,943	116,385	232,705	326,447	254,113
3 Drainage projects..... number 1960...	123	2	2	2	10	5	1	7
4 1950...	45	1	1	...	...	3	1	2
5 Total area in drainage projects ¹ acres served 1960...	339,966	1,175	1,050	1,175	8,200	7,987	900	22,264
6 1950...	249,011	200	8,700	...	...	6,765	5,589	18,549
7 Area not used for agriculture or not drained..... acres served 1960...	1,900	...	...	...	...	...	...	...
8 Net area drained and used for agriculture..... acres served 1960...	338,066	1,175	1,050	1,175	8,200	7,987	900	22,264
9 Drainage established before 1950..... acres served 1960...	229,279	350	...	...	...	6,765	...	18,549
10 Area added, 1950-1959..... acres served 1960...	108,787	825	1,050	1,175	8,200	1,222	900	3,715
11 Area served by two or more projects..... acres served 1960...	15,850	...	...	...	...	...	...	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION								
12 Drains owned by one landowner..... number of projects...	59	2	1	...	9	1	1	1
13 acres served ² ...	88,203	1,175	500	...	7,650	680	900	1,145
14 Cooperative or mutual drains..... number of projects...	52	...	1	2	1	1	...	4
15 acres served ² ...	97,212	...	550	1,175	550	542	...	3,020
16 Legally organized public drains..... number of projects...	12	...	...	...	...	3	...	2
17 acres served ² ...	168,501	...	...	...	...	6,765	...	18,099
PROJECTS, 1960, BY YEAR STARTED								
18 1960-1959..... number of projects...	82	1	1	2	10	2	1	5
19 acres served ² ...	119,612	650	550	1,175	8,200	1,222	900	4,165
20 Prior to 1960..... number of projects...	41	1	1	...	...	3	...	2
21 acres served ² ...	234,304	525	500	...	...	6,765	...	18,099
DRAINAGE OPERATIONS, 1950-1959 ³								
22 Cost of drainage works and services..... projects reporting...	95	2	(4)	(4)	10	2	(4)	5
23 dollars...	824,238	9,208	(4)	(4)	104,961	5,073	(4)	22,850
24 New drainage works constructed, enlarged, or installed..... projects reporting...	95	2	(4)	(4)	10	2	(4)	5
25 dollars...	785,638	3,608	(4)	(4)	104,961	5,073	(4)	22,850
26 Open ditches..... projects reporting...	93	2	(4)	(4)	9	2	(4)	5
27 length, miles...	551.2	5.9	(4)	(4)	171.0	3.7	(4)	12.7
28 Tile or covered drains..... projects reporting...	10	...	...	...	...	...	...	1
29 length, miles...	43.5	...	...	...	...	...	...	1.8
30 Levees or dikes..... projects reporting...	3	...	...	...	1	...	...	...
31 length, miles...	10.4	...	...	...	6.0	...	...	...
32 Pumps..... projects reporting...	1	...	...	...	...	...	...	...
33 number of pumps...	1	...	...	...	...	...	...	...
34 Other (see text)..... projects reporting...	...	...	...	...	...	...	...	...
35 Cost of maintenance, operation, repair, and administration..... projects reporting...	5	1	...	...	...	...	...	...
36 dollars...	38,600	5,600	...	...	...	...	...	...

¹Land served by two or more projects counted only once.²Acres served by two projects are included for each project. See text.³Includes projects taken over by another project prior to 1960. See text.⁴Included in State total only.

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	Dillon	Dorchester	Florence	Georgetown	Hampton	Horry	Jasper	Kerabaw
AREA								
1 Approximate land area.....acres 1960...	260,480	364,160	515,200	520,320	359,680	737,280	423,680	503,040
2 Land in farms.....acres 1959...	189,432	128,167	354,668	89,465	199,067	361,341	113,682	205,548
3 Drainage projects..... number 1960...	5	7	9	2	17	18	4	2
4 1950...	1	7	4	...	5	3	2	...
5 Total area in drainage projects ¹ acres served 1960...	18,373	5,209	35,873	3,800	16,800	41,609	31,000	1,500
6 1950...	15,983	5,034	29,093	...	3,875	2,164	29,700	...
7 Area not used for agriculture or not drained..... acres served 1960...	...	...	...	...	...	...	...	...
8 Net area drained and used for agriculture..... acres served 1960...	18,373	5,209	35,873	3,800	16,800	41,609	31,000	1,500
9 Drainage established before 1950..... acres served 1960...	15,983	5,034	29,093	...	4,125	2,164	29,700	...
10 Area added, 1950-1959..... acres served 1960...	2,390	175	6,780	3,800	12,675	39,445	1,300	1,500
11 Area served by two or more projects..... acres served 1960...	...	...	...	...	...	15,850	...	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION								
12 Drains owned by one landowner..... number of projects...	...	7	1	...	15	3	4	2
13 acres served ²..	...	5,209	1,200	...	13,600	2,394	31,000	1,500
14 Cooperative or mutual drains..... number of projects...	4	...	4	2	2	15	...	...
15 acres served ² ..	2,390	...	6,780	3,800	3,200	55,065	...	...
16 Legally organized public drains..... number of projects...	1	...	4	...	...	...	...	...
17 acres served ² ..	15,983	...	27,893	...	...	...	...	...
PROJECTS, 1960, BY YEAR STARTED								
18 1950-1959..... number of projects...	4	...	5	2	11	15	2	2
19 acres served ² ..	2,390	...	7,980	3,800	8,650	55,295	1,000	1,500
20 Prior to 1950..... number of projects...	1	7	4	...	6	3	2	...
21 acres served ² ..	15,983	5,209	27,893	...	8,150	2,164	30,000	...
DRAINAGE OPERATIONS, 1950-1959 ³								
22 Cost of drainage works and services.....projects reporting...	4	2	5	2	14	17	3	(4)
23 dollars...	10,010	1,603	31,574	13,500	41,013	346,535	32,629	(4)
24 New drainage works constructed, enlarged, of installed.....projects reporting...	4	2	5	2	14	17	3	(4)
25 dollars...	10,010	1,603	31,574	13,500	41,013	337,535	10,629	(4)
26 Open ditches.....projects reporting...	4	2	5	2	14	17	3	(4)
27 length, miles...	5.9	1.5	15.3	13.0	31.1	153.0	7.3	(4)
28 Tile or covered drains.....projects reporting...	...	...	...	...	...	7	...	...
29 length, miles...	...	...	...	...	...	36.2	...	...
30 Levees or dikes.....projects reporting...	...	...	...	...	...	...	1	...
31 length, miles...	...	...	...	...	...	...	2.4	...
32 Pumps.....projects reporting...	...	...	...	...	...	...	1	...
33 number of pumps...	...	...	...	...	...	...	1	...
34 Other (see text).....projects reporting...	...	...	...	...	...	...	...	...
35 Cost of maintenance, operation, repair, and administration.....projects reporting...	...	...	...	...	...	2	1	...
36 dollars...	...	...	...	...	...	9,000	22,000	...

¹Land served by two or more projects counted only once.
²Acres served by two projects are included for each project. See text.
³Includes projects taken over by another project prior to 1960. See text.
⁴Included in State total only.

DRAINAGE OF AGRICULTURAL LANDS

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	Lee	Marion	Marlboro	Orangeburg	Sumter	Williamsburg	All other counties ¹
AREA							
1 Approximate land area.....acres 1960...	261,760	307,200	308,480	707,200	425,600	595,840	812,800
2 Land in farms.....acres 1959...	190,608	153,298	174,814	456,670	242,834	381,966	431,147
3 Drainage projects..... number 1960...	2	12	8	8	5	7	...
4 1950...	3	6	3	4	1	3	2
5 Total area in drainage projects ² acres served 1960...	15,092	12,806	6,914	52,483	4,300	51,456	...
6 1950...	15,092	9,706	3,614	46,848	1,200	42,456	4,443
7 Area not used for agriculture or not drained..... acres served 1960...	1,400	...	...	500	...	...	...
8 Net area drained and used for agriculture..... acres served 1960...	13,692	12,806	6,914	51,983	4,300	51,456	...
9 Drainage established before 1950..... acres served 1960...	13,692	9,706	3,614	46,848	1,200	42,456	...
10 Area added, 1950-1959..... acres served 1960...	...	3,100	3,300	5,135	3,100	9,000	...
11 Area served by two or more projects..... acres served 1960...	...	...	...	...	...	...	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION							
12 Drains owned by one landowner..... number of projects...	...	5	4	3	3	1	...
13 acres served ³..	...	7,160	3,550	4,740	3,000	2,800	...
14 Cooperative or mutual drains..... number of projects...	1	6	3	3	2	4	...
15 acres served ³ ..	580	4,360	2,250	3,650	1,300	8,000	...
16 Legally organized public drains..... number of projects...	1	1	1	2	...	2	...
17 acres served ³ ..	13,112	1,286	1,114	43,593	...	40,656	...
PROJECTS, 1960, BY YEAR STARTED							
18 1950-1959..... number of projects...	...	6	5	4	4	4	...
19 acres served ³..	...	3,100	3,300	4,635	3,100	8,000	...
20 Prior to 1950..... number of projects...	2	6	3	4	1	3	...
21 acres served ³ ..	13,692	9,706	3,614	47,348	1,200	43,456	...
DRAINAGE OPERATIONS, 1950-1959 ⁴							
22 Cost of drainage works and services.....projects reporting...	...	8	7	5	4	5	...
23 dollars...	...	23,905	55,308	24,278	24,200	52,670	...
24 New drainage works constructed, enlarged, or installed.....projects reporting...	...	8	7	5	4	5	...
25 dollars...	...	23,905	55,308	24,278	24,200	50,670	...
26 Open ditches.....projects reporting...	...	8	6	5	4	5	...
27 length, miles...	...	19.1	28.9	21.9	18.3	20.0	...
28 Tile or covered drains.....projects reporting...	...	...	2	...	...	...	...
29 length, miles...	...	...	5.5	...	...	...	...
30 Levees or dikes.....projects reporting...	...	...	...	...	1	...	...
31 length, miles...	...	...	...	...	2.0	...	...
32 Pumps.....projects reporting...	...	...	...	...	...	...	...
33 number of pumps...	...	...	...	...	...	...	...
34 Other (see text).....projects reporting...	...	...	...	...	...	...	...
35 Cost of maintenance, operation, repair, and administration.....projects reporting...	...	...	...	...	...	1	...
36 dollars...	...	...	...	...	...	2,000	...

¹Includes Chester and York counties.²Land served by two or more projects counted only once.³Acres served by two projects are included for each project. See text.⁴Includes projects taken over by another project prior to 1960. See text.

State Table 1.—DRAINAGE PROJECTS—NUMBER, AREA, COST, AND WORKS, 1920 TO 1960

[See text for comparability of data.]

Item	1960 Census	1950 Census	1940 Census	1930 Census	1920 Census
AREA					
Approximate land area..... acres...	48,881,920	48,983,040	48,983,040	49,195,520	49,195,520
Land in farms..... acres...	44,850,666	44,785,529	39,473,584	36,470,083	34,636,491
Drainage projects..... number...	41	34	¹ 202	NA	NA
Total area in drainage projects..... acres served...	658,580	707,263	676,472	697,758	222,062
Area not used for agriculture or not drained..... acres served...	...	NA	NA	NA	NA
Net area drained and used for agriculture..... acres served...	658,580	NA	² 647,173	² 684,746	NA
Drainage established 10 years or more before Census date..... acres served...	647,251	NA	NA	NA	NA
Drainage established within 10 years of Census date..... acres served...	11,329	NA	NA	NA	NA
Area served by two or more projects..... acres served...	2,010	NA	35,100	...	12,139
PROJECTS BY TYPE OF ORGANIZATION					
Drains owned by one landowner..... number of projects...	...	(³)	NA	NA	NA
acres served...	...	(³)	(³)	³ 2,000	...
Cooperative or mutual drains..... number of projects...	8	(³)	...	...	...
acres served...	11,059	(³)	...	...	...
Legally organized public drains..... number of projects...	33	³ 32	NA	NA	NA
acres served...	649,531	³ 706,973	³ 603,966	³ 621,258	222,062
PROJECTS BY YEAR STARTED					
Started 10 years or more before Census date..... number of projects...	33	NA	NA	NA	NA
acres served...	649,531	NA	676,472	436,665	59,446
Started within 10 years of Census date..... number of projects...	8	NA	...	NA	NA
acres served...	11,059	NA	...	261,093	162,616
OPERATIONS, 10-YEAR PERIOD PRECEDING CENSUS DATE					
Cost of drainage works and services..... projects reporting...	22	17	NA	NA	NA
dollars...	298,591	483,275	NA	NA	NA
New drainage works constructed, enlarged, or installed..... projects reporting...	11	...	NA	NA	NA
cost, dollars...	110,334	...	NA	NA	NA
Open ditches..... projects reporting...	11	...	NA	NA	NA
length, miles...	38.4	...	NA	NA	NA
Tile or covered drains..... projects reporting...	...	...	NA	NA	NA
length, miles...	...	...	NA	NA	NA
Levees or dikes..... projects reporting...	...	...	NA	NA	NA
length, miles...	...	...	NA	NA	NA
Pumps..... projects reporting...	...	NA	NA	NA	NA
number of pumps...	...	NA	NA	NA	NA
Other (see text)..... projects reporting...	...	NA	NA	NA	NA
Cost of maintenance, operation, repair, and administration..... projects reporting...	15	17	NA	NA	NA
dollars...	188,257	483,275	NA	NA	NA
STATUS ON CENSUS DATE					
Capital investment..... dollars...	NA	NA	5,078,771	4,534,768	1,461,063
Physical works:					
Open ditches..... length, miles...	NA	NA	840.7	854.4	237.8
Tile drains..... length, miles...	NA	NA	335.8	315.3	179.3
Levees and dikes..... length, miles...	NA	NA	7.4	...	2.4
Pumping units..... number of units...	NA	NA	...	...	...

NA Not available.

¹In 1940 each county drain was counted as a separate project. See text.²Not fully comparable. See text.³All projects in 1950 included with county drains, except 2 counties and 290 acres from Census of Irrigation; 1940 figures exclude 72,506 acres in "irrigation enterprises"; and 1930 figures exclude 74,500 acres in "irrigation enterprises." See text.

DRAINAGE OF AGRICULTURAL LANDS

State Table 2.—DRAINAGE

	Size of project (Based on area of agricultural land in project)	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	41	660,590	4,020	35	649,261	8	11,329
2	500 to 999 acres.....	4	2,820	...	3	2,120	1	700
3	1,000 to 1,999 acres.....	6	7,979	2,010	2	2,010	5	5,969
4	2,000 to 4,999 acres.....	7	21,786	...	6	19,406	1	2,380
5	5,000 to 9,999 acres.....	9	64,609	1,490	9	64,609	...	...
6	10,000 to 19,999 acres.....	6	101,096	520	6	101,096	...	...
7	20,000 to 49,999 acres.....	5	152,654	...	5	152,654	...	...
8	50,000 to 99,999 acres.....	3	197,579	...	3	195,299	1	2,280
9	100,000 or more acres.....	1	112,067	...	1	112,067	...	...

State Table 3.—DRAINAGE PROJECTS, 1960,

	Type of organization	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	41	660,590	4,020	35	649,261	8	11,329
2	Drains owned by one landowner.....	...	...	...	...	...	...	...
3	Cooperative or mutual drains.....	8	11,059	2,010	2	2,010	7	9,049
4	Legally organized public drains.....	33	649,531	2,010	33	647,251	1	2,280

State Table 4.—DRAINAGE PROJECTS, 1960,

	Year of organization	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	41	660,590	4,020	35	649,261	8	11,329
2	1950-1959.....	8	11,059	2,010	2	2,010	7	9,049
3	Prior to 1950.....	33	649,531	2,010	33	647,251	1	2,280

DRAINAGE OF AGRICULTURAL LANDS

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data.]

Item and Census year	The State	Beadle	Bon Homme	Brookings	Brown	Charles Mix	Clark	Clay
AREA								
1 Approximate land area.....acres 1960...	48,881,920	807,040	361,600	512,640	1,073,280	706,560	624,640	257,920
2 Land in farms.....acres 1959...	44,850,666	771,745	352,009	499,797	1,077,193	686,669	587,936	248,788
3 Drainage projects..... number 1960...	41	1	1	3	1	1	1	2
4..... 1950...	34	1	1	1	1	1	1	1
5 Total area in drainage projects ² acres served 1960...	658,580	8,192	3,277	9,580	112,067	800	6,291	62,459
6..... 1950...	707,263	8,192	3,277	7,200	112,067	800	6,291	59,050
7 Area not used for agriculture or not drained..... acres served 1960...	...	...	...	...	...	...	...	...
8 Net area drained and used for agriculture..... acres served 1960...	658,580	8,192	3,277	9,580	112,067	800	6,291	62,459
9 Drainage established before 1950..... acres served 1960...	647,251	8,192	3,277	7,200	112,067	800	6,291	59,050
10 Area added, 1950-1959..... acres served 1960...	11,329	...	...	2,380	...	...	...	3,409
11 Area served by two or more projects..... acres served 1960...	2,010	...	...	1,490	...	...	...	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION								
12 Drains owned by one landowner..... number of projects...	...	...	...	...	...	...	...	...
13..... acres served ³...	...	...	...	...	...	...	...	...
14 Cooperative or mutual drains..... number of projects...	8	...	...	2	...	...	...	1
15..... acres served ³ ...	11,059	...	...	3,870	...	...	...	1,129
16 Legally organized public drains..... number of projects...	33	1	1	1	1	1	1	1
17..... acres served ³ ...	649,531	8,192	3,277	7,200	112,067	800	6,291	61,330
PROJECTS, 1960, BY YEAR STARTED								
18 1950-1959..... number of projects...	8	...	...	2	...	...	...	1
19..... acres served ³ ...	11,059	...	...	3,870	...	...	...	1,129
20 Prior to 1950..... number of projects...	33	1	1	1	1	1	1	1
21..... acres served ³ ...	649,531	8,192	3,277	7,200	112,067	800	6,291	61,330
DRAINAGE OPERATIONS, 1950-1959 ⁴								
22 Cost of drainage works and services.....projects reporting...	22	...	...	2	1	...	...	2
23..... dollars...	298,591	...	...	8,195	9,928	...	...	86,542
24 New drainage works constructed, enlarged, or installed.....projects reporting...	11	...	...	2	...	...	...	2
25..... dollars...	110,334	...	...	7,225	...	...	...	60,465
26 Open ditches.....projects reporting...	11	...	...	2	...	...	...	2
27..... length, miles...	38.4	...	...	5.8	...	...	...	14.4
28 Tile or covered drains.....projects reporting...	...	...	...	...	...	...	...	...
29..... length, miles...	...	...	...	...	...	...	...	...
30 Levees or dikes.....projects reporting...	...	...	...	...	...	...	...	...
31..... length, miles...	...	...	...	...	...	...	...	...
32 Pumps.....projects reporting...	...	...	...	...	...	...	...	...
33..... number of pumps...	...	...	...	...	...	...	...	...
34 Other (see text).....projects reporting...	...	...	...	...	...	...	...	...
35 Cost of maintenance, operation, repair, and administration.....projects reporting...	15	...	...	1	1	...	...	1
36..... dollars...	188,257	...	...	970	9,928	...	...	26,077

¹The excess of farm acreage over approximate land area is due to the fact that the entire acreage of a farm is tabulated as in the county in which the headquarters is located, even though a part of the farm may be situated in an adjoining county.

²Land served by two or more projects counted only once.

³Acres served by two projects are included for each project. See text.

⁴Includes projects taken over by another project prior to 1960. See text.

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	Codington	Davison	Day	Douglas	Hamlin	Hanson	Hutchinson	Jerauld
AREA								
1 Approximate land area.....acres 1960...	442,240	276,480	678,400	¹ 278,400	332,800	275,840	520,960	337,920
2 Land in farms.....acres 1959...	415,574	272,295	638,207	¹ 284,629	311,092	259,885	518,505	317,266
3 Drainage projects..... number 1960...	1	1	1	1	1	1	1	1
4 1950...	1	1	1	1	1	1	1	1
5 Total area in drainage projects ² acres served 1960...	2,408	15,474	840	19,640	13,599	8,510	8,760	480
6 1950...	2,408	15,474	3,080	19,640	13,599	8,510	8,760	480
7 Area not used for agriculture or not drained..... acres served 1960...	...	...	...	...	...	...	...	...
8 Net area drained and used for agriculture..... acres served 1960...	2,408	15,474	840	19,640	13,599	8,510	8,760	480
9 Drainage established before 1960..... acres served 1960...	2,408	15,474	840	19,640	13,599	8,510	8,760	480
10 Area added, 1950-1959..... acres served 1960...	...	...	...	...	...	...	...	...
11 Area served by two or more projects..... acres served 1960...	...	...	...	...	...	...	...	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION								
12 Drains owned by one landowner..... number of projects...	...	...	...	...	...	...	...	...
13 acres served ³...	...	...	...	...	...	...	...	...
14 Cooperative or mutual drains..... number of projects...	...	...	...	...	...	...	...	...
15 acres served ³...	...	...	...	...	...	...	...	...
16 Legally organized public drains..... number of projects...	1	1	1	1	1	1	1	1
17 acres served ³ ...	2,408	15,474	840	19,640	13,599	8,510	8,760	480
PROJECTS, 1960, BY YEAR STARTED								
18 1960-1969..... number of projects...	...	...	...	...	...	...	...	...
19 acres served ³...	...	...	...	...	...	...	...	...
20 Prior to 1960..... number of projects...	1	1	1	1	1	1	1	1
21 acres served ³ ...	2,408	15,474	840	19,640	13,599	8,510	8,760	480
DRAINAGE OPERATIONS, 1950-1959 ⁴								
22 Cost of drainage works and services..... projects reporting...	...	...	1	1	1	...	...	...
23 dollars...	...	...	477	763	764	...	...	...
24 New drainage works constructed, enlarged, or installed..... projects reporting...	...	...	...	...	...	...	...	...
25 dollars...	...	...	...	...	...	...	...	...
26 Open ditches..... projects reporting...	...	...	...	...	...	...	...	...
27 length, miles...	...	...	...	...	...	...	...	...
28 Tile or covered drains..... projects reporting...	...	...	...	...	...	...	...	...
29 length, miles...	...	...	...	...	...	...	...	...
30 Levees or dikes..... projects reporting...	...	...	...	...	...	...	...	...
31 length, miles...	...	...	...	...	...	...	...	...
32 Pumps..... projects reporting...	...	...	...	...	...	...	...	...
33 number of pumps...	...	...	...	...	...	...	...	...
34 Other (see text)..... projects reporting...	...	...	...	...	...	...	...	...
35 Cost of maintenance, operation, repair, and administration..... projects reporting...	...	...	1	1	1	...	...	...
36 dollars...	...	...	477	763	764	...	...	...

¹The excess of farm acreage over approximate land area is due to the fact that the entire acreage of a farm is tabulated as in the county in which the headquarters is located, even though a part of the farm may be situated in an adjoining county.

²Land served by two or more projects counted only once.

³Acres served by two projects are included for each project. See text.

⁴Includes projects taken over by another project prior to 1960. See text.

DRAINAGE OF AGRICULTURAL LANDS

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1960 data]

Item and Census year	Kingsbury	Lake	Lincoln	Lyman	McCook	Marshall	Miner	Minnehaha
AREA								
1 Approximate land area.....acres 1960...	524,160	365,440	368,640	1,066,880	369,280	560,000	365,440	521,600
2 Land in farms.....acres 1959...	512,555	344,785	354,988	937,075	363,080	534,185	346,258	491,584
3 Drainage projects..... number 1960...	1	1	1	1	1	2	1	2
4 1960...	1	1	1	1	1	1	1	1
5 Total area in drainage projects ¹ acres served 1960...	9,160	25,805	33,971	4,320	2,080	91,392	5,200	39,732
6 1960...	9,160	25,805	33,971	4,320	2,080	91,392	5,200	42,172
7 Area not used for agriculture or not drained..... acres served 1960...	...	...	...	...	...	...	...	...
8 Net area drained and used for agriculture..... acres served 1960...	9,160	25,805	33,971	4,320	2,080	91,392	5,200	39,732
9 Drainage established before 1950..... acres served 1960...	9,160	25,805	33,971	4,320	2,080	91,392	5,200	39,732
10 Area added, 1950-1959..... acres served 1960...	...	...	...	...	...	...	...	...
11 Area served by two or more projects..... acres served 1960...	...	...	...	...	...	...	...	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION								
12 Drains owned by one landowner..... number of projects...	...	...	...	...	...	...	...	...
13 acres served ²...	...	...	...	...	...	...	...	...
14 Cooperative or mutual drains..... number of projects...	...	...	...	...	...	...	...	...
15 acres served ²...	...	...	...	...	...	...	...	...
16 Legally organized public drains..... number of projects...	1	1	1	1	1	2	1	2
17 acres served ² ...	9,160	25,805	33,971	4,320	2,080	91,392	5,200	39,732
PROJECTS, 1960, BY YEAR STARTED								
18 1950-1959..... number of projects...	...	...	...	...	...	...	...	...
19 acres served ²...	...	...	...	...	...	...	...	...
20 Prior to 1950..... number of projects...	1	1	1	1	1	2	1	2
21 acres served ² ...	9,160	25,805	33,971	4,320	2,080	91,392	5,200	39,732
DRAINAGE OPERATIONS, 1950-1959 ³								
22 Cost of drainage works and services.....projects reporting...	1	1	1	...	...	1	...	1
23 dollars...	2,557	28,847	10,387	...	...	9,110	...	18,267
24 New drainage works constructed, enlarged, or installed.....projects reporting...	...	...	1	...	...	...	...	...
25 dollars...	...	...	10,137	...	...	...	...	...
26 Open ditches.....projects reporting...	...	...	1	...	...	...	...	...
27 length, miles...	...	...	3.6	...	...	...	...	...
28 Tile or covered drains.....projects reporting...	...	...	...	...	...	...	...	...
29 length, miles...	...	...	...	...	...	...	...	...
30 Levees or dikes.....projects reporting...	...	...	...	...	...	...	...	...
31 length, miles...	...	...	...	...	...	...	...	...
32 Pumps.....projects reporting...	...	...	...	...	...	...	...	...
33 number of pumps...	...	...	...	...	...	...	...	...
34 Other (see text).....projects reporting...	...	...	...	...	...	...	...	...
35 Cost of maintenance, operation, repair, and administration.....projects reporting...	1	1	1	...	...	1	...	1
36 dollars...	2,557	28,847	250	...	...	9,110	...	18,267

¹Land served by two or more projects counted only once.²Acres served by two projects are included for each project. See text.³Includes projects taken over by another project prior to 1960. See text.

County Table 1. - DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	Moody	Roberts	Sanborn	Spink	Turner	Union	Yankton	All other counties ¹
AREA								
1 Approximate land area.....acres 1960...	334,720	711,040	365,440	963,840	391,040	290,560	333,440	6,323,200
2 Land in farms.....acres 1959...	323,323	671,761	339,791	921,614	384,851	275,265	307,880	5,437,235
3 Drainage projects..... number 1960...	1	2	1	2	2	4	1	...
4 1950...	1	1	1	1	1	1	1	4
5 Total area in drainage projects ² acres served 1960...	4,681	8,576	42,880	16,629	52,017	20,960	28,800	...
6 1950...	4,681	8,576	42,880	15,929	50,217	17,920	28,800	55,332
7 Area not used for agriculture or not drained..... acres served 1960...	...	...	...	...	...	...	...	...
8 Net area drained and used for agriculture..... acres served 1960...	4,681	8,576	42,880	16,629	52,017	20,960	28,800	...
9 Drainage established before 1950..... acres served 1960...	4,681	8,576	42,880	15,929	50,217	17,920	28,800	...
10 Area added, 1950-1959..... acres served 1960...	...	...	...	700	1,800	3,040	...	...
11 Area served by two or more projects..... acres served 1960...	...	...	...	...	...	520	...	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION								
12 Drains owned by one landowner..... number of projects...	...	...	...	...	...	...	...	...
13 acres served ³...	...	...	...	...	...	...	...	...
14 Cooperative or mutual drains..... number of projects...	...	...	...	1	1	3	...	...
15 acres served ³...	...	...	...	700	1,800	3,560	...	...
16 Legally organized public drains..... number of projects...	1	2	1	1	1	1	1	...
17 acres served ³ ...	4,681	8,576	42,880	15,929	50,217	17,920	28,800	...
PROJECTS, 1960, BY YEAR STARTED								
18 1950-1959..... number of projects...	...	...	...	1	1	3	...	...
19 acres served ³...	...	...	...	700	1,800	3,560	...	...
20 Prior to 1950..... number of projects...	1	2	1	1	1	1	1	...
21 acres served ³ ...	4,681	8,576	42,880	15,929	50,217	17,920	28,800	...
DRAINAGE OPERATIONS, 1950-1959 ⁴								
22 Cost of drainage works and services.....projects reporting...	...	...	1	1	2	4	1	...
23 dollars...	...	...	244	900	29,083	84,062	8,465	...
24 New drainage works constructed, enlarged, or installed.....projects reporting...	...	...	...	1	2	3	...	...
25 dollars...	...	...	...	900	21,317	10,290	...	...
26 Open ditches.....projects reporting...	...	...	...	1	2	3	...	...
27 length, miles...	...	...	...	0.5	7.5	6.6	...	...
28 Tile or covered drains.....projects reporting...	...	...	...	...	...	...	...	...
29 length, miles...	...	...	...	...	...	...	...	...
30 Levees or dikes.....projects reporting...	...	...	...	...	...	...	...	...
31 length, miles...	...	...	...	...	...	...	...	...
32 Pumps.....projects reporting...	...	...	...	...	...	...	...	...
33 number of pumps...	...	...	...	...	...	...	...	...
34 Other (see text).....projects reporting...	...	...	...	...	...	...	...	...
35 Cost of maintenance, operation, repair, and administration.....projects reporting...	...	...	1	...	1	1	1	...
36 dollars...	...	...	244	...	7,766	73,772	8,465	...

¹Includes Butte, Meade, Pennington, and Todd counties.
²Land served by two or more projects counted only once.
³Acres served by two projects are included for each project. See text.
⁴Includes projects taken over by another project prior to 1960. See text.

State Table 1.—DRAINAGE PROJECTS—NUMBER, AREA, COST, AND WORKS, 1920 TO 1960

[See text for comparability of data.]

Item	1960 Census	1950 Census	1940 Census	1930 Census	1920 Census
AREA					
Approximate land area..... acres ...	26,727,680	26,750,080	26,855,040	26,679,680	26,679,680
Land in farms..... acres ...	16,080,285	18,534,380	18,492,898	18,003,241	19,510,856
Drainage projects..... number ...	179	151	155	NA	NA
Total area in drainage projects..... acres served...	730,855	615,838	601,592	593,560	363,671
Area not used for agriculture or not drained..... acres served...	139,976	NA	NA	NA	NA
Net area drained and used for agriculture..... acres served...	590,879	NA	¹ 579,283	¹ 413,791	NA
Drainage established 10 years or more before Census date..... acres served...	492,825	NA	NA	NA	NA
Drainage established within 10 years of Census date..... acres served...	98,054	NA	NA	NA	NA
Area served by two or more projects..... acres served...	6,527	5,148	16,580	5,832	...
PROJECTS BY TYPE OF ORGANIZATION					
Drains owned by one landowner..... number of projects ...	8	2	NA	NA	...
acres served...	8,433	2,175	1,200	600	...
Cooperative or mutual drains..... number of projects ...	37	20	...	...	...
acres served...	39,293	21,623	...	...	...
Legally organized public drains..... number of projects ...	134	129	NA	NA	NA
acres served...	549,680	592,040	600,392	592,960	363,671
PROJECTS BY YEAR STARTED					
Started 10 years or more before Census date..... number of projects ...	¹ 54	132	NA	NA	...
acres served...	467,976	593,248	573,432	486,830	...
Started within 10 years of Census date..... number of projects ...	25	19	NA	NA	NA
acres served...	129,430	22,590	28,160	106,730	363,671
OPERATIONS, 10-YEAR PERIOD PRECEDING CENSUS DATE					
Cost of drainage works and services..... projects reporting...	36	26	NA	NA	NA
dollars ...	2,136,236	270,623	NA	NA	NA
New drainage works constructed, enlarged, or installed..... projects reporting...	22	² 23	NA	NA	NA
cost, dollars ...	1,853,349	² 255,697	NA	NA	NA
Open ditches..... projects reporting...	22	23	NA	NA	NA
length, miles ...	134.6	105	NA	NA	NA
Tile or covered drains..... projects reporting...	...	...	NA	NA	NA
length, miles ...	...	...	NA	NA	NA
Levees or dikes..... projects reporting...	...	...	NA	NA	NA
length, miles ...	...	...	NA	NA	NA
Pumps..... projects reporting...	...	NA	NA	NA	NA
number of pumps...	...	NA	NA	NA	NA
Other (see text)..... projects reporting...	...	NA	NA	NA	NA
Cost of maintenance, operation, repair, and administration..... projects reporting...	17	NA	NA	NA	NA
dollars ...	282,887	14,926	NA	NA	NA
STATUS ON CENSUS DATE					
Capital investment..... dollars ...	NA	NA	6,501,750	6,366,747	2,925,944
Physical works:					
Open ditches..... length, miles ...	NA	NA	1,508.0	1,413.0	777.3
Tile drains..... length, miles ...	NA	NA	...	...	0.3;
Levees and dikes..... length, miles ...	NA	NA	30.0	29.8	42.3
Pumping units..... number of units ...	NA	...	...	...	...

NA Not available.

¹Not fully comparable. See text.

²Cost of new works for lands not previously drained.

DRAINAGE OF AGRICULTURAL LANDS

State Table 2.—DRAINAGE

	Size of project (Based on area of agricultural land in project)	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	179	597,406	13,054	164	499,352	18	98,054
2	500 to 999 acres.....	55	38,260	700	44	31,490	11	6,770
3	1,000 to 1,999 acres.....	60	83,789	3,267	58	80,839	3	2,950
4	2,000 to 4,999 acres.....	41	131,220	...	39	126,920	2	4,300
5	5,000 to 9,999 acres.....	11	75,379	500	11	75,379	...	...
6	10,000 to 19,999 acres.....	8	108,569	2,560	8	103,200	1	5,369
7	20,000 to 49,999 acres.....	3	69,189	...	3	69,189	...	...
8	50,000 to 99,999 acres.....	1	91,000	6,027	1	12,335	1	78,665
9	100,000 or more acres.....	...	...	...	...	...	...	...

¹Includes one project taken over by another project prior to 1960. See text.

State Table 3.—DRAINAGE PROJECTS, 1960,

	Type of organization	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	179	597,406	13,054	164	499,352	18	98,054
2	Drains owned by one landowner.....	8	8,433	...	4	4,533	4	3,900
3	Cooperative or mutual drains.....	37	39,293	3,967	26	29,173	12	10,120
4	Legally organized public drains.....	134	549,680	9,087	134	465,646	2	84,034

State Table 4.—DRAINAGE PROJECTS, 1960,

	Year of organization	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	179	597,406	13,054	164	499,352	18	98,054
2	1950-1959.....	25	129,430	8,587	10	31,376	18	98,054
3	Prior to 1950.....	154	467,976	4,467	154	467,976	...	...

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	Gibson	Hardeman	Hardin	Haywood	Henderson	Henry	Humphreys	Lake
AREA								
1 Approximate land area.....acres 1960...	388,480	419,840	375,680	332,160	329,600	383,360	355,200	104,960
2 Land in farms.....acres 1959...	344,464	275,578	197,122	266,279	223,786	252,293	148,732	87,639
3 Drainage projects..... number 1960...	18	7	11	12	11	6	1	1
4 1950...	18	6	9	11	16	5	1	1
5 Total area in drainage projects ¹ acres served 1960...	69,477	8,554	15,106	41,344	15,085	22,858	1,702	8,000
6 1950...	69,477	7,754	15,106	39,044	26,903	31,542	1,702	3,164
7 Area not used for agriculture or not drained..... acres served 1960...	8,000	...	...	7,600	...	16,696	...	800
8 Net area drained and used for agriculture..... acres served 1960...	61,477	8,554	15,106	33,744	15,085	6,162	1,702	7,200
9 Drainage established before 1950..... acres served 1960...	61,477	7,754	15,106	31,444	15,085	6,162	1,702	3,164
10 Area added, 1950-1959..... acres served 1960...	...	800	...	2,300	...	...	...	4,036
11 Area served by two or more projects..... acres served 1960...	...	...	...	...	...	...	...	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION								
12 Drains owned by one landowner..... number of projects...	...	1	...	1	...	...	...	...
13 acres served ²...	...	800	...	500	...	...	...	...
14 Cooperative or mutual drains..... number of projects...	2	...	2	2	...	...	...	...
15 acres served ² ...	1,370	...	1,500	4,600	...	...	...	...
16 Legally organized public drains..... number of projects...	16	6	9	9	11	6	1	1
17 acres served ² ...	60,107	7,754	13,606	28,644	15,085	6,162	1,702	7,200
PROJECTS, 1960, BY YEAR STARTED								
18 1950-1959..... number of projects...	...	1	2	1	...	...	...	1
19 acres served ²...	...	800	1,500	2,300	...	...	...	7,200
20 Prior to 1950..... number of projects...	18	6	9	11	11	6	1	...
21 acres served ² ...	61,477	7,754	13,606	31,444	15,085	6,162	1,702	...
DRAINAGE OPERATIONS, 1950-1959 ³								
22 Cost of drainage works and services.....projects reporting...	...	(⁴)	2	2	...	...	...	1
23 dollars...	...	(⁴)	14,200	27,000	...	...	...	202,382
24 New drainage works constructed, enlarged, or installed.....projects reporting...	...	(⁴)	...	2	...	...	...	1
25 dollars...	...	(⁴)	...	23,000	...	...	...	202,382
26 Open ditches.....projects reporting...	...	(⁴)	...	2	...	...	...	1
27 length, miles...	...	(⁴)	...	13.0	...	...	...	8.7
28 Tile or covered drains.....projects reporting...	...	...	...	...	...	...	...	...
29 length, miles...	...	...	...	...	...	...	...	...
30 Levees or dikes.....projects reporting...	...	...	...	...	...	...	...	...
31 length, miles...	...	...	...	...	...	...	...	...
32 Pumps.....projects reporting...	...	...	...	...	...	...	...	...
33 number of pumps...	...	...	...	...	...	...	...	...
34 Other (see text).....projects reporting...	...	...	...	...	...	...	...	...
35 Cost of maintenance, operation, repair, and administration.....projects reporting...	...	...	2	1	...	...	...	...
36 dollars...	...	...	14,200	4,000	...	...	...	...

¹Land served by two or more projects counted only once.
²Acres served by two projects are included for each project. See text.
³Includes projects taken over by another project prior to 1960. See text.
⁴Included in State total only.

DRAINAGE OF AGRICULTURAL LANDS

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	Lauderdale	McNairy	Madison	Obion	Perry	Shelby	Tipton	Weakley
AREA								
1 Approximate land area.....acres 1960...	310,400	364,160	358,400	352,000	268,160	480,640	293,120	368,640
2 Land in farms.....acres 1959...	225,566	213,956	263,409	285,759	129,748	293,581	241,009	280,127
3 Drainage projects..... number 1960...	4	22	12	12	1	12	10	15
4 1950...	4	13	12	12	...	7	8	14
5 Total area in drainage projects ¹ acres served 1960...	8,857	30,328	36,220	44,711	1,685	54,862	17,219	66,147
6 1950...	8,857	25,138	36,220	45,458	...	43,812	17,219	66,047
7 Area not used for agriculture or not drained..... acres served 1960...	...	...	6,500	18,500	...	...	...	14,700
8 Net area drained and used for agriculture..... acres served 1960...	8,857	30,328	29,720	26,211	1,685	54,862	17,219	51,447
9 Drainage established before 1950..... acres served 1960...	8,857	25,138	29,720	24,028	1,685	53,612	17,219	51,447
10 Area added, 1950-1959..... acres served 1960...	...	5,190	...	2,183	...	1,250	...	...
11 Area served by two or more projects..... acres served 1960...	...	...	...	...	...	500	...	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION								
12 Drains owned by one landowner..... number of projects...	...	4	...	...	...	...	1	...
13 acres served ²...	...	3,958	...	...	...	...	1,175	...
14 Cooperative or mutual drains..... number of projects...	2	6	...	1	...	4	5	...
15 acres served ² ...	2,656	5,140	...	850	...	3,190	7,501	...
16 Legally organized public drains..... number of projects...	2	12	12	11	1	8	4	15
17 acres served ² ...	6,201	21,230	29,720	25,361	1,685	52,172	8,543	51,447
PROJECTS, 1960, BY YEAR STARTED								
18 1950-1959..... number of projects...	...	9	...	2	...	2	2	1
19 acres served ²...	...	6,740	...	5,150	...	1,250	4,500	2,800
20 Prior to 1950..... number of projects...	4	13	12	10	1	10	8	14
21 acres served ² ...	8,857	23,588	29,720	21,061	1,685	54,112	12,719	48,647
DRAINAGE OPERATIONS, 1950-1959 ³								
22 Cost of drainage works and services.....projects reporting...	...	10	...	3	...	6	4	1
23 dollars...	...	53,987	...	172,019	...	70,252	26,200	10,000
24 New drainage works constructed, enlarged, of installed.....projects reporting...	...	8	...	2	...	2	...	1
25 dollars...	...	29,000	...	147,019	...	22,752	...	10,000
26 Open ditches.....projects reporting...	...	8	...	2	...	2	...	1
27 length, miles...	...	16.5	...	7.6	...	5.8	...	7.0
28 Tile or covered drains.....projects reporting...	...	...	...	...	...	...	...	...
29 length, miles...	...	...	...	...	...	...	...	...
30 Levees or dikes.....projects reporting...	...	...	...	...	...	...	...	...
31 length, miles...	...	...	...	...	...	...	...	...
32 Pumps.....projects reporting...	...	...	...	...	...	...	...	...
33 number of pumps...	...	...	...	...	...	...	...	...
34 Other (see text).....projects reporting...	...	...	...	...	...	...	...	...
35 Cost of maintenance, operation, repair, and administration.....projects reporting...	...	2	...	1	...	5	4	...
36 dollars...	...	24,987	...	25,000	...	47,500	26,200	...

¹Land served by two or more projects counted only once.²Acres served by two projects are included for each project. See text.³Includes projects taken over by another project prior to 1960. See text.

State Table 1.—DRAINAGE PROJECTS—NUMBER, AREA, COST, AND WORKS, 1920 TO 1960

[See text for comparability of data.]

Item	1960 Census	1950 Census	1940 Census	1930 Census	1920 Census
AREA					
Approximate land area..... acres...	168,217,600	168,648,320	168,732,160	167,934,720	167,934,720
Land in farms..... acres...	143,217,559	145,389,014	137,683,372	124,707,130	114,020,621
Drainage projects..... number...	243	543	81	NA	NA
Total area in drainage projects..... acres served...	6,500,043	5,794,786	4,218,850	2,883,356	2,166,128
Area not used for agriculture or not drained..... acres served...	808,913	NA	NA	NA	NA
Net area drained and used for agriculture..... acres served...	5,691,130	NA	12,819,775	11,895,486	NA
Drainage established 10 years or more before Census date..... acres served...	5,372,932	NA	NA	NA	NA
Drainage established within 10 years of Census date..... acres served...	318,198	NA	NA	NA	NA
Area served by two or more projects..... acres served...	247,844	134,831	312,320	...	...
PROJECTS BY TYPE OF ORGANIZATION					
Drains owned by one landowner..... number of projects...	130	222	NA	NA	NA
acres served...	369,079	2147,345	240,380	228,600	27,500
Cooperative or mutual drains..... number of projects...	43	213	...	...	...
acres served...	74,170	218,155	...	...	...
Legally organized public drains..... number of projects...	70	262	NA	NA	NA
acres served...	5,495,725	25,155,647	23,844,378	22,767,477	22,102,628
PROJECTS BY YEAR STARTED					
Started 10 years or more before Census date..... number of projects...	133	259	NA	NA	NA
acres served...	5,744,714	23,355,505	3,060,462	2,366,724	893,981
Started within 10 years of Census date..... number of projects...	110	238	NA	NA	NA
acres served...	194,260	21,965,642	1,158,388	516,632	1,272,147
OPERATIONS, 10-YEAR PERIOD PRECEDING CENSUS DATE					
Cost of drainage works and services..... projects reporting...	225	289	NA	NA	NA
dollars...	28,895,392	9,534,229	NA	NA	NA
New drainage works constructed, enlarged, or installed..... projects reporting...	175	332	NA	NA	NA
cost, dollars...	13,031,672	21,822,245	NA	NA	NA
Open ditches..... projects reporting...	171	33	NA	NA	NA
length, miles...	3,224.7	948.1	NA	NA	NA
Tile or covered drains..... projects reporting...	17	1	NA	NA	NA
length, miles...	117.0	4	NA	NA	NA
Levees or dikes..... projects reporting...	4	2	NA	NA	NA
length, miles...	4.7	7	NA	NA	NA
Pumps..... projects reporting...	5	NA	NA	NA	NA
number of pumps...	5	NA	NA	NA	NA
Other (see text)..... projects reporting...	4	NA	NA	NA	NA
Cost of maintenance, operation, repair, and administration..... projects reporting...	141	NA	NA	NA	NA
dollars...	15,863,720	7,711,984	NA	NA	NA
STATUS ON CENSUS DATE					
Capital investment..... dollars...	NA	NA	14,047,181	12,002,949	5,700,805
Physical works:					
Open ditches..... length, miles...	NA	NA	4,906.3	3,661.8	2,728.5
Tile drains..... length, miles...	NA	NA	14.1	8.5	...
Levees and dikes..... length, miles...	NA	NA	61.7	215.9	59.8
Pumping units..... number of units...	NA	25	11	53	...

NA Not available.

¹Not fully comparable. See text.

²1950 figures exclude 446 projects and 473,639 acres in "irrigation enterprises"; 1940 figures exclude 334,092 acres in "irrigation enterprises"; 1930 figures exclude 87,279 acres in "irrigation enterprises"; 1920 figures exclude 56,000 acres in "irrigation enterprises."

³Cost of new works for lands not previously drained.

DRAINAGE OF AGRICULTURAL LANDS

State Table 2.—DRAINAGE

Size of project (Based on area of agricultural land in project)	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
		Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
				Projects reporting	Acres	Projects reporting	Acres
1 All projects.....	243	5,938,974	495,688	156	5,611,598	103	327,376
2 500 to 999 acres.....	78	51,490	12,989	28	18,897	50	32,593
3 1,000 to 1,999 acres.....	54	71,193	17,329	31	39,063	27	32,130
4 2,000 to 4,999 acres.....	32	99,489	28,315	21	61,701	13	37,788
5 5,000 to 9,999 acres.....	13	96,652	33,294	12	83,828	3	12,824
6 10,000 to 19,999 acres.....	20	277,059	52,417	18	237,472	4	39,587
7 20,000 to 49,999 acres.....	24	777,625	82,811	24	731,213	2	46,412
8 50,000 to 99,999 acres.....	11	735,784	78,421	11	693,884	1	41,900
9 100,000 or more acres.....	11	3,829,682	190,112	11	3,745,540	3	84,142

State Table 3.—DRAINAGE PROJECTS, 1960,

Type of organization	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
		Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
				Projects reporting	Acres	Projects reporting	Acres
1 All projects.....	243	5,938,974	495,688	156	5,611,598	103	327,376
2 Drains owned by one landowner.....	130	369,079	166,758	64	261,172	72	107,907
3 Cooperative or mutual drains.....	43	74,170	10,886	24	43,560	22	30,610
4 Legally organized public drains.....	70	5,495,725	318,044	68	5,306,866	9	188,859

State Table 4.—DRAINAGE PROJECTS, 1960,

Year of organization	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
		Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
				Projects reporting	Acres	Projects reporting	Acres
1 All projects.....	243	5,938,974	495,688	156	5,611,598	103	327,376
2 1960-1959.....	110	194,260	36,018	23	54,032	88	140,228
3 Prior to 1950.....	133	5,744,714	459,670	133	5,557,566	15	187,148

PROJECTS, 1960, BY SIZE

Cost of drainage works and services, 1950-1959				New works constructed, enlarged, or installed, 1950-1959									
Total		For new works		Open ditches		Tile or covered drains		Levees and dikes		Pumps		Other, projects reporting	
Projects reporting	Dollars	Projects reporting	Dollars	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Number		
225	28,895,392	175	13,031,672	171	3,224.7	17	117.0	4	4.7	5	5	4	1
73	331,711	65	264,146	64	367.2	4	0.4	3	3.7	...	...	1	2
49	263,934	40	222,519	40	347.4	1	0.1	...	...	1	1	1	3
28	418,917	22	311,492	22	216.6	...	...	...	...	...	...	1	4
11	338,164	7	136,314	6	120.5	1	1.0	...	...	1	1	...	5
18	2,127,599	12	996,846	11	764.6	2	1.1	...	...	1	1	...	6
24	2,420,066	12	255,349	12	205.5	1	1.7	...	...	...	...	1	7
11	5,311,387	7	1,190,347	6	232.0	5	110.3	1	1.0	1	1	...	8
11	17,683,614	10	9,654,659	10	970.9	3	2.4	...	...	1	1	...	9

BY TYPE OF ORGANIZATION

Cost of drainage works and services, 1950-1959				New works constructed, enlarged, or installed, 1950-1959									
Total		For new works		Open ditches		Tile or covered drains		Levees and dikes		Pumps		Other, projects reporting	
Projects reporting	Dollars	Projects reporting	Dollars	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Number		
225	28,895,392	175	13,031,672	171	3,224.7	17	117.0	4	4.7	5	5	4	1
125	1,305,444	113	1,020,577	112	1,685.2	4	0.4	3	3.7	2	2	3	2
32	263,423	26	224,690	26	123.4	1	0.1	...	...	...	...	...	3
68	27,326,525	36	11,786,405	33	1,416.1	12	116.5	1	1.0	3	3	1	4

BY YEAR OF ORGANIZATION

Cost of drainage works and services, 1950-1959				New works constructed, enlarged, or installed, 1950-1959									
Total		For new works		Open ditches		Tile or covered drains		Levees and dikes		Pumps		Other, projects reporting	
Projects reporting	Dollars	Projects reporting	Dollars	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Number		
225	28,895,392	175	13,031,672	171	3,224.7	17	117.0	4	4.7	5	5	4	1
110	1,075,004	108	958,539	108	1,057.4	4	0.4	2	0.2	1	1	1	2
115	27,820,388	67	12,073,133	63	2,167.3	13	116.6	2	4.5	4	4	3	3

DRAINAGE OF AGRICULTURAL LANDS

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	The State	Anderson	Austin	Bowie	Brazoria	Brazos	Burleson	Calhoun	Cameron	
AREA										
1 Approximate land area.....acres 1960...	168,217,600	682,880	423,680	577,920	910,080	373,120	434,560	343,040	565,120	
2 Land in farms.....acres 1959...	143,217,559	444,650	414,165	351,142	633,166	325,983	371,000	158,054	486,198	
3 Drainage projects..... number 1960...	243	1	5	10	17	9	1	14	9	
4	1950...	543	1	4	1	23	2	...	7	41
5 Total area in drainage projects ¹ acres served 1960...	6,500,043	1,145	12,540	8,749	476,129	7,412	1,250	92,532	271,226	
6	1950...	5,794,786	1,145	11,140	1,000	374,510	1,768	...	93,099	277,258
7 Area not used for agriculture or not drained..... acres served 1960...	808,913	...	...	...	29,500	...	...	...	5,585
8 Not area drained and used for agriculture..... acres served 1960...	5,691,130	1,145	12,540	8,749	446,629	7,412	1,250	92,532	265,641	
9 Drainage established before 1950..... acres served 1960...	5,372,932	1,145	10,740	2,791	358,736	1,249	...	83,011	263,731	
10 Area added, 1950-1959..... acres served 1960...	318,198	...	1,800	5,958	87,893	6,163	1,250	9,521	1,910	
11 Area served by two or more projects..... acres served 1960...	247,844	...	...	...	3,640	...	...	2,900	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION										
12 Drains owned by one landowner..... number of projects...	130	1	3	9	7	7	...	3	...	
13	acres served ² ...	369,079	1,145	3,020	7,749	25,581	5,163	...	3,040	...
14 Cooperative or mutual drains.....number of projects...	43	...	1	1	1	2	1	6	2	
15	acres served ² ...	74,170	...	600	1,000	510	2,249	1,250	8,058	1,910
16 Legally organized public drains..... number of projects...	70	...	1	...	9	...	...	5	7
17	acres served ² ...	5,495,725	...	8,920	...	424,178	...	84,334	263,731	
PROJECTS, 1960, BY YEAR STARTED										
18 1960-1959.....number of projects...	110	...	2	6	7	7	1	7	2	
19	acres served ² ...	194,260	...	1,800	3,955	24,491	5,163	1,250	37,535	1,910
20 Prior to 1950.....number of projects...	133	1	3	4	10	2	...	7	7	
21	acres served ² ...	5,744,714	1,145	10,740	4,794	425,778	2,249	...	57,897	263,731
DRAINAGE OPERATIONS, 1950-1959 ³										
22 Cost of drainage works and services.....projects reporting...	225	(⁴)	3	10	17	8	(⁴)	11	9	
23	dollars...	28,895,392	(⁴)	7,155	56,422	4,361,601	47,450	(⁴)	195,183	794,412
24 New drainage works constructed, enlarged, or installed.....projects reporting...	175	(⁴)	2	8	15	8	(⁴)	7	6	
25	dollars...	13,031,672	(⁴)	4,975	51,447	775,034	46,250	(⁴)	139,558	169,912
26 Open ditches.....projects reporting...	171	(⁴)	2	8	14	8	(⁴)	7	6	
27	length, miles...	3,244.7	(⁴)	11.2	140.3	381.7	68.5	(⁴)	35.2	53.0
28 Tile or covered drains.....projects reporting...	17	...	...	...	6	...	...	1	1
29	length, miles...	117.0	...	...	...	9.8	...	0.1	28.4
30 Levees or dikes.....projects reporting...	4	...	...	...	...	...	...	...	...
31	length, miles...	4.7	...	...	...	...	...	...	1
32 Pumps.....projects reporting...	5	...	...	...	1	...	...	...	1
33	number of pumps...	5	...	...	...	1	...	...	1
34 Other (see text).....projects reporting...	4	...	...	...	...	...	...	...	1
35 Cost of maintenance, operation, repair, and administration.....projects reporting...	141	...	2	6	9	1	...	5	7	
36	dollars...	15,863,720	...	2,180	4,975	3,586,567	1,200	...	55,625	624,500

¹Land served by two or more projects counted only once.²Acres served by two projects are included for each project. See text.³Includes projects taken over by another project prior to 1960. See text.⁴Included in State total only.

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959-Continued

[See text for comparability of 1960 and 1950 data.]

Item and Census year	Chambers	Colorado	Dallas	Delta	De Witt	Falls	Fannin	Fort Bend	Galveston
AREA									
1 Approximate land area..... acres 1960...	394,880	¹ 608,000	570,880	176,640	582,400	487,040	579,840	551,680	274,560
2 Land in farms..... acres 1959...	350,064	¹ 609,762	277,641	146,901	573,303	412,244	469,289	545,759	125,677
3 Drainage projects..... number 1960...	5	2	6	3	1	2	4	11	6
4 1950...	21	18	18	3	1	1	3	19	6
5 Total area in drainage projects ² acres served 1960...	320,200	608,000	9,116	9,946	1,200	1,500	19,235	551,680	77,226
6 1950...	392,000	603,469	226	10,541	600	20	16,735	24,515	73,865
7 Area not used for agriculture or not drained..... acres served 1960...	33,000	...	...	...	600	...	...	4,500	3,500
8 Net area drained and used for agriculture..... acres served 1960...	287,200	608,000	9,116	9,946	600	1,500	19,235	547,180	73,726
9 Drainage established before 1950..... acres served 1960...	287,200	608,000	6,925	9,946	600	...	16,735	547,180	71,992
10 Area added, 1950-1959..... acres served 1960...	...	...	2,191	...	...	1,500	2,500	...	1,734
11 Area served by two or more projects..... acres served 1960...	43,219	771	...	...	...	...	...	31,850	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION									
12 Drains owned by one landowner..... number of projects...	4	...	6	...	...	2	1	7	2
13 acres served ³ ...	44,419	...	9,116	...	...	1,500	2,500	29,945	5,192
14 Cooperative or mutual drains..... number of projects...	...	1	...	...	...	...	...	3	1
15 acres served ³...	...	771	...	...	...	...	...	1,905	1,734
16 Legally organized public drains..... number of projects...	1	1	...	3	1	...	3	1	3
17 acres served ³ ...	286,000	608,000	...	9,946	600	...	16,735	547,180	66,800
PROJECTS, 1960, BY YEAR STARTED									
18 1950-1959..... number of projects...	...	1	3	...	...	2	1	4	1
19 acres served ³...	...	771	2,191	...	...	1,500	2,500	2,635	1,734
20 Prior to 1950..... number of projects...	5	1	3	3	1	...	3	7	5
21 acres served ³ ...	330,419	¹ 608,000	6,925	9,946	600	...	16,735	576,395	71,992
DRAINAGE OPERATIONS, 1950-1959 ⁴									
22 Cost of drainage works and services..... projects reporting...	4	2	6	3	1	(5)	3	10	5
23 dollars...	2,856,456	219,049	38,320	4,747	10,000	(5)	46,099	3,883,558	589,011
24 New drainage works constructed, enlarged, or installed..... projects reporting...	4	2	6	...	...	(5)	(5)	9	4
25 dollars...	618,981	27,034	17,400	...	...	(5)	(5)	2,583,908	145,300
26 Open ditches..... projects reporting...	4	2	6	...	...	(5)	(5)	9	3
27 length, miles...	242.4	10.5	29.7	...	...	(5)	(5)	838.2	33.1
28 Tile or covered drains..... projects reporting...	...	...	...	...	...	...	...	4	1
29 length, miles...	...	...	...	...	...	...	...	0.4	1.0
30 Levees or dikes..... projects reporting...	...	...	...	...	...	...	...	...	...
31 length, miles...	...	...	...	...	...	...	...	...	...
32 Pumps..... projects reporting...	2	...	...	...	...	...	...	...	...
33 number of pumps...	2	...	...	...	...	...	...	...	...
34 Other (see text)..... projects reporting...	...	...	1	...	...	(5)	...	...	...
35 Cost of maintenance, operation, repair, and administration..... projects reporting...	3	2	5	3	1	...	2	7	4
36 dollars...	2,237,475	192,015	20,920	4,747	10,000	...	1,329	1,299,650	443,711

¹The excess of farm acreage over approximate land area is due to the fact that the entire acreage of a farm is tabulated as in the county in which the headquarters is located, even though a part of the farm may be situated in an adjoining county.

²Land served by two or more projects counted only once.

³Acres served by two projects are included for each project. See text.

⁴Includes projects taken over by another project prior to 1960. See text.

⁵Included in State total only.

DRAINAGE OF AGRICULTURAL LANDS

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959-Continued

[See text for comparability of 1960 and 1950 data]

Item and Census year	Grimes	Hardeman	Hardin	Harris	Henderson	Hidalgo	Houston	Jackson	Jefferson	
AREA										
1 Approximate land area.....acres 1960...	512,640	438,400	572,800	1,095,040	599,040	986,240	788,480	² 546,560	604,800	
2 Land in farms.....acres 1959...	424,485	375,791	175,904	667,255	373,735	810,422	484,516	² 561,188	422,292	
3 Drainage projects..... number 1960...	3	1	1	9	3	3	19	10	7	
4	1950...	...	...	46	...	69	2	15	30
5 Total area in drainage projects ² acres served 1960...	1,999	625	860	1,095,040	2,300	384,800	48,137	188,572	357,274	
6	1950...	...	...	1,012,261	...	496,045	2,800	174,264	320,270
7 Area not used for agriculture or not drained..... acres served 1960...	...	...	...	478,040	...	22,000	...	...	56,350
8 Net area drained and used for agriculture..... acres served 1960...	1,999	625	860	617,000	2,300	362,800	48,137	188,572	300,924	
9 Drainage established before 1950..... acres served 1960...	1,369	625	...	617,000	...	362,800	12,300	170,500	300,924	
10 Area added, 1950-1959..... acres served 1960...	630	...	860	...	2,300	...	35,837	18,072	...	
11 Area served by two or more projects..... acres served 1960...	...	...	...	16,992	...	70,200	...	5,400	960
PROJECTS, 1960, BY TYPE OF ORGANIZATION										
12 Drains owned by one landowner..... number of projects...	3	1	1	8	3	...	14	1	1	
13	acres served ³ ...	1,999	625	860	16,992	2,300	...	34,137	4,700	960
14 Cooperative or mutual drains..... number of projects...	...	...	...	...	...	...	3	3	1
15	acres served ³...	...	...	...	...	...	5,276	2,435	2,100
16 Legally organized public drains..... number of projects...	...	...	...	1	...	3	2	6	5
17	acres served ³...	...	...	617,000	...	433,000	8,724	186,837	298,824
PROJECTS, 1960, BY YEAR STARTED										
18 1950-1959..... number of projects...	1	...	1	6	3	...	16	4	...	
19	acres served ³ ...	630	...	860	9,872	2,300	...	34,837	7,135	...
20 Prior to 1950..... number of projects...	2	1	...	3	...	3	3	6	7	
21	acres served ³ ...	1,369	625	...	624,120	...	433,000	13,300	186,837	301,884
DRAINAGE OPERATIONS, 1950-1959 ⁴										
22 Cost of drainage works and services..... projects reporting...	3	(⁵)	(⁵)	9	3	3	19	10	5	
23	dollars...	6,764	(⁵)	(⁵)	6,567,228	29,000	1,335,826	287,329	674,270	2,322,109
24 New drainage works constructed, enlarged, or installed..... projects reporting...	(⁵)	...	(⁵)	8	3	2	17	7	3	
25	dollars...	(⁵)	...	(⁵)	5,724,528	29,000	323,000	236,921	50,746	721,358
26 Open ditches..... projects reporting...	(⁵)	...	(⁵)	8	3	1	17	7	3	
27	length, miles...	(⁵)	...	(⁵)	179.9	35.2	18.0	200.6	39.2	56.0
28 Tile or covered drains..... projects reporting...	...	...	...	1	...	1	...	...	1
29	length, miles...	...	...	1.0	...	75.0	...	...	0.4
30 Levees or dikes..... projects reporting...	...	...	...	...	...	...	...	...	...
31	length, miles...	...	...	...	...	...	...	...	...
32 Pumps..... projects reporting...	...	...	...	...	...	...	...	...	...
33	number of pumps...	...	...	...	...	...	...	...	...
34 Other (see text)..... projects reporting...	...	...	...	...	...	...	...	...	...
35 Cost of maintenance, operation, repair, and administration..... projects reporting...	3	(⁵)	...	6	...	3	8	6	5	
36	dollars...	2,764	(⁵)	...	842,700	...	1,012,826	50,408	623,524	1,600,751

¹The excess of farm acreage over approximate land area is due to the fact that the entire acreage of a farm is tabulated as in the county in which the headquarters is located, even though a part of the farm may be situated in an adjoining county.

²Land served by two or more projects counted only once.

³Acres served by two projects are included for each project. See text.

⁴Includes projects taken over by another project prior to 1960. See text.

⁵Included in State total only.

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959-Continued

[See text for comparability of 1960 and 1950 data]

Item and Census year	Kaufman	Lamar	Liberty	Madison	Mata-gorda	Nueces	Orange	Polk	Refugio
AREA									
1 Approximate land area.....acres 1960...	520,960	579,840	750,720	305,920	729,600	¹ 536,320	227,840	700,160	¹ 493,440
2 Land in farms.....acres 1959...	466,555	496,627	532,575	303,213	727,574	¹ 628,263	95,981	284,155	1498,301
3 Drainage projects..... number 1960...	3	8	12	6	19	10	1	2	2
4 1960...	...	4	32	...	26	3	6	...	1
5 Total area in drainage projects ² acres served 1960...	2,837	15,531	180,594	10,600	340,524	104,340	208,000	1,969	123,260
6 1960...	...	11,652	194,024	...	227,633	70,090	208,000	...	123,260
7 Area not used for agriculture or not drained..... acres served 1960...	...	...	...	...	1,500	...	158,000	...	...
8 Net area drained and used for agriculture..... acres served 1960...	2,837	15,531	180,594	10,600	339,024	104,340	50,000	1,969	123,260
9 Drainage established before 1960..... acres served 1960...	1,037	11,849	149,989	...	261,979	100,840	50,000	1,356	123,260
10 Area added, 1960-1959..... acres served 1960...	1,800	3,682	30,605	10,600	77,045	3,500	...	613	...
11 Area served by two or more projects..... acres served 1960...	...	...	37,992	...	8,220	5,300	...	...	3,600
PROJECTS, 1960, BY TYPE OF ORGANIZATION									
12 Drains owned by one landowner..... number of projects...	3	1	8	4	12	3	...	2	1
13 acres served ³ ...	2,837	2,319	49,134	4,600	27,044	2,000	...	1,969	3,600
14 Cooperative or mutual drains..... number of projects...	...	4	...	2	3	5	...	...	...
15 acres served ³...	...	3,368	...	6,000	7,600	6,800	...	...	...
16 Legally organized public drains..... number of projects...	...	3	4	...	4	2	1	...	1
17 acres served ³...	...	9,844	169,452	...	312,600	100,840	50,000	...	123,260
PROJECTS, 1960, BY YEAR STARTED									
18 1960-1959..... number of projects...	2	3	1	6	8	4	...	1	1
19 acres served ³ ...	1,800	3,682	530	10,600	12,645	5,300	...	613	3,600
20 Prior to 1960..... number of projects...	1	5	11	...	11	6	1	1	1
21 acres served ³ ...	1,037	11,849	218,056	...	334,599	104,340	50,000	1,356	123,260
DRAINAGE OPERATIONS, 1950-1959 ⁴									
22 Cost of drainage works and services..... projects reporting...	3	6	12	6	18	9	1	(⁵)	(⁵)
23 dollars...	14,848	22,655	531,903	72,500	803,795	150,460	1,200,000	(⁵)	(⁵)
24 New drainage works constructed, enlarged, or installed..... projects reporting...	5	3	9	6	14	5	1	(⁵)	(⁵)
25 dollars...	8,600	17,593	129,120	69,102	128,055	61,700	360,000	(⁵)	(⁵)
26 Open ditches..... projects reporting...	3	3	9	6	14	4	1	(⁵)	(⁵)
27 length, miles...	16.5	37.8	203.4	54.6	78.8	17.7	134.0	(⁵)	(⁵)
28 Tile or covered drains..... projects reporting...	...	...	...	...	...	...	1	...	...
29 length, miles...	..	...	...	...	...	...	0.9	...	...
30 Levees or dikes..... projects reporting...	...	...	...	...	...	1	1	(⁵)	...
31 length, miles...	...	...	...	...	...	3.5	1.0	(⁵)	...
32 Pumps..... projects reporting...	1	...	...	...	...	...	...	...	...
33 number of pumps...	1	...	...	...	...	...	...	...	...
34 Other (see text)..... projects reporting...	...	...	...	...	...	...	...	...	...
35 Cost of maintenance, operation, repair, and administration..... projects reporting...	3	4	9	2	11	7	1	(⁵)	(⁵)
36 dollars...	6,248	5,062	402,783	3,398	675,740	88,760	840,000	(⁵)	(⁵)

¹The excess of farm acreage over approximate land area is due to the fact that the entire acreage of a farm is tabulated as in the county in which the headquarters is located, even though a part of the farm may be situated in an adjoining county.

²Land served by two or more projects counted only once.

³Acres served by two projects are included for each project. See text.

⁴Includes projects taken over by another project prior to 1960. See text.

⁵Included in State total only.

DRAINAGE OF AGRICULTURAL LANDS

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959 -Continued

[See text for comparability of 1960 and 1950 data]

Item and Census year	Robertson	Rockwall	San Patriacio	Victoria	Waller	Ward	Washington	Wharton	Willacy	All other counties ¹
AREA										
1 Approximate land area.....acres 1960...	558,720	94,080	² 435,200	571,520	324,480	529,280	391,040	² 690,560	380,800	25,620,480
2 Land in farms.....acres 1959...	392,427	86,703	² 549,114	551,046	287,496	469,531	339,225	² 710,574	373,751	22,578,930
3 Drainage projects..... number 1960...	9	1	3	8	4	1	1	4	1	...
4 1950...	1	...	3	5	6	2	...	31	7	111
5 Total area in drainage projects ³ acres served 1960...	9,351	766	58,407	165,813	2,920	32,478	900	690,560	2,500	...
6 1950...	1,062	...	58,407	136,123	3,535	37,645	...	690,560	21,583	123,681
7 Area not used for agriculture or not drained..... acres served 1960...	...	...	1,360	...	...	12,478	...	2,500	...	...
8 Not area drained and used for agriculture..... acres served 1960...	9,351	766	57,047	165,813	2,920	20,000	900	688,060	2,500	...
9 Drainage established before 1950..... acres served 1960...	3,737	766	57,047	165,813	1,700	20,000	...	688,060	...	...
10 Area added, 1950-1959..... acres served 1960...	5,614	...	...	...	1,220	...	900	...	2,500	...
11 Area served by two or more projects..... acres served 1960...	...	...	...	2,500	...	...	...	14,300	...	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION										
12 Drains owned by one landowner..... number of projects...	7	1	...	4	3	...	1	2	1	...
13 acres served ⁴ ...	7,347	766	...	47,500	2,320	...	900	13,300	2,500	...
14 Cooperative or mutual drains..... number of projects...	2	...	...	1	1	...	...	1	...	...
15 acres served ⁴ ...	2,004	...	...	17,000	600	...	...	1,000	...	...
16 Legally organized public drains..... number of projects...	...	...	3	3	...	1	...	1	...	...
17 acres served ⁴...	...	...	57,047	103,813	...	20,000	...	688,060	...	...
PROJECTS, 1960, BY YEAR STARTED										
18 1950-1959..... number of projects...	6	...	...	2	2	...	1	...	1	...
19 acres served ⁴ ...	5,301	...	...	2,500	1,220	...	900	...	2,500	...
20 Prior to 1950..... number of projects...	3	1	3	6	2	1	...	4	...	...
21 acres served ⁴ ...	4,050	766	57,047	165,813	1,700	20,000	...	702,360	...	...
DRAINAGE OPERATIONS, 1950-1959 ⁵										
22 Cost of drainage works and services..... projects reporting...	9	(⁶)	3	6	3	1	(⁶)	4	(⁶)	...
23 dollars...	78,943	(⁶)	129,139	725,890	12,201	54	(⁶)	442,902	(⁶)	...
24 New drainage works constructed, enlarged, or installed..... projects reporting...	8	(⁶)	...	5	3	...	(⁶)	1	(⁶)	...
25 dollars...	49,643	(⁶)	...	74,450	11,701	...	(⁶)	60,000	(⁶)	...
26 Open ditches..... projects reporting...	8	(⁶)	...	5	3	...	(⁶)	1	(⁶)	...
27 length, miles...	52.9	(⁶)	...	97.8	10.5	...	(⁶)	30.0	(⁶)	...
28 Tile or covered drains..... projects reporting...	...	...	...	...	...	...	...	...	...	...
29 length, miles...	...	...	...	...	...	...	...	...	...	...
30 Levees or dikes..... projects reporting...	...	...	...	...	1	...	...	...	...	...
31 length, miles...	...	...	...	...	0.1	...	...	...	...	...
32 Pumps..... projects reporting...	...	...	...	...	...	...	...	...	...	...
33 number of pumps...	...	...	...	...	...	...	...	...	...	...
34 Other (see text)..... projects reporting...	1	...	...	...	...	...	...	...	...	...
35 Cost of maintenance, operation, repair, and administration..... projects reporting...	7	(⁶)	3	5	1	1	(⁶)	4	...	...
36 dollars...	29,300	(⁶)	129,139	651,440	500	54	(⁶)	382,902	...	...

¹Includes Atascosa, Bexar, Brown, Castro, Crosby, Dawson, Deaf Smith, Dimmit, El Paso, Gonzales, Hale, Hookley, Hudspeth, Lamb, Lampasas, Lubbock, Lynn, McLennan, Mason, Maverick, Menard, Pecos, Randall, Reeves, Starr, Swisher, Tarrant, Taylor, Wichita, Williamson, and Zapata counties.

²The excess of farm acreage over approximate land area is due to the fact that the entire acreage of a farm is tabulated as in the county in which the headquarters is located, even though a part of the farm may be situated in an adjoining county.

³Land served by two or more projects counted only once.

⁴Acres served by two projects are included for each project. See text.

⁵Includes projects taken over by another project prior to 1960. See text.

⁶Included in State total only.

State Table 1.—DRAINAGE PROJECTS—NUMBER, AREA, COST, AND WORKS, 1920 TO 1960

[See text for comparability of data]

Item	1960 Census	1950 Census	1940 Census	1930 Census	1920 Census
AREA					
Approximate land area..... acres...	52,696,960	52,701,440	52,701,440	52,597,760	52,597,760
Land in farms..... acres...	12,688,518	10,865,165	7,302,007	5,613,101	5,050,410
Drainage projects..... number...	9	471	36	NA	NA
Total area in drainage projects..... acres served...	68,910	302,158	202,058	156,052	113,823
Area not used for agriculture or not drained..... acres served...	2,000	NA	NA	NA	NA
Net area drained and used for agriculture..... acres served...	66,910	NA	¹ 140,148	¹ 109,518	NA
Drainage established 10 years or more before Census date..... acres served...	66,390	NA	NA	NA	NA
Drainage established within 10 years of Census date..... acres served...	520	NA	NA	NA	NA
Area served by two or more projects..... acres served...	...	5,292	2,092	...	...
PROJECTS BY TYPE OF ORGANIZATION					
Drains owned by one landowner..... number of projects...	...	² 4	NA	NA	NA
acres served...	...	² 4,120	² 12,020	11,200	8,304
Cooperative or mutual drains..... number of projects...	1	² 7	...	...	...
acres served...	1,300	² 16,070	...	...	...
Legally organized public drains..... number of projects...	8	² 25	NA	NA	NA
acres served...	² 65,610	² 130,003	² 148,677	144,852	105,519
PROJECTS BY YEAR STARTED					
Started 10 years or more before Census date..... number of projects...	8	² 28	NA	NA	NA
acres served...	65,870	² 142,309	199,755	130,488	750
Started within 10 years of Census date..... number of projects...	1	² 8	NA	NA	NA
acres served...	1,040	² 7,884	² 303	25,564	113,073
OPERATIONS, 10-YEAR PERIOD PRECEDING CENSUS DATE					
Cost of drainage works and services..... projects reporting...	5	² 30	NA	NA	NA
dollars...	558,392	836,973	NA	NA	NA
New drainage works constructed, enlarged, or installed..... projects reporting...	3	³ 13	NA	NA	NA
cost, dollars...	350,197	³ 29,181	NA	NA	NA
Open ditches..... projects reporting...	2	12	NA	NA	NA
length, miles...	60.9	29	NA	NA	NA
Tile or covered drains..... projects reporting...	2	3	NA	NA	NA
length, miles...	3.6	5	NA	NA	NA
Levees or dikes..... projects reporting...	...	...	NA	NA	NA
length, miles...	...	...	NA	NA	NA
Pumps..... projects reporting...	...	NA	NA	NA	NA
number of pumps...	...	NA	NA	NA	NA
Other (see text)..... projects reporting...	...	NA	NA	NA	NA
Cost of maintenance, operation, repair, and administration..... projects reporting...	5	NA	NA	NA	NA
dollars...	208,195	807,792	NA	NA	NA
STATUS ON CENSUS DATE					
Capital investment..... dollars...	NA	NA	⁴ 869,273	4,772,000	1,005,473
Physical works:					
Open ditches..... length, miles...	NA	NA	267.8	304.3	120.3
Tile drains..... length, miles...	NA	NA	1,618.6	1,944.5	599.1
Levees and dikes..... length, miles...	NA	NA	5.0	2.0	2.0
Pumping units..... number of units...	NA	(²)	...	...	NA

NA Not available.

¹Not fully comparable. See text.

²In 1950, figures exclude 435 projects and 151,965 acres in "irrigation enterprises"; in 1940, figures exclude 41,361 acres in "irrigation enterprises."

³Cost of new works for lands not previously drained.

DRAINAGE OF AGRICULTURAL LANDS

State Table 2.—DRAINAGE

	Size of project (Based on area of agricultural land in project)	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	9	66,910	...	9	66,390	1	520
2	500 to 999 acres.....	...	...	...	...	...	...	...
3	1,000 to 1,999 acres.....	6	8,110	...	6	7,590	1	520
4	2,000 to 4,999 acres.....	1	2,800	...	1	2,800	...	...
5	5,000 to 9,999 acres.....	...	...	...	...	...	...	...
6	10,000 to 19,999 acres.....	1	12,000	...	1	12,000	...	...
7	20,000 to 49,999 acres.....	1	44,000	...	1	44,000	...	...
8	50,000 to 99,999 acres.....	...	...	...	...	...	...	...
9	100,000 or more acres.....	...	...	...	...	...	...	...

State Table 3.—DRAINAGE PROJECTS, 1960,

	Type of organization	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	9	66,910	...	9	66,390	1	520
2	Drains owned by one landowner.....	...	...	...	...	...	...	...
3	Cooperative or mutual drains.....	1	1,300	...	1	1,300	...	...
4	Legally organized public drains.....	8	65,610	...	8	65,090	1	520

State Table 4.—DRAINAGE PROJECTS, 1960,

	Year of organization	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	9	66,910	...	9	66,390	1	520
2	1950-1959.....	1	1,040	...	1	520	1	520
3	Prior to 1950.....	8	65,870	...	8	65,870	...	...

PROJECTS, 1960, BY SIZE

Cost of drainage works and services, 1950-1959				New works constructed, enlarged, or installed, 1950-1959									
Total		For new works		Open ditches		Tile or covered drains		Levees and dikes		Pumps		Other, projects reporting	
Projects reporting	Dollars	Projects reporting	Dollars	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Number		
5	558,392	3	350,197	2	60.9	2	3.6	...	...	...	...	...	1
...	...	...	...	...	...	...	...	...	...	...	...	...	2
2	272,460	2	269,197	1	6.4	2	3.6	...	...	...	...	...	3
1	2,176	...	...	...	...	...	...	...	...	...	...	...	4
...	...	...	...	...	...	...	...	...	...	...	...	...	5
1	130,463	...	...	...	...	...	...	...	...	...	...	...	6
1	153,293	1	81,000	1	54.5	...	...	...	...	...	...	...	7
...	...	...	...	...	...	...	...	...	...	...	...	...	8
...	...	...	...	...	...	...	...	...	...	...	...	...	9

BY TYPE OF ORGANIZATION

Cost of drainage works and services, 1950-1959				New works constructed, enlarged, or installed, 1950-1959									
Total		For new works		Open ditches		Tile or covered drains		Levees and dikes		Pumps		Other, projects reporting	
Projects reporting	Dollars	Projects reporting	Dollars	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Number		
5	558,392	3	350,197	2	60.9	2	3.6	...	...	...	...	...	1
...	...	...	...	...	...	...	...	...	...	...	...	...	2
...	...	...	...	...	...	...	...	...	...	...	...	...	3
5	558,392	3	350,197	2	60.9	2	3.6	...	...	...	...	...	4

BY YEAR OF ORGANIZATION

Cost of drainage works and services, 1950-1959				New works constructed, enlarged, or installed, 1950-1959									
Total		For new works		Open ditches		Tile or covered drains		Levees and dikes		Pumps		Other, projects reporting	
Projects reporting	Dollars	Projects reporting	Dollars	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Number		
5	558,392	3	350,197	2	60.9	2	3.6	...	...	...	...	...	1
1	270,000	1	268,000	1	6.4	1	3.4	...	...	...	...	...	2
4	288,392	2	82,197	1	54.5	1	0.2	...	...	...	...	...	3

DRAINAGE OF AGRICULTURAL LANDS

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1960 data]

Item and Census year	The State	Box Elder	Cache	Davis	Millard	Piute	Sevier	All other counties ¹
AREA								
1 Approximate land area.....acres 1960...	52,696,960	3,580,160	752,000	² 171,520	4,254,720	481,920	1,236,480	31,799,040
2 Land in farms.....acres 1959...	12,688,518	1,698,855	428,790	² 277,991	593,390	79,093	240,199	7,451,542
3 Drainage projects..... number 1960...	9	3	1	2	1	1	1	...
4..... 1950...	471	45	45	62	10	4	33	275
5 Total area in drainage projects ³ acres served 1960...	68,910	16,100	1,000	2,570	46,000	1,800	1,440	...
6..... 1950...	302,158	46,250	26,064	16,683	116,344	2,280	21,504	73,033
7 Area not used for agriculture or not drained..... acres served 1960...	2,000	...	...	...	2,000	...	...	...
8 Net area drained and used for agriculture..... acres served 1960...	66,910	16,100	1,000	2,570	44,000	1,800	1,440	...
9 Drainage established before 1950..... acres served 1960...	66,390	16,100	1,000	2,050	44,000	1,800	1,440	...
10 Area added, 1950-1959..... acres served 1960...	520	...	...	520	...	...	...	...
11 Area served by two or more projects..... acres served 1960...	...	...	...	...	...	...	...	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION								
12 Drains owned by one landowner..... number of projects...	...	...	...	...	...	...	...	...
13..... acres served ⁴...	...	...	...	...	...	...	...	...
14 Cooperative or mutual drains..... number of projects...	1	1	...	...	...	...	...	...
15..... acres served ⁴ ...	1,300	1,300	...	...	...	...	...	...
16 Legally organized public drains..... number of projects...	8	2	1	2	1	1	1	...
17..... acres served ⁴ ...	65,610	14,800	1,000	2,570	44,000	1,800	1,440	...
PROJECTS, 1960, BY YEAR STARTED								
18 1950-1959..... number of projects...	1	...	...	1	...	...	...	...
19..... acres served ⁴ ...	1,040	...	...	1,040	...	...	...	...
20 Prior to 1950..... number of projects...	8	3	1	1	1	1	1	...
21..... acres served ⁴ ...	65,870	16,100	1,000	1,530	44,000	1,800	1,440	...
DRAINAGE OPERATIONS, 1950-1959 ⁵								
22 Cost of drainage works and services..... projects reporting...	5	2	1	1	1	...	...	...
23..... dollars...	558,392	132,639	2,460	270,000	153,293	...	...	...
24 New drainage works constructed, enlarged, or installed..... projects reporting...	3	...	1	1	1	...	...	...
25..... dollars...	350,197	...	1,197	268,000	81,000	...	...	...
26 Open ditches..... projects reporting...	2	...	...	1	1	...	...	...
27..... length, miles...	60.9	...	...	6.4	54.5	...	...	...
28 Tile or covered drains..... projects reporting...	2	...	1	1	...	...	...	...
29..... length, miles...	3.6	...	0.2	3.4	...	...	...	...
30 Levees or dikes..... projects reporting...	...	...	...	...	...	...	...	...
31..... length, miles...	...	...	...	...	...	...	...	...
32 Pumps..... projects reporting...	...	...	...	...	...	...	...	...
33..... number of pumps...	...	...	...	...	...	...	...	...
34 Other (see text)..... projects reporting...	...	...	...	...	...	...	...	...
35 Cost of maintenance, operation, repair, and administration..... projects reporting...	5	2	1	1	1	...	...	...
36..... dollars...	208,195	132,639	1,263	2,000	72,293	...	...	...

¹Includes Carbon, Duchesne, Emery, Garfield, Grand, Juab, Kane, Rich, Salt Lake, Sanpete, Summit, Tooele, Uintah, Utah, Washington, Wayne, and Weber counties.²The excess of farm acreage over approximate land area is due to the fact that the entire acreage of a farm is tabulated as in the county in which the headquarters is located, even though a part of the farm may be situated in an adjoining county.³Land served by two or more projects counted only once.⁴Acres served by two projects are included for each project. See text.⁵Includes projects taken over by another project prior to 1960. See text.

State Table 1.—DRAINAGE PROJECTS—NUMBER, AREA, COST, AND WORKS, 1920 TO 1960

[See text for comparability of data.]

Item	1960 Census	1950 Census	1940 Census	1930 Census	1920 Census
AREA					
Approximate land area.....acres...	25,496,320	25,531,520	25,535,360	25,767,680	25,767,680
Land in farms.....acres...	13,125,802	15,572,295	16,444,907	16,728,620	18,561,112
Drainage projects.....number...	66	30	2	NA	...
Total area in drainage projects.....acres served...	98,478	45,460	15,714	15,042	...
Area not used for agriculture or not drained.....acres served...	5,700	NA	NA	NA	...
Net area drained and used for agriculture.....acres served...	92,778	NA	¹ 15,714	¹ 5,704	...
Drainage established 10 years or more before Census date.....acres served...	40,807	NA	NA	NA	...
Drainage established within 10 years of Census date.....acres served...	51,971	NA	NA	NA	...
Area served by two or more projects.....acres served...	9,198	...	...	...	...
PROJECTS BY TYPE OF ORGANIZATION					
Drains owned by one landowner.....number of projects...	5	...	...	NA	...
acres served...	7,286	...	...	3,304	...
Cooperative or mutual drains.....number of projects...	59	28	...	...	...
acres served...	82,289	29,739	...	...	...
Legally organized public drains.....number of projects...	2	2	2	NA	...
acres served...	12,401	15,721	15,714	11,738	...
PROJECTS BY YEAR STARTED					
Started 10 years or more before Census date.....number of projects...	28	3	2	NA	...
acres served...	38,259	19,521	15,714	3,304	...
Started within 10 years of Census date.....number of projects...	38	27	...	NA	...
acres served...	63,717	25,939	...	11,738	...
OPERATIONS, 10-YEAR PERIOD PRECEDING CENSUS DATE					
Cost of drainage works and services.....projects reporting...	54	28	NA	NA	...
dollars...	401,765	111,394	NA	NA	...
New drainage works constructed, enlarged, or installed.....projects reporting...	22	² 27	NA	NA	...
cost, dollars...	215,992	² 95,794	NA	NA	...
Open ditches.....projects reporting...	22	27	NA	NA	...
length, miles...	45.2	59	NA	NA	...
Tile or covered drains.....projects reporting...	...	...	NA	NA	...
length, miles...	...	...	NA	NA	...
Levees or dikes.....projects reporting...	...	...	NA	NA	...
length, miles...	...	...	NA	NA	...
Pumps.....projects reporting...	...	NA	NA	NA	...
number of pumps...	...	NA	NA	NA	...
Other (see text).....projects reporting...	2	NA	NA	NA	...
Cost of maintenance, operation, repair, and administration.....projects reporting...	46	NA	NA	NA	...
dollars...	185,773	15,600	NA	NA	...
STATUS ON CENSUS DATE					
Capital investment.....dollars...	NA	NA	201,300	241,608	...
Physical works:					
Open ditches.....length, miles...	NA	NA	46.7	40.0	...
Tile drains.....length, miles...	NA	NA	...	...	...
Levees and dikes.....length, miles...	NA	NA	...	...	...
Pumping units.....number of units...	NA	...	...	...	...

NA Not available.

¹Not fully comparable. See text.

²Cost of new works for lands not previously drained.

DRAINAGE OF AGRICULTURAL LANDS

State Table 2.—DRAINAGE

	Size of project (Based on area of agricultural land in project)	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	66	101,976	18,396	36	45,479	37	56,497
2	500 to 999 acres.....	43	29,435	7,248	22	15,496	22	13,939
3	1,000 to 1,999 acres.....	11	14,792	3,493	8	9,217	5	5,575
4	2,000 to 4,999 acres.....	7	21,948	565	3	5,953	6	15,995
5	5,000 to 9,999 acres.....	4	25,553	7,090	2	4,565	4	20,988
6	10,000 to 19,999 acres.....	1	10,248	...	1	10,248	...	...
7	20,000 to 49,999 acres.....	...	...	...	...	...	...	...
8	50,000 to 99,999 acres.....	...	...	...	...	...	...	...
9	100,000 or more acres.....	...	...	...	...	...	...	...

State Table 3.—DRAINAGE PROJECTS, 1960,

	Type of organization	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	66	101,976	18,396	36	45,479	37	56,497
2	Drains owned by one landowner.....	5	7,286	...	5	6,536	1	750
3	Cooperative or mutual drains.....	59	82,289	18,396	29	26,542	36	55,747
4	Legally organized public drains.....	2	12,401	...	2	12,401	...	...

State Table 4.—DRAINAGE PROJECTS, 1960,

	Year of organization	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	66	101,976	18,396	36	45,479	37	56,497
2	1950-1959.....	38	63,717	13,924	8	8,553	35	55,164
3	Prior to 1950.....	28	38,259	4,472	28	36,926	2	1,333

DRAINAGE OF AGRICULTURAL LANDS

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	The State	Accomack	Halifax	Norfolk	Northampton	Princess Anne	Southampton
AREA							
1 Approximate land area.....acres 1960...	25,496,320	300,800	513,280	263,680	144,640	163,200	388,480
2 Land in farms.....acres 1959...	13,125,802	112,191	402,534	75,775	67,066	60,383	260,793
3 Drainage projects..... number 1960...	66	1	1	15	2	48	2
4	30	...	...	9	...	21	...
5 Total area in drainage projects ¹ acres served 1960...	98,478	700	500	39,354	1,950	52,314	3,660
6	45,460	...	...	24,477	...	20,983	...
7 Area not used for agriculture or not drained..... acres served 1960...	5,700	...	...	...	...	5,700	...
8 Not area drained and used for agriculture..... acres served 1960...	92,778	700	500	39,354	1,950	46,634	3,660
9 Drainage established before 1950..... acres served 1960...	40,807	...	...	20,787	...	20,020	...
10 Area added, 1950-1959..... acres served 1960...	51,971	700	500	18,567	1,950	26,594	3,660
11 Area served by two or more projects..... acres served 1960...	9,198	...	...	...	...	9,198	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION							
12 Drains owned by one landowner..... number of projects...	5	...	...	5	...	...	...
13	7,286	...	...	7,286	...	...	...
14 Cooperative or mutual drains..... number of projects...	59	1	1	8	2	47	2
15	82,289	700	500	20,037	1,950	55,442	3,660
16 Legally organized public drains..... number of projects...	2	...	...	2	...	1	...
17	12,401	...	...	12,031	...	370	...
PROJECTS, 1960, BY YEAR STARTED							
18 1960-1959..... number of projects...	38	1	1	5	2	28	2
19	63,717	700	500	17,234	1,950	39,673	3,660
20 Prior to 1960..... number of projects...	28	...	...	10	...	20	...
21	38,259	...	...	22,120	...	16,139	...
DRAINAGE OPERATIONS, 1950-1959 ³							
22 Cost of drainage works and services..... projects reporting...	54	1	1	12	2	37	2
23	401,765	3,742	2,100	63,854	50,362	255,719	25,988
24 New drainage works constructed, enlarged, of installed..... projects reporting...	22	1	1	5	2	12	2
25	215,992	3,742	1,000	40,655	50,362	96,245	23,988
26 Open ditches..... projects reporting...	22	1	1	5	2	12	2
27	45.2	1.6	0.6	22.6	6.3	8.6	5.5
28 Tile or covered drains..... projects reporting...	...	...	...	...	...	...	...
29 .....	...	...	...	...	...	...	...
30 Levees or dikes..... projects reporting...	...	...	...	...	...	...	...
31 .....	...	...	...	...	...	...	...
32 Pumps..... projects reporting...	...	...	...	...	...	...	...
33 .....	...	...	...	...	...	...	...
34 Other (see text)..... projects reporting...	2	...	...	...	2	...	...
35 Cost of maintenance, operation, repair, and administration..... projects reporting...	46	...	1	8	...	37	1
36	185,773	...	1,100	23,199	...	159,474	2,000

¹Land served by two or more projects counted only once.²Acres served by two projects are included for each project. See text.³Includes projects taken over by another project prior to 1960. See text.

State Table 1.—DRAINAGE PROJECTS—NUMBER, AREA, COST, AND WORKS, 1920 TO 1960

[See text for comparability of data.]

Item	1960 Census	1950 Census	1940 Census	1930 Census	1920 Census
AREA					
Approximate land area..... acres...	42,693,760	42,743,040	42,865,280	42,775,040	42,775,040
Land in farms..... acres...	18,716,972	17,369,245	15,181,815	13,533,778	13,244,720
Drainage projects..... number...	122	533	165	NA	NA
Total area in drainage projects..... acres served...	254,482	431,613	405,709	367,242	94,924
Area not used for agriculture or not drained..... acres served...	13,300	NA	NA	NA	NA
Net area drained and used for agriculture..... acres served...	241,182	NA	¹ 380,964	¹ 351,898	NA
Drainage established 10 years or more before Census date..... acres served...	227,696	NA	NA	NA	NA
Drainage established within 10 years of Census date..... acres served...	13,486	NA	NA	NA	NA
Area served by two or more projects..... acres served...	1,300	30,907	27,631	27,609	10,553
PROJECTS BY TYPE OF ORGANIZATION					
Drains owned by one landowner..... number of projects...	2	² 1	NA	NA	NA
acres served...	1,375	² 1,280	² 1,280	² 1,200	1,100
Cooperative or mutual drains..... number of projects...	20	² 9	...	...	...
acres served...	20,374	² 8,205	...	...	...
Legally organized public drains..... number of projects...	100	² 130	NA	NA	NA
acres served...	220,733	² 263,423	² 264,039	² 275,642	93,824
PROJECTS BY YEAR STARTED					
Started 10 years or more before Census date..... number of projects...	108	² 124	NA	NA	NA
acres served...	223,895	² 248,497	390,883	288,599	² 43,166
Started within 10 years of Census date..... number of projects...	14	² 16	NA	NA	NA
acres served...	18,587	² 24,411	14,826	78,643	² 45,258
OPERATIONS, 10-YEAR PERIOD PRECEDING CENSUS DATE					
Cost of drainage works and services..... projects reporting...	114	² 131	NA	NA	NA
dollars...	4,404,324	1,541,318	NA	NA	NA
New drainage works constructed, enlarged, or installed..... projects reporting...	49	³ 24	NA	NA	NA
cost, dollars...	1,304,272	³ 203,873	NA	NA	NA
Open ditches..... projects reporting...	38	23	NA	NA	NA
length, miles...	97.8	55	NA	NA	NA
Tile or covered drains..... projects reporting...	6	4	NA	NA	NA
length, miles...	8.5	4	NA	NA	NA
Levees or dikes..... projects reporting...	11	4	NA	NA	NA
length, miles...	30.7	4	NA	NA	NA
Pumps..... projects reporting...	13	NA	NA	NA	NA
number of pumps...	17	NA	NA	NA	NA
Other (see text)..... projects reporting...	18	NA	NA	NA	NA
Cost of maintenance, operation, repair, and administration..... projects reporting...	108	NA	NA	NA	NA
dollars...	3,100,052	1,337,445	NA	NA	NA
STATUS ON CENSUS DATE					
Capital investment..... dollars...	NA	NA	5,332,842	4,637,576	1,397,419
Physical works:					
Open ditches..... length, miles...	NA	NA	885.0	746.7	162.4
Tile drains..... length, miles...	NA	NA	179.0	199.2	83.0
Levees and dikes..... length, miles...	NA	NA	72.4	78.8	...
Pumping units..... number of units...	NA	² 43	24	18	...

NA Not available.

¹Not fully comparable. See text.²1950 figures exclude 393 projects and 158,705 acres in "irrigation enterprises"; 1940 figures exclude 140,390 acres in "irrigation enterprises"; 1930 figures exclude 90,000 acres in "irrigation enterprises" and 400 acres classed as "other"; 1920 figures exclude 6,500 acres for which date of organization was not reported.³Cost of new works for lands not previously drained.

DRAINAGE OF AGRICULTURAL LANDS

State Table 2.—DRAINAGE

	Size of project (Based on area of agricultural land in project)	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	122	242,482	2,600	112	228,996	17	13,486
2	500 to 999 acres.....	50	34,970	...	43	29,595	10	5,375
3	1,000 to 1,999 acres.....	35	50,138	1,300	33	47,208	4	2,930
4	2,000 to 4,999 acres.....	25	73,502	...	24	69,042	2	4,460
5	5,000 to 9,999 acres.....	11	72,372	1,300	11	71,651	1	721
6	10,000 to 19,999 acres.....	1	11,500	...	1	11,500	...	...
7	20,000 to 49,999 acres.....	...	...	...	...	...	...	...
8	50,000 to 99,999 acres.....	...	...	...	...	...	...	...
9	100,000 or more acres.....	...	...	...	...	...	...	...

¹Includes projects taken over by another project prior to 1960. See text.

State Table 3.—DRAINAGE PROJECTS, 1960,

	Type of organization	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	122	242,482	2,600	112	228,996	17	13,486
2	Drains owned by one landowner.....	2	1,375	...	1	675	1	700
3	Cooperative or mutual drains.....	20	20,374	...	15	15,674	7	4,700
4	Legally organized public drains.....	100	220,733	2,600	96	212,647	9	8,086

¹Includes projects taken over by another project prior to 1960. See text.

State Table 4.—DRAINAGE PROJECTS, 1960,

	Year of organization	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	122	242,482	2,600	112	228,996	17	13,486
2	1950-1959.....	14	18,587	1,300	4	7,119	12	11,468
3	Prior to 1950.....	108	223,895	1,300	108	221,877	5	2,018

PROJECTS, 1960, BY SIZE

Cost of drainage works and services, 1950-1959				New works constructed, enlarged, or installed, 1950-1959									
Total		For new works		Open ditches		Tile or covered drains		Levees and dikes		Pumps		Other, projects reporting	
Projects reporting	Dollars	Projects reporting	Dollars	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Number		
114	4,404,324	49	1,304,272	38	97.8	6	8.5	11	30.7	13	17	18	1
44	619,899	17	269,851	14	19.2	3	2.4	6	10.9	4	6	5	2
31	897,815	14	402,215	9	22.8	1	4.9	3	1.3	3	3	7	3
25	1,235,651	12	524,853	10	30.6	1	0.2	2	18.5	5	7	6	4
13	1,538,187	5	80,353	4	24.7	...	...	...	...	1	1	...	5
1	112,772	1	27,000	1	0.5	1	1.0	...	...	...	...	...	6
...	...	...	...	...	...	...	...	...	...	...	...	...	7
...	...	...	...	...	...	...	...	...	...	...	...	...	8
...	...	...	...	...	...	...	...	...	...	...	...	...	9

BY TYPE OF ORGANIZATION

Cost of drainage works and services, 1950-1959				New works constructed, enlarged, or installed, 1950-1959									
Total		For new works		Open ditches		Tile or covered drains		Levees and dikes		Pumps		Other, projects reporting	
Projects reporting	Dollars	Projects reporting	Dollars	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Number		
114	4,404,324	49	1,304,272	38	97.8	6	8.5	11	30.7	13	17	18	1
13	205,000	3	125,000	3	5.2	...	...	3	13.1	2	3	1	2
18	191,085	12	93,911	11	16.9	1	0.1	3	3.5	1	1	6	3
93	4,008,239	34	1,085,361	24	75.7	5	8.4	5	14.1	10	13	11	4

BY YEAR OF ORGANIZATION

Cost of drainage works and services, 1950-1959				New works constructed, enlarged, or installed, 1950-1959									
Total		For new works		Open ditches		Tile or covered drains		Levees and dikes		Pumps		Other, projects reporting	
Projects reporting	Dollars	Projects reporting	Dollars	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Number		
114	4,404,324	49	1,304,272	38	97.8	6	8.5	11	30.7	13	17	18	1
14	680,014	13	585,334	11	33.9	4	7.3	4	22.5	4	4	5	2
100	3,724,310	36	718,938	27	63.9	2	1.2	7	8.2	9	13	13	3

DRAINAGE OF AGRICULTURAL LANDS

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1960 data]

Item and Census year	The State	Clark	Cowlitz	Grant	Grays Harbor	Island	Jefferson
AREA							
1 Approximate land area.....acres 1960...	42,693,760	403,200	731,520	1,721,600	1,219,200	131,840	1,159,680
2 Land in farms.....acres 1959...	18,716,972	188,479	80,176	1,075,642	99,529	38,702	35,123
3 Drainage projects..... number 1960...	122	11	5	1	2	7	2
4 1950...	533	22	10	2	6	5	6
5 Total area in drainage projects ¹ acres served 1960...	254,482	17,960	25,482	1,280	2,336	7,245	6,990
6 1950...	431,613	12,300	10,269	1,405	2,356	3,080	7,090
7 Area not used for agriculture or not drained acres served 1960...	13,300	...	10,000	...	...	...	...
8 Net area drained and used for agriculture acres served 1960...	241,182	17,960	15,482	1,280	2,336	7,245	6,990
9 Drainage established before 1950 acres served 1960...	227,696	11,425	15,482	1,280	2,336	7,245	6,990
10 Area added, 1950-1959 acres served 1960...	13,486	6,535	...	...	...	...	...
11 Area served by two or more projects..... acres served 1960...	1,300	...	1,300	...	...	...	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION							
12 Drains owned by one landowner number of projects...	2	1	...	...	...	...	...
13 acres served ² ...	1,375	675	...	...	...	...	...
14 Cooperative or mutual drains number of projects...	20	2	...	1	...	...	1
15 acres served ² ...	20,374	1,850	...	1,280	...	...	960
16 Legally organized public drains number of projects...	100	8	5	...	2	7	1
17 acres served ² ...	220,733	15,435	16,782	...	2,336	7,245	6,030
PROJECTS, 1960, BY YEAR STARTED							
18 1950-1959 number of projects...	14	5	1	...	...	...	...
19 acres served ² ...	18,587	6,535	1,300	...	...	...	...
20 Prior to 1950 number of projects...	108	6	4	1	2	7	2
21 acres served ² ...	223,895	11,425	15,482	1,280	2,336	7,245	6,990
DRAINAGE OPERATIONS, 1950-1959 ³							
22 Cost of drainage works and services .....projects reporting...	114	12	5	1	2	6	(⁴)
23 dollars ...	4,404,324	532,821	1,322,171	12,000	8,416	26,427	(⁴)
24 New drainage works constructed, enlarged, or installed .....projects reporting...	49	10	2	...	...	2	...
25 dollars ...	1,304,272	448,008	72,368	...	...	10,633	...
26 Open ditches.....projects reporting...	38	9	1	...	...	2	...
27 length, miles ...	97.8	21.6	9.0	...	...	2.5	...
28 Tile or covered drains.....projects reporting...	6	3	...	...	...	...	...
29 length, miles ...	8.5	2.4	...	...	...	...	...
30 Levees or dikes.....projects reporting...	11	5	...	...	...	...	...
31 length, miles ...	30.7	28.1	...	...	...	...	...
32 Pumps .....projects reporting...	13	4	1	...	...	1	...
33 number of pumps ...	17	5	1	...	...	1	...
34 Other (see text).....projects reporting...	18	5	...	...	...	...	...
35 Cost of maintenance, operation, repair, and administration.....projects reporting...	108	12	5	1	2	6	(⁴)
36 dollars ...	3,100,052	84,813	1,249,803	12,000	8,416	15,794	(⁴)

¹Land served by two or more projects counted only once.
²Acres served by two projects are included for each project. See text.
³Includes projects taken over by another project prior to 1960. See text.
⁴Included in State total only.

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data.]

Item and Census year	King	Klickitat	Lewis	Pacific	Pierce	San Juan	Skagit
AREA							
1 Approximate land area.....acres 1960...	1,365,760	1,219,200	1,566,080	592,000	1,072,640	110,080	1,110,400
2 Land in farms.....acres 1959...	114,719	960,614	255,012	53,348	153,363	45,707	141,770
3 Drainage projects..... number 1960...	8	1	6	9	8	3	14
4 1950...	54	4	20	13	58	2	19
5 Total area in drainage projects ¹ acres served 1960...	17,837	8,234	8,629	11,600	10,036	2,775	51,702
6 1950...	19,064	10,954	8,818	4,586	10,771	2,275	46,809
7 Area not used for agriculture or not drained..... acres served 1960...	2,700	...	...	600	...	...	...
8 Net area drained and used for agriculture..... acres served 1960...	15,137	8,234	8,629	11,000	10,036	2,775	51,702
9 Drainage established before 1950..... acres served 1960...	15,137	8,234	8,629	9,600	10,036	2,275	50,774
10 Area added, 1950-1959..... acres served 1960...	...	...	...	1,400	...	500	928
11 Area served by two or more projects..... acres served 1960...	...	...	...	...	...	...	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION							
12 Drains owned by one landowner..... number of projects...	...	...	...	1	...	...	...
13 acres served ²...	...	...	...	700	...	...	...
14 Cooperative or mutual drains..... number of projects...	...	...	1	6	...	1	1
15 acres served ²...	...	...	809	6,500	...	500	1,100
16 Legally organized public drains..... number of projects...	8	1	5	2	8	2	13
17 acres served ² ...	15,137	8,234	7,820	3,800	10,036	2,275	50,602
PROJECTS, 1960, BY YEAR STARTED							
18 1960-1959..... number of projects...	...	...	...	2	...	1	1
19 acres served ²...	...	...	...	1,400	...	500	630
20 Prior to 1960..... number of projects...	8	1	6	7	8	2	13
21 acres served ² ...	15,137	8,234	8,629	9,600	10,036	2,275	51,072
DRAINAGE OPERATIONS, 1950-1959 ³							
22 Cost of drainage works and services.....projects reporting...	8	1	4	9	8	(⁴)	14
23 dollars...	154,777	10,100	17,943	103,992	93,546	(⁴)	930,827
24 New drainage works constructed, enlarged, or installed.....projects reporting...	1	1	...	5	...	(⁴)	13
25 dollars...	2,000	3,793	...	16,200	...	(⁴)	114,176
26 Open ditches.....projects reporting...	1	1	...	5	...	(⁴)	8
27 length, miles...	0.2	22.5	...	5.5	...	(⁴)	9.5
28 Tile or covered drains.....projects reporting...	...	...	...	...	...	...	1
29 length, miles...	...	...	...	...	...	...	1.0
30 Levees or dikes.....projects reporting...	...	...	...	1	...	...	2
31 length, miles...	...	...	...	0.8	...	...	0.7
32 Pumps.....projects reporting...	...	...	...	...	...	...	5
33 number of pumps...	...	...	...	...	...	...	6
34 Other (see text).....projects reporting...	...	...	...	2	...	...	5
35 Cost of maintenance, operation, repair, and administration.....projects reporting...	8	1	4	7	8	...	14
36 dollars...	152,777	6,307	17,943	87,792	93,546	...	816,651

¹Land served by two or more projects counted only once.

²Acres served by two projects are included for each project. See text.

³Includes projects taken over by another project prior to 1960. See text.

⁴Included in State total only.

DRAINAGE OF AGRICULTURAL LANDS

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	Snohomish	Spokane	Stevens	Thurston	Wahkiakum	Whatcom	Yakima	All other counties ¹
AREA								
1 Approximate land area.....acres 1960...	1,344,000	1,128,320	1,591,040	458,880	172,160	1,365,760	2,734,720	16,667,520
2 Land in farms.....acres 1959...	148,604	822,008	803,776	142,170	26,299	185,045	1,884,694	8,684,990
3 Drainage projects.....number 1960...	14	1	2	5	4	20	1	...
4	23	4	13	6	3	58	90	123
5 Total area in drainage projects ².....acres served 1960...	25,017	525	2,840	6,539	8,126	38,297	1,032	...
6	20,783	563	3,587	3,285	7,169	33,774	186,806	35,869
7 Area not used for agriculture or not drained.....acres served 1960...	...	...	...	...	...	...	...	...
8 Net area drained and used for agriculture.....acres served 1960...	25,017	525	2,840	6,539	8,126	38,297	1,032	...
9 Drainage established before 1950.....acres served 1960...	25,017	525	2,540	6,539	8,126	35,506	...	...
10 Area added, 1950-1959.....acres served 1960...	...	...	300	...	...	2,791	1,032	...
11 Area served by two or more projects.....acres served 1960...	...	...	...	...	...	...	...	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION								
12 Drains owned by one landowner.....number of projects...	...	...	...	...	...	...	...	...
13 .....	...	...	...	...	...	...	...	...
14 Cooperative or mutual drains.....number of projects...	1	...	2	...	1	3	...	...
15	750	...	2,840	...	1,100	2,685	...	...
16 Legally organized public drains.....number of projects...	13	1	...	5	3	17	1	...
17	24,267	525	...	6,539	7,026	35,612	1,032	...
PROJECTS, 1960, BY YEAR STARTED								
18 1950-1959.....number of projects...	...	...	...	1	...	2	1	...
19 .....	...	...	...	800	...	6,390	1,032	...
20 Prior to 1950.....number of projects...	14	1	2	4	4	18	...	...
21	25,017	525	2,840	5,739	8,126	31,907	...	...
DRAINAGE OPERATIONS, 1950-1959 ⁴								
22 Cost of drainage works and services.....projects reporting...	15	...	(⁵)	5	4	16	1	...
23	378,043	...	(⁵)	24,229	370,369	157,560	238,590	...
24 New drainage works constructed, enlarged, or installed.....projects reporting...	3	...	(⁵)	...	3	6	1	...
25	18,500	...	(⁵)	...	291,369	82,872	238,590	...
26 Open ditches.....projects reporting...	2	...	(⁵)	...	2	5	...	...
27	1.4	...	(⁵)	...	8.5	13.1	...	...
28 Tile or covered drains.....projects reporting...	...	...	...	...	...	1	1	...
29 .....	...	...	...	...	...	0.2	4.9	...
30 Levees or dikes.....projects reporting...	2	...	(⁵)	...	...	...	...	...
31	0.6	...	(⁵)	...	...	...	...	...
32 Pumps.....projects reporting...	...	...	...	...	2	...	...	...
33 .....	...	...	...	...	4	...	...	...
34 Other (see text).....projects reporting...	1	...	...	...	3	2	...	...
35 Cost of maintenance, operation, repair, and administration.....projects reporting...	15	...	(⁵)	5	3	15	...	...
36	359,543	...	(⁵)	24,229	79,000	74,688	...	...

¹Includes Adams, Benton, Chelan, Clallam, Columbia, Douglas, Ferry, Kitsap, Kittitas, Okanogan, Pend Oreille, Walla Walla, and Whitman counties.²Land served by two or more projects counted only once.³Acres served by two projects are included for each project. See text.⁴Includes projects taken over by another project prior to 1960. See text.⁵Included in State total only.

State Table 1.—DRAINAGE PROJECTS—NUMBER, AREA, COST, AND WORKS, 1920 TO 1960

[See text for comparability of data.]

Item	1960 Census	1950 Census	1940 Census	1930 Census	1920 Census
AREA					
Approximate land area..... acres...	35,011,200	35,011,200	35,017,600	35,363,840	35,363,840
Land in farms..... acres...	21,156,223	23,221,095	22,876,494	21,874,155	22,148,223
Drainage projects..... number...	235	206	396	NA	NA
Total area in drainage projects..... acres served...	587,803	514,700	761,203	892,713	794,569
Area not used for agriculture or not drained..... acres served...	3,710	NA	NA	NA	NA
Net area drained and used for agriculture..... acres served...	584,093	NA	¹ 561,723	¹ 574,892	NA
Drainage established 10 years or more before Census date..... acres served...	536,444	NA	NA	NA	NA
Drainage established within 10 years of Census date..... acres served...	47,649	NA	NA	NA	NA
Area served by two or more projects..... acres served...	4,770	1,720	11,790	2,985	...
PROJECTS BY TYPE OF ORGANIZATION					
Drains owned by one landowner..... number of projects...	7	1	NA	NA	NA
acres served...	8,055	700	² 3,600	5,710	(²)
Cooperative or mutual drains..... number of projects...	17	...	...	...	...
acres served...	23,834	...	...	...	...
Legally organized public drains..... number of projects...	211	205	NA	NA	NA
acres served...	556,974	514,000	² 721,603	887,003	² 790,489
PROJECTS BY YEAR STARTED					
Started 10 years or more before Census date..... number of projects...	203	186	NA	NA	NA
acres served...	533,314	471,714	754,393	760,911	³ 462,696
Started within 10 years of Census date..... number of projects...	32	20	NA	NA	NA
acres served...	55,549	42,986	6,810	131,802	³ 329,526
OPERATIONS, 10-YEAR PERIOD PRECEDING CENSUS DATE					
Cost of drainage works and services..... projects reporting...	140	92	NA	NA	NA
dollars...	1,579,398	610,918	NA	NA	NA
New drainage works constructed, enlarged, or installed..... projects reporting...	45	⁴ 15	NA	NA	NA
cost, dollars...	598,533	⁴ 296,176	NA	NA	NA
Open ditches..... projects reporting...	40	15	NA	NA	NA
length, miles...	261.8	76	NA	NA	NA
Tile or covered drains..... projects reporting...	12	3	NA	NA	NA
length, miles...	78.5	10	NA	NA	NA
Levees or dikes..... projects reporting...	5	...	NA	NA	NA
length, miles...	12.0	...	NA	NA	NA
Pumps..... projects reporting...	5	NA	NA	NA	NA
number of pumps...	8	NA	NA	NA	NA
Other (see text)..... projects reporting...	1	NA	NA	NA	NA
Cost of maintenance, operation, repair, and administration..... projects reporting...	118	NA	NA	NA	NA
dollars...	980,865	314,742	NA	NA	NA
STATUS ON CENSUS DATE					
Capital investment.....dollars...	NA	NA	4,254,586	6,207,278	4,163,055
Physical works:					
Open ditches..... length, miles...	NA	NA	1,580.7	1,989.4	1,691.3
Tile drains..... length, miles...	NA	NA	282.5	303.4	211.3
Levees and dikes..... length, miles...	NA	NA	8.0	9.0	7.7
Pumping units..... number of units...	NA	...	NA	1	NA

NA Not available.

¹Not fully comparable. See text.

²1940 figures by type of project exclude 36,000 acres reported as "other"; 1920 figures by type of project exclude 4,080 acres reported as "other."

³1920 figures do not include 2,347 acres for which date of organization was not reported.

⁴Cost of new works for lands not previously drained.

DRAINAGE OF AGRICULTURAL LANDS

State Table 2.—DRAINAGE

	Size of project (Based on area of agricultural land in project)	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	235	588,863	9,540	209	541,214	36	47,649
2	500 to 999 acres.....	68	48,510	1,230	54	38,895	16	9,615
3	1,000 to 1,999 acres.....	88	124,894	5,010	80	111,917	12	12,977
4	2,000 to 4,999 acres.....	56	165,204	880	52	153,857	6	11,347
5	5,000 to 9,999 acres.....	16	103,960	2,420	16	103,960	...	...
6	10,000 to 19,999 acres.....	6	90,295	...	6	76,585	2	13,710
7	20,000 to 49,999 acres.....	...	...	...	...	...	...	...
8	50,000 to 99,999 acres.....	1	56,000	...	1	56,000	...	...
9	100,000 or more acres.....	...	...	...	...	...	...	...

State Table 3.—DRAINAGE PROJECTS, 1960,

	Type of organization	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	235	588,863	9,540	209	541,214	36	47,649
2	Drains owned by one landowner.....	7	8,055	...	2	1,700	6	6,355
3	Cooperative or mutual drains.....	17	23,834	480	7	14,604	12	9,230
4	Legally organized public drains.....	211	556,974	9,060	200	524,910	18	32,064

State Table 4.—DRAINAGE PROJECTS, 1960,

	Year of organization	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	235	588,863	9,540	209	541,214	36	47,649
2	1960-1959.....	32	55,549	2,650	6	10,660	28	44,889
3	Prior to 1950.....	203	533,314	6,890	203	530,554	8	2,760

PROJECTS, 1960, BY SIZE

Cost of drainage works and services, 1950-1959				New works constructed, enlarged, or installed, 1950-1959									
Total		For new works		Open ditches		Tile or covered drains		Levees and dikes		Pumps		Other, projects reporting	
Projects reporting	Dollars	Projects reporting	Dollars	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Number		
140	1,579,398	45	598,533	40	261.8	12	78.5	5	12.0	5	8	1	1
38	183,110	17	133,974	16	110.7	3	45.2	3	6.8	4	7	1	2
49	298,769	16	194,661	13	74.9	5	25.9	1	3.2	1	1	...	3
37	367,103	7	78,598	6	26.0	1	1.8	...	...	...	...	...	4
10	329,854	2	27,100	2	7.1	1	2.2	...	...	...	...	...	5
5	400,216	3	164,200	3	43.1	2	3.4	1	2.0	...	...	...	6
...	...	...	...	...	...	...	...	...	...	...	...	...	7
1	346	...	...	...	...	...	...	...	...	...	...	...	8
...	...	...	...	...	...	...	...	...	...	...	...	...	9

BY TYPE OF ORGANIZATION

Cost of drainage works and services, 1950-1959				New works constructed, enlarged, or installed, 1950-1959									
Total		For new works		Open ditches		Tile or covered drains		Levees and dikes		Pumps		Other, projects reporting	
Projects reporting	Dollars	Projects reporting	Dollars	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Number		
140	1,579,398	45	598,533	40	261.8	12	78.5	5	12.0	5	8	1	1
7	114,900	7	104,500	6	39.5	3	51.1	3	6.8	4	6	...	2
15	124,255	11	82,160	11	115.2	2	12.3	...	...	...	...	1	3
118	1,340,243	27	411,873	23	107.1	7	15.1	2	5.2	1	2	...	4

BY YEAR OF ORGANIZATION

Cost of drainage works and services, 1950-1959				New works constructed, enlarged, or installed, 1950-1959									
Total		For new works		Open ditches		Tile or covered drains		Levees and dikes		Pumps		Other, projects reporting	
Projects reporting	Dollars	Projects reporting	Dollars	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Number		
140	1,579,398	45	598,533	40	261.8	12	78.5	5	12.0	5	8	1	1
32	455,667	29	409,802	28	224.0	6	61.0	4	10.0	4	6	1	2
108	1,123,731	16	188,731	12	37.8	6	17.5	1	2.0	1	2	...	3

DRAINAGE OF AGRICULTURAL LANDS

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	The State	Adams	Barron	Brown	Buffalo	Burnett	Calumet	Columbia	Dane	Dodge
AREA										
1 Approximate land area.....acres 1960...	35,011,200	433,280	554,240	336,000	455,680	537,600	201,600	497,920	766,080	570,880
2 Land in farms.....acres 1959...	21,156,223	171,812	466,724	292,995	385,678	163,370	190,327	411,128	682,960	501,945
3 Drainage projects..... number 1960...	235	3	2	3	1	1	1	18	33	11
4	1950...	206	2	2	3	...	1	1	16	25
5 Total area in drainage projects ¹ acres served 1960...	587,803	20,510	1,520	4,960	575	1,760	1,060	28,525	61,818	9,047
6	1950...	514,700	17,310	1,520	4,960	...	1,760	1,060	24,130	52,943
7 Area not used for agriculture or not drained..... acres served 1960...	3,710	...	...	...	...	...	...	...	1,200	...
8 Net area drained and used for agriculture..... acres served 1960...	584,093	20,510	1,520	4,960	575	1,760	1,060	28,525	60,618	9,047
9 Drainage established before 1950..... acres served 1960...	536,444	17,310	1,520	4,960	...	1,760	1,060	25,625	56,303	9,047
10 Area added, 1950-1959..... acres served 1960...	47,649	3,200	...	...	575	...	...	2,900	4,315	...
11 Area served by two or more projects..... acres served 1960...	4,770	...	...	...	...	...	...	750	1,900	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION										
12 Drains owned by one landowner..... number of projects...	7	1	...	...	1	...	...	1	...	...
18	acres served ² ..	8,055	3,200	...	...	575	...	1,000	...	...
14 Cooperative or mutual drains..... number of projects...	17	...	...	...	...	...	...	2	1	1
15	acres served ² ..	23,834	...	...	...	...	...	2,500	600	240
16 Legally organized public drains..... number of projects...	211	2	2	3	...	1	1	15	32	10
17	acres served ² ..	556,974	17,310	1,520	4,960	...	1,760	1,060	25,775	61,918
PROJECTS, 1960, BY YEAR STARTED										
18 1960-1959..... number of projects...	32	1	...	...	1	...	...	4	7	...
19	acres served ² ..	55,549	3,200	...	...	575	...	4,360	8,915	...
20 Prior to 1960..... number of projects...	203	2	2	3	...	1	1	14	26	11
21	acres served ² ..	533,314	17,310	1,520	4,960	...	1,760	1,060	24,915	53,603
DRAINAGE OPERATIONS, 1950-1959 ³										
22 Cost of drainage works and services..... projects reporting...	140	2	...	2	1	...	...	12	26	3
23	dollars...	1,579,398	5,050	...	10,589	10,000	...	104,131	114,266	22,822
24 New drainage works constructed, enlarged, or installed..... projects reporting...	45	1	...	...	1	...	...	7	6	...
25	dollars...	598,533	4,000	...	...	10,000	...	58,413	41,180	...
26 Open ditches..... projects reporting...	40	1	...	...	1	...	...	4	6	...
27	length, miles...	261.8	5.0	...	...	7.7	...	17.0	12.5	...
28 Tile or covered drains..... projects reporting...	12	...	...	...	...	...	...	2	...	...
29	length, miles...	78.5	...	...	...	...	...	13.4	...	...
30 Levees or dikes..... projects reporting...	5	...	...	...	1	...	...	...	...	...
31	length, miles...	12.0	...	...	...	3.3	...	...	...	...
32 Pumps..... projects reporting...	5	...	...	...	1	...	...	2	...	...
33	number of pumps...	8	...	...	...	2	...	3	...	...
34 Other (see text)..... projects reporting...	1	...	...	...	...	...	...	...	...	...
35 Cost of maintenance, operation, repair, and administration..... projects reporting...	118	2	...	2	...	...	...	9	26	3
36	dollars...	980,865	1,050	...	10,589	...	...	45,718	73,086	22,822

¹Land served by two or more projects counted only once.²Acres served by two projects are included for each project. See text.³Includes projects taken over by another project prior to 1960. See text.

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	Fond du Lac	Green	Green Lake	Jefferson	Juneau	Kenosha	Manitowoc	Marinette	Marquette	Milwaukee
AREA										
1 Approximate land area.....acres 1960...	463,360	375,040	227,200	360,960	508,800	174,720	376,960	888,320	292,480	152,960
2 Land in farms.....acres 1959...	409,776	361,739	188,643	310,500	219,103	123,495	336,144	277,242	213,844	32,848
3 Drainage projects..... number 1960...	13	6	2	45	4	7	3	3	3	3
4 1950...	12	5	2	33	4	6	2	2	1	5
5 Total area in drainage projects ¹ acres served 1960...	14,682	7,800	4,320	65,456	7,180	16,500	4,542	23,040	4,630	2,590
6 1950...	14,412	6,400	4,320	44,980	8,580	15,700	3,510	6,760	700	5,890
7 Area not used for agriculture or not drained..... acres served 1960...	...	...	...	...	...	...	...	640	...	540
8 Net area drained and used for agriculture..... acres served 1960...	14,682	7,800	4,320	65,456	7,180	16,500	4,542	22,400	4,630	2,050
9 Drainage established before 1950..... acres served 1960...	14,412	6,600	4,320	64,006	6,280	15,700	3,510	6,120	700	2,050
10 Area added, 1950-1959..... acres served 1960...	270	1,200	1...	1,450	900	800	1,032	16,280	3,930	...
11 Area served by two or more projects..... acres served 1960...	480	...	...	...	...	...	...	...	...	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION										
12 Drains owned by one landowner..... number of projects...	...	...	...	...	1	...	...	...	1	...
13 acres served ²...	...	...	...	...	900	...	...	...	1,160	...
14 Cooperative or mutual drains..... number of projects...	1	...	...	4	...	1	...	...	1	...
15 acres served ² ...	750	...	...	6,884	...	800	...	...	1,560	...
16 Legally organized public drains..... number of projects...	12	6	2	41	3	6	3	3	1	3
17 acres served ² ...	14,412	7,800	4,320	58,572	6,280	15,700	4,542	22,400	1,910	2,050
PROJECTS, 1960, BY YEAR STARTED										
18 1950-1959..... number of projects...	...	1	...	2	1	1	1	2	2	...
19 acres served ²...	...	1,200	...	1,450	900	800	1,032	20,280	3,470	...
20 Prior to 1950..... number of projects...	13	5	2	43	3	6	2	1	1	3
21 acres served ² ...	15,162	6,600	4,320	64,006	6,280	15,700	3,510	2,120	1,160	2,050
DRAINAGE OPERATIONS, 1950-1959 ³										
22 Cost of drainage works and services.....projects reporting...	2	4	1	38	3	5	1	2	3	1
23 dollars...	12,600	53,718	135	78,953	12,400	20,760	18,532	90,493	57,600	820
24 New drainage works constructed, enlarged, or installed.....projects reporting...	(4)	1	...	2	(4)	...	1	2	3	...
25 dollars...	(4)	28,000	...	4,030	(4)	...	18,532	80,000	52,000	...
26 Open ditches.....projects reporting...	(4)	1	...	2	(4)	...	1	2	3	...
27 length, miles...	(4)	5.0	...	4.0	(4)	...	1.3	43.0	40.5	...
28 Tile or covered drains.....projects reporting...	(4)	...	...	...	(4)	...	1	1	1	...
29 length, miles...	(4)	...	...	...	(4)	...	1.9	0.4	7.6	...
30 Levees or dikes.....projects reporting...	...	...	...	...	...	...	...	...	1	...
31 length, miles...	...	...	...	...	...	...	...	...	3.2	...
32 Pumps.....projects reporting...	...	...	...	...	...	...	...	...	...	...
33 number of pumps...	...	...	...	...	...	...	...	...	...	...
34 Other (see text).....projects reporting...	...	...	...	...	...	...	...	...	...	...
35 Cost of maintenance, operation, repair, and administration.....projects reporting...	(4)	3	1	37	(4)	5	...	1	1	1
36 dollars...	(4)	25,718	135	74,923	(4)	20,760	...	10,493	5,600	820

¹Land served by two or more projects counted only once.
²Acres served by two projects are included for each project. See text.
³Includes projects taken over by another project prior to 1960. See text.
⁴Included in State total only.

DRAINAGE OF AGRICULTURAL LANDS

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	Monroe	Oconto	Outagamie	Ozaukee	Polk	Portage	Racine	Richland	Rook	Rusk
AREA										
1 Approximate land area.....acres 1960...	585,600	707,840	405,760	150,400	597,760	518,400	215,680	373,760	461,440	582,400
2 Land in farms.....acres 1959...	412,740	325,224	345,935	116,827	438,147	399,278	149,391	351,672	417,586	265,746
3 Drainage projects..... number 1960...	1	4	17	5	3	2	10	1	9	1
4 1950...	1	1	15	5	3	2	9	1	7	1
5 Total area in drainage projects ¹ acres served 1960...	13,000	16,360	38,572	6,870	3,400	58,560	60,280	880	27,840	1,250
6 1950...	13,000	8,960	37,282	6,870	3,400	58,560	52,780	880	24,840	1,250
7 Area not used for agriculture or not drained..... acres served 1960...	...	...	1,330	...	...	...	...	...	...	...
8 Net area drained and used for agriculture..... acres served 1960...	13,000	16,360	37,242	6,870	3,400	58,560	60,280	880	27,840	1,250
9 Drainage established before 1960..... acres served 1960...	13,000	15,360	35,992	6,870	3,400	58,560	59,850	880	24,840	1,250
10 Area added, 1950-1959..... acres served 1960...	...	1,000	1,250	...	...	...	430	...	3,000	...
11 Area served by two or more projects..... acres served 1960...	...	...	...	...	...	...	...	...	...	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION										
12 Drains owned by one landowner..... number of projects...	...	...	...	...	...	...	...	...	...	...
13 acres served ²...	...	...	...	...	...	...	...	...	...	...
14 Cooperative or mutual drains..... number of projects...	...	3	2	...	...	...	...	...	1	...
15 acres served ²...	...	7,400	1,250	...	...	...	...	...	1,100	...
16 Legally organized public drains..... number of projects...	1	1	15	5	3	2	10	1	8	1
17 acres served ² ...	13,000	8,960	35,992	6,870	3,400	58,560	60,280	880	26,740	1,250
PROJECTS, 1960, BY YEAR STARTED										
18 1950-1959..... number of projects...	...	2	2	...	...	...	...	...	2	...
19 acres served ²...	...	1,000	1,250	...	...	...	...	...	2,500	...
20 Prior to 1950..... number of projects...	1	2	15	5	3	2	10	1	7	1
21 acres served ² ...	13,000	15,360	35,992	6,870	3,400	58,560	60,280	880	25,340	1,250
DRAINAGE OPERATIONS, 1950-1959 ³										
22 Cost of drainage works and services..... projects reporting...	1	3	6	2	1	1	9	...	8	...
23 dollars...	8,000	14,400	27,052	475	4,101	346	709,509	...	96,057	...
24 New drainage works constructed, enlarged, or installed..... projects reporting...	...	2	2	...	...	...	4	...	5	...
25 dollars...	...	14,200	9,500	...	...	...	132,907	...	49,400	...
26 Open ditches..... projects reporting...	...	2	2	...	...	...	3	...	5	...
27 length, miles...	...	2.9	72.0	...	...	...	13.2	...	14.5	...
28 Tile or covered drains..... projects reporting...	...	...	...	...	...	...	3	...	...	...
29 length, miles...	...	...	...	...	...	...	7.0	...	...	...
30 Levees or dikes..... projects reporting...	...	...	...	...	...	...	1	...	...	...
31 length, miles...	...	...	...	...	...	...	2.0	...	...	...
32 Pumps..... projects reporting...	...	...	...	...	...	...	...	...	...	...
33 number of pumps...	...	...	...	...	...	...	...	...	...	...
34 Other (see text)..... projects reporting...	...	1	...	...	...	...	...	...	...	...
35 Cost of maintenance, operation, repair, and administration..... projects reporting...	1	1	4	2	1	1	9	...	7	...
36 dollars...	8,000	200	17,552	475	4,101	346	576,602	...	46,657	...

¹Land served by two or more projects counted only once.
²Acres served by two projects are included for each project. See text.
³Includes projects taken over by another project prior to 1960. See text.

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data.]

Item and Census year	Sauk	Shawano	Sheboygan	Walworth	Washington	Waukesha	Waupaca	Waushara	Winnepago	All other counties ¹
AREA										
1 Approximate land area.....acres 1960...	537,600	752,640	323,840	358,400	273,920	355,840	480,640	401,920	290,560	819,840
2 Land in farms.....acres 1959...	460,193	451,245	275,649	306,290	218,120	230,728	367,670	272,880	236,621	572,422
3 Drainage projects..... number 1960...	1	5	5	3	4	8	8	10	4	...
4 1950...	1	5	6	3	5	8	8	9	3	4
5 Total area in drainage projects ² acres served 1960...	4,400	10,990	3,906	13,380	7,200	11,141	9,680	12,650	6,929	...
6 1950...	4,400	10,990	4,546	13,380	8,260	8,574	9,680	12,050	6,179	10,500
7 Area not used for agriculture or not drained..... acres served 1960...	...	...	...	...	...	...	...	...	...	...
8 Net area drained and used for agriculture..... acres served 1960...	4,400	10,990	3,906	13,380	7,200	11,141	9,680	12,650	6,929	...
9 Drainage established before 1960..... acres served 1960...	4,400	10,990	3,906	13,380	6,580	7,994	9,680	12,050	6,179	...
10 Area added, 1950-1959..... acres served 1960...	...	...	...	...	620	3,147	...	600	750	...
11 Area served by two or more projects..... acres served 1960...	...	...	...	...	...	...	...	1,640	...	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION										
12 Drains owned by one landowner..... number of projects...	...	...	...	...	1	...	...	1	...	...
13 acres served ³...	...	...	...	...	620	...	...	600	...	...
14 Cooperative or mutual drains..... number of projects...	...	...	...	...	...	...	...	...	1	...
15 acres served ³...	...	...	...	...	...	...	...	...	750	...
16 Legally organized public drains..... number of projects...	1	5	5	3	3	8	8	9	3	...
17 acres served ³ ...	4,400	10,990	3,906	13,380	6,580	11,141	9,680	13,690	6,179	...
PROJECTS, 1960, BY YEAR STARTED										
18 1960-1959..... number of projects...	...	...	...	...	1	1	...	1	1	...
19 acres served ³...	...	...	...	...	620	2,647	...	600	750	...
20 Prior to 1960..... number of projects...	1	5	5	3	3	7	8	9	3	...
21 acres served ³ ...	4,400	10,990	3,906	13,380	6,580	8,494	9,680	13,690	6,179	...
DRAINAGE OPERATIONS, 1950-1959 ⁴										
22 Cost of drainage works and services..... projects reporting...	1	1	3	...	3	7	1	2	(⁵)	...
23 dollars...	4,000	12,000	935	...	11,700	19,671	200	54,203	(⁵)	...
24 New drainage works constructed, enlarged, or installed..... projects reporting...	...	...	...	...	(⁵)	2	...	(⁵)	(⁵)	...
25 dollars...	...	...	...	...	(⁵)	12,791	...	(⁵)	(⁵)	...
26 Open ditches..... projects reporting...	...	...	...	...	(⁵)	2	...	(⁵)	(⁵)	...
27 length, miles...	...	...	...	...	(⁵)	4.5	...	(⁵)	(⁵)	...
28 Tile or covered drains..... projects reporting...	...	...	...	...	(⁵)	...	...	(⁵)	...	...
29 length, miles...	...	...	...	...	(⁵)	...	...	(⁵)	...	...
30 Levees or dikes..... projects reporting...	...	...	...	...	(⁵)	...	...	(⁵)	...	...
31 length, miles...	...	...	...	...	(⁵)	...	...	(⁵)	...	...
32 Pumps..... projects reporting...	...	...	...	...	(⁵)	...	...	(⁵)	...	...
33 number of pumps...	...	...	...	...	(⁵)	...	...	(⁵)	...	...
34 Other (see text)..... projects reporting...	...	...	...	...	...	...	...	...	...	...
35 Cost of maintenance, operation, repair, and administration..... projects reporting...	1	1	3	...	(⁵)	5	1	(⁵)	...	...
36 dollars...	4,000	12,000	935	...	(⁵)	6,880	200	(⁵)	...	...

¹Includes LaCrosse and Wood counties.

²Land served by two or more projects counted only once.

³Acres served by two projects are included for each project. See text.

⁴Includes projects taken over by another project prior to 1960. See text.

⁵Included in State total only.

State Table 1.—DRAINAGE PROJECTS—NUMBER, AREA, COST, AND WORKS, 1920 TO 1960

[See text for comparability of data.]

Item	1960 Census	1950 Census	1940 Census	1930 Census	1920 Census
AREA					
Approximate land area.....acres...	62,343,040	62,403,840	62,403,840	62,430,720	62,430,720
Land in farms.....acres...	36,199,666	34,420,892	28,025,979	23,525,234	11,809,351
Drainage projects.....number...	6	189	25	NA	NA
Total area in drainage projects.....acres served...	23,833	325,981	312,662	245,703	95,474
Area not used for agriculture or not drained.....acres served...	...	NA	NA	NA	NA
Net area drained and used for agriculture.....acres served...	23,833	NA	¹ 287,420	¹ 188,327	NA
Drainage established 10 years or more before Census date.....acres served...	23,833	NA	NA	NA	NA
Drainage established within 10 years of Census date.....acres served...	...	NA	NA	NA	NA
Area served by two or more projects.....acres served...	...	500	...	2,613	...
PROJECTS BY TYPE OF ORGANIZATION					
Drains owned by one landowner.....number of projects...	...	(²)	NA	NA	NA
.....acres served...	...	(²)	(²)	(²)	² 500
Cooperative or mutual drains.....number of projects...	...	² 2	...	...	...
.....acres served...	...	² 2,669	...	...	...
Legally organized public drains.....number of projects...	6	² 17	NA	NA	NA
.....acres served...	23,833	² 84,116	² 88,803	² 89,908	² 60,834
PROJECTS BY YEAR STARTED					
Started 10 years or more before Census date.....number of projects...	6	² 17	NA	NA	...
.....acres served...	23,833	² 84,116	312,662	137,154	...
Started within 10 years of Census date.....number of projects...	...	² 2	...	NA	NA
.....acres served...	...	² 2,669	...	108,549	95,474
OPERATIONS, 10-YEAR PERIOD PRECEDING CENSUS DATE					
Cost of drainage works and services.....projects reporting...	6	² 14	NA	NA	NA
.....dollars...	145,293	163,163	NA	NA	NA
New drainage works constructed, enlarged, or installed.....projects reporting...	1	³ 2	NA	NA	NA
.....cost, dollars...	2,300	³ 12,237	NA	NA	NA
Open ditches.....projects reporting...	...	2	NA	NA	NA
.....length, miles...	...	5	NA	NA	NA
Tile or covered drains.....projects reporting...	1	...	NA	NA	NA
.....length, miles...	0.4	...	NA	NA	NA
Levees or dikes.....projects reporting...	...	...	NA	NA	NA
.....length, miles...	...	...	NA	NA	NA
Pumps.....projects reporting...	...	NA	NA	NA	NA
.....number of pumps...	...	NA	NA	NA	NA
Other (see text).....projects reporting...	...	NA	NA	NA	NA
Cost of maintenance, operation, repair, and administration.....projects reporting...	6	NA	NA	NA	NA
.....dollars...	142,993	150,926	NA	NA	NA
STATUS ON CENSUS DATE					
Capital investment.....dollars...	NA	NA	5,594,856	5,250,573	1,175,962
Physical works:					
Open ditches.....length, miles...	NA	NA	643.3	521.0	25.1
Tile drains.....length, miles...	NA	NA	262.1	237.6	114.2
Levees and dikes.....length, miles...	NA	NA	7.2	...	...
Pumping units.....number of units...	NA	(²)	NA	...	...

NA Not available.
¹Not fully comparable. See text.
²1950 figures exclude 170 projects and 239,196 acres in "irrigation enterprises"; 1940 figures exclude 223,859 acres in "irrigation enterprises"; 1930 figures exclude 155,795 acres in "irrigation enterprises"; 1920 figures exclude 34,140 acres in "irrigation enterprises."
³Cost of new works for lands not previously drained.

DRAINAGE OF AGRICULTURAL LANDS

State Table 2.—DRAINAGE

	Size of project (Based on area of agricultural land in project)	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	6	23,833	...	6	23,833	...	...
2	500 to 999 acres.....	...	...	...	...	...	...	...
3	1,000 to 1,999 acres.....	2	3,455	...	2	3,455	...	...
4	2,000 to 4,999 acres.....	1	3,347	...	1	3,347	...	...
5	5,000 to 9,999 acres.....	3	17,031	...	3	17,031	...	...
6	10,000 to 19,999 acres.....	...	...	...	...	...	...	...
7	20,000 to 49,999 acres.....	...	...	...	...	...	...	...
8	50,000 to 99,999 acres.....	...	...	...	...	...	...	...
9	100,000 or more acres.....	...	...	...	...	...	...	...

State Table 3.—DRAINAGE PROJECTS, 1960,

	Type of organization	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	6	23,833	...	6	23,833	...	...
2	Drains owned by one landowner.....	...	...	...	...	...	...	...
3	Cooperative or mutual drains.....	...	...	...	...	...	...	...
4	Legally organized public drains.....	6	23,833	...	6	23,833	...	...

State Table 4.—DRAINAGE PROJECTS, 1960,

	Year of organization	Number of projects	Area drained and used for agriculture, 1960		Area by period drainage was established			
			Total (acres)	Served by two or more projects (acres)	Before 1950		Area added 1950-1959	
					Projects reporting	Acres	Projects reporting	Acres
1	All projects.....	6	23,833	...	6	23,833	...	...
2	1950-1959.....	...	...	...	...	...	...	...
3	Prior to 1950.....	6	23,833	...	6	23,833	...	...

PROJECTS, 1960, BY SIZE

Cost of drainage works and services, 1950-1959				New works constructed, enlarged, or installed, 1950-1959									
Total		For new works		Open ditches		Tile or covered drains		Levees and dikes		Pumps		Other, projects reporting	
Projects reporting	Dollars	Projects reporting	Dollars	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Number		
6	145,293	1	2,300	...	...	1	0.4	...	...	...	...	...	1
...	...	...	...	...	...	...	...	...	...	...	...	...	2
2	4,719	...	...	...	...	...	...	...	...	...	...	...	3
1	9,798	...	...	...	...	...	...	...	...	...	...	...	4
3	130,776	1	2,300	...	...	1	0.4	...	...	...	...	...	5
...	...	...	...	...	...	...	...	...	...	...	...	...	6
...	...	...	...	...	...	...	...	...	...	...	...	...	7
...	...	...	...	...	...	...	...	...	...	...	...	...	8
...	...	...	...	...	...	...	...	...	...	...	...	...	9

BY TYPE OF ORGANIZATION

Cost of drainage works and services, 1950-1959				New works constructed, enlarged, or installed, 1950-1959									
Total		For new works		Open ditches		Tile or covered drains		Levees and dikes		Pumps		Other, projects reporting	
Projects reporting	Dollars	Projects reporting	Dollars	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Number		
6	145,293	1	2,300	...	...	1	0.4	...	...	...	...	...	1
...	...	...	...	...	...	...	...	...	...	...	...	...	2
...	...	...	...	...	...	...	...	...	...	...	...	...	3
6	145,293	1	2,300	...	...	1	0.4	...	...	...	...	...	4

BY YEAR OF ORGANIZATION

Cost of drainage works and services, 1950-1959				New works constructed, enlarged, or installed, 1950-1959									
Total		For new works		Open ditches		Tile or covered drains		Levees and dikes		Pumps		Other, projects reporting	
Projects reporting	Dollars	Projects reporting	Dollars	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Length (miles)	Projects reporting	Number		
6	145,293	1	2,300	...	...	1	0.4	...	...	...	...	...	1
...	...	...	...	...	...	...	...	...	...	...	...	...	2
6	145,293	1	2,300	...	...	1	0.4	...	...	...	...	...	3

DRAINAGE OF AGRICULTURAL LANDS

County Table 1. -DRAINAGE PROJECTS, 1960 AND 1950; AND OPERATIONS, 1950-1959

[See text for comparability of 1960 and 1950 data]

Item and Census year	The State	Big Horn	Platte	Wahakie	All other counties ¹
AREA					
1 Approximate land area.....acres 1960...	62,343,040	2,032,640	² 1,335,040	1,447,680	49,395,200
2 Land in farms.....acres 1959...	36,199,666	513,960	² 1,429,736	467,204	27,618,108
3 Drainage projects..... number 1960...	6	3	1	2	...
4 1950...	189	38	14	9	133
5 Total area in drainage projects ³ acres served 1960...	23,833	10,350	1,680	11,803	...
6 1950...	325,981	105,143	5,661	39,535	175,642
7 Area not used for agriculture or not drained..... acres served 1960...	...	...	...	...	...
8 Net area drained and used for agriculture..... acres served 1960...	23,833	10,350	1,680	11,803	...
9 Drainage established before 1950..... acres served 1960...	23,833	10,350	1,680	11,803	...
10 Area added, 1950-1959..... acres served 1960...	...	...	...	...	...
11 Area served by two or more projects..... acres served 1960...	...	...	...	...	...
PROJECTS, 1960, BY TYPE OF ORGANIZATION					
12 Drains owned by one landowner..... number of projects...	...	...	...	...	...
13 acres served ⁴..	...	...	...	...	...
14 Cooperative or mutual drains..... number of projects...	...	...	...	...	...
15 acres served ⁴..	...	...	...	...	...
16 Legally organized public drains..... number of projects...	6	3	1	2	...
17 acres served ⁴ ..	23,833	10,350	1,680	11,803	...
PROJECTS, 1960, BY YEAR STARTED					
18 1950-1959..... number of projects...	...	...	...	...	...
19 acres served ⁴..	...	...	...	...	...
20 Prior to 1950..... number of projects...	6	3	1	2	...
21 acres served ⁴ ..	23,833	10,350	1,680	11,803	...
DRAINAGE OPERATIONS, 1950-1959 ⁵					
22 Cost of drainage works and services.....projects reporting...	6	3	1	2	...
23 dollars...	145,293	22,549	1,250	121,494	...
24 New drainage works constructed, enlarged, or installed.....projects reporting...	1	...	...	1	...
25 dollars...	2,300	...	...	2,300	...
26 Open ditches.....projects reporting...	...	...	...	...	...
27 length, miles...	...	...	...	...	...
28 Tile or covered drains.....projects reporting...	1	...	...	1	...
29 length, miles...	0.4	...	...	0.4	...
30 Levees or dikes.....projects reporting...	...	...	...	...	...
31 length, miles...	...	...	...	...	...
32 Pumps.....projects reporting...	...	...	...	...	...
33 number of pumps...	...	...	...	...	...
34 Other (see text).....projects reporting...	...	...	...	...	...
35 Cost of maintenance, operation, repair, and administration.....projects reporting...	6	3	1	2	...
36 dollars...	142,993	22,549	1,250	119,194	...

¹Includes Albany, Carbon, Converse, Crook, Fremont, Goshen, Hot Springs, Johnson, Laramie, Lincoln, Natrona, Park, Sheridan, Sublette, Sweetwater, Teton, and Uinta counties.²The excess of farm acreage over approximate land area is due to the fact that the entire acreage of a farm is tabulated as in the county in which the headquarters is located, even though a part of the farm may be situated in an adjoining county.³Land served by two or more projects counted only once.⁴Acres served by two projects are included for each project. See text.⁵Includes projects taken over by another project prior to 1960. See text.

APPENDIX

The Questionnaire

(357)

THE QUESTIONNAIRE

This census is authorized by Act of Congress, United States Code, Title 13, Sections 5, 9, 142, 221, 223, and 224, requiring that the inquiries be answered completely and accurately, and guaranteeing that the information furnished be accorded confidential treatment. *The census report cannot be used for purposes of taxation, investigation, or regulation.*

Budget Bureau No. 41-5466
Approval expires December 31, 1960

D1 No. _____

U.S. DEPARTMENT OF COMMERCE—BUREAU OF THE CENSUS
WASHINGTON

D1 CENSUS OF DRAINAGE OF AGRICULTURAL LANDS: 1960

State _____ County _____

Section I—ORGANIZATION

1. What is the name of this drainage project or organization?
(a) If the name of the organization which controls it is different, give name of organization here _____

2. What person or persons may be contacted in reference to this drainage project or organization?

Name	Connection with project or organization	Telephone number
Address		
Name	Connection with project or organization	Telephone number
Address		
Name	Connection with project or organization	Telephone number
Address		

3. Is this project or organization—
(a) Owned by one land owner (individual, partnership, corporation, or institution)?
(If (a) is marked, skip to question [6].)
(b) A cooperative or mutual organization?
(If (b) is marked, skip to question [6].)
(c) A legally organized public organization?

4. Has this drainage project or organization—
(a) Officials now to conduct its business?
(b) No officials now, and has never been legally dissolved?
(c) Been dissolved by court action?

5. Does this project provide any major public service other than agricultural drainage? (Storm water removal, flood control, mosquito control, sewage disposal, etc.)
No Yes
If "Yes," describe public service provided: _____

[6] What year was this drainage project or organization started? Before 1950? 1950 or later? What year? _____

7. Does this drainage project extend into counties other than the county listed at the top of this questionnaire? No Yes
If "Yes," what other counties? _____

If the drainage organization operates, or the drainage project extends into other counties, separate questionnaires are required for the portions in each county. The information given for the following questions should relate only to the portion in this county. See worksheet on back of this questionnaire.

Section II—OPERATIONS DURING 10 YEARS—1950 TO 1959

You may report on either a calendar or fiscal year basis. Indicate which.

Calendar year basis Fiscal year basis

Jan. 1, 1950, through Dec. 31, 1959 (month) (day) 19____ through (month) (day) 19____
(Include full 10-year period.)
(You may use worksheet on back to total operations for the 10-year period.)

8. During the past 10 years, has there been by or for the management of this project or organization any—
(a) Construction or installation of new drainage works, including enlargement or complete replacement of prior works? No Yes
(b) Major clean-out or restoration of old works? No Yes
(c) Maintenance, operation, or repair of drainage works? No Yes
(d) Other operations? No Yes
If "Yes" for (d), describe: _____
(If "No" for all parts (a) through (d), skip to Section III.)

9. What was the total cost of all drainage works and services provided for this 10-year period? \$ _____
(Include all costs relating to works and services provided during the 10 years regardless of when paid or to be paid. Be sure to include costs of organization, engineering, rights-of-way, legal services, and administration. Do not include payments on principal or interest on bonds or notes.)

10. What new drainage works have been constructed, enlarged, or installed, during this 10-year period? None
(If "None," mark X and skip to Section III.)
(a) Open ditches? None Miles _____ /10 or Linear feet _____
(b) Tile or other covered drains? None Miles _____ /10 or Linear feet _____
(c) Levees or dikes? None Miles _____ /10 or Linear feet _____
(d) Pumps? None Number _____
(e) Other? None _____

11. Of the total costs of works and services provided in this 10-year period (question 9), how much represented new drainage works (question 10)? None \$ _____

12. Where is the outlet of the new drainage works?
(a) Name of lake, stream, or ditch receiving discharge _____
(b) Location of outlet: Section _____; Township _____; Range _____
or _____ miles (direction) from _____ (nearby town or place)

Section III—AREA IN PROJECT

Attach to this report a map for this project or organization indicating drained areas added since January 1, 1950. Any sizeable included areas which are not agricultural lands served by the drainage works of this project should be outlined. (You may sketch in the area on the township grid on the back of this questionnaire, if convenient.)

13. What was the total area included in this drainage project or organization in this county on January 1, 1950? None Acres _____
(If "None," skip to question [15].)

14. How much area has been added since January 1, 1950? None Acres _____

[15] What was the total area for this project or organization on January 1, 1960? Acres _____
(If organized before 1950, and area in 1960 does not equal sum of questions 13 and 14, explain under Remarks.)

16. Are there within this total area (question 15) any contiguous tracts totaling 500 or more acres of any of the following—
(a) Land that no longer receives drainage benefits from these drainage facilities (because drainage works have deteriorated completely)? No Yes
(b) Land that receives no drainage benefits from works of this project. Include land protected from overflow with no drains provided for the protected land? No Yes
(c) Land for which the need for drainage resulted solely because of irrigation? No Yes
(d) Land not now being used for agriculture? (Wasteland, cutover land, residential, industrial, airports, military installation, public parks, wildlife refuge, State or National Forest, commercial woodland, etc.) No Yes
Give present use and identify name of tract when possible: _____

17. If "Yes" for any part of question 16—What is the total area of the tracts with "Yes"? Acres _____

To enumerator: Check shaded square when area to left has been mapped

DRAINAGE OF AGRICULTURAL LANDS

OFFICE OF
THE DIRECTORDEPARTMENT OF COMMERCE
BUREAU OF THE CENSUS
WASHINGTON 25

Dear Sir:

A Census of Drainage organizations covering drainage operations for the year 1959 is now being taken by the Bureau of the Census. An Act of Congress (13 USC; Sec. 142) directs the Bureau of the Census to take this census and requires a report from you. This same Act requires that information furnished for your organization (1) be kept confidential, and (2) that your report may be seen only by sworn employees of the Bureau of the Census. The information provided cannot be used for taxation, regulation, or investigation.

It is important that all questions on the attached form be answered for your organization. Where exact information cannot be given, you are requested to supply carefully prepared estimates.

The enclosed form should be filled even though the organization is no longer active or the drains are no longer functioning. A sketch map of the project lands may be required. This map is necessary provided any drained areas have been added since January 1, 1950 or if any sizeable acreage within the project boundaries does not represent agricultural lands served by the drainage works of this project. If no area has been added since 1950 and only agricultural lands are served by the works, a map of the project lands need not be furnished. If you are unable to supply the requested information, will you please enter, under question 2 of the form, the name of the person who can.

Please fill out and return the enclosed form within 30 days. Please use the self-addressed official envelope, which does not require postage, to return your report.

Sincerely yours,



Robert W. Burgess
Director
Bureau of the Census

Enclosure

60-11-160L
(10-12-59)

D3

D2 No.

U.S. DEPARTMENT OF COMMERCE—BUREAU OF THE CENSUS
PARSONS, KANSAS

D2 SURVEY OF DRAINAGE OF
IRRIGATED AGRICULTURAL LANDS **1960**

Dear Sirs:

In preparation for the 1960 Census of Drainage, authorized by an Act of Congress, we must obtain a few facts about the drainage of lands served by your irrigation project.

Will you kindly fill in the information requested at the right of this letter and return in the enclosed official envelope which requires no postage.

Your cooperation in furnishing this information will be greatly appreciated.

Sincerely yours

Robert W. Burgess

Robert W. Burgess
Director
Bureau of the Census

1. What organization(s) or person(s) is(are) responsible for the drainage of 500 or more acres of agricultural lands served by your irrigation project?

Name _____

Mail address _____

Name _____

Mail address _____

2. Did the need for this drainage arise solely because of irrigation?

- (Mark one.) { Yes, to control alkali or seepage from irrigation.
 No, drainage was to improve naturally wet lands.

3. Are 500 acres or more drained by constructed works?

- (Mark one.) { Yes (500 acres or more are drained).
 No (less than 500 are drained).

Remarks: _____

THE QUESTIONNAIRE

DRAINAGE OF AGRICULTURAL LANDS

UNITED STATES DEPARTMENT OF AGRICULTURE
Soil Conservation Service
Washington 25, D. C.

ADVISORY NOTICE W-1496

October 2, 1959

To: Work Unit Conservationists

From: D. A. Williams, Administrator

Re: RECORDS AND REPORTS - Information on Drainage Enterprises for the
1960 Census of Drainage

The Bureau of the Census has requested the assistance of the Soil Conservation Service in connection with the taking of the 1960 Census of Drainage. The 1960 Census of Drainage will include all drainage projects that benefit 500 acres or more of land for agriculture.

Under the proposed plans primary dependence of coverage will be the preparation in advance of the enumeration of a listing of the projects to be enumerated. As a starting point the Bureau of the Census expects to canvass all projects that were included in the last Census, that of 1950.

The Bureau of the Census is depending upon the Soil Conservation Service to provide a listing of drainage projects undertaken since 1950.

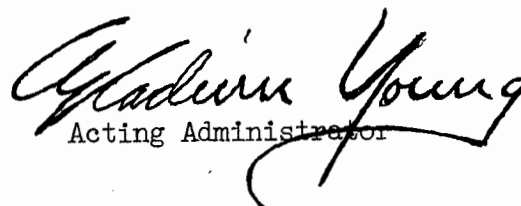
Will you kindly list in the spaces provided any projects in or partially in the county, or counties, served by your office. Include only projects that provide drainage benefits for approximately 500 or more acres of land for agriculture. Include only jobs completed or started since January 1, 1950. Include all projects--group, individual, and public--irrespective of whether they received technical assistance from SCS. Do not include projects where the need for drainage resulted solely because of irrigation.

In many cases you will be able to provide information on physical works, costs, and maps and you should so indicate in the appropriate boxes. Later, when the enumeration is under way, we would appreciate any help you might be able to give the Drainage Census enumerator.

Three copies of each list should be prepared. The original and one copy should be mailed to the state office and one copy retained in the files of the preparing office. The Bureau of Census has requested us to provide this information by November 9, 1959, so your list should reach the state office by November 2, 1959.

In those counties where no new drainage projects of 500 acres or more in size have been undertaken since 1950, the work unit conservationist should return the list to the state office showing the county names, and indicating the absence of new projects.

STC
WUC-3


Acting Administrator

UNITED STATES DEPARTMENT OF AGRICULTURE
SOIL CONSERVATION SERVICE
WASHINGTON, D.C.

LISTING OF DRAINAGE PROJECTS UNDERTAKEN SINCE 1950,
FOR USE OF THE BUREAU OF THE CENSUS

State _____

County _____

<input type="checkbox"/> No projects Name of project	Approximate acres benefited for agriculture	Project is a—			Name and address of person(s) to contact for information for (if two or more persons for one project, use a separate line for each person)	Physical works	Costs	Maps or Plats	Remarks
		Single farm project	Cooperative or mutual project	Legally organized project					
		<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>		<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
		<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>		<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
		<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>		<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
		<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>		<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
		<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>		<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
		<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>		<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
		<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>		<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
		<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>		<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
		<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>		<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
		<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>		<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
		<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>		<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
		<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>		<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
		<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>		<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
		<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>		<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
		<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>		<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
		<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>		<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
		<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>		<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
		<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>		<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
		<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>		<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
		<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>		<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	

If more space is required use the back of this form or a separate blank sheet. Use a check mark in boxes as appropriate.

The above information furnished by— Name _____ Title _____ Date _____, 19__.
Address _____ month day

DRAINAGE OF AGRICULTURAL LANDS

Form 60-02-65 (4-7-60)	U.S. DEPARTMENT OF COMMERCE Bureau of the Census	State
WORKSHEET FOR EDITING--CENSUS OF DRAINAGE: 1960		County

Planimeter measurements: (Map scale: _____) (Conversion: _____)	By	Date
--	----	------

Item	Reported	Planimeter				Acres
		1st	2d	3d	Mean	
1. 1950 Census (Area mapped in 1950)						
2. 1950 add (1950 area reported in 1960 and not mapped in 1950)						
3. 1950 out (1950 mapped area not included in 1960 Census)						
4. Added 1950-1959 (Area not mapped in 1950 and reported as added since 1-1-50)						
5. Total 1960 (1 + 2 - 3 + 4)						
6. Non-agricultural and nondrained						
7. Net agricultural (5-6)						
8. Agricultural areas served by 2 or more projects						

Remarks:

Work lines:	By	Date
-------------	----	------

D1 number	1950 add	1950 out	Added 1950-1959	Non-agri-cultural or non-drained	Agricultural areas served by 2 or more projects	Plani-meter ¹	Remarks
	(1)	(2)	(3)	(4)	(5)	(6)	
9. Total							

¹Post D1 question numbers for areas requiring measurement. Show planimeter measurements of indicated areas on back of sheet. Encircled figures represent adjustments needed for tables.