**BULLETIN 361** 

# IMPLICATIONS of ALLOTMENTS on Optimum Farm Organization and Supply Relationships in Two Alabama Areas

AGRICULTURAL EXPERIMENT STATION A U B U R N U N I V E R S I T Y



E. V. Smith, Director

Auburn, Alabama

AUBURN UN

#### SUMMARY

The study reported in this bulletin was designed to provide guidelines for use by farm policy makers in considering policy alternatives and by those who are affected by policy changes. The objectives were to determine the profit maximizing combinations of enterprises for several resource situations in the Limestone Valleys and Wiregrass of Alabama under alternative levels of prices and acreage allotments for cotton and peanuts; to determine the aggregate effects of the adoption of such adjustments; and to compare results of this study with those obtained for these areas when no allotment restrictions were placed on cotton or peanuts. Optimum combinations of enterprises at the selected cotton allotment levels and price ranges were determined for four representative farm resource situations in both the Limestone Valleys and Wiregrass. In addition, optimum combinations of enterprises at selected peanut allotment levels and price ranges were determined for the four representative farms in the Wiregrass. The resulting optimum farm programs were then expanded by selected aggregation models under 1959 and projected 1975 farm size distributions to determine the aggregate effects of these adjustments. Cotton and peanut production estimates from the aggregate data represent conditionally predictive cotton and peanut supply curves for the areas. These supply curves were compared with estimated free market supply curves for the same areas. Finally, net return targets were set for each area and cotton and peanut price requirements for iso-net returns were computed.

In the Limestone Valleys, the optimum farm organizations included all allotted acreages of cotton on the small farm when the price was at or above 23.5 cents per pound of lint, on the medium farm when the cotton price was at or above 24.5 cents, and on the large and extra large farms at all cotton prices programmed. In the Wiregrass, with peanut acreage restricted to the 1963 allotment level, the optimum programs included all the allotted acreages of cotton when the price was at 20.01 cents or above for the small farm, at 21.1 cents or above for the medium farm, and at all prices programmed for the large and extra large farms. Also, in the Wiregrass with cotton acreage restricted to the 1963 allotment level, the optimum programs included all the allotted acreages of peanuts when the price was \$104.50 per ton or above for the small farm, \$110.50 or above for the medium farm, and at all prices programmed for the large and extra large farms.

In comparison with the free market supply curves, all cotton allotment levels used in this study placed restrictions on aggregate cotton production at prices above 19.1 cents per pound of lint in the Limestone Valleys and 21.1 cents in the Wiregrass. For peanuts in the Wiregrass, all allotment levels were restrictive when compared with the free market supply curve at prices above \$119.50 per ton.

For the iso-net return analysis, the target aggregate net return was obtained with the 85 per cent allotment level and a 31.2cent cotton price in the Limestone Valleys and 30.0-cent cotton in the Wiregrass. When the allotment acreage was reduced from the 85 to the 55 per cent level, the target net return level would be maintained with a cotton price of at least 38.7 cents in the Limestone Valleys and 35.3 cents in the Wiregrass. Conversely, with an allotment increase from the 85 to the 115 per cent level, the target net returns would be maintained with a cotton price of at least 27.9 cents in the Limestone Valleys and 27.5 cents in the Wiregrass. With no allotment restrictions, the cotton price would still have to be above 25.2 cents in the Limestone Valleys and 24.2 cents in the Wiregrass to maintain the target net return level.

The target aggregate return for peanuts was that obtained with the 85 per cent allotment level and a price of \$210 per ton. When the allotment level was decreased from 85 to the 70 per cent, a peanut price of at least \$233.18 was required for farmers to obtain the net return target. However, an equal increase in allotments from the 85 to the 100 per cent level would allow the peanut price to drop no further than \$193.48 and still yield the net return target. With no allotment restrictions on peanuts, the peanut price would have to be in excess of \$145.95 per ton to meet the net return target.

#### CONTENTS

	Page
Summary	2
INTRODUCTION	5
Review of Regional Project	6
Objectives	7
Description of Areas	8
Farm and Area Supply Response	
Assumptions	
Land	
Capital	
Enterprise Activities	12
Representative Farms	
Resource and Product Prices and Allotment Levels	
Optimum Farm Organization	
Limestone Valley Area	
Wiregrass Area	17
Aggregate Area Supply Response	
Aggregate Models	
Aggregate Data	
Iso-Net Return Analysis	
Conclusions	
References	
Appendix	
Acknowledgment	

FIRST PRINTING 3M, OCTOBER 1965

## IMPLICATIONS of ALLOTMENTS on Optimum Farm Organization and Supply Relationships in Two Alabama Areas

NEIL R. MARTIN, JR.,\* EARL J. PARTENHEIMER,\*\* and P. LEO STRICKLAND, JR.\*\*\*

#### INTRODUCTION

HE United States has experienced a period of prosperity with high incomes, relatively high employment, and vast growth since the depression of the 1930's. Recessions have been mild and severe depressions have been avoided. While the general economy has experienced the most prosperous period in history, the agricultural segment has not been as prosperous. During this period, except for the years of World War II, agriculture has encountered problems of declining real incomes and relatively low rates of return on resources.

Income problems of farmers have led to government farm programs with an objective to help the farmer attain a more equitable income. Some farm programs administered today are designed to support agricultural prices and bring production into a more favorable balance with demand. Among commodities included in the programs, only cotton and peanuts are grown

<sup>\*</sup> Formerly Graduate Assistant, Department of Agricultural Economics, Agricultural Experiment Station, Auburn University, and presently, Agricultural Economist, Farm Production Economics Division, Economic Research Service, U.S. Department of Agriculture.

<sup>\*\*</sup> Associate Professor, Department of Agricultural Economics, Agricultural Experiment Station, Auburn University, resigned.

<sup>\*\*\*</sup> Agricultural Economist, Farm Production Economics Division, Economics Research Service, U.S. Department of Agriculture.

extensively in Alabama. Programs on these two commodities have supported prices and controlled production through acreage allotments.

Although cotton acreage has been cut by more than one-third since the 1930's, yield per acre has continued to increase; thus total production has remained at a high level. Carryover stocks of cotton for the past decade have been above 50 per cent of the annual cotton production. The high level of domestic cotton prices has also caused some difficulties. The United States has been losing some of its export markets, and the synthetic fibers industry has expanded and made vast technological advances.

Peanut acreage has also been cut substantially by acreage allotment programs, but both production and carryover stocks remain at high levels. Approximately 20 per cent of annual production is purchased by the Commodity Credit Corporation at the price support level.

Since farm incomes and returns to agricultural resources remain generally below the nonfarm economy, alternative farm programs are being considered and discussed. Thus, it should prove helpful to provide more economic guidelines for use by persons responsible for formulating future farm programs. One such economic guideline would be information on the response of farmers to alternative levels of prices and allotments for a given commodity.

#### REVIEW OF REGIONAL PROJECT

The study reported here is a part of Regional Research Project S-42, "An Economic Appraisal of Farming Adjustment Opportunities in the Southern Region to Meet Changing Conditions." The Alabama Agricultural Experiment Station is one of 12 State Experiment Stations contributing to the project in cooperation with the Economic Research Service, United States Department of Agriculture. Various parts of this project have been completed and others are presently being conducted. A brief review of the contributing studies that have been completed in Alabama will serve as an illustration of work in the entire region since the other states are applying similar analysis to areas in these states.

Two areas were selected in Alabama for intensive study. Land resources, base allotment levels, and farm size distributions were obtained using Soil Conservation Service, Agricultural Stabiliza-

tion and Conservation Service, Census, and other data. Input and price coefficients were obtained from production scientists, farmers, farm supply dealers, and experiment station publications. Enterprise budgets were constructed for major enterprises under various resource situations using both current and improved production practices (3,4,6,7).

Linear programming and price mapping procedures were used to determine the profit maximizing enterprise organizations over a range of prices for cotton and peanuts. Free markets and partial equilibrium in an intermediate time period were assumed. Effects of other input prices at 30 per cent above and below estimated free market prices were also determined. Finally, optimum programs were expanded by aggregation models to attain projected area production and resource use without acreage controls under each set of assumptions (8,10).

In this study, various levels of allotment restrictions for cotton and peanuts were introduced into the analysis. Free markets were assumed for all input and other product markets. Also, the partial equilibrium and intermediate length of run assumptions were retained.

The resulting data from these studies in all the major cottonand peanut-producing areas of the country will be analyzed on a regional basis. Equilibrium price and quantity combinations will be determined by comparing these regional supply data with approximate demand schedules. This analysis should provide some of the information needed to determine the effects of various policy proposals.

#### OBJECTIVES

The general purpose of this study was to determine optimum enterprise combinations and aggregate area production under alternative prices and acreage allotments for cotton and peanuts in the Limestone Valley and Wiregrass areas of Alabama. The specific objectives were:

(1) To determine the most profitable combinations of enterprises for several resource situations under various alternative cotton prices and acreage allotment situations in the Limestone Valleys.

(2) To determine the most profitable combinations of enterprises for several resource situations under various alternative

cotton and peanut prices and acreage allotment situations in the Wiregrass.

(3) To determine the effects of these price and allotment situations on aggregate supplies of the major crops and livestock and on net income levels of farmers in the two areas.

(4) To compare the results of this study with results obtained for the same areas when no allotment restrictions were placed on cotton or peanuts.

#### DESCRIPTION OF AREAS

This study applies to two major farming areas in the State – Limestone Valleys and the Wiregrass.

#### Limestone Valleys

The farming area designated in this study as the Limestone Valley consists of the Tennessee Valley Area plus irregular valleys and flood plains in several other northeastern Alabama counties (Figure 1). The soils of these areas are above average in natural fertility as compared with other soils in the State. The nearly level to gently rolling topography of the area is adaptable to mechanization. A large percentage of the land is open and cultivation is intensive.

The area receives an annual rainfall ranging from 50 to 56 inches. This rainfall, however, is usually distributed so that it is relatively dry in late spring and early fall. The growing season ranges from 200 to 220 days (5).

Cotton, the leading cash crop of the State, is also the most important crop in the area. Forty-seven per cent of Alabama's cotton production, or 2.2 per cent of the United States' cotton production, was produced in the Limestone Valleys in 1962. Other major crops in the area include corn and hay crops.

#### Wiregrass

The Wiregrass is a 12-county area in southeastern Alabama and occupies the eastern portion of the State's Lower Coastal Plain (Figure 1). The southeastern portion of the Wiregrass is a nearly level to rolling plain, whereas the northern edge and the western third have more irregular topography. Forest land comprises a relatively large portion of the western third. Soils in the area are slightly acid and range in texture from sandy loam to



loamy sand. Although deficiencies in calcium and potash are common, improved management practices can produce good crop yields.

The area receives an average annual rainfall of 52 to 58 inches. However, this rainfall is usually distributed so that it is relatively dry in late spring and late fall. The growing season ranges from 240 to 255 days (5).

Cotton and peanuts, the two most important crops in the Wiregrass, contributed approximately the same amounts in cash receipts to area farmers in 1962. That year the area produced 17 and 96 per cent of the State's cotton and peanut production respectively. This amounted to 0.8 per cent of national cotton production and 10.5 per cent of national peanut production in 1962. Other major crops in the area include corn and hay crops.

#### FARM AND AREA SUPPLY RESPONSE

If optimum farm organizations are computed for increasing prices of one product, a partial equilibrium supply schedule can be ascertained for that product on the farm. Since land, resident labor, allotments, and certain machinery items are assumed fixed, the supply schedule would apply to an intermediate time period. If a further assumption of pure competition is made, then an aggregate area supply schedule could be computed by horizontally summing the supply schedules of each farm in the area (9).

In this study, certain assumptions must be stated that affect farm supply schedules. Additional assumptions must also be made as to which farms in an area will respond to the various adjustment opportunities. A conditionally predictive supply schedule reflects expectations under a specific set of assumptions. All aggregate figures in this study are subject to certain assumptions and, therefore, are conditionally predictive.

#### ASSUMPTIONS

Input-output budgets used in this study were based on improved management practices, which assume use of the best technology available and a high level of managerial ability. Separate budgets were constructed for each size farm, since machinery and labor coefficients varied with size. Yields and production rates were assumed the same on all farm sizes. They represent

Crop	Unit	Limestone Valleys	Wiregrass
Cotton, lint	Lb.	700.0	625.0
Peanuts	Lb		2,000.0
Corn	Bu	65.0	55.0
Oats	Bu	70.0	60.0
Grain sorghum	Bu	45.0	40.0
Alfalfa	Ton	4.5 <sup>1</sup>	
Lespedeza	Ton	2.0 <sup>2</sup>	
Soybeans	Bu	22.0	22.0
Wheat	Bu		28.0
Coastal	Ton		5.0
Corn silage		12.0 <sup>3</sup>	$10.0^{4}$

TABLE 1.	Assumed	Crop	YIELDS	Per	ACRE,	LIMESTONE	VALLEYS	AND
		W	/IREGRA	ss, A	LABAM	(A S		

<sup>1</sup> Less 0.9 ton for weather loss per acre.

<sup>2</sup> Less 0.2 ton for weather loss per acre.

<sup>3</sup> Less 2.4 tons for seepage and spoilage loss per acre.

<sup>4</sup> Less 2.0 tons for seepage and spoilage loss per acre.

the output that might be expected under the assumed level of management practices and average weather conditions (Table 1).

#### LAND

The acreages of land and their use capabilities, as used in this study, were based on Soil Conservation Service data. Only open land from which crops or pasture could be harvested was considered in the analysis. An assumption was made that all land in Soil Conservation Service Capability Classes I through IV, which was being used for cropland or pasture in 1961, could be adjusted to its best alternative use. Therefore, all land in these categories was defined as open land (Appendix Table 1). Class I and II land was considered as suitable for row crops year after year. Classes IIIe and IIIw were considered suitable for row crops 1 year out of 2. Therefore, total available row cropland was all Class I, all Class II, and  $\frac{1}{2}$  of Class IIIe and IIIw cropland and pasture. The remaining one-half of the Class IIIe and IIIw land was considered as plowable land not suitable for row crops. All Class IV land was designated as nonplowable land suitable only for permanent sod crops.

There were 1,607,890 acres in the Limestone Valley that met the definition for open land (Table 2). Of this, 69 per cent could be classified as row cropland, 21 per cent plowable land not suitable for row crops, and 10 per cent as suitable only for permanent sod crops. In the Wiregrass, 1,712,378 acres were classified as

Classification	Soil Conservation Service capability classes	Acreage
Limestone Valleys		
Open land	Class I through IV	1 007 000
Plowable land	cropland and pasture Class I II and III	1,607,890
	cropland and pasture	1,454,506
Row cropland	and IIIw cropland and pasture	1,115,397
Wiregrass		
Open land	Class I through IV	1 510 050
Plowable land	cropland and pasture Class I II and III	1,712,378
r lowable fand	cropland and pasture	1,469,034
Row cropland	Class I, II and ½ Class IIIe and IIIw cropland and pasture	987,450

TABLE 2. SOIL BASE ACREAGE, BY CLASSIFICATION USED IN STUDY, LIMESTONE VALLEYS AND WIREGRASS, ALABAMA

open land. Row crops could be planted on 58 per cent of this land. Plowable, nonrow cropland comprised 28 per cent of this open land, and 14 per cent was nonplowable open land.

#### CAPITAL

Other than for land, interest at 6 per cent was charged on all operating capital and investment capital required in the farm programs. Operating capital included expenditures that would be recovered in less than 1 year. Interest on operating capital was charged for the time between actual expenditure and recovery of the capital. No interest was charged on expenditures that would be recovered in less than 30 days.

Investment capital was expenditures that would be invested for more than 1 year. Interest on investment capital, other than for land, was charged on the average value during life of the capital equipment or input, rather than on its new cost. Interest on investments in land was not charged as an expense in programming the representative farms. Therefore, returns were stated as net return to operator's labor, management, and land in the individual farm results.

#### **ENTERPRISE** ACTIVITIES

The enterprises used in the programming model were all land based activities. "Land based" means that the enterprise would require use of some quantity of open land as defined in this study for production of the commodity. Cotton, corn for sale, corn for feed, oats, soybeans, grain sorghum, and hog enterprises were included as alternatives on all sizes of farms in the Limestone Valleys. Because of the small acreage of land on the small and medium farms, certain enterprises considered on the larger farms would not be feasible. Alfalfa hay, lespedeza hay, and steer enterprises were added to the list of alternatives for the medium, large, and extra large farms; a beef cow enterprise was included for the large and extra large farms.

Cotton, peanuts, corn for sale, corn for feed, oats, wheat, soybeans, grain sorghum, oats and grain sorghum (double cropped), hogs on good pasture, and hogs on poor pasture were included as alternatives for all farm sizes in the Wiregrass. As in the Limestone Valleys, the small acreages of land on the small and medium farms prevented some enterprises from being feasible that were included on the larger farms. Steers were added to the list of alternatives for the medium, large, and extra large farms; and beef cows were added to the large rarms.

Several enterprises were not considered for various reasons. Production of vegetables, fruits, or nuts is possible in both areas studied. However, specialized management, labor, and other resources required and lack of stable marketing possibilities limit the consideration of these enterprises. Grade A milk production can be profitable in the areas. However, the overall supply and marketing situation is such that limited opportunity exists for entrance into Grade A milk production. Poultry production now exists in both areas, but does not require use of open land. Poultry enterprises as alternatives on a farm would be determined by available labor and capital rather than land. Coastal bermudagrass hay production was limited to that used on the farm since the local market for selling hay is relatively limited.

These excluded activities could be profitable adjustment alternatives for individual farmers. Because of limited possibilities for general adoption, they were not considered as aggregate area adjustment alternatives.

#### **Representative Farms**

Agricultural Stabilization and Conservation Service farm records, Census of Agriculture, and other data were used to construct farm size distributions for each area. From these data, the farms in each area were divided into five major groups by amounts of open land. The first group, farms with less than 10 acres of open land, was classified as nonfarm rural residences and was not considered in this study. A representative resource situation was determined for the remaining four groups in each farming area.

Although the percentage of land composition of row cropland, plowable land, and nonplowable land varied among individual farms, no appreciable differences in the average composition were found between the size groups. Row cropland and plowable land, as percentages of open land, were assumed identical for each representative resource situation. Furthermore, there was no appreciable difference in the cotton or peanut allotments as a percentage of open land between size groups. Therefore, cotton or peanut allotments, as a percentage of open land, were also identical for each representative resource situation. Land resources available and current allotments on representative farms in the Limestone Valleys and the Wiregrass are presented in Appendix Table 2.

Machinery coefficients were based on 2-row equipment for the small and medium farms, and on 4-row equipment for the large and extra large farms. No harvesting equipment was owned on the small farms, and only hay harvesting equipment was owned on the medium farms when hay crops entered the programs. The large farm operator in the Wiregrass owned all necessary harvesting equipment except a cotton picker. The large farm operator in the Limestone Valleys and the extra large farm operators of both areas owned harvesting equipment for all crops included in the optimum programs. Crops on all farms were assumed to be mechanically harvested. Crop harvesting on farms where equipment was not owned by the operator was custom hired.

It was assumed that resident labor, either operator or full-time hired men, would perform most of the productive chores. However, some odd jobs would require hiring seasonal labor at a rate of 90 cents per hour.

Small farms in both the Limestone Valleys and the Wiregrass were defined as part-time operations, with the operators working 40 hours per week off the farm. Resident labor supply on the medium and large farms of both areas consisted of a full-time operator. On the extra large farms, the resident labor consisted of a full-time operator and two full-time hired men in the Limestone Valleys, and a full-time operator and one full-time hired man in the Wiregrass. The monthly labor distributions by farm size are given in Appendix Table 2.

RESOURCE AND PRODUCT PRICES AND ALLOTMENT LEVELS

All input prices and product prices for nonallotment crops were set at expected equilibrium levels.<sup>1</sup> These prices were given in previous publications (8,10).

Prices for allotment crops, cotton and peanuts, varied with the levels of allotment used. Effects of cotton prices between 20.8 and 36.4 cents per pound of lint in the Limestone Valleys and 20.0 and 35.0 cents in the Wiregrass were analyzed. Effects of peanut prices between \$96 and \$256 per ton in the Wiregrass were analyzed.

Effects of cotton allotments were analyzed at four levels in each area. The levels were set at 55, 85, 100, and 115 per cent of the 1963 cotton allotments in the respective areas. When analysis for varying cotton allotments was being made in the Wiregrass, the peanut allotment was set at 100 per cent of the 1963 allotment in the area and the peanut price was set at \$210 per ton. The various acreage allotments included in the analysis on cotton in the Limestone Valleys and the Wiregrass are presented in Table 3.

Size of representative farm	Allotment	e 1963 level		
(open land acreage)	55	85	100	115
		A	cres	
Limestone Valleys				
Small (32 acres) Medium (80 acres) Large (210 acres) Extra large (635 acres)	$\begin{array}{c} 3.2 \\ 7.9 \\ 20.8 \\ 62.9 \end{array}$	$\begin{array}{c} 4.9 \\ 12.2 \\ 32.1 \\ 97.2 \end{array}$	$5.8 \\ 14.4 \\ 37.8 \\ 114.3$	$\begin{array}{r} 6.6 \\ 16.6 \\ 43.5 \\ 131.4 \end{array}$
Wiregrass				
Small (31 acres) Medium (81 acres) Large (184 acres) Extra large (438 acres)	$\begin{array}{c} 1.9 \\ 4.9 \\ 11.1 \\ 26.4 \end{array}$	$2.9 \\ 7.6 \\ 17.2 \\ 40.8$	$3.4 \\ 8.9 \\ 20.2 \\ 48.1$	$\begin{array}{r} 3.9 \\ 10.2 \\ 23.2 \\ 55.3 \end{array}$

TABLE	3.	Assum	IED (	Current	Сотто	n Allo	TMENT	LEVELS	FOR	Represen	TATIVE
	]	Farm	Sizes	s, Limest	'ONE V	ALLEYS	AND \	VIREGRAS	s, Ai	LABAMA	

<sup>&</sup>lt;sup>1</sup>These prices were determined by members of the S-42 Technical Committee, composed of representatives from each of 12 cooperating State Experiment Stations and from the Economic Research Service, U.S. Department of Agriculture. The basic price assumptions were used by each cooperating state, but modifications were made to reflect normal transportation and quality differentials.

Size of	Allotment level, percentage of the 1963 level					
representative farm	70	85	100	115	130	
~			Acres			
Small	2.7	3.3	3.9	4.4	5.0	
Medium	7.1	8.6	10.1	11.6	13.1	
Large	16.0	19.5	22.9	26.4	29.8	
Extra large	38.2	46.4	54.6	62.7	70.9	

 TABLE 4. Assumed Current Peanut Allotment Levels for Representative Farm Sizes, Wiregrass, Alabama

Effects of peanut allotments were analyzed at five levels in the Wiregrass. The levels were set at 70, 85, 100, 115, and 130 per cent of the 1963 peanut allotments in the area. When analysis for varying peanut allotments was being made, the cotton allotment was set at the 100 per cent level and the cotton price was set at 30 cents per pound of lint. The various acreage allotments included in the analysis on peanuts are presented in Table 4.

#### OPTIMUM FARM ORGANIZATION

Profit maximization was the objective for determining the optimum farm organizations. Personal preferences of individual farmers were not considered. Optimum programs for each cotton and peanut allotment situation were computed for each representative farm covering the specified range of prices.

#### LIMESTONE VALLEY AREA

Cotton was the only crop subject to acreage allotments on representative farms of the Limestone Valleys. Prices of other products were held constant so that changes in cotton acreages resulting from various allotment and price combinations could be analyzed. The ranges of cotton prices analyzed were 31.2 to 36.4 cents per pound of lint for the 55 per cent allotment level, 26.0 to 36.4 cents for the 85 per cent level, 20.8 to 36.4 for the 100 per cent level, and 20.8 to 31.2 cents for the 115 per cent level.

On the small farm, the entire allotted acreage of cotton entered the optimum programs at the 55 and 85 per cent allotment levels for all cotton prices considered (Appendix Table 3). When the cotton allotment was increased to the 100 and 115 per cent levels and effects of lower cotton prices were analyzed, the optimum programs included only a part of the allotted acreage at cotton

16

prices below 23.5 cents per pound of lint. With cotton prices at 23.5 cents and above, the entire allotted acreage of cotton was included in the optimum programs.

On the medium farm the entire allotted acreage of cotton was included at all prices investigated with allotments at the 55 and the 85 per cent levels (Appendix Table 4). With allotments at the 100 and 115 per cent levels, no cotton entered the optimum program at prices below 24.2 cents, and the entire allotments were included at all prices above this level.

On the large and extra large farms, the acreage allotted for cotton entered the optimum programs for all prices and allotment combinations analyzed (Appendix Tables 5 and 6).

As cotton acreage increased on all farms studied in the Limestone Valleys, the corn and hog enterprises decreased and the oats enterprise increased. Furthermore, the grain sorghum enterprise on the small farm and the alfalfa enterprise on the large and extra large farms decreased as cotton acreage increased.

#### WIREGRASS AREA

Cotton and peanuts were subject to acreage allotments on representative farms in the Wiregrass. When adjustments to varying levels of cotton allotments were analyzed, the peanut allotment and price were set at the 1963 level and \$210 per ton, respectively. The ranges of cotton prices analyzed were 30 to 35 cents per pound of lint for the 55 per cent allotment level, 25 to 35 cents for 85 per cent level, 20 to 35 cents for 100 per cent level, and 20 to 30 cents for 115 per cent level. When adjustments to varying levels of peanut allotments were analyzed, the cotton allotment and price were set at the 1963 level and 30 cents, respectively. The peanut prices analyzed were \$256 per ton for the 70 per cent allotment level, \$192 to \$256 for 85 per cent level, \$160 to \$224 dollars for 100 per cent level, \$128 to \$192 for 115 per cent level, and \$96 to \$128 for 130 per cent level.

#### Cotton

The entire allotted acreage of cotton entered the optimum small and medium farm programs at the 55 and 85 per cent allotment levels for all cotton prices considered (Appendix Tables 7 and 8). When the cotton allotments were increased to 100 and 115 per cent levels and effects of lower cotton prices were analyzed, no cotton entered the optimum program at prices below 20.01 and 21.1 cents per pound of lint on the small and medium farms, respectively. The entire allotments were included at all prices above these levels.

On the large and extra large farms, allotted acreages of cotton entered the optimum programs for all price and allotment combinations analyzed (Appendix Tables 9 and 10).

Increases in cotton acreage were accompanied by decreases in the corn, hog, and steer enterprises and increases in the oats enterprise on farms in the Wiregrass. On large and extra large farms, the beef cow enterprise increased along with increases in cotton acreage.

#### Peanuts

On the small and medium farms, allotted acreages of peanuts entered the optimum programs at the 70, 85, 100, and 115 per cent allotment levels for the ranges of peanut prices considered (Appendix Tables 11 and 12). When the peanut allotments were increased to the 130 per cent level and effects of lower peanut prices were analyzed, no peanuts entered the optimum programs at prices below \$104.50 and \$110.50 per ton on the small and medium farms, respectively. The entire allotments were included at all prices above these levels. On the large and extra large farms, allotted acreages of peanuts entered the optimum programs for all price and allotment levels analyzed (Appendix Tables 13 and 14).

As peanut acreage increased, there were decreases in the corn, hog, and steer enterprises but increases in the oats enterprise on farms in the Wiregrass. On the large and extra large farms, the beef cow enterprise increased along with increases in peanut acreage.

#### AGGREGATE AREA SUPPLY RESPONSE

Other objectives of the study were: (1) to determine aggregate area response to the various price and allotment combinations presented in the previous section, and (2) to compare the aggregate area supply responses for cotton and peanuts obtained from

this study with estimated area supply response under free market conditions for cotton and peanuts.

#### Aggregation Models

A number of assumptions can be made as to the groups of farmers who would actually make the adjustments. In this study it was assumed that farming adjustments as specified by the optimum farm programs would be made on all farms and acreages other than those specialized in dairy, vegetables, or fruit and nut trees and those classified as nonfarm rural residences.

The aggregation models used to expand the optimum farm programs were the same as those derived for use in earlier studies in which aggregate area data were obtained for free market conditions for cotton and peanuts (8,10). Two farm size distributions, representing 1959 and projected 1975 conditions, were used so that variations in the aggregate estimates because of changes in farm sizes could be shown.

The base acreage and soil classifications were previously given (Table 2). Before the base acreages were distributed to the four farm size groups of each farming area, the excluded acreages were subtracted (Table 5). The remaining base acreages were then divided into the four farm size groups for each area. The number of representative farms in each group was determined by dividing the total acreage in that group by the open land acreage on the representative farm for that size group (Table 6). The resulting farm numbers were used to expand the optimum farm organizations to obtain the aggregate area data. This procedure was followed for both the 1959 and the 1975 farm size distributions.

T.	Farm size	distribution
Item	1959	1975
	Ac	res
Limestone Valleys		
Dairy, vegetables, fruits, and nuts Nonfarm rural residences	$62,000 \\ 9,265$	$62,000 \\ 16,365$
Total exclusions	71,265	78,365
Wiregrass		
Dairy, vegetables, fruits, and nuts Nonfarm rural residences	$27,900 \\ 9,602$	$31,500 \\ 12,828$
Total exclusions	37,502	44,328

 TABLE 5. Excluded Acreages of Open Land, by Type of Farm, Limestone

 Valleys and Wiregrass, Alabama

	Open la	nd acreage	Representative farms		
Size groups	Farm size	distribution	Farm size	distribution	
(open land acreage)	1959	1975	1959	1975	
	A	cres	Nu	mber	
Limestone Valleys					
Small (10-49.9) Medium (50-124.9) Large (125-299.9) Extra large (300 and over)	$345,600 \\ 449,600 \\ 325,500 \\ 415,925$	$216,000 \\ 170,000 \\ 600,600 \\ 542,925$	$\begin{array}{r} 10,800 \\ 5,620 \\ 1,550 \\ 655 \end{array}$	$6,750 \\ 2,125 \\ 2,860 \\ 855$	
Total	1,536,625	1,529,525	$18,\!625$	12,590	
Wiregrass					
Small (10-49.9) Medium (50-149.9) Large (150-249.9) Extra large (250 and over)	207,700 703,080 466,256 297,840	173,600 457,650 651,360 385,440	6,700 8,680 2,534 680	5,600 5,650 3,540 880	
Total	1,674,876	1,668,050	18,594	15,670	

TABLE 6. ESTIMATED ACREAGES OF OPEN LAND FOR AGGREGATION AND MAXIMUM NUMBER OF REPRESENTATIVE FARMS, BY SIZE GROUPS, LIMESTONE VALLEYS AND WIREGRASS, ALABAMA

#### Aggregate Data

The aggregation model for the Limestone Valleys was used to determine aggregate area production and resource use covering a range of cotton prices and allotment levels for the two farm size distributions (Appendix Tables 15 and 16). The model for the Wiregrass was first used to determine aggregate area production and resource use for a range of cotton prices and allotment levels for the two farm size distributions (Appendix Tables 17 and 18). This was done with the peanut allotment set at the 100 per cent level and the peanut price set at \$210 per ton. Second, a set of aggregate area data was obtained for a range of peanut prices and allotment levels for the two farm size distributions (Appendix Tables 19 and 20). This was done with cotton acreage allotments set at the 100 per cent level and cotton price set at 30 cents per pound of lint.

#### Area response

As allotments were increased with a fixed price for all products, the acreage of corn and the number of hogs decreased in both areas studied. The acreage of oats increased along with increasing allotments in both areas. Also, in the Limestone Valleys the acreage of grain sorghum and alfalfa hay decreased as cotton allotments increased, and in the Wiregrass the number of steers decreased as cotton or peanut allotments increased. Although requirements for capital and labor resources fluctuated as allotments varied in either area, the only significant change was in the Wiregrass where operating capital decreased as allotments increased. At any given price programmed in either area, the net return to operator labor and management increased as allotments increased.

#### Cotton and peanut supply response

The aggregate production of cotton or peanuts, for increasing prices of these two crops, represents points on a conditionally predictive cotton or peanut area supply schedule. Thus, a supply curve for cotton and peanuts for each allotment level in the respective areas can be plotted graphically from the production data in Appendix Tables 15 through 20.

Corresponding supply data for free market conditions in the same areas are given in Appendix Tables 21, 22, and 23. Conditionally predictive cotton supply curves for the Limestone Valleys (Figures 2 and 3) and the Wiregrass (Figures 4 and 5), illustrating the effects of alternative allotment levels and free market conditions on cotton production, were constructed from the foregoing data. Similar peanut supply curves were also constructed (Figures 6 and 7).

Comparison of the allotment and the free market supply curves indicated that the 55 per cent cotton allotment level restricted cotton production at cotton prices above 18 cents in the Limestone Valleys and above 20 cents in the Wiregrass. The 85 per cent cotton allotment level also placed some restriction on production at 18-cent cotton in the Limestone Valleys and at 20 cents in the Wiregrass. All cotton allotment levels were restrictive at cotton prices above 19.1 cents in the Limestone Valleys and above 21.1 cents in the Wiregrass. For peanuts in the Wiregrass, the 70, 85, and 100 per cent allotment levels were restrictive at peanut prices above \$114.80 per ton, the 115 per cent level was restrictive above \$115.40 per ton, and the 130 per cent level was restrictive above \$119.50 per ton.

#### **ISO-NET RETURN ANALYSIS**

An analysis was made to determine the level of cotton prices required at each cotton allotment situation to yield equal net



FIG. 2. Estimated cotton production and iso-net return curves at a range of cotton prices and specified allotment situations, 1959 farm size distribution, Limestone Valleys, Alabama.



FIG. 3. Estimated cotton production and iso-net return curves at a range of cotton prices and specified allotment situations, 1975 farm size distribution, Limestone Valleys, Alabama.







FIG. 5. Estimated cotton production and iso-net return curves at a range of cotton prices and specified allotment situations, 1975 farm size distribution, Wiregrass, Alabama. (See page 29.)



FIG. 6. Estimated aggregate peanut production and iso-net return curves at a range of peanut prices and specified allotment situations, 1959 farm size distribution, Wiregrass, Alabama. (See page 30.)



FIG. 7. Estimated aggregate peanut production at a range of peanut prices and specified allotment situations, 1975 farm size distribution, Wiregrass, Alabama. (See page 30.)

returns to operator labor and management.<sup>2</sup> In the Limestone Valleys, the net return target was set at the aggregate net return obtained with the 85 per cent allotment level and a cotton price of 31.2 cents per pound of lint. The net return target for the Wiregrass was the aggregate net return at the 85 per cent allotment level and a cotton price of 30 cents.<sup>3</sup> Using these targets, iso-net return schedules were computed for each allotment level and free market situation (Table 7). These iso-net return schedules have also been plotted on the supply schedules previously discussed (Figures 2, 3, 4, and 5).

These iso-net return schedules indicate what change will be required in the cotton price with specified changes in cotton allotment levels if farmers are to receive an equal aggregate net return.

A 11 - L L 1 12	Limeston	e Valleys	Wiregrass	
Allotment level	1959	1975	1959	1975
	Ce	ents per po	unds of li	nt
Cotton				
55 85 100 115 Free market	$\begin{array}{c} 38.7\\31.2\\29.4\\28.2\\25.7\end{array}$	$\begin{array}{c} 40.5 \\ 31.2 \\ 29.2 \\ 27.9 \\ 25.2 \end{array}$	35.3 30.0 28.5 27.5 24.5 Dollars	35.4 30.0 28.5 27.5 24.3
Peanuts			Donars	per ten
70	-		$\begin{array}{c} 233.18\\ 210.00\\ 193.87\\ 182.03\\ 172.84\\ 148.61\end{array}$	$\begin{array}{c} 233.68\\ 210.00\\ 193.48\\ 181.34\\ 171.93\\ 145.95 \end{array}$

TABLE 7. COTTON AND PEANUT PRICES REQUIRED AT THE SPECIFIED ALLOTMENT LEVELS TO YIELD AN EQUAL NET RETURN,<sup>1</sup> 1959 AND 1975 FARM SIZE DISTRIBUTIONS, LIMESTONE VALLEYS AND WIREGRASS, ALABAMA

<sup>1</sup> The net return level is the aggregate net return to operator's labor and management obtained at the 85 per cent allotment level with 31.2 cent cotton in the Limestone Valleys and 30 cent cotton and \$210 peanuts in the Wiregrass.

<sup>2</sup> Percentage of 1963 acreage allotment for the area.

 $<sup>^{2}</sup>$  Net return to operator labor and management was obtained by subtracting a charge for investment in land from the net return to operator labor, management, and land. The charge was \$10 per acre of open land for the Limestone Valleys and \$5.25 per acre of open land for the Wiregrass.

<sup>&</sup>lt;sup>8</sup> The S-42 Technical Committee estimated that, with the yields associated with improved practices in the S-42 study, the belt-wide production for the 85 per cent allotment level would approximate present production. Furthermore, 30 cents per pound of lint was assumed to be the belt-wide support price level. Since the grade of northern Alabama cotton is usually above national average, the assumed current support price for the Limestone Valleys was set at 31.2 cents per pound of lint.

These prices are the minimum change that could be made since the net returns were calculated on the basis that farm enterprises had been adjusted to the most profitable organization for the given allotment situation.

Using the 1959 farm size distribution, a reduction in the Limestone Valleys allotments from the 85 to the 55 per cent level would require a 7.5 cent increase in cotton price to give the farmers an equal net return. The corresponding figure for the 1975 farm size distribution is 9.3 cents. On the other hand, an increase in allotments from the 85 to the 115 per cent level would allow only a 3.0 and 3.3 cent price decrease for the respective farm size distributions to yield the equal net returns. If farmers were allowed to grow all the cotton that could be profitably produced, they would have to receive a cotton price in excess of 25 cents for either farm size distribution to obtain net returns equal to the net return target.

In the Wiregrass a reduction in cotton allotments from the 85 to the 55 per cent level would require price increases of only 5.3 cents and 5.4 cents for the 1959 and 1975 farm size distributions, respectively, to attain equal net returns. If allotments were increased from the 85 to the 115 per cent level, prices would decrease 2.5 cents for both farm size distributions. With free market production, the price of cotton would have to be about 24.5 cents for farmers to receive net returns equal to the net return target. However, in comparing data for the free market with those for allotment situations, one should consider that the free market curve was computed with peanuts unrestricted and at a price of \$160 per ton. In contrast, the allotment situations were computed with peanuts restricted to the 1963 allotment level and priced at \$210 per ton.

Following the same procedure used for cotton, peanut price requirements for equal net returns to operator labor and management in the Wiregrass were found for each peanut allotment situation. Again, the 85 per cent allotment level was used to set the income targets because of increased yields under the assumptions of the study. A peanut price of \$210 per ton was used.<sup>4</sup> Using this target, iso-net return schedules were computed for each allotment level and the free market situations (Table 7).

 $<sup>^{\</sup>ast}$  A peanut price of \$210 per ton was set for acreage control conditions in the Wiregrass by the S-42 Technical Committee.

These schedules have also been plotted on the peanut supply schedules previously discussed (Figures 6 and 7).

A reduction in peanut allotments from the 85 to the 70 per cent level would require an increase in the peanut price in excess of \$23 per ton for both 1959 and 1975 farm size distributions. If peanut allotments were increased from the 85 to the 100 per cent level, the peanut price required to yield equal net returns would be decreased less than \$17. If the farmers of the area are allowed to produce peanuts free of allotment restrictions, they would have to receive a peanut price of \$148.61 and \$145.95 for the 1959 and the 1975 farm size distributions, respectively, to obtain the net return target. However, in comparing data for the free market with those for allotment situations, one should consider that the free market curve was computed with cotton also unrestricted and priced at 25 cents per pound of lint, whereas the allotment situations were computed with cotton restricted to the 1963 allotment level and priced at 30 cents per pound of lint.

#### CONCLUSIONS

Using improved management practices for all enterprises as assumed in this analysis, cotton and peanuts would be the most profitable enterprises even at prices considerably below their current support levels. Thus, elimination of allotment restrictions on these commodities would result in increased production. However, even with this increased production, prices would have to be above current world price for farmers to obtain the same income as available with the allotment situation assumed as current for this analysis. Decreases in production by lowering allotments below current levels would require price increases above the current support level to maintain the same producer income. Thus, it seems that reductions in the allotment levels in the areas studied would probably cause decreased farm incomes, increased government costs, or both.

It would appear that the objectives of lower prices, decreased surpluses, increased farmer incomes, and lower government expenditures cannot be obtained in one program. Policy alternatives, however, need to be considered in light of the present trend for cotton and peanuts to a less competitive price position in comparison with foreign and substitute products.

If demand schedules could be constructed for specific produc-

ing areas, the cost of suggested policy alternatives could be estimated for any level of net returns to farmers in the specified areas. However, cotton and peanuts are both storable and essentially homogeneous. Therefore, national demand cannot be broken down into separate demand schedules for cotton or peanuts produced in an individual area. For that reason, analyses of equilibrium price and quantity combinations were not included in this study. When the results of this study are combined with similar studies for other areas that are being conducted under Southern Regional Research Project S-42, demand data will be introduced and analysis of equilibrium conditions will be made.

#### REFERENCES

- (1) ALABAMA CONSERVATION NEEDS COMMITTEE. Alabama Soil and Water Conservation Needs Inventory. State Soil Conser. Com. 1961.
- (2) ALABAMA CROP AND LIVESTOCK REPORTING SERVICE. Alabama Agricultural Statistics. Ala. Dept. of Agr. and Indus. and Statis. Reptg. Ser., U. S. Dept. of Agr. Bul. 11. 1962.
- (3) CLARK, GEORGE W., AND PARTENHEIMER, EARL J. Costs and Returns from Crop Production in the Wiregrass Area, Lower Coastal Plain, Alabama. Ala. Agr. Expt. Sta. in cooperation with Farm Econ. Res. Div., Econ. Res. Ser., U. S. Dept. of Agr. Litho. Rept. 1961.
- (4) ELLIS, THEO H., AND PARTENHEIMER, EARL J. Costs and Returns from Livestock Production in the Limestone Valley Areas of Alabama. Ala. Agr. Expt. Sta. in cooperation with Farm Econ. Res. Div., Agr. Res. Ser., U. S. Dept. of Agr. Litho. Rept. 1960.
- (5) LANHAM, BEN T., JR., YEAGER, J. H., AND ALVORD, BEN F. Alabama Agriculture, Its Characteristics and Farming Area. Ala. Agr. Expt. Sta. Bul. 286. 1953.
- (6) PARTENHEIMER, EARL J., AND CLARK, GEORGE W. Costs and Returns from Livestock Production in the Wiregrass Area, Lower Coastal Plain, Alabama. Ala. Agr. Expt. Sta. in cooperation with Farm Econ. Div., Econ. Res. Ser., U. S. Dept. of Agr. Litho. Rept. 1961.
- (7) PARTENHEIMER, EARL J., AND ELLIS, THEO H. Costs and Returns from Crop Production in the Limestone Valley Area of Alabama. Ala. Agr. Expt. Sta. in cooperation with Farm Econ. Res. Div., Agr. Res. Ser., U. S. Dept. of Agr. Litho. Rept. 1960.
- (8) PARTENHEIMER, EARL J., AND STRICKLAND, P. L., JR. Optimum Farm Organization and Aggregate Area Production in the Wiregrass Area of Alabama. Ala. Agr. Expt. Sta. in cooperation with Farm Prod. Econ. Div., Econ. Res. Ser., U.S. Dept. of Agr. Econ. Agr. Series 3. 1964.
- (9) SCHUH, GEORGE E. The Supply of Fluid Milk in the Detroit Milkshed as Affected by Costs of Production. Mich. State Univ. Agr. Expt. Sta. Tech. Bul. 259. 1957.
- (10) STRICKLAND, P. L., JR., AND PARTENHEIMER, EARL J. Optimum Farm Organization and Aggregate Area Production in the Limestone Valley Areas of Alabama. Ala. Agr. Expt. Sta. in cooperation with Farm Prod. Econ. Div., Econ. Res. Ser., U. S. Dept. of Agr. Agr. Econ. Series 1. 1963.
- (11) YEARBOOK STATISTICAL COMMITTEE. Agricultural Statistics. U. S. Dept. of Agr. 1963.

#### APPENDIX

Soil Conservation Service	Current use				
capability class	Cropland	Pasture			
	Ad	cres			
Limestone Valleys					
I	114.925	26,898			
IIe	543,673	104,022			
IIw	40,859	8,593			
IIIe	239,097	93,734			
IIIs	42,511	20,168			
IIIw	156,467	63,559			
IVe	50,526	43,518			
IVw	27,667	31,673			
Total	1,215,725	392,165			
Wiregrass					
I	151,804	26,525			
IIe	461,967	86,405			
IIs	18,222	3,065			
IIw	26,472	10,600			
IIIe	258,711	109,352			
IIIs	228,268	50,926			
IIIw	21,083	15,634			
IVe	44,468	36,492			
IVs	105,674	47,012			
IVw	2,272	7,426			
Total	1,318,941	393,437			

Appendix Table 1. Soil Base Acreage, by Current Use and Capability Class, Limestone Valleys and Wiregrass, Alabama<sup>1</sup>

<sup>1</sup>Current use and capability classes were determined from county work sheets for: Alabama Conservation Needs Committee, *Alabama Soil and Water Conservation Needs Inventory* published by the State Soil Conservation Committee, 1961.

Appendix Table 2. Resources Available by Farm Size, Limestone Valleys and Wiregrass, Alabama

	<b>T</b> T •.	Limestone Valleys				Wiregrass			
Resource	Unit	Small	Medium	Large	Extra large	Small	Medium	Large	Extra large
Open land	Acre	32.0	80.0	210.0	635.0	31.0	81.0	184.0	438.0
Plowable land	Acre	29.0	72.4	190.0	574.4	26.6	69.5	157.9	375.8
Row cropland	Acre	22.2	55.5	145.7	440.7	17.9	46.7	106.6	252.6
Cotton allotment <sup>1</sup>	Acre	7.3	16.2	32.1	133.4	3.4	8.9	20.2	48.1
Peanut allotment <sup>2</sup>	Acre					3.9	10.1	22.9	54.6
Winter labor	Hour	100.0	606.0	606.0	1,818.0	100.0	606.0	606.0	1,151.0
March labor	Hour	40.0	239.0	239.0	717.0	40.0	239.0	239.0	454.0
April labor	Hour	39.0	231.0	231.0	693.0	39.0	231.0	231.0	439.0
May labor	Hour	66.0	266.0	266.0	798.0	66.0	266.0	266.0	505.0
June labor	Hour	64.0	257.0	257.0	771.0	64.0	257.0	257.0	488.0
July labor	Hour	64.0	257.0	257.0	771.0	64.0	257.0	257.0	488.0
August labor	Hour	66.0	266.0	266.0	798.0	66.0	266.0	266.0	505.0
September labor	Hour	64.0	257.0	257.0	771.0	64.0	257.0	257.0	488.0
October labor	Hour	40.0	239.0	239.0	717.0	40.0	239.0	239.0	454.0
November labor	Hour	33.0	199.0	199.0	597.0	33.0	199.0	199.0	378.0
Total Labor	Hour	576.0	2,817.0	2,817.0	8,451.0	576.0	2,817.0	2,817.0	5,350.0

 $^{\rm 1}$  Cotton allotment at 100 per cent of the 1963 level.  $^{\rm 2}$  Peanut allotment at 100 per cent of the 1963 level.

Enterprise		Cotton allotment, percentage of 1963 level ( cotton price, cents per pound of lint )						
	Unit	55	85 10		00	1	115	
		(31.2-36.4)	(26.0-36.4)	(20.8-23.5)	(23.5-36.4)	(20.8-23.5)	(23.5-36.4)	
Cotton Corn for feed Oats Grain sorghum Pasture Idle open land	Acre Acre Acre Acre Acre Acre	3.2 12.6 0.0 5.2 2.4 8.6	$\begin{array}{c} 4.9 \\ 11.7 \\ 5.7 \\ 4.5 \\ 2.2 \\ 3.0 \end{array}$	$\begin{array}{c} 4.5 \\ 12.0 \\ 5.7 \\ 4.5 \\ 2.3 \\ 3.0 \end{array}$	$5.8 \\ 10.9 \\ 5.7 \\ 4.5 \\ 2.1 \\ 3.0$	$\begin{array}{c} 4.5 \\ 12.0 \\ 5.7 \\ 4.5 \\ 2.3 \\ 3.0 \end{array}$	$\begin{array}{c} 6.6 \\ 10.2 \\ 5.9 \\ 4.4 \\ 1.9 \\ 3.0 \end{array}$	
Sows	No.	4.8	4.4	4.6	4.2	4.6	3.9	
Net revenue	Dol.	1,350.521	1,493.73 <sup>1</sup>	$1,144.26^{2}$	$1,539.98^{1}$	$1,144.26^{2}$	$1,584.44^{1}$	
Capital: Investment Operating Resident labor Seasonal labor	Dol. Dol. Hour Hour	$841.07 \\ 571.21 \\ 427.8 \\ 41.2$	815.15679.75447.147.8	$\begin{array}{c} 827.43 \\ 682.15 \\ 451.4 \\ 46.9 \end{array}$	$787.41 \\ 674.31 \\ 437.4 \\ 49.7$	$\begin{array}{c} 827.43 \\ 682.15 \\ 451.4 \\ 46.9 \end{array}$	$759.67 \\ 668.87 \\ 428.0 \\ 51.6$	

Appendix Table 3. Optimum Small Farm Program, Limestone Valleys, Alabama (Specified Prices and Allotments for Cotton—Base Prices for Other Products—Part-Time Labor Supply—Advanced Technology)

<sup>1</sup>Net revenue is based on a cotton price of 31.2 cents per pound of lint so that net revenue changes because of varying allotment levels can be analyzed.

<sup>2</sup> Net revenue is based on a cotton price of 20.8 cents per pound of lint.

	Service -	Cotton allotment, percentage of 1963 level (cotton prices, cents per pound of lint)						
Enterprise	Unit	55	85	10	00	1	115	
		(31.2-36.4)	(26.0-36.4)	(20.8-24.2)	(24.2-36.4)	(20.8-24.2)	(24.2—36.4)	
Cotton Corn for feed Oats Pasture Idle open land	Acre Acre Acre Acre Acre	$7.9 \\ 43.4 \\ 12.8 \\ 8.3 \\ 7.6$	$12.2 \\ 39.5 \\ 13.1 \\ 7.6 \\ 7.6 \\ 7.6$	$\begin{array}{c} 0.0 \\ 50.7 \\ 12.1 \\ 9.6 \\ 7.6 \end{array}$	$14.4 \\ 37.5 \\ 13.3 \\ 7.2 \\ 7.6$	$0.0 \\ 50.7 \\ 12.1 \\ 9.6 \\ 7.6$	$16.6 \\ 35.5 \\ 13.5 \\ 6.8 \\ 7.6$	
Sows	No.	16.6	15.1	19.3	14.3	19.3	13.6	
Net revenue	Dol.	4,346.301	4,557.661	$3,958.80^{\circ}$	4,663.341	$3,958.80^{2}$	4,769.021	
Capital: Investment Operating Resident labor Seasonal labor	Dol. Dol. Hour Hour	2,729.00 2,020.34 1,299.0 105.0	2,519.26 1,986.41 1,243.7 114.9	3,113.51 2,082.57 1,400.4 86.9	2,414.40 1,969.43 1,216.1 119.8	3,113.51 2,082.57 1,400.4 86.9	2,309.54 1,952.46 1,188.4 124.7	

Appendix Table 4. Optimum Medium Farm Program, Limestone Valleys, Alabama (Specified Prices and Allotments for Cotton—Base Prices for Other Products—One-Man Labor Supply—Advanced Technology)

<sup>1</sup>Net revenue is based on a cotton price of 31.2 cents per pound of lint so that net revenue changes because of varying allotment levels can be analyzed.

<sup>2</sup> Net revenue is independent of cotton prices since no cotton entered the optimum programs.

#### ALLOTMENT IMPLICATIONS ON FARM ORGANIZATION

		протисыр	I LOINTODOOI	• /			
		Cotton allotment, percentage of 1963 level (cotton price, cents per pound of lint)					
Enterprise	Unit	55	85	100	115		
		(31.2-36.4)	(26.0 - 36.4)	(20.8-36.4)	(20.8-31.2)		
Cotton Corn for sale Corn for feed Oats Alfalfa Pasture Idle open land	Acre Acre Acre Acre Acre Acre Acre	$20.8 \\ 28.4 \\ 74.6 \\ 37.2 \\ 14.8 \\ 14.2 \\ 20.0$	32.126.573.037.37.213.920.0	$37.8 \\ 25.5 \\ 72.2 \\ 37.4 \\ 3.3 \\ 13.8 \\ 20.0$	$\begin{array}{c} 43.5\\ 23.0\\ 69.4\\ 37.7\\ 3.2\\ 13.2\\ 20.0 \end{array}$		
Sows	No.	28.4	27.8	27.5	26.5		
Net revenue <sup>1</sup>	Dol.	9,830.88	11,738.7	12,314.24	12,787.33		
Capital: Investment Operating Resident labor Seasonal labor	Dol. Dol. Hour Hour	9,044.02 4,449.62 2,502.0 538.6	9,234.99 4,571.15 2,548.0 510.9	9,330.48 4,631.91 2,571.4 497.1	9,379.77 4,651.36 2,561.3 509.7		

Appendix Table 5. Optimum Large Farm Program, Limestone Valleys, Alabama (Specified Prices and Allotments for Cotton—Base Prices for Other Products—One-Man Labor Supply—Advanced Technology)

<sup>1</sup>Net revenue is based on a cotton price of 31.2 cents per pound of lint so that net revenue changes because of varying allotment levels can be analyzed.

Appendix Table 6. Optimum Extra Large Farm Program, Limestone Valleys, Alabama (Specified Prices and Allotments for Cotton— Base Prices for Other Products—Three Man Labor Supply—Advanced Technology)

	Unit	Cotton allotment, percentage of 1963 level (cotton price, cents per pound of lint)					
Enterprise		55	85	100	115		
		(31.2-36.4)	(26.0-36.4)	(20.8-36.4)	(20.8-31.2)		
Cotton Corn for sale Corn for feed Oats Alfalfa Pasture Idle open land	Acre Acre Acre Acre Acre Acre Acre Acre	$\begin{array}{c} 62.9\\ 99.1\\ 216.2\\ 113.1\\ 41.9\\ 101.8\\ 0.0\\ \end{array}$	$97.2 \\93.3 \\211.5 \\113.5 \\18.6 \\100.9 \\0.0$	$114.3 \\90.4 \\209.1 \\113.8 \\7.0 \\100.4 \\0.0$	$131.4 \\76.1 \\212.9 \\113.4 \\0.0 \\40.6 \\60.6$		
Sows Beef cows	No. No.	$\begin{array}{c} 82.5\\ 26.5\end{array}$	$     80.7 \\     26.5 $	$79.8 \\ 26.5$	$\underset{0.0}{81.2}$		
Net revenue <sup>1</sup>	Dol.	27,698.80	31,225.46	32,987.76	34,704.76		
Capital: Investment Operating Resident labor Seasonal labor	Dol. Dol. Hour Hour	27,841.86 13,555.44 7,456.7 1.723.4	28,467.64 13,923.03 7,521.3 1,639.6	28,780.34 14,106.71 7,553.7 1,597.7	22,258.86 14,122.47 7,496.3 1,473.2		

<sup>1</sup>Net revenue is based on a cotton price of 31.2 cents per pound of lint so that net revenue changes because of varying allotment levels can be analyzed.

		Cotton allotment, percentage of 1963 level (cotton price, cents per pound of lint)						
Enterprise	Unit	55	85	1	00	1	115	
		(30.0-35.0)	(25.0-35.0)	(20.0-20.01)	(20.01-35.0)	(20.0-20.01)	(20.01-30.0)	
Cotton       Peanuts       Corn for feed       Oats       Pasture       Idle open land	Acre Acre Acre Acre Acre Acre	$1.9 \\ 3.9 \\ 12.1 \\ 4.3 \\ 4.4 \\ 4.4$	$2.9 \\ 3.9 \\ 11.1 \\ 4.7 \\ 4.0 \\ 4.4$	0.0 3.9 14.0 3.6 5.1 4.4	3.4 3.9 10.6 4.9 3.8 4.4	$0.0 \\ 3.9 \\ 14.0 \\ 3.6 \\ 5.1 \\ 4.4$	$3.9 \\ 3.9 \\ 10.1 \\ 5.1 \\ 3.6 \\ 4.4$	
Sows Net revenue	No. Dol.	3.8 944.7 <sup>1</sup>	3.5 1,008.38¹	$\frac{4.4}{827.99^2}$	3.3 1,040.21 <sup>1</sup>	$4.4$ $827.99^{2}$	3.2 1,071.59¹	
Capital: Investment Operating Resident labor Seasonal labor	Dol. Dol. Hour Hour	$2,930.70 \\ 695.61 \\ 340.8 \\ 26.5$	2,874.25 682.49 325.8 28.6	3,034.19 719.66 368.3 22.8	2,846.02 675.94 318.3 29.6	3,034.19 719.66 368.3 22.8	$2,817.80 \\ 669.38 \\ 310.8 \\ 30.6$	

Appendix Table 7. Optimum Small Farm Program, Wiregrass, Alabama (Specified Prices and Allotments for Cotton—Base Prices for Other Products—Part-Time Labor Supply—Advanced Technology)

<sup>1</sup>Net revenue is based on a cotton price of 30.0 cents per pound of lint so that net revenue changes because of varying allot-ment levels can be analyzed. <sup>2</sup>Net revenue is independent of cotton prices since no cotton entered the optimum programs.

· ·		Cotton allotment, percentage of 1963 level ( cotton price, cents per pound of lint)						
Enterprise	Unit	55	85	10	)0	1	15	
		(30.0-35.0)	(25.0-35.0)	(20.0-21.1)	(21.1-35.0)	(20.0-21.1)	(21.1-35.0)	
Cotton       Peanuts         Corn for feed       Oats         Oats       Peanure         Corn silage       Pasture and hay         Idle open land       Peanure	Acre Acre Acre Acre Acre Acre Acre	$\begin{array}{c} 4.9\\ 10.1\\ 23.2\\ 12.6\\ 8.5\\ 21.7\\ 0.0\\ \end{array}$	$7.6 \\ 10.1 \\ 21.2 \\ 14.4 \\ 7.8 \\ 19.9 \\ 0.0$	$\begin{array}{c} 0.0 \\ 10.1 \\ 26.7 \\ 9.2 \\ 9.9 \\ 25.1 \\ 0.0 \end{array}$	$\begin{array}{c} 8.9 \\ 10.1 \\ 20.2 \\ 15.3 \\ 7.5 \\ 19.0 \\ 0.0 \end{array}$	$\begin{array}{c} 0.0 \\ 10.1 \\ 26.7 \\ 9.2 \\ 9.9 \\ 25.1 \\ 0.0 \end{array}$	$10.2 \\ 10.1 \\ 19.3 \\ 16.2 \\ 7.1 \\ 18.1 \\ 0.0$	
Steers	No.	36.2	33.2	41.8	31.6	41.8	30.1	
Net revenue	Dol.	3,091.841	3,239.891	$2,819.67^{2}$	3,314.471	$2,819.67^2$	3,388.49 <sup>1</sup>	
Capital: Investment Operating Resident labor Seasonal labor	Dol. Dol. Hour Hour	5,292.66 5,732.76 648.7 159.1	5,079.69 5,386.18 634.6 158.0	5,684.17 6,369.91 674.7 161.0	$\substack{4,972.41\\5,211.58\\627.5\\157.5}$	5,684.17 6,369.91 674.7 161.0	$\begin{array}{r} 4,865.92 \\ 5,038.29 \\ 620.4 \\ 157.0 \end{array}$	

Appendix Table 8. Optimum Medium Farm Program, Wiregrass, Alabama (Specified Prices and Allotments for Cotton—Base Prices for Other Products—One-Man Labor Supply—Advanced Technology)

<sup>1</sup>Net revenue is based on a cotton price of 30.0 cents per pound of lint so that net revenue changes because of varying allotment levels can be analyzed.

<sup>2</sup> Net revenue is independent of cotton prices since no cotton entered the optimum programs.

		Cotton allotment, percentage of 1963 level (cotton price, cents per pound of lint)						
Enterprise	Unit	55	85	100	115			
1		(30.0-35.0)	(25.0-35.0)	(20.0-35.0)	(20.0-30.0)			
Cotton Peanuts Corn for feed Corn silage Pasture and hay Idle open land	Acre Acre Acre Acre Acre Acre	$11.1 \\ 22.9 \\ 52.7 \\ 19.4 \\ 77.9 \\ 0.0$	$17.2 \\ 22.9 \\ 48.2 \\ 17.8 \\ 77.9 \\ 0.0$	$20.2 \\ 22.9 \\ 46.0 \\ 17.0 \\ 77.9 \\ 0.0$	$23.2 \\ 22.9 \\ 43.8 \\ 16.2 \\ 77.9 \\ 0.0 $			
Beef cows Steers	No. No.	$\begin{array}{c} 19.5\\ 82.3\end{array}$	$\begin{array}{c} 22.4 \\ 75.4 \end{array}$	$23.8 \\ 71.9$	$\begin{array}{c} 25.2 \\ 68.4 \end{array}$			
Net revenue <sup>1</sup>	Dol.	7,415.67	7,796.90	7,987.52	8,178.14			
Capital: Investment Operating Resident labor Seasonal labor	Dol. Dol. Hour Hour	$18,485.97 \\13,075.32 \\1,361.4 \\416.7$	$\begin{array}{c} 18,\!508.02\\ 12,\!309.99\\ 1,\!334.6\\ 398.1 \end{array}$	$18,519.04 \\11,927.32 \\1,321.2 \\388.8$	$18,530.07 \\ 11,544.66 \\ 1,307.7 \\ 379.5$			

Appendix Table 9. Optimum Large Farm Program, Wirecrass, Alabama (Specified Prices and Allotments for Cotton—Base Prices for Other Products—One-Man Labor Supply—Advanced Technology)

<sup>1</sup>Net revenue is based on a cotton price of 30.0 cents per pound of lint so that net revenue changes because of varying allotment levels can be analyzed.

Appendix Table 10. Optimum Extra Large Farm Program, Wiregrass Alabama (Specified Prices and Allotments for Cotton—Base Prices for Other Products—Two-Man Labor Supply—Advanced Technology)

_	<b>TT</b> 1.	Cotton allotment, percentage of 1963 level (cotton price, cents per pound of lint)					
Enterprise	Unit	55	85	100	115		
		(30.0-35.0)	(25.0-35.0)	(20.0-35.0)	(20.0-30.0)		
Cotton Peanuts Corn for feed Corn silage Pasture and hay Idle open land	Acre Acre Acre Acre Acre Acre	$26.4 \\ 54.6 \\ 125.4 \\ 46.2 \\ 185.4 \\ 0.0$	$\begin{array}{r} 40.8\\ 54.6\\ 114.8\\ 42.4\\ 185.4\\ 0.0\\ \end{array}$	$\begin{array}{c} 48.1 \\ 54.6 \\ 109.5 \\ 40.4 \\ 185.4 \\ 0.0 \end{array}$	$55.3 \\ 54.6 \\ 104.3 \\ 38.4 \\ 185.4 \\ 0.0$		
Beef cows Steers	No. No.	$\begin{array}{c} 46.4 \\ 195.9 \end{array}$	$53.2 \\ 179.5$	$56.5 \\ 171.2$	$59.9 \\ 163.0$		
Net revenue <sup>1</sup>	Dol.	16,114.20	17,105.09	17,600.54	18,095.99		
Capital: Investment Operating Resident labor Seasonal labor	Dol. Dol. Hour Hour	36,434.12 29,666.92 3,183.7 1,036.4	38,381.26 27,968.73 3,144.6 1,008.3	39,354.83 27,119.64 3,125.1 994.3	40,328.40 26,270.55 3,105.6 980.3		

<sup>1</sup> Net revenue is based on a cotton price of 30.0 cents per pound of lint so that net revenue changes because of varying allotment levels can be analyzed.

Enterprise		Peanut allotment, percentage of 1963 level (peanut price, dollars per ton)						
	Unit	70	85	100	115	1	30	
	_	(256.0)	(192.0-256.0)	(160.0-224.0)	(128.0—192.0)	(96.0—104.5)	(104.5-128.0)	
Cotton	Acre Acre Acre Acre Acre Acre	3.4 2.7 11.8 4.5 4.2 4.4	$3.4 \\ 3.3 \\ 11.2 \\ 4.7 \\ 4.0 \\ 4.4$	$3.4 \\ 3.9 \\ 10.6 \\ 4.9 \\ 3.8 \\ 4.4$	$\begin{array}{c} 3.4 \\ 4.4 \\ 10.1 \\ 5.1 \\ 3.6 \\ 4.4 \end{array}$	$3.4 \\ 0.0 \\ 14.5 \\ 3.5 \\ 5.2 \\ 4.4$	3.4 5.0 9.5 5.3 3.4 4.4	
Sows	No.	3.7	3.5	3.3	3.1	4.5	3.0	
Net revenue	Dol.	782.82 <sup>1</sup>	$815.02^{1}$	$847.21^{1}$	879.40 <sup>1</sup>	$632.96^{2}$	911.64 <sup>1</sup>	
Capital: Investment Operating Resident labor Seasonal labor	Dol. Dol. Hour Hour	2,927.62 699.75 338.4 29.8	2,886.82 687.84 328.4 29.7	2,846.02 675.94 318.3 29.6	2,805.22 664.03 308.3 29.5	$3,117.55\ 755.18\ 385.1\ 30.1$	2,764.42 652.12 298.3 29.5	

Appendix Table 11. Optimum Small Farm Program, Wiregrass, Alabama (Specified Prices and Allotments for Peanuts—Base Prices for Other Products—Part-Time Labor Supply—Advanced Technology)

<sup>1</sup>Net revenue is based on a peanut price of \$160 per ton so that net revenue changes because of varying allotment levels can be analyzed.

<sup>2</sup> Net revenue is independent of peanut prices since no peanuts entered the optimum programs.

		Peanut allotment, percentage of 1963 level (peanut price, dollars per ton)						
Enterprise	Unit	70	.85	100 115		1	30	
	-	(256.0)	(192.0-256.0)	(160.0—224.0)	(128.0—192.0)	(96.0—110.5)	(110.5—128.0)	
Cotton Peanuts Corn for feed Oats Corn silage Pasture Idle open land	Acre Acre Acre Acre Acre Acre Acre	$8.9 \\ 7.1 \\ 22.5 \\ 13.2 \\ 8.3 \\ 21.0 \\ 0.0 \\$	$\begin{array}{c} 8.9 \\ 8.6 \\ 21.4 \\ 14.3 \\ 7.9 \\ 19.9 \\ 0.0 \end{array}$	$\begin{array}{c} 8.9 \\ 10.1 \\ 20.3 \\ 15.3 \\ 7.5 \\ 18.9 \\ 0.0 \end{array}$	$\begin{array}{c} 8.9 \\ 11.6 \\ 19.1 \\ 16.3 \\ 7.1 \\ 18.0 \\ 0.0 \end{array}$	$8.9 \\ 0.0 \\ 27.6 \\ 8.4 \\ 10.2 \\ 25.9 \\ 0.0$	$\begin{array}{c} 8.9 \\ 13.1 \\ 18.0 \\ 17.4 \\ 6.7 \\ 16.9 \\ 0.0 \end{array}$	
Steers	No.	35.1	33.4	31.6	29.9	43.2	28.2	
Net revenue	Dol.	2,660.07 <sup>1</sup>	$2,735.27^{1}$	$2,809.97^{1}$	2,884.691	$2,310.78^{2}$	$2,949.38^{1}$	
Capital: Investment Operating Resident labor Seasonal labor	Dol. Dol. Hour Hour	5,195.79 5,629.62 649.3 165.2	5,083.73 5,419.91 638.4 161.3	4,972.41 5,211.58 627.5 157.5	$\begin{array}{r} 4,861.09\\ 5,003.25\\ 616.6\\ 153.7\end{array}$	5,716.27 6,603.66 700.1 183.0	$\begin{array}{r} 4,749.76\\ 4,794.92\\ 605.8\\ 149.9\end{array}$	

### Appendix Table 12. Optimum Medium Farm Program, Wiregrass, Alabama (Specified Prices and Allotments for Peanuts—Base Prices for Other Products—One-Man Labor Supply—Advanced Technology)

 $^{1}$  Net revenue is based on a peanut price of \$160 per ton so that net revenue changes because of varying allotment levels can be analyzed.

<sup>2</sup> Net revenue is independent of peanut prices since no peanuts entered the optimum programs.

ALABAMA AGRICULTURAL EXPERIMENT STATION

		Pear	Peanut allotment, percentage of 1963 level (peanut price, dollars per ton)						
Enterprise	Unit	70	85	100	115	130			
		(256)	(192-256)	(160-224)	(128—192)	(96—128)			
Cotton Peanuts Corn for feed Corn silage Pasture and hay Idle open land Beef cows	Acre Acre Acre Acre Acre Acre Acre No.	$20.2 \\ 16.0 \\ 51.1 \\ 18.8 \\ 77.9 \\ 0.0 \\ 20.5$	$20.2 \\ 19.5 \\ 48.5 \\ 17.9 \\ 77.9 \\ 0.0 \\ 22.2$	$20.2 \\ 22.9 \\ 46.0 \\ 17.0 \\ 77.9 \\ 0.0 \\ 23.8$	$20.2 \\ 26.4 \\ 43.5 \\ 16.0 \\ 77.9 \\ 0.0 \\ 25.4$	$20.2 \\ 29.8 \\ 41.0 \\ 15.1 \\ 77.9 \\ 0.0 \\ 27.0$			
Steers	No.	79.8	75.8	71.9	68.0	64.0			
Net revenue <sup>1</sup>	Dol.	6,387.26	6,614.40	6,841.53	7,068.00	7,295.13			
Capital: Investment Operating Resident labor Seasonal labor	Dol. Dol. Hour Hour	$18,180.97 \\ 12,869.62 \\ 1,360.6 \\ 406.8$	$18,350.01 \\ 12,398.47 \\ 1,340.9 \\ 397.8$	$18,519.05 \\11,927.32 \\1,321.2 \\388.8$	$18,687.59 \\ 11,457.55 \\ 1,301.5 \\ 397.8$	$18,856.63 \\ 10,986.40 \\ 1,281.7 \\ 370.9$			

Appendix Table 13. Optimum Large Farm Program, Wirecrass, Alabama (Specified Prices and Allotments for Peanuts—Base Prices for Other Products—One-Man Labor Supply—Advanced Technology)

 $^{\rm 1}\,\rm Net$  revenue is based on a peanut price of \$160 per ton so that net revenue changes because of varying allotment levels can be analyzed.

Appendix Table 14. Optimum Extra Large Farm Program, Wiregrass, Alabama (Specified Prices and Allotments for Peanuts—Base Prices for Other Products—Two-Man Labor Supply—Advanced Technology)

		Peanut allotment, percentage of 1963 level (peanut price, dollars per ton)							
Enterprise	Unit	70	85	100	115	130			
		(256)	(192-256)	(160-224)	(128—192)	(96—128)			
Cotton Peanuts Corn for feed Corn silage Pasture and hay Idle open land	Acre Acre Acre Acre Acre Acre	$\begin{array}{r} 48.1 \\ 38.2 \\ 121.5 \\ 44.8 \\ 185.4 \\ 0.0 \end{array}$	$\begin{array}{r} 48.1 \\ 46.4 \\ 115.5 \\ 42.6 \\ 185.4 \\ 0.0 \end{array}$	$\begin{array}{r} 48.1 \\ 54.6 \\ 109.5 \\ 40.4 \\ 185.4 \\ 0.0 \end{array}$	$\begin{array}{r} 48.1 \\ 62.7 \\ 103.6 \\ 38.2 \\ 185.4 \\ 0.0 \end{array}$	$\begin{array}{r} 48.1 \\ 70.9 \\ 97.6 \\ 36.0 \\ 185.4 \\ 0.0 \end{array}$			
Beef cows Steers	No. No.	$\begin{array}{c} 48.9 \\ 189.9 \end{array}$	$52.7 \\ 180.6$	$\begin{array}{c} 56.5\\171.2\end{array}$	$\begin{array}{c} 60.4 \\ 161.9 \end{array}$	$\begin{array}{c} 48.1 \\ 152.5 \end{array}$			
Net revenue <sup>1</sup>	Dol.	13,813.99	$14,\!343.52$	14,873.03	15,407.56	15,932.72			
Capital: Investment Operating Resident labor Seasonal labor	Dol. Dol. Hour Hour	38,405.44 29,220.09 3,210.5 1.038.2	38,880.14 28,170.25 3,167.8 1,016.3	39,354.83 27,119.64 3,125.1 994.3	39,829.51 26,069.03 3,082.4 972.4	40,304.78 25,017.15 3,039.7 950.4			

 $^{\rm 1}$  Net revenue is based on a peanut price of \$160 per ton so that net revenue changes because of varying allotment levels can be analyzed.

Appendix 7	Table 15.	Aggregates	FOR	Specified	Items,	LIMESTONE	VALLEY
Areas, A	LABAMA (	(1959 Farm I	Distr	IBUTION $$	ARYING	Allotment	S FOR
Co	OTTON-C	OTTON PRICE A	ат Ро	DINT OF CH	ANGE IN	OPTIMUM	
	Progr	ams—Base Pi	RICES	FOR OTHE	r Produ	jcts )	

		Cotton allotment, percentage of 1963 level ( cotton price, cents per pound of lint)				
Item	Unit	55	85	10	00	
		(31.2) <sup>1</sup>	(26.0)1	(20.8)1	(23.5)	
Cotton	Acre	152,398	234,905	182,057	196,097	
Corn for feed	Acre	637 229	600.032	90,737	98,137	
Oats	Acre	203 677	267,340	262 071	262.071	
Grain sorghum	Acre	56,160	48,600	48.600	48,600	
Alfalfa hay	Acre	50,384	23,343	9,700	9,700	
Pasture	Acre	161,255	154,106	165,944	163,784	
Idle open land	Acre	166,592	106,112	106,112	106,112	
Total open land	Acre	1,536,625	1,536,625	1,536,625	1,536,625	
Sows	No. No.	$243,190 \\ 17,358$	$228,330 \\ 17,358$	$253,040 \\ 17,358$	$248,720 \\ 17,358$	
Cotton allotment Investment capital Operating capital Resident labor used <sup>2</sup> Seasonal labor hired	Acre Dol. Dol. Hour Hour	$\begin{array}{r} 152,398\\ 56,675,185\\ 33,297,449\\ 20,682,858\\ 2,998,717\end{array}$	$\begin{array}{r} 234,905\\ 55,922,400\\ 34,709,791\\ 20,694,590\\ 3,027,811 \end{array}$	277,024 59,747,537 35,490,619 21,678,712 2,811,896	277,024 59,315,321 35,405,947 21,527,512 3,027,034	
Cotton Corn for sale Corn for feed Grain sorghum Alfalfa hay Market hogs sold Fat calves sold	Bale Bu. Bu. Bu. Bu. Ton No. No.	$\begin{array}{c} 213,357\\ 7,080,450\\ 41,419,885\\ 14,257,390\\ 2,527,200\\ 181,382\\ 3,769,445\\ 13,018\end{array}$	$\begin{array}{r} 328,867\\ 6,642,155\\ 39,002,080\\ 18,713,800\\ 2,187,000\\ 84,035\\ 3,539,115\\ 13,018 \end{array}$	$\begin{array}{c} 254,880\\ 6,417,905\\ 43,121,260\\ 18,344,970\\ 2,187,000\\ 34,920\\ 3,922,120\\ 13,018 \end{array}$	$\begin{array}{c} 274,536\\ 6,417,905\\ 42,349,060\\ 18,344,970\\ 2,187,000\\ 34,920\\ 3,855,160\\ 13,018 \end{array}$	
Return to operator labor, management and land Return to operator labor and management <sup>3</sup>	Dol. Dol.	72,392,400 57,026,150	71,834,508 56,468,258	65,584,886 50,218,636	69,018,207 53,651,957	

		Cotton allotment, percentage of 1963 level (cotton price, cents per pound of lint)				
Item	Unit	100		115		
		(24.2)	(20.8)1	(23.5)	(24.2)	
Cotton Corn for sale Corn for feed	Acre Acre Acre	277,025 98,737 577,340 268,815	202,092 85,496 661,553 262,274	224,772 85,496 642,113 264,434	318,064 85,496 556,689 272,302	
Grain sorghum       Alfalfa hay       Pasture       Idle open land	Acre Acre Acre Acre Acre	$\begin{array}{r} 203,313\\ 48,600\\ 9,700\\ 150,296\\ 106,112\end{array}$	$\begin{array}{r} 202,274\\ 48,600\\ 4,960\\ 113,481\\ 158,169\end{array}$	$\begin{array}{r} 204,434\\ 47,520\\ 4,960\\ 121,525\\ 145,805\end{array}$	$\begin{array}{r} 47,\!520 \\ 47,\!520 \\ 4,\!960 \\ 105,\!789 \\ 145,\!805 \end{array}$	
Total open land	Acre	1,536,625	1,536,625	1,536,625	1,536,625	
Sows Cows	No. No.	$220,620 \\ 17,358$	252,407	244,847	212,813	
Cotton allotment Investment capital Operating capital Resident labor used <sup>2</sup> Seasonal labor hired	Acre Dol. Dol. Hour Hour	$\begin{array}{c} 277,024\\ 55,386,323\\ 34,770,100\\ 20,491,746\\ 3,027,034 \end{array}$	318,064 55,552,367 35,531,089 21,625,460 2,749,879	318,064 54,820,559 35,387,665 21,372,740 2,800,639	$\begin{array}{r} 318,064\\ 50,302,248\\ 34,656,447\\ 20,181,300\\ 2,749,879\end{array}$	
Cotton Corn for sale Corn for feed Grain sorghum Alfalfa hay Market hogs sold Fat Calves sold	Bale Bu. Bu. Bu. Bu. Ton No. No.	$\begin{array}{r} 387,835\\ 6,417,905\\ 37,527,100\\ 18,817,050\\ 2,187,000\\ 34,920\\ 3,419,610\\ 13,018\end{array}$	$\begin{array}{c} 282,929\\ 5,557,240\\ 43,000,945\\ 18,359,180\\ 2,187,000\\ 17,856\\ 3,912,667\end{array}$	314,681 5,557,240 41,737,345 18,510,380 2,138,400 17,856 3,795,128	445,290 5,557,240 36,184,785 19,061,140 2,138,400 17,856 3,298,139	
Return to operator labor, management and land	Dol.	70,230,375	65,985,699	69,814,841	71,443,272	
Return to operator labor and management <sup>a</sup>	Dol.	54.864.125	50,619.449	54,448,591	56,077,022	

APPENDIX TABLE 15. Continued

<sup>1</sup> Lowest price programmed for the specified allotment level. <sup>2</sup> Resident labor available is 31,954,095 hours. <sup>3</sup> Return to operator labor, management, and land less a charge of \$10 per acre of open land.

APPENDIX TABLE 16. AGGREGATES FOR SPECIFIED ITEMS, LIMESTONE VALLEY
AREAS, ALABAMA (1975 FARM DISTRIBUTION-VARYING ALLOTMENTS
for Cotton—Cotton Price at Point of Change in Optimum
Programs—Base Prices for Other Products)

	TT	Cotton allotment, percentage of 1963 level (cotton price, cents per pound of lint)				
Item	Unit	55	85	1	00	
		(31.2)1	(26.0)1	(20.8)1	(23.5)	
Cotton	Acre	151,655	233,912	236,210	244,985	
Corn for sale	Acre	165,955	155,562	150,222	150,222	
Corn for feed	Acre	575,482	552,525	574,010	566,585	
Oats	Acre	230,292	270,033	268,450	268,450	
Grain sorghum	Acre	35,100	30,375	30,375	30,375	
Alfalfa hay	Acre	78,153	36,495	15,423	15,423	
Pasture	Acre	161,488	157,023	161,235	159,885	
Idle open land	Acre	131,400	93,600	93,600	93,600	
Total open land	Acre	1,529,525	1,529,525	1,529,525	1,529,525	
Sows	No.	219,436	210,294	218.942	216.242	
Beef cows	No.	22,658	22,658	22,658	22,658	
Cotton allotment Investment capital Operating capital Resident labor used <sup>2</sup> Seasonal labor hired	Acre Dol. Dol. Hour Hour	151,655 61,147,035 32,464,704 19,179,224 3,515,128	$\begin{array}{c} 233,912\\ 61,607,594\\ 33,787,113\\ 19,379,637\\ 3,429,845 \end{array}$	275,585 63,493,725 34,338,473 19,835,418 3,288,977	275,585 63,223,590 34,285,553 19,740,918 3,307,877	
Cotton Corn for sale Corn for feed Grain sorghum Alfalfa hay Market hogs sold Fat calves sold	Bale Bu. Bu. Bu. Bu. Ton No. No.	$\begin{array}{c} 212,317\\ 10,787,075\\ 37,406,330\\ 16,120,440\\ 1,579,500\\ 281,351\\ 3,401,258\\ 16,994 \end{array}$	$\begin{array}{r} 327,477\\ 10,111,530\\ 35,914,125\\ 18,902,310\\ 1,366,875\\ 131,382\\ 3,259,557\\ 16,994 \end{array}$	$\begin{array}{r} 330,694\\ 9,764,430\\ 37,310,650\\ 18,791,500\\ 1,366,875\\ 55,523\\ 3,393,601\\ 16,994 \end{array}$	$\begin{array}{r} 342,979\\ 9,764,430\\ 36,828,025\\ 18,791,500\\ 1,366,875\\ 55,523\\ 3,351,751\\ 16,994 \end{array}$	
Return to operator labor, management and land Return to operator labor and management <sup>3</sup>	Dol. Dol.	70,150,688 54.855,438	71,518,778 56,223,528	64,574,715 49 279,465	69,013,421 53,718,171	

	Cotton a ( cotto	llotment, per n price, cents	centage of 19 per pound o	963 level f lint)
Unit	100		115	
	(24.2)	(20.8)2	(23.5)	(24.2)
Acre Acre Acre Acre Acre Acre	275,585 150,222 538,535 271,000 30,375 15,423	$267,132 \\130,846 \\569,251 \\268,966 \\30,375 \\9,152$	$281,307 \\130,846 \\557,101 \\270,316 \\29,700 \\9,152$	$316,582 \\ 130,846 \\ 524,801 \\ 273,291 \\ 29,700 \\ 9152$
Acre Acre	154,785	108,390 145,413	105,690 145,413	99,740 145,413
Acre	1,529,525	1,529,525	1,529,525	1,529,525
No. No.	$205,616 \\ 22,658$	217,278	212,554 	200,441
Acre Dol. Dol. Hour Hour	$\begin{array}{c} 275,585\\ 61,737,981\\ 34,045,131\\ 19,349,280\\ 3,377,790 \end{array}$	316,582 58,058,829 34,407,575 19,757,454 3,218,566	316,582 57,601,449 34,317,935 19,599,504 3,250,291	316,582 55,893,013 34,041,451 19,149,004 3,330,616
Bale Bu. Bu. Bu. Bu. Ton No. No.	$\begin{array}{r} 385,819\\ 9,764,430\\ 35,004,775\\ 18,970,000\\ 1,366,875\\ 55,523\\ 3,187,048\\ 16,994\end{array}$	373,985 8,504,990 37,001,315 18,827,620 1,366,875 32,947 3,367,809	393,830 8,504,990 36,211,565 18,922,120 1,366,500 32,947 3,294,587	$\begin{array}{c} 443,215\\ 8,504,990\\ 34,112,065\\ 19,130,370\\ 1,336,500\\ 32,947\\ 3,106,836\end{array}$
Dol. Dol	70,365,477	65,148,376 49 853 126	70,203,170	71,910,982 56 615 732
	Unit Acre Acre Acre Acre Acre Acre Acre No. No. Acre Dol. Hour Hour Bale Bu. Bu. Bu. Bu. Bu. Dol. No. No. No. No.	$\begin{array}{c} & \begin{array}{c} & Cotton a \\ (cotto) \\ \hline 100 \\ \hline (24.2) \\ \hline \\ Acre \\ Acre \\ 275,585 \\ Acre \\ 150,222 \\ Acre \\ 538,535 \\ Acre \\ 271,000 \\ Acre \\ 30,375 \\ Acre \\ 15,423 \\ Acre \\ 154,785 \\ Acre \\ 93,600 \\ Acre \\ 1,529,525 \\ \hline \\ No. \\ 205,616 \\ No. \\ 22,658 \\ Acre \\ 275,585 \\ Dol. \\ 61,737,981 \\ Dol. \\ 34,045,131 \\ Hour \\ 19,349,280 \\ Hour \\ 3,377,790 \\ Bale \\ 385,819 \\ Bu. \\ 9,764,430 \\ Bu. \\ 35,004,775 \\ Bu. \\ 13,66,875 \\ Ton \\ 55,523 \\ No. \\ 3,187,048 \\ No. \\ 16,994 \\ \hline \\ Dol. \\ 70,365,477 \\ Dol. \\ 55,070,227 \\ \hline \end{array}$	$\begin{array}{r c c c c c c c c c c c c c c c c c c c$	$\begin{array}{r c c c c c c c c c c c c c c c c c c c$

APPENDIX TABLE 16. Continued

<sup>1</sup> Lowest price programmed for the specified allotment level. <sup>2</sup> Resident labor available is 25,156,350 hours. <sup>3</sup> Return to operator labor, management and land less a charge of \$10 per acre of open land.

Appendix Table 17. Accregates for Specified Items, Wiregrass Area
Alabama (1959 Farm Distribution—Varying Allotments for
Cotton—Cotton Price at Point of Change in Optimum
Programs—Base Prices for Other Products)

		Cotton allotment, percentage of 1963 level (cotton price, cents per pound of lint)				
Item	Unit	.55	85	10	00	
		(30.0)1	(25.0)1	(20.0)1	(20.01)	
Cotton	Acre	101,341	156,727	83,895	106,675	
Comp for food	Acre	208,955	208,955	208,955	208,955	
Oats	Acre	138 178	400,009	103 976	112 686	
Corn silage	Acre	154,356	141 641	156 482	156 482	
Pasture and hav	Acre	541,306	523 002	575,508	566,798	
Idle open land	Acre	29,480	29,480	29,480	29,480	
Total open land	Acre	1,674,876	1,674,876	1,674,876	1,674,876	
Sows Beef cows Steers	No. No. No.	25,460 80,965 655,976	23,450 92,939 601,300	$29,480 \\ 98,729 \\ 661,435$	$22,110 \\ 98,729 \\ 661,435$	
Cotton allotment Investment capital Operating capital Resident labor used <sup>2</sup> Seasonal labor hired	Acre Dol. Dol. Hour Hour	$101,341 \\137,194,628 \\107,727,310 \\13,528,780 \\3,319,208$	156,727 136,347,764 101,536,976 13,211,392 3,257,489	$183,927 \\ 143,356,200 \\ 108,777,725 \\ 13,796,995 \\ 3,211,583 \\ \end{array}$	$183,927 \\142,095,461 \\108,484,801 \\13,461,995 \\3,257,143$	
Cotton Peanuts Corn for feed Oats Market hogs sold Fat calves sold Market steers sold	Bale Ton Bu. Bu. No. No. No.	$\begin{array}{r} 126,676\\ 208,955\\ 27,569,300\\ 829,068\\ 394,630\\ 60,724\\ 655,976\end{array}$	$\begin{array}{r} 195,909\\ 208,955\\ 25,222,395\\ 9,388,920\\ 363,475\\ 69,704\\ 601,300\\ \end{array}$	$\begin{array}{r} 104,869\\ 208,955\\ 28,411,190\\ 6,238,560\\ 456,940\\ 74,047\\ 661,435\end{array}$	$\begin{array}{r} 133,344\\ 208,955\\ 27,159,000\\ 6,761,160\\ 342,705\\ 74,047\\ 661,435\end{array}$	
Return to operator labor, management and land Return to operator labor and management <sup>3</sup>	Dol. Dol.	62,915,692 54,122,593	61,387,175 52,594,076	56,990,883 48,197,784	56,996,123 48,203,024	

		Cotton allotment, percentage of 1963 level (cotton price, cents per pound of lint)				
Item	Unit	100		115		
		(21.1)	(20.0)1	(20.01)	(21.1)	
Cotton Peanuts Corn for feed Oats Corn silage Pasture and hay Idle open land	Acre Acre Acre Acre Acre Acre Acre Acre	$183,927 \\ 208,955 \\ 437,380 \\ 165,634 \\ 135,650 \\ 513,850 \\ 29,480 \\$	$\begin{array}{r} 96,393\\ 208,955\\ 507,469\\ 103,976\\ 153,095\\ 575,508\\ 29,480\end{array}$	$\begin{array}{c} 122,523\\ 208,955\\ 481,339\\ 114,026\\ 153,095\\ 565,458\\ 29,480\end{array}$	$\begin{array}{c} 211,059\\ 208,955\\ 417,107\\ 174,786\\ 128,791\\ 504,698\\ 29,480\end{array}$	
Total open land	Acre	1,674,876	1,674,876	1,674,876	1,674,876	
Sows Beef cows Steers	No. No. No.	22,110 98,729 572,899	29,480 104,589 646,990	$\begin{array}{c} 21,440 \\ 104,589 \\ 646,990 \end{array}$	$21,440 \\ 104,589 \\ 545,434$	
Cotton allotment Investment capital Operating capital Resident labor used <sup>2</sup> Seasonal labor hired	Acre Dol. Dol. Hour Hour	$183,927 \\135,917,384 \\98,430,496 \\13,052,299 \\3,226,763$	211,059 144,046,178 107,230,683 13,749,526 3,178,497	$\begin{array}{c} 211,059\\ 142,596,365\\ 106,893,807\\ 13,364,276\\ 3,230,757\end{array}$	211,059 135,493,955 95,335,346 12,892,952 3,196,037	
Cotton Peanuts Corn for feed Oats Market hogs sold Fat calves sold Market steers sold	Bale Ton Bu. Bu. No. No. No.	$\begin{array}{r} 229,909\\ 208,955\\ 24,055,900\\ 9,938,040\\ 342,705\\ 74,047\\ 572,899\end{array}$	$\begin{array}{r} 120,491\\ 208,955\\ 27,910,795\\ 6,238,560\\ 456,940\\ 78,442\\ 646,990\end{array}$	$\begin{array}{r} 153,154\\ 208,955\\ 26,473,645\\ 6,841,560\\ 332,320\\ 78,442\\ 646,990\end{array}$	$\begin{array}{r} 263,824\\ 208,955\\ 22,940,885\\ 10,487,160\\ 332,320\\ 78,442\\ 545,434\end{array}$	
Return to operator labor, management and land Return to operator labor and	Dol.	57,724,228	57,024,503	57,034,530	57,866,832	
management	Dol.	48,931,129	48,231,404	40,241,431	49,073,733	

APPENDIX TABLE 17. Continued

<sup>1</sup> Lowest price programmed for the specified allotment level. <sup>2</sup> Resident labor available is 39,087,038 hours. <sup>3</sup> Return to operator labor, management and land less a charge of \$5.25 per acre of open land.

	<b>TT</b>	Cotton allotment, Percentage of 1963 Level (cotton price, cents per pound of lint)					
Item	Unit	55	85	10	0		
		(30.0)1	(25.0)1	(20.0)1	(20.01)		
Cotton	Acre	100,851	155,972	113,836	132,876		
Peanuts	Acre	208,019	208,019	208,019	208,019		
Corn for feed	Acre	495,750	453,592	488,455	469,415		
Oats	Acre	95,270	107,680	72,140	79,420		
Corn silage	Acre	157,357	144,394	151,667	151,667		
Pasture and hay	Acre	586,163	573,753	609,293	602,013		
Idle open land	Acre	24,640	24,640	24,640	24,640		
Total open land	Acre	1,668,050	1,668,050	1,668,050	1,668,050		
Sows	No.	21.280	19,600	24,640	18,480		
Beef cows	No.	109,862	126.112	133,972	133,972		
Steers	No.	668,264	612,456	641,352	641,352		
Cotton allotment Investment capital Operating capital Resident labor used <sup>2</sup> Seasonal labor hired	Acre Dol. Dol. Hour Hour	$100,851 \\ 143,817,808 \\ 108,679,032 \\ 13,194,647 \\ 3,434,465$	$155,972 \\144,089,948 \\102,443,708 \\12,901,702 \\3,349,348$	$183,161 \\ 149,296,676 \\ 106,108,084 \\ 13,301,671 \\ 3,288,666$	$183,161\\148,242,924\\105,863,252\\13,021,671\\3,326,746$		
Cotton Peanuts Corn for feed Oats Market hogs sold Fat calves sold Market steers sold	Bale Ton Bu. Bu. No. No. No.	$\begin{array}{r} 126,064\\ 208,019\\ 27,266,250\\ 5,716,200\\ 329,840\\ 82,396\\ 668,264\end{array}$	$\begin{array}{c} 194,965\\ 208,019\\ 24,947,560\\ 6,460,800\\ 303,800\\ 94,584\\ 612,456\end{array}$	$\begin{array}{r} 142,295\\ 208,019\\ 26,865,025\\ 4,328,400\\ 381,920\\ 100,479\\ 641,352\end{array}$	$\begin{array}{r} 166,905\\ 208,019\\ 25,817,825\\ 4,765,200\\ 286,440\\ 100,479\\ 641,352\end{array}$		
Return to operator labor, management and land Return to operator labor and management <sup>3</sup>	Dol. Dol.	63,191,241 54.433.977	61,745,260 52,987,998	57,221,856 48,464,593	57,228,965 48,471,702		

#### Appendix Table 18. Accrecates for Specified Items, Wiregrass Area, Alabama (1975 Farm Distribution—Varying Allotments for Cotton—Cotton Price at Point of Change in Optimum Programs—Base Prices for Other Products)

_		Cotton allotment, percentage of 1963 level (cotton price, cents per pound of lint)				
Item	Unit	100		115		
		(21.1)	(20.0)1	(20.01)	(21.1)	
Cotton	Acre	183,161	130,792	152,632	210,262	
Peanuts	Acre	208,019	208,019	208,019	208,019	
Corn for feed	A cre	432,690	476,091	454,251	412,441	
Oats	Acre	113,885	72,140	80,540	120,090	
Corn silage	Acre	138,107	147,075	147,075	131,255	
Pasture and hay	Acre	567,548	609,293	600,893	561,343	
Idle open land	Acre	24,640	24,640	24,640	24,640	
Total open land	Acre	$1,\!668,\!050$	1,668,050	1,668,050	1,668,050	
Sows	No.	18.480	24 640	17.920	17.920	
Beef cows	No.	133,972	141,920	141.920	141.920	
Steers	No.	583,722	621,746	621,746	555,641	
Cotton allotment Investment capital Operating capital Resident labor used <sup>2</sup> Seasonal labor hired	Acre Dol. Dol. Hour Hour	$183,161\\144,221,481\\99,318,687\\12,754,991\\3,306,971$	210,262 150,192,464 104,006,268 13,236,721 3,243,424	$\begin{array}{r} 210,262\\ 148,980,680\\ 103,724,700\\ 12,914,721\\ 3,287,104 \end{array}$	210,262 144,357,568 96,201,047 12,607,926 3,264,504	
Cotton Peanuts Oots Market hogs sold Fat calves sold Market steers sold	Bale Ton Bu. Bu. No. No. No.	$\begin{array}{r} 228,951\\ 208,019\\ 23,797,950\\ 6,833,100\\ 286,440\\ 100,479\\ 583,722\end{array}$	$\begin{array}{r} 163,\!490\\ 208,\!019\\ 26,\!185,\!055\\ 4,\!328,\!400\\ 381,\!920\\ 106,\!440\\ 621,\!746\end{array}$	$\begin{array}{r} 190,790\\ 208,019\\ 24,983,805\\ 4,832,400\\ 277,760\\ 106,440\\ 621,746\end{array}$	$\begin{array}{r} 262,828\\ 208,019\\ 22,684,255\\ 7,205,400\\ 277,760\\ 106,440\\ 555,641\end{array}$	
Return to operator labor, management and land Return to operator labor and management <sup>3</sup>	Dol. Dol.	58,135,335 49,378,072	57,265,687 48.508.424	57,273,865 48,516,602	58,315,020 49,557,758	

APPENDIX TABLE 18. Continued

<sup>1</sup> Lowest price programmed for the specified allotment level. <sup>2</sup> Resident labor available is 33,821,830 hours. <sup>3</sup> Return to operator labor, management and land less a charge of \$5.25 per acre of open land.

APPENDIX TABLE 19. AGGREGATES FOR SPECIFIED ITEMS, WIREGRASS AREA	А,
Alabama (1959 Farm Distribution—Varying Allotments for	
Peanuts—Peanut Price at Point of Change in Optimum	
PROGRAMS—BASE PRICES FOR OTHER PRODUCTS)	

_	Peanut allotment, percentag ( peanut price, dollars			rcentage of 19 dollars per to	ge of 1963 level s per ton)	
Item	Unit	70	85	100	115	
· · · · · ·		$(256)^{1}$	(192)1	(160)1	(128)1	
Cotton Peanuts	Acre Acre	183,927 146,238	183,927 177,723	183,927 208.887	183,927 239,702	
Corn for feed	Acre	486,467	462,231	438,316	414,135	
Corn silage	Acre Acre	150,147	142,899	135,650	128,148 175,654	
Pasture and hay Idle open land	Acre Acre	533,891 29,480	523,002 29,480	512,982 29,480	503,830 29,480	
Total open land	Acre	1,674,876	1,674,876	1,674,876	1,674,876	
Sows Beef cows Steers	No. No. No.	24,790 85,199 636,013	$23,450 \\ 92,091 \\ 604,797$	22,110 98,729 572,899	20,770 105,436 541,936	
Peanut allotment Investment capital Operating capital Resident labor used <sup>2</sup> Seasonal labor hired	Acre Dol. Dol. Hour Hour	$\begin{array}{r} 146,238\\ 136,900,788\\ 106,034,705\\ 13,534,104\\ 3,370,403\end{array}$	$\begin{array}{r} 177,723\\136,405,891\\102,226,840\\13,293,537\\3,298,183\end{array}$	$\begin{array}{r} 208,887\\ 135,917,410\\ 98,430,496\\ 13,052,299\\ 3,226,763\end{array}$	239,702 135,427,655 94,637,583 12,811,731 3,155,411	
Cotton Peanuts Corn for feed Oats Market hogs sold Fat calves sold Market steers sold	Bale Ton Bu. Bu. No. No. No.	$\begin{array}{r} 229,909\\ 146,238\\ 26,755,685\\ 8,683,560\\ 384,245\\ 63,899\\ 636,013\end{array}$	$\begin{array}{r} 229,909\\ 177,723\\ 25,422,705\\ 9,336,840\\ 363,475\\ 69,068\\ 604,797\end{array}$	$\begin{array}{r} 299,909\\ 208,887\\ 24,107,380\\ 9,938,040\\ 342,705\\ 74,047\\ 572,899\end{array}$	299,909 239,702 22,777,425 10,539,240 321,935 79,077 541,936	
Return to operator labor, management and land Return to operator labor and management <sup>3</sup>	Dol. Dol	67,927,726 59 134 627	61,392,279 52,599,180	57,516,944 48 723 845	51,639,430 42 846 331	

		Peanut allotment, percentage of 1963 level (peanut price, dollars per ton)			
Item	Unit		130		
		(96)1	(104.5)	(110.5)	
Cotton	Acre	183,927	183,927	183,927	
Peanuts	Acre	123,725	157,225	270,933	
Corn for feed	Acre	506,980	473,480	390,152	
Corn silage	Acre	151,279	151,279	120,899	
Oats	Acre	96,362	108,422	186,542	
Pasture and hay	Acre	583,123	571,063	492,943	
Idle open land	Acre	29,480	29,480	29,480	
Total open land	Acre	1,674,876	1,674,876	1,674,876	
Sows	No.	30.150	20.100	20.100	
Beef cows	No.	101,126	101.126	101,126	
Steers	No.	640,852	640,852	$510,\!652$	
Peanut allotment	Acre	270,933	270,933	270,933	
Investment capital	Dol.	145,694,759	143,328,788	134,939,482	
Operating capital	Dol.	107,230,674	106,540,172	90,840,309	
Resident labor used <sup>2</sup>	Hour	13,971,862	13,390,302	12,571,778	
Seasonal labor hired	Hour	3,376,243	3,372,223	3,084,915	
Cotton	Bale	229,909	229,909	229,909	
Peanuts	Ton	123,725	157,225	270,933	
Corn for feed	Bu.	27,883,900	26,041,400	21,458,360	
Oats	Bu.	5,781,720	6,505,320	11,192,520	
Market hogs sold	No.	467,325	311,550	311,550	
Fat calves sold	No.	75,844	75,844	75,844	
Market steers sold	No.	640,852	640,852	$510,\!652$	
Return to operator					
labor, management					
_ and land	Dol.	45,700,850	46,752,514	47,700,574	
Return to operator					
labor and					
management <sup>a</sup>	Dol.	36,907,751	37,959,415	38,907,475	

Appendix	TABLE	19.	Continued
MEEDIA	TUDLE	<b>TO</b> .	Commute

<sup>1</sup> Lowest price programmed for the specified allotment level. <sup>2</sup> Resident labor available is 39,087,038 hours. <sup>3</sup> Return to operator labor, management and land less a charge of \$5.25 per acre of open land.

4
APPENDIX TABLE 20. AGGREGATES FOR SPECIFIED ITEMS, WIREGRASS AREA,
Alabama (1975 Farm Distribution—Varying Allotments for
Peanuts—Peanut Price at Point of Change in Optimum
PROGRAMS—BASE PRICES FOR OTHER PRODUCTS)

	· · ·	Peanut allotment, percentage of 1963 level (peanut price, dollars per ton)			
Item	Unit	70	85	100	115
		$(256)^{1}$	(192)1	(160)1	(128)1
Cotton	Acre	183,161	183,161	183,161	183,161
Comp for food	Acre	145,491	176,932	208,019	238,812
Corn for feed	Acre	481,019	456,960	433,343	409,633
Corn snage	Acre	152,871	145,489	138,107	130,371
Pasture and hav	Acre	591,700	579 759	110,000	120,000
I asture and nay	Acre	24 640	24 640	24 640	24 640
Total open land	Acre	1 668 050	1 668 050	1 668 050	1 669 050
Total open land	11010	1,000,000	1,008,030	1,008,030	1,000,000
Sows	No.	20,720	19,600	18,480	17,360
Beet cows	No.	115,602	124,964	133,972	143,068
Steers	NO.	647,919	615,970	583,722	552,127
Peanut allotment Investment capital Operating capital Resident labor used <sup>2</sup> Seasonal labor hired	Acre Dol. Dol. Hour Hour	$\begin{array}{r} 145,491\\ 143,908,306\\ 106,998,087\\ 13,205,349\\ 3,453,948\end{array}$	$\begin{array}{r} 176,932\\144,062,825\\103,154,799\\12,980,458\\3,380,221\end{array}$	$\begin{array}{r} 208,019\\144,221,516\\99,318,687\\12,754,991\\3,306,971\end{array}$	$\begin{array}{r} 238,812\\ 144,378,428\\ 95,487,404\\ 12,530,092\\ 3,233,809 \end{array}$
Cotton Peanuts Corn for feed Oats Market hogs sold Fat calves sold Market steers sold	Bale Ton Bu. Bu. No. No. No.	$\begin{array}{r} 228,951\\ 145,491\\ 26,456,045\\ 5,986,800\\ 321,160\\ 86,702\\ 647,919\end{array}$	$\begin{array}{r} 228,951\\ 176,932\\ 25,132,800\\ 6,426,900\\ 303,800\\ 93,723\\ 615,970\end{array}$	$\begin{array}{r} 228,951\\ 208,019\\ 23,833,865\\ 6,833,100\\ 286,440\\ 100,479\\ 583,722\end{array}$	$\begin{array}{r} 228,951\\ 238,812\\ 22,529,815\\ 7,239,300\\ 269,080\\ 107,301\\ 552,127\end{array}$
Return to operator labor, management and land Return to operator labor and management <sup>8</sup>	Dol. Dol.	68,138,588 59.381 325	61,707,175 52.949,912	57,927,989 49.170,727	52,153,722 43,396,460

· · · · · · · · · · · · · · · · · · ·					
		Peanut allotment, percentage of 1963 level (peanut price, dollars per ton)			
Item	Unit		130		
	-	(96)1	(104.5)	(110.5)	
Cotton Peanuts Corn for feed Oats Pasture and hay Ule open land	Acre Acre Acre Acre Acre Acre Acre	$183,161 \\ 167,884 \\ 468,168 \\ 142,764 \\ 67,060 \\ 614,373 \\ 24,640$	$183,161 \\ 195,884 \\ 440,168 \\ 142,764 \\ 77,140 \\ 604,293 \\ 24,640$	183,161269,899385,928122,989127,990553,44324,640	
Total open land	Acre	1 668 050	1 668 050	1 668 050	
Sows Beef cows Steers	No. No. No.	$\begin{array}{r} 25,200\\ 137,908\\ 604,840\end{array}$	$16,800 \\ 137,908 \\ 604,840$	$16,800 \\ 137,908 \\ 520,090$	
Peanut allotment Investment capital Operating capital Resident labor used <sup>2</sup> Seasonal labor hired	Acre Dol. Dol. Hour Hour	269,899 151,975,882 102,446,635 13,324,279 3,351,848	$\begin{array}{r} 269,899\\ 149,998,354\\ 101,869,499\\ 12,838,199\\ 3,348,488\end{array}$	$\begin{array}{r} 269,899\\ 144,537,573\\ 91,650,118\\ 12,305,404\\ 3,161,473\end{array}$	
Cotton Peanuts Corn for feed Oats Market hogs sold Fat calves sold Market steers sold	Bale Ton Bu. Bu. No. No. No.	$\begin{array}{r} 228,951\\ 167,884\\ 25,749,240\\ 4,023,600\\ 390,600\\ 103,431\\ 604,840\end{array}$	$\begin{array}{r} 228,951\\ 195,884\\ 24,209,240\\ 4,628,400\\ 260,400\\ 103,431\\ 604,840\end{array}$	$\begin{array}{r} 228,951\\ 269,899\\ 21,226,040\\ 7,679,400\\ 260,400\\ 103,431\\ 520,090\end{array}$	
Return to operator, labor, management and land Return to operator labor and	Dol.	45,702,600	47,129,614	48,310,783	
management <sup>a</sup>	Dol.	36,945,338	38,372,352	39,553,520	

APPENDIX TABLE 20. Continued

.

<sup>1</sup> Lowest price programmed for the specified allotment level. <sup>2</sup> Resident labor available is 33,821,830 hours. <sup>3</sup> Return to operator labor, management and land less a charge of \$5.25 per acre of open land.

#### Appendix Table 21. Aggregate Supply of Cotton, Limestone Valleys, Alabama (No Allotment Restriction for Cotton—Cotton Price at Point of Change in Optimum Programs— Base Prices for Other Products)

Cotton price	Farm size distribution			
per pound of lint	1959	1975		
Cents	1	Bales		
16.51	114,245.1	149,129.1		
16.62	118,921.8	155,233.8		
16.70	205,163.8	314,364.2		
18.04	264,563.8	351,489.2		
18.42	273,419.8	357,024.2		
19.08	323,226.0	422,038.4		
20.63	331,906.0	438,054.4		
20.68	433,142.8	570,203,2		
21.32	440,806.3	580,206.7		
21.96	465,853.0	626,481.5		
22.85	468,148.3	630,657.1		
23.52	540,508.3	675,882.1		
24.20	723,045.9	744,902.1		
24.25	732,717.9	762,748.5		
24.27	742,032.0	774,906.6		
25.00	831,888.0	831,066.6		
25.73	949,570.8	875,564.1		
26.25	975,083.8	922,639.7		
26.58	1,003,417.8	974,920.5		
26,79	1,043,674.1	1.027.468.8		
27.14	1,075,077.1	1,085,412,4		
27.66	1.110.717.1	1.107.687.4		
28.48	1,164,331.9	1,127,959.9		
30.85	1,165,757.9	1,130,591.1		

Appendix Table 22. Acgregate Supply of Cotton, Wiregrass, Alabama (No Allotment Restrictions for Cotton—Cotton Price at Point of Change in Optimum Programs—Base Price for Other Products)

Cotton price	Farm size distribution			
per pound of lint	1959	1975		
Cents	Be	ales		
$17.82 \\ 19.07 \\ 19.81 \\ 20.01 \\ 21.09 \\ 21.26 \\ 21.35 \\ 21.66 \\ 21.77 \\ 22.16 \\ 22.70 \\ 22.94 \\ 23.27 $	$\begin{array}{c} 15,496\\ 39,685\\ 122,535\\ 191,210\\ 346,843\\ 476,594\\ 505,363\\ 507,176\\ 583,734\\ 623,132\\ 626,026\\ 687,634\\ 784,796\end{array}$	$\begin{array}{c} 20,053\\ 53,846\\ 161,064\\ 218,464\\ 319,768\\ 501,030\\ 525,077\\ 527,423\\ 577,256\\ 628,241\\ 632,284\\ 718,348\\ 781,595\end{array}$		
31.01	797,633	792,324		
31.13 32.04	840,217 858,281	820.043 843,419		
32.75 34.99	886,155 908,265	882,359 900,839		

#### Appendix Table 23. Aggregate Supply of Peanuts, Wiregrass, Alabama (No Allotment Restrictions for Peanuts-Peanut Price at Point of CHANGE IN OPTIMUM PROGRAMS-BASE PRICE FOR

Peanut price	Farm size distribution			
per ton	1959	1975		
Dollars	Т	ons		
100.32	7,276	9,416		
100.23	19,186	26,054		
103.18	53,458	70,406		
103.61	106,925	145,100		
104.50	113,625	150,700		
110.06	135,735	169,180		
114.80	233,819	233,025		
115.43	258,146	267,009		
119.53	273,854	287.337		
124.73	311.178	311.632		
125.46	322,568	321,152		

#### **OTHER** PRODUCTS)

#### ACKNOWLEDGMENT

This publication is based on a part of Southern Regional Research Project S-42, "An Economic Appraisal of Farming Adjustment Opportunities in the Southern Region to Meet Changing Conditions." This regional project is partially financed by Research and Marketing Act funds. It is a cooperative effort of the Departments of Agricultural Economics of the State Agricultural Experiment Stations in Alabama, Arkansas, Georgia, Kentucky, Louisiana, Mississippi, North Carolina, Oklahoma, South Carolina, Tennessee, Texas, and Virginia; and the Farm Production Economics Division, Economic Research Service, United States Department of Agriculture. Dr. John W. White, Vice-president for Agriculture, University of Arkansas, is the administrative advisor, and Dr. James H. White, University of Arkansas, is chairman of the Regional Committee.

The Southern Farm Management Research Committee, sponsored by the Farm Foundation and the Southern Agricultural Experiment Stations, was helpful in development of the regional project. The overall purposes of the project are (1) to provide guides to farmers when choosing alternative production opportunities, especially as those opportunities are affected by changes in prices and technology, and (2) to provide guides to persons engaged in developing and administering public agricultural programs.