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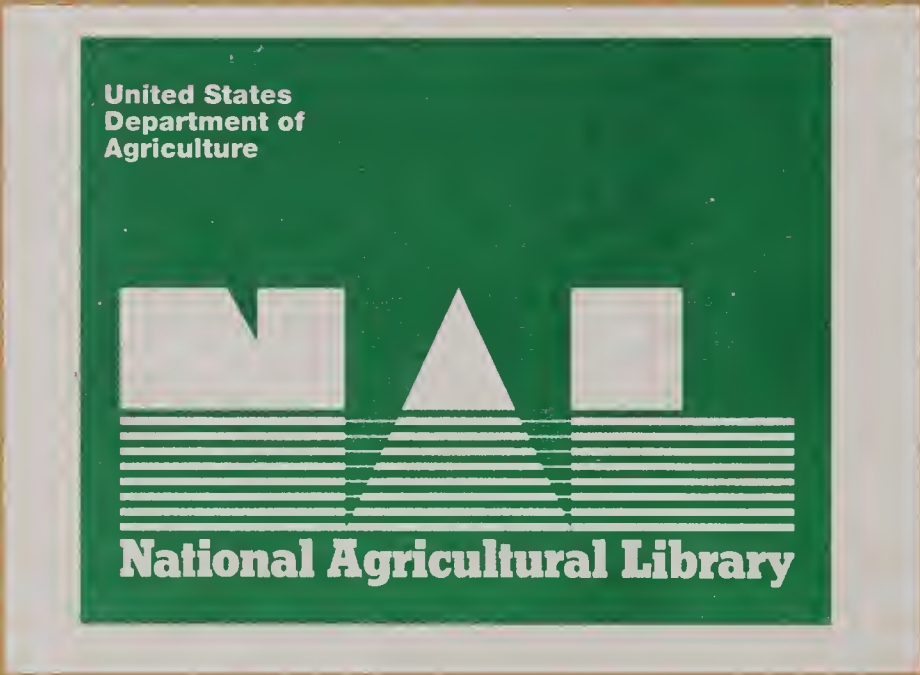


AGRICULTURAL LAND RESOURCES  
THEIR PRODUCTIVITY AND USE  
LOWER MISSISSIPPI REGION

*Jan. 1972*



SOUTHERN RESOURCE GROUP  
NATURAL RESOURCE ECONOMICS DIVISION  
ECONOMIC RESEARCH SERVICE  
U. S. DEPARTMENT OF AGRICULTURE



AGRICULTURAL LAND RESOURCES  
THEIR PRODUCTIVITY AND USE  
LOWER MISSISSIPPI REGION

Jan. 1972

Working Materials  
Prepared in This Form for Use  
by the  
Land Use and Management Subcommittee  
of the  
Lower Mississippi Region Comprehensive Study

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Southern Resource Group  
Natural Resource Economics Division  
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United States Department of Agriculture  
In Cooperation With Other Federal And State Agencies  
Jackson, Mississippi

January 1972



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UNITED STATES DEPARTMENT OF AGRICULTURE

SOIL CONSERVATION SERVICE

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P. O. Box 3319, Jackson, Mississippi 39207

February 8, 1972

Mr. Bruce Cox, Chairman  
Plan Formulation Committee  
Lower Mississippi Region Comprehensive Study  
Mississippi River Commission  
P. O. Box 80  
Vicksburg, Mississippi 39180

Dear Mr. Cox:

I am sending you five copies of a report "Agricultural Land Resources Their Productivity and Use Lower Mississippi Region" dated January 1972. This is the report prepared by the Economic Research Service which USDA personnel discussed with you at the Jackson airport Plan Formulation Committee meeting recently. I feel that this report will be useful in plan formulation purposes.

By copy of this letter I am sending members of my Land Use and Management Subcommittee listed below a copy of this report. I am also sending a copy to Mr. Ernest Boswell, USGS, for his use in evaluating resource capabilities, his present assignment on the Task Force.

Cordially yours,

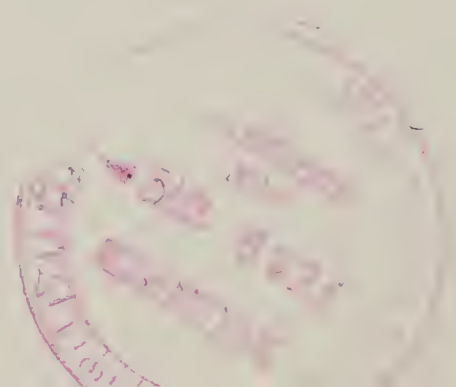


M. E. Cribbs, Chairman  
Land Use and Management Subcommittee

Attachments

cc: w/attachment  
H. R. Gardner, MRC  
Charles M. Schuler, BOR  
R. E. Eichhorn, BSF&W  
R. G. Andrews, Ark. Soil and Water Comm.  
Carl Hoover, USFS  
Roy W. Ryling, EPA  
James C. Webb, La. Dept. of Public Works  
Jack Pepper, Miss. Bd. of Water Comm.  
Ernest Boswell, USGS

FEB 9 1972  
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AGRICULTURAL LAND RESOURCES  
THEIR PRODUCTIVITY AND USE  
LOWER MISSISSIPPI REGION

INTRODUCTION

This report by the Economic Research Service of the United States Department of Agriculture is a contribution to the Land Use and Management Appendix of the Comprehensive Plan of Development that is being prepared for the Lower Mississippi Region. The Lower Mississippi Region Comprehensive Study is a part of the Water Resource Council program to develop plans for comprehensive water development and management for all major river basins in the United States. The purpose is to facilitate the coordinated and orderly conservation, development, utilization, and management of the basin's water and related land resources.

AGENCY REPORT PURPOSE

The agricultural land resource studies are accomplished under the guidance of the Land Use and Management Subcommittee. Although each Type I study element will be prepared and presented as a separate unit within the context of the entire study, many of the study elements are interrelated and dependent on each other to provide information and data for the various subcommittees. The exchange of information occurs between subcommittees, or perhaps, at times at the study element level.

The Economic Research Service in cooperation with the Soil Conservation Service developed a system of soil productivity groups for use in a least-cost linear programming analysis of food and fiber production in 1970, 1980, 2000, and 2020. These groups are combinations of soils that are sufficiently homogeneous to permit a reasonable degree of accuracy in estimating and projecting crop yields. They were also considered adequate for estimating selected 1970 crop production costs.

This report contains descriptions of the soil productivity groups in the Lower Mississippi Region and acreages of the soil groups by major use for each water resource planning area (Tables 1 to 11). The Lower Mississippi Region and Water Resource Planning Area's boundaries are shown in Plate 1. Estimated 1970 and projected 1980, 2000, and 2020 nonirrigated and irrigated yields of selected crops are presented in Tables 12 and 24. These yields assume a continuation of the historical rate of the adoption of new technology, better management, and other factors that have contributed to higher yields. Estimated 1970 and projected 1980, 2000, and 2020 yields of selected crops, assuming no resource development after 1970, are presented



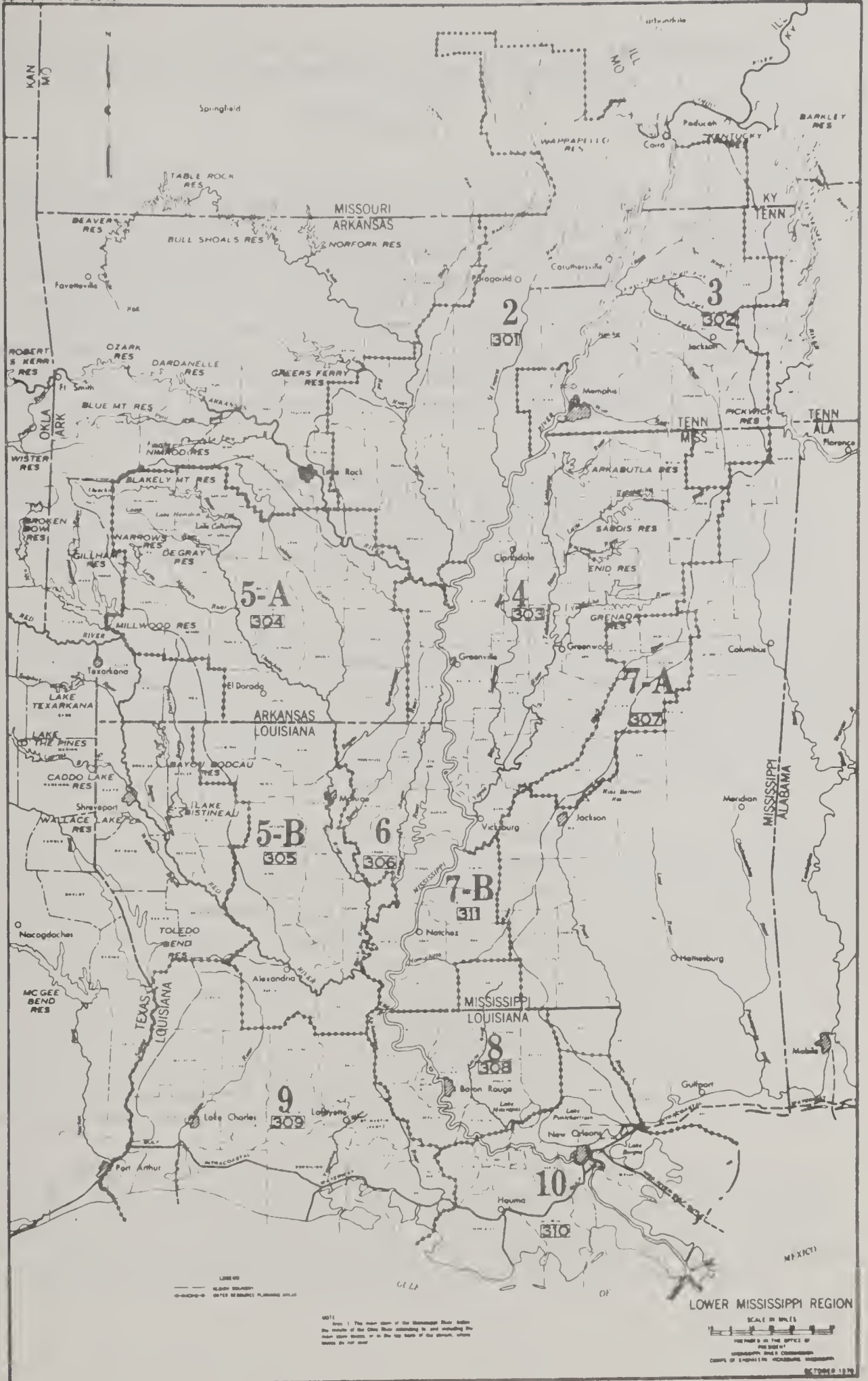


Plate 1





in Tables 25 to 34. In addition, this report contains selected crop budgets for the above soil productivity groups (Table 35).

## METHODOLOGY

Basic data used to formulate the soil productivity groups are from the 1967 Conservation Needs Inventory and the National Cooperative Soil Survey of the Soil Conservation Service. Land capability units presented in the Conservation Needs Inventory were listed and the one or more soil series from the National Cooperative Soil Survey occurring in each land capability unit was identified. Soil scientists of the Soil Conservation Service, using the soil series identification criteria, combined the land capability units into relatively homogeneous soil groups with respect to yield characteristics, responses to fertilizers, and management requirements.

For brevity, the land capability units placed in each soil productivity group are omitted from most of the soil group descriptions in this report. However, lists of land capability units in each group are available from the Jackson, Mississippi office of the Economic Research Service.

Nonirrigated yield data associated with the soil series descriptions in the National Cooperative Soil Survey were arrayed and the soil productivity groups checked for consistency. A simple average of the yields listed in a soil productivity group was used as the first estimate of the yield of a crop for a particular soil productivity group. These yields were then adjusted to 1970 by using trends in crop yields from Agricultural Census, Statistical Reporting Service, and Experiment Station data.

Each soil productivity group was then reexamined by soil scientists with respect to the soil group's probable use and potential for irrigation. The soil groups that are suitable for irrigation were identified and arrayed separately from those not suitable for irrigation. Available Experiment Station data on the response of crop yields to irrigation by soil type were associated with the soil groups. It was found that generally only cotton, corn, and soybeans are recommended for supplemental irrigation. Supplemental irrigation of corn is not recommended in all water resource planning areas. Rice is grown entirely under irrigation and was included in the first analysis of yields. Soil scientists and agronomists then assigned estimates of 1970 irrigated yields to the soil groups. These yields were checked for consistency and adopted for use.

Historical trends of selected crop yields for both water resource planning areas and states in the Lower Mississippi Region were developed from Agricultural Census and Statistical Reporting Service data. Indices of these trends were calculated, arrayed, and compared to indices developed from other Natural Resources Economics Division studies in the Lower



Mississippi Region. <sup>1/</sup> Indices developed for the unpublished National Interregional Analysis and Projections were added to the arrayed. From these comparisons the decision was made to use the trends developed from the "Current and Projected Crop Yields for Arkansas," USDA, ERS, NRED, November 1969. Yields, both nonirrigated and irrigated, for 1970 were then projected to 1980, 2000, and 2020. Cotton, sugarcane, and oats were projected, using an index as follows: 1970 = 100, 1980 = 117, 2000 = 135, and 2020 = 153. Soybeans, corn, wheat, rice, and grain sorghum were projected, using an index of: 1970 = 100, 1980 = 123, 2000 = 153, and 2020 = 187. These indices represent trends and imply a continuation of the historical rate of adoption of new technology, better management, resource development, and other relevant factors that have contributed to higher yields.

The above 1980, 2000, and 2020 yields were discounted to reflect the assumption of no further resource development after 1970 by soil scientists and agronomists of the Soil Conservation Service in cooperation with economists of the Economic Research Service. Personnel involved were cognizant that the adoption of resource development contributes to higher crop yields. However, little or no research data were available on which to base this yield situation. Therefore, the yields reflect the informed judgement, experience, and expertise of the personnel involved. Basically, the discounted yields for the future time frames do not include the beneficial effects of agricultural drainage, flood protection, and land treatment practices over and beyond that now afforded and reflected in the 1970 crop yields. However, the projected yields do imply that the 1970 level of resource development will be maintained.

Crop production cost data were compiled from published and unpublished reports of the Agricultural Experiment Stations and Universities serving the Lower Mississippi Region. Crop budgets contained in the reports differentiate production costs for most crops between one or more of the following soil textures: (1) Clay soil, (2) sandy and/or mixed soil, (3) sandy loam soil, (4) silt loam soil, and (5) clay loam soil. This necessitated grouping the more detailed soil productivity groups into cost groups. The dominant soil texture in each soil productivity group was identified by soil scientists and used to assign a soil group to a cost group.

The budget data compiled for the cost groups were then adjusted to 1970. Labor inputs were adjusted, using the Indices of Wage Rates for Hired Farm Labor in the Annual Summary of Agricultural Prices, Statistical Reporting Service, Washington, D. C. Nonlabor inputs were adjusted, using the Indices of Items for Production from the same source.

---

<sup>1/</sup> "Agriculture Land Resource Use and Yields for Arkansas," prepared by USDA, ERS, NRED, August 1965. "Input Data Used in White River Basin Agricultural Impact Study," prepared by USDA, ERS, NRED, June 1968. "Current and Projected Crop Yields for Arkansas," prepared by USDA, ERS, NRED, November 1969.



## LIMITATIONS

The system of soil productivity groups presented in this report is a generalized combination of land capability units from the Conservation Needs Inventory of the U.S. Department of Agriculture. Although agricultural land has many classifications, the land capability units used in the Conservation Needs Inventory were specifically designed to illustrate the type and degree of land problems. It is a practical classification based on limitations of the soils, the risk of damage when the soils are used, and the way in which they respond to treatment. This classification identifies soils at three levels, the capability class, subclass, and unit. The eight capability classes in the broadest groupings are numbered I through VIII. Class I includes soils that have few limitations, the widest range of use, and the least risk of damage from use. The soils in the other classes have progressively greater limitations. However, the land capability unit classification does not reflect the productivity of any soil.

Soil scientists can identify the one or more dominant soil series in each land capability unit and have estimated crop yields for most soil series in the National Cooperative Soil Survey. Thus, a first approximation of the crop yields for a soil productivity group can be obtained by associating the soil series crop yield data from the National Cooperative Soil Survey with the land capability units in a soil productivity group. However, historical data on crop yields from land capability units, soil series, and other known land classification systems are not available. Therefore, the current and projected yields used to reflect the productivity of the soil groups under all assumptions are based largely on informed judgement, experience, and expertise of the personnel involved. The soil productivity groups and yields reflect an average for a wide range of conditions or resource situations and do not recognize the restrictions on the manner in which enterprises may be combined on any farm unit.

The crop production cost data in each enterprise budget, used as a source, reflects a specific set of assumptions with respect to soil textures, yield levels, and production practices that might be expected with current levels of management and technology. Therefore, the crop production cost data associated with broad soil productivity groups are likely to be most useful in "making first approximations" when evaluating production opportunities. This does not negate the value of the budgets for planning because they contain some of the basic data that allows a systematic framework to be used in evaluating alternative uses of farm resources.

Thus, the soil groups, yields, and cost data should not be interpreted as specific figures for future years. They should be utilized as the relative magnitudes, directions, and patterns that may be expected to prevail, subject to assumptions of the study. Further, carrying estimates in the individual cells of the various tables to units was done merely for mathematical convenience in balancing the tables and does not imply that degree of accuracy.



## SOIL PRODUCTIVITY GROUPS

A soil productivity group consists of two or more land capability units that have similar yield characteristics, responses to fertilizers, and management requirements. The soils included in a soil productivity group may occur in one or more land resource area (LRA) and are sufficiently homogeneous to permit a reasonable degree of accuracy in estimating and projecting crop yields.

The soil productivity groups were developed separately, but with a consistent procedure in each of the six states in the study area. Although some soils occur in more than one state, differences in the soil identification systems employed by the states necessitated unique productivity groups for the soils in each state. Further, the soil productivity groups in Water Resource Planning Area 4 in Mississippi were renumbered to create a geographic separation of the soils to provide a means of using a set of six-row crop budgets in Water Resource Planning Area 4 and a set of four-row crop budgets in the remainder of Mississippi. Selected soil productivity groups were also renumbered in Louisiana to allow for different yield responses from irrigation in northern and southern Louisiana.

Descriptions of the soil productivity groups, by state, follow:

### Soil Productivity Groups for Arkansas

#### Soil Productivity Group No. 1

LRA's 118 and 119. Mainly Capability Class I, II, and III; soil group 67. Deep, well drained soils. Friable fine sandy loam over moderately permeable silty clay loam or sandy clay loam subsoils. Some areas are gravelly. Moderate available moisture capacity. Slopes up to 8 percent. Slight to severe erosion hazard. Major soils are Hartsells, Leadvale, Linker, and Pickwick.

#### Soil Productivity Group No. 2

LRA's 118 and 119. Capability Class I, II, III; mainly soil groups 89, 9vd, 9c, and 15x. Mostly deep, well drained bottomland soils. Friable sandy loam or silt loam over moderately permeable crumbly, sandy clay loam or silty clay loam subsoils with moderately high available moisture capacity. Subject to slight or moderate overflow damage. (Also contains small areas of stony bottomland soils with the above characteristics and small areas of loamy sand bottomland soils.) Slopes up to 8 percent. Major soils are Bruno, Caspiana, Cleora, Congaree, Dubbs, Morganfield, and State.





### Soil Productivity Group No. 3

LRA's 118 and 119. Chiefly Capability Class III and IV; soil groups 2, 5, and 20. Deep, moderately well drained soils; friable grayish fine sandy loam to clay over clay subsoil with low available moisture capacity, and shallow, rapidly permeable, well to excessively drained sandy loam or silt loam soils. Some areas are gravelly. Low water holding capacity. Moderate to severe erosion hazard. Principally Enders, Georgeville, Goldston, Hector, Montevallo, and Mountainburg soils.

### Soil Productivity Group No. 4

LRA's 118 and 119. Capability Class II, III, and IV. Mainly soil groups 5a1, 5aL, 6a1, 65a, and 65a1. Deep, poorly, to somewhat poorly drained silt loam to fine sandy loam over slowly, to very slowly permeable dense, compact silty or clayey subsoil with moderate available moisture capacity. Commonly have a seasonal water table at or near the surface. Major soils are Gunthrie, Falkner, and Taft.

### Soil Productivity Group No. 5

LRA's 118 and 119. Capability Class II, III, and V. Soil groups 8a, 8a1, 89, 9c, and 33. Bottomland soils subject to moderate to very severe overflow or needing drainage before regular use for row crops. Deep, well drained to poorly drained soil with moderate to low water holding capacity. Mostly sandy loam or silt loam over moderately to slowly permeable sandy clay loam or silty clay loam subsoils. Some areas are gravelly or stony. May have seasonal high water table. Major soils are Chewacla, Cleora, Congaree, Gunthrie, State, and Wehadkee.

### Soil Productivity Group No. 6

LRA's 118 and 119. Capability Class III, IV, VI, and VII. Soil groups 67 and 67c. Slopes from 3 to more than 20 percent. Deep, well drained soils with moderate water holding capacity. Friable sandy loam over moderately permeable sandy clay loam or silty clay loam subsoil. Most areas are gravelly or stony and moderate to very severe erosion hazard. Principally Allen, Hartsells, Holston, and Linker soils.

### Soil Productivity Group No. 7

LRA's 118 and 119. Capability Class VI and VII. Soil groups 5 and 5c. Slopes from 3 percent to more than 20 percent. Deep, moderately well drained soils with low available moisture capacity. Friable, mostly stony, sandy loam or silt loam over very slowly permeable clay subsoil. Severe to very severe erosion hazard. Principally Enders and Georgeville soils.



### Soil Productivity Group No. 8

LRA's 118 and 119. Capability Class VI and VII. Soil groups 20, 24, 27, 20c, and 25c. Slopes from 3 percent to more than 20 percent. Shallow to very shallow, well to excessively drained sandy loam or silt loam soils. Stony, gravelly, or rocky. Low water holding capacity. Severe erosion hazard and droughty. Generally too rough for use of farm machinery. Major soils are Goldston, Hector, Montevallo, and Mountainburg.

### Soil Productivity Group No. 9

LRA 118. Capability Class II, III, and V. Soil groups 3a, 4a1, and 4. Deep, poorly drained to moderately well drained soils in the Arkansas River bottomlands. Gray to dark red clay or silty clay. Moderate available water capacity. Locally moderate to severe overflow hazard. Slopes chiefly less than 1 percent, ranging up to 3 percent. Principal soils are Moreland, Perry, Portland, and Sharkey.

### Soil Productivity Group No. 10

LRA's 132 and 134. Capability Class II, III, and IV. Soil groups 5, 65, and M56. Deep, moderately well drained and somewhat poorly drained soils. Silt loam over very slowly permeable clay subsoil. Slow to medium runoff. Moderate available moisture capacity. Moderately erosive. Mostly Hillemann and Stuttgart soils on gentle slopes.

### Soil Productivity Group No. 11

LRA's 132 and 134. Capability Class I, II, III, and IV. Mostly soil groups 67, 6p, and 67L. Deep, moderately well drained and well drained loess soils. Brown silt loam over moderately permeable to slowly permeable silty clay loam subsoil. Some have a pan layer in the subsoil. Moderate available moisture capacity. Very erosive soils. Slopes 0 to 12 percent. Major soils are Grenada, Loring, and Memphis.

### Soil Productivity Group No. 12

LRA 134. Capability Class VI and VII. Soil groups 67L and 7vd. Deep, well drained loess soils. Brown silt loam over moderately permeable, crumbly, silty clay loam subsoil. Some areas are gravelly. Moderate available moisture capacity. Very erosive soils. Slopes 12 to more than 20 percent. Major soils are Brandon, Loring, and Memphis.



### Soil Productivity Group No. 13

LRA's 132 and 134. Capability Class I and II. Soil Group 89. Deep, well drained bottomland soils. Friable silt loam surface over moderately permeable, crumbly, silt loam subsoil. Moderately high available moisture capacity. Slight to moderate overflow hazard. Slopes 0 to 3 percent. Mostly Collins soils.

### Soil Productivity Group No. 14

LRA's 132 and 134. Capability Class II, III, and IV. Soil groups 1a, 5a1, 5a1L, 5aL, 6a1, 6a1L, and 65a. Deep, somewhat poorly, and poorly drained soils. Grayish friable silt loam over grayish, slowly permeable, compact silty clay loam or silty clay subsoil. Moderate available moisture capacity. Seasonal water table near surface. Principal soils are Calhoun, Calloway, Crowley, and Henry.

### Soil Productivity Group No. 15

LRA's 132 and 134. Capability Class II, III, and Vw. Soil groups 3a, 8a, 8a1, L8a, and 89. Deep, poorly drained or overflowed bottomland. Gray loams and clays over gray mottled silt loam, silty clay loam to clay subsoil. Seasonal high water table. Slight to severe overflow hazard. Principal soils are Arkabutta, Tichnor, Waverly, and Zachary.

### Soil Productivity Group No. 16

LRA 131. Capability Class I, II, and III. Soil groups 4 and 89. Deep, moderately well drained and well drained bottomland soils. Crumbly clay to silty clay loam and friable loam over slowly to moderately permeable clay, sandy clay loam, silty clay loam, or loam subsoil. Moderate to moderately high available moisture capacity. Slight overflow hazard; slight erosion hazard. Slopes 0 to 8 percent. Principal soils are Bosket, Caspiana, Coushatta, Dubbs, Dundee, Moreland, and Rilla.

### Soil Productivity Group No. 17

LRA 131. Capability Class II, III, and V. Soil groups 3, 3a, 3z, and 4a1. Deep, poorly to somewhat poorly drained bottomland soils. Mostly gray or mottled clay to silty clay, locally over stratified sandy subsoil. Moderately high available moisture capacity. Seasonal high water table. Slight to severe overflow hazard. Principal soils are Alligator, Bowdre, Earls, Newellton, Perry, Portland, Sharkey, and Tunica.



### Soil Productivity Group No. 18

LRA 131. Capability Class II, III, and V. Soil groups 8a, 8al, L8a, L8al, 14a, and 89. Deep, poorly drained bottomland soils. Gray loams over moderately permeable, crumbly, sandy clay loam or silty clay loam subsoil. Moderately high available moisture capacity. Subject to moderate to severe overflow and high seasonal water table. Principal soils are Amagon, Caspiana, Commerce, Coushatta, Dubbs, Forestdale, Herbert, Mhoun, Rilla, and Robinsonville.

### Soil Productivity Group No. 19

LRA 131. Capability Class III. Soil group 15x. Deep, excessively drained bottomland soil. Rapidly permeable, loose, loamy sand. Low available moisture capacity. Some areas subject to overflow. Slope 0 to 3 percent. Mostly Bruno and Crevasse soils.

### Soil Productivity Group No. 20

Same as Group 11.

### Soil Productivity Group No. 21

Same as Group 14.

### Soil Productivity Group No. 22

LRA's 133 and 86. Capability Class I, II, III, and IV. Soil groups 67, 6P, and 7vd. Deep, moderately well and well drained soils. Friable loam over moderately to slowly permeable silty clay loam or sandy clay loam subsoil. Some are gravelly and some have a pan layer in the subsoil. Moderate available moisture capacity. Moderate erosion hazard. Slopes up to 12 percent. Major soils are Cahaba, Leadvale, Norfolk, Ora, Ruston, and Saffell.

### Soil Productivity Group No. 23

LRA 133. Capability Class II, III, and IV. Soil groups 1, 2, M56, 5, and 20. Deep, moderately well and excessively drained soils. Sandy loam, clay loam, or silty clay over plastic clays; includes a few areas of shallow, excessively drained sandy soils. Low to moderate available moisture capacity. Moderate to severe erosion hazard. Slopes 1 to 12 percent. Major soils are Boswell, Kirvin, Sacul, Susquehanna, and Wilcox.





#### Soil Productivity Group No. 24

LRA's 133 and 86. Capability Class I, II, and III. Soil group 89. Deep, well drained bottomland soil (includes part of Red River Bottomland). Friable loams over moderately permeable, crumbly, sandy clay loam or silty clay loam subsoil. Moderately high available moisture capacity. Slight erosion hazard; slight overflow hazard. Slopes 0 to 3 percent. Mostly Caspiana, Coushatta, Iuka, Joyce, Ochlockonee, and Rilla.

#### Soil Productivity Group No. 25

LRA's 133 and 86. Capability Class II, III, and IV. Soil groups 2a1, 6a1, 65a, and 65a1. Deep, somewhat poorly to poorly drained soils. Grayish loam over slowly permeable, compact silty clay loam or silty clay subsoil. Some areas have silty clay surface. Moderate available moisture capacity. May have seasonal water table at or near the surface. Slopes 1 to 3 percent. Principal soils are Amy, Caddo, Mashulaville, Myatt, Pheba, Stough, and Weston.

#### Soil Productivity Group No. 26

LRA's 133 and 86. Capability Class II, III, and V. Soil groups 3a, 4, 4a1, 8a, 8a1, 15x, and 89. Deep, poorly drained to well drained bottomland soils (includes part of Red River Bottomland). Friable loam or clay loam over moderately to slowly permeable sandy clay loam, silty clay loam or clayey subsoils. Moderately high available moisture capacity. Seasonal high water table. Slight to severe overflow. Slopes 0 to 3 percent. Major soils are Bibb, Bruno, Catalpa, Coushatta, Houlka, Iuka, Joyce, Kaufman, Latanier, Mantachie, Miller, Moreland, Ochlockonee, Perry, Smackover, and Una.

#### Soil Productivity Group No. 27

LRA 133. Capability Class II, III, and IV. Soil groups 12 and 13. Deep, well drained to excessively drained loamy sands over loamy sand, sandy loam, or sandy clay loam subsoils. Moderate to low available moisture capacity. Moderate to severe erosion hazard. Slopes up to 12 percent. Principal soils are Alaga and Ruston.

#### Soil Productivity Group No. 28

LRA 86. Capability Class II and III. Soil groups 1, 1a, 2, 5, and 17. Deep and shallow, moderately well drained, and poorly drained soils. Silt loam to clay over clay subsoil, and shallow clay over chalk or marl. Moderate available moisture capacity. Severe erosion hazard. Slopes 1 to 8 percent. Major soils are Houston, Hunt, Mayhew, and Sumter.



### Soil Productivity Group No. 29

LRA's 133 and 86. Capability Class IV, VI, and VII. Soil groups mainly 1, 5, 6p, 67, 7vd, 12, 13, 17, 24, and 27. Deep and shallow, moderately well drained, and well drained very slowly permeable to rapidly permeable soils. Surfaces range from clay through silt loam, fine sandy loam, gravelly fine sandy loam to loamy sand. Subsoils range from clay through sandy clay loam, gravelly sandy clay loam, fine sandy loam to loamy sand. Moderate to low available moisture capacity. Severe erosion hazard. Slopes 8 to more than 20 percent. Major soils are Alaga, Boswell, Cahaba, Houston, Hunt, Kirwin, Ora, Saffree, Socul, and Sumter.

### Soil Productivity Groups for Kentucky

### Soil Productivity Group No. 30

These soils are well suited to all commonly grown crops. They can be continuously cropped by following good conservation practices. The addition of crop residue helps reduce crusting and packing. Row arrangement is needed to remove excess surface water. Applications of recommended fertilizers are needed for high yields. These soils are subject to overflow for short periods. Major soils are Collins, Commerce, Robinsonville, and Vicksburg.

### Soil Productivity Group No. 31

These soils are well suited to all commonly grown crops. They can be continuously cropped by following good conservation practices. The addition of crop residue helps prevent crusting and packing and reduces erosion. Runoff is slow to medium and erosion is a hazard. Row arrangement and surface field ditches are needed in some areas to remove excess surface water. Applications of recommended fertilizers are needed for high yields. Major soils are Beulah, Bosket, Dubbs, Loring, and Memphis.

### Soil Productivity Group No. 32

These soils are suited for all commonly grown crops. They can be continuously cropped by following good conservation practices. The addition of crop residue helps prevent crusting and packing. Row arrangement and surface field ditches are needed to remove excess surface water. Some of these soils have a fragipan or clayey layer that restricts the movement of water, air, and plant roots. Applications of recommended fertilizers are needed for high yields. Major soils are Dundee, Falaya, Grenada, Patton, and Wakeland.



### Soil Productivity Group No. 33

These soils are suited to most commonly grown crops. Runoff is slow to medium and erosion is a hazard due to slope. Cultivated crops that produce large amounts of residue should be grown to help prevent crusting and packing and reduce erosion. Cultivated crops can be grown continuously if adequate conservation practices, such as terracing, contour farming, or strip cropping are used. Applications of recommended fertilizers are needed for moderate yields. Major soils are Brandon, Grenada, Lax, Lexington, Loring, Memphis, and Providence.

### Soil Productivity Group No. 34

These soils are suited or poorly suited to most commonly grown crops. Runoff is medium to rapid and erosion is a severe hazard. Because of the severe erosion hazard these soils should be in permanent cover most of the time. Cultivated crops can be grown about one-fourth of the time by using adequate cropping systems. Applications of recommended fertilizers are needed for moderate yields. Major soils are Grenada and Loring.

### Soil Productivity Group No. 35

These soils are suited to most commonly grown crops, but they are best suited to crops such as corn and soybeans. They can be continuously cropped by following conservation practices. Row arrangement and field ditches are needed to remove excess surface water. These soils have seasonally high water tables that restrict root growth. Applications of recommended fertilizers are needed for moderate yields. Major soils are Calloway, Forestdale, Sharkey, Tunica, and Waverly.

### Soil Productivity Group No. 36

These soils are suited or poorly suited to commonly grown crops. The addition of crop residue helps prevent crusting and packing. Row arrangement and field ditches are needed to remove excess water. They have a seasonally high water table at or near the surface most of the time. Applications of recommended fertilizers are needed for low to moderate yields. Major soil is Henry.

### Soil Productivity Group No. 37

These soils are well suited for permanent pasture or trees. Major soils are Brandon, Crevasse, Lexington, Loring, and Memphis.

### Soil Productivity Group No. 38

These soils should be in trees. On site investigation is needed to determine recommended species of trees. These soils are mostly in gullied areas.



## Soil Productivity Groups for Louisiana

### Soil Productivity Group No. 39

These are nearly level to very gently sloping loamy soils of high fertility. They are easy to work and crop roots penetrate easily. Plow pans form easily. These soils supply adequate moisture to crops in most years. They are adapted to a wide variety of field crops and pasture plants. Most crops respond well to nitrogen and possibly to other fertilizers. Land leveling, proper row direction, and contour farming will improve surface drainage, reduce erosion, and increase the efficiency of farm equipment. Variable depth plowing or chiseling will help eliminate plow pans. Major soils are Commerce and Cypremort.

### Soil Productivity Group No. 40

These are nearly level to very gently sloping loamy soils of moderate fertility that may be subject to an occasional flooding. They are easy to work and crop roots penetrate easily. Plow pans form easily. These soils supply adequate moisture to crops in most years. They are adapted to a wide variety of field crops and pasture plants. Most crops respond well to fertilizers. Lime is generally needed. Land leveling, proper row direction and contour farming will improve surface drainage, reduce erosion, and increase the efficiency of farm equipment. Variable depth plowing or chiseling will help eliminate plow pans. Major soils are Collins and Gallion.

### Soil Productivity Group No. 41

These are nearly level to very gently sloping loamy soils of moderate fertility. They are easy to work and crop roots penetrate easily. Surface crusting is a problem. Crops suffer from lack of moisture during some dry periods. These soils are adapted to a fairly wide variety of field crops and pasture plants. Most crops respond well to fertilizers. Lime may be needed. Land leveling, proper row direction and contour farming will reduce erosion and increase the efficiency of farm equipment. Major soils are Loring and Memphis.

### Soil Productivity Group No. 42

These are loamy soils of moderate to high fertility on level and short irregular slopes in a ridge and swale pattern. They are somewhat difficult to work but crop roots penetrate easily. These soils supply adequate moisture for crops in most years. They are adapted to a wide variety of field crops and pasture plants. Most crops respond well to nitrogen and possibly other fertilizers. Drainage of swales is generally needed. Land leveling will improve drainage and increase the efficiency of farm equipment but may require a large yardage of earth to be moved. Major soils are Commerce and Rilla.





### Soil Productivity Group No. 43

These are nearly level loamy soils of moderate fertility. They are fairly easy to work and crop roots penetrate fairly easy. These soils supply adequate moisture to crops in most years. They are adapted to a wide variety of field crops and pasture plants. Most crops respond well to fertilizers. Drainage is generally needed. Land leveling will improve drainage and increase the efficiency of farm equipment. Variable depth plowing or chiseling will help eliminate plow pans. Major soils are Dundee, Falaya, Herbert, Jeanerette, and Mhoon.

### Soil Productivity Group No. 44

These are nearly level to very gently sloping loamy soils of low fertility. They are fairly easy to work and crop roots penetrate easily. Surface crusting may be a problem. Crops suffer from lack of moisture during some dry periods. These soils are adapted to a fairly wide variety of field crops and pasture plants. Most crops respond well to fertilizers. Lime is generally needed. Contour farming, proper row direction, and terracing will improve drainage and increase the efficiency of farm equipment. Major soils are Cahaba, Calloway, Olivier, Providence, and Ruston.

### Soil Productivity Group No. 45

These are loamy and clayey soils of moderate to high fertility. These soils may be level or in ridge and swale patterns. They are difficult to work due to short irregular slopes and variable textures. Crop roots do not penetrate easily and crops suffer from lack of moisture during some dry periods. These soils are adapted to a somewhat limited number of field crops and pasture plants. Most crops respond well to fertilizers. Lime may be needed. Drainage of swales is needed. Land leveling will improve drainage and increase the efficiency of farm equipment. Major soils are Baldwin, Dundee-Alligator complexes, Iberia, Mhoon, Perry, Sharkey, and Waverly.

### Soil Productivity Group No. 46

These are gently sloping clayey soils of moderate to high fertility. Soil may have silty surfaces. They are somewhat difficult to work, crop roots do not penetrate easily and crops suffer from a lack of moisture during some dry periods. These soils are adapted to a fairly wide variety of field crops and pasture plants. Most crops respond well to nitrogen and possibly other fertilizers. Contour farming or proper row direction may be needed to control runoff and help reduce erosion. Major soil is Sharkey.



#### Soil Productivity Group No. 47

These are level loamy and clayey soils with some silty surfaces. Most of these soils are fairly easy to work and generally crop roots penetrate easily. Surface crusting may be a problem. These soils are generally slow to dry out in the spring and crops suffer from lack of moisture in some dry periods. These soils are adapted to a fairly wide variety of field crops and pasture plants. Most crops respond fairly well to fertilizers. Lime may be needed. Drainage is needed. Land leveling and proper row direction will improve drainage and increase the efficiency of farm equipment. Major soils are Caddo, Crowley, Harris, Leaf, Midland, Myatt, and Wrightsville.

#### Soil Productivity Group No. 48

These are gently sloping to strongly sloping loamy soils of low fertility. They are easy to work and crop roots penetrate easily. Slope may interfere with equipment operations. Crops suffer from lack of moisture during some dry periods. These soils are adapted to a wide variety of field crops and pasture plants. Most crops respond well to fertilizers. Lime is generally needed. Contour farming, strip cropping, and terracing are needed to control runoff and help reduce erosion. Major soils are Lexington and Loring.

#### Soil Productivity Group No. 49

These are nearly level to moderately sloping loamy, clayey and gravelly soils of low fertility. They are generally fairly easy to work except for the very gravelly soils which are somewhat difficult to work. Crops suffer from lack of moisture during dry periods in most years. These soils are adapted to a fairly wide variety of field crops and pasture plants. Most crops respond fairly well to fertilizers. Lime is generally needed. Contour farming, strip cropping, or terracing are needed to control runoff and help reduce erosion. Major soils are Beauregard, Crowley, Cuthbert, Deerford, Kirvin, Ruston, Sawyer, Shubuta, and Summerfield.

#### Soil Productivity Group No. 50

These are level to moderately sloping clayey soils of low fertility with some silty surfaces. They are difficult to easy to work. Crop roots do not penetrate easily. Crops suffer from lack of moisture during dry periods. These soils are adapted to a somewhat limited number of field crops and pasture plants. Crop response to fertilizer is poor. Contour farming, and possibly strip cropping will help control runoff and reduce erosion. Major soils are Morse, Nacogdoches, and Sumter.



### Soil Productivity Group No. 51

These are gently to moderately sloping sandy soils of low fertility. They are easy to work when moist but equipment traction is poor when dry. Crop roots penetrate easily. Crops suffer from lack of moisture in most years. These soils are adapted to a limited number of field crops and pasture plants. Most crops respond poor to fairly well to fertilizers. Lime is generally needed. Contour farming and possibly strip cropping is needed to control runoff and help reduce erosion. Major soils are Alaga, Bienville, Eustis, and Luverne.

### Soil Productivity Group No. 52

These are nearly level loamy, sandy, and silty soils of low to moderate fertility. (Some freshwater marsh, peat, and muck soils under pumpoff drainage that are subject to continuous subsidence are included.) They are generally difficult to work. Crop roots generally penetrate easily, but are restricted in some cases. Crops suffer from a lack of moisture in most years. These soils are adapted to a limited number of field crops and pasture plants. Most crops respond somewhat poorly to fertilizers. Proper row direction, drainage, or contour farming may be needed. Major soils are Bonn, Crevasse, Harris, Lafe, Palm Beach, and Verdun.

### Soil Productivity Group No. 53

These are nearly level loamy, wet loamy, and wet clayey soils of low to moderate fertility. The flooding hazard precludes their use for cropland in most years. A limited to very limited number of pasture plants are adapted. Plants respond poor to well to fertilizers. Lime is generally needed. Grazing may be restricted during wet seasons of the year.

### Soil Productivity Group No. 54

These are strongly sloping or severely eroded soils of low fertility with loamy surfaces and clayey or loamy subsoils. Slope or degree of erosion precludes the use of these soils for cropland. Plants suffer from lack of moisture during dry periods in most years. These soils are adapted to a fairly wide variety of pasture plants. Plants respond fairly well to fertilizers. Lime may be needed. Gully stabilization and land smoothing may be necessary before seed beds can be prepared.

### Soil Productivity Group No. 55

These are strongly sloping or severely eroded sandy and clayey soils of low fertility. Slope or degree of erosion precludes the use of these soils for cropland. Plants suffer from lack of moisture in most years and adequate stands are difficult to establish on the sandy soils. These soils are adapted to a limited number of pasture plants. Plants give poor response to fertilizers. Gully stabilization and land smoothing may be necessary before seed beds can be prepared.



### Soil Productivity Group No. 56

These are level wet clayey soils and nearly level to gently sloping, alkaline soils of moderate to high fertility that are subject to flooding. The flooding hazard precludes the use of these soils for cropland in most years. A very limited number of pasture plants are adapted. Grazing is restricted during flooding periods and wet seasons of the year.

### Soil Productivity Group No. 57

Level clayey soils of moderate to high fertility that are subject to flooding. These soils are difficult to work and crop roots do not penetrate easily. Crops suffer from lack of moisture during some dry periods. The flooding hazard restricts field crops and pasture plant adaptation. Most crops respond fairly well to nitrogen and possibly other fertilizers. Lime may be needed. Drainage is needed.

### Soil Productivity Group No. 58

These are mineral and organic soils in swamp and marshland areas. The permanently high water table precludes the use of these soils for cropland or pasture. Their use without major reclamation is restricted to limited livestock range, wildlife habitat, woodland, recreation or aesthetic purposes.

## Soil Productivity Groups for Mississippi

### Soil Productivity Group No. 59

These soils are well suited to all commonly grown crops. They can be continuously cropped by following good conservation practices. The addition of crop residue helps reduce crusting and packing. Row arrangement is needed to remove excess surface water. Applications of recommended fertilizers are needed for high yields. These soils are subject to overflow for short periods. Major soils are Adler, Bosket, Collins, Commerce, Robinsonville, and Vicksburg.

### Soil Productivity Group No. 60

These soils are well suited to all commonly grown crops. They can be continuously cropped by following good conservation practices. The addition of crop residue helps reduce crusting and packing. Row arrangement is needed on some of these soils to remove excess surface water. Application of recommended fertilizers are needed for high yields. Major soils are Atwood, Dubbs, Leverett, Loring, Lucedale, and Memphis.





### Soil Productivity Group No. 61

These soils are well suited to all commonly grown crops. They can be continuously cropped by following good conservation practices. The addition of crop residue helps prevent crusting and packing and reduces erosion. Runoff is slow to medium and erosion is a hazard. Row arrangement and surface field ditches are needed in some areas to remove excess surface water. Applications of recommended fertilizers are needed for high yields. Major soils are Atwood, Bosket, Cahaba, Dubbs, Dundee, Lexington, Loring, Lucedale, Luverne, Memphis, and Sweatman.

### Soil Productivity Group No. 62

These soils are suited to all commonly grown crops. They can be continuously cropped by following good conservation practices. The addition of crop residue helps prevent crusting and packing and reduces erosion. Runoff is slow to medium and erosion is a slight hazard. Some of these soils have a fragipan or clayey layer that restricts movement of water and air. These soils require adequate fertilization for high yields. Major soils are Grenada, Leverett, Ora, Prentiss, Providence, Tippah, and Savannah.

### Soil Productivity Group No. 63

These soils are suited for all commonly grown crops. They can be continuously cropped by following good conservation practices. The addition of crop residue helps prevent crusting and packing. Row arrangement and surface field ditches are needed to remove excess surface water. Some of these soils have a fragipan that restricts the movement of water, air, and plant roots. Applications of recommended fertilizers are needed for high yields. Major soils are Grenada, Ora, Prentiss, and Savannah.

### Soil Productivity Group No. 64

These soils are suited to all commonly grown crops. They can be continuously cropped by following good conservation practices. The addition of crop residue helps prevent crusting and packing. Row arrangements and surface field ditches are needed to remove excess surface water. In some areas stands are difficult to establish and cultivation is difficult due to the texture of the surface layer. These soils flood occasionally and/or have a seasonally high water table which cause slight or moderate crop damage. Applications of recommended fertilizers are needed for high yields. Major soils are Ark, Collins, Commerce, Falaya, Iuka, Mantachie, Marietta, and Souva.



### Soil Productivity Group No. 65

These soils are well suited to most commonly grown crops. They can be continuously cropped by following good conservation practices. The addition of crop residue helps prevent clodding and packing. Runoff is slow and row arrangement and/or field ditches are needed to remove excess surface water. These soils flood unless protected, causing moderate crop damage. Stands may be difficult to establish due to the fine texture of the surface layer. Applications of recommended fertilizers are needed for moderate yields. Major soils are Catalpa, Houlka, and Kaufman.

### Soil Productivity Group No. 66

These soils are suited to all commonly grown crops. They can be continuously cropped by following good conservation practices. These soils are somewhat droughty and should be fertilized in lighter, more frequent applications. Applications of recommended fertilizers are needed for high yields. Major soil is Beulah.

### Soil Productivity Group No. 67

These soils are suited to most commonly grown crops. Runoff is slow to medium and erosion is a hazard due to slope. Cultivated crops that produce large amounts of residue should be grown to help prevent crusting and packing and reduce erosion. Cultivated crops can be grown continuously if adequate conservation practices, such as terracing, contour farming, or strip cropping are used. Applications of recommended fertilizers are needed for moderate yields. Major soils are Atwood, Bosket, Cahaba, Dubbs, Dundee, Falkner, Grenada, Lexington, Loring, Lucedale, Luverne, Memphis, Nacogdoches, Ora, Providence, Ruston, Savannah, Shubuta, and Tippah.

### Soil Productivity Group No. 68

These soils are suited to most commonly grown crops. Runoff is slow to medium and erosion is a hazard due to slope. The addition of crop residue helps reduce crusting, packing, and erosion. These soils need to be in close growing crops about 2 years out of 3. Cultivated crops can be grown by using adequate cropping systems for erosion control. Applications of recommended fertilizers are needed for moderate to high yields. Major soils are Angie, Boswell, and Wilcox.



### Soil Productivity Group No. 69

These soils are suited to most commonly grown crops. They can be continuously cropped by following good conservation practices. The addition of crop residue helps prevent crusting and packing. Row arrangement and surface field ditches are needed to remove excess surface water. Seasonally high water tables and short periods of flooding delay cultivation in the spring, restrict root growth, and cause moderate crop damage. Some of these soils can only be worked over a narrow range of moisture content due to texture. The fine texture of the surface layer of some of these soils also causes difficulty in establishing stands. Applications of recommended fertilizers are needed for moderate yields. Major soils are Ark, Bowdre, Falkner, Forestdale, Sharkey, Souva, Vaiden, and Verona.

### Soil Productivity Group No. 70

These soils are suited to most commonly grown crops, but they are best suited to crops such as corn and soybeans. They can be continuously cropped by following good conservation practices. Row arrangement and field ditches are needed to remove excess surface water. These soils have seasonally high water tables that restrict root growth. Application of recommended fertilizers are needed for moderate yields. Major soils are Bude, Calloway, Pheba, and Stough.

### Soil Productivity Group No. 71

These soils are best suited to crops such as corn, soybeans, and truck crops. They can be continuously cropped by following good conservation practices. The addition of crop residue helps prevent crusting and packing. Row arrangement and field ditches are needed to remove excess surface water. These soils have seasonally high water tables that restrict root growth. Applications of recommended fertilizers will produce high yields of truck crops and moderate yields of other crops. Major soils are Bibb and Johnston.

### Soil Productivity Group No. 72

These soils are suited to most commonly grown crops. They can be continuously cropped by following good conservation practices. The addition of crop residue helps prevent crusting and packing. Row arrangement and surface field ditches are needed to remove excess surface water. These soils flood for short periods, causing moderate crop damage. Application of recommended fertilizers are needed for moderately high yields. Major soil is Waverly.



### Soil Productivity Group No. 73

These soils are suited or poorly suited to most commonly grown crops. Runoff is medium to rapid and erosion is a severe hazard. Because of the severe erosion hazard these soils should be in permanent cover most of the time. Cultivated crops can be grown about one-fourth of the time by using adequate cropping systems. Applications of recommended fertilizers are needed for moderate yields. Major soils are Atwood, Cahaba, Falkner, Grenada, Lexington, Loring, Luverne, Memphis, Nocogdoches, Ora, Providence, Ruston, and Tippah.

### Soil Productivity Group No. 74

These soils are suited or poorly suited to most commonly grown crops. Runoff is medium to rapid and erosion is a severe hazard. Because of the severe erosion hazard these soils should be in permanent cover most of the time. Cultivated crops can be grown about one-fourth of the time. Applications of recommended fertilizers are needed to produce best yields. Major soils are Angie, Boswell, Shubuta, and Susquehanna.

### Soil Productivity Group No. 75

These soils are poorly suited to commonly grown crops. Row arrangement and field ditches are needed to remove excess water. These soils are subject to flooding during growing seasons causing severe crop damage. Yields are usually low due to flooding. Major soils are Collins, Iuka, and Vicksburg.

### Soil Productivity Group No. 76

These soils are poorly suited to commonly grown crops. Stands are difficult to establish due to fine texture of surface layer. These soils have a seasonally high water table and/or subject to severe flooding. Row arrangement and field ditches are needed to remove excess water. Yields are moderate to low due to wetness and flooding. Major soils are Ark, Dowling, Eutaw, Mhoon, Sessums, Sharkey, Souva, Tuscumbia, and Una.

### Soil Productivity Group No. 77

These soils are suited or poorly suited to commonly grown crops. The addition of crop residue helps prevent crusting and packing. Row arrangement and field ditches are needed to remove excess water. They have a seasonally high water table at or near the surface most of the time. Applications of recommended fertilizers are needed for low to moderate yields. Major soils are Henry, Mashulaville, and Mayhew.





#### Soil Productivity Group No. 78

These soils are not suited for crops due to severe flood hazard. They are suited for permanent pasture or trees. Major soils are Commerce and Rosebloom.

#### Soil Productivity Group No. 79

These soils are well suited for permanent pasture or trees. They are not suited to row crops due to steep slopes and severe erosion hazard. Major soils are Cahaba, Loring, Memphis, Providence, Ruston, Sawyer, Shubuta, and Tippah.

#### Soil Productivity Group No. 80

These soils are suited for permanent pasture or trees. Most shrink and crack when dry and erodibility is high. Major soils are Angie, Binnsville, Boswell, Mayhew, Sumter, Susquehanna, and Vaiden.

#### Soil Productivity Group No. 81

These soils are suited for permanent pasture or trees. Most shrink and crack when dry, and erodibility of these soils is high. Grazing should be managed to avoid grazed-out areas and to minimize cow paths and trails. Major soils are Boswell, Sumter, Susquehanna, and Vaiden.

#### Soil Productivity Group No. 82

These soils are suited for permanent pasture or trees. Major soils are Loring, Memphis, Providence, and Ruston.

#### Soil Productivity Group No. 83

These soils are suited for use of all commonly grown crops. They are gravelly to very gravelly in texture which restricts cultivation in some areas. These soils are somewhat droughty. They can be continuously cropped by following good conservation practices. The addition of crop residue helps prevent crusting, packing, and reduces erosion. Runoff is slow to medium and erosion is a slight hazard. With applications of recommended fertilizers, these will produce high yields. Major soil is Saffell.

#### Soil Productivity Group No. 84

These soils should be in trees. On site investigation is needed to determine recommended species of trees. These areas are mostly in gullied land.



Soil Productivity Group No. 85

These soils are poorly suited to most commonly grown crops. On some of these soils runoff is medium to rapid and erosion is a hazard. These soils are droughty. Fertilizers leach readily and frequent light applications are needed. Applications of recommended fertilizers are needed for low to fair yields. Major soil is Crevasse.

Soil Productivity Group No. 86

Same as Group 59.

Soil Productivity Group No. 87

Same as Group 60.

Soil Productivity Group No. 88

Same as Group 61.

Soil Productivity Group No. 89

Same as Group 62.

Soil Productivity Group No. 90

Same as Group 63.

Soil Productivity Group No. 91

Same as Group 64.

Soil Productivity Group No. 92

Same as Group 65.

Soil Productivity Group No. 93

Same as Group 66.

Soil Productivity Group No. 94

Same as Group 67.



Soil Productivity Group No. 95

These soils are suited to most commonly grown crops. Runoff is slow to medium and erosion is a hazard. Stands will be difficult to establish due to the fine texture of the surface layer. The addition of crop residue helps prevent clodding and packing and reduces erosion. Cultivated crops can be grown by using adequate cropping systems. Applications of recommended fertilizers are needed for moderate yields. Major soils are Forestdale and Sharkey.

Soil Productivity Group No. 96

Same as Group 69.

Soil Productivity Group No. 97

Same as Group 70.

Soil Productivity Group No. 98

Same as Group 71.

Soil Productivity Group No. 99

Same as Group 72.

Soil Productivity Group No. A0

Same as Group 73.

Soil Productivity Group No. A1

Same as Group 74.

Soil Productivity Group No. A2

Same as Group 75.

Soil Productivity Group No. A3

Same as Group 76.

Soil Productivity Group No. A4

Same as Group 77.

Soil Productivity Group No. A5

Same as Group 79.



Soil Productivity Group No. A6

Same as Group 80.

Soil Productivity Group No. A7

Same as Group 81.

Soil Productivity Group No. A8

Same as Group 82.

Soil Productivity Group No. A9

Same as Group 83.

Soil Productivity Group No. B0

Same as Group 84.

Soil Productivity Group No. B1

Same as Group 85.

Soil Productivity Groups for Missouri

Soil Productivity Group No. B2

LRA's 115 and 116 - All this group consist of deep, well and moderately well drained soils of the uplands and bottoms. The silt loam surface is over siltloam, silty clay loam, or clayey textured subsoils. These soils are developed in loess, limestone residuum and alluvium on nearly level to steep slopes. The nearly level areas have no major problems while the sloping part is subject to erosion. They contain mostly high available moisture. Capability classes are I, II, III, and IV. The soil series include the Ashton, Nolin, and Sharon of the bottomland and the Crider, Hagerstown, Memfro, and Winfield of the uplands.

LRA's 131 and 134 - Deep, well drained medium textured soils developed in loess and alluvium. They have high available moisture capacity. Slopes are level to about 20 percent. Erosion is slight to severe. Capabilities are Class I, II, III, IV, and VI. Major soil series are Bosket, Caruthersville, Dubbs, Loring, and Memphis.





### Soil Productivity Group No. B3

LRA's 115 and 116 - This group is composed of moderately well drained soils developed in 2 to 4 feet of loess over cherty limestone or sandstone residuum. A moderately to strongly developed fragipan occurs at 30 to 40 inches depth in uneroded profiles. These soils occupy upland and low slope positions of 2 to 13 percent slope. The available moisture capacity is medium. There is a moderate to very severe erosion hazard. Capabilities include Class II, III, and IV. The major soil series are Tilsit, Union, and some acreage of Viraton.

LRA 131 - Deep, somewhat poorly and poorly drained soils on level or nearly level bottomlands of the Mississippi River Delta. These soils are developed in coarse-silty, fine loamy, and fine-silty textured alluvium. They all have high available moisture capacity except Dundee which generally contains medium available moisture. Since they occupy level areas, erosion is not a problem. Moderate to severe wetness is a problem. Land Capability Classes are II and III. The soils include the Commerce, Dundee, Falaya, Gideon, Hayti, Mhoon, Sikeston, and Waverly series.

LRA 134 - These are moderately deep soils underlain by gravel or sand and some have a fragipan. They developed in alluvium or loess over coastal plains gravel and sand. They are on level to 9 percent slopes and have medium to low available moisture. Erosion is slight to severe. Capability Classes are II, III, and IV. Soils include small gravelly bottoms like the Elsay and Gladden series.

### Soil Productivity Group No. B4

LRA's 115 and 116 - This group contains mostly moderately deep soils on stream bottoms and uplands underlain by gravel, chert, or fragipans. The soils are somewhat excessively drained, well drained, and moderately well drained. They contain medium and low available water. They occupy nearly level to moderate slopes. Droughtiness is common to the soils and in addition, the sloping areas are subject to moderate to very severe erosion. Mainly Capability Classes II, III, and IV. The major soils are of the Elsay, Gladden, and Razort series of the small stream bottoms and the Lebanon and Plato series of the uplands.

LRA 131 - These are moderately deep soils underlain by gravel or sand and some have a fragipan. They developed in alluvium, or loess over coastal plains gravel and sand. They are on level to 9 percent slopes and have medium to low available moisture. Erosion is slight to severe. Capability classes are II, III, and IV. Soils include small gravelly bottoms like the Elsay and Gladden series and the upland Lax and Providence series.



#### Soil Productivity Group No. B5

LRA's 115 and 116 - This group consist primarily of shallow and cherty, moderately well to somewhat excessively drained soils of the Ozark highlands. Most of the acreage is gentle to sloping ridge tops and gently sloping narrow stream bottoms. They contain low available moisture. Although the soils are droughty, the major problem is considered to be its susceptibility to erosion. Capability Classes are III and IV. Soils include Elsay, Clarksville, Coulstone, Nixa, and Razort.

LRA 134 - This group consist of moderately well drained soils developed in loess on Crowleys Ridge and moderately well and somewhat poorly drained soils developed in alluvium on gently sloping bottoms. The silt loam surface is underlain by a silt loam or light silty clay loam subsoil. The available moisture capacity is generally high on uneroded soils and medium on eroded soils. They occupy slopes ranging from 2 to 13 percent. There is slight and moderate and in some places severe erosion. The land Capability Classes are II, III, and IV. The upland part is mostly Grenada soils and the gently sloping bottoms are occupied by Collins and Falaya.

#### Soil Productivity Group No. B6

LRA's 115 and 116 (mostly 115) - Deep, somewhat poorly and poorly drained soils of the uplands and second bottoms (terraces) make up this group. The silty surface is over a silty clayey loam or clayey subsoil. They are developed in loess and alluvium, and nearly level and gentle slopes. The available moisture capacity is medium. Nearly level areas have a wetness problem and sloping fields have a moderate to severe erosion hazard. The Capability Classes are III and IV. The soils are Auxvassa, Freeburg, Marion, Moniteau, and Weldon.

LRA 131 - These are mostly deep, poorly and somewhat poorly drained soils with silt loam surface layers over silty clay loam, clay loam, or clay subsoils. Some, however, have silt loam or sandy loam textures. The available moisture capacity is medium. Slopes are level to about 10 percent. There is a moderate to severe wetness problem on level areas and a severe erosion hazard on the slopes. Capabilities are Classes II, III, IV, and VI. The major soils are Amagon, Calhoun, Calloway, Forestdale, Patterson, Wardell, and Zachary.

#### Soil Productivity Group No. B7

LRA 131 - These are poorly drained fine textured soils developed in clayey sediments deposited by still water on backswamp areas. They are level to slightly depressional. The clayey surface is underlain by dark gray or gray clay to depths of 3 feet or more except for the Tunica series which is underlain by loamy sediments between 24 and 36 inches. The soils have low available moisture capacity. Wetness is a severe problem because of overflow, slow runoff, highwater table, and slow internal drainage. Capability Classes are II and III. Major soils are Alligator, Iberia, Sharkey, and Tunica.



### Soil Productivity Group No. B8

LRA 131 - These are deep well to excessively drained rapidly permeable soils developed in sandy alluvium. They contain low and very low available moisture. They are on nearly level to undulating areas of the Mississippi River Delta. These soils have a droughty problem and undulating areas are especially subject to blowing. Capabilities are Classes III and IV. Soil series include Bruno, Canalou, Crevasse, and Steele.

### Soil Productivity Group No. B9

LRA 131 - This group contains those unidentified soils heretofore referred to as organic soils. The major area of their occurrence is in the extreme northern part of LRA 131. The expanded CNI acreage has exaggerated the extent of these soils. With the inclusion of closely associated soils such as Iberia and Sikeston, the acreage is still about double the actual extent. These soils are poorly drained, dark colored, wet soils developed mostly from organic materials under wet swampy conditions. It is mostly Class III. Soils unknown.

### Soil Productivity Group No. C0

LRA's 115 and 116 - Soils of this group are shallow, cherty, and stony. They range from moderately well to somewhat excessively drained soils, mostly on steep slopes. A small acreage is gravel beds along the channel of the larger streams. All these soils generally contain only very low available moisture. All the soils are droughty, but at the same time are subject to severe erosion because of the steep slopes on which they occur. However, the shallow soils are considered to have a dominant limitation of droughtiness and the deeper cherty and stony soils have a dominate hazard of erosion. They have as Capability Classes IV, VI, VII, and VIII. The major soil series are Ashe, Clarksville, Coulstone, Doniphan, Gasconade, Hector, and Lebanon. Included are the land types: Riverwash and Rockland.

LRA's 131 and 134 - This unit consist of steep slopes occupied by well and moderately well drained soils developed in loess, coastal plains gravel and cherty limestone residuum. They range from deep to shallow, high to low available moisture capacity and from 15 to about 35 percent slope. Erosion is a severe hazard. The shallow soils and the gravelly soils are droughty. Capabilities are Class VI and VII land. The major soils are of the Clarksville, Grenada, Loring, Memphis, and Saffell series.



## Soil Productivity Groups for Tennessee

### Soil Productivity Group No. C1

LRA 133 - Deep well-drained upland soils over sandy material with 0-8 percent slope and none to moderate erosion. Includes Land Capability Units: 1-11, 2e11, 3e11, 2e12, 2e13, 3e13, and 2e14. Major soils are Lexington, Memphis, and Ruston.

LRA 134 - Deep well-drained loess upland soils having 0-8 percent slope and none to moderate erosion. Includes Land Capability Units: 1-11, 2e11, 3e11, 2e12, 2e13, 3e13, and 2e14. Major soils are Grenada, Loring, and Memphis.

### Soil Productivity Group No. C2

LRA 133 - Deep moderately well-drained upland soils over sandy material with 5-12 percent slope and slight to severe erosion. Includes Land Capability Units: 2s11, 3s11, 4e11, 2s12, 3e12, 4e12, 4e13, 3e14, 2e15, and 2e16. Major soils are Dulac, Lintonia, Memphis, and Providence.

LRA 134 - Deep moderately well-drained loess upland soils having 2-12 percent slope and slight to severe erosion. Includes Land Capability Units: 2s11, 3s11, 4e11, 3e12, 4e12, 4e13, 3e14, 2e15, and 2e16. Major soils are Grenada, Loring, and Memphis.

### Soil Productivity Group No. C3

LRA 133 - Somewhat poorly drained upland soil over sandy material. Includes Land Capability Units: 2w12 and 3w12. Major soils are Calloway and Hatchie.

LRA 134 - Somewhat poorly-drained nearly level upland soils. Includes Land Capability Units: 2w12 and 3w12. Major soils are Calloway and Center.

### Soil Productivity Group No. C4

LRA 133 - Deep well-drained soils over clayey subsoils with over 20 percent slope. Includes Land Capability Units: 4s11, 6s11, 6e11, 7s11, 7e11, 4s12, 6e12, 7e12, 7s12, 6e13, 7s13, 7e13, 4e14, 6e14, 3e15, 4e15, 6e15, 3e16, 4e16, 6e16, and 7e16. Major soils are Dulac, Lexington, Memphis, and Providence.

LRA 134 - Deep to moderately deep, moderately well-drained loess upland soils with over 8 percent slope and moderate to severe erosion. Includes Land Capability Units: 4s11, 6s11, 6e11, 7s11, 7e11, 4s12, 6e12, 7e12, 7s12, 6e13, 7e13, 4e14, 6e14, 3e15, 4e15, 6e15, 4e15, 6e15, 3e16, 4e16, and 6e16. Major soils are Dexter, Grenada, Loring, and Memphis.





Soil Productivity Group No. C5

LRA 133 - Deep well-drained to moderately drained bottom lands with overflow problems. Includes Land Capability Units: 1-12 and 2W-13. Major soils are Collins and Iuka.

LRA 134 - Deep moderately well-drained bottomland with overflow problem. Includes Land Capability Units: 1-12 and 2W-13. Major soils are Adler, Collins, Morganfield, and Vicksburg.

Soil Productivity Group No. C6

LRA 133 - Deep somewhat poorly-drained bottomlands with overflow problems. Includes Land Capability Unit 2w11. Major soils are Falaya and Mantachie.

LRA 134 - Deep somewhat poorly-drained bottomland with overflow problem. Includes Land Capability Units: 2w11 and 2w17. Major soils are Convent, Dekoven, and Falaya.

Soil Productivity Group No. C7

LRA 133 - Deep poorly-drained bottomland with overflow problems. Includes Land Capability Units: 3w11, 7w11, 3w13, 3w14, 4w12, 3w19, and 4w11. Major soil is Waverly.

LRA 134 - Deep poorly-drained bottomland with overflow problem. Includes Land Capability Units: 3w11, 7w11, 3w13, 3w14, 4w12, 3w19, and 4w11. Major soils are Birds and Waverly.

Soil Productivity Groups for Louisiana

Soil Productivity Group No. C8

Same as Group 39.

Soil Productivity Group No. C9

Same as Group 40.

Soil Productivity Group No. D0

Same as Group 41.

Soil Productivity Group No. D1

Same as Group 43.



Soil Productivity Group No. D2

Same as Group 44.

Soil Productivity Group No. D3

Same as Group 45.

Soil Productivity Group No. D4

Same as Group 47.



Table 1. WRPA 1. Agricultural land use of land area adjoining WRPA's 2, 3, 4, 6, 7, 8, and 10, by state portions, Lower Mississippi Region, 1970<sup>1/</sup>

WRPA and State	Total Agricultural land Acres	Other Agricultural land Acres	Forest land Acres	Total Pasture and cropland Acres	Pasture Acres	Cropland Acres
WRPA 2						
Arkansas	77,770	4,316	15,589	57,865	631	57,234
Missouri	124,380	5,264	75,780	43,336	4,168	39,168
Total	202,150	9,580	91,369	101,201	4,799	96,402
WRPA 3						
Arkansas	66,760	6,067	40,972	19,721	908	18,813
Kentucky	23,622	1,391	9,865	12,366	787	11,579
Tennessee	88,374	3,943	42,305	42,126	723	41,403
Total	178,756	11,401	93,142	74,213	2,418	71,795
WRPA 4						
Mississippi	347,256	28,526	272,780	45,950	12,775	33,175
WRPA 6						
Arkansas	113,920	--	113,920	--	--	--
Louisiana	189,450	11,710	162,671	15,069	4,452	10,617
Total	303,370	11,710	276,591	15,069	4,452	10,617
WRPA 7						
Mississippi	66,530	--	60,329	6,201	197	6,004
WRPA 8						
Louisiana	70,060	672	62,446	6,942	6,942	--
WRPA 10						
Louisiana	22,160	--	22,160	--	--	--
WRPA 1						
Total	1,190,282	61,889	878,817	249,576	31,583	217,993

Sources: Land area taken from data supplied to the Land Use and Management Subcommittee by the Lower Mississippi Valley Division, U.S. Army Corps of Engineers. Land use based on data from the 1967 Conservation Needs Inventory of the Soil Conservation Service, USDA.

<sup>1/</sup> Area included in WRPA 1 is defined as the land and water within the levees on the Mississippi River or the land and water to the high bank of the river where no levee exists. Crop production on the land in WRPA 1 is not recommended because of the severe flood risk. Therefore, the soils in WRPA 1 were not grouped into soil productivity groups and were excluded from the land resource base in the analysis of future crop production.



Table 2. WRPA 2. Agricultural land use by soil productivity group, Lower Mississippi Region, 1970.

Soil Productivity Groups	Total Agricultural Land	Other Agricultural Land	Forest Land	Total Pasture and Cropland	Pasture	Cropland
	Acres	Acres	Acres	Acres	Acres	Acres
<b>Arkansas</b>						
1	175,741	1,651	28,726	145,364	69,605	75,759
2	22,838	861	13,179	8,798	4,399	4,399
3	50,654	--	14,795	35,859	28,083	7,776
4	53,145	--	12,740	40,405	26,413	13,992
5	32,873	789	10,241	21,843	11,457	10,386
6	11,197	--	10,336	861	861	--
8	104,456	862	99,256	4,338	2,616	1,722
9	447	--	350	97	97	--
10	62,965	4,553	7,664	50,748	3,023	47,725
11	892,069	32,069	118,269	741,731	100,157	641,574
12	174,757	3,280	95,498	75,979	48,820	27,159
13	113,765	1,868	20,885	91,012	10,045	80,967
14	1,197,571	20,944	187,374	989,253	42,630	946,623
15	531,815	11,374	189,434	331,007	18,757	312,250
16	429,008	12,978	21,929	394,101	16,604	377,497
17	1,564,930	34,188	328,142	1,202,600	11,154	1,191,446
18	1,202,537	21,606	147,875	1,033,056	28,999	1,004,057
19	47,255	1,747	992	44,516	2,018	42,498
20	45,696	2,814	2,361	40,521	13,567	26,954
21	154,726	3,384	21,874	129,468	6,963	122,505
Total	6,868,445	154,968	1,331,920	5,381,557	446,268	4,935,289
<b>Missouri</b>						
B2	380,878	10,061	39,926	330,891	91,348	239,543
B3	463,285	14,052	51,132	398,101	18,541	379,560
B4	290,769	6,276	126,473	158,020	100,455	57,565
B5	61,987	2,362	8,050	51,575	27,797	23,778
B6	462,167	15,754	19,508	426,905	29,380	397,525
B7	593,011	18,080	20,403	554,528	10,990	543,538
B8	167,813	7,784	3,618	156,411	2,844	153,567
B9	5,933	219	--	5,714	--	5,714
C0	801,684	5,362	734,301	62,021	52,355	9,666
Total	3,227,527	79,950	1,003,411	2,144,166	333,710	1,810,456
WRPA 2 Total	10,095,972	234,918	2,335,331	7,525,723	779,978	6,745,745

Source: Economic Research Service, United States Department of Agriculture, Jackson, Mississippi.





Table 3 . WRPA 3. Agricultural land use by soil productivity group, Lower Mississippi Region, 1970

Soil Productivity Groups	Total Ag-	Other Ag-	Forest Land	Total Pas-	Pasture	Cropland
	ricultural Land	ricultural Land		ture and Cropland		
	<u>Acres</u>	<u>Acres</u>	<u>Acres</u>	<u>Acres</u>	<u>Acres</u>	<u>Acres</u>
Arkansas						
16	50,399	908	419	49,072	--	49,072
17	221,100	5,284	6,179	209,637	3,186	206,451
18	35,415	1,816	1,256	32,343	--	32,343
Total	306,914	8,008	7,854	291,052	3,186	287,866
Kentucky						
30	107,286	1,584	23,007	82,695	9,690	73,005
31	126,769	5,350	15,419	106,000	25,665	80,335
32	91,277	1,812	12,257	77,208	11,386	65,822
33	149,158	4,610	18,819	125,729	27,694	98,035
34	69,803	2,112	10,465	57,226	16,493	40,733
35	53,119	396	22,177	30,546	5,481	25,065
36	7,735	--	2,569	5,166	886	4,280
37	102,338	1,791	62,162	38,385	18,906	19,479
38	11,215	1,072	7,475	2,668	1,072	1,596
Total	718,700	18,727	174,350	525,623	117,273	408,350

Continued -----



Table 3. WRPA 3. Agricultural land use by soil productivity group, Lower Mississippi Region, 1970 (continued)

Soil Productivity Groups	Total Agricultural Land Acres	Other Agricultural Land Acres	Forest Land Acres	Total Pasture and Cropland Acres	Pasture Acres	Cropland Acres
Mississippi						
62	633	--	--	633	--	633
63	2,534	--	513	2,021	808	1,213
64	69,754	396	5,764	63,594	11,585	52,009
67	12,634	198	513	11,923	3,333	8,590
69	12,456	--	1,831	10,625	2,188	8,437
70	2,972	--	1,031	1,941	1,941	--
71	6,207	198	435	5,574	1,858	3,716
73	49,311	1,387	20,133	27,791	10,628	17,163
74	8,123	594	4,557	2,972	1,387	1,585
75	1,267	--	440	827	827	--
76	14,115	--	3,728	10,387	3,056	7,331
77	211	--	--	211	211	--
79	18,430	396	9,189	8,845	3,921	4,924
80	12,572	--	3,591	8,981	4,991	3,990
81	157,182	396	147,158	9,628	5,850	3,778
82	70,519	--	60,173	10,346	6,123	4,223
83	8,915	396	344	8,175	2,151	6,024
84	79,639	--	65,396	14,243	9,043	5,200
Total	527,474	3,961	324,796	198,717	69,901	128,816
Tennessee						
C1	1,226,828	50,372	158,443	1,018,013	224,202	793,811
C2	557,551	19,338	137,080	401,133	123,146	277,987
C3	162,258	4,192	7,079	150,987	18,249	132,738
C4	988,730	39,769	620,150	328,811	161,280	167,531
C5	448,447	17,574	79,928	350,945	45,309	305,636
C6	693,910	27,209	129,224	537,477	65,783	471,694
C7	770,884	9,081	392,454	369,349	51,838	317,511
Total	4,848,608	167,535	1,524,358	3,156,715	689,807	2,466,908
WRPA 3						
Total	6,401,696	198,231	2,031,358	4,172,107	880,167	3,291,940

Source: Economic Research Service, United States Department of Agriculture, Jackson, Mississippi.



Table 4. WRPA 4. Agricultural land use by soil productivity group, Lower Mississippi Region, 1970

Soil Productivity Groups	Total Agricultural Land	Other Agricultural Land	Forest Land	Total Pasture and Cropland	Pasture	Cropland
	Acres	Acres		Acres		
Mississippi						
86	284,501	14,910	13,034	256,557	23,878	232,679
87	364,044	13,180	7,903	342,961	17,954	325,007
88	300,537	15,433	20,381	264,723	47,581	217,142
89	93,442	4,134	6,041	83,267	35,523	47,744
90	81,776	3,386	18,158	60,232	20,881	39,351
91	1,266,531	41,028	237,217	988,286	191,070	797,216
92	4,766	--	342	4,424	211	4,213
93	7,316	222	--	7,094	2,661	4,433
94	409,759	8,718	100,503	300,538	164,567	135,971
95	86,871	1,720	10,107	75,044	6,807	68,237
96	1,716,015	40,296	266,362	1,409,357	80,745	1,328,612
97	74,281	793	6,429	67,059	32,674	34,385
98	33,429	1,338	2,121	29,970	4,688	25,282
99	58,338	882	28,515	28,941	18,174	10,767
A0	280,110	8,173	79,705	192,232	108,345	83,887
A1	10,594	225	5,545	4,824	2,419	2,405
A2	49,989	223	10,730	39,036	10,930	28,106
A3	832,060	9,551	291,702	530,807	29,495	501,312
A4	75,731	2,007	20,557	53,167	33,317	19,850
A5	419,789	5,172	314,802	99,815	77,784	22,031
A6	21,822	433	13,873	7,516	4,144	3,372
A7	262,207	2,946	207,741	51,520	38,417	13,103
A8	790,602	3,278	694,888	92,436	75,666	16,770
A9	25,185	1,100	3,720	20,365	10,579	9,786
B0	713,825	9,938	477,261	226,626	177,432	49,194
B1	48,610	4,006	36,583	8,021	2,997	5,024
Total	8,312,130	193,092	2,874,220	5,244,818	1,218,939	4,025,879

Source: Economic Research Service, United States Department of Agriculture, Jackson, Mississippi.



Table 5 . WRPA 5A. Agricultural land use by soil productivity group, Lower Mississippi Region, 1970

Soil Productivity Groups	Total Agricultural Land	Other Agricultural Land	Forest Land	Total Pasture and Cropland	Pasture	Cropland
	Acres	Acres		Acres	Acres	Acres
Arkansas						
1	176,473	3,868	98,474	74,131	62,921	11,210
2	36,616	--	21,801	14,815	9,647	5,168
3	177,526	4,795	119,382	53,349	49,774	3,575
4	12,698	--	10,811	1,887	1,887	--
5	65,982	423	53,024	12,535	11,555	980
6	20,659	--	18,961	1,698	808	890
7	3,558	--	3,558	--	--	--
8	524,333	5,803	466,879	51,651	47,711	3,940
10	5,883	--	5,647	236	236	--
11	271,986	4,539	231,577	35,870	27,266	8,604
12	3,108	--	3,108	--	--	--
14	143,373	1,852	116,400	25,121	13,977	11,144
15	72,793	--	54,481	18,312	8,713	9,599
16	251,337	7,661	13,269	230,407	20,001	210,406
17	439,771	16,329	144,178	279,264	18,487	260,777
18	116,237	3,599	24,486	88,152	1,368	86,784
19	10,154	--	5,443	4,711	1,906	2,805
22	1,787,634	19,347	1,362,158	406,129	270,862	135,267
23	268,539	1,217	229,752	37,570	29,683	7,887
24	133,993	890	82,742	50,361	29,632	20,729
25	1,126,862	4,403	1,003,019	119,440	81,473	37,967
26	1,468,310	4,333	1,265,524	198,453	128,660	69,793
27	176,074	1,331	141,033	33,710	25,717	7,993
28	44,644	887	11,863	31,894	22,876	9,018
29	253,296	1,298	237,830	14,168	12,440	1,728
Total	7,591,839	82,575	5,725,400	1,783,864	877,600	906,264

Source: Economic Research Service, United States Department of Agriculture, Jackson, Mississippi.





Table 6. WRPA 5B Agricultural land use by soil productivity group, Lower Mississippi Region, 1970

Soil Productivity Groups	Total Ag-ricultural Land	Other Ag-ricultural Land	Forest Land	Total Pas-ture and Cropland	Pasture	Cropland
	Acres	Acres	Acres	Acres	Acres	Acres
Louisiana						
39	81,697	1,883	12,369	67,445	15,067	52,378
40	87,439	1,491	18,524	67,424	22,905	44,519
41	41,322	1,715	15,511	24,096	12,783	11,313
42	45,641	430	9,038	36,173	10,426	25,747
43	38,913	649	12,923	25,341	8,448	16,893
44	189,186	2,102	148,618	38,466	20,364	18,102
45	721,997	865	515,691	205,441	93,269	112,172
46	394	--	--	394	394	--
47	271,242	427	177,823	92,992	27,178	65,814
48	105,547	1,963	80,830	22,754	14,147	8,607
49	1,790,048	13,646	1,584,386	192,016	149,158	42,858
50	16,249	236	13,239	2,774	1,849	925
51	147,222	615	112,165	34,442	25,425	9,017
53	725,173	1,137	691,105	32,931	30,889	2,042
54	615,943	9,647	585,400	20,896	19,559	1,337
55	12,569	--	12,216	353	--	353
56	254,156	227	225,139	28,790	11,442	17,348
58	1,923	--	1,923	--	--	--
Total	5,146,661	37,033	4,216,900	892,728	463,303	429,425

Source: Economic Research Service, United States Department of Agriculture, Jackson, Mississippi.



Table 7. WRPA 6. Agricultural land use by soil productivity group, Lower Mississippi Region, 1970

Soil Productivity Groups	Total Agricultural Land	Other Agricultural Land	Forest Land	Total Pasture and Cropland	Pasture	Cropland
	Acres	Acres		Acres		
Arkansas						
11	26,070	--	603	25,467	7,346	18,121
12	948	--	948	--	--	--
14	21,803	--	5,630	16,173	12,580	3,593
15	5,688	--	2,011	3,677	1,838	1,839
16	51,602	--	--	51,602	8,387	43,215
17	554,092	--	54,600	499,492	48,460	451,032
18	80,615	--	14,888	65,727	2,742	62,985
19	4,559	--	--	--	4,559	--
Total	745,377	--	78,680	666,697	85,912	580,785
Louisiana						
39	91,710	243	4,054	87,413	22,713	64,700
40	93,573	3,700	5,628	84,245	12,879	71,366
41	151,722	2,060	34,265	115,397	27,261	88,136
42	80,558	4,041	8,222	68,295	31,250	37,045
43	124,875	1,992	24,663	98,220	17,086	81,134
44	190,306	2,385	68,514	119,407	31,884	87,523
45	1,473,041	8,718	713,546	750,777	213,821	536,956
46	10,518	--	1,413	9,105	1,620	7,485
47	356,770	2,720	108,759	245,291	62,939	182,352
48	28,388	108	15,739	12,541	4,969	7,572
49	23,498	--	14,641	8,857	1,300	7,557
52	5,634	--	394	5,240	5,018	222
53	38,042	--	34,434	3,608	3,608	--
54	18,512	--	1,733	16,779	16,779	--
56	77,105	--	70,193	6,912	6,912	--
58	5,631	--	5,631	--	--	--
Total	2,769,883	25,967	1,111,829	1,632,087	460,039	1,172,048
WRPA 6						
Total	3,515,260	25,967	1,190,509	2,298,784	545,951	1,752,833

Source: Economic Research Service, United States Department of Agriculture, Jackson, Mississippi.



Table 8. WRPA 7. Agricultural land use by soil productivity group, Lower Mississippi Region, 1970

Soil Productivity Groups	Total Agricultural Land	Other Agricultural Land	Forest Land	Total Pasture and Cropland	Pasture	Cropland
	Acres	Acres		Acres		
Mississippi						
59	7,865	--	1,321	6,544	1,800	4,744
60	10,047	426	1,245	8,376	5,381	2,995
61	47,517	1,413	19,118	26,986	17,794	9,192
62	80,460	197	25,722	54,541	28,694	25,847
63	28,368	625	8,861	18,882	7,802	11,080
64	436,835	4,349	226,096	206,390	116,630	89,760
66	197	--	185	12	12	--
67	232,513	2,529	101,951	128,033	93,620	34,413
68	3,548	--	3,133	415	--	415
69	22,495	395	18,763	3,337	939	2,398
70	71,159	2,107	14,584	54,468	29,348	25,120
71	20,775	1,251	6,929	12,595	5,870	6,725
72	53,304	--	35,601	17,703	9,798	7,905
73	309,410	4,134	159,790	145,486	95,811	49,675
74	9,305	212	6,128	2,965	845	2,120
75	12,298	--	6,623	5,675	3,315	2,360
76	44,667	627	29,579	14,461	8,735	5,726
77	172,700	3,142	101,051	68,507	36,387	32,120
78	27,462	--	27,462	--	--	--
79	499,394	2,015	433,692	63,687	52,100	11,587
80	16,759	209	11,298	5,252	3,570	1,682
81	125,086	1,256	112,166	11,664	8,942	2,722
82	663,236	2,111	611,681	49,444	40,245	9,199
83	44,256	835	17,907	25,514	12,385	13,129
84	82,604	--	65,122	17,482	16,085	1,397
85	43,119	197	37,563	5,359	5,359	--
Total	3,065,379	28,030	2,083,571	953,778	601,467	352,311

Source: Economic Research Service, United States Department of Agriculture, Jackson, Mississippi.



Table 9. WRPA 8. Agricultural land use by soil productivity group, Lower Mississippi Region, 1970

Soil Productivity Groups	Total Agricultural Land Acres	Other Agricultural Land Acres	Forest Land Acres	Total Pasture and Cropland Acres	Pasture Acres	Cropland Acres
Louisiana						
30	193,630	8,931	21,546	163,153	69,741	93,412
40	8,743	416	1,211	7,116	5,290	1,826
41	241,639	6,395	119,624	115,620	80,335	35,285
42	76,329	563	20,494	55,272	33,858	21,414
43	19,488	180	4,632	14,676	13,161	1,515
44	262,678	8,428	155,615	98,635	68,347	30,288
45	300,356	899	163,350	136,107	88,754	47,353
47	446,975	6,134	355,580	85,261	61,931	23,330
48	231,600	839	147,964	82,797	59,778	23,019
49	177,550	1,180	125,094	51,276	29,482	21,794
52	2,952	296	1,086	1,570	1,570	--
53	244,890	360	211,685	32,845	30,663	2,182
54	55,121	1,529	45,620	7,972	7,972	--
56	372,645	--	354,354	18,291	18,291	--
58	210,221	9,822	200,399	--	--	--
Total	2,844,817	45,972	1,928,254	870,591	569,173	301,418
Mississippi						
61	7,998	--	4,308	3,690	1,302	2,388
62	93,605	2,810	59,678	31,117	20,236	10,881
63	4,756	--	3,663	1,093	437	656
64	67,014	--	47,613	19,401	14,606	4,795
67	69,392	648	42,225	26,519	16,085	10,434
69	30,265	432	21,760	8,073	5,891	2,182
72	23,996	--	18,743	5,253	4,596	657
73	39,561	--	22,915	16,646	12,755	3,891
77	216	--	216	--	--	--
79	38,264	--	30,048	8,216	6,701	1,515
82	44,533	--	37,831	6,702	4,324	2,378
Total	419,600	3,890	289,000	126,710	86,933	39,777
WRPA 8 Total	3,264,417	49,862	2,217,254	997,301	656,106	341,195

Source: Economic Research Service, United States Department of Agriculture, Jackson, Mississippi.





Table 10. WRPA 9. Agricultural land use by soil productivity group, Lower Mississippi Region, 1970

Soil Productivity Groups	Total Agricultural Land	Other Agricultural Land	Forest Land	Total Pasture and Cropland	Pasture	Cropland
	Acres	Acres		Acres	Acres	Acres
Louisiana						
39	31,173	3,837	--	27,336	11,220	16,116
40	34,588	2,473	543	31,572	4,815	26,757
41	101,049	5,935	3,122	91,992	35,978	56,014
42	6,660	--	419	6,241	4,950	1,291
43	156,821	4,620	6,927	145,274	42,231	103,043
44	321,946	9,523	75,037	237,386	91,180	146,206
45	605,743	12,785	313,770	279,188	63,990	215,198
46	19,952	3,984	6,341	9,627	--	9,627
47	2,208,136	44,855	546,594	1,616,687	196,104	1,420,583
48	7,091	447	1,123	5,521	4,076	1,445
49	1,063,888	6,061	905,915	151,912	64,487	87,425
50	17,029	--	9,816	7,213	7,213	--
51	63,513	--	58,737	4,776	1,681	3,095
52	96,418	7,711	7,662	81,045	64,090	16,955
53	445,987	254	423,829	21,904	14,542	7,362
54	136,231	1,695	126,648	7,888	7,474	414
55	7,353	--	7,353	--	--	--
56	428,247	580	411,359	16,308	16,308	--
58	1,314,008	833,016	204,805	276,187	276,187	--
Total	7,065,833	937,776	3,110,000	3,018,057	906,526	2,111,531

Source: Economic Research Service, United States Department of Agriculture, Jackson, Mississippi.



Table 11. WRPA 10. Agricultural land use by soil productivity group, Lower Mississippi Region, 1970

Soil Productivity Groups	Total Ag-	Other Ag-	Forest Land	Total Pas-	Pasture	Cropland
	ricultural Land	ricultural Land		ture and Cropland		
	<u>Acres</u>	<u>Acres</u>	<u>Acres</u>	<u>Acres</u>	<u>Acres</u>	<u>Acres</u>
Louisiana						
39	103,623	6,245	1,878	95,500	5,501	89,999
41	17,137	--	7,075	10,062	5,031	5,031
42	85,431	5,574	6,220	73,637	6,657	66,980
43	67,029	4,811	654	61,564	880	60,684
44	36,529	1,353	21,932	13,244	4,140	9,104
45	213,237	6,132	61,977	145,128	19,795	125,333
47	228,758	2,340	160,600	65,818	54,859	10,959
48	4,961	--	707	4,254	944	3,310
49	68,999	902	38,557	29,540	11,958	17,582
52	1,452	645	--	807	807	--
53	64,038	--	50,231	13,807	6,903	6,904
54	2,983	901	--	2,082	2,082	--
56	182,974	3,898	136,758	42,318	9,780	32,538
58	2,621,320	2,024,853	546,201	50,266	50,266	--
Total	3,698,471	2,057,654	1,032,790	608,027	179,603	428,424

Source: Economic Research Service, United States Department of Agriculture, Jackson, Mississippi.



Table 12 . Cotton - Per acre yield by soil productivity groups within states, Lower Mississippi Region, estimated 1970, and projected 1980, 2000, and 2020

State and soil group	1970 Bales	1980 Bales	2000 Bales	2020 Bales
Arkansas				
1	.776	.926	1.096	1.250
2	1.020	1.212	1.406	1.602
3	.488	.552	.640	.730
5	.644	.784	.910	1.030
10	.678	.806	.934	1.064
11	.958	1.182	1.372	1.564
13	1.216	1.474	1.710	1.950
14	.666	.810	.940	1.072
15	.934	1.122	1.302	1.484
16	1.248	1.512	1.754	2.000
17	.878	1.048	1.216	1.386
18	.930	1.104	1.280	1.460
20	.958	1.182	1.372	1.564
21	.722	.878	1.018	1.160
22	.844	1.050	1.218	1.388
23	.534	.600	.696	.794
24	.934	1.122	1.302	1.484
25	.544	.630	.730	.832
26	.660	.776	.900	1.026
28	.926	1.188	1.378	1.570
Kentucky				
30	1.660	1.942	2.240	2.540
31	1.470	1.720	1.984	2.250
32	1.250	1.462	1.688	1.912
33	1.234	1.444	1.666	1.888
34	.988	1.156	1.334	1.512
35	1.114	1.304	1.504	1.704
Louisiana				
39	1.650	1.930	2.228	2.524
40	1.556	1.820	2.100	2.380
41	1.440	1.684	1.944	2.204
42	1.590	1.860	2.146	2.432
43	1.494	1.748	2.016	2.286
44	1.230	1.440	1.660	1.882
45	1.002	1.172	1.352	1.534
46	.960	1.124	1.296	1.468

Continued-----



Table 12. Cotton - Per acre yield by soil productivity groups within states, Lower Mississippi Region, estimated 1970, and projected 1980, 2000, and 2020 (continued)

State and soil group	1970 Bales	1980 Bales	2000 Bales	2020 Bales
Louisiana (continued)				
47	.780	<u>1/</u>	<u>1/</u>	<u>1/</u>
48	1.056	<u>1/</u>	<u>1/</u>	<u>1/</u>
49	.944	<u>1/</u>	<u>1/</u>	<u>1/</u>
50	.676	<u>1/</u>	<u>1/</u>	<u>1/</u>
51	.832	<u>1/</u>	<u>1/</u>	<u>1/</u>
52	.676	<u>1/</u>	<u>1/</u>	<u>1/</u>
Mississippi				
59	1.684	1.970	2.274	2.576
60	1.622	1.898	2.190	2.482
61	1.456	1.704	1.966	2.228
62	1.416	1.656	1.912	2.166
63	1.540	1.802	2.080	2.356
64	1.648	1.928	2.224	2.522
65	1.560	1.826	2.106	2.386
66	1.040	1.216	1.404	1.592
67	1.268	1.484	1.712	1.940
68	.780	.912	1.052	1.194
69	1.138	1.332	1.536	1.742
70	1.272	1.488	1.718	1.946
72	1.144	1.338	1.544	1.750
73	1.030	1.206	1.390	1.576
74	.728	.852	.982	1.114
77	.844	1.034	1.194	1.352
83	.780	.912	1.052	1.194
86	1.684	1.970	2.274	2.576
87	1.622	1.898	2.190	2.482
88	1.456	1.704	1.966	2.228
89	1.416	1.656	1.912	2.166
90	1.540	1.802	2.080	2.356
91	1.648	1.928	2.224	2.522
92	1.560	1.826	2.106	2.386
93	1.040	1.216	1.404	1.592
94	1.268	1.484	1.712	1.940
95	1.040	1.216	1.404	1.592
96	1.138	1.332	1.536	1.742
97	1.272	1.488	1.718	1.946

Continued -----





Table 12 . Cotton - Per acre yield by soil productivity groups within states, Lower Mississippi Region, estimated 1970, and projected 1980, 2000, and 2020 (continued)

State and soil group	1970 Bales	1980 Bales	2000 Bales	2020 Bales
Mississippi (continued)				
99	1.144	1.338	1.544	1.750
A0	1.030	1.206	1.390	1.576
A1	.728	.852	.982	1.114
A4	.844	1.034	1.194	1.352
A9	.780	.912	1.052	1.194
Missouri				
B2	1.400	1.638	1.890	2.142
B3	.900	1.052	1.216	1.376
B4	1.100	1.288	1.484	1.684
B5	1.200	1.404	1.620	1.836
B6	1.050	1.228	1.418	1.606
B7	1.000	1.170	1.350	1.530
B8	.500	.586	.676	.766
Tennessee				
C1	1.368	1.600	1.846	2.094
C2	1.224	1.432	1.652	1.872
C3	1.242	1.454	1.676	1.900
C4	.982	1.148	1.326	1.502
C5	1.500	1.756	2.026	2.296
C6	1.410	1.650	1.904	2.158
C7	1.112	1.302	1.502	1.702

1/ Soil scientists of the Soil Conservation Service do not recommend these soils for cotton.

Source: Economic Research Service and Soil Conservation Service, United States Department of Agriculture, Jackson, Mississippi.



Table 13. Soybeans - Per acre yield by soil productivity groups within states, Lower Mississippi Region, estimated 1970, and projected 1980, 2000, and 2020

State and soil group	1970 Bushels	1980 Bushels	2000 Bushels	2020 Bushels
Arkansas				
1	21	24	30	37
2	25	30	37	45
3	16	18	22	27
4	15	18	22	26
5	21	24	30	37
6	10	11	14	17
10	21	24	30	36
11	28	35	43	53
13	32	37	46	56
14	19	23	28	34
15	24	30	37	45
16	32	37	46	56
17	25	32	39	48
18	23	29	35	43
20	28	35	43	53
21	19	23	28	34
22	24	28	35	43
24	28	33	40	49
26	23	27	34	41
28	21	24	29	36
Kentucky				
30	33	41	50	62
31	29	36	44	54
32	35	43	54	65
33	24	30	37	45
34	24	30	37	45
35	29	36	44	54
Louisiana				
39	29	36	44	54
40	29	36	44	54
41	27	33	41	50
42	32	39	49	60
43	29	36	44	54
44	26	32	40	49

Continued -----



Table 13. Soybeans - Per acre yield by soil productivity groups within states, Lower Mississippi Region, estimated 1970, and projected 1980, 2000, and 2020 (continued)

State and soil group	1970 Bushels	1980 Bushels	2000 Bushels	2020 Bushels
Louisiana (continued)				
45	27	33	41	50
46	29	36	44	54
47	24	30	37	45
48	18	<u>1/</u>	<u>1/</u>	<u>1/</u>
49	22	<u>1/</u>	<u>1/</u>	<u>1/</u>
50	19	<u>1/</u>	<u>1/</u>	<u>1/</u>
51	14	<u>1/</u>	<u>1/</u>	<u>1/</u>
52	14	<u>1/</u>	<u>1/</u>	<u>1/</u>
Mississippi				
59	31	38	47	58
60	33	41	50	62
61	24	29	36	44
62	26	32	39	47
63	30	37	46	56
64	25	31	38	46
65	35	43	53	65
66	31	38	47	58
67	23	28	34	41
68	20	24	30	36
69	26	32	39	47
70	17	21	26	31
71	31	38	47	58
72	26	32	40	49
73	19	23	28	34
74	16	20	25	30
76	20	24	30	36
77	20	24	30	36
86	31	38	47	58
87	33	41	50	62
88	24	29	36	44
89	26	32	39	47
90	30	37	46	56
91	25	31	38	46
92	35	43	53	65
93	31	38	47	58
94	23	28	34	41

Continued -----



Table 13. Soybeans - Per acre yield by soil productivity groups within states, Lower Mississippi Region, estimated 1970, and projected 1980, 2000, and 2020 (continued)

State and soil group	1970 Bushels	1980 Bushels	2000 Bushels	2020 Bushels
Mississippi (continued)				
95	28	34	42	51
96	26	32	39	47
97	17	21	26	31
98	31	38	47	58
99	26	32	40	49
A0	19	23	28	34
A1	16	20	25	30
A3	20	24	30	36
A4	20	24	30	36
Missouri				
B2	35	43	54	64
B3	25	31	38	46
B4	20	25	31	37
B5	33	41	50	60
B6	28	34	43	52
B7	35	43	54	64
B8	18	22	28	33
Tennessee				
C1	28	34	43	52
C2	23	28	35	43
C3	19	23	29	36
C4	14	17	21	26
C5	30	37	46	56
C6	26	32	40	49
C7	19	23	29	36

<sup>1/</sup> Soil scientists of the Soil Conservation Service do not recommend these soils for soybeans.

Source: Economic Research Service and Soil Conservation Service, United States Department of Agriculture, Jackson, Mississippi.





Table 14. Corn - Per acre yield by soil productivity groups within states, Lower Mississippi Region, estimated 1970, and projected 1980, 2000, and 2020

State and soil group	1970 Bushels	1980 Bushels	2000 Bushels	2020 Bushels
Arkansas				
1	29	39	53	66
2	44	55	74	93
3	16	18	24	30
4	16	19	26	32
5	34	44	60	74
6	21	26	34	43
10	18	22	30	37
11	43	60	80	100
13	53	68	91	114
14	17	21	29	36
15	39	49	66	83
16	54	67	90	113
17	27	35	47	59
18	41	50	68	85
20	43	60	80	100
21	17	21	42	53
22	32	43	58	72
23	20	25	34	43
24	42	52	71	88
25	18	22	30	38
26	31	40	54	67
Kentucky				
30	85	105	130	159
31	66	81	101	123
32	74	91	113	138
33	56	69	86	105
34	49	60	75	92
35	53	65	81	99
Louisiana				
39	65	80	99	119
40	60	74	92	110
41	52	64	80	95
42	65	80	99	119
43	55	68	84	101
44	47	58	72	86
45	44	<u>1/</u>	<u>1/</u>	<u>1/</u>

Continued -----



Table 14. Corn - Per acre yield by soil productivity groups within states, Lower Mississippi Region, estimated 1970, and projected 1980, 2000, and 2020

State and soil group	1970 Bushels	1980 Bushels	2000 Bushels	2020 Bushels
Louisiana				
46	37	<u>1/</u>	<u>1/</u>	<u>1/</u>
47	33	<u>41</u>	<u>50</u>	<u>60</u>
48	37	<u>1/</u>	<u>1/</u>	<u>1/</u>
49	33	<u>1/</u>	<u>1/</u>	<u>1/</u>
50	30	<u>1/</u>	<u>1/</u>	<u>1/</u>
51	36	<u>1/</u>	<u>1/</u>	<u>1/</u>
52	30	<u>1/</u>	<u>1/</u>	<u>1/</u>
Mississippi				
59	60	74	92	112
60	58	71	89	108
61	46	57	70	86
62	48	59	73	90
63	51	63	78	95
64	56	69	86	105
65	49	60	75	92
66	40	49	61	75
67	42	52	64	79
68	27	33	41	50
69	33	41	50	62
70	45	55	69	84
71	74	91	113	138
72	43	53	66	80
73	35	43	54	65
74	25	31	38	47
76	31	38	47	58
77	31	38	47	58
86	60	74	92	112
87	58	71	89	108
88	46	57	70	86
89	48	59	73	90
90	51	63	78	95
91	56	69	86	105
92	49	60	75	92
93	40	49	61	75
94	42	52	64	79
96	33	41	50	62
97	45	55	69	84
98	74	91	113	138
99	43	53	66	80

Continued -----



Table 14. Corn - Per acre yield by soil productivity groups within states, Lower Mississippi Region, estimated 1970, and projected 1980, 2000, and 2020 (continued)

State and soil group	1970 Bushels	1980 Bushels	2000 Bushels	2020 Bushels
Mississippi (continued)				
A0	35	43	54	65
A1	25	31	38	47
A3	31	38	47	58
A4	31	38	47	58
Missouri				
B2	90	111	138	165
B3	50	62	76	92
B4	45	55	69	82
B5	50	62	76	92
B6	45	55	69	84
B7	40	49	61	73
B8	45	55	69	82
Tennessee				
C1	50	62	77	94
C2	42	52	64	79
C3	38	47	58	71
C4	33	41	50	62
C5	65	80	99	122
C6	60	74	92	92
C7	38	47	58	58

<sup>1/</sup> Soil scientists of the Soil Conservation Service do not recommend these soils for corn.

Source: Economic Research Service and Soil Conservation Service, United States Department of Agriculture, Jackson, Mississippi.



Table 15. Grain sorghum - Per acre yield by soil productivity groups within states, Lower Mississippi Region, estimated 1970, and projected 1980, 2000, and 2020

State and soil group	1970 Bushels	1980 Bushels	2000 Bushels	2020 Bushels
Arkansas				
1	43	52	65	80
2	54	65	81	100
3	32	39	49	60
4	32	39	49	60
5	46	56	70	87
6	18	22	27	33
10	39	47	60	73
11	39	47	60	73
12	18	22	27	33
13	54	65	81	100
14	38	45	57	70
15	50	60	76	93
16	57	69	87	107
17	50	60	76	93
18	54	65	81	100
20	46	56	70	87
21	39	47	60	73
22	39	47	60	73
23	29	34	43	53
24	46	56	70	87
25	29	34	43	53
26	39	47	60	73
28	43	52	65	80
Kentucky				
30	65	80	99	119
31	50	62	77	92
32	57	70	87	104
33	43	53	66	79
34	37	46	57	68
35	41	50	63	75
Louisiana				
39	47	58	72	86
40	36	44	55	66
41	36	44	55	66
42	39	48	60	72
43	33	41	50	60

Continued -----





Table 15. Grain sorghum - Per acre yield by soil productivity groups within states, Lower Mississippi Region, estimated 1970, and projected 1980, 2000, and 2020 (continued)

State and soil group	1970 Bushels	1980 Bushels	2000 Bushels	2020 Bushels
Louisiana (continued)				
44	32	39	49	58
45	27	33	41	49
46	31	38	47	57
47	25	31	38	46
48	31	<u>1/</u>	<u>1/</u>	<u>1/</u>
49	26	<u>1/</u>	<u>1/</u>	<u>1/</u>
50	26	<u>1/</u>	<u>1/</u>	<u>1/</u>
51	26	<u>1/</u>	<u>1/</u>	<u>1/</u>
52	26	<u>1/</u>	<u>1/</u>	<u>1/</u>
57	17	<u>1/</u>	<u>1/</u>	<u>1/</u>
Mississippi				
1	56	69	86	105
2	54	66	83	101
3	43	53	66	80
4	44	54	67	82
5	47	58	72	88
6	52	64	80	97
7	45	55	69	84
8	37	46	57	69
9	39	48	60	73
10	25	31	38	47
12	31	38	47	58
13	41	50	63	77
14	68	84	104	127
15	40	49	61	75
16	32	39	49	60
17	23	28	35	43
19	28	34	43	52
20	28	34	43	52
Missouri				
B2	60	74	92	110
B3	35	43	54	64
B4	25	31	38	46
B5	60	74	92	110
B6	30	37	46	55
B7	60	74	92	110
B8	40	49	61	73

Continued -----



Table 15. Grain sorghum - Per acre yield by soil productivity groups within states, Lower Mississippi Region, estimated 1970, and projected 1980, 2000, and 2020 (continued)

State and soil group	1970 Bushels	1980 Bushels	2000 Bushels	2020 Bushels
Louisiana (continued)				
44	32	39	49	58
45	27	33	41	49
46	31	38	47	57
47	25	31	38	46
48	31	<u>1/</u>	<u>1/</u>	<u>1/</u>
49	26	<u>1/</u>	<u>1/</u>	<u>1/</u>
50	26	<u>1/</u>	<u>1/</u>	<u>1/</u>
51	26	<u>1/</u>	<u>1/</u>	<u>1/</u>
52	26	<u>1/</u>	<u>1/</u>	<u>1/</u>
57	17	<u>1/</u>	<u>1/</u>	<u>1/</u>
Mississippi				
1	56	69	86	105
2	54	66	83	101
3	43	53	66	80
4	44	54	67	82
5	47	58	72	88
6	52	64	80	97
7	45	55	69	84
8	37	46	57	69
9	39	48	60	73
10	25	31	38	47
12	31	38	47	58
13	41	50	63	77
14	68	84	104	127
15	40	49	61	75
16	32	39	49	60
17	23	28	35	43
19	28	34	43	52
20	28	34	43	52
Missouri				
B2	60	74	92	110
B3	35	43	54	64
B4	25	31	38	46
B5	60	74	92	110
B6	30	37	46	55
B7	60	74	92	110
B8	40	49	61	73

Continued -----



Table 15, Grain sorghum - Per acre yield by soil productivity groups within states, Lower Mississippi Region, estimated 1970, and projected 1980, 2000, and 2020 (continued)

State and soil group	1970 Bushels	1980 Bushels	2000 Bushels	2020 Bushels
Tennessee				
C1	50	62	77	94
C2	62	52	64	79
C3	38	47	58	71
C4	33	41	50	62
C5	65	80	99	122
C6	60	74	92	1/
C7	38	47	58	71

1/ Soil scientists of the Soil Conservation Service do not recommend these soils for grain sorghum.

Source: Economic Research Service and Soil Conservation Service, United States Department of Agriculture, Jackson, Mississippi.



Table 16. Oats - Per acre yield by soil productivity groups within states; Lower Mississippi Region, estimated 1970, and projected 1980, 2000, and 2020

State and soil group	1970 Bushels	1980 Bushels	2000 Bushels	2020 Bushels
Arkansas				
1	49	61	70	77
2	57	70	80	88
3	39	47	53	58
4	35	44	50	55
5	43	55	63	69
10	38	48	55	61
11	54	70	80	88
13	60	75	86	94
14	36	43	49	54
15	49	63	72	79
16	63	77	88	97
17	43	58	66	73
18	50	65	74	82
20	54	70	80	88
21	36	43	49	54
22	47	58	66	73
23	35	42	48	53
24	50	62	71	79
25	34	42	48	53
26	43	55	62	69
Kentucky				
30	70	82	94	107
31	68	80	92	104
32	35	41	47	54
33	58	68	78	89
34	55	64	74	84
35	34	40	46	52
36	44	51	59	67
Louisiana				
39	55	64	74	84
40	49	57	66	75
41	44	51	59	67
42	44	51	59	67
43	28	33	38	43
44	55	64	74	84
45	35	41	47	54

Continued -----





Table 16. Oats - Per acre yield by soil productivity groups within states, Lower Mississippi Region, estimated 1970, and projected 1980, 2000, and 2020 (continued)

State and soil group	1970 Bushels	1980 Bushels	2000 Bushels	2020 Bushels
Louisiana (continued)				
46	38	44	51	28
47	28	1/	1/	1/
48	36	1/	1/	1/
49	43	1/	1/	1/
50	22	1/	1/	1/
51	51	1/	1/	1/
52	22	1/	1/	1/
53	41	1/	1/	1/
54	19	1/	1/	1/
Mississippi				
59	70	82	94	107
60	69	81	93	106
61	68	80	92	104
62	54	63	73	92
63	35	41	47	53
64	55	64	74	84
65	45	53	61	69
66	40	47	54	61
67	58	68	78	89
68	40	47	54	61
69	49	57	66	75
70	35	41	47	54
71	36	42	49	55
72	33	39	44	50
73	52	61	70	80
74	30	35	41	46
75	34	40	46	52
76	35	41	47	54
77	44	51	59	67
78	50	58	68	76
83	40	47	54	61
86	70	82	94	107
87	69	81	93	106
88	68	80	92	104
89	54	63	73	92
90	35	41	47	53
91	55	64	74	84
92	45	53	61	69

Continued -----



Table 16. Oats - Per acre yield by soil productivity groups within states; Lower Mississippi Region, estimated 1970, and projected 1980, 2000, and 2020 (continued)

State and soil group	1970 Bushels	1980 Bushels	2000 Bushels	2020 Bushels
Mississippi (continued)				
93	40	47	54	61
94	58	68	78	89
95	45	53	61	69
96	49	57	66	75
97	35	41	47	54
98	36	42	49	55
99	33	39	44	50
A0	52	61	70	80
A1	30	35	41	46
A2	34	40	46	52
A3	35	41	47	54
A4	44	51	59	67
A9	40	47	54	61
Missouri				
B2	55	64	74	84
B3	50	58	68	77
B4	45	53	61	69
B5	50	58	68	77
B6	50	58	68	77
B7	45	53	61	69
Tennessee				
C1	59	69	80	90
C2	50	59	68	77
C3	41	48	55	63
C4	47	55	63	72
C5	65	76	88	99
C6	62	73	84	95
C7	44	51	59	67

1/ Soil scientists of the Soil Conservation Service do not recommend these soils for oats.

Source: Economic Research Service and Soil Conservation Service, United States Department of Agriculture, Jackson, Mississippi.



Table 17. Wheat - Per acre yield by soil productivity groups within states, Lower Mississippi Region, estimated 1970, and projected 1980, 2000, and 2020

State and soil group	1970 Bushels	1980 Bushels	2000 Bushels	2020 Bushels
Arkansas				
1	29	36	43	50
2	30	37	43	51
3	19	22	26	30
4	23	29	33	39
5	20	25	29	34
10	26	31	37	43
11	40	51	60	70
13	46	57	67	78
14	25	30	35	41
15	29	35	41	48
16	47	58	68	79
17	29	36	42	49
18	31	38	45	52
20	40	51	60	70
21	25	30	35	41
22	28	35	41	48
26	20	25	30	35
28	26	33	38	45
Kentucky				
30	33	41	50	62
31	31	38	47	58
32	23	28	35	43
33	29	36	44	54
34	21	26	32	39
Louisiana				
39	40	49	61	75
40	36	44	55	67
41	32	39	49	60
42	32	39	49	60
43	20	25	31	37
44	40	49	61	75
45	26	32	40	49
46	32	39	49	60
47	20	1/	1/	1/
48	26	1/	1/	1/
49	31	1/	1/	1/
50	16	1/	1/	1/

Continued -----



Table 17. Wheat - Per acre yield by soil productivity groups within states, Lower Mississippi Region, estimated 1970, and projected 1980, 2000, and 2020 (continued)

State and soil group	1970 Bushels	1980 Bushels	2000 Bushels	2020 Bushels
Louisiana (continued)				
51	37	<u>1/</u>	<u>1/</u>	<u>1/</u>
52	16	<u>1/</u>	<u>1/</u>	<u>1/</u>
53	30	<u>1/</u>	<u>1/</u>	<u>1/</u>
54	14	<u>1/</u>	<u>1/</u>	<u>1/</u>
Mississippi				
59	41	50	63	77
60	38	47	58	71
61	35	43	54	65
62	33	41	50	62
63	23	28	35	43
64	38	47	58	71
65	38	47	58	71
66	38	47	58	71
67	32	39	49	60
68	26	32	40	49
69	31	38	47	58
71	33	41	50	62
72	29	36	44	54
73	26	32	40	49
75	28	34	43	52
76	20	25	31	37
78	20	25	31	37
86	41	50	63	77
87	38	47	58	71
88	35	43	54	65
89	33	41	50	62
90	23	28	35	43
91	38	47	58	71
92	38	47	58	71
93	38	47	58	71
94	32	39	49	60
95	29	36	47	54
96	31	38	47	58
98	33	41	50	62
99	29	36	44	54
A0	26	32	40	49
A2	28	34	43	52
A3	20	25	31	37

Continued -----





Table 17. Wheat - Per acre yield by soil productivity groups within states, Lower Mississippi Region, estimated 1970, and projected 1980, 2000, and 2020 (continued)

State and soil group	1970 Bushels	1980 Bushels	2000 Bushels	2020 Bushels
Missouri				
B2	40	49	61	73
B3	35	43	54	64
B4	30	37	46	55
B5	35	43	54	64
B6	35	43	54	65
B7	35	43	54	64
B8	32	39	49	59
Tennessee				
C1	35	43	54	65
C2	27	33	41	50
C3	23	28	35	43
C4	20	25	31	37
C5	26	32	40	49
C6	24	30	37	45
C7	17	21	26	32

<sup>1/</sup> Soil scientists of the Soil Conservation Service do not recommend these soils for wheat.

Source: Economic Research Service and Soil Conservation Service, United States Department of Agriculture, Jackson, Mississippi.



Table 18. Rice - Per acre yield by soil productivity groups within states, Lower Mississippi Region, estimated 1970, and projected 1980, 2000, and 2020

State and soil group	1970 Bushels	1980 Bushels	2000 Bushels	2020 Bushels
Arkansas				
10	91	105	122	139
11	93	106	123	140
14	98	112	130	148
15	128	146	170	193
17	128	146	170	193
20	93	106	123	140
21	98	112	130	148
Louisiana				
45	83	102	127	155
47	85	105	130	159
Mississippi				
96	90	105	121	138
Missouri				
B5	94	116	144	172
B6	94	116	144	172
B7	99	122	151	181

Source: Economic Research Service and Soil Conservation Service, United States Department of Agriculture, Jackson, Mississippi.

Table 19. Sugarcane - Per acre yield by soil productivity groups within states, Lower Mississippi Region, estimated 1970, and projected 1980, 2000, and 2020

State and soil group	1970 Tons	1980 Tons	2000 Tons	2020 Tons
Louisiana				
39	30	35	41	46
40	23	27	31	35
42	29	34	39	44
43	26	30	35	40
45	24	28	32	37

Source: Economic Research Service and Soil Conservation Service, United States Department of Agriculture, Jackson, Mississippi.



Table 20, Sweet potatoes - Per acre yield by soil productivity groups within states, Lower Mississippi Region, estimated 1970, and projected 1980, 2000, and 2020

State and soil group	1970	1980	2000	2020
	Bushels	Bushels	Bushels	Bushels
Louisiana				
39	155	191	233	262
41	150	185	228	257
44	156	192	234	292
47	130	160	208	238

Source: Economic Research Service and Soil Conservation Service, United States Department of Agriculture, Jackson, Mississippi.

Table 21. Tobacco - Per acre yield by soil productivity groups within states, Lower Mississippi Region, estimated 1970, and projected 1980, 2000, and 2020

State and soil group	1970	1980	2000	2020
	Pounds	Pounds	Pounds	Pounds
Kentucky				
33	2,400	2,837	3,121	3,433

Source: Economic Research Service and Soil Conservation Service, United States Department of Agriculture, Jackson, Mississippi.



Table 22.. Irrigated cotton - Per acre yield by soil productivity groups within states, Lower Mississippi Region, estimated 1970, and projected 1980, 2000, and 2020

State and soil group	1970 Bales	1980 Bales	2000 Bales	2020 Bales
<b>Arkansas</b>				
2	1.204	1.430	1.658	1.890
10	1.016	1.208	1.402	1.598
11	1.196	1.476	1.712	1.952
13	1.510	1.828	2.120	2.416
14	1.274	1.142	1.324	1.510
15	1.300	1.560	1.810	2.064
16	1.574	1.906	2.210	2.520
17	1.194	1.426	1.654	1.886
18	1.226	1.458	1.692	1.928
20	1.196	1.476	1.712	1.952
21	.938	1.142	1.324	1.510
<b>Louisiana, WRPA 5B and 6</b>				
39	1.732	2.060	2.412	2.776
40	1.588	1.874	2.182	2.500
41	1.470	1.734	2.020	2.314
43	1.524	1.800	2.094	2.400
44	1.256	1.484	1.724	1.976
45	1.022	1.208	1.404	1.610
<b>Louisiana, WRPA 8, 9, and 10</b>				
C8	1.732	2.060	2.412	2.776
C9	1.634	1.942	2.274	2.618
D0	1.512	1.796	2.106	2.424
D1	1.570	1.866	2.184	2.514
D2	1.292	1.536	1.798	2.070
D3	1.102	1.310	1.546	1.758
<b>Mississippi</b>				
59	2.164	2.470	2.774	3.076
60	2.122	2.398	2.690	2.982
61	1.856	2.104	2.366	2.628
62	1.616	1.856	2.112	2.366
63	1.740	2.002	2.280	2.556
64	2.148	2.428	2.724	3.022
65	1.960	2.226	2.506	2.786
66	1.340	1.516	1.704	1.892
67	1.468	1.684	1.912	2.140
69	1.338	1.532	1.736	1.942
70	1.572	1.788	2.018	2.246
86	2.164	2.470	2.774	3.076
87	2.122	2.398	2.690	2.982

Continued -----





Table 22. Irrigated cotton - Per acre yield by soil productivity groups within states, Lower Mississippi Region, estimated 1970, and projected 1980, 2000, and 2020 (continued)

State and soil group	1970	1980	2000	2020
	Bales	Bales	Bales	Bales
Mississippi (continued)				
88	1.856	2.104	2.366	2.628
89	1.616	1.856	2.112	2.366
90	1.740	2.002	2.280	2.556
91	2.148	2.428	2.724	3.022
92	1.960	2.226	2.506	2.786
93	1.340	1.516	1.704	1.892
94	1.468	1.684	1.912	2.140
95	1.240	1.416	1.604	1.792
96	1.338	1.532	1.736	1.942
97	1.572	1.788	2.018	2.246
Missouri				
B2	1.600	1.858	2.132	2.406
B3	1.400	1.496	1.596	1.696
B5	1.450	1.574	1.704	1.834
B6	1.200	1.250	1.304	1.358
B7	1.150	1.244	1.352	1.454
B8	1.100	1.137	1.177	1.216

Source: Economic Research Service and Soil Conservation Service, United States Department of Agriculture, Jackson, Mississippi.



Table 23. Irrigated soybeans - Per acre yield by soil productivity groups within states, Lower Mississippi Region, estimated 1970, and projected 1980, 2000, and 2020

State and soil group	1970 Bushels	1980 Bushels	2000 Bushels	2020 Bushels
<b>Arkansas</b>				
2	33	39	47	56
10	27	32	38	45
11	35	43	52	62
13	38	44	53	63
14	28	32	38	46
15	32	39	47	56
16	38	44	53	63
17	33	42	50	60
18	32	38	45	54
20	35	43	52	62
21	28	32	38	46
<b>Louisiana, WRPA 5B and 6</b>				
39	30	38	47	59
40	30	38	47	59
41	28	35	44	55
43	30	38	47	59
44	27	34	43	54
45	28	35	44	55
47	25	32	40	50
<b>Louisiana, WRPA 8, 9, and 10</b>				
C8	32	41	52	65
C9	32	41	52	65
D0	30	37	48	60
D1	32	41	52	65
D2	29	35	47	59
D3	31	38	48	62
<b>Mississippi</b>				
59	41	48	57	68
60	43	51	60	72
61	33	38	45	53
62	31	37	44	52
63	35	42	51	61
64	34	40	47	55
65	44	51	61	74
66	37	44	53	64
67	29	34	40	47
69	33	40	46	54

Continued -----



Table 23. Irrigated soybeans - Per acre yield by soil productivity groups within states, Lower Mississippi Region, estimated 1970, and projected 1980, 2000, and 2020 (continued)

State and soil group	1970 Bushels	1980 Bushels	2000 Bushels	2020 Bushels
Mississippi (continued)				
70	22	26	31	36
86	41	48	57	68
87	43	51	60	72
88	33	38	45	53
89	31	37	44	52
90	35	42	51	61
91	34	40	47	55
92	44	51	61	74
93	37	44	53	64
94	29	34	40	47
95	35	41	49	58
96	33	40	46	54
97	22	26	31	36
Missouri				
B2	40	49	60	73
B3	40	44	48	54
B5	38	42	48	55
B6	34	36	39	41
B7	40	45	51	57
B8	38	40	42	45

Source: Economic Research Service and Soil Conservation Service, United States Department of Agriculture, Jackson, Mississippi.



Table 24. Irrigated corn - Per acre yield by soil productivity groups within states, Lower Mississippi Region, estimated 1970, and projected 1980, 2000, and 2020

State and soil group	1970 Bushels	1980 Bushels	2000 Bushels	2020 Bushels
Louisiana, WRPA 5B and 6				
39	72	90	112	136
40	66	83	104	126
41	57	72	91	109
43	61	76	95	116
44	52	65	82	99
47	36	46	57	69
Louisiana, WRPA 8, 9, and 10				
C8	75	95	120	148
C9	69	88	111	137
D0	60	76	97	118
D1	63	81	102	126
D2	54	69	87	107
Mississippi				
59	86	100	118	138
60	83	96	114	133
61	69	80	93	109
62	68	79	93	110
63	71	83	98	115
64	82	95	114	131
65	74	85	100	117
66	62	71	83	97
67	64	74	86	101
69	51	59	68	80
70	65	75	89	104
86	86	100	118	138
87	83	96	114	133
88	69	80	93	109
89	68	79	93	110
90	71	83	98	115
91	82	95	114	131
92	74	85	100	117
93	62	71	83	97
94	64	74	86	101
96	51	59	68	80
97	65	75	89	104

Continued -----





Table 24. Irrigated corn - Per acre yield by soil productivity groups within states, Lower Mississippi Region, estimated 1970, and projected 1980, 2000, and 2020 (continued)

State and soil group	1970 Bushels	1980 Bushels	2000 Bushels	2020 Bushels
Missouri				
B2	100	122	150	183
B3	100	109	121	135
B5	85	95	108	122
B6	85	90	96	103
B7	80	89	101	115
B8	85	89	94	100

Source: Economic Research Service and Soil Conservation Service, United States Department of Agriculture, Jackson, Mississippi.



Table 25. Cotton - Per acre yield by soil productivity groups within states, Lower Mississippi Region, estimated 1970, and projected 1980, 2000, and 2020, assuming no resource development after 1970

State and soil group	1970 Bales	1980 Bales	2000 Bales	2020 Bales
Arkansas				
1	.776	.911	1.064	1.203
2	1.020	1.164	1.310	1.457
3	.488	.552	.640	.730
5	.644	.714	.777	.867
10	.678	.793	.908	1.025
11	.958	1.160	1.331	1.503
13	1.216	1.410	1.587	1.767
14	.666	.796	.913	1.031
15	.934	1.028	1.118	1.209
16	1.248	1.499	1.729	1.962
17	.878	.963	1.047	1.132
18	.930	1.017	1.105	1.195
20	.958	1.160	1.331	1.503
21	.722	.862	.988	1.170
22	.844	1.040	1.199	1.361
23	.534	.600	.696	.794
24	.934	1.075	1.210	1.347
25	.544	.621	.711	.803
26	.660	.735	.816	.898
28	.926	1.149	1.310	1.473
Kentucky				
30	1.660	1.928	2.212	2.496
31	1.470	1.658	1.856	2.054
32	1.250	1.430	1.622	1.814
33	1.234	1.370	1.514	1.660
34	.988	1.072	1.160	1.250
35	1.114	1.238	1.368	1.498
Louisiana				
39	1.650	1.846	2.054	2.262
40	1.556	1.768	1.992	2.216
41	1.440	1.660	1.894	2.126
42	1.590	1.752	1.924	2.096
43	1.494	1.646	1.808	1.970

Continued -----



Table 25. Cotton - Per acre yield by soil productivity groups within states, Lower Mississippi Region, estimated 1970, and projected 1980, 2000, and 2020, assuming no resource development after 1970 (continued)

State and soil group	1970 Bales	1980 Bales	2000 Bales	2020 Bales
Louisiana (continued)				
44	1.230	1.418	1.616	1.816
45	1.002	1.044	1.090	1.134
46	.960	1.106	1.262	1.418
Mississippi				
59	1.684	1.956	2.244	2.532
60	1.622	1.870	2.132	2.396
61	1.456	1.642	1.838	2.034
62	1.416	1.584	1.762	1.942
63	1.540	1.762	1.998	2.234
64	1.648	1.872	2.110	2.346
65	1.560	1.746	1.942	2.138
66	1.040	1.190	1.350	1.508
67	1.268	1.408	1.556	1.704
68	.780	.872	.972	1.070
69	1.138	1.254	1.376	1.410
70	1.272	1.412	1.562	1.710
72	1.144	1.222	1.304	1.386
73	1.030	1.118	1.210	1.302
74	.728	.790	.856	.920
77	.844	.916	.992	1.068
83	.780	.880	.984	1.090
86	1.684	1.956	2.244	2.532
87	1.622	1.870	2.132	2.396
88	1.456	1.642	1.838	2.034
89	1.416	1.584	1.762	1.942
90	1.540	1.762	1.998	2.234
91	1.648	1.872	2.110	2.346
92	1.560	1.746	1.942	2.138
93	1.040	1.190	1.350	1.508
94	1.268	1.408	1.556	1.704
95	1.040	1.164	1.294	1.426
96	1.138	1.254	1.376	1.410
97	1.272	1.412	1.562	1.710
99	1.144	1.222	1.304	1.386
A0	1.030	1.118	1.210	1.302

Continued -----



Table 25. Cotton - Per acre yield by soil productivity groups within states, Lower Mississippi Region, estimated 1970, and projected 1980, 2000, and 2020, assuming no resource development after 1970 (continued)

State and soil group	1970 Bales	1980 Bales	2000 Bales	2020 Bales
Mississippi (continued)				
A1	.728	.790	.856	.920
A4	.844	.916	.992	1.068
A9	.780	.880	.984	1.090
Missouri				
B2	1.400	1.626	1.866	2.104
B3	.900	.962	1.026	1.090
B4	1.100	1.278	1.466	1.654
B5	1.200	1.302	1.410	1.518
B6	1.050	1.094	1.142	1.190
B7	1.000	1.086	1.176	1.266
B8	.500	.517	.535	.553
Tennessee				
C1	1.368	1.554	1.752	1.948
C2	1.224	1.390	1.566	1.742
C3	1.242	1.306	1.372	1.440
C4	.982	1.132	1.292	1.450
C5	1.500	1.678	1.868	2.056
C6	1.410	1.482	1.558	1.634
C7	1.112	1.150	1.190	1.228

Source: Economic Research Service and Soil Conservation Service, United States Department of Agriculture, Jackson, Mississippi.





Table 26. Soybeans - Per acre yield by soil productivity groups within states, Lower Mississippi Region, estimated 1970, and projected 1980, 2000, and 2020, assuming no resource development after 1970

State and soil group	1970 Bushels	1980 Bushels	2000 Bushels	2020 Bushels
Arkansas				
1	21	24	29	35
2	25	29	34	40
3	16	18	22	27
4	15	18	22	26
5	21	23	26	29
6	10	11	14	17
10	21	23	29	35
11	28	34	33	51
13	32	36	43	50
14	19	23	27	33
15	24	27	31	35
16	32	37	45	55
17	25	29	32	37
18	23	26	29	33
20	28	34	42	51
21	19	23	27	33
22	24	28	34	42
24	28	32	37	44
26	23	26	30	35
28	21	24	28	34
Kentucky				
30	33	40	50	60
31	29	34	41	48
32	35	42	51	61
33	24	28	32	38
34	24	27	30	34
35	29	33	39	45
Louisiana				
39	29	34	40	47
40	29	34	41	49
41	27	33	40	48
42	29	33	38	44
43	29	33	38	44

Continued -----



Table 26. Soybeans - Per acre yield by soil productivity groups within states, Lower Mississippi Region, estimated 1970, and projected 1980, 2000, and 2020, assuming no resource development after 1970 (continued)

State and soil group	1970 Bushels	1980 Bushels	2000 Bushels	2020 Bushels
Louisiana (continued)				
44	26	31	38	46
45	27	29	31	33
46	29	35	43	52
47	24	27	30	34
Mississippi				
59	31	38	47	57
60	33	40	49	59
61	24	28	34	40
62	26	30	36	42
63	30	36	44	52
64	25	30	36	42
65	35	41	48	56
66	31	37	45	54
67	23	26	31	36
68	20	23	27	32
69	26	30	34	40
70	17	20	23	27
71	31	35	39	44
72	26	28	32	35
73	19	21	24	27
74	16	18	20	23
76	20	22	24	27
77	20	22	25	29
86	31	38	47	57
87	33	40	49	59
88	24	28	34	40
89	26	30	36	42
90	30	36	44	52
91	25	30	36	42
92	35	41	48	56
93	31	37	45	54
94	23	26	31	36
95	28	33	38	45
96	26	30	34	40
97	17	20	23	27

Continued -----



Table 26. Soybeans - Per acre yield by soil productivity groups within states, Lower Mississippi Region, estimated 1970, and projected 1980, 2000, and 2020, assuming no resource development after 1970 (continued)

State and soil group	1970 Bushels	1980 Bushels	2000 Bushels	2020 Bushels
Mississippi (continued)				
98	31	35	39	44
99	26	28	32	35
A0	19	21	24	27
A1	16	18	20	23
A3	20	22	24	27
A4	20	22	25	29
Missouri				
B2	35	43	53	64
B3	25	27	30	34
B4	20	24	30	37
B5	33	37	42	47
B6	28	30	32	34
B7	35	39	44	50
B8	18	19	20	21
Tennessee				
C1	28	33	40	47
C2	23	27	33	39
C3	19	21	23	26
C4	14	17	21	25
C5	30	32	35	38
C6	26	28	32	35
C7	19	27	29	31

Source: Economic Research Service and Soil Conservation Service, United States Department of Agriculture, Jackson, Mississippi.



Table 27. Corn - Per acre yield by soil productivity groups within states, Lower Mississippi Region, estimated 1970, and projected 1980, 2000, and 2020, assuming no resource development after 1970

State and soil group	1970 Bushels	1980 Bushels	2000 Bushels	2020 Bushels
Arkansas				
1	29	38	51	62
2	44	52	67	81
3	16	18	24	30
4	16	19	26	32
5	34	39	47	54
6	21	26	33	42
10	18	21	29	35
11	43	58	76	94
13	53	64	82	99
14	17	21	28	34
15	39	44	53	61
16	54	66	88	110
17	27	31	37	43
18	41	46	55	64
20	43	58	76	94
21	17	21	40	49
22	32	42	57	70
23	20	25	34	43
24	42	50	64	77
25	18	22	29	36
26	31	39	51	62
Kentucky				
30	85	104	128	155
31	66	77	92	109
32	74	88	107	129
33	56	64	75	88
34	49	55	62	70
35	53	61	71	83
Louisiana				
39	65	75	89	105
40	60	71	85	102
41	52	63	77	93
42	65	74	86	99

Continued-----





Table 27. Corn - Per acre yield by soil productivity groups within states, Lower Mississippi Region, estimated 1970, and projected 1980, 2000, and 2020, assuming no resource development after 1970 (continued)

State and soil group	1970 Bushels	1980 Bushels	2000 Bushels	2020 Bushels
Louisiana (continued)				
43	55	63	72	84
44	47	57	69	84
47	33	37	42	47
Mississippi				
59	60	73	90	110
60	58	70	86	103
61	46	54	64	76
62	48	56	66	77
63	51	61	74	89
64	56	66	80	95
65	49	57	67	79
66	40	48	58	70
67	42	48	56	66
68	27	31	37	43
69	33	38	43	50
70	45	52	61	70
71	74	83	94	106
72	43	47	52	58
73	35	39	44	50
74	25	28	32	36
76	31	34	38	42
77	31	35	39	44
86	60	73	90	110
87	58	70	86	103
88	46	54	64	76
89	48	56	66	77
90	51	61	74	89
91	56	66	80	95
92	49	57	67	79
93	40	48	58	70
94	42	48	56	66
96	33	38	43	50
97	45	52	61	70
98	74	83	94	106
99	43	47	52	58

Continued-----



Table 27. Corn - Per acre yield by soil productivity groups within states, Lower Mississippi Region, estimated 1970, and projected 1980, 2000, and 2020, assuming no resource development after 1970 (continued)

State and soil group	1970 Bushels	1980 Bushels	2000 Bushels	2020 Bushels
Mississippi (continued)				
A0	35	39	44	50
A1	25	28	32	36
A3	31	34	38	42
A4	31	35	39	44
Missouri				
B2	90	110	135	164
B3	50	55	61	67
B4	45	55	68	82
B5	50	56	63	72
B6	45	48	51	55
B7	40	45	51	57
B8	45	47	50	53
Tennessee				
C1	50	59	71	85
C2	42	50	60	71
C3	38	41	44	48
C4	33	40	49	59
C5	65	75	89	105
C6	60	64	70	76
C7	38	40	42	45

Source: Economic Research Service and Soil Conservation Service, United States Department of Agriculture, Jackson, Mississippi.



Table 28. Grain sorghum - Per acre yield by soil productivity groups within states, Lower Mississippi Region, estimated 1970, and projected 1980, 2000, and 2020, assuming no resource development after 1970

State and soil group	1970 Bushels	1980 Bushels	2000 Bushels	2020 Bushels
Kentucky				
30	65	79	98	119
31	50	59	70	83
32	57	68	83	99
33	43	49	58	67
34	37	41	47	53
35	41	47	55	64
Louisiana				
39	47	55	64	76
40	36	43	51	61
41	36	43	53	64
42	39	44	51	59
43	33	38	43	50
44	32	39	47	57
45	27	29	31	33
46	31	37	46	55
47	25	28	32	36

Source: Economic Research Service and Soil Conservation Service, United States Department of Agriculture, Jackson, Mississippi.



Table 29. Oats - Per acre yield by soil productivity groups within states, Lower Mississippi Region, estimated 1970, and projected 1980, 2000, and 2020, assuming no resource development after 1970

State and soil group	1970 Bushels	1980 Bushels	2000 Bushels	2020 Bushels
Arkansas				
1	49	60	68	74
2	57	67	74	80
3	39	47	53	58
4	35	44	50	55
5	43	49	53	56
10	38	47	53	59
11	54	68	77	85
13	60	71	80	86
14	36	42	48	52
15	49	56	61	64
16	63	76	87	95
17	43	51	55	58
18	50	58	62	66
20	54	68	77	85
21	36	42	48	52
22	47	57	65	72
23	35	42	48	53
24	50	59	66	72
25	34	41	47	51
26	43	53	59	65
Kentucky				
30	70	81	93	105
31	68	77	86	95
32	35	40	45	51
33	58	64	71	78
34	55	60	65	70
35	34	38	42	46
36	44	48	52	56
Louisiana				
39	55	62	68	75
40	49	56	63	70
41	44	51	58	65
42	44	48	53	58
43	28	31	34	37

Continued -----





Table 29. Oats - Per acre yield by soil productivity groups within states, Lower Mississippi Region, estimated 1970, and projected 1980, 2000, and 2020, assuming no resource development after 1970 (continued)

State and soil group	1970 Bushels	1980 Bushels	2000 Bushels	2020 Bushels
Louisiana (continued)				
44	55	63	72	81
45	35	36	38	40
46	36	42	47	53
Mississippi				
59	70	85	105	128
60	69	83	102	123
61	68	80	86	95
62	54	63	74	87
63	35	42	45	51
64	55	62	70	78
65	45	50	56	62
66	40	46	52	58
67	58	64	71	78
68	40	45	50	55
69	49	54	59	65
70	35	39	43	47
71	36	39	42	46
72	33	35	38	40
73	52	56	61	66
74	30	33	35	38
75	34	36	39	41
76	35	37	40	42
77	44	48	52	56
78	50	53	57	61
83	40	45	51	56
86	70	85	105	128
87	69	83	102	123
88	68	80	86	95
89	54	63	74	87
90	35	42	45	51
91	55	62	70	78
92	45	50	56	62
93	40	46	52	58
94	58	64	71	78

Continued-----



Table 29. Oats - Per acre yield by soil productivity groups within states, Lower Mississippi Region, estimated 1970, and projected 1980, 2000, and 2020, assuming no resource development after 1970 (continued)

State and soil group	1970 Bushels	1980 Bushels	2000 Bushels	2020 Bushels
Mississippi (continued)				
95	45	50	56	62
96	49	54	59	65
97	35	39	43	47
98	36	39	42	46
99	33	35	38	40
A0	52	56	61	66
A1	30	33	35	38
A2	34	36	39	41
A3	35	37	40	42
A4	44	48	52	56
A9	40	45	51	56
Missouri				
B2	55	64	73	83
B3	50	53	57	61
B4	45	52	60	68
B5	50	54	59	63
B6	50	52	54	57
B7	45	49	53	57
Tennessee				
C1	59	68	78	87
C2	50	58	66	74
C3	41	43	45	48
C4	47	54	62	69
C5	65	68	72	75
C6	62	69	77	85
C7	44	51	59	66

Source: Economic Research Service and Soil Conservation Service, United States Department of Agriculture, Jackson, Mississippi.



Table 30. Wheat - Per acre yield by soil productivity groups within states, Lower Mississippi Region, estimated 1970, and projected 1980, 2000, and 2020, assuming no resource development after 1970

State and soil group	1970 Bushels	1980 Bushels	2000 Bushels	2020 Bushels
Arkansas				
1	29	35	42	48
2	30	35	40	46
3	19	22	26	30
4	23	29	33	39
5	20	23	25	27
10	26	31	36	41
11	40	50	58	67
13	46	54	62	70
14	25	30	34	39
15	29	32	35	39
16	47	57	67	77
17	29	33	36	44
18	31	35	38	42
20	40	50	58	67
21	25	30	34	39
22	28	35	40	47
26	20	23	27	30
28	26	32	36	42
Kentucky				
30	33	40	50	60
31	31	36	43	51
32	23	27	33	40
33	29	33	39	45
34	21	23	27	30
Louisiana				
39	40	46	55	64
40	36	43	51	61
41	32	39	47	57
42	32	36	42	49
43	20	23	26	30
44	40	48	59	71
45	26	27	29	32
46	32	39	47	57

Continued =====



Table 30. Wheat - Per acre yield by soil productivity groups within states, Lower Mississippi Region, estimated 1970, and projected 1980, 2000, and 2020, assuming no resource development after 1970 (continued)

State and soil group	1970 Bushels	1980 Bushels	2000 Bushels	2020 Bushels
Mississippi				
59	41	50	62	75
60	38	46	56	68
61	35	41	49	58
62	33	41	48	56
63	23	27	33	40
64	38	45	54	64
65	38	44	52	61
66	38	45	55	66
67	32	37	43	50
68	26	30	36	42
69	31	35	41	47
71	33	37	42	47
72	29	32	35	39
73	26	29	33	37
75	28	31	34	38
76	20	22	24	27
78	20	22	24	27
86	41	50	62	75
87	38	46	56	68
88	35	41	49	58
89	33	41	48	56
90	23	27	33	40
91	38	45	54	64
92	38	44	52	61
93	38	45	55	66
94	32	37	43	50
95	29	34	40	47
96	31	35	41	47
98	33	37	42	47
99	29	32	35	39
A0	26	29	33	37
A2	28	31	34	38
A3	20	22	24	27

Continued-----





Table 30. Wheat - Per acre yield by soil productivity groups within states, Lower Mississippi Region, estimated 1970, and projected 1980, 2000, and 2020, assuming no resource development after 1970 (continued)

State and soil group	1970 Bushels	1980 Bushels	2000 Bushels	2020 Bushels
Missouri				
B2	40	49	60	73
B3	35	38	42	47
B4	30	37	45	55
B5	35	39	44	50
B6	35	37	40	43
B7	35	39	44	50
B8	32	33	35	38
Tennessee				
C1	35	42	52	62
C2	27	33	40	48
C3	23	25	27	29
C4	20	24	30	36
C5	26	28	30	33
C6	24	28	33	39
C7	17	21	26	31

Source: Economic Research Service and Soil Conservation Service, United States Department of Agriculture, Jackson, Mississippi.



Table 31. Rice - Per acre yield by soil productivity groups within states, Lower Mississippi Region, estimated 1970, and projected 1980, 2000, and 2020, assuming no resource development after 1970

State and soil group	1970 Bushels	1980 Bushels	2000 Bushels	2020 Bushels
Arkansas				
10	91	104	119	134
11	93	105	120	135
14	98	109	122	136
15	128	137	149	161
17	128	137	149	161
20	93	105	120	135
21	98	111	127	143
Louisiana				
45	83	100	123	148
47	85	103	126	152
Mississippi				
96	90	105	121	138
Missouri				
B5	94	105	119	135
B6	94	99	106	114
B7	99	110	125	142

Source: Economic Research Service and Soil Conservation Service, United States Department of Agriculture, Jackson, Mississippi.

Table 32. Sugarcane - Per acre yield by soil productivity groups within states, Lower Mississippi Region, estimated 1970, and projected 1980, 2000, and 2020, assuming no resource development after 1970

State and soil group	1970 Tons	1980 Tons	2000 Tons	2020 Tons
Louisiana				
39	30	34	37	41
40	23	26	29	33
42	29	32	35	38
43	26	29	31	34
45	24	25	26	27

Source: Economic Research Service and Soil Conservation Service, United States Department of Agriculture, Jackson, Mississippi.



Table 33 . Sweet potatoes - Per acre yield by soil productivity groups within states, Lower Mississippi Region, estimated 1970, and projected 1980, 2000, and 2020, assuming no resource development after 1970

State and soil group	1970	1980	2000	2020
	Bushels	Bushels	Bushels	Bushels
Louisiana				
39	155	180	213	249
41	150	181	222	267
44	156	188	230	278
47	130	145	164	186

Source: Economic Research Service and Soil Conservation Service, United States Department of Agriculture, Jackson, Mississippi.

Table 34.. Tobacco - Per acre yield by soil productivity groups within states, Lower Mississippi Region, estimated 1970, and projected 1980, 2000, and 2020, assuming no resource development after 1970

State and soil group	1970	1980	2000	2020
	Pounds	Pounds	Pounds	Pounds
Kentucky				
33	2,400	2,837	3,121	3,433

Source: Economic Research Service and Soil Conservation Service, United States Department of Agriculture, Jackson, Mississippi.



Table 35. Estimated crop production budgets by cost groups, Lower Mississippi Region, 1970

Cost Group	Soil productivity groups included in cost group	Crop	Preharvest cost		Fixed harvest cost		Variable harvest cost		Source
			per acre	per acre	cost per acre	cost per unit	of production	of production	
			Dollars	Dollars	Dollars	Dollars	Dollars	Dollars	
No. 1	04, 05, 10, 11, 12, 13,	Cotton	61.20	35.77	21.95/Bale	(1, pg. 27)			
	14, 15, 18, 20, 21, 23,	Corn	39.27	11.36	0.10/Bu.	(2, pg. 53)			
	24, 25, B2, B3, B4, B5,	Oats	25.18	6.54	0.10/Bu.	(2, pg. 61)			
	B6, C3	Rice	112.73	8.59	0.25/Bu.	(3, pg. 16)			
		Wheat	25.16	6.54	0.10/Bu.	(2, pg. 57)			
		Soybeans	28.40	7.47	0.10/Bu.	(2, pp. 39-44)			
		Misc. Crops	31.29	0.00	0.00	(4)			
	Pasture	1.96	0.00	0.00	(4)				
No. 2	03, 06, 16, 22, B8, C1,	Cotton	60.26	40.56	21.95/Bale	(5, pg. 27)			
	C2, C4	Corn	39.04	11.36	0.10/Bu.	(5, pg. 53)			
		Oats	21.87	6.54	0.10/Bu.	(5, pg. 62)			
		Wheat	23.30	6.54	0.10/Bu.	(5, pg. 57)			
		Soybeans	33.94	7.47	0.10/Bu.	(5, pp. 39-44)			
		Misc. Crops	31.29	0.00	0.00	(4)			
		Pasture	1.96	0.00	0.00	(4)			
No. 3	17, 28, B7, B9, C5, C6,	Cotton	49.06	30.77	21.95/Bale	(1, pg. 69)			
	C7	Corn	45.30	11.36	0.10/Bu.	(1, pg. 89)			
		Oats	18.35	6.54	0.10/Bu.	(5, pg. 107)			
		Rice	112.73	8.59	0.25/Bu.	(3, pg. 16)			
		Wheat	19.51	6.54	0.10/Bu.	(1, pg. 93)			
		Soybeans	33.17	7.47	0.10/Bu.	(1, pp. 75-80)			
		Misc. Crops	31.29	0.00	0.00	(4)			
	Pasture	1.96	0.00	0.00	(4)				

Continued-----





Table 35. Estimated crop production budgets by cost groups, Lower Mississippi Region, 1970 (continued)

Cost Group	Soil productivity groups included in cost group	Crop	Preharvest cost		Fixed harvest cost		Variable harvest cost		Source
			per acre	per acre	cost per acre	cost per unit	of production	of production	
			Dollars	Dollars	Dollars	Dollars	Dollars	Dollars	
4	01, 02, 26	Cotton	52.16	35.80	21.95/Bale	(1, pg. 27)			
		Corn	35.95	11.36	0.10/Bu.	(1, pg. 50)			
		Cats	20.44	6.54	0.10/Bu.	(1, pg. 54)			
		Wheat	20.44	6.54	0.10/Bu.	(1, pg. 54)			
		Soybeans	33.47	7.47	0.10/Bu.	(1, pg. 36)			
		Misc. Crops	31.29	0.00	0.00	(4)			
		Pasture	1.96	0.00	0.00	(4)			
5	07, 08, 09, 19, 27, 29, 38, 58, 84, 80, C0	Misc. Crops	31.29	0.00	0.00	(4)			
		Pasture	1.96	0.00	0.00	(4)			
6	35, 65, 68, 69, 74, 76, 80, 81	Cotton	85.75	42.06	21.95/Bale	(6)			
		Corn	63.21	11.18	0.16/Bu.	(6)			
		Cats	21.73	7.10	0.10/Bu.	(6)			
		Wheat	21.73	7.10	0.10/Bu.	(6)			
		Soybeans	24.06	6.24	0.10/Bu.	(6)			
		Misc. Crops	31.29	0.00	0.00	(4)			
		Pasture	1.96	0.00	0.00	(4)			

Continued -----



Table 35. Estimated crop production budgets by cost groups, Lower Mississippi Region, 1979 (continued)

Cost Group	Soil productivity groups included in cost group	Crop	Preharvest cost		Fixed harvest		Variable harvest		Source
			per acre	per acre	cost per acre	cost per unit	cost per unit	of production	
			Dollars	Dollars	Dollars	Dollars	Dollars	Dollars	
No. 7	30, 31, 32, 33, 34, 36,	Cotton	78.38	42.06	21.95/Bale	(6)			
	37, 59, 60, 61, 62, 63,	Corn	63.21	11.18	0.10/Bu.	(6)			
	64, 66, 67, 70, 71, 72,	Oats	21.73	7.10	0.10/Bu.	(6)			
	73, 75, 77, 78, 79, 82,	Tobacco	332.98	369.62	0.02/lb.	(7, pg. 131)			
	83, 85	Wheat	21.73	7.10	0.10/Bu.	(6)			
		Soybeans	21.01	6.24	0.10/Bu.	(6)			
		Misc. Crops	31.29	0.00	0.00	(4)			
	Pasture	1.96	0.00	0.00	(4)				
No. 8	92, 95, 96, A1, A3, A6,	Cotton	83.63	42.06	21.95/Bale	(6)			
	A7	Corn	61.19	11.18	0.16/Bu.	(6)			
		Oats	20.08	7.10	0.10/Bu.	(6)			
		Rice	142.48	9.00	0.25/Bu.	(3, pg. 20)			
		Wheat	20.08	7.10	0.10/Bu.	(6)			
		Soybeans	20.83	6.24	0.10/Bu.	(6)			
		Misc. Crops	31.29	0.00	0.00	(4)			
	Pasture	1.96	0.00	0.00	(4)				
No. 9	86, 87, 88, 89, 90, 91,	Cotton	79.77	42.06	21.95/Bale	(6)			
	93, 94, 97, 98, 99, A0,	Corn	61.19	11.18	0.16/Bu.	(6)			
	A2, A4, A5, A8, A9, B1	Oats	20.08	7.10	0.10/Bu.	(6)			
		Wheat	20.08	7.10	0.10/Bu.	(6)			
		Soybeans	21.03	6.24	0.10/Bu.	(6)			
		Misc. Crops	31.29	0.00	0.00	(4)			
		Pasture	1.96	0.00	0.00	(4)			

Continued -----



Table 35. Estimated crop production budgets by cost groups, Lower Mississippi Region, 1970 (continued)

Cost Group	Soil productivity groups included in cost group	Crop	Preharvest cost		Fixed harvest cost		Variable harvest cost		Source
			per acre	Dollars	cost per acre	Dollars	cost per unit of production	Dollars	
No. 10	45, 46, 49, 50, 53, 56, 57, D3	Cotton	78.01		42.06		21.95/Bale	(6)	
		Corn	60.35		11.18		0.16/Bu.	(6)	
		Sorghum	30.58		7.50		0.25/Bu.	(5, pg. 96)	
		Oats	17.92		7.10		0.10/Bu.	(6)	
		Rice	116.68		9.67		0.25/Bu.	(3, pg. 26)	
		Sweet Potatoes	183.09		33.03		0.14/Bu.	(8, pg. 42)	
		Sugarcane	100.77		28.90		0.40/Ton	(9, pg. 28)	
		Wheat	17.92		7.10		0.10/Bu.	(6)	
		Soybeans	23.77		6.24		0.10/Bu.	(6)	
		Misc. Crops	31.29		0.00		0.00	(4)	
Pasture	1.96		0.00		0.00	(4)			
No. 11	39, 40, 41, 42, 43, 44, 47, 48, 51, 52, 54, 55, C8, C9, D0, D1, D2, D4	Cotton	73.48		42.06		21.95/Bale	(6)	
		Corn	60.35		11.18		0.16/Bu.	(6)	
		Sorghum	30.54		7.47		0.25/Bu.	(5, pg. 51)	
		Oats	17.92		7.10		0.10/Bu.	(6)	
		Rice	116.68		9.67		0.25/Bu.	(3, pg. 26)	
		Sweet Potatoes	183.09		33.03		0.14/Bu.	(8, pg. 42)	
		Sugarcane	100.77		28.90		0.40/Ton	(9, pg. 28)	
		Wheat	17.92		7.10		0.10/Bu.	(6)	
		Soybeans	18.47		6.24		0.10/Bu.	(6)	
		Misc. Crops	31.29		0.00		0.00	(4)	
Pasture	1.96		0.00		0.00	(4)			
No. 12	02	Irrigated Cotton	68.93		35.80		21.95/Bale	(1, pg. 30)	
		Irrigated Soybeans	50.51		7.47		0.10/Bu.	(1, pp. 42-47)	



Table 35. Estimated crop production budgets by cost groups, Lower Mississippi Region, 1970 (continued)

Cost Group	Soil productivity groups included in cost group	Crop	Preharvest cost per acre	Fixed harvest cost per acre	Variable harvest cost per unit of production	Source
			Dollars	Dollars	Dollars	
No. 13	10, 11, 13, 14, 15, 13, 20, 21, B2, B3, B5, B6	Irrigated Cotton	77.92	35.80	21.95/Bale	(2, pg. 30)
		Irrigated Soybeans	48.65	7.47	0.10/Bu.	(2, pp. 45-50)
No. 14	16, B8	Irrigated Cotton	76.47	40.53	21.95/Bale	(5, pg. 30)
		Irrigated Soybeans	50.04	7.47	0.10/Bu.	(5, pp. 45-50)
No. 15	17, B7	Irrigated Cotton	65.18	30.77	21.95/Bale	(1, pg. 72)
		Irrigated Soybeans	48.71	7.47	0.10/Bu.	(1, pg. 81)
No. 16	59, 60, 61, 62, 63, 64, 66, 67, 70	Irrigated Cotton	107.61	42.06	21.95/Bale	(6, 10)
		Irrigated Corn	80.77	11.18	0.16/Bu.	(6, 10, 11)
		Irrigated Soybeans	38.57	6.24	0.10/Bu.	(6, 10, 11)

Continued -----





Table 35. Estimated crop production budgets by cost groups, Lower Mississippi Region, 1970 (continued)

Cost Group	Soil productivity groups included in cost group	Crop	Preharvest cost		Fixed harvest cost		Variable harvest cost		Source
			per acre	Dollars	cost per acre	Dollars	cost per unit of production	Dollars	
No. 17	65, 69	Irrigated Cotton	114.98		42.06		21.95/Bale		(6, 10)
		Irrigated Corn	80.77		11.18		0.16/Bu.		(6, 10, 11)
		Irrigated Soybeans	41.62		6.24		0.10/Bu.		(6, 10, 11)
No. 18	86, 87, 88, 89, 90, 91, 93, 94, 97	Irrigated Cotton	104.66		42.06		21.95/Bale		(6, 10)
		Irrigated Corn	78.75		11.18		0.16/Bu.		(6, 10, 11)
		Irrigated Soybeans	38.59		6.24		0.10/Bu.		(6, 10, 11)
No. 19	92, 95, 96	Irrigated Cotton	112.86		42.06		21.95/Bale		(6, 10)
		Irrigated Corn	78.75		11.18		0.16/Bu.		(6, 10, 11)
		Irrigated Soybeans	38.39		6.24		0.10/Bu.		(6, 10, 11)

Continued -----



Table 35. Estimated crop production budgets by cost groups, Lower Mississippi Region, 1970 (continued)

Cost Group	Soil productivity groups included in cost group	Crop	Preharvest cost per acre	Fixed harvest cost per acre	Variable harvest cost per unit of production	Source
			<u>Dollars</u>	<u>Dollars</u>	<u>Dollars</u>	
No. 20	39, 40, 41, 43, 44, 47	Irrigated Cotton	102.71	42.06	21.95/Bale	(6, 10)
		Irrigated Corn	77.91	11.18	0.16/Bu.	(6, 10, 11)
		Irrigated Soybeans	36.03	6.24	0.10/Bu.	(6, 10, 11)
No. 21	45	Irrigated Cotton	107.34	42.06	21.95/Bale	(6, 10)
		Irrigated Corn	77.91	11.18	0.16/Bu.	(6, 10, 11)
		Irrigated Soybeans	41.33	6.24	0.10/Bu.	(6, 10, 11)

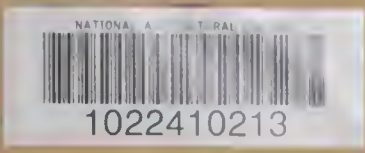
Source: Economic Research Service, United States Department of Agriculture, Jackson, Mississippi, November 1971.



## Selected Bibliography

- (1) Musick, Joseph A., White, James H., and Halbrook, Waymon A., Estimated Production Items, Costs, and Returns for Crop and Livestock Enterprises for Eastern Arkansas, Part I. North Delta, Arkansas Agricultural Experiment Station Misc. Publication 123.
- (2) Musick, Joseph A., White, James H., and Halbrook, Waymon A., Estimated Production Items, Costs, and Returns for Crop and Livestock Enterprises for Eastern Arkansas, Part III. Loessial Terrace, Arkansas Agricultural Experiment Station Misc. Publication 125.
- (3) Southern Cooperative Committee, Estimated Costs and Returns Per Acre of Rice and Incomes for Representative Farms in Southern Rice Areas, 1966 Season, Southern Cooperative Series Bulletin 141, Arkansas Agricultural Experiment Station, November 1968.
- (4) Economic Research Service, Composite acre budget prepared by personnel in Jackson, Mississippi.
- (5) Musick, Joseph A., White, James H., and Halbrook, Waymon A., Estimated Production Items, Costs, and Returns for Crop and Livestock Enterprises for Eastern Arkansas, Part II. South Delta, Arkansas Agricultural Experiment Station Misc. Publication 124.
- (6) U.S. Department of Agriculture, Economic Research Service, Farm Production Economics Division, and Mississippi Agricultural Experiment Station, "Unpublished Crop Budget Data."
- (7) McArthur, W. C., Selected U.S. Crop Budgets, Yields, Inputs, and Variable Costs, Volume I, Southeast Region, U.S. Dept. of Agriculture, Economic Research Service Report 457, April 1971.
- (8) Gerlow, Arthur R., and Woolf, Willard F., Data for Farm Planning in the Southwest Louisiana Rice Area, Louisiana State University, Dept. of Agricultural Economics Research Report No. 403, September 1969.
- (9) Campbell, Joe R., "Louisiana Report (Sugarcane)," Western Regional Project WM-51, prepared for the Annual Meeting of the Technical Committee, Western Regional Project WM-51, Bozeman, Montana, August 15-16, 1968.
- (10) Cooke, Fred T. Jr., The Economics of Supplemental Irrigation in Cotton, Yazoo-Mississippi Delta, Mississippi Agricultural Experiment Station Bulletin 669, July 1963.
- (11) Tramel, Thomas E., Crowe, Grady B., Akel, J. F. Jr., Supplemental Irrigation, Investment and Operating Costs in the Delta Area of Mississippi, Mississippi Agricultural Experiment Station Bulletin 559, May 1958.





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