

**DELTA
2018
PLANNING BUDGETS**

**Mississippi State University
Department of Agricultural Economics
Budget Report 2017-05**

October 2017

Foreword

This report is designed to provide necessary planning data to farmers, research and extension staffs, lending agencies, and others in agriculture. Readers are cautioned that returns presented are labeled "**Returns Above Specified Expenses.**" Estimated costs for land, management, and general farm overhead are not included in this report. The exception is unallocated labor, which is included. "**Returns Above Direct Expenses**" should be used in making 2018 planning decisions. This would be a one-year short-run decision. Decisions beyond one year, or long-run decisions, should be based on "**Returns Above Specified Expenses.**"

Acknowledgments

A list of individuals who contributed to the development of the agricultural enterprise budgets follows this acknowledgment. The administrative committee structure and enterprise committees have shown a spirit of cooperation seldom found when so many work together. A team effort has led to many improvements in the budgets over the years.

Special appreciation is expressed to producers who provided information on crop practices used. Appreciation also is expressed to farm supply dealers, equipment dealers, custom operators, and chemical companies who provided prices for crop production inputs. The Mississippi Agricultural Statistics Service is commended for its excellence in collecting price and production practice data.

Acknowledgment is made to the Mississippi State University Extension Service, the Mississippi Agricultural and Forestry Experiment Station, and the United States Agricultural Research Service staffs for the excellent cooperation that made this report possible.

The mention in this report of any commercial product does not imply its endorsement by MSU-ES, MAFES, or USDA over other products not named nor does the omission imply they are not satisfactory.

2018 Budget Committees

Corn, Grain Sorghum, and Wheat

Brian Williams, MSU-ES, Chairman
Erick Larson, MSU-ES/MAFES
Jason Bond, MSU-ES/MAFES
Angus Catchot, MSU-ES
Don Cook, MAFES
Bobby Golden, MSU-ES/MAFES
Jeff Gore, MSU-ES/MAFES
Jason Krutz, MSU-ES
Larry Oldham, MSU-ES
H. C. Pringle, MAFES

Cotton

Larry Falconer, MSU-ES, Chairman
Darrin Dodds, MSU-ES
Jason Bond, MSU-ES/MAFES
Angus Catchot, MSU-ES
Don Cook, MAFES
Bobby Golden, MSU-ES/MAFES
Jeff Gore, MSU-ES/MAFES
Larry Oldham, MSU-ES
H. C. Pringle, MAFES

Peanuts

Bryon Parman, MSU-ES, Chairman
Jason Sarver, MSU-ES
Jeff Gore, MSU-ES/MAFES
Alan Henn, MSU-ES

Rice

Larry Falconer, MSU-ES, Chairman
Bobby Golden, MSU-ES/MAFES
Tom Allen, MSU-ES/MAFES
Jason Bond, MSU-ES/MAFES
Jeff Gore, MSU-ES/MAFES
Jason Krutz, MSU-ES
H. C. Pringle, MAFES

Soybeans

Larry Falconer, MSU-ES, Chairman
Trent Irby, MSU-ES
John Orłowski, MSU-ES/MAFES
Tom Allen, MSU-ES/MAFES
Jason Bond, MSU-ES/MAFES
Normie W. Buehring, MAFES
Angus Catchot, MSU-ES
Don Cook, MAFES
Bobby Golden, MSU-ES/MAFES
Jeff Gore, MSU-ES/MAFES
Jason Krutz, MSU-ES
H. C. Pringle, MAFES

Vegetables

Elizabeth Canales, MSU-ES, Chairman
Blake Layton, MSU-ES
Stephen Meyers, MSU-ES
David H. Nagel, MSU-ES

Fruit & Nut

Alba Collart, MSU-ES, Chairman
Eric Stafne, MSU-ES
Frank Matta, MAFES

Supporting Committees

Equipment

Larry Falconer, MSU-ES, Chairman
W. Gail Gillis, MSU-ES

Prices

Larry Falconer, MSU-ES, Chairman
W. Gail Gillis, MSU-ES

Documentation and Data Processing

Larry Falconer, MSU-ES, Chairman
W. Gail Gillis, MSU-ES

Publication Review

Larry Falconer, MSU-ES, Chairman
W. Gail Gillis, MSU-ES

Table of Contents

	Page
Foreword.....	i
Acknowledgments.....	i
2018 Budget Committees.....	ii
2018 Planning Budgets	1
Budgets for Agricultural Enterprises.....	1
Methods and Procedures	1
Production Practices	1
Machinery	1
Estimates of Direct Costs.....	2
Estimates of Fixed Costs.....	2
Estimates of Returns	3
Irrigation Costs	3
Net Returns	3
Enterprise Budgets	
Table	
1 Cotton, 12R-38", solid, conservation tillage B2XF variety, Delta Area	6
2 Cotton, 12R-38", solid, conservation tillage B2XF variety, furrow irrigated, 10.5 ac-in., Delta Area	12
3 Cotton, 12R-38", solid, conservation tillage GLB2 variety, Delta Area	18
4 Cotton, 12R-38", solid, conservation tillage GLB2 variety, furrow irrigated, 10.5 ac-in., Delta Area	24
5 Cotton, 12R-38", solid, conservation tillage B2XF variety, pivot irrigated, 7.5 ac-in., Delta Area.....	30
6 Cotton, 12R-38" solid, no-till B2XF variety, Delta Area	36
7 Cotton, 12R-38", 2x1 full-skip, (8 rows planted) Conservation tillage, B2XF variety, Delta Area	42
8 Soybeans, full-season, RR, stale seedbed, 12R 30" Non-irrigated, Delta Area	48
9 Soybeans, full-season, RR, stale seedbed, 12R 30" Furrow irrigated, 9 ac-in., Delta Area.....	54
10 Soybeans, full-season, RR, stale seedbed, 12R 30" Flood irrigated, 13.5 ac-in., Delta Area	60
11 Soybeans, double crop after wheat, RR, 12R 30" Pivot irrigated, 7.5 ac-in., All Areas	66
12 Soybeans, double crop after wheat, RR, 12R 30" Non-irrigated, All Areas.....	72
13 Soybeans full season, RR2X, stale seedbed, 12R 30" Non-irrigated, Delta Area	78
14 Soybeans, full-season, RR2X, stale seedbed, 12R 30" Furrow irrigated, 9 ac-in., Delta Area.....	84
15 Soybeans, full-season, RR2X, stale seedbed, 12R 30" Flood irrigated, 13.5 ac-in., Delta Area	90
16 Soybeans, double crop after wheat, RR2X, 12R 30" Pivot irrigated, 12.0 ac-in.,All Areas	96
17 Soybeans, double crop after wheat, RR2X, 12R 30" Non-irrigated, All Areas	102

18	Soybeans, full-season, LL, stale seedbed, 12R 30” Non-irrigated, Delta Area	108
19	Soybeans, full-season, LL, stale seedbed, 12R 30” Furrow irrigated, 9 ac-in., Delta Area	114
20	Soybeans, full-season, LL, stale seedbed, 12R 30” Flood irrigated, 13.5 ac-in., Delta Area	120
21	Soybeans, double crop after wheat, LL, 12R 30” Pivot irrigated, 7.5 ac-in., All Areas	126
22	Soybeans, double crop after wheat, LL, 12R 30” Non-irrigated, All Areas	132
23	Corn, stale seedbed, BtRR, 12-row 38”, 220 bu yield goal Furrow irrigated, 13 ac-in., Delta Area	138
24	Corn, stale seedbed, BtRR, non-irrigated, 12-row 38” 170 bu yield goal, Delta Area	144
25	Corn, conventional tillage, RR seed, 12-row 38” 220 bu yield goal, furrow irrigated, 13 ac-in., Delta Area	150
26	Corn, conventional tillage, RR seed, 12-row 38” 170 bu yield goal, non-irrigated, Delta Area	156
27	Grain sorghum, 12-row 30”, 100 bu yield goal All Areas	162
28	Wheat followed by soybeans, 70 bu yield goal All Areas	168
29	Contour levee rice Flood irrigated, 33 ac-in, Delta Area.....	174
30	Straight levee rice Flood irrigated, 27 ac-in, Delta Area.....	180
31	Straight levee rice Multi inlet flood irrigated, 23 ac-in, Delta Area.....	186
32	Straight levee rice – zero grade Flood irrigated, 19 ac-in, Delta Area.....	192
33	Clearfield contour levee rice Flood irrigated, 33 ac-in, Delta Area.....	198
34	Clearfield straight levee rice Flood irrigated, 27 ac-in, Delta Area.....	204
35	Clearfield straight levee multi inlet rice Flood irrigated, 23 ac-in, Delta Area.....	210
36	Clearfield straight levee-zero grade rice Flood irrigated, 19 ac-in, Delta Area.....	216
37	Clearfield hybrid straight levee rice Flood irrigated, 27 ac-in, Delta Area.....	222
38	Clearfield hybrid straight levee multi inlet rice Flood irrigated, 23 ac-in, Delta Area.....	228
39	Clearfield hybrid straight levee-zero grade rice Flood irrigated, 19 ac-in, Delta Area.....	234
40	Conventional hybrid straight levee rice Flood irrigated, 27 ac-in, Delta Area.....	240
41	Conventional hybrid straight levee multi inlet rice Flood irrigated, 23 ac-in, Delta Area.....	246
42	Conventional hybrid straight levee-zero grade rice Flood irrigated, 19 ac-in, Delta Area.....	252
43	Peanut- runner, 1.8 ton (3600 lb) yield, 8 row-38 inch All Areas	258
44	Peanut- runner, 1.8 ton (3600 lb) yield, 8 row-30 inch All Areas	264
45	Peanut- runner, 1.8 ton (3600 lb) yield, 12 row-38 inch All Areas	270
46	Peanut- runner, 1.8 ton (3600 lb) yield, 12 row-38 inch Furrow irrigated, All Areas	276

Appendix
Table

1	Tractors/Harvesters: estimated purchase price, annual use, useful life, fuel use, and direct and fixed costs per hour	284
2	Self-propelled machines: estimated purchase price, annual use, useful life, fuel use, performance rate, and direct and fixed costs per acre	285
3	Towed equipment: estimated purchase price, annual use, useful life, performance rate, and direct and fixed costs per acre	286
4	Operating inputs: estimated prices	292
5	Estimated fuel prices and interest rates	295
6	Labor types, wage rates and unallocated labor multipliers for crop enterprises	295
7	Futures contract prices, basis levels, forward contract prices, and loan rates used in row crop budgets	296
8	Cotton irrigated with roll-out pipe 160-acre roll-out pipe system, 10.5 ac-in., Delta Area	297
9	Cotton irrigated with center pivot 135-acre ¼-mile pivot system, 7.5 ac-in., Delta Area.....	298
10	Full-season soybeans irrigated with roll-out pipe, 160-acre system, 9 ac-in., Delta Area	299
11	Irrigation with a contour flood system 80-acre system, 13.5 ac-in., Delta Area	300
12	Irrigation with a ½-mile center pivot system 530-acre system, 7.5 ac-in., Delta Area	301
13	Corn irrigated with roll-out pipe 160-acre system, 13 ac-in., Delta Area	302
14	Contour levee rice flood irrigation system, 80-acre system, 33 ac-in., Delta Area	303
15	Straight levee rice flood irrigation system, 80-acre system, 27 ac-in., Delta Area	304
16	Straight levee rice multi inlet flood irrigation system, 80-acre system, 23 ac-in., Delta Area	305
17	Straight levee rice – zero grade flood irrigation system 80-acre system, 19 ac-in., Delta Area	306
18	Peanuts irrigated with a roll-out pipe 160-acre system, 12 ac-in., Delta Area	307
	Literature Cited	309

2018 Planning Budgets

Budgets for Agricultural Enterprises

This publication provides economic and technical information in the form of enterprise budgets for a major crop produced by Mississippi farmers. A multidisciplinary approach involving researchers and extension personnel was used to determine production practices and input quantities, and to estimate costs and returns for each enterprise (14). The purpose of this section is to present the methods and procedures used to calculate costs and returns for each budget included in this publication.

Enterprise budgets represent a type of information that can be used by a wide variety of individuals in making decisions in the food and fiber industry. They are used:

- by farmers for planning,
- by extension personnel in providing educational programs to farmers,
- by lenders as a basis for credit,
- to provide basic data for research, and
- to inform non-farmers of the costs incurred by farmers in the production of food and fiber crops.

A budget should be prepared with a specific objective in mind. The budgets in this report were prepared to provide general information for several different uses. They provide information concerning general levels of costs and returns which will need to be adjusted for specific situations. Most users should think of these budgets as a first approximation and then make appropriate adjustments using the "Your Farm" column provided on each budget to add, delete, or change costs or incomes to reflect their specific situations.

Methods and Procedures

Production Practices

The production practices listed in each budget are the result of a combined effort by researchers and extension personnel to represent those practices that producers could use in a specific production system. Producers might use different practices in their own operations. If different types and quantities of operating inputs are to be used, then the budgeted expenses should be changed to more accurately reflect actual input usage. The Mississippi Agricultural Statistics Service conducts a survey of producers of major field crops in Mississippi. Data collected from producers are a part of the information used in selecting the practices included in each budget.

Committees made up of appropriate disciplines from the Mississippi Agricultural and Forestry Experiment Station, the Mississippi State University Extension Service, and the U.S. Department of Agriculture review and update the practices in the budgets every year. The updates are based on the collective judgment of the committee members. Quantities of materials and individual production practices budgeted are based on survey data from producers and/or generally accepted recommendations by committee members.

Machinery

Machinery manufacturers form the basis for machinery prices used in these publications. Prices by size of equipment are determined from the most common sales in each category as reported by machinery dealers. Prices used in the budgets reflect prices paid by farmers in 2017. (Appendix Tables 1, 2, and 3).

A performance rate reflects the time required to perform a given task or operation and is expressed as that part of an hour per acre. Previous studies and expert knowledge of the equipment committee members are used to estimate performance rates for new and larger equipment (1, 4, 5, 6, 7, 9, and 13).

The hours of annual use have been modified based on information collected from the cited studies (3, 4, 6, and 7).

Repairs and maintenance as a percentage of new cost are estimated for the life of the equipment and include oil and lubricants (1, 4, and 6).

Estimates of Direct Costs

Direct costs include estimated costs of repairs and maintenance (R&M) for all machinery and include fuel costs for powered machinery (Appendix Tables 1, 2, and 3). Direct costs are estimated on an hourly basis and are then converted to a per-acre basis using the performance rate for the particular operation. R&M costs for towed equipment and powered equipment are estimated as follows:

$$RPH = \frac{RLC \times RP}{THL}$$

$$RPA = RPH \times PR$$

where:

RPH = R&M cost per hour of use
 RLC = Replacement cost of machine
 RP = R&M percentage (percent of RLC)
 THL = Total hours of machine life
 RPA = R&M cost per acre
 PR = Performance rate

Direct costs include an estimate of fuel cost based on average fuel consumption per hour of use for the power unit. Other components of direct costs include quantities of materials used in production multiplied by the price per unit of these inputs, custom rates, hourly wage rates, and interest charges on operating capital (Appendix Tables 4, 5, and 6).

The labor wage rate per hour includes social security, accident and unemployment insurance, and some perquisites (11). Labor costs are estimated for four labor categories: operator labor, hand labor, irrigation labor, and unallocated labor. Operator labor and hand labor represent estimates of labor required to

perform the in-field tasks. Operator labor is that labor required to operate all power-driven equipment. Irrigation labor is used to perform tasks associated with an irrigation system. Unallocated labor is an estimate of labor that is not used directly in producing the enterprise. Its cost is estimated as a percentage of operator labor (11). The percentages used for the various crop enterprises are listed in Appendix Table 6.

Interest on operating capital is determined by using a short-term interest rate obtained from agricultural lenders and making a charge against capital outflows as the production process takes place. Interest is accumulated until the crop is harvested.

Estimates of Fixed Costs

Annual fixed cost estimates for machinery are based on a budgeting technique which computes the annual capital recovery charge (2, p. 143). When a combination of machines or equipment is required to perform a single operation, the total cost per acre for all equipment used in the operation is estimated. The fixed cost of machinery ownership is calculated by first computing the capital recovery factor and then using it to estimate the annual capital recovery charge.

$$CRF = \frac{IIR}{1 - (1 + IIR)^{-TYL}}$$

where:

CRF = Capital recovery factor
 IIR = Intermediate-term interest rate
 TYL = Total years of life

$$CRCPY = [(RLC - SV) \times CRF] + (SV \times IIR)$$

where:

CRCPY = Capital recovery charge per year
 RLC = Replacement cost
 SV = Salvage value (at end of useful life)

This value is then converted to its per-hour and per-acre equivalent values:

$$\text{CRCPH} = \frac{\text{CRCPY}}{\text{HAU}}$$

$$\text{CRCPA} = \text{CRCPH} \times \text{PR}$$

where:

CRCPH = Capital recovery charge per hour

HAU = Hours of annual use

CRCPA = Capital recovery charge per acre

PR = Performance rate

Estimates of Returns

It is difficult to estimate crop yields that may be expected for a particular production system in a given year. Crop yields used in the budgets are representative of historical yields modified to match the production system used to produce the yield. All yields including conventional, no-tillage, irrigation, and double-cropping are tempered with unpublished research and judgments of the commodity committees. Producers should use yield estimates that are reflective of their own operation.

To estimate returns, a price for the commodity must be used. Individual producers must determine their own expected price for the commodity. Commodity prices used in this report represent the higher of a calculated forward contract price or the loan rate that was applicable for the 2017 crop year. Government payments for commodities are not included in the budgets except to the extent that they are included in loan rates.

The futures price for an appropriate contract month is determined by averaging the closing prices for the first five trading days in October. The basis is determined by subtracting the average daily cash price for the month of October from the average daily closing price of the specified harvest month futures contract. These average futures prices and the basis adjustments are presented in Appendix Table 7.

A special table is presented to illustrate the effects of alternative levels of yields and prices on net returns. The budgeted yield and the budgeted price are used as base values (100 percent). Yields are then varied from 50 to 150 percent of the base yield while prices are varied from 75 to 125 percent of the base price. Net returns are computed for each combination of yield and price.

Irrigation Costs

Estimated costs of various irrigation systems are presented in Appendix Tables 8 through 18. A dryland crop budget may be converted to an irrigated crop budget by adding the appropriate direct and fixed costs to the costs of the dryland crop. Also, adjustments in crop yields and other costs may be required with the addition of supplemental irrigation.

Net Returns

Net returns are generally considered to be the amount left after subtracting all costs from all incomes for a particular enterprise. In these budgets, "RETURNS ABOVE DIRECT EXPENSES" and "RETURNS ABOVE TOTAL SPECIFIED EXPENSES" are used as a proxy for the economic concepts of net returns above variable costs and net returns above variable plus fixed costs, respectively. Some items are intentionally left out of these calculations, i.e., costs for land or land rent, taxes, insurance premiums, general farm overhead, and expected incomes from government payments or insurance payments. These costs and incomes vary widely among farms and farm situations so as to make routine calculation for representative situations impractical. These items should, however, be considered by each producer and factored into the final budget each producer develops for his own situation.

Enterprise Budgets

Table 1.A Estimated costs per acre
 Cotton, 12R-38" solid, conservation tillage
 B2XF variety, Delta Area, Mississippi, 2018

ITEM	UNIT	PRICE	QUANTITY	AMOUNT	YOUR FARM
		dollars		dollars	
DIRECT EXPENSES					
CUSTOM SPRAY					
App by Air (5 gal)	appl	6.50	2.5000	16.25	_____
App by Air (3 gal)	appl	5.00	5.2500	26.25	_____
HARVEST AIDS					
Thidiazuron 4lb	oz	1.50	2.3000	3.45	_____
Ethephon 6E	pt	2.88	2.3125	6.66	_____
Tribufos 6lb	pt	10.54	0.5000	5.27	_____
GINNING					
Gin & Haul	lb	0.11	1200.0000	132.00	_____
FERTILIZERS					
Potash (60% K2O)	cwt	18.98	1.3300	25.24	_____
UAN (32%)	gal	1.17	34.3582	40.20	_____
FUNGICIDES					
Cotton Seed Trt.	acre	20.00	1.0000	20.00	_____
HERBICIDES					
Clarity	pt	11.55	0.5000	5.78	_____
Glyphosate 3lbs a.e	oz	0.14	64.0000	8.96	_____
Select Max	pt	12.64	1.0000	12.64	_____
Gramoxone SL 2.0	oz	0.15	48.0000	7.20	_____
Cotoran	pt	6.42	2.0000	12.84	_____
Dual Magnum	pt	13.80	2.0000	27.60	_____
Liberty 280	oz	0.60	58.0000	34.80	_____
Diuron	pt	3.90	1.6000	6.24	_____
INSECTICIDES					
Acephate 90%	lb	7.43	1.7500	13.00	_____
Bidrin 8EC	oz	1.17	2.2000	2.57	_____
Centric 40WG	oz	5.38	4.5000	24.21	_____
Diamond .83EC	oz	1.40	6.0000	8.40	_____
Imidacloprid 4F	oz	0.78	2.0000	1.56	_____
Bifenthrin	oz	0.78	12.8000	9.98	_____
Lambda	oz	1.04	1.0000	1.04	_____
IncidentalPestTrt\$30	acre	30.00	1.0000	30.00	_____
SEED/PLANTS					
Cotton Seed B2XF	thous	3.00	45.0000	135.00	_____
GROWTH REGULATORS					
Mepiquat Chloride	oz	0.07	32.0000	2.24	_____
ADJUVANTS					
Surfactant	pt	3.28	0.4000	1.31	_____
CUSTOM FERTILIZE					
Custom Apply Fert	acre	7.50	1.0000	7.50	_____
ERADICATION FEE					
Eradication	acre	1.00	1.0000	1.00	_____
CUSTOM LIME					
Lime (Spread)	ton	46.00	0.6660	30.64	_____
CROP CONSULTANT					
Cotton Consultant	acre	8.00	1.0000	8.00	_____
SOIL TEST					
Soil Test	acre	10.00	0.3330	3.33	_____
OPERATOR LABOR					
Tractors	hour	13.51	0.3993	5.39	_____
Self-Propelled	hour	13.51	0.2310	3.13	_____
HAND LABOR					
Implements	hour	9.06	0.1235	1.11	_____
Self-Propelled	hour	9.06	0.2016	1.82	_____
UNALLOCATED LABOR					
	hour	13.52	0.5043	6.82	_____
DIESEL FUEL					
Tractors	gal	1.80	4.6248	8.32	_____
Self-Propelled	gal	1.80	5.0512	9.10	_____
REPAIR & MAINTENANCE					
Implements	acre	6.76	1.0000	6.76	_____
Tractors	acre	2.62	1.0000	2.62	_____
Self-Propelled	acre	21.32	1.0000	21.32	_____
INTEREST ON OP. CAP.	acre	14.55	1.0000	14.55	_____
TOTAL DIRECT EXPENSES				752.11	_____
FIXED EXPENSES					
Implements	acre	9.62	1.0000	9.62	_____
Tractors	acre	16.51	1.0000	16.51	_____
Self-Propelled	acre	85.97	1.0000	85.97	_____
TOTAL FIXED EXPENSES				112.10	_____
TOTAL SPECIFIED EXPENSES				864.21	_____

Note: Cost of production estimates are based on 2017 input prices.
Fertilization decisions should be based on soil tests.
Soil test cost is prorated for a test every 3rd year.
Lime cost prorated for application every 3rd year.

Table 1.B Summary of estimated costs and returns per acre
Cotton, 12R-38" solid, conservation tillage
B2XF variety, Delta Area, Mississippi, 2018

ITEM	UNIT	PRICE	QUANTITY	AMOUNT	YOUR FARM
		dollars		dollars	
INCOME					
Cotton Lint	lb	0.66	1200.0000	792.00	_____
Cotton Seed	lb	0.10	1620.0000	162.00	_____

TOTAL INCOME				954.00	_____
DIRECT EXPENSES					
CUSTOM SPRAY	acre	42.50	1.0000	42.50	_____
HARVEST AIDS	acre	15.38	1.0000	15.38	_____
GINNING	acre	132.00	1.0000	132.00	_____
FERTILIZERS	acre	65.44	1.0000	65.44	_____
FUNGICIDES	acre	20.00	1.0000	20.00	_____
HERBICIDES	acre	116.06	1.0000	116.06	_____
INSECTICIDES	acre	90.76	1.0000	90.76	_____
SEED/PLANTS	acre	135.00	1.0000	135.00	_____
GROWTH REGULATORS	acre	2.24	1.0000	2.24	_____
ADJUVANTS	acre	1.32	1.0000	1.32	_____
CUSTOM FERTILIZE	acre	7.50	1.0000	7.50	_____
ERADICATION FEE	acre	1.00	1.0000	1.00	_____
CUSTOM LIME	acre	30.64	1.0000	30.64	_____
CROP CONSULTANT	acre	8.00	1.0000	8.00	_____
SOIL TEST	acre	3.33	1.0000	3.33	_____
HAND LABOR	hour	9.06	0.3252	2.93	_____
OPERATOR LABOR	hour	13.51	0.6304	8.52	_____
UNALLOCATED LABOR	hour	13.52	0.5043	6.82	_____
DIESEL FUEL	gal	1.80	9.6761	17.42	_____
REPAIR & MAINTENANCE	acre	30.70	1.0000	30.70	_____
INTEREST ON OP. CAP.	acre	14.55	1.0000	14.55	_____

TOTAL DIRECT EXPENSES				752.11	_____
RETURNS ABOVE DIRECT EXPENSES				201.89	_____

TOTAL FIXED EXPENSES				112.10	_____

TOTAL SPECIFIED EXPENSES				864.21	_____
RETURNS ABOVE TOTAL SPECIFIED EXPENSES				89.79	_____

Note: Cost of production estimates are based on 2017 input prices.

Fertilization decisions should be based on soil tests.

Soil test cost is prorated for a test every 3rd year.

Lime cost prorated for application every 3rd year.

Table 1.C Estimated resource use for field operations, per acre
 Cotton, 12R-38" solid, conservation tillage
 B2XF variety, Delta Area, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	POWER UNIT SIZE	PERF RATE	TIMES OVER	MTH	INPUT AMOUNT	IMPLEMENT	POWER UNIT	ALLOC LABOR	UNALL LABOR
-----hours-----										
Soil Test	acre			0.33	Nov	0.3330				
Lime (Spread)	ton			0.33	Nov	0.6660				
Custom Apply Fert	acre			1.00	Nov	1.0000				
Potash (60% K2O)	cwt					1.3300				
Bed-Paratill Fold	12R-38	MFWD 225	0.053	1.00	Nov		0.05	0.05	0.05	0.04
Bed/Disk (Hipper)	12R-38	MFWD 225	0.049	0.50	Nov		0.02	0.02	0.02	0.01
App by Air (5 gal)	appl			1.00	Mar	1.0000				
Clarity	pt					0.5000				
Glyphosate 3lbs a.e	oz					32.0000				
Select Max	pt					1.0000				
Surfactant	pt					0.2000				
Fert Appl (Liquid)	12R-38	MFWD 225	0.051	1.00	Apr		0.05	0.05	0.07	0.04
UAN (32%)	gal					17.1791				
Row Cond Folding	38'	MFWD 225	0.040	1.00	May		0.04	0.04	0.04	0.03
Plant - Folding	12R-38	MFWD 225	0.049	1.00	May		0.04	0.04	0.09	0.03
Cotton Seed B2XF	thous					45.0000				
Cotton Seed Trt.	acre					1.0000				
Sprayer 600-750gal	60' 175hp		0.017	1.00	May			0.01	0.02	0.01
Gramoxone SL 2.0	oz					48.0000				
Cotoran	pt					2.0000				
Surfactant	pt					0.2000				
Cotton Consultant	acre			1.00	May	1.0000				
Eradication	acre					1.0000				
Sprayer 600-825gal	90' 250hp		0.011	1.00	May			0.01	0.01	0.00
Dual Magnum	pt					1.0000				
Liberty 280	oz					29.0000				
Acephate 90%	lb					0.2500				
Sprayer 600-750gal	60' 175hp		0.017	1.00	May			0.01	0.02	0.01
Dual Magnum	pt					1.0000				
Glyphosate 3lbs a.e	oz					32.0000				
Bidrin 8EC	oz					0.2000				
Sprayer 600-825gal	90' 250hp		0.011	1.00	Jun			0.01	0.01	0.00
Centric 40WG	oz					2.0000				
Mepiquat Chloride	oz					16.0000				
Fert Appl (Liquid)	12R-38	MFWD 225	0.051	1.00	Jun		0.05	0.05	0.07	0.04
UAN (32%)	gal					17.1791				
App by Air (3 gal)	appl			1.00	Jun	1.0000				
Diamond .83EC	oz					6.0000				
Imidacloprid 4F	oz					2.0000				
Spray (Direct/Layby)	12R-38	MFWD 225	0.044	1.00	Jul		0.04	0.04	0.06	0.03
Diuron	pt					1.6000				
Liberty 280	oz					29.0000				
App by Air (3 gal)	appl			1.00	Jul	1.0000				
Acephate 90%	lb					0.7500				
Mepiquat Chloride	oz					16.0000				
Bifenthrin	oz					6.4000				
App by Air (3 gal)	appl			0.25	Jul	0.2500				
Lambda	oz					1.0000				
Bidrin 8EC	oz					2.0000				
Incidental Pest				1.00	Jul					
App by Air (3 gal)	appl					1.0000				
IncidentalPestTrt\$30	acre					1.0000				
App by Air (3 gal)	appl			1.00	Aug	1.0000				
Acephate 90%	lb					0.7500				
Bifenthrin	oz					6.4000				
App by Air (3 gal)	appl			1.00	Aug	1.0000				
Centric 40WG	oz					2.5000				
App by Air (5 gal)	appl			1.00	Sep	1.0000				
Thidiazuron 4lb	oz					2.3000				
Ethephon 6E	pt					2.0000				
App by Air (5 gal)	appl			0.50	Sep	0.5000				
Tribufos 6lb	pt					0.5000				
Ethephon 6E	pt					0.3125				
Cotton Picker/Module	6R-38 (500)		0.172	1.00	Oct			0.17	0.34	0.13
Gin & Haul	lb			1.00	Oct	1200.0000				
Stalk Shredder-Flail	20'	MFWD 225	0.082	1.00	Oct		0.08	0.08	0.08	0.06
TOTALS							0.63	0.39	0.95	0.50

Note: Cost of production estimates are based on 2017 input prices.

Fertilization decisions should be based on soil tests.

Soil test cost is prorated for a test every 3rd year.

Lime cost prorated for application every 3rd year.

Table 1.D Estimated costs for field operations, per acre
Cotton, 12R-38" solid, conservation tillage
B2XF variety, Delta Area, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	-----DIRECT COST-----							FIXED COST	TOTAL COST	
		OP INPUT	FUEL	R&M	LABOR	LEASE	INTER	TOTAL			
-----dollars-----											
Soil Test	acre	3.33						0.16	3.49		3.49
Lime (Spread)	ton	30.64						1.46	32.10		32.10
Custom Apply Fert	acre	7.50						0.36	7.86		7.86
Potash (60% K2O)	cwt	25.24						1.20	26.44		26.44
Bed-Paratill Fold	12R-38		1.12	1.69	1.31			0.20	4.32	4.55	8.87
Bed/Disk (Hipper)	12R-38		0.51	0.34	0.60			0.07	1.52	1.50	3.02
App by Air (5 gal)	appl	6.50						0.21	6.71		6.71
Clarity	pt	5.78						0.18	5.96		5.96
Glyphosate 3lbs a.e	oz	4.48						0.14	4.62		4.62
Select Max	pt	12.64						0.40	13.04		13.04
Surfactant	pt	0.66						0.02	0.68		0.68
Fert Appl (Liquid)	12R-38		1.08	0.99	1.49			0.10	3.66	2.88	6.54
UAN (32%)	gal	20.10						0.56	20.66		20.66
Row Cond Folding	38'		0.85	0.54	0.99			0.06	2.44	2.82	5.26
Plant - Folding	12R-38		1.03	1.71	1.66			0.10	4.50	4.69	9.19
Cotton Seed B2XF	thous	135.00						3.21	138.21		138.21
Cotton Seed Trt.	acre	20.00						0.48	20.48		20.48
Sprayer 600-750gal	60' 175hp		0.29	0.18	0.51			0.02	1.00	1.20	2.20
Gramoxone SL 2.0	oz	7.20						0.17	7.37		7.37
Cotoran	pt	12.84						0.30	13.14		13.14
Surfactant	pt	0.66						0.02	0.68		0.68
Cotton Consultant	acre	8.00						0.19	8.19		8.19
Eradication	acre	1.00						0.02	1.02		1.02
Sprayer 600-825gal	90' 250hp		0.27	0.18	0.34			0.02	0.81	1.15	1.96
Dual Magnum	pt	13.80						0.33	14.13		14.13
Liberty 280	oz	17.40						0.41	17.81		17.81
Acephate 90%	lb	1.86						0.04	1.90		1.90
Sprayer 600-750gal	60' 175hp		0.29	0.18	0.51			0.02	1.00	1.20	2.20
Dual Magnum	pt	13.80						0.33	14.13		14.13
Glyphosate 3lbs a.e	oz	4.48						0.11	4.59		4.59
Bidrin 8EC	oz	0.23						0.01	0.24		0.24
Sprayer 600-825gal	90' 250hp		0.27	0.18	0.34			0.02	0.81	1.15	1.96
Centric 40WG	oz	10.76						0.21	10.97		10.97
Mepiquat Chloride	oz	1.12						0.02	1.14		1.14
Fert Appl (Liquid)	12R-38		1.08	0.99	1.49			0.07	3.63	2.88	6.51
UAN (32%)	gal	20.10						0.40	20.50		20.50
App by Air (3 gal)	appl	5.00						0.10	5.10		5.10
Diamond .83EC	oz	8.40						0.17	8.57		8.57
Imidacloprid 4F	oz	1.56						0.03	1.59		1.59
Spray (Direct/Layby)	12R-38		0.93	0.59	1.28			0.04	2.84	2.20	5.04
Diuron	pt	6.24						0.10	6.34		6.34
Liberty 280	oz	17.40						0.28	17.68		17.68
App by Air (3 gal)	appl	5.00						0.08	5.08		5.08
Acephate 90%	lb	5.57						0.09	5.66		5.66
Mepiquat Chloride	oz	1.12						0.02	1.14		1.14
Bifenthrin	oz	4.99						0.08	5.07		5.07
App by Air (3 gal)	appl	1.25						0.02	1.27		1.27
Lambda	oz	1.04						0.02	1.06		1.06
Bidrin 8EC	oz	2.34						0.04	2.38		2.38
Incidental Pest											
App by Air (3 gal)	appl	5.00						0.08	5.08		5.08
IncidentalPestTrt\$30	acre	30.00						0.48	30.48		30.48
App by Air (3 gal)	appl	5.00						0.06	5.06		5.06
Acephate 90%	lb	5.57						0.07	5.64		5.64
Bifenthrin	oz	4.99						0.06	5.05		5.05
App by Air (3 gal)	appl	5.00						0.06	5.06		5.06
Centric 40WG	oz	13.45						0.16	13.61		13.61
App by Air (5 gal)	appl	6.50						0.05	6.55		6.55
Thidiazuron 4lb	oz	3.45						0.03	3.48		3.48
Ethephon 6E	pt	5.76						0.05	5.81		5.81
App by Air (5 gal)	appl	3.25						0.03	3.28		3.28
Tribufos 6lb	pt	5.27						0.04	5.31		5.31
Ethephon 6E	pt	0.90						0.01	0.91		0.91
Cotton Picker/Module	6R-38(500)		7.98	20.60	5.75			0.14	34.47	81.27	115.74
Gin & Haul	lb	132.00						0.52	132.52		132.52
Stalk Shredder-Flail	20'		1.72	2.53	2.00			0.02	6.27	4.61	10.88
TOTALS		671.17	17.42	30.70	18.27	0.00	14.55	752.11	112.10	864.21	

Note: Cost of production estimates are based on 2017 input prices.

Fertilization decisions should be based on soil tests.

Soil test cost is prorated for a test every 3rd year.

Lime cost prorated for application every 3rd year.

Table 1.E Estimated monthly income and expense flows per acre
Cotton, 12R-38" solid, conservation tillage
B2XF variety, Delta Area, Mississippi, 2018

ITEM	Nov	Dec	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct
-----dollars-----												
TOTAL INCOME	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	954.00
DIRECT EXPENSES												
CUSTOM SPRAY	0.00	0.00	0.00	0.00	6.50	0.00	0.00	5.00	11.25	10.00	9.75	0.00
HARVEST AIDS	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	15.38	0.00
GINNING	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	132.00
FERTILIZERS	25.24	0.00	0.00	0.00	0.00	20.10	0.00	20.10	0.00	0.00	0.00	0.00
FUNGICIDES	0.00	0.00	0.00	0.00	0.00	0.00	20.00	0.00	0.00	0.00	0.00	0.00
HERBICIDES	0.00	0.00	0.00	0.00	22.90	0.00	69.52	0.00	23.64	0.00	0.00	0.00
INSECTICIDES	0.00	0.00	0.00	0.00	0.00	0.00	2.09	20.72	43.94	24.01	0.00	0.00
SEED/PLANTS	0.00	0.00	0.00	0.00	0.00	0.00	135.00	0.00	0.00	0.00	0.00	0.00
GROWTH REGULATORS	0.00	0.00	0.00	0.00	0.00	0.00	0.00	1.12	1.12	0.00	0.00	0.00
ADJUVANTS	0.00	0.00	0.00	0.00	0.66	0.00	0.66	0.00	0.00	0.00	0.00	0.00
CUSTOM FERTILIZE	7.50	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
ERADICATION FEE	0.00	0.00	0.00	0.00	0.00	0.00	1.00	0.00	0.00	0.00	0.00	0.00
CUSTOM LIME	30.64	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
CROP CONSULTANT	0.00	0.00	0.00	0.00	0.00	0.00	8.00	0.00	0.00	0.00	0.00	0.00
SOIL TEST	3.33	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
LABOR	1.91	0.00	0.00	0.00	0.00	1.49	4.01	1.83	1.28	0.00	0.00	7.75
LEASE *	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
FUEL	1.63	0.00	0.00	0.00	0.00	1.08	2.73	1.35	0.93	0.00	0.00	9.70
REPAIR & MAINTENANCE	2.03	0.00	0.00	0.00	0.00	0.99	2.79	1.17	0.59	0.00	0.00	23.13
INTEREST ON OP. CAP.	3.45	0.00	0.00	0.00	0.95	0.66	5.84	1.02	1.33	0.41	0.21	0.68
TOTAL DIRECT EXPENSES	75.73	0.00	0.00	0.00	31.01	24.32	251.64	52.31	84.08	34.42	25.34	173.26
NET INCOME	-75.73	0.00	0.00	0.00	-31.01	-24.32	-251.64	-52.31	-84.08	-34.42	-25.34	780.74
NET INCOME TO DATE	-75.73	-75.73	-75.73	-75.73	-106.74	-131.06	-382.70	-435.01	-519.09	-553.51	-578.85	201.89

Note: Cost of production estimates are based on 2017 input prices.

Fertilization decisions should be based on soil tests.

Soil test cost is prorated for a test every 3rd year.

Lime cost prorated for application every 3rd year.

* Lease costs are based on hourly usage costs.

Table 1.F Estimated returns for various price/yield combinations, per acre
 Cotton, 12R-38" solid, conservation tillage
 B2XF variety, Delta Area, Mississippi, 2018

PRODUCT			PERCENT										
			75	80	85	90	95	100	105	110	115	120	125
			PRODUCT PRICE										
Cotton Lint			0.49	0.52	0.56	0.59	0.62	0.66	0.69	0.72	0.75	0.79	0.82
PERCENT	YIELD	UNIT	dollars										
50	600.00	lb	-226 -338	-207 -319	-187 -299	-167 -279	-147 -259	-127 -239	-108 -220	-88 -200	-68 -180	-48 -160	-28 -140
60	720.00	lb	-180 -292	-156 -269	-133 -245	-109 -221	-85 -197	-61 -174	-38 -150	-14 -126	9 -102	33 -78	56 -55
70	840.00	lb	-134 -246	-106 -218	-79 -191	-51 -163	-23 -135	4 -108	31 -80	59 -52	87 -24	114 2	142 30
80	960.00	lb	-88 -200	-56 -168	-25 -137	6 -105	38 -73	69 -42	101 -10	133 21	165 52	196 84	228 116
90	1080.00	lb	-42 -154	-6 -118	29 -83	64 -47	100 -11	135 23	171 59	207 95	242 130	278 166	314 202
100	1200.00	lb	3 -108	43 -68	83 -29	122 10	162 50	201 89	241 129	281 168	320 208	360 248	399 287
110	1320.00	lb	50 -62	93 -18	137 25	180 68	224 112	267 155	311 199	354 242	398 286	442 329	485 373
120	1440.00	lb	96 -15	143 31	191 79	238 126	286 174	333 221	381 269	428 316	476 364	523 411	571 459
130	1560.00	lb	142 30	193 81	245 133	296 184	348 236	399 287	451 339	502 390	554 442	605 493	657 545
140	1680.00	lb	188 76	243 131	299 187	354 242	410 298	465 353	521 409	576 464	632 519	687 575	742 630
150	1800.00	lb	234 122	294 181	353 241	412 300	472 360	531 419	591 478	650 538	709 597	769 657	828 716

The top number in each cell is Returns Above Direct Expenses.
 The bottom number in each cell is Returns Above Total Specified Expenses.
 Only the product listed has been varied to calculate net returns.
 Note: Cost of production estimates are based on 2017 input prices.

Table 2.A Estimated costs per acre
Cotton, 12R-38" solid, conservation tillage,
B2XF variety, furrow irrigated, 10.5 ac-in., Delta Area, Mississippi, 2018

ITEM	UNIT	PRICE	QUANTITY	AMOUNT	YOUR FARM
		dollars		dollars	
DIRECT EXPENSES					
CUSTOM SPRAY					
App by Air (5 gal)	appl	6.50	2.5000	16.25	_____
App by Air (3 gal)	appl	5.00	6.7500	33.75	_____
HARVEST AIDS					
Thidiazuron 4lb	oz	1.50	2.3000	3.45	_____
Ethephon 6E	pt	2.88	2.3125	6.66	_____
Tribufos 6lb	pt	10.54	0.5000	5.27	_____
GINNING					
Gin & Haul	lb	0.11	1500.0000	165.00	_____
FERTILIZERS					
Potash (60% K2O)	cwt	18.98	1.5000	28.47	_____
UAN (32%)	gal	1.17	34.3582	40.20	_____
FUNGICIDES					
Cotton Seed Trt.	acre	20.00	1.0000	20.00	_____
HERBICIDES					
Clarity	pt	11.55	0.5000	5.78	_____
Glyphosate 3lbs a.e	oz	0.14	64.0000	8.96	_____
Select Max	pt	12.64	1.0000	12.64	_____
Gramoxone SL 2.0	oz	0.15	48.0000	7.20	_____
Cotoran	pt	6.42	2.0000	12.84	_____
Dual Magnum	pt	13.80	2.0000	27.60	_____
Liberty 280	oz	0.60	58.0000	34.80	_____
Diuron	pt	3.90	1.6000	6.24	_____
INSECTICIDES					
Acephate 90%	lb	7.43	1.7500	13.00	_____
Bidrin 8EC	oz	1.17	2.2000	2.57	_____
Centric 40WG	oz	5.38	4.5000	24.21	_____
Diamond .83EC	oz	1.40	6.0000	8.40	_____
Imidacloprid 4F	oz	0.78	2.0000	1.56	_____
Bifenthrin	oz	0.78	12.8000	9.98	_____
Lambda	oz	1.04	1.0000	1.04	_____
IncidentalPestTrt\$30	acre	30.00	1.5000	45.00	_____
IRRIGATION SUPPLIES					
Roll-Out Pipe	ft	0.25	33.0000	8.25	_____
SEED/PLANTS					
Cotton Seed B2XF	thous	3.00	45.0000	135.00	_____
GROWTH REGULATORS					
Mepiquat Chloride	oz	0.07	48.0000	3.36	_____
ADJUVANTS					
Surfactant	pt	3.28	0.4000	1.31	_____
CUSTOM FERTILIZE					
Custom Apply Fert	acre	7.50	1.0000	7.50	_____
ERADICATION FEE					
Eradication	acre	1.00	1.0000	1.00	_____
CUSTOM LIME					
Lime (Spread)	ton	46.00	0.6660	30.64	_____
CROP CONSULTANT					
Cotton Consultant	acre	8.00	1.0000	8.00	_____
SOIL TEST					
Soil Test	acre	10.00	0.3330	3.33	_____
OPERATOR LABOR					
Tractors	hour	13.51	0.5025	6.79	_____
Self-Propelled	hour	13.51	0.2310	3.13	_____
IRRIGATE LABOR					
Special Labor	hour	9.06	0.3000	2.73	_____
Implements	hour	9.06	0.0625	0.57	_____
HAND LABOR					
Implements	hour	9.06	0.1235	1.11	_____
Self-Propelled	hour	9.06	0.2016	1.82	_____
UNALLOCATED LABOR					
	hour	13.50	0.5240	7.08	_____
DIESEL FUEL					
Tractors	gal	1.80	5.6368	10.16	_____
Self-Propelled	gal	1.80	5.0512	9.10	_____
Roll-Out Pipe Irr.	gal	1.80	8.5535	15.39	_____
REPAIR & MAINTENANCE					
Implements	acre	7.14	1.0000	7.14	_____
Tractors	acre	3.17	1.0000	3.17	_____
Self-Propelled	acre	21.32	1.0000	21.32	_____
Roll-Out Pipe Irr.	acre	6.89	1.0000	6.89	_____
INTEREST ON OP. CAP.	acre	15.91	1.0000	15.91	_____
TOTAL DIRECT EXPENSES				851.58	_____
FIXED EXPENSES					
Implements	acre	11.11	1.0000	11.11	_____
Tractors	acre	20.04	1.0000	20.04	_____
Self-Propelled	acre	85.97	1.0000	85.97	_____
Roll-Out Pipe Irr.	acre	53.42	1.0000	53.42	_____
TOTAL FIXED EXPENSES				170.54	_____
TOTAL SPECIFIED EXPENSES				1022.12	_____

Note: Cost of production estimates are based on 2017 input prices.
Fertilization decisions should be based on soil tests.
Soil test cost is prorated for a test every 3rd year.
Lime cost prorated for application every 3rd year.

Table 2.B Summary of estimated costs and returns per acre
 Cotton, 12R-38" solid, conservation tillage,
 B2XF variety, furrow irrigated, 10.5 ac-in., Delta Area, Mississippi, 2018

ITEM	UNIT	PRICE	QUANTITY	AMOUNT	YOUR FARM
		dollars		dollars	
INCOME					
Cotton Lint	lb	0.66	1500.0000	990.00	_____
Cotton Seed	lb	0.10	2025.0000	202.50	_____

TOTAL INCOME				1192.50	_____
DIRECT EXPENSES					
CUSTOM SPRAY	acre	50.00	1.0000	50.00	_____
HARVEST AIDS	acre	15.38	1.0000	15.38	_____
GINNING	acre	165.00	1.0000	165.00	_____
FERTILIZERS	acre	68.67	1.0000	68.67	_____
FUNGICIDES	acre	20.00	1.0000	20.00	_____
HERBICIDES	acre	116.06	1.0000	116.06	_____
INSECTICIDES	acre	105.76	1.0000	105.76	_____
IRRIGATION SUPPLIES	acre	8.25	1.0000	8.25	_____
SEED/PLANTS	acre	135.00	1.0000	135.00	_____
GROWTH REGULATORS	acre	3.36	1.0000	3.36	_____
ADJUVANTS	acre	1.32	1.0000	1.32	_____
CUSTOM FERTILIZE	acre	7.50	1.0000	7.50	_____
ERADICATION FEE	acre	1.00	1.0000	1.00	_____
CUSTOM LIME	acre	30.64	1.0000	30.64	_____
CROP CONSULTANT	acre	8.00	1.0000	8.00	_____
SOIL TEST	acre	3.33	1.0000	3.33	_____
HAND LABOR	hour	9.06	0.3252	2.93	_____
IRRIGATE LABOR	hour	9.06	0.3625	3.30	_____
OPERATOR LABOR	hour	13.51	0.7336	9.92	_____
UNALLOCATED LABOR	hour	13.50	0.5240	7.08	_____
DIESEL FUEL	gal	1.80	19.2417	34.65	_____
REPAIR & MAINTENANCE	acre	38.52	1.0000	38.52	_____
INTEREST ON OP. CAP.	acre	15.91	1.0000	15.91	_____

TOTAL DIRECT EXPENSES				851.58	_____
RETURNS ABOVE DIRECT EXPENSES				340.92	_____
TOTAL FIXED EXPENSES				170.54	_____

TOTAL SPECIFIED EXPENSES				1022.12	_____
RETURNS ABOVE TOTAL SPECIFIED EXPENSES				170.38	_____

Note: Cost of production estimates are based on 2017 input prices.

Fertilization decisions should be based on soil tests.

Soil test cost is prorated for a test every 3rd year.

Lime cost prorated for application every 3rd year.

Table 2.C Estimated resource use for field operations, per acre
 Cotton, 12R-38" solid, conservation tillage,
 B2XF variety, furrow irrigated, 10.5 ac-in., Delta Area, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	POWER UNIT SIZE	PERF RATE	TIMES OVER	MTH	INPUT AMOUNT	IMPLEMENT	POWER UNIT	ALLOC LABOR	UNALL LABOR
-----hours-----										
Soil Test	acre			0.33	Nov	0.3330				
Lime (Spread)	ton			0.33	Nov	0.6660				
Custom Apply Fert	acre			1.00	Nov	1.0000				
Potash (60% K2O)	cwt					1.5000				
Bed-Paratill Fold	12R-38	MFWD 225	0.053	1.00	Nov		0.05	0.05	0.05	0.04
Bed/Disk (Hipper)	12R-38	MFWD 225	0.049	1.00	Nov		0.04	0.04	0.04	0.03
App by Air (5 gal)	appl			1.00	Mar	1.0000				
Clarity	pt					0.5000				
Glyphosate 3lbs a.e	oz					32.0000				
Select Max	pt					1.0000				
Surfactant	pt					0.2000				
Fert Appl (Liquid)	12R-38	MFWD 225	0.051	1.00	Apr		0.05	0.05	0.07	0.04
UAN (32%)	gal					17.1791				
Row Cond Folding	38'	MFWD 225	0.040	1.00	May		0.04	0.04	0.04	0.03
Plant - Folding	12R-38	MFWD 225	0.049	1.00	May		0.04	0.04	0.09	0.03
Cotton Seed B2XF	thous					45.0000				
Cotton Seed Trt.	acre					1.0000				
Sprayer 600-750gal	60' 175hp		0.017	1.00	May			0.01	0.02	0.01
Gramoxone SL 2.0	oz					48.0000				
Cotoran	pt					2.0000				
Surfactant	pt					0.2000				
Cotton Consultant	acre			1.00	May	1.0000				
Eradication	acre					1.0000				
Sprayer 600-825gal	90' 250hp		0.011	1.00	May			0.01	0.01	0.00
Dual Magnum	pt					1.0000				
Liberty 280	oz					29.0000				
Acephate 90%	lb					0.2500				
Sprayer 600-750gal	60' 175hp		0.017	1.00	May			0.01	0.02	0.01
Dual Magnum	pt					1.0000				
Glyphosate 3lbs a.e	oz					32.0000				
Bidrin 8EC	oz					0.2000				
Sprayer 600-825gal	90' 250hp		0.011	1.00	Jun			0.01	0.01	0.00
Centric 40WG	oz					2.0000				
Mepiquat Chloride	oz					16.0000				
Fert Appl (Liquid)	12R-38	MFWD 225	0.051	1.00	Jun		0.05	0.05	0.07	0.04
UAN (32%)	gal					17.1791				
App by Air (3 gal)	appl			1.00	Jun	1.0000				
Diamond .83EC	oz					6.0000				
Imidacloprid 4F	oz					2.0000				
App by Air (3 gal)	appl			1.00	Jun	1.0000				
Mepiquat Chloride	oz					16.0000				
Spray (Direct/Layby)	12R-38	MFWD 225	0.044	1.00	Jul		0.04	0.04	0.06	0.03
Diuron	pt					1.6000				
Liberty 280	oz					29.0000				
App by Air (3 gal)	appl			1.00	Jul	1.0000				
Acephate 90%	lb					0.7500				
Mepiquat Chloride	oz					16.0000				
Bifenthrin	oz					6.4000				
App by Air (3 gal)	appl			0.25	Jul	0.2500				
Lambda	oz					1.0000				
Bidrin 8EC	oz					2.0000				
Incidental Pest				1.50	Jul					
App by Air (3 gal)	appl					1.5000				
IncidentalPestTrt\$30	acre					1.5000				
App by Air (3 gal)	appl			1.00	Aug	1.0000				
Acephate 90%	lb					0.7500				
Bifenthrin	oz					6.4000				
App by Air (3 gal)	appl			1.00	Aug	1.0000				
Centric 40WG	oz					2.5000				
App by Air (5 gal)	appl			1.00	Sep	1.0000				
Thidiazuron 4lb	oz					2.3000				
Ethephon 6E	pt					2.0000				
App by Air (5 gal)	appl			0.50	Sep	0.5000				
Tribufos 6lb	pt					0.5000				
Ethephon 6E	pt					0.3125				
Cotton Picker/Module	6R-38(500)		0.172	1.00	Oct			0.17	0.34	0.13
Gin & Haul	lb			1.00	Oct	1500.0000				
Stalk Shredder-Flail	20'	MFWD 225	0.082	1.00	Oct		0.08	0.08	0.08	0.06
Roll-Out Pipe Irr.	acre				Jan	1.0000	0.07	0.07	0.44	
TOTALS							0.73	0.50	1.42	0.52

Note: Cost of production estimates are based on 2017 input prices.
Fertilization decisions should be based on soil tests.
Soil test cost is prorated for a test every 3rd year.
Lime cost prorated for application every 3rd year.

Table 2.D Estimated costs for field operations, per acre
 Cotton, 12R-38" solid, conservation tillage,
 B2XF variety, furrow irrigated, 10.5 ac-in., Delta Area, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	-----DIRECT COST-----							FIXED COST	TOTAL COST
		OP INPUT	FUEL	R&M	LABOR	LEASE	INTER	TOTAL		
-----dollars-----										
Soil Test	acre	3.33						0.16	3.49	3.49
Lime (Spread)	ton	30.64						1.46	32.10	32.10
Custom Apply Fert	acre	7.50						0.36	7.86	7.86
Potash (60% K2O)	cwt	28.47						1.35	29.82	29.82
Bed-Paratill Fold	12R-38		1.12	1.69	1.31			0.20	4.32	4.55
Bed/Disk (Hipper)	12R-38		1.03	0.68	1.20			0.14	3.05	2.99
App by Air (5 gal)	appl	6.50						0.21	6.71	6.71
Clarity	pt	5.78						0.18	5.96	5.96
Glyphosate 3lbs a.e	oz	4.48						0.14	4.62	4.62
Select Max	pt	12.64						0.40	13.04	13.04
Surfactant	pt	0.66						0.02	0.68	0.68
Fert Appl (Liquid)	12R-38		1.08	0.99	1.49			0.10	3.66	2.88
UAN (32%)	gal	20.10						0.56	20.66	20.66
Row Cond Folding	38'		0.85	0.54	0.99			0.06	2.44	2.82
Plant - Folding	12R-38		1.03	1.71	1.66			0.10	4.50	4.69
Cotton Seed B2XF	thous	135.00						3.21	138.21	138.21
Cotton Seed Trt.	acre	20.00						0.48	20.48	20.48
Sprayer 600-750gal	60' 175hp		0.29	0.18	0.51			0.02	1.00	1.20
Gramoxone SL 2.0	oz	7.20						0.17	7.37	7.37
Cotoran	pt	12.84						0.30	13.14	13.14
Surfactant	pt	0.66						0.02	0.68	0.68
Cotton Consultant	acre	8.00						0.19	8.19	8.19
Eradication	acre	1.00						0.02	1.02	1.02
Sprayer 600-825gal	90' 250hp		0.27	0.18	0.34			0.02	0.81	1.15
Dual Magnum	pt	13.80						0.33	14.13	14.13
Liberty 280	oz	17.40						0.41	17.81	17.81
Acephate 90%	lb	1.86						0.04	1.90	1.90
Sprayer 600-750gal	60' 175hp		0.29	0.18	0.51			0.02	1.00	1.20
Dual Magnum	pt	13.80						0.33	14.13	14.13
Glyphosate 3lbs a.e	oz	4.48						0.11	4.59	4.59
Bidrin 8EC	oz	0.23						0.01	0.24	0.24
Sprayer 600-825gal	90' 250hp		0.27	0.18	0.34			0.02	0.81	1.15
Centric 40WG	oz	10.76						0.21	10.97	10.97
Mepiquat Chloride	oz	1.12						0.02	1.14	1.14
Fert Appl (Liquid)	12R-38		1.08	0.99	1.49			0.07	3.63	2.88
UAN (32%)	gal	20.10						0.40	20.50	20.50
App by Air (3 gal)	appl	5.00						0.10	5.10	5.10
Diamond .83EC	oz	8.40						0.17	8.57	8.57
Imidacloprid 4F	oz	1.56						0.03	1.59	1.59
App by Air (3 gal)	appl	5.00						0.10	5.10	5.10
Mepiquat Chloride	oz	1.12						0.02	1.14	1.14
Spray (Direct/Layby)	12R-38		0.93	0.59	1.28			0.04	2.84	2.20
Diuron	pt	6.24						0.10	6.34	6.34
Liberty 280	oz	17.40						0.28	17.68	17.68
App by Air (3 gal)	appl	5.00						0.08	5.08	5.08
Acephate 90%	lb	5.57						0.09	5.66	5.66
Mepiquat Chloride	oz	1.12						0.02	1.14	1.14
Bifenthrin	oz	4.99						0.08	5.07	5.07
App by Air (3 gal)	appl	1.25						0.02	1.27	1.27
Lambda	oz	1.04						0.02	1.06	1.06
Bidrin 8EC	oz	2.34						0.04	2.38	2.38
Incidental Pest										
App by Air (3 gal)	appl	7.50						0.12	7.62	7.62
IncidentalPestTrt\$30	acre	45.00						0.71	45.71	45.71
App by Air (3 gal)	appl	5.00						0.06	5.06	5.06
Acephate 90%	lb	5.57						0.07	5.64	5.64
Bifenthrin	oz	4.99						0.06	5.05	5.05
App by Air (3 gal)	appl	5.00						0.06	5.06	5.06
Centric 40WG	oz	13.45						0.16	13.61	13.61
App by Air (5 gal)	appl	6.50						0.05	6.55	6.55
Thidiazuron 4lb	oz	3.45						0.03	3.48	3.48
Ethephon 6E	pt	5.76						0.05	5.81	5.81
App by Air (5 gal)	appl	3.25						0.03	3.28	3.28
Tribufos 6lb	pt	5.27						0.04	5.31	5.31
Ethephon 6E	pt	0.90						0.01	0.91	0.91
Cotton Picker/Module	6R-38(500)		7.98	20.60	5.75			0.14	34.47	81.27
Gin & Haul	lb	165.00						0.65	165.65	165.65
Stalk Shredder-Flail	20'		1.72	2.53	2.00			0.02	6.27	4.61
Roll-Out Pipe Irr.	acre	8.25	16.71	7.48	4.36			0.62	37.42	56.95
TOTALS		739.27	34.65	38.52	23.23	0.00	15.91	851.58	170.54	1022.12

Note: Cost of production estimates are based on 2017 input prices.
Fertilization decisions should be based on soil tests.
Soil test cost is prorated for a test every 3rd year.
Lime cost prorated for application every 3rd year.

Table 2.E Estimated monthly income and expense flows per acre
 Cotton, 12R-38" solid, conservation tillage,
 B2XF variety, furrow irrigated, 10.5 ac-in., Delta Area, Mississippi, 2018

ITEM	Nov	Dec	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct
-----dollars-----												
TOTAL INCOME	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	1192.50
DIRECT EXPENSES												
CUSTOM SPRAY	0.00	0.00	0.00	0.00	6.50	0.00	0.00	10.00	13.75	10.00	9.75	0.00
HARVEST AIDS	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	15.38	0.00
GINNING	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	165.00
FERTILIZERS	28.47	0.00	0.00	0.00	0.00	20.10	0.00	20.10	0.00	0.00	0.00	0.00
FUNGICIDES	0.00	0.00	0.00	0.00	0.00	0.00	20.00	0.00	0.00	0.00	0.00	0.00
HERBICIDES	0.00	0.00	0.00	0.00	22.90	0.00	69.52	0.00	23.64	0.00	0.00	0.00
INSECTICIDES	0.00	0.00	0.00	0.00	0.00	0.00	2.09	20.72	58.94	24.01	0.00	0.00
IRRIGATION SUPPLIES	0.00	0.00	0.00	0.00	0.00	0.00	0.00	8.25	0.00	0.00	0.00	0.00
SEED/PLANTS	0.00	0.00	0.00	0.00	0.00	0.00	135.00	0.00	0.00	0.00	0.00	0.00
GROWTH REGULATORS	0.00	0.00	0.00	0.00	0.00	0.00	0.00	2.24	1.12	0.00	0.00	0.00
ADJUVANTS	0.00	0.00	0.00	0.00	0.66	0.00	0.66	0.00	0.00	0.00	0.00	0.00
CUSTOM FERTILIZE	7.50	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
ERADICATION FEE	0.00	0.00	0.00	0.00	0.00	0.00	1.00	0.00	0.00	0.00	0.00	0.00
CUSTOM LIME	30.64	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
CROP CONSULTANT	0.00	0.00	0.00	0.00	0.00	0.00	8.00	0.00	0.00	0.00	0.00	0.00
SOIL TEST	3.33	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
LABOR	2.51	0.00	0.00	0.00	0.00	1.49	4.24	4.40	1.51	0.23	0.59	8.26
LEASE *	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
FUEL	2.15	0.00	0.00	0.00	0.00	1.08	2.73	6.83	6.06	5.13	0.30	10.37
REPAIR & MAINTENANCE	2.37	0.00	0.00	0.00	0.00	0.99	2.79	5.59	1.90	1.31	0.13	23.44
INTEREST ON OP. CAP.	3.67	0.00	0.00	0.00	0.95	0.66	5.85	1.55	1.70	0.49	0.22	0.82
TOTAL DIRECT EXPENSES	80.64	0.00	0.00	0.00	31.01	24.32	251.88	79.68	108.62	41.17	26.37	207.89
NET INCOME	-80.64	0.00	0.00	0.00	-31.01	-24.32	-251.88	-79.68	-108.62	-41.17	-26.37	984.61
NET INCOME TO DATE	-80.64	-80.64	-80.64	-80.64	-111.65	-135.97	-387.85	-467.53	-576.15	-617.32	-643.69	340.92

Note: Cost of production estimates are based on 2017 input prices.

Fertilization decisions should be based on soil tests.

Soil test cost is prorated for a test every 3rd year.

Lime cost prorated for application every 3rd year.

* Lease costs are based on hourly usage costs.

Table 2.F Estimated returns for various price/yield combinations, per acre
 Cotton, 12R-38" solid, conservation tillage,
 B2XF variety, furrow irrigated, 10.5 ac-in., Delta Area, Mississippi, 2018

PRODUCT			PERCENT										
			75	80	85	90	95	100	105	110	115	120	125
			PRODUCT PRICE										
Cotton Lint			0.49	0.52	0.56	0.59	0.62	0.66	0.69	0.72	0.75	0.79	0.82
PERCENT	YIELD	UNIT	dollars										
50	750.00	lb	-195 -365	-170 -340	-145 -316	-120 -291	-96 -266	-71 -241	-46 -217	-21 -192	2 -167	27 -142	52 -118
60	900.00	lb	-137 -307	-107 -278	-77 -248	-48 -218	-18 -189	11 -159	40 -129	70 -99	100 -70	129 -40	159 -10
70	1050.00	lb	-79 -250	-44 -215	-10 -180	24 -146	58 -111	93 -76	128 -42	162 -7	197 27	232 61	266 96
80	1200.00	lb	-21 -192	17 -152	57 -113	96 -73	136 -34	176 5	215 45	255 84	294 124	334 163	374 203
90	1350.00	lb	35 -134	80 -90	124 -45	169 -1	213 43	258 87	303 132	347 177	392 221	436 266	481 310
100	1500.00	lb	93 -77	142 -27	192 21	241 71	291 120	340 170	390 219	439 269	489 318	538 368	588 417
110	1650.00	lb	151 -19	205 35	260 89	314 143	368 198	423 252	477 307	532 361	586 416	641 470	695 525
120	1800.00	lb	208 38	268 97	327 157	386 216	446 275	505 335	565 394	624 454	683 513	743 572	802 632
130	1950.00	lb	266 95	330 160	395 224	459 288	523 353	588 417	652 482	716 546	781 610	845 675	909 739
140	2100.00	lb	324 153	393 222	462 292	532 361	601 430	670 500	739 569	809 638	878 708	947 777	1017 846
150	2250.00	lb	381 211	456 285	530 359	604 434	678 508	753 582	827 656	901 731	975 805	1050 879	1124 953

The top number in each cell is Returns Above Direct Expenses.
 The bottom number in each cell is Returns Above Total Specified Expenses.
 Only the product listed has been varied to calculate net returns.
 Note: Cost of production estimates are based on 2017 input prices.

Table 3.A Estimated costs per acre
Cotton, 12R-38" solid, conservation tillage
GLB2 variety, Delta Area, Mississippi, 2018

ITEM	UNIT	PRICE	QUANTITY	AMOUNT	YOUR FARM
		dollars		dollars	
DIRECT EXPENSES					
CUSTOM SPRAY					
App by Air (5 gal)	appl	6.50	2.5000	16.25	_____
App by Air (3 gal)	appl	5.00	5.2500	26.25	_____
HARVEST AIDS					
Thidiazuron 4lb	oz	1.50	2.3000	3.45	_____
Ethephon 6E	pt	2.88	2.3125	6.66	_____
Tribufos 6lb	pt	10.54	0.5000	5.27	_____
GINNING					
Gin & Haul	lb	0.11	1200.0000	132.00	_____
FERTILIZERS					
Potash (60% K2O)	cwt	18.98	1.5000	28.47	_____
UAN (32%)	gal	1.17	34.3582	40.20	_____
HERBICIDES					
Clarity	pt	11.55	0.5000	5.78	_____
Glyphosate 3lbs a.e	oz	0.14	64.0000	8.96	_____
Select Max	pt	12.64	1.0000	12.64	_____
Gramoxone SL 2.0	oz	0.15	48.0000	7.20	_____
Cotoran	pt	6.42	2.0000	12.84	_____
Dual Magnum	pt	13.80	2.0000	27.60	_____
Liberty 280	oz	0.60	58.0000	34.80	_____
Diuron	pt	3.90	1.6000	6.24	_____
INSECTICIDES					
Acephate 90%	lb	7.43	1.7500	13.00	_____
Bidrin 8EC	oz	1.17	2.2000	2.57	_____
Centric 40WG	oz	5.38	4.5000	24.21	_____
Diamond .83EC	oz	1.40	6.0000	8.40	_____
Imidacloprid 4F	oz	0.78	2.0000	1.56	_____
Bifenthrin	oz	0.78	12.8000	9.98	_____
Lambda	oz	1.04	1.0000	1.04	_____
IncidentalPestTrt\$30	acre	30.00	1.0000	30.00	_____
SEED/PLANTS					
Cotton Seed GLB2	thous	3.10	45.0000	139.50	_____
GROWTH REGULATORS					
Mepiquat Chloride	oz	0.07	32.0000	2.24	_____
ADJUVANTS					
Surfactant	pt	3.28	0.4000	1.31	_____
CUSTOM FERTILIZE					
Custom Apply Fert	acre	7.50	1.0000	7.50	_____
ERADICATION FEE					
Eradication	acre	1.00	1.0000	1.00	_____
CUSTOM LIME					
Lime (Spread)	ton	46.00	0.6660	30.64	_____
CROP CONSULTANT					
Cotton Consultant	acre	8.00	1.0000	8.00	_____
SOIL TEST					
Soil Test	acre	10.00	0.3330	3.33	_____
OPERATOR LABOR					
Tractors	hour	13.51	0.3993	5.39	_____
Self-Propelled	hour	13.51	0.2310	3.13	_____
HAND LABOR					
Implements	hour	9.06	0.1235	1.11	_____
Self-Propelled	hour	9.06	0.2016	1.82	_____
UNALLOCATED LABOR					
hour	hour	13.52	0.5043	6.82	_____
DIESEL FUEL					
Tractors	gal	1.80	4.6248	8.32	_____
Self-Propelled	gal	1.80	5.0512	9.10	_____
REPAIR & MAINTENANCE					
Implements	acre	6.76	1.0000	6.76	_____
Tractors	acre	2.62	1.0000	2.62	_____
Self-Propelled	acre	21.32	1.0000	21.32	_____
INTEREST ON OP. CAP.	acre	14.32	1.0000	14.32	_____
TOTAL DIRECT EXPENSES				739.61	_____
FIXED EXPENSES					
Implements	acre	9.62	1.0000	9.62	_____
Tractors	acre	16.51	1.0000	16.51	_____
Self-Propelled	acre	85.97	1.0000	85.97	_____
TOTAL FIXED EXPENSES				112.10	_____
TOTAL SPECIFIED EXPENSES				851.71	_____

Note: Cost of production estimates are based on 2017 input prices.

Fertilization decisions should be based on soil tests.

Soil test cost is prorated for a test every 3rd year.

Lime cost prorated for application every 3rd year.

Table 3.B Summary of estimated costs and returns per acre
Cotton, 12R-38" solid, conservation tillage
GLB2 variety, Delta Area, Mississippi, 2018

ITEM	UNIT	PRICE	QUANTITY	AMOUNT	YOUR FARM
		dollars		dollars	
INCOME					
Cotton Lint	lb	0.66	1200.0000	792.00	_____
Cotton Seed	lb	0.10	1620.0000	162.00	_____

TOTAL INCOME				954.00	_____
DIRECT EXPENSES					
CUSTOM SPRAY	acre	42.50	1.0000	42.50	_____
HARVEST AIDS	acre	15.38	1.0000	15.38	_____
GINNING	acre	132.00	1.0000	132.00	_____
FERTILIZERS	acre	68.67	1.0000	68.67	_____
HERBICIDES	acre	116.06	1.0000	116.06	_____
INSECTICIDES	acre	90.76	1.0000	90.76	_____
SEED/PLANTS	acre	139.50	1.0000	139.50	_____
GROWTH REGULATORS	acre	2.24	1.0000	2.24	_____
ADJUVANTS	acre	1.32	1.0000	1.32	_____
CUSTOM FERTILIZE	acre	7.50	1.0000	7.50	_____
ERADICATION FEE	acre	1.00	1.0000	1.00	_____
CUSTOM LIME	acre	30.64	1.0000	30.64	_____
CROP CONSULTANT	acre	8.00	1.0000	8.00	_____
SOIL TEST	acre	3.33	1.0000	3.33	_____
HAND LABOR	hour	9.06	0.3252	2.93	_____
OPERATOR LABOR	hour	13.51	0.6304	8.52	_____
UNALLOCATED LABOR	hour	13.52	0.5043	6.82	_____
DIESEL FUEL	gal	1.80	9.6761	17.42	_____
REPAIR & MAINTENANCE	acre	30.70	1.0000	30.70	_____
INTEREST ON OP. CAP.	acre	14.32	1.0000	14.32	_____

TOTAL DIRECT EXPENSES				739.61	_____
RETURNS ABOVE DIRECT EXPENSES				214.39	_____

TOTAL FIXED EXPENSES				112.10	_____

TOTAL SPECIFIED EXPENSES				851.71	_____
RETURNS ABOVE TOTAL SPECIFIED EXPENSES				102.29	_____

Note: Cost of production estimates are based on 2017 input prices.

Fertilization decisions should be based on soil tests.

Soil test cost is prorated for a test every 3rd year.

Lime cost prorated for application every 3rd year.

Table 3.C Estimated resource use for field operations, per acre
 Cotton, 12R-38" solid, conservation tillage
 GLB2 variety, Delta Area, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	POWER UNIT SIZE	PERF RATE	TIMES OVER	MTH	INPUT AMOUNT	IMPLEMENT	POWER UNIT	ALLOC LABOR	UNALL LABOR
-----hours-----										
Soil Test	acre			0.33	Nov	0.3330				
Lime (Spread)	ton			0.33	Nov	0.6660				
Custom Apply Fert	acre			1.00	Nov	1.0000				
Potash (60% K2O)	cwt					1.5000				
Bed-Paratill Fold	12R-38	MFWD 225	0.053	1.00	Nov		0.05	0.05	0.05	0.04
Bed/Disk (Hipper)	12R-38	MFWD 225	0.049	0.50	Nov		0.02	0.02	0.02	0.01
App by Air (5 gal)	appl			1.00	Mar	1.0000				
Clarity	pt					0.5000				
Glyphosate 3lbs a.e	oz					32.0000				
Select Max	pt					1.0000				
Surfactant	pt					0.2000				
Fert Appl (Liquid)	12R-38	MFWD 225	0.051	1.00	Apr		0.05	0.05	0.07	0.04
UAN (32%)	gal					17.1791				
Row Cond Folding	38'	MFWD 225	0.040	1.00	May		0.04	0.04	0.04	0.03
Plant - Folding	12R-38	MFWD 225	0.049	1.00	May		0.04	0.04	0.09	0.03
Cotton Seed GLB2	thous					45.0000				
Sprayer 600-750gal	60' 175hp		0.017	1.00	May			0.01	0.02	0.01
Gramoxone SL 2.0	oz					48.0000				
Cotoran	pt					2.0000				
Surfactant	pt					0.2000				
Cotton Consultant	acre			1.00	May	1.0000				
Eradication	acre					1.0000				
Sprayer 600-825gal	90' 250hp		0.011	1.00	May			0.01	0.01	0.00
Dual Magnum	pt					1.0000				
Liberty 280	oz					29.0000				
Acephate 90%	lb					0.2500				
Sprayer 600-750gal	60' 175hp		0.017	1.00	May			0.01	0.02	0.01
Dual Magnum	pt					1.0000				
Glyphosate 3lbs a.e	oz					32.0000				
Bidrin 8EC	oz					0.2000				
Sprayer 600-825gal	90' 250hp		0.011	1.00	Jun			0.01	0.01	0.00
Centric 40WG	oz					2.0000				
Mepiquat Chloride	oz					16.0000				
Fert Appl (Liquid)	12R-38	MFWD 225	0.051	1.00	Jun		0.05	0.05	0.07	0.04
UAN (32%)	gal					17.1791				
App by Air (3 gal)	appl			1.00	Jun	1.0000				
Diamond .83EC	oz					6.0000				
Imidacloprid 4F	oz					2.0000				
Spray (Direct/Layby)	12R-38	MFWD 225	0.044	1.00	Jul		0.04	0.04	0.06	0.03
Diuron	pt					1.6000				
Liberty 280	oz					29.0000				
App by Air (3 gal)	appl			1.00	Jul	1.0000				
Acephate 90%	lb					0.7500				
Mepiquat Chloride	oz					16.0000				
Bifenthrin	oz					6.4000				
App by Air (3 gal)	appl			0.25	Jul	0.2500				
Lambda	oz					1.0000				
Bidrin 8EC	oz					2.0000				
Incidental Pest				1.00	Jul					
App by Air (3 gal)	appl					1.0000				
IncidentalPestTrt\$30	acre					1.0000				
App by Air (3 gal)	appl			1.00	Aug	1.0000				
Acephate 90%	lb					0.7500				
Bifenthrin	oz					6.4000				
App by Air (3 gal)	appl			1.00	Aug	1.0000				
Centric 40WG	oz					2.5000				
App by Air (5 gal)	appl			1.00	Sep	1.0000				
Thidiazuron 4lb	oz					2.3000				
Ethephon 6E	pt					2.0000				
App by Air (5 gal)	appl			0.50	Sep	0.5000				
Tribufos 6lb	pt					0.5000				
Ethephon 6E	pt					0.3125				
Cotton Picker/Module	6R-38 (500)		0.172	1.00	Oct			0.17	0.34	0.13
Gin & Haul	lb			1.00	Oct	1200.0000				
Stalk Shredder-Flail	20'	MFWD 225	0.082	1.00	Oct		0.08	0.08	0.08	0.06
TOTALS							0.63	0.39	0.95	0.50

Note: Cost of production estimates are based on 2017 input prices.

Fertilization decisions should be based on soil tests.

Soil test cost is prorated for a test every 3rd year.

Lime cost prorated for application every 3rd year.

Table 3.D Estimated costs for field operations, per acre
Cotton, 12R-38" solid, conservation tillage
GLB2 variety, Delta Area, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	-----DIRECT COST-----							FIXED COST	TOTAL COST
		OP INPUT	FUEL	R&M	LABOR	LEASE	INTER	TOTAL		
-----dollars-----										
Soil Test	acre	3.33						0.16	3.49	3.49
Lime (Spread)	ton	30.64						1.46	32.10	32.10
Custom Apply Fert	acre	7.50						0.36	7.86	7.86
Potash (60% K2O)	cwt	28.47						1.35	29.82	29.82
Bed-Paratill Fold	12R-38		1.12	1.69	1.31			0.20	4.32	4.55
Bed/Disk (Hipper)	12R-38		0.51	0.34	0.60			0.07	1.52	1.50
App by Air (5 gal)	appl	6.50						0.21	6.71	6.71
Clarity	pt	5.78						0.18	5.96	5.96
Glyphosate 3lbs a.e	oz	4.48						0.14	4.62	4.62
Select Max	pt	12.64						0.40	13.04	13.04
Surfactant	pt	0.66						0.02	0.68	0.68
Fert Appl (Liquid)	12R-38		1.08	0.99	1.49			0.10	3.66	2.88
UAN (32%)	gal	20.10						0.56	20.66	20.66
Row Cond Folding	38'		0.85	0.54	0.99			0.06	2.44	2.82
Plant - Folding	12R-38		1.03	1.71	1.66			0.10	4.50	4.69
Cotton Seed GLB2	thous	139.50						3.31	142.81	142.81
Sprayer 600-750gal	60' 175hp		0.29	0.18	0.51			0.02	1.00	1.20
Gramoxone SL 2.0	oz	7.20						0.17	7.37	7.37
Cotoran	pt	12.84						0.30	13.14	13.14
Surfactant	pt	0.66						0.02	0.68	0.68
Cotton Consultant	acre	8.00						0.19	8.19	8.19
Eradication	acre	1.00						0.02	1.02	1.02
Sprayer 600-825gal	90' 250hp		0.27	0.18	0.34			0.02	0.81	1.15
Dual Magnum	pt	13.80						0.33	14.13	14.13
Liberty 280	oz	17.40						0.41	17.81	17.81
Acephate 90%	lb	1.86						0.04	1.90	1.90
Sprayer 600-750gal	60' 175hp		0.29	0.18	0.51			0.02	1.00	1.20
Dual Magnum	pt	13.80						0.33	14.13	14.13
Glyphosate 3lbs a.e	oz	4.48						0.11	4.59	4.59
Bidrin 8EC	oz	0.23						0.01	0.24	0.24
Sprayer 600-825gal	90' 250hp		0.27	0.18	0.34			0.02	0.81	1.15
Centric 40WG	oz	10.76						0.21	10.97	10.97
Mepiquat Chloride	oz	1.12						0.02	1.14	1.14
Fert Appl (Liquid)	12R-38		1.08	0.99	1.49			0.07	3.63	2.88
UAN (32%)	gal	20.10						0.40	20.50	20.50
App by Air (3 gal)	appl	5.00						0.10	5.10	5.10
Diamond .83EC	oz	8.40						0.17	8.57	8.57
Imidacloprid 4F	oz	1.56						0.03	1.59	1.59
Spray (Direct/Layby)	12R-38		0.93	0.59	1.28			0.04	2.84	2.20
Diuron	pt	6.24						0.10	6.34	6.34
Liberty 280	oz	17.40						0.28	17.68	17.68
App by Air (3 gal)	appl	5.00						0.08	5.08	5.08
Acephate 90%	lb	5.57						0.09	5.66	5.66
Mepiquat Chloride	oz	1.12						0.02	1.14	1.14
Bifenthrin	oz	4.99						0.08	5.07	5.07
App by Air (3 gal)	appl	1.25						0.02	1.27	1.27
Lambda	oz	1.04						0.02	1.06	1.06
Bidrin 8EC	oz	2.34						0.04	2.38	2.38
Incidental Pest										
App by Air (3 gal)	appl	5.00						0.08	5.08	5.08
IncidentalPestTrt\$30	acre	30.00						0.48	30.48	30.48
App by Air (3 gal)	appl	5.00						0.06	5.06	5.06
Acephate 90%	lb	5.57						0.07	5.64	5.64
Bifenthrin	oz	4.99						0.06	5.05	5.05
App by Air (3 gal)	appl	5.00						0.06	5.06	5.06
Centric 40WG	oz	13.45						0.16	13.61	13.61
App by Air (5 gal)	appl	6.50						0.05	6.55	6.55
Thidiazuron 4lb	oz	3.45						0.03	3.48	3.48
Ethephon 6E	pt	5.76						0.05	5.81	5.81
App by Air (5 gal)	appl	3.25						0.03	3.28	3.28
Tribufos 6lb	pt	5.27						0.04	5.31	5.31
Ethephon 6E	pt	0.90						0.01	0.91	0.91
Cotton Picker/Module	6R-38(500)		7.98	20.60	5.75			0.14	34.47	81.27
Gin & Haul	lb	132.00						0.52	132.52	132.52
Stalk Shredder-Flail	20'		1.72	2.53	2.00			0.02	6.27	4.61
TOTALS		658.90	17.42	30.70	18.27	0.00	14.32	739.61	112.10	851.71

Note: Cost of production estimates are based on 2017 input prices.

Fertilization decisions should be based on soil tests.

Soil test cost is prorated for a test every 3rd year.

Lime cost prorated for application every 3rd year.

Table 3.E Estimated monthly income and expense flows per acre
Cotton, 12R-38" solid, conservation tillage
GLB2 variety, Delta Area, Mississippi, 2018

ITEM	Nov	Dec	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct
-----dollars-----												
TOTAL INCOME	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	954.00
DIRECT EXPENSES												
CUSTOM SPRAY	0.00	0.00	0.00	0.00	6.50	0.00	0.00	5.00	11.25	10.00	9.75	0.00
HARVEST AIDS	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	15.38	0.00
GINNING	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	132.00
FERTILIZERS	28.47	0.00	0.00	0.00	0.00	20.10	0.00	20.10	0.00	0.00	0.00	0.00
HERBICIDES	0.00	0.00	0.00	0.00	22.90	0.00	69.52	0.00	23.64	0.00	0.00	0.00
INSECTICIDES	0.00	0.00	0.00	0.00	0.00	0.00	2.09	20.72	43.94	24.01	0.00	0.00
SEED/PLANTS	0.00	0.00	0.00	0.00	0.00	0.00	139.50	0.00	0.00	0.00	0.00	0.00
GROWTH REGULATORS	0.00	0.00	0.00	0.00	0.00	0.00	0.00	1.12	1.12	0.00	0.00	0.00
ADJUVANTS	0.00	0.00	0.00	0.00	0.66	0.00	0.66	0.00	0.00	0.00	0.00	0.00
CUSTOM FERTILIZE	7.50	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
ERADICATION FEE	0.00	0.00	0.00	0.00	0.00	0.00	1.00	0.00	0.00	0.00	0.00	0.00
CUSTOM LIME	30.64	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
CROP CONSULTANT	0.00	0.00	0.00	0.00	0.00	0.00	8.00	0.00	0.00	0.00	0.00	0.00
SOIL TEST	3.33	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
LABOR	1.91	0.00	0.00	0.00	0.00	1.49	4.01	1.83	1.28	0.00	0.00	7.75
LEASE *	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
FUEL	1.63	0.00	0.00	0.00	0.00	1.08	2.73	1.35	0.93	0.00	0.00	9.70
REPAIR & MAINTENANCE	2.03	0.00	0.00	0.00	0.00	0.99	2.79	1.17	0.59	0.00	0.00	23.13
INTEREST ON OP. CAP.	3.60	0.00	0.00	0.00	0.95	0.66	5.46	1.02	1.33	0.41	0.21	0.68
TOTAL DIRECT EXPENSES	79.11	0.00	0.00	0.00	31.01	24.32	235.76	52.31	84.08	34.42	25.34	173.26
NET INCOME	-79.11	0.00	0.00	0.00	-31.01	-24.32	-235.76	-52.31	-84.08	-34.42	-25.34	780.74
NET INCOME TO DATE	-79.11	-79.11	-79.11	-79.11	-110.12	-134.44	-370.20	-422.51	-506.59	-541.01	-566.35	214.39

Note: Cost of production estimates are based on 2017 input prices.

Fertilization decisions should be based on soil tests.

Soil test cost is prorated for a test every 3rd year.

Lime cost prorated for application every 3rd year.

* Lease costs are based on hourly usage costs.

Table 3.F Estimated returns for various price/yield combinations, per acre
 Cotton, 12R-38" solid, conservation tillage
 GLB2 variety, Delta Area, Mississippi, 2018

PRODUCT	PERCENT												
	75	80	85	90	95	100	105	110	115	120	125		
	PRODUCT PRICE												
Cotton Lint	0.49	0.52	0.56	0.59	0.62	0.66	0.69	0.72	0.75	0.79	0.82		
PERCENT	YIELD	UNIT	dollars										
50	600.00	lb	-214	-194	-174	-154	-135	-115	-95	-75	-55	-36	-16
			-326	-306	-286	-267	-247	-227	-207	-187	-168	-148	-128
60	720.00	lb	-168	-144	-120	-96	-73	-49	-25	-1	21	45	69
			-280	-256	-232	-209	-185	-161	-137	-113	-90	-66	-42
70	840.00	lb	-122	-94	-66	-38	-11	16	44	71	99	127	155
			-234	-206	-178	-150	-123	-95	-67	-40	-12	15	43
80	960.00	lb	-75	-44	-12	19	50	82	114	145	177	209	240
			-188	-156	-124	-92	-61	-29	2	33	65	97	128
90	1080.00	lb	-29	5	41	77	112	148	184	219	255	291	326
			-141	-106	-70	-34	0	36	71	107	143	178	214
100	1200.00	lb	16	55	95	135	174	214	253	293	333	372	412
			-95	-56	-16	23	62	102	141	181	221	260	300
110	1320.00	lb	62	106	149	193	236	280	323	367	411	454	498
			-49	-6	37	81	124	168	211	255	298	342	386
120	1440.00	lb	108	156	203	251	298	346	393	441	488	536	583
			-3	44	91	139	186	234	281	329	376	424	471
130	1560.00	lb	154	206	257	309	360	412	463	515	566	618	669
			42	94	145	197	248	300	351	403	454	506	557
140	1680.00	lb	200	256	311	367	422	478	533	589	644	699	755
			88	144	199	255	310	366	421	476	532	587	643
150	1800.00	lb	247	306	365	425	484	544	603	662	722	781	841
			135	194	253	313	372	432	491	550	610	669	729

The top number in each cell is Returns Above Direct Expenses.
 The bottom number in each cell is Returns Above Total Specified Expenses.
 Only the product listed has been varied to calculate net returns.
 Note: Cost of production estimates are based on 2017 input prices.

Table 4.A Estimated costs per acre
Cotton, 12R-38" solid, conservation tillage,
GLB2 variety, furrow irrigated, 10.5 ac-in., Delta Area, Mississippi, 2018

ITEM	UNIT	PRICE	QUANTITY	AMOUNT	YOUR FARM
		dollars		dollars	
DIRECT EXPENSES					
CUSTOM SPRAY					
App by Air (5 gal)	appl	6.50	2.5000	16.25	_____
App by Air (3 gal)	appl	5.00	6.7500	33.75	_____
HARVEST AIDS					
Thidiazuron 4lb	oz	1.50	2.3000	3.45	_____
Ethephon 6E	pt	2.88	2.3125	6.66	_____
Tribufos 6lb	pt	10.54	0.5000	5.27	_____
GINNING					
Gin & Haul	lb	0.11	1500.0000	165.00	_____
FERTILIZERS					
Potash (60% K2O)	cwt	18.98	1.5000	28.47	_____
UAN (32%)	gal	1.17	34.3582	40.20	_____
HERBICIDES					
Clarity	pt	11.55	0.5000	5.78	_____
Glyphosate 3lbs a.e	oz	0.14	64.0000	8.96	_____
Select Max	pt	12.64	1.0000	12.64	_____
Gramoxone SL 2.0	oz	0.15	48.0000	7.20	_____
Cotoran	pt	6.42	2.0000	12.84	_____
Dual Magnum	pt	13.80	2.0000	27.60	_____
Liberty 280	oz	0.60	58.0000	34.80	_____
Diuron	pt	3.90	1.6000	6.24	_____
INSECTICIDES					
Acephate 90%	lb	7.43	1.7500	13.00	_____
Bidrin 8EC	oz	1.17	2.2000	2.57	_____
Centric 40WG	oz	5.38	4.5000	24.21	_____
Diamond .83EC	oz	1.40	6.0000	8.40	_____
Imidacloprid 4F	oz	0.78	2.0000	1.56	_____
Bifenthrin	oz	0.78	12.8000	9.98	_____
Lambda	oz	1.04	1.0000	1.04	_____
IncidentalPestTrt\$30	acre	30.00	1.5000	45.00	_____
IRRIGATION SUPPLIES					
Roll-Out Pipe	ft	0.25	33.0000	8.25	_____
SEED/PLANTS					
Cotton Seed GLB2	thous	3.10	45.0000	139.50	_____
GROWTH REGULATORS					
Mepiquat Chloride	oz	0.07	48.0000	3.36	_____
ADJUVANTS					
Surfactant	pt	3.28	0.4000	1.31	_____
CUSTOM FERTILIZE					
Custom Apply Fert	acre	7.50	1.0000	7.50	_____
ERADICATION FEE					
Eradication	acre	1.00	1.0000	1.00	_____
CUSTOM LIME					
Lime (Spread)	ton	46.00	0.6660	30.64	_____
CROP CONSULTANT					
Cotton Consultant	acre	8.00	1.0000	8.00	_____
SOIL TEST					
Soil Test	acre	10.00	0.3330	3.33	_____
OPERATOR LABOR					
Tractors	hour	13.51	0.5025	6.79	_____
Self-Propelled	hour	13.51	0.2310	3.13	_____
IRRIGATE LABOR					
Special Labor	hour	9.06	0.3000	2.73	_____
Implements	hour	9.06	0.0625	0.57	_____
HAND LABOR					
Implements	hour	9.06	0.1235	1.11	_____
Self-Propelled	hour	9.06	0.2016	1.82	_____
UNALLOCATED LABOR					
	hour	13.50	0.5240	7.08	_____
DIESEL FUEL					
Tractors	gal	1.80	5.6368	10.16	_____
Self-Propelled	gal	1.80	5.0512	9.10	_____
Roll-Out Pipe Irr.	gal	1.80	8.5535	15.39	_____
REPAIR & MAINTENANCE					
Implements	acre	7.14	1.0000	7.14	_____
Tractors	acre	3.17	1.0000	3.17	_____
Self-Propelled	acre	21.32	1.0000	21.32	_____
Roll-Out Pipe Irr.	acre	6.89	1.0000	6.89	_____
INTEREST ON OP. CAP.	acre	15.53	1.0000	15.53	_____
TOTAL DIRECT EXPENSES				835.70	_____
FIXED EXPENSES					
Implements	acre	11.11	1.0000	11.11	_____
Tractors	acre	20.04	1.0000	20.04	_____
Self-Propelled	acre	85.97	1.0000	85.97	_____
Roll-Out Pipe Irr.	acre	53.42	1.0000	53.42	_____
TOTAL FIXED EXPENSES				170.54	_____
TOTAL SPECIFIED EXPENSES				1006.24	_____

Note: Cost of production estimates are based on 2017 input prices.
Fertilization decisions should be based on soil tests.
Soil test cost is prorated for a test every 3rd year.
Lime cost prorated for application every 3rd year.

Table 4.B Summary of estimated costs and returns per acre
 Cotton, 12R-38" solid, conservation tillage,
 GLB2 variety, furrow irrigated, 10.5 ac-in., Delta Area, Mississippi, 2018

ITEM	UNIT	PRICE	QUANTITY	AMOUNT	YOUR FARM
		dollars		dollars	
INCOME					
Cotton Lint	lb	0.66	1500.0000	990.00	_____
Cotton Seed	lb	0.10	2025.0000	202.50	_____

TOTAL INCOME				1192.50	_____
DIRECT EXPENSES					
CUSTOM SPRAY	acre	50.00	1.0000	50.00	_____
HARVEST AIDS	acre	15.38	1.0000	15.38	_____
GINNING	acre	165.00	1.0000	165.00	_____
FERTILIZERS	acre	68.67	1.0000	68.67	_____
HERBICIDES	acre	116.06	1.0000	116.06	_____
INSECTICIDES	acre	105.76	1.0000	105.76	_____
IRRIGATION SUPPLIES	acre	8.25	1.0000	8.25	_____
SEED/PLANTS	acre	139.50	1.0000	139.50	_____
GROWTH REGULATORS	acre	3.36	1.0000	3.36	_____
ADJUVANTS	acre	1.32	1.0000	1.32	_____
CUSTOM FERTILIZE	acre	7.50	1.0000	7.50	_____
ERADICATION FEE	acre	1.00	1.0000	1.00	_____
CUSTOM LIME	acre	30.64	1.0000	30.64	_____
CROP CONSULTANT	acre	8.00	1.0000	8.00	_____
SOIL TEST	acre	3.33	1.0000	3.33	_____
HAND LABOR	hour	9.06	0.3252	2.93	_____
IRRIGATE LABOR	hour	9.06	0.3625	3.30	_____
OPERATOR LABOR	hour	13.51	0.7336	9.92	_____
UNALLOCATED LABOR	hour	13.50	0.5240	7.08	_____
DIESEL FUEL	gal	1.80	19.2417	34.65	_____
REPAIR & MAINTENANCE	acre	38.52	1.0000	38.52	_____
INTEREST ON OP. CAP.	acre	15.53	1.0000	15.53	_____

TOTAL DIRECT EXPENSES				835.70	_____
RETURNS ABOVE DIRECT EXPENSES				356.80	_____

TOTAL FIXED EXPENSES				170.54	_____

TOTAL SPECIFIED EXPENSES				1006.24	_____
RETURNS ABOVE TOTAL SPECIFIED EXPENSES				186.26	_____

Note: Cost of production estimates are based on 2017 input prices.

Fertilization decisions should be based on soil tests.

Soil test cost is prorated for a test every 3rd year.

Lime cost prorated for application every 3rd year.

Table 4.C Estimated resource use for field operations, per acre
 Cotton, 12R-38" solid, conservation tillage,
 GLB2 variety, furrow irrigated, 10.5 ac-in., Delta Area, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	POWER UNIT SIZE	PERF RATE	TIMES OVER	MTH	INPUT AMOUNT	IMPLEMENT	POWER UNIT	ALLOC LABOR	UNALL LABOR
-----hours-----										
Soil Test	acre			0.33	Nov	0.3330				
Lime (Spread)	ton			0.33	Nov	0.6660				
Custom Apply Fert	acre			1.00	Nov	1.0000				
Potash (60% K2O)	cwt					1.5000				
Bed-Paratill Fold	12R-38	MFWD 225	0.053	1.00	Nov		0.05	0.05	0.05	0.04
Bed/Disk (Hipper)	12R-38	MFWD 225	0.049	1.00	Nov		0.04	0.04	0.04	0.03
App by Air (5 gal)	appl			1.00	Mar	1.0000				
Clarity	pt					0.5000				
Glyphosate 3lbs a.e	oz					32.0000				
Select Max	pt					1.0000				
Surfactant	pt					0.2000				
Fert Appl (Liquid)	12R-38	MFWD 225	0.051	1.00	Apr		0.05	0.05	0.07	0.04
UAN (32%)	gal					17.1791				
Row Cond Folding	38'	MFWD 225	0.040	1.00	May		0.04	0.04	0.04	0.03
Plant - Folding	12R-38	MFWD 225	0.049	1.00	May		0.04	0.04	0.09	0.03
Cotton Seed GLB2	thous					45.0000				
Sprayer 600-750gal	60' 175hp		0.017	1.00	May			0.01	0.02	0.01
Gramoxone SL 2.0	oz					48.0000				
Cotoran	pt					2.0000				
Surfactant	pt					0.2000				
Cotton Consultant	acre			1.00	May	1.0000				
Eradication	acre					1.0000				
Sprayer 600-825gal	90' 250hp		0.011	1.00	May			0.01	0.01	0.00
Dual Magnum	pt					1.0000				
Liberty 280	oz					29.0000				
Acephate 90%	lb					0.2500				
Sprayer 600-750gal	60' 175hp		0.017	1.00	May			0.01	0.02	0.01
Dual Magnum	pt					1.0000				
Glyphosate 3lbs a.e	oz					32.0000				
Bidrin 8EC	oz					0.2000				
Sprayer 600-825gal	90' 250hp		0.011	1.00	Jun			0.01	0.01	0.00
Centric 40WG	oz					2.0000				
Mepiquat Chloride	oz					16.0000				
Fert Appl (Liquid)	12R-38	MFWD 225	0.051	1.00	Jun		0.05	0.05	0.07	0.04
UAN (32%)	gal					17.1791				
App by Air (3 gal)	appl			1.00	Jun	1.0000				
Diamond .83EC	oz					6.0000				
Imidacloprid 4F	oz					2.0000				
App by Air (3 gal)	appl			1.00	Jun	1.0000				
Mepiquat Chloride	oz					16.0000				
Spray (Direct/Layby)	12R-38	MFWD 225	0.044	1.00	Jul		0.04	0.04	0.06	0.03
Diuron	pt					1.6000				
Liberty 280	oz					29.0000				
App by Air (3 gal)	appl			1.00	Jul	1.0000				
Acephate 90%	lb					0.7500				
Mepiquat Chloride	oz					16.0000				
Bifenthrin	oz					6.4000				
App by Air (3 gal)	appl			0.25	Jul	0.2500				
Lambda	oz					1.0000				
Bidrin 8EC	oz					2.0000				
Incidental Pest				1.50	Jul					
App by Air (3 gal)	appl					1.5000				
IncidentalPestTrt\$30	acre					1.5000				
App by Air (3 gal)	appl			1.00	Aug	1.0000				
Acephate 90%	lb					0.7500				
Bifenthrin	oz					6.4000				
App by Air (3 gal)	appl			1.00	Aug	1.0000				
Centric 40WG	oz					2.5000				
App by Air (5 gal)	appl			1.00	Sep	1.0000				
Thidiazuron 4lb	oz					2.3000				
Ethephon 6E	pt					2.0000				
App by Air (5 gal)	appl			0.50	Sep	0.5000				
Tribufos 6lb	pt					0.5000				
Ethephon 6E	pt					0.3125				
Cotton Picker/Module	6R-38(500)		0.172	1.00	Oct			0.17	0.34	0.13
Gin & Haul	lb			1.00	Oct	1500.0000				
Stalk Shredder-Flail	20'	MFWD 225	0.082	1.00	Oct		0.08	0.08	0.08	0.06
Roll-Out Pipe Irr.	acre				Jan	1.0000	0.07	0.07	0.44	
TOTALS							0.73	0.50	1.42	0.52

Note: Cost of production estimates are based on 2017 input prices.

- Fertilization decisions should be based on soil tests.**
- Soil test cost is prorated for a test every 3rd year.**
- Lime cost prorated for application every 3rd year.**

Table 4.D Estimated costs for field operations, per acre
 Cotton, 12R-38" solid, conservation tillage,
 GLB2 variety, furrow irrigated, 10.5 ac-in., Delta Area, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	-----DIRECT COST-----							FIXED COST	TOTAL COST
		OP INPUT	FUEL	R&M	LABOR	LEASE	INTER	TOTAL		
-----dollars-----										
Soil Test	acre	3.33						0.16	3.49	3.49
Lime (Spread)	ton	30.64						1.46	32.10	32.10
Custom Apply Fert	acre	7.50						0.36	7.86	7.86
Potash (60% K2O)	cwt	28.47						1.35	29.82	29.82
Bed-Paratill Fold	12R-38		1.12	1.69	1.31			0.20	4.32	4.55
Bed/Disk (Hipper)	12R-38		1.03	0.68	1.20			0.14	3.05	2.99
App by Air (5 gal)	appl	6.50						0.21	6.71	6.71
Clarity	pt	5.78						0.18	5.96	5.96
Glyphosate 3lbs a.e	oz	4.48						0.14	4.62	4.62
Select Max	pt	12.64						0.40	13.04	13.04
Surfactant	pt	0.66						0.02	0.68	0.68
Fert Appl (Liquid)	12R-38		1.08	0.99	1.49			0.10	3.66	2.88
UAN (32%)	gal	20.10						0.56	20.66	20.66
Row Cond Folding	38'		0.85	0.54	0.99			0.06	2.44	2.82
Plant - Folding	12R-38		1.03	1.71	1.66			0.10	4.50	4.69
Cotton Seed GLB2	thous	139.50						3.31	142.81	142.81
Sprayer 600-750gal	60' 175hp		0.29	0.18	0.51			0.02	1.00	1.20
Gramoxone SL 2.0	oz	7.20						0.17	7.37	7.37
Cotoran	pt	12.84						0.30	13.14	13.14
Surfactant	pt	0.66						0.02	0.68	0.68
Cotton Consultant	acre	8.00						0.19	8.19	8.19
Eradication	acre	1.00						0.02	1.02	1.02
Sprayer 600-825gal	90' 250hp		0.27	0.18	0.34			0.02	0.81	1.15
Dual Magnum	pt	13.80						0.33	14.13	14.13
Liberty 280	oz	17.40						0.41	17.81	17.81
Acephate 90%	lb	1.86						0.04	1.90	1.90
Sprayer 600-750gal	60' 175hp		0.29	0.18	0.51			0.02	1.00	1.20
Dual Magnum	pt	13.80						0.33	14.13	14.13
Glyphosate 3lbs a.e	oz	4.48						0.11	4.59	4.59
Bidrin 8EC	oz	0.23						0.01	0.24	0.24
Sprayer 600-825gal	90' 250hp		0.27	0.18	0.34			0.02	0.81	1.15
Centric 40WG	oz	10.76						0.21	10.97	10.97
Mepiquat Chloride	oz	1.12						0.02	1.14	1.14
Fert Appl (Liquid)	12R-38		1.08	0.99	1.49			0.07	3.63	2.88
UAN (32%)	gal	20.10						0.40	20.50	20.50
App by Air (3 gal)	appl	5.00						0.10	5.10	5.10
Diamond .83EC	oz	8.40						0.17	8.57	8.57
Imidacloprid 4F	oz	1.56						0.03	1.59	1.59
App by Air (3 gal)	appl	5.00						0.10	5.10	5.10
Mepiquat Chloride	oz	1.12						0.02	1.14	1.14
Spray (Direct/Layby)	12R-38		0.93	0.59	1.28			0.04	2.84	2.20
Diuron	pt	6.24						0.10	6.34	6.34
Liberty 280	oz	17.40						0.28	17.68	17.68
App by Air (3 gal)	appl	5.00						0.08	5.08	5.08
Acephate 90%	lb	5.57						0.09	5.66	5.66
Mepiquat Chloride	oz	1.12						0.02	1.14	1.14
Bifenthrin	oz	4.99						0.08	5.07	5.07
App by Air (3 gal)	appl	1.25						0.02	1.27	1.27
Lambda	oz	1.04						0.02	1.06	1.06
Bidrin 8EC	oz	2.34						0.04	2.38	2.38
Incidental Pest										
App by Air (3 gal)	appl	7.50						0.12	7.62	7.62
IncidentalPestTrt\$30	acre	45.00						0.71	45.71	45.71
App by Air (3 gal)	appl	5.00						0.06	5.06	5.06
Acephate 90%	lb	5.57						0.07	5.64	5.64
Bifenthrin	oz	4.99						0.06	5.05	5.05
App by Air (3 gal)	appl	5.00						0.06	5.06	5.06
Centric 40WG	oz	13.45						0.16	13.61	13.61
App by Air (5 gal)	appl	6.50						0.05	6.55	6.55
Thidiazuron 4lb	oz	3.45						0.03	3.48	3.48
Ethephon 6E	pt	5.76						0.05	5.81	5.81
App by Air (5 gal)	appl	3.25						0.03	3.28	3.28
Tribufos 6lb	pt	5.27						0.04	5.31	5.31
Ethephon 6E	pt	0.90						0.01	0.91	0.91
Cotton Picker/Module	6R-38(500)		7.98	20.60	5.75			0.14	34.47	81.27
Gin & Haul	lb	165.00						0.65	165.65	165.65
Stalk Shredder-Flail	20'		1.72	2.53	2.00			0.02	6.27	4.61
Roll-Out Pipe Irr.	acre	8.25	16.71	7.48	4.36			0.62	37.42	56.95
TOTALS		723.77	34.65	38.52	23.23	0.00	15.53	835.70	170.54	1006.24

Note: Cost of production estimates are based on 2017 input prices.
Fertilization decisions should be based on soil tests.
Soil test cost is prorated for a test every 3rd year.
Lime cost prorated for application every 3rd year.

Table 4.E Estimated monthly income and expense flows per acre
 Cotton, 12R-38" solid, conservation tillage,
 GLB2 variety, furrow irrigated, 10.5 ac-in., Delta Area, Mississippi, 2018

ITEM	Nov	Dec	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct
-----dollars-----												
TOTAL INCOME	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	1192.50
DIRECT EXPENSES												
CUSTOM SPRAY	0.00	0.00	0.00	0.00	6.50	0.00	0.00	10.00	13.75	10.00	9.75	0.00
HARVEST AIDS	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	15.38	0.00
GINNING	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	165.00
FERTILIZERS	28.47	0.00	0.00	0.00	0.00	20.10	0.00	20.10	0.00	0.00	0.00	0.00
HERBICIDES	0.00	0.00	0.00	0.00	22.90	0.00	69.52	0.00	23.64	0.00	0.00	0.00
INSECTICIDES	0.00	0.00	0.00	0.00	0.00	0.00	2.09	20.72	58.94	24.01	0.00	0.00
IRRIGATION SUPPLIES	0.00	0.00	0.00	0.00	0.00	0.00	0.00	8.25	0.00	0.00	0.00	0.00
SEED/PLANTS	0.00	0.00	0.00	0.00	0.00	0.00	139.50	0.00	0.00	0.00	0.00	0.00
GROWTH REGULATORS	0.00	0.00	0.00	0.00	0.00	0.00	0.00	2.24	1.12	0.00	0.00	0.00
ADJUVANTS	0.00	0.00	0.00	0.00	0.66	0.00	0.66	0.00	0.00	0.00	0.00	0.00
CUSTOM FERTILIZE	7.50	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
ERADICATION FEE	0.00	0.00	0.00	0.00	0.00	0.00	1.00	0.00	0.00	0.00	0.00	0.00
CUSTOM LIME	30.64	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
CROP CONSULTANT	0.00	0.00	0.00	0.00	0.00	0.00	8.00	0.00	0.00	0.00	0.00	0.00
SOIL TEST	3.33	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
LABOR	2.51	0.00	0.00	0.00	0.00	1.49	4.24	4.40	1.51	0.23	0.59	8.26
LEASE *	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
FUEL	2.15	0.00	0.00	0.00	0.00	1.08	2.73	6.83	6.06	5.13	0.30	10.37
REPAIR & MAINTENANCE	2.37	0.00	0.00	0.00	0.00	0.99	2.79	5.59	1.90	1.31	0.13	23.44
INTEREST ON OP. CAP.	3.67	0.00	0.00	0.00	0.95	0.66	5.47	1.55	1.70	0.49	0.22	0.82
TOTAL DIRECT EXPENSES	80.64	0.00	0.00	0.00	31.01	24.32	236.00	79.68	108.62	41.17	26.37	207.89
NET INCOME	-80.64	0.00	0.00	0.00	-31.01	-24.32	-236.00	-79.68	-108.62	-41.17	-26.37	984.61
NET INCOME TO DATE	-80.64	-80.64	-80.64	-80.64	-111.65	-135.97	-371.97	-451.65	-560.27	-601.44	-627.81	356.80

Note: Cost of production estimates are based on 2017 input prices.

Fertilization decisions should be based on soil tests.

Soil test cost is prorated for a test every 3rd year.

Lime cost prorated for application every 3rd year.

* Lease costs are based on hourly usage costs.

Table 4.F Estimated returns for various price/yield combinations, per acre
 Cotton, 12R-38" solid, conservation tillage,
 GLB2 variety, furrow irrigated, 10.5 ac-in., Delta Area, Mississippi, 2018

PRODUCT			PERCENT										
			75	80	85	90	95	100	105	110	115	120	125
			PRODUCT PRICE										
Cotton Lint			0.49	0.52	0.56	0.59	0.62	0.66	0.69	0.72	0.75	0.79	0.82
PERCENT	YIELD	UNIT	dollars										
50	750.00	lb	-179 -349	-154 -324	-129 -300	-104 -275	-80 -250	-55 -225	-30 -201	-5 -176	18 -151	43 -126	68 -102
60	900.00	lb	-121 -291	-91 -262	-62 -232	-32 -202	-2 -173	27 -143	56 -113	86 -84	116 -54	145 -24	175 5
70	1050.00	lb	-63 -234	-29 -199	5 -164	40 -130	74 -95	109 -61	144 -26	178 8	213 42	248 77	282 112
80	1200.00	lb	-6 -176	33 -137	73 -97	112 -57	152 -18	191 21	231 60	271 100	310 140	350 179	389 219
90	1350.00	lb	51 -118	96 -74	140 -29	185 14	229 59	274 103	318 148	363 192	408 237	452 282	497 326
100	1500.00	lb	109 -61	158 -11	208 37	257 87	307 136	356 186	406 235	455 285	505 334	554 384	604 433
110	1650.00	lb	166 -3	221 50	275 105	330 159	384 214	439 268	493 323	548 377	602 432	657 486	711 540
120	1800.00	lb	224 54	284 113	343 172	402 232	462 291	521 351	581 410	640 469	699 529	759 588	818 648
130	1950.00	lb	282 111	346 176	411 240	475 304	539 369	604 433	668 497	732 562	797 626	861 690	925 755
140	2100.00	lb	340 169	409 238	478 308	547 377	617 446	686 516	755 585	825 654	894 723	963 793	1033 862
150	2250.00	lb	397 227	471 301	546 375	620 449	694 524	768 598	843 672	917 746	991 821	1065 895	1140 969

The top number in each cell is Returns Above Direct Expenses.
 The bottom number in each cell is Returns Above Total Specified Expenses.
 Only the product listed has been varied to calculate net returns.
 Note: Cost of production estimates are based on 2017 input prices.

Table 5.A Estimated costs per acre
 Cotton, 12R-38" solid, conservation tillage
 B2XF variety, pivot irrigated, 7.5 ac.-in., Delta Area, Mississippi, 2018

ITEM	UNIT	PRICE	QUANTITY	AMOUNT	YOUR FARM
		dollars		dollars	
DIRECT EXPENSES					
CUSTOM SPRAY					
App by Air (5 gal)	appl	6.50	4.5000	29.25	_____
App by Air (3 gal)	appl	5.00	4.7500	23.75	_____
HARVEST AIDS					
Thidiazuron 4lb	oz	1.50	2.3000	3.45	_____
Ethephon 6E	pt	2.88	2.3125	6.66	_____
Tribufos 6lb	pt	10.54	0.5000	5.27	_____
GINNING					
Gin & Haul	lb	0.11	1500.0000	165.00	_____
FERTILIZERS					
Potash (60% K2O)	cwt	18.98	1.5000	28.47	_____
UAN (32%)	gal	1.17	34.3582	40.20	_____
FUNGICIDES					
Cotton Seed Trt.	acre	20.00	1.0000	20.00	_____
HERBICIDES					
Clarity	pt	11.55	0.5000	5.78	_____
Glyphosate 3lbs a.e	oz	0.14	64.0000	8.96	_____
Select Max	pt	12.64	1.0000	12.64	_____
Gramoxone SL 2.0	oz	0.15	48.0000	7.20	_____
Cotoran	pt	6.42	2.0000	12.84	_____
Dual Magnum	pt	13.80	2.0000	27.60	_____
Liberty 280	oz	0.60	58.0000	34.80	_____
Diuron	pt	3.90	1.6000	6.24	_____
INSECTICIDES					
Acephate 90%	lb	7.43	1.7500	13.00	_____
Bidrin 8EC	oz	1.17	2.2000	2.57	_____
Centric 40WG	oz	5.38	4.5000	24.21	_____
Diamond .83EC	oz	1.40	6.0000	8.40	_____
Imidacloprid 4F	oz	0.78	2.0000	1.56	_____
Bifenthrin	oz	0.78	12.8000	9.98	_____
Lambda	oz	1.04	1.0000	1.04	_____
IncidentalPestTrt\$30	acre	30.00	1.5000	45.00	_____
SEED/PLANTS					
Cotton Seed B2XF	thous	3.00	45.0000	135.00	_____
GROWTH REGULATORS					
Mepiquat Chloride	oz	0.07	48.0000	3.36	_____
ADJUVANTS					
Surfactant	pt	3.28	0.4000	1.31	_____
CUSTOM FERTILIZE					
Custom Apply Fert	acre	7.50	1.0000	7.50	_____
ERADICATION FEE					
Eradication	acre	1.00	1.0000	1.00	_____
CUSTOM LIME					
Lime (Spread)	ton	46.00	0.6660	30.64	_____
CROP CONSULTANT					
Cotton Consultant	acre	8.00	1.0000	8.00	_____
SOIL TEST					
Soil Test	acre	10.00	0.3330	3.33	_____
OPERATOR LABOR					
Tractors	hour	13.51	0.3993	5.39	_____
Self-Propelled	hour	13.51	0.2310	3.13	_____
IRRIGATE LABOR					
Special Labor	hour	9.06	0.2036	1.84	_____
HAND LABOR					
Implements	hour	9.06	0.1235	1.11	_____
Self-Propelled	hour	9.06	0.2016	1.82	_____
UNALLOCATED LABOR					
	hour	13.52	0.5043	6.82	_____
DIESEL FUEL					
Tractors	gal	1.80	4.6248	8.32	_____
Self-Propelled	gal	1.80	5.0512	9.10	_____
1/4-mi. Pivot Irr.	gal	1.80	11.2011	20.16	_____
REPAIR & MAINTENANCE					
Implements	acre	6.76	1.0000	6.76	_____
Tractors	acre	2.62	1.0000	2.62	_____
Self-Propelled	acre	21.32	1.0000	21.32	_____
1/4-mi. Pivot Irr.	acre	21.65	1.0000	21.65	_____
INTEREST ON OP. CAP.	acre	16.05	1.0000	16.05	_____
TOTAL DIRECT EXPENSES				860.11	_____
FIXED EXPENSES					
Implements	acre	9.62	1.0000	9.62	_____
Tractors	acre	16.51	1.0000	16.51	_____
Self-Propelled	acre	85.97	1.0000	85.97	_____
1/4-mi. Pivot Irr.	acre	74.43	1.0000	74.43	_____
TOTAL FIXED EXPENSES				186.53	_____
TOTAL SPECIFIED EXPENSES				1046.64	_____

Note: Cost of production estimates are based on 2017 input prices.
Fertilization decisions should be based on soil tests.
Soil test cost is prorated for a test every 3rd year.
Lime cost prorated for application every 3rd year.

Table 5.B Summary of estimated costs and returns per acre
 Cotton, 12R-38" solid, conservation tillage
 B2XF variety, pivot irrigated, 7.5 ac.-in., Delta Area, Mississippi, 2018

ITEM	UNIT	PRICE	QUANTITY	AMOUNT	YOUR FARM
		dollars		dollars	
INCOME					
Cotton Lint	lb	0.66	1500.0000	990.00	_____
Cotton Seed	lb	0.10	2025.0000	202.50	_____
TOTAL INCOME				1192.50	_____
DIRECT EXPENSES					
CUSTOM SPRAY	acre	53.00	1.0000	53.00	_____
HARVEST AIDS	acre	15.38	1.0000	15.38	_____
GINNING	acre	165.00	1.0000	165.00	_____
FERTILIZERS	acre	68.67	1.0000	68.67	_____
FUNGICIDES	acre	20.00	1.0000	20.00	_____
HERBICIDES	acre	116.06	1.0000	116.06	_____
INSECTICIDES	acre	105.76	1.0000	105.76	_____
SEED/PLANTS	acre	135.00	1.0000	135.00	_____
GROWTH REGULATORS	acre	3.36	1.0000	3.36	_____
ADJUVANTS	acre	1.32	1.0000	1.32	_____
CUSTOM FERTILIZE	acre	7.50	1.0000	7.50	_____
ERADICATION FEE	acre	1.00	1.0000	1.00	_____
CUSTOM LIME	acre	30.64	1.0000	30.64	_____
CROP CONSULTANT	acre	8.00	1.0000	8.00	_____
SOIL TEST	acre	3.33	1.0000	3.33	_____
HAND LABOR	hour	9.06	0.3252	2.93	_____
IRRIGATE LABOR	hour	9.06	0.2036	1.84	_____
OPERATOR LABOR	hour	13.51	0.6304	8.52	_____
UNALLOCATED LABOR	hour	13.52	0.5043	6.82	_____
DIESEL FUEL	gal	1.80	20.8772	37.58	_____
REPAIR & MAINTENANCE	acre	52.35	1.0000	52.35	_____
INTEREST ON OP. CAP.	acre	16.05	1.0000	16.05	_____
TOTAL DIRECT EXPENSES				860.11	_____
RETURNS ABOVE DIRECT EXPENSES				332.39	_____
TOTAL FIXED EXPENSES				186.53	_____
TOTAL SPECIFIED EXPENSES				1046.64	_____
RETURNS ABOVE TOTAL SPECIFIED EXPENSES				145.86	_____

Note: Cost of production estimates are based on 2017 input prices.

Fertilization decisions should be based on soil tests.

Soil test cost is prorated for a test every 3rd year.

Lime cost prorated for application every 3rd year.

Table 5.C Estimated resource use for field operations, per acre
 Cotton, 12R-38" solid, conservation tillage
 B2XF variety, pivot irrigated, 7.5 ac.-in., Delta Area, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	POWER UNIT SIZE	PERF RATE	TIMES OVER	MTH	INPUT AMOUNT	IMPLEMENT	POWER UNIT	ALLOC LABOR	UNALL LABOR
-----hours-----										
Soil Test	acre			0.33	Nov	0.3330				
Lime (Spread)	ton			0.33	Nov	0.6660				
Custom Apply Fert	acre			1.00	Nov	1.0000				
Potash (60% K2O)	cwt					1.5000				
Bed-Paratill	Fold	12R-38	MFWD 225	0.053	1.00	Nov		0.05	0.05	0.04
Bed/Disk (Hipper)		12R-38	MFWD 225	0.049	0.50	Nov		0.02	0.02	0.01
App by Air (5 gal)	appl				Mar	1.0000				
Clarity	pt					0.5000				
Glyphosate 3lbs a.e	oz					32.0000				
Select Max	pt					1.0000				
Surfactant	pt					0.2000				
Fert Appl (Liquid)	12R-38	MFWD 225	0.051	1.00	Apr		0.05	0.05	0.07	0.04
UAN (32%)	gal					17.1791				
Row Cond Folding	38'	MFWD 225	0.040	1.00	May		0.04	0.04	0.04	0.03
Plant - Folding	12R-38	MFWD 225	0.049	1.00	May		0.04	0.04	0.09	0.03
Cotton Seed B2XF	thous					45.0000				
Cotton Seed Trt.	acre					1.0000				
Sprayer 600-750gal	60' 175hp		0.017	1.00	May			0.01	0.02	0.01
Gramoxone SL 2.0	oz					48.0000				
Cotoran	pt					2.0000				
Surfactant	pt					0.2000				
Cotton Consultant	acre				May	1.0000				
Eradication	acre					1.0000				
Sprayer 600-825gal	90' 250hp		0.011	1.00	May			0.01	0.01	0.00
Dual Magnum	pt					1.0000				
Liberty 280	oz					29.0000				
Acephate 90%	lb					0.2500				
Sprayer 600-750gal	60' 175hp		0.017	1.00	May			0.01	0.02	0.01
Dual Magnum	pt					1.0000				
Glyphosate 3lbs a.e	oz					32.0000				
Bidrin 8EC	oz					0.2000				
Sprayer 600-825gal	90' 250hp		0.011	1.00	Jun			0.01	0.01	0.00
Centric 40WG	oz					2.0000				
Mepiquat Chloride	oz					16.0000				
Fert Appl (Liquid)	12R-38	MFWD 225	0.051	1.00	Jun		0.05	0.05	0.07	0.04
UAN (32%)	gal					17.1791				
App by Air (5 gal)	appl				Jun	1.0000				
Diamond .83EC	oz					6.0000				
Imidacloprid 4F	oz					2.0000				
App by Air (3 gal)	appl				Jun	1.0000				
Mepiquat Chloride	oz					16.0000				
Spray (Direct/Layby)	12R-38	MFWD 225	0.044	1.00	Jul		0.04	0.04	0.06	0.03
Diuron	pt					1.6000				
Liberty 280	oz					29.0000				
App by Air (3 gal)	appl				Jul	1.0000				
Acephate 90%	lb					0.7500				
Mepiquat Chloride	oz					16.0000				
Bifenthrin	oz					6.4000				
App by Air (3 gal)	appl				Jul	0.2500				
Lambda	oz					1.0000				
Bidrin 8EC	oz					2.0000				
Incidental Pest					Jul					
App by Air (3 gal)	appl					1.5000				
IncidentalPestTrt\$30	acre					1.5000				
App by Air (3 gal)	appl				Aug	1.0000				
Acephate 90%	lb					0.7500				
Bifenthrin	oz					6.4000				
App by Air (5 gal)	appl				Aug	1.0000				
Centric 40WG	oz					2.5000				
App by Air (5 gal)	appl				Sep	1.0000				
Thidiazuron 4lb	oz					2.3000				
Ethephon 6E	pt					2.0000				
App by Air (5 gal)	appl				Sep	0.5000				
Tribufos 6lb	pt					0.5000				
Ethephon 6E	pt					0.3125				
Cotton Picker/Module	6R-38(500)		0.172	1.00	Oct			0.17	0.34	0.13
Gin & Haul	lb				Oct	1500.0000				
Stalk Shredder-Flail	20'	MFWD 225	0.082	1.00	Oct		0.08	0.08	0.08	0.06
1/4-mi. Pivot Irr.	acre				Jan	1.0000			0.20	
TOTALS							0.63	0.39	1.15	0.50

Note: Cost of production estimates are based on 2017 input prices.
Fertilization decisions should be based on soil tests.
Soil test cost is prorated for a test every 3rd year.
Lime cost prorated for application every 3rd year.

Table 5.D Estimated costs for field operations, per acre
 Cotton, 12R-38" solid, conservation tillage
 B2XF variety, pivot irrigated, 7.5 ac.-in., Delta Area, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	-----DIRECT COST-----							FIXED COST	TOTAL COST
		OP INPUT	FUEL	R&M	LABOR	LEASE	INTER	TOTAL		
-----dollars-----										
Soil Test	acre	3.33						0.16	3.49	3.49
Lime (Spread)	ton	30.64						1.46	32.10	32.10
Custom Apply Fert	acre	7.50						0.36	7.86	7.86
Potash (60% K2O)	cwt	28.47						1.35	29.82	29.82
Bed-Paratill	Fold	12R-38	1.12	1.69	1.31			0.20	4.32	4.55
Bed/Disk (Hipper)	12R-38		0.51	0.34	0.60			0.07	1.52	1.50
App by Air (5 gal)	appl	6.50						0.21	6.71	6.71
Clarity	pt	5.78						0.18	5.96	5.96
Glyphosate 3lbs a.e	oz	4.48						0.14	4.62	4.62
Select Max	pt	12.64						0.40	13.04	13.04
Surfactant	pt	0.66						0.02	0.68	0.68
Fert Appl (Liquid)	12R-38		1.08	0.99	1.49			0.10	3.66	2.88
UAN (32%)	gal	20.10						0.56	20.66	20.66
Row Cond Folding	38'		0.85	0.54	0.99			0.06	2.44	2.82
Plant - Folding	12R-38		1.03	1.71	1.66			0.10	4.50	4.69
Cotton Seed B2XF	thous	135.00						3.21	138.21	138.21
Cotton Seed Trt.	acre	20.00						0.48	20.48	20.48
Sprayer 600-750gal	60' 175hp		0.29	0.18	0.51			0.02	1.00	1.20
Gramoxone SL 2.0	oz	7.20						0.17	7.37	7.37
Cotoran	pt	12.84						0.30	13.14	13.14
Surfactant	pt	0.66						0.02	0.68	0.68
Cotton Consultant	acre	8.00						0.19	8.19	8.19
Eradication	acre	1.00						0.02	1.02	1.02
Sprayer 600-825gal	90' 250hp		0.27	0.18	0.34			0.02	0.81	1.15
Dual Magnum	pt	13.80						0.33	14.13	14.13
Liberty 280	oz	17.40						0.41	17.81	17.81
Acephate 90%	lb	1.86						0.04	1.90	1.90
Sprayer 600-750gal	60' 175hp		0.29	0.18	0.51			0.02	1.00	1.20
Dual Magnum	pt	13.80						0.33	14.13	14.13
Glyphosate 3lbs a.e	oz	4.48						0.11	4.59	4.59
Bidrin 8EC	oz	0.23						0.01	0.24	0.24
Sprayer 600-825gal	90' 250hp		0.27	0.18	0.34			0.02	0.81	1.15
Centric 40WG	oz	10.76						0.21	10.97	10.97
Mepiquat Chloride	oz	1.12						0.02	1.14	1.14
Fert Appl (Liquid)	12R-38		1.08	0.99	1.49			0.07	3.63	2.88
UAN (32%)	gal	20.10						0.40	20.50	20.50
App by Air (5 gal)	appl	6.50						0.13	6.63	6.63
Diamond .83EC	oz	8.40						0.17	8.57	8.57
Imidacloprid 4F	oz	1.56						0.03	1.59	1.59
App by Air (3 gal)	appl	5.00						0.10	5.10	5.10
Mepiquat Chloride	oz	1.12						0.02	1.14	1.14
Spray (Direct/Layby)	12R-38		0.93	0.59	1.28			0.04	2.84	2.20
Diuron	pt	6.24						0.10	6.34	6.34
Liberty 280	oz	17.40						0.28	17.68	17.68
App by Air (3 gal)	appl	5.00						0.08	5.08	5.08
Acephate 90%	lb	5.57						0.09	5.66	5.66
Mepiquat Chloride	oz	1.12						0.02	1.14	1.14
Bifenthrin	oz	4.99						0.08	5.07	5.07
App by Air (3 gal)	appl	1.25						0.02	1.27	1.27
Lambda	oz	1.04						0.02	1.06	1.06
Bidrin 8EC	oz	2.34						0.04	2.38	2.38
Incidental Pest										
App by Air (3 gal)	appl	7.50						0.12	7.62	7.62
IncidentalPestTrt\$30	acre	45.00						0.71	45.71	45.71
App by Air (3 gal)	appl	5.00						0.06	5.06	5.06
Acephate 90%	lb	5.57						0.07	5.64	5.64
Bifenthrin	oz	4.99						0.06	5.05	5.05
App by Air (5 gal)	appl	6.50						0.08	6.58	6.58
Centric 40WG	oz	13.45						0.16	13.61	13.61
App by Air (5 gal)	appl	6.50						0.05	6.55	6.55
Thidiazuron 4lb	oz	3.45						0.03	3.48	3.48
Ethephon 6E	pt	5.76						0.05	5.81	5.81
App by Air (5 gal)	appl	3.25						0.03	3.28	3.28
Tribufos 6lb	pt	5.27						0.04	5.31	5.31
Ethephon 6E	pt	0.90						0.01	0.91	0.91
Cotton Picker/Module	6R-38(500)		7.98	20.60	5.75			0.14	34.47	81.27
Gin & Haul	lb	165.00						0.65	165.65	165.65
Stalk Shredder-Flail	20'		1.72	2.53	2.00			0.02	6.27	4.61
1/4-mi. Pivot Irr.	acre		20.16	21.65	1.84			0.78	44.43	74.43
TOTALS		734.02	37.58	52.35	20.11	0.00	16.05	860.11	186.53	1046.64

Note: Cost of production estimates are based on 2017 input prices.
Fertilization decisions should be based on soil tests.
Soil test cost is prorated for a test every 3rd year.
Lime cost prorated for application every 3rd year.

Table 5.E Estimated monthly income and expense flows per acre
 Cotton, 12R-38" solid, conservation tillage
 B2XF variety, pivot irrigated, 7.5 ac.-in., Delta Area, Mississippi, 2018

ITEM	Nov	Dec	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct
-----dollars-----												
TOTAL INCOME	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	1192.50
DIRECT EXPENSES												
CUSTOM SPRAY	0.00	0.00	0.00	0.00	6.50	0.00	0.00	11.50	13.75	11.50	9.75	0.00
HARVEST AIDS	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	15.38	0.00
GINNING	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	165.00
FERTILIZERS	28.47	0.00	0.00	0.00	0.00	20.10	0.00	20.10	0.00	0.00	0.00	0.00
FUNGICIDES	0.00	0.00	0.00	0.00	0.00	0.00	20.00	0.00	0.00	0.00	0.00	0.00
HERBICIDES	0.00	0.00	0.00	0.00	22.90	0.00	69.52	0.00	23.64	0.00	0.00	0.00
INSECTICIDES	0.00	0.00	0.00	0.00	0.00	0.00	2.09	20.72	58.94	24.01	0.00	0.00
SEED/PLANTS	0.00	0.00	0.00	0.00	0.00	0.00	135.00	0.00	0.00	0.00	0.00	0.00
GROWTH REGULATORS	0.00	0.00	0.00	0.00	0.00	0.00	0.00	2.24	1.12	0.00	0.00	0.00
ADJUVANTS	0.00	0.00	0.00	0.00	0.66	0.00	0.66	0.00	0.00	0.00	0.00	0.00
CUSTOM FERTILIZE	7.50	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
ERADICATION FEE	0.00	0.00	0.00	0.00	0.00	0.00	1.00	0.00	0.00	0.00	0.00	0.00
CUSTOM LIME	30.64	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
CROP CONSULTANT	0.00	0.00	0.00	0.00	0.00	0.00	8.00	0.00	0.00	0.00	0.00	0.00
SOIL TEST	3.33	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
LABOR	1.91	0.00	0.00	0.00	0.00	1.49	5.35	1.98	1.48	0.15	0.00	7.75
LEASE *	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
FUEL	1.63	0.00	0.00	0.00	0.00	1.08	2.73	7.40	8.99	6.05	0.00	9.70
REPAIR & MAINTENANCE	2.03	0.00	0.00	0.00	0.00	0.99	2.79	19.55	2.46	1.40	0.00	23.13
INTEREST ON OP. CAP.	3.60	0.00	0.00	0.00	0.95	0.66	5.88	1.66	1.76	0.52	0.21	0.81
TOTAL DIRECT EXPENSES	79.11	0.00	0.00	0.00	31.01	24.32	253.02	85.15	112.14	43.63	25.34	206.39
NET INCOME	-79.11	0.00	0.00	0.00	-31.01	-24.32	-253.02	-85.15	-112.14	-43.63	-25.34	986.11
NET INCOME TO DATE	-79.11	-79.11	-79.11	-79.11	-110.12	-134.44	-387.46	-472.61	-584.75	-628.38	-653.72	332.39

Note: Cost of production estimates are based on 2017 input prices.

Fertilization decisions should be based on soil tests.

Soil test cost is prorated for a test every 3rd year.

Lime cost prorated for application every 3rd year.

* Lease costs are based on hourly usage costs.

Table 5.F Estimated returns for various price/yield combinations, per acre
 Cotton, 12R-38" solid, conservation tillage
 B2XF variety, pivot irrigated, 7.5 ac.-in., Delta Area, Mississippi, 2018

PRODUCT			PERCENT										
			75	80	85	90	95	100	105	110	115	120	125
Cotton Lint			0.49	0.52	0.56	0.59	0.62	0.66	0.69	0.72	0.75	0.79	0.82
PERCENT	YIELD	UNIT	dollars										
50	750.00	lb	-203 -390	-178 -365	-154 -340	-129 -315	-104 -291	-79 -266	-55 -241	-30 -216	-5 -192	19 -167	43 -142
60	900.00	lb	-145 -332	-116 -302	-86 -272	-56 -243	-27 -213	2 -183	32 -154	62 -124	91 -94	121 -65	151 -35
70	1050.00	lb	-88 -274	-53 -240	-18 -205	15 -170	50 -136	85 -101	119 -66	154 -32	189 2	223 37	258 71
80	1200.00	lb	-30 -217	9 -177	48 -137	88 -98	127 -58	167 -19	207 20	246 60	286 99	325 139	365 178
90	1350.00	lb	27 -159	71 -114	116 -70	160 -25	205 18	249 63	294 107	339 152	383 197	428 241	472 286
100	1500.00	lb	84 -101	134 -52	183 -2	233 46	282 96	332 145	381 195	431 244	480 294	530 343	579 393
110	1650.00	lb	142 -43	197 10	251 64	305 119	360 173	414 228	469 282	523 337	578 391	632 446	687 500
120	1800.00	lb	200 13	259 73	319 132	378 191	437 251	497 310	556 370	616 429	675 488	734 548	794 607
130	1950.00	lb	257 71	322 135	386 200	450 264	515 328	579 393	644 457	708 521	772 586	837 650	901 714
140	2100.00	lb	315 129	384 198	454 267	523 337	592 406	662 475	731 544	800 614	870 683	939 752	1008 822
150	2250.00	lb	373 186	447 261	521 335	596 409	670 483	744 558	818 632	893 706	967 780	1041 855	1115 929

The top number in each cell is Returns Above Direct Expenses.
 The bottom number in each cell is Returns Above Total Specified Expenses.
 Only the product listed has been varied to calculate net returns.
 Note: Cost of production estimates are based on 2017 input prices.

Table 6.A Estimated costs per acre
 Cotton, 12R-38" solid, no-till
 B2XF variety, Delta Area, Mississippi, 2018

ITEM	UNIT	PRICE	QUANTITY	AMOUNT	YOUR FARM
		dollars		dollars	
DIRECT EXPENSES					
CUSTOM SPRAY					
App by Air (5 gal)	appl	6.50	2.5000	16.25	_____
App by Air (3 gal)	appl	5.00	5.2500	26.25	_____
HARVEST AIDS					
Thidiazuron 4lb	oz	1.50	2.3000	3.45	_____
Ethephon 6E	pt	2.88	2.3125	6.66	_____
Tribufos 6lb	pt	10.54	0.5000	5.27	_____
GINNING					
Gin & Haul	lb	0.11	1200.0000	132.00	_____
FERTILIZERS					
Potash (60% K2O)	cwt	18.98	1.5000	28.47	_____
UAN (32%)	gal	1.17	25.4000	29.72	_____
FUNGICIDES					
Cotton Seed Trt.	acre	20.00	1.0000	20.00	_____
HERBICIDES					
Clarity	pt	11.55	0.5000	5.78	_____
Glyphosate 3lbs a.e	oz	0.14	64.0000	8.96	_____
Select Max	pt	12.64	1.0000	12.64	_____
Gramoxone SL 2.0	oz	0.15	48.0000	7.20	_____
Cotoran	pt	6.42	2.0000	12.84	_____
Dual Magnum	pt	13.80	2.0000	27.60	_____
Liberty 280	oz	0.60	58.0000	34.80	_____
Diuron	pt	3.90	1.6000	6.24	_____
INSECTICIDES					
Acephate 90%	lb	7.43	1.7500	13.00	_____
Bidrin 8EC	oz	1.17	2.2000	2.57	_____
Centric 40WG	oz	5.38	4.5000	24.21	_____
Diamond .83EC	oz	1.40	6.0000	8.40	_____
Imidacloprid 4F	oz	0.78	4.0000	3.12	_____
Bifenthrin	oz	0.78	12.8000	9.98	_____
Lambda	oz	1.04	1.0000	1.04	_____
IncidentalPestTrt\$30	acre	30.00	1.0000	30.00	_____
SEED/PLANTS					
Cotton Seed B2XF	thous	3.00	45.0000	135.00	_____
GROWTH REGULATORS					
Mepiquat Chloride	oz	0.07	32.0000	2.24	_____
ADJUVANTS					
Surfactant	pt	3.28	0.4000	1.31	_____
CUSTOM FERTILIZE					
Custom Apply Fert	acre	7.50	1.0000	7.50	_____
ERADICATION FEE					
Eradication	acre	1.00	1.0000	1.00	_____
CUSTOM LIME					
Lime (Spread)	ton	46.00	0.6660	30.64	_____
CROP CONSULTANT					
Cotton Consultant	acre	8.00	1.0000	8.00	_____
SOIL TEST					
Soil Test	acre	10.00	0.3330	3.33	_____
OPERATOR LABOR					
Tractors	hour	13.51	0.2712	3.66	_____
Self-Propelled	hour	13.51	0.2310	3.13	_____
HAND LABOR					
Implements	hour	9.06	0.0998	0.90	_____
Self-Propelled	hour	9.06	0.2016	1.82	_____
UNALLOCATED LABOR					
	hour	13.51	0.4018	5.43	_____
DIESEL FUEL					
Tractors	gal	1.80	3.1417	5.66	_____
Self-Propelled	gal	1.80	5.0512	9.10	_____
REPAIR & MAINTENANCE					
Implements	acre	4.78	1.0000	4.78	_____
Tractors	acre	1.78	1.0000	1.78	_____
Self-Propelled	acre	21.32	1.0000	21.32	_____
INTEREST ON OP. CAP.	acre	14.10	1.0000	14.10	_____
TOTAL DIRECT EXPENSES				737.16	_____
FIXED EXPENSES					
Implements	acre	6.44	1.0000	6.44	_____
Tractors	acre	11.22	1.0000	11.22	_____
Self-Propelled	acre	85.97	1.0000	85.97	_____
TOTAL FIXED EXPENSES				103.63	_____
TOTAL SPECIFIED EXPENSES				840.79	_____

Note: Cost of production estimates are based on 2017 input prices.
Fertilization decisions should be based on soil tests.
Soil test cost is prorated for a test every 3rd year.
Lime cost prorated for application every 3rd year.

Table 6.B Summary of estimated costs and returns per acre
 Cotton, 12R-38" solid, no-till
 B2XF variety, Delta Area, Mississippi, 2018

ITEM	UNIT	PRICE	QUANTITY	AMOUNT	YOUR FARM
		dollars		dollars	
INCOME					
Cotton Lint	lb	0.66	1200.0000	792.00	_____
Cotton Seed	lb	0.10	1620.0000	162.00	_____

TOTAL INCOME				954.00	_____
DIRECT EXPENSES					
CUSTOM SPRAY	acre	42.50	1.0000	42.50	_____
HARVEST AIDS	acre	15.38	1.0000	15.38	_____
GINNING	acre	132.00	1.0000	132.00	_____
FERTILIZERS	acre	58.19	1.0000	58.19	_____
FUNGICIDES	acre	20.00	1.0000	20.00	_____
HERBICIDES	acre	116.06	1.0000	116.06	_____
INSECTICIDES	acre	92.32	1.0000	92.32	_____
SEED/PLANTS	acre	135.00	1.0000	135.00	_____
GROWTH REGULATORS	acre	2.24	1.0000	2.24	_____
ADJUVANTS	acre	1.32	1.0000	1.32	_____
CUSTOM FERTILIZE	acre	7.50	1.0000	7.50	_____
ERADICATION FEE	acre	1.00	1.0000	1.00	_____
CUSTOM LIME	acre	30.64	1.0000	30.64	_____
CROP CONSULTANT	acre	8.00	1.0000	8.00	_____
SOIL TEST	acre	3.33	1.0000	3.33	_____
HAND LABOR	hour	9.06	0.3014	2.72	_____
OPERATOR LABOR	hour	13.51	0.5023	6.79	_____
UNALLOCATED LABOR	hour	13.51	0.4018	5.43	_____
DIESEL FUEL	gal	1.80	8.1930	14.76	_____
REPAIR & MAINTENANCE	acre	27.88	1.0000	27.88	_____
INTEREST ON OP. CAP.	acre	14.10	1.0000	14.10	_____

TOTAL DIRECT EXPENSES				737.16	_____
RETURNS ABOVE DIRECT EXPENSES				216.84	_____

TOTAL FIXED EXPENSES				103.63	_____

TOTAL SPECIFIED EXPENSES				840.79	_____
RETURNS ABOVE TOTAL SPECIFIED EXPENSES				113.21	_____

Note: Cost of production estimates are based on 2017 input prices.

Fertilization decisions should be based on soil tests.

Soil test cost is prorated for a test every 3rd year.

Lime cost prorated for application every 3rd year.

Table 6.C Estimated resource use for field operations, per acre
 Cotton, 12R-38" solid, no-till
 B2XF variety, Delta Area, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	POWER UNIT SIZE	PERF RATE	TIMES OVER	MTH	INPUT AMOUNT	IMPLEMENT	POWER UNIT	ALLOC LABOR	UNALL LABOR
							-----hours-----			
Soil Test	acre			0.33	Nov	0.3330				
Lime (Spread)	ton			0.33	Nov	0.6660				
Custom Apply Fert	acre			1.00	Nov	1.0000				
Potash (60% K2O)	cwt					1.5000				
App by Air (5 gal)	appl			1.00	Mar	1.0000				
Clarity	pt					0.5000				
Glyphosate 3lbs a.e	oz					32.0000				
Select Max	pt					1.0000				
Surfactant	pt					0.2000				
Row Cond Folding	38'	MFWD 225	0.040	1.00	May		0.04	0.04	0.04	0.03
NT Plant-Folding	12R-38	MFWD 225	0.051	1.00	May		0.05	0.05	0.10	0.04
Cotton Seed B2XF	thous					45.0000				
Cotton Seed Trt.	acre					1.0000				
Sprayer 600-750gal	60' 175hp		0.017	1.00	May			0.01	0.02	0.01
Gramoxone SL 2.0	oz					48.0000				
Cotoran	pt					2.0000				
Surfactant	pt					0.2000				
Cotton Consultant	acre			1.00	May	1.0000				
Eradication	acre					1.0000				
Sprayer 600-825gal	90' 250hp		0.011	1.00	May			0.01	0.01	0.00
Dual Magnum	pt					1.0000				
Liberty 280	oz					29.0000				
Acephate 90%	lb					0.2500				
Sprayer 600-750gal	60' 175hp		0.017	1.00	May			0.01	0.02	0.01
Dual Magnum	pt					1.0000				
Glyphosate 3lbs a.e	oz					32.0000				
Bidrin 8EC	oz					0.2000				
Sprayer 600-825gal	90' 250hp		0.011	1.00	Jun			0.01	0.01	0.00
Centric 40WG	oz					2.0000				
Mepiquat Chloride	oz					16.0000				
Fert Appl (Liquid)	12R-38	MFWD 225	0.051	1.00	Jun		0.05	0.05	0.07	0.04
UAN (32%)	gal					25.4000				
App by Air (3 gal)	appl			1.00	Jun	1.0000				
Diamond .83EC	oz					6.0000				
Imidacloprid 4F	oz					4.0000				
Spray (Direct/Layby)	12R-38	MFWD 225	0.044	1.00	Jun		0.04	0.04	0.06	0.03
Diuron	pt					1.6000				
Liberty 280	oz					29.0000				
App by Air (3 gal)	appl			1.00	Jul	1.0000				
Acephate 90%	lb					0.7500				
Mepiquat Chloride	oz					16.0000				
Bifenthrin	oz					6.4000				
App by Air (3 gal)	appl			0.25	Jul	0.2500				
Lambda	oz					1.0000				
Bidrin 8EC	oz					2.0000				
Incidental Pest				1.00	Jul					
App by Air (3 gal)	appl					1.0000				
IncidentalPestTrt\$30	acre					1.0000				
App by Air (3 gal)	appl			1.00	Aug	1.0000				
Acephate 90%	lb					0.7500				
Bifenthrin	oz					6.4000				
App by Air (3 gal)	appl			1.00	Aug	1.0000				
Centric 40WG	oz					2.5000				
App by Air (5 gal)	appl			1.00	Sep	1.0000				
Thidiazuron 4lb	oz					2.3000				
Ethephon 6E	pt					2.0000				
App by Air (5 gal)	appl			0.50	Sep	0.5000				
Tribufos 6lb	pt					0.5000				
Ethephon 6E	pt					0.3125				
Cotton Picker/Module	6R-38(500)		0.172	1.00	Oct			0.17	0.34	0.13
Gin & Haul	lb			1.00	Oct	1200.0000				
Stalk Shredder-Flail	20'	MFWD 225	0.082	1.00	Oct		0.08	0.08	0.08	0.06
TOTALS							0.50	0.27	0.80	0.40

Note: Cost of production estimates are based on 2017 input prices.
Fertilization decisions should be based on soil tests.
Soil test cost is prorated for a test every 3rd year.
Lime cost prorated for application every 3rd year.

Table 6.D Estimated costs for field operations, per acre
 Cotton, 12R-38" solid, no-till
 B2XF variety, Delta Area, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	-----DIRECT COST-----							FIXED COST	TOTAL COST
		OP INPUT	FUEL	R&M	LABOR	LEASE	INTER	TOTAL		
-----dollars-----										
Soil Test	acre	3.33						0.16	3.49	3.49
Lime (Spread)	ton	30.64						1.46	32.10	32.10
Custom Apply Fert	acre	7.50						0.36	7.86	7.86
Potash (60% K20)	cwt	28.47						1.35	29.82	29.82
App by Air (5 gal)	appl	6.50						0.21	6.71	6.71
Clarity	pt	5.78						0.18	5.96	5.96
Glyphosate 3lbs a.e	oz	4.48						0.14	4.62	4.62
Select Max	pt	12.64						0.40	13.04	13.04
Surfactant	pt	0.66						0.02	0.68	0.68
Row Cond Folding	38'		0.85	0.54	0.99			0.06	2.44	2.82
NT Plant-Folding	12R-38		1.08	1.91	1.73			0.11	4.83	5.15
Cotton Seed B2XF	thous	135.00						3.21	138.21	138.21
Cotton Seed Trt.	acre	20.00						0.48	20.48	20.48
Sprayer 600-750gal	60' 175hp		0.29	0.18	0.51			0.02	1.00	1.20
Gramoxone SL 2.0	oz	7.20						0.17	7.37	7.37
Cotoran	pt	12.84						0.30	13.14	13.14
Surfactant	pt	0.66						0.02	0.68	0.68
Cotton Consultant	acre	8.00						0.19	8.19	8.19
Eradication	acre	1.00						0.02	1.02	1.02
Sprayer 600-825gal	90' 250hp		0.27	0.18	0.34			0.02	0.81	1.15
Dual Magnum	pt	13.80						0.33	14.13	14.13
Liberty 280	oz	17.40						0.41	17.81	17.81
Acephate 90%	lb	1.86						0.04	1.90	1.90
Sprayer 600-750gal	60' 175hp		0.29	0.18	0.51			0.02	1.00	1.20
Dual Magnum	pt	13.80						0.33	14.13	14.13
Glyphosate 3lbs a.e	oz	4.48						0.11	4.59	4.59
Bidrin 8EC	oz	0.23						0.01	0.24	0.24
Sprayer 600-825gal	90' 250hp		0.27	0.18	0.34			0.02	0.81	1.15
Centric 40WG	oz	10.76						0.21	10.97	10.97
Mepiquat Chloride	oz	1.12						0.02	1.14	1.14
Fert Appl (Liquid)	12R-38		1.08	0.99	1.49			0.07	3.63	2.88
UAN (32%)	gal	29.72						0.59	30.31	30.31
App by Air (3 gal)	appl	5.00						0.10	5.10	5.10
Diamond .83EC	oz	8.40						0.17	8.57	8.57
Imidacloprid 4F	oz	3.12						0.06	3.18	3.18
Spray (Direct/Layby)	12R-38		0.93	0.59	1.28			0.06	2.86	2.20
Diuron	pt	6.24						0.12	6.36	6.36
Liberty 280	oz	17.40						0.34	17.74	17.74
App by Air (3 gal)	appl	5.00						0.08	5.08	5.08
Acephate 90%	lb	5.57						0.09	5.66	5.66
Mepiquat Chloride	oz	1.12						0.02	1.14	1.14
Bifenthrin	oz	4.99						0.08	5.07	5.07
App by Air (3 gal)	appl	1.25						0.02	1.27	1.27
Lambda	oz	1.04						0.02	1.06	1.06
Bidrin 8EC	oz	2.34						0.04	2.38	2.38
Incidental Pest										
App by Air (3 gal)	appl	5.00						0.08	5.08	5.08
IncidentalPestTrt\$30	acre	30.00						0.48	30.48	30.48
App by Air (3 gal)	appl	5.00						0.06	5.06	5.06
Acephate 90%	lb	5.57						0.07	5.64	5.64
Bifenthrin	oz	4.99						0.06	5.05	5.05
App by Air (3 gal)	appl	5.00						0.06	5.06	5.06
Centric 40WG	oz	13.45						0.16	13.61	13.61
App by Air (5 gal)	appl	6.50						0.05	6.55	6.55
Thidiazuron 4lb	oz	3.45						0.03	3.48	3.48
Ethephon 6E	pt	5.76						0.05	5.81	5.81
App by Air (5 gal)	appl	3.25						0.03	3.28	3.28
Tribufos 6lb	pt	5.27						0.04	5.31	5.31
Ethephon 6E	pt	0.90						0.01	0.91	0.91
Cotton Picker/Module	6R-38(500)		7.98	20.60	5.75			0.14	34.47	81.27
Gin & Haul	lb	132.00						0.52	132.52	132.52
Stalk Shredder-Flail	20'		1.72	2.53	2.00			0.02	6.27	4.61
TOTALS		665.48	14.76	27.88	14.94	0.00	14.10	737.16	103.63	840.79

Note: Cost of production estimates are based on 2017 input prices.
Fertilization decisions should be based on soil tests.
Soil test cost is prorated for a test every 3rd year.
Lime cost prorated for application every 3rd year.

Table 6.E Estimated monthly income and expense flows per acre
 Cotton, 12R-38" solid, no-till
 B2XF variety, Delta Area, Mississippi, 2018

ITEM	Nov	Dec	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct
-----dollars-----												
TOTAL INCOME	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	954.00
DIRECT EXPENSES												
CUSTOM SPRAY	0.00	0.00	0.00	0.00	6.50	0.00	0.00	5.00	11.25	10.00	9.75	0.00
HARVEST AIDS	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	15.38	0.00
GINNING	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	132.00
FERTILIZERS	28.47	0.00	0.00	0.00	0.00	0.00	0.00	29.72	0.00	0.00	0.00	0.00
FUNGICIDES	0.00	0.00	0.00	0.00	0.00	0.00	20.00	0.00	0.00	0.00	0.00	0.00
HERBICIDES	0.00	0.00	0.00	0.00	22.90	0.00	69.52	23.64	0.00	0.00	0.00	0.00
INSECTICIDES	0.00	0.00	0.00	0.00	0.00	0.00	2.09	22.28	43.94	24.01	0.00	0.00
SEED/PLANTS	0.00	0.00	0.00	0.00	0.00	0.00	135.00	0.00	0.00	0.00	0.00	0.00
GROWTH REGULATORS	0.00	0.00	0.00	0.00	0.00	0.00	0.00	1.12	1.12	0.00	0.00	0.00
ADJUVANTS	0.00	0.00	0.00	0.00	0.66	0.00	0.66	0.00	0.00	0.00	0.00	0.00
CUSTOM FERTILIZE	7.50	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
ERADICATION FEE	0.00	0.00	0.00	0.00	0.00	0.00	1.00	0.00	0.00	0.00	0.00	0.00
CUSTOM LIME	30.64	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
CROP CONSULTANT	0.00	0.00	0.00	0.00	0.00	0.00	8.00	0.00	0.00	0.00	0.00	0.00
SOIL TEST	3.33	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
LABOR	0.00	0.00	0.00	0.00	0.00	0.00	4.08	3.11	0.00	0.00	0.00	7.75
LEASE *	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
FUEL	0.00	0.00	0.00	0.00	0.00	0.00	2.78	2.28	0.00	0.00	0.00	9.70
REPAIR & MAINTENANCE	0.00	0.00	0.00	0.00	0.00	0.00	2.99	1.76	0.00	0.00	0.00	23.13
INTEREST ON OP. CAP.	3.33	0.00	0.00	0.00	0.95	0.00	5.85	1.76	0.91	0.41	0.21	0.68
TOTAL DIRECT EXPENSES	73.27	0.00	0.00	0.00	31.01	0.00	251.97	90.67	57.22	34.42	25.34	173.26
NET INCOME	-73.27	0.00	0.00	0.00	-31.01	0.00	-251.97	-90.67	-57.22	-34.42	-25.34	780.74
NET INCOME TO DATE	-73.27	-73.27	-73.27	-73.27	-104.28	-104.28	-356.25	-446.92	-504.14	-538.56	-563.90	216.84

Note: Cost of production estimates are based on 2017 input prices.

Fertilization decisions should be based on soil tests.

Soil test cost is prorated for a test every 3rd year.

Lime cost prorated for application every 3rd year.

* Lease costs are based on hourly usage costs.

Table 6.F Estimated returns for various price/yield combinations, per acre
 Cotton, 12R-38" solid, no-till
 B2XF variety, Delta Area, Mississippi, 2018

PRODUCT	PERCENT												
	75	80	85	90	95	100	105	110	115	120	125		
	PRODUCT PRICE												
Cotton Lint	0.49	0.52	0.56	0.59	0.62	0.66	0.69	0.72	0.75	0.79	0.82		
PERCENT	YIELD	UNIT	dollars										
50	600.00	lb	-211 -315	-192 -295	-172 -275	-152 -256	-132 -236	-112 -216	-93 -196	-73 -176	-53 -157	-33 -137	-13 -117
60	720.00	lb	-165 -269	-141 -245	-118 -221	-94 -198	-70 -174	-46 -150	-23 -126	0 -103	24 -79	48 -55	71 -31
70	840.00	lb	-119 -223	-91 -195	-64 -167	-36 -140	-8 -112	18 -84	46 -56	74 -29	102 -1	129 26	157 53
80	960.00	lb	-73 -177	-41 -145	-10 -113	21 -82	53 -50	84 -18	116 12	148 44	179 76	211 108	243 139
90	1080.00	lb	-27 -130	8 -95	43 -59	79 -24	115 11	150 47	186 82	222 118	257 154	293 189	329 225
100	1200.00	lb	18 -84	58 -45	98 -5	137 34	177 73	216 113	256 152	296 192	335 232	375 271	414 311
110	1320.00	lb	64 -38	108 4	152 48	195 92	239 135	282 179	326 222	369 266	413 309	457 353	500 396
120	1440.00	lb	111 7	158 55	206 102	253 150	301 197	348 245	396 292	443 340	491 387	538 435	586 482
130	1560.00	lb	157 53	208 105	260 156	311 208	363 259	414 311	466 362	517 414	569 465	620 516	672 568
140	1680.00	lb	203 99	258 155	314 210	369 266	425 321	480 377	536 432	591 487	646 543	702 598	757 654
150	1800.00	lb	249 145	308 205	368 264	427 324	487 383	546 442	605 502	665 561	724 621	784 680	843 739

The top number in each cell is Returns Above Direct Expenses.
 The bottom number in each cell is Returns Above Total Specified Expenses.
 Only the product listed has been varied to calculate net returns.
 Note: Cost of production estimates are based on 2017 input prices.

Table 7.A Estimated costs per acre
 Cotton, 12R-38" 2X1 full-skip (8 rows planted)
 Conservation tillage, B2XF variety, Delta Area, Mississippi, 2018

ITEM	UNIT	PRICE	QUANTITY	AMOUNT	YOUR FARM
		dollars		dollars	
DIRECT EXPENSES					
CUSTOM SPRAY					
App by Air (5 gal)	appl	6.50	2.5000	16.25	_____
App by Air (3 gal)	appl	5.00	5.2500	26.25	_____
HARVEST AIDS					
Thidiazuron 4lb	oz	1.50	2.3000	3.45	_____
Ethephon 6E	pt	2.88	2.3125	6.66	_____
Tribufos 6lb	pt	10.54	0.5000	5.27	_____
GINNING					
Gin & Haul	lb	0.11	811.0000	89.21	_____
FERTILIZERS					
Potash (60% K2O)	cwt	18.98	1.3500	25.62	_____
UAN (32%)	gal	1.17	32.5498	38.08	_____
FUNGICIDES					
Cotton Seed Trt.	acre	20.00	0.6700	13.40	_____
HERBICIDES					
Clarity	pt	11.55	0.5000	5.78	_____
Glyphosate 3lbs a.e	oz	0.14	64.0000	8.96	_____
Select Max	pt	12.64	1.0000	12.64	_____
Gramoxone SL 2.0	oz	0.15	48.0000	7.20	_____
Cotoran	pt	6.42	2.0000	12.84	_____
Dual Magnum	pt	13.80	1.6700	23.05	_____
Liberty 280	oz	0.60	58.0000	34.80	_____
Diuron	pt	3.90	1.1000	4.29	_____
INSECTICIDES					
Acephate 90%	lb	7.43	1.7500	13.00	_____
Bidrin 8EC	oz	1.17	2.2000	2.57	_____
Centric 40WG	oz	5.38	3.8400	20.66	_____
Diamond .83EC	oz	1.40	6.0000	8.40	_____
Imidacloprid 4F	oz	0.78	2.0000	1.56	_____
Bifenthrin	oz	0.78	12.8000	9.98	_____
Lambda	oz	1.04	1.0000	1.04	_____
IncidentalPestTrt\$30	acre	30.00	1.0000	30.00	_____
SEED/PLANTS					
Cotton Seed B2XF	thous	3.00	30.0000	90.00	_____
GROWTH REGULATORS					
Mepiquat Chloride	oz	0.07	26.7200	1.87	_____
ADJUVANTS					
Surfactant	pt	3.28	0.4000	1.31	_____
CUSTOM FERTILIZE					
Custom Apply Fert	acre	7.50	1.0000	7.50	_____
ERADICATION FEE					
Eradication	acre	1.00	1.0000	1.00	_____
CUSTOM LIME					
Lime (Spread)	ton	46.00	0.6660	30.64	_____
CROP CONSULTANT					
Cotton Consultant	acre	8.00	1.0000	8.00	_____
SOIL TEST					
Soil Test	acre	10.00	0.3330	3.33	_____
OPERATOR LABOR					
Tractors	hour	13.51	0.8605	11.63	_____
Self-Propelled	hour	13.51	0.2075	2.81	_____
HAND LABOR					
Implements	hour	9.06	0.3404	3.07	_____
Self-Propelled	hour	9.06	0.1899	1.72	_____
UNALLOCATED LABOR					
	hour	13.50	0.8544	11.54	_____
DIESEL FUEL					
Tractors	gal	1.80	9.9659	17.93	_____
Self-Propelled	gal	1.80	3.4215	6.17	_____
REPAIR & MAINTENANCE					
Implements	acre	10.36	1.0000	10.36	_____
Tractors	acre	5.64	1.0000	5.64	_____
Self-Propelled	acre	9.97	1.0000	9.97	_____
INTEREST ON OP. CAP.	acre	13.03	1.0000	13.03	_____
TOTAL DIRECT EXPENSES				658.49	_____
FIXED EXPENSES					
Implements	acre	16.19	1.0000	16.19	_____
Tractors	acre	35.57	1.0000	35.57	_____
Self-Propelled	acre	40.33	1.0000	40.33	_____
TOTAL FIXED EXPENSES				92.09	_____
TOTAL SPECIFIED EXPENSES				750.58	_____

Note: Cost of production estimates are based on 2017 input prices.

Fertilization decisions should be based on soil tests.

Soil test cost is prorated for a test every 3rd year.

Lime cost prorated for application every 3rd year..

Table 7.B Summary of estimated costs and returns per acre
 Cotton, 12R-38" 2X1 full-skip (8 rows planted)
 Conservation tillage, B2XF variety, Delta Area, Mississippi, 2018

ITEM	UNIT	PRICE	QUANTITY	AMOUNT	YOUR FARM
		dollars		dollars	
INCOME					
Cotton Lint	lb	0.66	811.0000	535.26	_____
Cotton Seed	lb	0.10	1095.0000	109.50	_____

TOTAL INCOME				644.76	_____
DIRECT EXPENSES					
CUSTOM SPRAY	acre	42.50	1.0000	42.50	_____
HARVEST AIDS	acre	15.38	1.0000	15.38	_____
GINNING	acre	89.21	1.0000	89.21	_____
FERTILIZERS	acre	63.70	1.0000	63.70	_____
FUNGICIDES	acre	13.40	1.0000	13.40	_____
HERBICIDES	acre	109.56	1.0000	109.56	_____
INSECTICIDES	acre	87.21	1.0000	87.21	_____
SEED/PLANTS	acre	90.00	1.0000	90.00	_____
GROWTH REGULATORS	acre	1.87	1.0000	1.87	_____
ADJUVANTS	acre	1.32	1.0000	1.32	_____
CUSTOM FERTILIZE	acre	7.50	1.0000	7.50	_____
ERADICATION FEE	acre	1.00	1.0000	1.00	_____
CUSTOM LIME	acre	30.64	1.0000	30.64	_____
CROP CONSULTANT	acre	8.00	1.0000	8.00	_____
SOIL TEST	acre	3.33	1.0000	3.33	_____
HAND LABOR	hour	9.06	0.5303	4.79	_____
OPERATOR LABOR	hour	13.51	1.0680	14.44	_____
UNALLOCATED LABOR	hour	13.50	0.8544	11.54	_____
DIESEL FUEL	gal	1.80	13.3875	24.10	_____
REPAIR & MAINTENANCE	acre	25.97	1.0000	25.97	_____
INTEREST ON OP. CAP.	acre	13.03	1.0000	13.03	_____

TOTAL DIRECT EXPENSES				658.49	_____
RETURNS ABOVE DIRECT EXPENSES				-13.73	_____

TOTAL FIXED EXPENSES				92.09	_____

TOTAL SPECIFIED EXPENSES				750.58	_____
RETURNS ABOVE TOTAL SPECIFIED EXPENSES				-105.82	_____

Note: Cost of production estimates are based on 2017 input prices.

Fertilization decisions should be based on soil tests.

Soil test cost is prorated for a test every 3rd year.

Lime cost prorated for application every 3rd year.

Table 7.C Estimated resource use for field operations, per acre
 Cotton, 12R-38" 2X1 full-skip (8 rows planted)
 Conservation tillage, B2XF variety, Delta Area, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	POWER UNIT SIZE	PERF RATE	TIMES OVER	MTH	INPUT AMOUNT	IMPLEMENT	POWER UNIT	ALLOC LABOR	UNALL LABOR
-----hours-----										
Soil Test	acre			0.33	Nov	0.3330				
Lime (Spread)	ton			0.33	Nov	0.6660				
Custom Apply Fert	acre			1.00	Nov	1.0000				
Potash (60% K2O)	cwt					1.3500				
Bed-Paratill Fold	8R-38 2x1	MFWD 225	0.053	1.00	Nov		0.05	0.05	0.05	0.04
Bed/Disk (Hipper)	8R-38 2x1	MFWD 225	0.049	0.50	Nov		0.02	0.02	0.02	0.01
App by Air (5 gal)	appl			1.00	Mar	1.0000				
Clarity	pt					0.5000				
Glyphosate 3lbs a.e	oz					32.0000				
Select Max	pt					1.0000				
Surfactant	pt					0.2000				
Fert Appl (Liquid)	8R-38 2x1	MFWD 225	0.051	1.00	Apr		0.05	0.05	0.07	0.04
UAN (32%)	gal					16.2749				
Row Cond Folding	38'	MFWD 225	0.040	1.00	May		0.04	0.04	0.04	0.03
Plant - Folding	8R-38 2x1	MFWD 225	0.049	1.00	May		0.04	0.04	0.09	0.03
Cotton Seed B2XF	thous					30.0000				
Cotton Seed Trt.	acre					0.6700				
Sprayer 600-750gal	60' 175hp		0.017	1.00	May			0.01	0.02	0.01
Gramoxone SL 2.0	oz					48.0000				
Cotoran	pt					2.0000				
Surfactant	pt					0.2000				
Cotton Consultant	acre			1.00	May	1.0000				
Eradication	acre					1.0000				
Spray (Direct/Layby)	8R-38 2x1	MFWD 225	0.044	1.00	May		0.04	0.04	0.06	0.03
Dual Magnum	pt					0.6700				
Liberty 280	oz					29.0000				
Acephate 90%	lb					0.2500				
Sprayer 600-750gal	60' 175hp		0.017	1.00	May			0.01	0.02	0.01
Dual Magnum	pt					1.0000				
Glyphosate 3lbs a.e	oz					32.0000				
Bidrin 8EC	oz					0.2000				
Spray (Direct/Layby)	8R-38 2x1	MFWD 225	0.044	1.00	Jun		0.04	0.04	0.06	0.03
Centric 40WG	oz					1.3400				
Mepiquat Chloride	oz					10.7200				
Fert Appl (Liquid)	8R-38 2x1	MFWD 225	0.051	1.00	Jun		0.05	0.05	0.07	0.04
UAN (32%)	gal					16.2749				
App by Air (3 gal)	appl			1.00	Jun	1.0000				
Diamond .83EC	oz					6.0000				
Imidacloprid 4F	oz					2.0000				
Spray (Direct/Layby)	8R-38 2x1	MFWD 225	0.044	1.00	Jul		0.04	0.04	0.06	0.03
Diuron	pt					1.1000				
Liberty 280	oz					29.0000				
App by Air (3 gal)	appl			1.00	Jul	1.0000				
Acephate 90%	lb					0.7500				
Mepiquat Chloride	oz					16.0000				
Bifenthrin	oz					6.4000				
App by Air (3 gal)	appl			0.25	Jul	0.2500				
Lambda	oz					1.0000				
Bidrin 8EC	oz					2.0000				
Incidental Pest				1.00	Jul					
App by Air (3 gal)	appl					1.0000				
IncidentalPestTrt\$30	acre					1.0000				
App by Air (3 gal)	appl			1.00	Aug	1.0000				
Acephate 90%	lb					0.7500				
Bifenthrin	oz					6.4000				
App by Air (3 gal)	appl			1.00	Aug	1.0000				
Centric 40WG	oz					2.5000				
App by Air (5 gal)	appl			1.00	Sep	1.0000				
Thidiazuron 4lb	oz					2.3000				
Ethephon 6E	pt					2.0000				
App by Air (5 gal)	appl			0.50	Sep	0.5000				
Ethephon 6E	pt					0.3125				
Tribufos 6lb	pt					0.5000				
Cotton Picker	4R2x1 (350)		0.172	1.00	Oct			0.17	0.34	0.13
Boll Buggy	4R2x1 (350)	MFWD 225	0.172	1.00	Oct		0.17	0.17	0.17	0.13
Module Builder	4R2x1 (350)	MFWD 225	0.172	1.00	Oct		0.17	0.17	0.34	0.13
Gin & Haul	lb			1.00	Oct	811.0000				
Stalk Shredder-Flail	15'	MFWD 225	0.110	1.00	Oct		0.11	0.11	0.11	0.08
TOTALS							1.06	0.86	1.59	0.85

Note: Cost of production estimates are based on 2017 input prices.

Fertilization decisions should be based on soil tests.

Soil test cost is prorated for a test every 3rd year.

Lime cost prorated for application every 3rd year.

Table 7.D Estimated costs for field operations, per acre
Cotton, 12R-38" 2X1 full-skip (8 rows planted)
Conservation tillage, B2XF variety, Delta Area, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	-----DIRECT COST-----							FIXED COST	TOTAL COST	
		OP INPUT	FUEL	R&M	LABOR	LEASE	INTER	TOTAL			
-----dollars-----											
Soil Test	acre	3.33						0.16	3.49		3.49
Lime (Spread)	ton	30.64						1.46	32.10		32.10
Custom Apply Fert	acre	7.50						0.36	7.86		7.86
Potash (60% K2O)	cwt	25.62						1.22	26.84		26.84
Bed-Paratill Fold	8R-38 2x1		1.12	1.69	1.31			0.20	4.32	4.55	8.87
Bed/Disk (Hipper)	8R-38 2x1		0.51	0.34	0.60			0.07	1.52	1.50	3.02
App by Air (5 gal)	appl	6.50						0.21	6.71		6.71
Clarity	pt	5.78						0.18	5.96		5.96
Glyphosate 3lbs a.e	oz	4.48						0.14	4.62		4.62
Select Max	pt	12.64						0.40	13.04		13.04
Surfactant	pt	0.66						0.02	0.68		0.68
Fert Appl (Liquid)	8R-38 2x1		1.08	1.02	1.49			0.10	3.69	2.91	6.60
UAN (32%)	gal	19.04						0.53	19.57		19.57
Row Cond Folding	38'		0.85	0.54	0.99			0.06	2.44	2.82	5.26
Plant - Folding	8R-38 2x1		1.03	1.71	1.66			0.10	4.50	4.69	9.19
Cotton Seed B2XF	thous	90.00						2.14	92.14		92.14
Cotton Seed Trt.	acre	13.40						0.32	13.72		13.72
Sprayer 600-750gal	60' 175hp		0.29	0.18	0.51			0.02	1.00	1.20	2.20
Gramoxone SL 2.0	oz	7.20						0.17	7.37		7.37
Cotoran	pt	12.84						0.30	13.14		13.14
Surfactant	pt	0.66						0.02	0.68		0.68
Cotton Consultant	acre	8.00						0.19	8.19		8.19
Eradication	acre	1.00						0.02	1.02		1.02
Spray (Direct/Layby)	8R-38 2x1		0.93	0.59	1.28			0.07	2.87	2.20	5.07
Dual Magnum	pt	9.25						0.22	9.47		9.47
Liberty 280	oz	17.40						0.41	17.81		17.81
Acephate 90%	lb	1.86						0.04	1.90		1.90
Sprayer 600-750gal	60' 175hp		0.29	0.18	0.51			0.02	1.00	1.20	2.20
Dual Magnum	pt	13.80						0.33	14.13		14.13
Glyphosate 3lbs a.e	oz	4.48						0.11	4.59		4.59
Bidrin 8EC	oz	0.23						0.01	0.24		0.24
Spray (Direct/Layby)	8R-38 2x1		0.93	0.59	1.28			0.06	2.86	2.20	5.06
Centric 40WG	oz	7.21						0.14	7.35		7.35
Mepiquat Chloride	oz	0.75						0.01	0.76		0.76
Fert Appl (Liquid)	8R-38 2x1		1.08	1.02	1.49			0.07	3.66	2.91	6.57
UAN (32%)	gal	19.04						0.38	19.42		19.42
App by Air (3 gal)	appl	5.00						0.10	5.10		5.10
Diamond .83EC	oz	8.40						0.17	8.57		8.57
Imidacloprid 4F	oz	1.56						0.03	1.59		1.59
Spray (Direct/Layby)	8R-38 2x1		0.93	0.59	1.28			0.04	2.84	2.20	5.04
Diuron	pt	4.29						0.07	4.36		4.36
Liberty 280	oz	17.40						0.28	17.68		17.68
App by Air (3 gal)	appl	5.00						0.08	5.08		5.08
Acephate 90%	lb	5.57						0.09	5.66		5.66
Mepiquat Chloride	oz	1.12						0.02	1.14		1.14
Bifenthrin	oz	4.99						0.08	5.07		5.07
App by Air (3 gal)	appl	1.25						0.02	1.27		1.27
Lambda	oz	1.04						0.02	1.06		1.06
Bidrin 8EC	oz	2.34						0.04	2.38		2.38
Incidental Pest											
App by Air (3 gal)	appl	5.00						0.08	5.08		5.08
IncidentalPestTrt\$30	acre	30.00						0.48	30.48		30.48
App by Air (3 gal)	appl	5.00						0.06	5.06		5.06
Acephate 90%	lb	5.57						0.07	5.64		5.64
Bifenthrin	oz	4.99						0.06	5.05		5.05
App by Air (3 gal)	appl	5.00						0.06	5.06		5.06
Centric 40WG	oz	13.45						0.16	13.61		13.61
App by Air (5 gal)	appl	6.50						0.05	6.55		6.55
Thidiazuron 4lb	oz	3.45						0.03	3.48		3.48
Ethephon 6E	pt	5.76						0.05	5.81		5.81
App by Air (5 gal)	appl	3.25						0.03	3.28		3.28
Ethephon 6E	pt	0.90						0.01	0.91		0.91
Tribufos 6lb	pt	5.27						0.04	5.31		5.31
Cotton Picker	4R2x1 (350)		5.59	9.61	5.75			0.08	21.03	37.93	58.96
Boll Buggy	4R2x1 (350)		3.59	2.44	4.19			0.04	10.26	9.79	20.05
Module Builder	4R2x1 (350)		3.59	2.62	5.75			0.05	12.01	10.16	22.17
Gin & Haul	lb	89.21						0.35	89.56		89.56
Stalk Shredder-Flail	15'		2.29	2.85	2.68			0.03	7.85	5.83	13.68
TOTALS		564.62	24.10	25.97	30.77	0.00	13.03	658.49	92.09	750.58	

Note: Cost of production estimates are based on 2017 input prices.

Fertilization decisions should be based on soil tests.

Soil test cost is prorated for a test every 3rd year.

Lime cost prorated for application every 3rd year.

Table 7.E Estimated monthly income and expense flows per acre
 Cotton, 12R-38" 2X1 full-skip (8 rows planted)
 Conservation tillage, B2XF variety, Delta Area, Mississippi, 2018

ITEM	Nov	Dec	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct
-----dollars-----												
TOTAL INCOME	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	644.76
DIRECT EXPENSES												
CUSTOM SPRAY	0.00	0.00	0.00	0.00	6.50	0.00	0.00	5.00	11.25	10.00	9.75	0.00
HARVEST AIDS	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	15.38	0.00
GINNING	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	89.21
FERTILIZERS	25.62	0.00	0.00	0.00	0.00	19.04	0.00	19.04	0.00	0.00	0.00	0.00
FUNGICIDES	0.00	0.00	0.00	0.00	0.00	0.00	13.40	0.00	0.00	0.00	0.00	0.00
HERBICIDES	0.00	0.00	0.00	0.00	22.90	0.00	64.97	0.00	21.69	0.00	0.00	0.00
INSECTICIDES	0.00	0.00	0.00	0.00	0.00	0.00	2.09	17.17	43.94	24.01	0.00	0.00
SEED/PLANTS	0.00	0.00	0.00	0.00	0.00	0.00	90.00	0.00	0.00	0.00	0.00	0.00
GROWTH REGULATORS	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.75	1.12	0.00	0.00	0.00
ADJUVANTS	0.00	0.00	0.00	0.00	0.66	0.00	0.66	0.00	0.00	0.00	0.00	0.00
CUSTOM FERTILIZE	7.50	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
ERADICATION FEE	0.00	0.00	0.00	0.00	0.00	0.00	1.00	0.00	0.00	0.00	0.00	0.00
CUSTOM LIME	30.64	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
CROP CONSULTANT	0.00	0.00	0.00	0.00	0.00	0.00	8.00	0.00	0.00	0.00	0.00	0.00
SOIL TEST	3.33	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
LABOR	1.91	0.00	0.00	0.00	0.00	1.49	4.95	2.77	1.28	0.00	0.00	18.37
LEASE *	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
FUEL	1.63	0.00	0.00	0.00	0.00	1.08	3.39	2.01	0.93	0.00	0.00	15.06
REPAIR & MAINTENANCE	2.03	0.00	0.00	0.00	0.00	1.02	3.20	1.61	0.59	0.00	0.00	17.52
INTEREST ON OP. CAP.	3.47	0.00	0.00	0.00	0.95	0.63	4.55	0.96	1.30	0.41	0.21	0.55
TOTAL DIRECT EXPENSES	76.13	0.00	0.00	0.00	31.01	23.26	196.21	49.31	82.10	34.42	25.34	140.71
NET INCOME	-76.13	0.00	0.00	0.00	-31.01	-23.26	-196.21	-49.31	-82.10	-34.42	-25.34	504.05
NET INCOME TO DATE	-76.13	-76.13	-76.13	-76.13	-107.14	-130.40	-326.61	-375.92	-458.02	-492.44	-517.78	-13.73

Note: Cost of production estimates are based on 2017 input prices.

Fertilization decisions should be based on soil tests.

Soil test cost is prorated for a test every 3rd year.

Lime cost prorated for application every 3rd year.

* Lease costs are based on hourly usage costs.

Table 7.F Estimated returns for various price/yield combinations, per acre
 Cotton, 12R-38" 2X1 full-skip (8 rows planted)
 Conservation tillage, B2XF variety, Delta Area, Mississippi, 2018

PRODUCT	PERCENT													
	75	80	85	90	95	100	105	110	115	120	125			
	PRODUCT PRICE													
Cotton Lint	0.49	0.52	0.56	0.59	0.62	0.66	0.69	0.72	0.75	0.79	0.82			
PERCENT	YIELD	UNIT	dollars											
50	405.50	lb	-303 -395	-290 -382	-276 -368	-263 -355	-249 -342	-236 -328	-223 -315	-209 -301	-196 -288	-183 -275	-169 -261	
60	486.60	lb	-272 -364	-256 -348	-240 -332	-224 -316	-208 -300	-192 -284	-175 -268	-159 -251	-143 -235	-127 -219	-111 -203	
70	567.70	lb	-241 -333	-222 -314	-203 -295	-184 -276	-166 -258	-147 -239	-128 -220	-109 -202	-91 -183	-72 -164	-53 -145	
80	648.80	lb	-209 -302	-188 -280	-167 -259	-145 -237	-124 -216	-102 -194	-81 -173	-60 -152	-38 -130	-17 -109	4 -87	
90	729.90	lb	-178 -270	-154 -246	-130 -222	-106 -198	-82 -174	-58 -150	-34 -126	-10 -102	13 -78	38 -54	62 -29	
100	811.00	lb	-147 -239	-120 -212	-94 -186	-67 -159	-40 -132	-13 -105	13 -79	39 -52	66 -25	93 1	120 27	
110	892.10	lb	-116 -208	-86 -179	-57 -149	-28 -120	1 -90	30 -61	60 -31	89 -2	119 27	148 56	178 85	
120	973.20	lb	-85 -177	-53 -145	-20 -113	11 -80	43 -48	75 -16	107 15	139 47	171 79	203 111	235 143	
130	1054.30	lb	-53 -146	-19 -111	15 -76	50 -41	85 -6	119 27	154 62	189 97	224 132	259 167	293 201	
140	1135.40	lb	-22 -114	14 -77	52 -39	89 -2	127 34	164 72	202 109	239 147	276 184	314 222	351 259	
150	1216.50	lb	8 -83	48 -43	88 -3	128 36	168 76	209 117	249 157	289 197	329 237	369 277	409 317	

The top number in each cell is Returns Above Direct Expenses.
 The bottom number in each cell is Returns Above Total Specified Expenses.
 Only the product listed has been varied to calculate net returns.
 Note: Cost of production estimates are based on 2017 input prices.

Table 8.A Estimated costs per acre
Soybeans, full-season, RR, stale seedbed, 12R 30"
Non-irrigated, Delta Area, Mississippi, 2018

ITEM	UNIT	PRICE	QUANTITY	AMOUNT	YOUR FARM
		dollars		dollars	
DIRECT EXPENSES					
CUSTOM SPRAY					
App by Air (5 gal)	appl	6.50	3.0000	19.50	_____
HARVEST AIDS					
Gramoxone SL	oz	0.15	16.0000	2.40	_____
Sodium Chlorate 5L	gal	5.39	0.6000	3.23	_____
FERTILIZERS					
Phosphorus (46% P2O5)	cwt	18.75	0.8700	16.31	_____
Potash (60% K2O)	cwt	18.98	1.3300	25.24	_____
FUNGICIDES					
CruiserMaxx	oz	4.25	1.6000	6.80	_____
HERBICIDES					
Glyphosate 3lbs a.e	oz	0.14	96.0000	13.44	_____
2,4-D Amine 4	pt	2.40	2.0000	4.80	_____
Select Max	pt	12.64	1.0000	12.64	_____
Valor SX	oz	4.57	2.0000	9.14	_____
Boundary	pt	11.20	2.0000	22.40	_____
Gramoxone SL 2.0	oz	0.15	48.0000	7.20	_____
Prefix	pt	6.53	2.0000	13.06	_____
Zidua	oz	9.05	1.5000	13.58	_____
INSECTICIDES					
Acephate 90SP	lb	7.43	0.7500	5.57	_____
SEED/PLANTS					
Soybean Seed RR2	lb	1.51	50.0000	75.50	_____
ADJUVANTS					
Surfactant	pt	3.28	1.0000	3.28	_____
CUSTOM FERTILIZE					
Custom Apply Fert	acre	7.50	1.0000	7.50	_____
HAULING					
Haul Soybeans	bu	0.27	42.0000	11.34	_____
CUSTOM LIME					
Lime (Spread)	ton	46.00	0.3330	15.32	_____
CROP CONSULTANT					
Soybeans Consultant	acre	6.50	1.0000	6.50	_____
INOCULANT					
Optimize	oz	2.14	1.4000	3.00	_____
SOIL TEST					
Soil Test	acre	10.00	0.3330	3.33	_____
OPERATOR LABOR					
Tractors	hour	13.51	0.3302	4.46	_____
Harvesters	hour	13.51	0.1021	1.38	_____
HAND LABOR					
Implements	hour	9.06	0.0959	0.87	_____
UNALLOCATED LABOR	hour	13.51	0.3892	5.26	_____
DIESEL FUEL					
Tractors	gal	1.80	3.8252	6.89	_____
Harvesters	gal	1.80	1.3935	2.51	_____
REPAIR & MAINTENANCE					
Implements	acre	4.81	1.0000	4.81	_____
Tractors	acre	2.18	1.0000	2.18	_____
Harvesters	acre	3.49	1.0000	3.49	_____
INTEREST ON OP. CAP.	acre	9.09	1.0000	9.09	_____
TOTAL DIRECT EXPENSES				342.02	_____
FIXED EXPENSES					
Implements	acre	9.73	1.0000	9.73	_____
Tractors	acre	13.66	1.0000	13.66	_____
Harvesters	acre	13.77	1.0000	13.77	_____
TOTAL FIXED EXPENSES				37.16	_____
TOTAL SPECIFIED EXPENSES				379.18	_____

Note: Cost of production estimates are based on 2017 input prices. These fertilizer rates are based on the assumption that 30-40% of the soybean fields would be mixed to light textured fields and not heavy clay exclusively. Also, rates are based on maintenance levels associated with the expected yield in the budget. **Fertilization decisions should be based on soil tests. Soil test cost is prorated for a test every 3rd year. Lime cost prorated for application every 3rd year.** The budget does not include a second fungicide application to control Asian soybean rust, but the cost of treatment could range from \$10 to \$18 plus application cost per acre.

Table 8.B Summary of estimated costs and returns per acre
Soybeans, full-season, RR, stale seedbed, 12R 30"
Non-irrigated, Delta Area, Mississippi, 2018

ITEM	UNIT	PRICE	QUANTITY	AMOUNT	YOUR FARM
		dollars		dollars	
INCOME					
Soybeans	bu	9.90	42.0000	415.80	_____

TOTAL INCOME				415.80	_____
DIRECT EXPENSES					
CUSTOM SPRAY	acre	19.50	1.0000	19.50	_____
HARVEST AIDS	acre	5.63	1.0000	5.63	_____
FERTILIZERS	acre	41.55	1.0000	41.55	_____
FUNGICIDES	acre	6.80	1.0000	6.80	_____
HERBICIDES	acre	96.26	1.0000	96.26	_____
INSECTICIDES	acre	5.57	1.0000	5.57	_____
SEED/PLANTS	acre	75.50	1.0000	75.50	_____
ADJUVANTS	acre	3.28	1.0000	3.28	_____
CUSTOM FERTILIZE	acre	7.50	1.0000	7.50	_____
HAULING	acre	11.34	1.0000	11.34	_____
CUSTOM LIME	acre	15.32	1.0000	15.32	_____
CROP CONSULTANT	acre	6.50	1.0000	6.50	_____
INOCULANT	acre	3.00	1.0000	3.00	_____
SOIL TEST	acre	3.33	1.0000	3.33	_____
HAND LABOR	hour	9.06	0.0959	0.87	_____
OPERATOR LABOR	hour	13.51	0.4324	5.84	_____
UNALLOCATED LABOR	hour	13.51	0.3892	5.26	_____
DIESEL FUEL	gal	1.80	5.2188	9.40	_____
REPAIR & MAINTENANCE	acre	10.48	1.0000	10.48	_____
INTEREST ON OP. CAP.	acre	9.09	1.0000	9.09	_____

TOTAL DIRECT EXPENSES				342.02	_____
RETURNS ABOVE DIRECT EXPENSES				73.78	_____
TOTAL FIXED EXPENSES				37.16	_____

TOTAL SPECIFIED EXPENSES				379.18	_____
RETURNS ABOVE TOTAL SPECIFIED EXPENSES				36.62	_____

Note: Cost of production estimates are based on 2017 input prices. These fertilizer rates are based on the assumption that 30-40% of the soybean fields would be mixed to light textured fields and not heavy clay exclusively. Also, rates are based on maintenance levels associated with the expected yield in the budget. **Fertilization decisions should be based on soil tests. Soil test cost is prorated for a test every 3rd year. Lime cost prorated for application every 3rd year.** The budget does not include a second fungicide application to control Asian soybean rust, but the cost of treatment could range from \$10 to \$18 plus application cost per acre.

Table 8.C Estimated resource use for field operations, per acre
Soybeans, full-season, RR, stale seedbed, 12R 30"
Non-irrigated, Delta Area, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	POWER UNIT SIZE	PERF RATE	TIMES OVER	MTH	INPUT AMOUNT	IMPLEMENT	POWER UNIT	ALLOC LABOR	UNALL LABOR
						-----hours-----				
Soil Test	acre			0.33	Oct	0.3330				
Subsoiler	3 shank	MFWD 225	0.204	0.20	Oct		0.04	0.04	0.04	0.03
Lime (Spread)	ton			0.33	Oct	0.3330				
Custom Apply Fert	acre			1.00	Oct	1.0000				
Phosphorus (46% P2O5)	cwt					0.8700				
Potash (60% K2O)	cwt					1.3300				
Disk Harrow	24'	MFWD 225	0.081	1.00	Oct		0.08	0.08	0.08	0.07
Field Cultivate Fld	24'	MFWD 225	0.062	1.00	Oct		0.06	0.06	0.06	0.05
App by Air (5 gal)	appl			1.00	Feb	1.0000				
Glyphosate 3lbs a.e	oz					32.0000				
2,4-D Amine 4	pt					2.0000				
Select Max	pt					1.0000				
Valor SX	oz					2.0000				
Surfactant	pt					0.4000				
Plant & Pre-Folding	12R-30	MFWD 225	0.067	1.00	Apr		0.06	0.06	0.13	0.06
Soybean Seed RR2	lb					50.0000				
CruiserMaxx	oz					1.6000				
Optimize	oz					1.4000				
Boundary	pt					2.0000				
Gramoxone SL 2.0	oz					48.0000				
Surfactant	pt					0.4000				
Soybeans Consultant	acre			1.00	May	1.0000				
Spray (Broadcast)	60'	MFWD 225	0.028	1.00	May		0.02	0.02	0.04	0.02
Glyphosate 3lbs a.e	oz					32.0000				
Prefix	pt					2.0000				
Spray (Broadcast)	60'	MFWD 225	0.028	1.00	May		0.02	0.02	0.04	0.02
Glyphosate 3lbs a.e	oz					32.0000				
Zidua	oz					1.5000				
App by Air (5 gal)	appl			1.00	Aug	1.0000				
Acephate 90SP	lb					0.7500				
App by Air (5 gal)	appl			1.00	Aug	1.0000				
Gramoxone SL	oz					16.0000				
Sodium Chlorate 5L	gal					0.6000				
Surfactant	pt					0.2000				
Header -Soybean	25' Flex	265 hp	0.102	1.00	Sep		0.10	0.10	0.10	0.09
Haul Soybeans	bu					42.0000				
Grain Cart Soybean	700 bu	MFWD 225	0.021	1.00	Sep		0.02	0.02	0.02	0.01
TOTALS							0.43	0.43	0.52	0.38

Note: Cost of production estimates are based on 2017 input prices.

These fertilizer rates are based on the assumption that 30-40% of the soybean fields would be mixed to light textured fields and not heavy clay exclusively. Also, rates are based on maintenance levels associated with the expected yield in the budget. **Fertilization decisions should be based on soil tests. Soil test cost is prorated for a test every 3rd year. Lime cost prorated for application every 3rd year.** The budget does not include a second fungicide application to control Asian soybean rust, but the cost of treatment could range from \$10 to \$18 plus application cost per acre.

Table 8.D Estimated costs for field operations, per acre
Soybeans, full-season, RR, stale seedbed, 12R 30"
Non-irrigated, Delta Area, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	-----DIRECT COST-----							FIXED COST	TOTAL COST	
		OP INPUT	FUEL	R&M	LABOR	LEASE	INTER	TOTAL			
-----dollars-----											
Soil Test	acre	3.33						0.16	3.49		3.49
Subsoiler	3 shank		0.85	0.33	1.05			0.11	2.34	1.84	4.18
Lime (Spread)	ton	15.32						0.73	16.05		16.05
Custom Apply Fert	acre	7.50						0.36	7.86		7.86
Phosphorus (46% P2O5)	cwt	16.31						0.77	17.08		17.08
Potash (60% K2O)	cwt	25.24						1.20	26.44		26.44
Disk Harrow	24'		1.71	1.48	2.11			0.25	5.55	5.37	10.92
Field Cultivate Fld	24'		1.30	0.86	1.60			0.18	3.94	4.48	8.42
App by Air (5 gal)	appl	6.50						0.21	6.71		6.71
Glyphosate 3lbs a.e	oz	4.48						0.14	4.62		4.62
2,4-D Amine 4	pt	4.80						0.15	4.95		4.95
Select Max	pt	12.64						0.40	13.04		13.04
Valor SX	oz	9.14						0.29	9.43		9.43
Surfactant	pt	1.31						0.04	1.35		1.35
Plant & Pre-Folding	12R-30		1.41	2.23	2.34			0.14	6.12	6.22	12.34
Soybean Seed RR2	lb	75.50						1.79	77.29		77.29
CruiserMaxx	oz	6.80						0.16	6.96		6.96
Optimize	oz	3.00						0.07	3.07		3.07
Boundary	pt	22.40						0.53	22.93		22.93
Gramoxone SL 2.0	oz	7.20						0.17	7.37		7.37
Surfactant	pt	1.31						0.03	1.34		1.34
Soybeans Consultant	acre	6.50						0.13	6.63		6.63
Spray (Broadcast)	60'		0.59	0.43	0.85			0.04	1.91	1.45	3.36
Glyphosate 3lbs a.e	oz	4.48						0.09	4.57		4.57
Prefix	pt	13.06						0.26	13.32		13.32
Spray (Broadcast)	60'		0.59	0.43	0.85			0.04	1.91	1.45	3.36
Glyphosate 3lbs a.e	oz	4.48						0.09	4.57		4.57
Zidua	oz	13.58						0.27	13.85		13.85
App by Air (5 gal)	appl	6.50						0.05	6.55		6.55
Acephate 90SP	lb	5.57						0.04	5.61		5.61
App by Air (5 gal)	appl	6.50						0.05	6.55		6.55
Gramoxone SL	oz	2.40						0.02	2.42		2.42
Sodium Chlorate 5L	gal	3.23						0.03	3.26		3.26
Surfactant	pt	0.66						0.01	0.67		0.67
Header -Soybean	25' Flex		2.51	4.37	2.62			0.04	9.54	15.10	24.64
Haul Soybeans	bu	11.34						0.04	11.38		11.38
Grain Cart Soybean	700 bu		0.44	0.35	0.55			0.01	1.35	1.25	2.60
TOTALS		301.08	9.40	10.48	11.97	0.00	9.09	342.02	37.16	379.18	

Note: Cost of production estimates are based on 2017 input prices.

These fertilizer rates are based on the assumption that 30-40% of the soybean fields would be mixed to light textured fields and not heavy clay exclusively. Also, rates are based on maintenance levels associated with the expected yield in the budget. **Fertilization decisions should be based on soil tests. Soil test cost is prorated for a test every 3rd year. Lime cost prorated for application every 3rd year.** The budget does not include a second fungicide application to control Asian soybean rust, but the cost of treatment could range from \$10 to \$18 plus application cost per acre.

Table 8.E Estimated monthly income and expense flows per acre
Soybeans, full-season, RR, stale seedbed, 12R 30"
Non-irrigated, Delta Area, Mississippi, 2018

ITEM	Oct	Nov	Dec	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep
-----dollars-----												
TOTAL INCOME	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	415.80
DIRECT EXPENSES												
CUSTOM SPRAY	0.00	0.00	0.00	0.00	6.50	0.00	0.00	0.00	0.00	0.00	13.00	0.00
HARVEST AIDS	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	5.63	0.00
FERTILIZERS	41.55	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
FUNGICIDES	0.00	0.00	0.00	0.00	0.00	0.00	6.80	0.00	0.00	0.00	0.00	0.00
HERBICIDES	0.00	0.00	0.00	0.00	31.06	0.00	29.60	35.60	0.00	0.00	0.00	0.00
INSECTICIDES	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	5.57	0.00
SEED/PLANTS	0.00	0.00	0.00	0.00	0.00	0.00	75.50	0.00	0.00	0.00	0.00	0.00
ADJUVANTS	0.00	0.00	0.00	0.00	1.31	0.00	1.31	0.00	0.00	0.00	0.66	0.00
CUSTOM FERTILIZE	7.50	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
HAULING	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	11.34
CUSTOM LIME	15.32	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
CROP CONSULTANT	0.00	0.00	0.00	0.00	0.00	0.00	0.00	6.50	0.00	0.00	0.00	0.00
INOCULANT	0.00	0.00	0.00	0.00	0.00	0.00	3.00	0.00	0.00	0.00	0.00	0.00
SOIL TEST	3.33	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
LABOR	4.76	0.00	0.00	0.00	0.00	0.00	2.34	1.70	0.00	0.00	0.00	3.17
LEASE *	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
FUEL	3.86	0.00	0.00	0.00	0.00	0.00	1.41	1.18	0.00	0.00	0.00	2.95
REPAIR & MAINTENANCE	2.67	0.00	0.00	0.00	0.00	0.00	2.23	0.86	0.00	0.00	0.00	4.72
INTEREST ON OP. CAP.	3.76	0.00	0.00	0.00	1.23	0.00	2.89	0.92	0.00	0.00	0.20	0.09
TOTAL DIRECT EXPENSES	82.75	0.00	0.00	0.00	40.10	0.00	125.08	46.76	0.00	0.00	25.06	22.27
NET INCOME	-82.75	0.00	0.00	0.00	-40.10	0.00	-125.08	-46.76	0.00	0.00	-25.06	393.53
NET INCOME TO DATE	-82.75	-82.75	-82.75	-82.75	-122.85	-122.85	-247.93	-294.69	-294.69	-294.69	-319.75	73.78

Note: Cost of production estimates are based on 2017 input prices.

These fertilizer rates are based on the assumption that 30-40% of the soybean fields would be mixed to light textured fields and not heavy clay exclusively. Also, rates are based on maintenance levels associated with the expected yield in the budget. **Fertilization decisions should be based on soil tests. Soil test cost is prorated for a test every 3rd year. Lime cost prorated for application every 3rd year.** The budget does not include a second fungicide application to control Asian soybean rust, but the cost of treatment could range from \$10 to \$18 plus application cost per acre

* Lease costs are based on hourly usage costs.

Table 8.F Estimated returns for various price/yield combinations, per acre
 Soybeans, full-season, RR, stale seedbed, 12R 30"
 Non-irrigated, Delta Area, Mississippi, 2018

			PERCENT										
PRODUCT			75	80	85	90	95	100	105	110	115	120	125
Soybeans			7.42	7.92	8.41	8.91	9.40	9.90	10.39	10.89	11.38	11.88	12.37
PERCENT	YIELD	UNIT	dollars										
50	21.00	bu	-180 -217	-170 -207	-159 -196	-149 -186	-138 -175	-128 -165	-118 -155	-107 -144	-97 -134	-86 -124	-76 -113
60	25.20	bu	-150 -187	-137 -175	-125 -162	-112 -150	-100 -137	-87 -125	-75 -112	-63 -100	-50 -87	-38 -75	-25 -62
70	29.40	bu	-120 -157	-105 -142	-91 -128	-76 -113	-62 -99	-47 -84	-32 -70	-18 -55	-3 -41	10 -26	25 -11
80	33.60	bu	-90 -127	-73 -110	-57 -94	-40 -77	-23 -60	-7 -44	9 -27	26 -11	42 5	59 22	76 38
90	37.80	bu	-60 -97	-41 -78	-22 -59	-4 -41	14 -22	33 -3	52 14	70 33	89 52	108 71	126 89
100	42.00	bu	-30 -67	-9 -46	11 -25	32 -4	52 15	73 36	94 57	115 78	136 98	156 119	177 140
110	46.20	bu	-0 -37	22 -14	45 8	68 31	91 54	114 77	137 99	159 122	182 145	205 168	228 191
120	50.40	bu	29 -7	54 17	79 42	104 67	129 92	154 117	179 142	204 167	229 192	254 217	279 242
130	54.60	bu	59 22	86 49	114 76	141 103	168 130	195 157	222 184	249 212	276 239	303 266	330 293
140	58.80	bu	90 52	119 81	148 111	177 140	206 169	235 198	264 227	293 256	322 285	351 314	381 343
150	63.00	bu	120 82	151 114	182 145	213 176	244 207	275 238	307 270	338 301	369 332	400 363	431 394

The top number in each cell is Returns Above Direct Expenses.
 The bottom number in each cell is Returns Above Total Specified Expenses.
 Only the product listed has been varied to calculate net returns.
 Note: Cost of production estimates are based on 2017 input prices.

Table 9.A Estimated costs per acre
Soybeans, full-season, RR, stale seedbed, 12R 30"
Furrow irrigated, 9 ac-in., Delta Area, Mississippi, 2018

ITEM	UNIT	PRICE	QUANTITY	AMOUNT	YOUR FARM
		dollars		dollars	
DIRECT EXPENSES					
CUSTOM SPRAY					
App by Air (5 gal)	appl	6.50	4.0000	26.00	_____
HARVEST AIDS					
Gramoxone SL	oz	0.15	16.0000	2.40	_____
Sodium Chlorate 5L	gal	5.39	0.6000	3.23	_____
FERTILIZERS					
Phosphorus (46% P2O5)	cwt	18.75	0.8700	16.31	_____
Potash (60% K2O)	cwt	18.98	1.3300	25.24	_____
FUNGICIDES					
CruiserMaxx	oz	4.25	1.6000	6.80	_____
Quadris Top SBX	oz	2.75	7.0000	19.25	_____
HERBICIDES					
Glyphosate 3lbs a.e	oz	0.14	96.0000	13.44	_____
2,4-D Amine 4	pt	2.40	2.0000	4.80	_____
Select Max	pt	12.64	1.0000	12.64	_____
Valor SX	oz	4.57	2.0000	9.14	_____
Boundary	pt	11.20	2.0000	22.40	_____
Gramoxone SL 2.0	oz	0.15	48.0000	7.20	_____
Prefix	pt	6.53	2.0000	13.06	_____
Zidua	oz	9.05	1.5000	13.58	_____
INSECTICIDES					
Acephate 90SP	lb	7.43	0.7500	5.57	_____
IRRIGATION SUPPLIES					
Roll-Out Pipe	ft	0.25	33.0000	8.25	_____
SEED/PLANTS					
Soybean Seed RR2	lb	1.51	50.0000	75.50	_____
ADJUVANTS					
Surfactant	pt	3.28	1.1000	3.61	_____
CUSTOM FERTILIZE					
Custom Apply Fert	acre	7.50	1.0000	7.50	_____
HAULING					
Haul Soybeans	bu	0.27	60.0000	16.20	_____
CUSTOM LIME					
Lime (Spread)	ton	46.00	0.3330	15.32	_____
CROP CONSULTANT					
Soybeans Consultant	acre	6.50	1.0000	6.50	_____
INOCULANT					
Optimize	oz	2.14	1.4000	3.00	_____
SOIL TEST					
Soil Test	acre	10.00	0.3330	3.33	_____
OPERATOR LABOR					
Tractors	hour	13.51	0.4713	6.36	_____
Harvesters	hour	13.51	0.1021	1.38	_____
IRRIGATE LABOR					
Special Labor	hour	9.06	0.3000	2.73	_____
Implements	hour	9.06	0.0625	0.57	_____
HAND LABOR					
Implements	hour	9.06	0.0959	0.87	_____
UNALLOCATED LABOR					
	hour	13.51	0.4454	6.02	_____
DIESEL FUEL					
Tractors	gal	1.80	5.2753	9.51	_____
Harvesters	gal	1.80	1.3935	2.51	_____
Roll-Out Pipe Irr.	gal	1.80	7.3316	13.20	_____
REPAIR & MAINTENANCE					
Implements	acre	5.47	1.0000	5.47	_____
Tractors	acre	2.98	1.0000	2.98	_____
Harvesters	acre	3.49	1.0000	3.49	_____
Roll-Out Pipe Irr.	acre	6.89	1.0000	6.89	_____
INTEREST ON OP. CAP.	acre	10.15	1.0000	10.15	_____
TOTAL DIRECT EXPENSES				412.40	_____
FIXED EXPENSES					
Implements	acre	11.96	1.0000	11.96	_____
Tractors	acre	18.75	1.0000	18.75	_____
Harvesters	acre	13.77	1.0000	13.77	_____
Roll-Out Pipe Irr.	acre	53.42	1.0000	53.42	_____
TOTAL FIXED EXPENSES				97.90	_____
TOTAL SPECIFIED EXPENSES				510.30	_____

Note: Cost of production estimates are based on 2017 input prices. These fertilizer rates are based on the assumption that 30-40% of the soybean fields would be mixed to light textured fields and not heavy clay exclusively. Also, rates are based on maintenance levels associated with the expected yield in the budget. **Fertilization decisions should be based on soil tests. Soil test cost is prorated for a test every 3rd year. Lime cost prorated for application every 3rd year.** The budget does not include a second fungicide application to control Asian soybean rust, but the cost of treatment could range from \$10 to \$18 plus application cost per acre.

Table 9.B Summary of estimated costs and returns per acre
 Soybeans, full-season, RR, stale seedbed, 12R 30"
 Furrow irrigated, 9 ac-in., Delta Area, Mississippi, 2018

ITEM	UNIT	PRICE	QUANTITY	AMOUNT	YOUR FARM
		dollars		dollars	
INCOME					
Soybeans	bu	9.90	60.0000	594.00	_____

TOTAL INCOME				594.00	_____
DIRECT EXPENSES					
CUSTOM SPRAY	acre	26.00	1.0000	26.00	_____
HARVEST AIDS	acre	5.63	1.0000	5.63	_____
FERTILIZERS	acre	41.55	1.0000	41.55	_____
FUNGICIDES	acre	26.05	1.0000	26.05	_____
HERBICIDES	acre	96.26	1.0000	96.26	_____
INSECTICIDES	acre	5.57	1.0000	5.57	_____
IRRIGATION SUPPLIES	acre	8.25	1.0000	8.25	_____
SEED/PLANTS	acre	75.50	1.0000	75.50	_____
ADJUVANTS	acre	3.61	1.0000	3.61	_____
CUSTOM FERTILIZE	acre	7.50	1.0000	7.50	_____
HAULING	acre	16.20	1.0000	16.20	_____
CUSTOM LIME	acre	15.32	1.0000	15.32	_____
CROP CONSULTANT	acre	6.50	1.0000	6.50	_____
INOCULANT	acre	3.00	1.0000	3.00	_____
SOIL TEST	acre	3.33	1.0000	3.33	_____
HAND LABOR	hour	9.06	0.0959	0.87	_____
IRRIGATE LABOR	hour	9.06	0.3625	3.30	_____
OPERATOR LABOR	hour	13.51	0.5735	7.74	_____
UNALLOCATED LABOR	hour	13.51	0.4454	6.02	_____
DIESEL FUEL	gal	1.80	14.0006	25.22	_____
REPAIR & MAINTENANCE	acre	18.83	1.0000	18.83	_____
INTEREST ON OP. CAP.	acre	10.15	1.0000	10.15	_____

TOTAL DIRECT EXPENSES				412.40	_____
RETURNS ABOVE DIRECT EXPENSES				181.60	_____
TOTAL FIXED EXPENSES				97.90	_____

TOTAL SPECIFIED EXPENSES				510.30	_____
RETURNS ABOVE TOTAL SPECIFIED EXPENSES				83.70	_____

Note: Cost of production estimates are based on 2017 input prices.
 These fertilizer rates are based on the assumption that 30-40% of the soybean fields would be mixed to light textured fields and not heavy clay exclusively. Also, rates are based on maintenance levels associated with the expected yield in the budget. **Fertilization decisions should be based on soil tests. Soil test cost is prorated for a test every 3rd year. Lime cost prorated for application every 3rd year.** The budget does not include a second fungicide application to control Asian soybean rust, but the cost of treatment could range from \$10 to \$18 plus application cost per acre.

Table 9.C Estimated resource use for field operations, per acre
 Soybeans, full-season, RR, stale seedbed, 12R 30"
 Furrow irrigated, 9 ac-in., Delta Area, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	POWER UNIT SIZE	PERF RATE	TIMES OVER	MTH	INPUT AMOUNT	IMPLEMENT	POWER UNIT	ALLOC LABOR	UNALL LABOR
							-----hours-----			
Soil Test	acre			0.33	Oct	0.3330				
Subsoiler	3 shank	MFWD 225	0.204	0.20	Oct		0.04	0.04	0.04	0.03
Lime (Spread)	ton			0.33	Oct	0.3330				
Custom Apply Fert	acre			1.00	Oct	1.0000				
Phosphorus (46% P2O5)	cwt					0.8700				
Potash (60% K2O)	cwt					1.3300				
Disk Harrow	24'	MFWD 225	0.081	1.00	Oct		0.08	0.08	0.08	0.07
Field Cultivate Fld	24'	MFWD 225	0.062	1.00	Oct		0.06	0.06	0.06	0.05
Bed/Lister-Roll-Fold	12R-30	MFWD 225	0.062	1.00	Oct		0.06	0.06	0.06	0.05
App by Air (5 gal)	appl			1.00	Feb	1.0000				
Glyphosate 3lbs a.e	oz					32.0000				
2,4-D Amine 4	pt					2.0000				
Select Max	pt					1.0000				
Valor SX	oz					2.0000				
Surfactant	pt					0.4000				
Plant & Pre-Folding	12R-30	MFWD 225	0.067	1.00	Apr		0.06	0.06	0.13	0.06
Soybean Seed RR2	lb					50.0000				
CruiserMaxx	oz					1.6000				
Optimize	oz					1.4000				
Boundary	pt					2.0000				
Gramoxone SL 2.0	oz					48.0000				
Surfactant	pt					0.4000				
Soybeans Consultant	acre			1.00	May	1.0000				
Spray (Broadcast)	60'	MFWD 225	0.028	1.00	May		0.02	0.02	0.04	0.02
Glyphosate 3lbs a.e	oz					32.0000				
Prefix	pt					2.0000				
Spray (Broadcast)	60'	MFWD 225	0.028	1.00	May		0.02	0.02	0.04	0.02
Glyphosate 3lbs a.e	oz					32.0000				
Zidua	oz					1.5000				
App by Air (5 gal)	appl			1.00	Jul	1.0000				
Quadris Top SBX	oz					7.0000				
Surfactant	pt					0.1000				
App by Air (5 gal)	appl			1.00	Aug	1.0000				
Acephate 90SP	lb					0.7500				
App by Air (5 gal)	appl			1.00	Aug	1.0000				
Gramoxone SL	oz					16.0000				
Sodium Chlorate 5L	gal					0.6000				
Surfactant	pt					0.2000				
Header -Soybean	25' Flex	265 hp	0.102	1.00	Sep		0.10	0.10	0.10	0.09
Haul Soybeans	bu					60.0000				
Grain Cart Soybean	700 bu	MFWD 225	0.021	1.00	Sep		0.02	0.02	0.02	0.01
Roll-Out Pipe Irr.	acre				Jul	1.0000	0.07	0.07	0.44	
TOTALS							0.57	0.57	1.03	0.44

Note: Cost of production estimates are based on 2017 input prices.
 These fertilizer rates are based on the assumption that 30-40% of the soybean fields would be mixed to light textured fields and not heavy clay exclusively. Also, rates are based on maintenance levels associated with the expected yield in the budget. **Fertilization decisions should be based on soil tests. Soil test cost is prorated for a test every 3rd year. Lime cost prorated for application every 3rd year.** The budget does not include a second fungicide application to control Asian soybean rust, but the cost of treatment could range from \$10 to \$18 plus application cost per acre.

Table 9.D Estimated costs for field operations, per acre
 Soybeans, full-season, RR, stale seedbed, 12R 30"
 Furrow irrigated, 9 ac-in., Delta Area, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	-----DIRECT COST-----							FIXED COST	TOTAL COST	
		OP INPUT	FUEL	R&M	LABOR	LEASE	INTER	TOTAL			
-----dollars-----											
Soil Test	acre	3.33						0.16	3.49		3.49
Subsoiler	3 shank		0.85	0.33	1.05			0.11	2.34	1.84	4.18
Lime (Spread)	ton	15.32						0.73	16.05		16.05
Custom Apply Fert	acre	7.50						0.36	7.86		7.86
Phosphorus (46% P2O5)	cwt	16.31						0.77	17.08		17.08
Potash (60% K2O)	cwt	25.24						1.20	26.44		26.44
Disk Harrow	24'		1.71	1.48	2.11			0.25	5.55	5.37	10.92
Field Cultivate Fld	24'		1.30	0.86	1.60			0.18	3.94	4.48	8.42
Bed/Lister-Roll-Fold	12R-30		1.30	0.87	1.60			0.18	3.95	3.79	7.74
App by Air (5 gal)	appl	6.50						0.21	6.71		6.71
Glyphosate 3lbs a.e	oz	4.48						0.14	4.62		4.62
2,4-D Amine 4	pt	4.80						0.15	4.95		4.95
Select Max	pt	12.64						0.40	13.04		13.04
Valor SX	oz	9.14						0.29	9.43		9.43
Surfactant	pt	1.31						0.04	1.35		1.35
Plant & Pre-Folding	12R-30		1.41	2.23	2.34			0.14	6.12	6.22	12.34
Soybean Seed RR2	lb	75.50						1.79	77.29		77.29
CruiserMaxx	oz	6.80						0.16	6.96		6.96
Optimize	oz	3.00						0.07	3.07		3.07
Boundary	pt	22.40						0.53	22.93		22.93
Gramoxone SL 2.0	oz	7.20						0.17	7.37		7.37
Surfactant	pt	1.31						0.03	1.34		1.34
Soybeans Consultant	acre	6.50						0.13	6.63		6.63
Spray (Broadcast)	60'		0.59	0.43	0.85			0.04	1.91	1.45	3.36
Glyphosate 3lbs a.e	oz	4.48						0.09	4.57		4.57
Prefix	pt	13.06						0.26	13.32		13.32
Spray (Broadcast)	60'		0.59	0.43	0.85			0.04	1.91	1.45	3.36
Glyphosate 3lbs a.e	oz	4.48						0.09	4.57		4.57
Zidua	oz	13.58						0.27	13.85		13.85
App by Air (5 gal)	appl	6.50						0.08	6.58		6.58
Quadris Top SBX	oz	19.25						0.23	19.48		19.48
Surfactant	pt	0.33							0.33		0.33
App by Air (5 gal)	appl	6.50						0.05	6.55		6.55
Acephate 90SP	lb	5.57						0.04	5.61		5.61
App by Air (5 gal)	appl	6.50						0.05	6.55		6.55
Gramoxone SL	oz	2.40						0.02	2.42		2.42
Sodium Chlorate 5L	gal	3.23						0.03	3.26		3.26
Surfactant	pt	0.66						0.01	0.67		0.67
Header -Soybean	25' Flex		2.51	4.37	2.62			0.04	9.54	15.10	24.64
Haul Soybeans	bu	16.20						0.06	16.26		16.26
Grain Cart Soybean	700 bu		0.44	0.35	0.55			0.01	1.35	1.25	2.60
Roll-Out Pipe Irr.	acre	8.25	14.52	7.48	4.36			0.55	35.16	56.95	92.11
TOTALS		340.27	25.22	18.83	17.93	0.00	10.15	412.40	97.90	510.30	

Note: Cost of production estimates are based on 2017 input prices.

These fertilizer rates are based on the assumption that 30-40% of the soybean fields would be mixed to light textured fields and not heavy clay exclusively. Also, rates are based on maintenance levels associated with the expected yield in the budget. **Fertilization decisions should be based on soil tests. Soil test cost is prorated for a test every 3rd year. Lime cost prorated for application every 3rd year.** The budget does not include a second fungicide application to control Asian soybean rust, but the cost of treatment could range from \$10 to \$18 plus application cost per acre.

Table 9.E Estimated monthly income and expense flows per acre
Soybeans, full-season, RR, stale seedbed, 12R 30"
Furrow irrigated, 9 ac-in., Delta Area, Mississippi, 2018

ITEM	Oct	Nov	Dec	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep
-----dollars-----												
TOTAL INCOME	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	594.00
DIRECT EXPENSES												
CUSTOM SPRAY	0.00	0.00	0.00	0.00	6.50	0.00	0.00	0.00	0.00	6.50	13.00	0.00
HARVEST AIDS	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	5.63	0.00
FERTILIZERS	41.55	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
FUNGICIDES	0.00	0.00	0.00	0.00	0.00	0.00	6.80	0.00	0.00	19.25	0.00	0.00
HERBICIDES	0.00	0.00	0.00	0.00	31.06	0.00	29.60	35.60	0.00	0.00	0.00	0.00
INSECTICIDES	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	5.57	0.00
IRRIGATION SUPPLIES	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	8.25	0.00	0.00	0.00
SEED/PLANTS	0.00	0.00	0.00	0.00	0.00	0.00	75.50	0.00	0.00	0.00	0.00	0.00
ADJUVANTS	0.00	0.00	0.00	0.00	1.31	0.00	1.31	0.00	0.00	0.33	0.66	0.00
CUSTOM FERTILIZE	7.50	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
HAULING	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	16.20
CUSTOM LIME	15.32	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
CROP CONSULTANT	0.00	0.00	0.00	0.00	0.00	0.00	0.00	6.50	0.00	0.00	0.00	0.00
INOCULANT	0.00	0.00	0.00	0.00	0.00	0.00	3.00	0.00	0.00	0.00	0.00	0.00
SOIL TEST	3.33	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
LABOR	6.87	0.00	0.00	0.00	0.00	0.00	2.34	1.93	2.80	0.23	0.00	3.76
LEASE *	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
FUEL	5.83	0.00	0.00	0.00	0.00	0.00	1.41	1.18	9.15	4.40	0.00	3.25
REPAIR & MAINTENANCE	3.85	0.00	0.00	0.00	0.00	0.00	2.23	0.86	5.73	1.31	0.00	4.85
INTEREST ON OP. CAP.	4.01	0.00	0.00	0.00	1.23	0.00	2.89	0.92	0.41	0.38	0.20	0.11
TOTAL DIRECT EXPENSES	88.26	0.00	0.00	0.00	40.10	0.00	125.08	46.99	26.34	32.40	25.06	28.17
NET INCOME	-88.26	0.00	0.00	0.00	-40.10	0.00	-125.08	-46.99	-26.34	-32.40	-25.06	565.83
NET INCOME TO DATE	-88.26	-88.26	-88.26	-88.26	-128.36	-128.36	-253.44	-300.43	-326.77	-359.17	-384.23	181.60

Note: Cost of production estimates are based on 2017 input prices.

These fertilizer rates are based on the assumption that 30-40% of the soybean fields would be mixed to light textured fields and not heavy clay exclusively. Also, rates are based on maintenance levels associated with the expected yield in the budget. **Fertilization decisions should be based on soil tests. Soil test cost is prorated for a test every 3rd year. Lime cost prorated for application every 3rd year.** The budget does not include a second fungicide application to control Asian soybean rust, but the cost of treatment could range from \$10 to \$18 plus application cost per acre

* Lease costs are based on hourly usage costs.

Table 9.F Estimated returns for various price/yield combinations, per acre
 Soybeans, full-season, RR, stale seedbed, 12R 30"
 Furrow irrigated, 9 ac-in., Delta Area, Mississippi, 2018

PRODUCT	PERCENT												
	75	80	85	90	95	100	105	110	115	120	125		
PRODUCT PRICE													
Soybeans	7.42	7.92	8.41	8.91	9.40	9.90	10.39	10.89	11.38	11.88	12.37		
PERCENT	YIELD	UNIT	dollars										
50	30.00	bu	-181 -279	-166 -264	-151 -249	-136 -234	-122 -220	-107 -205	-92 -190	-77 -175	-62 -160	-47 -145	-33 -130
60	36.00	bu	-138 -236	-120 -218	-102 -200	-85 -183	-67 -165	-49 -147	-31 -129	-13 -111	3 -93	21 -76	39 -58
70	42.00	bu	-95 -193	-74 -172	-54 -151	-33 -131	-12 -110	8 -89	29 -68	49 -48	70 -27	91 -6	112 14
80	48.00	bu	-52 -150	-28 -126	-5 -103	18 -79	42 -55	66 -31	89 -8	113 15	137 39	161 63	184 86
90	54.00	bu	-9 -107	16 -80	43 -54	70 -27	97 -0	123 25	150 52	177 79	204 106	230 132	257 159
100	60.00	bu	33 -64	62 -35	92 -5	122 24	151 54	181 83	211 113	241 143	270 172	300 202	330 232
110	66.00	bu	76 -21	108 10	141 43	174 76	206 108	239 141	272 174	304 206	337 239	370 272	402 304
120	72.00	bu	118 21	154 56	190 92	225 127	261 163	297 199	332 234	368 270	404 306	439 341	475 377
130	78.00	bu	161 63	200 102	239 141	277 179	316 218	354 257	393 295	432 334	470 372	509 411	547 450
140	84.00	bu	204 106	246 148	287 190	329 231	371 273	412 314	454 356	495 397	537 439	579 481	620 522
150	90.00	bu	247 149	292 194	336 238	381 283	425 328	470 372	515 417	559 461	604 506	648 550	693 595

The top number in each cell is Returns Above Direct Expenses.
 The bottom number in each cell is Returns Above Total Specified Expenses.
 Only the product listed has been varied to calculate net returns.
 Note: Cost of production estimates are based on 2017 input prices.

Table 10.A Estimated costs per acre
Soybeans, full-season, RR, stale seedbed, 12R 30"
Flood irrigated, 13.5 ac-in., Delta Area, Mississippi, 2018

ITEM	UNIT	PRICE	QUANTITY	AMOUNT	YOUR FARM
		dollars		dollars	
DIRECT EXPENSES					
CUSTOM SPRAY					
App by Air (5 gal)	appl	6.50	5.0000	32.50	_____
HARVEST AIDS					
Gramoxone SL	oz	0.15	16.0000	2.40	_____
Sodium Chlorate 5L	gal	5.39	0.6000	3.23	_____
FERTILIZERS					
Phosphorus (46% P2O5)	cwt	18.75	0.8700	16.31	_____
Potash (60% K2O)	cwt	18.98	1.3300	25.24	_____
FUNGICIDES					
CruiserMaxx	oz	4.25	1.6000	6.80	_____
Quadris Top SBX	oz	2.75	7.0000	19.25	_____
HERBICIDES					
Glyphosate 3lbs a.e	oz	0.14	96.0000	13.44	_____
Select Max	pt	12.64	1.0000	12.64	_____
Valor SX	oz	4.57	2.0000	9.14	_____
Boundary	pt	11.20	2.0000	22.40	_____
Gramoxone SL 2.0	oz	0.15	48.0000	7.20	_____
Prefix	pt	6.53	2.0000	13.06	_____
INSECTICIDES					
Acephate 90SP	lb	7.43	0.7500	5.57	_____
Prevathon	oz	1.32	14.0000	18.48	_____
IncidentalPestTrt \$8	acre	8.00	1.0000	8.00	_____
SEED/PLANTS					
Soybean Seed RR2	lb	1.51	50.0000	75.50	_____
ADJUVANTS					
Surfactant	pt	3.28	1.1000	3.61	_____
CUSTOM FERTILIZE					
Custom Apply Fert	acre	7.50	1.0000	7.50	_____
HAULING					
Haul Soybeans	bu	0.27	53.0000	14.31	_____
SURVEY & MARK LEVEES					
Survey & Mark Levees	acre	4.50	0.5000	2.25	_____
CUSTOM LIME					
Lime (Spread)	ton	46.00	0.3330	15.32	_____
CROP CONSULTANT					
Soybeans Consultant	acre	6.50	1.0000	6.50	_____
INOCULANT					
Optimize	oz	2.14	1.4000	3.00	_____
SOIL TEST					
Soil Test	acre	10.00	0.3330	3.33	_____
OPERATOR LABOR					
Tractors	hour	13.51	0.4582	6.21	_____
Harvesters	hour	13.51	0.1021	1.38	_____
IRRIGATE LABOR					
Special Labor	hour	9.06	0.3125	2.82	_____
HAND LABOR					
Implements	hour	9.06	0.1100	1.00	_____
UNALLOCATED LABOR	hour	13.48	0.3218	4.34	_____
DIESEL FUEL					
Tractors	gal	1.80	4.3236	7.80	_____
Harvesters	gal	1.80	1.3935	2.51	_____
Contour Flood Irr.	gal	1.80	10.9974	19.80	_____
REPAIR & MAINTENANCE					
Implements	acre	4.76	1.0000	4.76	_____
Tractors	acre	2.39	1.0000	2.39	_____
Harvesters	acre	3.49	1.0000	3.49	_____
Contour Flood Irr.	acre	13.80	1.0000	13.80	_____
INTEREST ON OP. CAP.	acre	10.06	1.0000	10.06	_____
TOTAL DIRECT EXPENSES				427.34	_____
FIXED EXPENSES					
Implements	acre	9.06	1.0000	9.06	_____
Tractors	acre	15.01	1.0000	15.01	_____
Harvesters	acre	13.77	1.0000	13.77	_____
Contour Flood Irr.	acre	42.34	1.0000	42.34	_____
TOTAL FIXED EXPENSES				80.18	_____
TOTAL SPECIFIED EXPENSES				507.52	_____

Note: Cost of production estimates are based on 2017 input prices. These fertilizer rates are based on the assumption that 30-40% of the soybean fields would be mixed to light textured fields and not heavy clay exclusively. Also, rates are based on maintenance levels associated with the expected yield in the budget. **Fertilization decisions should be based on soil tests. Soil test cost is prorated for a test every 3rd year. Lime cost prorated for application every 3rd year.** The budget does not include a second fungicide application to control Asian soybean rust, but the cost of treatment could range from \$10 to \$18 plus application cost per acre.

Table 10.B Summary of estimated costs and returns per acre
 Soybeans, full-season, RR, stale seedbed, 12R 30"
 Flood irrigated, 13.5 ac-in., Delta Area, Mississippi, 2018

ITEM	UNIT	PRICE	QUANTITY	AMOUNT	YOUR FARM
		dollars		dollars	
INCOME					
Soybeans	bu	9.90	53.0000	524.70	_____

TOTAL INCOME				524.70	_____
DIRECT EXPENSES					
CUSTOM SPRAY	acre	32.50	1.0000	32.50	_____
HARVEST AIDS	acre	5.63	1.0000	5.63	_____
FERTILIZERS	acre	41.55	1.0000	41.55	_____
FUNGICIDES	acre	26.05	1.0000	26.05	_____
HERBICIDES	acre	77.88	1.0000	77.88	_____
INSECTICIDES	acre	32.05	1.0000	32.05	_____
SEED/PLANTS	acre	75.50	1.0000	75.50	_____
ADJUVANTS	acre	3.61	1.0000	3.61	_____
CUSTOM FERTILIZE	acre	7.50	1.0000	7.50	_____
HAULING	acre	14.31	1.0000	14.31	_____
SURVEY & MARK LEVEES	acre	2.25	1.0000	2.25	_____
CUSTOM LIME	acre	15.32	1.0000	15.32	_____
CROP CONSULTANT	acre	6.50	1.0000	6.50	_____
INOCULANT	acre	3.00	1.0000	3.00	_____
SOIL TEST	acre	3.33	1.0000	3.33	_____
HAND LABOR	hour	9.06	0.1100	1.00	_____
IRRIGATE LABOR	hour	9.06	0.3125	2.82	_____
OPERATOR LABOR	hour	13.51	0.5604	7.59	_____
UNALLOCATED LABOR	hour	13.48	0.3218	4.34	_____
DIESEL FUEL	gal	1.80	16.7147	30.11	_____
REPAIR & MAINTENANCE	acre	24.44	1.0000	24.44	_____
INTEREST ON OP. CAP.	acre	10.06	1.0000	10.06	_____

TOTAL DIRECT EXPENSES				427.34	_____
RETURNS ABOVE DIRECT EXPENSES				97.36	_____
TOTAL FIXED EXPENSES				80.18	_____

TOTAL SPECIFIED EXPENSES				507.52	_____
RETURNS ABOVE TOTAL SPECIFIED EXPENSES				17.18	_____

Note: Cost of production estimates are based on 2017 input prices.
 These fertilizer rates are based on the assumption that 30-40% of the soybean fields would be mixed to light textured fields and not heavy clay exclusively. Also, rates are based on maintenance levels associated with the expected yield in the budget. **Fertilization decisions should be based on soil tests. Soil test cost is prorated for a test every 3rd year. Lime cost prorated for application every 3rd year.** The budget does not include a second fungicide application to control Asian soybean rust, but the cost of treatment could range from \$10 to \$18 plus application cost per acre.

Table 10.C Estimated resource use for field operations, per acre
 Soybeans, full-season, RR, stale seedbed, 12R 30"
 Flood irrigated, 13.5 ac-in., Delta Area, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	POWER UNIT SIZE	PERF RATE	TIMES OVER	MTH	INPUT AMOUNT	IMPLEMENT	POWER UNIT	ALLOC LABOR	UNALL LABOR
							-----hours-----			
Soil Test	acre			0.33	Nov	0.3330				
Disk Harrow	24'	MFWD 190	0.081	1.00	Nov		0.08	0.08	0.08	0.07
Lime (Spread)	ton			0.33	Nov	0.3330				
Custom Apply Fert	acre			1.00	Nov	1.0000				
Phosphorus(46% P2O5)	cwt					0.8700				
Potash (60% K2O)	cwt					1.3300				
Spray (Broadcast)	60'	MFWD 225	0.028	1.00	Feb		0.02	0.02	0.04	0.02
Glyphosate 3lbs a.e	oz					32.0000				
Select Max	pt					1.0000				
Surfactant	pt					0.4000				
Valor SX	oz					2.0000				
Soybeans Consultant	acre			1.00	May	1.0000				
Plant & Pre-Folding	12R-30	MFWD 190	0.067	1.00	May		0.06	0.06	0.13	0.06
Soybean Seed RR2	lb					50.0000				
CruiserMaxx	oz					1.6000				
Optimize	oz					1.4000				
Boundary	pt					2.0000				
Gramoxone SL 2.0	oz					48.0000				
Surfactant	pt					0.4000				
Spray (Broadcast)	60'	MFWD 190	0.028	1.00	May		0.02	0.02	0.04	0.02
Glyphosate 3lbs a.e	oz					32.0000				
Prefix	pt					2.0000				
Spray (Broadcast)	60'	MFWD 190	0.028	1.00	Jun		0.02	0.02	0.04	0.02
Glyphosate 3lbs a.e	oz					32.0000				
App by Air (5 gal)	appl			1.00	Jul	1.0000				
Quadris Top SBX	oz					7.0000				
Surfactant	pt					0.1000				
App by Air (5 gal)	appl			1.00	Aug	1.0000				
Acephate 90SP	lb					0.7500				
App by Air (5 gal)	appl			1.00	Aug	1.0000				
Prevathon	oz					14.0000				
Incidental Pest				1.00	Sep					
App by Air (5 gal)	appl					1.0000				
IncidentalPestTrt \$8	acre					1.0000				
App by Air (5 gal)	appl			1.00	Sep	1.0000				
Gramoxone SL	oz					16.0000				
Sodium Chlorate 5L	gal					0.6000				
Surfactant	pt					0.2000				
Header -Soybean	25' Flex	265 hp	0.102	1.00	Oct		0.10	0.10	0.10	0.09
Haul Soybeans	bu					53.0000				
Grain Cart Soybean	700 bu	MFWD 190	0.021	1.00	Oct		0.02	0.02	0.02	0.01
Contour Flood Irr.	acre				Jul	1.0000	0.20	0.20	0.51	
TOTALS							0.56	0.56	0.98	0.32

Note: Cost of production estimates are based on 2017 input prices.

These fertilizer rates are based on the assumption that 30-40% of the soybean fields would be mixed to light textured fields and not heavy clay exclusively. Also, rates are based on maintenance levels associated with the expected yield in the budget. **Fertilization decisions should be based on soil tests. Soil test cost is prorated for a test every 3rd year. Lime cost prorated for application every 3rd year.** The budget does not include a second fungicide application to control Asian soybean rust, but the cost of treatment could range from \$10 to \$18 plus application cost per acre.

Table 10.D Estimated costs for field operations, per acre
Soybeans, full-season, RR, stale seedbed, 12R 30"
Flood irrigated, 13.5 ac-in., Delta Area, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	-----DIRECT COST-----							FIXED COST	TOTAL COST	
		OP INPUT	FUEL	R&M	LABOR	LEASE	INTER	TOTAL			
-----dollars-----											
Soil Test	acre	3.33						0.16	3.49		3.49
Disk Harrow	24'		1.44	1.38	2.11			0.23	5.16	4.78	9.94
Lime (Spread)	ton	15.32						0.73	16.05		16.05
Custom Apply Fert	acre	7.50						0.36	7.86		7.86
Phosphorus (46% P2O5)	cwt	16.31						0.77	17.08		17.08
Potash (60% K2O)	cwt	25.24						1.20	26.44		26.44
Spray (Broadcast)	60'		0.59	0.43	0.85			0.07	1.94	1.45	3.39
Glyphosate 3lbs a.e	oz	4.48						0.16	4.64		4.64
Select Max	pt	12.64						0.45	13.09		13.09
Surfactant	pt	1.31						0.05	1.36		1.36
Valor SX	oz	9.14						0.33	9.47		9.47
Soybeans Consultant	acre	6.50						0.15	6.65		6.65
Plant & Pre-Folding	12R-30		1.19	2.16	2.34			0.14	5.83	5.72	11.55
Soybean Seed RR2	lb	75.50						1.79	77.29		77.29
CruiserMaxx	oz	6.80						0.16	6.96		6.96
Optimize	oz	3.00						0.07	3.07		3.07
Boundary	pt	22.40						0.53	22.93		22.93
Gramoxone SL 2.0	oz	7.20						0.17	7.37		7.37
Surfactant	pt	1.31						0.03	1.34		1.34
Spray (Broadcast)	60'		0.50	0.39	0.85			0.04	1.78	1.24	3.02
Glyphosate 3lbs a.e	oz	4.48						0.11	4.59		4.59
Prefix	pt	13.06						0.31	13.37		13.37
Spray (Broadcast)	60'		0.50	0.39	0.85			0.03	1.77	1.24	3.01
Glyphosate 3lbs a.e	oz	4.48						0.09	4.57		4.57
App by Air (5 gal)	appl	6.50						0.10	6.60		6.60
Quadris Top SBX	oz	19.25						0.30	19.55		19.55
Surfactant	pt	0.33						0.01	0.34		0.34
App by Air (5 gal)	appl	6.50						0.08	6.58		6.58
Acephate 90SP	lb	5.57						0.07	5.64		5.64
App by Air (5 gal)	appl	6.50						0.08	6.58		6.58
Prevathon	oz	18.48						0.22	18.70		18.70
Incidental Pest											
App by Air (5 gal)	appl	6.50						0.05	6.55		6.55
IncidentalPestTrt \$8	acre	8.00						0.06	8.06		8.06
App by Air (5 gal)	appl	6.50						0.05	6.55		6.55
Gramoxone SL	oz	2.40						0.02	2.42		2.42
Sodium Chlorate 5L	gal	3.23						0.03	3.26		3.26
Surfactant	pt	0.66						0.01	0.67		0.67
Header -Soybean	25' Flex		2.51	4.37	2.62			0.04	9.54	15.10	24.64
Haul Soybeans	bu	14.31						0.06	14.37		14.37
Grain Cart Soybean	700 bu		0.37	0.32	0.55				1.24	1.09	2.33
Contour Flood Irr.	acre	2.25	23.01	15.00	5.58			0.75	46.59	49.56	96.15
TOTALS		346.98	30.11	24.44	15.75	0.00	10.06	427.34	80.18	507.52	

Note: Cost of production estimates are based on 2017 input prices.
These fertilizer rates are based on the assumption that 30-40% of the soybean fields would be mixed to light textured fields and not heavy clay exclusively. Also, rates are based on maintenance levels associated with the expected yield in the budget. **Fertilization decisions should be based on soil tests. Soil test cost is prorated for a test every 3rd year. Lime cost prorated for application every 3rd year.** The budget does not include a second fungicide application to control Asian soybean rust, but the cost of treatment could range from \$10 to \$18 plus application cost per acre.

Table 10.E Estimated monthly income and expense flows per acre
Soybeans, full-season, RR, stale seedbed, 12R 30"
Flood irrigated, 13.5 ac-in., Delta Area, Mississippi, 2018

ITEM	Nov	Dec	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct
-----dollars-----												
TOTAL INCOME	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	524.70
DIRECT EXPENSES												
CUSTOM SPRAY	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	6.50	13.00	13.00	0.00
HARVEST AIDS	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	5.63	0.00
FERTILIZERS	41.55	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
FUNGICIDES	0.00	0.00	0.00	0.00	0.00	0.00	6.80	0.00	19.25	0.00	0.00	0.00
HERBICIDES	0.00	0.00	0.00	26.26	0.00	0.00	47.14	4.48	0.00	0.00	0.00	0.00
INSECTICIDES	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	24.05	8.00	0.00
SEED/PLANTS	0.00	0.00	0.00	0.00	0.00	0.00	75.50	0.00	0.00	0.00	0.00	0.00
ADJUVANTS	0.00	0.00	0.00	1.31	0.00	0.00	1.31	0.00	0.33	0.00	0.66	0.00
CUSTOM FERTILIZE	7.50	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
HAULING	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	14.31
SURVEY & MARK LEVEES	0.00	0.00	0.00	0.00	0.00	0.00	0.00	2.25	0.00	0.00	0.00	0.00
CUSTOM LIME	15.32	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
CROP CONSULTANT	0.00	0.00	0.00	0.00	0.00	0.00	6.50	0.00	0.00	0.00	0.00	0.00
INOCULANT	0.00	0.00	0.00	0.00	0.00	0.00	3.00	0.00	0.00	0.00	0.00	0.00
SOIL TEST	3.33	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
LABOR	2.11	0.00	0.00	0.85	0.00	0.00	3.64	2.65	1.58	1.58	0.17	3.17
LEASE *	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
FUEL	1.44	0.00	0.00	0.59	0.00	0.00	1.69	8.27	7.52	7.52	0.20	2.88
REPAIR & MAINTENANCE	1.38	0.00	0.00	0.43	0.00	0.00	2.55	9.37	2.97	2.97	0.08	4.69
INTEREST ON OP. CAP.	3.45	0.00	0.00	1.06	0.00	0.00	3.51	0.52	0.60	0.60	0.22	0.10
TOTAL DIRECT EXPENSES	76.08	0.00	0.00	30.50	0.00	0.00	151.64	27.54	38.75	49.72	27.96	25.15
NET INCOME	-76.08	0.00	0.00	-30.50	0.00	0.00	-151.64	-27.54	-38.75	-49.72	-27.96	499.55
NET INCOME TO DATE	-76.08	-76.08	-76.08	-106.58	-106.58	-106.58	-258.22	-285.76	-324.51	-374.23	-402.19	97.36

Note: Cost of production estimates are based on 2017 input prices.

These fertilizer rates are based on the assumption that 30-40% of the soybean fields would be mixed to light textured fields and not heavy clay exclusively. Also, rates are based on maintenance levels associated with the expected yield in the budget. **Fertilization decisions should be based on soil tests. Soil test cost is prorated for a test every 3rd year. Lime cost prorated for application every 3rd year.** The budget does not include a second fungicide application to control Asian soybean rust, but the cost of treatment could range from \$10 to \$18 plus application cost per acre

* Lease costs are based on hourly usage costs.

Table 10.F Estimated returns for various price/yield combinations, per acre
 Soybeans, full-season, RR, stale seedbed, 12R 30"
 Flood irrigated, 13.5 ac-in., Delta Area, Mississippi, 2018

			PERCENT										
PRODUCT			75	80	85	90	95	100	105	110	115	120	125
			PRODUCT PRICE										
Soybeans			7.42	7.92	8.41	8.91	9.40	9.90	10.39	10.89	11.38	11.88	12.37
PERCENT	YIELD	UNIT	dollars										
50	26.50	bu	-223 -303	-210 -290	-197 -277	-184 -264	-170 -251	-157 -237	-144 -224	-131 -211	-118 -198	-105 -185	-92 -172
60	31.80	bu	-185 -265	-169 -249	-153 -234	-138 -218	-122 -202	-106 -186	-91 -171	-75 -155	-59 -139	-43 -123	-28 -108
70	37.10	bu	-147 -227	-129 -209	-110 -191	-92 -172	-74 -154	-55 -135	-37 -117	-19 -99	-0 -80	17 -62	36 -44
80	42.40	bu	-109 -189	-88 -168	-67 -147	-46 -126	-25 -105	-4 -84	16 -63	37 -42	58 -21	79 -0	100 20
90	47.70	bu	-71 -151	-48 -128	-24 -104	-0 -81	22 -57	46 -33	69 -10	93 13	117 36	140 60	164 84
100	53.00	bu	-33 -113	-7 -87	18 -61	44 -35	71 -9	97 17	123 43	149 69	176 95	202 122	228 148
110	58.30	bu	4 -76	32 -47	61 -18	90 10	119 39	148 68	177 97	206 125	234 154	263 183	292 212
120	63.60	bu	42 -38	73 -6	104 24	136 56	167 87	199 119	230 150	262 182	293 213	325 245	356 276
130	68.90	bu	79 -0	114 33	148 67	182 102	216 136	250 170	284 204	318 238	352 272	386 306	420 340
140	74.20	bu	117 37	154 74	191 111	228 147	264 184	301 221	338 258	374 294	411 331	448 368	485 404
150	79.50	bu	155 75	195 114	234 154	273 193	313 232	352 272	391 311	431 351	470 390	509 429	549 469

The top number in each cell is Returns Above Direct Expenses.
 The bottom number in each cell is Returns Above Total Specified Expenses.
 Only the product listed has been varied to calculate net returns.
 Note: Cost of production estimates are based on 2017 input prices.

Table 11.A Estimated costs per acre
Soybeans, double crop after wheat, RR, 12R 30"
Pivot irrigated, 7.5 ac-in., All Areas, Mississippi, 2018

ITEM	UNIT	PRICE	QUANTITY	AMOUNT	YOUR FARM
		dollars		dollars	
DIRECT EXPENSES					
CUSTOM SPRAY					
App by Air (5 gal)	appl	6.50	4.0000	26.00	_____
FERTILIZERS					
Phosphorus (46% P2O5)	cwt	18.75	0.8700	16.31	_____
Potash (60% K2O)	cwt	18.98	1.3300	25.24	_____
FUNGICIDES					
CruiserMaxx	oz	4.25	1.6000	6.80	_____
Quadris Top SBX	oz	2.75	7.0000	19.25	_____
HERBICIDES					
Boundary	pt	11.20	2.0000	22.40	_____
Gramoxone SL 2.0	oz	0.15	48.0000	7.20	_____
Glyphosate 3lbs a.e	oz	0.14	32.0000	4.48	_____
Prefix	pt	6.53	2.0000	13.06	_____
INSECTICIDES					
Acephate 90SP	lb	7.43	0.7500	5.57	_____
Prevathon	oz	1.32	14.0000	18.48	_____
Bifenthrin	oz	0.78	6.4000	4.99	_____
IncidentalPestTrt \$8	acre	8.00	1.0000	8.00	_____
SEED/PLANTS					
Soybean Seed RR2	lb	1.51	50.0000	75.50	_____
ADJUVANTS					
Surfactant	pt	3.28	0.6000	1.97	_____
CUSTOM FERTILIZE					
Custom Apply Fert	acre	7.50	1.0000	7.50	_____
HAULING					
Haul Soybeans	bu	0.27	50.0000	13.50	_____
CUSTOM LIME					
Lime (Spread)	ton	46.00	0.3330	15.32	_____
CROP CONSULTANT					
Soybeans Consultant	acre	6.50	1.0000	6.50	_____
INOCULANT					
Optimize	oz	2.14	1.4000	3.00	_____
SOIL TEST					
Soil Test	acre	10.00	0.3330	3.33	_____
OPERATOR LABOR					
Tractors	hour	13.51	0.1171	1.58	_____
Harvesters	hour	13.51	0.1021	1.38	_____
IRRIGATE LABOR					
Special Labor	hour	9.06	0.0518	0.47	_____
HAND LABOR					
Implements	hour	9.06	0.0817	0.74	_____
UNALLOCATED LABOR	hour	13.57	0.1886	2.56	_____
DIESEL FUEL					
Tractors	gal	1.80	1.3567	2.44	_____
Harvesters	gal	1.80	1.3935	2.51	_____
1/2-mi Pivot Irr.	gal	1.80	16.4057	29.53	_____
REPAIR & MAINTENANCE					
Implements	acre	3.12	1.0000	3.12	_____
Tractors	acre	0.77	1.0000	0.77	_____
Harvesters	acre	3.49	1.0000	3.49	_____
1/2-mi Pivot Irr.	acre	11.57	1.0000	11.57	_____
INTEREST ON OP. CAP.	acre	7.82	1.0000	7.82	_____
TOTAL DIRECT EXPENSES				372.38	_____
FIXED EXPENSES					
Implements	acre	5.40	1.0000	5.40	_____
Tractors	acre	4.85	1.0000	4.85	_____
Harvesters	acre	13.77	1.0000	13.77	_____
1/2-mi Pivot Irr.	acre	41.81	1.0000	41.81	_____
TOTAL FIXED EXPENSES				65.83	_____
TOTAL SPECIFIED EXPENSES				438.21	_____

Note: Cost of production estimates are based on 2017 input prices. These fertilizer rates are based on the assumption that 30-40% of the soybean fields would be mixed to light textured fields and not heavy clay exclusively. Also, rates are based on maintenance levels associated with the expected yield in the budget. **Fertilization decisions should be based on soil tests. Soil test cost is prorated for a test every 3rd year. Lime cost prorated for application every 3rd year.** The budget does not include a second fungicide application to control Asian soybean rust, but the cost of treatment could range from \$10 to \$18 plus application cost per acre.

Table 11.B Summary of estimated costs and returns per acre
 Soybeans, double crop after wheat, RR, 12R 30"
 Pivot irrigated, 7.5 ac-in., All Areas, Mississippi, 2018

ITEM	UNIT	PRICE	QUANTITY	AMOUNT	YOUR FARM
		dollars		dollars	
INCOME					
Soybeans	bu	9.90	50.0000	495.00	_____

TOTAL INCOME				495.00	_____
DIRECT EXPENSES					
CUSTOM SPRAY	acre	26.00	1.0000	26.00	_____
FERTILIZERS	acre	41.55	1.0000	41.55	_____
FUNGICIDES	acre	26.05	1.0000	26.05	_____
HERBICIDES	acre	47.14	1.0000	47.14	_____
INSECTICIDES	acre	37.04	1.0000	37.04	_____
SEED/PLANTS	acre	75.50	1.0000	75.50	_____
ADJUVANTS	acre	1.97	1.0000	1.97	_____
CUSTOM FERTILIZE	acre	7.50	1.0000	7.50	_____
HAULING	acre	13.50	1.0000	13.50	_____
CUSTOM LIME	acre	15.32	1.0000	15.32	_____
CROP CONSULTANT	acre	6.50	1.0000	6.50	_____
INOCULANT	acre	3.00	1.0000	3.00	_____
SOIL TEST	acre	3.33	1.0000	3.33	_____
HAND LABOR	hour	9.06	0.0817	0.74	_____
IRRIGATE LABOR	hour	9.06	0.0518	0.47	_____
OPERATOR LABOR	hour	13.51	0.2193	2.96	_____
UNALLOCATED LABOR	hour	13.57	0.1886	2.56	_____
DIESEL FUEL	gal	1.80	19.1560	34.48	_____
REPAIR & MAINTENANCE	acre	18.95	1.0000	18.95	_____
INTEREST ON OP. CAP.	acre	7.82	1.0000	7.82	_____

TOTAL DIRECT EXPENSES				372.38	_____
RETURNS ABOVE DIRECT EXPENSES				122.62	_____
TOTAL FIXED EXPENSES				65.83	_____

TOTAL SPECIFIED EXPENSES				438.21	_____
RETURNS ABOVE TOTAL SPECIFIED EXPENSES				56.79	_____

Note: Cost of production estimates are based on 2017 input prices.
 These fertilizer rates are based on the assumption that 30-40% of the soybean fields would be mixed to light textured fields and not heavy clay exclusively. Also, rates are based on maintenance levels associated with the expected yield in the budget. **Fertilization decisions should be based on soil tests. Soil test cost is prorated for a test every 3rd year. Lime cost prorated for application every 3rd year.** The budget does not include a second fungicide application to control Asian soybean rust, but the cost of treatment could range from \$10 to \$18 plus application cost per acre.

Table 11.C Estimated resource use for field operations, per acre
 Soybeans, double crop after wheat, RR, 12R 30"
 Pivot irrigated, 7.5 ac-in., All Areas, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	POWER UNIT SIZE	PERF RATE	TIMES OVER	MTH	INPUT AMOUNT	IMPLEMENT	POWER UNIT	ALLOC LABOR	UNALL LABOR
						-----hours-----				
Soil Test	acre			0.33	Nov	0.3330				
Lime (Spread)	ton			0.33	Nov	0.3330				
Custom Apply Fert	acre			1.00	Nov	1.0000				
Phosphorus (46% P2O5)	cwt					0.8700				
Potash (60% K2O)	cwt					1.3300				
Soybeans Consultant	acre			1.00	May	1.0000				
Plant & Pre-Folding	12R-30	MFWD 225	0.067	1.00	Jun		0.06	0.06	0.13	0.05
Soybean Seed RR2	lb					50.0000				
CruiserMaxx	oz					1.6000				
Optimize	oz					1.4000				
Boundary	pt					2.0000				
Gramoxone SL 2.0	oz					48.0000				
Surfactant	pt					0.4000				
Spray (Broadcast)	60'	MFWD 225	0.028	1.00	Jul		0.02	0.02	0.04	0.02
Glyphosate 3lbs a.e	oz					32.0000				
Prefix	pt					2.0000				
App by Air (5 gal)	appl			1.00	Aug	1.0000				
Quadris Top SBX	oz					7.0000				
Surfactant	pt					0.1000				
App by Air (5 gal)	appl			1.00	Aug	1.0000				
Acephate 90SP	lb					0.7500				
App by Air (5 gal)	appl			1.00	Aug	1.0000				
Prevathon	oz					14.0000				
Surfactant	pt					0.1000				
Bifenthrin	oz					6.4000				
Incidental Pest				1.00	Sep					
App by Air (5 gal)	appl					1.0000				
IncidentalPestTrt \$8	acre					1.0000				
Header -Soybean	25' Flex	265 hp	0.102	1.00	Oct		0.10	0.10	0.10	0.08
Haul Soybeans	bu					50.0000				
Grain Cart Soybean	700 bu	MFWD 225	0.021	1.00	Oct		0.02	0.02	0.02	0.01
1/2-mi Pivot Irr.	acre				Jul	1.0000			0.05	
TOTALS							0.21	0.21	0.35	0.18

Note: Cost of production estimates are based on 2017 input prices.

These fertilizer rates are based on the assumption that 30-40% of the soybean fields would be mixed to light textured fields and not heavy clay exclusively. Also, rates are based on maintenance levels associated with the expected yield in the budget. **Fertilization decisions should be based on soil tests. Soil test cost is prorated for a test every 3rd year. Lime cost prorated for application every 3rd year.** The budget does not include a second fungicide application to control Asian soybean rust, but the cost of treatment could range from \$10 to \$18 plus application cost per acre.

Table 11.D Estimated costs for field operations, per acre
 Soybeans, double crop after wheat, RR, 12R 30"
 Pivot irrigated, 7.5 ac-in., All Areas, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	-----DIRECT COST-----							FIXED COST	TOTAL COST
		OP INPUT	FUEL	R&M	LABOR	LEASE	INTER	TOTAL		
-----dollars-----										
Soil Test	acre	3.33						0.16	3.49	3.49
Lime (Spread)	ton	15.32						0.73	16.05	16.05
Custom Apply Fert	acre	7.50						0.36	7.86	7.86
Phosphorus(46% P2O5)	cwt	16.31						0.77	17.08	17.08
Potash (60% K2O)	cwt	25.24						1.20	26.44	26.44
Soybeans Consultant	acre	6.50						0.15	6.65	6.65
Plant & Pre-Folding	12R-30		1.41	2.23	2.31			0.12	6.07	6.22
Soybean Seed RR2	lb	75.50						1.49	76.99	76.99
CruiserMaxx	oz	6.80						0.13	6.93	6.93
Optimize	oz	3.00						0.06	3.06	3.06
Boundary	pt	22.40						0.44	22.84	22.84
Gramoxone SL 2.0	oz	7.20						0.14	7.34	7.34
Surfactant	pt	1.31						0.03	1.34	1.34
Spray (Broadcast)	60'		0.59	0.43	0.84			0.03	1.89	1.45
Glyphosate 3lbs a.e	oz	4.48						0.07	4.55	4.55
Prefix	pt	13.06						0.21	13.27	13.27
App by Air (5 gal)	appl	6.50						0.08	6.58	6.58
Quadris Top SBX	oz	19.25						0.23	19.48	19.48
Surfactant	pt	0.33							0.33	0.33
App by Air (5 gal)	appl	6.50						0.08	6.58	6.58
Acephate 90SP	lb	5.57						0.07	5.64	5.64
App by Air (5 gal)	appl	6.50						0.08	6.58	6.58
Prevathon	oz	18.48						0.22	18.70	18.70
Surfactant	pt	0.33							0.33	0.33
Bifenthrin	oz	4.99						0.06	5.05	5.05
Incidental Pest										
App by Air (5 gal)	appl	6.50						0.05	6.55	6.55
IncidentalPestTrt \$8	acre	8.00						0.06	8.06	8.06
Header -Soybean	25' Flex		2.51	4.37	2.57			0.04	9.49	15.10
Haul Soybeans	bu	13.50						0.05	13.55	13.55
Grain Cart Soybean	700 bu		0.44	0.35	0.54			0.01	1.34	1.25
1/2-mi Pivot Irr.	acre		29.53	11.57	0.47			0.70	42.27	41.81
TOTALS		304.40	34.48	18.95	6.73	0.00	7.82	372.38	65.83	438.21

Note: Cost of production estimates are based on 2017 input prices.
 These fertilizer rates are based on the assumption that 30-40% of the soybean fields would be mixed to light textured fields and not heavy clay exclusively. Also, rates are based on maintenance levels associated with the expected yield in the budget. **Fertilization decisions should be based on soil tests. Soil test cost is prorated for a test every 3rd year. Lime cost prorated for application every 3rd year.** The budget does not include a second fungicide application to control Asian soybean rust, but the cost of treatment could range from \$10 to \$18 plus application cost per acre.

Table 11.E Estimated monthly income and expense flows per acre
Soybeans, double crop after wheat, RR, 12R 30"
Pivot irrigated, 7.5 ac-in., All Areas, Mississippi, 2018

ITEM	Nov	Dec	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct
-----dollars-----												
TOTAL INCOME	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	495.00
DIRECT EXPENSES												
CUSTOM SPRAY	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	19.50	6.50	0.00
FERTILIZERS	41.55	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
FUNGICIDES	0.00	0.00	0.00	0.00	0.00	0.00	0.00	6.80	0.00	19.25	0.00	0.00
HERBICIDES	0.00	0.00	0.00	0.00	0.00	0.00	0.00	29.60	17.54	0.00	0.00	0.00
INSECTICIDES	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	29.04	8.00	0.00
SEED/PLANTS	0.00	0.00	0.00	0.00	0.00	0.00	0.00	75.50	0.00	0.00	0.00	0.00
ADJUVANTS	0.00	0.00	0.00	0.00	0.00	0.00	0.00	1.31	0.00	0.66	0.00	0.00
CUSTOM FERTILIZE	7.50	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
HAULING	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	13.50
CUSTOM LIME	15.32	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
CROP CONSULTANT	0.00	0.00	0.00	0.00	0.00	0.00	6.50	0.00	0.00	0.00	0.00	0.00
INOCULANT	0.00	0.00	0.00	0.00	0.00	0.00	0.00	3.00	0.00	0.00	0.00	0.00
SOIL TEST	3.33	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
LABOR	0.00	0.00	0.00	0.00	0.00	0.00	0.34	2.35	0.89	0.04	0.00	3.11
LEASE *	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
FUEL	0.00	0.00	0.00	0.00	0.00	0.00	0.00	10.27	12.40	8.86	0.00	2.95
REPAIR & MAINTENANCE	0.00	0.00	0.00	0.00	0.00	0.00	0.00	12.51	1.17	0.55	0.00	4.72
INTEREST ON OP. CAP.	3.22	0.00	0.00	0.00	0.00	0.00	0.16	2.79	0.51	0.93	0.11	0.10
TOTAL DIRECT EXPENSES	70.92	0.00	0.00	0.00	0.00	0.00	7.00	144.13	32.51	78.83	14.61	24.38
NET INCOME	-70.92	0.00	0.00	0.00	0.00	0.00	-7.00	-144.13	-32.51	-78.83	-14.61	470.62
NET INCOME TO DATE	-70.92	-70.92	-70.92	-70.92	-70.92	-70.92	-77.92	-222.05	-254.56	-333.39	-348.00	122.62

Note: Cost of production estimates are based on 2017 input prices.

These fertilizer rates are based on the assumption that 30-40% of the soybean fields would be mixed to light textured fields and not heavy clay exclusively. Also, rates are based on maintenance levels associated with the expected yield in the budget.

Fertilization decisions should be based on soil tests. Soil test cost is prorated for a test every 3rd year. Lime cost prorated for application every 3rd year. The budget does not include a second fungicide application to control Asian soybean rust, but the cost of treatment could range from \$10 to \$18 plus application cost per acre

* Lease costs are based on hourly usage costs.

Table 11.F Estimated returns for various price/yield combinations, per acre
 Soybeans, double crop after wheat, RR, 12R 30"
 Pivot irrigated, 7.5 ac-in., All Areas, Mississippi, 2018

			-----PERCENT-----										
PRODUCT			75	80	85	90	95	100	105	110	115	120	125
			-----PRODUCT PRICE-----										
Soybeans			7.42	7.92	8.41	8.91	9.40	9.90	10.39	10.89	11.38	11.88	12.37
PERCENT	YIELD	UNIT	-----dollars-----										
50	25.00	bu	-179 -245	-167 -233	-155 -221	-142 -208	-130 -196	-118 -183	-105 -171	-93 -159	-80 -146	-68 -134	-56 -122
60	30.00	bu	-144 -210	-129 -195	-114 -180	-99 -165	-84 -150	-69 -135	-55 -120	-40 -106	-25 -91	-10 -76	4 -61
70	35.00	bu	-108 -174	-91 -156	-73 -139	-56 -122	-39 -104	-21 -87	-4 -70	12 -52	30 -35	47 -18	64 -1
80	40.00	bu	-72 -138	-52 -118	-33 -98	-13 -79	6 -59	26 -39	46 -19	65 0	85 19	105 39	125 59
90	45.00	bu	-36 -102	-14 -80	7 -58	29 -35	52 -13	74 8	96 30	119 53	141 75	163 97	185 120
100	50.00	bu	-1 -66	23 -42	48 -17	73 7	97 32	122 56	147 81	172 106	196 131	221 155	246 180
110	55.00	bu	34 -31	61 -3	89 23	116 50	143 77	170 104	197 132	225 159	252 186	279 213	306 241
120	60.00	bu	70 4	100 34	129 63	159 93	189 123	218 153	248 182	278 212	308 242	337 271	367 301
130	65.00	bu	106 40	138 72	170 104	202 136	234 169	267 201	299 233	331 265	363 297	395 329	427 362
140	70.00	bu	141 76	176 110	211 145	245 180	280 214	315 249	349 284	384 318	419 353	453 387	488 422
150	75.00	bu	177 111	214 149	251 186	289 223	326 260	363 297	400 334	437 371	474 408	511 446	548 483

The top number in each cell is Returns Above Direct Expenses.
 The bottom number in each cell is Returns Above Total Specified Expenses.
 Only the product listed has been varied to calculate net returns.
 Note: Cost of production estimates are based on 2017 input prices.

Table 12.A Estimated costs per acre
Soybeans, double crop after wheat, RR, 12R 30"
Non-irrigated, All Areas, Mississippi, 2018

ITEM	UNIT	PRICE	QUANTITY	AMOUNT	YOUR FARM
		dollars		dollars	
DIRECT EXPENSES					
CUSTOM SPRAY					
App by Air (5 gal)	appl	6.50	3.0000	19.50	_____
FERTILIZERS					
Phosphorus (46% P2O5)	cwt	18.75	0.8700	16.31	_____
Potash (60% K2O)	cwt	18.98	1.3300	25.24	_____
FUNGICIDES					
CruiserMaxx	oz	4.25	1.6000	6.80	_____
HERBICIDES					
Boundary	pt	11.20	2.0000	22.40	_____
Gramoxone SL 2.0	oz	0.15	48.0000	7.20	_____
Glyphosate 3lbs a.e	oz	0.14	32.0000	4.48	_____
Prefix	pt	6.53	2.0000	13.06	_____
INSECTICIDES					
Acephate 90SP	lb	7.43	0.7500	5.57	_____
Prevathon	oz	1.32	14.0000	18.48	_____
Bifenthrin	oz	0.78	6.4000	4.99	_____
IncidentalPestTrt \$8	acre	8.00	1.0000	8.00	_____
SEED/PLANTS					
Soybean Seed RR2	lb	1.51	50.0000	75.50	_____
ADJUVANTS					
Surfactant	pt	3.28	0.5000	1.64	_____
CUSTOM FERTILIZE					
Custom Apply Fert	acre	7.50	1.0000	7.50	_____
HAULING					
Haul Soybeans	bu	0.27	25.0000	6.75	_____
CUSTOM LIME					
Lime (Spread)	ton	46.00	0.3330	15.32	_____
CROP CONSULTANT					
Soybeans Consultant	acre	6.50	1.0000	6.50	_____
INOCULANT					
Optimize	oz	2.14	1.4000	3.00	_____
SOIL TEST					
Soil Test	acre	10.00	0.3330	3.33	_____
OPERATOR LABOR					
Tractors	hour	13.51	0.1171	1.58	_____
Harvesters	hour	13.51	0.1021	1.38	_____
HAND LABOR					
Implements	hour	9.06	0.0817	0.74	_____
UNALLOCATED LABOR					
	hour	13.57	0.1886	2.56	_____
DIESEL FUEL					
Tractors	gal	1.80	1.3567	2.44	_____
Harvesters	gal	1.80	1.3935	2.51	_____
REPAIR & MAINTENANCE					
Implements	acre	3.12	1.0000	3.12	_____
Tractors	acre	0.77	1.0000	0.77	_____
Harvesters	acre	3.49	1.0000	3.49	_____
INTEREST ON OP. CAP.	acre	6.79	1.0000	6.79	_____
TOTAL DIRECT EXPENSES				296.95	_____
FIXED EXPENSES					
Implements	acre	5.40	1.0000	5.40	_____
Tractors	acre	4.85	1.0000	4.85	_____
Harvesters	acre	13.77	1.0000	13.77	_____
TOTAL FIXED EXPENSES				24.02	_____
TOTAL SPECIFIED EXPENSES				320.97	_____

Note: Cost of production estimates are based on 2017 input prices. These fertilizer rates are based on the assumption that 30-40% of the soybean fields would be mixed to light textured fields and not heavy clay exclusively. Also, rates are based on maintenance levels associated with the expected yield in the budget. **Fertilization decisions should be based on soil tests. Soil test cost is prorated for a test every 3rd year. Lime cost prorated for application every 3rd year.** The budget does not include a second fungicide application to control Asian soybean rust, but the cost of treatment could range from \$10 to \$18 plus application cost per acre.

Table 12.B Summary of estimated costs and returns per acre
Soybeans, double crop after wheat, RR, 12R 30"
Non-irrigated, All Areas, Mississippi, 2018

ITEM	UNIT	PRICE	QUANTITY	AMOUNT	YOUR FARM
		dollars		dollars	
INCOME					
Soybeans	bu	9.90	25.0000	247.50	_____

TOTAL INCOME				247.50	_____
DIRECT EXPENSES					
CUSTOM SPRAY	acre	19.50	1.0000	19.50	_____
FERTILIZERS	acre	41.55	1.0000	41.55	_____
FUNGICIDES	acre	6.80	1.0000	6.80	_____
HERBICIDES	acre	47.14	1.0000	47.14	_____
INSECTICIDES	acre	37.04	1.0000	37.04	_____
SEED/PLANTS	acre	75.50	1.0000	75.50	_____
ADJUVANTS	acre	1.64	1.0000	1.64	_____
CUSTOM FERTILIZE	acre	7.50	1.0000	7.50	_____
HAULING	acre	6.75	1.0000	6.75	_____
CUSTOM LIME	acre	15.32	1.0000	15.32	_____
CROP CONSULTANT	acre	6.50	1.0000	6.50	_____
INOCULANT	acre	3.00	1.0000	3.00	_____
SOIL TEST	acre	3.33	1.0000	3.33	_____
HAND LABOR	hour	9.06	0.0817	0.74	_____
OPERATOR LABOR	hour	13.51	0.2193	2.96	_____
UNALLOCATED LABOR	hour	13.57	0.1886	2.56	_____
DIESEL FUEL	gal	1.80	2.7503	4.95	_____
REPAIR & MAINTENANCE	acre	7.38	1.0000	7.38	_____
INTEREST ON OP. CAP.	acre	6.79	1.0000	6.79	_____

TOTAL DIRECT EXPENSES				296.95	_____
RETURNS ABOVE DIRECT EXPENSES				-49.45	_____
TOTAL FIXED EXPENSES				24.02	_____

TOTAL SPECIFIED EXPENSES				320.97	_____
RETURNS ABOVE TOTAL SPECIFIED EXPENSES				-73.47	_____

Note: Cost of production estimates are based on 2017 input prices. These fertilizer rates are based on the assumption that 30-40% of the soybean fields would be mixed to light textured fields and not heavy clay exclusively. Also, rates are based on maintenance levels associated with the expected yield in the budget. **Fertilization decisions should be based on soil tests. Soil test cost is prorated for a test every 3rd year. Lime cost prorated for application every 3rd year.** The budget does not include a second fungicide application to control Asian soybean rust, but the cost of treatment could range from \$10 to \$18 plus application cost per acre.

Table 12.C Estimated resource use for field operations, per acre
Soybeans, double crop after wheat, RR, 12R 30"
Non-irrigated, All Areas, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	POWER UNIT SIZE	PERF RATE	TIMES OVER	MTH	INPUT AMOUNT	IMPLEMENT	POWER UNIT	ALLOC LABOR	UNALL LABOR
						-----hours-----				
Soil Test	acre			0.33	Nov	0.3330				
Lime (Spread)	ton			0.33	Nov	0.3330				
Custom Apply Fert	acre			1.00	Nov	1.0000				
Phosphorus (46% P2O5)	cwt					0.8700				
Potash (60% K2O)	cwt					1.3300				
Soybeans Consultant	acre			1.00	May	1.0000				
Plant & Pre-Folding	12R-30	MFWD 225	0.067	1.00	Jun		0.06	0.06	0.13	0.05
Soybean Seed RR2	lb					50.0000				
CruiserMaxx	oz					1.6000				
Optimize	oz					1.4000				
Boundary	pt					2.0000				
Gramoxone SL 2.0	oz					48.0000				
Surfactant	pt					0.4000				
Spray (Broadcast)	60'	MFWD 225	0.028	1.00	Jul		0.02	0.02	0.04	0.02
Glyphosate 3lbs a.e	oz					32.0000				
Prefix	pt					2.0000				
App by Air (5 gal)	appl			1.00	Aug	1.0000				
Acephate 90SP	lb					0.7500				
App by Air (5 gal)	appl			1.00	Aug	1.0000				
Prevathon	oz					14.0000				
Surfactant	pt					0.1000				
Bifenthrin	oz					6.4000				
Incidental Pest				1.00	Sep					
App by Air (5 gal)	appl					1.0000				
IncidentalPestTrt \$8	acre					1.0000				
Header -Soybean	25' Flex	265 hp	0.102	1.00	Oct		0.10	0.10	0.10	0.08
Haul Soybeans	bu					25.0000				
Grain Cart Soybean	700 bu	MFWD 225	0.021	1.00	Oct		0.02	0.02	0.02	0.01
TOTALS							0.21	0.21	0.30	0.18

Note: Cost of production estimates are based on 2017 input prices.

These fertilizer rates are based on the assumption that 30-40% of the soybean fields would be mixed to light textured fields and not heavy clay exclusively. Also, rates are based on maintenance levels associated with the expected yield in the budget. **Fertilization decisions should be based on soil tests. Soil test cost is prorated for a test every 3rd year. Lime cost prorated for application every 3rd year.** The budget does not include a second fungicide application to control Asian soybean rust, but the cost of treatment could range from \$10 to \$18 plus application cost per acre.

Table 12.D Estimated costs for field operations, per acre
Soybeans, double crop after wheat, RR, 12R 30"
Non-irrigated, All Areas, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	-----DIRECT COST-----							FIXED COST	TOTAL COST
		OP INPUT	FUEL	R&M	LABOR	LEASE	INTER	TOTAL		
-----dollars-----										
Soil Test	acre	3.33						0.16	3.49	3.49
Lime (Spread)	ton	15.32						0.73	16.05	16.05
Custom Apply Fert	acre	7.50						0.36	7.86	7.86
Phosphorus(46% P2O5)	cwt	16.31						0.77	17.08	17.08
Potash (60% K2O)	cwt	25.24						1.20	26.44	26.44
Soybeans Consultant	acre	6.50						0.15	6.65	6.65
Plant & Pre-Folding	12R-30		1.41	2.23	2.31			0.12	6.07	6.22
Soybean Seed RR2	lb	75.50						1.49	76.99	76.99
CruiserMaxx	oz	6.80						0.13	6.93	6.93
Optimize	oz	3.00						0.06	3.06	3.06
Boundary	pt	22.40						0.44	22.84	22.84
Gramoxone SL 2.0	oz	7.20						0.14	7.34	7.34
Surfactant	pt	1.31						0.03	1.34	1.34
Spray (Broadcast)	60'		0.59	0.43	0.84			0.03	1.89	1.45
Glyphosate 3lbs a.e	oz	4.48						0.07	4.55	4.55
Prefix	pt	13.06						0.21	13.27	13.27
App by Air (5 gal)	appl	6.50						0.08	6.58	6.58
Acephate 90SP	lb	5.57						0.07	5.64	5.64
App by Air (5 gal)	appl	6.50						0.08	6.58	6.58
Prevathon	oz	18.48						0.22	18.70	18.70
Surfactant	pt	0.33							0.33	0.33
Bifenthrin	oz	4.99						0.06	5.05	5.05
Incidental Pest										
App by Air (5 gal)	appl	6.50						0.05	6.55	6.55
IncidentalPestTrt \$8	acre	8.00						0.06	8.06	8.06
Header -Soybean	25' Flex		2.51	4.37	2.57			0.04	9.49	15.10
Haul Soybeans	bu	6.75						0.03	6.78	6.78
Grain Cart Soybean	700 bu		0.44	0.35	0.54			0.01	1.34	1.25
TOTALS		271.57	4.95	7.38	6.26	0.00	6.79	296.95	24.02	320.97

Note: Cost of production estimates are based on 2017 input prices.
These fertilizer rates are based on the assumption that 30-40% of the soybean fields would be mixed to light textured fields and not heavy clay exclusively. Also, rates are based on maintenance levels associated with the expected yield in the budget. **Fertilization decisions should be based on soil tests. Soil test cost is prorated for a test every 3rd year. Lime cost prorated for application every 3rd year.** The budget does not include a second fungicide application to control Asian soybean rust, but the cost of treatment could range from \$10 to \$18 plus application cost per acre.

Table 12.E Estimated monthly income and expense flows per acre
Soybeans, double crop after wheat, RR, 12R 30"
Non-irrigated, All Areas, Mississippi, 2018

ITEM	Nov	Dec	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct
-----dollars-----												
TOTAL INCOME	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	247.50
DIRECT EXPENSES												
CUSTOM SPRAY	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	13.00	6.50	0.00
FERTILIZERS	41.55	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
FUNGICIDES	0.00	0.00	0.00	0.00	0.00	0.00	0.00	6.80	0.00	0.00	0.00	0.00
HERBICIDES	0.00	0.00	0.00	0.00	0.00	0.00	0.00	29.60	17.54	0.00	0.00	0.00
INSECTICIDES	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	29.04	8.00	0.00
SEED/PLANTS	0.00	0.00	0.00	0.00	0.00	0.00	0.00	75.50	0.00	0.00	0.00	0.00
ADJUVANTS	0.00	0.00	0.00	0.00	0.00	0.00	0.00	1.31	0.00	0.33	0.00	0.00
CUSTOM FERTILIZE	7.50	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
HAULING	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	6.75
CUSTOM LIME	15.32	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
CROP CONSULTANT	0.00	0.00	0.00	0.00	0.00	0.00	6.50	0.00	0.00	0.00	0.00	0.00
INOCULANT	0.00	0.00	0.00	0.00	0.00	0.00	0.00	3.00	0.00	0.00	0.00	0.00
SOIL TEST	3.33	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
LABOR	0.00	0.00	0.00	0.00	0.00	0.00	0.00	2.31	0.84	0.00	0.00	3.11
LEASE *	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
FUEL	0.00	0.00	0.00	0.00	0.00	0.00	0.00	1.41	0.59	0.00	0.00	2.95
REPAIR & MAINTENANCE	0.00	0.00	0.00	0.00	0.00	0.00	0.00	2.23	0.43	0.00	0.00	4.72
INTEREST ON OP. CAP.	3.22	0.00	0.00	0.00	0.00	0.00	0.15	2.41	0.31	0.51	0.11	0.08
TOTAL DIRECT EXPENSES	70.92	0.00	0.00	0.00	0.00	0.00	6.65	124.57	19.71	42.88	14.61	17.61
NET INCOME	-70.92	0.00	0.00	0.00	0.00	0.00	-6.65	-124.57	-19.71	-42.88	-14.61	229.89
NET INCOME TO DATE	-70.92	-70.92	-70.92	-70.92	-70.92	-70.92	-77.57	-202.14	-221.85	-264.73	-279.34	-49.45

Note: Cost of production estimates are based on 2017 input prices.

These fertilizer rates are based on the assumption that 30-40% of the soybean fields would be mixed to light textured fields and not heavy clay exclusively. Also, rates are based on maintenance levels associated with the expected yield in the budget. **Fertilization decisions should be based on soil tests. Soil test cost is prorated for a test every 3rd Lime cost prorated for application every 3rd year.** The budget does not include a second fungicide application to control Asian soybean rust, but the cost of treatment could range from \$10 to \$18 plus application cost per acre* Lease costs are based on hourly usage costs.

Table 12.F Estimated returns for various price/yield combinations, per acre
 Soybeans, double crop after wheat, RR, 12R 30"
 Non-irrigated, All Areas, Mississippi, 2018

			PERCENT										
PRODUCT			75	80	85	90	95	100	105	110	115	120	125
			PRODUCT PRICE										
Soybeans			7.42	7.92	8.41	8.91	9.40	9.90	10.39	10.89	11.38	11.88	12.37
PERCENT	YIELD	UNIT	dollars										
50	12.50	bu	-200	-194	-188	-182	-175	-169	-163	-157	-151	-145	-138
			-224	-218	-212	-206	-200	-193	-187	-181	-175	-169	-162
60	15.00	bu	-182	-175	-168	-160	-153	-145	-138	-130	-123	-116	-108
			-206	-199	-192	-184	-177	-169	-162	-154	-147	-140	-132
70	17.50	bu	-164	-156	-147	-138	-130	-121	-113	-104	-95	-87	-78
			-188	-180	-171	-163	-154	-145	-137	-128	-119	-111	-102
80	20.00	bu	-147	-137	-127	-117	-107	-97	-87	-77	-67	-57	-48
			-171	-161	-151	-141	-131	-121	-111	-101	-91	-82	-72
90	22.50	bu	-129	-118	-106	-95	-84	-73	-62	-51	-40	-28	-17
			-153	-142	-130	-119	-108	-97	-86	-75	-64	-52	-41
100	25.00	bu	-111	-98	-86	-74	-61	-49	-37	-24	-12	0	12
			-135	-122	-110	-98	-85	-73	-61	-48	-36	-23	-11
110	27.50	bu	-93	-79	-66	-52	-38	-25	-11	1	15	29	42
			-117	-103	-90	-76	-63	-49	-35	-22	-8	5	18
120	30.00	bu	-75	-60	-45	-31	-16	-1	13	28	43	58	72
			-99	-84	-69	-55	-40	-25	-10	4	19	34	48
130	32.50	bu	-57	-41	-25	-9	6	22	38	54	71	87	103
			-81	-65	-49	-33	-17	-1	14	30	47	63	79
140	35.00	bu	-39	-22	-5	12	29	46	64	81	98	116	133
			-63	-46	-29	-11	5	22	40	57	74	92	109
150	37.50	bu	-21	-3	15	33	52	70	89	108	126	145	163
			-45	-27	-8	9	28	46	65	84	102	121	139

The top number in each cell is Returns Above Direct Expenses.
 The bottom number in each cell is Returns Above Total Specified Expenses.
 Only the product listed has been varied to calculate net returns.
 Note: Cost of production estimates are based on 2017 input prices.

Table 13.A Estimated costs per acre
Soybeans, full-season, RR2X, stale seedbed, 12R 30"
Non-irrigated, Delta Area, Mississippi, 2018

ITEM	UNIT	PRICE	QUANTITY	AMOUNT	YOUR FARM
		dollars		dollars	
DIRECT EXPENSES					
CUSTOM SPRAY					
App by Air (5 gal)	appl	6.50	3.0000	19.50	_____
HARVEST AIDS					
Gramoxone SL	oz	0.15	16.0000	2.40	_____
Sodium Chlorate 5L	gal	5.39	0.6000	3.23	_____
FERTILIZERS					
Phosphorus (46% P2O5)	cwt	18.75	0.8700	16.31	_____
Potash (60% K2O)	cwt	18.98	1.3300	25.24	_____
FUNGICIDES					
CruiserMaxx	oz	4.25	1.6000	6.80	_____
HERBICIDES					
Glyphosate 3lbs a.e	oz	0.14	96.0000	13.44	_____
2,4-D Amine 4	pt	2.40	2.0000	4.80	_____
Select Max	pt	12.64	1.0000	12.64	_____
Valor SX	oz	4.57	2.0000	9.14	_____
Boundary	pt	11.20	2.0000	22.40	_____
Gramoxone SL 2.0	oz	0.15	48.0000	7.20	_____
Prefix	pt	6.53	2.0000	13.06	_____
Zidua	oz	9.05	1.5000	13.58	_____
INSECTICIDES					
Acephate 90SP	lb	7.43	0.7500	5.57	_____
SEED/PLANTS					
Soybean Seed RR2X	lb	1.47	50.0000	73.50	_____
ADJUVANTS					
Surfactant	pt	3.28	1.0000	3.28	_____
CUSTOM FERTILIZE					
Custom Apply Fert	acre	7.50	1.0000	7.50	_____
HAULING					
Haul Soybeans	bu	0.27	42.0000	11.34	_____
CUSTOM LIME					
Lime (Spread)	ton	46.00	0.3330	15.32	_____
CROP CONSULTANT					
Soybeans Consultant	acre	6.50	1.0000	6.50	_____
INOCULANT					
Optimize	oz	2.14	1.4000	3.00	_____
SOIL TEST					
Soil Test	acre	10.00	0.3330	3.33	_____
OPERATOR LABOR					
Tractors	hour	13.51	0.3302	4.46	_____
Harvesters	hour	13.51	0.1021	1.38	_____
HAND LABOR					
Implements	hour	9.06	0.0959	0.87	_____
UNALLOCATED LABOR					
	hour	13.51	0.3892	5.26	_____
DIESEL FUEL					
Tractors	gal	1.80	3.8252	6.89	_____
Harvesters	gal	1.80	1.3935	2.51	_____
REPAIR & MAINTENANCE					
Implements	acre	4.81	1.0000	4.81	_____
Tractors	acre	2.18	1.0000	2.18	_____
Harvesters	acre	3.49	1.0000	3.49	_____
INTEREST ON OP. CAP.	acre	9.05	1.0000	9.05	_____
TOTAL DIRECT EXPENSES				339.98	_____
FIXED EXPENSES					
Implements	acre	9.73	1.0000	9.73	_____
Tractors	acre	13.66	1.0000	13.66	_____
Harvesters	acre	13.77	1.0000	13.77	_____
TOTAL FIXED EXPENSES				37.16	_____
TOTAL SPECIFIED EXPENSES				377.14	_____

Note: Cost of production estimates are based on 2017 input prices. These fertilizer rates are based on the assumption that 30-40% of the soybean fields would be mixed to light textured fields and not heavy clay exclusively. Also, rates are based on maintenance levels associated with the expected yield in the budget. **Fertilization decisions should be based on soil tests. Soil test cost is prorated for a test every 3rd year. Lime cost prorated for application every 3rd year.** The budget does not include a second fungicide application to control Asian soybean rust, but the cost of treatment could range from \$10 to \$18 plus application cost per acre.

Table 13.B Summary of estimated costs and returns per acre
Soybeans, full-season, RR2X, stale seedbed, 12R 30"
Non-irrigated, Delta Area, Mississippi, 2018

ITEM	UNIT	PRICE	QUANTITY	AMOUNT	YOUR FARM
		dollars		dollars	
INCOME					
Soybeans	bu	9.90	42.0000	415.80	_____

TOTAL INCOME				415.80	_____
DIRECT EXPENSES					
CUSTOM SPRAY	acre	19.50	1.0000	19.50	_____
HARVEST AIDS	acre	5.63	1.0000	5.63	_____
FERTILIZERS	acre	41.55	1.0000	41.55	_____
FUNGICIDES	acre	6.80	1.0000	6.80	_____
HERBICIDES	acre	96.26	1.0000	96.26	_____
INSECTICIDES	acre	5.57	1.0000	5.57	_____
SEED/PLANTS	acre	73.50	1.0000	73.50	_____
ADJUVANTS	acre	3.28	1.0000	3.28	_____
CUSTOM FERTILIZE	acre	7.50	1.0000	7.50	_____
HAULING	acre	11.34	1.0000	11.34	_____
CUSTOM LIME	acre	15.32	1.0000	15.32	_____
CROP CONSULTANT	acre	6.50	1.0000	6.50	_____
INOCULANT	acre	3.00	1.0000	3.00	_____
SOIL TEST	acre	3.33	1.0000	3.33	_____
HAND LABOR	hour	9.06	0.0959	0.87	_____
OPERATOR LABOR	hour	13.51	0.4324	5.84	_____
UNALLOCATED LABOR	hour	13.51	0.3892	5.26	_____
DIESEL FUEL	gal	1.80	5.2188	9.40	_____
REPAIR & MAINTENANCE	acre	10.48	1.0000	10.48	_____
INTEREST ON OP. CAP.	acre	9.05	1.0000	9.05	_____

TOTAL DIRECT EXPENSES				339.98	_____
RETURNS ABOVE DIRECT EXPENSES				75.82	_____
TOTAL FIXED EXPENSES				37.16	_____

TOTAL SPECIFIED EXPENSES				377.14	_____
RETURNS ABOVE TOTAL SPECIFIED EXPENSES				38.66	_____

Note: Cost of production estimates are based on 2017 input prices. These fertilizer rates are based on the assumption that 30-40% of the soybean fields would be mixed to light textured fields and not heavy clay exclusively. Also, rates are based on maintenance levels associated with the expected yield in the budget. **Fertilization decisions should be based on soil tests. Soil test cost is prorated for a test every 3rd year. Lime cost prorated for application every 3rd year.** The budget does not include a second fungicide application to control Asian soybean rust, but the cost of treatment could range from \$10 to \$18 plus application cost per acre.

Table 13.C Estimated resource use for field operations, per acre
 Soybeans, full-season, RR2X, stale seedbed, 12R 30"
 Non-irrigated, Delta Area, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	POWER UNIT SIZE	PERF RATE	TIMES OVER	MTH	INPUT AMOUNT	IMPLEMENT	POWER UNIT	ALLOC LABOR	UNALL LABOR
						-----hours-----				
Soil Test	acre			0.33	Oct	0.3330				
Subsoiler	3 shank	MFWD 225	0.204	0.20	Oct		0.04	0.04	0.04	0.03
Lime (Spread)	ton			0.33	Oct	0.3330				
Custom Apply Fert	acre			1.00	Oct	1.0000				
Phosphorus(46% P2O5)	cwt					0.8700				
Potash (60% K2O)	cwt					1.3300				
Disk Harrow	24'	MFWD 225	0.081	1.00	Oct		0.08	0.08	0.08	0.07
Field Cultivate Fld	24'	MFWD 225	0.062	1.00	Oct		0.06	0.06	0.06	0.05
App by Air (5 gal)	appl			1.00	Feb	1.0000				
Glyphosate 3lbs a.e	oz					32.0000				
2,4-D Amine 4	pt					2.0000				
Select Max	pt					1.0000				
Valor SX	oz					2.0000				
Surfactant	pt					0.4000				
Plant & Pre-Folding	12R-30	MFWD 225	0.067	1.00	Apr		0.06	0.06	0.13	0.06
Soybean Seed RR2X	lb					50.0000				
CruiserMaxx	oz					1.6000				
Optimize	oz					1.4000				
Boundary	pt					2.0000				
Gramoxone SL 2.0	oz					48.0000				
Surfactant	pt					0.4000				
Soybeans Consultant	acre			1.00	May	1.0000				
Spray (Broadcast)	60'	MFWD 225	0.028	1.00	May		0.02	0.02	0.04	0.02
Glyphosate 3lbs a.e	oz					32.0000				
Prefix	pt					2.0000				
Spray (Broadcast)	60'	MFWD 225	0.028	1.00	May		0.02	0.02	0.04	0.02
Glyphosate 3lbs a.e	oz					32.0000				
Zidua	oz					1.5000				
App by Air (5 gal)	appl			1.00	Aug	1.0000				
Acephate 90SP	lb					0.7500				
App by Air (5 gal)	appl			1.00	Aug	1.0000				
Gramoxone SL	oz					16.0000				
Sodium Chlorate 5L	gal					0.6000				
Surfactant	pt					0.2000				
Header -Soybean	25' Flex	265 hp	0.102	1.00	Sep		0.10	0.10	0.10	0.09
Haul Soybeans	bu					42.0000				
Grain Cart Soybean	700 bu	MFWD 225	0.021	1.00	Sep		0.02	0.02	0.02	0.01
TOTALS							0.43	0.43	0.52	0.38

Note: Cost of production estimates are based on 2017 input prices.
 These fertilizer rates are based on the assumption that 30-40% of the soybean fields would be mixed to light textured fields and not heavy clay exclusively. Also, rates are based on maintenance levels associated with the expected yield in the budget. **Fertilization decisions should be based on soil tests. Soil test cost is prorated for a test every 3rd year. Lime cost prorated for application every 3rd year.** The budget does not include a second fungicide application to control Asian soybean rust, but the cost of treatment could range from \$10 to \$18 plus application cost per acre.

Table 13.D Estimated costs for field operations, per acre
Soybeans, full-season, RR2X, stale seedbed, 12R 30"
Non-irrigated, Delta Area, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	-----DIRECT COST-----							FIXED COST	TOTAL COST	
		OP INPUT	FUEL	R&M	LABOR	LEASE	INTER	TOTAL			
-----dollars-----											
Soil Test	acre	3.33						0.16	3.49		3.49
Subsoiler	3 shank		0.85	0.33	1.05			0.11	2.34	1.84	4.18
Lime (Spread)	ton	15.32						0.73	16.05		16.05
Custom Apply Fert	acre	7.50						0.36	7.86		7.86
Phosphorus (46% P2O5)	cwt	16.31						0.77	17.08		17.08
Potash (60% K2O)	cwt	25.24						1.20	26.44		26.44
Disk Harrow	24'		1.71	1.48	2.11			0.25	5.55	5.37	10.92
Field Cultivate Fld	24'		1.30	0.86	1.60			0.18	3.94	4.48	8.42
App by Air (5 gal)	appl	6.50						0.21	6.71		6.71
Glyphosate 3lbs a.e	oz	4.48						0.14	4.62		4.62
2,4-D Amine 4	pt	4.80						0.15	4.95		4.95
Select Max	pt	12.64						0.40	13.04		13.04
Valor SX	oz	9.14						0.29	9.43		9.43
Surfactant	pt	1.31						0.04	1.35		1.35
Plant & Pre-Folding	12R-30		1.41	2.23	2.34			0.14	6.12	6.22	12.34
Soybean Seed RR2X	lb	73.50						1.75	75.25		75.25
CruiserMaxx	oz	6.80						0.16	6.96		6.96
Optimize	oz	3.00						0.07	3.07		3.07
Boundary	pt	22.40						0.53	22.93		22.93
Gramoxone SL 2.0	oz	7.20						0.17	7.37		7.37
Surfactant	pt	1.31						0.03	1.34		1.34
Soybeans Consultant	acre	6.50						0.13	6.63		6.63
Spray (Broadcast)	60'		0.59	0.43	0.85			0.04	1.91	1.45	3.36
Glyphosate 3lbs a.e	oz	4.48						0.09	4.57		4.57
Prefix	pt	13.06						0.26	13.32		13.32
Spray (Broadcast)	60'		0.59	0.43	0.85			0.04	1.91	1.45	3.36
Glyphosate 3lbs a.e	oz	4.48						0.09	4.57		4.57
Zidua	oz	13.58						0.27	13.85		13.85
App by Air (5 gal)	appl	6.50						0.05	6.55		6.55
Acephate 90SP	lb	5.57						0.04	5.61		5.61
App by Air (5 gal)	appl	6.50						0.05	6.55		6.55
Gramoxone SL	oz	2.40						0.02	2.42		2.42
Sodium Chlorate 5L	gal	3.23						0.03	3.26		3.26
Surfactant	pt	0.66						0.01	0.67		0.67
Header -Soybean	25' Flex		2.51	4.37	2.62			0.04	9.54	15.10	24.64
Haul Soybeans	bu	11.34						0.04	11.38		11.38
Grain Cart Soybean	700 bu		0.44	0.35	0.55			0.01	1.35	1.25	2.60
TOTALS		299.08	9.40	10.48	11.97	0.00	9.05	339.98	37.16	377.14	

Note: Cost of production estimates are based on 2017 input prices.
These fertilizer rates are based on the assumption that 30-40% of the soybean fields would be mixed to light textured fields and not heavy clay exclusively. Also, rates are based on maintenance levels associated with the expected yield in the budget. **Fertilization decisions should be based on soil tests. Soil test cost is prorated for a test every 3rd year. Lime cost prorated for application every 3rd year.** The budget does not include a second fungicide application to control Asian soybean rust, but the cost of treatment could range from \$10 to \$18 plus application cost per acre.

Table 13.E Estimated monthly income and expense flows per acre
Soybeans, full-season, RR2X, stale seedbed, 12R 30"
Non-irrigated, Delta Area, Mississippi, 2018

ITEM	Oct	Nov	Dec	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep
-----dollars-----												
TOTAL INCOME	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	415.80
DIRECT EXPENSES												
CUSTOM SPRAY	0.00	0.00	0.00	0.00	6.50	0.00	0.00	0.00	0.00	0.00	13.00	0.00
HARVEST AIDS	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	5.63	0.00
FERTILIZERS	41.55	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
FUNGICIDES	0.00	0.00	0.00	0.00	0.00	0.00	6.80	0.00	0.00	0.00	0.00	0.00
HERBICIDES	0.00	0.00	0.00	0.00	31.06	0.00	29.60	35.60	0.00	0.00	0.00	0.00
INSECTICIDES	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	5.57	0.00
SEED/PLANTS	0.00	0.00	0.00	0.00	0.00	0.00	73.50	0.00	0.00	0.00	0.00	0.00
ADJUVANTS	0.00	0.00	0.00	0.00	1.31	0.00	1.31	0.00	0.00	0.00	0.66	0.00
CUSTOM FERTILIZE	7.50	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
HAULING	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	11.34
CUSTOM LIME	15.32	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
CROP CONSULTANT	0.00	0.00	0.00	0.00	0.00	0.00	0.00	6.50	0.00	0.00	0.00	0.00
INOCULANT	0.00	0.00	0.00	0.00	0.00	0.00	3.00	0.00	0.00	0.00	0.00	0.00
SOIL TEST	3.33	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
LABOR	4.76	0.00	0.00	0.00	0.00	0.00	2.34	1.70	0.00	0.00	0.00	3.17
LEASE *	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
FUEL	3.86	0.00	0.00	0.00	0.00	0.00	1.41	1.18	0.00	0.00	0.00	2.95
REPAIR & MAINTENANCE	2.67	0.00	0.00	0.00	0.00	0.00	2.23	0.86	0.00	0.00	0.00	4.72
INTEREST ON OP. CAP.	3.76	0.00	0.00	0.00	1.23	0.00	2.85	0.92	0.00	0.00	0.20	0.09
TOTAL DIRECT EXPENSES	82.75	0.00	0.00	0.00	40.10	0.00	123.04	46.76	0.00	0.00	25.06	22.27
NET INCOME	-82.75	0.00	0.00	0.00	-40.10	0.00	-123.04	-46.76	0.00	0.00	-25.06	393.53
NET INCOME TO DATE	-82.75	-82.75	-82.75	-82.75	-122.85	-122.85	-245.89	-292.65	-292.65	-292.65	-317.71	75.82

Note: Cost of production estimates are based on 2017 input prices.

These fertilizer rates are based on the assumption that 30-40% of the soybean fields would be mixed to light textured fields and not heavy clay exclusively. Also, rates are based on maintenance levels associated with the expected yield in the budget. **Fertilization decisions should be based on soil tests. Soil test cost is prorated for a test every 3rd year. Lime cost prorated for application every 3rd year.** The budget does not include a second fungicide application to control Asian soybean rust, but the cost of treatment could range from \$10 to \$18 plus application cost per acre.

* Lease costs are based on hourly usage costs.

Table 13.F Estimated returns for various price/yield combinations, per acre
 Soybeans, full-season, RR2X, stale seedbed, 12R 30"
 Non-irrigated, Delta Area, Mississippi, 2018

			PERCENT										
PRODUCT			75	80	85	90	95	100	105	110	115	120	125
			PRODUCT PRICE										
Soybeans			7.42	7.92	8.41	8.91	9.40	9.90	10.39	10.89	11.38	11.88	12.37
PERCENT	YIELD	UNIT	dollars										
50	21.00	bu	-178 -215	-167 -205	-157 -194	-147 -184	-136 -173	-126 -163	-115 -153	-105 -142	-95 -132	-84 -121	-74 -111
60	25.20	bu	-148 -185	-135 -173	-123 -160	-110 -148	-98 -135	-85 -123	-73 -110	-61 -98	-48 -85	-36 -73	-23 -60
70	29.40	bu	-118 -155	-103 -140	-89 -126	-74 -111	-60 -97	-45 -82	-30 -68	-16 -53	-1 -39	12 -24	27 -9
80	33.60	bu	-88 -125	-71 -108	-54 -92	-38 -75	-21 -58	-5 -42	11 -25	28 -8	44 7	61 24	78 40
90	37.80	bu	-58 -95	-39 -76	-20 -57	-2 -39	16 -20	35 -1	54 16	72 35	91 54	110 73	128 91
100	42.00	bu	-28 -65	-7 -44	13 -23	34 -2	55 17	75 38	96 59	117 80	138 101	158 121	179 142
110	46.20	bu	1 -35	24 -12	47 10	70 33	93 56	116 79	139 101	162 124	184 147	207 170	230 193
120	50.40	bu	31 -5	56 19	81 44	106 69	131 94	156 119	181 144	206 169	231 194	256 219	281 244
130	54.60	bu	62 24	89 51	116 78	143 105	170 132	197 159	224 187	251 214	278 241	305 268	332 295
140	58.80	bu	92 54	121 84	150 113	179 142	208 171	237 200	266 229	295 258	324 287	354 316	383 345
150	63.00	bu	122 84	153 116	184 147	215 178	246 209	278 240	309 272	340 303	371 334	402 365	433 396

The top number in each cell is Returns Above Direct Expenses.
 The bottom number in each cell is Returns Above Total Specified Expenses.
 Only the product listed has been varied to calculate net returns.
 Note: Cost of production estimates are based on 2017 input prices.

Table 14.A Estimated costs per acre
Soybeans, full-season, RR2X, stale seedbed, 12R 30"
Furrow irrigated, 9 ac-in., Delta Area, Mississippi, 2018

ITEM	UNIT	PRICE	QUANTITY	AMOUNT	YOUR FARM
		dollars		dollars	
DIRECT EXPENSES					
CUSTOM SPRAY					
App by Air (5 gal)	appl	6.50	4.0000	26.00	_____
HARVEST AIDS					
Gramoxone SL	oz	0.15	16.0000	2.40	_____
Sodium Chlorate 5L	gal	5.39	0.6000	3.23	_____
FERTILIZERS					
Phosphorus (46% P2O5)	cwt	18.75	0.8700	16.31	_____
Potash (60% K2O)	cwt	18.98	1.3300	25.24	_____
FUNGICIDES					
CruiserMaxx	oz	4.25	1.6000	6.80	_____
Quadris Top SBX	oz	2.75	7.0000	19.25	_____
HERBICIDES					
Glyphosate 3lbs a.e	oz	0.14	96.0000	13.44	_____
2,4-D Amine 4	pt	2.40	2.0000	4.80	_____
Select Max	pt	12.64	1.0000	12.64	_____
Valor SX	oz	4.57	2.0000	9.14	_____
Boundary	pt	11.20	2.0000	22.40	_____
Gramoxone SL 2.0	oz	0.15	48.0000	7.20	_____
Prefix	pt	6.53	2.0000	13.06	_____
Zidua	oz	9.05	1.5000	13.58	_____
INSECTICIDES					
Acephate 90SP	lb	7.43	0.7500	5.57	_____
IRRIGATION SUPPLIES					
Roll-Out Pipe	ft	0.25	33.0000	8.25	_____
SEED/PLANTS					
Soybean Seed RR2X	lb	1.47	50.0000	73.50	_____
ADJUVANTS					
Surfactant	pt	3.28	1.1000	3.61	_____
CUSTOM FERTILIZE					
Custom Apply Fert	acre	7.50	1.0000	7.50	_____
HAULING					
Haul Soybeans	bu	0.27	60.0000	16.20	_____
CUSTOM LIME					
Lime (Spread)	ton	46.00	0.3330	15.32	_____
CROP CONSULTANT					
Soybeans Consultant	acre	6.50	1.0000	6.50	_____
INOCULANT					
Optimize	oz	2.14	1.4000	3.00	_____
SOIL TEST					
Soil Test	acre	10.00	0.3330	3.33	_____
OPERATOR LABOR					
Tractors	hour	13.51	0.4713	6.36	_____
Harvesters	hour	13.51	0.1021	1.38	_____
IRRIGATE LABOR					
Special Labor	hour	9.06	0.3000	2.73	_____
Implements	hour	9.06	0.0625	0.57	_____
HAND LABOR					
Implements	hour	9.06	0.0959	0.87	_____
UNALLOCATED LABOR					
	hour	13.51	0.4454	6.02	_____
DIESEL FUEL					
Tractors	gal	1.80	5.2753	9.51	_____
Harvesters	gal	1.80	1.3935	2.51	_____
Roll-Out Pipe Irr.	gal	1.80	7.3316	13.20	_____
REPAIR & MAINTENANCE					
Implements	acre	5.47	1.0000	5.47	_____
Tractors	acre	2.98	1.0000	2.98	_____
Harvesters	acre	3.49	1.0000	3.49	_____
Roll-Out Pipe Irr.	acre	6.89	1.0000	6.89	_____
INTEREST ON OP. CAP.	acre	10.11	1.0000	10.11	_____
TOTAL DIRECT EXPENSES				410.36	_____
FIXED EXPENSES					
Implements	acre	11.96	1.0000	11.96	_____
Tractors	acre	18.75	1.0000	18.75	_____
Harvesters	acre	13.77	1.0000	13.77	_____
Roll-Out Pipe Irr.	acre	53.42	1.0000	53.42	_____
TOTAL FIXED EXPENSES				97.90	_____
TOTAL SPECIFIED EXPENSES				508.26	_____

Note: Cost of production estimates are based on 2017 input prices. These fertilizer rates are based on the assumption that 30-40% of the soybean fields would be mixed to light textured fields and not heavy clay exclusively. Also, rates are based on maintenance levels associated with the expected yield in the budget. **Fertilization decisions should be based on soil tests. Soil test cost is prorated for a test every 3rd year. Lime cost prorated for application every 3rd year.** The budget does not include a second fungicide application to control Asian soybean rust, but the cost of treatment could range from \$10 to \$18 plus application cost per acre.

Table 14.B Summary of estimated costs and returns per acre
Soybeans, full-season, RR2X, stale seedbed, 12R 30"
Furrow irrigated, 9 ac-in., Delta Area, Mississippi, 2018

ITEM	UNIT	PRICE	QUANTITY	AMOUNT	YOUR FARM
		dollars		dollars	
INCOME					
Soybeans	bu	9.90	60.0000	594.00	_____

TOTAL INCOME				594.00	_____
DIRECT EXPENSES					
CUSTOM SPRAY	acre	26.00	1.0000	26.00	_____
HARVEST AIDS	acre	5.63	1.0000	5.63	_____
FERTILIZERS	acre	41.55	1.0000	41.55	_____
FUNGICIDES	acre	26.05	1.0000	26.05	_____
HERBICIDES	acre	96.26	1.0000	96.26	_____
INSECTICIDES	acre	5.57	1.0000	5.57	_____
IRRIGATION SUPPLIES	acre	8.25	1.0000	8.25	_____
SEED/PLANTS	acre	73.50	1.0000	73.50	_____
ADJUVANTS	acre	3.61	1.0000	3.61	_____
CUSTOM FERTILIZE	acre	7.50	1.0000	7.50	_____
HAULING	acre	16.20	1.0000	16.20	_____
CUSTOM LIME	acre	15.32	1.0000	15.32	_____
CROP CONSULTANT	acre	6.50	1.0000	6.50	_____
INOCULANT	acre	3.00	1.0000	3.00	_____
SOIL TEST	acre	3.33	1.0000	3.33	_____
HAND LABOR	hour	9.06	0.0959	0.87	_____
IRRIGATE LABOR	hour	9.06	0.3625	3.30	_____
OPERATOR LABOR	hour	13.51	0.5735	7.74	_____
UNALLOCATED LABOR	hour	13.51	0.4454	6.02	_____
DIESEL FUEL	gal	1.80	14.0006	25.22	_____
REPAIR & MAINTENANCE	acre	18.83	1.0000	18.83	_____
INTEREST ON OP. CAP.	acre	10.11	1.0000	10.11	_____

TOTAL DIRECT EXPENSES				410.36	_____
RETURNS ABOVE DIRECT EXPENSES				183.64	_____
TOTAL FIXED EXPENSES				97.90	_____

TOTAL SPECIFIED EXPENSES				508.26	_____
RETURNS ABOVE TOTAL SPECIFIED EXPENSES				85.74	_____

Note: Cost of production estimates are based on 2017 input prices.
These fertilizer rates are based on the assumption that 30-40% of the soybean fields would be mixed to light textured fields and not heavy clay exclusively. Also, rates are based on maintenance levels associated with the expected yield in the budget. **Fertilization decisions should be based on soil tests. Soil test cost is prorated for a test every 3rd year. Lime cost prorated for application every 3rd year.** The budget does not include a second fungicide application to control Asian soybean rust, but the cost of treatment could range from \$10 to \$18 plus application cost per acre.

Table 14.C Estimated resource use for field operations, per acre
 Soybeans, full-season, RR2X, stale seedbed, 12R 30"
 Furrow irrigated, 9 ac-in., Delta Area, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	POWER UNIT SIZE	PERF RATE	TIMES OVER	MTH	INPUT AMOUNT	IMPLEMENT	POWER UNIT	ALLOC LABOR	UNALL LABOR
						-----hours-----				
Soil Test	acre			0.33	Oct	0.3330				
Subsoiler	3 shank	MFWD 225	0.204	0.20	Oct		0.04	0.04	0.04	0.03
Lime (Spread)	ton			0.33	Oct	0.3330				
Custom Apply Fert	acre			1.00	Oct	1.0000				
Phosphorus(46% P2O5)	cwt					0.8700				
Potash (60% K2O)	cwt					1.3300				
Disk Harrow	24'	MFWD 225	0.081	1.00	Oct		0.08	0.08	0.08	0.07
Field Cultivate Fld	24'	MFWD 225	0.062	1.00	Oct		0.06	0.06	0.06	0.05
Bed/Lister-Roll-Fold	12R-30	MFWD 225	0.062	1.00	Oct		0.06	0.06	0.06	0.05
App by Air (5 gal)	appl			1.00	Feb	1.0000				
Glyphosate 3lbs a.e	oz					32.0000				
2,4-D Amine 4	pt					2.0000				
Select Max	pt					1.0000				
Valor SX	oz					2.0000				
Surfactant	pt					0.4000				
Plant & Pre-Folding	12R-30	MFWD 225	0.067	1.00	Apr		0.06	0.06	0.13	0.06
Soybean Seed RR2X	lb					50.0000				
CruiserMaxx	oz					1.6000				
Optimize	oz					1.4000				
Boundary	pt					2.0000				
Gramoxone SL 2.0	oz					48.0000				
Surfactant	pt					0.4000				
Soybeans Consultant	acre			1.00	May	1.0000				
Spray (Broadcast)	60'	MFWD 225	0.028	1.00	May		0.02	0.02	0.04	0.02
Glyphosate 3lbs a.e	oz					32.0000				
Prefix	pt					2.0000				
Spray (Broadcast)	60'	MFWD 225	0.028	1.00	May		0.02	0.02	0.04	0.02
Glyphosate 3lbs a.e	oz					32.0000				
Zidua	oz					1.5000				
App by Air (5 gal)	appl			1.00	Jul	1.0000				
Quadris Top SBX	oz					7.0000				
Surfactant	pt					0.1000				
App by Air (5 gal)	appl			1.00	Aug	1.0000				
Acephate 90SP	lb					0.7500				
App by Air (5 gal)	appl			1.00	Aug	1.0000				
Gramoxone SL	oz					16.0000				
Sodium Chlorate 5L	gal					0.6000				
Surfactant	pt					0.2000				
Header -Soybean	25' Flex	265 hp	0.102	1.00	Sep		0.10	0.10	0.10	0.09
Haul Soybeans	bu					60.0000				
Grain Cart Soybean	700 bu	MFWD 225	0.021	1.00	Sep		0.02	0.02	0.02	0.01
Roll-Out Pipe Irr.	acre				Jul	1.0000	0.07	0.07	0.44	
TOTALS							0.57	0.57	1.03	0.44

Note: Cost of production estimates are based on 2017 input prices.

These fertilizer rates are based on the assumption that 30-40% of the soybean fields would be mixed to light textured fields and not heavy clay exclusively. Also, rates are based on maintenance levels associated with the expected yield in the budget. **Fertilization decisions should be based on soil tests. Soil test cost is prorated for a test every 3rd year. Lime cost prorated for application every 3rd year.** The budget does not include a second fungicide application to control Asian soybean rust, but the cost of treatment could range from \$10 to \$18 plus application cost per acre.

Table 14.D Estimated costs for field operations, per acre
Soybeans, full-season, RR2X, stale seedbed, 12R 30"
Furrow irrigated, 9 ac-in., Delta Area, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	-----DIRECT COST-----							FIXED COST	TOTAL COST	
		OP INPUT	FUEL	R&M	LABOR	LEASE	INTER	TOTAL			
-----dollars-----											
Soil Test	acre	3.33						0.16	3.49		3.49
Subsoiler	3 shank		0.85	0.33	1.05			0.11	2.34	1.84	4.18
Lime (Spread)	ton	15.32						0.73	16.05		16.05
Custom Apply Fert	acre	7.50						0.36	7.86		7.86
Phosphorus (46% P2O5)	cwt	16.31						0.77	17.08		17.08
Potash (60% K2O)	cwt	25.24						1.20	26.44		26.44
Disk Harrow	24'		1.71	1.48	2.11			0.25	5.55	5.37	10.92
Field Cultivate Fld	24'		1.30	0.86	1.60			0.18	3.94	4.48	8.42
Bed/Lister-Roll-Fold	12R-30		1.30	0.87	1.60			0.18	3.95	3.79	7.74
App by Air (5 gal)	appl	6.50						0.21	6.71		6.71
Glyphosate 3lbs a.e	oz	4.48						0.14	4.62		4.62
2,4-D Amine 4	pt	4.80						0.15	4.95		4.95
Select Max	pt	12.64						0.40	13.04		13.04
Valor SX	oz	9.14						0.29	9.43		9.43
Surfactant	pt	1.31						0.04	1.35		1.35
Plant & Pre-Folding	12R-30		1.41	2.23	2.34			0.14	6.12	6.22	12.34
Soybean Seed RR2X	lb	73.50						1.75	75.25		75.25
CruiserMaxx	oz	6.80						0.16	6.96		6.96
Optimize	oz	3.00						0.07	3.07		3.07
Boundary	pt	22.40						0.53	22.93		22.93
Gramoxone SL 2.0	oz	7.20						0.17	7.37		7.37
Surfactant	pt	1.31						0.03	1.34		1.34
Soybeans Consultant	acre	6.50						0.13	6.63		6.63
Spray (Broadcast)	60'		0.59	0.43	0.85			0.04	1.91	1.45	3.36
Glyphosate 3lbs a.e	oz	4.48						0.09	4.57		4.57
Prefix	pt	13.06						0.26	13.32		13.32
Spray (Broadcast)	60'		0.59	0.43	0.85			0.04	1.91	1.45	3.36
Glyphosate 3lbs a.e	oz	4.48						0.09	4.57		4.57
Zidua	oz	13.58						0.27	13.85		13.85
App by Air (5 gal)	appl	6.50						0.08	6.58		6.58
Quadris Top SBX	oz	19.25						0.23	19.48		19.48
Surfactant	pt	0.33							0.33		0.33
App by Air (5 gal)	appl	6.50						0.05	6.55		6.55
Acephate 90SP	lb	5.57						0.04	5.61		5.61
App by Air (5 gal)	appl	6.50						0.05	6.55		6.55
Gramoxone SL	oz	2.40						0.02	2.42		2.42
Sodium Chlorate 5L	gal	3.23						0.03	3.26		3.26
Surfactant	pt	0.66						0.01	0.67		0.67
Header -Soybean	25' Flex		2.51	4.37	2.62			0.04	9.54	15.10	24.64
Haul Soybeans	bu	16.20						0.06	16.26		16.26
Grain Cart Soybean	700 bu		0.44	0.35	0.55			0.01	1.35	1.25	2.60
Roll-Out Pipe Irr.	acre	8.25	14.52	7.48	4.36			0.55	35.16	56.95	92.11
TOTALS		338.27	25.22	18.83	17.93	0.00	10.11	410.36	97.90	508.26	

Note: Cost of production estimates are based on 2017 input prices.
These fertilizer rates are based on the assumption that 30-40% of the soybean fields would be mixed to light textured fields and not heavy clay exclusively. Also, rates are based on maintenance levels associated with the expected yield in the budget. **Fertilization decisions should be based on soil tests. Soil test cost is prorated for a test every 3rd year. Lime cost prorated for application every 3rd year.** The budget does not include a second fungicide application to control Asian soybean rust, but the cost of treatment could range from \$10 to \$18 plus application cost per acre.

Table 14.E Estimated monthly income and expense flows per acre
Soybeans, full-season, RR2X, stale seedbed, 12R 30"
Furrow irrigated, 9 ac-in., Delta Area, Mississippi, 2018

ITEM	Oct	Nov	Dec	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep
-----dollars-----												
TOTAL INCOME	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	594.00
DIRECT EXPENSES												
CUSTOM SPRAY	0.00	0.00	0.00	0.00	6.50	0.00	0.00	0.00	0.00	6.50	13.00	0.00
HARVEST AIDS	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	5.63	0.00
FERTILIZERS	41.55	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
FUNGICIDES	0.00	0.00	0.00	0.00	0.00	0.00	6.80	0.00	0.00	19.25	0.00	0.00
HERBICIDES	0.00	0.00	0.00	0.00	31.06	0.00	29.60	35.60	0.00	0.00	0.00	0.00
INSECTICIDES	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	5.57	0.00
IRRIGATION SUPPLIES	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	8.25	0.00	0.00	0.00
SEED/PLANTS	0.00	0.00	0.00	0.00	0.00	0.00	73.50	0.00	0.00	0.00	0.00	0.00
ADJUVANTS	0.00	0.00	0.00	0.00	1.31	0.00	1.31	0.00	0.00	0.33	0.66	0.00
CUSTOM FERTILIZE	7.50	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
HAULING	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	16.20
CUSTOM LIME	15.32	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
CROP CONSULTANT	0.00	0.00	0.00	0.00	0.00	0.00	0.00	6.50	0.00	0.00	0.00	0.00
INOCULANT	0.00	0.00	0.00	0.00	0.00	0.00	3.00	0.00	0.00	0.00	0.00	0.00
SOIL TEST	3.33	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
LABOR	6.87	0.00	0.00	0.00	0.00	0.00	2.34	1.93	2.80	0.23	0.00	3.76
LEASE *	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
FUEL	5.83	0.00	0.00	0.00	0.00	0.00	1.41	1.18	9.15	4.40	0.00	3.25
REPAIR & MAINTENANCE	3.85	0.00	0.00	0.00	0.00	0.00	2.23	0.86	5.73	1.31	0.00	4.85
INTEREST ON OP. CAP.	4.01	0.00	0.00	0.00	1.23	0.00	2.85	0.92	0.41	0.38	0.20	0.11
TOTAL DIRECT EXPENSES	88.26	0.00	0.00	0.00	40.10	0.00	123.04	46.99	26.34	32.40	25.06	28.17
NET INCOME	-88.26	0.00	0.00	0.00	-40.10	0.00	-123.04	-46.99	-26.34	-32.40	-25.06	565.83
NET INCOME TO DATE	-88.26	-88.26	-88.26	-88.26	-128.36	-128.36	-251.40	-298.39	-324.73	-357.13	-382.19	183.64

Note: Cost of production estimates are based on 2017 input prices.

These fertilizer rates are based on the assumption that 30-40% of the soybean fields would be mixed to light textured fields and not heavy clay exclusively. Also, rates are based on maintenance levels associated with the expected yield in the budget. **Fertilization decisions should be based on soil tests. Soil test cost is prorated for a test every 3rd year. Lime cost prorated for application every 3rd year.** The budget does not include a second fungicide application to control Asian soybean rust, but the cost of treatment could range from \$10 to \$18 plus application cost per acre.

* Lease costs are based on hourly usage costs.

Table 14.F Estimated returns for various price/yield combinations, per acre
 Soybeans, full-season, RR2X, stale seedbed, 12R 30"
 Furrow irrigated, 9 ac-in., Delta Area, Mississippi, 2018

PRODUCT	PERCENT												
	75	80	85	90	95	100	105	110	115	120	125		
PRODUCT PRICE													
Soybeans	7.42	7.92	8.41	8.91	9.40	9.90	10.39	10.89	11.38	11.88	12.37		
PERCENT	YIELD	UNIT	dollars										
50	30.00	bu	-179	-164	-149	-134	-120	-105	-90	-75	-60	-45	-30
			-277	-262	-247	-232	-217	-203	-188	-173	-158	-143	-128
60	36.00	bu	-136	-118	-100	-83	-65	-47	-29	-11	6	23	41
			-234	-216	-198	-180	-163	-145	-127	-109	-91	-74	-56
70	42.00	bu	-93	-72	-52	-31	-10	10	31	51	72	93	114
			-191	-170	-149	-129	-108	-87	-66	-46	-25	-4	16
80	48.00	bu	-50	-26	-3	20	44	68	91	115	139	163	186
			-148	-124	-101	-77	-53	-29	-6	17	41	65	88
90	54.00	bu	-7	18	45	72	99	125	152	179	206	232	259
			-105	-78	-52	-25	1	27	54	81	108	134	161
100	60.00	bu	35	64	94	124	153	183	213	243	272	302	332
			-62	-33	-3	26	56	85	115	145	174	204	234
110	66.00	bu	78	110	143	176	208	241	274	306	339	372	404
			-19	12	45	78	110	143	176	208	241	274	306
120	72.00	bu	120	156	192	227	263	299	334	370	406	441	477
			23	58	94	130	165	201	236	272	308	343	379
130	78.00	bu	163	202	241	279	318	356	395	434	472	511	550
			66	104	143	181	220	259	297	336	374	413	452
140	84.00	bu	206	248	289	331	373	414	456	497	539	581	622
			108	150	192	233	275	316	358	399	441	483	524
150	90.00	bu	249	294	338	383	427	472	517	561	606	650	695
			151	196	240	285	330	374	419	463	508	552	597

The top number in each cell is Returns Above Direct Expenses.
 The bottom number in each cell is Returns Above Total Specified Expenses.
 Only the product listed has been varied to calculate net returns.
 Note: Cost of production estimates are based on 2017 input prices.

Table 15.A Estimated costs per acre
Soybeans, full-season, RR2X, stale seedbed, 12R 30"
Flood irrigated, 13.5 ac-in., Delta Area, Mississippi, 2018

ITEM	UNIT	PRICE	QUANTITY	AMOUNT	YOUR FARM
		dollars		dollars	
DIRECT EXPENSES					
CUSTOM SPRAY					
App by Air (5 gal)	appl	6.50	5.0000	32.50	_____
HARVEST AIDS					
Gramoxone SL	oz	0.15	16.0000	2.40	_____
Sodium Chlorate 5L	gal	5.39	0.6000	3.23	_____
FERTILIZERS					
Phosphorus (46% P2O5)	cwt	18.75	0.8700	16.31	_____
Potash (60% K2O)	cwt	18.98	1.3300	25.24	_____
FUNGICIDES					
CruiserMaxx	oz	4.25	1.6000	6.80	_____
Quadris Top SBX	oz	2.75	7.0000	19.25	_____
HERBICIDES					
Glyphosate 3lbs a.e	oz	0.14	96.0000	13.44	_____
Select Max	pt	12.64	1.0000	12.64	_____
Valor SX	oz	4.57	2.0000	9.14	_____
Boundary	pt	11.20	2.0000	22.40	_____
Gramoxone SL 2.0	oz	0.15	48.0000	7.20	_____
Prefix	pt	6.53	2.0000	13.06	_____
INSECTICIDES					
Acephate 90SP	lb	7.43	0.7500	5.57	_____
Prevathon	oz	1.32	14.0000	18.48	_____
IncidentalPestTrt \$8	acre	8.00	1.0000	8.00	_____
SEED/PLANTS					
Soybean Seed RR2X	lb	1.47	50.0000	73.50	_____
ADJUVANTS					
Surfactant	pt	3.28	1.1000	3.61	_____
CUSTOM FERTILIZE					
Custom Apply Fert	acre	7.50	1.0000	7.50	_____
HAULING					
Haul Soybeans	bu	0.27	53.0000	14.31	_____
SURVEY & MARK LEVEES					
Survey & Mark Levees	acre	4.50	0.5000	2.25	_____
CUSTOM LIME					
Lime (Spread)	ton	46.00	0.3330	15.32	_____
CROP CONSULTANT					
Soybeans Consultant	acre	6.50	1.0000	6.50	_____
INOCULANT					
Optimize	oz	2.14	1.4000	3.00	_____
SOIL TEST					
Soil Test	acre	10.00	0.3330	3.33	_____
OPERATOR LABOR					
Tractors	hour	13.51	0.4582	6.21	_____
Harvesters	hour	13.51	0.1021	1.38	_____
IRRIGATE LABOR					
Special Labor	hour	9.06	0.3125	2.82	_____
HAND LABOR					
Implements	hour	9.06	0.1100	1.00	_____
UNALLOCATED LABOR					
	hour	13.48	0.3218	4.34	_____
DIESEL FUEL					
Tractors	gal	1.80	4.3236	7.80	_____
Harvesters	gal	1.80	1.3935	2.51	_____
Contour Flood Irr.	gal	1.80	10.9974	19.80	_____
REPAIR & MAINTENANCE					
Implements	acre	4.76	1.0000	4.76	_____
Tractors	acre	2.39	1.0000	2.39	_____
Harvesters	acre	3.49	1.0000	3.49	_____
Contour Flood Irr.	acre	13.80	1.0000	13.80	_____
INTEREST ON OP. CAP.					
	acre	10.02	1.0000	10.02	_____
TOTAL DIRECT EXPENSES				425.30	_____
FIXED EXPENSES					
Implements	acre	9.06	1.0000	9.06	_____
Tractors	acre	15.01	1.0000	15.01	_____
Harvesters	acre	13.77	1.0000	13.77	_____
Contour Flood Irr.	acre	42.34	1.0000	42.34	_____
TOTAL FIXED EXPENSES				80.18	_____
TOTAL SPECIFIED EXPENSES				505.48	_____

Note: Cost of production estimates are based on 2017 input prices. These fertilizer rates are based on the assumption that 30-40% of the soybean fields would be mixed to light textured fields and not heavy clay exclusively. Also, rates are based on maintenance levels associated with the expected yield in the budget. **Fertilization decisions should be based on soil tests. Soil test cost is prorated for a test every 3rd year. Lime cost prorated for application every 3rd year.** The budget does not include a second fungicide application to control Asian soybean rust, but the cost of treatment could range from \$10 to \$18 plus application cost per acre.

Table 15.B Summary of estimated costs and returns per acre
 Soybeans, full-season, RR2X, stale seedbed, 12R 30"
 Flood irrigated, 13.5 ac-in., Delta Area, Mississippi, 2018

ITEM	UNIT	PRICE	QUANTITY	AMOUNT	YOUR FARM
		dollars		dollars	
INCOME					
Soybeans	bu	9.90	53.0000	524.70	_____

TOTAL INCOME				524.70	_____
DIRECT EXPENSES					
CUSTOM SPRAY	acre	32.50	1.0000	32.50	_____
HARVEST AIDS	acre	5.63	1.0000	5.63	_____
FERTILIZERS	acre	41.55	1.0000	41.55	_____
FUNGICIDES	acre	26.05	1.0000	26.05	_____
HERBICIDES	acre	77.88	1.0000	77.88	_____
INSECTICIDES	acre	32.05	1.0000	32.05	_____
SEED/PLANTS	acre	73.50	1.0000	73.50	_____
ADJUVANTS	acre	3.61	1.0000	3.61	_____
CUSTOM FERTILIZE	acre	7.50	1.0000	7.50	_____
HAULING	acre	14.31	1.0000	14.31	_____
SURVEY & MARK LEVEES	acre	2.25	1.0000	2.25	_____
CUSTOM LIME	acre	15.32	1.0000	15.32	_____
CROP CONSULTANT	acre	6.50	1.0000	6.50	_____
INOCULANT	acre	3.00	1.0000	3.00	_____
SOIL TEST	acre	3.33	1.0000	3.33	_____
HAND LABOR	hour	9.06	0.1100	1.00	_____
IRRIGATE LABOR	hour	9.06	0.3125	2.82	_____
OPERATOR LABOR	hour	13.51	0.5604	7.59	_____
UNALLOCATED LABOR	hour	13.48	0.3218	4.34	_____
DIESEL FUEL	gal	1.80	16.7147	30.11	_____
REPAIR & MAINTENANCE	acre	24.44	1.0000	24.44	_____
INTEREST ON OP. CAP.	acre	10.02	1.0000	10.02	_____

TOTAL DIRECT EXPENSES				425.30	_____
RETURNS ABOVE DIRECT EXPENSES				99.40	_____
TOTAL FIXED EXPENSES				80.18	_____

TOTAL SPECIFIED EXPENSES				505.48	_____
RETURNS ABOVE TOTAL SPECIFIED EXPENSES				19.22	_____

Note: Cost of production estimates are based on 2017 input prices.
 These fertilizer rates are based on the assumption that 30-40% of the soybean fields would be mixed to light textured fields and not heavy clay exclusively. Also, rates are based on maintenance levels associated with the expected yield in the budget. **Fertilization decisions should be based on soil tests. Soil test cost is prorated for a test every 3rd year. Lime cost prorated for application every 3rd year.** The budget does not include a second fungicide application to control Asian soybean rust, but the cost of treatment could range from \$10 to \$18 plus application cost per acre.

Table 15.C Estimated resource use for field operations, per acre
 Soybeans, full-season, RR2X, stale seedbed, 12R 30"
 Flood irrigated, 13.5 ac-in., Delta Area, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	POWER UNIT SIZE	PERF RATE	TIMES OVER	MTH	INPUT AMOUNT	IMPLEMENT	POWER UNIT	ALLOC LABOR	UNALL LABOR
							-----hours-----			
Soil Test	acre			0.33	Nov	0.3330				
Disk Harrow	24'	MFWD 190	0.081	1.00	Nov		0.08	0.08	0.08	0.07
Lime (Spread)	ton			0.33	Nov	0.3330				
Custom Apply Fert	acre			1.00	Nov	1.0000				
Phosphorus(46% P2O5)	cwt					0.8700				
Potash (60% K2O)	cwt					1.3300				
Spray (Broadcast)	60'	MFWD 225	0.028	1.00	Feb		0.02	0.02	0.04	0.02
Glyphosate 3lbs a.e	oz					32.0000				
Select Max	pt					1.0000				
Surfactant	pt					0.4000				
Valor SX	oz					2.0000				
Soybeans Consultant	acre			1.00	May	1.0000				
Plant & Pre-Folding	12R-30	MFWD 190	0.067	1.00	May		0.06	0.06	0.13	0.06
Soybean Seed RR2X	lb					50.0000				
CruiserMaxx	oz					1.6000				
Optimize	oz					1.4000				
Boundary	pt					2.0000				
Gramoxone SL 2.0	oz					48.0000				
Surfactant	pt					0.4000				
Spray (Broadcast)	60'	MFWD 190	0.028	1.00	May		0.02	0.02	0.04	0.02
Glyphosate 3lbs a.e	oz					32.0000				
Prefix	pt					2.0000				
Spray (Broadcast)	60'	MFWD 190	0.028	1.00	Jun		0.02	0.02	0.04	0.02
Glyphosate 3lbs a.e	oz					32.0000				
App by Air (5 gal)	appl			1.00	Jul	1.0000				
Quadris Top SBX	oz					7.0000				
Surfactant	pt					0.1000				
App by Air (5 gal)	appl			1.00	Aug	1.0000				
Acephate 90SP	lb					0.7500				
App by Air (5 gal)	appl			1.00	Aug	1.0000				
Prevathon	oz					14.0000				
Incidental Pest				1.00	Sep					
App by Air (5 gal)	appl					1.0000				
IncidentalPestTrt \$8	acre					1.0000				
App by Air (5 gal)	appl			1.00	Sep	1.0000				
Gramoxone SL	oz					16.0000				
Sodium Chlorate 5L	gal					0.6000				
Surfactant	pt					0.2000				
Header -Soybean	25' Flex	265 hp	0.102	1.00	Oct		0.10	0.10	0.10	0.09
Haul Soybeans	bu					53.0000				
Grain Cart Soybean	700 bu	MFWD 190	0.021	1.00	Oct		0.02	0.02	0.02	0.01
Contour Flood Irr.	acre				Jul	1.0000	0.20	0.20	0.51	
TOTALS							0.56	0.56	0.98	0.32

Note: Cost of production estimates are based on 2017 input prices.
 These fertilizer rates are based on the assumption that 30-40% of the soybean fields would be mixed to light textured fields and not heavy clay exclusively. Also, rates are based on maintenance levels associated with the expected yield in the budget. **Fertilization decisions should be based on soil tests. Soil test cost is prorated for a test every 3rd year. Lime cost prorated for application every 3rd year.** The budget does not include a second fungicide application to control Asian soybean rust, but the cost of treatment could range from \$10 to \$18 plus application cost per acre.

Table 15.D Estimated costs for field operations, per acre
Soybeans, full-season, RR2X, stale seedbed, 12R 30"
Flood irrigated, 13.5 ac-in., Delta Area, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	-----DIRECT COST-----							FIXED COST	TOTAL COST	
		OP INPUT	FUEL	R&M	LABOR	LEASE	INTER	TOTAL			
-----dollars-----											
Soil Test	acre	3.33						0.16	3.49		3.49
Disk Harrow	24'		1.44	1.38	2.11			0.23	5.16	4.78	9.94
Lime (Spread)	ton	15.32						0.73	16.05		16.05
Custom Apply Fert	acre	7.50						0.36	7.86		7.86
Phosphorus (46% P2O5)	cwt	16.31						0.77	17.08		17.08
Potash (60% K2O)	cwt	25.24						1.20	26.44		26.44
Spray (Broadcast)	60'		0.59	0.43	0.85			0.07	1.94	1.45	3.39
Glyphosate 3lbs a.e	oz	4.48						0.16	4.64		4.64
Select Max	pt	12.64						0.45	13.09		13.09
Surfactant	pt	1.31						0.05	1.36		1.36
Valor SX	oz	9.14						0.33	9.47		9.47
Soybeans Consultant	acre	6.50						0.15	6.65		6.65
Plant & Pre-Folding	12R-30		1.19	2.16	2.34			0.14	5.83	5.72	11.55
Soybean Seed RR2X	lb	73.50						1.75	75.25		75.25
CruiserMaxx	oz	6.80						0.16	6.96		6.96
Optimize	oz	3.00						0.07	3.07		3.07
Boundary	pt	22.40						0.53	22.93		22.93
Gramoxone SL 2.0	oz	7.20						0.17	7.37		7.37
Surfactant	pt	1.31						0.03	1.34		1.34
Spray (Broadcast)	60'		0.50	0.39	0.85			0.04	1.78	1.24	3.02
Glyphosate 3lbs a.e	oz	4.48						0.11	4.59		4.59
Prefix	pt	13.06						0.31	13.37		13.37
Spray (Broadcast)	60'		0.50	0.39	0.85			0.03	1.77	1.24	3.01
Glyphosate 3lbs a.e	oz	4.48						0.09	4.57		4.57
App by Air (5 gal)	appl	6.50						0.10	6.60		6.60
Quadris Top SBX	oz	19.25						0.30	19.55		19.55
Surfactant	pt	0.33						0.01	0.34		0.34
App by Air (5 gal)	appl	6.50						0.08	6.58		6.58
Acephate 90SP	lb	5.57						0.07	5.64		5.64
App by Air (5 gal)	appl	6.50						0.08	6.58		6.58
Prevathon	oz	18.48						0.22	18.70		18.70
Incidental Pest											
App by Air (5 gal)	appl	6.50						0.05	6.55		6.55
IncidentalPestTrt \$8	acre	8.00						0.06	8.06		8.06
App by Air (5 gal)	appl	6.50						0.05	6.55		6.55
Gramoxone SL	oz	2.40						0.02	2.42		2.42
Sodium Chlorate 5L	gal	3.23						0.03	3.26		3.26
Surfactant	pt	0.66						0.01	0.67		0.67
Header -Soybean	25' Flex		2.51	4.37	2.62			0.04	9.54	15.10	24.64
Haul Soybeans	bu	14.31						0.06	14.37		14.37
Grain Cart Soybean	700 bu		0.37	0.32	0.55				1.24	1.09	2.33
Contour Flood Irr.	acre	2.25	23.01	15.00	5.58			0.75	46.59	49.56	96.15
TOTALS		344.98	30.11	24.44	15.75	0.00	10.02	425.30	80.18	505.48	

Note: Cost of production estimates are based on 2017 input prices.

These fertilizer rates are based on the assumption that 30-40% of the soybean fields would be mixed to light textured fields and not heavy clay exclusively. Also, rates are based on maintenance levels associated with the expected yield in the budget. **Fertilization decisions should be based on soil tests. Soil test cost is prorated for a test every 3rd year. Lime cost prorated for application every 3rd year.** The budget does not include a second fungicide application to control Asian soybean rust, but the cost of treatment could range from \$10 to \$18 plus application cost per acre.

Table 15.E Estimated monthly income and expense flows per acre
 Soybeans, full-season, RR2X, stale seedbed, 12R 30"
 Flood irrigated, 13.5 ac-in., Delta Area, Mississippi, 2018

ITEM	Nov	Dec	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct
-----dollars-----												
TOTAL INCOME	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	524.70
DIRECT EXPENSES												
CUSTOM SPRAY	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	6.50	13.00	13.00	0.00
HARVEST AIDS	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	5.63	0.00
FERTILIZERS	41.55	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
FUNGICIDES	0.00	0.00	0.00	0.00	0.00	0.00	6.80	0.00	19.25	0.00	0.00	0.00
HERBICIDES	0.00	0.00	0.00	26.26	0.00	0.00	47.14	4.48	0.00	0.00	0.00	0.00
INSECTICIDES	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	24.05	8.00	0.00
SEED/PLANTS	0.00	0.00	0.00	0.00	0.00	0.00	73.50	0.00	0.00	0.00	0.00	0.00
ADJUVANTS	0.00	0.00	0.00	1.31	0.00	0.00	1.31	0.00	0.33	0.00	0.66	0.00
CUSTOM FERTILIZE	7.50	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
HAULING	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	14.31
SURVEY & MARK LEVEES	0.00	0.00	0.00	0.00	0.00	0.00	0.00	2.25	0.00	0.00	0.00	0.00
CUSTOM LIME	15.32	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
CROP CONSULTANT	0.00	0.00	0.00	0.00	0.00	0.00	6.50	0.00	0.00	0.00	0.00	0.00
INOCULANT	0.00	0.00	0.00	0.00	0.00	0.00	3.00	0.00	0.00	0.00	0.00	0.00
SOIL TEST	3.33	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
LABOR	2.11	0.00	0.00	0.85	0.00	0.00	3.64	2.65	1.58	1.58	0.17	3.17
LEASE *	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
FUEL	1.44	0.00	0.00	0.59	0.00	0.00	1.69	8.27	7.52	7.52	0.20	2.88
REPAIR & MAINTENANCE	1.38	0.00	0.00	0.43	0.00	0.00	2.55	9.37	2.97	2.97	0.08	4.69
INTEREST ON OP. CAP.	3.45	0.00	0.00	1.06	0.00	0.00	3.47	0.52	0.60	0.60	0.22	0.10
TOTAL DIRECT EXPENSES	76.08	0.00	0.00	30.50	0.00	0.00	149.60	27.54	38.75	49.72	27.96	25.15
NET INCOME	-76.08	0.00	0.00	-30.50	0.00	0.00	-149.60	-27.54	-38.75	-49.72	-27.96	499.55
NET INCOME TO DATE	-76.08	-76.08	-76.08	-106.58	-106.58	-106.58	-256.18	-283.72	-322.47	-372.19	-400.15	99.40

Note: Cost of production estimates are based on 2017 input prices.

These fertilizer rates are based on the assumption that 30-40% of the soybean fields would be mixed to light textured fields and not heavy clay exclusively. Also, rates are based on maintenance levels associated with the expected yield in the budget. **Fertilization decisions should be based on soil tests. Soil test cost is prorated for a test every 3rd year. Lime cost prorated for application every 3rd year.** The budget does not include a second fungicide application to control Asian soybean rust, but the cost of treatment could range from \$10 to \$18 plus application cost per acre.

* Lease costs are based on hourly usage costs.

Table 15.F Estimated returns for various price/yield combinations, per acre
 Soybeans, full-season, RR2X, stale seedbed, 12R 30"
 Flood irrigated, 13.5 ac-in., Delta Area, Mississippi, 2018

PRODUCT	PERCENT												
	75	80	85	90	95	100	105	110	115	120	125		
PRODUCT PRICE													
Soybeans	7.42	7.92	8.41	8.91	9.40	9.90	10.39	10.89	11.38	11.88	12.37		
PERCENT	YIELD	UNIT	dollars										
50	26.50	bu	-221 -301	-208 -288	-195 -275	-182 -262	-168 -249	-155 -235	-142 -222	-129 -209	-116 -196	-103 -183	-90 -170
60	31.80	bu	-183 -263	-167 -247	-151 -232	-136 -216	-120 -200	-104 -184	-88 -169	-73 -153	-57 -137	-41 -121	-26 -106
70	37.10	bu	-145 -225	-127 -207	-108 -188	-90 -170	-72 -152	-53 -133	-35 -115	-16 -97	1 -78	19 -60	38 -42
80	42.40	bu	-107 -187	-86 -166	-65 -145	-44 -124	-23 -103	-2 -82	18 -61	39 -40	60 -19	81 1	102 22
90	47.70	bu	-69 -149	-46 -126	-22 -102	1 -79	24 -55	48 -31	71 -8	95 15	119 39	142 62	166 86
100	53.00	bu	-31 -111	-5 -85	20 -59	46 -33	73 -7	99 19	125 45	151 71	178 97	204 124	230 150
110	58.30	bu	6 -74	34 -45	63 -16	92 12	121 41	150 70	179 99	208 127	237 156	265 185	294 214
120	63.60	bu	44 -36	75 -4	107 26	138 58	169 89	201 121	232 152	264 184	295 215	327 247	358 278
130	68.90	bu	81 1	116 35	150 70	184 104	218 138	252 172	286 206	320 240	354 274	388 308	423 342
140	74.20	bu	119 39	156 76	193 113	230 149	266 186	303 223	340 260	376 296	413 333	450 370	487 406
150	79.50	bu	157 77	197 116	236 156	275 195	315 235	354 274	393 313	433 353	472 392	511 431	551 471

The top number in each cell is Returns Above Direct Expenses.
 The bottom number in each cell is Returns Above Total Specified Expenses.
 Only the product listed has been varied to calculate net returns.
 Note: Cost of production estimates are based on 2017 input prices.

Table 16.A Estimated costs per acre
Soybeans, double crop after wheat, RR2X, 12R 30"
Pivot irrigated, 7.5 ac-in., All Areas, Mississippi, 2018

ITEM	UNIT	PRICE	QUANTITY	AMOUNT	YOUR FARM
		dollars		dollars	
DIRECT EXPENSES					
CUSTOM SPRAY					
App by Air (5 gal)	appl	6.50	4.0000	26.00	_____
FERTILIZERS					
Phosphorus (46% P2O5)	cwt	18.75	0.8700	16.31	_____
Potash (60% K2O)	cwt	18.98	1.3300	25.24	_____
FUNGICIDES					
CruiserMaxx	oz	4.25	1.6000	6.80	_____
Quadris Top SBX	oz	2.75	7.0000	19.25	_____
HERBICIDES					
Boundary	pt	11.20	2.0000	22.40	_____
Gramoxone SL 2.0	oz	0.15	48.0000	7.20	_____
Glyphosate 3lbs a.e	oz	0.14	32.0000	4.48	_____
Prefix	pt	6.53	2.0000	13.06	_____
INSECTICIDES					
Acephate 90SP	lb	7.43	0.7500	5.57	_____
Prevathon	oz	1.32	14.0000	18.48	_____
Bifenthrin	oz	0.78	6.4000	4.99	_____
IncidentalPestTrt	\$8 acre	8.00	1.0000	8.00	_____
SEED/PLANTS					
Soybean Seed RR2X	lb	1.47	50.0000	73.50	_____
ADJUVANTS					
Surfactant	pt	3.28	0.6000	1.97	_____
CUSTOM FERTILIZE					
Custom Apply Fert	acre	7.50	1.0000	7.50	_____
HAULING					
Haul Soybeans	bu	0.27	50.0000	13.50	_____
CUSTOM LIME					
Lime (Spread)	ton	46.00	0.3330	15.32	_____
CROP CONSULTANT					
Soybeans Consultant	acre	6.50	1.0000	6.50	_____
INOCULANT					
Optimize	oz	2.14	1.4000	3.00	_____
SOIL TEST					
Soil Test	acre	10.00	0.3330	3.33	_____
OPERATOR LABOR					
Tractors	hour	13.51	0.1171	1.58	_____
Harvesters	hour	13.51	0.1021	1.38	_____
IRRIGATE LABOR					
Special Labor	hour	9.06	0.0518	0.47	_____
HAND LABOR					
Implements	hour	9.06	0.0817	0.74	_____
UNALLOCATED LABOR	hour	13.57	0.1886	2.56	_____
DIESEL FUEL					
Tractors	gal	1.80	1.3567	2.44	_____
Harvesters	gal	1.80	1.3935	2.51	_____
1/2-mi Pivot Irr.	gal	1.80	16.4057	29.53	_____
REPAIR & MAINTENANCE					
Implements	acre	3.12	1.0000	3.12	_____
Tractors	acre	0.77	1.0000	0.77	_____
Harvesters	acre	3.49	1.0000	3.49	_____
1/2-mi Pivot Irr.	acre	11.57	1.0000	11.57	_____
INTEREST ON OP. CAP.	acre	7.78	1.0000	7.78	_____
TOTAL DIRECT EXPENSES				370.34	_____
FIXED EXPENSES					
Implements	acre	5.40	1.0000	5.40	_____
Tractors	acre	4.85	1.0000	4.85	_____
Harvesters	acre	13.77	1.0000	13.77	_____
1/2-mi Pivot Irr.	acre	41.81	1.0000	41.81	_____
TOTAL FIXED EXPENSES				65.83	_____
TOTAL SPECIFIED EXPENSES				436.17	_____

Note: Cost of production estimates are based on 2017 input prices.
Fertilization decisions should be based on soil tests. Soil test cost is prorated for a test every 3rd year. Lime cost prorated for application every 3rd year. The budget does not include a second fungicide application to control Asian soybean rust, but the cost of treatment could range from \$10 to \$18 plus application cost per acre.

Table 16.B Summary of estimated costs and returns per acre
 Soybeans, double crop after wheat, RR2X, 12R 30"
 Pivot irrigated, 7.5 ac-in., All Areas, Mississippi, 2018

ITEM	UNIT	PRICE	QUANTITY	AMOUNT	YOUR FARM
		dollars		dollars	
INCOME					
Soybeans	bu	9.90	50.0000	495.00	_____

TOTAL INCOME				495.00	_____
DIRECT EXPENSES					
CUSTOM SPRAY	acre	26.00	1.0000	26.00	_____
FERTILIZERS	acre	41.55	1.0000	41.55	_____
FUNGICIDES	acre	26.05	1.0000	26.05	_____
HERBICIDES	acre	47.14	1.0000	47.14	_____
INSECTICIDES	acre	37.04	1.0000	37.04	_____
SEED/PLANTS	acre	73.50	1.0000	73.50	_____
ADJUVANTS	acre	1.97	1.0000	1.97	_____
CUSTOM FERTILIZE	acre	7.50	1.0000	7.50	_____
HAULING	acre	13.50	1.0000	13.50	_____
CUSTOM LIME	acre	15.32	1.0000	15.32	_____
CROP CONSULTANT	acre	6.50	1.0000	6.50	_____
INOCULANT	acre	3.00	1.0000	3.00	_____
SOIL TEST	acre	3.33	1.0000	3.33	_____
HAND LABOR	hour	9.06	0.0817	0.74	_____
IRRIGATE LABOR	hour	9.06	0.0518	0.47	_____
OPERATOR LABOR	hour	13.51	0.2193	2.96	_____
UNALLOCATED LABOR	hour	13.57	0.1886	2.56	_____
DIESEL FUEL	gal	1.80	19.1560	34.48	_____
REPAIR & MAINTENANCE	acre	18.95	1.0000	18.95	_____
INTEREST ON OP. CAP.	acre	7.78	1.0000	7.78	_____

TOTAL DIRECT EXPENSES				370.34	_____
RETURNS ABOVE DIRECT EXPENSES				124.66	_____
TOTAL FIXED EXPENSES				65.83	_____

TOTAL SPECIFIED EXPENSES				436.17	_____
RETURNS ABOVE TOTAL SPECIFIED EXPENSES				58.83	_____

Note: Cost of production estimates are based on 2017 input prices.

Fertilization decisions should be based on soil tests. Soil test cost is prorated for a test every 3rd year. Lime cost prorated for application every 3rd year. The budget does not include a second fungicide application to control Asian soybean rust, but the cost of treatment could range from \$10 to \$18 plus application cost per acre.

Table 16.C Estimated resource use for field operations, per acre
 Soybeans, double crop after wheat, RR2X, 12R 30"
 Pivot irrigated, 7.5 ac-in., All Areas, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	POWER UNIT SIZE	PERF RATE	TIMES OVER	MTH	INPUT AMOUNT	IMPLEMENT	POWER UNIT	ALLOC LABOR	UNALL LABOR
						-----hours-----				
Soil Test	acre			0.33	Nov	0.3330				
Lime (Spread)	ton			0.33	Nov	0.3330				
Custom Apply Fert	acre			1.00	Nov	1.0000				
Phosphorus(46% P2O5)	cwt					0.8700				
Potash (60% K2O)	cwt					1.3300				
Soybeans Consultant	acre			1.00	May	1.0000				
Plant & Pre-Folding	12R-30	MFWD 225	0.067	1.00	Jun		0.06	0.06	0.13	0.05
Soybean Seed RR2X	lb					50.0000				
CruiserMaxx	oz					1.6000				
Optimize	oz					1.4000				
Boundary	pt					2.0000				
Gramoxone SL 2.0	oz					48.0000				
Surfactant	pt					0.4000				
Spray (Broadcast)	60'	MFWD 225	0.028	1.00	Jul		0.02	0.02	0.04	0.02
Glyphosate 3lbs a.e	oz					32.0000				
Prefix	pt					2.0000				
App by Air (5 gal)	appl			1.00	Aug	1.0000				
Quadris Top SBX	oz					7.0000				
Surfactant	pt					0.1000				
App by Air (5 gal)	appl			1.00	Aug	1.0000				
Acephate 90SP	lb					0.7500				
App by Air (5 gal)	appl			1.00	Aug	1.0000				
Prevathon	oz					14.0000				
Surfactant	pt					0.1000				
Bifenthrin	oz					6.4000				
Incidental Pest				1.00	Sep					
App by Air (5 gal)	appl					1.0000				
IncidentalPestTrt \$8	acre					1.0000				
Header -Soybean	25' Flex	265 hp	0.102	1.00	Oct		0.10	0.10	0.10	0.08
Haul Soybeans	bu					50.0000				
Grain Cart Soybean	700 bu	MFWD 225	0.021	1.00	Oct		0.02	0.02	0.02	0.01
1/2-mi Pivot Irr.	acre				Jul	1.0000			0.05	
TOTALS							0.21	0.21	0.35	0.18

Note: Cost of production estimates are based on 2017 input prices.
 These fertilizer rates are based on the assumption that 30-40% of the soybean fields would be mixed to light textured fields and not heavy clay exclusively. Also, rates are based on maintenance levels associated with the expected yield in the budget. **Fertilization decisions should be based on soil tests. Soil test cost is prorated for a test every 3rd year. Lime cost prorated for application every 3rd year.** The budget does not include a second fungicide application to control Asian soybean rust, but the cost of treatment could range from \$10 to \$18 plus application cost per acre.

Table 16.D Estimated costs for field operations, per acre
Soybeans, double crop after wheat, RR2X, 12R 30"
Pivot irrigated, 7.5 ac-in., All Areas, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	-----DIRECT COST-----							FIXED COST	TOTAL COST
		OP INPUT	FUEL	R&M	LABOR	LEASE	INTER	TOTAL		
-----dollars-----										
Soil Test	acre	3.33						0.16	3.49	3.49
Lime (Spread)	ton	15.32						0.73	16.05	16.05
Custom Apply Fert	acre	7.50						0.36	7.86	7.86
Phosphorus(46% P2O5)	cwt	16.31						0.77	17.08	17.08
Potash (60% K2O)	cwt	25.24						1.20	26.44	26.44
Soybeans Consultant	acre	6.50						0.15	6.65	6.65
Plant & Pre-Folding	12R-30		1.41	2.23	2.31			0.12	6.07	6.22
Soybean Seed RR2X	lb	73.50						1.45	74.95	74.95
CruiserMaxx	oz	6.80						0.13	6.93	6.93
Optimize	oz	3.00						0.06	3.06	3.06
Boundary	pt	22.40						0.44	22.84	22.84
Gramoxone SL 2.0	oz	7.20						0.14	7.34	7.34
Surfactant	pt	1.31						0.03	1.34	1.34
Spray (Broadcast)	60'		0.59	0.43	0.84			0.03	1.89	1.45
Glyphosate 3lbs a.e	oz	4.48						0.07	4.55	4.55
Prefix	pt	13.06						0.21	13.27	13.27
App by Air (5 gal)	appl	6.50						0.08	6.58	6.58
Quadris Top SBX	oz	19.25						0.23	19.48	19.48
Surfactant	pt	0.33							0.33	0.33
App by Air (5 gal)	appl	6.50						0.08	6.58	6.58
Acephate 90SP	lb	5.57						0.07	5.64	5.64
App by Air (5 gal)	appl	6.50						0.08	6.58	6.58
Prevathon	oz	18.48						0.22	18.70	18.70
Surfactant	pt	0.33							0.33	0.33
Bifenthrin	oz	4.99						0.06	5.05	5.05
Incidental Pest										
App by Air (5 gal)	appl	6.50						0.05	6.55	6.55
IncidentalPestTrt \$8	acre	8.00						0.06	8.06	8.06
Header -Soybean	25' Flex		2.51	4.37	2.57			0.04	9.49	15.10
Haul Soybeans	bu	13.50						0.05	13.55	13.55
Grain Cart Soybean	700 bu		0.44	0.35	0.54			0.01	1.34	1.25
1/2-mi Pivot Irr.	acre		29.53	11.57	0.47			0.70	42.27	41.81
TOTALS		302.40	34.48	18.95	6.73	0.00	7.78	370.34	65.83	436.17

Note: Cost of production estimates are based on 2017 input prices.

These fertilizer rates are based on the assumption that 30-40% of the soybean fields would be mixed to light textured fields and not heavy clay exclusively. Also, rates are based on maintenance levels associated with the expected yield in the budget. **Fertilization decisions should be based on soil tests. Soil test cost is prorated for a test every 3rd year. Lime cost prorated for application every 3rd year.** The budget does not include a second fungicide application to control Asian soybean rust, but the cost of treatment could range from \$10 to \$18 plus application cost per acre.

Table 16.E Estimated monthly income and expense flows per acre
 Soybeans, double crop after wheat, RR2X, 12R 30"
 Pivot irrigated, 7.5 ac-in., All Areas, Mississippi, 2018

ITEM	Nov	Dec	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct
-----dollars-----												
TOTAL INCOME	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	495.00
DIRECT EXPENSES												
CUSTOM SPRAY	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	19.50	6.50	0.00
FERTILIZERS	41.55	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
FUNGICIDES	0.00	0.00	0.00	0.00	0.00	0.00	0.00	6.80	0.00	19.25	0.00	0.00
HERBICIDES	0.00	0.00	0.00	0.00	0.00	0.00	0.00	29.60	17.54	0.00	0.00	0.00
INSECTICIDES	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	29.04	8.00	0.00
SEED/PLANTS	0.00	0.00	0.00	0.00	0.00	0.00	0.00	73.50	0.00	0.00	0.00	0.00
ADJUVANTS	0.00	0.00	0.00	0.00	0.00	0.00	0.00	1.31	0.00	0.66	0.00	0.00
CUSTOM FERTILIZE	7.50	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
HAULING	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	13.50
CUSTOM LIME	15.32	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
CROP CONSULTANT	0.00	0.00	0.00	0.00	0.00	0.00	6.50	0.00	0.00	0.00	0.00	0.00
INOCULANT	0.00	0.00	0.00	0.00	0.00	0.00	0.00	3.00	0.00	0.00	0.00	0.00
SOIL TEST	3.33	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
LABOR	0.00	0.00	0.00	0.00	0.00	0.00	0.34	2.35	0.89	0.04	0.00	3.11
LEASE *	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
FUEL	0.00	0.00	0.00	0.00	0.00	0.00	0.00	10.27	12.40	8.86	0.00	2.95
REPAIR & MAINTENANCE	0.00	0.00	0.00	0.00	0.00	0.00	0.00	12.51	1.17	0.55	0.00	4.72
INTEREST ON OP. CAP.	3.22	0.00	0.00	0.00	0.00	0.00	0.16	2.75	0.51	0.93	0.11	0.10
TOTAL DIRECT EXPENSES	70.92	0.00	0.00	0.00	0.00	0.00	7.00	142.09	32.51	78.83	14.61	24.38
NET INCOME	-70.92	0.00	0.00	0.00	0.00	0.00	-7.00	-142.09	-32.51	-78.83	-14.61	470.62
NET INCOME TO DATE	-70.92	-70.92	-70.92	-70.92	-70.92	-70.92	-77.92	-220.01	-252.52	-331.35	-345.96	124.66

Note: Cost of production estimates are based on 2017 input prices.

Fertilization decisions should be based on soil tests. Soil test cost is prorated for a test every 3rd year. Lime cost prorated for application every 3rd year. The budget does not include a second fungicide application to control Asian soybean rust, but the cost of treatment could range from \$10 to \$18 plus application cost per acre

* Lease costs are based on hourly usage costs.

Table 16.F Estimated returns for various price/yield combinations, per acre
 Soybeans, double crop after wheat, RR2X, 12R 30"
 Pivot irrigated, 7.5 ac-in., All Areas, Mississippi, 2018

			-----PERCENT-----										
PRODUCT			75	80	85	90	95	100	105	110	115	120	125
			-----PRODUCT PRICE-----										
Soybeans			7.42	7.92	8.41	8.91	9.40	9.90	10.39	10.89	11.38	11.88	12.37
PERCENT	YIELD	UNIT	-----dollars-----										
50	25.00	bu	-177 -243	-165 -231	-153 -219	-140 -206	-128 -194	-116 -181	-103 -169	-91 -157	-78 -144	-66 -132	-54 -120
60	30.00	bu	-142 -208	-127 -193	-112 -178	-97 -163	-82 -148	-67 -133	-53 -118	-38 -104	-23 -89	-8 -74	6 -59
70	35.00	bu	-106 -172	-89 -154	-71 -137	-54 -120	-37 -102	-19 -85	-2 -68	14 -50	32 -33	49 -16	66 1
80	40.00	bu	-70 -136	-50 -116	-31 -96	-11 -77	8 -57	28 -37	48 -17	67 2	87 21	107 41	127 61
90	45.00	bu	-34 -100	-12 -78	9 -56	31 -33	54 -11	76 10	98 32	121 55	143 77	165 99	187 122
100	50.00	bu	0 -64	25 -40	50 -15	75 9	99 34	124 58	149 83	174 108	198 133	223 157	248 182
110	55.00	bu	36 -29	63 -1	91 25	118 52	145 79	172 106	200 134	227 161	254 188	281 215	308 243
120	60.00	bu	72 6	102 36	131 66	161 95	191 125	220 155	250 184	280 214	310 244	339 273	369 303
130	65.00	bu	108 42	140 74	172 106	204 138	236 171	269 203	301 235	333 267	365 299	397 331	429 364
140	70.00	bu	143 78	178 112	213 147	247 182	282 216	317 251	351 286	386 320	421 355	455 390	490 424
150	75.00	bu	179 113	216 151	254 188	291 225	328 262	365 299	402 336	439 373	476 410	513 448	551 485

The top number in each cell is Returns Above Direct Expenses.
 The bottom number in each cell is Returns Above Total Specified Expenses.
 Only the product listed has been varied to calculate net returns.
 Note: Cost of production estimates are based on 2017 input prices.

Table 17.A Estimated costs per acre
Soybeans, double crop after wheat, RR2X, 12R 30"
Non-irrigated, All Areas, Mississippi, 2018

ITEM	UNIT	PRICE	QUANTITY	AMOUNT	YOUR FARM
		dollars		dollars	
DIRECT EXPENSES					
CUSTOM SPRAY					
App by Air (5 gal)	appl	6.50	3.0000	19.50	_____
FERTILIZERS					
Phosphorus (46% P2O5)	cwt	18.75	0.8700	16.31	_____
Potash (60% K2O)	cwt	18.98	1.3300	25.24	_____
FUNGICIDES					
CruiserMaxx	oz	4.25	1.6000	6.80	_____
HERBICIDES					
Boundary	pt	11.20	2.0000	22.40	_____
Gramoxone SL 2.0	oz	0.15	48.0000	7.20	_____
Glyphosate 3lbs a.e	oz	0.14	32.0000	4.48	_____
Prefix	pt	6.53	2.0000	13.06	_____
INSECTICIDES					
Acephate 90SP	lb	7.43	0.7500	5.57	_____
Prevathon	oz	1.32	14.0000	18.48	_____
Bifenthrin	oz	0.78	6.4000	4.99	_____
IncidentalPestTrt \$8	acre	8.00	1.0000	8.00	_____
SEED/PLANTS					
Soybean Seed RR2X	lb	1.47	50.0000	73.50	_____
ADJUVANTS					
Surfactant	pt	3.28	0.5000	1.64	_____
CUSTOM FERTILIZE					
Custom Apply Fert	acre	7.50	1.0000	7.50	_____
HAULING					
Haul Soybeans	bu	0.27	25.0000	6.75	_____
CUSTOM LIME					
Lime (Spread)	ton	46.00	0.3330	15.32	_____
CROP CONSULTANT					
Soybeans Consultant	acre	6.50	1.0000	6.50	_____
INOCULANT					
Optimize	oz	2.14	1.4000	3.00	_____
SOIL TEST					
Soil Test	acre	10.00	0.3330	3.33	_____
OPERATOR LABOR					
Tractors	hour	13.51	0.1171	1.58	_____
Harvesters	hour	13.51	0.1021	1.38	_____
HAND LABOR					
Implements	hour	9.06	0.0817	0.74	_____
UNALLOCATED LABOR					
	hour	13.57	0.1886	2.56	_____
DIESEL FUEL					
Tractors	gal	1.80	1.3567	2.44	_____
Harvesters	gal	1.80	1.3935	2.51	_____
REPAIR & MAINTENANCE					
Implements	acre	3.12	1.0000	3.12	_____
Tractors	acre	0.77	1.0000	0.77	_____
Harvesters	acre	3.49	1.0000	3.49	_____
INTEREST ON OP. CAP.	acre	6.75	1.0000	6.75	_____
TOTAL DIRECT EXPENSES				294.91	_____
FIXED EXPENSES					
Implements	acre	5.40	1.0000	5.40	_____
Tractors	acre	4.85	1.0000	4.85	_____
Harvesters	acre	13.77	1.0000	13.77	_____
TOTAL FIXED EXPENSES				24.02	_____
TOTAL SPECIFIED EXPENSES				318.93	_____

Note: Cost of production estimates are based on 2017 input prices. These fertilizer rates are based on the assumption that 30-40% of the soybean fields would be mixed to light textured fields and not heavy clay exclusively. Also, rates are based on maintenance levels associated with the expected yield in the budget. **Fertilization decisions should be based on soil tests. Soil test cost is prorated for a test every 3rd year. Lime cost prorated for application every 3rd year.** The budget does not include a second fungicide application to control Asian soybean rust, but the cost of treatment could range from \$10 to \$18 plus application cost per acre.

Table 17.B Summary of estimated costs and returns per acre
Soybeans, double crop after wheat, RR2X, 12R 30"
Non-irrigated, All Areas, Mississippi, 2018

ITEM	UNIT	PRICE	QUANTITY	AMOUNT	YOUR FARM
		dollars		dollars	
INCOME					
Soybeans	bu	9.90	25.0000	247.50	_____

TOTAL INCOME				247.50	_____
DIRECT EXPENSES					
CUSTOM SPRAY	acre	19.50	1.0000	19.50	_____
FERTILIZERS	acre	41.55	1.0000	41.55	_____
FUNGICIDES	acre	6.80	1.0000	6.80	_____
HERBICIDES	acre	47.14	1.0000	47.14	_____
INSECTICIDES	acre	37.04	1.0000	37.04	_____
SEED/PLANTS	acre	73.50	1.0000	73.50	_____
ADJUVANTS	acre	1.64	1.0000	1.64	_____
CUSTOM FERTILIZE	acre	7.50	1.0000	7.50	_____
HAULING	acre	6.75	1.0000	6.75	_____
CUSTOM LIME	acre	15.32	1.0000	15.32	_____
CROP CONSULTANT	acre	6.50	1.0000	6.50	_____
INOCULANT	acre	3.00	1.0000	3.00	_____
SOIL TEST	acre	3.33	1.0000	3.33	_____
HAND LABOR	hour	9.06	0.0817	0.74	_____
OPERATOR LABOR	hour	13.51	0.2193	2.96	_____
UNALLOCATED LABOR	hour	13.57	0.1886	2.56	_____
DIESEL FUEL	gal	1.80	2.7503	4.95	_____
REPAIR & MAINTENANCE	acre	7.38	1.0000	7.38	_____
INTEREST ON OP. CAP.	acre	6.75	1.0000	6.75	_____

TOTAL DIRECT EXPENSES				294.91	_____
RETURNS ABOVE DIRECT EXPENSES				-47.41	_____
TOTAL FIXED EXPENSES				24.02	_____

TOTAL SPECIFIED EXPENSES				318.93	_____
RETURNS ABOVE TOTAL SPECIFIED EXPENSES				-71.43	_____

Note: Cost of production estimates are based on 2017 input prices. These fertilizer rates are based on the assumption that 30-40% of the soybean fields would be mixed to light textured fields and not heavy clay exclusively. Also, rates are based on maintenance levels associated with the expected yield in the budget. **Fertilization decisions should be based on soil tests. Soil test cost is prorated for a test every 3rd year. Lime cost prorated for application every 3rd year.** The budget does not include a second fungicide application to control Asian soybean rust, but the cost of treatment could range from \$10 to \$18 plus application cost per acre.

Table 17.C Estimated resource use for field operations, per acre
 Soybeans, double crop after wheat, RR2X, 12R 30"
 Non-irrigated, All Areas, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	POWER UNIT SIZE	PERF RATE	TIMES OVER	MTH	INPUT AMOUNT	IMPLEMENT	POWER UNIT	ALLOC LABOR	UNALL LABOR
						-----hours-----				
Soil Test	acre			0.33	Nov	0.3330				
Lime (Spread)	ton			0.33	Nov	0.3330				
Custom Apply Fert	acre			1.00	Nov	1.0000				
Phosphorus(46% P2O5)	cwt					0.8700				
Potash (60% K2O)	cwt					1.3300				
Soybeans Consultant	acre			1.00	May	1.0000				
Plant & Pre-Folding	12R-30	MFWD 225	0.067	1.00	Jun		0.06	0.06	0.13	0.05
Soybean Seed RR2X	lb					50.0000				
CruiserMaxx	oz					1.6000				
Optimize	oz					1.4000				
Boundary	pt					2.0000				
Gramoxone SL 2.0	oz					48.0000				
Surfactant	pt					0.4000				
Spray (Broadcast)	60'	MFWD 225	0.028	1.00	Jul		0.02	0.02	0.04	0.02
Glyphosate 3lbs a.e	oz					32.0000				
Prefix	pt					2.0000				
App by Air (5 gal)	appl			1.00	Aug	1.0000				
Acephate 90SP	lb					0.7500				
App by Air (5 gal)	appl			1.00	Aug	1.0000				
Prevathon	oz					14.0000				
Surfactant	pt					0.1000				
Bifenthrin	oz					6.4000				
Incidental Pest				1.00	Sep					
App by Air (5 gal)	appl					1.0000				
IncidentalPestTrt \$8	acre					1.0000				
Header -Soybean	25' Flex	265 hp	0.102	1.00	Oct		0.10	0.10	0.10	0.08
Haul Soybeans	bu					25.0000				
Grain Cart Soybean	700 bu	MFWD 225	0.021	1.00	Oct		0.02	0.02	0.02	0.01

TOTALS							0.21	0.21	0.30	0.18

Note: Cost of production estimates are based on 2017 input prices.
 These fertilizer rates are based on the assumption that 30-40% of the soybean fields would be mixed to light textured fields and not heavy clay exclusively. Also, rates are based on maintenance levels associated with the expected yield in the budget. **Fertilization decisions should be based on soil tests. Soil test cost is prorated for a test every 3rd year. Lime cost prorated for application every 3rd year.** The budget does not include a second fungicide application to control Asian soybean rust, but the cost of treatment could range from \$10 to \$18 plus application cost per acre.

Table 17.D Estimated costs for field operations, per acre
Soybeans, double crop after wheat, RR2X, 12R 30"
Non-irrigated, All Areas, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	-----DIRECT COST-----							FIXED COST	TOTAL COST	
		OP INPUT	FUEL	R&M	LABOR	LEASE	INTER	TOTAL			
-----dollars-----											
Soil Test	acre	3.33						0.16	3.49		3.49
Lime (Spread)	ton	15.32						0.73	16.05		16.05
Custom Apply Fert	acre	7.50						0.36	7.86		7.86
Phosphorus(46% P2O5)	cwt	16.31						0.77	17.08		17.08
Potash (60% K2O)	cwt	25.24						1.20	26.44		26.44
Soybeans Consulting	acre	6.50						0.15	6.65		6.65
Plant & Pre-Folding	12R-30		1.41	2.23	2.31			0.12	6.07	6.22	12.29
Soybean Seed RR2X	lb	73.50						1.45	74.95		74.95
CruiserMaxx	oz	6.80						0.13	6.93		6.93
Optimize	oz	3.00						0.06	3.06		3.06
Boundary	pt	22.40						0.44	22.84		22.84
Gramoxone SL 2.0	oz	7.20						0.14	7.34		7.34
Surfactant	pt	1.31						0.03	1.34		1.34
Spray (Broadcast)	60'		0.59	0.43	0.84			0.03	1.89	1.45	3.34
Glyphosate 3lbs a.e	oz	4.48						0.07	4.55		4.55
Prefix	pt	13.06						0.21	13.27		13.27
App by Air (5 gal)	appl	6.50						0.08	6.58		6.58
Acephate 90SP	lb	5.57						0.07	5.64		5.64
App by Air (5 gal)	appl	6.50						0.08	6.58		6.58
Prevathon	oz	18.48						0.22	18.70		18.70
Surfactant	pt	0.33							0.33		0.33
Bifenthrin	oz	4.99						0.06	5.05		5.05
Incidental Pest											
App by Air (5 gal)	appl	6.50						0.05	6.55		6.55
IncidentalPestTrt \$8	acre	8.00						0.06	8.06		8.06
Header -Soybean	25' Flex		2.51	4.37	2.57			0.04	9.49	15.10	24.59
Haul Soybeans	bu	6.75						0.03	6.78		6.78
Grain Cart Soybean	700 bu		0.44	0.35	0.54			0.01	1.34	1.25	2.59
TOTALS			269.57	4.95	7.38	6.26	0.00	6.75	294.91	24.02	318.93

Note: Cost of production estimates are based on 2017 input prices.
 These fertilizer rates are based on the assumption that 30-40% of the soybean fields would be mixed to light textured fields and not heavy clay exclusively. Also, rates are based on maintenance levels associated with the expected yield in the budget. **Fertilization decisions should be based on soil tests. Soil test cost is prorated for a test every 3rd year. Lime cost prorated for application every 3rd year.** The budget does not include a second fungicide application to control Asian soybean rust, but the cost of treatment could range from \$10 to \$18 plus application cost per acre.

Table 17.E Estimated monthly income and expense flows per acre
Soybeans, double crop after wheat, RR2X, 12R 30"
Non-irrigated, All Areas, Mississippi, 2018

ITEM	Nov	Dec	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct
-----dollars-----												
TOTAL INCOME	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	247.50
DIRECT EXPENSES												
CUSTOM SPRAY	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	13.00	6.50	0.00
FERTILIZERS	41.55	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
FUNGICIDES	0.00	0.00	0.00	0.00	0.00	0.00	0.00	6.80	0.00	0.00	0.00	0.00
HERBICIDES	0.00	0.00	0.00	0.00	0.00	0.00	0.00	29.60	17.54	0.00	0.00	0.00
INSECTICIDES	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	29.04	8.00	0.00
SEED/PLANTS	0.00	0.00	0.00	0.00	0.00	0.00	0.00	73.50	0.00	0.00	0.00	0.00
ADJUVANTS	0.00	0.00	0.00	0.00	0.00	0.00	0.00	1.31	0.00	0.33	0.00	0.00
CUSTOM FERTILIZE	7.50	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
HAULING	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	6.75
CUSTOM LIME	15.32	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
CROP CONSULTANT	0.00	0.00	0.00	0.00	0.00	0.00	6.50	0.00	0.00	0.00	0.00	0.00
INOCULANT	0.00	0.00	0.00	0.00	0.00	0.00	0.00	3.00	0.00	0.00	0.00	0.00
SOIL TEST	3.33	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
LABOR	0.00	0.00	0.00	0.00	0.00	0.00	0.00	2.31	0.84	0.00	0.00	3.11
LEASE *	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
FUEL	0.00	0.00	0.00	0.00	0.00	0.00	0.00	1.41	0.59	0.00	0.00	2.95
REPAIR & MAINTENANCE	0.00	0.00	0.00	0.00	0.00	0.00	0.00	2.23	0.43	0.00	0.00	4.72
INTEREST ON OP. CAP.	3.22	0.00	0.00	0.00	0.00	0.00	0.15	2.37	0.31	0.51	0.11	0.08
TOTAL DIRECT EXPENSES	70.92	0.00	0.00	0.00	0.00	0.00	6.65	122.53	19.71	42.88	14.61	17.61
NET INCOME	-70.92	0.00	0.00	0.00	0.00	0.00	-6.65	-122.53	-19.71	-42.88	-14.61	229.89
NET INCOME TO DATE	-70.92	-70.92	-70.92	-70.92	-70.92	-70.92	-77.57	-200.10	-219.81	-262.69	-277.30	-47.41

Note: Cost of production estimates are based on 2017 input prices.

These fertilizer rates are based on the assumption that 30-40% of the soybean fields would be mixed to light textured fields and not heavy clay exclusively. Also, rates are based on maintenance levels associated with the expected yield in the budget.

Fertilization decisions should be based on soil tests. Soil test cost is prorated for a test every 3rd year. Lime cost prorated for application every 3rd year. The budget does not include a second fungicide application to control Asian soybean rust, but the cost of treatment could range from \$10 to \$18 plus application cost per acre

* Lease costs are based on hourly usage costs.

Table 17.F Estimated returns for various price/yield combinations, per acre
 Soybeans, double crop after wheat, RR2X, 12R 30"
 Non-irrigated, All Areas, Mississippi, 2018

			PERCENT										
PRODUCT			75	80	85	90	95	100	105	110	115	120	125
Soybeans			7.42	7.92	8.41	8.91	9.40	9.90	10.39	10.89	11.38	11.88	12.37
			PRODUCT PRICE										
PERCENT	YIELD	UNIT	dollars										
50	12.50	bu	-198 -222	-192 -216	-186 -210	-180 -204	-173 -197	-167 -191	-161 -185	-155 -179	-149 -173	-143 -167	-136 -160
60	15.00	bu	-180 -204	-173 -197	-165 -189	-158 -182	-151 -175	-143 -167	-136 -160	-128 -152	-121 -145	-113 -138	-106 -130
70	17.50	bu	-162 -186	-154 -178	-145 -169	-136 -160	-128 -152	-119 -143	-110 -134	-102 -126	-93 -117	-84 -108	-76 -100
80	20.00	bu	-145 -169	-135 -159	-125 -149	-115 -139	-105 -129	-95 -119	-85 -109	-75 -99	-65 -89	-55 -79	-46 -70
90	22.50	bu	-127 -151	-116 -140	-104 -128	-93 -117	-82 -106	-71 -95	-60 -84	-49 -73	-38 -62	-26 -50	-15 -39
100	25.00	bu	-109 -133	-96 -120	-84 -108	-72 -96	-59 -83	-47 -71	-35 -59	-22 -46	-10 -34	2 -21	14 -9
110	27.50	bu	-91 -115	-77 -101	-64 -88	-50 -74	-36 -60	-23 -47	-9 -33	3 -20	17 -6	31 7	44 20
120	30.00	bu	-73 -97	-58 -82	-43 -67	-28 -52	-14 -38	0 -23	15 -8	30 6	45 21	60 36	74 50
130	32.50	bu	-55 -79	-39 -63	-23 -47	-7 -31	8 -15	24 0	40 16	56 32	73 49	89 65	105 81
140	35.00	bu	-37 -61	-20 -44	-3 -27	14 -9	31 7	48 24	66 42	83 59	100 76	118 94	135 111
150	37.50	bu	-19 -43	-1 -25	17 -6	35 11	54 30	72 48	91 67	110 86	128 104	147 123	165 141

The top number in each cell is Returns Above Direct Expenses.
 The bottom number in each cell is Returns Above Total Specified Expenses.
 Only the product listed has been varied to calculate net returns.
 Note: Cost of production estimates are based on 2017 input prices.

Table 18.A Estimated costs per acre
Soybeans, full-season, LL, stale seedbed, 12R 30"
Non-irrigated, Delta Area, Mississippi, 2018

ITEM	UNIT	PRICE	QUANTITY	AMOUNT	YOUR FARM
		dollars		dollars	
DIRECT EXPENSES					
CUSTOM SPRAY					
App by Air (5 gal)	appl	6.50	3.0000	19.50	_____
HARVEST AIDS					
Gramoxone SL	oz	0.15	16.0000	2.40	_____
Sodium Chlorate 5L	gal	5.39	0.6000	3.23	_____
FERTILIZERS					
Phosphorus (46% P2O5)	cwt	18.75	0.8700	16.31	_____
Potash (60% K2O)	cwt	18.98	1.3300	25.24	_____
FUNGICIDES					
CruiserMaxx	oz	4.25	1.6000	6.80	_____
HERBICIDES					
Glyphosate 3lbs a.e	oz	0.14	32.0000	4.48	_____
2,4-D Amine 4	pt	2.40	2.0000	4.80	_____
Select Max	pt	12.64	1.0000	12.64	_____
Valor SX	oz	4.57	2.0000	9.14	_____
Boundary	pt	11.20	2.0000	22.40	_____
Gramoxone SL 2.0	oz	0.15	48.0000	7.20	_____
Liberty 280	oz	0.60	58.0000	34.80	_____
Dual Magnum	pt	13.80	1.0000	13.80	_____
Zidua	oz	9.05	1.5000	13.58	_____
INSECTICIDES					
Acephate 90SP	lb	7.43	0.7500	5.57	_____
SEED/PLANTS					
Soybean Seed LL	lb	1.28	50.0000	64.00	_____
ADJUVANTS					
Surfactant	pt	3.28	1.0000	3.28	_____
CUSTOM FERTILIZE					
Custom Apply Fert	acre	7.50	1.0000	7.50	_____
HAULING					
Haul Soybeans	bu	0.27	42.0000	11.34	_____
CUSTOM LIME					
Lime (Spread)	ton	46.00	0.3330	15.32	_____
CROP CONSULTANT					
Soybeans Consultant	acre	6.50	1.0000	6.50	_____
INOCULANT					
Optimize	oz	2.14	1.4000	3.00	_____
SOIL TEST					
Soil Test	acre	10.00	0.3330	3.33	_____
OPERATOR LABOR					
Tractors	hour	13.51	0.3302	4.46	_____
Harvesters	hour	13.51	0.1021	1.38	_____
HAND LABOR					
Implements	hour	9.06	0.0959	0.87	_____
UNALLOCATED LABOR					
	hour	13.51	0.3892	5.26	_____
DIESEL FUEL					
Tractors	gal	1.80	3.8252	6.89	_____
Harvesters	gal	1.80	1.3935	2.51	_____
REPAIR & MAINTENANCE					
Implements	acre	4.81	1.0000	4.81	_____
Tractors	acre	2.18	1.0000	2.18	_____
Harvesters	acre	3.49	1.0000	3.49	_____
INTEREST ON OP. CAP.	acre	9.33	1.0000	9.33	_____
TOTAL DIRECT EXPENSES				357.34	_____
FIXED EXPENSES					
Implements	acre	9.73	1.0000	9.73	_____
Tractors	acre	13.66	1.0000	13.66	_____
Harvesters	acre	13.77	1.0000	13.77	_____
TOTAL FIXED EXPENSES				37.16	_____
TOTAL SPECIFIED EXPENSES				394.50	_____

Note: Cost of production estimates are based on 2017 input prices. These fertilizer rates are based on the assumption that 30-40% of the soybean fields would be mixed to light textured fields and not heavy clay exclusively. Also, rates are based on maintenance levels associated with the expected yield in the budget. **Fertilization decisions should be based on soil tests. Soil test cost is prorated for a test every 3rd year. Lime cost prorated for application every 3rd year.** The budget does not include a second fungicide application to control Asian soybean rust, but the cost of treatment could range from \$10 to \$18 plus application cost per acre.

Table 18.B Summary of estimated costs and returns per acre
Soybeans, full-season, LL, stale seedbed, 12R 30"
Non-irrigated, Delta Area, Mississippi, 2018

ITEM	UNIT	PRICE	QUANTITY	AMOUNT	YOUR FARM
		dollars		dollars	
INCOME					
Soybeans	bu	9.90	42.0000	415.80	_____

TOTAL INCOME				415.80	_____
DIRECT EXPENSES					
CUSTOM SPRAY	acre	19.50	1.0000	19.50	_____
HARVEST AIDS	acre	5.63	1.0000	5.63	_____
FERTILIZERS	acre	41.55	1.0000	41.55	_____
FUNGICIDES	acre	6.80	1.0000	6.80	_____
HERBICIDES	acre	122.84	1.0000	122.84	_____
INSECTICIDES	acre	5.57	1.0000	5.57	_____
SEED/PLANTS	acre	64.00	1.0000	64.00	_____
ADJUVANTS	acre	3.28	1.0000	3.28	_____
CUSTOM FERTILIZE	acre	7.50	1.0000	7.50	_____
HAULING	acre	11.34	1.0000	11.34	_____
CUSTOM LIME	acre	15.32	1.0000	15.32	_____
CROP CONSULTANT	acre	6.50	1.0000	6.50	_____
INOCULANT	acre	3.00	1.0000	3.00	_____
SOIL TEST	acre	3.33	1.0000	3.33	_____
HAND LABOR	hour	9.06	0.0959	0.87	_____
OPERATOR LABOR	hour	13.51	0.4324	5.84	_____
UNALLOCATED LABOR	hour	13.51	0.3892	5.26	_____
DIESEL FUEL	gal	1.80	5.2188	9.40	_____
REPAIR & MAINTENANCE	acre	10.48	1.0000	10.48	_____
INTEREST ON OP. CAP.	acre	9.33	1.0000	9.33	_____

TOTAL DIRECT EXPENSES				357.34	_____
RETURNS ABOVE DIRECT EXPENSES				58.46	_____
TOTAL FIXED EXPENSES				37.16	_____

TOTAL SPECIFIED EXPENSES				394.50	_____
RETURNS ABOVE TOTAL SPECIFIED EXPENSES				21.30	_____

Note: Cost of production estimates are based on 2017 input prices.
These fertilizer rates are based on the assumption that 30-40% of the soybean fields would be mixed to light textured fields and not heavy clay exclusively. Also, rates are based on maintenance levels associated with the expected yield in the budget. **Fertilization decisions should be based on soil tests. Soil test cost is prorated for a test every 3rd year. Lime cost prorated for application every 3rd year.** The budget does not include a second fungicide application to control Asian soybean rust, but the cost of treatment could range from \$10 to \$18 plus application cost per acre.

Table 18.C Estimated resource use for field operations, per acre
Soybeans, full-season, LL, stale seedbed, 12R 30"
Non-irrigated, Delta Area, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	POWER UNIT SIZE	PERF RATE	TIMES OVER	MTH	INPUT AMOUNT	IMPLEMENT	POWER UNIT	ALLOC LABOR	UNALL LABOR
-----hours-----										
Soil Test	acre			0.33	Oct	0.3330				
Subsoiler	3 shank	MFWD 225	0.204	0.20	Oct		0.04	0.04	0.04	0.03
Lime (Spread)	ton			0.33	Oct	0.3330				
Custom Apply Fert	acre			1.00	Oct	1.0000				
Phosphorus (46% P2O5)	cwt					0.8700				
Potash (60% K2O)	cwt					1.3300				
Disk Harrow	24'	MFWD 225	0.081	1.00	Oct		0.08	0.08	0.08	0.07
Field Cultivate Fld	24'	MFWD 225	0.062	1.00	Oct		0.06	0.06	0.06	0.05
App by Air (5 gal)	appl			1.00	Feb	1.0000				
Glyphosate 3lbs a.e	oz					32.0000				
2,4-D Amine 4	pt					2.0000				
Select Max	pt					1.0000				
Valor SX	oz					2.0000				
Surfactant	pt					0.4000				
Plant & Pre-Folding	12R-30	MFWD 225	0.067	1.00	Apr		0.06	0.06	0.13	0.06
Soybean Seed LL	lb					50.0000				
CruiserMaxx	oz					1.6000				
Optimize	oz					1.4000				
Boundary	pt					2.0000				
Gramoxone SL 2.0	oz					48.0000				
Surfactant	pt					0.4000				
Soybeans Consultant	acre			1.00	May	1.0000				
Spray (Broadcast)	60'	MFWD 225	0.028	1.00	May		0.02	0.02	0.04	0.02
Liberty 280	oz					29.0000				
Dual Magnum	pt					1.0000				
Spray (Broadcast)	60'	MFWD 225	0.028	1.00	May		0.02	0.02	0.04	0.02
Liberty 280	oz					29.0000				
Zidua	oz					1.5000				
App by Air (5 gal)	appl			1.00	Aug	1.0000				
Acephate 90SP	lb					0.7500				
App by Air (5 gal)	appl			1.00	Aug	1.0000				
Gramoxone SL	oz					16.0000				
Sodium Chlorate 5L	gal					0.6000				
Surfactant	pt					0.2000				
Header -Soybean	25' Flex	265 hp	0.102	1.00	Sep		0.10	0.10	0.10	0.09
Haul Soybeans	bu					42.0000				
Grain Cart Soybean	700 bu	MFWD 225	0.021	1.00	Sep		0.02	0.02	0.02	0.01
TOTALS							0.43	0.43	0.52	0.38

Note: Cost of production estimates are based on 2017 input prices.

These fertilizer rates are based on the assumption that 30-40% of the soybean fields would be mixed to light textured fields and not heavy clay exclusively. Also, rates are based on maintenance levels associated with the expected yield in the budget. **Fertilization decisions should be based on soil tests. Soil test cost is prorated for a test every 3rd year. Lime cost prorated for application every 3rd year.** The budget does not include a second fungicide application to control Asian soybean rust, but the cost of treatment could range from \$10 to \$18 plus application cost per acre.

Table 18.D Estimated costs for field operations, per acre
Soybeans, full-season, LL, stale seedbed, 12R 30"
Non-irrigated, Delta Area, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	-----DIRECT COST-----							FIXED COST	TOTAL COST	
		OP INPUT	FUEL	R&M	LABOR	LEASE	INTER	TOTAL			
-----dollars-----											
Soil Test	acre	3.33						0.16	3.49		3.49
Subsoiler	3 shank		0.85	0.33	1.05			0.11	2.34	1.84	4.18
Lime (Spread)	ton	15.32						0.73	16.05		16.05
Custom Apply Fert	acre	7.50						0.36	7.86		7.86
Phosphorus (46% P2O5)	cwt	16.31						0.77	17.08		17.08
Potash (60% K2O)	cwt	25.24						1.20	26.44		26.44
Disk Harrow	24'		1.71	1.48	2.11			0.25	5.55	5.37	10.92
Field Cultivate Fld	24'		1.30	0.86	1.60			0.18	3.94	4.48	8.42
App by Air (5 gal)	appl	6.50						0.21	6.71		6.71
Glyphosate 3lbs a.e	oz	4.48						0.14	4.62		4.62
2,4-D Amine 4	pt	4.80						0.15	4.95		4.95
Select Max	pt	12.64						0.40	13.04		13.04
Valor SX	oz	9.14						0.29	9.43		9.43
Surfactant	pt	1.31						0.04	1.35		1.35
Plant & Pre-Folding	12R-30		1.41	2.23	2.34			0.14	6.12	6.22	12.34
Soybean Seed LL	lb	64.00						1.52	65.52		65.52
CruiserMaxx	oz	6.80						0.16	6.96		6.96
Optimize	oz	3.00						0.07	3.07		3.07
Boundary	pt	22.40						0.53	22.93		22.93
Gramoxone SL 2.0	oz	7.20						0.17	7.37		7.37
Surfactant	pt	1.31						0.03	1.34		1.34
Soybeans Consultant	acre	6.50						0.13	6.63		6.63
Spray (Broadcast)	60'		0.59	0.43	0.85			0.04	1.91	1.45	3.36
Liberty 280	oz	17.40						0.34	17.74		17.74
Dual Magnum	pt	13.80						0.27	14.07		14.07
Spray (Broadcast)	60'		0.59	0.43	0.85			0.04	1.91	1.45	3.36
Liberty 280	oz	17.40						0.34	17.74		17.74
Zidua	oz	13.58						0.27	13.85		13.85
App by Air (5 gal)	appl	6.50						0.05	6.55		6.55
Acephate 90SP	lb	5.57						0.04	5.61		5.61
App by Air (5 gal)	appl	6.50						0.05	6.55		6.55
Gramoxone SL	oz	2.40						0.02	2.42		2.42
Sodium Chlorate 5L	gal	3.23						0.03	3.26		3.26
Surfactant	pt	0.66						0.01	0.67		0.67
Header -Soybean	25' Flex		2.51	4.37	2.62			0.04	9.54	15.10	24.64
Haul Soybeans	bu	11.34						0.04	11.38		11.38
Grain Cart Soybean	700 bu		0.44	0.35	0.55			0.01	1.35	1.25	2.60
TOTALS		316.16	9.40	10.48	11.97	0.00	9.33	357.34	37.16	394.50	

Note: Cost of production estimates are based on 2017 input prices.
These fertilizer rates are based on the assumption that 30-40% of the soybean fields would be mixed to light textured fields and not heavy clay exclusively. Also, rates are based on maintenance levels associated with the expected yield in the budget. **Fertilization decisions should be based on soil tests. Soil test cost is prorated for a test every 3rd year. Lime cost prorated for application every 3rd year.** The budget does not include a second fungicide application to control Asian soybean rust, but the cost of treatment could range from \$10 to \$18 plus application cost per acre.

Table 18.E Estimated monthly income and expense flows per acre
Soybeans, full-season, LL, stale seedbed, 12R 30"
Non-irrigated, Delta Area, Mississippi, 2018

ITEM	Oct	Nov	Dec	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep
-----dollars-----												
TOTAL INCOME	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	415.80
DIRECT EXPENSES												
CUSTOM SPRAY	0.00	0.00	0.00	0.00	6.50	0.00	0.00	0.00	0.00	0.00	13.00	0.00
HARVEST AIDS	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	5.63	0.00
FERTILIZERS	41.55	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
FUNGICIDES	0.00	0.00	0.00	0.00	0.00	0.00	6.80	0.00	0.00	0.00	0.00	0.00
HERBICIDES	0.00	0.00	0.00	0.00	31.06	0.00	29.60	62.18	0.00	0.00	0.00	0.00
INSECTICIDES	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	5.57	0.00
SEED/PLANTS	0.00	0.00	0.00	0.00	0.00	0.00	64.00	0.00	0.00	0.00	0.00	0.00
ADJUVANTS	0.00	0.00	0.00	0.00	1.31	0.00	1.31	0.00	0.00	0.00	0.66	0.00
CUSTOM FERTILIZE	7.50	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
HAULING	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	11.34
CUSTOM LIME	15.32	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
CROP CONSULTANT	0.00	0.00	0.00	0.00	0.00	0.00	0.00	6.50	0.00	0.00	0.00	0.00
INOCULANT	0.00	0.00	0.00	0.00	0.00	0.00	3.00	0.00	0.00	0.00	0.00	0.00
SOIL TEST	3.33	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
LABOR	4.76	0.00	0.00	0.00	0.00	0.00	2.34	1.70	0.00	0.00	0.00	3.17
LEASE *	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
FUEL	3.86	0.00	0.00	0.00	0.00	0.00	1.41	1.18	0.00	0.00	0.00	2.95
REPAIR & MAINTENANCE	2.67	0.00	0.00	0.00	0.00	0.00	2.23	0.86	0.00	0.00	0.00	4.72
INTEREST ON OP. CAP.	3.76	0.00	0.00	0.00	1.23	0.00	2.62	1.43	0.00	0.00	0.20	0.09
TOTAL DIRECT EXPENSES	82.75	0.00	0.00	0.00	40.10	0.00	113.31	73.85	0.00	0.00	25.06	22.27
NET INCOME	-82.75	0.00	0.00	0.00	-40.10	0.00	-113.31	-73.85	0.00	0.00	-25.06	393.53
NET INCOME TO DATE	-82.75	-82.75	-82.75	-82.75	-122.85	-122.85	-236.16	-310.01	-310.01	-310.01	-335.07	58.46

Note: Cost of production estimates are based on 2017 input prices.

These fertilizer rates are based on the assumption that 30-40% of the soybean fields would be mixed to light textured fields and not heavy clay exclusively. Also, rates are based on maintenance levels associated with the expected yield in the budget. **Fertilization decisions should be based on soil tests. Soil test cost is prorated for a test every 3rd year. Lime cost prorated for application every 3rd year.** The budget does not include a second fungicide application to control Asian soybean rust, but the cost of treatment could range from \$10 to \$18 plus application cost per acre*Lease costs are based on hourly usage costs.

Table 18.F Estimated returns for various price/yield combinations, per acre
 Soybeans, full-season, LL, stale seedbed, 12R 30"
 Non-irrigated, Delta Area, Mississippi, 2018

			PERCENT										
PRODUCT			75	80	85	90	95	100	105	110	115	120	125
Soybeans			PRODUCT PRICE										
			7.42	7.92	8.41	8.91	9.40	9.90	10.39	10.89	11.38	11.88	12.37
PERCENT	YIELD	UNIT	dollars										
50	21.00	bu	-195	-185	-174	-164	-154	-143	-133	-122	-112	-102	-91
			-232	-222	-212	-201	-191	-180	-170	-160	-149	-139	-128
60	25.20	bu	-165	-153	-140	-128	-115	-103	-90	-78	-65	-53	-40
			-202	-190	-177	-165	-152	-140	-127	-115	-103	-90	-78
70	29.40	bu	-135	-121	-106	-91	-77	-62	-48	-33	-19	-4	9
			-172	-158	-143	-129	-114	-100	-85	-70	-56	-41	-27
80	33.60	bu	-105	-88	-72	-55	-39	-22	-5	10	27	44	60
			-142	-126	-109	-92	-76	-59	-42	-26	-9	6	23
90	37.80	bu	-75	-56	-38	-19	-0	18	36	55	74	92	111
			-112	-93	-75	-56	-37	-19	-0	18	36	55	74
100	42.00	bu	-45	-24	-3	16	37	58	79	100	120	141	162
			-82	-61	-41	-20	0	21	42	62	83	104	125
110	46.20	bu	-15	7	30	53	76	98	121	144	167	190	213
			-52	-29	-6	16	38	61	84	107	130	153	176
120	50.40	bu	14	39	64	89	114	139	164	189	214	239	264
			-22	2	27	52	77	102	127	152	177	201	226
130	54.60	bu	44	71	98	125	152	179	206	233	260	287	314
			7	34	61	88	115	142	169	196	223	250	277
140	58.80	bu	74	103	132	162	191	220	249	278	307	336	365
			37	66	95	124	153	183	212	241	270	299	328
150	63.00	bu	104	135	167	198	229	260	291	323	354	385	416
			67	98	129	161	192	223	254	285	317	348	379

The top number in each cell is Returns Above Direct Expenses.
 The bottom number in each cell is Returns Above Total Specified Expenses.
 Only the product listed has been varied to calculate net returns.
 Note: Cost of production estimates are based on 2017 input prices.

Table 19.A Estimated costs per acre
Soybeans, full-season, LL, stale seedbed, 12R 30"
Furrow irrigated, 9 ac-in., Delta Area, Mississippi, 2018

ITEM	UNIT	PRICE	QUANTITY	AMOUNT	YOUR FARM
		dollars		dollars	
DIRECT EXPENSES					
CUSTOM SPRAY					
App by Air (5 gal)	appl	6.50	4.0000	26.00	_____
HARVEST AIDS					
Gramoxone SL	oz	0.15	16.0000	2.40	_____
Sodium Chlorate 5L	gal	5.39	0.6000	3.23	_____
FERTILIZERS					
Phosphorus (46% P2O5)	cwt	18.75	0.8700	16.31	_____
Potash (60% K2O)	cwt	18.98	1.3300	25.24	_____
FUNGICIDES					
CruiserMaxx	oz	4.25	1.6000	6.80	_____
Quadris Top SBX	oz	2.75	7.0000	19.25	_____
HERBICIDES					
Glyphosate 3lbs a.e	oz	0.14	32.0000	4.48	_____
2,4-D Amine 4	pt	2.40	2.0000	4.80	_____
Select Max	pt	12.64	1.0000	12.64	_____
Valor SX	oz	4.57	2.0000	9.14	_____
Boundary	pt	11.20	2.0000	22.40	_____
Gramoxone SL 2.0	oz	0.15	48.0000	7.20	_____
Liberty 280	oz	0.60	58.0000	34.80	_____
Dual Magnum	pt	13.80	1.0000	13.80	_____
Zidua	oz	9.05	1.5000	13.58	_____
INSECTICIDES					
Acephate 90SP	lb	7.43	0.7500	5.57	_____
IRRIGATION SUPPLIES					
Roll-Out Pipe	ft	0.25	33.0000	8.25	_____
SEED/PLANTS					
Soybean Seed LL	lb	1.28	50.0000	64.00	_____
ADJUVANTS					
Surfactant	pt	3.28	1.1000	3.61	_____
CUSTOM FERTILIZE					
Custom Apply Fert	acre	7.50	1.0000	7.50	_____
HAULING					
Haul Soybeans	bu	0.27	60.0000	16.20	_____
CUSTOM LIME					
Lime (Spread)	ton	46.00	0.3330	15.32	_____
CROP CONSULTANT					
Soybeans Consultant	acre	6.50	1.0000	6.50	_____
INOCULANT					
Optimize	oz	2.14	1.4000	3.00	_____
SOIL TEST					
Soil Test	acre	10.00	0.3330	3.33	_____
OPERATOR LABOR					
Tractors	hour	13.51	0.4713	6.36	_____
Harvesters	hour	13.51	0.1021	1.38	_____
IRRIGATE LABOR					
Special Labor	hour	9.06	0.3000	2.73	_____
Implements	hour	9.06	0.0625	0.57	_____
HAND LABOR					
Implements	hour	9.06	0.0959	0.87	_____
UNALLOCATED LABOR					
	hour	13.51	0.4454	6.02	_____
DIESEL FUEL					
Tractors	gal	1.80	5.2753	9.51	_____
Harvesters	gal	1.80	1.3935	2.51	_____
Roll-Out Pipe Irr.	gal	1.80	7.3316	13.20	_____
REPAIR & MAINTENANCE					
Implements	acre	5.47	1.0000	5.47	_____
Tractors	acre	2.98	1.0000	2.98	_____
Harvesters	acre	3.49	1.0000	3.49	_____
Roll-Out Pipe Irr.	acre	6.89	1.0000	6.89	_____
INTEREST ON OP. CAP.	acre	10.39	1.0000	10.39	_____
TOTAL DIRECT EXPENSES				427.72	_____
FIXED EXPENSES					
Implements	acre	11.96	1.0000	11.96	_____
Tractors	acre	18.75	1.0000	18.75	_____
Harvesters	acre	13.77	1.0000	13.77	_____
Roll-Out Pipe Irr.	acre	53.42	1.0000	53.42	_____
TOTAL FIXED EXPENSES				97.90	_____
TOTAL SPECIFIED EXPENSES				525.62	_____

Note: Cost of production estimates are based on 2017 input prices.
These fertilizer rates are based on the assumption that 30-40% of the soybean fields would be mixed to light textured fields and not heavy clay exclusively. Also, rates are based on maintenance levels associated with the expected yield in the budget. **Fertilization decisions should be based on soil tests. Soil test cost is prorated for a test every 3rd year. Lime cost prorated for application every 3rd year.** The budget does not include a second fungicide application to control Asian soybean rust, but the cost of treatment could range from \$10 to \$18 plus application cost per acre.

Table 19.B Summary of estimated costs and returns per acre
 Soybeans, full-season, LL, stale seedbed, 12R 30"
 Furrow irrigated, 9 ac-in., Delta Area, Mississippi, 2018

ITEM	UNIT	PRICE	QUANTITY	AMOUNT	YOUR FARM
		dollars		dollars	
INCOME					
Soybeans	bu	9.90	60.0000	594.00	_____

TOTAL INCOME				594.00	_____
DIRECT EXPENSES					
CUSTOM SPRAY	acre	26.00	1.0000	26.00	_____
HARVEST AIDS	acre	5.63	1.0000	5.63	_____
FERTILIZERS	acre	41.55	1.0000	41.55	_____
FUNGICIDES	acre	26.05	1.0000	26.05	_____
HERBICIDES	acre	122.84	1.0000	122.84	_____
INSECTICIDES	acre	5.57	1.0000	5.57	_____
IRRIGATION SUPPLIES	acre	8.25	1.0000	8.25	_____
SEED/PLANTS	acre	64.00	1.0000	64.00	_____
ADJUVANTS	acre	3.61	1.0000	3.61	_____
CUSTOM FERTILIZE	acre	7.50	1.0000	7.50	_____
HAULING	acre	16.20	1.0000	16.20	_____
CUSTOM LIME	acre	15.32	1.0000	15.32	_____
CROP CONSULTANT	acre	6.50	1.0000	6.50	_____
INOCULANT	acre	3.00	1.0000	3.00	_____
SOIL TEST	acre	3.33	1.0000	3.33	_____
HAND LABOR	hour	9.06	0.0959	0.87	_____
IRRIGATE LABOR	hour	9.06	0.3625	3.30	_____
OPERATOR LABOR	hour	13.51	0.5735	7.74	_____
UNALLOCATED LABOR	hour	13.51	0.4454	6.02	_____
DIESEL FUEL	gal	1.80	14.0006	25.22	_____
REPAIR & MAINTENANCE	acre	18.83	1.0000	18.83	_____
INTEREST ON OP. CAP.	acre	10.39	1.0000	10.39	_____

TOTAL DIRECT EXPENSES				427.72	_____
RETURNS ABOVE DIRECT EXPENSES				166.28	_____
TOTAL FIXED EXPENSES				97.90	_____

TOTAL SPECIFIED EXPENSES				525.62	_____
RETURNS ABOVE TOTAL SPECIFIED EXPENSES				68.38	_____

Note: Cost of production estimates are based on 2017 input prices.
 These fertilizer rates are based on the assumption that 30-40% of the soybean fields would be mixed to light textured fields and not heavy clay exclusively. Also, rates are based on maintenance levels associated with the expected yield in the budget. **Fertilization decisions should be based on soil tests. Soil test cost is prorated for a test every 3rd year. Lime cost prorated for application every 3rd year.** The budget does not include a second fungicide application to control Asian soybean rust, but the cost of treatment could range from \$10 to \$18 plus application cost per acre.

Table 19.C Estimated resource use for field operations, per acre
 Soybeans, full-season, LL, stale seedbed, 12R 30"
 Furrow irrigated, 9 ac-in., Delta Area, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	POWER UNIT SIZE	PERF RATE	TIMES OVER	MTH	INPUT AMOUNT	IMPLEMENT	POWER UNIT	ALLOC LABOR	UNALL LABOR
						-----hours-----				
Soil Test	acre			0.33	Oct	0.3330				
Subsoiler	3 shank	MFWD 225	0.204	0.20	Oct		0.04	0.04	0.04	0.03
Lime (Spread)	ton			0.33	Oct	0.3330				
Custom Apply Fert	acre			1.00	Oct	1.0000				
Phosphorus (46% P2O5)	cwt					0.8700				
Potash (60% K2O)	cwt					1.3300				
Disk Harrow	24'	MFWD 225	0.081	1.00	Oct		0.08	0.08	0.08	0.07
Field Cultivate Fld	24'	MFWD 225	0.062	1.00	Oct		0.06	0.06	0.06	0.05
Bed/Lister-Roll-Fold	12R-30	MFWD 225	0.062	1.00	Oct		0.06	0.06	0.06	0.05
App by Air (5 gal)	appl			1.00	Feb	1.0000				
Glyphosate 3lbs a.e	oz					32.0000				
2,4-D Amine 4	pt					2.0000				
Select Max	pt					1.0000				
Valor SX	oz					2.0000				
Surfactant	pt					0.4000				
Plant & Pre-Folding	12R-30	MFWD 225	0.067	1.00	Apr		0.06	0.06	0.13	0.06
Soybean Seed LL	lb					50.0000				
CruiserMaxx	oz					1.6000				
Optimize	oz					1.4000				
Boundary	pt					2.0000				
Gramoxone SL 2.0	oz					48.0000				
Surfactant	pt					0.4000				
Soybeans Consultant	acre			1.00	May	1.0000				
Spray (Broadcast)	60'	MFWD 225	0.028	1.00	May		0.02	0.02	0.04	0.02
Liberty 280	oz					29.0000				
Dual Magnum	pt					1.0000				
Spray (Broadcast)	60'	MFWD 225	0.028	1.00	May		0.02	0.02	0.04	0.02
Liberty 280	oz					29.0000				
Zidua	oz					1.5000				
App by Air (5 gal)	appl			1.00	Jul	1.0000				
Quadris Top SBX	oz					7.0000				
Surfactant	pt					0.1000				
App by Air (5 gal)	appl			1.00	Aug	1.0000				
Acephate 90SP	lb					0.7500				
App by Air (5 gal)	appl			1.00	Aug	1.0000				
Gramoxone SL	oz					16.0000				
Sodium Chlorate 5L	gal					0.6000				
Surfactant	pt					0.2000				
Header -Soybean	25' Flex	265 hp	0.102	1.00	Sep		0.10	0.10	0.10	0.09
Haul Soybeans	bu					60.0000				
Grain Cart Soybean	700 bu	MFWD 225	0.021	1.00	Sep		0.02	0.02	0.02	0.01
Roll-Out Pipe Irr.	acre				Jul	1.0000	0.07	0.07	0.44	
TOTALS							0.57	0.57	1.03	0.44

Note: Cost of production estimates are based on 2017 input prices.
 These fertilizer rates are based on the assumption that 30-40% of the soybean fields would be mixed to light textured fields and not heavy clay exclusively. Also, rates are based on maintenance levels associated with the expected yield in the budget. **Fertilization decisions should be based on soil tests. Soil test cost is prorated for a test every 3rd year. Lime cost prorated for application every 3rd year.** The budget does not include a second fungicide application to control Asian soybean rust, but the cost of treatment could range from \$10 to \$18 plus application cost per acre.

Table 19.D Estimated costs for field operations, per acre
Soybeans, full-season, LL, stale seedbed, 12R 30"
Furrow irrigated, 9 ac-in., Delta Area, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	-----DIRECT COST-----							FIXED COST	TOTAL COST	
		OP INPUT	FUEL	R&M	LABOR	LEASE	INTER	TOTAL			
-----dollars-----											
Soil Test	acre	3.33						0.16	3.49		3.49
Subsoiler	3 shank		0.85	0.33	1.05			0.11	2.34	1.84	4.18
Lime (Spread)	ton	15.32						0.73	16.05		16.05
Custom Apply Fert	acre	7.50						0.36	7.86		7.86
Phosphorus (46% P2O5)	cwt	16.31						0.77	17.08		17.08
Potash (60% K2O)	cwt	25.24						1.20	26.44		26.44
Disk Harrow	24'		1.71	1.48	2.11			0.25	5.55	5.37	10.92
Field Cultivate Fld	24'		1.30	0.86	1.60			0.18	3.94	4.48	8.42
Bed/Lister-Roll-Fold	12R-30		1.30	0.87	1.60			0.18	3.95	3.79	7.74
App by Air (5 gal)	appl	6.50						0.21	6.71		6.71
Glyphosate 3lbs a.e	oz	4.48						0.14	4.62		4.62
2,4-D Amine 4	pt	4.80						0.15	4.95		4.95
Select Max	pt	12.64						0.40	13.04		13.04
Valor SX	oz	9.14						0.29	9.43		9.43
Surfactant	pt	1.31						0.04	1.35		1.35
Plant & Pre-Folding	12R-30		1.41	2.23	2.34			0.14	6.12	6.22	12.34
Soybean Seed LL	lb	64.00						1.52	65.52		65.52
CruiserMaxx	oz	6.80						0.16	6.96		6.96
Optimize	oz	3.00						0.07	3.07		3.07
Boundary	pt	22.40						0.53	22.93		22.93
Gramoxone SL 2.0	oz	7.20						0.17	7.37		7.37
Surfactant	pt	1.31						0.03	1.34		1.34
Soybeans Consultant	acre	6.50						0.13	6.63		6.63
Spray (Broadcast)	60'		0.59	0.43	0.85			0.04	1.91	1.45	3.36
Liberty 280	oz	17.40						0.34	17.74		17.74
Dual Magnum	pt	13.80						0.27	14.07		14.07
Spray (Broadcast)	60'		0.59	0.43	0.85			0.04	1.91	1.45	3.36
Liberty 280	oz	17.40						0.34	17.74		17.74
Zidua	oz	13.58						0.27	13.85		13.85
App by Air (5 gal)	appl	6.50						0.08	6.58		6.58
Quadris Top SBX	oz	19.25						0.23	19.48		19.48
Surfactant	pt	0.33							0.33		0.33
App by Air (5 gal)	appl	6.50						0.05	6.55		6.55
Acephate 90SP	lb	5.57						0.04	5.61		5.61
App by Air (5 gal)	appl	6.50						0.05	6.55		6.55
Gramoxone SL	oz	2.40						0.02	2.42		2.42
Sodium Chlorate 5L	gal	3.23						0.03	3.26		3.26
Surfactant	pt	0.66						0.01	0.67		0.67
Header -Soybean	25' Flex		2.51	4.37	2.62			0.04	9.54	15.10	24.64
Haul Soybeans	bu	16.20						0.06	16.26		16.26
Grain Cart Soybean	700 bu		0.44	0.35	0.55			0.01	1.35	1.25	2.60
Roll-Out Pipe Irr.	acre	8.25	14.52	7.48	4.36			0.55	35.16	56.95	92.11
TOTALS		355.35	25.22	18.83	17.93	0.00	10.39	427.72	97.90	525.62	

Note: Cost of production estimates are based on 2017 input prices.

These fertilizer rates are based on the assumption that 30-40% of the soybean fields would be mixed to light textured fields and not heavy clay exclusively. Also, rates are based on maintenance levels associated with the expected yield in the budget. **Fertilization decisions should be based on soil tests. Soil test cost is prorated for a test every 3rd year. Lime cost prorated for application every 3rd year.** The budget does not include a second fungicide application to control Asian soybean rust, but the cost of treatment could range from \$10 to \$18 plus application cost per acre.

Table 19.E Estimated monthly income and expense flows per acre
 Soybeans, full-season, LL, stale seedbed, 12R 30"
 Furrow irrigated, 9 ac-in., Delta Area, Mississippi, 2018

ITEM	Oct	Nov	Dec	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep
-----dollars-----												
TOTAL INCOME	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	594.00
DIRECT EXPENSES												
CUSTOM SPRAY	0.00	0.00	0.00	0.00	6.50	0.00	0.00	0.00	0.00	6.50	13.00	0.00
HARVEST AIDS	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	5.63	0.00
FERTILIZERS	41.55	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
FUNGICIDES	0.00	0.00	0.00	0.00	0.00	0.00	6.80	0.00	0.00	19.25	0.00	0.00
HERBICIDES	0.00	0.00	0.00	0.00	31.06	0.00	29.60	62.18	0.00	0.00	0.00	0.00
INSECTICIDES	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	5.57	0.00
IRRIGATION SUPPLIES	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	8.25	0.00	0.00	0.00
SEED/PLANTS	0.00	0.00	0.00	0.00	0.00	0.00	64.00	0.00	0.00	0.00	0.00	0.00
ADJUVANTS	0.00	0.00	0.00	0.00	1.31	0.00	1.31	0.00	0.00	0.33	0.66	0.00
CUSTOM FERTILIZE	7.50	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
HAULING	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	16.20
CUSTOM LIME	15.32	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
CROP CONSULTANT	0.00	0.00	0.00	0.00	0.00	0.00	0.00	6.50	0.00	0.00	0.00	0.00
INOCULANT	0.00	0.00	0.00	0.00	0.00	0.00	3.00	0.00	0.00	0.00	0.00	0.00
SOIL TEST	3.33	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
LABOR	6.87	0.00	0.00	0.00	0.00	0.00	2.34	1.93	2.80	0.23	0.00	3.76
LEASE *	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
FUEL	5.83	0.00	0.00	0.00	0.00	0.00	1.41	1.18	9.15	4.40	0.00	3.25
REPAIR & MAINTENANCE	3.85	0.00	0.00	0.00	0.00	0.00	2.23	0.86	5.73	1.31	0.00	4.85
INTEREST ON OP. CAP.	4.01	0.00	0.00	0.00	1.23	0.00	2.62	1.43	0.41	0.38	0.20	0.11
TOTAL DIRECT EXPENSES	88.26	0.00	0.00	0.00	40.10	0.00	113.31	74.08	26.34	32.40	25.06	28.17
NET INCOME	-88.26	0.00	0.00	0.00	-40.10	0.00	-113.31	-74.08	-26.34	-32.40	-25.06	565.83
NET INCOME TO DATE	-88.26	-88.26	-88.26	-88.26	-128.36	-128.36	-241.67	-315.75	-342.09	-374.49	-399.55	166.28

Note: Cost of production estimates are based on 2017 input prices.

These fertilizer rates are based on the assumption that 30-40% of the soybean fields would be mixed to light textured fields and not heavy clay exclusively. Also, rates are based on maintenance levels associated with the expected yield in the budget.

Fertilization decisions should be based on soil tests. Soil test cost is prorated for a test every 3rd year. Lime cost prorated for application every 3rd year. The budget does not include a second fungicide application to control Asian soybean rust, but the cost of treatment could range from \$10 to \$18 plus application cost per acre.

* Lease costs are based on hourly usage costs.

Table 19.F Estimated returns for various price/yield combinations, per acre
 Soybeans, full-season, LL, stale seedbed, 12R 30"
 Furrow irrigated, 9 ac-in., Delta Area, Mississippi, 2018

			PERCENT										
PRODUCT			75	80	85	90	95	100	105	110	115	120	125
			PRODUCT PRICE										
Soybeans			7.42	7.92	8.41	8.91	9.40	9.90	10.39	10.89	11.38	11.88	12.37
PERCENT	YIELD	UNIT	dollars										
50	30.00	bu	-196 -294	-181 -279	-167 -265	-152 -250	-137 -235	-122 -220	-107 -205	-92 -190	-78 -175	-63 -161	-48 -146
60	36.00	bu	-153 -251	-136 -233	-118 -216	-100 -198	-82 -180	-64 -162	-46 -144	-29 -127	-11 -109	6 -91	24 -73
70	42.00	bu	-110 -208	-90 -188	-69 -167	-48 -146	-27 -125	-7 -104	13 -84	34 -63	55 -42	76 -21	96 -0
80	48.00	bu	-68 -165	-44 -142	-20 -118	3 -94	26 -70	50 -47	74 -23	98 0	122 24	145 47	169 71
90	54.00	bu	-25 -123	1 -96	28 -69	55 -42	81 -16	108 10	135 37	161 64	188 90	215 117	242 144
100	60.00	bu	17 -80	47 -50	77 -20	106 8	136 38	166 68	195 98	225 127	255 157	285 187	314 216
110	66.00	bu	60 -37	93 -4	126 28	158 60	191 93	224 126	256 158	289 191	322 224	354 256	387 289
120	72.00	bu	103 5	139 41	174 77	210 112	246 148	281 183	317 219	353 255	388 290	424 326	460 362
130	78.00	bu	146 48	185 87	223 125	262 164	300 203	339 241	378 280	416 318	455 357	494 396	532 434
140	84.00	bu	189 91	231 133	272 174	314 216	355 257	397 299	438 341	480 382	522 424	563 465	605 507
150	90.00	bu	232 134	276 179	321 223	366 268	410 312	455 357	499 401	544 446	588 490	633 535	677 580

The top number in each cell is Returns Above Direct Expenses.
 The bottom number in each cell is Returns Above Total Specified Expenses.
 Only the product listed has been varied to calculate net returns.
 Note: Cost of production estimates are based on 2017 input prices.

Table 20.A Estimated costs per acre
Soybeans, full-season, LL, stale seedbed, 12R 30"
Flood irrigated, 13.5 ac-in., Delta Area, Mississippi, 2018

ITEM	UNIT	PRICE	QUANTITY	AMOUNT	YOUR FARM
		dollars		dollars	
DIRECT EXPENSES					
CUSTOM SPRAY					
App by Air (5 gal)	appl	6.50	5.0000	32.50	_____
HARVEST AIDS					
Gramoxone SL	oz	0.15	16.0000	2.40	_____
Sodium Chlorate 5L	gal	5.39	0.6000	3.23	_____
FERTILIZERS					
Phosphorus (46% P2O5)	cwt	18.75	0.8700	16.31	_____
Potash (60% K2O)	cwt	18.98	1.3300	25.24	_____
FUNGICIDES					
CruiserMaxx	oz	4.25	1.6000	6.80	_____
Quadris Top SBX	oz	2.75	7.0000	19.25	_____
HERBICIDES					
Glyphosate 3lbs a.e	oz	0.14	32.0000	4.48	_____
Select Max	pt	12.64	1.0000	12.64	_____
Valor SX	oz	4.57	2.0000	9.14	_____
Boundary	pt	11.20	2.0000	22.40	_____
Gramoxone SL 2.0	oz	0.15	48.0000	7.20	_____
Liberty 280	oz	0.60	58.0000	34.80	_____
Dual Magnum	pt	13.80	1.0000	13.80	_____
Zidua	oz	9.05	1.5000	13.58	_____
INSECTICIDES					
Acephate 90SP	lb	7.43	0.7500	5.57	_____
Prevathon	oz	1.32	14.0000	18.48	_____
IncidentalPestTrt \$8	acre	8.00	1.0000	8.00	_____
SEED/PLANTS					
Soybean Seed LL	lb	1.28	50.0000	64.00	_____
ADJUVANTS					
Surfactant	pt	3.28	1.1000	3.61	_____
CUSTOM FERTILIZE					
Custom Apply Fert	acre	7.50	1.0000	7.50	_____
HAULING					
Haul Soybeans	bu	0.27	53.0000	14.31	_____
SURVEY & MARK LEVEES					
Survey & Mark Levees	acre	4.50	0.5000	2.25	_____
CUSTOM LIME					
Lime (Spread)	ton	46.00	0.3330	15.32	_____
CROP CONSULTANT					
Soybeans Consultant	acre	6.50	1.0000	6.50	_____
INOCULANT					
Optimize	oz	2.14	1.4000	3.00	_____
SOIL TEST					
Soil Test	acre	10.00	0.3330	3.33	_____
OPERATOR LABOR					
Tractors	hour	13.51	0.4582	6.21	_____
Harvesters	hour	13.51	0.1021	1.38	_____
IRRIGATE LABOR					
Special Labor	hour	9.06	0.3125	2.82	_____
HAND LABOR					
Implements	hour	9.06	0.1100	1.00	_____
UNALLOCATED LABOR	hour	13.48	0.3218	4.34	_____
DIESEL FUEL					
Tractors	gal	1.80	4.3236	7.80	_____
Harvesters	gal	1.80	1.3935	2.51	_____
Contour Flood Irr.	gal	1.80	10.9974	19.80	_____
REPAIR & MAINTENANCE					
Implements	acre	4.76	1.0000	4.76	_____
Tractors	acre	2.39	1.0000	2.39	_____
Harvesters	acre	3.49	1.0000	3.49	_____
Contour Flood Irr.	acre	13.80	1.0000	13.80	_____
INTEREST ON OP. CAP.	acre	10.63	1.0000	10.63	_____
TOTAL DIRECT EXPENSES				456.57	_____
FIXED EXPENSES					
Implements	acre	9.06	1.0000	9.06	_____
Tractors	acre	15.01	1.0000	15.01	_____
Harvesters	acre	13.77	1.0000	13.77	_____
Contour Flood Irr.	acre	42.34	1.0000	42.34	_____
TOTAL FIXED EXPENSES				80.18	_____
TOTAL SPECIFIED EXPENSES				536.75	_____

Note: Cost of production estimates are based on 2017 input prices. These fertilizer rates are based on the assumption that 30-40% of the soybean fields would be mixed to light textured fields and not heavy clay exclusively. Also, rates are based on maintenance levels associated with the expected yield in the budget. **Fertilization decisions should be based on soil tests. Soil test cost is prorated for a test every 3rd year. Lime cost prorated for application every 3rd year.** The budget does not include a second fungicide application to control Asian soybean rust, but the cost of treatment could range from \$10 to \$18 plus application cost per acre.

Table 20.B Summary of estimated costs and returns per acre
 Soybeans, full-season, LL, stale seedbed, 12R 30"
 Flood irrigated, 13.5 ac-in., Delta Area, Mississippi, 2018

ITEM	UNIT	PRICE	QUANTITY	AMOUNT	YOUR FARM
		dollars		dollars	
INCOME					
Soybeans	bu	9.90	53.0000	524.70	_____

TOTAL INCOME				524.70	_____
DIRECT EXPENSES					
CUSTOM SPRAY	acre	32.50	1.0000	32.50	_____
HARVEST AIDS	acre	5.63	1.0000	5.63	_____
FERTILIZERS	acre	41.55	1.0000	41.55	_____
FUNGICIDES	acre	26.05	1.0000	26.05	_____
HERBICIDES	acre	118.04	1.0000	118.04	_____
INSECTICIDES	acre	32.05	1.0000	32.05	_____
SEED/PLANTS	acre	64.00	1.0000	64.00	_____
ADJUVANTS	acre	3.61	1.0000	3.61	_____
CUSTOM FERTILIZE	acre	7.50	1.0000	7.50	_____
HAULING	acre	14.31	1.0000	14.31	_____
SURVEY & MARK LEVEES	acre	2.25	1.0000	2.25	_____
CUSTOM LIME	acre	15.32	1.0000	15.32	_____
CROP CONSULTANT	acre	6.50	1.0000	6.50	_____
INOCULANT	acre	3.00	1.0000	3.00	_____
SOIL TEST	acre	3.33	1.0000	3.33	_____
HAND LABOR	hour	9.06	0.1100	1.00	_____
IRRIGATE LABOR	hour	9.06	0.3125	2.82	_____
OPERATOR LABOR	hour	13.51	0.5604	7.59	_____
UNALLOCATED LABOR	hour	13.48	0.3218	4.34	_____
DIESEL FUEL	gal	1.80	16.7147	30.11	_____
REPAIR & MAINTENANCE	acre	24.44	1.0000	24.44	_____
INTEREST ON OP. CAP.	acre	10.63	1.0000	10.63	_____

TOTAL DIRECT EXPENSES				456.57	_____
RETURNS ABOVE DIRECT EXPENSES				68.13	_____
TOTAL FIXED EXPENSES				80.18	_____

TOTAL SPECIFIED EXPENSES				536.75	_____
RETURNS ABOVE TOTAL SPECIFIED EXPENSES				-12.05	_____

Note: Cost of production estimates are based on 2017 input prices.
 These fertilizer rates are based on the assumption that 30-40% of the soybean fields would be mixed to light textured fields and not heavy clay exclusively. Also, rates are based on maintenance levels associated with the expected yield in the budget. **Fertilization decisions should be based on soil tests. Soil test cost is prorated for a test every 3rd year. Lime cost prorated for application every 3rd year.** The budget does not include a second fungicide application to control Asian soybean rust, but the cost of treatment could range from \$10 to \$18 plus application cost per acre.

Table 20.C Estimated resource use for field operations, per acre
 Soybeans, full-season, LL, stale seedbed, 12R 30"
 Flood irrigated, 13.5 ac-in., Delta Area, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	POWER UNIT SIZE	PERF RATE	TIMES OVER	MTH	INPUT AMOUNT	IMPLEMENT	POWER UNIT	ALLOC LABOR	UNALL LABOR
							-----hours-----			
Soil Test	acre			0.33	Nov	0.3330				
Disk Harrow	24'	MFWD 190	0.081	1.00	Nov		0.08	0.08	0.08	0.07
Lime (Spread)	ton			0.33	Nov	0.3330				
Custom Apply Fert	acre			1.00	Nov	1.0000				
Phosphorus(46% P2O5)	cwt					0.8700				
Potash (60% K2O)	cwt					1.3300				
Spray (Broadcast)	60'	MFWD 225	0.028	1.00	Feb		0.02	0.02	0.04	0.02
Glyphosate 3lbs a.e	oz					32.0000				
Select Max	pt					1.0000				
Surfactant	pt					0.4000				
Valor SX	oz					2.0000				
Soybeans Consultant	acre			1.00	May	1.0000				
Plant & Pre-Folding	12R-30	MFWD 190	0.067	1.00	May		0.06	0.06	0.13	0.06
Soybean Seed LL	lb					50.0000				
CruiserMaxx	oz					1.6000				
Optimize	oz					1.4000				
Boundary	pt					2.0000				
Gramoxone SL 2.0	oz					48.0000				
Surfactant	pt					0.4000				
Spray (Broadcast)	60'	MFWD 190	0.028	1.00	May		0.02	0.02	0.04	0.02
Liberty 280	oz					29.0000				
Dual Magnum	pt					1.0000				
Spray (Broadcast)	60'	MFWD 190	0.028	1.00	Jun		0.02	0.02	0.04	0.02
Liberty 280	oz					29.0000				
Zidua	oz					1.5000				
App by Air (5 gal)	appl			1.00	Jul	1.0000				
Quadris Top SBX	oz					7.0000				
Surfactant	pt					0.1000				
App by Air (5 gal)	appl			1.00	Aug	1.0000				
Acephate 90SP	lb					0.7500				
App by Air (5 gal)	appl			1.00	Aug	1.0000				
Prevathon	oz					14.0000				
Incidental Pest				1.00	Sep					
App by Air (5 gal)	appl					1.0000				
IncidentalPestTrt \$8	acre					1.0000				
App by Air (5 gal)	appl			1.00	Sep	1.0000				
Gramoxone SL	oz					16.0000				
Sodium Chlorate 5L	gal					0.6000				
Surfactant	pt					0.2000				
Header -Soybean	25' Flex	265 hp	0.102	1.00	Oct		0.10	0.10	0.10	0.09
Haul Soybeans	bu					53.0000				
Grain Cart Soybean	700 bu	MFWD 190	0.021	1.00	Oct		0.02	0.02	0.02	0.01
Contour Flood Irr.	acre				Jul	1.0000	0.20	0.20	0.51	
TOTALS							0.56	0.56	0.98	0.32

Note: Cost of production estimates are based on 2017 input prices.
 These fertilizer rates are based on the assumption that 30-40% of the soybean fields would be mixed to light textured fields and not heavy clay exclusively. Also, rates are based on maintenance levels associated with the expected yield in the budget. **Fertilization decisions should be based on soil tests. Soil test cost is prorated for a test every 3rd year. Lime cost prorated for application every 3rd year.** The budget does not include a second fungicide application to control Asian soybean rust, but the cost of treatment could range from \$10 to \$18 plus application cost per acre.

Table 20.D Estimated costs for field operations, per acre
Soybeans, full-season, LL, stale seedbed, 12R 30"
Flood irrigated, 13.5 ac-in., Delta Area, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	-----DIRECT COST-----							FIXED COST	TOTAL COST	
		OP INPUT	FUEL	R&M	LABOR	LEASE	INTER	TOTAL			
-----dollars-----											
Soil Test	acre	3.33						0.16	3.49		3.49
Disk Harrow	24'		1.44	1.38	2.11			0.23	5.16	4.78	9.94
Lime (Spread)	ton	15.32						0.73	16.05		16.05
Custom Apply Fert	acre	7.50						0.36	7.86		7.86
Phosphorus (46% P2O5)	cwt	16.31						0.77	17.08		17.08
Potash (60% K2O)	cwt	25.24						1.20	26.44		26.44
Spray (Broadcast)	60'		0.59	0.43	0.85			0.07	1.94	1.45	3.39
Glyphosate 3lbs a.e	oz	4.48						0.16	4.64		4.64
Select Max	pt	12.64						0.45	13.09		13.09
Surfactant	pt	1.31						0.05	1.36		1.36
Valor SX	oz	9.14						0.33	9.47		9.47
Soybeans Consultant	acre	6.50						0.15	6.65		6.65
Plant & Pre-Folding	12R-30		1.19	2.16	2.34			0.14	5.83	5.72	11.55
Soybean Seed LL	lb	64.00						1.52	65.52		65.52
CruiserMaxx	oz	6.80						0.16	6.96		6.96
Optimize	oz	3.00						0.07	3.07		3.07
Boundary	pt	22.40						0.53	22.93		22.93
Gramoxone SL 2.0	oz	7.20						0.17	7.37		7.37
Surfactant	pt	1.31						0.03	1.34		1.34
Spray (Broadcast)	60'		0.50	0.39	0.85			0.04	1.78	1.24	3.02
Liberty 280	oz	17.40						0.41	17.81		17.81
Dual Magnum	pt	13.80						0.33	14.13		14.13
Spray (Broadcast)	60'		0.50	0.39	0.85			0.03	1.77	1.24	3.01
Liberty 280	oz	17.40						0.34	17.74		17.74
Zidua	oz	13.58						0.27	13.85		13.85
App by Air (5 gal)	appl	6.50						0.10	6.60		6.60
Quadris Top SBX	oz	19.25						0.30	19.55		19.55
Surfactant	pt	0.33						0.01	0.34		0.34
App by Air (5 gal)	appl	6.50						0.08	6.58		6.58
Acephate 90SP	lb	5.57						0.07	5.64		5.64
App by Air (5 gal)	appl	6.50						0.08	6.58		6.58
Prevathon	oz	18.48						0.22	18.70		18.70
Incidental Pest											
App by Air (5 gal)	appl	6.50						0.05	6.55		6.55
IncidentalPestTrt \$8	acre	8.00						0.06	8.06		8.06
App by Air (5 gal)	appl	6.50						0.05	6.55		6.55
Gramoxone SL	oz	2.40						0.02	2.42		2.42
Sodium Chlorate 5L	gal	3.23						0.03	3.26		3.26
Surfactant	pt	0.66						0.01	0.67		0.67
Header -Soybean	25' Flex		2.51	4.37	2.62			0.04	9.54	15.10	24.64
Haul Soybeans	bu	14.31						0.06	14.37		14.37
Grain Cart Soybean	700 bu		0.37	0.32	0.55				1.24	1.09	2.33
Contour Flood Irr.	acre	2.25	23.01	15.00	5.58			0.75	46.59	49.56	96.15
TOTALS		375.64	30.11	24.44	15.75	0.00	10.63	456.57	80.18	536.75	

Note: Cost of production estimates are based on 2017 input prices.

These fertilizer rates are based on the assumption that 30-40% of the soybean fields would be mixed to light textured fields and not heavy clay exclusively. Also, rates are based on maintenance levels associated with the expected yield in the budget. **Fertilization decisions should be based on soil tests. Soil test cost is prorated for a test every 3rd year. Lime cost prorated for application every 3rd year.** The budget does not include a second fungicide application to control Asian soybean rust, but the cost of treatment could range from \$10 to \$18 plus application cost per acre.

Table 20.E Estimated monthly income and expense flows per acre
 Soybeans, full-season, LL, stale seedbed, 12R 30"
 Flood irrigated, 13.5 ac-in., Delta Area, Mississippi, 2018

ITEM	Nov	Dec	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct
-----dollars-----												
TOTAL INCOME	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	524.70
DIRECT EXPENSES												
CUSTOM SPRAY	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	6.50	13.00	13.00	0.00
HARVEST AIDS	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	5.63	0.00
FERTILIZERS	41.55	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
FUNGICIDES	0.00	0.00	0.00	0.00	0.00	0.00	6.80	0.00	19.25	0.00	0.00	0.00
HERBICIDES	0.00	0.00	0.00	26.26	0.00	0.00	60.80	30.98	0.00	0.00	0.00	0.00
INSECTICIDES	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	24.05	8.00	0.00
SEED/PLANTS	0.00	0.00	0.00	0.00	0.00	0.00	64.00	0.00	0.00	0.00	0.00	0.00
ADJUVANTS	0.00	0.00	0.00	1.31	0.00	0.00	1.31	0.00	0.33	0.00	0.66	0.00
CUSTOM FERTILIZE	7.50	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
HAULING	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	14.31
SURVEY & MARK LEVEES	0.00	0.00	0.00	0.00	0.00	0.00	0.00	2.25	0.00	0.00	0.00	0.00
CUSTOM LIME	15.32	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
CROP CONSULTANT	0.00	0.00	0.00	0.00	0.00	0.00	6.50	0.00	0.00	0.00	0.00	0.00
INOCULANT	0.00	0.00	0.00	0.00	0.00	0.00	3.00	0.00	0.00	0.00	0.00	0.00
SOIL TEST	3.33	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
LABOR	2.11	0.00	0.00	0.85	0.00	0.00	3.64	2.65	1.58	1.58	0.17	3.17
LEASE *	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
FUEL	1.44	0.00	0.00	0.59	0.00	0.00	1.69	8.27	7.52	7.52	0.20	2.88
REPAIR & MAINTENANCE	1.38	0.00	0.00	0.43	0.00	0.00	2.55	9.37	2.97	2.97	0.08	4.69
INTEREST ON OP. CAP.	3.45	0.00	0.00	1.06	0.00	0.00	3.56	1.04	0.60	0.60	0.22	0.10
TOTAL DIRECT EXPENSES	76.08	0.00	0.00	30.50	0.00	0.00	153.85	54.56	38.75	49.72	27.96	25.15
NET INCOME	-76.08	0.00	0.00	-30.50	0.00	0.00	-153.85	-54.56	-38.75	-49.72	-27.96	499.55
NET INCOME TO DATE	-76.08	-76.08	-76.08	-106.58	-106.58	-106.58	-260.43	-314.99	-353.74	-403.46	-431.42	68.13

Note: Cost of production estimates are based on 2017 input prices.

These fertilizer rates are based on the assumption that 30-40% of the soybean fields would be mixed to light textured fields and not heavy clay exclusively. Also, rates are based on maintenance levels associated with the expected yield in the budget.

Fertilization decisions should be based on soil tests. Soil test cost is prorated for a test every 3rd year. Lime cost prorated for application every 3rd year. The budget does not include a second fungicide application to control Asian soybean rust, but the cost of treatment could range from \$10 to \$18 plus application cost per acre.

* Lease costs are based on hourly usage costs.

Table 20.F Estimated returns for various price/yield combinations, per acre
 Soybeans, full-season, LL, stale seedbed, 12R 30"
 Flood irrigated, 13.5 ac-in., Delta Area, Mississippi, 2018

			PERCENT										
PRODUCT			75	80	85	90	95	100	105	110	115	120	125
Soybeans			7.42	7.92	8.41	8.91	9.40	9.90	10.39	10.89	11.38	11.88	12.37
			dollars										
PERCENT	YIELD	UNIT											
50	26.50	bu	-252	-239	-226	-213	-200	-187	-173	-160	-147	-134	-121
			-332	-319	-306	-293	-280	-267	-254	-240	-227	-214	-201
60	31.80	bu	-214	-198	-183	-167	-151	-136	-120	-104	-88	-73	-57
			-294	-279	-263	-247	-231	-216	-200	-184	-168	-153	-137
70	37.10	bu	-176	-158	-140	-121	-103	-84	-66	-48	-29	-11	6
			-256	-238	-220	-201	-183	-165	-146	-128	-110	-91	-73
80	42.40	bu	-138	-117	-96	-75	-54	-33	-12	8	29	50	71
			-219	-198	-177	-156	-135	-114	-93	-72	-51	-30	-9
90	47.70	bu	-100	-77	-53	-30	-6	17	40	64	87	111	135
			-181	-157	-133	-110	-86	-63	-39	-15	7	31	54
100	53.00	bu	-63	-36	-10	15	41	68	94	120	146	173	199
			-143	-116	-90	-64	-38	-12	14	40	66	92	119
110	58.30	bu	-25	3	32	61	90	119	148	176	205	234	263
			-105	-76	-47	-18	10	38	67	96	125	154	183
120	63.60	bu	12	44	75	107	138	170	201	233	264	296	327
			-67	-35	-4	27	58	90	121	152	184	215	247
130	68.90	bu	50	84	118	153	187	221	255	289	323	357	391
			-29	4	38	72	106	141	175	209	243	277	311
140	74.20	bu	88	125	162	198	235	272	308	345	382	419	455
			8	45	81	118	155	192	228	265	302	338	375
150	79.50	bu	126	165	205	244	283	323	362	402	441	480	520
			46	85	125	164	203	243	282	321	361	400	439

The top number in each cell is Returns Above Direct Expenses.
 The bottom number in each cell is Returns Above Total Specified Expenses.
 Only the product listed has been varied to calculate net returns.
 Note: Cost of production estimates are based on 2017 input prices.

Table 21.A Estimated costs per acre
 Soybeans, double crop after wheat, LL, 12R 30"
 Pivot irrigated, 7.5 ac-in., All Areas, Mississippi, 2018

ITEM	UNIT	PRICE	QUANTITY	AMOUNT	YOUR FARM
		dollars		dollars	
DIRECT EXPENSES					
CUSTOM SPRAY					
App by Air (5 gal)	appl	6.50	4.0000	26.00	_____
FERTILIZERS					
Phosphorus (46% P2O5)	cwt	18.75	0.8700	16.31	_____
Potash (60% K2O)	cwt	18.98	1.3300	25.24	_____
FUNGICIDES					
CruiserMaxx	oz	4.25	1.6000	6.80	_____
Quadris Top SBX	oz	2.75	7.0000	19.25	_____
HERBICIDES					
Boundary	pt	11.20	2.0000	22.40	_____
Gramoxone SL 2.0	oz	0.15	48.0000	7.20	_____
Liberty 280	oz	0.60	29.0000	17.40	_____
Dual Magnum	pt	13.80	1.0000	13.80	_____
INSECTICIDES					
Acephate 90SP	lb	7.43	0.7500	5.57	_____
Prevathon	oz	1.32	14.0000	18.48	_____
Bifenthrin	oz	0.78	6.4000	4.99	_____
IncidentalPestTrt	\$8 acre	8.00	1.0000	8.00	_____
SEED/PLANTS					
Soybean Seed LL	lb	1.28	50.0000	64.00	_____
ADJUVANTS					
Surfactant	pt	3.28	0.6000	1.97	_____
CUSTOM FERTILIZE					
Custom Apply Fert	acre	7.50	1.0000	7.50	_____
HAULING					
Haul Soybeans	bu	0.27	50.0000	13.50	_____
CUSTOM LIME					
Lime (Spread)	ton	46.00	0.3330	15.32	_____
CROP CONSULTANT					
Soybeans Consultant	acre	6.50	1.0000	6.50	_____
INOCULANT					
Optimize	oz	2.14	1.4000	3.00	_____
SOIL TEST					
Soil Test	acre	10.00	0.3330	3.33	_____
OPERATOR LABOR					
Tractors	hour	13.51	0.1171	1.58	_____
Harvesters	hour	13.51	0.1021	1.38	_____
IRRIGATE LABOR					
Special Labor	hour	9.06	0.0518	0.47	_____
HAND LABOR					
Implements	hour	9.06	0.0817	0.74	_____
UNALLOCATED LABOR	hour	13.57	0.1886	2.56	_____
DIESEL FUEL					
Tractors	gal	1.80	1.3567	2.44	_____
Harvesters	gal	1.80	1.3935	2.51	_____
1/2-mi Pivot Irr.	gal	1.80	16.4057	29.53	_____
REPAIR & MAINTENANCE					
Implements	acre	3.12	1.0000	3.12	_____
Tractors	acre	0.77	1.0000	0.77	_____
Harvesters	acre	3.49	1.0000	3.49	_____
1/2-mi Pivot Irr.	acre	11.57	1.0000	11.57	_____
INTEREST ON OP. CAP.	acre	7.82	1.0000	7.82	_____
TOTAL DIRECT EXPENSES				374.54	_____
FIXED EXPENSES					
Implements	acre	5.40	1.0000	5.40	_____
Tractors	acre	4.85	1.0000	4.85	_____
Harvesters	acre	13.77	1.0000	13.77	_____
1/2-mi Pivot Irr.	acre	41.81	1.0000	41.81	_____
TOTAL FIXED EXPENSES				65.83	_____
TOTAL SPECIFIED EXPENSES				440.37	_____

Note: Cost of production estimates are based on 2017 input prices. These fertilizer rates are based on the assumption that 30-40% of the soybean fields would be mixed to light textured fields and not heavy clay exclusively. Also, rates are based on maintenance levels associated with the expected yield in the budget. **Fertilization decisions should be based on soil tests. Soil test cost is prorated for a test every 3rd year. Lime cost prorated for application every 3rd year.** The budget does not include a second fungicide application to control Asian soybean rust, but the cost of treatment could range from \$10 to \$18 plus application cost per acre.

Table 21.B Summary of estimated costs and returns per acre
 Soybeans, double crop after wheat, LL, 12R 30"
 Pivot irrigated, 7.5 ac-in., All Areas, Mississippi, 2018

ITEM	UNIT	PRICE	QUANTITY	AMOUNT	YOUR FARM
		dollars		dollars	
INCOME					
Soybeans	bu	9.90	50.0000	495.00	_____

TOTAL INCOME				495.00	_____
DIRECT EXPENSES					
CUSTOM SPRAY	acre	26.00	1.0000	26.00	_____
FERTILIZERS	acre	41.55	1.0000	41.55	_____
FUNGICIDES	acre	26.05	1.0000	26.05	_____
HERBICIDES	acre	60.80	1.0000	60.80	_____
INSECTICIDES	acre	37.04	1.0000	37.04	_____
SEED/PLANTS	acre	64.00	1.0000	64.00	_____
ADJUVANTS	acre	1.97	1.0000	1.97	_____
CUSTOM FERTILIZE	acre	7.50	1.0000	7.50	_____
HAULING	acre	13.50	1.0000	13.50	_____
CUSTOM LIME	acre	15.32	1.0000	15.32	_____
CROP CONSULTANT	acre	6.50	1.0000	6.50	_____
INOCULANT	acre	3.00	1.0000	3.00	_____
SOIL TEST	acre	3.33	1.0000	3.33	_____
HAND LABOR	hour	9.06	0.0817	0.74	_____
IRRIGATE LABOR	hour	9.06	0.0518	0.47	_____
OPERATOR LABOR	hour	13.51	0.2193	2.96	_____
UNALLOCATED LABOR	hour	13.57	0.1886	2.56	_____
DIESEL FUEL	gal	1.80	19.1560	34.48	_____
REPAIR & MAINTENANCE	acre	18.95	1.0000	18.95	_____
INTEREST ON OP. CAP.	acre	7.82	1.0000	7.82	_____

TOTAL DIRECT EXPENSES				374.54	_____
RETURNS ABOVE DIRECT EXPENSES				120.46	_____
TOTAL FIXED EXPENSES				65.83	_____

TOTAL SPECIFIED EXPENSES				440.37	_____
RETURNS ABOVE TOTAL SPECIFIED EXPENSES				54.63	_____

Note: Cost of production estimates are based on 2017 input prices.
 These fertilizer rates are based on the assumption that 30-40% of the soybean fields would be mixed to light textured fields and not heavy clay exclusively. Also, rates are based on maintenance levels associated with the expected yield in the budget. **Fertilization decisions should be based on soil tests. Soil test cost is prorated for a test every 3rd year. Lime cost prorated for application every 3rd year.** The budget does not include a second fungicide application to control Asian soybean rust, but the cost of treatment could range from \$10 to \$18 plus application cost per acre.

Table 21.C Estimated resource use for field operations, per acre
 Soybeans, double crop after wheat, LL, 12R 30"
 Pivot irrigated, 7.5 ac-in., All Areas, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	POWER UNIT SIZE	PERF RATE	TIMES OVER	MTH	INPUT AMOUNT	IMPLEMENT	POWER UNIT	ALLOC LABOR	UNALL LABOR
						-----hours-----				
Soil Test	acre			0.33	Nov	0.3330				
Lime (Spread)	ton			0.33	Nov	0.3330				
Custom Apply Fert	acre			1.00	Nov	1.0000				
Phosphorus(46% P2O5)	cwt					0.8700				
Potash (60% K2O)	cwt					1.3300				
Soybeans Consultant	acre			1.00	May	1.0000				
Plant & Pre-Folding	12R-30	MFWD 225	0.067	1.00	Jun		0.06	0.06	0.13	0.05
Soybean Seed LL	lb					50.0000				
CruiserMaxx	oz					1.6000				
Optimize	oz					1.4000				
Boundary	pt					2.0000				
Gramoxone SL 2.0	oz					48.0000				
Surfactant	pt					0.4000				
Spray (Broadcast)	60'	MFWD 225	0.028	1.00	Jul		0.02	0.02	0.04	0.02
Liberty 280	oz					29.0000				
Dual Magnum	pt					1.0000				
App by Air (5 gal)	appl			1.00	Aug	1.0000				
Quadris Top SBX	oz					7.0000				
Surfactant	pt					0.1000				
App by Air (5 gal)	appl			1.00	Aug	1.0000				
Acephate 90SP	lb					0.7500				
App by Air (5 gal)	appl			1.00	Aug	1.0000				
Prevathon	oz					14.0000				
Surfactant	pt					0.1000				
Bifenthrin	oz					6.4000				
Incidental Pest				1.00	Sep					
App by Air (5 gal)	appl					1.0000				
IncidentalPestTrt \$8	acre					1.0000				
Header -Soybean	25' Flex	265 hp	0.102	1.00	Oct		0.10	0.10	0.10	0.08
Haul Soybeans	bu					50.0000				
Grain Cart Soybean	700 bu	MFWD 225	0.021	1.00	Oct		0.02	0.02	0.02	0.01
1/2-mi Pivot Irr.	acre				Jul	1.0000			0.05	
TOTALS							0.21	0.21	0.35	0.18

Note: Cost of production estimates are based on 2017 input prices.
 These fertilizer rates are based on the assumption that 30-40% of the soybean fields would be mixed to light textured fields and not heavy clay exclusively. Also, rates are based on maintenance levels associated with the expected yield in the budget. **Fertilization decisions should be based on soil tests. Soil test cost is prorated for a test every 3rd year. Lime cost prorated for application every 3rd year.** The budget does not include a second fungicide application to control Asian soybean rust, but the cost of treatment could range from \$10 to \$18 plus application cost per acre.

Table 21.D Estimated costs for field operations, per acre
 Soybeans, double crop after wheat, LL, 12R 30"
 Pivot irrigated, 7.5 ac-in., All Areas, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	-----DIRECT COST-----							FIXED COST	TOTAL COST
		OP INPUT	FUEL	R&M	LABOR	LEASE	INTER	TOTAL		
-----dollars-----										
Soil Test	acre	3.33						0.16	3.49	3.49
Lime (Spread)	ton	15.32						0.73	16.05	16.05
Custom Apply Fert	acre	7.50						0.36	7.86	7.86
Phosphorus(46% P2O5)	cwt	16.31						0.77	17.08	17.08
Potash (60% K2O)	cwt	25.24						1.20	26.44	26.44
Soybeans Consultant	acre	6.50						0.15	6.65	6.65
Plant & Pre-Folding	12R-30		1.41	2.23	2.31			0.12	6.07	6.22
Soybean Seed LL	lb	64.00						1.27	65.27	65.27
CruiserMaxx	oz	6.80						0.13	6.93	6.93
Optimize	oz	3.00						0.06	3.06	3.06
Boundary	pt	22.40						0.44	22.84	22.84
Gramoxone SL 2.0	oz	7.20						0.14	7.34	7.34
Surfactant	pt	1.31						0.03	1.34	1.34
Spray (Broadcast)	60'		0.59	0.43	0.84			0.03	1.89	1.45
Liberty 280	oz	17.40						0.28	17.68	17.68
Dual Magnum	pt	13.80						0.22	14.02	14.02
App by Air (5 gal)	appl	6.50						0.08	6.58	6.58
Quadris Top SBX	oz	19.25						0.23	19.48	19.48
Surfactant	pt	0.33							0.33	0.33
App by Air (5 gal)	appl	6.50						0.08	6.58	6.58
Acephate 90SP	lb	5.57						0.07	5.64	5.64
App by Air (5 gal)	appl	6.50						0.08	6.58	6.58
Prevathon	oz	18.48						0.22	18.70	18.70
Surfactant	pt	0.33							0.33	0.33
Bifenthrin	oz	4.99						0.06	5.05	5.05
Incidental Pest										
App by Air (5 gal)	appl	6.50						0.05	6.55	6.55
IncidentalPestTrt \$8	acre	8.00						0.06	8.06	8.06
Header -Soybean	25' Flex		2.51	4.37	2.57			0.04	9.49	15.10
Haul Soybeans	bu	13.50						0.05	13.55	13.55
Grain Cart Soybean	700 bu		0.44	0.35	0.54			0.01	1.34	1.25
1/2-mi Pivot Irr.	acre		29.53	11.57	0.47			0.70	42.27	41.81
TOTALS		306.56	34.48	18.95	6.73	0.00	7.82	374.54	65.83	440.37

Note: Cost of production estimates are based on 2017 input prices.
 These fertilizer rates are based on the assumption that 30-40% of the soybean fields would be mixed to light textured fields and not heavy clay exclusively. Also, rates are based on maintenance levels associated with the expected yield in the budget. **Fertilization decisions should be based on soil tests. Soil test cost is prorated for a test every 3rd year. Lime cost prorated for application every 3rd year.** The budget does not include a second fungicide application to control Asian soybean rust, but the cost of treatment could range from \$10 to \$18 plus application cost per acre.

Table 21.E Estimated monthly income and expense flows per acre
 Soybeans, double crop after wheat, LL, 12R 30"
 Pivot irrigated, 7.5 ac-in., All Areas, Mississippi, 2018

ITEM	Nov	Dec	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct
-----dollars-----												
TOTAL INCOME	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	495.00
DIRECT EXPENSES												
CUSTOM SPRAY	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	19.50	6.50	0.00
FERTILIZERS	41.55	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
FUNGICIDES	0.00	0.00	0.00	0.00	0.00	0.00	0.00	6.80	0.00	19.25	0.00	0.00
HERBICIDES	0.00	0.00	0.00	0.00	0.00	0.00	0.00	29.60	31.20	0.00	0.00	0.00
INSECTICIDES	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	29.04	8.00	0.00
SEED/PLANTS	0.00	0.00	0.00	0.00	0.00	0.00	0.00	64.00	0.00	0.00	0.00	0.00
ADJUVANTS	0.00	0.00	0.00	0.00	0.00	0.00	0.00	1.31	0.00	0.66	0.00	0.00
CUSTOM FERTILIZE	7.50	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
HAULING	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	13.50
CUSTOM LIME	15.32	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
CROP CONSULTANT	0.00	0.00	0.00	0.00	0.00	0.00	6.50	0.00	0.00	0.00	0.00	0.00
INOCULANT	0.00	0.00	0.00	0.00	0.00	0.00	0.00	3.00	0.00	0.00	0.00	0.00
SOIL TEST	3.33	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
LABOR	0.00	0.00	0.00	0.00	0.00	0.00	0.34	2.35	0.89	0.04	0.00	3.11
LEASE *	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
FUEL	0.00	0.00	0.00	0.00	0.00	0.00	0.00	10.27	12.40	8.86	0.00	2.95
REPAIR & MAINTENANCE	0.00	0.00	0.00	0.00	0.00	0.00	0.00	12.51	1.17	0.55	0.00	4.72
INTEREST ON OP. CAP.	3.22	0.00	0.00	0.00	0.00	0.00	0.16	2.57	0.73	0.93	0.11	0.10
TOTAL DIRECT EXPENSES	70.92	0.00	0.00	0.00	0.00	0.00	7.00	132.41	46.39	78.83	14.61	24.38
NET INCOME	-70.92	0.00	0.00	0.00	0.00	0.00	-7.00	-132.41	-46.39	-78.83	-14.61	470.62
NET INCOME TO DATE	-70.92	-70.92	-70.92	-70.92	-70.92	-70.92	-77.92	-210.33	-256.72	-335.55	-350.16	120.46

Note: Cost of production estimates are based on 2017 input prices.

These fertilizer rates are based on the assumption that 30-40% of the soybean fields would be mixed to light textured fields and not heavy clay exclusively. Also, rates are based on maintenance levels associated with the expected yield in the budget.

Fertilization decisions should be based on soil tests. Soil test cost is prorated for a test every 3rd year. Lime cost prorated for application every 3rd year. The budget does not include a second fungicide application to control Asian soybean rust, but the cost of treatment could range from \$10 to \$18 plus application cost per acre.

* Lease costs are based on hourly usage costs.

Table 21.F estimated returns for various price/yield combinations, per acre
 Soybeans, double crop after wheat, LL, 12R 30"
 Pivot irrigated, 7.5 ac-in., All Areas, Mississippi, 2018

			PERCENT										
PRODUCT			75	80	85	90	95	100	105	110	115	120	125
			PRODUCT PRICE										
			dollars										
Soybeans			7.42	7.92	8.41	8.91	9.40	9.90	10.39	10.89	11.38	11.88	12.37
PERCENT	YIELD	UNIT											
50	25.00	bu	-182 -247	-169 -235	-157 -223	-145 -210	-132 -198	-120 -186	-107 -173	-95 -161	-83 -148	-70 -136	-58 -124
60	30.00	bu	-146 -212	-131 -197	-116 -182	-101 -167	-86 -152	-72 -137	-57 -123	-42 -108	-27 -93	-12 -78	2 -63
70	35.00	bu	-110 -176	-93 -159	-75 -141	-58 -124	-41 -107	-23 -89	-6 -72	10 -55	28 -37	45 -20	62 -3
80	40.00	bu	-74 -140	-55 -120	-35 -101	-15 -81	4 -61	24 -41	43 -21	63 -2	83 17	103 37	123 57
90	45.00	bu	-39 -104	-16 -82	5 -60	27 -38	50 -15	72 6	94 28	116 51	139 73	161 95	183 117
100	50.00	bu	-3 -69	21 -44	46 -19	70 5	95 29	120 54	145 79	169 104	194 128	219 153	244 178
110	55.00	bu	32 -33	59 -6	86 21	114 48	141 75	168 102	195 130	223 157	250 184	277 211	304 238
120	60.00	bu	68 2	97 32	127 61	157 91	187 121	216 150	246 180	276 210	305 240	335 269	365 299
130	65.00	bu	104 38	136 70	168 102	200 134	232 166	264 199	297 231	329 263	361 295	393 327	425 359
140	70.00	bu	139 73	174 108	209 143	243 177	278 212	313 247	347 281	382 316	416 351	451 385	486 420
150	75.00	bu	175 109	212 146	249 183	286 221	324 258	361 295	398 332	435 369	472 406	509 443	546 480

The top number in each cell is Returns Above Direct Expenses.
 The bottom number in each cell is Returns Above Total Specified Expenses.
 Only the product listed has been varied to calculate net returns.
 Note: Cost of production estimates are based on 2017 input prices.

Table 22.A Estimated costs per acre
Soybeans, double crop after wheat, LL, 12R 30"
Non-irrigated, All Areas, Mississippi, 2018

ITEM	UNIT	PRICE	QUANTITY	AMOUNT	YOUR FARM
		dollars		dollars	
DIRECT EXPENSES					
CUSTOM SPRAY					
App by Air (5 gal)	appl	6.50	3.0000	19.50	_____
FERTILIZERS					
Phosphorus (46% P2O5)	cwt	18.75	0.8700	16.31	_____
Potash (60% K2O)	cwt	18.98	1.3300	25.24	_____
FUNGICIDES					
CruiserMaxx	oz	4.25	1.6000	6.80	_____
HERBICIDES					
Boundary	pt	11.20	2.0000	22.40	_____
Gramoxone SL 2.0	oz	0.15	48.0000	7.20	_____
Liberty 280	oz	0.60	29.0000	17.40	_____
Dual Magnum	pt	13.80	1.0000	13.80	_____
INSECTICIDES					
Acephate 90SP	lb	7.43	0.7500	5.57	_____
Prevathon	oz	1.32	14.0000	18.48	_____
Bifenthrin	oz	0.78	6.4000	4.99	_____
IncidentalPestTrt \$8	acre	8.00	1.0000	8.00	_____
SEED/PLANTS					
Soybean Seed LL	lb	1.28	50.0000	64.00	_____
ADJUVANTS					
Surfactant	pt	3.28	0.5000	1.64	_____
CUSTOM FERTILIZE					
Custom Apply Fert	acre	7.50	1.0000	7.50	_____
HAULING					
Haul Soybeans	bu	0.27	25.0000	6.75	_____
CUSTOM LIME					
Lime (Spread)	ton	46.00	0.3330	15.32	_____
CROP CONSULTANT					
Soybeans Consultant	acre	6.50	1.0000	6.50	_____
INOCULANT					
Optimize	oz	2.14	1.4000	3.00	_____
SOIL TEST					
Soil Test	acre	10.00	0.3330	3.33	_____
OPERATOR LABOR					
Tractors	hour	13.51	0.1171	1.58	_____
Harvesters	hour	13.51	0.1021	1.38	_____
HAND LABOR					
Implements	hour	9.06	0.0817	0.74	_____
UNALLOCATED LABOR					
	hour	13.57	0.1886	2.56	_____
DIESEL FUEL					
Tractors	gal	1.80	1.3567	2.44	_____
Harvesters	gal	1.80	1.3935	2.51	_____
REPAIR & MAINTENANCE					
Implements	acre	3.12	1.0000	3.12	_____
Tractors	acre	0.77	1.0000	0.77	_____
Harvesters	acre	3.49	1.0000	3.49	_____
INTEREST ON OP. CAP.	acre	6.79	1.0000	6.79	_____
TOTAL DIRECT EXPENSES				299.11	_____
FIXED EXPENSES					
Implements	acre	5.40	1.0000	5.40	_____
Tractors	acre	4.85	1.0000	4.85	_____
Harvesters	acre	13.77	1.0000	13.77	_____
TOTAL FIXED EXPENSES				24.02	_____
TOTAL SPECIFIED EXPENSES				323.13	_____

Note: Cost of production estimates are based on 2017 input prices.

Fertilization decisions should be based on soil tests. Soil test cost is prorated for a test every 3rd year. Lime cost prorated for application every 3rd year. The budget does not include a second fungicide application to control Asian soybean rust, but the cost of treatment could range from \$10 to \$18 plus application cost per acre.

Table 22.B Summary of estimated costs and returns per acre
Soybeans, double crop after wheat, LL, 12R 30"
Non-irrigated, All Areas, Mississippi, 2018

ITEM	UNIT	PRICE	QUANTITY	AMOUNT	YOUR FARM
		dollars		dollars	
INCOME					
Soybeans	bu	9.90	25.0000	247.50	_____

TOTAL INCOME				247.50	_____
DIRECT EXPENSES					
CUSTOM SPRAY	acre	19.50	1.0000	19.50	_____
FERTILIZERS	acre	41.55	1.0000	41.55	_____
FUNGICIDES	acre	6.80	1.0000	6.80	_____
HERBICIDES	acre	60.80	1.0000	60.80	_____
INSECTICIDES	acre	37.04	1.0000	37.04	_____
SEED/PLANTS	acre	64.00	1.0000	64.00	_____
ADJUVANTS	acre	1.64	1.0000	1.64	_____
CUSTOM FERTILIZE	acre	7.50	1.0000	7.50	_____
HAULING	acre	6.75	1.0000	6.75	_____
CUSTOM LIME	acre	15.32	1.0000	15.32	_____
CROP CONSULTANT	acre	6.50	1.0000	6.50	_____
INOCULANT	acre	3.00	1.0000	3.00	_____
SOIL TEST	acre	3.33	1.0000	3.33	_____
HAND LABOR	hour	9.06	0.0817	0.74	_____
OPERATOR LABOR	hour	13.51	0.2193	2.96	_____
UNALLOCATED LABOR	hour	13.57	0.1886	2.56	_____
DIESEL FUEL	gal	1.80	2.7503	4.95	_____
REPAIR & MAINTENANCE	acre	7.38	1.0000	7.38	_____
INTEREST ON OP. CAP.	acre	6.79	1.0000	6.79	_____

TOTAL DIRECT EXPENSES				299.11	_____
RETURNS ABOVE DIRECT EXPENSES				-51.61	_____
TOTAL FIXED EXPENSES				24.02	_____

TOTAL SPECIFIED EXPENSES				323.13	_____
RETURNS ABOVE TOTAL SPECIFIED EXPENSES				-75.63	_____

Note: Cost of production estimates are based on 2017 input prices.
Fertilization decisions should be based on soil tests. Soil test cost is prorated for a test every 3rd year. Lime cost prorated for application every 3rd year. The budget does not include a second fungicide application to control Asian soybean rust, but the cost of treatment could range from \$10 to \$18 plus application cost per acre..

Table 22.C Estimated resource use for field operations, per acre
 Soybeans, double crop after wheat, LL, 12R 30"
 Non-irrigated, All Areas, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	POWER UNIT SIZE	PERF RATE	TIMES OVER	MTH	INPUT AMOUNT	IMPLEMENT	POWER UNIT	ALLOC LABOR	UNALL LABOR
						-----hours-----				
Soil Test	acre			0.33	Nov	0.3330				
Lime (Spread)	ton			0.33	Nov	0.3330				
Custom Apply Fert	acre			1.00	Nov	1.0000				
Phosphorus (46% P2O5)	cwt					0.8700				
Potash (60% K2O)	cwt					1.3300				
Soybeans Consultant	acre			1.00	May	1.0000				
Plant & Pre-Folding	12R-30	MFWD 225	0.067	1.00	Jun		0.06	0.06	0.13	0.05
Soybean Seed LL	lb					50.0000				
CruiserMaxx	oz					1.6000				
Optimize	oz					1.4000				
Boundary	pt					2.0000				
Gramoxone SL 2.0	oz					48.0000				
Surfactant	pt					0.4000				
Spray (Broadcast)	60'	MFWD 225	0.028	1.00	Jul		0.02	0.02	0.04	0.02
Liberty 280	oz					29.0000				
Dual Magnum	pt					1.0000				
App by Air (5 gal)	appl			1.00	Aug	1.0000				
Acephate 90SP	lb					0.7500				
App by Air (5 gal)	appl			1.00	Aug	1.0000				
Prevathon	oz					14.0000				
Surfactant	pt					0.1000				
Bifenthrin	oz					6.4000				
Incidental Pest				1.00	Sep					
App by Air (5 gal)	appl					1.0000				
IncidentalPestTrt \$8	acre					1.0000				
Header -Soybean	25' Flex	265 hp	0.102	1.00	Oct		0.10	0.10	0.10	0.08
Haul Soybeans	bu					25.0000				
Grain Cart Soybean	700 bu	MFWD 225	0.021	1.00	Oct		0.02	0.02	0.02	0.01

TOTALS							0.21	0.21	0.30	0.18

Note: Cost of production estimates are based on 2017 input prices.
Fertilization decisions should be based on soil tests. Soil test cost is prorated for a test every 3rd year. Lime cost prorated for application every 3rd year. The budget does not include a second fungicide application to control Asian soybean rust, but the cost of treatment could range from \$10 to \$18 plus application cost per acre.

Table 22.D Estimated costs for field operations, per acre
Soybeans, double crop after wheat, LL, 12R 30"
Non-irrigated, All Areas, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	-----DIRECT COST-----							FIXED COST	TOTAL COST
		OP INPUT	FUEL	R&M	LABOR	LEASE	INTER	TOTAL		
-----dollars-----										
Soil Test	acre	3.33						0.16	3.49	3.49
Lime (Spread)	ton	15.32						0.73	16.05	16.05
Custom Apply Fert	acre	7.50						0.36	7.86	7.86
Phosphorus(46% P2O5)	cwt	16.31						0.77	17.08	17.08
Potash (60% K2O)	cwt	25.24						1.20	26.44	26.44
Soybeans Consultant	acre	6.50						0.15	6.65	6.65
Plant & Pre-Folding	12R-30		1.41	2.23	2.31			0.12	6.07	6.22
Soybean Seed LL	lb	64.00						1.27	65.27	65.27
CruiserMaxx	oz	6.80						0.13	6.93	6.93
Optimize	oz	3.00						0.06	3.06	3.06
Boundary	pt	22.40						0.44	22.84	22.84
Gramoxone SL 2.0	oz	7.20						0.14	7.34	7.34
Surfactant	pt	1.31						0.03	1.34	1.34
Spray (Broadcast)	60'		0.59	0.43	0.84			0.03	1.89	1.45
Liberty 280	oz	17.40						0.28	17.68	17.68
Dual Magnum	pt	13.80						0.22	14.02	14.02
App by Air (5 gal)	appl	6.50						0.08	6.58	6.58
Acephate 90SP	lb	5.57						0.07	5.64	5.64
App by Air (5 gal)	appl	6.50						0.08	6.58	6.58
Prevathon	oz	18.48						0.22	18.70	18.70
Surfactant	pt	0.33							0.33	0.33
Bifenthrin	oz	4.99						0.06	5.05	5.05
Incidental Pest										
App by Air (5 gal)	appl	6.50						0.05	6.55	6.55
IncidentalPestTrt \$8	acre	8.00						0.06	8.06	8.06
Header -Soybean	25' Flex		2.51	4.37	2.57			0.04	9.49	15.10
Haul Soybeans	bu	6.75						0.03	6.78	6.78
Grain Cart Soybean	700 bu		0.44	0.35	0.54			0.01	1.34	1.25
TOTALS		273.73	4.95	7.38	6.26	0.00	6.79	299.11	24.02	323.13

Note: Cost of production estimates are based on 2017 input prices.

Fertilization decisions should be based on soil tests. Soil test cost is prorated for a test every 3rd year. Lime cost prorated for application every 3rd year. The budget does not include a second Fungicide application to control Asian soybean rust, but the cost of treatment could range from \$10 to \$18 plus application cost per acre.

Table 22.E Estimated monthly income and expense flows per acre
Soybeans, double crop after wheat, 1L, 12R 30"
Non-irrigated, All Areas, Mississippi, 2018

ITEM	Nov	Dec	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct
-----dollars-----												
TOTAL INCOME	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	247.50
DIRECT EXPENSES												
CUSTOM SPRAY	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	13.00	6.50	0.00
FERTILIZERS	41.55	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
FUNGICIDES	0.00	0.00	0.00	0.00	0.00	0.00	0.00	6.80	0.00	0.00	0.00	0.00
HERBICIDES	0.00	0.00	0.00	0.00	0.00	0.00	0.00	29.60	31.20	0.00	0.00	0.00
INSECTICIDES	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	29.04	8.00	0.00
SEED/PLANTS	0.00	0.00	0.00	0.00	0.00	0.00	0.00	64.00	0.00	0.00	0.00	0.00
ADJUVANTS	0.00	0.00	0.00	0.00	0.00	0.00	0.00	1.31	0.00	0.33	0.00	0.00
CUSTOM FERTILIZE	7.50	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
HAULING	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	6.75
CUSTOM LIME	15.32	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
CROP CONSULTANT	0.00	0.00	0.00	0.00	0.00	0.00	6.50	0.00	0.00	0.00	0.00	0.00
INOCULANT	0.00	0.00	0.00	0.00	0.00	0.00	0.00	3.00	0.00	0.00	0.00	0.00
SOIL TEST	3.33	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
LABOR	0.00	0.00	0.00	0.00	0.00	0.00	0.00	2.31	0.84	0.00	0.00	3.11
LEASE *	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
FUEL	0.00	0.00	0.00	0.00	0.00	0.00	0.00	1.41	0.59	0.00	0.00	2.95
REPAIR & MAINTENANCE	0.00	0.00	0.00	0.00	0.00	0.00	0.00	2.23	0.43	0.00	0.00	4.72
INTEREST ON OP. CAP.	3.22	0.00	0.00	0.00	0.00	0.00	0.15	2.19	0.53	0.51	0.11	0.08
TOTAL DIRECT EXPENSES	70.92	0.00	0.00	0.00	0.00	0.00	6.65	112.85	33.59	42.88	14.61	17.61
NET INCOME	-70.92	0.00	0.00	0.00	0.00	0.00	-6.65	-112.85	-33.59	-42.88	-14.61	229.89
NET INCOME TO DATE	-70.92	-70.92	-70.92	-70.92	-70.92	-70.92	-77.57	-190.42	-224.01	-266.89	-281.50	-51.61

Note: Cost of production estimates are based on 2017 input prices.

Fertilization decisions should be based on soil tests. Soil test cost is prorated for a test every 3rd year. Lime cost prorated for application every 3rd year. The budget does not include a second fungicide application to control Asian soybean rust, but the cost of treatment could range from \$10 to \$18 plus application cost per acre

* Lease costs are based on hourly usage costs.

Table 22.F Estimated returns for various price/yield combinations, per acre
 Soybeans, double crop after wheat, LL, 12R 30"
 Non-irrigated, All Areas, Mississippi, 2018

			-----PERCENT-----										
PRODUCT			75	80	85	90	95	100	105	110	115	120	125
			-----PRODUCT PRICE-----										
Soybeans			7.42	7.92	8.41	8.91	9.40	9.90	10.39	10.89	11.38	11.88	12.37
PERCENT	YIELD	UNIT	-----dollars-----										
50	12.50	bu	-202	-196	-190	-184	-178	-171	-165	-159	-153	-147	-141
			-226	-220	-214	-208	-202	-195	-189	-183	-177	-171	-165
60	15.00	bu	-185	-177	-170	-162	-155	-147	-140	-133	-125	-118	-110
			-209	-201	-194	-186	-179	-171	-164	-157	-149	-142	-134
70	17.50	bu	-167	-158	-149	-141	-132	-123	-115	-106	-97	-89	-80
			-191	-182	-173	-165	-156	-147	-139	-130	-121	-113	-104
80	20.00	bu	-149	-139	-129	-119	-109	-99	-89	-79	-70	-60	-50
			-173	-163	-153	-143	-133	-123	-113	-103	-94	-84	-74
90	22.50	bu	-131	-120	-109	-97	-86	-75	-64	-53	-42	-31	-19
			-155	-144	-133	-121	-110	-99	-88	-77	-66	-55	-44
100	25.00	bu	-113	-101	-88	-76	-63	-51	-39	-26	-14	-2	10
			-137	-125	-112	-100	-88	-75	-63	-50	-38	-26	-13
110	27.50	bu	-95	-81	-68	-54	-41	-27	-13	-0	13	26	40
			-119	-106	-92	-78	-65	-51	-37	-24	-10	2	16
120	30.00	bu	-77	-62	-48	-33	-18	-3	11	26	41	55	70
			-101	-86	-72	-57	-42	-27	-12	2	17	31	46
130	32.50	bu	-59	-43	-27	-11	4	20	36	52	68	84	101
			-83	-67	-51	-35	-19	-3	12	28	44	60	77
140	35.00	bu	-41	-24	-7	10	27	44	62	79	96	113	131
			-65	-48	-31	-13	3	20	37	55	72	89	107
150	37.50	bu	-24	-5	13	31	50	68	87	105	124	143	161
			-48	-29	-10	7	26	44	63	81	100	118	137

The top number in each cell is Returns Above Direct Expenses.
 The bottom number in each cell is Returns Above Total Specified Expenses.
 Only the product listed has been varied to calculate net returns.
 Note: Cost of production estimates are based on 2017 input prices.

Table 23.A Estimated costs per acre
 Corn, stale seedbed, BtRR, 12-row 38", 220 bu yield goal
 Furrow Irrigated, 13 ac-in., Delta Area, Mississippi, 2018

ITEM	UNIT	PRICE	QUANTITY	AMOUNT	YOUR FARM
		dollars		dollars	
DIRECT EXPENSES					
CUSTOM SPRAY					
App by Air (5 gal)	appl	6.50	1.0000	6.50	_____
App by Air (3 gal)	appl	5.00	0.2000	1.00	_____
FERTILIZERS					
Phosphorus(46% P2O5)	cwt	18.75	1.9570	36.69	_____
Potash (60% K2O)	cwt	18.98	1.5000	28.47	_____
Fert 10-34-0	gal	2.59	4.2919	11.12	_____
Zinc Plus	pt	2.99	2.0000	5.98	_____
UAN + Sulfur (28%)	gal	1.31	32.1712	42.14	_____
UAN (32%)	gal	1.17	39.5570	46.28	_____
HERBICIDES					
Glyphosate 3lbs a.e	oz	0.14	32.0000	4.48	_____
Clarity	pt	11.55	0.5000	5.78	_____
Select Max	pt	12.64	1.0000	12.64	_____
Atrazine 4L	pt	2.12	4.0000	8.48	_____
Halex GT	pt	7.80	3.6000	28.08	_____
INSECTICIDES					
Bifenthrin	oz	0.78	1.2800	1.00	_____
IRRIGATION SUPPLIES					
Roll-Out Pipe	ft	0.25	33.0000	8.25	_____
SEED/PLANTS					
Corn Seed BtRR	thous	3.63	34.0000	123.42	_____
CUSTOM FERTILIZE					
Custom Apply Fert	acre	7.50	1.0000	7.50	_____
HAULING					
Haul Corn	bu	0.23	220.0000	50.60	_____
CUSTOM LIME					
Lime (Spread)	ton	46.00	0.6660	30.64	_____
CROP CONSULTANT					
Corn Consultant	acre	6.00	1.0000	6.00	_____
SOIL TEST					
Soil Test	acre	10.00	0.3330	3.33	_____
OPERATOR LABOR					
Tractors	hour	13.51	0.4242	5.72	_____
Harvesters	hour	13.51	0.1009	1.36	_____
IRRIGATE LABOR					
Special Labor	hour	9.06	0.3250	2.96	_____
Implements	hour	9.06	0.0625	0.57	_____
HAND LABOR					
Implements	hour	9.06	0.1354	1.22	_____
UNALLOCATED LABOR					
	hour	13.50	0.4020	5.43	_____
DIESEL FUEL					
Tractors	gal	1.80	4.7302	8.53	_____
Harvesters	gal	1.80	1.6890	3.04	_____
Roll-Out Pipe Irr.	gal	1.80	10.5901	19.08	_____
REPAIR & MAINTENANCE					
Implements	acre	7.52	1.0000	7.52	_____
Tractors	acre	2.67	1.0000	2.67	_____
Harvesters	acre	3.73	1.0000	3.73	_____
Roll-Out Pipe Irr.	acre	6.88	1.0000	6.88	_____
INTEREST ON OP. CAP.	acre	14.18	1.0000	14.18	_____
TOTAL DIRECT EXPENSES				551.27	_____
FIXED EXPENSES					
Implements	acre	11.58	1.0000	11.58	_____
Tractors	acre	16.81	1.0000	16.81	_____
Harvesters	acre	14.73	1.0000	14.73	_____
Roll-Out Pipe Irr.	acre	53.42	1.0000	53.42	_____
TOTAL FIXED EXPENSES				96.54	_____
TOTAL SPECIFIED EXPENSES				647.81	_____

Note: Cost of production estimates are based on 2017 input prices.

Fertilization decisions should be based on soil tests.

Soil test cost is prorated for a test every 3rd year.

Lime cost prorated for application every 3rd year.

Table 23.B Summary of estimated costs and returns per acre
 Corn, stale seedbed, BtRR, 12-row 38", 220 bu yield goal
 Furrow Irrigated, 13 ac-in., Delta Area, Mississippi, 2018

ITEM	UNIT	PRICE	QUANTITY	AMOUNT	YOUR FARM
		dollars		dollars	
INCOME					
Corn	bu	3.76	220.0000	827.20	_____

TOTAL INCOME				827.20	_____
DIRECT EXPENSES					
CUSTOM SPRAY	acre	7.50	1.0000	7.50	_____
FERTILIZERS	acre	170.68	1.0000	170.68	_____
HERBICIDES	acre	59.46	1.0000	59.46	_____
INSECTICIDES	acre	1.00	1.0000	1.00	_____
IRRIGATION SUPPLIES	acre	8.25	1.0000	8.25	_____
SEED/PLANTS	acre	123.42	1.0000	123.42	_____
CUSTOM FERTILIZE	acre	7.50	1.0000	7.50	_____
HAULING	acre	50.60	1.0000	50.60	_____
CUSTOM LIME	acre	30.64	1.0000	30.64	_____
CROP CONSULTANT	acre	6.00	1.0000	6.00	_____
SOIL TEST	acre	3.33	1.0000	3.33	_____
HAND LABOR	hour	9.06	0.1354	1.22	_____
IRRIGATE LABOR	hour	9.06	0.3875	3.53	_____
OPERATOR LABOR	hour	13.51	0.5252	7.08	_____
UNALLOCATED LABOR	hour	13.50	0.4020	5.43	_____
DIESEL FUEL	gal	1.80	17.0094	30.65	_____
REPAIR & MAINTENANCE	acre	20.80	1.0000	20.80	_____
INTEREST ON OP. CAP.	acre	14.18	1.0000	14.18	_____

TOTAL DIRECT EXPENSES				551.27	_____
RETURNS ABOVE DIRECT EXPENSES				275.93	_____
TOTAL FIXED EXPENSES				96.54	_____

TOTAL SPECIFIED EXPENSES				647.81	_____
RETURNS ABOVE TOTAL SPECIFIED EXPENSES				179.39	_____

Note: Cost of production estimates are based on 2017 input prices.

Fertilization decisions should be based on soil tests.

Soil test cost is prorated for a test every 3rd year.

Lime cost prorated for application every 3rd year.

Table 23.C Estimated resource use for field operations, per acre
 Corn, stale seedbed, BtRR, 12-row 38", 220 bu yield goal
 Furrow Irrigated, 13 ac-in., Delta Area, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	POWER UNIT SIZE	PERF RATE	TIMES OVER	MTH	INPUT AMOUNT	IMPLEMENT	POWER UNIT	ALLOC LABOR	UNALL LABOR
						-----hours-----				
Soil Test	acre			0.33	Oct	0.3330				
Lime (Spread)	ton			0.33	Oct	0.6660				
Spin Spreader	5 ton	MFWD 225	0.042	1.00	Oct		0.04	0.04	0.08	0.03
Phosphorus (46% P2O5)	cwt					1.9570				
Potash (60% K2O)	cwt					1.5000				
Bed/Disk w/roller	12R-30/40	MFWD 225	0.062	1.00	Oct		0.06	0.06	0.06	0.05
App by Air (5 gal)	appl			1.00	Feb	1.0000				
Glyphosate 3lbs a.e	oz					32.0000				
Clarity	pt					0.5000				
Select Max	pt					1.0000				
Plant & Pre-Folding	12R-38	MFWD 225	0.053	1.00	Mar		0.05	0.05	0.10	0.04
Corn Seed BtRR	thous					34.0000				
Fert 10-34-0	gal					4.2919				
Zinc Plus	pt					2.0000				
Custom Apply Fert	acre			1.00	Apr	1.0000				
UAN + Sulfur (28%)	gal					32.1712				
Spray (Broadcast)	60'	MFWD 225	0.028	1.00	Apr		0.02	0.02	0.04	0.02
Atrazine 4L	pt					4.0000				
Halex GT	pt					3.6000				
App by Air (3 gal)	appl			0.20	May	0.2000				
Bifenthrin	oz					1.2800				
Corn Consultant	acre			1.00	May	1.0000				
Fert Appl (Liquid)	12R-38	MFWD 225	0.051	1.00	May		0.05	0.05	0.07	0.04
UAN (32%)	gal					39.5570				
Header - Corn	8R-38	325 hp	0.100	1.00	Sep		0.10	0.10	0.10	0.09
Grain Cart Corn	700 bu	MFWD 225	0.025	1.00	Sep		0.02	0.02	0.02	0.02
Haul Corn	bu					220.0000				
Stalk Shredder Flex	20'	MFWD 225	0.082	1.00	Sep		0.08	0.08	0.08	0.07
Roll-Out Pipe Irr.	acre				Jul	1.0000	0.07	0.07	0.46	
TOTALS							0.52	0.52	1.04	0.40

Note: Cost of production estimates are based on 2017 input prices.

Fertilization decisions should be based on soil tests.

Soil test cost is prorated for a test every 3rd year.

Lime cost prorated for application every 3rd year.

Table 23.D Estimated costs for field operations, per acre
 Corn, stale seedbed, BtRR, 12-row 38", 220 bu yield goal
 Furrow Irrigated, 13 ac-in., Delta Area, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	-----DIRECT COST-----							FIXED COST	TOTAL COST
		OP INPUT	FUEL	R&M	LABOR	LEASE	INTER	TOTAL		
-----dollars-----										
Soil Test	acre	3.33						0.16	3.49	3.49
Lime (Spread)	ton	30.64						1.46	32.10	32.10
Spin Spreader	5 ton		0.88	0.57	1.46			0.14	3.05	2.33 5.38
Phosphorus (46% P2O5)	cwt	36.69						1.74	38.43	38.43
Potash (60% K2O)	cwt	28.47						1.35	29.82	29.82
Bed/Disk w/roller	12R-30/40		1.30	1.10	1.60			0.19	4.19	4.41 8.60
App by Air (5 gal)	appl	6.50						0.21	6.71	6.71
Glyphosate 3lbs a.e	oz	4.48						0.14	4.62	4.62
Clarity	pt	5.78						0.18	5.96	5.96
Select Max	pt	12.64						0.40	13.04	13.04
Plant & Pre-Folding	12R-38		1.11	1.98	1.85			0.14	5.08	5.32 10.40
Corn Seed BtRR	thous	123.42						3.42	126.84	126.84
Fert 10-34-0	gal	11.12						0.31	11.43	11.43
Zinc Plus	pt	5.98						0.17	6.15	6.15
Custom Apply Fert	acre	7.50						0.18	7.68	7.68
UAN + Sulfur (28%)	gal	42.14						1.00	43.14	43.14
Spray (Broadcast)	60'		0.59	0.43	0.85			0.04	1.91	1.45 3.36
Atrazine 4L	pt	8.48						0.20	8.68	8.68
Halex GT	pt	28.08						0.67	28.75	28.75
App by Air (3 gal)	appl	1.00						0.02	1.02	1.02
Bifenthrin	oz	1.00						0.02	1.02	1.02
Corn Consultant	acre	6.00						0.12	6.12	6.12
Fert Appl (Liquid)	12R-38		1.08	0.99	1.56			0.07	3.70	2.88 6.58
UAN (32%)	gal	46.28						0.92	47.20	47.20
Header - Corn	8R-38		3.04	5.30	2.59			0.04	10.97	17.09 28.06
Grain Cart Corn	700 bu		0.53	0.42	0.65			0.01	1.61	1.49 3.10
Haul Corn	bu	50.60						0.20	50.80	50.80
Stalk Shredder Flex	20'		1.72	2.54	2.11			0.03	6.40	4.62 11.02
Roll-Out Pipe Irr.	acre	8.25	20.40	7.47	4.59			0.65	41.36	56.95 98.31
TOTALS		468.38	30.65	20.80	17.26	0.00	14.18	551.27	96.54	647.81

Note: Cost of production estimates are based on 2017 input prices.

Fertilization decisions should be based on soil tests.

Soil test cost is prorated for a test every 3rd year.

Lime cost prorated for application every 3rd year.

Table 23.E Estimated monthly income and expense flows per acre
 Corn, stale seedbed, BtRR, 12-row 38", 220 bu yield goal
 Furrow Irrigated, 13 ac-in., Delta Area, Mississippi, 2018

ITEM	Oct	Nov	Dec	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep
-----dollars-----												
TOTAL INCOME	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	827.20
DIRECT EXPENSES												
CUSTOM SPRAY	0.00	0.00	0.00	0.00	6.50	0.00	0.00	1.00	0.00	0.00	0.00	0.00
FERTILIZERS	65.16	0.00	0.00	0.00	0.00	17.10	42.14	46.28	0.00	0.00	0.00	0.00
HERBICIDES	0.00	0.00	0.00	0.00	22.90	0.00	36.56	0.00	0.00	0.00	0.00	0.00
INSECTICIDES	0.00	0.00	0.00	0.00	0.00	0.00	0.00	1.00	0.00	0.00	0.00	0.00
IRRIGATION SUPPLIES	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	8.25	0.00	0.00	0.00
SEED/PLANTS	0.00	0.00	0.00	0.00	0.00	123.42	0.00	0.00	0.00	0.00	0.00	0.00
CUSTOM FERTILIZE	0.00	0.00	0.00	0.00	0.00	0.00	7.50	0.00	0.00	0.00	0.00	0.00
HAULING	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	50.60
CUSTOM LIME	30.64	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
CROP CONSULTANT	0.00	0.00	0.00	0.00	0.00	0.00	0.00	6.00	0.00	0.00	0.00	0.00
SOIL TEST	3.33	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
LABOR	3.57	0.00	0.00	0.00	0.00	1.85	0.85	1.79	3.03	0.23	0.59	5.35
LEASE *	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
FUEL	2.85	0.00	0.00	0.00	0.00	1.11	0.59	1.08	14.66	4.77	0.30	5.29
REPAIR & MAINTENANCE	1.98	0.00	0.00	0.00	0.00	1.98	0.43	0.99	6.05	0.98	0.13	8.26
INTEREST ON OP. CAP.	5.11	0.00	0.00	0.00	0.93	4.04	2.09	1.15	0.50	0.07	0.01	0.28
TOTAL DIRECT EXPENSES	112.64	0.00	0.00	0.00	30.33	149.50	90.16	59.29	32.49	6.05	1.03	69.78
NET INCOME	-112.64	0.00	0.00	0.00	-30.33	-149.50	-90.16	-59.29	-32.49	-6.05	-1.03	757.42
NET INCOME TO DATE	-112.64	-112.64	-112.64	-112.64	-142.97	-292.47	-382.63	-441.92	-474.41	-480.46	-481.49	275.93

Note: Cost of production estimates are based on 2017 input prices.

Fertilization decisions should be based on soil tests.

Soil test cost is prorated for a test every 3rd year.

Lime cost prorated for application every 3rd year.

* Lease costs are based on hourly usage costs.

Table 23.F Estimated returns for various price/yield combinations, per acre
 Corn, stale seedbed, BtRR, 12-row 38", 220 bu yield goal
 Furrow Irrigated, 13 ac-in., Delta Area, Mississippi, 2018

PRODUCT	PERCENT												
	75	80	85	90	95	100	105	110	115	120	125		
	PRODUCT PRICE												
Corn	2.82	3.00	3.19	3.38	3.57	3.76	3.94	4.13	4.32	4.51	4.70		
PERCENT	YIELD	UNIT	dollars										
50	110.00	bu	-215 -312	-194 -291	-174 -270	-153 -250	-132 -229	-112 -208	-91 -188	-70 -167	-50 -146	-29 -126	-8 -105
60	132.00	bu	-158 -255	-133 -230	-109 -205	-84 -180	-59 -155	-34 -131	-9 -106	15 -81	39 -56	64 -31	89 -7
70	154.00	bu	-101 -198	-72 -169	-43 -140	-14 -111	14 -82	43 -53	71 -24	100 4	129 33	158 62	187 91
80	176.00	bu	-44 -141	-11 -108	21 -75	54 -42	87 -8	120 24	153 57	186 90	219 123	253 156	286 189
90	198.00	bu	12 -84	49 -47	86 -9	123 27	161 64	198 101	235 138	272 176	309 213	347 250	384 287
100	220.00	bu	69 -27	110 13	151 55	193 96	234 138	275 179	317 220	358 262	400 303	441 344	482 386
110	242.00	bu	126 29	171 75	217 120	262 166	308 211	353 257	399 302	444 348	490 393	535 439	581 484
120	264.00	bu	183 86	232 136	282 185	331 235	381 285	431 334	480 384	530 433	580 483	629 533	679 582
130	286.00	bu	240 143	293 197	347 251	401 304	455 358	508 412	562 466	616 519	670 573	723 627	777 681
140	308.00	bu	296 200	354 258	412 316	470 374	528 432	586 489	644 547	702 605	760 663	818 721	876 779
150	330.00	bu	353 257	415 319	478 381	540 443	602 505	664 567	726 629	788 691	850 753	912 815	974 877

The top number in each cell is Returns Above Direct Expenses.
 The bottom number in each cell is Returns Above Total Specified Expenses.
 Only the product listed has been varied to calculate net returns.
 Note: Cost of production estimates are based on 2017 input prices.

Table 24.A Estimated costs per acre
 Corn, stale seedbed, BtRR, non-irrigated, 12row 38"
 170 bu yield goal, Delta Area, Mississippi, 2018

ITEM	UNIT	PRICE	QUANTITY	AMOUNT	YOUR FARM
		dollars		dollars	
DIRECT EXPENSES					
CUSTOM SPRAY					
App by Air (5 gal)	appl	6.50	1.0000	6.50	_____
App by Air (3 gal)	appl	5.00	0.2000	1.00	_____
FERTILIZERS					
Phosphorus (46% P2O5)	cwt	18.75	1.6300	30.56	_____
Potash (60% K2O)	cwt	18.98	1.2500	23.73	_____
Fert 10-34-0	gal	2.59	4.2919	11.12	_____
Zinc Plus	pt	2.99	2.0000	5.98	_____
UAN + Sulfur (28%)	gal	1.31	19.3063	25.29	_____
UAN (32%)	gal	1.17	29.6700	34.71	_____
HERBICIDES					
Glyphosate 3lbs a.e	oz	0.14	32.0000	4.48	_____
Clarity	pt	11.55	0.5000	5.78	_____
Select Max	pt	12.64	1.0000	12.64	_____
Atrazine 4L	pt	2.12	4.0000	8.48	_____
Halex GT	pt	7.80	3.6000	28.08	_____
INSECTICIDES					
Bifenthrin	oz	0.78	1.2800	1.00	_____
SEED/PLANTS					
Corn Seed BtRR	thous	3.63	28.0000	101.64	_____
CUSTOM FERTILIZE					
Custom Apply Fert	acre	7.50	1.0000	7.50	_____
HAULING					
Haul Corn	bu	0.23	170.0000	39.10	_____
CUSTOM LIME					
Lime (Spread)	ton	46.00	0.6660	30.64	_____
CROP CONSULTANT					
Corn Consultant	acre	6.00	1.0000	6.00	_____
SOIL TEST					
Soil Test	acre	10.00	0.3330	3.33	_____
OPERATOR LABOR					
Tractors	hour	13.51	0.3457	4.66	_____
Harvesters	hour	13.51	0.1009	1.36	_____
HAND LABOR					
Implements	hour	9.06	0.1354	1.22	_____
UNALLOCATED LABOR	hour	13.50	0.4020	5.43	_____
DIESEL FUEL					
Tractors	gal	1.80	4.0040	7.21	_____
Harvesters	gal	1.80	1.3770	2.48	_____
REPAIR & MAINTENANCE					
Implements	acre	7.32	1.0000	7.32	_____
Tractors	acre	2.28	1.0000	2.28	_____
Harvesters	acre	3.45	1.0000	3.45	_____
INTEREST ON OP. CAP.	acre	11.74	1.0000	11.74	_____
TOTAL DIRECT EXPENSES				434.71	_____
FIXED EXPENSES					
Implements	acre	10.56	1.0000	10.56	_____
Tractors	acre	14.30	1.0000	14.30	_____
Harvesters	acre	13.61	1.0000	13.61	_____
TOTAL FIXED EXPENSES				38.47	_____
TOTAL SPECIFIED EXPENSES				473.18	_____

Note: Cost of production estimates are based on 2017 input prices.

Fertilization decisions should be based on soil tests.

Soil test cost is prorated for a test every 3rd year.

Lime cost prorated for application every 3rd year.

Table 24.B Summary of estimated costs and returns per acre
 Corn, stale seedbed, BtRR, non-irrigated, 12row 38"
 170 bu yield goal, Delta Area, Mississippi, 2018

ITEM	UNIT	PRICE	QUANTITY	AMOUNT	YOUR FARM
		dollars		dollars	
INCOME					
Corn	bu	3.76	170.0000	639.20	_____

TOTAL INCOME				639.20	_____
DIRECT EXPENSES					
CUSTOM SPRAY	acre	7.50	1.0000	7.50	_____
FERTILIZERS	acre	131.39	1.0000	131.39	_____
HERBICIDES	acre	59.46	1.0000	59.46	_____
INSECTICIDES	acre	1.00	1.0000	1.00	_____
SEED/PLANTS	acre	101.64	1.0000	101.64	_____
CUSTOM FERTILIZE	acre	7.50	1.0000	7.50	_____
HAULING	acre	39.10	1.0000	39.10	_____
CUSTOM LIME	acre	30.64	1.0000	30.64	_____
CROP CONSULTANT	acre	6.00	1.0000	6.00	_____
SOIL TEST	acre	3.33	1.0000	3.33	_____
HAND LABOR	hour	9.06	0.1354	1.22	_____
OPERATOR LABOR	hour	13.51	0.4466	6.02	_____
UNALLOCATED LABOR	hour	13.50	0.4020	5.43	_____
DIESEL FUEL	gal	1.80	5.3810	9.69	_____
REPAIR & MAINTENANCE	acre	13.05	1.0000	13.05	_____
INTEREST ON OP. CAP.	acre	11.74	1.0000	11.74	_____

TOTAL DIRECT EXPENSES				434.71	_____
RETURNS ABOVE DIRECT EXPENSES				204.49	_____
TOTAL FIXED EXPENSES				38.47	_____

TOTAL SPECIFIED EXPENSES				473.18	_____
RETURNS ABOVE TOTAL SPECIFIED EXPENSES				166.02	_____

Note: Cost of production estimates are based on 2017 input prices.

Fertilization decisions should be based on soil tests.

Soil test cost is prorated for a test every 3rd year.

Lime cost prorated for application every 3rd year.

Table 24.C Estimated resource use for field operations, per acre
 Corn, stale seedbed, BtRR, non-irrigated, 12row 38"
 170 bu yield goal, Delta Area, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	POWER UNIT SIZE	PERF RATE	TIMES OVER	MTH	INPUT AMOUNT	IMPLEMENT	POWER UNIT	ALLOC LABOR	UNALL LABOR
						-----hours-----				
Soil Test	acre			0.33	Oct	0.3330				
Lime (Spread)	ton			0.33	Oct	0.6660				
Spin Spreader	5 ton	MFWD 225	0.042	1.00	Oct		0.04	0.04	0.08	0.03
Phosphorus (46% P2O5)	cwt					1.6300				
Potash (60% K2O)	cwt					1.2500				
Bed/Disk w/roller	12R-30/40	MFWD 225	0.062	1.00	Oct		0.06	0.06	0.06	0.05
App by Air (5 gal)	appl			1.00	Feb	1.0000				
Glyphosate 3lbs a.e	oz					32.0000				
Clarity	pt					0.5000				
Select Max	pt					1.0000				
Plant & Pre-Folding	12R-38	MFWD 225	0.053	1.00	Mar		0.05	0.05	0.10	0.04
Corn Seed BtRR	thous					28.0000				
Fert 10-34-0	gal					4.2919				
Zinc Plus	pt					2.0000				
Custom Apply Fert	acre			1.00	Apr	1.0000				
UAN + Sulfur (28%)	gal					19.3063				
Spray (Broadcast)	60'	MFWD 225	0.028	1.00	Apr		0.02	0.02	0.04	0.02
Atrazine 4L	pt					4.0000				
Halex GT	pt					3.6000				
App by Air (3 gal)	appl			0.20	May	0.2000				
Bifenthrin	oz					1.2800				
Corn Consultant	acre			1.00	May	1.0000				
Fert Appl (Liquid)	12R-38	MFWD 225	0.051	1.00	May		0.05	0.05	0.07	0.04
UAN (32%)	gal					29.6700				
Header - Corn	8R-38	265 hp	0.100	1.00	Sep		0.10	0.10	0.10	0.09
Grain Cart Corn	700 bu	MFWD 225	0.025	1.00	Sep		0.02	0.02	0.02	0.02
Haul Corn	bu					170.0000				
Stalk Shredder Flex	20'	MFWD 225	0.082	1.00	Sep		0.08	0.08	0.08	0.07
TOTALS							0.44	0.44	0.58	0.40

Note: Cost of production estimates are based on 2017 input prices.

- Fertilization decisions should be based on soil tests.**
- Soil test cost is prorated for a test every 3rd year.**
- Lime cost prorated for application every 3rd year.**

Table 24.D Estimated costs for field operations, per acre
 Corn, stale seedbed, BtRR, non-irrigated, 12row 38"
 170 bu yield goal, Delta Area, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	-----DIRECT COST-----							FIXED COST	TOTAL COST	
		OP INPUT	FUEL	R&M	LABOR	LEASE	INTER	TOTAL			
-----dollars-----											
Soil Test	acre	3.33						0.16	3.49		3.49
Lime (Spread)	ton	30.64						1.46	32.10		32.10
Spin Spreader	5 ton		0.88	0.57	1.46			0.14	3.05	2.33	5.38
Phosphorus (46% P2O5)	cwt	30.56						1.45	32.01		32.01
Potash (60% K2O)	cwt	23.73						1.13	24.86		24.86
Bed/Disk w/roller	12R-30/40		1.30	1.10	1.60			0.19	4.19	4.41	8.60
App by Air (5 gal)	appl	6.50						0.21	6.71		6.71
Glyphosate 3lbs a.e	oz	4.48						0.14	4.62		4.62
Clarity	pt	5.78						0.18	5.96		5.96
Select Max	pt	12.64						0.40	13.04		13.04
Plant & Pre-Folding	12R-38		1.11	1.98	1.85			0.14	5.08	5.32	10.40
Corn Seed BtRR	thous	101.64						2.82	104.46		104.46
Fert 10-34-0	gal	11.12						0.31	11.43		11.43
Zinc Plus	pt	5.98						0.17	6.15		6.15
Custom Apply Fert	acre	7.50						0.18	7.68		7.68
UAN + Sulfur (28%)	gal	25.29						0.60	25.89		25.89
Spray (Broadcast)	60'		0.59	0.43	0.85			0.04	1.91	1.45	3.36
Atrazine 4L	pt	8.48						0.20	8.68		8.68
Halex GT	pt	28.08						0.67	28.75		28.75
App by Air (3 gal)	appl	1.00						0.02	1.02		1.02
Bifenthrin	oz	1.00						0.02	1.02		1.02
Corn Consultant	acre	6.00						0.12	6.12		6.12
Fert Appl (Liquid)	12R-38		1.08	0.99	1.56			0.07	3.70	2.88	6.58
UAN (32%)	gal	34.71						0.69	35.40		35.40
Header - Corn	8R-38		2.48	5.02	2.59			0.04	10.13	15.97	26.10
Grain Cart Corn	700 bu		0.53	0.42	0.65			0.01	1.61	1.49	3.10
Haul Corn	bu	39.10						0.15	39.25		39.25
Stalk Shredder Flex	20'		1.72	2.54	2.11			0.03	6.40	4.62	11.02
TOTALS		387.56	9.69	13.05	12.67	0.00	11.74	434.71	38.47	473.18	

Note: Cost of production estimates are based on 2017 input prices.

Fertilization decisions should be based on soil tests.

Soil test cost is prorated for a test every 3rd year.

Lime cost prorated for application every 3rd year.

Table 24.E Estimated monthly income and expense flows per acre
 Corn, stale seedbed, BtRR, non-irrigated, 12row 38"
 170 bu yield goal, Delta Area, Mississippi, 2018

ITEM	Oct	Nov	Dec	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep
-----dollars-----												
TOTAL INCOME	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	639.20
DIRECT EXPENSES												
CUSTOM SPRAY	0.00	0.00	0.00	0.00	6.50	0.00	0.00	1.00	0.00	0.00	0.00	0.00
FERTILIZERS	54.29	0.00	0.00	0.00	0.00	17.10	25.29	34.71	0.00	0.00	0.00	0.00
HERBICIDES	0.00	0.00	0.00	0.00	22.90	0.00	36.56	0.00	0.00	0.00	0.00	0.00
INSECTICIDES	0.00	0.00	0.00	0.00	0.00	0.00	0.00	1.00	0.00	0.00	0.00	0.00
SEED/PLANTS	0.00	0.00	0.00	0.00	0.00	101.64	0.00	0.00	0.00	0.00	0.00	0.00
CUSTOM FERTILIZE	0.00	0.00	0.00	0.00	0.00	0.00	7.50	0.00	0.00	0.00	0.00	0.00
HAULING	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	39.10
CUSTOM LIME	30.64	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
CROP CONSULTANT	0.00	0.00	0.00	0.00	0.00	0.00	0.00	6.00	0.00	0.00	0.00	0.00
SOIL TEST	3.33	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
LABOR	3.06	0.00	0.00	0.00	0.00	1.85	0.85	1.56	0.00	0.00	0.00	5.35
LEASE *	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
FUEL	2.18	0.00	0.00	0.00	0.00	1.11	0.59	1.08	0.00	0.00	0.00	4.73
REPAIR & MAINTENANCE	1.67	0.00	0.00	0.00	0.00	1.98	0.43	0.99	0.00	0.00	0.00	7.98
INTEREST ON OP. CAP.	4.53	0.00	0.00	0.00	0.93	3.44	1.69	0.92	0.00	0.00	0.00	0.23
TOTAL DIRECT EXPENSES	99.70	0.00	0.00	0.00	30.33	127.12	72.91	47.26	0.00	0.00	0.00	57.39
NET INCOME	-99.70	0.00	0.00	0.00	-30.33	-127.12	-72.91	-47.26	0.00	0.00	0.00	581.81
NET INCOME TO DATE	-99.70	-99.70	-99.70	-99.70	-130.03	-257.15	-330.06	-377.32	-377.32	-377.32	-377.32	204.49

Note: Cost of production estimates are based on 2017 input prices.

Fertilization decisions should be based on soil tests.

Soil test cost is prorated for a test every 3rd year.

Lime cost prorated for application every 3rd year.

* Lease costs are based on hourly usage costs.

Table 24.F Estimated returns for various price/yield combinations, per acre
 Corn, stale seedbed, BtRR, non-irrigated, 12row 38"
 170 bu yield goal, Delta Area, Mississippi, 2018

PRODUCT	PERCENT												
	75	80	85	90	95	100	105	110	115	120	125		
PRODUCT PRICE													
Corn	2.82	3.00	3.19	3.38	3.57	3.76	3.94	4.13	4.32	4.51	4.70		
PERCENT	YIELD	UNIT	dollars										
50	85.00	bu	-175 -213	-159 -197	-143 -181	-127 -165	-111 -149	-95 -133	-79 -117	-63 -101	-47 -86	-31 -70	-15 -54
60	102.00	bu	-131 -169	-112 -150	-93 -131	-73 -112	-54 -93	-35 -73	-16 -54	2 -35	22 -16	41 2	60 21
70	119.00	bu	-87 -125	-64 -103	-42 -81	-20 -58	2 -36	24 -13	46 8	69 30	91 53	113 75	136 97
80	136.00	bu	-43 -81	-17 -56	7 -30	33 -5	58 20	84 46	110 71	135 97	161 122	186 148	212 173
90	153.00	bu	0 -37	29 -9	58 19	86 48	115 77	144 106	173 134	202 163	230 192	259 221	288 249
100	170.00	bu	44 6	76 38	108 70	140 102	172 134	204 166	236 197	268 229	300 261	332 293	364 325
110	187.00	bu	88 50	123 85	159 120	194 155	229 190	264 226	299 261	334 296	369 331	405 366	440 401
120	204.00	bu	132 94	171 132	209 170	247 209	286 247	324 286	362 324	401 362	439 401	477 439	516 477
130	221.00	bu	176 138	218 179	259 221	301 262	342 304	384 346	426 387	467 429	509 470	550 512	592 553
140	238.00	bu	220 182	265 227	310 271	354 316	399 361	444 406	489 450	533 495	578 540	623 584	668 629
150	255.00	bu	264 226	312 274	360 322	408 370	456 418	504 465	552 513	600 561	648 609	696 657	744 705

The top number in each cell is Returns Above Direct Expenses.
 The bottom number in each cell is Returns Above Total Specified Expenses.
 Only the product listed has been varied to calculate net returns.
 Note: Cost of production estimates are based on 2017 input prices.

Table 25.A Estimated costs per acre
 Corn, conventional tillage, RR seed, 12-row 38",
 220 bu yld goal, furrow irrigated, 13 ac-in., Delta Area, Mississippi, 2018

ITEM	UNIT	PRICE	QUANTITY	AMOUNT	YOUR FARM
		dollars		dollars	
DIRECT EXPENSES					
CUSTOM SPRAY					
App by Air (5 gal)	appl	6.50	1.0000	6.50	_____
App by Air (3 gal)	appl	5.00	1.2000	6.00	_____
FERTILIZERS					
Phosphorus (46% P2O5)	cwt	18.75	1.9570	36.69	_____
Potash (60% K2O)	cwt	18.98	1.5000	28.47	_____
UAN + Sulfur (28%)	gal	1.31	32.1712	42.14	_____
UAN (32%)	gal	1.17	39.5570	46.28	_____
HERBICIDES					
Glyphosate 3lbs a.e	oz	0.14	32.0000	4.48	_____
Clarity	pt	11.55	0.5000	5.78	_____
Select Max	pt	12.64	1.0000	12.64	_____
Atrazine 4L	pt	2.12	4.0000	8.48	_____
Halex GT	pt	7.80	3.6000	28.08	_____
INSECTICIDES					
Bifenthrin	oz	0.78	1.2804	1.00	_____
Intrepid 2F	oz	2.00	4.0000	8.00	_____
IRRIGATION SUPPLIES					
Roll-Out Pipe	ft	0.25	33.0000	8.25	_____
SEED/PLANTS					
Corn Seed RR2	thous	3.24	34.0000	110.16	_____
CUSTOM FERTILIZE					
Custom Apply Fert	acre	7.50	1.0000	7.50	_____
HAULING					
Haul Corn	bu	0.23	220.0000	50.60	_____
CUSTOM LIME					
Lime (Spread)	ton	46.00	0.6660	30.64	_____
CROP CONSULTANT					
Corn Consultant	acre	6.00	1.0000	6.00	_____
SOIL TEST					
Soil Test	acre	10.00	0.3330	3.33	_____
OPERATOR LABOR					
Tractors	hour	13.51	0.6930	9.35	_____
Harvesters	hour	13.51	0.1009	1.36	_____
Self-Propelled	hour	13.51	0.0176	0.24	_____
IRRIGATE LABOR					
Special Labor	hour	9.06	0.3250	2.96	_____
Implements	hour	9.06	0.0625	0.57	_____
HAND LABOR					
Implements	hour	9.06	0.1175	1.06	_____
Self-Propelled	hour	9.06	0.0088	0.08	_____
UNALLOCATED LABOR					
	hour	13.50	0.6597	8.91	_____
DIESEL FUEL					
Tractors	gal	1.80	7.8429	14.13	_____
Harvesters	gal	1.80	1.3770	2.48	_____
Self-Propelled	gal	1.80	0.1586	0.29	_____
Roll-Out Pipe Irr.	gal	1.80	10.5901	19.08	_____
REPAIR & MAINTENANCE					
Implements	acre	9.22	1.0000	9.22	_____
Tractors	acre	4.44	1.0000	4.44	_____
Harvesters	acre	3.45	1.0000	3.45	_____
Self-Propelled	acre	0.18	1.0000	0.18	_____
Roll-Out Pipe Irr.	acre	6.88	1.0000	6.88	_____
INTEREST ON OP. CAP.	acre	14.19	1.0000	14.19	_____
TOTAL DIRECT EXPENSES				549.89	_____
FIXED EXPENSES					
Implements	acre	16.10	1.0000	16.10	_____
Tractors	acre	27.90	1.0000	27.90	_____
Harvesters	acre	13.61	1.0000	13.61	_____
Self-Propelled	acre	1.20	1.0000	1.20	_____
Roll-Out Pipe Irr.	acre	53.42	1.0000	53.42	_____
TOTAL FIXED EXPENSES				112.23	_____
TOTAL SPECIFIED EXPENSES				662.12	_____

Note: Cost of production estimates are based on 2017 input prices.

Fertilization decisions should be based on soil tests.

Soil test cost is prorated for a test every 3rd year.

Lime cost prorated for application every 3rd year.

Table 25.B Summary of estimated costs and returns per acre
 Corn, conventional tillage, RR seed, 12-row 38",
 220 bu yld goal, furrow irrigated, 13 ac-in., Delta Area, Mississippi, 2018

ITEM	UNIT	PRICE	QUANTITY	AMOUNT	YOUR FARM
		dollars		dollars	
INCOME					
Corn	bu	3.76	220.0000	827.20	_____

TOTAL INCOME				827.20	_____
DIRECT EXPENSES					
CUSTOM SPRAY	acre	12.50	1.0000	12.50	_____
FERTILIZERS	acre	153.58	1.0000	153.58	_____
HERBICIDES	acre	59.46	1.0000	59.46	_____
INSECTICIDES	acre	9.00	1.0000	9.00	_____
IRRIGATION SUPPLIES	acre	8.25	1.0000	8.25	_____
SEED/PLANTS	acre	110.16	1.0000	110.16	_____
CUSTOM FERTILIZE	acre	7.50	1.0000	7.50	_____
HAULING	acre	50.60	1.0000	50.60	_____
CUSTOM LIME	acre	30.64	1.0000	30.64	_____
CROP CONSULTANT	acre	6.00	1.0000	6.00	_____
SOIL TEST	acre	3.33	1.0000	3.33	_____
HAND LABOR	hour	9.06	0.1263	1.14	_____
IRRIGATE LABOR	hour	9.06	0.3875	3.53	_____
OPERATOR LABOR	hour	13.51	0.8116	10.95	_____
UNALLOCATED LABOR	hour	13.50	0.6597	8.91	_____
DIESEL FUEL	gal	1.80	19.9688	35.98	_____
REPAIR & MAINTENANCE	acre	24.17	1.0000	24.17	_____
INTEREST ON OP. CAP.	acre	14.19	1.0000	14.19	_____

TOTAL DIRECT EXPENSES				549.89	_____
RETURNS ABOVE DIRECT EXPENSES				277.31	_____
TOTAL FIXED EXPENSES				112.23	_____

TOTAL SPECIFIED EXPENSES				662.12	_____
RETURNS ABOVE TOTAL SPECIFIED EXPENSES				165.08	_____

Note: Cost of production estimates are based on 2017 input prices.

Fertilization decisions should be based on soil tests.

Soil test cost is prorated for a test every 3rd year.

Lime cost prorated for application every 3rd year.

Table 25.C Estimated resource use for field operations, per acre
 Corn, conventional tillage, RR seed, 12-row 38",
 220 bu yld goal, furrow irrigated, 13 ac-in.,Delta Area, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	POWER UNIT SIZE	PERF RATE	TIMES OVER	MTH	INPUT AMOUNT	IMPLEMENT	POWER UNIT	ALLOC LABOR	UNALL LABOR
							-----hours-----			
Subsoiler	3 shank	MFWD 225	0.204	0.50	Oct		0.10	0.10	0.10	0.09
Disk Harrow	24'	MFWD 225	0.081	1.00	Oct		0.08	0.08	0.08	0.07
Soil Test	acre			0.33	Oct	0.3330				
Lime (Spread)	ton			0.33	Oct	0.6660				
Spin Spreader	5 ton	MFWD 225	0.042	1.00	Oct		0.04	0.04	0.08	0.03
Phosphorus(46% P2O5)	cwt					1.9570				
Potash (60% K2O)	cwt					1.5000				
Bed/Disk w/roller	12R-30/40	MFWD 225	0.062	1.00	Oct		0.06	0.06	0.06	0.05
App by Air (5 gal)	appl			1.00	Feb	1.0000				
Glyphosate 3lbs a.e	oz					32.0000				
Clarity	pt					0.5000				
Select Max	pt					1.0000				
Row Cond./Roll-Fold.	30'	MFWD 225	0.062	1.00	Mar		0.06	0.06	0.06	0.05
Plant - Folding	12R-38	MFWD 225	0.049	1.00	Mar		0.04	0.04	0.09	0.04
Corn Seed RR2	thous					34.0000				
Custom Apply Fert	acre			1.00	Apr	1.0000				
UAN + Sulfur (28%)	gal					32.1712				
Sprayer 600-750gal	60' 175hp		0.017	1.00	Apr			0.01	0.02	0.01
Atrazine 4L	pt					4.0000				
Halex GT	pt					3.6000				
Corn Consultant	acre			1.00	May	1.0000				
				0.20	May					
App by Air (3 gal)	appl					0.2000				
Bifenthrin	oz					1.2804				
Fert Appl (Liquid)	12R-38	MFWD 225	0.051	1.00	May		0.05	0.05	0.07	0.04
UAN (32%)	gal					39.5570				
Cultivate	12R-38	MFWD 225	0.054	1.00	May		0.05	0.05	0.05	0.04
App by Air (3 gal)	appl			1.00	Jun	1.0000				
Intrepid 2F	oz					4.0000				
Header - Corn	8R-38	265 hp	0.100	1.00	Sep		0.10	0.10	0.10	0.09
Grain Cart Corn	700 bu	MFWD 225	0.025	1.00	Sep		0.02	0.02	0.02	0.02
Haul Corn	bu					220.0000				
Stalk Shredder Flex	20'	MFWD 225	0.082	1.00	Sep		0.08	0.08	0.08	0.07
Roll-Out Pipe Irr.	acre				Jul	1.0000	0.07	0.07	0.46	
TOTALS							0.81	0.79	1.32	0.65

Note: Cost of production estimates are based on 2017 input prices.
Fertilization decisions should be based on soil tests.
Soil test cost is prorated for a test every 3rd year.
Lime cost prorated for application every 3rd year.

Table 25.D Estimated costs for field operations, per acre
 Corn, conventional tillage, RR seed, 12-row 38",
 220 bu yld goal, furrow irrigated, 13 ac-in.,Delta Area, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	-----DIRECT COST-----							FIXED COST	TOTAL COST	
		OP INPUT	FUEL	R&M	LABOR	LEASE	INTER	TOTAL			
-----dollars-----											
Subsoiler	3 shank		2.13	0.82	2.62			0.26	5.83	4.60	10.43
Disk Harrow	24'		1.71	1.48	2.11			0.25	5.55	5.37	10.92
Soil Test	acre	3.33						0.16	3.49		3.49
Lime (Spread)	ton	30.64						1.46	32.10		32.10
Spin Spreader	5 ton		0.88	0.57	1.46			0.14	3.05	2.33	5.38
Phosphorus(46% P2O5)	cwt	36.69						1.74	38.43		38.43
Potash (60% K2O)	cwt	28.47						1.35	29.82		29.82
Bed/Disk w/roller	12R-30/40		1.30	1.10	1.60			0.19	4.19	4.41	8.60
App by Air (5 gal)	appl	6.50						0.21	6.71		6.71
Glyphosate 3lbs a.e	oz	4.48						0.14	4.62		4.62
Clarity	pt	5.78						0.18	5.96		5.96
Select Max	pt	12.64						0.40	13.04		13.04
Row Cond./Roll-Fold.	30'		1.30	0.97	1.60			0.11	3.98	4.05	8.03
Plant - Folding	12R-38		1.03	1.71	1.72			0.12	4.58	4.69	9.27
Corn Seed RR2	thous	110.16						3.05	113.21		113.21
Custom Apply Fert	acre	7.50						0.18	7.68		7.68
UAN + Sulfur (28%)	gal	42.14						1.00	43.14		43.14
Sprayer 600-750gal	60' 175hp		0.29	0.18	0.53			0.02	1.02	1.20	2.22
Atrazine 4L	pt	8.48						0.20	8.68		8.68
Halex GT	pt	28.08						0.67	28.75		28.75
Corn Consultant	acre	6.00						0.12	6.12		6.12
App by Air (3 gal)	appl	1.00						0.02	1.02		1.02
Bifenthrin	oz	1.00						0.02	1.02		1.02
Fert Appl (Liquid)	12R-38		1.08	0.99	1.56			0.07	3.70	2.88	6.58
UAN (32%)	gal	46.28						0.92	47.20		47.20
Cultivate	12R-38		1.13	0.90	1.39			0.07	3.49	3.67	7.16
App by Air (3 gal)	appl	5.00						0.08	5.08		5.08
Intrepid 2F	oz	8.00						0.13	8.13		8.13
Header - Corn	8R-38		2.48	5.02	2.59			0.04	10.13	15.97	26.10
Grain Cart Corn	700 bu		0.53	0.42	0.65			0.01	1.61	1.49	3.10
Haul Corn	bu	50.60						0.20	50.80		50.80
Stalk Shredder Flex	20'		1.72	2.54	2.11			0.03	6.40	4.62	11.02
Roll-Out Pipe Irr.	acre	8.25	20.40	7.47	4.59			0.65	41.36	56.95	98.31
TOTALS		451.02	35.98	24.17	24.53	0.00	14.19	549.89	112.23	662.12	

Note: Cost of production estimates are based on 2017 input prices.
Fertilization decisions should be based on soil tests.
Soil test cost is prorated for a test every 3rd year.
Lime cost prorated for application every 3rd year.

Table 25.E Estimated monthly income and expense flows per acre
 Corn, conventional tillage, RR seed, 12-row 38",
 220 bu yld goal, furrow irrigated, 13 ac-in.,Delta Area, Mississippi, 2018

ITEM	Oct	Nov	Dec	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep
-----dollars-----												
TOTAL INCOME	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	827.20
DIRECT EXPENSES												
CUSTOM SPRAY	0.00	0.00	0.00	0.00	6.50	0.00	0.00	1.00	5.00	0.00	0.00	0.00
FERTILIZERS	65.16	0.00	0.00	0.00	0.00	0.00	42.14	46.28	0.00	0.00	0.00	0.00
HERBICIDES	0.00	0.00	0.00	0.00	22.90	0.00	36.56	0.00	0.00	0.00	0.00	0.00
INSECTICIDES	0.00	0.00	0.00	0.00	0.00	0.00	0.00	1.00	8.00	0.00	0.00	0.00
IRRIGATION SUPPLIES	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	8.25	0.00	0.00	0.00
SEED/PLANTS	0.00	0.00	0.00	0.00	0.00	110.16	0.00	0.00	0.00	0.00	0.00	0.00
CUSTOM FERTILIZE	0.00	0.00	0.00	0.00	0.00	0.00	7.50	0.00	0.00	0.00	0.00	0.00
HAULING	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	50.60
CUSTOM LIME	30.64	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
CROP CONSULTANT	0.00	0.00	0.00	0.00	0.00	0.00	0.00	6.00	0.00	0.00	0.00	0.00
SOIL TEST	3.33	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
LABOR	8.30	0.00	0.00	0.00	0.00	3.32	0.53	3.18	3.03	0.23	0.59	5.35
LEASE *	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
FUEL	6.69	0.00	0.00	0.00	0.00	2.33	0.29	2.21	14.66	4.77	0.30	4.73
REPAIR & MAINTENANCE	4.28	0.00	0.00	0.00	0.00	2.68	0.18	1.89	6.05	0.98	0.13	7.98
INTEREST ON OP. CAP.	5.62	0.00	0.00	0.00	0.93	3.28	2.07	1.22	0.71	0.07	0.01	0.28
TOTAL DIRECT EXPENSES	124.02	0.00	0.00	0.00	30.33	121.77	89.27	62.78	45.70	6.05	1.03	68.94
NET INCOME	-124.02	0.00	0.00	0.00	-30.33	-121.77	-89.27	-62.78	-45.70	-6.05	-1.03	758.26
NET INCOME TO DATE	-124.02	-124.02	-124.02	-124.02	-154.35	-276.12	-365.39	-428.17	-473.87	-479.92	-480.95	277.31

Note: Cost of production estimates are based on 2017 input prices.

Fertilization decisions should be based on soil tests.

Soil test cost is prorated for a test every 3rd year.

Lime cost prorated for application every 3rd year.

* Lease costs are based on hourly usage costs.

Table 25.F Estimated returns for various price/yield combinations, per acre
 Corn, conventional tillage, RR seed, 12-row 38",
 220 bu yld goal, furrow irrigated, 13 ac-in., Delta Area, Mississippi, 2018

PRODUCT	-----PERCENT-----												
	75	80	85	90	95	100	105	110	115	120	125		
-----PRODUCT PRICE-----													
Corn	2.82	3.00	3.19	3.38	3.57	3.76	3.94	4.13	4.32	4.51	4.70		
PERCENT	YIELD	UNIT	-----dollars-----										
50	110.00	bu	-214 -326	-193 -305	-172 -285	-152 -264	-131 -243	-110 -223	-90 -202	-69 -181	-48 -161	-28 -140	-7 -119
60	132.00	bu	-157 -269	-132 -244	-107 -219	-82 -195	-58 -170	-33 -145	-8 -120	16 -95	41 -71	66 -46	90 -21
70	154.00	bu	-100 -212	-71 -183	-42 -154	-13 -125	15 -96	44 -67	73 -38	102 -9	131 19	160 47	189 76
80	176.00	bu	-43 -155	-10 -122	22 -89	55 -56	88 -23	122 9	155 42	188 75	221 109	254 142	287 175
90	198.00	bu	13 -98	50 -61	87 -24	125 12	162 50	199 87	236 124	274 161	311 199	348 236	385 273
100	220.00	bu	70 -41	111 -0	153 41	194 82	235 123	277 165	318 206	360 247	401 289	442 330	484 371
110	242.00	bu	127 15	172 60	218 106	263 151	309 197	354 242	400 288	445 333	491 379	536 424	582 470
120	264.00	bu	184 72	234 121	283 171	333 221	382 270	432 320	482 369	531 419	581 469	631 518	680 568
130	286.00	bu	241 129	295 182	348 236	402 290	456 344	510 398	563 451	617 505	671 559	725 613	779 666
140	308.00	bu	298 186	356 244	414 301	472 359	529 417	587 475	645 533	703 591	761 649	819 707	877 765
150	330.00	bu	355 243	417 305	479 367	541 429	603 491	665 553	727 615	789 677	851 739	913 801	975 863

The top number in each cell is Returns Above Direct Expenses.
 The bottom number in each cell is Returns Above Total Specified Expenses.
 Only the product listed has been varied to calculate net returns.
 Note: Cost of production estimates are based on 2017 input prices

Table 26.A Estimated costs per acre
 Corn, conventional tillage, RR seed, 12-row 38"
 170 bu yield goal, non-irrigated, Delta Area, Mississippi, 2018

ITEM	UNIT	PRICE	QUANTITY	AMOUNT	YOUR FARM
		dollars		dollars	
DIRECT EXPENSES					
CUSTOM SPRAY					
App by Air (5 gal)	appl	6.50	1.0000	6.50	_____
App by Air (3 gal)	appl	5.00	1.2000	6.00	_____
FERTILIZERS					
Phosphorus (46% P2O5)	cwt	18.75	1.6300	30.56	_____
Potash (60% K2O)	cwt	18.98	1.2500	23.73	_____
UAN + Sulfur (28%)	gal	1.31	19.3063	25.29	_____
UAN (32%)	gal	1.17	29.6700	34.71	_____
HERBICIDES					
Glyphosate 3lbs a.e	oz	0.14	32.0000	4.48	_____
Clarity	pt	11.55	0.5000	5.78	_____
Select Max	pt	12.64	1.0000	12.64	_____
Atrazine 4L	pt	2.12	4.0000	8.48	_____
Halex GT	pt	7.80	3.6000	28.08	_____
INSECTICIDES					
Bifenthrin	oz	0.78	1.2804	1.00	_____
Intrepid 2F	oz	2.00	4.0000	8.00	_____
SEED/PLANTS					
Corn Seed RR2	thous	3.24	28.0000	90.72	_____
CUSTOM FERTILIZE					
Custom Apply Fert	acre	7.50	1.0000	7.50	_____
HAULING					
Haul Corn	bu	0.23	170.0000	39.10	_____
CUSTOM LIME					
Lime (Spread)	ton	46.00	0.6660	30.64	_____
CROP CONSULTANT					
Corn Consultant	acre	6.00	1.0000	6.00	_____
SOIL TEST					
Soil Test	acre	10.00	0.3330	3.33	_____
OPERATOR LABOR					
Tractors	hour	13.51	0.5690	7.69	_____
Harvesters	hour	13.51	0.1009	1.36	_____
Self-Propelled	hour	13.51	0.0176	0.24	_____
HAND LABOR					
Implements	hour	9.06	0.1175	1.06	_____
Self-Propelled	hour	9.06	0.0088	0.08	_____
UNALLOCATED LABOR					
	hour	13.50	0.6188	8.36	_____
DIESEL FUEL					
Tractors	gal	1.80	6.5903	11.87	_____
Harvesters	gal	1.80	1.3770	2.48	_____
Self-Propelled	gal	1.80	0.1586	0.29	_____
REPAIR & MAINTENANCE					
Implements	acre	7.75	1.0000	7.75	_____
Tractors	acre	3.75	1.0000	3.75	_____
Harvesters	acre	3.45	1.0000	3.45	_____
Self-Propelled	acre	0.18	1.0000	0.18	_____
INTEREST ON OP. CAP.	acre	11.73	1.0000	11.73	_____
TOTAL DIRECT EXPENSES				432.83	_____
FIXED EXPENSES					
Implements	acre	12.08	1.0000	12.08	_____
Tractors	acre	23.52	1.0000	23.52	_____
Harvesters	acre	13.61	1.0000	13.61	_____
Self-Propelled	acre	1.20	1.0000	1.20	_____
TOTAL FIXED EXPENSES				50.41	_____
TOTAL SPECIFIED EXPENSES				483.24	_____

Note: Cost of production estimates are based on 2017 input prices.

Fertilization decisions should be based on soil tests.

Soil test cost is prorated for a test every 3rd year.

Lime cost prorated for application every 3rd year.

Table 26.B Summary of estimated costs and returns per acre
 Corn, conventional tillage, RR seed, 12-row 38"
 170 bu yield goal, non-irrigated, Delta Area, Mississippi, 2018

ITEM	UNIT	PRICE	QUANTITY	AMOUNT	YOUR FARM
		dollars		dollars	
INCOME					
Corn	bu	3.76	170.0000	639.20	_____

TOTAL INCOME				639.20	_____
DIRECT EXPENSES					
CUSTOM SPRAY	acre	12.50	1.0000	12.50	_____
FERTILIZERS	acre	114.29	1.0000	114.29	_____
HERBICIDES	acre	59.46	1.0000	59.46	_____
INSECTICIDES	acre	9.00	1.0000	9.00	_____
SEED/PLANTS	acre	90.72	1.0000	90.72	_____
CUSTOM FERTILIZE	acre	7.50	1.0000	7.50	_____
HAULING	acre	39.10	1.0000	39.10	_____
CUSTOM LIME	acre	30.64	1.0000	30.64	_____
CROP CONSULTANT	acre	6.00	1.0000	6.00	_____
SOIL TEST	acre	3.33	1.0000	3.33	_____
HAND LABOR	hour	9.06	0.1263	1.14	_____
OPERATOR LABOR	hour	13.51	0.6876	9.29	_____
UNALLOCATED LABOR	hour	13.50	0.6188	8.36	_____
DIESEL FUEL	gal	1.80	8.1261	14.64	_____
REPAIR & MAINTENANCE	acre	15.13	1.0000	15.13	_____
INTEREST ON OP. CAP.	acre	11.73	1.0000	11.73	_____

TOTAL DIRECT EXPENSES				432.83	_____
RETURNS ABOVE DIRECT EXPENSES				206.37	_____
TOTAL FIXED EXPENSES				50.41	_____

TOTAL SPECIFIED EXPENSES				483.24	_____
RETURNS ABOVE TOTAL SPECIFIED EXPENSES				155.96	_____

Note: Cost of production estimates are based on 2017 input prices.

Fertilization decisions should be based on soil tests.

Soil test cost is prorated for a test every 3rd year.

Lime cost prorated for application every 3rd year.

Table 26.C Estimated resource use for field operations, per acre
 Corn, conventional tillage, RR seed, 12-row 38"
 170 bu yield goal, non-irrigated, Delta Area, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	POWER UNIT SIZE	PERF RATE	TIMES OVER	MTH	INPUT AMOUNT	IMPLEMENT	POWER UNIT	ALLOC LABOR	UNALL LABOR
							-----hours-----			
Subsoiler	3 shank	MFWD 225	0.204	0.50	Oct		0.10	0.10	0.10	0.09
Disk Harrow	24'	MFWD 225	0.081	1.00	Oct		0.08	0.08	0.08	0.07
Soil Test	acre			0.33	Oct	0.3330				
Lime (Spread)	ton			0.33	Oct	0.6660				
Spin Spreader	5 ton	MFWD 225	0.042	1.00	Oct		0.04	0.04	0.08	0.03
Phosphorus(46% P2O5)	cwt					1.6300				
Potash (60% K2O)	cwt					1.2500				
Bed/Disk (Hipper)Rd	8R-38	MFWD 225	0.074	1.00	Oct		0.07	0.07	0.07	0.06
App by Air (5 gal)	appl			1.00	Feb	1.0000				
Glyphosate 3lbs a.e	oz					32.0000				
Clarity	pt					0.5000				
Select Max	pt					1.0000				
Row Cond Rigid	26'	MFWD 225	0.059	1.00	Mar		0.05	0.05	0.05	0.05
Plant - Folding	12R-38	MFWD 225	0.049	1.00	Mar		0.04	0.04	0.09	0.04
Corn Seed RR2	thous					28.0000				
Custom Apply Fert	acre			1.00	Apr	1.0000				
UAN + Sulfur (28%)	gal					19.3063				
Sprayer 600-750gal	60' 175hp		0.017	1.00	Apr			0.01	0.02	0.01
Atrazine 4L	pt					4.0000				
Halex GT	pt					3.6000				
Corn Consultant	acre			1.00	May	1.0000				
App by Air (3 gal)	appl			0.20	May	0.2000				
Bifenthrin	oz					1.2804				
Fert Appl (Liquid)	12R-38	MFWD 225	0.051	1.00	May		0.05	0.05	0.07	0.04
UAN (32%)	gal					29.6700				
App by Air (3 gal)	appl			1.00	Jun	1.0000				
Intrepid 2F	oz					4.0000				
Header - Corn	8R-38	265 hp	0.100	1.00	Sep		0.10	0.10	0.10	0.09
Grain Cart Corn	700 bu	MFWD 225	0.025	1.00	Sep		0.02	0.02	0.02	0.02
Haul Corn	bu					170.0000				
Stalk Shredder Flex	20'	MFWD 225	0.082	1.00	Sep		0.08	0.08	0.08	0.07
TOTALS							0.68	0.67	0.81	0.61

Note: Cost of production estimates are based on 2017 input prices.

- Fertilization decisions should be based on soil tests.**
- Soil test cost is prorated for a test every 3rd year.**
- Lime cost prorated for application every 3rd year.**

Table 26.D Estimated costs for field operations, per acre
 Corn, conventional tillage, RR seed, 12-row 38"
 170 bu yield goal, non-irrigated, Delta Area, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	-----DIRECT COST-----							FIXED COST	TOTAL COST	
		OP INPUT	FUEL	R&M	LABOR	LEASE	INTER	TOTAL			
-----dollars-----											
Subsoiler	3 shank		2.13	0.82	2.62			0.26	5.83	4.60	10.43
Disk Harrow	24'		1.71	1.48	2.11			0.25	5.55	5.37	10.92
Soil Test	acre	3.33						0.16	3.49		3.49
Lime (Spread)	ton	30.64						1.46	32.10		32.10
Spin Spreader	5 ton		0.88	0.57	1.46			0.14	3.05	2.33	5.38
Phosphorus(46% P2O5)	cwt	30.56						1.45	32.01		32.01
Potash (60% K2O)	cwt	23.73						1.13	24.86		24.86
Bed/Disk (Hipper)Rd	8R-38		1.54	0.78	1.90			0.20	4.42	3.82	8.24
App by Air (5 gal)	appl	6.50						0.21	6.71		6.71
Glyphosate 3lbs a.e	oz	4.48						0.14	4.62		4.62
Clarity	pt	5.78						0.18	5.96		5.96
Select Max	pt	12.64						0.40	13.04		13.04
Row Cond Rigid	26'		1.25	0.62	1.54			0.09	3.50	3.44	6.94
Plant - Folding	12R-38		1.03	1.71	1.72			0.12	4.58	4.69	9.27
Corn Seed RR2	thous	90.72						2.51	93.23		93.23
Custom Apply Fert	acre	7.50						0.18	7.68		7.68
UAN + Sulfur (28%)	gal	25.29						0.60	25.89		25.89
Sprayer 600-750gal	60' 175hp		0.29	0.18	0.53			0.02	1.02	1.20	2.22
Atrazine 4L	pt	8.48						0.20	8.68		8.68
Halex GT	pt	28.08						0.67	28.75		28.75
Corn Consultant	acre	6.00						0.12	6.12		6.12
App by Air (3 gal)	appl	1.00						0.02	1.02		1.02
Bifenthrin	oz	1.00						0.02	1.02		1.02
Fert Appl (Liquid)	12R-38		1.08	0.99	1.56			0.07	3.70	2.88	6.58
UAN (32%)	gal	34.71						0.69	35.40		35.40
App by Air (3 gal)	appl	5.00						0.08	5.08		5.08
Intrepid 2F	oz	8.00						0.13	8.13		8.13
Header - Corn	8R-38		2.48	5.02	2.59			0.04	10.13	15.97	26.10
Grain Cart Corn	700 bu		0.53	0.42	0.65			0.01	1.61	1.49	3.10
Haul Corn	bu	39.10						0.15	39.25		39.25
Stalk Shredder Flex	20'		1.72	2.54	2.11			0.03	6.40	4.62	11.02
TOTALS		372.54	14.64	15.13	18.79	0.00	11.73	432.83	50.41	483.24	

Note: Cost of production estimates are based on 2017 input prices.

Fertilization decisions should be based on soil tests.

Soil test cost is prorated for a test every 3rd year.

Lime cost prorated for application every 3rd year.

Table 26.E Estimated monthly income and expense flows per acre
 Corn, conventional tillage, RR seed, 12-row 38"
 170 bu yield goal, non-irrigated, Delta Area, Mississippi, 2018

ITEM	Oct	Nov	Dec	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep
-----dollars-----												
TOTAL INCOME	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	639.20
DIRECT EXPENSES												
CUSTOM SPRAY	0.00	0.00	0.00	0.00	6.50	0.00	0.00	1.00	5.00	0.00	0.00	0.00
FERTILIZERS	54.29	0.00	0.00	0.00	0.00	0.00	25.29	34.71	0.00	0.00	0.00	0.00
HERBICIDES	0.00	0.00	0.00	0.00	22.90	0.00	36.56	0.00	0.00	0.00	0.00	0.00
INSECTICIDES	0.00	0.00	0.00	0.00	0.00	0.00	0.00	1.00	8.00	0.00	0.00	0.00
SEED/PLANTS	0.00	0.00	0.00	0.00	0.00	90.72	0.00	0.00	0.00	0.00	0.00	0.00
CUSTOM FERTILIZE	0.00	0.00	0.00	0.00	0.00	0.00	7.50	0.00	0.00	0.00	0.00	0.00
HAULING	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	39.10
CUSTOM LIME	30.64	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
CROP CONSULTANT	0.00	0.00	0.00	0.00	0.00	0.00	0.00	6.00	0.00	0.00	0.00	0.00
SOIL TEST	3.33	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
LABOR	8.09	0.00	0.00	0.00	0.00	3.26	0.53	1.56	0.00	0.00	0.00	5.35
LEASE *	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
FUEL	6.26	0.00	0.00	0.00	0.00	2.28	0.29	1.08	0.00	0.00	0.00	4.73
REPAIR & MAINTENANCE	3.65	0.00	0.00	0.00	0.00	2.33	0.18	0.99	0.00	0.00	0.00	7.98
INTEREST ON OP. CAP.	5.05	0.00	0.00	0.00	0.93	2.72	1.67	0.92	0.21	0.00	0.00	0.23
TOTAL DIRECT EXPENSES	111.31	0.00	0.00	0.00	30.33	101.31	72.02	47.26	13.21	0.00	0.00	57.39
NET INCOME	-111.31	0.00	0.00	0.00	-30.33	-101.31	-72.02	-47.26	-13.21	0.00	0.00	581.81
NET INCOME TO DATE	-111.31	-111.31	-111.31	-111.31	-141.64	-242.95	-314.97	-362.23	-375.44	-375.44	-375.44	206.37

Note: Cost of production estimates are based on 2017 input prices.

Fertilization decisions should be based on soil tests.

Soil test cost is prorated for a test every 3rd year.

Lime cost prorated for application every 3rd year.

* Lease costs are based on hourly usage costs.

Table 26.F Estimated returns for various price/yield combinations, per acre
 Corn, conventional tillage, RR seed, 12-row 38"
 170 bu yield goal, non-irrigated, Delta Area, Mississippi, 2018

PRODUCT	PERCENT												
	75	80	85	90	95	100	105	110	115	120	125		
	PRODUCT PRICE												
Corn	2.82	3.00	3.19	3.38	3.57	3.76	3.94	4.13	4.32	4.51	4.70		
PERCENT	YIELD	UNIT	dollars										
50	85.00	bu	-173	-157	-141	-125	-109	-93	-77	-61	-45	-29	-13
			-223	-207	-191	-175	-159	-144	-128	-112	-96	-80	-64
60	102.00	bu	-129	-110	-91	-71	-52	-33	-14	4	23	43	62
			-179	-160	-141	-122	-103	-84	-64	-45	-26	-7	11
70	119.00	bu	-85	-63	-40	-18	4	26	48	71	93	115	138
			-135	-113	-91	-68	-46	-24	-1	20	43	65	87
80	136.00	bu	-41	-15	9	35	60	86	111	137	163	188	214
			-91	-66	-40	-15	10	35	61	87	112	138	163
90	153.00	bu	2	31	60	88	117	146	175	203	232	261	290
			-47	-19	9	38	67	95	124	153	182	211	239
100	170.00	bu	46	78	110	142	174	206	238	270	302	334	366
			-3	28	60	92	124	155	187	219	251	283	315
110	187.00	bu	90	125	160	196	231	266	301	336	371	406	442
			40	75	110	145	180	215	251	286	321	356	391
120	204.00	bu	134	172	211	249	288	326	364	403	441	479	518
			84	122	160	199	237	275	314	352	391	429	467
130	221.00	bu	178	220	261	303	344	386	427	469	510	552	594
			128	169	211	252	294	335	377	419	460	502	543
140	238.00	bu	222	267	312	356	401	446	491	535	580	625	670
			172	216	261	306	351	395	440	485	530	574	619
150	255.00	bu	266	314	362	410	458	506	554	602	650	698	746
			216	264	312	360	407	455	503	551	599	647	695

The top number in each cell is Returns Above Direct Expenses.
 The bottom number in each cell is Returns Above Total Specified Expenses.
 Only the product listed has been varied to calculate net returns.

Note: Cost of production estimates are based on 2017 input prices .

Table 27.A Estimated costs per acre
 Grain sorghum, 12-row 30", 100 bu yield goal
 All Areas, Mississippi, 2018

ITEM	UNIT	PRICE	QUANTITY	AMOUNT	YOUR FARM
		dollars		dollars	
DIRECT EXPENSES					
CUSTOM SPRAY					
App by Air (5 gal)	appl	6.50	1.0000	6.50	_____
FERTILIZERS					
Phosphorus (46% P2O5)	cwt	18.75	1.3000	24.38	_____
Potash (60% K2O)	cwt	18.98	1.0000	18.98	_____
UAN + Sulfur (28%)	gal	1.31	38.2883	50.16	_____
HERBICIDES					
Glyphosate 3lbs a.e	oz	0.14	32.0000	4.48	_____
2,4-D Amine 4	pt	2.40	2.0000	4.80	_____
Select Max	pt	12.64	1.0000	12.64	_____
Lexar	pt	7.96	6.0000	47.76	_____
INSECTICIDES					
Sivanto Prime	oz	2.55	8.0000	20.40	_____
Karate Z	oz	2.74	1.5000	4.11	_____
Prevathon	oz	1.32	14.0000	18.48	_____
SEED/PLANTS					
Sorghum Concept+ Po	lb	3.92	4.5000	17.64	_____
ADJUVANTS					
Surfactant	pt	3.28	0.3000	0.98	_____
HAULING					
Haul Sorghum	bu	0.25	100.0000	25.00	_____
CUSTOM LIME					
Lime (Spread)	ton	46.00	0.6660	30.64	_____
CROP CONSULTANT					
Sorghum Consultant	acre	6.00	1.0000	6.00	_____
SOIL TEST					
Soil Test	acre	10.00	0.3330	3.33	_____
OPERATOR LABOR					
Tractors	hour	13.51	0.3120	4.22	_____
Harvesters	hour	13.51	0.1021	1.38	_____
Self-Propelled	hour	13.51	0.0661	0.90	_____
HAND LABOR					
Implements	hour	9.06	0.1442	1.31	_____
Self-Propelled	hour	9.06	0.0330	0.30	_____
UNALLOCATED LABOR					
	hour	13.51	0.4322	5.84	_____
DIESEL FUEL					
Tractors	gal	1.80	2.7303	4.91	_____
Harvesters	gal	1.80	1.3935	2.51	_____
Self-Propelled	gal	1.80	0.8505	1.55	_____
REPAIR & MAINTENANCE					
Implements	acre	4.74	1.0000	4.74	_____
Tractors	acre	1.49	1.0000	1.49	_____
Harvesters	acre	3.49	1.0000	3.49	_____
Self-Propelled	acre	0.90	1.0000	0.90	_____
INTEREST ON OP. CAP.	acre	7.54	1.0000	7.54	_____
TOTAL DIRECT EXPENSES				337.36	_____
FIXED EXPENSES					
Implements	acre	9.31	1.0000	9.31	_____
Tractors	acre	9.39	1.0000	9.39	_____
Harvesters	acre	13.77	1.0000	13.77	_____
Self-Propelled	acre	5.90	1.0000	5.90	_____
TOTAL FIXED EXPENSES				38.37	_____
TOTAL SPECIFIED EXPENSES				375.73	_____

Note: Cost of production estimates are based on 2017 input prices.
Fertilization decisions should be based on soil tests.
Soil test cost is prorated for a test every 3rd year.
Lime cost prorated for application every 3rd year.

Table 27.B Summary of estimated costs and returns per acre
 Grain sorghum, 12-row 30", 100 bu yield goal
 All Areas, Mississippi, 2018

ITEM	UNIT	PRICE	QUANTITY	AMOUNT	YOUR FARM
		dollars		dollars	
INCOME					
Grain Sorghum	bu	3.57	100.0000	357.00	_____

TOTAL INCOME				357.00	_____
DIRECT EXPENSES					
CUSTOM SPRAY	acre	6.50	1.0000	6.50	_____
FERTILIZERS	acre	93.52	1.0000	93.52	_____
HERBICIDES	acre	69.68	1.0000	69.68	_____
INSECTICIDES	acre	42.99	1.0000	42.99	_____
SEED/PLANTS	acre	17.64	1.0000	17.64	_____
ADJUVANTS	acre	0.98	1.0000	0.98	_____
HAULING	acre	25.00	1.0000	25.00	_____
CUSTOM LIME	acre	30.64	1.0000	30.64	_____
CROP CONSULTANT	acre	6.00	1.0000	6.00	_____
SOIL TEST	acre	3.33	1.0000	3.33	_____
HAND LABOR	hour	9.06	0.1772	1.61	_____
OPERATOR LABOR	hour	13.51	0.4803	6.50	_____
UNALLOCATED LABOR	hour	13.51	0.4322	5.84	_____
DIESEL FUEL	gal	1.80	4.9745	8.97	_____
REPAIR & MAINTENANCE	acre	10.62	1.0000	10.62	_____
INTEREST ON OP. CAP.	acre	7.54	1.0000	7.54	_____

TOTAL DIRECT EXPENSES				337.36	_____
RETURNS ABOVE DIRECT EXPENSES				19.64	_____
TOTAL FIXED EXPENSES				38.37	_____

TOTAL SPECIFIED EXPENSES				375.73	_____
RETURNS ABOVE TOTAL SPECIFIED EXPENSES				-18.73	_____

Note: Cost of production estimates are based on 2017 input prices.

Fertilization decisions should be based on soil tests.

Soil test cost is prorated for a test every 3rd year.

Lime cost prorated for application every 3rd year.

Table 27.C Estimated resource use for field operations, per acre
 Grain sorghum, 12-row 30", 100 bu yield goal
 All Areas, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	POWER UNIT SIZE	PERF RATE	TIMES OVER	MTH	INPUT AMOUNT	IMPLEMENT	POWER UNIT	ALLOC LABOR	UNALL LABOR
						-----hours-----				
Soil Test	acre			0.33	Oct	0.3330				
Lime (Spread)	ton			0.33	Oct	0.6660				
Disk Harrow	24'	MFWD 170	0.081	1.00	Nov		0.08	0.08	0.08	0.07
App by Air (5 gal)	appl			1.00	Feb	1.0000				
Glyphosate 3lbs a.e	oz					32.0000				
2,4-D Amine 4	pt					2.0000				
Select Max	pt					1.0000				
Surfactant	pt					0.3000				
Spin Spreader	5 ton	MFWD 170	0.042	1.00	Apr		0.04	0.04	0.08	0.03
Phosphorus(46% P2O5)	cwt					1.3000				
Potash (60% K2O)	cwt					1.0000				
Field Cultivate Fld	32'	MFWD 170	0.046	1.00	Apr		0.04	0.04	0.04	0.04
Plant - Folding	12R-30	MFWD 170	0.062	1.00	Apr		0.06	0.06	0.12	0.05
Sorghum Concept+ Po	lb					4.5000				
Sprayer 800gal	80' 250hp		0.013	1.00	Apr			0.01	0.01	0.01
Lexar	pt					6.0000				
Sorghum Consultant	acre			1.00	May	1.0000				
Fert Appl (Liquid)	12R-30	MFWD 170	0.078	1.00	May		0.07	0.07	0.11	0.07
UAN + Sulfur (28%)	gal					38.2883				
Sprayer 800gal	80' 250hp		0.013	1.00	Jun			0.01	0.01	0.01
Sivanto Prime	oz					4.0000				
Sprayer 800gal	80' 250hp		0.013	1.00	Jul			0.01	0.01	0.01
Karate Z	oz					1.5000				
Sprayer 800gal	80' 250hp		0.013	1.00	Jul			0.01	0.01	0.01
Prevathon	oz					14.0000				
Sprayer 800gal	80' 250hp		0.013	1.00	Jul			0.01	0.01	0.01
Sivanto Prime	oz					4.0000				
Header Wheat/Sorghum	25' Rigid	265 hp	0.102	1.00	Sep		0.10	0.10	0.10	0.09
Haul Sorghum	bu					100.0000				
TOTALS							0.48	0.41	0.65	0.43

Note: Cost of production estimates are based on 2017 input prices.

Fertilization decisions should be based on soil tests.

Soil test cost is prorated for a test every 3rd year.

Lime cost prorated for application every 3rd year.

Table 27.D Estimated costs for field operations, per acre
 Grain sorghum, 12-row 30", 100 bu yield goal
 All Areas, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	-----DIRECT COST-----							FIXED COST	TOTAL COST
		OP INPUT	FUEL	R&M	LABOR	LEASE	INTER	TOTAL		
-----dollars-----										
Soil Test	acre	3.33						0.16	3.49	3.49
Lime (Spread)	ton	30.64						1.46	32.10	32.10
Disk Harrow	24'		1.29	1.33	2.11			0.21	4.94	4.45 9.39
App by Air (5 gal)	appl	6.50						0.21	6.71	6.71
Glyphosate 3lbs a.e	oz	4.48						0.14	4.62	4.62
2,4-D Amine 4	pt	4.80						0.15	4.95	4.95
Select Max	pt	12.64						0.40	13.04	13.04
Surfactant	pt	0.98						0.03	1.01	1.01
Spin Spreader	5 ton		0.66	0.49	1.46			0.06	2.67	1.86 4.53
Phosphorus(46% P2O5)	cwt	24.38						0.58	24.96	24.96
Potash (60% K2O)	cwt	18.98						0.45	19.43	19.43
Field Cultivate Fld	32'		0.73	0.67	1.20			0.06	2.66	3.30 5.96
Plant - Folding	12R-30		0.99	1.79	2.18			0.12	5.08	4.75 9.83
Sorghum Concept+ Po	lb	17.64						0.42	18.06	18.06
Sprayer 800gal	80' 250hp		0.31	0.18	0.40			0.02	0.91	1.18 2.09
Lexar	pt	47.76						1.13	48.89	48.89
Sorghum Consultant	acre	6.00						0.12	6.12	6.12
Fert Appl (Liquid)	12R-30		1.24	1.43	2.38			0.10	5.15	3.55 8.70
UAN + Sulfur (28%)	gal	50.16						0.99	51.15	51.15
Sprayer 800gal	80' 250hp		0.31	0.18	0.40			0.01	0.90	1.18 2.08
Sivanto Prime	oz	10.20						0.16	10.36	10.36
Sprayer 800gal	80' 250hp		0.31	0.18	0.40			0.01	0.90	1.18 2.08
Karate Z	oz	4.11						0.05	4.16	4.16
Sprayer 800gal	80' 250hp		0.31	0.18	0.40			0.01	0.90	1.18 2.08
Prevathon	oz	18.48						0.22	18.70	18.70
Sprayer 800gal	80' 250hp		0.31	0.18	0.40			0.01	0.90	1.18 2.08
Sivanto Prime	oz	10.20						0.12	10.32	10.32
Header Wheat/Sorghum	25' Rigid		2.51	4.01	2.62			0.04	9.18	14.56 23.74
Haul Sorghum	bu	25.00						0.10	25.10	25.10
TOTALS		296.28	8.97	10.62	13.95	0.00	7.54	337.36	38.37	375.73

Note: Cost of production estimates are based on 2017 input prices.

Fertilization decisions should be based on soil tests.

Soil test cost is prorated for a test every 3rd year.

Lime cost prorated for application every 3rd year.

Table 27.E Estimated monthly income and expense flows per acre
 Grain sorghum, 12-row 30", 100 bu yield goal
 All Areas, Mississippi, 2018

ITEM	Oct	Nov	Dec	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep
-----dollars-----												
TOTAL INCOME	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	357.00
DIRECT EXPENSES												
CUSTOM SPRAY	0.00	0.00	0.00	0.00	6.50	0.00	0.00	0.00	0.00	0.00	0.00	0.00
FERTILIZERS	0.00	0.00	0.00	0.00	0.00	0.00	43.36	50.16	0.00	0.00	0.00	0.00
HERBICIDES	0.00	0.00	0.00	0.00	21.92	0.00	47.76	0.00	0.00	0.00	0.00	0.00
INSECTICIDES	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	10.20	32.79	0.00	0.00
SEED/PLANTS	0.00	0.00	0.00	0.00	0.00	0.00	17.64	0.00	0.00	0.00	0.00	0.00
ADJUVANTS	0.00	0.00	0.00	0.00	0.98	0.00	0.00	0.00	0.00	0.00	0.00	0.00
HAULING	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	25.00
CUSTOM LIME	30.64	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
CROP CONSULTANT	0.00	0.00	0.00	0.00	0.00	0.00	0.00	6.00	0.00	0.00	0.00	0.00
SOIL TEST	3.33	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
LABOR	0.00	2.11	0.00	0.00	0.00	0.00	5.24	2.38	0.40	1.20	0.00	2.62
LEASE *	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
FUEL	0.00	1.29	0.00	0.00	0.00	0.00	2.69	1.24	0.31	0.93	0.00	2.51
REPAIR & MAINTENANCE	0.00	1.33	0.00	0.00	0.00	0.00	3.13	1.43	0.18	0.54	0.00	4.01
INTEREST ON OP. CAP.	1.62	0.21	0.00	0.00	0.93	0.00	2.84	1.21	0.17	0.42	0.00	0.14
TOTAL DIRECT EXPENSES	35.59	4.94	0.00	0.00	30.33	0.00	122.66	62.42	11.26	35.88	0.00	34.28
NET INCOME	-35.59	-4.94	0.00	0.00	-30.33	0.00	-122.66	-62.42	-11.26	-35.88	0.00	322.72
NET INCOME TO DATE	-35.59	-40.53	-40.53	-40.53	-70.86	-70.86	-193.52	-255.94	-267.20	-303.08	-303.08	19.64

Note: Cost of production estimates are based on 2017 input prices.

Fertilization decisions should be based on soil tests.

Soil test cost is prorated for a test every 3rd year.

Lime cost prorated for application every 3rd year.

* Lease costs are based on hourly usage costs.

Table 27.F Estimated returns for various price/yield combinations, per acre
 Grain sorghum, 12-row 30", 100 bu yield goal
 All Areas, Mississippi, 2018

			PERCENT										
PRODUCT			75	80	85	90	95	100	105	110	115	120	125
-----			-----PRODUCT PRICE-----										
Grain Sorghum			2.67	2.85	3.03	3.21	3.39	3.57	3.74	3.92	4.10	4.28	4.46
PERCENT	YIELD	UNIT	-----dollars-----										
50	50.00	bu	-190 -229	-182 -220	-173 -211	-164 -202	-155 -193	-146 -184	-137 -175	-128 -166	-119 -157	-110 -148	-101 -140
60	60.00	bu	-166 -205	-155 -194	-145 -183	-134 -172	-123 -162	-113 -151	-102 -140	-91 -130	-80 -119	-70 -108	-59 -97
70	70.00	bu	-142 -180	-129 -168	-117 -155	-104 -143	-92 -130	-79 -118	-67 -105	-54 -93	-42 -80	-29 -68	-17 -55
80	80.00	bu	-118 -156	-103 -142	-89 -127	-75 -113	-61 -99	-46 -85	-32 -70	-18 -56	-3 -42	10 -27	24 -13
90	90.00	bu	-93 -132	-77 -116	-61 -100	-45 -84	-29 -67	-13 -51	2 -35	18 -19	34 -3	50 12	66 28
100	100.00	bu	-69 -107	-51 -90	-33 -72	-16 -54	1 -36	19 -18	37 -0	55 16	73 34	91 52	108 70
110	110.00	bu	-45 -83	-25 -64	-6 -44	13 -24	33 -5	52 14	72 34	92 53	111 73	131 93	151 112
120	120.00	bu	-21 -59	0 -38	21 -16	43 4	64 26	86 47	107 69	128 90	150 111	171 133	193 154
130	130.00	bu	3 -35	26 -11	49 11	72 34	96 57	119 80	142 104	165 127	188 150	212 173	235 196
140	140.00	bu	27 -10	52 14	77 39	102 64	127 89	152 114	177 139	202 164	227 189	252 213	277 238
150	150.00	bu	51 13	78 40	105 66	132 93	158 120	185 147	212 173	239 200	265 227	292 254	319 281

The top number in each cell is Returns Above Direct Expenses.
 The bottom number in each cell is Returns Above Total Specified Expenses.
 Only the product listed has been varied to calculate net returns.
 Note: Cost of production estimates are based on 2017 input prices.

Table 28.A Estimated costs per acre
 Wheat followed by soybeans, 70 bu yield goal
 All Areas, Mississippi, 2018

ITEM	UNIT	PRICE	QUANTITY	AMOUNT	YOUR FARM
		dollars		dollars	
DIRECT EXPENSES					
CUSTOM SPRAY					
App by Air (5 gal)	appl	6.50	2.0000	13.00	_____
App by Air (3 gal)	appl	5.00	1.0000	5.00	_____
FERTILIZERS					
Phosphorus (46% P2O5)	cwt	18.75	1.0000	18.75	_____
Potash (60% K2O)	cwt	18.98	0.7500	14.24	_____
Fert 41-0-0-4	cwt	13.50	3.0480	41.15	_____
FUNGICIDES					
CruiserMaxx	oz	4.25	4.5000	19.13	_____
Prosaro	oz	5.57	8.0000	44.56	_____
HERBICIDES					
Axiom	oz	1.92	10.0000	19.20	_____
Harmony Extra SG	oz	13.79	0.7500	10.34	_____
Axial XL	oz	1.17	16.4000	19.19	_____
INSECTICIDES					
Karate Z	oz	2.74	1.5000	4.11	_____
SEED/PLANTS					
Wheat Seed Private	lb	0.29	90.0000	26.10	_____
CUSTOM FERTILIZE					
App Fert by Air	cwt	7.00	3.0480	21.34	_____
HAULING					
Haul Wheat	bu	0.26	70.0000	18.20	_____
CUSTOM LIME					
Lime (Spread)	ton	46.00	0.6660	30.64	_____
CROP CONSULTANT					
Wheat Consultant	acre	5.50	1.0000	5.50	_____
SOIL TEST					
Soil Test	acre	10.00	0.3330	3.33	_____
OPERATOR LABOR					
Tractors	hour	13.51	0.2648	3.58	_____
Harvesters	hour	13.51	0.1021	1.38	_____
HAND LABOR					
Implements	hour	9.06	0.1363	1.23	_____
UNALLOCATED LABOR	hour	13.45	0.2936	3.95	_____
DIESEL FUEL					
Tractors	gal	1.80	2.3178	4.17	_____
Harvesters	gal	1.80	1.3935	2.51	_____
REPAIR & MAINTENANCE					
Implements	acre	3.52	1.0000	3.52	_____
Tractors	acre	1.26	1.0000	1.26	_____
Harvesters	acre	3.49	1.0000	3.49	_____
INTEREST ON OP. CAP.	acre	8.48	1.0000	8.48	_____
TOTAL DIRECT EXPENSES				347.34	_____
FIXED EXPENSES					
Implements	acre	7.79	1.0000	7.79	_____
Tractors	acre	7.97	1.0000	7.97	_____
Harvesters	acre	13.77	1.0000	13.77	_____
TOTAL FIXED EXPENSES				29.53	_____
TOTAL SPECIFIED EXPENSES				376.87	_____

Note: Cost of production estimates are based on 2017 input prices.

Fertilization decisions should be based on soil tests.

Soil test cost is prorated for a test every 3rd year.

Lime cost prorated for application every 3rd year.

Table 28.B Summary of estimated costs and returns per acre
 Wheat followed by soybeans, 70 bu yield goal
 All Areas, Mississippi, 2018

ITEM	UNIT	PRICE	QUANTITY	AMOUNT	YOUR FARM
		dollars		dollars	
INCOME					
Wheat	bu	4.71	70.0000	329.70	_____

TOTAL INCOME				329.70	_____
DIRECT EXPENSES					
CUSTOM SPRAY	acre	18.00	1.0000	18.00	_____
FERTILIZERS	acre	74.13	1.0000	74.13	_____
FUNGICIDES	acre	63.69	1.0000	63.69	_____
HERBICIDES	acre	48.73	1.0000	48.73	_____
INSECTICIDES	acre	4.11	1.0000	4.11	_____
SEED/PLANTS	acre	26.10	1.0000	26.10	_____
CUSTOM FERTILIZE	acre	21.34	1.0000	21.34	_____
HAULING	acre	18.20	1.0000	18.20	_____
CUSTOM LIME	acre	30.64	1.0000	30.64	_____
CROP CONSULTANT	acre	5.50	1.0000	5.50	_____
SOIL TEST	acre	3.33	1.0000	3.33	_____
HAND LABOR	hour	9.06	0.1363	1.23	_____
OPERATOR LABOR	hour	13.51	0.3670	4.96	_____
UNALLOCATED LABOR	hour	13.45	0.2936	3.95	_____
DIESEL FUEL	gal	1.80	3.7114	6.68	_____
REPAIR & MAINTENANCE	acre	8.27	1.0000	8.27	_____
INTEREST ON OP. CAP.	acre	8.48	1.0000	8.48	_____

TOTAL DIRECT EXPENSES				347.34	_____
RETURNS ABOVE DIRECT EXPENSES				-17.64	_____
TOTAL FIXED EXPENSES				29.53	_____

TOTAL SPECIFIED EXPENSES				376.87	_____
RETURNS ABOVE TOTAL SPECIFIED EXPENSES				-47.17	_____

Note: Cost of production estimates are based on 2017 input prices.

Fertilization decisions should be based on soil tests.

Soil test cost is prorated for a test every 3rd year.

Lime cost prorated for application every 3rd year.

Table 28.C Estimated resource use for field operations, per acre
 Wheat followed by soybeans, 70 bu yield goal
 All Areas, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	POWER UNIT SIZE	PERF RATE	TIMES OVER	MTH	INPUT AMOUNT	POWER UNIT	ALLOC LABOR	UNALL LABOR	
						-----hours-----				
Soil Test	acre			0.33	Sep	0.3330				
Lime (Spread)	ton			0.33	Sep	0.6660				
Disk Harrow	24'	MFWD 170	0.081	1.00	Sep		0.08	0.08	0.06	
Spin Spreader	5 ton	MFWD 170	0.042	1.00	Sep		0.04	0.04	0.03	
Phosphorus (46% P2O5)	cwt					1.0000				
Potash (60% K2O)	cwt					0.7500				
Field Cultivate Fld	32'	MFWD 170	0.046	1.00	Sep		0.04	0.04	0.03	
Grain Drill	20'	MFWD 170	0.094	1.00	Oct		0.09	0.09	0.18	
Wheat Seed Private	lb					90.0000				
CruiserMaxx	oz					4.5000				
Wheat Consultant	acre			1.00	Oct	1.0000				
App by Air (5 gal)	appl			1.00	Nov	1.0000				
Axiom	oz					10.0000				
App by Air (3 gal)	appl			1.00	Feb	1.0000				
Karate Z	oz					1.5000				
Harmony Extra SG	oz					0.7500				
Axial XL	oz					16.4000				
App Fert by Air	cwt			1.00	Feb	1.5240				
Fert 41-0-0-4	cwt					1.5240				
App Fert by Air	cwt			1.00	Mar	1.5240				
Fert 41-0-0-4	cwt					1.5240				
App by Air (5 gal)	appl			1.00	Apr	1.0000				
Prosaro	oz					8.0000				
Header Wheat/Sorghum	25' Rigid	265 hp	0.102	1.00	Jun		0.10	0.10	0.08	
Haul Wheat	bu					70.0000				
TOTALS							0.36	0.36	0.50	0.29

Note: Cost of production estimates are based on 2017 input prices.

Fertilization decisions should be based on soil tests.

Soil test cost is prorated for a test every 3rd year.

Lime cost prorated for application every 3rd year.

Table 28.D Estimated costs for field operations, per acre
 Wheat followed by soybeans, 70 bu yield goal
 All Areas, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	-----DIRECT COST-----							FIXED COST	TOTAL COST
		OP INPUT	FUEL	R&M	LABOR	LEASE	INTER	TOTAL		
-----dollars-----										
Soil Test	acre	3.33						0.13	3.46	3.46
Lime (Spread)	ton	30.64						1.21	31.85	31.85
Disk Harrow	24'		1.29	1.33	1.99			0.18	4.79	4.45 9.24
Spin Spreader	5 ton		0.66	0.49	1.40			0.10	2.65	1.86 4.51
Phosphorus(46% P2O5)	cwt	18.75						0.74	19.49	19.49
Potash (60% K2O)	cwt	14.24						0.56	14.80	14.80
Field Cultivate Fld	32'		0.73	0.67	1.13			0.10	2.63	3.30 5.93
Grain Drill	20'		1.49	1.77	3.14			0.23	6.63	5.36 11.99
Wheat Seed Private	lb	26.10						0.93	27.03	27.03
CruiserMaxx	oz	19.13						0.68	19.81	19.81
Wheat Consultant	acre	5.50						0.20	5.70	5.70
App by Air (5 gal)	appl	6.50						0.21	6.71	6.71
Axiom	oz	19.20						0.61	19.81	19.81
App by Air (3 gal)	appl	5.00						0.10	5.10	5.10
Karate Z	oz	4.11						0.08	4.19	4.19
Harmony Extra SG	oz	10.34						0.20	10.54	10.54
Axial XL	oz	19.19						0.38	19.57	19.57
App Fert by Air	cwt	10.67						0.21	10.88	10.88
Fert 41-0-0-4	cwt	20.57						0.41	20.98	20.98
App Fert by Air	cwt	10.67						0.17	10.84	10.84
Fert 41-0-0-4	cwt	20.57						0.33	20.90	20.90
App by Air (5 gal)	appl	6.50						0.08	6.58	6.58
Prosaro	oz	44.56						0.53	45.09	45.09
Header Wheat/Sorghum	25' Rigid		2.51	4.01	2.48			0.04	9.04	14.56 23.60
Haul Wheat	bu	18.20						0.07	18.27	18.27
TOTALS		313.77	6.68	8.27	10.14	0.00	8.48	347.34	29.53	376.87

Note: Cost of production estimates are based on 2017 input prices.

Fertilization decisions should be based on soil tests.

Soil test cost is prorated for a test every 3rd year.

Lime cost prorated for application every 3rd year.

Table 28.E Estimated monthly income and expense flows per acre
 Wheat followed by soybeans, 70 bu yield goal
 All Areas, Mississippi, 2018

ITEM	Jul	Aug	Sep	Oct	Nov	Dec	Jan	Feb	Mar	Apr	May	Jun
-----dollars-----												
TOTAL INCOME	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	329.70
DIRECT EXPENSES												
CUSTOM SPRAY	0.00	0.00	0.00	0.00	6.50	0.00	0.00	5.00	0.00	6.50	0.00	0.00
FERTILIZERS	0.00	0.00	32.99	0.00	0.00	0.00	0.00	20.57	20.57	0.00	0.00	0.00
FUNGICIDES	0.00	0.00	0.00	19.13	0.00	0.00	0.00	0.00	0.00	44.56	0.00	0.00
HERBICIDES	0.00	0.00	0.00	0.00	19.20	0.00	0.00	29.53	0.00	0.00	0.00	0.00
INSECTICIDES	0.00	0.00	0.00	0.00	0.00	0.00	0.00	4.11	0.00	0.00	0.00	0.00
SEED/PLANTS	0.00	0.00	0.00	26.10	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
CUSTOM FERTILIZE	0.00	0.00	0.00	0.00	0.00	0.00	0.00	10.67	10.67	0.00	0.00	0.00
HAULING	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	18.20
CUSTOM LIME	0.00	0.00	30.64	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
CROP CONSULTANT	0.00	0.00	0.00	5.50	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
SOIL TEST	0.00	0.00	3.33	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
LABOR	0.00	0.00	4.52	3.14	0.00	0.00	0.00	0.00	0.00	0.00	0.00	2.48
LEASE *	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
FUEL	0.00	0.00	2.68	1.49	0.00	0.00	0.00	0.00	0.00	0.00	0.00	2.51
REPAIR & MAINTENANCE	0.00	0.00	2.49	1.77	0.00	0.00	0.00	0.00	0.00	0.00	0.00	4.01
INTEREST ON OP. CAP.	0.00	0.00	3.02	2.04	0.82	0.00	0.00	1.38	0.50	0.61	0.00	0.11
TOTAL DIRECT EXPENSES	0.00	0.00	79.67	59.17	26.52	0.00	0.00	71.26	31.74	51.67	0.00	27.31
NET INCOME	0.00	0.00	-79.67	-59.17	-26.52	0.00	0.00	-71.26	-31.74	-51.67	0.00	302.39
NET INCOME TO DATE	0.00	0.00	-79.67	-138.84	-165.36	-165.36	-165.36	-236.62	-268.36	-320.03	-320.03	-17.64

Note: Cost of production estimates are based on 2017 input prices.

Fertilization decisions should be based on soil tests.

Soil test cost is prorated for a test every 3rd year.

Lime cost prorated for application every 3rd year.

* Lease costs are based on hourly usage costs.

Table 28.F Estimated returns for various price/yield combinations, per acre
Wheat followed by soybeans, 70 bu yield goal
All Areas, Mississippi, 2018

			PERCENT										
PRODUCT			75	80	85	90	95	100	105	110	115	120	125
Wheat			3.53	3.76	4.00	4.23	4.47	4.71	4.94	5.18	5.41	5.65	5.88
PERCENT			dollars										
YIELD	UNIT												
50	35.00	bu	-214	-206	-198	-189	-181	-173	-165	-156	-148	-140	-132
			-244	-235	-227	-219	-211	-202	-194	-186	-178	-169	-161
60	42.00	bu	-191	-181	-171	-161	-152	-142	-132	-122	-112	-102	-92
			-221	-211	-201	-191	-181	-171	-161	-151	-142	-132	-122
70	49.00	bu	-168	-157	-145	-134	-122	-111	-99	-87	-76	-64	-53
			-198	-186	-175	-163	-152	-140	-129	-117	-105	-94	-82
80	56.00	bu	-145	-132	-119	-106	-93	-79	-66	-53	-40	-27	-13
			-175	-162	-149	-135	-122	-109	-96	-83	-69	-56	-43
90	63.00	bu	-122	-108	-93	-78	-63	-48	-33	-19	-4	10	25
			-152	-137	-122	-107	-93	-78	-63	-48	-33	-18	-4
100	70.00	bu	-100	-83	-67	-50	-34	-17	-1	15	31	48	64
			-129	-113	-96	-80	-63	-47	-30	-14	2	18	35
110	77.00	bu	-77	-59	-40	-22	-4	13	31	49	67	86	104
			-106	-88	-70	-52	-34	-16	2	20	38	56	74
120	84.00	bu	-54	-34	-14	5	24	44	64	84	103	123	143
			-83	-64	-44	-24	-4	15	34	54	74	94	114
130	91.00	bu	-31	-9	11	32	54	75	97	118	140	161	182
			-60	-39	-18	3	24	46	67	89	110	131	153
140	98.00	bu	-8	14	37	60	83	106	130	153	176	199	222
			-37	-14	8	31	54	77	100	123	146	169	192
150	105.00	bu	14	39	63	88	113	138	162	187	212	236	261
			-15	9	34	59	83	108	133	158	182	207	232

The top number in each cell is Returns Above Direct Expenses.
The bottom number in each cell is Returns Above Total Specified Expenses.
Only the product listed has been varied to calculate net returns.
Note: Cost of production estimates are based on 2017 input prices.

Table 29.A Estimated costs per acre
 Contour levee rice
 Flood irrigated, 33 ac-in., Delta Area, Mississippi, 2018

ITEM	UNIT	PRICE	QUANTITY	AMOUNT	YOUR FARM
		dollars		dollars	
DIRECT EXPENSES					
CUSTOM SPRAY					
App by Air (5 gal)	appl	6.50	5.5000	35.75	_____
App by Air (3 gal)	appl	5.00	1.5000	7.50	_____
FERTILIZERS					
Amm Sulfate (21% N)	cwt	13.43	0.5000	6.72	_____
DAP	cwt	21.52	0.5000	10.76	_____
Urea, Solid (46% N)	cwt	14.19	4.0000	56.76	_____
NBPT	pt	9.00	0.7500	6.75	_____
FUNGICIDES					
Stratego	pt	17.50	1.1875	20.78	_____
HERBICIDES					
Glyphosate 3lbs a.e	oz	0.14	80.0000	11.20	_____
2,4-D Amine 4	pt	2.40	2.0000	4.80	_____
Command 3ME	pt	19.93	1.0000	19.93	_____
Sharpen	oz	6.45	2.0000	12.90	_____
Regiment	oz	44.90	0.6000	26.94	_____
Facet L	pt	15.25	2.6900	41.02	_____
Permit	oz	22.43	0.7500	16.82	_____
Clincher SF	oz	2.34	7.5000	17.55	_____
INSECTICIDES					
Karate Z	oz	2.74	3.0000	8.22	_____
SEED/PLANTS					
Rice Seed Conv.	lb	0.28	75.0000	21.00	_____
Rice Seed Trt/Insect	lbseed	0.23	88.6000	20.38	_____
Rice Seed Cv(Levees)	lb	0.28	13.6000	3.81	_____
ADJUVANTS					
Class Act NG	pt	2.38	0.5000	1.19	_____
MSO	pt	2.61	1.5000	3.92	_____
Dyne-A-Pak	pt	4.73	0.5000	2.37	_____
Crop Oil Conc. (Pet.)	pt	2.74	0.4000	1.10	_____
Surfactant	pt	3.28	0.1000	0.33	_____
CUSTOM FERTILIZE					
App Fert by Air	cwt	7.00	5.0000	35.00	_____
HAULING					
Haul Rice	bu	0.35	156.0000	54.60	_____
DRYING					
Dry Rice	bu	0.40	156.0000	62.40	_____
SURVEY & MARK LEVEES					
Survey & Mark Levees	acre	4.50	1.0000	4.50	_____
CROP CONSULTANT					
Rice Consultant	acre	8.00	1.0000	8.00	_____
SOIL TEST					
Soil Test	acre	10.00	0.3330	3.33	_____
OPERATOR LABOR					
Tractors	hour	13.51	0.5475	7.39	_____
Harvesters	hour	13.51	0.2030	2.74	_____
IRRIGATE LABOR					
Special Labor	hour	9.06	3.5250	31.96	_____
HAND LABOR					
Special Labor	hour	9.06	0.2500	2.27	_____
Implements	hour	9.06	0.0785	0.71	_____
RICE MGT. LABOR					
Special Labor	hour	9.06	1.5000	13.59	_____
UNALLOCATED LABOR					
	hour	13.50	0.5633	7.61	_____
DIESEL FUEL					
Tractors	gal	1.80	5.9886	10.79	_____
Harvesters	gal	1.80	3.3975	6.12	_____
Flood Irr.	gal	1.80	26.8827	48.40	_____
REPAIR & MAINTENANCE					
Implements	acre	8.36	1.0000	8.36	_____
Tractors	acre	3.37	1.0000	3.37	_____
Harvesters	acre	7.51	1.0000	7.51	_____
Flood Irr.	acre	13.79	1.0000	13.79	_____
INTEREST ON OP. CAP.	acre	11.78	1.0000	11.78	_____
TOTAL DIRECT EXPENSES				702.73	_____
FIXED EXPENSES					
Implements	acre	17.77	1.0000	17.77	_____
Tractors	acre	21.22	1.0000	21.22	_____
Harvesters	acre	29.63	1.0000	29.63	_____
Flood Irr.	acre	43.00	1.0000	43.00	_____
TOTAL FIXED EXPENSES				111.62	_____
TOTAL SPECIFIED EXPENSES				814.35	_____

Note: Cost of production estimates are based on 2017 input prices.

Fertilization decisions should be based on soil tests.
Soil test cost is prorated for a test every 3rd year.

Table 29.B Summary of estimated costs and returns per acre
 Contour levee rice
 Flood irrigated, 33 ac-in., Delta Area, Mississippi, 2018

ITEM	UNIT	PRICE	QUANTITY	AMOUNT	YOUR FARM
		dollars		dollars	
INCOME					
Rice	bu	4.90	156.0000	764.40	_____

TOTAL INCOME				764.40	_____
DIRECT EXPENSES					
CUSTOM SPRAY	acre	43.25	1.0000	43.25	_____
FERTILIZERS	acre	81.00	1.0000	81.00	_____
FUNGICIDES	acre	20.78	1.0000	20.78	_____
HERBICIDES	acre	151.16	1.0000	151.16	_____
INSECTICIDES	acre	8.22	1.0000	8.22	_____
SEED/PLANTS	acre	45.19	1.0000	45.19	_____
ADJUVANTS	acre	8.91	1.0000	8.91	_____
CUSTOM FERTILIZE	acre	35.00	1.0000	35.00	_____
HAULING	acre	54.60	1.0000	54.60	_____
DRYING	acre	62.40	1.0000	62.40	_____
SURVEY & MARK LEVEES	acre	4.50	1.0000	4.50	_____
CROP CONSULTANT	acre	8.00	1.0000	8.00	_____
SOIL TEST	acre	3.33	1.0000	3.33	_____
HAND LABOR	hour	9.06	0.3285	2.98	_____
IRRIGATE LABOR	hour	9.06	3.5250	31.96	_____
OPERATOR LABOR	hour	13.51	0.7506	10.13	_____
RICE MGT. LABOR	hour	9.06	1.5000	13.59	_____
UNALLOCATED LABOR	hour	13.50	0.5633	7.61	_____
DIESEL FUEL	gal	1.80	36.2688	65.31	_____
REPAIR & MAINTENANCE	acre	33.03	1.0000	33.03	_____
INTEREST ON OP. CAP.	acre	11.78	1.0000	11.78	_____

TOTAL DIRECT EXPENSES				702.73	_____
RETURNS ABOVE DIRECT EXPENSES				61.67	_____
TOTAL FIXED EXPENSES				111.62	_____

TOTAL SPECIFIED EXPENSES				814.35	_____
RETURNS ABOVE TOTAL SPECIFIED EXPENSES				-49.95	_____

Note: Cost of production estimates are based on 2017 input prices.

Fertilization decisions should be based on soil tests.

Soil test cost is prorated for a test every 3rd year.

Table 29.C Estimated resource use for field operations, per acre
 Contour levee rice
 Flood irrigated, 33 ac-in., Delta Area, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	POWER UNIT SIZE	PERF RATE	TIMES OVER	MTH	INPUT AMOUNT	IMPLEMENT	POWER UNIT	ALLOC LABOR	UNALL LABOR
-----hours-----										
Soil Test	acre			0.33	Sep	0.3330				
Field Cultivate Fld	32'	MFWD 225	0.046	2.00	Oct		0.09	0.09	0.09	0.08
Harrow - Folding	40'	MFWD 225	0.038	1.00	Oct		0.03	0.03	0.03	0.03
App by Air (5 gal)	appl			1.00	Feb	1.0000				
Glyphosate 3lbs a.e	oz					48.0000				
2,4-D Amine 4	pt					2.0000				
Grain Drill	24'	MFWD 225	0.078	1.00	Apr		0.07	0.07	0.15	0.07
Rice Seed Conv.	lb					75.0000				
Rice Seed Trt/Insect	lbseed					75.0000				
Roller/Cultipacker	30'	MFWD 225	0.049	1.00	Apr		0.04	0.04	0.04	0.04
App by Air (5 gal)	appl			1.00	Apr	1.0000				
Glyphosate 3lbs a.e	oz					32.0000				
Command 3ME	pt					1.0000				
Sharpen	oz					2.0000				
Class Act NG	pt					0.5000				
MSO	pt					0.5000				
Seed Levees				1.00	Apr					
Rice Seed Cv (Levees)	lb					13.6000				
Rice Seed Trt/Insect	lbseed					13.6000				
Rice Consultant	acre			1.00	May	1.0000				
App Fert by Air	cwt			1.00	May	1.0000				
Amm Sulfate (21% N)	cwt					0.5000				
DAP	cwt					0.5000				
App by Air (5 gal)	appl			1.00	May	1.0000				
Regiment	oz					0.6000				
Dyne-A-Pak	pt					0.5000				
App Fert by Air	cwt			1.00	May	2.5000				
Urea, Solid (46% N)	cwt					2.5000				
NBPT	pt					0.7500				
Rice Management				1.00	May					
RICE MGT. LABOR	hour								0.30	
App by Air (5 gal)	appl			1.00	May	1.0000				
Facet L	pt					2.6900				
Permit	oz					0.7500				
Crop Oil Conc. (Pet.)	pt					0.4000				
App by Air (5 gal)	appl			0.50	Jun	0.5000				
Clincher SF	oz					7.5000				
MSO	pt					1.0000				
Rice Management				1.00	Jun					
RICE MGT. LABOR	hour								0.50	
App Fert by Air	cwt			1.00	Jun	1.5000				
Urea, Solid (46% N)	cwt					1.5000				
Rice Management				1.00	Jul					
RICE MGT. LABOR	hour								0.50	
App by Air (5 gal)	appl			1.00	Jul	1.0000				
Stratego	pt					1.1875				
Surfactant	pt					0.1000				
App by Air (3 gal)	appl			1.50	Jul	1.5000				
Karate Z	oz					3.0000				
Rice Management				1.00	Aug					
RICE MGT. LABOR	hour								0.20	
Header - Draper (CL)	25' Rigid	325 hp	0.203	1.00	Aug		0.20	0.20	0.20	0.18
Grain Cart Rice	700 bu	MFWD 225	0.055	0.20	Aug		0.01	0.01	0.01	0.00
Handling & Storage				1.00	Aug					
HAND LABOR	hour								0.25	
Haul Rice	bu			1.00	Aug	156.0000				
Dry Rice	bu			1.00	Aug	156.0000				
Disk Heavy	28'	MFWD 225	0.075	2.00	Sep		0.15	0.15	0.15	0.13
Flood Irr.	acre				Jan	1.0000	0.12	0.12	3.64	
TOTALS							0.75	0.75	6.10	0.56

Note: Cost of production estimates are based on 2017 input prices.
Fertilization decisions should be based on soil tests.
Soil test cost is prorated for a test every 3rd year.

Table 29.D Estimated costs for field operations, per acre
 Contour levee rice
 Flood irrigated, 33 ac-in., Delta Area, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	-----DIRECT COST-----							FIXED COST	TOTAL COST
		OP INPUT	FUEL	R&M	LABOR	LEASE	INTER	TOTAL		
-----dollars-----										
Soil Test	acre	3.33						0.01	3.34	3.34
Field Cultivate Fld	32'		1.95	1.51	2.39			0.28	6.13	7.66
Harrow - Folding	40'		0.81	0.51	0.99			0.11	2.42	1.99
App by Air (5 gal)	appl	6.50						0.21	6.71	6.71
Glyphosate 3lbs a.e	oz	6.72						0.21	6.93	6.93
2,4-D Amine 4	pt	4.80						0.15	4.95	4.95
Grain Drill	24'		1.64	2.38	2.73			0.16	6.91	6.80
Rice Seed Conv.	lb	21.00						0.50	21.50	21.50
Rice Seed Trt/Insect	lbseed	17.25						0.41	17.66	17.66
Roller/Cultipacker	30'		1.04	0.55	1.28			0.07	2.94	2.37
App by Air (5 gal)	appl	6.50						0.15	6.65	6.65
Glyphosate 3lbs a.e	oz	4.48						0.11	4.59	4.59
Command 3ME	pt	19.93						0.47	20.40	20.40
Sharpen	oz	12.90						0.31	13.21	13.21
Class Act NG	pt	1.19						0.03	1.22	1.22
MSO	pt	1.31						0.03	1.34	1.34
Seed Levees										
Rice Seed Cv(Levees)	lb	3.81						0.09	3.90	3.90
Rice Seed Trt/Insect	lbseed	3.13						0.07	3.20	3.20
Rice Consultant	acre	8.00						0.16	8.16	8.16
App Fert by Air	cwt	7.00						0.14	7.14	7.14
Amm Sulfate (21% N)	cwt	6.72						0.13	6.85	6.85
DAP	cwt	10.76						0.21	10.97	10.97
App by Air (5 gal)	appl	6.50						0.13	6.63	6.63
Regiment	oz	26.94						0.53	27.47	27.47
Dyne-A-Pak	pt	2.37						0.05	2.42	2.42
App Fert by Air	cwt	17.50						0.35	17.85	17.85
Urea, Solid (46% N)	cwt	35.48						0.70	36.18	36.18
NBPT	pt	6.75						0.13	6.88	6.88
Rice Management										
RICE MGT. LABOR	hour				2.72			0.05	2.77	2.77
App by Air (5 gal)	appl	6.50						0.13	6.63	6.63
Facet L	pt	41.02						0.81	41.83	41.83
Permit	oz	16.82						0.33	17.15	17.15
Crop Oil Conc.(Pet.)	pt	1.10						0.02	1.12	1.12
App by Air (5 gal)	appl	3.25						0.05	3.30	3.30
Clincher SF	oz	17.55						0.28	17.83	17.83
MSO	pt	2.61						0.04	2.65	2.65
Rice Management										
RICE MGT. LABOR	hour				4.53			0.07	4.60	4.60
App Fert by Air	cwt	10.50						0.17	10.67	10.67
Urea, Solid (46% N)	cwt	21.29						0.34	21.63	21.63
Rice Management										
RICE MGT. LABOR	hour				4.53			0.05	4.58	4.58
App by Air (5 gal)	appl	6.50						0.08	6.58	6.58
Stratego	pt	20.78						0.25	21.03	21.03
Surfactant	pt	0.33							0.33	0.33
App by Air (3 gal)	appl	7.50						0.09	7.59	7.59
Karate Z	oz	8.22						0.10	8.32	8.32
Rice Management										
RICE MGT. LABOR	hour				1.81			0.01	1.82	1.82
Header - Draper (CL)	25' Rigid		6.12	10.25	5.21			0.17	21.75	33.91
Grain Cart Rice	700 bu		0.23	0.18	0.28			0.01	0.70	0.64
Handling & Storage										
HAND LABOR	hour				2.27			0.02	2.29	2.29
Haul Rice	bu	54.60						0.43	55.03	55.03
Dry Rice	bu	62.40						0.49	62.89	62.89
Disk Heavy	28'		3.16	3.10	3.88			0.04	10.18	10.70
Flood Irr.	acre	4.50	50.36	14.55	33.65			1.85	104.91	47.55
TOTALS		526.34	65.31	33.03	66.27	0.00	11.78	702.73	111.62	814.35

Note: Cost of production estimates are based on 2017 input prices.
Fertilization decisions should be based on soil tests.
Soil test cost is prorated for a test every 3rd year.

Table 29.E Estimated monthly income and expense flows per acre
 Contour levee rice
 Flood irrigated, 33 ac-in., Delta Area, Mississippi, 2018

ITEM	Oct	Nov	Dec	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep
-----dollars-----												
TOTAL INCOME	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	764.40	0.00
DIRECT EXPENSES												
CUSTOM SPRAY	0.00	0.00	0.00	0.00	6.50	0.00	6.50	13.00	3.25	14.00	0.00	0.00
FERTILIZERS	0.00	0.00	0.00	0.00	0.00	0.00	0.00	59.71	21.29	0.00	0.00	0.00
FUNGICIDES	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	20.78	0.00	0.00
HERBICIDES	0.00	0.00	0.00	0.00	11.52	0.00	37.31	84.78	17.55	0.00	0.00	0.00
INSECTICIDES	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	8.22	0.00	0.00
SEED/PLANTS	0.00	0.00	0.00	0.00	0.00	0.00	45.19	0.00	0.00	0.00	0.00	0.00
ADJUVANTS	0.00	0.00	0.00	0.00	0.00	0.00	2.50	3.47	2.61	0.33	0.00	0.00
CUSTOM FERTILIZE	0.00	0.00	0.00	0.00	0.00	0.00	0.00	24.50	10.50	0.00	0.00	0.00
HAULING	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	54.60	0.00
DRYING	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	62.40	0.00
SURVEY & MARK LEVEES	0.00	0.00	0.00	0.00	0.00	0.00	4.50	0.00	0.00	0.00	0.00	0.00
CROP CONSULTANT	0.00	0.00	0.00	0.00	0.00	0.00	0.00	8.00	0.00	0.00	0.00	0.00
SOIL TEST	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	3.33
LABOR	3.38	0.00	0.00	0.00	0.00	0.00	15.73	9.52	11.33	11.33	11.10	3.88
LEASE *	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
FUEL	2.76	0.00	0.00	0.00	0.00	0.00	12.72	13.20	13.20	13.20	7.07	3.16
REPAIR & MAINTENANCE	2.02	0.00	0.00	0.00	0.00	0.00	4.83	8.06	2.15	2.15	10.72	3.10
INTEREST ON OP. CAP.	0.39	0.00	0.00	0.00	0.57	0.00	3.07	4.42	1.30	0.83	1.15	0.05
TOTAL DIRECT EXPENSES	8.55	0.00	0.00	0.00	18.59	0.00	132.35	228.66	83.18	70.84	147.04	13.52
NET INCOME	-8.55	0.00	0.00	0.00	-18.59	0.00	-132.35	-228.66	-83.18	-70.84	617.36	-13.52
NET INCOME TO DATE	-8.55	-8.55	-8.55	-8.55	-27.14	-27.14	-159.49	-388.15	-471.33	-542.17	75.19	61.67

Note: Cost of production estimates are based on 2017 input prices.

Fertilization decisions should be based on soil tests.

* Lease costs are based on hourly usage costs

Table 29.F Estimated returns for various price/yield combinations, per acre
 Contour levee rice
 Flood irrigated, 33 ac-in., Delta Area, Mississippi, 2018

			PERCENT										
			75	80	85	90	95	100	105	110	115	120	125
			PRODUCT PRICE										
			3.67	3.92	4.16	4.41	4.65	4.90	5.14	5.39	5.63	5.88	6.12
PERCENT	YIELD	UNIT	dollars										
50	78.00	bu	-357 -468	-338 -449	-318 -430	-299 -411	-280 -392	-261 -373	-242 -354	-223 -334	-204 -315	-185 -296	-166 -277
60	93.60	bu	-311 -423	-288 -400	-265 -377	-242 -354	-219 -331	-196 -308	-173 -285	-151 -262	-128 -239	-105 -216	-82 -193
70	109.20	bu	-266 -377	-239 -350	-212 -324	-185 -297	-159 -270	-132 -243	-105 -217	-78 -190	-52 -163	-25 -136	1 -110
80	124.80	bu	-220 -332	-189 -301	-159 -270	-128 -240	-98 -209	-67 -179	-37 -148	-6 -118	24 -87	54 -56	85 -26
90	140.40	bu	-174 -286	-140 -252	-106 -217	-71 -183	-37 -148	-2 -114	31 -80	65 -45	100 -11	134 22	169 57
100	156.00	bu	-129 -241	-91 -202	-52 -164	-14 -126	23 -88	61 -49	99 -11	138 26	176 64	214 102	252 141
110	171.60	bu	-83 -195	-41 -153	0 -111	42 -69	84 -27	126 14	168 56	210 98	252 140	294 182	336 224
120	187.20	bu	-38 -149	7 -104	53 -58	99 -12	145 33	190 79	236 125	282 171	328 216	374 262	420 308
130	202.80	bu	7 -104	56 -54	106 -5	156 44	205 94	255 143	305 193	354 243	404 293	454 342	504 392
140	218.40	bu	52 -58	106 -5	159 48	213 101	266 155	320 208	373 262	427 315	480 369	534 422	587 476
150	234.00	bu	98 -13	155 43	212 101	270 158	327 215	384 273	442 330	499 387	556 445	614 502	671 559

The top number in each cell is Returns Above Direct Expenses.
 The bottom number in each cell is Returns Above Total Specified Expenses.
 Only the product listed has been varied to calculate net returns.
 Note: Cost of production estimates are based on 2017 input prices.

Table 30.A Estimated costs per acre
 Straight levee rice
 Flood irrigated, 27 ac-in., Delta Area, Mississippi, 2018

ITEM	UNIT	PRICE	QUANTITY	AMOUNT	YOUR FARM
		dollars		dollars	
DIRECT EXPENSES					
CUSTOM SPRAY					
App by Air (5 gal)	appl	6.50	5.5000	35.75	_____
App by Air (3 gal)	appl	5.00	1.5000	7.50	_____
FERTILIZERS					
Amm Sulfate (21% N)	cwt	13.43	0.5000	6.72	_____
DAP	cwt	21.52	0.5000	10.76	_____
Urea, Solid (46% N)	cwt	14.19	4.0000	56.76	_____
NBPT	pt	9.00	0.7500	6.75	_____
FUNGICIDES					
Stratego	pt	17.50	1.1875	20.78	_____
HERBICIDES					
Glyphosate 3lbs a.e	oz	0.14	80.0000	11.20	_____
2,4-D Amine 4	pt	2.40	2.0000	4.80	_____
Command 3ME	pt	19.93	1.0000	19.93	_____
Sharpen	oz	6.45	2.0000	12.90	_____
Regiment	oz	44.90	0.6000	26.94	_____
Facet L	pt	15.25	2.6900	41.02	_____
Permit	oz	22.43	0.7500	16.82	_____
Clincher SF	oz	2.34	7.5000	17.55	_____
INSECTICIDES					
Karate Z	oz	2.74	3.0000	8.22	_____
SEED/PLANTS					
Rice Seed Conv.	lb	0.28	75.0000	21.00	_____
Rice Seed Trt/Insect	lbseed	0.23	88.6000	20.38	_____
Rice Seed Cv (Levees)	lb	0.28	13.6000	3.81	_____
ADJUVANTS					
MSO	pt	2.61	1.5000	3.92	_____
Class Act NG	pt	2.38	0.5000	1.19	_____
Dyne-A-Pak	pt	4.73	0.5000	2.37	_____
Crop Oil Conc. (Pet.)	pt	2.74	0.4000	1.10	_____
Surfactant	pt	3.28	0.1000	0.33	_____
CUSTOM FERTILIZE					
App Fert by Air	cwt	7.00	5.0000	35.00	_____
HAULING					
Haul Rice	bu	0.35	156.0000	54.60	_____
DRYING					
Dry Rice	bu	0.40	156.0000	62.40	_____
SURVEY & MARK LEVEES					
Survey & Mark Levees	acre	4.50	0.5000	2.25	_____
CROP CONSULTANT					
Rice Consultant	acre	8.00	1.0000	8.00	_____
SOIL TEST					
Soil Test	acre	10.00	0.3330	3.33	_____
OPERATOR LABOR					
Tractors	hour	13.51	0.4999	6.74	_____
Harvesters	hour	13.51	0.1760	2.38	_____
IRRIGATE LABOR					
Special Labor	hour	9.06	2.3750	21.52	_____
HAND LABOR					
Special Labor	hour	9.06	0.2500	2.27	_____
Implements	hour	9.06	0.0785	0.71	_____
RICE MGT. LABOR					
Special Labor	hour	9.06	0.7000	6.34	_____
UNALLOCATED LABOR					
	hour	13.50	0.5389	7.28	_____
DIESEL FUEL					
Tractors	gal	1.80	5.5719	10.05	_____
Harvesters	gal	1.80	2.9444	5.30	_____
Flood Irr.	gal	1.80	21.9949	39.58	_____
REPAIR & MAINTENANCE					
Implements	acre	7.93	1.0000	7.93	_____
Tractors	acre	3.14	1.0000	3.14	_____
Harvesters	acre	6.51	1.0000	6.51	_____
Flood Irr.	acre	13.78	1.0000	13.78	_____
INTEREST ON OP. CAP.	acre	11.41	1.0000	11.41	_____
TOTAL DIRECT EXPENSES				669.03	_____
FIXED EXPENSES					
Implements	acre	16.84	1.0000	16.84	_____
Tractors	acre	19.79	1.0000	19.79	_____
Harvesters	acre	25.68	1.0000	25.68	_____
Flood Irr.	acre	66.91	1.0000	66.91	_____
TOTAL FIXED EXPENSES				129.22	_____
TOTAL SPECIFIED EXPENSES				798.25	_____

Note: Cost of production estimates are based on 2017 input prices.
Fertilization decisions should be based on soil tests.
Soil test cost is prorated for a test every 3rd year.

Table 30.B Summary of estimated costs and returns per acre
 Straight levee rice
 Flood irrigated, 27 ac-in., Delta Area, Mississippi, 2018

ITEM	UNIT	PRICE	QUANTITY	AMOUNT	YOUR FARM
		dollars		dollars	
INCOME					
Rice	bu	4.90	156.0000	764.40	_____

TOTAL INCOME				764.40	_____
DIRECT EXPENSES					
CUSTOM SPRAY	acre	43.25	1.0000	43.25	_____
FERTILIZERS	acre	81.00	1.0000	81.00	_____
FUNGICIDES	acre	20.78	1.0000	20.78	_____
HERBICIDES	acre	151.16	1.0000	151.16	_____
INSECTICIDES	acre	8.22	1.0000	8.22	_____
SEED/PLANTS	acre	45.19	1.0000	45.19	_____
ADJUVANTS	acre	8.91	1.0000	8.91	_____
CUSTOM FERTILIZE	acre	35.00	1.0000	35.00	_____
HAULING	acre	54.60	1.0000	54.60	_____
DRYING	acre	62.40	1.0000	62.40	_____
SURVEY & MARK LEVEES	acre	2.25	1.0000	2.25	_____
CROP CONSULTANT	acre	8.00	1.0000	8.00	_____
SOIL TEST	acre	3.33	1.0000	3.33	_____
HAND LABOR	hour	9.06	0.3285	2.98	_____
IRRIGATE LABOR	hour	9.06	2.3750	21.52	_____
OPERATOR LABOR	hour	13.51	0.6759	9.12	_____
RICE MGT. LABOR	hour	9.06	0.7000	6.34	_____
UNALLOCATED LABOR	hour	13.50	0.5389	7.28	_____
DIESEL FUEL	gal	1.80	30.5114	54.93	_____
REPAIR & MAINTENANCE	acre	31.36	1.0000	31.36	_____
INTEREST ON OP. CAP.	acre	11.41	1.0000	11.41	_____

TOTAL DIRECT EXPENSES				669.03	_____
RETURNS ABOVE DIRECT EXPENSES				95.37	_____
TOTAL FIXED EXPENSES				129.22	_____

TOTAL SPECIFIED EXPENSES				798.25	_____
RETURNS ABOVE TOTAL SPECIFIED EXPENSES				-33.85	_____

Note: Cost of production estimates are based on 2017 input prices.

Fertilization decisions should be based on soil tests.

Soil test cost is prorated for a test every 3rd year.

Table 30.C Estimated resource use for field operations, per acre
 Straight levee rice
 Flood irrigated, 27 ac-in., Delta Area, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	POWER UNIT SIZE	PERF RATE	TIMES OVER	MTH	INPUT AMOUNT	IMPLEMENT	POWER UNIT	ALLOC LABOR	UNALL LABOR
-----hours-----										
Soil Test	acre			0.33	Oct	0.3330				
Field Cultivate Fld	32'	MFWD 225	0.046	2.00	Oct		0.09	0.09	0.09	0.08
Harrow - Folding	40'	MFWD 225	0.038	1.00	Oct		0.03	0.03	0.03	0.03
App by Air (5 gal)	appl			1.00	Feb	1.0000				
Glyphosate 3lbs a.e	oz					48.0000				
2,4-D Amine 4	pt					2.0000				
Grain Drill	24'	MFWD 225	0.078	1.00	Apr		0.07	0.07	0.15	0.07
Rice Seed Conv.	lb					75.0000				
Rice Seed Trt/Insect	lbseed					75.0000				
Roller/Cultipacker	30'	MFWD 225	0.049	1.00	Apr		0.04	0.04	0.04	0.04
App by Air (5 gal)	appl			1.00	Apr	1.0000				
Glyphosate 3lbs a.e	oz					32.0000				
Command 3ME	pt					1.0000				
Sharpen	oz					2.0000				
MSO	pt					0.5000				
Class Act NG	pt					0.5000				
Seed Levees				1.00	Apr					
Rice Seed Cv(Levees)	lb					13.6000				
Rice Seed Trt/Insect	lbseed					13.6000				
Rice Consultant	acre			1.00	May	1.0000				
App Fert by Air	cwt			1.00	May	1.0000				
Amm Sulfate (21% N)	cwt					0.5000				
DAP	cwt					0.5000				
App by Air (5 gal)	appl			1.00	May	1.0000				
Regiment	oz					0.6000				
Dyne-A-Pak	pt					0.5000				
App Fert by Air	cwt			1.00	May	2.5000				
Urea, Solid (46% N)	cwt					2.5000				
NBPT	pt					0.7500				
Rice Management				1.00	May					
RICE MGT. LABOR	hour								0.10	
App by Air (5 gal)	appl			1.00	May	1.0000				
Facet L	pt					2.6900				
Permit	oz					0.7500				
Crop Oil Conc.(Pet.)	pt					0.4000				
App by Air (5 gal)	appl			0.50	Jun	0.5000				
Clincher SF	oz					7.5000				
MSO	pt					1.0000				
Rice Management				1.00	Jun					
RICE MGT. LABOR	hour								0.20	
App Fert by Air	cwt			1.00	Jun	1.5000				
Urea, Solid (46% N)	cwt					1.5000				
Rice Management				1.00	Jul					
RICE MGT. LABOR	hour								0.20	
App by Air (5 gal)	appl			1.00	Jul	1.0000				
Stratego	pt					1.1875				
Surfactant	pt					0.1000				
App by Air (3 gal)	appl			1.50	Jul	1.5000				
Karate Z	oz					3.0000				
Rice Management				1.00	Aug					
RICE MGT. LABOR	hour								0.20	
Header - Draper (SL)	25' Rigid	325 hp	0.176	1.00	Aug		0.17	0.17	0.17	0.15
Grain Cart Rice	700 bu	MFWD 225	0.055	0.20	Aug		0.01	0.01	0.01	0.00
Handling & Storage				1.00	Aug					
HAND LABOR	hour								0.25	
Haul Rice	bu			1.00	Aug	156.0000				
Dry Rice	bu			1.00	Aug	156.0000				
Disk Heavy	28'	MFWD 225	0.075	2.00	Sep		0.15	0.15	0.15	0.13
Flood Irr.	acre				Jan	1.0000	0.07	0.07	2.45	
TOTALS							0.67	0.67	4.07	0.53

Note: Cost of production estimates are based on 2017 input prices.
Fertilization decisions should be based on soil tests.
Soil test cost is prorated for a test every 3rd year.

Table 30.D Estimated costs for field operations, per acre
 Straight levee rice
 Flood irrigated, 27 ac-in., Delta Area, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	-----DIRECT COST-----							FIXED COST	TOTAL COST
		OP INPUT	FUEL	R&M	LABOR	LEASE	INTER	TOTAL		
-----dollars-----										
Soil Test	acre	3.33						0.16	3.49	3.49
Field Cultivate Fld	32'		1.95	1.51	2.39			0.28	6.13	7.66
Harrow - Folding	40'		0.81	0.51	0.99			0.11	2.42	1.99
App by Air (5 gal)	appl	6.50						0.21	6.71	6.71
Glyphosate 3lbs a.e	oz	6.72						0.21	6.93	6.93
2,4-D Amine 4	pt	4.80						0.15	4.95	4.95
Grain Drill	24'		1.64	2.38	2.73			0.16	6.91	6.80
Rice Seed Conv.	lb	21.00						0.50	21.50	21.50
Rice Seed Trt/Insect	lbseed	17.25						0.41	17.66	17.66
Roller/Cultipacker	30'		1.04	0.55	1.28			0.07	2.94	2.37
App by Air (5 gal)	appl	6.50						0.15	6.65	6.65
Glyphosate 3lbs a.e	oz	4.48						0.11	4.59	4.59
Command 3ME	pt	19.93						0.47	20.40	20.40
Sharpen	oz	12.90						0.31	13.21	13.21
MSO	pt	1.31						0.03	1.34	1.34
Class Act NG	pt	1.19						0.03	1.22	1.22
Seed Levees										
Rice Seed Cv(Levees)	lb	3.81						0.09	3.90	3.90
Rice Seed Trt/Insect	lbseed	3.13						0.07	3.20	3.20
Rice Consultant	acre	8.00						0.16	8.16	8.16
App Fert by Air	cwt	7.00						0.14	7.14	7.14
Amm Sulfate (21% N)	cwt	6.72						0.13	6.85	6.85
DAP	cwt	10.76						0.21	10.97	10.97
App by Air (5 gal)	appl	6.50						0.13	6.63	6.63
Regiment	oz	26.94						0.53	27.47	27.47
Dyne-A-Pak	pt	2.37						0.05	2.42	2.42
App Fert by Air	cwt	17.50						0.35	17.85	17.85
Urea, Solid (46% N)	cwt	35.48						0.70	36.18	36.18
NBPT	pt	6.75						0.13	6.88	6.88
Rice Management										
RICE MGT. LABOR	hour				0.91			0.02	0.93	0.93
App by Air (5 gal)	appl	6.50						0.13	6.63	6.63
Facet L	pt	41.02						0.81	41.83	41.83
Permit	oz	16.82						0.33	17.15	17.15
Crop Oil Conc.(Pet.)	pt	1.10						0.02	1.12	1.12
App by Air (5 gal)	appl	3.25						0.05	3.30	3.30
Clincher SF	oz	17.55						0.28	17.83	17.83
MSO	pt	2.61						0.04	2.65	2.65
Rice Management										
RICE MGT. LABOR	hour				1.81			0.03	1.84	1.84
App Fert by Air	cwt	10.50						0.17	10.67	10.67
Urea, Solid (46% N)	cwt	21.29						0.34	21.63	21.63
Rice Management										
RICE MGT. LABOR	hour				1.81			0.02	1.83	1.83
App by Air (5 gal)	appl	6.50						0.08	6.58	6.58
Stratego	pt	20.78						0.25	21.03	21.03
Surfactant	pt	0.33							0.33	0.33
App by Air (3 gal)	appl	7.50						0.09	7.59	7.59
Karate Z	oz	8.22						0.10	8.32	8.32
Rice Management										
RICE MGT. LABOR	hour				1.81			0.01	1.82	1.82
Header - Draper (SL)	25' Rigid		5.30	8.88	4.52			0.15	18.85	29.39
Grain Cart Rice	700 bu		0.23	0.18	0.28			0.01	0.70	0.64
Handling & Storage										
HAND LABOR	hour				2.27			0.02	2.29	2.29
Haul Rice	bu	54.60						0.43	55.03	55.03
Dry Rice	bu	62.40						0.49	62.89	62.89
Disk Heavy	28'		3.16	3.10	3.88			0.04	10.18	10.70
Flood Irr.	acre	2.25	40.80	14.25	22.56			1.45	81.31	69.67
TOTALS		524.09	54.93	31.36	47.24	0.00	11.41	669.03	129.22	798.25

Note: Cost of production estimates are based on 2017 input prices.
Fertilization decisions should be based on soil tests.
Soil test cost is prorated for a test every 3rd year.

Table 30.E Estimated monthly income and expense flows per acre
 Straight levee rice
 Flood irrigated, 27 ac-in., Delta Area, Mississippi, 2018

ITEM	Oct	Nov	Dec	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep
-----dollars-----												
TOTAL INCOME	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	764.40	0.00
DIRECT EXPENSES												
CUSTOM SPRAY	0.00	0.00	0.00	0.00	6.50	0.00	6.50	13.00	3.25	14.00	0.00	0.00
FERTILIZERS	0.00	0.00	0.00	0.00	0.00	0.00	0.00	59.71	21.29	0.00	0.00	0.00
FUNGICIDES	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	20.78	0.00	0.00
HERBICIDES	0.00	0.00	0.00	0.00	11.52	0.00	37.31	84.78	17.55	0.00	0.00	0.00
INSECTICIDES	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	8.22	0.00	0.00
SEED/PLANTS	0.00	0.00	0.00	0.00	0.00	0.00	45.19	0.00	0.00	0.00	0.00	0.00
ADJUVANTS	0.00	0.00	0.00	0.00	0.00	0.00	2.50	3.47	2.61	0.33	0.00	0.00
CUSTOM FERTILIZE	0.00	0.00	0.00	0.00	0.00	0.00	0.00	24.50	10.50	0.00	0.00	0.00
HAULING	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	54.60	0.00
DRYING	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	62.40	0.00
SURVEY & MARK LEVEES	0.00	0.00	0.00	0.00	0.00	0.00	2.25	0.00	0.00	0.00	0.00	0.00
CROP CONSULTANT	0.00	0.00	0.00	0.00	0.00	0.00	0.00	8.00	0.00	0.00	0.00	0.00
SOIL TEST	3.33	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
LABOR	3.38	0.00	0.00	0.00	0.00	0.00	11.73	5.44	6.34	6.34	10.13	3.88
LEASE *	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
FUEL	2.76	0.00	0.00	0.00	0.00	0.00	12.31	10.26	10.26	10.26	5.92	3.16
REPAIR & MAINTENANCE	2.02	0.00	0.00	0.00	0.00	0.00	4.99	7.95	2.04	2.04	9.22	3.10
INTEREST ON OP. CAP.	0.55	0.00	0.00	0.00	0.57	0.00	2.92	4.29	1.17	0.74	1.13	0.04
TOTAL DIRECT EXPENSES	12.04	0.00	0.00	0.00	18.59	0.00	125.70	221.40	75.01	62.71	143.40	10.18
NET INCOME	-12.04	0.00	0.00	0.00	-18.59	0.00	-125.70	-221.40	-75.01	-62.71	621.00	-10.18
NET INCOME TO DATE	-12.04	-12.04	-12.04	-12.04	-30.63	-30.63	-156.33	-377.73	-452.74	-515.45	105.55	95.37

Note: Cost of production estimates are based on 2017 input prices.

Fertilization decisions should be based on soil tests.

Soil test cost is prorated for a test every 3rd year.

* Lease costs are based on hourly usage costs

Table 30.F Estimated returns for various price/yield combinations, per acre
 Straight levee rice
 Flood irrigated, 27 ac-in., Delta Area, Mississippi, 2018

			PERCENT										
PRODUCT			75	80	85	90	95	100	105	110	115	120	125
			PRODUCT PRICE										
Rice			3.67	3.92	4.16	4.41	4.65	4.90	5.14	5.39	5.63	5.88	6.12
PERCENT	YIELD	UNIT	dollars										
50	78.00	bu	-323 -452	-304 -433	-285 -414	-266 -395	-246 -376	-227 -357	-208 -337	-189 -318	-170 -299	-151 -280	-132 -261
60	93.60	bu	-277 -407	-254 -384	-232 -361	-209 -338	-186 -315	-163 -292	-140 -269	-117 -246	-94 -223	-71 -200	-48 -177
70	109.20	bu	-232 -361	-205 -334	-178 -308	-152 -281	-125 -254	-98 -227	-71 -201	-45 -174	-18 -147	8 -120	35 -94
80	124.80	bu	-186 -316	-156 -285	-125 -254	-95 -224	-64 -193	-33 -163	-3 -132	27 -101	57 -71	88 -40	118 -10
90	140.40	bu	-141 -270	-106 -236	-72 -201	-38 -167	-3 -132	30 -98	65 -64	99 -29	133 4	168 39	202 73
100	156.00	bu	-95 -224	-57 -186	-19 -148	18 -110	57 -72	95 -33	133 4	171 42	210 80	248 119	286 157
110	171.60	bu	-50 -179	-8 -137	33 -95	75 -53	117 -11	160 30	202 72	244 114	286 156	328 198	370 241
120	187.20	bu	-4 -133	41 -88	87 -42	132 3	178 49	224 95	270 141	316 187	362 233	408 278	453 324
130	202.80	bu	40 -88	90 -38	140 11	189 60	239 110	289 160	339 209	388 259	438 309	488 358	537 408
140	218.40	bu	86 -42	139 10	193 64	246 117	300 171	353 224	407 278	460 331	514 385	567 438	621 492
150	234.00	bu	131 2	189 60	246 117	303 174	361 232	418 289	475 346	533 404	590 461	647 518	705 576

The top number in each cell is Returns Above Direct Expenses.
 The bottom number in each cell is Returns Above Total Specified Expenses.
 Only the product listed has been varied to calculate net returns.
 Note: Cost of production estimates are based on 2017 input prices.

Table 31.A Estimated costs per acre
 Straight levee rice
 Multi inlet flood irrigated, 23 ac-in., Delta Area, Mississippi, 2018

ITEM	UNIT	PRICE	QUANTITY	AMOUNT	YOUR FARM
		dollars		dollars	
DIRECT EXPENSES					
CUSTOM SPRAY					
App by Air (5 gal)	appl	6.50	5.5000	35.75	_____
App by Air (3 gal)	appl	5.00	1.5000	7.50	_____
FERTILIZERS					
Amm Sulfate (21% N)	cwt	13.43	0.5000	6.72	_____
DAP	cwt	21.52	0.5000	10.76	_____
Urea, Solid (46% N)	cwt	14.19	4.0000	56.76	_____
NBPT	pt	9.00	0.7500	6.75	_____
FUNGICIDES					
Stratego	pt	17.50	1.1875	20.78	_____
HERBICIDES					
Glyphosate 3lbs a.e	oz	0.14	80.0000	11.20	_____
2,4-D Amine 4	pt	2.40	2.0000	4.80	_____
Command 3ME	pt	19.93	1.0000	19.93	_____
Sharpen	oz	6.45	2.0000	12.90	_____
Regiment	oz	44.90	0.6000	26.94	_____
Facet L	pt	15.25	2.6900	41.02	_____
Permit	oz	22.43	0.7500	16.82	_____
Clincher SF	oz	2.34	7.5000	17.55	_____
INSECTICIDES					
Karate Z	oz	2.74	3.0000	8.22	_____
IRRIGATION SUPPLIES					
Roll-Out Pipe	ft	0.25	33.0000	8.25	_____
SEED/PLANTS					
Rice Seed Conv.	lb	0.28	75.0000	21.00	_____
Rice Seed Trt/Insect	lbseed	0.23	88.6000	20.38	_____
Rice Seed Cv(Levees)	lb	0.28	13.6000	3.81	_____
ADJUVANTS					
Class Act NG	pt	2.38	0.5000	1.19	_____
MSO	pt	2.61	1.5000	3.92	_____
Dyne-A-Pak	pt	4.73	0.5000	2.37	_____
Crop Oil Conc.(Pet.)	pt	2.74	0.5000	1.37	_____
Surfactant	pt	3.28	0.1000	0.33	_____
CUSTOM FERTILIZE					
App Fert by Air	cwt	7.00	5.0000	35.00	_____
HAULING					
Haul Rice	bu	0.35	156.0000	54.60	_____
DRYING					
Dry Rice	bu	0.40	156.0000	62.40	_____
SURVEY & MARK LEVEES					
Survey & Mark Levees	acre	4.50	0.5000	2.25	_____
CROP CONSULTANT					
Rice Consultant	acre	8.00	1.0000	8.00	_____
SOIL TEST					
Soil Test	acre	10.00	0.3330	3.33	_____
OPERATOR LABOR					
Tractors	hour	13.51	0.5281	7.12	_____
Harvesters	hour	13.51	0.1760	2.38	_____
IRRIGATE LABOR					
Special Labor	hour	9.06	1.1250	10.18	_____
Implements	hour	9.06	0.0375	0.34	_____
HAND LABOR					
Special Labor	hour	9.06	0.2500	2.27	_____
Implements	hour	9.06	0.0785	0.71	_____
RICE MGT. LABOR					
Special Labor	hour	9.06	0.7000	6.34	_____
UNALLOCATED LABOR					
	hour	13.50	0.5389	7.28	_____
DIESEL FUEL					
Tractors	gal	1.80	5.8180	10.50	_____
Harvesters	gal	1.80	2.9444	5.30	_____
Flood Irr.	gal	1.80	18.7364	33.73	_____
REPAIR & MAINTENANCE					
Implements	acre	7.99	1.0000	7.99	_____
Tractors	acre	3.27	1.0000	3.27	_____
Harvesters	acre	6.51	1.0000	6.51	_____
Flood Irr.	acre	13.46	1.0000	13.46	_____
INTEREST ON OP. CAP.	acre	11.34	1.0000	11.34	_____
TOTAL DIRECT EXPENSES				661.33	_____
FIXED EXPENSES					
Implements	acre	17.29	1.0000	17.29	_____
Tractors	acre	20.64	1.0000	20.64	_____
Harvesters	acre	25.68	1.0000	25.68	_____
Flood Irr.	acre	66.58	1.0000	66.58	_____
TOTAL FIXED EXPENSES				130.19	_____
TOTAL SPECIFIED EXPENSES				791.52	_____

Note: Cost of production estimates are based on 2017 input prices.

Fertilization decisions should be based on soil tests.

Soil test cost is prorated for a test every 3rd year.

Table 31.B Summary of estimated costs and returns per acre
 Straight levee rice
 Multi inlet flood irrigated, 23 ac-in., Delta Area, Mississippi, 2018

ITEM	UNIT	PRICE	QUANTITY	AMOUNT	YOUR FARM
		dollars		dollars	
INCOME					
Rice	bu	4.90	156.0000	764.40	_____

TOTAL INCOME				764.40	_____
DIRECT EXPENSES					
CUSTOM SPRAY	acre	43.25	1.0000	43.25	_____
FERTILIZERS	acre	81.00	1.0000	81.00	_____
FUNGICIDES	acre	20.78	1.0000	20.78	_____
HERBICIDES	acre	151.16	1.0000	151.16	_____
INSECTICIDES	acre	8.22	1.0000	8.22	_____
IRRIGATION SUPPLIES	acre	8.25	1.0000	8.25	_____
SEED/PLANTS	acre	45.19	1.0000	45.19	_____
ADJUVANTS	acre	9.18	1.0000	9.18	_____
CUSTOM FERTILIZE	acre	35.00	1.0000	35.00	_____
HAULING	acre	54.60	1.0000	54.60	_____
DRYING	acre	62.40	1.0000	62.40	_____
SURVEY & MARK LEVEES	acre	2.25	1.0000	2.25	_____
CROP CONSULTANT	acre	8.00	1.0000	8.00	_____
SOIL TEST	acre	3.33	1.0000	3.33	_____
HAND LABOR	hour	9.06	0.3285	2.98	_____
IRRIGATE LABOR	hour	9.06	1.1625	10.52	_____
OPERATOR LABOR	hour	13.51	0.7041	9.50	_____
RICE MGT. LABOR	hour	9.06	0.7000	6.34	_____
UNALLOCATED LABOR	hour	13.50	0.5389	7.28	_____
DIESEL FUEL	gal	1.80	27.4990	49.53	_____
REPAIR & MAINTENANCE	acre	31.23	1.0000	31.23	_____
INTEREST ON OP. CAP.	acre	11.34	1.0000	11.34	_____

TOTAL DIRECT EXPENSES				661.33	_____
RETURNS ABOVE DIRECT EXPENSES				103.07	_____
TOTAL FIXED EXPENSES				130.19	_____

TOTAL SPECIFIED EXPENSES				791.52	_____
RETURNS ABOVE TOTAL SPECIFIED EXPENSES				-27.12	_____

Note: Cost of production estimates are based on 2017 input prices.

Fertilization decisions should be based on soil tests.

Soil test cost is prorated for a test every 3rd year.

Table 31.C Estimated resource use for field operations, per acre
 Straight levee rice
 Multi inlet flood irrigated, 23 ac-in., Delta Area, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	POWER UNIT SIZE	PERF RATE	TIMES OVER	MTH	INPUT AMOUNT	IMPLEMENT	POWER UNIT	ALLOC LABOR	UNALL LABOR
-----hours-----										
Soil Test	acre			0.33	Oct	0.3330				
Field Cultivate Fld	32'	MFWD 225	0.046	2.00	Oct		0.09	0.09	0.09	0.08
Harrow - Folding	40'	MFWD 225	0.038	1.00	Oct		0.03	0.03	0.03	0.03
App by Air (5 gal)	appl			1.00	Feb	1.0000				
Glyphosate 3lbs a.e	oz					48.0000				
2,4-D Amine 4	pt					2.0000				
Grain Drill	24'	MFWD 225	0.078	1.00	Apr		0.07	0.07	0.15	0.07
Rice Seed Conv.	lb					75.0000				
Rice Seed Trt/Insect	lbseed					75.0000				
Roller/Cultipacker	30'	MFWD 225	0.049	1.00	Apr		0.04	0.04	0.04	0.04
App by Air (5 gal)	appl			1.00	Apr	1.0000				
Glyphosate 3lbs a.e	oz					32.0000				
Command 3ME	pt					1.0000				
Sharpen	oz					2.0000				
Class Act NG	pt					0.5000				
MSO	pt					0.5000				
Seed Levees				1.00	Apr					
Rice Seed Cv (Levees)	lb					13.6000				
Rice Seed Trt/Insect	lbseed					13.6000				
Rice Consultant	acre			1.00	May	1.0000				
App Fert by Air	cwt			1.00	May	1.0000				
Amm Sulfate (21% N)	cwt					0.5000				
DAP	cwt					0.5000				
App by Air (5 gal)	appl			1.00	May	1.0000				
Regiment	oz					0.6000				
Dyne-A-Pak	pt					0.5000				
App Fert by Air	cwt			1.00	May	2.5000				
Urea, Solid (46% N)	cwt					2.5000				
NBPT	pt					0.7500				
Rice Management				1.00	May					
RICE MGT. LABOR	hour								0.10	
App by Air (5 gal)	appl			1.00	May	1.0000				
Facet L	pt					2.6900				
Permit	oz					0.7500				
Crop Oil Conc. (Pet.)	pt					0.5000				
App by Air (5 gal)	appl			0.50	Jun	0.5000				
Clincher SF	oz					7.5000				
MSO	pt					1.0000				
Rice Management				1.00	Jun					
RICE MGT. LABOR	hour								0.20	
App Fert by Air	cwt			1.00	Jun	1.5000				
Urea, Solid (46% N)	cwt					1.5000				
Rice Management				1.00	Jul					
RICE MGT. LABOR	hour								0.20	
App by Air (5 gal)	appl			1.00	Jul	1.0000				
Stratego	pt					1.1875				
Surfactant	pt					0.1000				
App by Air (3 gal)	appl			1.50	Jul	1.5000				
Karate Z	oz					3.0000				
Rice Management				1.00	Aug					
RICE MGT. LABOR	hour								0.20	
Header - Draper (SL)	25' Rigid	325 hp	0.176	1.00	Aug		0.17	0.17	0.17	0.15
Grain Cart Rice	700 bu	MFWD 225	0.055	0.20	Aug		0.01	0.01	0.01	0.00
Handling & Storage				1.00	Aug					
HAND LABOR	hour								0.25	
Haul Rice	bu			1.00	Aug	156.0000				
Dry Rice	bu			1.00	Aug	156.0000				
Disk Heavy	28'	MFWD 225	0.075	2.00	Sep		0.15	0.15	0.15	0.13
Flood Irr.	acre				Jan	1.0000	0.10	0.10	1.26	
TOTALS							0.70	0.70	2.89	0.53

Note: Cost of production estimates are based on 2017 input prices.
Fertilization decisions should be based on soil tests.
Soil test cost is prorated for a test every 3rd year.

Table 31.D Estimated costs for field operations, per acre
 Straight levee rice
 Multi inlet flood irrigated, 23 ac-in., Delta Area, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	-----DIRECT COST-----							FIXED COST	TOTAL COST
		OP INPUT	FUEL	R&M	LABOR	LEASE	INTER	TOTAL		
-----dollars-----										
Soil Test	acre	3.33						0.16	3.49	3.49
Field Cultivate Fld	32'		1.95	1.51	2.39			0.28	6.13	7.66
Harrow - Folding	40'		0.81	0.51	0.99			0.11	2.42	1.99
App by Air (5 gal)	appl	6.50						0.21	6.71	6.71
Glyphosate 3lbs a.e	oz	6.72						0.21	6.93	6.93
2,4-D Amine 4	pt	4.80						0.15	4.95	4.95
Grain Drill	24'		1.64	2.38	2.73			0.16	6.91	6.80
Rice Seed Conv.	lb	21.00						0.50	21.50	21.50
Rice Seed Trt/Insect	lbseed	17.25						0.41	17.66	17.66
Roller/Cultipacker	30'		1.04	0.55	1.28			0.07	2.94	2.37
App by Air (5 gal)	appl	6.50						0.15	6.65	6.65
Glyphosate 3lbs a.e	oz	4.48						0.11	4.59	4.59
Command 3ME	pt	19.93						0.47	20.40	20.40
Sharpen	oz	12.90						0.31	13.21	13.21
Class Act NG	pt	1.19						0.03	1.22	1.22
MSO	pt	1.31						0.03	1.34	1.34
Seed Levees										
Rice Seed Cv(Levees)	lb	3.81						0.09	3.90	3.90
Rice Seed Trt/Insect	lbseed	3.13						0.07	3.20	3.20
Rice Consultant	acre	8.00						0.16	8.16	8.16
App Fert by Air	cwt	7.00						0.14	7.14	7.14
Amm Sulfate (21% N)	cwt	6.72						0.13	6.85	6.85
DAP	cwt	10.76						0.21	10.97	10.97
App by Air (5 gal)	appl	6.50						0.13	6.63	6.63
Regiment	oz	26.94						0.53	27.47	27.47
Dyne-A-Pak	pt	2.37						0.05	2.42	2.42
App Fert by Air	cwt	17.50						0.35	17.85	17.85
Urea, Solid (46% N)	cwt	35.48						0.70	36.18	36.18
NBPT	pt	6.75						0.13	6.88	6.88
Rice Management										
RICE MGT. LABOR	hour				0.91			0.02	0.93	0.93
App by Air (5 gal)	appl	6.50						0.13	6.63	6.63
Facet L	pt	41.02						0.81	41.83	41.83
Permit	oz	16.82						0.33	17.15	17.15
Crop Oil Conc.(Pet.)	pt	1.37						0.03	1.40	1.40
App by Air (5 gal)	appl	3.25						0.05	3.30	3.30
Clincher SF	oz	17.55						0.28	17.83	17.83
MSO	pt	2.61						0.04	2.65	2.65
Rice Management										
RICE MGT. LABOR	hour				1.81			0.03	1.84	1.84
App Fert by Air	cwt	10.50						0.17	10.67	10.67
Urea, Solid (46% N)	cwt	21.29						0.34	21.63	21.63
Rice Management										
RICE MGT. LABOR	hour				1.81			0.02	1.83	1.83
App by Air (5 gal)	appl	6.50						0.08	6.58	6.58
Stratego	pt	20.78						0.25	21.03	21.03
Surfactant	pt	0.33							0.33	0.33
App by Air (3 gal)	appl	7.50						0.09	7.59	7.59
Karate Z	oz	8.22						0.10	8.32	8.32
Rice Management										
RICE MGT. LABOR	hour				1.81			0.01	1.82	1.82
Header - Draper (SL)	25' Rigid		5.30	8.88	4.52			0.15	18.85	29.39
Grain Cart Rice	700 bu		0.23	0.18	0.28			0.01	0.70	0.64
Handling & Storage										
HAND LABOR	hour				2.27			0.02	2.29	2.29
Haul Rice	bu	54.60						0.43	55.03	55.03
Dry Rice	bu	62.40						0.49	62.89	62.89
Disk Heavy	28'		3.16	3.10	3.88			0.04	10.18	10.70
Flood Irr.	acre	10.50	35.40	14.12	11.94			1.37	73.33	70.64
TOTALS		532.61	49.53	31.23	36.62	0.00	11.34	661.33	130.19	791.52

Note: Cost of production estimates are based on 2017 input prices.

Fertilization decisions should be based on soil tests.

Soil test cost is prorated for a test every 3rd year.

Table 31.E Estimated monthly income and expense flows per acre
 Straight levee rice
 Multi inlet flood irrigated, 23 ac-in., Delta Area, Mississippi, 2018

ITEM	Oct	Nov	Dec	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep
-----dollars-----												
TOTAL INCOME	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	764.40	0.00
DIRECT EXPENSES												
CUSTOM SPRAY	0.00	0.00	0.00	0.00	6.50	0.00	6.50	13.00	3.25	14.00	0.00	0.00
FERTILIZERS	0.00	0.00	0.00	0.00	0.00	0.00	0.00	59.71	21.29	0.00	0.00	0.00
FUNGICIDES	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	20.78	0.00	0.00
HERBICIDES	0.00	0.00	0.00	0.00	11.52	0.00	37.31	84.78	17.55	0.00	0.00	0.00
INSECTICIDES	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	8.22	0.00	0.00
IRRIGATION SUPPLIES	0.00	0.00	0.00	0.00	0.00	0.00	8.25	0.00	0.00	0.00	0.00	0.00
SEED/PLANTS	0.00	0.00	0.00	0.00	0.00	0.00	45.19	0.00	0.00	0.00	0.00	0.00
ADJUVANTS	0.00	0.00	0.00	0.00	0.00	0.00	2.50	3.74	2.61	0.33	0.00	0.00
CUSTOM FERTILIZE	0.00	0.00	0.00	0.00	0.00	0.00	0.00	24.50	10.50	0.00	0.00	0.00
HAULING	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	54.60	0.00
DRYING	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	62.40	0.00
SURVEY & MARK LEVEES	0.00	0.00	0.00	0.00	0.00	0.00	2.25	0.00	0.00	0.00	0.00	0.00
CROP CONSULTANT	0.00	0.00	0.00	0.00	0.00	0.00	0.00	8.00	0.00	0.00	0.00	0.00
SOIL TEST	3.33	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
LABOR	3.38	0.00	0.00	0.00	0.00	0.00	9.54	2.72	3.62	3.62	9.86	3.88
LEASE *	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
FUEL	2.76	0.00	0.00	0.00	0.00	0.00	11.19	8.80	8.80	8.80	6.02	3.16
REPAIR & MAINTENANCE	2.02	0.00	0.00	0.00	0.00	0.00	5.03	7.88	1.97	1.97	9.26	3.10
INTEREST ON OP. CAP.	0.55	0.00	0.00	0.00	0.57	0.00	3.04	4.22	1.11	0.69	1.12	0.04
TOTAL DIRECT EXPENSES	12.04	0.00	0.00	0.00	18.59	0.00	130.80	217.35	70.70	58.41	143.26	10.18
NET INCOME	-12.04	0.00	0.00	0.00	-18.59	0.00	-130.80	-217.35	-70.70	-58.41	621.14	-10.18
NET INCOME TO DATE	-12.04	-12.04	-12.04	-12.04	-30.63	-30.63	-161.43	-378.78	-449.48	-507.89	113.25	103.07

Note: Cost of production estimates are based on 2017 input prices.

Fertilization decisions should be based on soil tests.

Soil test cost is prorated for a test every 3rd year.

* Lease costs are based on hourly usage costs

Table 31.F Estimated returns for various price/yield combinations, per acre
 Straight levee rice
 Multi inlet flood irrigated, 23 ac-in., Delta Area, Mississippi, 2018

PRODUCT			PERCENT										
			75	80	85	90	95	100	105	110	115	120	125
			PRODUCT PRICE										
Rice			3.67	3.92	4.16	4.41	4.65	4.90	5.14	5.39	5.63	5.88	6.12
PERCENT	YIELD	UNIT	dollars										
50	78.00	bu	-315 -445	-296 -426	-277 -407	-258 -388	-239 -369	-220 -350	-201 -331	-181 -312	-162 -293	-143 -273	-124 -254
60	93.60	bu	-270 -400	-247 -377	-224 -354	-201 -331	-178 -308	-155 -285	-132 -262	-109 -239	-86 -216	-63 -193	-40 -171
70	109.20	bu	-224 -354	-197 -328	-171 -301	-144 -274	-117 -247	-90 -221	-64 -194	-37 -167	-10 -140	16 -114	42 -87
80	124.80	bu	-179 -309	-148 -278	-117 -248	-87 -217	-56 -186	-26 -156	4 -125	34 -95	65 -64	96 -34	126 -3
90	140.40	bu	-133 -263	-99 -229	-64 -194	-30 -160	4 -126	38 -91	72 -57	107 -22	141 11	176 45	210 80
100	156.00	bu	-88 -218	-49 -180	-11 -141	26 -103	64 -65	103 -27	141 11	179 49	217 87	255 125	294 163
110	171.60	bu	-42 -172	-0 -130	41 -88	83 -46	125 -4	167 37	209 79	251 121	293 163	335 205	377 247
120	187.20	bu	3 -127	48 -81	94 -35	140 10	186 56	232 102	278 148	324 193	369 239	415 285	461 331
130	202.80	bu	48 -81	98 -31	147 17	197 67	247 117	297 166	346 216	396 266	446 315	495 365	545 415
140	218.40	bu	94 -36	147 17	201 70	254 124	308 177	361 231	415 284	468 338	522 391	575 445	629 499
150	234.00	bu	139 9	196 66	254 124	311 181	368 238	426 296	483 353	540 410	598 468	655 525	712 582

The top number in each cell is Returns Above Direct Expenses.
 The bottom number in each cell is Returns Above Total Specified Expenses.
 Only the product listed has been varied to calculate net returns.
 Note: Cost of production estimates are based on 2017 input prices.

Table 32.A Estimated costs per acre
 Straight levee rice - zero grade
 Flood irrigated, 19 ac-in., Delta Area, Mississippi, 2018

ITEM	UNIT	PRICE	QUANTITY	AMOUNT	YOUR FARM
		dollars		dollars	
DIRECT EXPENSES					
CUSTOM SPRAY					
App by Air (5 gal)	appl	6.50	5.5000	35.75	
App by Air (3 gal)	appl	5.00	1.5000	7.50	
FERTILIZERS					
Amm Sulfate (21% N)	cwt	13.43	0.5000	6.72	
DAP	cwt	21.52	0.5000	10.76	
Urea, Solid (46% N)	cwt	14.19	4.0000	56.76	
NBPT	pt	9.00	0.7500	6.75	
FUNGICIDES					
Stratego	pt	17.50	1.1875	20.78	
HERBICIDES					
Glyphosate 3lbs a.e	oz	0.14	80.0000	11.20	
2,4-D Amine 4	pt	2.40	2.0000	4.80	
Command 3ME	pt	19.93	1.0000	19.93	
Sharpen	oz	6.45	2.0000	12.90	
Regiment	oz	44.90	0.6000	26.94	
Facet L	pt	15.25	2.6900	41.02	
Permit	oz	22.43	0.7500	16.82	
Clincher SF	oz	2.34	7.5000	17.55	
INSECTICIDES					
Karate Z	oz	2.74	3.0000	8.22	
SEED/PLANTS					
Rice Seed Conv.	lb	0.28	75.0000	21.00	
Rice Seed Trt/Insect	lbseed	0.23	75.0000	17.25	
ADJUVANTS					
Class Act NG	pt	2.38	0.5000	1.19	
MSO	pt	2.61	1.5000	3.92	
Dyne-A-Pak	pt	4.73	0.5000	2.37	
Crop Oil Conc. (Pet.)	pt	2.74	0.5000	1.37	
Surfactant	pt	3.28	0.1000	0.33	
CUSTOM FERTILIZE					
App Fert by Air	cwt	7.00	5.0000	35.00	
HAULING					
Haul Rice	bu	0.35	156.0000	54.60	
DRYING					
Dry Rice	bu	0.40	156.0000	62.40	
CROP CONSULTANT					
Rice Consultant	acre	8.00	1.0000	8.00	
SOIL TEST					
Soil Test	acre	10.00	0.3330	3.33	
OPERATOR LABOR					
Tractors	hour	13.51	0.4228	5.70	
Harvesters	hour	13.51	0.1760	2.38	
IRRIGATE LABOR					
Special Labor	hour	9.06	1.0500	9.53	
HAND LABOR					
Special Labor	hour	9.06	0.2500	2.27	
Implements	hour	9.06	0.0785	0.71	
RICE MGT. LABOR					
Special Labor	hour	9.06	0.7000	6.34	
UNALLOCATED LABOR					
	hour	13.50	0.5389	7.28	
DIESEL FUEL					
Tractors	gal	1.80	4.8970	8.83	
Harvesters	gal	1.80	2.9444	5.30	
Flood Irr.	gal	1.80	15.4779	27.86	
REPAIR & MAINTENANCE					
Implements	acre	7.83	1.0000	7.83	
Tractors	acre	2.77	1.0000	2.77	
Harvesters	acre	6.51	1.0000	6.51	
Flood Irr.	acre	11.46	1.0000	11.46	
INTEREST ON OP. CAP.	acre	10.68	1.0000	10.68	
TOTAL DIRECT EXPENSES				630.62	
FIXED EXPENSES					
Implements	acre	16.40	1.0000	16.40	
Tractors	acre	17.47	1.0000	17.47	
Harvesters	acre	25.68	1.0000	25.68	
Flood Irr.	acre	66.25	1.0000	66.25	
TOTAL FIXED EXPENSES				125.80	
TOTAL SPECIFIED EXPENSES				756.42	

Note: Cost of production estimates are based on 2017 input prices.
Fertilization decisions should be based on soil tests.
Soil test cost is prorated for a test every 3rd year.

Table 32.B Summary of estimated costs and returns per acre
 Straight levee rice - zero grade
 Flood irrigated, 19 ac-in., Delta Area, Mississippi, 2018

ITEM	UNIT	PRICE	QUANTITY	AMOUNT	YOUR FARM
		dollars		dollars	
INCOME					
Rice	bu	4.90	156.0000	764.40	_____

TOTAL INCOME				764.40	_____
DIRECT EXPENSES					
CUSTOM SPRAY	acre	43.25	1.0000	43.25	_____
FERTILIZERS	acre	81.00	1.0000	81.00	_____
FUNGICIDES	acre	20.78	1.0000	20.78	_____
HERBICIDES	acre	151.16	1.0000	151.16	_____
INSECTICIDES	acre	8.22	1.0000	8.22	_____
SEED/PLANTS	acre	38.25	1.0000	38.25	_____
ADJUVANTS	acre	9.18	1.0000	9.18	_____
CUSTOM FERTILIZE	acre	35.00	1.0000	35.00	_____
HAULING	acre	54.60	1.0000	54.60	_____
DRYING	acre	62.40	1.0000	62.40	_____
CROP CONSULTANT	acre	8.00	1.0000	8.00	_____
SOIL TEST	acre	3.33	1.0000	3.33	_____
HAND LABOR	hour	9.06	0.3285	2.98	_____
IRRIGATE LABOR	hour	9.06	1.0500	9.53	_____
OPERATOR LABOR	hour	13.51	0.5988	8.08	_____
RICE MGT. LABOR	hour	9.06	0.7000	6.34	_____
UNALLOCATED LABOR	hour	13.50	0.5389	7.28	_____
DIESEL FUEL	gal	1.80	23.3194	41.99	_____
REPAIR & MAINTENANCE	acre	28.57	1.0000	28.57	_____
INTEREST ON OP. CAP.	acre	10.68	1.0000	10.68	_____

TOTAL DIRECT EXPENSES				630.62	_____
RETURNS ABOVE DIRECT EXPENSES				133.78	_____
TOTAL FIXED EXPENSES				125.80	_____

TOTAL SPECIFIED EXPENSES				756.42	_____
RETURNS ABOVE TOTAL SPECIFIED EXPENSES				7.98	_____

Note: Cost of production estimates are based on 2017 input prices.

Fertilization decisions should be based on soil tests.

Soil test cost is prorated for a test every 3rd year.

Table 32.C Estimated resource use for field operations, per acre
 Straight levee rice - zero grade
 Flood irrigated, 19 ac-in., Delta Area, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	POWER UNIT SIZE	PERF RATE	TIMES OVER	MTH	INPUT AMOUNT	IMPLEMENT	POWER UNIT	ALLOC LABOR	UNALL LABOR
						-----hours-----				
Soil Test	acre			0.33	Oct	0.3330				
Field Cultivate Fld	32'	MFWD 225	0.046	2.00	Oct		0.09	0.09	0.09	0.08
Harrow - Folding	40'	MFWD 225	0.038	1.00	Oct		0.03	0.03	0.03	0.03
App by Air (5 gal)	appl			1.00	Feb	1.0000				
Glyphosate 3lbs a.e	oz					48.0000				
2,4-D Amine 4	pt					2.0000				
Grain Drill	24'	MFWD 225	0.078	1.00	Apr		0.07	0.07	0.15	0.07
Rice Seed Conv.	lb					75.0000				
Rice Seed Trt/Insect	lbseed					75.0000				
Roller/Cultipacker	30'	MFWD 225	0.049	1.00	Apr		0.04	0.04	0.04	0.04
App by Air (5 gal)	appl			1.00	Apr	1.0000				
Glyphosate 3lbs a.e	oz					32.0000				
Command 3ME	pt					1.0000				
Sharpen	oz					2.0000				
Class Act NG	pt					0.5000				
MSO	pt					0.5000				
Rice Consultant	acre			1.00	May	1.0000				
App Fert by Air	cwt			1.00	May	1.0000				
Amm Sulfate (21% N)	cwt					0.5000				
DAP	cwt					0.5000				
App by Air (5 gal)	appl			1.00	May	1.0000				
Regiment	oz					0.6000				
Dyne-A-Pak	pt					0.5000				
App Fert by Air	cwt			1.00	May	2.5000				
Urea, Solid (46% N)	cwt					2.5000				
NBPT	pt					0.7500				
Rice Management				1.00	May					
RICE MGT. LABOR	hour								0.10	
App by Air (5 gal)	appl			1.00	May	1.0000				
Facet L	pt					2.6900				
Permit	oz					0.7500				
Crop Oil Conc.(Pet.)	pt					0.5000				
App by Air (5 gal)	appl			0.50	Jun	0.5000				
Clincher SF	oz					7.5000				
MSO	pt					1.0000				
Rice Management				1.00	Jun					
RICE MGT. LABOR	hour								0.20	
App Fert by Air	cwt			1.00	Jun	1.5000				
Urea, Solid (46% N)	cwt					1.5000				
Rice Management				1.00	Jul					
RICE MGT. LABOR	hour								0.20	
App by Air (5 gal)	appl			1.00	Jul	1.0000				
Stratego	pt					1.1875				
Surfactant	pt					0.1000				
App by Air (3 gal)	appl			1.50	Jul	1.5000				
Karate Z	oz					3.0000				
Rice Management				1.00	Aug					
RICE MGT. LABOR	hour								0.20	
Header - Draper (SL)	25' Rigid	325 hp	0.176	1.00	Aug		0.17	0.17	0.17	0.15
Grain Cart Rice	700 bu	MFWD 225	0.055	0.20	Aug		0.01	0.01	0.01	0.00
Handling & Storage				1.00	Aug					
HAND LABOR	hour								0.25	
Haul Rice	bu			1.00	Aug	156.0000				
Dry Rice	bu			1.00	Aug	156.0000				
Disk Heavy	28'	MFWD 225	0.075	2.00	Sep		0.15	0.15	0.15	0.13
Flood Irr.	acre				Jan	1.0000				1.05
TOTALS							0.59	0.59	2.67	0.53

Note: Cost of production estimates are based on 2017 input prices.
Fertilization decisions should be based on soil tests.
Soil test cost is prorated for a test every 3rd year.

Table 32.D Estimated costs for field operations, per acre
 Straight levee rice - zero grade
 Flood irrigated, 19 ac-in., Delta Area, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	-----DIRECT COST-----							FIXED COST	TOTAL COST
		OP INPUT	FUEL	R&M	LABOR	LEASE	INTER	TOTAL		
-----dollars-----										
Soil Test	acre	3.33						0.16	3.49	3.49
Field Cultivate Fld	32'		1.95	1.51	2.39			0.28	6.13	7.66
Harrow - Folding	40'		0.81	0.51	0.99			0.11	2.42	1.99
App by Air (5 gal)	appl	6.50						0.21	6.71	6.71
Glyphosate 3lbs a.e	oz	6.72						0.21	6.93	6.93
2,4-D Amine 4	pt	4.80						0.15	4.95	4.95
Grain Drill	24'		1.64	2.38	2.73			0.16	6.91	6.80
Rice Seed Conv.	lb	21.00						0.50	21.50	21.50
Rice Seed Trt/Insect	lbseed	17.25						0.41	17.66	17.66
Roller/Cultipacker	30'		1.04	0.55	1.28			0.07	2.94	2.37
App by Air (5 gal)	appl	6.50						0.15	6.65	6.65
Glyphosate 3lbs a.e	oz	4.48						0.11	4.59	4.59
Command 3ME	pt	19.93						0.47	20.40	20.40
Sharpen	oz	12.90						0.31	13.21	13.21
Class Act NG	pt	1.19						0.03	1.22	1.22
MSO	pt	1.31						0.03	1.34	1.34
Rice Consultant	acre	8.00						0.16	8.16	8.16
App Fert by Air	cwt	7.00						0.14	7.14	7.14
Amm Sulfate (21% N)	cwt	6.72						0.13	6.85	6.85
DAP	cwt	10.76						0.21	10.97	10.97
App by Air (5 gal)	appl	6.50						0.13	6.63	6.63
Regiment	oz	26.94						0.53	27.47	27.47
Dyne-A-Pak	pt	2.37						0.05	2.42	2.42
App Fert by Air	cwt	17.50						0.35	17.85	17.85
Urea, Solid (46% N)	cwt	35.48						0.70	36.18	36.18
NBPT	pt	6.75						0.13	6.88	6.88
Rice Management										
RICE MGT. LABOR	hour				0.91			0.02	0.93	0.93
App by Air (5 gal)	appl	6.50						0.13	6.63	6.63
Facet L	pt	41.02						0.81	41.83	41.83
Permit	oz	16.82						0.33	17.15	17.15
Crop Oil Conc.(Pet.)	pt	1.37						0.03	1.40	1.40
App by Air (5 gal)	appl	3.25						0.05	3.30	3.30
Clincher SF	oz	17.55						0.28	17.83	17.83
MSO	pt	2.61						0.04	2.65	2.65
Rice Management										
RICE MGT. LABOR	hour				1.81			0.03	1.84	1.84
App Fert by Air	cwt	10.50						0.17	10.67	10.67
Urea, Solid (46% N)	cwt	21.29						0.34	21.63	21.63
Rice Management										
RICE MGT. LABOR	hour				1.81			0.02	1.83	1.83
App by Air (5 gal)	appl	6.50						0.08	6.58	6.58
Stratego	pt	20.78						0.25	21.03	21.03
Surfactant	pt	0.33							0.33	0.33
App by Air (3 gal)	appl	7.50						0.09	7.59	7.59
Karate Z	oz	8.22						0.10	8.32	8.32
Rice Management										
RICE MGT. LABOR	hour				1.81			0.01	1.82	1.82
Header - Draper (SL)	25' Rigid		5.30	8.88	4.52			0.15	18.85	29.39
Grain Cart Rice	700 bu		0.23	0.18	0.28			0.01	0.70	0.64
Handling & Storage										
HAND LABOR	hour				2.27			0.02	2.29	2.29
Haul Rice	bu	54.60						0.43	55.03	55.03
Dry Rice	bu	62.40						0.49	62.89	62.89
Disk Heavy	28'		3.16	3.10	3.88			0.04	10.18	10.70
Flood Irr.	acre		27.86	11.46	9.53			0.87	49.72	66.25
TOTALS			515.17	41.99	28.57	34.21	0.00	10.68	630.62	125.80

Note: Cost of production estimates are based on 2017 input prices.

Fertilization decisions should be based on soil tests.

Soil test cost is prorated for a test every 3rd year.

Table 32.E Estimated monthly income and expense flows per acre
 Straight levee rice - zero grade
 Flood irrigated, 19 ac-in., Delta Area, Mississippi, 2018

ITEM	Oct	Nov	Dec	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep
-----dollars-----												
TOTAL INCOME	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	764.40	0.00
DIRECT EXPENSES												
CUSTOM SPRAY	0.00	0.00	0.00	0.00	6.50	0.00	6.50	13.00	3.25	14.00	0.00	0.00
FERTILIZERS	0.00	0.00	0.00	0.00	0.00	0.00	0.00	59.71	21.29	0.00	0.00	0.00
FUNGICIDES	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	20.78	0.00	0.00
HERBICIDES	0.00	0.00	0.00	0.00	11.52	0.00	37.31	84.78	17.55	0.00	0.00	0.00
INSECTICIDES	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	8.22	0.00	0.00
SEED/PLANTS	0.00	0.00	0.00	0.00	0.00	0.00	38.25	0.00	0.00	0.00	0.00	0.00
ADJUVANTS	0.00	0.00	0.00	0.00	0.00	0.00	2.50	3.74	2.61	0.33	0.00	0.00
CUSTOM FERTILIZE	0.00	0.00	0.00	0.00	0.00	0.00	0.00	24.50	10.50	0.00	0.00	0.00
HAULING	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	54.60	0.00
DRYING	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	62.40	0.00
CROP CONSULTANT	0.00	0.00	0.00	0.00	0.00	0.00	0.00	8.00	0.00	0.00	0.00	0.00
SOIL TEST	3.33	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
LABOR	3.38	0.00	0.00	0.00	0.00	0.00	6.73	3.18	4.08	4.08	8.88	3.88
LEASE *	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
FUEL	2.76	0.00	0.00	0.00	0.00	0.00	8.55	7.33	7.33	7.33	5.53	3.16
REPAIR & MAINTENANCE	2.02	0.00	0.00	0.00	0.00	0.00	4.10	7.37	1.46	1.46	9.06	3.10
INTEREST ON OP. CAP.	0.55	0.00	0.00	0.00	0.57	0.00	2.47	4.18	1.09	0.67	1.11	0.04
TOTAL DIRECT EXPENSES	12.04	0.00	0.00	0.00	18.59	0.00	106.41	215.79	69.16	56.87	141.58	10.18
NET INCOME	-12.04	0.00	0.00	0.00	-18.59	0.00	-106.41	-215.79	-69.16	-56.87	622.82	-10.18
NET INCOME TO DATE	-12.04	-12.04	-12.04	-12.04	-30.63	-30.63	-137.04	-352.83	-421.99	-478.86	143.96	133.78

Note: Cost of production estimates are based on 2017 input prices.

Fertilization decisions should be based on soil tests.

Soil test cost is prorated for a test every 3rd year.

* Lease costs are based on hourly usage costs.

Table 32.F Estimated returns for various price/yield combinations, per acre
 Straight levee rice - zero grade
 Flood irrigated, 19 ac-in., Delta Area, Mississippi, 2018

			PERCENT										
PRODUCT			75	80	85	90	95	100	105	110	115	120	125
			PRODUCT PRICE										
Rice			3.67	3.92	4.16	4.41	4.65	4.90	5.14	5.39	5.63	5.88	6.12
PERCENT	YIELD	UNIT	dollars										
50	78.00	bu	-285 -410	-265 -391	-246 -372	-227 -353	-208 -334	-189 -315	-170 -296	-151 -277	-132 -257	-113 -238	-93 -219
60	93.60	bu	-239 -365	-216 -342	-193 -319	-170 -296	-147 -273	-124 -250	-101 -227	-78 -204	-56 -181	-33 -158	-10 -135
70	109.20	bu	-193 -319	-167 -292	-140 -266	-113 -239	-86 -212	-60 -185	-33 -159	-6 -132	20 -105	46 -78	73 -52
80	124.80	bu	-148 -274	-117 -243	-87 -213	-56 -182	-26 -151	4 -121	35 -90	65 -60	96 -29	126 0	157 31
90	140.40	bu	-102 -228	-68 -194	-34 -159	0 -125	34 -91	69 -56	103 -22	137 12	172 46	206 80	241 115
100	156.00	bu	-57 -183	-19 -144	19 -106	57 -68	95 -30	133 7	172 46	210 84	248 122	286 160	324 199
110	171.60	bu	-11 -137	30 -95	72 -53	114 -11	156 30	198 72	240 114	282 156	324 198	366 240	408 282
120	187.20	bu	33 -92	79 -46	125 -0	171 45	217 91	263 137	308 183	354 229	400 274	446 320	492 366
130	202.80	bu	79 -46	128 3	178 52	228 102	278 152	327 201	377 251	427 301	476 350	526 400	576 450
140	218.40	bu	124 -0	178 52	231 106	285 159	338 213	392 266	445 320	499 373	552 427	606 480	659 534
150	234.00	bu	170 44	227 101	285 159	342 216	399 273	457 331	514 388	571 445	629 503	686 560	743 617

The top number in each cell is Returns Above Direct Expenses.
 The bottom number in each cell is Returns Above Total Specified Expenses.
 Only the product listed has been varied to calculate net returns.
 Note: Cost of production estimates are based on 2017 input prices.

Table 33.A Estimated costs per acre
 Clearfield contour levee rice
 Flood irrigated, 33 ac-in., Delta Area, Mississippi, 2018

ITEM	UNIT	PRICE	QUANTITY	AMOUNT	YOUR FARM
		dollars		dollars	
DIRECT EXPENSES					
CUSTOM SPRAY					
App by Air (5 gal)	appl	6.50	4.5000	29.25	_____
App by Air (10 gal)	appl	9.00	1.0000	9.00	_____
App by Air (3 gal)	appl	5.00	1.5000	7.50	_____
FERTILIZERS					
Amm Sulfate (21% N)	cwt	13.43	0.5000	6.72	_____
DAP	cwt	21.52	0.5000	10.76	_____
Urea, Solid (46% N)	cwt	14.19	4.0000	56.76	_____
NBPT	pt	9.00	0.7500	6.75	_____
FUNGICIDES					
Stratego	pt	17.50	1.1875	20.78	_____
HERBICIDES					
Glyphosate 3lbs a.e	oz	0.14	80.0000	11.20	_____
2,4-D Amine 4	pt	2.40	2.0000	4.80	_____
Command 3ME	pt	19.93	1.0000	19.93	_____
Sharpen	oz	6.45	2.0000	12.90	_____
Clearpath	lb	61.26	0.5000	30.63	_____
Newpath	oz	3.83	6.0000	22.98	_____
Aim	oz	5.65	1.5000	8.48	_____
Clincher SF	oz	2.34	7.5000	17.55	_____
INSECTICIDES					
Karate Z	oz	2.74	3.0000	8.22	_____
SEED/PLANTS					
Rice Clearfield	lb	0.95	65.0000	61.75	_____
Rice Seed Trt./Insect	lbseed	0.23	77.0000	17.71	_____
Rice Seed CF(Levees)	lb	0.95	12.0000	11.40	_____
ADJUVANTS					
Class Act NG	pt	2.38	0.5000	1.19	_____
MSO	pt	2.61	1.5000	3.92	_____
Crop Oil Conc. (Pet.)	pt	2.74	4.0000	10.96	_____
Surfactant	pt	3.28	0.1000	0.33	_____
CUSTOM FERTILIZE					
App Fert by Air	cwt	7.00	5.0000	35.00	_____
HAULING					
Haul Rice	bu	0.35	156.0000	54.60	_____
DRYING					
Dry Rice	bu	0.40	156.0000	62.40	_____
SURVEY & MARK LEVEES					
Survey & Mark Levees	acre	4.50	1.0000	4.50	_____
CROP CONSULTANT					
Rice Consultant	acre	8.00	1.0000	8.00	_____
SOIL TEST					
Soil Test	acre	10.00	0.3330	3.33	_____
OPERATOR LABOR					
Tractors	hour	13.51	0.5757	7.77	_____
Harvesters	hour	13.51	0.2030	2.74	_____
IRRIGATE LABOR					
Special Labor	hour	9.06	3.5250	31.96	_____
HAND LABOR					
Special Labor	hour	9.06	0.2500	2.27	_____
Implements	hour	9.06	0.0926	0.84	_____
RICE MGT. LABOR					
Special Labor	hour	9.06	1.5000	13.59	_____
UNALLOCATED LABOR					
	hour	13.50	0.5887	7.95	_____
DIESEL FUEL					
Tractors	gal	1.80	6.3153	11.38	_____
Harvesters	gal	1.80	3.3975	6.12	_____
Flood Irr.	gal	1.80	26.8827	48.40	_____
REPAIR & MAINTENANCE					
Implements	acre	8.60	1.0000	8.60	_____
Tractors	acre	3.56	1.0000	3.56	_____
Harvesters	acre	7.51	1.0000	7.51	_____
Flood Irr.	acre	13.79	1.0000	13.79	_____
INTEREST ON OP. CAP.	acre	12.99	1.0000	12.99	_____
TOTAL DIRECT EXPENSES				738.78	_____
FIXED EXPENSES					
Implements	acre	18.05	1.0000	18.05	_____
Tractors	acre	22.39	1.0000	22.39	_____
Harvesters	acre	29.63	1.0000	29.63	_____
Flood Irr.	acre	43.00	1.0000	43.00	_____
TOTAL FIXED EXPENSES				113.07	_____
TOTAL SPECIFIED EXPENSES				851.85	_____

Note: Cost of production estimates are based on 2017 input prices.
Fertilization decisions should be based on soil tests.
Soil test cost is prorated for a test every 3rd year.

Table 33.B Summary of estimated costs and returns per acre
 Clearfield contour levee rice
 Flood irrigated, 33 ac-in., Delta Area, Mississippi, 2018

ITEM	UNIT	PRICE	QUANTITY	AMOUNT	YOUR FARM
		dollars		dollars	
INCOME					
Rice	bu	4.90	156.0000	764.40	_____

TOTAL INCOME				764.40	_____
DIRECT EXPENSES					
CUSTOM SPRAY	acre	45.75	1.0000	45.75	_____
FERTILIZERS	acre	81.00	1.0000	81.00	_____
FUNGICIDES	acre	20.78	1.0000	20.78	_____
HERBICIDES	acre	128.47	1.0000	128.47	_____
INSECTICIDES	acre	8.22	1.0000	8.22	_____
SEED/PLANTS	acre	90.86	1.0000	90.86	_____
ADJUVANTS	acre	16.40	1.0000	16.40	_____
CUSTOM FERTILIZE	acre	35.00	1.0000	35.00	_____
HAULING	acre	54.60	1.0000	54.60	_____
DRYING	acre	62.40	1.0000	62.40	_____
SURVEY & MARK LEVEES	acre	4.50	1.0000	4.50	_____
CROP CONSULTANT	acre	8.00	1.0000	8.00	_____
SOIL TEST	acre	3.33	1.0000	3.33	_____
HAND LABOR	hour	9.06	0.3426	3.11	_____
IRRIGATE LABOR	hour	9.06	3.5250	31.96	_____
OPERATOR LABOR	hour	13.51	0.7788	10.51	_____
RICE MGT. LABOR	hour	9.06	1.5000	13.59	_____
UNALLOCATED LABOR	hour	13.50	0.5887	7.95	_____
DIESEL FUEL	gal	1.80	36.5955	65.90	_____
REPAIR & MAINTENANCE	acre	33.46	1.0000	33.46	_____
INTEREST ON OP. CAP.	acre	12.99	1.0000	12.99	_____

TOTAL DIRECT EXPENSES				738.78	_____
RETURNS ABOVE DIRECT EXPENSES				25.62	_____
TOTAL FIXED EXPENSES				113.07	_____

TOTAL SPECIFIED EXPENSES				851.85	_____
RETURNS ABOVE TOTAL SPECIFIED EXPENSES				-87.45	_____

Note: Cost of production estimates are based on 2017 input prices.

Fertilization decisions should be based on soil tests.

Soil test cost is prorated for a test every 3rd year.

Table 33.C Estimated resource use for field operations, per acre
 Clearfield contour levee rice
 Flood irrigated, 33 ac-in., Delta Area, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	POWER UNIT SIZE	PERF RATE	TIMES OVER	MTH	INPUT AMOUNT	IMPLEMENT	POWER UNIT	ALLOC LABOR	UNALL LABOR
-----hours-----										
Soil Test	acre			0.33	Oct	0.3330				
Field Cultivate Fld	32'	MFWD 225	0.046	2.00	Oct		0.09	0.09	0.09	0.08
Harrow - Folding	40'	MFWD 225	0.038	1.00	Oct		0.03	0.03	0.03	0.03
App by Air (5 gal)	appl			1.00	Feb	1.0000				
Glyphosate 3lbs a.e	oz					48.0000				
2,4-D Amine 4	pt					2.0000				
Grain Drill	24'	MFWD 225	0.078	1.00	Apr		0.07	0.07	0.15	0.07
Rice Clearfield	lb					65.0000				
Rice Seed Trt/Insect	lbseed					65.0000				
Roller/Cultipacker	30'	MFWD 225	0.049	1.00	Apr		0.04	0.04	0.04	0.04
Spray (Broadcast)	60'	MFWD 225	0.028	1.00	Apr		0.02	0.02	0.04	0.02
App by Air (5 gal)	appl					1.0000				
Glyphosate 3lbs a.e	oz					32.0000				
Command 3ME	pt					1.0000				
Sharpen	oz					2.0000				
Class Act NG	pt					0.5000				
MSO	pt					0.5000				
Seed Levees				1.00	Apr					
Rice Seed CF(Levees)	lb					12.0000				
Rice Seed Trt/Insect	lbseed					12.0000				
App by Air (5 gal)	appl			1.00	Apr	1.0000				
Clearpath	lb					0.5000				
Crop Oil Conc.(Pet.)	pt					2.0000				
App Fert by Air	cwt			1.00	May	1.0000				
Amm Sulfate (21% N)	cwt					0.5000				
DAP	cwt					0.5000				
Rice Consultant	acre			1.00	May	1.0000				
App Fert by Air	cwt			1.00	May	2.5000				
Urea, Solid (46% N)	cwt					2.5000				
NBPT	pt					0.7500				
App by Air (10 gal)	appl			1.00	May	1.0000				
Newpath	oz					6.0000				
Crop Oil Conc.(Pet.)	pt					2.0000				
Aim	oz					1.5000				
Rice Management				1.00	May					
RICE MGT. LABOR	hour								0.30	
App by Air (5 gal)	appl			0.50	Jun	0.5000				
Clincher SF	oz					7.5000				
MSO	pt					1.0000				
Rice Management				1.00	Jun					
RICE MGT. LABOR	hour								0.50	
App Fert by Air	cwt			1.00	Jun	1.5000				
Urea, Solid (46% N)	cwt					1.5000				
Rice Management				1.00	Jul					
RICE MGT. LABOR	hour								0.50	
App by Air (5 gal)	appl			1.00	Jul	1.0000				
Stratego	pt					1.1875				
Surfactant	pt					0.1000				
App by Air (3 gal)	appl			1.50	Jul	1.5000				
Karate Z	oz					3.0000				
Rice Management				1.00	Aug					
RICE MGT. LABOR	hour								0.20	
Header - Draper (CL)	25' Rigid	325 hp	0.203	1.00	Aug		0.20	0.20	0.20	0.18
Grain Cart Rice	700 bu	MFWD 225	0.055	0.20	Aug		0.01	0.01	0.01	0.00
Handling & Storage				1.00	Aug					
HAND LABOR	hour								0.25	
Haul Rice	bu			1.00	Aug	156.0000				
Dry Rice	bu			1.00	Aug	156.0000				
Disk Heavy	28'	MFWD 225	0.075	2.00	Sep		0.15	0.15	0.15	0.13
Flood Irr.	acre				Jan	1.0000	0.12	0.12	3.64	
TOTALS							0.77	0.77	6.14	0.58

Note: Cost of production estimates are based on 2017 input prices.
Fertilization decisions should be based on soil tests.
Soil test cost is prorated for a test every 3rd year.

Table 33.D Estimated costs for field operations, per acre
 Clearfield contour levee rice
 Flood irrigated, 33 ac-in., Delta Area, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	-----DIRECT COST-----							FIXED COST	TOTAL COST
		OP INPUT	FUEL	R&M	LABOR	LEASE	INTER	TOTAL		
-----dollars-----										
Soil Test	acre	3.33						0.16	3.49	3.49
Field Cultivate Fld	32'		1.95	1.51	2.39			0.28	6.13	7.66
Harrow - Folding	40'		0.81	0.51	0.99			0.11	2.42	1.99
App by Air (5 gal)	appl	6.50						0.21	6.71	6.71
Glyphosate 3lbs a.e	oz	6.72						0.21	6.93	6.93
2,4-D Amine 4	pt	4.80						0.15	4.95	4.95
Grain Drill	24'		1.64	2.38	2.73			0.16	6.91	6.80
Rice Clearfield	lb	61.75						1.47	63.22	63.22
Rice Seed Trt/Insect	lbseed	14.95						0.36	15.31	15.31
Roller/Cultipacker	30'		1.04	0.55	1.28			0.07	2.94	2.37
Spray (Broadcast)	60'		0.59	0.43	0.85			0.04	1.91	1.45
App by Air (5 gal)	appl	6.50						0.15	6.65	6.65
Glyphosate 3lbs a.e	oz	4.48						0.11	4.59	4.59
Command 3ME	pt	19.93						0.47	20.40	20.40
Sharpen	oz	12.90						0.31	13.21	13.21
Class Act NG	pt	1.19						0.03	1.22	1.22
MSO	pt	1.31						0.03	1.34	1.34
Seed Levees										
Rice Seed CF(Levees)	lb	11.40						0.27	11.67	11.67
Rice Seed Trt/Insect	lbseed	2.76						0.07	2.83	2.83
App by Air (5 gal)	appl	6.50						0.15	6.65	6.65
Clearpath	lb	30.63						0.73	31.36	31.36
Crop Oil Conc.(Pet.)	pt	5.48						0.13	5.61	5.61
App Fert by Air	cwt	7.00						0.14	7.14	7.14
Amm Sulfate (21% N)	cwt	6.72						0.13	6.85	6.85
DAP	cwt	10.76						0.21	10.97	10.97
Rice Consultant	acre	8.00						0.16	8.16	8.16
App Fert by Air	cwt	17.50						0.35	17.85	17.85
Urea, Solid (46% N)	cwt	35.48						0.70	36.18	36.18
NBPT	pt	6.75						0.13	6.88	6.88
App by Air (10 gal)	appl	9.00						0.18	9.18	9.18
Newpath	oz	22.98						0.45	23.43	23.43
Crop Oil Conc.(Pet.)	pt	5.48						0.11	5.59	5.59
Aim	oz	8.48						0.17	8.65	8.65
Rice Management										
RICE MGT. LABOR	hour				2.72			0.05	2.77	2.77
App by Air (5 gal)	appl	3.25						0.05	3.30	3.30
Clincher SF	oz	17.55						0.28	17.83	17.83
MSO	pt	2.61						0.04	2.65	2.65
Rice Management										
RICE MGT. LABOR	hour				4.53			0.07	4.60	4.60
App Fert by Air	cwt	10.50						0.17	10.67	10.67
Urea, Solid (46% N)	cwt	21.29						0.34	21.63	21.63
Rice Management										
RICE MGT. LABOR	hour				4.53			0.05	4.58	4.58
App by Air (5 gal)	appl	6.50						0.08	6.58	6.58
Stratego	pt	20.78						0.25	21.03	21.03
Surfactant	pt	0.33							0.33	0.33
App by Air (3 gal)	appl	7.50						0.09	7.59	7.59
Karate Z	oz	8.22						0.10	8.32	8.32
Rice Management										
RICE MGT. LABOR	hour				1.81			0.01	1.82	1.82
Header - Draper (CL)	25' Rigid		6.12	10.25	5.21			0.17	21.75	33.91
Grain Cart Rice	700 bu		0.23	0.18	0.28			0.01	0.70	0.64
Handling & Storage										
HAND LABOR	hour				2.27			0.02	2.29	2.29
Haul Rice	bu	54.60						0.43	55.03	55.03
Dry Rice	bu	62.40						0.49	62.89	62.89
Disk Heavy	28'		3.16	3.10	3.88			0.04	10.18	10.70
Flood Irr.	acre	4.50	50.36	14.55	33.65			1.85	104.91	47.55
TOTALS		559.31	65.90	33.46	67.12	0.00	12.99	738.78	113.07	851.85

Note: Cost of production estimates are based on 2017 input prices.

Fertilization decisions should be based on soil tests.

Soil test cost is prorated for a test every 3rd year.

Table 33.E Estimated monthly income and expense flows per acre
 Clearfield contour levee rice
 Flood irrigated, 33 ac-in., Delta Area, Mississippi, 2018

ITEM	Oct	Nov	Dec	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep
-----dollars-----												
TOTAL INCOME	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	764.40	0.00
DIRECT EXPENSES												
CUSTOM SPRAY	0.00	0.00	0.00	0.00	6.50	0.00	13.00	9.00	3.25	14.00	0.00	0.00
FERTILIZERS	0.00	0.00	0.00	0.00	0.00	0.00	0.00	59.71	21.29	0.00	0.00	0.00
FUNGICIDES	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	20.78	0.00	0.00
HERBICIDES	0.00	0.00	0.00	0.00	11.52	0.00	67.94	31.46	17.55	0.00	0.00	0.00
INSECTICIDES	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	8.22	0.00	0.00
SEED/PLANTS	0.00	0.00	0.00	0.00	0.00	0.00	90.86	0.00	0.00	0.00	0.00	0.00
ADJUVANTS	0.00	0.00	0.00	0.00	0.00	0.00	7.98	5.48	2.61	0.33	0.00	0.00
CUSTOM FERTILIZE	0.00	0.00	0.00	0.00	0.00	0.00	0.00	24.50	10.50	0.00	0.00	0.00
HAULING	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	54.60	0.00
DRYING	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	62.40	0.00
SURVEY & MARK LEVEES	0.00	0.00	0.00	0.00	0.00	0.00	4.50	0.00	0.00	0.00	0.00	0.00
CROP CONSULTANT	0.00	0.00	0.00	0.00	0.00	0.00	0.00	8.00	0.00	0.00	0.00	0.00
SOIL TEST	3.33	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
LABOR	3.38	0.00	0.00	0.00	0.00	0.00	16.58	9.52	11.33	11.33	11.10	3.88
LEASE *	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
FUEL	2.76	0.00	0.00	0.00	0.00	0.00	13.31	13.20	13.20	13.20	7.07	3.16
REPAIR & MAINTENANCE	2.02	0.00	0.00	0.00	0.00	0.00	5.26	8.06	2.15	2.15	10.72	3.10
INTEREST ON OP. CAP.	0.55	0.00	0.00	0.00	0.57	0.00	5.22	3.33	1.30	0.83	1.15	0.04
TOTAL DIRECT EXPENSES	12.04	0.00	0.00	0.00	18.59	0.00	224.65	172.26	83.18	70.84	147.04	10.18
NET INCOME	-12.04	0.00	0.00	0.00	-18.59	0.00	-224.65	-172.26	-83.18	-70.84	617.36	-10.18
NET INCOME TO DATE	-12.04	-12.04	-12.04	-12.04	-30.63	-30.63	-255.28	-427.54	-510.72	-581.56	35.80	25.62

Note: Cost of production estimates are based on 2017 input prices.

Fertilization decisions should be based on soil tests.

Soil test cost is prorated for a test every 3rd year.

* Lease costs are based on hourly usage costs

Table 33.F Estimated returns for various price/yield combinations, per acre
 Clearfield contour levee rice
 Flood irrigated, 33 ac-in., Delta Area, Mississippi, 2018

PRODUCT			PERCENT										
			75	80	85	90	95	100	105	110	115	120	125
			PRODUCT PRICE										
Rice			3.67	3.92	4.16	4.41	4.65	4.90	5.14	5.39	5.63	5.88	6.12
PERCENT	YIELD	UNIT	dollars										
50	78.00	bu	-393 -506	-374 -487	-354 -468	-335 -448	-316 -429	-297 -410	-278 -391	-259 -372	-240 -353	-221 -334	-202 -315
60	93.60	bu	-347 -460	-324 -437	-301 -414	-278 -391	-255 -368	-232 -346	-210 -323	-187 -300	-164 -277	-141 -254	-118 -231
70	109.20	bu	-302 -415	-275 -388	-248 -361	-221 -334	-195 -308	-168 -281	-141 -254	-114 -227	-88 -201	-61 -174	-34 -147
80	124.80	bu	-256 -369	-225 -339	-195 -308	-164 -277	-134 -247	-103 -216	-73 -186	-42 -155	-11 -125	18 -94	49 -63
90	140.40	bu	-211 -324	-176 -289	-142 -255	-107 -220	-73 -186	-39 -152	-4 -117	29 -83	64 -48	98 -14	132 19
100	156.00	bu	-165 -278	-127 -240	-89 -202	-50 -163	-12 -125	25 -87	63 -49	102 -11	140 27	178 65	216 103
110	171.60	bu	-119 -233	-77 -190	-35 -148	6 -106	48 -64	90 -22	132 19	174 61	216 103	258 145	300 187
120	187.20	bu	-74 -187	-28 -141	17 -95	63 -49	109 -4	154 41	200 87	246 133	292 179	338 225	384 271
130	202.80	bu	-28 -141	20 -92	70 -42	120 7	169 56	219 106	269 156	318 205	368 255	418 305	467 354
140	218.40	bu	16 -96	70 -42	123 10	177 64	230 117	284 171	337 224	391 278	444 331	498 385	551 438
150	234.00	bu	62 -50	119 6	176 63	234 121	291 178	348 235	406 293	463 350	520 407	578 465	635 522

The top number in each cell is Returns Above Direct Expenses.
 The bottom number in each cell is Returns Above Total Specified Expenses.
 Only the product listed has been varied to calculate net returns.
 Note: Cost of production estimates are based on 2017 input prices.

Table 34.A Estimated costs per acre
 Clearfield straight levee rice
 Flood irrigated, 27 ac-in., Delta Area, Mississippi, 2018

ITEM	UNIT	PRICE	QUANTITY	AMOUNT	YOUR FARM
		dollars		dollars	
DIRECT EXPENSES					
CUSTOM SPRAY					
App by Air (5 gal)	appl	6.50	4.5000	29.25	_____
App by Air (10 gal)	appl	9.00	1.0000	9.00	_____
App by Air (3 gal)	appl	5.00	1.5000	7.50	_____
FERTILIZERS					
Amm Sulfate (21% N)	cwt	13.43	0.5000	6.72	_____
DAP	cwt	21.52	0.5000	10.76	_____
Urea, Solid (46% N)	cwt	14.19	4.0000	56.76	_____
NBPT	pt	9.00	0.7500	6.75	_____
FUNGICIDES					
Stratego	pt	17.50	1.1875	20.78	_____
HERBICIDES					
Glyphosate 3lbs a.e	oz	0.14	80.0000	11.20	_____
2,4-D Amine 4	pt	2.40	2.0000	4.80	_____
Command 3ME	pt	19.93	1.0000	19.93	_____
Sharpen	oz	6.45	2.0000	12.90	_____
Clearpath	lb	61.26	0.5000	30.63	_____
Newpath	oz	3.83	6.0000	22.98	_____
Aim	oz	5.65	1.5000	8.48	_____
Clincher SF	oz	2.34	7.5000	17.55	_____
INSECTICIDES					
Karate Z	oz	2.74	3.0000	8.22	_____
SEED/PLANTS					
Rice Clearfield	lb	0.95	65.0000	61.75	_____
Rice Seed Trt/Insect	lbseed	0.23	77.0000	17.71	_____
Rice Seed CF(Levees)	lb	0.95	12.0000	11.40	_____
ADJUVANTS					
MSO	pt	2.61	1.5000	3.92	_____
Class Act NG	pt	2.38	0.5000	1.19	_____
Crop Oil Conc. (Pet.)	pt	2.74	4.0000	10.96	_____
Surfactant	pt	3.28	0.1000	0.33	_____
CUSTOM FERTILIZE					
App Fert by Air	cwt	7.00	5.0000	35.00	_____
HAULING					
Haul Rice	bu	0.35	156.0000	54.60	_____
DRYING					
Dry Rice	bu	0.40	156.0000	62.40	_____
SURVEY & MARK LEVEES					
Survey & Mark Levees	acre	4.50	0.5000	2.25	_____
CROP CONSULTANT					
Rice Consultant	acre	8.00	1.0000	8.00	_____
SOIL TEST					
Soil Test	acre	10.00	0.3330	3.33	_____
OPERATOR LABOR					
Tractors	hour	13.51	0.5281	7.12	_____
Harvesters	hour	13.51	0.1760	2.38	_____
IRRIGATE LABOR					
Special Labor	hour	9.06	2.3750	21.52	_____
HAND LABOR					
Special Labor	hour	9.06	0.2500	2.27	_____
Implements	hour	9.06	0.0926	0.84	_____
RICE MGT. LABOR					
Special Labor	hour	9.06	0.7000	6.34	_____
UNALLOCATED LABOR					
	hour	13.50	0.5643	7.62	_____
DIESEL FUEL					
Tractors	gal	1.80	5.8986	10.64	_____
Harvesters	gal	1.80	2.9444	5.30	_____
Flood Irr.	gal	1.80	21.9949	39.58	_____
REPAIR & MAINTENANCE					
Implements	acre	8.17	1.0000	8.17	_____
Tractors	acre	3.33	1.0000	3.33	_____
Harvesters	acre	6.51	1.0000	6.51	_____
Flood Irr.	acre	13.78	1.0000	13.78	_____
INTEREST ON OP. CAP.	acre	12.47	1.0000	12.47	_____
TOTAL DIRECT EXPENSES				704.93	_____
FIXED EXPENSES					
Implements	acre	17.12	1.0000	17.12	_____
Tractors	acre	20.96	1.0000	20.96	_____
Harvesters	acre	25.68	1.0000	25.68	_____
Flood Irr.	acre	66.91	1.0000	66.91	_____
TOTAL FIXED EXPENSES				130.67	_____
TOTAL SPECIFIED EXPENSES				835.60	_____

Note: Cost of production estimates are based on 2017 input prices.
Fertilization decisions should be based on soil tests.
Soil test cost is prorated for a test every 3rd year.

Table 34.B Summary of estimated costs and returns per acre
 Clearfield straight levee rice
 Flood irrigated, 27 ac-in., Delta Area, Mississippi, 2018

ITEM	UNIT	PRICE	QUANTITY	AMOUNT	YOUR FARM
		dollars		dollars	
INCOME					
Rice	bu	4.90	156.0000	764.40	_____

TOTAL INCOME				764.40	_____
DIRECT EXPENSES					
CUSTOM SPRAY	acre	45.75	1.0000	45.75	_____
FERTILIZERS	acre	81.00	1.0000	81.00	_____
FUNGICIDES	acre	20.78	1.0000	20.78	_____
HERBICIDES	acre	128.47	1.0000	128.47	_____
INSECTICIDES	acre	8.22	1.0000	8.22	_____
SEED/PLANTS	acre	90.86	1.0000	90.86	_____
ADJUVANTS	acre	16.40	1.0000	16.40	_____
CUSTOM FERTILIZE	acre	35.00	1.0000	35.00	_____
HAULING	acre	54.60	1.0000	54.60	_____
DRYING	acre	62.40	1.0000	62.40	_____
SURVEY & MARK LEVEES	acre	2.25	1.0000	2.25	_____
CROP CONSULTANT	acre	8.00	1.0000	8.00	_____
SOIL TEST	acre	3.33	1.0000	3.33	_____
HAND LABOR	hour	9.06	0.3426	3.11	_____
IRRIGATE LABOR	hour	9.06	2.3750	21.52	_____
OPERATOR LABOR	hour	13.51	0.7041	9.50	_____
RICE MGT. LABOR	hour	9.06	0.7000	6.34	_____
UNALLOCATED LABOR	hour	13.50	0.5643	7.62	_____
DIESEL FUEL	gal	1.80	30.8381	55.52	_____
REPAIR & MAINTENANCE	acre	31.79	1.0000	31.79	_____
INTEREST ON OP. CAP.	acre	12.47	1.0000	12.47	_____

TOTAL DIRECT EXPENSES				704.93	_____
RETURNS ABOVE DIRECT EXPENSES				59.47	_____
TOTAL FIXED EXPENSES				130.67	_____

TOTAL SPECIFIED EXPENSES				835.60	_____
RETURNS ABOVE TOTAL SPECIFIED EXPENSES				-71.20	_____

Note: Cost of production estimates are based on 2017 input prices.

Fertilization decisions should be based on soil tests.

Soil test cost is prorated for a test every 3rd year.

Table 34.C Estimated resource use for field operations, per acre
 Clearfield straight levee rice
 Flood irrigated, 27 ac-in., Delta Area, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	POWER UNIT SIZE	PERF RATE	TIMES OVER	MTH	INPUT AMOUNT	IMPLEMENT	POWER UNIT	ALLOC LABOR	UNALL LABOR
-----hours-----										
Soil Test	acre			0.33	Oct	0.3330				
Field Cultivate Fld	32'	MFWD 225	0.046	2.00	Oct		0.09	0.09	0.09	0.08
Harrow - Folding	40'	MFWD 225	0.038	1.00	Oct		0.03	0.03	0.03	0.03
App by Air (5 gal)	appl			1.00	Feb	1.0000				
Glyphosate 3lbs a.e	oz					48.0000				
2,4-D Amine 4	pt					2.0000				
Grain Drill	24'	MFWD 225	0.078	1.00	Apr		0.07	0.07	0.15	0.07
Rice Clearfield	lb					65.0000				
Rice Seed Trt/Insect	lbseed					65.0000				
Roller/Cultipacker	30'	MFWD 225	0.049	1.00	Apr		0.04	0.04	0.04	0.04
Spray (Broadcast)	60'	MFWD 225	0.028	1.00	Apr		0.02	0.02	0.04	0.02
App by Air (5 gal)	appl					1.0000				
Glyphosate 3lbs a.e	oz					32.0000				
Command 3ME	pt					1.0000				
Sharpen	oz					2.0000				
MSO	pt					0.5000				
Class Act NG	pt					0.5000				
Seed Levees				1.00	Apr					
Rice Seed CF (Levees)	lb					12.0000				
Rice Seed Trt/Insect	lbseed					12.0000				
App by Air (5 gal)	appl			1.00	Apr	1.0000				
Clearpath	lb					0.5000				
Crop Oil Conc. (Pet.)	pt					2.0000				
App Fert by Air	cwt			1.00	May	1.0000				
Amm Sulfate (21% N)	cwt					0.5000				
DAP	cwt					0.5000				
Rice Consultant	acre			1.00	May	1.0000				
App Fert by Air	cwt			1.00	May	2.5000				
Urea, Solid (46% N)	cwt					2.5000				
NBPT	pt					0.7500				
App by Air (10 gal)	appl			1.00	May	1.0000				
Newpath	oz					6.0000				
Crop Oil Conc. (Pet.)	pt					2.0000				
Aim	oz					1.5000				
Rice Management				1.00	May					
RICE MGT. LABOR	hour								0.10	
App by Air (5 gal)	appl			0.50	Jun	0.5000				
Clincher SF	oz					7.5000				
MSO	pt					1.0000				
Rice Management				1.00	Jun					
RICE MGT. LABOR	hour								0.20	
App Fert by Air	cwt			1.00	Jun	1.5000				
Urea, Solid (46% N)	cwt					1.5000				
Rice Management				1.00	Jul					
RICE MGT. LABOR	hour								0.20	
App by Air (5 gal)	appl			1.00	Jul	1.0000				
Stratego	pt					1.1875				
Surfactant	pt					0.1000				
App by Air (3 gal)	appl			1.50	Jul	1.5000				
Karate Z	oz					3.0000				
Rice Management				1.00	Aug					
RICE MGT. LABOR	hour								0.20	
Header - Draper (SL)	25' Rigid	325 hp	0.176	1.00	Aug		0.17	0.17	0.17	0.15
Grain Cart Rice	700 bu	MFWD 225	0.055	0.20	Aug		0.01	0.01	0.01	0.00
Handling & Storage				1.00	Aug					
HAND LABOR	hour								0.25	
Haul Rice	bu			1.00	Aug	156.0000				
Dry Rice	bu			1.00	Aug	156.0000				
Disk Heavy	28'	MFWD 225	0.075	2.00	Sep		0.15	0.15	0.15	0.13
Flood Irr.	acre				Jan	1.0000	0.07	0.07	2.45	
TOTALS							0.70	0.70	4.12	0.56

Note: Cost of production estimates are based on 2017 input prices.
Fertilization decisions should be based on soil tests.
Soil test cost is prorated for a test every 3rd year.

Table 34.D Estimated costs for field operations, per acre
 Clearfield straight levee rice
 Flood irrigated, 27 ac-in., Delta Area, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	-----DIRECT COST-----							FIXED COST	TOTAL COST
		OP INPUT	FUEL	R&M	LABOR	LEASE	INTER	TOTAL		
-----dollars-----										
Soil Test	acre	3.33						0.16	3.49	3.49
Field Cultivate Fld	32'		1.95	1.51	2.39			0.28	6.13	7.66
Harrow - Folding	40'		0.81	0.51	0.99			0.11	2.42	1.99
App by Air (5 gal)	appl	6.50						0.21	6.71	6.71
Glyphosate 3lbs a.e	oz	6.72						0.21	6.93	6.93
2,4-D Amine 4	pt	4.80						0.15	4.95	4.95
Grain Drill	24'		1.64	2.38	2.73			0.16	6.91	6.80
Rice Clearfield	lb	61.75						1.47	63.22	63.22
Rice Seed Trt/Insect	lbseed	14.95						0.36	15.31	15.31
Roller/Cultipacker	30'		1.04	0.55	1.28			0.07	2.94	2.37
Spray (Broadcast)	60'		0.59	0.43	0.85			0.04	1.91	1.45
App by Air (5 gal)	appl	6.50						0.15	6.65	6.65
Glyphosate 3lbs a.e	oz	4.48						0.11	4.59	4.59
Command 3ME	pt	19.93						0.47	20.40	20.40
Sharpen	oz	12.90						0.31	13.21	13.21
MSO	pt	1.31						0.03	1.34	1.34
Class Act NG	pt	1.19						0.03	1.22	1.22
Seed Levees										
Rice Seed CF(Levees)	lb	11.40						0.27	11.67	11.67
Rice Seed Trt/Insect	lbseed	2.76						0.07	2.83	2.83
App by Air (5 gal)	appl	6.50						0.15	6.65	6.65
Clearpath	lb	30.63						0.73	31.36	31.36
Crop Oil Conc.(Pet.)	pt	5.48						0.13	5.61	5.61
App Fert by Air	cwt	7.00						0.14	7.14	7.14
Amm Sulfate (21% N)	cwt	6.72						0.13	6.85	6.85
DAP	cwt	10.76						0.21	10.97	10.97
Rice Consultant	acre	8.00						0.16	8.16	8.16
App Fert by Air	cwt	17.50						0.35	17.85	17.85
Urea, Solid (46% N)	cwt	35.48						0.70	36.18	36.18
NBPT	pt	6.75						0.13	6.88	6.88
App by Air (10 gal)	appl	9.00						0.18	9.18	9.18
Newpath	oz	22.98						0.45	23.43	23.43
Crop Oil Conc.(Pet.)	pt	5.48						0.11	5.59	5.59
Aim	oz	8.48						0.17	8.65	8.65
Rice Management										
RICE MGT. LABOR	hour				0.91			0.02	0.93	0.93
App by Air (5 gal)	appl	3.25						0.05	3.30	3.30
Clincher SF	oz	17.55						0.28	17.83	17.83
MSO	pt	2.61						0.04	2.65	2.65
Rice Management										
RICE MGT. LABOR	hour				1.81			0.03	1.84	1.84
App Fert by Air	cwt	10.50						0.17	10.67	10.67
Urea, Solid (46% N)	cwt	21.29						0.34	21.63	21.63
Rice Management										
RICE MGT. LABOR	hour				1.81			0.02	1.83	1.83
App by Air (5 gal)	appl	6.50						0.08	6.58	6.58
Stratego	pt	20.78						0.25	21.03	21.03
Surfactant	pt	0.33							0.33	0.33
App by Air (3 gal)	appl	7.50						0.09	7.59	7.59
Karate Z	oz	8.22						0.10	8.32	8.32
Rice Management										
RICE MGT. LABOR	hour				1.81			0.01	1.82	1.82
Header - Draper (SL)	25' Rigid		5.30	8.88	4.52			0.15	18.85	29.39
Grain Cart Rice	700 bu		0.23	0.18	0.28			0.01	0.70	0.64
Handling & Storage										
HAND LABOR	hour				2.27			0.02	2.29	2.29
Haul Rice	bu	54.60						0.43	55.03	55.03
Dry Rice	bu	62.40						0.49	62.89	62.89
Disk Heavy	28'		3.16	3.10	3.88			0.04	10.18	10.70
Flood Irr.	acre	2.25	40.80	14.25	22.56			1.45	81.31	69.67
TOTALS		557.06	55.52	31.79	48.09	0.00	12.47	704.93	130.67	835.60

Note: Cost of production estimates are based on 2017 input prices.

Fertilization decisions should be based on soil tests.

Soil test cost is prorated for a test every 3rd year.

Table 34.E Estimated monthly income and expense flows per acre
 Clearfield straight levee rice
 Flood irrigated, 27 ac-in., Delta Area, Mississippi, 2018

ITEM	Oct	Nov	Dec	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep
-----dollars-----												
TOTAL INCOME	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	764.40	0.00
DIRECT EXPENSES												
CUSTOM SPRAY	0.00	0.00	0.00	0.00	6.50	0.00	13.00	9.00	3.25	14.00	0.00	0.00
FERTILIZERS	0.00	0.00	0.00	0.00	0.00	0.00	0.00	59.71	21.29	0.00	0.00	0.00
FUNGICIDES	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	20.78	0.00	0.00
HERBICIDES	0.00	0.00	0.00	0.00	11.52	0.00	67.94	31.46	17.55	0.00	0.00	0.00
INSECTICIDES	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	8.22	0.00	0.00
SEED/PLANTS	0.00	0.00	0.00	0.00	0.00	0.00	90.86	0.00	0.00	0.00	0.00	0.00
ADJUVANTS	0.00	0.00	0.00	0.00	0.00	0.00	7.98	5.48	2.61	0.33	0.00	0.00
CUSTOM FERTILIZE	0.00	0.00	0.00	0.00	0.00	0.00	0.00	24.50	10.50	0.00	0.00	0.00
HAULING	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	54.60	0.00
DRYING	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	62.40	0.00
SURVEY & MARK LEVEES	0.00	0.00	0.00	0.00	0.00	0.00	2.25	0.00	0.00	0.00	0.00	0.00
CROP CONSULTANT	0.00	0.00	0.00	0.00	0.00	0.00	0.00	8.00	0.00	0.00	0.00	0.00
SOIL TEST	3.33	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
LABOR	3.38	0.00	0.00	0.00	0.00	0.00	12.58	5.44	6.34	6.34	10.13	3.88
LEASE *	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
FUEL	2.76	0.00	0.00	0.00	0.00	0.00	12.90	10.26	10.26	10.26	5.92	3.16
REPAIR & MAINTENANCE	2.02	0.00	0.00	0.00	0.00	0.00	5.42	7.95	2.04	2.04	9.22	3.10
INTEREST ON OP. CAP.	0.55	0.00	0.00	0.00	0.57	0.00	5.07	3.20	1.17	0.74	1.13	0.04
TOTAL DIRECT EXPENSES	12.04	0.00	0.00	0.00	18.59	0.00	218.00	165.00	75.01	62.71	143.40	10.18
NET INCOME	-12.04	0.00	0.00	0.00	-18.59	0.00	-218.00	-165.00	-75.01	-62.71	621.00	-10.18
NET INCOME TO DATE	-12.04	-12.04	-12.04	-12.04	-30.63	-30.63	-248.63	-413.63	-488.64	-551.35	69.65	59.47

Note: Cost of production estimates are based on 2017 input prices.

Fertilization decisions should be based on soil tests.

Soil test cost is prorated for a test every 3rd year.

* Lease costs are based on hourly usage costs.

Table 34.F Estimated returns for various price/yield combinations, per acre
 Clearfield straight levee rice
 Flood irrigated, 27 ac-in., Delta Area, Mississippi, 2018

PRODUCT			PERCENT										
			75	80	85	90	95	100	105	110	115	120	125
			PRODUCT PRICE										
Rice			3.67	3.92	4.16	4.41	4.65	4.90	5.14	5.39	5.63	5.88	6.12
PERCENT	YIELD	UNIT	dollars										
50	78.00	bu	-359 -489	-340 -470	-321 -451	-301 -432	-282 -413	-263 -394	-244 -375	-225 -356	-206 -337	-187 -318	-168 -298
60	93.60	bu	-313 -444	-290 -421	-267 -398	-244 -375	-222 -352	-199 -329	-176 -306	-153 -283	-130 -260	-107 -238	-84 -215
70	109.20	bu	-268 -398	-241 -372	-214 -345	-187 -318	-161 -291	-134 -265	-107 -238	-80 -211	-54 -184	-27 -158	-0 -131
80	124.80	bu	-222 -353	-192 -322	-161 -292	-130 -261	-100 -231	-69 -200	-39 -169	-8 -139	21 -108	52 -78	83 -47
90	140.40	bu	-177 -307	-142 -273	-108 -239	-73 -204	-39 -170	-5 -135	29 -101	63 -67	98 -32	132 1	166 36
100	156.00	bu	-131 -262	-93 -224	-55 -185	-16 -147	21 -109	59 -71	97 -32	135 5	174 43	212 81	250 119
110	171.60	bu	-86 -216	-44 -174	-2 -132	40 -90	82 -48	124 -6	166 35	208 77	250 119	292 161	334 203
120	187.20	bu	-40 -171	5 -125	51 -79	97 -33	142 12	188 58	234 103	280 149	326 195	372 241	418 287
130	202.80	bu	4 -125	54 -76	104 -26	154 23	203 73	253 122	303 172	352 222	402 271	452 321	501 371
140	218.40	bu	50 -80	104 -26	157 26	211 80	264 133	318 187	371 240	425 294	478 347	532 401	585 454
150	234.00	bu	96 -34	153 22	210 80	268 137	325 194	382 252	440 309	497 366	554 424	612 481	669 538

The top number in each cell is Returns Above Direct Expenses.
 The bottom number in each cell is Returns Above Total Specified Expenses.
 Only the product listed has been varied to calculate net returns.
 Note: Cost of production estimates are based on 2017 input prices.

Table 35.A Estimated costs per acre
 Clearfield straight levee multi inlet rice
 Flood irrigated, 23 ac-in., Delta Area, Mississippi, 2018

ITEM	UNIT	PRICE	QUANTITY	AMOUNT	YOUR FARM
		dollars		dollars	
DIRECT EXPENSES					
CUSTOM SPRAY					
App by Air (5 gal)	appl	6.50	4.5000	29.25	_____
App by Air (10 gal)	appl	9.00	1.0000	9.00	_____
App by Air (3 gal)	appl	5.00	1.5000	7.50	_____
FERTILIZERS					
Amm Sulfate (21% N)	cwt	13.43	0.5000	6.72	_____
DAP	cwt	21.52	0.5000	10.76	_____
Urea, Solid (46% N)	cwt	14.19	4.0000	56.76	_____
NBPT	pt	9.00	0.7500	6.75	_____
FUNGICIDES					
Stratego	pt	17.50	1.1875	20.78	_____
HERBICIDES					
Glyphosate 3lbs a.e	oz	0.14	80.0000	11.20	_____
2,4-D Amine 4	pt	2.40	2.0000	4.80	_____
Command 3ME	pt	19.93	1.0000	19.93	_____
Sharpen	oz	6.45	2.0000	12.90	_____
Clearpath	lb	61.26	0.5000	30.63	_____
Newpath	oz	3.83	6.0000	22.98	_____
Aim	oz	5.65	1.5000	8.48	_____
Clincher SF	oz	2.34	7.5000	17.55	_____
INSECTICIDES					
Karate Z	oz	2.74	3.0000	8.22	_____
IRRIGATION SUPPLIES					
Roll-Out Pipe	ft	0.25	33.0000	8.25	_____
SEED/PLANTS					
Rice Clearfield	lb	0.95	65.0000	61.75	_____
Rice Seed Trt/Insect	lbseed	0.23	77.0000	17.71	_____
Rice Seed CF (Levees)	lb	0.95	12.0000	11.40	_____
ADJUVANTS					
MSO	pt	2.61	1.5000	3.92	_____
Class Act NG	pt	2.38	0.5000	1.19	_____
Crop Oil Conc. (Pet.)	pt	2.74	4.0000	10.96	_____
Surfactant	pt	3.28	0.1000	0.33	_____
CUSTOM FERTILIZE					
App Fert by Air	cwt	7.00	5.0000	35.00	_____
HAULING					
Haul Rice	bu	0.35	156.0000	54.60	_____
DRYING					
Dry Rice	bu	0.40	156.0000	62.40	_____
SURVEY & MARK LEVEES					
Survey & Mark Levees	acre	4.50	0.5000	2.25	_____
CROP CONSULTANT					
Rice Consultant	acre	8.00	1.0000	8.00	_____
SOIL TEST					
Soil Test	acre	10.00	0.3330	3.33	_____
OPERATOR LABOR					
Tractors	hour	13.51	0.5281	7.12	_____
Harvesters	hour	13.51	0.1760	2.38	_____
IRRIGATE LABOR					
Special Labor	hour	9.06	1.1250	10.18	_____
Implements	hour	9.06	0.0375	0.34	_____
HAND LABOR					
Special Labor	hour	9.06	0.2500	2.27	_____
Implements	hour	9.06	0.0785	0.71	_____
RICE MGT. LABOR					
Special Labor	hour	9.06	0.7000	6.34	_____
UNALLOCATED LABOR					
	hour	13.50	0.5389	7.28	_____
DIESEL FUEL					
Tractors	gal	1.80	5.8180	10.50	_____
Harvesters	gal	1.80	2.9444	5.30	_____
Flood Irr.	gal	1.80	18.7364	33.73	_____
REPAIR & MAINTENANCE					
Implements	acre	7.99	1.0000	7.99	_____
Tractors	acre	3.27	1.0000	3.27	_____
Harvesters	acre	6.51	1.0000	6.51	_____
Flood Irr.	acre	13.46	1.0000	13.46	_____
INTEREST ON OP. CAP.	acre	12.35	1.0000	12.35	_____
TOTAL DIRECT EXPENSES				695.04	_____
FIXED EXPENSES					
Implements	acre	17.29	1.0000	17.29	_____
Tractors	acre	20.64	1.0000	20.64	_____
Harvesters	acre	25.68	1.0000	25.68	_____
Flood Irr.	acre	66.58	1.0000	66.58	_____
TOTAL FIXED EXPENSES				130.19	_____
TOTAL SPECIFIED EXPENSES				825.23	_____

Note: Cost of production estimates are based on 2017 input prices.

Fertilization decisions should be based on soil tests.
Soil test cost is prorated for a test every 3rd year.

Table 35.B Summary of estimated costs and returns per acre
Clearfield straight levee multi inlet rice
Flood irrigated, 23 ac-in., Delta Area, Mississippi, 2018

ITEM	UNIT	PRICE	QUANTITY	AMOUNT	YOUR FARM
		dollars		dollars	
INCOME					
Rice	bu	4.90	156.0000	764.40	_____

TOTAL INCOME				764.40	_____
DIRECT EXPENSES					
CUSTOM SPRAY	acre	45.75	1.0000	45.75	_____
FERTILIZERS	acre	81.00	1.0000	81.00	_____
FUNGICIDES	acre	20.78	1.0000	20.78	_____
HERBICIDES	acre	128.47	1.0000	128.47	_____
INSECTICIDES	acre	8.22	1.0000	8.22	_____
IRRIGATION SUPPLIES	acre	8.25	1.0000	8.25	_____
SEED/PLANTS	acre	90.86	1.0000	90.86	_____
ADJUVANTS	acre	16.40	1.0000	16.40	_____
CUSTOM FERTILIZE	acre	35.00	1.0000	35.00	_____
HAULING	acre	54.60	1.0000	54.60	_____
DRYING	acre	62.40	1.0000	62.40	_____
SURVEY & MARK LEVEES	acre	2.25	1.0000	2.25	_____
CROP CONSULTANT	acre	8.00	1.0000	8.00	_____
SOIL TEST	acre	3.33	1.0000	3.33	_____
HAND LABOR	hour	9.06	0.3285	2.98	_____
IRRIGATE LABOR	hour	9.06	1.1625	10.52	_____
OPERATOR LABOR	hour	13.51	0.7041	9.50	_____
RICE MGT. LABOR	hour	9.06	0.7000	6.34	_____
UNALLOCATED LABOR	hour	13.50	0.5389	7.28	_____
DIESEL FUEL	gal	1.80	27.4990	49.53	_____
REPAIR & MAINTENANCE	acre	31.23	1.0000	31.23	_____
INTEREST ON OP. CAP.	acre	12.35	1.0000	12.35	_____

TOTAL DIRECT EXPENSES				695.04	_____
RETURNS ABOVE DIRECT EXPENSES				69.36	_____
TOTAL FIXED EXPENSES				130.19	_____

TOTAL SPECIFIED EXPENSES				825.23	_____
RETURNS ABOVE TOTAL SPECIFIED EXPENSES				-60.83	_____

Note: Cost of production estimates are based on 2017 input prices.
Fertilization decisions should be based on soil tests.
Soil test cost is prorated for a test every 3rd year.

Table 35.C Estimated resource use for field operations, per acre
 Clearfield straight levee multi inlet rice
 Flood irrigated, 23 ac-in., Delta Area, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	POWER UNIT SIZE	PERF RATE	TIMES OVER	MTH	INPUT AMOUNT	IMPLEMENT	POWER UNIT	ALLOC LABOR	UNALL LABOR
-----hours-----										
Soil Test	acre			0.33	Oct	0.3330				
Field Cultivate Fld	32'	MFWD 225	0.046	2.00	Oct		0.09	0.09	0.09	0.08
Harrow - Folding	40'	MFWD 225	0.038	1.00	Oct		0.03	0.03	0.03	0.03
App by Air (5 gal)	appl			1.00	Feb	1.0000				
Glyphosate 3lbs a.e	oz					48.0000				
2,4-D Amine 4	pt					2.0000				
Grain Drill	24'	MFWD 225	0.078	1.00	Apr		0.07	0.07	0.15	0.07
Rice Clearfield	lb					65.0000				
Rice Seed Trt/Insect	lbseed					65.0000				
Roller/Cultipacker	30'	MFWD 225	0.049	1.00	Apr		0.04	0.04	0.04	0.04
App by Air (5 gal)	appl			1.00	Apr	1.0000				
Glyphosate 3lbs a.e	oz					32.0000				
Command 3ME	pt					1.0000				
Sharpen	oz					2.0000				
MSO	pt					0.5000				
Class Act NG	pt					0.5000				
Seed Levees				1.00	Apr					
Rice Seed CF(Levees)	lb					12.0000				
Rice Seed Trt/Insect	lbseed					12.0000				
App by Air (5 gal)	appl			1.00	Apr	1.0000				
Clearpath	lb					0.5000				
Crop Oil Conc.(Pet.)	pt					2.0000				
App Fert by Air	cwt			1.00	May	1.0000				
Amm Sulfate (21% N)	cwt					0.5000				
DAP	cwt					0.5000				
Rice Consultant	acre			1.00	May	1.0000				
App Fert by Air	cwt			1.00	May	2.5000				
Urea, Solid (46% N)	cwt					2.5000				
NBPT	pt					0.7500				
App by Air (10 gal)	appl			1.00	May	1.0000				
Newpath	oz					6.0000				
Crop Oil Conc.(Pet.)	pt					2.0000				
Aim	oz					1.5000				
Rice Management				1.00	May					
RICE MGT. LABOR	hour								0.10	
App by Air (5 gal)	appl			0.50	Jun	0.5000				
Clincher SF	oz					7.5000				
MSO	pt					1.0000				
Rice Management				1.00	Jun					
RICE MGT. LABOR	hour								0.20	
App Fert by Air	cwt			1.00	Jun	1.5000				
Urea, Solid (46% N)	cwt					1.5000				
Rice Management				1.00	Jul					
RICE MGT. LABOR	hour								0.20	
App by Air (5 gal)	appl			1.00	Jul	1.0000				
Stratego	pt					1.1875				
Surfactant	pt					0.1000				
App by Air (3 gal)	appl			1.50	Jul	1.5000				
Karate Z	oz					3.0000				
Rice Management				1.00	Aug					
RICE MGT. LABOR	hour								0.20	
Header - Draper (SL)	25' Rigid	325 hp	0.176	1.00	Aug		0.17	0.17	0.17	0.15
Grain Cart Rice	700 bu	MFWD 225	0.055	0.20	Aug		0.01	0.01	0.01	0.00
Handling & Storage				1.00	Aug					
HAND LABOR	hour								0.25	
Haul Rice	bu			1.00	Aug	156.0000				
Dry Rice	bu			1.00	Aug	156.0000				
Disk Heavy	28'	MFWD 225	0.075	2.00	Sep		0.15	0.15	0.15	0.13
Flood Irr.	acre				Jan	1.0000	0.10	0.10	1.26	
TOTALS							0.70	0.70	2.89	0.53

Note: Cost of production estimates are based on 2017 input prices.

Fertilization decisions should be based on soil tests.
Soil test cost is prorated for a test every 3rd year.

Table 35.D Estimated costs for field operations, per acre
 Clearfield straight levee multi inlet rice
 Flood irrigated, 23 ac-in., Delta Area, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	-----DIRECT COST-----							FIXED COST	TOTAL COST
		OP INPUT	FUEL	R&M	LABOR	LEASE	INTER	TOTAL		
-----dollars-----										
Soil Test	acre	3.33						0.16	3.49	3.49
Field Cultivate Fld	32'		1.95	1.51	2.39			0.28	6.13	7.66
Harrow - Folding	40'		0.81	0.51	0.99			0.11	2.42	1.99
App by Air (5 gal)	appl	6.50						0.21	6.71	6.71
Glyphosate 3lbs a.e	oz	6.72						0.21	6.93	6.93
2,4-D Amine 4	pt	4.80						0.15	4.95	4.95
Grain Drill	24'		1.64	2.38	2.73			0.16	6.91	6.80
Rice Clearfield	lb	61.75						1.47	63.22	63.22
Rice Seed Trt/Insect	lbseed	14.95						0.36	15.31	15.31
Roller/Cultipacker	30'		1.04	0.55	1.28			0.07	2.94	2.37
App by Air (5 gal)	appl	6.50						0.15	6.65	6.65
Glyphosate 3lbs a.e	oz	4.48						0.11	4.59	4.59
Command 3ME	pt	19.93						0.47	20.40	20.40
Sharpen	oz	12.90						0.31	13.21	13.21
MSO	pt	1.31						0.03	1.34	1.34
Class Act NG	pt	1.19						0.03	1.22	1.22
Seed Levees										
Rice Seed CF (Levees)	lb	11.40						0.27	11.67	11.67
Rice Seed Trt/Insect	lbseed	2.76						0.07	2.83	2.83
App by Air (5 gal)	appl	6.50						0.15	6.65	6.65
Clearpath	lb	30.63						0.73	31.36	31.36
Crop Oil Conc. (Pet.)	pt	5.48						0.13	5.61	5.61
App Fert by Air	cwt	7.00						0.14	7.14	7.14
Amm Sulfate (21% N)	cwt	6.72						0.13	6.85	6.85
DAP	cwt	10.76						0.21	10.97	10.97
Rice Consultant	acre	8.00						0.16	8.16	8.16
App Fert by Air	cwt	17.50						0.35	17.85	17.85
Urea, Solid (46% N)	cwt	35.48						0.70	36.18	36.18
NBPT	pt	6.75						0.13	6.88	6.88
App by Air (10 gal)	appl	9.00						0.18	9.18	9.18
Newpath	oz	22.98						0.45	23.43	23.43
Crop Oil Conc. (Pet.)	pt	5.48						0.11	5.59	5.59
Aim	oz	8.48						0.17	8.65	8.65
Rice Management										
RICE MGT. LABOR	hour				0.91			0.02	0.93	0.93
App by Air (5 gal)	appl	3.25						0.05	3.30	3.30
Clincher SF	oz	17.55						0.28	17.83	17.83
MSO	pt	2.61						0.04	2.65	2.65
Rice Management										
RICE MGT. LABOR	hour				1.81			0.03	1.84	1.84
App Fert by Air	cwt	10.50						0.17	10.67	10.67
Urea, Solid (46% N)	cwt	21.29						0.34	21.63	21.63
Rice Management										
RICE MGT. LABOR	hour				1.81			0.02	1.83	1.83
App by Air (5 gal)	appl	6.50						0.08	6.58	6.58
Stratego	pt	20.78						0.25	21.03	21.03
Surfactant	pt	0.33							0.33	0.33
App by Air (3 gal)	appl	7.50						0.09	7.59	7.59
Karate Z	oz	8.22						0.10	8.32	8.32
Rice Management										
RICE MGT. LABOR	hour				1.81			0.01	1.82	1.82
Header - Draper (SL)	25' Rigid		5.30	8.88	4.52			0.15	18.85	29.39
Grain Cart Rice	700 bu		0.23	0.18	0.28			0.01	0.70	0.64
Handling & Storage										
HAND LABOR	hour				2.27			0.02	2.29	2.29
Haul Rice	bu	54.60						0.43	55.03	55.03
Dry Rice	bu	62.40						0.49	62.89	62.89
Disk Heavy	28'		3.16	3.10	3.88			0.04	10.18	10.70
Flood Irr.	acre	10.50	35.40	14.12	11.94			1.37	73.33	70.64
TOTALS		565.31	49.53	31.23	36.62	0.00	12.35	695.04	130.19	825.23

Note: Cost of production estimates are based on 2017 input prices.

Fertilization decisions should be based on soil tests.

Soil test cost is prorated for a test every 3rd year.

Table 35.E Estimated monthly income and expense flows per acre
 Clearfield straight levee multi inlet rice
 Flood irrigated, 23 ac-in., Delta Area, Mississippi, 2018

ITEM	Oct	Nov	Dec	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep
-----dollars-----												
TOTAL INCOME	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	764.40	0.00
DIRECT EXPENSES												
CUSTOM SPRAY	0.00	0.00	0.00	0.00	6.50	0.00	13.00	9.00	3.25	14.00	0.00	0.00
FERTILIZERS	0.00	0.00	0.00	0.00	0.00	0.00	0.00	59.71	21.29	0.00	0.00	0.00
FUNGICIDES	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	20.78	0.00	0.00
HERBICIDES	0.00	0.00	0.00	0.00	11.52	0.00	67.94	31.46	17.55	0.00	0.00	0.00
INSECTICIDES	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	8.22	0.00	0.00
IRRIGATION SUPPLIES	0.00	0.00	0.00	0.00	0.00	0.00	8.25	0.00	0.00	0.00	0.00	0.00
SEED/PLANTS	0.00	0.00	0.00	0.00	0.00	0.00	90.86	0.00	0.00	0.00	0.00	0.00
ADJUVANTS	0.00	0.00	0.00	0.00	0.00	0.00	7.98	5.48	2.61	0.33	0.00	0.00
CUSTOM FERTILIZE	0.00	0.00	0.00	0.00	0.00	0.00	0.00	24.50	10.50	0.00	0.00	0.00
HAULING	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	54.60	0.00
DRYING	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	62.40	0.00
SURVEY & MARK LEVEES	0.00	0.00	0.00	0.00	0.00	0.00	2.25	0.00	0.00	0.00	0.00	0.00
CROP CONSULTANT	0.00	0.00	0.00	0.00	0.00	0.00	0.00	8.00	0.00	0.00	0.00	0.00
SOIL TEST	3.33	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
LABOR	3.38	0.00	0.00	0.00	0.00	0.00	9.54	2.72	3.62	3.62	9.86	3.88
LEASE *	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
FUEL	2.76	0.00	0.00	0.00	0.00	0.00	11.19	8.80	8.80	8.80	6.02	3.16
REPAIR & MAINTENANCE	2.02	0.00	0.00	0.00	0.00	0.00	5.03	7.88	1.97	1.97	9.26	3.10
INTEREST ON OP. CAP.	0.55	0.00	0.00	0.00	0.57	0.00	5.15	3.12	1.11	0.69	1.12	0.04
TOTAL DIRECT EXPENSES	12.04	0.00	0.00	0.00	18.59	0.00	221.19	160.67	70.70	58.41	143.26	10.18
NET INCOME	-12.04	0.00	0.00	0.00	-18.59	0.00	-221.19	-160.67	-70.70	-58.41	621.14	-10.18
NET INCOME TO DATE	-12.04	-12.04	-12.04	-12.04	-30.63	-30.63	-251.82	-412.49	-483.19	-541.60	79.54	69.36

Note: Cost of production estimates are based on 2017 input prices.

Fertilization decisions should be based on soil tests.

Soil test cost is prorated for a test every 3rd year.

* Lease costs are based on hourly usage costs.

Table 35.F Estimated returns for various price/yield combinations, per acre
Clearfield straight levee multi inlet rice
Flood irrigated, 23 ac-in., Delta Area, Mississippi, 2018

PRODUCT			PERCENT										
			75	80	85	90	95	100	105	110	115	120	125
Rice			3.67	3.92	4.16	4.41	4.65	4.90	5.14	5.39	5.63	5.88	6.12
PERCENT	YIELD	UNIT	dollars										
50	78.00	bu	-349 -479	-330 -460	-311 -441	-292 -422	-272 -403	-253 -384	-234 -364	-215 -345	-196 -326	-177 -307	-158 -288
60	93.60	bu	-303 -434	-280 -411	-258 -388	-235 -365	-212 -342	-189 -319	-166 -296	-143 -273	-120 -250	-97 -227	-74 -204
70	109.20	bu	-258 -388	-231 -361	-204 -335	-178 -308	-151 -281	-124 -254	-97 -228	-71 -201	-44 -174	-17 -147	9 -121
80	124.80	bu	-212 -343	-182 -312	-151 -281	-121 -251	-90 -220	-59 -190	-29 -159	1 -128	31 -98	62 -67	92 -37
90	140.40	bu	-167 -297	-132 -263	-98 -228	-64 -194	-29 -159	4 -125	39 -91	73 -56	107 -22	142 12	176 46
100	156.00	bu	-121 -251	-83 -213	-45 -175	-7 -137	31 -99	69 -60	107 -22	145 15	184 53	222 92	260 130
110	171.60	bu	-76 -206	-34 -164	7 -122	49 -80	91 -38	134 3	176 45	218 87	260 129	302 171	344 214
120	187.20	bu	-30 -160	15 -114	61 -69	106 -23	152 22	198 68	244 114	290 160	336 206	382 251	427 297
130	202.80	bu	14 -115	64 -65	114 -15	163 33	213 83	263 133	312 182	362 232	412 282	462 331	511 381
140	218.40	bu	60 -69	113 -16	167 37	220 90	274 144	327 197	381 251	434 304	488 358	541 411	595 465
150	234.00	bu	105 -24	163 33	220 90	277 147	335 205	392 262	449 319	507 377	564 434	621 491	679 549

The top number in each cell is Returns Above Direct Expenses.
The bottom number in each cell is Returns Above Total Specified Expenses.
Only the product listed has been varied to calculate net returns.
Note: Cost of production estimates are based on 2017 input prices.

Table 36.A Estimated costs per acre
 Clearfield straight levee-zero grade rice
 Flood irrigated, 19 ac-in., Delta Area, Mississippi, 2018

ITEM	UNIT	PRICE	QUANTITY	AMOUNT	YOUR FARM
		dollars		dollars	
DIRECT EXPENSES					
CUSTOM SPRAY					
App by Air (5 gal)	appl	6.50	4.5000	29.25	_____
App by Air (10 gal)	appl	9.00	1.0000	9.00	_____
App by Air (3 gal)	appl	5.00	1.5000	7.50	_____
FERTILIZERS					
Amm Sulfate (21% N)	cwt	13.43	0.5000	6.72	_____
DAP	cwt	21.52	0.5000	10.76	_____
Urea, Solid (46% N)	cwt	14.19	4.0000	56.76	_____
NBPT	pt	9.00	0.7500	6.75	_____
FUNGICIDES					
Stratego	pt	17.50	1.1875	20.78	_____
HERBICIDES					
Glyphosate 3lbs a.e	oz	0.14	80.0000	11.20	_____
2,4-D Amine 4	pt	2.40	2.0000	4.80	_____
Command 3ME	pt	19.93	1.0000	19.93	_____
Sharpen	oz	6.45	2.0000	12.90	_____
Clearpath	lb	61.26	0.5000	30.63	_____
Newpath	oz	3.83	6.0000	22.98	_____
Aim	oz	5.65	1.5000	8.48	_____
Clincher SF	oz	2.34	7.5000	17.55	_____
INSECTICIDES					
Karate Z	oz	2.74	3.0000	8.22	_____
SEED/PLANTS					
Rice Clearfield	lb	0.95	65.0000	61.75	_____
Rice Seed Trt/Insect	lbseed	0.23	77.0000	17.71	_____
Rice Seed CF(Levees)	lb	0.95	12.0000	11.40	_____
ADJUVANTS					
MSO	pt	2.61	1.5000	3.92	_____
Class Act NG	pt	2.38	0.5000	1.19	_____
Crop Oil Conc. (Pet.)	pt	2.74	4.0000	10.96	_____
Surfactant	pt	3.28	0.1000	0.33	_____
CUSTOM FERTILIZE					
App Fert by Air	cwt	7.00	5.0000	35.00	_____
HAULING					
Haul Rice	bu	0.35	156.0000	54.60	_____
DRYING					
Dry Rice	bu	0.40	156.0000	62.40	_____
CROP CONSULTANT					
Rice Consultant	acre	8.00	1.0000	8.00	_____
SOIL TEST					
Soil Test	acre	10.00	0.3330	3.33	_____
OPERATOR LABOR					
Tractors	hour	13.51	0.4228	5.70	_____
Harvesters	hour	13.51	0.1760	2.38	_____
IRRIGATE LABOR					
Special Labor	hour	9.06	1.0500	9.53	_____
HAND LABOR					
Special Labor	hour	9.06	0.2500	2.27	_____
Implements	hour	9.06	0.0785	0.71	_____
RICE MGT. LABOR					
Special Labor	hour	9.06	0.7000	6.34	_____
UNALLOCATED LABOR	hour	13.50	0.5389	7.28	_____
DIESEL FUEL					
Tractors	gal	1.80	4.8970	8.83	_____
Harvesters	gal	1.80	2.9444	5.30	_____
Flood Irr.	gal	1.80	15.4779	27.86	_____
REPAIR & MAINTENANCE					
Implements	acre	7.83	1.0000	7.83	_____
Tractors	acre	2.77	1.0000	2.77	_____
Harvesters	acre	6.51	1.0000	6.51	_____
Flood Irr.	acre	11.46	1.0000	11.46	_____
INTEREST ON OP. CAP.	acre	11.85	1.0000	11.85	_____
TOTAL DIRECT EXPENSES				671.43	_____
FIXED EXPENSES					
Implements	acre	16.40	1.0000	16.40	_____
Tractors	acre	17.47	1.0000	17.47	_____
Harvesters	acre	25.68	1.0000	25.68	_____
Flood Irr.	acre	66.25	1.0000	66.25	_____
TOTAL FIXED EXPENSES				125.80	_____
TOTAL SPECIFIED EXPENSES				797.23	_____

Note: Cost of production estimates are based on 2017 input prices.
Fertilization decisions should be based on soil tests.
Soil test cost is prorated for a test every 3rd year.

Table 36.B Summary of estimated costs and returns per acre
 Clearfield straight levee-zero grade rice
 Flood irrigated, 19 ac-in., Delta Area, Mississippi, 2018

ITEM	UNIT	PRICE	QUANTITY	AMOUNT	YOUR FARM
		dollars		dollars	
INCOME					
Rice	bu	4.90	156.0000	764.40	_____

TOTAL INCOME				764.40	_____
DIRECT EXPENSES					
CUSTOM SPRAY	acre	45.75	1.0000	45.75	_____
FERTILIZERS	acre	81.00	1.0000	81.00	_____
FUNGICIDES	acre	20.78	1.0000	20.78	_____
HERBICIDES	acre	128.47	1.0000	128.47	_____
INSECTICIDES	acre	8.22	1.0000	8.22	_____
SEED/PLANTS	acre	90.86	1.0000	90.86	_____
ADJUVANTS	acre	16.40	1.0000	16.40	_____
CUSTOM FERTILIZE	acre	35.00	1.0000	35.00	_____
HAULING	acre	54.60	1.0000	54.60	_____
DRYING	acre	62.40	1.0000	62.40	_____
CROP CONSULTANT	acre	8.00	1.0000	8.00	_____
SOIL TEST	acre	3.33	1.0000	3.33	_____
HAND LABOR	hour	9.06	0.3285	2.98	_____
IRRIGATE LABOR	hour	9.06	1.0500	9.53	_____
OPERATOR LABOR	hour	13.51	0.5988	8.08	_____
RICE MGT. LABOR	hour	9.06	0.7000	6.34	_____
UNALLOCATED LABOR	hour	13.50	0.5389	7.28	_____
DIESEL FUEL	gal	1.80	23.3194	41.99	_____
REPAIR & MAINTENANCE	acre	28.57	1.0000	28.57	_____
INTEREST ON OP. CAP.	acre	11.85	1.0000	11.85	_____

TOTAL DIRECT EXPENSES				671.43	_____
RETURNS ABOVE DIRECT EXPENSES				92.97	_____
TOTAL FIXED EXPENSES				125.80	_____

TOTAL SPECIFIED EXPENSES				797.23	_____
RETURNS ABOVE TOTAL SPECIFIED EXPENSES				-32.83	_____

Note: Cost of production estimates are based on 2017 input prices.
Fertilization decisions should be based on soil tests.
Soil test cost is prorated for a test every 3rd year.

Table 36.C Estimated resource use for field operations, per acre
 Clearfield straight levee-zero grade rice
 Flood irrigated, 19 ac-in., Delta Area, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	POWER UNIT SIZE	PERF RATE	TIMES OVER	MTH	INPUT AMOUNT	IMPLEMENT	POWER UNIT	ALLOC LABOR	UNALL LABOR
						-----hours-----				
Soil Test	acre			0.33	Oct	0.3330				
Field Cultivate Fld	32'	MFWD 225	0.046	2.00	Oct		0.09	0.09	0.09	0.08
Harrow - Folding	40'	MFWD 225	0.038	1.00	Oct		0.03	0.03	0.03	0.03
App by Air (5 gal)	appl			1.00	Feb	1.0000				
Glyphosate 3lbs a.e	oz					48.0000				
2,4-D Amine 4	pt					2.0000				
Grain Drill	24'	MFWD 225	0.078	1.00	Apr		0.07	0.07	0.15	0.07
Rice Clearfield	lb					65.0000				
Rice Seed Trt/Insect	lbseed					65.0000				
Roller/Cultipacker	30'	MFWD 225	0.049	1.00	Apr		0.04	0.04	0.04	0.04
App by Air (5 gal)	appl			1.00	Apr	1.0000				
Glyphosate 3lbs a.e	oz					32.0000				
Command 3ME	pt					1.0000				
Sharpen	oz					2.0000				
MSO	pt					0.5000				
Class Act NG	pt					0.5000				
Seed Levees				1.00	Apr					
Rice Seed CF (Levees)	lb					12.0000				
Rice Seed Trt/Insect	lbseed					12.0000				
App by Air (5 gal)	appl			1.00	Apr	1.0000				
Clearpath	lb					0.5000				
Crop Oil Conc. (Pet.)	pt					2.0000				
App Fert by Air	cwt			1.00	May	1.0000				
Amm Sulfate (21% N)	cwt					0.5000				
DAP	cwt					0.5000				
Rice Consultant	acre			1.00	May	1.0000				
App Fert by Air	cwt			1.00	May	2.5000				
Urea, Solid (46% N)	cwt					2.5000				
NBPT	pt					0.7500				
App by Air (10 gal)	appl			1.00	May	1.0000				
Newpath	oz					6.0000				
Crop Oil Conc. (Pet.)	pt					2.0000				
Aim	oz					1.5000				
Rice Management				1.00	May					
RICE MGT. LABOR	hour								0.10	
App by Air (5 gal)	appl			0.50	Jun	0.5000				
Clincher SF	oz					7.5000				
MSO	pt					1.0000				
Rice Management				1.00	Jun					
RICE MGT. LABOR	hour								0.20	
App Fert by Air	cwt			1.00	Jun	1.5000				
Urea, Solid (46% N)	cwt					1.5000				
Rice Management				1.00	Jul					
RICE MGT. LABOR	hour								0.20	
App by Air (5 gal)	appl			1.00	Jul	1.0000				
Stratego	pt					1.1875				
Surfactant	pt					0.1000				
App by Air (3 gal)	appl			1.50	Jul	1.5000				
Karate Z	oz					3.0000				
Rice Management				1.00	Aug					
RICE MGT. LABOR	hour								0.20	
Header - Draper (SL)	25' Rigid	325 hp	0.176	1.00	Aug		0.17	0.17	0.17	0.15
Grain Cart Rice	700 bu	MFWD 225	0.055	0.20	Aug		0.01	0.01	0.01	0.00
Handling & Storage				1.00	Aug					
HAND LABOR	hour								0.25	
Haul Rice	bu			1.00	Aug	156.0000				
Dry Rice	bu			1.00	Aug	156.0000				
Disk Heavy	28'	MFWD 225	0.075	2.00	Sep		0.15	0.15	0.15	0.13
Flood Irr.	acre				Jan	1.0000			1.05	
TOTALS							0.59	0.59	2.67	0.53

Note: Cost of production estimates are based on 2017 input prices.

Fertilization decisions should be based on soil tests.

Soil test cost is prorated for a test every 3rd year.

Table 36.D Estimated costs for field operations, per acre
 Clearfield straight levee-zero grade rice
 Flood irrigated, 19 ac-in., Delta Area, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	-----DIRECT COST-----							FIXED COST	TOTAL COST
		OP INPUT	FUEL	R&M	LABOR	LEASE	INTER	TOTAL		
-----dollars-----										
Soil Test	acre	3.33						0.16	3.49	3.49
Field Cultivate Fld	32'		1.95	1.51	2.39			0.28	6.13	7.66
Harrow - Folding	40'		0.81	0.51	0.99			0.11	2.42	1.99
App by Air (5 gal)	appl	6.50						0.21	6.71	6.71
Glyphosate 3lbs a.e	oz	6.72						0.21	6.93	6.93
2,4-D Amine 4	pt	4.80						0.15	4.95	4.95
Grain Drill	24'		1.64	2.38	2.73			0.16	6.91	6.80
Rice Clearfield	lb	61.75						1.47	63.22	63.22
Rice Seed Trt/Insect	lbseed	14.95						0.36	15.31	15.31
Roller/Cultipacker	30'		1.04	0.55	1.28			0.07	2.94	2.37
App by Air (5 gal)	appl	6.50						0.15	6.65	6.65
Glyphosate 3lbs a.e	oz	4.48						0.11	4.59	4.59
Command 3ME	pt	19.93						0.47	20.40	20.40
Sharpen	oz	12.90						0.31	13.21	13.21
MSO	pt	1.31						0.03	1.34	1.34
Class Act NG	pt	1.19						0.03	1.22	1.22
Seed Levees										
Rice Seed CF (Levees)	lb	11.40						0.27	11.67	11.67
Rice Seed Trt/Insect	lbseed	2.76						0.07	2.83	2.83
App by Air (5 gal)	appl	6.50						0.15	6.65	6.65
Clearpath	lb	30.63						0.73	31.36	31.36
Crop Oil Conc. (Pet.)	pt	5.48						0.13	5.61	5.61
App Fert by Air	cwt	7.00						0.14	7.14	7.14
Amm Sulfate (21% N)	cwt	6.72						0.13	6.85	6.85
DAP	cwt	10.76						0.21	10.97	10.97
Rice Consultant	acre	8.00						0.16	8.16	8.16
App Fert by Air	cwt	17.50						0.35	17.85	17.85
Urea, Solid (46% N)	cwt	35.48						0.70	36.18	36.18
NBPT	pt	6.75						0.13	6.88	6.88
App by Air (10 gal)	appl	9.00						0.18	9.18	9.18
Newpath	oz	22.98						0.45	23.43	23.43
Crop Oil Conc. (Pet.)	pt	5.48						0.11	5.59	5.59
Aim	oz	8.48						0.17	8.65	8.65
Rice Management										
RICE MGT. LABOR	hour				0.91			0.02	0.93	0.93
App by Air (5 gal)	appl	3.25						0.05	3.30	3.30
Clincher SF	oz	17.55						0.28	17.83	17.83
MSO	pt	2.61						0.04	2.65	2.65
Rice Management										
RICE MGT. LABOR	hour				1.81			0.03	1.84	1.84
App Fert by Air	cwt	10.50						0.17	10.67	10.67
Urea, Solid (46% N)	cwt	21.29						0.34	21.63	21.63
Rice Management										
RICE MGT. LABOR	hour				1.81			0.02	1.83	1.83
App by Air (5 gal)	appl	6.50						0.08	6.58	6.58
Stratego	pt	20.78						0.25	21.03	21.03
Surfactant	pt	0.33							0.33	0.33
App by Air (3 gal)	appl	7.50						0.09	7.59	7.59
Karate Z	oz	8.22						0.10	8.32	8.32
Rice Management										
RICE MGT. LABOR	hour				1.81			0.01	1.82	1.82
Header - Draper (SL)	25' Rigid		5.30	8.88	4.52			0.15	18.85	29.39
Grain Cart Rice	700 bu		0.23	0.18	0.28			0.01	0.70	0.64
Handling & Storage										
HAND LABOR	hour				2.27			0.02	2.29	2.29
Haul Rice	bu	54.60						0.43	55.03	55.03
Dry Rice	bu	62.40						0.49	62.89	62.89
Disk Heavy	28'		3.16	3.10	3.88			0.04	10.18	10.70
Flood Irr.	acre		27.86	11.46	9.53			0.87	49.72	66.25
TOTALS		554.81	41.99	28.57	34.21	0.00	11.85	671.43	125.80	797.23

Note: Cost of production estimates are based on 2017 input prices.
Fertilization decisions should be based on soil tests
Soil test cost is prorated for a test every 3rd year.

Table 36.E Estimated monthly income and expense flows per acre
 Clearfield straight levee-zero grade rice
 Flood irrigated, 19 ac-in., Delta Area, Mississippi, 2018

ITEM	Oct	Nov	Dec	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep
-----dollars-----												
TOTAL INCOME	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	764.40	0.00
DIRECT EXPENSES												
CUSTOM SPRAY	0.00	0.00	0.00	0.00	6.50	0.00	13.00	9.00	3.25	14.00	0.00	0.00
FERTILIZERS	0.00	0.00	0.00	0.00	0.00	0.00	0.00	59.71	21.29	0.00	0.00	0.00
FUNGICIDES	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	20.78	0.00	0.00
HERBICIDES	0.00	0.00	0.00	0.00	11.52	0.00	67.94	31.46	17.55	0.00	0.00	0.00
INSECTICIDES	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	8.22	0.00	0.00
SEED/PLANTS	0.00	0.00	0.00	0.00	0.00	0.00	90.86	0.00	0.00	0.00	0.00	0.00
ADJUVANTS	0.00	0.00	0.00	0.00	0.00	0.00	7.98	5.48	2.61	0.33	0.00	0.00
CUSTOM FERTILIZE	0.00	0.00	0.00	0.00	0.00	0.00	0.00	24.50	10.50	0.00	0.00	0.00
HAULING	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	54.60	0.00
DRYING	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	62.40	0.00
CROP CONSULTANT	0.00	0.00	0.00	0.00	0.00	0.00	0.00	8.00	0.00	0.00	0.00	0.00
SOIL TEST	3.33	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
LABOR	3.38	0.00	0.00	0.00	0.00	0.00	6.73	3.18	4.08	4.08	8.88	3.88
LEASE *	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
FUEL	2.76	0.00	0.00	0.00	0.00	0.00	8.55	7.33	7.33	7.33	5.53	3.16
REPAIR & MAINTENANCE	2.02	0.00	0.00	0.00	0.00	0.00	4.10	7.37	1.46	1.46	9.06	3.10
INTEREST ON OP. CAP.	0.55	0.00	0.00	0.00	0.57	0.00	4.74	3.08	1.09	0.67	1.11	0.04
TOTAL DIRECT EXPENSES	12.04	0.00	0.00	0.00	18.59	0.00	203.90	159.11	69.16	56.87	141.58	10.18
NET INCOME	-12.04	0.00	0.00	0.00	-18.59	0.00	-203.90	-159.11	-69.16	-56.87	622.82	-10.18
NET INCOME TO DATE	-12.04	-12.04	-12.04	-12.04	-30.63	-30.63	-234.53	-393.64	-462.80	-519.67	103.15	92.97

Note: Cost of production estimates are based on 2017 input prices.

Fertilization decisions should be based on soil tests.

Soil test cost is prorated for a test every 3rd year.

* Lease costs are based on hourly usage costs.

Table 36.F Estimated returns for various price/yield combinations, per acre
Clearfield straight levee-zero grade rice
Flood irrigated, 19 ac-in., Delta Area, Mississippi, 2018

PRODUCT			PERCENT										
-----			75	80	85	90	95	100	105	110	115	120	125
-----			PRODUCT PRICE										
-----			3.67	3.92	4.16	4.41	4.65	4.90	5.14	5.39	5.63	5.88	6.12
PERCENT	YIELD	UNIT	-----dollars-----										
50	78.00	bu	-325 -451	-306 -432	-287 -413	-268 -394	-249 -375	-230 -356	-211 -336	-192 -317	-172 -298	-153 -279	-134 -260
60	93.60	bu	-280 -406	-257 -383	-234 -360	-211 -337	-188 -314	-165 -291	-142 -268	-119 -245	-96 -222	-73 -199	-50 -176
70	109.20	bu	-234 -360	-207 -333	-181 -307	-154 -280	-127 -253	-100 -226	-74 -200	-47 -173	-20 -146	6 -119	32 -93
80	124.80	bu	-189 -315	-158 -284	-128 -253	-97 -223	-66 -192	-36 -162	-5 -131	24 -100	55 -70	85 -39	116 -9
90	140.40	bu	-143 -269	-109 -235	-74 -200	-40 -166	-6 -131	28 -97	62 -63	97 -28	131 5	165 40	200 74
100	156.00	bu	-98 -223	-59 -185	-21 -147	16 -109	54 -71	92 -32	131 5	169 43	207 81	245 120	284 158
110	171.60	bu	-52 -178	-10 -136	31 -94	73 -52	115 -10	157 31	199 73	241 115	283 157	325 199	367 242
120	187.20	bu	-7 -132	38 -86	84 -41	130 4	176 50	222 96	268 142	313 188	359 234	405 279	451 325
130	202.80	bu	38 -87	88 -37	137 12	187 61	237 111	286 161	336 210	386 260	435 310	485 359	535 409
140	218.40	bu	84 -41	137 11	191 65	244 118	298 172	351 225	405 279	458 332	512 386	565 439	619 493
150	234.00	bu	129 3	186 61	244 118	301 175	358 233	416 290	473 347	530 405	588 462	645 519	702 577

The top number in each cell is Returns Above Direct Expenses.
The bottom number in each cell is Returns Above Total Specified Expenses.
Only the product listed has been varied to calculate net returns.
Note: Cost of production estimates are based on 2017 input prices.

Table 37.A Estimated costs per acre
 Clearfield hybrid straight levee rice
 Flood irrigated, 27 ac-in., Delta Area, Mississippi, 2018

ITEM	UNIT	PRICE	QUANTITY	AMOUNT	YOUR FARM
		dollars		dollars	
DIRECT EXPENSES					
CUSTOM SPRAY					
App by Air (5 gal)	appl	6.50	3.5000	22.75	_____
App by Air (10 gal)	appl	9.00	1.0000	9.00	_____
App by Air (3 gal)	appl	5.00	1.5000	7.50	_____
FERTILIZERS					
Amm Sulfate (21% N)	cwt	13.43	0.5000	6.72	_____
DAP	cwt	21.52	0.5000	10.76	_____
Urea, Solid (46% N)	cwt	14.19	3.3220	47.14	_____
NBPT	pt	9.00	0.8000	7.20	_____
HERBICIDES					
Glyphosate 3lbs a.e	oz	0.14	80.0000	11.20	_____
2,4-D Amine 4	pt	2.40	2.0000	4.80	_____
Command 3ME	pt	19.93	1.0000	19.93	_____
Sharpen	oz	6.45	2.0000	12.90	_____
Clearpath	lb	61.26	0.5000	30.63	_____
Newpath	oz	3.83	6.0000	22.98	_____
Aim	oz	5.65	1.5000	8.48	_____
Clincher SF	oz	2.34	7.5000	17.55	_____
INSECTICIDES					
Karate Z	oz	2.74	3.0000	8.22	_____
SEED/PLANTS					
Rice Clrflld Hyb Trt	lb	5.55	23.0000	127.65	_____
Rice Seed CFH(Levee)	lb	1.78	4.2500	7.57	_____
Rice Seed Trt/Insect	lbseed	0.23	4.2500	0.98	_____
ADJUVANTS					
MSO	pt	2.61	1.5000	3.92	_____
Class Act NG	pt	2.38	0.5000	1.19	_____
Crop Oil Conc. (Pet.)	pt	2.74	4.0000	10.96	_____
CUSTOM FERTILIZE					
App Fert by Air	cwt	7.00	4.3220	30.25	_____
HAULING					
Haul Rice	bu	0.35	170.0000	59.50	_____
DRYING					
Dry Rice	bu	0.40	170.0000	68.00	_____
SURVEY & MARK LEVEES					
Survey & Mark Levees	acre	4.50	0.5000	2.25	_____
CROP CONSULTANT					
Rice Consultant	acre	8.00	1.0000	8.00	_____
SOIL TEST					
Soil Test	acre	10.00	0.3330	3.33	_____
OPERATOR LABOR					
Tractors	hour	13.51	0.4999	6.74	_____
Harvesters	hour	13.51	0.1760	2.38	_____
IRRIGATE LABOR					
Special Labor	hour	9.06	2.3750	21.52	_____
HAND LABOR					
Special Labor	hour	9.06	0.2500	2.27	_____
Implements	hour	9.06	0.0785	0.71	_____
RICE MGT. LABOR					
Special Labor	hour	9.06	0.7000	6.34	_____
UNALLOCATED LABOR					
	hour	13.50	0.5389	7.28	_____
DIESEL FUEL					
Tractors	gal	1.80	5.5719	10.05	_____
Harvesters	gal	1.80	2.9444	5.30	_____
Flood Irr.	gal	1.80	21.9949	39.58	_____
REPAIR & MAINTENANCE					
Implements	acre	7.93	1.0000	7.93	_____
Tractors	acre	3.14	1.0000	3.14	_____
Harvesters	acre	6.51	1.0000	6.51	_____
Flood Irr.	acre	13.78	1.0000	13.78	_____
INTEREST ON OP. CAP.	acre	13.04	1.0000	13.04	_____
TOTAL DIRECT EXPENSES				717.93	_____
FIXED EXPENSES					
Implements	acre	16.84	1.0000	16.84	_____
Tractors	acre	19.79	1.0000	19.79	_____
Harvesters	acre	25.68	1.0000	25.68	_____
Flood Irr.	acre	66.91	1.0000	66.91	_____
TOTAL FIXED EXPENSES				129.22	_____
TOTAL SPECIFIED EXPENSES				847.15	_____

Note: Cost of production estimates are based on 2017 input prices.

Fertilization decisions should be based on soil tests.

Soil test cost is prorated for a test every 3rd year.

Table 37.B Summary of estimated costs and returns per acre
 Clearfield hybrid straight levee rice
 Flood irrigated, 27 ac-in., Delta Area, Mississippi, 2018

ITEM	UNIT	PRICE	QUANTITY	AMOUNT	YOUR FARM
		dollars		dollars	
INCOME					
Rice	bu	4.90	170.0000	833.00	_____

TOTAL INCOME				833.00	_____
DIRECT EXPENSES					
CUSTOM SPRAY	acre	39.25	1.0000	39.25	_____
FERTILIZERS	acre	71.82	1.0000	71.82	_____
HERBICIDES	acre	128.47	1.0000	128.47	_____
INSECTICIDES	acre	8.22	1.0000	8.22	_____
SEED/PLANTS	acre	136.20	1.0000	136.20	_____
ADJUVANTS	acre	16.07	1.0000	16.07	_____
CUSTOM FERTILIZE	acre	30.25	1.0000	30.25	_____
HAULING	acre	59.50	1.0000	59.50	_____
DRYING	acre	68.00	1.0000	68.00	_____
SURVEY & MARK LEVEES	acre	2.25	1.0000	2.25	_____
CROP CONSULTANT	acre	8.00	1.0000	8.00	_____
SOIL TEST	acre	3.33	1.0000	3.33	_____
HAND LABOR	hour	9.06	0.3285	2.98	_____
IRRIGATE LABOR	hour	9.06	2.3750	21.52	_____
OPERATOR LABOR	hour	13.51	0.6759	9.12	_____
RICE MGT. LABOR	hour	9.06	0.7000	6.34	_____
UNALLOCATED LABOR	hour	13.50	0.5389	7.28	_____
DIESEL FUEL	gal	1.80	30.5114	54.93	_____
REPAIR & MAINTENANCE	acre	31.36	1.0000	31.36	_____
INTEREST ON OP. CAP.	acre	13.04	1.0000	13.04	_____

TOTAL DIRECT EXPENSES				717.93	_____
RETURNS ABOVE DIRECT EXPENSES				115.07	_____
TOTAL FIXED EXPENSES				129.22	_____

TOTAL SPECIFIED EXPENSES				847.15	_____
RETURNS ABOVE TOTAL SPECIFIED EXPENSES				-14.15	_____

Note: Cost of production estimates are based on 2017 input prices.

Fertilization decisions should be based on soil tests.

Soil test cost is prorated for a test every 3rd year.

Table 37.C Estimated resource use for field operations, per acre
 Clearfield hybrid straight levee rice
 Flood irrigated, 27 ac-in., Delta Area, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	POWER UNIT SIZE	PERF RATE	TIMES OVER	MTH	INPUT AMOUNT	IMPLEMENT	POWER UNIT	ALLOC LABOR	UNALL LABOR
						-----hours-----				
Soil Test	acre			0.33	Oct	0.3330				
Field Cultivate Fld	32'	MFWD 225	0.046	2.00	Oct		0.09	0.09	0.09	0.08
Harrow - Folding	40'	MFWD 225	0.038	1.00	Oct		0.03	0.03	0.03	0.03
App by Air (5 gal)	appl			1.00	Feb	1.0000				
Glyphosate 3lbs a.e	oz					48.0000				
2,4-D Amine 4	pt					2.0000				
Grain Drill	24'	MFWD 225	0.078	1.00	Apr		0.07	0.07	0.15	0.07
Rice Clrflld Hyb Trt	lb					23.0000				
Roller/Cultipacker	30'	MFWD 225	0.049	1.00	Apr		0.04	0.04	0.04	0.04
App by Air (5 gal)	appl			1.00	Apr	1.0000				
Glyphosate 3lbs a.e	oz					32.0000				
Command 3ME	pt					1.0000				
Sharpen	oz					2.0000				
MSO	pt					0.5000				
Class Act NG	pt					0.5000				
Seed Levees				1.00	Apr					
Rice Seed CFH (Levee)	lb					4.2500				
Rice Seed Trt/Insect	lbseed					4.2500				
App by Air (5 gal)	appl			1.00	Apr	1.0000				
Clearpath	lb					0.5000				
Crop Oil Conc. (Pet.)	pt					2.0000				
App Fert by Air	cwt			1.00	May	1.0000				
Amm Sulfate (21% N)	cwt					0.5000				
DAP	cwt					0.5000				
Rice Consultant	acre			1.00	May	1.0000				
App Fert by Air	cwt			1.00	May	2.6700				
Urea, Solid (46% N)	cwt					2.6700				
NBPT	pt					0.8000				
App by Air (10 gal)	appl			1.00	May	1.0000				
Newpath	oz					6.0000				
Crop Oil Conc. (Pet.)	pt					2.0000				
Aim	oz					1.5000				
Rice Management				1.00	May					
RICE MGT. LABOR	hour								0.10	
App by Air (5 gal)	appl			0.50	Jun	0.5000				
Clincher SF	oz					7.5000				
MSO	pt					1.0000				
Rice Management				1.00	Jun					
RICE MGT. LABOR	hour								0.20	
App Fert by Air	cwt			1.00	Jun	0.6520				
Urea, Solid (46% N)	cwt					0.6520				
Rice Management				1.00	Jul					
RICE MGT. LABOR	hour								0.20	
App by Air (3 gal)	appl			1.50	Jul	1.5000				
Karate Z	oz					3.0000				
Rice Management				1.00	Aug					
RICE MGT. LABOR	hour								0.20	
Header - Draper (SL)	25' Rigid	325 hp	0.176	1.00	Aug		0.17	0.17	0.17	0.15
Grain Cart Rice	700 bu	MFWD 225	0.055	0.20	Aug		0.01	0.01	0.01	0.00
Handling & Storage				1.00	Aug					
HAND LABOR	hour								0.25	
Haul Rice	bu			1.00	Aug	170.0000				
Dry Rice	bu			1.00	Aug	170.0000				
Disk Heavy	28'	MFWD 225	0.075	2.00	Sep		0.15	0.15	0.15	0.13
Flood Irr.	acre				Jan	1.0000	0.07	0.07	2.45	
TOTALS							0.67	0.67	4.07	0.53

Note: Cost of production estimates are based on 2017 input prices.
Fertilization decisions should be based on soil tests.
Soil test cost is prorated for a test every 3rd year.

Table 37.D Estimated costs for field operations, per acre
 Clearfield hybrid straight levee rice
 Flood irrigated, 27 ac-in., Delta Area, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	-----DIRECT COST-----							FIXED COST	TOTAL COST	
		OP INPUT	FUEL	R&M	LABOR	LEASE	INTER	TOTAL			
-----dollars-----											
Soil Test	acre	3.33						0.16	3.49		3.49
Field Cultivate Fld	32'		1.95	1.51	2.39			0.28	6.13	7.66	13.79
Harrow - Folding	40'		0.81	0.51	0.99			0.11	2.42	1.99	4.41
App by Air (5 gal)	appl	6.50						0.21	6.71		6.71
Glyphosate 3lbs a.e	oz	6.72						0.21	6.93		6.93
2,4-D Amine 4	pt	4.80						0.15	4.95		4.95
Grain Drill	24'		1.64	2.38	2.73			0.16	6.91	6.80	13.71
Rice Clrfld Hyb Trt	lb	127.65						3.03	130.68		130.68
Roller/Cultipacker	30'		1.04	0.55	1.28			0.07	2.94	2.37	5.31
App by Air (5 gal)	appl	6.50						0.15	6.65		6.65
Glyphosate 3lbs a.e	oz	4.48						0.11	4.59		4.59
Command 3ME	pt	19.93						0.47	20.40		20.40
Sharpen	oz	12.90						0.31	13.21		13.21
MSO	pt	1.31						0.03	1.34		1.34
Class Act NG	pt	1.19						0.03	1.22		1.22
Seed Levees											
Rice Seed CFH (Levee)	lb	7.57						0.18	7.75		7.75
Rice Seed Trt/Insect	lbseed	0.98						0.02	1.00		1.00
App by Air (5 gal)	appl	6.50						0.15	6.65		6.65
Clearpath	lb	30.63						0.73	31.36		31.36
Crop Oil Conc. (Pet.)	pt	5.48						0.13	5.61		5.61
App Fert by Air	cwt	7.00						0.14	7.14		7.14
Amm Sulfate (21% N)	cwt	6.72						0.13	6.85		6.85
DAP	cwt	10.76						0.21	10.97		10.97
Rice Consultant	acre	8.00						0.16	8.16		8.16
App Fert by Air	cwt	18.69						0.37	19.06		19.06
Urea, Solid (46% N)	cwt	37.89						0.75	38.64		38.64
NBPT	pt	7.20						0.14	7.34		7.34
App by Air (10 gal)	appl	9.00						0.18	9.18		9.18
Newpath	oz	22.98						0.45	23.43		23.43
Crop Oil Conc. (Pet.)	pt	5.48						0.11	5.59		5.59
Aim	oz	8.48						0.17	8.65		8.65
Rice Management											
RICE MGT. LABOR	hour				0.91			0.02	0.93		0.93
App by Air (5 gal)	appl	3.25						0.05	3.30		3.30
Clincher SF	oz	17.55						0.28	17.83		17.83
MSO	pt	2.61						0.04	2.65		2.65
Rice Management											
RICE MGT. LABOR	hour				1.81			0.03	1.84		1.84
App Fert by Air	cwt	4.56						0.07	4.63		4.63
Urea, Solid (46% N)	cwt	9.25						0.15	9.40		9.40
Rice Management											
RICE MGT. LABOR	hour				1.81			0.02	1.83		1.83
App by Air (3 gal)	appl	7.50						0.09	7.59		7.59
Karate Z	oz	8.22						0.10	8.32		8.32
Rice Management											
RICE MGT. LABOR	hour				1.81			0.01	1.82		1.82
Header - Draper (SL)	25' Rigid		5.30	8.88	4.52			0.15	18.85	29.39	48.24
Grain Cart Rice	700 bu		0.23	0.18	0.28			0.01	0.70	0.64	1.34
Handling & Storage											
HAND LABOR	hour				2.27			0.02	2.29		2.29
Haul Rice	bu	59.50						0.47	59.97		59.97
Dry Rice	bu	68.00						0.54	68.54		68.54
Disk Heavy	28'		3.16	3.10	3.88			0.04	10.18	10.70	20.88
Flood Irr.	acre	2.25	40.80	14.25	22.56			1.45	81.31	69.67	150.98
TOTALS		571.36	54.93	31.36	47.24	0.00	13.04	717.93	129.22	847.15	

Note: Cost of production estimates are based on 2017 input prices.
Fertilization decisions should be based on soil tests.
Soil test cost is prorated for a test every 3rd year.

Table 37.E Estimated monthly income and expense flows per acre
 Clearfield hybrid straight levee rice
 Flood irrigated, 27 ac-in., Delta Area, Mississippi, 2018

ITEM	Oct	Nov	Dec	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep
-----dollars-----												
TOTAL INCOME	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	833.00	0.00
DIRECT EXPENSES												
CUSTOM SPRAY	0.00	0.00	0.00	0.00	6.50	0.00	13.00	9.00	3.25	7.50	0.00	0.00
FERTILIZERS	0.00	0.00	0.00	0.00	0.00	0.00	0.00	62.57	9.25	0.00	0.00	0.00
HERBICIDES	0.00	0.00	0.00	0.00	11.52	0.00	67.94	31.46	17.55	0.00	0.00	0.00
INSECTICIDES	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	8.22	0.00	0.00
SEED/PLANTS	0.00	0.00	0.00	0.00	0.00	0.00	136.20	0.00	0.00	0.00	0.00	0.00
ADJUVANTS	0.00	0.00	0.00	0.00	0.00	0.00	7.98	5.48	2.61	0.00	0.00	0.00
CUSTOM FERTILIZE	0.00	0.00	0.00	0.00	0.00	0.00	0.00	25.69	4.56	0.00	0.00	0.00
HAULING	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	59.50	0.00
DRYING	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	68.00	0.00
SURVEY & MARK LEVEES	0.00	0.00	0.00	0.00	0.00	0.00	2.25	0.00	0.00	0.00	0.00	0.00
CROP CONSULTANT	0.00	0.00	0.00	0.00	0.00	0.00	0.00	8.00	0.00	0.00	0.00	0.00
SOIL TEST	3.33	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
LABOR	3.38	0.00	0.00	0.00	0.00	0.00	11.73	5.44	6.34	6.34	10.13	3.88
LEASE *	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
FUEL	2.76	0.00	0.00	0.00	0.00	0.00	12.31	10.26	10.26	10.26	5.92	3.16
REPAIR & MAINTENANCE	2.02	0.00	0.00	0.00	0.00	0.00	4.99	7.95	2.04	2.04	9.22	3.10
INTEREST ON OP. CAP.	0.55	0.00	0.00	0.00	0.57	0.00	6.09	3.28	0.88	0.41	1.22	0.04
TOTAL DIRECT EXPENSES	12.04	0.00	0.00	0.00	18.59	0.00	262.49	169.13	56.74	34.77	153.99	10.18
NET INCOME	-12.04	0.00	0.00	0.00	-18.59	0.00	-262.49	-169.13	-56.74	-34.77	679.01	-10.18
NET INCOME TO DATE	-12.04	-12.04	-12.04	-12.04	-30.63	-30.63	-293.12	-462.25	-518.99	-553.76	125.25	115.07

Note: Cost of production estimates are based on 2017 input prices.

Fertilization decisions should be based on soil tests.

Soil test cost is prorated for a test every 3rd year.

* Lease costs are based on hourly usage costs.

Table 37.F Estimated returns for various price/yield combinations, per acre
Clearfield hybrid straight levee rice
Flood irrigated, 27 ac-in., Delta Area, Mississippi, 2018

			PERCENT										
PRODUCT			75	80	85	90	95	100	105	110	115	120	125
			PRODUCT PRICE										
Rice			3.67	3.92	4.16	4.41	4.65	4.90	5.14	5.39	5.63	5.88	6.12
PERCENT	YIELD	UNIT	dollars										
50	85.00	bu	-341 -470	-320 -449	-299 -428	-278 -408	-258 -387	-237 -366	-216 -345	-195 -324	-174 -303	-153 -283	-133 -262
60	102.00	bu	-291 -420	-266 -395	-241 -370	-216 -345	-191 -320	-166 -295	-141 -270	-116 -245	-91 -220	-66 -195	-41 -170
70	119.00	bu	-242 -371	-212 -342	-183 -312	-154 -283	-125 -254	-96 -225	-67 -196	-37 -167	-8 -138	20 -108	49 -79
80	136.00	bu	-192 -321	-159 -288	-125 -255	-92 -221	-59 -188	-25 -155	7 -121	40 -88	74 -55	107 -21	140 11
90	153.00	bu	-142 -272	-105 -234	-67 -197	-30 -159	7 -122	44 -84	82 -47	119 -9	157 27	194 65	232 102
100	170.00	bu	-93 -222	-51 -180	-9 -139	31 -97	73 -55	115 -14	156 27	198 69	240 110	281 152	323 194
110	187.00	bu	-43 -172	2 -126	48 -81	93 -35	139 10	185 56	231 102	277 147	322 193	368 239	414 285
120	204.00	bu	6 -123	56 -73	106 -23	156 26	205 76	255 126	305 176	355 226	405 276	455 326	505 376
130	221.00	bu	55 -73	109 -19	163 34	218 88	272 143	326 197	380 251	434 305	488 359	542 413	597 467
140	238.00	bu	105 -23	163 34	221 92	280 151	338 209	396 267	455 325	513 384	571 442	630 500	688 559
150	255.00	bu	154 25	217 88	279 150	342 213	404 275	467 338	529 400	592 463	654 525	717 587	779 650

The top number in each cell is Returns Above Direct Expenses.
The bottom number in each cell is Returns Above Total Specified Expenses.
Only the product listed has been varied to calculate net returns.
Note: Cost of production estimates are based on 2017 input prices.

Table 38.A Estimated costs per acre
 Clearfield hybrid straight levee multi inlet rice
 Flood irrigated, 23 ac-in., Delta Area, Mississippi, 2018

ITEM	UNIT	PRICE	QUANTITY	AMOUNT	YOUR FARM
		dollars		dollars	
DIRECT EXPENSES					
CUSTOM SPRAY					
App by Air (5 gal)	appl	6.50	3.5000	22.75	_____
App by Air (10 gal)	appl	9.00	1.0000	9.00	_____
App by Air (3 gal)	appl	5.00	1.5000	7.50	_____
FERTILIZERS					
Amm Sulfate (21% N)	cwt	13.43	0.5000	6.72	_____
DAP	cwt	21.52	0.5000	10.76	_____
Urea, Solid (46% N)	cwt	14.19	3.3220	47.14	_____
NBPT	pt	9.00	0.8000	7.20	_____
HERBICIDES					
Glyphosate 3lbs a.e	oz	0.14	80.0000	11.20	_____
2,4-D Amine 4	pt	2.40	2.0000	4.80	_____
Command 3ME	pt	19.93	1.0000	19.93	_____
Sharpen	oz	6.45	2.0000	12.90	_____
Clearpath	lb	61.26	0.5000	30.63	_____
Newpath	oz	3.83	6.0000	22.98	_____
Aim	oz	5.65	1.5000	8.48	_____
Clincher SF	oz	2.34	7.5000	17.55	_____
INSECTICIDES					
Karate Z	oz	2.74	3.0000	8.22	_____
IRRIGATION SUPPLIES					
Roll-Out Pipe	ft	0.25	33.0000	8.25	_____
SEED/PLANTS					
Rice Clrflld Hyb Trt	lb	5.55	23.0000	127.65	_____
Rice Seed CFH (Levee)	lb	1.78	4.2500	7.57	_____
Rice Seed Trt/Insect	lbseed	0.23	4.2500	0.98	_____
ADJUVANTS					
MSO	pt	2.61	1.5000	3.92	_____
Class Act NG	pt	2.38	0.5000	1.19	_____
Crop Oil Conc. (Pet.)	pt	2.74	4.0000	10.96	_____
CUSTOM FERTILIZE					
App Fert by Air	cwt	7.00	4.3220	30.25	_____
HAULING					
Haul Rice	bu	0.35	170.0000	59.50	_____
DRYING					
Dry Rice	bu	0.40	170.0000	68.00	_____
SURVEY & MARK LEVEES					
Survey & Mark Levees	acre	4.50	0.5000	2.25	_____
CROP CONSULTANT					
Rice Consultant	acre	8.00	1.0000	8.00	_____
SOIL TEST					
Soil Test	acre	10.00	0.3330	3.33	_____
OPERATOR LABOR					
Tractors	hour	13.51	0.5281	7.12	_____
Harvesters	hour	13.51	0.1760	2.38	_____
IRRIGATE LABOR					
Special Labor	hour	9.06	1.1250	10.18	_____
Implements	hour	9.06	0.0375	0.34	_____
HAND LABOR					
Special Labor	hour	9.06	0.2500	2.27	_____
Implements	hour	9.06	0.0785	0.71	_____
RICE MGT. LABOR					
Special Labor	hour	9.06	0.7000	6.34	_____
UNALLOCATED LABOR					
	hour	13.50	0.5389	7.28	_____
DIESEL FUEL					
Tractors	gal	1.80	5.8180	10.50	_____
Harvesters	gal	1.80	2.9444	5.30	_____
Flood Irr.	gal	1.80	18.7364	33.73	_____
REPAIR & MAINTENANCE					
Implements	acre	7.99	1.0000	7.99	_____
Tractors	acre	3.27	1.0000	3.27	_____
Harvesters	acre	6.51	1.0000	6.51	_____
Flood Irr.	acre	13.46	1.0000	13.46	_____
INTEREST ON OP. CAP.	acre	12.96	1.0000	12.96	_____
TOTAL DIRECT EXPENSES				709.95	_____
FIXED EXPENSES					
Implements	acre	17.29	1.0000	17.29	_____
Tractors	acre	20.64	1.0000	20.64	_____
Harvesters	acre	25.68	1.0000	25.68	_____
Flood Irr.	acre	66.58	1.0000	66.58	_____
TOTAL FIXED EXPENSES				130.19	_____
TOTAL SPECIFIED EXPENSES				840.14	_____

Note: Cost of production estimates are based on 2017 input prices.

Fertilization decisions should be based on soil tests.
Soil test cost is prorated for a test every 3rd year.

Table 38.B Summary of estimated costs and returns per acre
 Clearfield hybrid straight levee multi inlet rice
 Flood irrigated, 23 ac-in., Delta Area, Mississippi, 2018

ITEM	UNIT	PRICE	QUANTITY	AMOUNT	YOUR FARM
		dollars		dollars	
INCOME					
Rice	bu	4.90	170.0000	833.00	_____

TOTAL INCOME				833.00	_____
DIRECT EXPENSES					
CUSTOM SPRAY	acre	39.25	1.0000	39.25	_____
FERTILIZERS	acre	71.82	1.0000	71.82	_____
HERBICIDES	acre	128.47	1.0000	128.47	_____
INSECTICIDES	acre	8.22	1.0000	8.22	_____
IRRIGATION SUPPLIES	acre	8.25	1.0000	8.25	_____
SEED/PLANTS	acre	136.20	1.0000	136.20	_____
ADJUVANTS	acre	16.07	1.0000	16.07	_____
CUSTOM FERTILIZE	acre	30.25	1.0000	30.25	_____
HAULING	acre	59.50	1.0000	59.50	_____
DRYING	acre	68.00	1.0000	68.00	_____
SURVEY & MARK LEVEES	acre	2.25	1.0000	2.25	_____
CROP CONSULTANT	acre	8.00	1.0000	8.00	_____
SOIL TEST	acre	3.33	1.0000	3.33	_____
HAND LABOR	hour	9.06	0.3285	2.98	_____
IRRIGATE LABOR	hour	9.06	1.1625	10.52	_____
OPERATOR LABOR	hour	13.51	0.7041	9.50	_____
RICE MGT. LABOR	hour	9.06	0.7000	6.34	_____
UNALLOCATED LABOR	hour	13.50	0.5389	7.28	_____
DIESEL FUEL	gal	1.80	27.4990	49.53	_____
REPAIR & MAINTENANCE	acre	31.23	1.0000	31.23	_____
INTEREST ON OP. CAP.	acre	12.96	1.0000	12.96	_____

TOTAL DIRECT EXPENSES				709.95	_____
RETURNS ABOVE DIRECT EXPENSES				123.05	_____
TOTAL FIXED EXPENSES				130.19	_____

TOTAL SPECIFIED EXPENSES				840.14	_____
RETURNS ABOVE TOTAL SPECIFIED EXPENSES				-7.14	_____

Note: Cost of production estimates are based on 2017 input prices.

Fertilization decisions should be based on soil tests.

Soil test cost is prorated for a test every 3rd year.

Table 38.C Estimated resource use for field operations, per acre
 Clearfield hybrid straight levee multi inlet rice
 Flood irrigated, 23 ac-in., Delta Area, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	POWER UNIT SIZE	PERF RATE	TIMES OVER	MTH	INPUT AMOUNT	IMPLEMENT	POWER UNIT	ALLOC LABOR	UNALL LABOR
-----hours-----										
Soil Test	acre			0.33	Oct	0.3330				
Field Cultivate Fld	32'	MFWD 225	0.046	2.00	Oct		0.09	0.09	0.09	0.08
Harrow - Folding	40'	MFWD 225	0.038	1.00	Oct		0.03	0.03	0.03	0.03
App by Air (5 gal)	appl			1.00	Feb	1.0000				
Glyphosate 3lbs a.e	oz					48.0000				
2,4-D Amine 4	pt					2.0000				
Grain Drill	24'	MFWD 225	0.078	1.00	Apr		0.07	0.07	0.15	0.07
Rice Clrflld Hyb Trt	lb					23.0000				
Roller/Cultipacker	30'	MFWD 225	0.049	1.00	Apr		0.04	0.04	0.04	0.04
App by Air (5 gal)	appl			1.00	Apr	1.0000				
Glyphosate 3lbs a.e	oz					32.0000				
Command 3ME	pt					1.0000				
Sharpen	oz					2.0000				
MSO	pt					0.5000				
Class Act NG	pt					0.5000				
Seed Levees				1.00	Apr					
Rice Seed CFH(Levee)	lb					4.2500				
Rice Seed Trt/Insect	lbseed					4.2500				
App by Air (5 gal)	appl			1.00	Apr	1.0000				
Clearpath	lb					0.5000				
Crop Oil Conc.(Pet.)	pt					2.0000				
App Fert by Air	cwt			1.00	May	1.0000				
Amm Sulfate (21% N)	cwt					0.5000				
DAP	cwt					0.5000				
Rice Consultant	acre			1.00	May	1.0000				
App Fert by Air	cwt			1.00	May	2.6700				
Urea, Solid (46% N)	cwt					2.6700				
NBPT	pt					0.8000				
App by Air (10 gal)	appl			1.00	May	1.0000				
Newpath	oz					6.0000				
Crop Oil Conc.(Pet.)	pt					2.0000				
Aim	oz					1.5000				
Rice Management				1.00	May					
RICE MGT. LABOR	hour								0.10	
App by Air (5 gal)	appl			0.50	Jun	0.5000				
Clincher SF	oz					7.5000				
MSO	pt					1.0000				
Rice Management				1.00	Jun					
RICE MGT. LABOR	hour								0.20	
App Fert by Air	cwt			1.00	Jun	0.6520				
Urea, Solid (46% N)	cwt					0.6520				
Rice Management				1.00	Jul					
RICE MGT. LABOR	hour								0.20	
App by Air (3 gal)	appl			1.50	Jul	1.5000				
Karate Z	oz					3.0000				
Rice Management				1.00	Aug					
RICE MGT. LABOR	hour								0.20	
Header - Draper (SL)	25' Rigid	325 hp	0.176	1.00	Aug		0.17	0.17	0.17	0.15
Grain Cart Rice	700 bu	MFWD 225	0.055	0.20	Aug		0.01	0.01	0.01	0.00
Handling & Storage				1.00	Aug					
HAND LABOR	hour								0.25	
Haul Rice	bu			1.00	Aug	170.0000				
Dry Rice	bu			1.00	Aug	170.0000				
Disk Heavy	28'	MFWD 225	0.075	2.00	Sep		0.15	0.15	0.15	0.13
Flood Irr.	acre				Jan	1.0000		0.10	0.10	1.26
TOTALS							0.70	0.70	2.89	0.53

Note: Cost of production estimates are based on 2017 input prices.
Fertilization decisions should be based on soil tests.
Soil test cost is prorated for a test every 3rd year.

Table 38.D Estimated costs for field operations, per acre
 Clearfield hybrid straight levee multi inlet rice
 Flood irrigated, 23 ac-in., Delta Area, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	-----DIRECT COST-----							FIXED COST	TOTAL COST
		OP INPUT	FUEL	R&M	LABOR	LEASE	INTER	TOTAL		
-----dollars-----										
Soil Test	acre	3.33						0.16	3.49	3.49
Field Cultivate Fld	32'		1.95	1.51	2.39			0.28	6.13	7.66
Harrow - Folding	40'		0.81	0.51	0.99			0.11	2.42	1.99
App by Air (5 gal)	appl	6.50						0.21	6.71	6.71
Glyphosate 3lbs a.e	oz	6.72						0.21	6.93	6.93
2,4-D Amine 4	pt	4.80						0.15	4.95	4.95
Grain Drill	24'		1.64	2.38	2.73			0.16	6.91	6.80
Rice Clrfld Hyb Trt	lb	127.65						3.03	130.68	130.68
Roller/Cultipacker	30'		1.04	0.55	1.28			0.07	2.94	2.37
App by Air (5 gal)	appl	6.50						0.15	6.65	6.65
Glyphosate 3lbs a.e	oz	4.48						0.11	4.59	4.59
Command 3ME	pt	19.93						0.47	20.40	20.40
Sharpen	oz	12.90						0.31	13.21	13.21
MSO	pt	1.31						0.03	1.34	1.34
Class Act NG	pt	1.19						0.03	1.22	1.22
Seed Levees										
Rice Seed CFH(Levee)	lb	7.57						0.18	7.75	7.75
Rice Seed Trt/Insect	lbseed	0.98						0.02	1.00	1.00
App by Air (5 gal)	appl	6.50						0.15	6.65	6.65
Clearpath	lb	30.63						0.73	31.36	31.36
Crop Oil Conc.(Pet.)	pt	5.48						0.13	5.61	5.61
App Fert by Air	cwt	7.00						0.14	7.14	7.14
Amm Sulfate (21% N)	cwt	6.72						0.13	6.85	6.85
DAP	cwt	10.76						0.21	10.97	10.97
Rice Consultant	acre	8.00						0.16	8.16	8.16
App Fert by Air	cwt	18.69						0.37	19.06	19.06
Urea, Solid (46% N)	cwt	37.89						0.75	38.64	38.64
NBPT	pt	7.20						0.14	7.34	7.34
App by Air (10 gal)	appl	9.00						0.18	9.18	9.18
Newpath	oz	22.98						0.45	23.43	23.43
Crop Oil Conc.(Pet.)	pt	5.48						0.11	5.59	5.59
Aim	oz	8.48						0.17	8.65	8.65
Rice Management										
RICE MGT. LABOR	hour				0.91			0.02	0.93	0.93
App by Air (5 gal)	appl	3.25						0.05	3.30	3.30
Clincher SF	oz	17.55						0.28	17.83	17.83
MSO	pt	2.61						0.04	2.65	2.65
Rice Management										
RICE MGT. LABOR	hour				1.81			0.03	1.84	1.84
App Fert by Air	cwt	4.56						0.07	4.63	4.63
Urea, Solid (46% N)	cwt	9.25						0.15	9.40	9.40
Rice Management										
RICE MGT. LABOR	hour				1.81			0.02	1.83	1.83
App by Air (3 gal)	appl	7.50						0.09	7.59	7.59
Karate Z	oz	8.22						0.10	8.32	8.32
Rice Management										
RICE MGT. LABOR	hour				1.81			0.01	1.82	1.82
Header - Draper (SL)	25' Rigid		5.30	8.88	4.52			0.15	18.85	29.39
Grain Cart Rice	700 bu		0.23	0.18	0.28			0.01	0.70	0.64
Handling & Storage										
HAND LABOR	hour				2.27			0.02	2.29	2.29
Haul Rice	bu	59.50						0.47	59.97	59.97
Dry Rice	bu	68.00						0.54	68.54	68.54
Disk Heavy	28'		3.16	3.10	3.88			0.04	10.18	10.70
Flood Irr.	acre	10.50	35.40	14.12	11.94			1.37	73.33	70.64
TOTALS		579.61	49.53	31.23	36.62	0.00	12.96	709.95	130.19	840.14

Note: Cost of production estimates are based on 2017 input prices.

Fertilization decisions should be based on soil tests.

Soil test cost is prorated for a test every 3rd year.

Table 38.E Estimated monthly income and expense flows per acre
 Clearfield hybrid straight levee multi inlet rice
 Flood irrigated, 23 ac-in., Delta Area, Mississippi, 2018

ITEM	Oct	Nov	Dec	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep
-----dollars-----												
TOTAL INCOME	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	833.00	0.00
DIRECT EXPENSES												
CUSTOM SPRAY	0.00	0.00	0.00	0.00	6.50	0.00	13.00	9.00	3.25	7.50	0.00	0.00
FERTILIZERS	0.00	0.00	0.00	0.00	0.00	0.00	0.00	62.57	9.25	0.00	0.00	0.00
HERBICIDES	0.00	0.00	0.00	0.00	11.52	0.00	67.94	31.46	17.55	0.00	0.00	0.00
INSECTICIDES	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	8.22	0.00	0.00
IRRIGATION SUPPLIES	0.00	0.00	0.00	0.00	0.00	0.00	8.25	0.00	0.00	0.00	0.00	0.00
SEED/PLANTS	0.00	0.00	0.00	0.00	0.00	0.00	136.20	0.00	0.00	0.00	0.00	0.00
ADJUVANTS	0.00	0.00	0.00	0.00	0.00	0.00	7.98	5.48	2.61	0.00	0.00	0.00
CUSTOM FERTILIZE	0.00	0.00	0.00	0.00	0.00	0.00	0.00	25.69	4.56	0.00	0.00	0.00
HAULING	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	59.50	0.00
DRYING	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	68.00	0.00
SURVEY & MARK LEVEES	0.00	0.00	0.00	0.00	0.00	0.00	2.25	0.00	0.00	0.00	0.00	0.00
CROP CONSULTANT	0.00	0.00	0.00	0.00	0.00	0.00	0.00	8.00	0.00	0.00	0.00	0.00
SOIL TEST	3.33	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
LABOR	3.38	0.00	0.00	0.00	0.00	0.00	9.54	2.72	3.62	3.62	9.86	3.88
LEASE *	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
FUEL	2.76	0.00	0.00	0.00	0.00	0.00	11.19	8.80	8.80	8.80	6.02	3.16
REPAIR & MAINTENANCE	2.02	0.00	0.00	0.00	0.00	0.00	5.03	7.88	1.97	1.97	9.26	3.10
INTEREST ON OP. CAP.	0.55	0.00	0.00	0.00	0.57	0.00	6.21	3.20	0.82	0.36	1.21	0.04
TOTAL DIRECT EXPENSES	12.04	0.00	0.00	0.00	18.59	0.00	267.59	164.80	52.43	30.47	153.85	10.18
NET INCOME	-12.04	0.00	0.00	0.00	-18.59	0.00	-267.59	-164.80	-52.43	-30.47	679.15	-10.18
NET INCOME TO DATE	-12.04	-12.04	-12.04	-12.04	-30.63	-30.63	-298.22	-463.02	-515.45	-545.92	133.23	123.05

Note: Cost of production estimates are based on 2017 input prices.

Fertilization decisions should be based on soil tests.

Soil test cost is prorated for a test every 3rd year.

* Lease costs are based on hourly usage costs

Table 38.F Estimated returns for various price/yield combinations, per acre
 Clearfield hybrid straight levee multi inlet rice
 Flood irrigated, 23 ac-in., Delta Area, Mississippi, 2018

PRODUCT			PERCENT										
			75	80	85	90	95	100	105	110	115	120	125
			PRODUCT PRICE										
Rice			3.67	3.92	4.16	4.41	4.65	4.90	5.14	5.39	5.63	5.88	6.12
PERCENT	YIELD	UNIT	dollars										
50	85.00	bu	-333 -463	-312 -442	-291 -421	-270 -401	-250 -380	-229 -359	-208 -338	-187 -317	-166 -296	-145 -276	-125 -255
60	102.00	bu	-283 -413	-258 -388	-233 -363	-208 -338	-183 -313	-158 -288	-133 -263	-108 -238	-83 -213	-58 -188	-33 -163
70	119.00	bu	-234 -364	-204 -335	-175 -305	-146 -276	-117 -247	-88 -218	-59 -189	-29 -160	-0 -131	28 -101	57 -72
80	136.00	bu	-184 -314	-151 -281	-117 -247	-84 -214	-51 -181	-17 -148	15 -114	48 -81	82 -48	115 -14	148 18
90	153.00	bu	-134 -265	-97 -227	-59 -190	-22 -152	15 -115	52 -77	90 -40	127 -2	165 34	202 72	240 109
100	170.00	bu	-85 -215	-43 -173	-1 -132	39 -90	81 -48	123 -7	164 34	206 76	248 117	289 159	331 201
110	187.00	bu	-35 -165	10 -119	56 -74	101 -28	147 17	193 63	239 109	285 154	330 200	376 246	422 292
120	204.00	bu	14 -116	64 -66	114 -16	163 33	213 83	263 133	313 183	363 233	413 283	463 333	513 383
130	221.00	bu	63 -66	117 -12	171 41	226 95	280 150	334 204	388 258	442 312	496 366	550 420	605 474
140	238.00	bu	113 -16	171 41	229 99	288 158	346 216	404 274	463 332	521 391	579 449	638 507	696 566
150	255.00	bu	162 32	225 95	287 157	350 220	412 282	475 345	537 407	600 470	662 532	725 595	787 657

The top number in each cell is Returns Above Direct Expenses.
 The bottom number in each cell is Returns Above Total Specified Expenses.
 Only the product listed has been varied to calculate net returns.
 Note: Cost of production estimates are based on 2017 input prices.

Table 39.A Estimated costs per acre
 Clearfield hybrid straight levee-zero grade rice
 Flood irrigated, 19 ac-in., Delta Area, Mississippi, 2018

ITEM	UNIT	PRICE	QUANTITY	AMOUNT	YOUR FARM
		dollars		dollars	
DIRECT EXPENSES					
CUSTOM SPRAY					
App by Air (5 gal)	appl	6.50	3.5000	22.75	_____
App by Air (10 gal)	appl	9.00	1.0000	9.00	_____
App by Air (3 gal)	appl	5.00	1.5000	7.50	_____
FERTILIZERS					
Amm Sulfate (21% N)	cwt	13.43	0.5000	6.72	_____
DAP	cwt	21.52	0.5000	10.76	_____
Urea, Solid (46% N)	cwt	14.19	3.3220	47.14	_____
NBPT	pt	9.00	0.8000	7.20	_____
HERBICIDES					
Glyphosate 3lbs a.e	oz	0.14	80.0000	11.20	_____
2,4-D Amine 4	pt	2.40	2.0000	4.80	_____
Command 3ME	pt	19.93	1.0000	19.93	_____
Sharpen	oz	6.45	2.0000	12.90	_____
Clearpath	lb	61.26	0.5000	30.63	_____
Newpath	oz	3.83	6.0000	22.98	_____
Aim	oz	5.65	1.5000	8.48	_____
Clincher SF	oz	2.34	7.5000	17.55	_____
INSECTICIDES					
Karate Z	oz	2.74	3.0000	8.22	_____
SEED/PLANTS					
Rice Clrflld Hyb Trt	lb	5.55	23.0000	127.65	_____
Rice Seed CFH(Levee)	lb	1.78	4.2500	7.57	_____
Rice Seed Trt/Insect	lbseed	0.23	4.2500	0.98	_____
ADJUVANTS					
MSO	pt	2.61	1.5000	3.92	_____
Class Act NG	pt	2.38	0.5000	1.19	_____
Crop Oil Conc. (Pet.)	pt	2.74	4.0000	10.96	_____
CUSTOM FERTILIZE					
App Fert by Air	cwt	7.00	4.3220	30.25	_____
HAULING					
Haul Rice	bu	0.35	170.0000	59.50	_____
DRYING					
Dry Rice	bu	0.40	170.0000	68.00	_____
CROP CONSULTANT					
Rice Consultant	acre	8.00	1.0000	8.00	_____
SOIL TEST					
Soil Test	acre	10.00	0.3330	3.33	_____
OPERATOR LABOR					
Tractors	hour	13.51	0.4228	5.70	_____
Harvesters	hour	13.51	0.1760	2.38	_____
IRRIGATE LABOR					
Special Labor	hour	9.06	1.0500	9.53	_____
HAND LABOR					
Special Labor	hour	9.06	0.2500	2.27	_____
Implements	hour	9.06	0.0785	0.71	_____
RICE MGT. LABOR					
Special Labor	hour	9.06	0.7000	6.34	_____
UNALLOCATED LABOR	hour	13.50	0.5389	7.28	_____
DIESEL FUEL					
Tractors	gal	1.80	4.8970	8.83	_____
Harvesters	gal	1.80	2.9444	5.30	_____
Flood Irr.	gal	1.80	15.4779	27.86	_____
REPAIR & MAINTENANCE					
Implements	acre	7.83	1.0000	7.83	_____
Tractors	acre	2.77	1.0000	2.77	_____
Harvesters	acre	6.51	1.0000	6.51	_____
Flood Irr.	acre	11.46	1.0000	11.46	_____
INTEREST ON OP. CAP.	acre	12.46	1.0000	12.46	_____
TOTAL DIRECT EXPENSES				686.34	_____
FIXED EXPENSES					
Implements	acre	16.40	1.0000	16.40	_____
Tractors	acre	17.47	1.0000	17.47	_____
Harvesters	acre	25.68	1.0000	25.68	_____
Flood Irr.	acre	66.25	1.0000	66.25	_____
TOTAL FIXED EXPENSES				125.80	_____
TOTAL SPECIFIED EXPENSES				812.14	_____

Note: Cost of production estimates are based on 2017 input prices.
Fertilization decisions should be based on soil tests.
Soil test cost is prorated for a test every 3rd year.

Table 39.B Summary of estimated costs and returns per acre
 Clearfield hybrid straight levee-zero grade rice
 Flood irrigated, 19 ac-in., Delta Area, Mississippi, 2018

ITEM	UNIT	PRICE	QUANTITY	AMOUNT	YOUR FARM
		dollars		dollars	
INCOME					
Rice	bu	4.90	170.0000	833.00	_____

TOTAL INCOME				833.00	_____
DIRECT EXPENSES					
CUSTOM SPRAY	acre	39.25	1.0000	39.25	_____
FERTILIZERS	acre	71.82	1.0000	71.82	_____
HERBICIDES	acre	128.47	1.0000	128.47	_____
INSECTICIDES	acre	8.22	1.0000	8.22	_____
SEED/PLANTS	acre	136.20	1.0000	136.20	_____
ADJUVANTS	acre	16.07	1.0000	16.07	_____
CUSTOM FERTILIZE	acre	30.25	1.0000	30.25	_____
HAULING	acre	59.50	1.0000	59.50	_____
DRYING	acre	68.00	1.0000	68.00	_____
CROP CONSULTANT	acre	8.00	1.0000	8.00	_____
SOIL TEST	acre	3.33	1.0000	3.33	_____
HAND LABOR	hour	9.06	0.3285	2.98	_____
IRRIGATE LABOR	hour	9.06	1.0500	9.53	_____
OPERATOR LABOR	hour	13.51	0.5988	8.08	_____
RICE MGT. LABOR	hour	9.06	0.7000	6.34	_____
UNALLOCATED LABOR	hour	13.50	0.5389	7.28	_____
DIESEL FUEL	gal	1.80	23.3194	41.99	_____
REPAIR & MAINTENANCE	acre	28.57	1.0000	28.57	_____
INTEREST ON OP. CAP.	acre	12.46	1.0000	12.46	_____

TOTAL DIRECT EXPENSES				686.34	_____
RETURNS ABOVE DIRECT EXPENSES				146.66	_____
TOTAL FIXED EXPENSES				125.80	_____

TOTAL SPECIFIED EXPENSES				812.14	_____
RETURNS ABOVE TOTAL SPECIFIED EXPENSES				20.86	_____

Note: Cost of production estimates are based on 2017 input prices.

Fertilization decisions should be based on soil tests.

Soil test cost is prorated for a test every 3rd year.

Table 39.C Estimated resource use for field operations, per acre
 Clearfield hybrid straight levee-zero grade rice
 Flood irrigated, 19 ac-in., Delta Area, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	POWER UNIT SIZE	PERF RATE	TIMES OVER	MTH	INPUT AMOUNT	IMPLEMENT	POWER UNIT	ALLOC LABOR	UNALL LABOR
-----hours-----										
Soil Test	acre			0.33	Oct	0.3330				
Field Cultivate Fld	32'	MFWD 225	0.046	2.00	Oct		0.09	0.09	0.09	0.08
Harrow - Folding	40'	MFWD 225	0.038	1.00	Oct		0.03	0.03	0.03	0.03
App by Air (5 gal)	appl			1.00	Feb	1.0000				
Glyphosate 3lbs a.e	oz					48.0000				
2,4-D Amine 4	pt					2.0000				
Grain Drill	24'	MFWD 225	0.078	1.00	Apr		0.07	0.07	0.15	0.07
Rice Clrflld Hyb Trt	lb					23.0000				
Roller/Cultipacker	30'	MFWD 225	0.049	1.00	Apr		0.04	0.04	0.04	0.04
App by Air (5 gal)	appl			1.00	Apr	1.0000				
Glyphosate 3lbs a.e	oz					32.0000				
Command 3ME	pt					1.0000				
Sharpen	oz					2.0000				
MSO	pt					0.5000				
Class Act NG	pt					0.5000				
Seed Levees				1.00	Apr					
Rice Seed CFH(Levee)	lb					4.2500				
Rice Seed Trt/Insect	lbseed					4.2500				
App by Air (5 gal)	appl			1.00	Apr	1.0000				
Clearpath	lb					0.5000				
Crop Oil Conc.(Pet.)	pt					2.0000				
App Fert by Air	cwt			1.00	May	1.0000				
Amm Sulfate (21% N)	cwt					0.5000				
DAP	cwt					0.5000				
Rice Consultant	acre			1.00	May	1.0000				
App Fert by Air	cwt			1.00	May	2.6700				
Urea, Solid (46% N)	cwt					2.6700				
NBPT	pt					0.8000				
App by Air (10 gal)	appl			1.00	May	1.0000				
Newpath	oz					6.0000				
Crop Oil Conc.(Pet.)	pt					2.0000				
Aim	oz					1.5000				
Rice Management				1.00	May					
RICE MGT. LABOR	hour								0.10	
App by Air (5 gal)	appl			0.50	Jun	0.5000				
Clincher SF	oz					7.5000				
MSO	pt					1.0000				
Rice Management				1.00	Jun					
RICE MGT. LABOR	hour								0.20	
App Fert by Air	cwt			1.00	Jun	0.6520				
Urea, Solid (46% N)	cwt					0.6520				
Rice Management				1.00	Jul					
RICE MGT. LABOR	hour								0.20	
App by Air (3 gal)	appl			1.50	Jul	1.5000				
Karate Z	oz					3.0000				
Rice Management				1.00	Aug					
RICE MGT. LABOR	hour								0.20	
Header - Draper (SL)	25' Rigid	325 hp	0.176	1.00	Aug		0.17	0.17	0.17	0.15
Grain Cart Rice	700 bu	MFWD 225	0.055	0.20	Aug		0.01	0.01	0.01	0.00
Handling & Storage				1.00	Aug					
HAND LABOR	hour								0.25	
Haul Rice	bu			1.00	Aug	170.0000				
Dry Rice	bu			1.00	Aug	170.0000				
Disk Heavy	28'	MFWD 225	0.075	2.00	Sep		0.15	0.15	0.15	0.13
Flood Irr.	acre				Jan	1.0000			1.05	
TOTALS							0.59	0.59	2.67	0.53

Note: Cost of production estimates are based on 2017 input prices.
Fertilization decisions should be based on soil tests.
Soil test cost is prorated for a test every 3rd year.

Table 39.D Estimated costs for field operations, per acre
 Clearfield hybrid straight levee-zero grade rice
 Flood irrigated, 19 ac-in., Delta Area, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	-----DIRECT COST-----							FIXED COST	TOTAL COST
		OP INPUT	FUEL	R&M	LABOR	LEASE	INTER	TOTAL		
-----dollars-----										
Soil Test	acre	3.33						0.16	3.49	3.49
Field Cultivate Fld	32'		1.95	1.51	2.39			0.28	6.13	7.66
Harrow - Folding	40'		0.81	0.51	0.99			0.11	2.42	1.99
App by Air (5 gal)	appl	6.50						0.21	6.71	6.71
Glyphosate 3lbs a.e	oz	6.72						0.21	6.93	6.93
2,4-D Amine 4	pt	4.80						0.15	4.95	4.95
Grain Drill	24'		1.64	2.38	2.73			0.16	6.91	6.80
Rice Clrfld Hyb Trt	lb	127.65						3.03	130.68	130.68
Roller/Cultipacker	30'		1.04	0.55	1.28			0.07	2.94	2.37
App by Air (5 gal)	appl	6.50						0.15	6.65	6.65
Glyphosate 3lbs a.e	oz	4.48						0.11	4.59	4.59
Command 3ME	pt	19.93						0.47	20.40	20.40
Sharpen	oz	12.90						0.31	13.21	13.21
MSO	pt	1.31						0.03	1.34	1.34
Class Act NG	pt	1.19						0.03	1.22	1.22
Seed Levees										
Rice Seed CFH(Levee)	lb	7.57						0.18	7.75	7.75
Rice Seed Trt/Insect	lbseed	0.98						0.02	1.00	1.00
App by Air (5 gal)	appl	6.50						0.15	6.65	6.65
Clearpath	lb	30.63						0.73	31.36	31.36
Crop Oil Conc.(Pet.)	pt	5.48						0.13	5.61	5.61
App Fert by Air	cwt	7.00						0.14	7.14	7.14
Amm Sulfate (21% N)	cwt	6.72						0.13	6.85	6.85
DAP	cwt	10.76						0.21	10.97	10.97
Rice Consultant	acre	8.00						0.16	8.16	8.16
App Fert by Air	cwt	18.69						0.37	19.06	19.06
Urea, Solid (46% N)	cwt	37.89						0.75	38.64	38.64
NBPT	pt	7.20						0.14	7.34	7.34
App by Air (10 gal)	appl	9.00						0.18	9.18	9.18
Newpath	oz	22.98						0.45	23.43	23.43
Crop Oil Conc.(Pet.)	pt	5.48						0.11	5.59	5.59
Aim	oz	8.48						0.17	8.65	8.65
Rice Management										
RICE MGT. LABOR	hour				0.91			0.02	0.93	0.93
App by Air (5 gal)	appl	3.25						0.05	3.30	3.30
Clincher SF	oz	17.55						0.28	17.83	17.83
MSO	pt	2.61						0.04	2.65	2.65
Rice Management										
RICE MGT. LABOR	hour				1.81			0.03	1.84	1.84
App Fert by Air	cwt	4.56						0.07	4.63	4.63
Urea, Solid (46% N)	cwt	9.25						0.15	9.40	9.40
Rice Management										
RICE MGT. LABOR	hour				1.81			0.02	1.83	1.83
App by Air (3 gal)	appl	7.50						0.09	7.59	7.59
Karate Z	oz	8.22						0.10	8.32	8.32
Rice Management										
RICE MGT. LABOR	hour				1.81			0.01	1.82	1.82
Header - Draper (SL)	25' Rigid		5.30	8.88	4.52			0.15	18.85	29.39
Grain Cart Rice	700 bu		0.23	0.18	0.28			0.01	0.70	0.64
Handling & Storage										
HAND LABOR	hour				2.27			0.02	2.29	2.29
Haul Rice	bu	59.50						0.47	59.97	59.97
Dry Rice	bu	68.00						0.54	68.54	68.54
Disk Heavy	28'		3.16	3.10	3.88			0.04	10.18	10.70
Flood Irr.	acre		27.86	11.46	9.53			0.87	49.72	66.25
TOTALS		569.11	41.99	28.57	34.21	0.00	12.46	686.34	125.80	812.14

Note: Cost of production estimates are based on 2017 input prices.

Fertilization decisions should be based on soil tests.

Soil test cost is prorated for a test every 3rd year.

Table 39.E Estimated monthly income and expense flows per acre
 Clearfield hybrid straight levee-zero grade rice
 Flood irrigated, 19 ac-in., Delta Area, Mississippi, 2018

ITEM	Oct	Nov	Dec	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep
-----dollars-----												
TOTAL INCOME	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	833.00	0.00
DIRECT EXPENSES												
CUSTOM SPRAY	0.00	0.00	0.00	0.00	6.50	0.00	13.00	9.00	3.25	7.50	0.00	0.00
FERTILIZERS	0.00	0.00	0.00	0.00	0.00	0.00	0.00	62.57	9.25	0.00	0.00	0.00
HERBICIDES	0.00	0.00	0.00	0.00	11.52	0.00	67.94	31.46	17.55	0.00	0.00	0.00
INSECTICIDES	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	8.22	0.00	0.00
SEED/PLANTS	0.00	0.00	0.00	0.00	0.00	0.00	136.20	0.00	0.00	0.00	0.00	0.00
ADJUVANTS	0.00	0.00	0.00	0.00	0.00	0.00	7.98	5.48	2.61	0.00	0.00	0.00
CUSTOM FERTILIZE	0.00	0.00	0.00	0.00	0.00	0.00	0.00	25.69	4.56	0.00	0.00	0.00
HAULING	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	59.50	0.00
DRYING	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	68.00	0.00
CROP CONSULTANT	0.00	0.00	0.00	0.00	0.00	0.00	0.00	8.00	0.00	0.00	0.00	0.00
SOIL TEST	3.33	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
LABOR	3.38	0.00	0.00	0.00	0.00	0.00	6.73	3.18	4.08	4.08	8.88	3.88
LEASE *	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
FUEL	2.76	0.00	0.00	0.00	0.00	0.00	8.55	7.33	7.33	7.33	5.53	3.16
REPAIR & MAINTENANCE	2.02	0.00	0.00	0.00	0.00	0.00	4.10	7.37	1.46	1.46	9.06	3.10
INTEREST ON OP. CAP.	0.55	0.00	0.00	0.00	0.57	0.00	5.80	3.16	0.80	0.34	1.20	0.04
TOTAL DIRECT EXPENSES	12.04	0.00	0.00	0.00	18.59	0.00	250.30	163.24	50.89	28.93	152.17	10.18
NET INCOME	-12.04	0.00	0.00	0.00	-18.59	0.00	-250.30	-163.24	-50.89	-28.93	680.83	-10.18
NET INCOME TO DATE	-12.04	-12.04	-12.04	-12.04	-30.63	-30.63	-280.93	-444.17	-495.06	-523.99	156.84	146.66

Note: Cost of production estimates are based on 2017 input prices.

Fertilization decisions should be based on soil tests.

Soil test cost is prorated for a test every 3rd year.

* Lease costs are based on hourly usage costs.

Table 39.F Estimated returns for various price/yield combinations, per acre
 Clearfield hybrid straight levee-zero grade rice
 Flood irrigated, 19 ac-in., Delta Area, Mississippi, 2018

PRODUCT			PERCENT										
			75	80	85	90	95	100	105	110	115	120	125
			PRODUCT PRICE										
Rice			3.67	3.92	4.16	4.41	4.65	4.90	5.14	5.39	5.63	5.88	6.12
PERCENT	YIELD	UNIT	dollars										
50	85.00	bu	-309 -435	-288 -414	-268 -393	-247 -373	-226 -352	-205 -331	-184 -310	-163 -289	-143 -268	-122 -248	-101 -227
60	102.00	bu	-260 -385	-235 -360	-210 -335	-185 -310	-160 -285	-135 -260	-110 -235	-85 -210	-60 -185	-35 -160	-10 -135
70	119.00	bu	-210 -336	-181 -307	-152 -277	-122 -248	-93 -219	-64 -190	-35 -161	-6 -132	22 -103	51 -73	81 -44
80	136.00	bu	-160 -286	-127 -253	-94 -219	-60 -186	-27 -153	5 -120	39 -86	72 -53	105 -20	139 13	172 46
90	153.00	bu	-111 -237	-73 -199	-36 -162	1 -124	38 -87	76 -49	113 -12	151 25	188 62	226 100	263 137
100	170.00	bu	-61 -187	-19 -145	21 -104	63 -62	105 -20	146 20	188 62	229 104	271 145	313 187	354 229
110	187.00	bu	-11 -137	33 -91	79 -46	125 -0	171 45	217 91	262 137	308 182	354 228	400 274	446 320
120	204.00	bu	37 -88	87 -38	137 11	187 61	237 111	287 161	337 211	387 261	437 311	487 361	537 411
130	221.00	bu	87 -38	141 15	195 69	249 123	303 178	358 232	412 286	466 340	520 394	574 448	628 502
140	238.00	bu	136 11	195 69	253 127	311 186	370 244	428 302	486 360	545 419	603 477	661 535	720 594
150	255.00	bu	186 60	249 123	311 185	373 248	436 310	498 373	561 435	623 498	686 560	748 623	811 685

The top number in each cell is Returns Above Direct Expenses.
 The bottom number in each cell is Returns Above Total Specified Expenses.
 Only the product listed has been varied to calculate net returns.
 Note: Cost of production estimates are based on 2017 input prices.

Table 40.A Estimated costs per acre
 Conventional hybrid straight levee rice
 Flood irrigated, 27 ac-in., Delta Area, Mississippi, 2018

ITEM	UNIT	PRICE	QUANTITY	AMOUNT	YOUR FARM
		dollars		dollars	
DIRECT EXPENSES					
CUSTOM SPRAY					
App by Air (5 gal)	appl	6.50	4.5000	29.25	_____
App by Air (3 gal)	appl	5.00	1.5000	7.50	_____
FERTILIZERS					
Amm Sulfate (21% N)	cwt	13.43	0.5000	6.72	_____
DAP	cwt	21.52	0.5000	10.76	_____
Urea, Solid (46% N)	cwt	14.19	3.3220	47.14	_____
NBPT	pt	9.00	0.8000	7.20	_____
HERBICIDES					
Glyphosate 3lbs a.e	oz	0.14	80.0000	11.20	_____
2,4-D Amine 4	pt	2.40	2.0000	4.80	_____
Command 3ME	pt	19.93	1.0000	19.93	_____
Sharpen	oz	6.45	2.0000	12.90	_____
Regiment	oz	44.90	0.6000	26.94	_____
Facet L	pt	15.25	2.6900	41.02	_____
Permit	oz	22.43	0.7500	16.82	_____
Clincher SF	oz	2.34	7.5000	17.55	_____
INSECTICIDES					
Karate Z	oz	2.74	3.0000	8.22	_____
SEED/PLANTS					
Rice Conv Hyb Trt	lb	5.66	23.0000	130.18	_____
Rice Seed CvH (Levee)	lb	1.66	4.2500	7.06	_____
Rice Seed Trt/Insect	lbseed	0.23	4.2500	0.98	_____
ADJUVANTS					
MSO	pt	2.61	1.5000	3.92	_____
Class Act NG	pt	2.38	0.5000	1.19	_____
Dyne-A-Pak	pt	4.73	0.5000	2.37	_____
Crop Oil Conc. (Pet.)	pt	2.74	0.4000	1.10	_____
CUSTOM FERTILIZE					
App Fert by Air	cwt	7.00	4.3220	30.25	_____
HAULING					
Haul Rice	bu	0.35	170.0000	59.50	_____
DRYING					
Dry Rice	bu	0.40	170.0000	68.00	_____
SURVEY & MARK LEVEES					
Survey & Mark Levees	acre	4.50	0.5000	2.25	_____
CROP CONSULTANT					
Rice Consultant	acre	8.00	1.0000	8.00	_____
SOIL TEST					
Soil Test	acre	10.00	0.3330	3.33	_____
OPERATOR LABOR					
Tractors	hour	13.51	0.4999	6.74	_____
Harvesters	hour	13.51	0.1760	2.38	_____
IRRIGATE LABOR					
Special Labor	hour	9.06	2.3750	21.52	_____
HAND LABOR					
Special Labor	hour	9.06	0.2500	2.27	_____
Implements	hour	9.06	0.0785	0.71	_____
RICE MGT. LABOR					
Special Labor	hour	9.06	0.7000	6.34	_____
UNALLOCATED LABOR					
	hour	13.50	0.5389	7.28	_____
DIESEL FUEL					
Tractors	gal	1.80	5.5719	10.05	_____
Harvesters	gal	1.80	2.9444	5.30	_____
Flood Irr.	gal	1.80	21.9949	39.58	_____
REPAIR & MAINTENANCE					
Implements	acre	7.93	1.0000	7.93	_____
Tractors	acre	3.14	1.0000	3.14	_____
Harvesters	acre	6.51	1.0000	6.51	_____
Flood Irr.	acre	13.78	1.0000	13.78	_____
INTEREST ON OP. CAP.	acre	13.17	1.0000	13.17	_____
TOTAL DIRECT EXPENSES				732.78	_____
FIXED EXPENSES					
Implements	acre	16.84	1.0000	16.84	_____
Tractors	acre	19.79	1.0000	19.79	_____
Harvesters	acre	25.68	1.0000	25.68	_____
Flood Irr.	acre	66.91	1.0000	66.91	_____
TOTAL FIXED EXPENSES				129.22	_____
TOTAL SPECIFIED EXPENSES				862.00	_____

Note: Cost of production estimates are based on 2017 input prices.

Fertilization decisions should be based on soil tests.

Soil test cost is prorated for a test every 3rd year.

Table 40.B Summary of estimated costs and returns per acre
 Conventional hybrid straight levee rice
 Flood irrigated, 27 ac-in., Delta Area, Mississippi, 2018

ITEM	UNIT	PRICE	QUANTITY	AMOUNT	YOUR FARM
		dollars		dollars	
INCOME					
Rice	bu	4.90	170.0000	833.00	_____

TOTAL INCOME				833.00	_____
DIRECT EXPENSES					
CUSTOM SPRAY	acre	36.75	1.0000	36.75	_____
FERTILIZERS	acre	71.82	1.0000	71.82	_____
HERBICIDES	acre	151.16	1.0000	151.16	_____
INSECTICIDES	acre	8.22	1.0000	8.22	_____
SEED/PLANTS	acre	138.22	1.0000	138.22	_____
ADJUVANTS	acre	8.58	1.0000	8.58	_____
CUSTOM FERTILIZE	acre	30.25	1.0000	30.25	_____
HAULING	acre	59.50	1.0000	59.50	_____
DRYING	acre	68.00	1.0000	68.00	_____
SURVEY & MARK LEVEES	acre	2.25	1.0000	2.25	_____
CROP CONSULTANT	acre	8.00	1.0000	8.00	_____
SOIL TEST	acre	3.33	1.0000	3.33	_____
HAND LABOR	hour	9.06	0.3285	2.98	_____
IRRIGATE LABOR	hour	9.06	2.3750	21.52	_____
OPERATOR LABOR	hour	13.51	0.6759	9.12	_____
RICE MGT. LABOR	hour	9.06	0.7000	6.34	_____
UNALLOCATED LABOR	hour	13.50	0.5389	7.28	_____
DIESEL FUEL	gal	1.80	30.5114	54.93	_____
REPAIR & MAINTENANCE	acre	31.36	1.0000	31.36	_____
INTEREST ON OP. CAP.	acre	13.17	1.0000	13.17	_____

TOTAL DIRECT EXPENSES				732.78	_____
RETURNS ABOVE DIRECT EXPENSES				100.22	_____
TOTAL FIXED EXPENSES				129.22	_____

TOTAL SPECIFIED EXPENSES				862.00	_____
RETURNS ABOVE TOTAL SPECIFIED EXPENSES				-29.00	_____

Note: Cost of production estimates are based on 2017 input prices.

Fertilization decisions should be based on soil tests.

Soil test cost is prorated for a test every 3rd year.

Table 40.C Estimated resource use for field operations, per acre
 Conventional hybrid straight levee rice
 Flood irrigated, 27 ac-in., Delta Area, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	POWER UNIT SIZE	PERF RATE	TIMES OVER	MTH	INPUT AMOUNT	IMPLEMENT	POWER UNIT	ALLOC LABOR	UNALL LABOR
-----hours-----										
Soil Test	acre			0.33	Oct	0.3330				
Field Cultivate Fld	32'	MFWD 225	0.046	2.00	Oct		0.09	0.09	0.09	0.08
Harrow - Folding	40'	MFWD 225	0.038	1.00	Oct		0.03	0.03	0.03	0.03
App by Air (5 gal)	appl			1.00	Feb	1.0000				
Glyphosate 3lbs a.e	oz					48.0000				
2,4-D Amine 4	pt					2.0000				
Grain Drill	24'	MFWD 225	0.078	1.00	Apr		0.07	0.07	0.15	0.07
Rice Conv Hyb Trt	lb					23.0000				
Roller/Cultipacker	30'	MFWD 225	0.049	1.00	Apr		0.04	0.04	0.04	0.04
App by Air (5 gal)	appl			1.00	Apr	1.0000				
Glyphosate 3lbs a.e	oz					32.0000				
Command 3ME	pt					1.0000				
Sharpen	oz					2.0000				
MSO	pt					0.5000				
Class Act NG	pt					0.5000				
Seed Levees				1.00	Apr					
Rice Seed CvH(Levee)	lb					4.2500				
Rice Seed Trt/Insect	lbseed					4.2500				
App Fert by Air	cwt			1.00	May	1.0000				
Amm Sulfate (21% N)	cwt					0.5000				
DAP	cwt					0.5000				
Rice Consultant	acre			1.00	May	1.0000				
App by Air (5 gal)	appl			1.00	May	1.0000				
Regiment	oz					0.6000				
Dyne-A-Pak	pt					0.5000				
App Fert by Air	cwt			1.00	May	2.6700				
Urea, Solid (46% N)	cwt					2.6700				
NBPT	pt					0.8000				
Rice Management				1.00	May					
RICE MGT. LABOR	hour								0.10	
App by Air (5 gal)	appl			1.00	May	1.0000				
Facet L	pt					2.6900				
Permit	oz					0.7500				
Crop Oil Conc.(Pet.)	pt					0.4000				
App by Air (5 gal)	appl			0.50	Jun	0.5000				
Clincher SF	oz					7.5000				
MSO	pt					1.0000				
Rice Management				1.00	Jun					
RICE MGT. LABOR	hour								0.20	
App Fert by Air	cwt			1.00	Jun	0.6520				
Urea, Solid (46% N)	cwt					0.6520				
Rice Management				1.00	Jul					
RICE MGT. LABOR	hour								0.20	
App by Air (3 gal)	appl			1.50	Jul	1.5000				
Karate Z	oz					3.0000				
Rice Management				1.00	Aug					
RICE MGT. LABOR	hour								0.20	
Header - Draper (SL)	25' Rigid	325 hp	0.176	1.00	Aug		0.17	0.17	0.17	0.15
Grain Cart Rice	700 bu	MFWD 225	0.055	0.20	Aug		0.01	0.01	0.01	0.00
Handling & Storage				1.00	Aug					
HAND LABOR	hour								0.25	
Haul Rice	bu			1.00	Aug	170.0000				
Dry Rice	bu			1.00	Aug	170.0000				
Disk Heavy	28'	MFWD 225	0.075	2.00	Sep		0.15	0.15	0.15	0.13
Flood Irr.	acre				Jan	1.0000	0.07	0.07	2.45	
TOTALS							0.67	0.67	4.07	0.53

Note: Cost of production estimates are based on 2017 input prices.
Fertilization decisions should be based on soil tests.
Soil test cost is prorated for a test every 3rd year.

Table 40.D Estimated costs for field operations, per acre
 Conventional hybrid straight levee rice
 Flood irrigated, 27 ac-in., Delta Area, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	-----DIRECT COST-----							FIXED COST	TOTAL COST	
		OP INPUT	FUEL	R&M	LABOR	LEASE	INTER	TOTAL			
-----dollars-----											
Soil Test	acre	3.33						0.16	3.49		3.49
Field Cultivate Fld	32'		1.95	1.51	2.39			0.28	6.13	7.66	13.79
Harrow - Folding	40'		0.81	0.51	0.99			0.11	2.42	1.99	4.41
App by Air (5 gal)	appl	6.50						0.21	6.71		6.71
Glyphosate 3lbs a.e	oz	6.72						0.21	6.93		6.93
2,4-D Amine 4	pt	4.80						0.15	4.95		4.95
Grain Drill	24'		1.64	2.38	2.73			0.16	6.91	6.80	13.71
Rice Conv Hyb Trt	lb	130.18						3.09	133.27		133.27
Roller/Cultipacker	30'		1.04	0.55	1.28			0.07	2.94	2.37	5.31
App by Air (5 gal)	appl	6.50						0.15	6.65		6.65
Glyphosate 3lbs a.e	oz	4.48						0.11	4.59		4.59
Command 3ME	pt	19.93						0.47	20.40		20.40
Sharpen	oz	12.90						0.31	13.21		13.21
MSO	pt	1.31						0.03	1.34		1.34
Class Act NG	pt	1.19						0.03	1.22		1.22
Seed Levees											
Rice Seed CvH (Levee)	lb	7.06						0.17	7.23		7.23
Rice Seed Trt/Insect	lbseed	0.98						0.02	1.00		1.00
App Fert by Air	cwt	7.00						0.14	7.14		7.14
Amm Sulfate (21% N)	cwt	6.72						0.13	6.85		6.85
DAP	cwt	10.76						0.21	10.97		10.97
Rice Consultant	acre	8.00						0.16	8.16		8.16
App by Air (5 gal)	appl	6.50						0.13	6.63		6.63
Regiment	oz	26.94						0.53	27.47		27.47
Dyne-A-Pak	pt	2.37						0.05	2.42		2.42
App Fert by Air	cwt	18.69						0.37	19.06		19.06
Urea, Solid (46% N)	cwt	37.89						0.75	38.64		38.64
NBPT	pt	7.20						0.14	7.34		7.34
Rice Management											
RICE MGT. LABOR	hour				0.91			0.02	0.93		0.93
App by Air (5 gal)	appl	6.50						0.13	6.63		6.63
Facet L	pt	41.02						0.81	41.83		41.83
Permit	oz	16.82						0.33	17.15		17.15
Crop Oil Conc. (Pet.)	pt	1.10						0.02	1.12		1.12
App by Air (5 gal)	appl	3.25						0.05	3.30		3.30
Clincher SF	oz	17.55						0.28	17.83		17.83
MSO	pt	2.61						0.04	2.65		2.65
Rice Management											
RICE MGT. LABOR	hour				1.81			0.03	1.84		1.84
App Fert by Air	cwt	4.56						0.07	4.63		4.63
Urea, Solid (46% N)	cwt	9.25						0.15	9.40		9.40
Rice Management											
RICE MGT. LABOR	hour				1.81			0.02	1.83		1.83
App by Air (3 gal)	appl	7.50						0.09	7.59		7.59
Karate Z	oz	8.22						0.10	8.32		8.32
Rice Management											
RICE MGT. LABOR	hour				1.81			0.01	1.82		1.82
Header - Draper (SL)	25' Rigid		5.30	8.88	4.52			0.15	18.85	29.39	48.24
Grain Cart Rice	700 bu		0.23	0.18	0.28			0.01	0.70	0.64	1.34
Handling & Storage											
HAND LABOR	hour				2.27			0.02	2.29		2.29
Haul Rice	bu	59.50						0.47	59.97		59.97
Dry Rice	bu	68.00						0.54	68.54		68.54
Disk Heavy	28'		3.16	3.10	3.88			0.04	10.18	10.70	20.88
Flood Irr.	acre	2.25	40.80	14.25	22.56			1.45	81.31	69.67	150.98
TOTALS		586.08	54.93	31.36	47.24	0.00	13.17	732.78	129.22	862.00	

Note: Cost of production estimates are based on 2017 input prices.

Fertilization decisions should be based on soil tests.

Soil test cost is prorated for a test every 3rd year.

Table 40.E Estimated monthly income and expense flows per acre
 Conventional hybrid straight levee rice
 Flood irrigated, 27 ac-in., Delta Area, Mississippi, 2018

ITEM	Oct	Nov	Dec	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep
-----dollars-----												
TOTAL INCOME	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	833.00	0.00
DIRECT EXPENSES												
CUSTOM SPRAY	0.00	0.00	0.00	0.00	6.50	0.00	6.50	13.00	3.25	7.50	0.00	0.00
FERTILIZERS	0.00	0.00	0.00	0.00	0.00	0.00	0.00	62.57	9.25	0.00	0.00	0.00
HERBICIDES	0.00	0.00	0.00	0.00	11.52	0.00	37.31	84.78	17.55	0.00	0.00	0.00
INSECTICIDES	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	8.22	0.00	0.00
SEED/PLANTS	0.00	0.00	0.00	0.00	0.00	0.00	138.22	0.00	0.00	0.00	0.00	0.00
ADJUVANTS	0.00	0.00	0.00	0.00	0.00	0.00	2.50	3.47	2.61	0.00	0.00	0.00
CUSTOM FERTILIZE	0.00	0.00	0.00	0.00	0.00	0.00	0.00	25.69	4.56	0.00	0.00	0.00
HAULING	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	59.50	0.00
DRYING	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	68.00	0.00
SURVEY & MARK LEVEES	0.00	0.00	0.00	0.00	0.00	0.00	2.25	0.00	0.00	0.00	0.00	0.00
CROP CONSULTANT	0.00	0.00	0.00	0.00	0.00	0.00	0.00	8.00	0.00	0.00	0.00	0.00
SOIL TEST	3.33	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
LABOR	3.38	0.00	0.00	0.00	0.00	0.00	11.73	5.44	6.34	6.34	10.13	3.88
LEASE *	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
FUEL	2.76	0.00	0.00	0.00	0.00	0.00	12.31	10.26	10.26	10.26	5.92	3.16
REPAIR & MAINTENANCE	2.02	0.00	0.00	0.00	0.00	0.00	4.99	7.95	2.04	2.04	9.22	3.10
INTEREST ON OP. CAP.	0.55	0.00	0.00	0.00	0.57	0.00	5.13	4.37	0.88	0.41	1.22	0.04
TOTAL DIRECT EXPENSES	12.04	0.00	0.00	0.00	18.59	0.00	220.94	225.53	56.74	34.77	153.99	10.18
NET INCOME	-12.04	0.00	0.00	0.00	-18.59	0.00	-220.94	-225.53	-56.74	-34.77	679.01	-10.18
NET INCOME TO DATE	-12.04	-12.04	-12.04	-12.04	-30.63	-30.63	-251.57	-477.10	-533.84	-568.61	110.40	100.22

Note: Cost of production estimates are based on 2017 input prices.

Fertilization decisions should be based on soil tests.

Soil test cost is prorated for a test every 3rd year.

* Lease costs are based on hourly usage costs

Table 40.F Estimated returns for various price/yield combinations, per acre
 Conventional hybrid straight levee rice
 Flood irrigated, 27 ac-in., Delta Area, Mississippi, 2018

PRODUCT			PERCENT										
			75	80	85	90	95	100	105	110	115	120	125
			PRODUCT PRICE										
Rice			3.67	3.92	4.16	4.41	4.65	4.90	5.14	5.39	5.63	5.88	6.12
PERCENT	YIELD	UNIT	dollars										
50	85.00	bu	-356 -485	-335 -464	-314 -443	-293 -422	-272 -402	-252 -381	-231 -360	-210 -339	-189 -318	-168 -297	-147 -277
60	102.00	bu	-306 -435	-281 -410	-256 -385	-231 -360	-206 -335	-181 -310	-156 -285	-131 -260	-106 -235	-81 -210	-56 -185
70	119.00	bu	-256 -386	-227 -356	-198 -327	-169 -298	-140 -269	-111 -240	-81 -211	-52 -182	-23 -152	5 -123	34 -94
80	136.00	bu	-207 -336	-173 -303	-140 -269	-107 -236	-73 -203	-40 -169	-7 -136	25 -103	59 -69	92 -36	125 -3
90	153.00	bu	-157 -286	-120 -249	-82 -211	-45 -174	-7 -136	29 -99	67 -61	104 -24	142 13	179 50	217 87
100	170.00	bu	-108 -237	-66 -195	-24 -153	16 -112	58 -70	100 -29	141 12	183 54	225 95	266 137	308 179
110	187.00	bu	-58 -187	-12 -141	33 -95	79 -50	124 -4	170 41	216 87	262 133	308 178	353 224	399 270
120	204.00	bu	-8 -138	41 -88	91 -38	141 11	191 61	241 111	291 161	341 211	391 261	441 311	491 361
130	221.00	bu	40 -88	94 -34	149 19	203 74	257 128	311 182	365 236	419 290	474 344	528 398	582 453
140	238.00	bu	90 -38	148 19	207 77	265 136	323 194	382 252	440 311	498 369	556 427	615 486	673 544
150	255.00	bu	140 10	202 73	265 135	327 198	389 260	452 323	514 385	577 448	639 510	702 573	764 635

The top number in each cell is Returns Above Direct Expenses.
 The bottom number in each cell is Returns Above Total Specified Expenses.
 Only the product listed has been varied to calculate net returns.
 Note: Cost of production estimates are based on 2017 input prices.

Table 41.A Estimated costs per acre
 Conventional hybrid straight levee multi inlet rice
 Flood irrigated, 23 ac-in., Delta Area, Mississippi, 2018

ITEM	UNIT	PRICE	QUANTITY	AMOUNT	YOUR FARM
		dollars		dollars	
DIRECT EXPENSES					
CUSTOM SPRAY					
App by Air (5 gal)	appl	6.50	4.5000	29.25	_____
App by Air (3 gal)	appl	5.00	1.5000	7.50	_____
FERTILIZERS					
Amm Sulfate (21% N)	cwt	13.43	0.5000	6.72	_____
DAP	cwt	21.52	0.5000	10.76	_____
Urea, Solid (46% N)	cwt	14.19	3.3220	47.14	_____
NBPT	pt	9.00	0.8000	7.20	_____
HERBICIDES					
Glyphosate 3lbs a.e	oz	0.14	80.0000	11.20	_____
2,4-D Amine 4	pt	2.40	2.0000	4.80	_____
Command 3ME	pt	19.93	1.0000	19.93	_____
Sharpen	oz	6.45	2.0000	12.90	_____
Regiment	oz	44.90	0.6000	26.94	_____
Facet L	pt	15.25	2.6900	41.02	_____
Permit	oz	22.43	0.7500	16.82	_____
Clincher SF	oz	2.34	7.5000	17.55	_____
INSECTICIDES					
Karate Z	oz	2.74	3.0000	8.22	_____
IRRIGATION SUPPLIES					
Roll-Out Pipe	ft	0.25	33.0000	8.25	_____
SEED/PLANTS					
Rice Conv Hyb Trt	lb	5.66	23.0000	130.18	_____
Rice Seed CvH(Levee)	lb	1.66	4.2500	7.06	_____
Rice Seed Trt/Insect	lbseed	0.23	4.2500	0.98	_____
ADJUVANTS					
MSO	pt	2.61	1.5000	3.92	_____
Class Act NG	pt	2.38	0.5000	1.19	_____
Dyne-A-Pak	pt	4.73	0.5000	2.37	_____
Crop Oil Conc. (Pet.)	pt	2.74	0.4000	1.10	_____
CUSTOM FERTILIZE					
App Fert by Air	cwt	7.00	4.3220	30.25	_____
HAULING					
Haul Rice	bu	0.35	170.0000	59.50	_____
DRYING					
Dry Rice	bu	0.40	170.0000	68.00	_____
SURVEY & MARK LEVEES					
Survey & Mark Levees	acre	4.50	0.5000	2.25	_____
CROP CONSULTANT					
Rice Consultant	acre	8.00	1.0000	8.00	_____
SOIL TEST					
Soil Test	acre	10.00	0.3330	3.33	_____
OPERATOR LABOR					
Tractors	hour	13.51	0.5281	7.12	_____
Harvesters	hour	13.51	0.1760	2.38	_____
IRRIGATE LABOR					
Special Labor	hour	9.06	1.1250	10.18	_____
Implements	hour	9.06	0.0375	0.34	_____
HAND LABOR					
Special Labor	hour	9.06	0.2500	2.27	_____
Implements	hour	9.06	0.0785	0.71	_____
RICE MGT. LABOR					
Special Labor	hour	9.06	0.7000	6.34	_____
UNALLOCATED LABOR					
	hour	13.50	0.5389	7.28	_____
DIESEL FUEL					
Tractors	gal	1.80	5.8180	10.50	_____
Harvesters	gal	1.80	2.9444	5.30	_____
Flood Irr.	gal	1.80	18.7364	33.73	_____
REPAIR & MAINTENANCE					
Implements	acre	7.99	1.0000	7.99	_____
Tractors	acre	3.27	1.0000	3.27	_____
Harvesters	acre	6.51	1.0000	6.51	_____
Flood Irr.	acre	13.46	1.0000	13.46	_____
INTEREST ON OP. CAP.	acre	13.09	1.0000	13.09	_____
TOTAL DIRECT EXPENSES				724.80	_____
FIXED EXPENSES					
Implements	acre	17.29	1.0000	17.29	_____
Tractors	acre	20.64	1.0000	20.64	_____
Harvesters	acre	25.68	1.0000	25.68	_____
Flood Irr.	acre	66.58	1.0000	66.58	_____
TOTAL FIXED EXPENSES				130.19	_____
TOTAL SPECIFIED EXPENSES				854.99	_____

Note: Cost of production estimates are based on 2017 input prices.

Fertilization decisions should be based on soil tests.
Soil test cost is prorated for a test every 3rd year.

Table 41.B Summary of estimated costs and returns per acre
 Conventional hybrid straight levee multi inlet rice
 Flood irrigated, 23 ac-in., Delta Area, Mississippi, 2018

ITEM	UNIT	PRICE	QUANTITY	AMOUNT	YOUR FARM
		dollars		dollars	
INCOME					
Rice	bu	4.90	170.0000	833.00	_____

TOTAL INCOME				833.00	_____
DIRECT EXPENSES					
CUSTOM SPRAY	acre	36.75	1.0000	36.75	_____
FERTILIZERS	acre	71.82	1.0000	71.82	_____
HERBICIDES	acre	151.16	1.0000	151.16	_____
INSECTICIDES	acre	8.22	1.0000	8.22	_____
IRRIGATION SUPPLIES	acre	8.25	1.0000	8.25	_____
SEED/PLANTS	acre	138.22	1.0000	138.22	_____
ADJUVANTS	acre	8.58	1.0000	8.58	_____
CUSTOM FERTILIZE	acre	30.25	1.0000	30.25	_____
HAULING	acre	59.50	1.0000	59.50	_____
DRYING	acre	68.00	1.0000	68.00	_____
SURVEY & MARK LEVEES	acre	2.25	1.0000	2.25	_____
CROP CONSULTANT	acre	8.00	1.0000	8.00	_____
SOIL TEST	acre	3.33	1.0000	3.33	_____
HAND LABOR	hour	9.06	0.3285	2.98	_____
IRRIGATE LABOR	hour	9.06	1.1625	10.52	_____
OPERATOR LABOR	hour	13.51	0.7041	9.50	_____
RICE MGT. LABOR	hour	9.06	0.7000	6.34	_____
UNALLOCATED LABOR	hour	13.50	0.5389	7.28	_____
DIESEL FUEL	gal	1.80	27.4990	49.53	_____
REPAIR & MAINTENANCE	acre	31.23	1.0000	31.23	_____
INTEREST ON OP. CAP.	acre	13.09	1.0000	13.09	_____

TOTAL DIRECT EXPENSES				724.80	_____
RETURNS ABOVE DIRECT EXPENSES				108.20	_____
TOTAL FIXED EXPENSES				130.19	_____

TOTAL SPECIFIED EXPENSES				854.99	_____
RETURNS ABOVE TOTAL SPECIFIED EXPENSES				-21.99	_____

Note: Cost of production estimates are based on 2017 input prices.

Fertilization decisions should be based on soil tests.

Soil test cost is prorated for a test every 3rd year.

Table 41.C Estimated resource use for field operations, per acre
 Conventional hybrid straight levee multi inlet rice
 Flood irrigated, 23 ac-in., Delta Area, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	POWER UNIT SIZE	PERF RATE	TIMES OVER	MTH	INPUT AMOUNT	IMPLEMENT	POWER UNIT	ALLOC LABOR	UNALL LABOR
						-----hours-----				
Soil Test	acre			0.33	Oct	0.3330				
Field Cultivate Fld	32'	MFWD 225	0.046	2.00	Oct		0.09	0.09	0.09	0.08
Harrow - Folding	40'	MFWD 225	0.038	1.00	Oct		0.03	0.03	0.03	0.03
App by Air (5 gal)	appl			1.00	Feb	1.0000				
Glyphosate 3lbs a.e	oz					48.0000				
2,4-D Amine 4	pt					2.0000				
Grain Drill	24'	MFWD 225	0.078	1.00	Apr		0.07	0.07	0.15	0.07
Rice Conv Hyb Trt	lb					23.0000				
Roller/Cultipacker	30'	MFWD 225	0.049	1.00	Apr		0.04	0.04	0.04	0.04
App by Air (5 gal)	appl			1.00	Apr	1.0000				
Glyphosate 3lbs a.e	oz					32.0000				
Command 3ME	pt					1.0000				
Sharpen	oz					2.0000				
MSO	pt					0.5000				
Class Act NG	pt					0.5000				
Seed Levees				1.00	Apr					
Rice Seed CvH (Levee)	lb					4.2500				
Rice Seed Trt/Insect	lbseed					4.2500				
App Fert by Air	cwt			1.00	May	1.0000				
Amm Sulfate (21% N)	cwt					0.5000				
DAP	cwt					0.5000				
Rice Consultant	acre			1.00	May	1.0000				
App by Air (5 gal)	appl			1.00	May	1.0000				
Regiment	oz					0.6000				
Dyne-A-Pak	pt					0.5000				
App Fert by Air	cwt			1.00	May	2.6700				
Urea, Solid (46% N)	cwt					2.6700				
NBPT	pt					0.8000				
Rice Management				1.00	May					
RICE MGT. LABOR	hour								0.10	
App by Air (5 gal)	appl			1.00	May	1.0000				
Facet L	pt					2.6900				
Permit	oz					0.7500				
Crop Oil Conc. (Pet.)	pt					0.4000				
App by Air (5 gal)	appl			0.50	Jun	0.5000				
Clincher SF	oz					7.5000				
MSO	pt					1.0000				
Rice Management				1.00	Jun					
RICE MGT. LABOR	hour								0.20	
App Fert by Air	cwt			1.00	Jun	0.6520				
Urea, Solid (46% N)	cwt					0.6520				
Rice Management				1.00	Jul					
RICE MGT. LABOR	hour								0.20	
App by Air (3 gal)	appl			1.50	Jul	1.5000				
Karate Z	oz					3.0000				
Rice Management				1.00	Aug					
RICE MGT. LABOR	hour								0.20	
Header - Draper (SL)	25' Rigid	325 hp	0.176	1.00	Aug		0.17	0.17	0.17	0.15
Grain Cart Rice	700 bu	MFWD 225	0.055	0.20	Aug		0.01	0.01	0.01	0.00
Handling & Storage				1.00	Aug					
HAND LABOR	hour								0.25	
Haul Rice	bu			1.00	Aug	170.0000				
Dry Rice	bu			1.00	Aug	170.0000				
Disk Heavy	28'	MFWD 225	0.075	2.00	Sep		0.15	0.15	0.15	0.13
Flood Irr.	acre				Jan	1.0000	0.10	0.10	1.26	
TOTALS							0.70	0.70	2.89	0.53

Note: Cost of production estimates are based on 2017 input prices.
Fertilization decisions should be based on soil tests.
Soil test cost is prorated for a test every 3rd year.

Table 41.D Estimated costs for field operations, per acre
 Conventional hybrid straight levee multi inlet rice
 Flood irrigated, 23 ac-in., Delta Area, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	-----DIRECT COST-----							FIXED COST	TOTAL COST
		OP INPUT	FUEL	R&M	LABOR	LEASE	INTER	TOTAL		
-----dollars-----										
Soil Test	acre	3.33						0.16	3.49	3.49
Field Cultivate Fld	32'		1.95	1.51	2.39			0.28	6.13	7.66
Harrow - Folding	40'		0.81	0.51	0.99			0.11	2.42	1.99
App by Air (5 gal)	appl	6.50						0.21	6.71	4.41
Glyphosate 3lbs a.e	oz	6.72						0.21	6.93	6.93
2,4-D Amine 4	pt	4.80						0.15	4.95	4.95
Grain Drill	24'		1.64	2.38	2.73			0.16	6.91	6.80
Rice Conv Hyb Trt	lb	130.18						3.09	133.27	133.27
Roller/Cultipacker	30'		1.04	0.55	1.28			0.07	2.94	2.37
App by Air (5 gal)	appl	6.50						0.15	6.65	5.31
Glyphosate 3lbs a.e	oz	4.48						0.11	4.59	6.65
Command 3ME	pt	19.93						0.47	20.40	4.59
Sharpen	oz	12.90						0.31	13.21	20.40
MSO	pt	1.31						0.03	1.34	13.21
Class Act NG	pt	1.19						0.03	1.22	1.34
Seed Levees										1.22
Rice Seed CvH (Levee)	lb	7.06						0.17	7.23	1.22
Rice Seed Trt/Insect	lbseed	0.98						0.02	1.00	7.23
App Fert by Air	cwt	7.00						0.14	7.14	1.00
Amm Sulfate (21% N)	cwt	6.72						0.13	6.85	7.14
DAP	cwt	10.76						0.21	10.97	6.85
Rice Consultant	acre	8.00						0.16	8.16	10.97
App by Air (5 gal)	appl	6.50						0.13	6.63	8.16
Regiment	oz	26.94						0.53	27.47	6.63
Dyne-A-Pak	pt	2.37						0.05	2.42	27.47
App Fert by Air	cwt	18.69						0.37	19.06	2.42
Urea, Solid (46% N)	cwt	37.89						0.75	38.64	19.06
NBPT	pt	7.20						0.14	7.34	38.64
Rice Management										7.34
RICE MGT. LABOR	hour				0.91			0.02	0.93	0.93
App by Air (5 gal)	appl	6.50						0.13	6.63	0.93
Facet L	pt	41.02						0.81	41.83	6.63
Permit	oz	16.82						0.33	17.15	41.83
Crop Oil Conc. (Pet.)	pt	1.10						0.02	1.12	17.15
App by Air (5 gal)	appl	3.25						0.05	3.30	1.12
Clincher SF	oz	17.55						0.28	17.83	3.30
MSO	pt	2.61						0.04	2.65	17.83
Rice Management										2.65
RICE MGT. LABOR	hour				1.81			0.03	1.84	1.84
App Fert by Air	cwt	4.56						0.07	4.63	1.84
Urea, Solid (46% N)	cwt	9.25						0.15	9.40	4.63
Rice Management										9.40
RICE MGT. LABOR	hour				1.81			0.02	1.83	1.83
App by Air (3 gal)	appl	7.50						0.09	7.59	1.83
Karate Z	oz	8.22						0.10	8.32	7.59
Rice Management										8.32
RICE MGT. LABOR	hour				1.81			0.01	1.82	1.82
Header - Draper (SL)	25' Rigid		5.30	8.88	4.52			0.15	18.85	29.39
Grain Cart Rice	700 bu		0.23	0.18	0.28			0.01	0.70	0.64
Handling & Storage										1.34
HAND LABOR	hour				2.27			0.02	2.29	2.29
Haul Rice	bu	59.50						0.47	59.97	59.97
Dry Rice	bu	68.00						0.54	68.54	68.54
Disk Heavy	28'		3.16	3.10	3.88			0.04	10.18	10.70
Flood Irr.	acre	10.50	35.40	14.12	11.94			1.37	73.33	70.64
TOTALS		594.33	49.53	31.23	36.62	0.00	13.09	724.80	130.19	854.99

Note: Cost of production estimates are based on 2017 input prices.
Fertilization decisions should be based on soil tests.
Soil test cost is prorated for a test every 3rd year.

Table 41.E Estimated monthly income and expense flows per acre
 Conventional hybrid straight levee multi inlet rice
 Flood irrigated, 23 ac-in., Delta Area, Mississippi, 2018

ITEM	Oct	Nov	Dec	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep
-----dollars-----												
TOTAL INCOME	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	833.00	0.00
DIRECT EXPENSES												
CUSTOM SPRAY	0.00	0.00	0.00	0.00	6.50	0.00	6.50	13.00	3.25	7.50	0.00	0.00
FERTILIZERS	0.00	0.00	0.00	0.00	0.00	0.00	0.00	62.57	9.25	0.00	0.00	0.00
HERBICIDES	0.00	0.00	0.00	0.00	11.52	0.00	37.31	84.78	17.55	0.00	0.00	0.00
INSECTICIDES	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	8.22	0.00	0.00
IRRIGATION SUPPLIES	0.00	0.00	0.00	0.00	0.00	0.00	8.25	0.00	0.00	0.00	0.00	0.00
SEED/PLANTS	0.00	0.00	0.00	0.00	0.00	0.00	138.22	0.00	0.00	0.00	0.00	0.00
ADJUVANTS	0.00	0.00	0.00	0.00	0.00	0.00	2.50	3.47	2.61	0.00	0.00	0.00
CUSTOM FERTILIZE	0.00	0.00	0.00	0.00	0.00	0.00	0.00	25.69	4.56	0.00	0.00	0.00
HAULING	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	59.50	0.00
DRYING	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	68.00	0.00
SURVEY & MARK LEVEES	0.00	0.00	0.00	0.00	0.00	0.00	2.25	0.00	0.00	0.00	0.00	0.00
CROP CONSULTANT	0.00	0.00	0.00	0.00	0.00	0.00	0.00	8.00	0.00	0.00	0.00	0.00
SOIL TEST	3.33	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
LABOR	3.38	0.00	0.00	0.00	0.00	0.00	9.54	2.72	3.62	3.62	9.86	3.88
LEASE *	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
FUEL	2.76	0.00	0.00	0.00	0.00	0.00	11.19	8.80	8.80	8.80	6.02	3.16
REPAIR & MAINTENANCE	2.02	0.00	0.00	0.00	0.00	0.00	5.03	7.88	1.97	1.97	9.26	3.10
INTEREST ON OP. CAP.	0.55	0.00	0.00	0.00	0.57	0.00	5.25	4.29	0.82	0.36	1.21	0.04
TOTAL DIRECT EXPENSES	12.04	0.00	0.00	0.00	18.59	0.00	226.04	221.20	52.43	30.47	153.85	10.18
NET INCOME	-12.04	0.00	0.00	0.00	-18.59	0.00	-226.04	-221.20	-52.43	-30.47	679.15	-10.18
NET INCOME TO DATE	-12.04	-12.04	-12.04	-12.04	-30.63	-30.63	-256.67	-477.87	-530.30	-560.77	118.38	108.20

Note: Cost of production estimates are based on 2017 input prices.

Fertilization decisions should be based on soil tests.

Soil test cost is prorated for a test every 3rd year.

* Lease costs are based on hourly usage costs.

Table 41.F Estimated returns for various price/yield combinations, per acre
 Conventional hybrid straight levee multi inlet rice
 Flood irrigated, 23 ac-in., Delta Area, Mississippi, 2018

PRODUCT			PERCENT										
			75	80	85	90	95	100	105	110	115	120	125
Rice			3.67	3.92	4.16	4.41	4.65	4.90	5.14	5.39	5.63	5.88	6.12
PERCENT	YIELD	UNIT	dollars										
50	85.00	bu	-348 -478	-327 -457	-306 -436	-285 -415	-264 -395	-244 -374	-223 -353	-202 -332	-181 -311	-160 -290	-139 -270
60	102.00	bu	-298 -428	-273 -403	-248 -378	-223 -353	-198 -328	-173 -303	-148 -278	-123 -253	-98 -228	-73 -203	-48 -178
70	119.00	bu	-248 -379	-219 -349	-190 -320	-161 -291	-132 -262	-103 -233	-73 -204	-44 -175	-15 -145	13 -116	42 -87
80	136.00	bu	-199 -329	-165 -296	-132 -262	-99 -229	-66 -196	-32 -162	0 -129	33 -96	67 -62	100 -29	133 3
90	153.00	bu	-149 -279	-112 -242	-74 -204	-37 -167	0 -129	37 -92	75 -54	112 -17	150 20	187 57	225 94
100	170.00	bu	-100 -230	-58 -188	-16 -146	24 -105	66 -63	108 -21	149 19	191 61	233 102	274 144	316 186
110	187.00	bu	-50 -180	-4 -134	41 -88	87 -43	132 2	178 48	224 94	270 140	316 185	361 231	407 277
120	204.00	bu	-0 -130	49 -81	99 -31	149 18	199 68	249 118	299 168	349 218	399 268	449 318	498 368
130	221.00	bu	48 -81	102 -27	157 26	211 81	265 135	319 189	373 243	427 297	481 351	536 405	590 460
140	238.00	bu	98 -31	156 26	215 84	273 143	331 201	389 259	448 318	506 376	564 434	623 493	681 551
150	255.00	bu	148 17	210 80	273 142	335 205	397 267	460 330	522 392	585 455	647 517	710 580	772 642

The top number in each cell is Returns Above Direct Expenses.
 The bottom number in each cell is Returns Above Total Specified Expenses.
 Only the product listed has been varied to calculate net returns.
 Note: Cost of production estimates are based on 2017 input prices.

Table 42.A Estimated costs per acre
 Conventional hybrid straight levee-zero grade rice
 Flood irrigated, 19 ac-in., Delta Area, Mississippi, 2018

ITEM	UNIT	PRICE	QUANTITY	AMOUNT	YOUR FARM
		dollars		dollars	
DIRECT EXPENSES					
CUSTOM SPRAY					
App by Air (5 gal)	appl	6.50	4.5000	29.25	_____
App by Air (3 gal)	appl	5.00	1.5000	7.50	_____
FERTILIZERS					
Amm Sulfate (21% N)	cwt	13.43	0.5000	6.72	_____
DAP	cwt	21.52	0.5000	10.76	_____
Urea, Solid (46% N)	cwt	14.19	3.3220	47.14	_____
NBPT	pt	9.00	0.8000	7.20	_____
HERBICIDES					
Glyphosate 3lbs a.e	oz	0.14	80.0000	11.20	_____
2,4-D Amine 4	pt	2.40	2.0000	4.80	_____
Command 3ME	pt	19.93	1.0000	19.93	_____
Sharpen	oz	6.45	2.0000	12.90	_____
Regiment	oz	44.90	0.6000	26.94	_____
Facet L	pt	15.25	2.6900	41.02	_____
Permit	oz	22.43	0.7500	16.82	_____
Clincher SF	oz	2.34	7.5000	17.55	_____
INSECTICIDES					
Karate Z	oz	2.74	3.0000	8.22	_____
SEED/PLANTS					
Rice Conv Hyb Trt	lb	5.66	23.0000	130.18	_____
Rice Seed CvH (Levee)	lb	1.66	4.2500	7.06	_____
Rice Seed Trt/Insect	lbseed	0.23	4.2500	0.98	_____
ADJUVANTS					
MSO	pt	2.61	1.5000	3.92	_____
Class Act NG	pt	2.38	0.5000	1.19	_____
Dyne-A-Pak	pt	4.73	0.5000	2.37	_____
Crop Oil Conc. (Pet.)	pt	2.74	0.4000	1.10	_____
CUSTOM FERTILIZE					
App Fert by Air	cwt	7.00	4.3220	30.25	_____
HAULING					
Haul Rice	bu	0.35	170.0000	59.50	_____
DRYING					
Dry Rice	bu	0.40	170.0000	68.00	_____
CROP CONSULTANT					
Rice Consultant	acre	8.00	1.0000	8.00	_____
SOIL TEST					
Soil Test	acre	10.00	0.3330	3.33	_____
OPERATOR LABOR					
Tractors	hour	13.51	0.4228	5.70	_____
Harvesters	hour	13.51	0.1760	2.38	_____
IRRIGATE LABOR					
Special Labor	hour	9.06	1.0500	9.53	_____
HAND LABOR					
Special Labor	hour	9.06	0.2500	2.27	_____
Implements	hour	9.06	0.0785	0.71	_____
RICE MGT. LABOR					
Special Labor	hour	9.06	0.7000	6.34	_____
UNALLOCATED LABOR	hour	13.50	0.5389	7.28	_____
DIESEL FUEL					
Tractors	gal	1.80	4.8970	8.83	_____
Harvesters	gal	1.80	2.9444	5.30	_____
Flood Irr.	gal	1.80	15.4779	27.86	_____
REPAIR & MAINTENANCE					
Implements	acre	7.83	1.0000	7.83	_____
Tractors	acre	2.77	1.0000	2.77	_____
Harvesters	acre	6.51	1.0000	6.51	_____
Flood Irr.	acre	11.46	1.0000	11.46	_____
INTEREST ON OP. CAP.	acre	12.59	1.0000	12.59	_____
TOTAL DIRECT EXPENSES				701.19	_____
FIXED EXPENSES					
Implements	acre	16.40	1.0000	16.40	_____
Tractors	acre	17.47	1.0000	17.47	_____
Harvesters	acre	25.68	1.0000	25.68	_____
Flood Irr.	acre	66.25	1.0000	66.25	_____
TOTAL FIXED EXPENSES				125.80	_____
TOTAL SPECIFIED EXPENSES				826.99	_____

Note: Cost of production estimates are based on 2017 input prices.
Fertilization decisions should be based on soil tests.
Soil test cost is prorated for a test every 3rd year.

Table 42.B Summary of estimated costs and returns per acre
 Conventional hybrid straight levee-zero grade rice
 Flood irrigated, 19 ac-in., Delta Area, Mississippi, 2018

ITEM	UNIT	PRICE	QUANTITY	AMOUNT	YOUR FARM
		dollars		dollars	
INCOME					
Rice	bu	4.90	170.0000	833.00	_____

TOTAL INCOME				833.00	_____
DIRECT EXPENSES					
CUSTOM SPRAY	acre	36.75	1.0000	36.75	_____
FERTILIZERS	acre	71.82	1.0000	71.82	_____
HERBICIDES	acre	151.16	1.0000	151.16	_____
INSECTICIDES	acre	8.22	1.0000	8.22	_____
SEED/PLANTS	acre	138.22	1.0000	138.22	_____
ADJUVANTS	acre	8.58	1.0000	8.58	_____
CUSTOM FERTILIZE	acre	30.25	1.0000	30.25	_____
HAULING	acre	59.50	1.0000	59.50	_____
DRYING	acre	68.00	1.0000	68.00	_____
CROP CONSULTANT	acre	8.00	1.0000	8.00	_____
SOIL TEST	acre	3.33	1.0000	3.33	_____
HAND LABOR	hour	9.06	0.3285	2.98	_____
IRRIGATE LABOR	hour	9.06	1.0500	9.53	_____
OPERATOR LABOR	hour	13.51	0.5988	8.08	_____
RICE MGT. LABOR	hour	9.06	0.7000	6.34	_____
UNALLOCATED LABOR	hour	13.50	0.5389	7.28	_____
DIESEL FUEL	gal	1.80	23.3194	41.99	_____
REPAIR & MAINTENANCE	acre	28.57	1.0000	28.57	_____
INTEREST ON OP. CAP.	acre	12.59	1.0000	12.59	_____

TOTAL DIRECT EXPENSES				701.19	_____
RETURNS ABOVE DIRECT EXPENSES				131.81	_____
TOTAL FIXED EXPENSES				125.80	_____

TOTAL SPECIFIED EXPENSES				826.99	_____
RETURNS ABOVE TOTAL SPECIFIED EXPENSES				6.01	_____

Note: Cost of production estimates are based on 2017 input prices.

Fertilization decisions should be based on soil tests.

Soil test cost is prorated for a test every 3rd year.

Table 42.C Estimated resource use for field operations, per acre
 Conventional hybrid straight levee-zero grade rice
 Flood irrigated, 19 ac-in., Delta Area, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	POWER UNIT SIZE	PERF RATE	TIMES OVER	MTH	INPUT AMOUNT	IMPLEMENT	POWER UNIT	ALLOC LABOR	UNALL LABOR
						-----hours-----				
Soil Test	acre			0.33	Oct	0.3330				
Field Cultivate Fld	32'	MFWD 225	0.046	2.00	Oct		0.09	0.09	0.09	0.08
Harrow - Folding	40'	MFWD 225	0.038	1.00	Oct		0.03	0.03	0.03	0.03
App by Air (5 gal)	appl			1.00	Feb	1.0000				
Glyphosate 3lbs a.e	oz					48.0000				
2,4-D Amine 4	pt					2.0000				
Grain Drill	24'	MFWD 225	0.078	1.00	Apr		0.07	0.07	0.15	0.07
Rice Conv Hyb Trt	lb					23.0000				
Roller/Cultipacker	30'	MFWD 225	0.049	1.00	Apr		0.04	0.04	0.04	0.04
App by Air (5 gal)	appl			1.00	Apr	1.0000				
Glyphosate 3lbs a.e	oz					32.0000				
Command 3ME	pt					1.0000				
Sharpen	oz					2.0000				
MSO	pt					0.5000				
Class Act NG	pt					0.5000				
Seed Levees				1.00	Apr					
Rice Seed CvH (Levee)	lb					4.2500				
Rice Seed Trt/Insect	lbseed					4.2500				
App Fert by Air	cwt			1.00	May	1.0000				
Amm Sulfate (21% N)	cwt					0.5000				
DAP	cwt					0.5000				
Rice Consultant	acre			1.00	May	1.0000				
App by Air (5 gal)	appl			1.00	May	1.0000				
Regiment	oz					0.6000				
Dyne-A-Pak	pt					0.5000				
App Fert by Air	cwt			1.00	May	2.6700				
Urea, Solid (46% N)	cwt					2.6700				
NBPT	pt					0.8000				
Rice Management				1.00	May					
RICE MGT. LABOR	hour								0.10	
App by Air (5 gal)	appl			1.00	May	1.0000				
Facet L	pt					2.6900				
Permit	oz					0.7500				
Crop Oil Conc. (Pet.)	pt					0.4000				
App by Air (5 gal)	appl			0.50	Jun	0.5000				
Clincher SF	oz					7.5000				
MSO	pt					1.0000				
Rice Management				1.00	Jun					
RICE MGT. LABOR	hour								0.20	
App Fert by Air	cwt			1.00	Jun	0.6520				
Urea, Solid (46% N)	cwt					0.6520				
Rice Management				1.00	Jul					
RICE MGT. LABOR	hour								0.20	
App by Air (3 gal)	appl			1.50	Jul	1.5000				
Karate Z	oz					3.0000				
Rice Management				1.00	Aug					
RICE MGT. LABOR	hour								0.20	
Header - Draper (SL)	25' Rigid	325 hp	0.176	1.00	Aug		0.17	0.17	0.17	0.15
Grain Cart Rice	700 bu	MFWD 225	0.055	0.20	Aug		0.01	0.01	0.01	0.00
Handling & Storage				1.00	Aug					
HAND LABOR	hour								0.25	
Haul Rice	bu			1.00	Aug	170.0000				
Dry Rice	bu			1.00	Aug	170.0000				
Disk Heavy	28'	MFWD 225	0.075	2.00	Sep		0.15	0.15	0.15	0.13
Flood Irr.	acre				Jan	1.0000			1.05	
TOTALS							0.59	0.59	2.67	0.53

Note: Cost of production estimates are based on 2017 input prices.
Fertilization decisions should be based on soil tests.
Soil test cost is prorated for a test every 3rd year.

Table 42.D Estimated costs for field operations, per acre
 Conventional hybrid straight levee-zero grade rice
 Flood irrigated, 19 ac-in., Delta Area, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	-----DIRECT COST-----							FIXED COST	TOTAL COST	
		OP INPUT	FUEL	R&M	LABOR	LEASE	INTER	TOTAL			
-----dollars-----											
Soil Test	acre	3.33						0.16	3.49		3.49
Field Cultivate Fld	32'		1.95	1.51	2.39			0.28	6.13	7.66	13.79
Harrow - Folding	40'		0.81	0.51	0.99			0.11	2.42	1.99	4.41
App by Air (5 gal)	appl	6.50						0.21	6.71		6.71
Glyphosate 3lbs a.e	oz	6.72						0.21	6.93		6.93
2,4-D Amine 4	pt	4.80						0.15	4.95		4.95
Grain Drill	24'		1.64	2.38	2.73			0.16	6.91	6.80	13.71
Rice Conv Hyb Trt	lb	130.18						3.09	133.27		133.27
Roller/Cultipacker	30'		1.04	0.55	1.28			0.07	2.94	2.37	5.31
App by Air (5 gal)	appl	6.50						0.15	6.65		6.65
Glyphosate 3lbs a.e	oz	4.48						0.11	4.59		4.59
Command 3ME	pt	19.93						0.47	20.40		20.40
Sharpen	oz	12.90						0.31	13.21		13.21
MSO	pt	1.31						0.03	1.34		1.34
Class Act NG	pt	1.19						0.03	1.22		1.22
Seed Levees											
Rice Seed CvH (Levee)	lb	7.06						0.17	7.23		7.23
Rice Seed Trt/Insect	lbseed	0.98						0.02	1.00		1.00
App Fert by Air	cwt	7.00						0.14	7.14		7.14
Amm Sulfate (21% N)	cwt	6.72						0.13	6.85		6.85
DAP	cwt	10.76						0.21	10.97		10.97
Rice Consultant	acre	8.00						0.16	8.16		8.16
App by Air (5 gal)	appl	6.50						0.13	6.63		6.63
Regiment	oz	26.94						0.53	27.47		27.47
Dyne-A-Pak	pt	2.37						0.05	2.42		2.42
App Fert by Air	cwt	18.69						0.37	19.06		19.06
Urea, Solid (46% N)	cwt	37.89						0.75	38.64		38.64
NBPT	pt	7.20						0.14	7.34		7.34
Rice Management											
RICE MGT. LABOR	hour				0.91			0.02	0.93		0.93
App by Air (5 gal)	appl	6.50						0.13	6.63		6.63
Facet L	pt	41.02						0.81	41.83		41.83
Permit	oz	16.82						0.33	17.15		17.15
Crop Oil Conc. (Pet.)	pt	1.10						0.02	1.12		1.12
App by Air (5 gal)	appl	3.25						0.05	3.30		3.30
Clincher SF	oz	17.55						0.28	17.83		17.83
MSO	pt	2.61						0.04	2.65		2.65
Rice Management											
RICE MGT. LABOR	hour				1.81			0.03	1.84		1.84
App Fert by Air	cwt	4.56						0.07	4.63		4.63
Urea, Solid (46% N)	cwt	9.25						0.15	9.40		9.40
Rice Management											
RICE MGT. LABOR	hour				1.81			0.02	1.83		1.83
App by Air (3 gal)	appl	7.50						0.09	7.59		7.59
Karate Z	oz	8.22						0.10	8.32		8.32
Rice Management											
RICE MGT. LABOR	hour				1.81			0.01	1.82		1.82
Header - Draper (SL)	25' Rigid		5.30	8.88	4.52			0.15	18.85	29.39	48.24
Grain Cart Rice	700 bu		0.23	0.18	0.28			0.01	0.70	0.64	1.34
Handling & Storage											
HAND LABOR	hour				2.27			0.02	2.29		2.29
Haul Rice	bu	59.50						0.47	59.97		59.97
Dry Rice	bu	68.00						0.54	68.54		68.54
Disk Heavy	28'		3.16	3.10	3.88			0.04	10.18	10.70	20.88
Flood Irr.	acre		27.86	11.46	9.53			0.87	49.72	66.25	115.97
TOTALS		583.83	41.99	28.57	34.21	0.00	12.59	701.19	125.80	826.99	

Note: Cost of production estimates are based on 2017 input prices.

Fertilization decisions should be based on soil tests.

Soil test cost is prorated for a test every 3rd year.

Table 42.E Estimated monthly income and expense flows per acre
 Conventional hybrid straight levee-zero grade rice
 Flood irrigated, 19 ac-in., Delta Area, Mississippi, 2018

ITEM	Oct	Nov	Dec	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep
-----dollars-----												
TOTAL INCOME	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	833.00	0.00
DIRECT EXPENSES												
CUSTOM SPRAY	0.00	0.00	0.00	0.00	6.50	0.00	6.50	13.00	3.25	7.50	0.00	0.00
FERTILIZERS	0.00	0.00	0.00	0.00	0.00	0.00	0.00	62.57	9.25	0.00	0.00	0.00
HERBICIDES	0.00	0.00	0.00	0.00	11.52	0.00	37.31	84.78	17.55	0.00	0.00	0.00
INSECTICIDES	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	8.22	0.00	0.00
SEED/PLANTS	0.00	0.00	0.00	0.00	0.00	0.00	138.22	0.00	0.00	0.00	0.00	0.00
ADJUVANTS	0.00	0.00	0.00	0.00	0.00	0.00	2.50	3.47	2.61	0.00	0.00	0.00
CUSTOM FERTILIZE	0.00	0.00	0.00	0.00	0.00	0.00	0.00	25.69	4.56	0.00	0.00	0.00
HAULING	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	59.50	0.00
DRYING	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	68.00	0.00
CROP CONSULTANT	0.00	0.00	0.00	0.00	0.00	0.00	0.00	8.00	0.00	0.00	0.00	0.00
SOIL TEST	3.33	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
LABOR	3.38	0.00	0.00	0.00	0.00	0.00	6.73	3.18	4.08	4.08	8.88	3.88
LEASE *	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
FUEL	2.76	0.00	0.00	0.00	0.00	0.00	8.55	7.33	7.33	7.33	5.53	3.16
REPAIR & MAINTENANCE	2.02	0.00	0.00	0.00	0.00	0.00	4.10	7.37	1.46	1.46	9.06	3.10
INTEREST ON OP. CAP.	0.55	0.00	0.00	0.00	0.57	0.00	4.84	4.25	0.80	0.34	1.20	0.04
TOTAL DIRECT EXPENSES	12.04	0.00	0.00	0.00	18.59	0.00	208.75	219.64	50.89	28.93	152.17	10.18
NET INCOME	-12.04	0.00	0.00	0.00	-18.59	0.00	-208.75	-219.64	-50.89	-28.93	680.83	-10.18
NET INCOME TO DATE	-12.04	-12.04	-12.04	-12.04	-30.63	-30.63	-239.38	-459.02	-509.91	-538.84	141.99	131.81

Note: Cost of production estimates are based on 2017 input prices.

Fertilization decisions should be based on soil tests.

Soil test cost is prorated for a test every 3rd year.

* Lease costs are based on hourly usage costs.

Table 42.F Estimated returns for various price/yield combinations, per acre
 Conventional hybrid straight levee-zero grade rice
 Flood irrigated, 19 ac-in., Delta Area, Mississippi, 2018

			PERCENT										
PRODUCT			75	80	85	90	95	100	105	110	115	120	125
			PRODUCT PRICE										
Rice			3.67	3.92	4.16	4.41	4.65	4.90	5.14	5.39	5.63	5.88	6.12
PERCENT	YIELD	UNIT	dollars										
50	85.00	bu	-324	-303	-282	-262	-241	-220	-199	-178	-157	-137	-116
			-450	-429	-408	-387	-367	-346	-325	-304	-283	-262	-242
60	102.00	bu	-274	-249	-224	-199	-174	-149	-124	-100	-75	-50	-25
			-400	-375	-350	-325	-300	-275	-250	-225	-200	-175	-150
70	119.00	bu	-225	-196	-167	-137	-108	-79	-50	-21	7	37	66
			-351	-321	-292	-263	-234	-205	-176	-147	-117	-88	-59
80	136.00	bu	-175	-142	-109	-75	-42	-9	24	57	90	124	157
			-301	-268	-234	-201	-168	-134	-101	-68	-34	-1	31
90	153.00	bu	-126	-88	-51	-13	23	61	98	136	173	211	248
			-251	-214	-176	-139	-101	-64	-26	10	48	85	122
100	170.00	bu	-76	-34	6	48	90	131	173	215	256	298	340
			-202	-160	-118	-77	-35	6	47	89	130	172	214
110	187.00	bu	-26	18	64	110	156	202	248	293	339	385	431
			-152	-106	-60	-15	30	76	122	168	213	259	305
120	204.00	bu	22	72	122	172	222	272	322	372	422	472	522
			-102	-53	-3	46	96	146	196	246	296	346	396
130	221.00	bu	72	126	180	234	289	343	397	451	505	559	613
			-53	0	54	109	163	217	271	325	379	433	488
140	238.00	bu	122	180	238	296	355	413	471	530	588	646	705
			-3	54	112	171	229	287	346	404	462	521	579
150	255.00	bu	171	234	296	359	421	484	546	609	671	733	796
			45	108	170	233	295	358	420	483	545	608	670

The top number in each cell is Returns Above Direct Expenses.
 The bottom number in each cell is Returns Above Total Specified Expenses.
 Only the product listed has been varied to calculate net returns.
 Note: Cost of production estimates are based on 2017 input prices .

Table 43.A Estimated costs per acre
 Peanut - runner, 1.8 ton (3600 lb) yield, 8 row-38 inch
 All Areas, Mississippi, 2018

ITEM	UNIT	PRICE	QUANTITY	AMOUNT	YOUR FARM
		dollars		dollars	
DIRECT EXPENSES					
FUNGICIDES					
Bravo Weather Stick	pt	6.56	5.5000	36.08	_____
Aframe	oz	1.96	36.0000	70.56	_____
Tebuconazole 3.6	oz	0.71	7.2000	5.11	_____
HERBICIDES					
Glyphosate 3lbs a.e	pt	2.25	4.0000	9.00	_____
Dual II Magnum	pt	14.83	1.0000	14.83	_____
Valor SX	oz	4.57	3.0000	13.71	_____
Storm	pt	11.41	1.5000	17.12	_____
Cadre	oz	3.54	4.0000	14.16	_____
Butyrac 200 (2,4-DB)	pt	4.34	2.0000	8.68	_____
Select Max	pt	12.64	1.0000	12.64	_____
INSECTICIDES					
Admire Pro	oz	1.70	9.0000	15.30	_____
Acephate 90%	lb	7.43	0.1375	1.02	_____
SEED/PLANTS					
Peanut Seed	lb	0.84	125.0000	105.00	_____
ADJUVANTS					
Crop Oil Conc. (Veg.)	pt	2.61	6.0000	15.66	_____
CLEANING					
Cleaning Peanuts	ton	18.00	1.5300	27.54	_____
DRYING					
Dry Peanuts	ton	24.00	1.0800	25.92	_____
CUSTOM LIME					
Lime (Spread)	ton	46.00	0.3330	15.32	_____
INOCULANT					
Optimize LIFT	oz	0.59	14.8000	8.73	_____
SOIL TEST					
Soil Test	acre	10.00	0.3330	3.33	_____
OPERATOR LABOR					
Tractors	hour	13.51	1.6246	21.96	_____
Self-Propelled	hour	13.51	0.1983	2.70	_____
HAND LABOR					
Implements	hour	9.06	0.1207	1.09	_____
Self-Propelled	hour	9.06	0.0991	0.90	_____
UNALLOCATED LABOR					
	hour	13.50	1.4583	19.70	_____
DIESEL FUEL					
Tractors	gal	1.80	17.5722	31.64	_____
Self-Propelled	gal	1.80	1.7850	3.26	_____
REPAIR & MAINTENANCE					
Implements	acre	11.39	1.0000	11.39	_____
Tractors	acre	9.87	1.0000	9.87	_____
Self-Propelled	acre	2.03	1.0000	2.03	_____
INTEREST ON OP. CAP.	acre	6.77	1.0000	6.77	_____
TOTAL DIRECT EXPENSES				531.02	_____
FIXED EXPENSES					
Implements	acre	38.28	1.0000	38.28	_____
Tractors	acre	62.11	1.0000	62.11	_____
Self-Propelled	acre	13.50	1.0000	13.50	_____
TOTAL FIXED EXPENSES				113.89	_____
TOTAL SPECIFIED EXPENSES				644.91	_____

Note: Cost of production estimates are based on 2017 input prices.

Fertilizer recommendations are based on the nutrients that the peanut crop removes. Fertilization decisions should be based on soil tests. Soil test cost is prorated for a test every 3rd year.

Lime cost prorated for application every 3rd year.

60% of all peanuts harvested need drying.

85% of all peanuts harvested need cleaning.

Table 43.B Summary of estimated costs and returns per acre
 Peanut - runner, 1.8 ton (3600 lb) yield, 8 row-38 inch
 All Areas, Mississippi, 2018

ITEM	UNIT	PRICE	QUANTITY	AMOUNT	YOUR FARM
		dollars		dollars	
INCOME					
Peanut Runner	ton	385.00	1.8000	693.00	_____

TOTAL INCOME				693.00	_____
DIRECT EXPENSES					
FUNGICIDES	acre	111.75	1.0000	111.75	_____
HERBICIDES	acre	90.14	1.0000	90.14	_____
INSECTICIDES	acre	16.32	1.0000	16.32	_____
SEED/PLANTS	acre	105.00	1.0000	105.00	_____
ADJUVANTS	acre	15.66	1.0000	15.66	_____
CLEANING	acre	27.54	1.0000	27.54	_____
DRYING	acre	25.92	1.0000	25.92	_____
CUSTOM LIME	acre	15.32	1.0000	15.32	_____
INOCULANT	acre	8.73	1.0000	8.73	_____
SOIL TEST	acre	3.33	1.0000	3.33	_____
HAND LABOR	hour	9.06	0.2199	1.99	_____
OPERATOR LABOR	hour	13.51	1.8229	24.66	_____
UNALLOCATED LABOR	hour	13.50	1.4583	19.70	_____
DIESEL FUEL	gal	1.80	19.3573	34.90	_____
REPAIR & MAINTENANCE	acre	23.29	1.0000	23.29	_____
INTEREST ON OP. CAP.	acre	6.77	1.0000	6.77	_____

TOTAL DIRECT EXPENSES				531.02	_____
RETURNS ABOVE DIRECT EXPENSES				161.98	_____
TOTAL FIXED EXPENSES				113.89	_____

TOTAL SPECIFIED EXPENSES				644.91	_____
RETURNS ABOVE TOTAL SPECIFIED EXPENSES				48.09	_____

Note: Cost of production estimates are based on 2017 input prices.

Fertilizer recommendations are based on the nutrients that the peanut crop removes. Fertilization decisions should be based on soil tests. Soil test cost is prorated for a test every 3rd year. Lime cost prorated for application every 3rd year.

60% of all peanuts harvested need drying.

85% of all peanuts harvested need cleaning.

Table 43.C Estimated resource use for field operations, per acre
 Peanut - runner, 1.8 ton (3600 lb) yield, 8 row-38 inch
 All Areas, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	POWER UNIT SIZE	PERF RATE	TIMES OVER	MTH	INPUT AMOUNT	IMPLEMENT	POWER UNIT	ALLOC LABOR	UNALL LABOR	
						-----hours-----					
Soil Test	acre			0.33	Apr	0.3330					
Sprayer 600-750gal Glyphosate 3lbs a.e	60' 175hp pt		0.017	1.00	Apr	4.0000		0.01	0.02	0.01	
Lime (Spread)	ton			0.33	Apr	0.3330					
Bed-Rip/Disk Fold.	8R-38	MFWD 190	0.073	1.00	May		0.07	0.07	0.07	0.05	
Peanut Plt&Pre Rigid	8R-38	MFWD 190	0.120	1.00	May		0.12	0.12	0.24	0.09	
Peanut Seed	lb					125.0000					
Optimize LIFT	oz					14.8000					
Admire Pro	oz					9.0000					
Sprayer 600-750gal Dual II Magnum	60' 175hp pt		0.017	1.00	May	1.0000		0.01	0.02	0.01	
Valor SX	oz					3.0000					
Sprayer 600-750gal Acephate 90%	60' 175hp lb		0.017	0.25	May	0.1375		0.00	0.00	0.00	
Sprayer 600-750gal Storm	60' 175hp pt		0.017	1.00	Jun	1.5000		0.01	0.02	0.01	
Cadre	oz					4.0000					
Butyrac 200 (2,4-DB)	pt					1.0000					
Crop Oil Conc. (Veg.)	pt					2.0000					
Sprayer 600-750gal Bravo Weather Stick	60' 175hp pt		0.017	1.00	Jun	1.5000		0.01	0.02	0.01	
Sprayer 600-750gal Aframe	60' 175hp oz		0.017	1.00	Jul	18.0000		0.01	0.02	0.01	
Sprayer 600-750gal Butyrac 200 (2,4-DB)	60' 175hp pt		0.017	1.00	Jul	1.0000		0.01	0.02	0.01	
Crop Oil Conc. (Veg.)	pt					2.0000					
Sprayer 600-750gal Select Max	60' 175hp pt		0.017	1.00	Jul	1.0000		0.01	0.02	0.01	
Crop Oil Conc. (Veg.)	pt					2.0000					
Sprayer 600-750gal Bravo Weather Stick	60' 175hp pt		0.017	1.00	Jul	1.0000		0.01	0.02	0.01	
Tebuconazole 3.6	oz					7.2000					
Sprayer 600-750gal Aframe	60' 175hp oz		0.017	1.00	Aug	18.0000		0.01	0.02	0.01	
Sprayer 600-750gal Bravo Weather Stick	60' 175hp pt		0.017	1.00	Aug	1.5000		0.01	0.02	0.01	
Sprayer 600-750gal Bravo Weather Stick	60' 175hp pt		0.017	1.00	Sep	1.5000		0.01	0.02	0.01	
Peanut Dig/Invertor	4R-38	MFWD 190	0.186	1.00	Sep		0.18	0.18	0.18	0.14	
Peanut Harvester	4R-38	MFWD 225	0.934	1.00	Sep		0.93	0.93	0.93	0.74	
Dry Peanuts	ton					1.0800					
Cleaning Peanuts	ton					1.5300					
Peanut Dump Cart	6-Row	MFWD 190	0.310	1.00	Sep		0.31	0.31	0.31	0.24	
TOTALS								1.82	1.62	2.04	1.45

Note: Cost of production estimates are based on 2017 input prices.

Fertilizer recommendations are based on the nutrients that the peanut crop removes.

Fertilization decisions should be based on soil tests.

Soil test cost is prorated for a test every 3rd year.

Lime cost prorated for application every 3rd year.

60% of all peanuts harvested need drying.

85% of all peanuts harvested need cleaning.

Table 43.D Estimated costs for field operations, per acre
 Peanut - runner, 1.8 ton (3600 lb) yield, 8 row-38 inch
 All Areas, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	-----DIRECT COST-----							FIXED COST	TOTAL COST
		OP INPUT	FUEL	R&M	LABOR	LEASE	INTER	TOTAL		
-----dollars-----										
Soil Test	acre	3.33						0.08	3.41	3.41
Sprayer 600-750gal	60' 175hp		0.29	0.18	0.51			0.02	1.00	1.20
Glyphosate 3lbs a.e	pt	9.00						0.21	9.21	9.21
Lime (Spread)	ton	15.32						0.36	15.68	15.68
Bed-Rip/Disk Fold.	8R-38		1.29	0.53	1.78			0.07	3.67	3.13
Peanut Plt&Pre Rigid	8R-38		2.13	2.39	4.03			0.17	8.72	7.45
Peanut Seed	lb	105.00						2.08	107.08	107.08
Optimize LIFT	oz	8.73						0.17	8.90	8.90
Admire Pro	oz	15.30						0.30	15.60	15.60
Sprayer 600-750gal	60' 175hp		0.29	0.18	0.51			0.02	1.00	1.20
Dual II Magnum	pt	14.83						0.29	15.12	15.12
Valor SX	oz	13.71						0.27	13.98	13.98
Sprayer 600-750gal	60' 175hp		0.07	0.05	0.13				0.25	0.30
Acephate 90%	lb	1.02						0.02	1.04	1.04
Sprayer 600-750gal	60' 175hp		0.29	0.18	0.51			0.02	1.00	1.20
Storm	pt	17.12						0.27	17.39	17.39
Cadre	oz	14.16						0.22	14.38	14.38
Butyrac 200 (2,4-DB)	pt	4.34						0.07	4.41	4.41
Crop Oil Conc.(Veg.)	pt	5.22						0.08	5.30	5.30
Sprayer 600-750gal	60' 175hp		0.29	0.18	0.51			0.02	1.00	1.20
Bravo Weather Stick	pt	9.84						0.16	10.00	10.00
Sprayer 600-750gal	60' 175hp		0.29	0.18	0.51			0.01	0.99	1.20
Aframe	oz	35.28						0.42	35.70	35.70
Sprayer 600-750gal	60' 175hp		0.29	0.18	0.51			0.01	0.99	1.20
Butyrac 200 (2,4-DB)	pt	4.34						0.05	4.39	4.39
Crop Oil Conc.(Veg.)	pt	5.22						0.06	5.28	5.28
Sprayer 600-750gal	60' 175hp		0.29	0.18	0.51			0.01	0.99	1.20
Select Max	pt	12.64						0.15	12.79	12.79
Crop Oil Conc.(Veg.)	pt	5.22						0.06	5.28	5.28
Sprayer 600-750gal	60' 175hp		0.29	0.18	0.51			0.01	0.99	1.20
Bravo Weather Stick	pt	6.56						0.08	6.64	6.64
Tebuconazole 3.6	oz	5.11						0.06	5.17	5.17
Sprayer 600-750gal	60' 175hp		0.29	0.18	0.51			0.01	0.99	1.20
Aframe	oz	35.28						0.28	35.56	35.56
Sprayer 600-750gal	60' 175hp		0.29	0.18	0.51			0.01	0.99	1.20
Bravo Weather Stick	pt	9.84						0.08	9.92	9.92
Sprayer 600-750gal	60' 175hp		0.29	0.18	0.51				0.98	1.20
Bravo Weather Stick	pt	9.84						0.04	9.88	9.88
Peanut Dig/Invertor	4R-38		3.28	2.39	4.53			0.04	10.24	7.99
Peanut Harvester	4R-38		19.48	13.39	22.73			0.22	55.82	67.70
Dry Peanuts	ton	25.92						0.10	26.02	26.02
Cleaning Peanuts	ton	27.54						0.11	27.65	27.65
Peanut Dump Cart	6-Row		5.46	2.56	7.54			0.06	15.62	14.12
TOTALS		419.71	34.90	23.29	46.35	0.00	6.77	531.02	113.89	644.91

Note: Cost of production estimates are based on 2017 input prices.

Fertilizer recommendations are based on the nutrients that the peanut crop removes.

Fertilization decisions should be based on soil tests.

Soil test cost is prorated for a test every 3rd year.

Lime cost prorated for application every 3rd year.

60% of all peanuts harvested need drying.

85% of all peanuts harvested need cleaning.

Table 43.E Estimated monthly income and expense flows per acre
 Peanut - runner, 1.8 ton (3600 lb) yield, 8 row-38 inch
 All Areas, Mississippi, 2018

ITEM	Oct	Nov	Dec	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep
-----dollars-----												
TOTAL INCOME	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	693.00
DIRECT EXPENSES												
FUNGICIDES	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	9.84	46.95	45.12	9.84
HERBICIDES	0.00	0.00	0.00	0.00	0.00	0.00	9.00	28.54	35.62	16.98	0.00	0.00
INSECTICIDES	0.00	0.00	0.00	0.00	0.00	0.00	0.00	16.32	0.00	0.00	0.00	0.00
SEED/PLANTS	0.00	0.00	0.00	0.00	0.00	0.00	0.00	105.00	0.00	0.00	0.00	0.00
ADJUVANTS	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	5.22	10.44	0.00	0.00
CLEANING	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	27.54
DRYING	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	25.92
CUSTOM LIME	0.00	0.00	0.00	0.00	0.00	0.00	15.32	0.00	0.00	0.00	0.00	0.00
INOCULANT	0.00	0.00	0.00	0.00	0.00	0.00	0.00	8.73	0.00	0.00	0.00	0.00
SOIL TEST	0.00	0.00	0.00	0.00	0.00	0.00	3.33	0.00	0.00	0.00	0.00	0.00
LABOR	0.00	0.00	0.00	0.00	0.00	0.00	0.51	6.45	1.02	2.04	1.02	35.31
LEASE *	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
FUEL	0.00	0.00	0.00	0.00	0.00	0.00	0.29	3.78	0.58	1.16	0.58	28.51
REPAIR & MAINTENANCE	0.00	0.00	0.00	0.00	0.00	0.00	0.18	3.15	0.36	0.72	0.36	18.52
INTEREST ON OP. CAP.	0.00	0.00	0.00	0.00	0.00	0.00	0.67	3.39	0.84	0.92	0.38	0.57
TOTAL DIRECT EXPENSES	0.00	0.00	0.00	0.00	0.00	0.00	29.30	175.36	53.48	79.21	47.46	146.21
NET INCOME	0.00	0.00	0.00	0.00	0.00	0.00	-29.30	-175.36	-53.48	-79.21	-47.46	546.79
NET INCOME TO DATE	0.00	0.00	0.00	0.00	0.00	0.00	-29.30	-204.66	-258.14	-337.35	-384.81	161.98

Note: Cost of production estimates are based on 2017 input prices.

Fertilizer recommendations are based on the nutrients that the peanut crop removes.

Fertilization decisions should be based on soil tests.

Soil test cost is prorated for a test every 3rd year.

Lime cost prorated for application every 3rd year.

60% of all peanuts harvested need drying.

85% of all peanuts harvested need cleaning.

* Lease costs are based on hourly usage costs.

Table 43.F Estimated returns for various price/yield combinations, per acre
 Peanut - runner, 1.8 ton (3600 lb) yield, 8 row-38 inch
 All Areas, Mississippi, 2018

PRODUCT			PERCENT										
			75	80	85	90	95	100	105	110	115	120	125
			PRODUCT PRICE										
Peanut Runner			288.75	308.00	327.25	346.50	365.75	385.00	404.25	423.50	442.75	462.00	481.25
PERCENT	YIELD	UNIT	dollars										
50	0.90	ton	-244	-226	-209	-192	-175	-157	-140	-123	-105	-88	-71
			-358	-340	-323	-306	-288	-271	-254	-236	-219	-202	-184
60	1.08	ton	-197	-176	-156	-135	-114	-93	-72	-52	-31	-10	10
			-311	-290	-270	-249	-228	-207	-186	-166	-145	-124	-103
70	1.26	ton	-151	-126	-102	-78	-54	-29	-5	18	42	67	91
			-264	-240	-216	-192	-167	-143	-119	-95	-70	-46	-22
80	1.44	ton	-104	-76	-49	-21	6	34	61	89	117	144	172
			-218	-190	-162	-135	-107	-79	-52	-24	3	31	58
90	1.62	ton	-57	-26	4	35	66	98	129	160	191	222	253
			-171	-140	-109	-78	-47	-15	15	46	77	108	140
100	1.80	ton	-11	23	58	92	127	161	196	231	265	300	335
			-125	-90	-55	-21	13	48	82	117	152	186	221
110	1.98	ton	35	73	111	149	187	225	264	302	340	378	416
			-78	-40	-2	35	73	112	150	188	226	264	302
120	2.16	ton	81	123	165	206	248	289	331	373	414	456	497
			-31	9	51	92	134	175	217	259	300	342	383
130	2.34	ton	128	173	218	263	308	353	398	443	488	533	579
			14	59	104	149	194	239	284	329	375	420	465
140	2.52	ton	175	223	272	320	369	417	466	514	563	611	660
			61	109	158	206	255	303	352	400	449	497	546
150	2.70	ton	221	273	325	377	429	481	533	585	637	689	741
			107	159	211	263	315	367	419	471	523	575	627

The top number in each cell is Returns Above Direct Expenses.
 The bottom number in each cell is Returns Above Total Specified Expenses.
 Only the product listed has been varied to calculate net returns.
 Note: Cost of production estimates are based on 2017 input prices.

Table 44.A Estimated costs per acre
 Peanut - runner, 1.8 ton (3600 lb) yield, 8 row-30 inch
 All Areas, Mississippi, 2018

ITEM	UNIT	PRICE	QUANTITY	AMOUNT	YOUR FARM
		dollars		dollars	
DIRECT EXPENSES					
FUNGICIDES					
Bravo Weather Stick	pt	6.56	5.5000	36.08	_____
Aframe	oz	1.96	36.0000	70.56	_____
Tebuconazole 3.6	oz	0.71	7.2000	5.11	_____
HERBICIDES					
Glyphosate 3lbs a.e	pt	2.25	4.0000	9.00	_____
Dual II Magnum	pt	14.83	1.0000	14.83	_____
Valor SX	oz	4.57	3.0000	13.71	_____
Storm	pt	11.41	1.5000	17.12	_____
Cadre	oz	3.54	4.0000	14.16	_____
Butyrac 200 (2,4-DB)	pt	4.34	2.0000	8.68	_____
Select Max	pt	12.64	1.0000	12.64	_____
INSECTICIDES					
Admire Pro	oz	1.70	9.0000	15.30	_____
Acephate 90%	lb	7.43	0.1375	1.02	_____
SEED/PLANTS					
Peanut Seed	lb	0.84	125.0000	105.00	_____
ADJUVANTS					
Crop Oil Conc. (Veg.)	pt	2.61	6.0000	15.66	_____
CLEANING					
Cleaning Peanuts	ton	18.00	1.5300	27.54	_____
DRYING					
Dry Peanuts	ton	24.00	1.0800	25.92	_____
CUSTOM LIME					
Lime (Spread)	ton	46.00	0.3330	15.32	_____
INOCULANT					
Optimize LIFT	oz	0.59	14.8000	8.73	_____
SOIL TEST					
Soil Test	acre	10.00	0.3330	3.33	_____
OPERATOR LABOR					
Tractors	hour	13.51	1.6876	22.80	_____
Self-Propelled	hour	13.51	0.1983	2.70	_____
HAND LABOR					
Implements	hour	9.06	0.1527	1.38	_____
Self-Propelled	hour	9.06	0.0991	0.90	_____
UNALLOCATED LABOR					
	hour	13.50	1.5087	20.38	_____
DIESEL FUEL					
Tractors	gal	1.80	18.0359	32.47	_____
Self-Propelled	gal	1.80	1.7850	3.26	_____
REPAIR & MAINTENANCE					
Implements	acre	11.87	1.0000	11.87	_____
Tractors	acre	10.12	1.0000	10.12	_____
Self-Propelled	acre	2.03	1.0000	2.03	_____
INTEREST ON OP. CAP.	acre	6.87	1.0000	6.87	_____
TOTAL DIRECT EXPENSES				534.49	_____
FIXED EXPENSES					
Implements	acre	36.61	1.0000	36.61	_____
Tractors	acre	63.64	1.0000	63.64	_____
Self-Propelled	acre	13.50	1.0000	13.50	_____
TOTAL FIXED EXPENSES				113.75	_____
TOTAL SPECIFIED EXPENSES				648.24	_____

Note: Cost of production estimates are based on 2017 input prices.

Fertilizer recommendations are based on the nutrients that the peanut crop removes. Fertilization decisions should be based on soil tests.

Soil test cost is prorated for a test every 3rd year.

Lime cost prorated for application every 3rd year.

60% of all peanuts harvested need drying.

85% of all peanuts harvested need cleaning.

Table 44.B Summary of estimated costs and returns per acre
 Peanut - runner, 1.8 ton (3600 lb) yield, 8 row-30 inch
 All Areas, Mississippi, 2018

ITEM	UNIT	PRICE	QUANTITY	AMOUNT	YOUR FARM
		dollars		dollars	
INCOME					
Peanut Runner	ton	385.00	1.8000	693.00	_____

TOTAL INCOME				693.00	_____
DIRECT EXPENSES					
FUNGICIDES	acre	111.75	1.0000	111.75	_____
HERBICIDES	acre	90.14	1.0000	90.14	_____
INSECTICIDES	acre	16.32	1.0000	16.32	_____
SEED/PLANTS	acre	105.00	1.0000	105.00	_____
ADJUVANTS	acre	15.66	1.0000	15.66	_____
CLEANING	acre	27.54	1.0000	27.54	_____
DRYING	acre	25.92	1.0000	25.92	_____
CUSTOM LIME	acre	15.32	1.0000	15.32	_____
INOCULANT	acre	8.73	1.0000	8.73	_____
SOIL TEST	acre	3.33	1.0000	3.33	_____
HAND LABOR	hour	9.06	0.2519	2.28	_____
OPERATOR LABOR	hour	13.51	1.8859	25.50	_____
UNALLOCATED LABOR	hour	13.50	1.5087	20.38	_____
DIESEL FUEL	gal	1.80	19.8209	35.73	_____
REPAIR & MAINTENANCE	acre	24.02	1.0000	24.02	_____
INTEREST ON OP. CAP.	acre	6.87	1.0000	6.87	_____

TOTAL DIRECT EXPENSES				534.49	_____
RETURNS ABOVE DIRECT EXPENSES				158.51	_____
TOTAL FIXED EXPENSES				113.75	_____

TOTAL SPECIFIED EXPENSES				648.24	_____
RETURNS ABOVE TOTAL SPECIFIED EXPENSES				44.76	_____

Note: Cost of production estimates are based on 2017 input prices.

Fertilizer recommendations are based on the nutrients that the peanut crop removes. Fertilization decisions should be based on soil tests. Soil test cost is prorated for a test every 3rd year. Lime cost prorated for application every 3rd year.

60% of all peanuts harvested need drying.

85% of all peanuts harvested need cleaning.

Table 44.C Estimated resource use for field operations, per acre
 Peanut - runner, 1.8 ton (3600 lb) yield, 8 row-30 inch
 All Areas, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	POWER UNIT SIZE	PERF RATE	TIMES OVER	MTH	INPUT AMOUNT	IMPLEMENT	POWER UNIT	ALLOC LABOR	UNALL LABOR	
						-----hours-----					
Soil Test	acre			0.33	Apr	0.3330					
Sprayer 600-750gal Glyphosate 3lbs a.e	60' 175hp pt		0.017	1.00	Apr	4.0000		0.01	0.02	0.01	
Lime (Spread)	ton			0.33	Apr	0.3330					
Bed-Rip/Disk Rigid	8R-30	MFWD 190	0.139	1.00	May		0.13	0.13	0.13	0.11	
Peanut Plt&Pre Rigid	8R-30	MFWD 190	0.152	1.00	May		0.15	0.15	0.30	0.12	
Peanut Seed	lb					125.0000					
Optimize LIFT	oz					14.8000					
Admire Pro	oz					9.0000					
Sprayer 600-750gal Dual II Magnum	60' 175hp pt		0.017	1.00	May	1.0000		0.01	0.02	0.01	
Valor SX	oz					3.0000					
Sprayer 600-750gal Acephate 90%	60' 175hp lb		0.017	0.25	May	0.1375		0.00	0.00	0.00	
Sprayer 600-750gal Storm	60' 175hp pt		0.017	1.00	Jun	1.5000		0.01	0.02	0.01	
Cadre	oz					4.0000					
Butyrac 200 (2,4-DB)	pt					1.0000					
Crop Oil Conc. (Veg.)	pt					2.0000					
Sprayer 600-750gal Bravo Weather Stick	60' 175hp pt		0.017	1.00	Jun	1.5000		0.01	0.02	0.01	
Sprayer 600-750gal Aframe	60' 175hp oz		0.017	1.00	Jul	18.0000		0.01	0.02	0.01	
Sprayer 600-750gal Butyrac 200 (2,4-DB)	60' 175hp pt		0.017	1.00	Jul	1.0000		0.01	0.02	0.01	
Crop Oil Conc. (Veg.)	pt					2.0000					
Sprayer 600-750gal Select Max	60' 175hp pt		0.017	1.00	Jul	1.0000		0.01	0.02	0.01	
Crop Oil Conc. (Veg.)	pt					2.0000					
Sprayer 600-750gal Bravo Weather Stick	60' 175hp pt		0.017	1.00	Jul	1.0000		0.01	0.02	0.01	
Tebuconazole 3.6	oz					7.2000					
Sprayer 600-750gal Aframe	60' 175hp oz		0.017	1.00	Aug	18.0000		0.01	0.02	0.01	
Sprayer 600-750gal Bravo Weather Stick	60' 175hp pt		0.017	1.00	Aug	1.5000		0.01	0.02	0.01	
Sprayer 600-750gal Bravo Weather Stick	60' 175hp pt		0.017	1.00	Sep	1.5000		0.01	0.02	0.01	
Peanut Dig/Invertor	4R-30	MFWD 190	0.235	1.00	Sep		0.23	0.23	0.23	0.18	
Peanut Harvester	4R-30	MFWD 225	0.849	1.00	Sep		0.85	0.85	0.85	0.68	
Dry Peanuts	ton					1.0800					
Cleaning Peanuts	ton					1.5300					
Peanut Dump Cart	6-Row	MFWD 190	0.310	1.00	Sep		0.31	0.31	0.31	0.24	
TOTALS								1.88	1.68	2.13	1.50

Note: Cost of production estimates are based on 2017 input prices.

Fertilizer recommendations are based on the nutrients that the peanut crop removes.

Soil test cost is prorated for a test every 3rd year.

Lime cost prorated for application every 3rd year.

60% of all peanuts harvested need drying.

85% of all peanuts harvested need cleaning.

Table 44.D Estimated costs for field operations, per acre
 Peanut - runner, 1.8 ton (3600 lb) yield, 8 row-30 inch
 All Areas, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	-----DIRECT COST-----							FIXED COST	TOTAL COST	
		OP INPUT	FUEL	R&M	LABOR	LEASE	INTER	TOTAL			
-----dollars-----											
Soil Test	acre	3.33						0.08	3.41		3.41
Sprayer 600-750gal	60' 175hp		0.29	0.18	0.51			0.02	1.00	1.20	2.20
Glyphosate 3lbs a.e	pt	9.00						0.21	9.21		9.21
Lime (Spread)	ton	15.32						0.36	15.68		15.68
Bed-Rip/Disk Rigid	8R-30		2.45	0.97	3.38			0.13	6.93	5.76	12.69
Peanut Plt&Pre Rigid	8R-30		2.69	3.25	5.09			0.22	11.25	9.84	21.09
Peanut Seed	lb	105.00						2.08	107.08		107.08
Optimize LIFT	oz	8.73						0.17	8.90		8.90
Admire Pro	oz	15.30						0.30	15.60		15.60
Sprayer 600-750gal	60' 175hp		0.29	0.18	0.51			0.02	1.00	1.20	2.20
Dual II Magnum	pt	14.83						0.29	15.12		15.12
Valor SX	oz	13.71						0.27	13.98		13.98
Sprayer 600-750gal	60' 175hp		0.07	0.05	0.13				0.25	0.30	0.55
Acephate 90%	lb	1.02						0.02	1.04		1.04
Sprayer 600-750gal	60' 175hp		0.29	0.18	0.51			0.02	1.00	1.20	2.20
Storm	pt	17.12						0.27	17.39		17.39
Cadre	oz	14.16						0.22	14.38		14.38
Butyrac 200 (2,4-DB)	pt	4.34						0.07	4.41		4.41
Crop Oil Conc.(Veg.)	pt	5.22						0.08	5.30		5.30
Sprayer 600-750gal	60' 175hp		0.29	0.18	0.51			0.02	1.00	1.20	2.20
Bravo Weather Stick	pt	9.84						0.16	10.00		10.00
Sprayer 600-750gal	60' 175hp		0.29	0.18	0.51			0.01	0.99	1.20	2.19
Aframe	oz	35.28						0.42	35.70		35.70
Sprayer 600-750gal	60' 175hp		0.29	0.18	0.51			0.01	0.99	1.20	2.19
Butyrac 200 (2,4-DB)	pt	4.34						0.05	4.39		4.39
Crop Oil Conc.(Veg.)	pt	5.22						0.06	5.28		5.28
Sprayer 600-750gal	60' 175hp		0.29	0.18	0.51			0.01	0.99	1.20	2.19
Select Max	pt	12.64						0.15	12.79		12.79
Crop Oil Conc.(Veg.)	pt	5.22						0.06	5.28		5.28
Sprayer 600-750gal	60' 175hp		0.29	0.18	0.51			0.01	0.99	1.20	2.19
Bravo Weather Stick	pt	6.56						0.08	6.64		6.64
Tebuconazole 3.6	oz	5.11						0.06	5.17		5.17
Sprayer 600-750gal	60' 175hp		0.29	0.18	0.51			0.01	0.99	1.20	2.19
Aframe	oz	35.28						0.28	35.56		35.56
Sprayer 600-750gal	60' 175hp		0.29	0.18	0.51			0.01	0.99	1.20	2.19
Bravo Weather Stick	pt	9.84						0.08	9.92		9.92
Sprayer 600-750gal	60' 175hp		0.29	0.18	0.51				0.98	1.20	2.18
Bravo Weather Stick	pt	9.84						0.04	9.88		9.88
Peanut Dig/Invertor	4R-30		4.15	3.03	5.74			0.05	12.97	10.12	23.09
Peanut Harvester	4R-30		17.72	12.18	20.67			0.20	50.77	60.41	111.18
Dry Peanuts	ton	25.92						0.10	26.02		26.02
Cleaning Peanuts	ton	27.54						0.11	27.65		27.65
Peanut Dump Cart	6-Row		5.46	2.56	7.54			0.06	15.62	14.12	29.74
TOTALS		419.71	35.73	24.02	48.16	0.00	6.87	534.49	113.75	648.24	

Note: Cost of production estimates are based on 2017 input prices.
Fertilizer recommendations are based on the nutrients that the peanut crop removes.
Soil test cost is prorated for a test every 3rd year.
Lime cost prorated for application every 3rd year.
 60% of all peanuts harvested need drying.
 85% of all peanuts harvested need cleaning.

Table 44.E Estimated monthly income and expense flows per acre
 Peanut - runner, 1.8 ton (3600 lb) yield, 8 row-30 inch
 All Areas, Mississippi, 2018

ITEM	Oct	Nov	Dec	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep
-----dollars-----												
TOTAL INCOME	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	693.00
DIRECT EXPENSES												
FUNGICIDES	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	9.84	46.95	45.12	9.84
HERBICIDES	0.00	0.00	0.00	0.00	0.00	0.00	9.00	28.54	35.62	16.98	0.00	0.00
INSECTICIDES	0.00	0.00	0.00	0.00	0.00	0.00	0.00	16.32	0.00	0.00	0.00	0.00
SEED/PLANTS	0.00	0.00	0.00	0.00	0.00	0.00	0.00	105.00	0.00	0.00	0.00	0.00
ADJUVANTS	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	5.22	10.44	0.00	0.00
CLEANING	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	27.54
DRYING	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	25.92
CUSTOM LIME	0.00	0.00	0.00	0.00	0.00	0.00	15.32	0.00	0.00	0.00	0.00	0.00
INOCULANT	0.00	0.00	0.00	0.00	0.00	0.00	0.00	8.73	0.00	0.00	0.00	0.00
SOIL TEST	0.00	0.00	0.00	0.00	0.00	0.00	3.33	0.00	0.00	0.00	0.00	0.00
LABOR	0.00	0.00	0.00	0.00	0.00	0.00	0.51	9.11	1.02	2.04	1.02	34.46
LEASE *	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
FUEL	0.00	0.00	0.00	0.00	0.00	0.00	0.29	5.50	0.58	1.16	0.58	27.62
REPAIR & MAINTENANCE	0.00	0.00	0.00	0.00	0.00	0.00	0.18	4.45	0.36	0.72	0.36	17.95
INTEREST ON OP. CAP.	0.00	0.00	0.00	0.00	0.00	0.00	0.67	3.50	0.84	0.92	0.38	0.56
TOTAL DIRECT EXPENSES	0.00	0.00	0.00	0.00	0.00	0.00	29.30	181.15	53.48	79.21	47.46	143.89
NET INCOME	0.00	0.00	0.00	0.00	0.00	0.00	-29.30	-181.15	-53.48	-79.21	-47.46	549.11
NET INCOME TO DATE	0.00	0.00	0.00	0.00	0.00	0.00	-29.30	-210.45	-263.93	-343.14	-390.60	158.51

Note: Cost of production estimates are based on 2017 input prices.

Fertilizer recommendations are based on the nutrients that the peanut crop removes.

Fertilization decisions should be based on soil tests.

Soil test cost is prorated for a test every 3rd year.

Lime cost prorated for application every 3rd year.

60% of all peanuts harvested need drying.

85% of all peanuts harvested need cleaning.

* Lease costs are based on hourly usage costs.

Table 44.F Estimated returns for various price/yield combinations, per acre
 Peanut - runner, 1.8 ton (3600 lb) yield, 8 row-30 inch
 All Areas, Mississippi, 2018

			PERCENT										
PRODUCT			75	80	85	90	95	100	105	110	115	120	125
Peanut Runner			288.75	308.00	327.25	346.50	365.75	385.00	404.25	423.50	442.75	462.00	481.25
PERCENT	YIELD	UNIT	dollars										
50	0.90	ton	-247 -361	-230 -344	-213 -326	-195 -309	-178 -292	-161 -274	-143 -257	-126 -240	-109 -222	-91 -205	-74 -188
60	1.08	ton	-201 -314	-180 -294	-159 -273	-138 -252	-118 -231	-97 -210	-76 -190	-55 -169	-34 -148	-14 -127	6 -107
70	1.26	ton	-154 -268	-130 -244	-106 -219	-81 -195	-57 -171	-33 -147	-9 -122	15 -98	39 -74	63 -50	87 -25
80	1.44	ton	-107 -221	-80 -193	-52 -166	-24 -138	2 -110	30 -83	58 -55	86 -27	113 0	141 27	169 55
90	1.62	ton	-61 -175	-30 -143	1 -112	32 -81	63 -50	94 -19	125 12	156 43	188 74	219 105	250 136
100	1.80	ton	-14 -128	19 -93	54 -59	89 -24	123 10	158 44	193 79	227 114	262 148	297 183	331 218
110	1.98	ton	31 -81	69 -43	108 -5	146 32	184 70	222 108	260 146	298 184	336 223	374 261	413 299
120	2.16	ton	78 -35	120 6	161 47	203 89	244 131	286 172	327 214	369 255	411 297	452 338	494 380
130	2.34	ton	125 11	170 56	215 101	260 146	305 191	350 236	395 281	440 326	485 371	530 416	575 461
140	2.52	ton	171 57	220 106	268 154	317 203	365 251	414 300	462 349	511 397	559 446	608 494	656 543
150	2.70	ton	218 104	270 156	322 208	374 260	426 312	478 364	530 416	582 468	634 520	686 572	738 624

The top number in each cell is Returns Above Direct Expenses.
 The bottom number in each cell is Returns Above Total Specified Expenses.
 Only the product listed has been varied to calculate net returns.
 Note: Cost of production estimates are based on 2017 input prices.

Table 45.A Estimated costs per acre
 Peanut - runner, 1.8 ton (3600 lb) yield, 12 row-38inch
 All Areas, Mississippi, 2018

ITEM	UNIT	PRICE	QUANTITY	AMOUNT	YOUR FARM
		dollars		dollars	
DIRECT EXPENSES					
FUNGICIDES					
Bravo Weather Stick	pt	6.56	5.5000	36.08	_____
Aframe	oz	1.96	36.0000	70.56	_____
Tebuconazole 3.6	oz	0.71	7.2000	5.11	_____
HERBICIDES					
Glyphosate 3lbs a.e	pt	2.25	4.0000	9.00	_____
Dual II Magnum	pt	14.83	1.0000	14.83	_____
Valor SX	oz	4.57	3.0000	13.71	_____
Storm	pt	11.41	1.5000	17.12	_____
Cadre	oz	3.54	4.0000	14.16	_____
Butyrac 200 (2,4-DB)	pt	4.34	2.0000	8.68	_____
Select Max	pt	12.64	1.0000	12.64	_____
INSECTICIDES					
Admire Pro	oz	1.70	9.0000	15.30	_____
Acephate 90%	lb	7.43	0.1375	1.02	_____
SEED/PLANTS					
Peanut Seed	lb	0.84	125.0000	105.00	_____
ADJUVANTS					
Crop Oil Conc. (Veg.)	pt	2.61	6.0000	15.66	_____
CLEANING					
Cleaning Peanuts	ton	18.00	1.5300	27.54	_____
DRYING					
Dry Peanuts	ton	24.00	1.0800	25.92	_____
CUSTOM LIME					
Lime (Spread)	ton	46.00	0.3330	15.32	_____
INOCULANT					
Optimize LIFT	oz	0.59	14.8000	8.73	_____
SOIL TEST					
Soil Test	acre	10.00	0.3330	3.33	_____
OPERATOR LABOR					
Tractors	hour	13.51	1.1856	16.02	_____
Self-Propelled	hour	13.51	0.1983	2.70	_____
HAND LABOR					
Implements	hour	9.06	0.0804	0.73	_____
Self-Propelled	hour	9.06	0.0991	0.90	_____
UNALLOCATED LABOR					
	hour	13.51	1.1072	14.96	_____
DIESEL FUEL					
Tractors	gal	1.80	12.8051	23.05	_____
Self-Propelled	gal	1.80	1.7850	3.26	_____
REPAIR & MAINTENANCE					
Implements	acre	8.97	1.0000	8.97	_____
Tractors	acre	7.18	1.0000	7.18	_____
Self-Propelled	acre	2.03	1.0000	2.03	_____
INTEREST ON OP. CAP.	acre	6.64	1.0000	6.64	_____
TOTAL DIRECT EXPENSES				506.15	_____
FIXED EXPENSES					
Implements	acre	31.91	1.0000	31.91	_____
Tractors	acre	45.25	1.0000	45.25	_____
Self-Propelled	acre	13.50	1.0000	13.50	_____
TOTAL FIXED EXPENSES				90.66	_____
TOTAL SPECIFIED EXPENSES				596.81	_____

Note: Cost of production estimates are based on 2017 input prices.

Fertilizer recommendations are based on the nutrients that the peanut crop removes. Fertilization decisions should be based on soil tests.

Soil test cost is prorated for a test every 3rd year.

Lime cost prorated for application every 3rd year.

60% of all peanuts harvested need drying.

85% of all peanuts harvested need cleaning.

Table 45.B Summary of estimated costs and returns per acre
 Peanut - runner, 1.8 ton (3600 lb) yield, 12 row-38inch
 All Areas, Mississippi, 2018

ITEM	UNIT	PRICE	QUANTITY	AMOUNT	YOUR FARM
		dollars		dollars	
INCOME					
Peanut Runner	ton	385.00	1.8000	693.00	_____

TOTAL INCOME				693.00	_____
DIRECT EXPENSES					
FUNGICIDES	acre	111.75	1.0000	111.75	_____
HERBICIDES	acre	90.14	1.0000	90.14	_____
INSECTICIDES	acre	16.32	1.0000	16.32	_____
SEED/PLANTS	acre	105.00	1.0000	105.00	_____
ADJUVANTS	acre	15.66	1.0000	15.66	_____
CLEANING	acre	27.54	1.0000	27.54	_____
DRYING	acre	25.92	1.0000	25.92	_____
CUSTOM LIME	acre	15.32	1.0000	15.32	_____
INOCULANT	acre	8.73	1.0000	8.73	_____
SOIL TEST	acre	3.33	1.0000	3.33	_____
HAND LABOR	hour	9.06	0.1795	1.63	_____
OPERATOR LABOR	hour	13.51	1.3840	18.72	_____
UNALLOCATED LABOR	hour	13.51	1.1072	14.96	_____
DIESEL FUEL	gal	1.80	14.5901	26.31	_____
REPAIR & MAINTENANCE	acre	18.18	1.0000	18.18	_____
INTEREST ON OP. CAP.	acre	6.64	1.0000	6.64	_____

TOTAL DIRECT EXPENSES				506.15	_____
RETURNS ABOVE DIRECT EXPENSES				186.85	_____
TOTAL FIXED EXPENSES				90.66	_____

TOTAL SPECIFIED EXPENSES				596.81	_____
RETURNS ABOVE TOTAL SPECIFIED EXPENSES				96.19	_____

Note: Cost of production estimates are based on 2017 input prices.

Fertilizer recommendations are based on the nutrients that the peanut crop removes. Fertilization decisions should be based on soil tests. Soil test cost is prorated for a test every 3rd year. Lime cost prorated for application every 3rd year.

60% of all peanuts harvested need drying.
 85% of all peanuts harvested need cleaning.

Table 45.C Estimated resource use for field operations, per acre
 Peanut - runner, 1.8 ton (3600 lb) yield, 12 row-38inch
 All Areas, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	POWER UNIT SIZE	PERF RATE	TIMES OVER	MTH	INPUT AMOUNT	IMPLEMENT	POWER UNIT	ALLOC LABOR	UNALL LABOR
-----hours-----										
Soil Test	acre			0.33	Apr	0.3330				
Sprayer 600-750gal	60' 175hp		0.017	1.00	Apr			0.01	0.02	0.01
Glyphosate 3lbs a.e	pt					4.0000				
Lime (Spread)	ton			0.33	Apr	0.3330				
Bed-Rip/Disk Fold.	12R-38	MFWD 225	0.046	1.00	May		0.04	0.04	0.04	0.03
Peanut Plt&Pre Fold.	12R-38	MFWD 190	0.080	1.00	May		0.08	0.08	0.16	0.06
Peanut Seed	lb					125.0000				
Optimize LIFT	oz					14.8000				
Admire Pro	oz					9.0000				
Sprayer 600-750gal	60' 175hp		0.017	1.00	May			0.01	0.02	0.01
Dual II Magnum	pt					1.0000				
Valor SX	oz					3.0000				
Sprayer 600-750gal	60' 175hp		0.017	0.25	May			0.00	0.00	0.00
Acephate 90%	lb					0.1375				
Sprayer 600-750gal	60' 175hp		0.017	1.00	Jun			0.01	0.02	0.01
Storm	pt					1.5000				
Cadre	oz					4.0000				
Butyrac 200 (2,4-DB)	pt					1.0000				
Crop Oil Conc.(Veg.)	pt					2.0000				
Sprayer 600-750gal	60' 175hp		0.017	1.00	Jun			0.01	0.02	0.01
Bravo Weather Stick	pt					1.5000				
Sprayer 600-750gal	60' 175hp		0.017	1.00	Jul			0.01	0.02	0.01
Aframe	oz					18.0000				
Sprayer 600-750gal	60' 175hp		0.017	1.00	Jul			0.01	0.02	0.01
Butyrac 200 (2,4-DB)	pt					1.0000				
Crop Oil Conc.(Veg.)	pt					2.0000				
Sprayer 600-750gal	60' 175hp		0.017	1.00	Jul			0.01	0.02	0.01
Select Max	pt					1.0000				
Crop Oil Conc.(Veg.)	pt					2.0000				
Sprayer 600-750gal	60' 175hp		0.017	1.00	Jul			0.01	0.02	0.01
Bravo Weather Stick	pt					1.0000				
Tebuconazole 3.6	oz					7.2000				
Sprayer 600-750gal	60' 175hp		0.017	1.00	Aug			0.01	0.02	0.01
Aframe	oz					18.0000				
Sprayer 600-750gal	60' 175hp		0.017	1.00	Aug			0.01	0.02	0.01
Bravo Weather Stick	pt					1.5000				
Sprayer 600-750gal	60' 175hp		0.017	1.00	Sep			0.01	0.02	0.01
Bravo Weather Stick	pt					1.5000				
Peanut Dig/Invertor	6R-38	MFWD 190	0.124	1.00	Sep		0.12	0.12	0.12	0.09
Peanut Harvester	6R-38	MFWD 225	0.625	1.00	Sep		0.62	0.62	0.62	0.50
Dry Peanuts	ton					1.0800				
Cleaning Peanuts	ton					1.5300				
Peanut Dump Cart	6-Row	MFWD 190	0.310	1.00	Sep		0.31	0.31	0.31	0.24
TOTALS							1.38	1.18	1.56	1.10

Note: Cost of production estimates are based on 2017 input prices.
Fertilizer recommendations are based on the nutrients that the peanut crop removes.
Soil test cost is prorated for a test every 3rd year.
Lime cost prorated for application every 3rd year.
 60% of all peanuts harvested need drying.
 85% of all peanuts harvested need cleaning.

Table 45.D Estimated costs for field operations, per acre
 Peanut - runner, 1.8 ton (3600 lb) yield, 12 row-38inch
 All Areas, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	-----DIRECT COST-----							FIXED COST	TOTAL COST	
		OP INPUT	FUEL	R&M	LABOR	LEASE	INTER	TOTAL			
-----dollars-----											
Soil Test	acre	3.33						0.08	3.41		3.41
Sprayer 600-750gal	60' 175hp		0.29	0.18	0.51			0.02	1.00	1.20	2.20
Glyphosate 3lbs a.e	pt	9.00						0.21	9.21		9.21
Lime (Spread)	ton	15.32						0.36	15.68		15.68
Bed-Rip/Disk Fold.	12R-38		0.96	0.43	1.12			0.05	2.56	2.53	5.09
Peanut Plt&Pre Fold.	12R-38		1.42	2.88	2.69			0.14	7.13	7.42	14.55
Peanut Seed	lb	105.00						2.08	107.08		107.08
Optimize LIFT	oz	8.73						0.17	8.90		8.90
Admire Pro	oz	15.30						0.30	15.60		15.60
Sprayer 600-750gal	60' 175hp		0.29	0.18	0.51			0.02	1.00	1.20	2.20
Dual II Magnum	pt	14.83						0.29	15.12		15.12
Valor SX	oz	13.71						0.27	13.98		13.98
Sprayer 600-750gal	60' 175hp		0.07	0.05	0.13				0.25	0.30	0.55
Acephate 90%	lb	1.02						0.02	1.04		1.04
Sprayer 600-750gal	60' 175hp		0.29	0.18	0.51			0.02	1.00	1.20	2.20
Storm	pt	17.12						0.27	17.39		17.39
Cadre	oz	14.16						0.22	14.38		14.38
Butyrac 200 (2,4-DB)	pt	4.34						0.07	4.41		4.41
Crop Oil Conc.(Veg.)	pt	5.22						0.08	5.30		5.30
Sprayer 600-750gal	60' 175hp		0.29	0.18	0.51			0.02	1.00	1.20	2.20
Bravo Weather Stick	pt	9.84						0.16	10.00		10.00
Sprayer 600-750gal	60' 175hp		0.29	0.18	0.51			0.01	0.99	1.20	2.19
Aframe	oz	35.28						0.42	35.70		35.70
Sprayer 600-750gal	60' 175hp		0.29	0.18	0.51			0.01	0.99	1.20	2.19
Butyrac 200 (2,4-DB)	pt	4.34						0.05	4.39		4.39
Crop Oil Conc.(Veg.)	pt	5.22						0.06	5.28		5.28
Sprayer 600-750gal	60' 175hp		0.29	0.18	0.51			0.01	0.99	1.20	2.19
Select Max	pt	12.64						0.15	12.79		12.79
Crop Oil Conc.(Veg.)	pt	5.22						0.06	5.28		5.28
Sprayer 600-750gal	60' 175hp		0.29	0.18	0.51			0.01	0.99	1.20	2.19
Bravo Weather Stick	pt	6.56						0.08	6.64		6.64
Tebuconazole 3.6	oz	5.11						0.06	5.17		5.17
Sprayer 600-750gal	60' 175hp		0.29	0.18	0.51			0.01	0.99	1.20	2.19
Aframe	oz	35.28						0.28	35.56		35.56
Sprayer 600-750gal	60' 175hp		0.29	0.18	0.51			0.01	0.99	1.20	2.19
Bravo Weather Stick	pt	9.84						0.08	9.92		9.92
Sprayer 600-750gal	60' 175hp		0.29	0.18	0.51				0.98	1.20	2.18
Bravo Weather Stick	pt	9.84						0.04	9.88		9.88
Peanut Dig/Invertor	6R-38		2.18	1.62	3.02			0.03	6.85	5.82	12.67
Peanut Harvester	6R-38		13.03	8.66	15.20			0.15	37.04	47.27	84.31
Dry Peanuts	ton	25.92						0.10	26.02		26.02
Cleaning Peanuts	ton	27.54						0.11	27.65		27.65
Peanut Dump Cart	6-Row		5.46	2.56	7.54			0.06	15.62	14.12	29.74
TOTALS		419.71	26.31	18.18	35.31	0.00	6.64	506.15	90.66	596.81	

Note: Cost of production estimates are based on 2017 input prices.
Fertilizer recommendations are based on the nutrients that the peanut crop removes.
Soil test cost is prorated for a test every 3rd year.
Lime cost prorated for application every 3rd year.
 60% of all peanuts harvested need drying.
 85% of all peanuts harvested need cleaning.

Table 45.E Estimated monthly income and expense flows per acre
 Peanut - runner, 1.8 ton (3600 lb) yield, 12 row-38inch
 All Areas, Mississippi, 2018

ITEM	Oct	Nov	Dec	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep
-----dollars-----												
TOTAL INCOME	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	693.00
DIRECT EXPENSES												
FUNGICIDES	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	9.84	46.95	45.12	9.84
HERBICIDES	0.00	0.00	0.00	0.00	0.00	0.00	9.00	28.54	35.62	16.98	0.00	0.00
INSECTICIDES	0.00	0.00	0.00	0.00	0.00	0.00	0.00	16.32	0.00	0.00	0.00	0.00
SEED/PLANTS	0.00	0.00	0.00	0.00	0.00	0.00	0.00	105.00	0.00	0.00	0.00	0.00
ADJUVANTS	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	5.22	10.44	0.00	0.00
CLEANING	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	27.54
DRYING	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	25.92
CUSTOM LIME	0.00	0.00	0.00	0.00	0.00	0.00	15.32	0.00	0.00	0.00	0.00	0.00
INOCULANT	0.00	0.00	0.00	0.00	0.00	0.00	0.00	8.73	0.00	0.00	0.00	0.00
SOIL TEST	0.00	0.00	0.00	0.00	0.00	0.00	3.33	0.00	0.00	0.00	0.00	0.00
LABOR	0.00	0.00	0.00	0.00	0.00	0.00	0.51	4.45	1.02	2.04	1.02	26.27
LEASE *	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
FUEL	0.00	0.00	0.00	0.00	0.00	0.00	0.29	2.74	0.58	1.16	0.58	20.96
REPAIR & MAINTENANCE	0.00	0.00	0.00	0.00	0.00	0.00	0.18	3.54	0.36	0.72	0.36	13.02
INTEREST ON OP. CAP.	0.00	0.00	0.00	0.00	0.00	0.00	0.67	3.34	0.84	0.92	0.38	0.49
TOTAL DIRECT EXPENSES	0.00	0.00	0.00	0.00	0.00	0.00	29.30	172.66	53.48	79.21	47.46	124.04
NET INCOME	0.00	0.00	0.00	0.00	0.00	0.00	-29.30	-172.66	-53.48	-79.21	-47.46	568.96
NET INCOME TO DATE	0.00	0.00	0.00	0.00	0.00	0.00	-29.30	-201.96	-255.44	-334.65	-382.11	186.85

Note: Cost of production estimates are based on 2017 input prices.

Fertilizer recommendations are based on the nutrients that the peanut crop removes.

Fertilization decisions should be based on soil tests.

Soil test cost is prorated for a test every 3rd year.

Lime cost prorated for application every 3rd year.

60% of all peanuts harvested need drying.

85% of all peanuts harvested need cleaning.

* Lease costs are based on hourly usage costs.

Table 45.F Estimated returns for various price/yield combinations, per acre
 Peanut - runner, 1.8 ton (3600 lb) yield, 12 row-38inch
 All Areas, Mississippi, 2018

			PERCENT										
PRODUCT			75	80	85	90	95	100	105	110	115	120	125
Peanut Runner			288.75	308.00	327.25	346.50	365.75	385.00	404.25	423.50	442.75	462.00	481.25
PERCENT	YIELD	UNIT	dollars										
50	0.90	ton	-219 -310	-202 -292	-184 -275	-167 -258	-150 -240	-132 -223	-115 -206	-98 -188	-80 -171	-63 -154	-46 -136
60	1.08	ton	-172 -263	-152 -242	-131 -221	-110 -201	-89 -180	-68 -159	-48 -138	-27 -117	-6 -97	14 -76	35 -55
70	1.26	ton	-126 -216	-101 -192	-77 -168	-53 -144	-29 -119	-4 -95	19 -71	43 -47	67 -22	92 1	116 25
80	1.44	ton	-79 -170	-51 -142	-24 -114	3 -87	31 -59	58 -31	86 -3	114 23	142 51	169 79	197 106
90	1.62	ton	-33 -123	-1 -92	29 -61	60 -30	91 1	122 32	154 63	185 94	216 125	247 156	278 188
100	1.80	ton	13 -77	48 -42	82 -7	117 26	152 61	186 96	221 130	256 165	290 200	325 234	360 269
110	1.98	ton	60 -30	98 7	136 45	174 83	212 122	250 160	288 198	327 236	365 274	403 312	441 350
120	2.16	ton	106 16	148 57	189 99	231 140	273 182	314 224	356 265	397 307	439 348	481 390	522 431
130	2.34	ton	153 62	198 107	243 152	288 197	333 242	378 287	423 333	468 378	513 423	558 468	603 513
140	2.52	ton	200 109	248 157	297 206	345 254	394 303	442 351	491 400	539 448	588 497	636 545	685 594
150	2.70	ton	246 155	298 207	350 259	402 311	454 363	506 415	558 467	610 519	662 571	714 623	766 675

The top number in each cell is Returns Above Direct Expenses.
 The bottom number in each cell is Returns Above Total Specified Expenses.
 Only the product listed has been varied to calculate net returns.
 Note: Cost of production estimates are based on 2017 input prices.

Table 46.A Estimated costs per acre
 Peanut-runner, 2.2 ton (4,400 lb) yield, 12 row-38inch
 Furrow irrigated, All Areas, Mississippi, 2018

ITEM	UNIT	PRICE	QUANTITY	AMOUNT	YOUR FARM
		dollars		dollars	
DIRECT EXPENSES					
FUNGICIDES					
Bravo Weather Stick	pt	6.56	5.5000	36.08	_____
Aframe	oz	1.96	36.0000	70.56	_____
Tebuconazole 3.6	oz	0.71	7.2000	5.11	_____
HERBICIDES					
Glyphosate 3lbs a.e	pt	2.25	4.0000	9.00	_____
Dual II Magnum	pt	14.83	1.0000	14.83	_____
Valor SX	oz	4.57	3.0000	13.71	_____
Storm	pt	11.41	1.5000	17.12	_____
Cadre	oz	3.54	4.0000	14.16	_____
Butyrac 200 (2,4-DB)	pt	4.34	2.0000	8.68	_____
Select Max	pt	12.64	1.0000	12.64	_____
INSECTICIDES					
Admire Pro	oz	1.70	9.0000	15.30	_____
Acephate 90%	lb	7.43	0.1375	1.02	_____
IRRIGATION SUPPLIES					
Roll-Out Pipe	ft	0.25	33.0000	8.25	_____
SEED/PLANTS					
Peanut Seed	lb	0.84	125.0000	105.00	_____
ADJUVANTS					
Crop Oil Conc. (Veg.)	pt	2.61	6.0000	15.66	_____
CLEANING					
Cleaning Peanuts	ton	18.00	1.8700	33.66	_____
DRYING					
Dry Peanuts	ton	24.00	1.3200	31.68	_____
CUSTOM LIME					
Lime (Spread)	ton	46.00	0.3330	15.32	_____
INOCULANT					
Optimize LIFT	oz	0.59	14.8000	8.73	_____
SOIL TEST					
Soil Test	acre	10.00	0.3330	3.33	_____
OPERATOR LABOR					
Tractors	hour	13.51	1.2642	17.08	_____
Self-Propelled	hour	13.51	0.1983	2.70	_____
IRRIGATE LABOR					
Special Labor	hour	9.06	0.3250	2.96	_____
Implements	hour	9.06	0.0625	0.57	_____
HAND LABOR					
Implements	hour	9.06	0.0804	0.73	_____
Self-Propelled	hour	9.06	0.0991	0.90	_____
UNALLOCATED LABOR					
	hour	13.51	1.1072	14.96	_____
DIESEL FUEL					
Tractors	gal	1.80	13.5313	24.37	_____
Self-Propelled	gal	1.80	1.7850	3.26	_____
Irrigate Peanuts	gal	1.80	9.7755	17.60	_____
REPAIR & MAINTENANCE					
Implements	acre	9.17	1.0000	9.17	_____
Tractors	acre	7.57	1.0000	7.57	_____
Self-Propelled	acre	2.03	1.0000	2.03	_____
Irrigate Peanuts	acre	6.88	1.0000	6.88	_____
INTEREST ON OP. CAP.	acre	7.31	1.0000	7.31	_____
TOTAL DIRECT EXPENSES				557.93	_____
FIXED EXPENSES					
Implements	acre	32.93	1.0000	32.93	_____
Tractors	acre	47.76	1.0000	47.76	_____
Self-Propelled	acre	13.50	1.0000	13.50	_____
Irrigate Peanuts	acre	53.42	1.0000	53.42	_____
TOTAL FIXED EXPENSES				147.61	_____
TOTAL SPECIFIED EXPENSES				705.54	_____

Note: Cost of production estimates are based on 2017 input prices.

Fertilizer recommendations are based on the nutrients that the peanut crop removes. Fertilization decisions should be based on soil tests. Soil test cost is prorated for a test every 3rd year. Lime cost prorated for application every 3rd year.

60% of all peanuts harvested need drying.

85% of all peanuts harvested need cleaning.

Table 46.B Summary of estimated costs and returns per acre
 Peanut-runner, 2.2 ton (4,400 lb) yield, 12 row-38inch
 Furrow irrigated, All Areas, Mississippi, 2018

ITEM	UNIT	PRICE	QUANTITY	AMOUNT	YOUR FARM
		dollars		dollars	
INCOME					
Peanut Runner	ton	385.00	2.2000	847.00	_____

TOTAL INCOME				847.00	_____
DIRECT EXPENSES					
FUNGICIDES	acre	111.75	1.0000	111.75	_____
HERBICIDES	acre	90.14	1.0000	90.14	_____
INSECTICIDES	acre	16.32	1.0000	16.32	_____
IRRIGATION SUPPLIES	acre	8.25	1.0000	8.25	_____
SEED/PLANTS	acre	105.00	1.0000	105.00	_____
ADJUVANTS	acre	15.66	1.0000	15.66	_____
CLEANING	acre	33.66	1.0000	33.66	_____
DRYING	acre	31.68	1.0000	31.68	_____
CUSTOM LIME	acre	15.32	1.0000	15.32	_____
INOCULANT	acre	8.73	1.0000	8.73	_____
SOIL TEST	acre	3.33	1.0000	3.33	_____
HAND LABOR	hour	9.06	0.1795	1.63	_____
IRRIGATE LABOR	hour	9.06	0.3875	3.53	_____
OPERATOR LABOR	hour	13.51	1.4625	19.78	_____
UNALLOCATED LABOR	hour	13.51	1.1072	14.96	_____
DIESEL FUEL	gal	1.80	25.0919	45.23	_____
REPAIR & MAINTENANCE	acre	25.65	1.0000	25.65	_____
INTEREST ON OP. CAP.	acre	7.31	1.0000	7.31	_____

TOTAL DIRECT EXPENSES				557.93	_____
RETURNS ABOVE DIRECT EXPENSES				289.07	_____
TOTAL FIXED EXPENSES				147.61	_____

TOTAL SPECIFIED EXPENSES				705.54	_____
RETURNS ABOVE TOTAL SPECIFIED EXPENSES				141.46	_____

Note: Cost of production estimates are based on 2017 input prices.

Fertilizer recommendations are based on the nutrients that the peanut crop removes. Fertilization decisions should be based on soil tests. Soil test cost is prorated for a test every 3rd year. Lime cost prorated for application every 3rd year.

60% of all peanuts harvested need drying.

85% of all peanuts harvested need cleaning.

Table 46.C Estimated resource use for field operations, per acre
 Peanut-runner, 2.2 ton (4,400 lb) yield, 12 row-38inch
 Furrow irrigated, All Areas, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	POWER UNIT SIZE	PERF RATE	TIMES OVER	MTH	INPUT AMOUNT	IMPLEMENT	POWER UNIT	ALLOC LABOR	UNALL LABOR
						-----hours-----				
Soil Test	acre			0.33	Apr	0.3330				
Sprayer 600-750gal	60' 175hp		0.017	1.00	Apr			0.01	0.02	0.01
Glyphosate 3lbs a.e	pt					4.0000				
Lime (Spread)	ton			0.33	Apr	0.3330				
Bed-Rip/Disk Fold.	12R-38	MFWD 225	0.046	1.00	May		0.04	0.04	0.04	0.03
Peanut Plt&Pre Fold.	12R-38	MFWD 190	0.080	1.00	May		0.08	0.08	0.16	0.06
Peanut Seed	lb					125.0000				
Optimize LIFT	oz					14.8000				
Admire Pro	oz					9.0000				
Sprayer 600-750gal	60' 175hp		0.017	1.00	May			0.01	0.02	0.01
Dual II Magnum	pt					1.0000				
Valor SX	oz					3.0000				
Sprayer 600-750gal	60' 175hp		0.017	0.25	May			0.00	0.00	0.00
Acephate 90%	lb					0.1375				
Sprayer 600-750gal	60' 175hp		0.017	1.00	Jun			0.01	0.02	0.01
Storm	pt					1.5000				
Cadre	oz					4.0000				
Butyrac 200 (2,4-DB)	pt					1.0000				
Crop Oil Conc.(Veg.)	pt					2.0000				
Sprayer 600-750gal	60' 175hp		0.017	1.00	Jun			0.01	0.02	0.01
Bravo Weather Stick	pt					1.5000				
Sprayer 600-750gal	60' 175hp		0.017	1.00	Jul			0.01	0.02	0.01
Aframe	oz					18.0000				
Sprayer 600-750gal	60' 175hp		0.017	1.00	Jul			0.01	0.02	0.01
Butyrac 200 (2,4-DB)	pt					1.0000				
Crop Oil Conc.(Veg.)	pt					2.0000				
Sprayer 600-750gal	60' 175hp		0.017	1.00	Jul			0.01	0.02	0.01
Select Max	pt					1.0000				
Crop Oil Conc.(Veg.)	pt					2.0000				
Sprayer 600-750gal	60' 175hp		0.017	1.00	Jul			0.01	0.02	0.01
Bravo Weather Stick	pt					1.0000				
Tebuconazole 3.6	oz					7.2000				
Sprayer 600-750gal	60' 175hp		0.017	1.00	Aug			0.01	0.02	0.01
Aframe	oz					18.0000				
Sprayer 600-750gal	60' 175hp		0.017	1.00	Aug			0.01	0.02	0.01
Bravo Weather Stick	pt					1.5000				
Sprayer 600-750gal	60' 175hp		0.017	1.00	Sep			0.01	0.02	0.01
Bravo Weather Stick	pt					1.5000				
Peanut Dig/Invertor	6R-38	MFWD 190	0.124	1.00	Sep		0.12	0.12	0.12	0.09
Peanut Harvester	6R-38	MFWD 225	0.625	1.00	Sep		0.62	0.62	0.62	0.50
Dry Peanuts	ton					1.3200				
Cleaning Peanuts	ton					1.8700				
Peanut Dump Cart	6-Row	MFWD 190	0.310	1.00	Sep		0.31	0.31	0.31	0.24
Irrigate Peanuts	acre				Jan	1.0000	0.07	0.07	0.46	
TOTALS							1.46	1.26	2.02	1.10

Note: Cost of production estimates are based on 2017 input prices.
Fertilizer recommendations are based on the nutrients that the peanut crop removes.
Soil test cost is prorated for a test every 3rd year.
Lime cost prorated for application every 3rd year.
 60% of all peanuts harvested need drying.
 85% of all peanuts harvested need cleaning.

Table 46.D Estimated costs for field operations, per acre
 Peanut-runner, 2.2 ton (4,400 lb) yield, 12 row-38inch
 Furrow irrigated, All Areas, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	-----DIRECT COST-----							FIXED COST	TOTAL COST	
		OP INPUT	FUEL	R&M	LABOR	LEASE	INTER	TOTAL			
-----dollars-----											
Soil Test	acre	3.33						0.08	3.41		3.41
Sprayer 600-750gal	60' 175hp		0.29	0.18	0.51			0.02	1.00	1.20	2.20
Glyphosate 3lbs a.e	pt	9.00						0.21	9.21		9.21
Lime (Spread)	ton	15.32						0.36	15.68		15.68
Bed-Rip/Disk Fold.	12R-38		0.96	0.43	1.12			0.05	2.56	2.53	5.09
Peanut Plt&Pre Fold.	12R-38		1.42	2.88	2.69			0.14	7.13	7.42	14.55
Peanut Seed	lb	105.00						2.08	107.08		107.08
Optimize LIFT	oz	8.73						0.17	8.90		8.90
Admire Pro	oz	15.30						0.30	15.60		15.60
Sprayer 600-750gal	60' 175hp		0.29	0.18	0.51			0.02	1.00	1.20	2.20
Dual II Magnum	pt	14.83						0.29	15.12		15.12
Valor SX	oz	13.71						0.27	13.98		13.98
Sprayer 600-750gal	60' 175hp		0.07	0.05	0.13				0.25	0.30	0.55
Acephate 90%	lb	1.02						0.02	1.04		1.04
Sprayer 600-750gal	60' 175hp		0.29	0.18	0.51			0.02	1.00	1.20	2.20
Storm	pt	17.12						0.27	17.39		17.39
Cadre	oz	14.16						0.22	14.38		14.38
Butyrac 200 (2,4-DB)	pt	4.34						0.07	4.41		4.41
Crop Oil Conc. (Veg.)	pt	5.22						0.08	5.30		5.30
Sprayer 600-750gal	60' 175hp		0.29	0.18	0.51			0.02	1.00	1.20	2.20
Bravo Weather Stick	pt	9.84						0.16	10.00		10.00
Sprayer 600-750gal	60' 175hp		0.29	0.18	0.51			0.01	0.99	1.20	2.19
Aframe	oz	35.28						0.42	35.70		35.70
Sprayer 600-750gal	60' 175hp		0.29	0.18	0.51			0.01	0.99	1.20	2.19
Butyrac 200 (2,4-DB)	pt	4.34						0.05	4.39		4.39
Crop Oil Conc. (Veg.)	pt	5.22						0.06	5.28		5.28
Sprayer 600-750gal	60' 175hp		0.29	0.18	0.51			0.01	0.99	1.20	2.19
Select Max	pt	12.64						0.15	12.79		12.79
Crop Oil Conc. (Veg.)	pt	5.22						0.06	5.28		5.28
Sprayer 600-750gal	60' 175hp		0.29	0.18	0.51			0.01	0.99	1.20	2.19
Bravo Weather Stick	pt	6.56						0.08	6.64		6.64
Tebuconazole 3.6	oz	5.11						0.06	5.17		5.17
Sprayer 600-750gal	60' 175hp		0.29	0.18	0.51			0.01	0.99	1.20	2.19
Aframe	oz	35.28						0.28	35.56		35.56
Sprayer 600-750gal	60' 175hp		0.29	0.18	0.51			0.01	0.99	1.20	2.19
Bravo Weather Stick	pt	9.84						0.08	9.92		9.92
Sprayer 600-750gal	60' 175hp		0.29	0.18	0.51				0.98	1.20	2.18
Bravo Weather Stick	pt	9.84						0.04	9.88		9.88
Peanut Dig/Invertor	6R-38		2.18	1.62	3.02			0.03	6.85	5.82	12.67
Peanut Harvester	6R-38		13.03	8.66	15.20			0.15	37.04	47.27	84.31
Dry Peanuts	ton	31.68						0.13	31.81		31.81
Cleaning Peanuts	ton	33.66						0.13	33.79		33.79
Peanut Dump Cart	6-Row		5.46	2.56	7.54			0.06	15.62	14.12	29.74
Irrigate Peanuts	acre	8.25	18.92	7.47	4.59			0.62	39.85	56.95	96.80
TOTALS		439.84	45.23	25.65	39.90	0.00	7.31	557.93	147.61	705.54	

Note: Cost of production estimates are based on 2017 input prices.
Fertilizer recommendations are based on the nutrients that the peanut crop removes.
Soil test cost is prorated for a test every 3rd year.
Lime cost prorated for application every 3rd year.
 60% of all peanuts harvested need drying.
 85% of all peanuts harvested need cleaning.

Table 46.E Estimated monthly income and expense flows per acre
 Peanut-runner, 2.2 ton (4,400 lb) yield, 12 row-38inch
 Furrow irrigated, All Areas, Mississippi, 2018

ITEM	Oct	Nov	Dec	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep
-----dollars-----												
TOTAL INCOME	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	847.00
DIRECT EXPENSES												
FUNGICIDES	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	9.84	46.95	45.12	9.84
HERBICIDES	0.00	0.00	0.00	0.00	0.00	0.00	9.00	28.54	35.62	16.98	0.00	0.00
INSECTICIDES	0.00	0.00	0.00	0.00	0.00	0.00	0.00	16.32	0.00	0.00	0.00	0.00
IRRIGATION SUPPLIES	0.00	0.00	0.00	0.00	0.00	0.00	0.00	8.25	0.00	0.00	0.00	0.00
SEED/PLANTS	0.00	0.00	0.00	0.00	0.00	0.00	0.00	105.00	0.00	0.00	0.00	0.00
ADJUVANTS	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	5.22	10.44	0.00	0.00
CLEANING	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	33.66
DRYING	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	31.68
CUSTOM LIME	0.00	0.00	0.00	0.00	0.00	0.00	15.32	0.00	0.00	0.00	0.00	0.00
INOCULANT	0.00	0.00	0.00	0.00	0.00	0.00	0.00	8.73	0.00	0.00	0.00	0.00
SOIL TEST	0.00	0.00	0.00	0.00	0.00	0.00	3.33	0.00	0.00	0.00	0.00	0.00
LABOR	0.51	0.00	0.00	0.00	0.00	0.00	0.74	6.79	1.25	2.50	1.84	26.27
LEASE *	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
FUEL	0.67	0.00	0.00	0.00	0.00	0.00	0.29	3.09	4.98	9.96	5.28	20.96
REPAIR & MAINTENANCE	0.31	0.00	0.00	0.00	0.00	0.00	0.18	6.65	1.34	2.68	1.47	13.02
INTEREST ON OP. CAP.	0.07	0.00	0.00	0.00	0.00	0.00	0.68	3.62	0.93	1.04	0.43	0.54
TOTAL DIRECT EXPENSES	1.56	0.00	0.00	0.00	0.00	0.00	29.54	186.99	59.18	90.55	54.14	135.97
NET INCOME	-1.56	0.00	0.00	0.00	0.00	0.00	-29.54	-186.99	-59.18	-90.55	-54.14	711.03
NET INCOME TO DATE	-1.56	-1.56	-1.56	-1.56	-1.56	-1.56	-31.10	-218.09	-277.27	-367.82	-421.96	289.07

Note: Cost of production estimates are based on 2017 input prices.

Fertilizer recommendations are based on the nutrients that the peanut crop removes.

Fertilization decisions should be based on soil tests.

Soil test cost is prorated for a test every 3rd year.

Lime cost prorated for application every 3rd year.

60% of all peanuts harvested need drying.

85% of all peanuts harvested need cleaning.

* Lease costs are based on hourly usage costs.

Table 46.F Estimated returns for various price/yield combinations, per acre
 Peanut-runner, 2.2 ton (4,400 lb) yield, 12 row-38inch
 Furrow irrigated, All Areas, Mississippi, 2018

			PERCENT										
PRODUCT			75	80	85	90	95	100	105	110	115	120	125
Peanut Runner			288.75	308.00	327.25	346.50	365.75	385.00	404.25	423.50	442.75	462.00	481.25
PERCENT	YIELD	UNIT	dollars										
50	1.10	ton	-207 -355	-186 -333	-165 -312	-143 -291	-122 -270	-101 -249	-80 -228	-59 -206	-38 -185	-16 -164	4 -143
60	1.32	ton	-150 -298	-125 -272	-99 -247	-74 -221	-48 -196	-23 -171	1 -145	27 -120	52 -94	78 -69	103 -44
70	1.54	ton	-93 -241	-63 -211	-34 -181	-4 -152	25 -122	54 -92	84 -63	113 -33	143 -4	173 25	202 55
80	1.76	ton	-36 -184	-2 -150	31 -116	65 -82	98 -48	132 -14	166 19	200 52	234 86	268 120	302 154
90	1.98	ton	20 -127	58 -89	96 -51	134 -12	172 25	210 63	249 101	287 139	325 177	363 215	401 253
100	2.20	ton	77 -70	119 -27	162 14	204 56	246 99	289 141	331 183	373 226	416 268	458 310	500 353
110	2.42	ton	134 -13	180 33	227 79	274 126	320 173	367 219	413 266	460 312	506 359	553 405	600 452
120	2.64	ton	191 43	242 94	292 145	343 196	394 246	445 297	496 348	546 399	597 450	648 501	699 551
130	2.86	ton	248 100	303 155	358 210	413 265	468 320	523 375	578 430	633 485	688 541	743 596	798 651
140	3.08	ton	305 157	364 216	423 276	483 335	542 394	601 454	660 513	720 572	779 631	838 691	898 750
150	3.30	ton	362 214	425 278	489 341	552 405	616 468	679 532	743 595	806 659	870 722	933 786	997 849

The top number in each cell is Returns Above Direct Expenses.
 The bottom number in each cell is Returns Above Total Specified Expenses.
 Only the product listed has been varied to calculate net returns.
 Note: Cost of production estimates are based on 2017 input prices.

APPENDIX

Appendix Table 1. Tractors/Harvesters: estimated purchase price, annual use, useful life, fuel use, and direct and fixed cost per hour, Mississippi, 2018

Item Name	Size	Purchase Price	Annual Use	Useful Life	Fuel Use	Labor	Fuel	R&M	Total Direct	Fixed	Total Cost
		dollars	hours	years	gal/hr	-----\$/hour-----					
Combine (250-299 hp)	265 hp	328,000	300	8	13.64	13.51	24.55	34.16	72.22	134.81	207.04
Combine (300-349 hp)	325 hp	355,000	300	8	16.73	13.51	30.11	36.97	80.60	145.91	226.51
Combine (350-399 hp)	355 hp	354,000	300	8	18.27	13.51	32.88	36.87	83.27	145.50	228.77
Combine (400-449 hp)	425 hp	413,000	300	8	21.87	13.51	39.37	43.02	95.90	169.75	265.65
Combine (450-499hp)	475 hp	427,000	300	8	24.44	13.51	44.00	44.47	101.99	175.50	277.50
Tractor (20-39hp)CB	MFWD 30	28,300	600	8	1.54	13.51	2.77	0.88	17.17	5.32	22.49
Tractor (20-39hp)RB	MFWD 30	20,000	600	8	1.54	13.51	2.77	0.62	16.91	3.76	20.67
Tractor (40-59hp)CB	2WD 50	32,300	600	8	2.57	13.51	4.63	1.00	19.15	6.07	25.22
Tractor (40-59hp)CB	MFWD 50	39,500	600	8	2.57	13.51	4.63	1.23	19.37	7.42	26.80
Tractor (40-59hp)RB	2WD 50	21,100	600	8	2.57	13.51	4.63	0.65	18.80	3.96	22.76
Tractor (40-59hp)RB	MFWD 50	24,800	600	8	2.57	13.51	4.63	0.77	18.91	4.66	23.58
Tractor (60-89hp)CB	2WD 75	49,300	600	8	3.86	13.51	6.94	1.54	21.99	9.27	31.27
Tractor (60-89hp)CB	MFWD 75	52,500	600	8	3.86	13.51	6.94	1.64	22.09	9.87	31.97
Tractor (60-89hp)RB	2WD 75	33,100	600	8	3.86	13.51	6.94	1.03	21.49	6.22	27.71
Tractor (60-89hp)RB	MFWD 75	37,800	600	8	3.86	13.51	6.94	1.18	21.63	7.10	28.74
Tractor (90-119hp)CB	2WD 105	66,300	600	8	5.40	13.51	9.72	2.07	25.31	12.46	37.77
Tractor (90-119hp)CB	MFWD 105	76,100	600	8	5.40	13.51	9.72	2.37	25.61	14.31	39.92
Tractor (90-119hp)RB	2WD 105	60,300	600	8	5.40	13.51	9.72	1.88	25.12	11.33	36.46
Tractor (90-119hp)RB	MFWD 105	67,800	600	8	5.40	13.51	9.72	2.11	25.35	12.75	38.10
Tractor (120-139hp)CB	2WD 130	103,000	600	8	6.69	13.51	12.04	3.21	28.77	19.36	48.14
Tractor (120-139hp)CB	MFWD 130	113,000	600	8	6.69	13.51	12.04	3.53	29.08	21.25	50.33
Tractor (140-159hp)CB	MFWD 150	131,000	600	8	7.72	13.51	13.89	4.09	31.50	24.63	56.13
Tractor (160-179hp)CB	MFWD 170	153,000	600	8	8.75	13.51	15.75	4.78	34.04	30.10	64.14
Tractor (180-199hp)CB	MFWD 190	173,000	600	8	9.77	13.51	17.60	5.40	36.51	34.04	70.56
Tractor (200-249hp)CB	MFWD 225	210,000	600	8	11.58	13.51	20.84	6.56	40.91	41.32	82.24
Tractor (250-349hp)CB	4WD 300	285,000	600	8	15.44	13.51	27.79	8.90	50.21	56.08	106.29
Tractor (250-349hp)CB	MFWD 300	272,000	600	8	15.44	13.51	27.79	8.50	49.80	53.52	103.32
Tractor (250-349hp)CB	Track 300	318,000	600	8	15.44	13.51	27.79	9.93	51.24	62.57	113.81
Tractor (350-449hp)	Track 400	341,000	600	8	20.58	13.51	37.06	10.65	61.22	67.10	128.32
Tractor (350-449hp)CB	4WD 400	331,000	600	8	20.58	13.51	37.06	10.34	60.91	65.13	126.04
Tractor (450-550hp)CB	4WD 500	367,000	600	8	25.73	13.51	46.32	11.46	71.30	72.21	143.52
Tractor (450-550hp)CB	Track 500	445,000	600	8	25.73	13.51	46.32	13.90	73.74	87.56	161.30
Utility Vehicle	800 CC	10,000	200	8	0.70	13.51	1.47	1.56	16.54	6.16	22.70
Utility Vehicle	900 CC	12,600	200	8	1.00	13.51	2.10	1.96	17.57	7.76	25.34
Utility Vehicle-mule	600 CC	8,340	200	8	0.50	13.51	1.05	1.30	15.86	5.14	21.00

Notes:

Labor: Includes allocated labor from power unit.

Total Direct: Does not include interest on operating capital.

CB = Cab, RB = Roll Bar

Appendix Table 2. Self-propelled machines: estimated purchase price, annual use, useful life, fuel use, performance rate, and direct and fixed cost per acre, Mississippi, 2018

Item Name	Size	Purchase Price	Annual Use	Useful Life	Fuel Use	Perf Rate	Labor	Fuel	R&M	Total Direct	Fixed	Total Cost
		dollars	hours	years	gal/hr	hr/ac	-----\$/acre-----					
Cotton Picker	4R-38 (250)	268,000	200	8	12.86	0.257	5.81	5.97	10.79	22.58	42.59	65.17
Cotton Picker	4R-38 (350)	351,000	200	8	18.01	0.257	5.81	8.35	14.13	28.31	55.78	84.09
Cotton Picker	4R2x1 (350)	357,000	200	8	18.01	0.172	3.88	5.58	9.61	19.08	37.92	57.01
Cotton Picker	6R-30 (355)	465,000	200	8	18.27	0.218	4.92	7.17	15.85	27.96	62.56	90.53
Cotton Picker	6R-38 (355)	465,000	200	8	18.27	0.172	3.88	5.66	12.51	22.07	49.39	71.47
Cotton Picker/Modu	4R-38 (365)	536,000	200	8	20.58	0.257	5.81	9.55	21.58	36.96	85.18	122.14
Cotton Picker/Modu	6R-30 (500)	764,000	200	8	25.73	0.218	4.92	10.11	26.05	41.08	102.80	143.89
Cotton Picker/Module	6R-38 (500)	765,000	200	8	25.73	0.172	3.88	7.98	20.59	32.46	81.26	113.73
Dry Applicator SP	70'300cuft	306,000	350	8	16.98	0.015	0.27	0.46	0.24	0.98	1.62	2.61
Sprayer 600-750gal	60' 175hp	193,000	350	8	9.00	0.017	0.31	0.28	0.18	0.78	1.19	1.98
Sprayer 600-825gal	80' 175hp	202,000	350	8	11.81	0.013	0.23	0.28	0.14	0.66	0.94	1.60
Sprayer 600-825gal	90' 250hp	279,000	350	8	12.73	0.011	0.21	0.26	0.17	0.65	1.15	1.81
Sprayer 800gal	100' 250hp	280,000	350	8	14.15	0.010	0.19	0.26	0.15	0.61	1.04	1.66
Sprayer 800gal	80' 250hp	254,000	350	8	12.86	0.013	0.23	0.30	0.17	0.72	1.18	1.90
Sprayer 1000-1400gal	90' 275hp	299,000	350	8	14.15	0.010	0.19	0.26	0.16	0.62	1.11	1.74
Sprayer 1000gal	100' 300hp	310,000	350	8	15.44	0.010	0.19	0.29	0.17	0.66	1.15	1.81
Sprayer 1200+gal	120' 300hp	334,000	350	8	15.44	0.008	0.15	0.24	0.15	0.56	1.03	1.59
xxCotton Picker/Modu	6R-38 (365)	536,000	200	8	20.58	0.172	3.88	6.38	14.43	24.70	56.94	81.64

Notes:

Labor: includes allocated labor plus any additional labor from self-propelled machine.

Direct: Does not include interest on operating capital.

Appendix Table 3. Towed equipment: estimated purchase price, annual use, useful life, performance rate, and direct and fixed cost per acre, Mississippi, 2018

Item Name	Size	Power Unit	Purchase Price	Annual Use	Useful Life	Perf Rate	Labor	Fuel	---R&M---		Total Direct	--Fixed--		Total Cost	
									Imp.	P.U.		Imp.	P.U.		
				dollars	hours	years	hr/ac	-----\$/acre-----							
Bed-Paratill	Fold	8R-38	MFWD 225	54,400	150	12	0.080	1.09	1.68	1.58	0.52	4.89	2.75	3.33	10.98
Bed-Paratill	Fold	8R-38 2x1	MFWD 225	69,100	150	12	0.053	0.72	1.12	1.34	0.35	3.54	2.32	2.22	8.09
Bed-Paratill	Fold	12R-38	MFWD 225	69,100	150	12	0.053	0.72	1.12	1.34	0.35	3.54	2.32	2.22	8.09
Bed-Paratill	Rigid	4R-30	MFWD 225	12,300	150	12	0.204	2.76	4.25	0.90	1.34	9.26	1.57	8.44	19.28
Bed-Paratill	Rigid	4R-38	MFWD 225	12,300	150	12	0.160	2.17	3.35	0.71	1.05	7.29	1.23	6.64	15.18
Bed-Paratill	Rigid	6R-30	MFWD 225	17,300	150	12	0.136	1.84	2.83	0.85	0.89	6.42	1.47	5.62	13.53
Bed-Paratill	Rigid	6R-38	MFWD 225	17,200	150	12	0.107	1.45	2.24	0.66	0.70	5.06	1.15	4.44	10.67
Bed-Paratill	Rigid	8R-30	MFWD 225	22,600	150	12	0.102	1.38	2.12	0.83	0.67	5.01	1.44	4.22	10.68
Bed-Paratill	Rigid	8R-38	MFWD 225	22,600	150	12	0.080	1.09	1.68	0.65	0.52	3.96	1.14	3.33	8.44
Bed-Paratill	w/rol	4R-30	MFWD 225	17,900	150	12	0.204	2.76	4.25	1.32	1.34	9.68	2.29	8.44	20.41
Bed-Paratill	w/rol	4R-38	MFWD 225	17,900	150	12	0.160	2.17	3.35	1.03	1.05	7.62	1.80	6.64	16.07
Bed-Paratill	w/rol	6R-38	MFWD 225	25,200	150	12	0.107	1.45	2.24	0.97	0.70	5.37	1.69	4.44	11.52
Bed-Rip/Disk	Fold.	8R-38	MFWD 190	36,900	300	20	0.073	0.98	1.28	0.13	0.39	2.80	0.63	2.48	5.93
Bed-Rip/Disk	Fold.	12R-30	MFWD 225	56,600	300	20	0.061	0.83	1.28	0.17	0.40	2.69	0.82	2.54	6.06
Bed-Rip/Disk	Fold.	12R-38	MFWD 225	56,600	300	20	0.046	0.62	0.96	0.13	0.30	2.02	0.62	1.91	4.55
Bed-Rip/Disk	Rigid	4R-30	MFWD 190	17,300	300	20	0.184	2.49	3.25	0.15	0.99	6.91	0.75	6.29	13.96
Bed-Rip/Disk	Rigid	4R-38	MFWD 190	17,300	300	20	0.146	1.98	2.58	0.12	0.79	5.48	0.60	4.99	11.08
Bed-Rip/Disk	Rigid	6R-38	MFWD 190	23,900	300	20	0.097	1.31	1.71	0.11	0.52	3.66	0.55	3.31	7.53
Bed-Rip/Disk	Rigid	8R-30	MFWD 190	31,300	300	20	0.139	1.87	2.44	0.21	0.75	5.29	1.03	4.73	11.05
Bed-Rip/Disk	Rigid	8R-38	MFWD 190	31,300	300	20	0.073	0.98	1.28	0.11	0.39	2.78	0.54	2.48	5.81
Bed-Rip/Disk	Rigid	6R-30	MFWD 190	23,900	300	20	0.123	1.66	2.16	0.14	0.66	4.64	0.69	4.19	9.54
Bed-Rip/Disk/Cond.		6-Row	MFWD 225	24,600	150	12	0.107	1.45	2.24	0.95	0.70	5.35	1.65	4.44	11.45
Bed-Rip/Disk/Cond.		8-Row	MFWD 225	32,700	150	12	0.080	1.09	1.68	0.95	0.52	4.25	1.65	3.33	9.25
Bed/Disk (Hipper)		4R-38	MFWD 150	9,200	160	10	0.147	1.99	2.05	0.33	0.60	4.99	0.89	3.63	9.52
Bed/Disk (Hipper)		6R-30	MFWD 170	15,100	160	10	0.125	1.68	1.96	0.47	0.59	4.72	1.24	3.76	9.73
Bed/Disk (Hipper)		6R-38	MFWD 170	13,000	160	10	0.098	1.33	1.55	0.32	0.47	3.67	0.84	2.97	7.49
Bed/Disk (Hipper)		8R-30	MFWD 190	14,400	160	10	0.093	1.26	1.65	0.33	0.50	3.76	0.89	3.19	7.84
Bed/Disk (Hipper)		8R-38 2x1	MFWD 190	29,200	160	10	0.049	0.66	0.86	0.36	0.26	2.16	0.95	1.67	4.79
Bed/Disk (Hipper)		12R-30	MFWD 225	28,400	160	10	0.062	0.84	1.30	0.44	0.41	3.00	1.17	2.58	6.75
Bed/Disk (Hipper)		12R-38	MFWD 225	29,200	160	10	0.049	0.66	1.02	0.36	0.32	2.37	0.95	2.03	5.36
Bed/Disk (Hipper)		16R40	MFWD 300	47,000	160	10	0.035	0.47	0.98	0.41	0.30	2.17	1.09	1.89	5.16
Bed/Disk (Hipper)Fl		8R-38	MFWD 190	20,000	160	10	0.074	1.00	1.30	0.37	0.40	3.07	0.97	2.52	6.57
Bed/Disk (Hipper)Rd		8R-38	MFWD 190	15,600	160	10	0.074	1.00	1.30	0.28	0.40	2.99	0.76	2.52	6.28
Bed/Disk w/roller		8R-30/40	MFWD 190	26,600	160	10	0.093	1.26	1.65	0.62	0.50	4.04	1.64	3.19	8.88
Bed/Disk w/roller		12R-30/40	MFWD 225	44,300	160	10	0.062	0.84	1.30	0.69	0.41	3.24	1.82	2.58	7.66
Bed/Disk w/roller		8R-38	MFWD 190	26,600	160	10	0.074	1.00	1.30	0.49	0.40	3.19	1.30	2.52	7.02
Bed/Lister		4R-38	MFWD 150	18,200	160	8	0.228	3.08	3.17	0.97	0.93	8.16	3.06	5.62	16.86
Bed/Lister		6R-38	MFWD 150	19,100	160	8	0.120	1.62	1.67	0.53	0.49	4.32	1.69	2.96	8.97
Bed/Lister		8R-30	MFWD 190	23,100	160	8	0.114	1.54	2.01	0.61	0.61	4.78	1.94	3.88	10.62
Bed/Lister		8R-38	MFWD 190	23,400	160	8	0.090	1.21	1.58	0.49	0.48	3.79	1.55	3.07	8.42
Bed/Lister		8R-38 2x1	MFWD 190	46,700	160	8	0.060	0.81	1.05	0.65	0.32	2.85	2.07	2.04	6.96
Bed/Lister		12R-38	MFWD 225	46,700	160	8	0.060	0.81	1.25	0.65	0.39	3.11	2.07	2.48	7.67
Bed/Lister		16R-30	MFWD 225	58,100	160	8	0.035	0.47	0.73	0.47	0.23	1.91	1.50	1.45	4.87
Bed/Lister		16R40	MFWD 300	60,900	160	8	0.043	0.58	1.19	0.61	0.36	2.76	1.93	2.30	7.00
Bed/Lister-Roll-Fold		8R-38	MFWD 190	24,300	160	10	0.074	1.00	1.30	0.45	0.40	3.15	1.18	2.52	6.86
Bed/Lister-Roll-Fold		12R-30	MFWD 225	29,200	160	10	0.062	0.84	1.30	0.45	0.41	3.01	1.20	2.58	6.80
Bed/Lister-Roll-Fold		12R-38	MFWD 225	33,700	160	10	0.049	0.66	1.02	0.41	0.32	2.43	1.09	2.03	5.57
Bed/Lister-Roll-Fold		16R-30	MFWD 225	34,800	160	10	0.046	0.63	0.97	0.40	0.30	2.32	1.07	1.93	5.34
Bed/Lister-Roll-Rig.		8R-38	MFWD 190	20,300	160	10	0.074	1.00	1.30	0.37	0.40	3.08	0.99	2.52	6.59
Blade-Box		6'-7'	MFWD 105	1,180	200	20	0.020	0.27	0.19	0.01	0.04	0.51	0.00	0.25	0.78
Blade-Box		8'-10'	MFWD 105	3,700	200	20	0.000	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Blade-Scraper		6'-7'	MFWD 105	1,190	200	20	0.000	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Blade-Scraper		8'-10'	MFWD 105	3,550	200	20	0.000	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Boll Buggy		4R-38 (250)	MFWD 190	30,500	200	10	0.257	3.48	4.53	1.96	1.39	11.37	3.99	8.77	24.15
Boll Buggy		4R-38 (350)	MFWD 190	30,500	200	10	0.257	3.48	4.53	1.96	1.39	11.37	3.99	8.77	24.15
Boll Buggy		4R2x1 (350)	MFWD 190	30,500	200	10	0.172	2.32	3.03	1.31	0.93	7.60	2.67	5.86	16.14
Boll Buggy		6R-30 (355)	MFWD 190	30,500	200	10	0.218	2.94	3.84	1.66	1.17	9.63	3.38	7.42	20.44
Boll Buggy		6R-38 (355)	MFWD 190	30,500	200	10	0.172	2.32	3.03	1.31	0.93	7.60	2.67	5.86	16.14
Chisel Plow-Folding		24'	MFWD 190	39,300	150	12	0.076	1.03	1.34	1.08	0.41	3.87	1.88	2.60	8.36
Chisel Plow-Folding		32'	MFWD 225	51,000	150	12	0.057	0.78	1.20	1.06	0.37	3.42	1.84	2.38	7.66
Chisel Plow-Folding		42'	MFWD 225	61,600	150	12	0.044	0.59	0.91	0.97	0.28	2.78	1.69	1.81	6.29
Chisel Plow-Folding		50'	MFWD 225	80,300	150	10	0.036	0.49	0.77	1.28	0.24	2.79	2.09	1.52	6.41
Chisel Plow-Folding		61'	MFWD 225	90,200	150	12	0.030	0.40	0.63	0.98	0.19	2.22	1.71	1.25	5.19
Chisel Plow-Rigid		10'	MFWD 170	6,600	150	12	0.184	2.49	2.91	0.44	0.88	6.73	0.76	5.56	13.06
Chisel Plow-Rigid		15'	2WD 130	11,600	150	12	0.123	1.66	1.48	0.51	0.39	4.06	0.89	2.38	7.34
Chisel Plow-Rigid		20'	MFWD 225	11,200	150	12	0.102	1.38	2.14	0.41	0.67	4.61	0.72	4.24	9.58
Chisel Plow-Rigid		24'	MFWD 190	11,700	150	12	0.077	1.04	1.35	0.32	0.41	3.13	0.56	2.62	6.32
Cultivate		4R-30	2WD 105	12,100	150	10	0.206	2.78	2.00	0.66	0.42	5.88	1.75	2.57	10.21
Cultivate		4R-38	2WD 105	12,200	150	10	0.162	2.19	1.57	0.52	0.30	4.60	1.39	1.84	7.84
Cultivate		6R-30	MFWD 150	16,300	150	10	0.137	1.85	1.91	0.59	0.56	4.92	1.57	3.38	9.89
Cultivate		6R-38	MFWD 150	17,200	150	10	0.108	1.46	1.50	0.49	0.44	3.91	1.31	2.67	7.90
Cultivate		8R-30	MFWD 190	20,600	150	10	0.103	1.39	1.81	0.56	0.55	4.33	1.49	3.51	9.34
Cultivate		8R-38	MFWD 190	21,600	150	10	0.073	0.99	1.29	0.42	0.39	3.11	1.12	2.50	6.74
Cultivate		8R-38 2x1	MFWD 190	37,500	150	10	0.054	0.73	0.95	0.54	0.29	2.52	1.43	1.84	5.80

(continued)

Appendix Table 3. Towed equipment: estimated purchase price, annual use, useful life, performance rate, and direct and fixed cost per acre, Mississippi, 2018 (continued)

Item Name	Size	Power Unit	Purchase Price	Annual Use	Useful Life	Perf Rate	Labor	Fuel	---R&M---		Total Direct	--Fixed--		Total Cost
									Imp.	P.U.		Imp.	P.U.	
			dollars	hours	years	hr/ac	-----\$/acre-----							
Cultivate	12R-30	MFWD 225	36,200	150	10	0.068	0.92	1.43	0.66	0.45	3.47	1.75	2.84	8.07
Cultivate	12R-38	MFWD 225	37,500	150	10	0.054	0.73	1.13	0.54	0.35	2.76	1.43	2.24	6.44
Cultivate	16R-30	MFWD 225	47,800	150	10	0.051	0.69	1.07	0.65	0.33	2.76	1.73	2.13	6.63
Cultivate & Post	4R-30	2WD 105	17,500	150	10	0.220	3.96	2.14	1.02	0.41	7.55	2.71	2.49	12.75
Cultivate & Post	4R-38	2WD 105	17,600	150	10	0.173	3.12	1.68	0.81	0.32	5.94	2.14	1.96	10.06
Cultivate & Post	6R-30	MFWD 150	21,700	150	10	0.146	2.64	2.03	0.84	0.60	6.13	2.24	3.61	11.98
Cultivate & Post	6R-38	MFWD 150	22,600	150	10	0.115	2.08	1.60	0.69	0.47	4.86	1.84	2.85	9.56
Cultivate & Post	8R-30	MFWD 190	26,000	150	10	0.110	1.98	1.93	0.76	0.59	5.27	2.01	3.74	11.03
Cultivate & Post	8R-38	MFWD 190	27,000	150	10	0.086	1.56	1.53	0.62	0.47	4.19	1.65	2.96	8.80
Cultivate & Post	8R-38 2x1	MFWD 190	44,500	150	10	0.057	1.04	1.01	0.68	0.31	3.06	1.81	1.97	6.84
Cultivate & Post	10R-30	MFWD 225	32,000	150	10	0.088	1.58	1.83	0.75	0.57	4.75	1.98	3.63	10.37
Cultivate & Post	12R-30	MFWD 225	41,500	150	10	0.073	1.32	1.52	0.81	0.48	4.14	2.14	3.03	9.31
Cultivate & Post	12R-38	MFWD 225	44,500	150	10	0.057	1.04	1.20	0.68	0.37	3.31	1.81	2.39	7.52
Cultivate & Post	16R-30	MFWD 225	54,900	150	10	0.055	0.99	1.14	0.80	0.36	3.30	2.12	2.27	7.70
Disk & Incorporate	14'	2WD 130	30,100	200	10	0.149	2.69	1.80	1.35	0.48	6.33	2.37	2.89	11.61
Disk & Incorporate	20'	MFWD 190	44,500	180	10	0.092	1.24	1.62	1.37	0.49	4.74	2.41	3.14	10.30
Disk & Incorporate	24'	MFWD 190	46,900	200	10	0.087	1.57	1.53	1.22	0.47	4.81	2.16	2.97	9.94
Disk & Incorporate	28'	MFWD 225	55,500	200	10	0.074	1.34	1.55	1.24	0.49	4.64	2.19	3.09	9.93
Disk & Incorporate	32'	MFWD 225	61,000	200	10	0.065	1.18	1.36	1.19	0.42	4.17	2.11	2.70	8.99
Disk Harrow	14'	2WD 130	24,800	180	10	0.140	1.89	1.68	0.96	0.45	5.00	2.04	2.71	9.76
Disk Harrow	20'	MFWD 190	39,200	180	10	0.098	1.32	1.72	1.06	0.53	4.65	2.25	3.34	10.25
Disk Harrow	24'	MFWD 190	41,500	180	10	0.081	1.10	1.44	0.94	0.44	3.93	1.99	2.78	8.71
Disk Harrow	28'	MFWD 225	50,100	180	10	0.070	0.94	1.46	0.97	0.46	3.84	2.06	2.89	8.80
Disk Harrow	32'	MFWD 225	55,700	180	10	0.061	0.82	1.27	0.94	0.40	3.46	2.00	2.53	8.00
Disk Harrow	42'	MFWD 225	96,300	180	10	0.046	0.63	0.97	1.25	0.30	3.16	2.64	1.93	7.74
Disk Harrow 40-100hp	14'	2WD 75	14,900	180	10	0.140	1.89	0.97	0.58	0.14	3.59	1.22	0.87	5.69
Disk Heavy	14'	MFWD 150	24,800	180	10	0.145	1.97	2.02	1.00	0.59	5.60	2.12	3.59	11.32
Disk Heavy	20'	MFWD 170	39,200	180	10	0.097	1.31	1.53	1.05	0.46	4.37	2.23	2.92	9.54
Disk Heavy	28'	MFWD 190	50,100	180	10	0.075	1.02	1.33	1.05	0.40	3.81	2.22	2.57	8.61
Disk Ripper	15'	MFWD 225	45,200	180	10	0.136	1.84	2.83	1.71	0.89	7.28	3.61	5.62	16.52
Ditcher		2WD 130	5,700	200	10	0.020	0.27	0.24	0.04	0.06	0.62	0.06	0.38	1.06
Ditcher (1m/160a)		2WD 130	5,700	200	10	0.009	0.12	0.11	0.02	0.03	0.29	0.02	0.18	0.50
Fert Appl (Liquid)	4R-38	MFWD 150	12,900	150	8	0.154	2.79	2.14	1.33	0.63	6.90	1.50	3.81	12.21
Fert Appl (Liquid)	6R-30	MFWD 170	16,300	150	8	0.130	2.36	2.06	1.42	0.62	6.47	1.60	3.94	12.02
Fert Appl (Liquid)	6R-38	MFWD 170	15,600	150	8	0.103	1.86	1.62	1.07	0.49	5.06	1.21	3.11	9.38
Fert Appl (Liquid)	8R-30	MFWD 190	16,300	150	8	0.098	1.77	1.72	1.06	0.53	5.09	1.20	3.34	9.64
Fert Appl (Liquid)	8R-38	MFWD 190	18,400	150	8	0.077	1.40	1.36	0.95	0.41	4.13	1.07	2.64	7.85
Fert Appl (Liquid)	8R-38 2x1	MFWD 190	19,700	150	8	0.051	0.93	0.90	0.67	0.27	2.80	0.76	1.75	5.32
Fert Appl (Liquid)	12R-30	MFWD 225	20,000	150	8	0.078	1.41	1.63	1.04	0.51	4.61	1.18	3.24	9.04
Fert Appl (Liquid)	12R-38	MFWD 225	19,000	150	8	0.051	0.93	1.07	0.65	0.33	3.00	0.73	2.13	5.87
Field Cult & Inc	42'	MFWD 225	59,700	100	10	0.037	0.68	0.78	0.56	0.24	2.28	2.38	1.56	6.22
Field Cult & Inc	50'	MFWD 225	72,000	100	10	0.031	0.57	0.66	0.57	0.20	2.01	2.41	1.31	5.73
Field Cult & Inc Fld	24'	MFWD 170	34,500	100	10	0.066	1.19	1.04	0.57	0.31	3.12	2.40	1.99	7.52
Field Cult & Inc Fld	32'	MFWD 190	43,800	100	10	0.049	0.89	0.87	0.54	0.26	2.57	2.29	1.68	6.56
Field Cult & Inc Rdg	12'	2WD 150	15,800	100	10	0.132	2.38	1.83	0.52	0.44	5.19	2.20	2.68	10.08
Field Cultivate Fld	24'	MFWD 170	29,100	100	10	0.062	0.84	0.98	0.45	0.29	2.57	1.91	1.87	6.35
Field Cultivate Fld	32'	MFWD 190	38,500	100	10	0.046	0.63	0.82	0.44	0.25	2.15	1.89	1.58	5.63
Field Cultivate Fld	42'	MFWD 225	52,600	100	10	0.035	0.48	0.74	0.46	0.23	1.92	1.97	1.46	5.36
Field Cultivate Fld	50'	MFWD 225	62,100	100	10	0.029	0.40	0.62	0.46	0.19	1.68	1.95	1.23	4.87
Field Cultivate Rdg	12'	2WD 150	10,400	100	10	0.124	1.68	1.72	0.32	0.41	4.15	1.36	2.52	8.04
Grain Cart Corn	500 bu	MFWD 190	24,000	200	12	0.025	0.34	0.44	0.16	0.13	1.08	0.28	0.86	2.23
Grain Cart Corn	700 bu	MFWD 190	36,700	200	12	0.025	0.34	0.44	0.25	0.13	1.17	0.43	0.86	2.47
Grain Cart Corn	1000 bu	MFWD 225	45,700	200	12	0.025	0.34	0.52	0.31	0.16	1.34	0.54	1.04	2.93
Grain Cart Rice	500 bu	MFWD 190	24,000	200	12	0.062	0.84	1.10	0.40	0.33	2.68	0.70	2.12	5.52
Grain Cart Rice	700 bu	MFWD 190	36,700	200	12	0.055	0.74	0.96	0.54	0.29	2.55	0.94	1.87	5.37
Grain Cart Rice	1000 bu	MFWD 190	45,700	200	12	0.045	0.61	0.80	0.56	0.24	2.24	0.98	1.56	4.78
Grain Cart Soybean	500 bu	MFWD 190	24,000	200	12	0.025	0.34	0.44	0.16	0.13	1.09	0.28	0.86	2.25
Grain Cart Soybean	700 bu	MFWD 190	36,700	200	12	0.021	0.28	0.37	0.21	0.11	0.98	0.36	0.72	2.07
Grain Cart Soybean	1000 bu	MFWD 190	45,700	200	12	0.021	0.28	0.37	0.26	0.11	1.03	0.45	0.72	2.21
Grain Cart Wht/Sor	500 bu	MFWD 190	24,000	200	12	0.025	0.34	0.44	0.16	0.13	1.09	0.28	0.86	2.25
Grain Cart Wht/Sor	700 bu	MFWD 190	36,700	200	12	0.021	0.28	0.37	0.21	0.11	0.98	0.36	0.72	2.07
Grain Cart Wht/Sor	1000 bu	MFWD 190	45,700	200	12	0.021	0.28	0.37	0.26	0.11	1.03	0.45	0.72	2.21
Grain Drill	10'	2WD 130	26,700	150	8	0.188	4.25	2.27	1.88	0.60	9.02	3.61	3.65	16.28
Grain Drill	12'	2WD 130	25,200	150	8	0.157	3.54	1.89	1.48	0.50	7.43	2.84	3.04	13.31
Grain Drill	15'	MFWD 150	31,800	150	8	0.125	2.83	1.74	1.49	0.51	6.59	2.86	3.09	12.56
Grain Drill	20'	MFWD 170	37,300	150	8	0.094	2.12	1.48	1.31	0.45	5.38	2.52	2.83	10.74
Grain Drill	24'	MFWD 190	63,000	150	8	0.078	1.77	1.38	1.85	0.42	5.43	3.55	2.67	11.66
Grain Drill	30'	MFWD 225	59,500	150	8	0.062	1.41	1.31	1.40	0.41	4.54	2.68	2.59	9.82
Grain Drill	35'	MFWD 225	90,600	150	8	0.053	1.21	1.12	1.83	0.35	4.52	3.50	2.22	10.25
Grain Drill & Pre	10'	2WD 130	32,000	150	8	0.203	4.58	2.44	2.43	0.65	10.12	4.66	3.93	18.71
Grain Drill & Pre	12'	2WD 130	30,600	150	8	0.169	3.81	2.03	1.94	0.54	8.34	3.71	3.27	15.33
Grain Drill & Pre	15'	MFWD 150	37,200	150	8	0.135	3.05	1.88	1.88	0.55	7.37	3.61	3.33	14.32
Grain Drill & Pre	20'	MFWD 170	42,700	150	8	0.101	2.29	1.59	1.62	0.48	6.00	3.11	3.05	12.16

(continued)

Appendix Table 3. Towed equipment: estimated purchase price, annual use, useful life, performance rate, and direct and fixed cost per acre, Mississippi, 2018 (continued)

Item Name	Size	Power Unit	Purchase Price	Annual Use	Useful Life	Perf Rate	Labor	Fuel	---R&M---		Total Direct	--Fixed--		Total Cost
									Imp.	P.U.		Imp.	P.U.	
			dollars	hours	years	hr/ac	-----\$/acre-----							
Grain Drill & Pre	24'	MFWD 190	68,400	150	8	0.084	1.90	1.48	2.17	0.45	6.02	4.15	2.88	13.06
Grain Drill & Pre	30'	MFWD 225	64,800	150	8	0.067	1.52	1.41	1.64	0.44	5.02	3.14	2.79	10.97
Grain Drill & Pre	35'	MFWD 225	96,000	150	8	0.058	1.30	1.20	2.08	0.38	4.98	3.99	2.39	11.38
Grain Drill & Pre T	8R-38	MFWD 225	49,600	150	8	0.062	1.41	1.31	1.16	0.41	4.31	2.23	2.59	9.14
Harrow - Rigid	21'	2WD 150	6,750	200	10	0.073	0.99	1.02	0.17	0.24	2.45	0.26	1.50	4.21
Harrow - Folding	24'	MFWD 190	12,800	200	10	0.064	0.87	1.13	0.28	0.34	2.65	0.43	2.20	5.29
Harrow - Folding	30'	MFWD 190	15,400	200	10	0.051	0.69	0.91	0.27	0.27	2.16	0.42	1.76	4.35
Harrow - Folding	40'	MFWD 190	19,200	200	10	0.038	0.52	0.68	0.26	0.20	1.67	0.39	1.32	3.39
Harrow - Folding	48'	MFWD 225	23,000	200	10	0.032	0.43	0.67	0.26	0.21	1.58	0.39	1.33	3.31
Harrow - Rigid	13'	2WD 130	4,950	200	10	0.119	1.61	1.43	0.20	0.38	3.64	0.31	2.31	6.27
Header - Corn	6R-30	265 hp	47,300	300	8	0.170	2.30	4.18	2.01	5.81	14.31	3.02	22.95	40.29
Header - Corn	6R-38	265 hp	47,700	300	8	0.134	1.81	3.30	1.60	4.59	11.31	2.41	18.12	31.84
Header - Corn	8R-30	265 hp	61,500	300	8	0.127	1.72	3.13	1.96	4.36	11.18	2.95	17.21	31.35
Header - Corn	8R-38	325 hp	62,100	300	8	0.100	1.36	3.04	1.56	3.73	9.70	2.35	14.73	26.79
Header - Corn	12R-20	325 hp	94,400	300	8	0.127	1.72	3.84	3.01	4.72	13.30	4.53	18.63	36.47
Header - Corn	12R-30	325 hp	96,300	300	8	0.085	1.15	2.56	2.04	3.14	8.91	3.08	12.42	24.41
Header - Draper (CL)	25' Rigid	265 hp	58,800	300	8	0.203	2.74	4.98	2.73	6.93	17.40	4.28	27.37	49.06
Header - Draper (CL)	30' Rigid	325 hp	67,900	300	8	0.169	2.28	5.09	2.63	6.25	16.27	4.12	24.69	45.08
Header - Draper (CL)	36' Rigid	355 hp	72,000	300	8	0.141	1.90	4.63	2.32	5.20	14.07	3.64	20.51	38.23
Header - Draper (CL)	40' Rigid	425 hp	76,300	30	8	0.126	1.71	4.99	22.19	5.46	34.36	34.73	21.54	90.64
Header - Draper (SL)	25' Rigid	325 hp	58,800	300	8	0.176	2.37	5.30	2.37	6.50	16.55	3.71	25.68	45.94
Header - Draper (SL)	30' Rigid	325 hp	67,900	300	8	0.146	1.98	4.41	2.28	5.42	14.10	3.57	21.40	39.07
Header - Draper (SL)	36' Rigid	355 hp	72,000	300	8	0.122	1.65	4.01	2.01	4.50	12.19	3.15	17.78	33.13
Header - Drapper	40' Rigid	425 hp	76,300	30	8	0.110	1.48	4.33	19.23	4.73	29.78	30.10	18.67	78.55
Header - Rice (CL)	25' Rigid	325 hp	64,400	300	8	0.253	3.42	7.64	4.08	9.38	24.54	6.14	37.03	67.73
Header - Rice (CL)	30' Rigid	325 hp	74,100	300	8	0.211	2.85	6.37	3.91	7.82	20.96	5.89	30.86	57.73
Header - Rice (SL)	25' Rigid	325 hp	64,400	300	8	0.220	2.97	6.62	3.54	8.13	21.27	5.32	32.10	58.70
Header - Rice (SL)	30' Rigid	325 hp	74,100	300	8	0.183	2.47	5.52	3.39	6.77	18.17	5.10	26.74	50.03
Header -RiceStrp(CL)	20'	265 hp	49,100	300	8	0.253	3.42	6.23	3.11	8.67	21.45	4.68	34.22	60.36
Header -RiceStrp(CL)	24'	325 hp	54,500	300	8	0.211	2.85	6.37	2.88	7.82	19.93	4.33	30.86	55.13
Header -RiceStrp(CL)	32'	325 hp	59,900	300	8	0.158	2.14	4.77	2.37	5.86	15.16	3.57	23.14	41.88
Header -RiceStrp(SL)	20'	265 hp	49,100	300	8	0.220	2.97	5.40	2.70	7.51	18.59	4.06	29.65	52.31
Header -RiceStrp(SL)	24'	325 hp	54,500	300	8	0.183	2.47	5.52	2.49	6.77	17.27	3.75	26.74	47.78
Header -RiceStrp(SL)	32'	325 hp	59,900	300	8	0.137	1.85	4.14	2.05	5.08	13.14	3.09	20.06	36.30
Header -Soybean	22' Flex	265 hp	32,400	300	8	0.116	1.56	2.85	0.94	3.96	9.32	1.41	15.65	26.39
Header -Soybean	25' Flex	325 hp	34,600	300	8	0.102	1.38	3.07	0.88	3.77	9.11	1.32	14.90	25.35
Header -Soybean	30' Flex	325 hp	41,400	300	8	0.085	1.15	2.56	0.88	3.14	7.74	1.32	12.42	21.49
Header -Soybean	35' Flex	355 hp	46,700	300	8	0.072	0.98	2.40	0.85	2.69	6.92	1.28	10.61	18.82
Header Wheat/Sorghum	22' Rigid	265 hp	19,800	300	8	0.116	1.56	2.85	0.57	3.96	8.96	0.86	15.65	25.47
Header Wheat/Sorghum	25' Rigid	325 hp	20,500	300	8	0.102	1.38	3.07	0.52	3.77	8.75	0.78	14.90	24.45
Header Wheat/Sorghum	30' Rigid	325 hp	23,600	300	8	0.085	1.15	2.56	0.50	3.14	7.36	0.75	12.42	20.54
Land Plane	50'x16'	MFWD 190	14,300	200	10	0.151	2.04	2.66	0.43	0.81	5.97	1.14	5.16	12.28
Levee Pull & Seed	8 Blade	MFWD 170	10,400	100	10	0.003	0.04	0.05	0.00	0.01	0.12	0.03	0.10	0.27
Levee Pull (1m/80a)	8 blade	MFWD 170	7,180	100	10	0.003	0.04	0.05	0.00	0.01	0.12	0.02	0.10	0.26
Levee Splitter (1/80	32"	MFWD 150	7,180	100	10	0.004	0.05	0.05	0.00	0.01	0.13	0.03	0.10	0.27
Module Builder	4R-38(250)	MFWD 190	34,700	200	10	0.257	5.81	4.53	2.23	1.39	13.98	4.54	8.77	27.30
Module Builder	4R-38(350)	MFWD 190	34,700	200	10	0.257	5.81	4.53	2.23	1.39	13.98	4.54	8.77	27.30
Module Builder	4R2x1(350)	MFWD 190	34,700	200	10	0.172	3.88	3.03	1.49	0.93	9.34	3.03	5.86	18.25
Module Builder	6R-30(355)	MFWD 190	34,700	200	10	0.218	4.92	3.84	1.89	1.17	11.84	3.85	7.42	23.12
Module Builder	6R-38(355)	MFWD 190	34,700	200	10	0.172	3.88	3.03	1.49	0.93	9.34	3.03	5.86	18.25
NT Grain Drill	10'	2WD 130	35,100	150	8	0.235	5.31	2.83	3.10	0.75	12.02	5.93	4.56	22.52
NT Grain Drill	12'	2WD 130	42,200	150	8	0.163	3.69	1.97	2.59	0.52	8.78	4.95	3.17	16.90
NT Grain Drill	15'	MFWD 150	49,200	150	8	0.130	2.95	1.81	2.41	0.53	7.72	4.62	3.22	15.57
NT Grain Drill	20'	MFWD 170	66,300	150	8	0.098	2.21	1.54	2.44	0.46	6.67	4.67	2.95	14.30
NT Grain Drill	24'	MFWD 190	75,600	150	8	0.081	1.84	1.44	2.32	0.44	6.05	4.43	2.78	13.27
NT Grain Drill	30'	MFWD 225	89,000	150	8	0.065	1.47	1.36	2.18	0.42	5.45	4.18	2.70	12.34
NT Grain Drill & Pre	10'	2WD 130	40,400	150	8	0.211	4.77	2.54	3.20	0.68	11.20	6.13	4.09	21.43
NT Grain Drill & Pre	12'	2WD 130	47,500	150	8	0.176	3.97	2.12	3.13	0.56	9.80	6.00	3.41	19.23
NT Grain Drill & Pre	15'	MFWD 150	54,600	150	8	0.141	3.18	1.95	2.88	0.57	8.60	5.52	3.47	17.60
NT Grain Drill & Pre	20'	MFWD 170	71,600	150	8	0.105	2.38	1.66	2.83	0.50	7.39	5.43	3.18	16.01
NT Grain Drill & Pre	24'	MFWD 190	81,000	150	8	0.088	1.98	1.55	2.67	0.47	6.69	5.12	3.00	14.81
NT Grain Drill & Pre	30'	MFWD 225	94,300	150	8	0.070	1.59	1.46	2.49	0.46	6.01	4.76	2.91	13.70
NT Plant&Pre-Folding	8R-38	MFWD 170	56,700	150	8	0.083	1.88	1.31	1.77	0.39	5.38	3.40	2.51	11.29
NT Plant&Pre-Folding	8R-38 2x1	MFWD 170	88,200	150	8	0.055	1.25	0.87	1.84	0.26	4.24	3.52	1.67	9.43
NT Plant&Pre-Folding	12R-20	MFWD 190	72,100	150	8	0.105	2.38	1.86	2.85	0.57	7.68	5.47	3.60	16.75
NT Plant&Pre-Folding	12R-30	MFWD 190	77,500	150	8	0.070	1.59	1.24	2.04	0.38	5.26	3.91	2.40	11.58
NT Plant&Pre-Folding	12R-38	MFWD 190	88,200	150	8	0.055	1.25	0.97	1.84	0.30	4.37	3.52	1.89	9.79
NT Plant&Pre-Folding	16R-30	MFWD 190	114,000	150	8	0.052	1.19	0.93	2.26	0.28	4.67	4.32	1.80	10.79
NT Plant&Pre-Folding	23R-15	MFWD 190	150,000	150	8	0.073	1.65	1.29	4.13	0.39	7.47	7.90	2.50	17.88
NT Plant&Pre-Folding	24R-15	MFWD 225	153,000	150	8	0.070	1.59	1.46	4.04	0.46	7.56	7.73	2.91	18.22
NT Plant&Pre-Folding	24R-20	MFWD 190	162,000	150	8	0.052	1.19	0.93	3.21	0.28	5.62	6.14	1.80	13.56
NT Plant&Pre-Folding	24R-30	MFWD 190	188,000	150	8	0.035	0.79	0.62	2.48	0.19	4.09	4.75	1.20	10.04

(continued)

Appendix Table 3. Towed equipment: estimated purchase price, annual use, useful life, performance rate, and direct and fixed cost per acre, Mississippi, 2018 (continued)

Item Name	Size	Power Unit	Purchase Price	Annual Use	Useful Life	Perf Rate	Labor	Fuel	---R&M---		Total Direct	--Fixed--		Total Cost
									Imp.	P.U.		Imp.	P.U.	
			dollars	hours	years	hr/ac	-----\$/acre-----							
NT Plant&Pre-Folding	31R-15	MFWD 225	181,000	150	8	0.054	1.23	1.13	3.71	0.35	6.44	7.09	2.25	15.79
NT Plant&Pre-Folding	32R-15	MFWD 225	197,000	150	8	0.052	1.19	1.10	3.90	0.34	6.54	7.47	2.18	16.20
NT Plant&Pre-Rigid	4R-30	2WD 130	28,200	150	8	0.211	4.77	2.54	2.23	0.68	10.24	4.27	4.09	18.61
NT Plant&Pre-Rigid	4R-38	2WD 130	30,800	150	8	0.166	3.75	2.00	1.92	0.53	8.22	3.68	3.22	15.13
NT Plant&Pre-Rigid	6R-30	MFWD 150	39,300	150	8	0.141	3.18	1.95	2.07	0.57	7.79	3.97	3.47	15.24
NT Plant&Pre-Rigid	6R-38	MFWD 150	36,200	150	8	0.111	2.51	1.54	1.51	0.45	6.02	2.89	2.74	11.66
NT Plant&Pre-Rigid	8R-30	MFWD 170	46,900	150	8	0.105	2.38	1.66	1.86	0.50	6.41	3.55	3.18	13.16
NT Plant&Pre-Rigid	8R-38	MFWD 170	43,200	150	8	0.083	1.88	1.31	1.35	0.39	4.95	2.59	2.51	10.06
NT Plant&Pre-Rigid	10R-30	MFWD 190	51,900	150	8	0.084	1.90	1.48	1.64	0.45	5.50	3.15	2.88	11.53
NT Plant&Pre-Rigid	11R-15	MFWD 170	56,000	150	8	0.143	3.24	2.26	3.02	0.68	9.22	5.78	4.33	19.33
NT Plant&Pre-Rigid	11R-20	MFWD 170	51,400	150	8	0.115	2.60	1.82	2.22	0.55	7.21	4.26	3.48	14.95
NT Plant&Pre-Rigid	12R-20	MFWD 190	57,700	150	8	0.105	2.38	1.86	2.28	0.57	7.10	4.37	3.60	15.08
NT Plant&Pre-Rigid	12R-30	MFWD 190	72,400	150	8	0.070	1.59	1.24	1.91	0.38	5.12	3.66	2.40	11.19
NT Plant&Pre-Rigid	13R-18/20	MFWD 225	63,000	150	8	0.097	2.20	2.03	2.30	0.63	7.17	4.40	4.02	15.60
NT Plant&Pre-Rigid	15R-15	MFWD 190	71,300	150	8	0.113	2.55	1.99	3.02	0.61	8.18	5.78	3.85	17.81
NT Plant&Pre-TwinRow	12R-30/40	MFWD 225	162,000	150	8	0.055	1.25	1.16	3.38	0.36	6.16	6.46	2.30	14.93
NT Plant&Pre-TwinRow	8R-30/40	MFWD 225	117,000	150	8	0.083	1.88	1.74	3.66	0.54	7.84	7.01	3.45	18.31
NT Plant-Folding	8R-38	MFWD 170	51,300	150	8	0.077	1.75	1.22	1.49	0.37	4.84	2.85	2.33	10.03
NT Plant-Folding	8R-38 2x1	MFWD 170	81,200	150	8	0.051	1.16	0.81	1.57	0.24	3.80	3.01	1.55	8.36
NT Plant-Folding	12R-20	MFWD 190	66,700	150	8	0.098	2.21	1.72	2.45	0.53	6.93	4.69	3.34	14.97
NT Plant-Folding	12R-30	MFWD 190	70,400	150	8	0.065	1.47	1.15	1.72	0.35	4.71	3.30	2.22	10.24
NT Plant-Folding	12R-38	MFWD 190	81,200	150	8	0.051	1.16	0.90	1.57	0.27	3.92	3.01	1.75	8.70
NT Plant-Folding	16R-30	MFWD 190	107,000	150	8	0.049	1.10	0.86	1.97	0.26	4.20	3.76	1.67	9.65
NT Plant-Folding	23R-15	MFWD 190	143,000	150	8	0.068	1.53	1.20	3.65	0.36	6.76	6.99	2.32	16.08
NT Plant-Folding	24R-15	MFWD 225	146,000	150	8	0.065	1.47	1.36	3.58	0.42	6.85	6.85	2.70	16.42
NT Plant-Folding	24R-20	MFWD 190	155,000	150	8	0.049	1.10	0.86	2.85	0.26	5.09	5.46	1.67	12.22
NT Plant-Folding	24R-30	MFWD 190	171,000	150	8	0.032	0.73	0.57	2.09	0.17	3.59	4.01	1.11	8.72
NT Plant-Folding	31R-15	MFWD 225	163,000	150	8	0.050	1.14	1.05	3.10	0.33	5.63	5.93	2.09	13.67
NT Plant-Folding	32R-15	MFWD 225	180,000	150	8	0.049	1.10	1.02	3.31	0.32	5.76	6.34	2.02	14.13
NT Plant-Rigid	4R-30	2WD 130	22,900	150	8	0.196	4.43	2.36	1.68	0.63	9.11	3.22	3.80	16.14
NT Plant-Rigid	4R-38	2WD 130	25,500	150	8	0.154	3.49	1.86	1.47	0.49	7.33	2.82	2.99	13.15
NT Plant-Rigid	6R-30	MFWD 150	34,000	150	8	0.130	2.95	1.81	1.66	0.53	6.98	3.19	3.22	13.40
NT Plant-Rigid	6R-38	MFWD 150	30,900	150	8	0.103	2.33	1.43	1.19	0.42	5.39	2.29	2.54	10.22
NT Plant-Rigid	8R-30	MFWD 170	41,600	150	8	0.098	2.21	1.54	1.53	0.46	5.76	2.93	2.95	11.65
NT Plant-Rigid	8R-38	MFWD 170	37,800	150	8	0.077	1.75	1.22	1.10	0.37	4.44	2.10	2.33	8.88
NT Plant-Rigid	10R-30	MFWD 190	46,500	150	8	0.078	1.77	1.38	1.37	0.42	4.95	2.62	2.67	10.24
NT Plant-Rigid	11R-15	MFWD 170	50,700	150	8	0.133	3.01	2.10	2.54	0.63	8.29	4.85	4.02	17.18
NT Plant-Rigid	11R-20	MFWD 170	46,100	150	8	0.107	2.42	1.69	1.85	0.51	6.48	3.54	3.23	13.26
NT Plant-Rigid	12R-20	MFWD 190	52,300	150	8	0.098	2.21	1.72	1.92	0.53	6.40	3.68	3.34	13.43
NT Plant-Rigid	12R-30	MFWD 190	65,400	150	8	0.065	1.47	1.15	1.60	0.35	4.59	3.07	2.22	9.89
NT Plant-Rigid	13R-18/20	MFWD 225	57,600	150	8	0.090	2.05	1.89	1.96	0.59	6.50	3.75	3.75	14.02
NT Plant-Rigid	15R-15	MFWD 190	64,300	150	8	0.105	2.37	1.84	2.53	0.56	7.32	4.84	3.57	15.74
NT Plant-TwinRow	12R-30/40	MFWD 225	144,000	150	8	0.051	1.16	1.07	2.79	0.33	5.37	5.33	2.13	12.84
NT Plant-TwinRow	8R-30/40	MFWD 225	112,000	150	8	0.077	1.75	1.61	3.26	0.50	7.14	6.23	3.20	16.58
Peanut Cond.& Lifter	6-Row	MFWD 190	13,300	300	20	0.100	1.35	1.76	0.22	0.54	3.87	0.32	3.40	7.60
Peanut Conditioner	6-Row	MFWD 190	15,300	300	20	0.100	1.35	1.76	0.30	0.54	3.95	0.33	3.40	7.69
Peanut Dig/Invertor	4R-30	MFWD 190	29,800	300	15	0.235	3.18	4.15	1.74	1.27	10.36	2.09	8.02	20.48
Peanut Dig/Invertor	4R-38	MFWD 190	29,800	300	15	0.186	2.51	3.27	1.38	1.00	8.18	1.65	6.33	16.17
Peanut Dig/Invertor	6R-38	MFWD 190	43,400	300	15	0.124	1.67	2.18	0.94	0.67	5.47	1.60	4.22	11.30
Peanut Dump Cart	6-Row	MFWD 190	48,500	300	20	0.310	4.18	5.45	0.87	1.67	12.19	3.56	10.55	26.31
Peanut Harvester	4R-30	MFWD 225	137,000	300	20	0.849	11.48	17.71	6.59	5.57	41.37	25.27	35.12	101.78
Peanut Harvester	4R-38	MFWD 225	137,000	300	20	0.934	12.62	19.48	7.25	6.13	45.49	29.08	38.62	113.20
Peanut Harvester	6R-38	MFWD 225	151,000	300	20	0.625	8.44	13.02	4.56	4.10	30.13	21.43	25.82	77.40
Peanut Lifter	6-Row	MFWD 225	6,500	300	20	0.100	1.35	2.08	0.13	0.65	4.22	0.14	4.13	8.49
Peanut Plt&Pre Fold.	12R-38	MFWD 190	81,200	150	8	0.080	1.81	1.41	2.44	0.43	6.11	4.68	2.73	13.53
Peanut Plt&Pre Rigid	8R-30	MFWD 190	42,300	150	8	0.152	3.44	2.68	2.42	0.82	9.38	4.63	5.20	19.22
Peanut Plt&Pre Rigid	8R-38	MFWD 190	38,500	150	8	0.120	2.72	2.12	1.74	0.65	7.24	3.33	4.11	14.69
Pipe Spool 160ac	1/4m roll	2WD 130	3,600	15	12	0.003	0.09	0.03	0.00	0.01	0.15	0.07	0.06	0.28
Pipe Trailer 1m/160a	30'	2WD 130	1,380	100	15	0.003	0.18	0.04	0.00	0.01	0.24	0.00	0.07	0.32
Plant & Pre-Folding	8R-38	MFWD 170	52,000	150	8	0.080	1.81	1.26	1.56	0.38	5.02	2.99	2.41	10.43
Plant & Pre-Folding	8R-38 2x1	MFWD 170	81,200	150	8	0.053	1.20	0.84	1.62	0.25	3.93	3.11	1.60	8.65
Plant & Pre-Folding	12R-20	MFWD 190	65,100	150	8	0.101	2.29	1.78	2.47	0.54	7.10	4.74	3.45	15.30
Plant & Pre-Folding	12R-30	MFWD 190	70,500	150	8	0.067	1.52	1.19	1.78	0.36	4.87	3.42	2.30	10.60
Plant & Pre-Folding	12R-38	MFWD 190	81,200	150	8	0.053	1.20	0.94	1.62	0.28	4.06	3.11	1.81	8.99
Plant & Pre-Folding	16R-30	MFWD 190	105,000	150	8	0.050	1.14	0.89	1.99	0.27	4.31	3.82	1.72	9.86
Plant & Pre-Folding	23R-15	MFWD 190	137,000	150	8	0.070	1.59	1.24	3.62	0.38	6.83	6.92	2.40	16.16
Plant & Pre-Folding	24R-15	MFWD 225	139,000	150	8	0.067	1.52	1.41	3.52	0.44	6.91	6.74	2.79	16.45
Plant & Pre-Folding	24R-20	MFWD 190	148,000	150	8	0.050	1.14	0.89	2.81	0.27	5.13	5.38	1.72	12.25
Plant & Pre-Folding	24R-30	MFWD 190	174,000	150	8	0.033	0.76	0.59	2.20	0.18	3.75	4.22	1.15	9.12
Plant & Pre-Folding	31R-15	MFWD 225	163,000	150	8	0.052	1.18	1.09	3.20	0.34	5.82	6.13	2.16	14.13
Plant & Pre-Folding	32R-15	MFWD 225	179,000	150	8	0.050	1.14	1.05	3.40	0.33	5.94	6.51	2.09	14.56
Plant & Pre-Rigid	4R-30	2WD 130	25,900	150	8	0.203	4.58	2.44	1.97	0.65	9.65	3.77	3.93	17.36
Plant & Pre-Rigid	4R-38	2WD 130	28,500	150	8	0.159	3.60	1.92	1.70	0.51	7.75	3.26	3.09	14.12
Plant & Pre-Rigid	6R-30	MFWD 150	25,900	150	8	0.135	3.05	1.88	1.31	0.55	6.80	2.51	3.33	12.65
Plant & Pre-Rigid	6R-38	MFWD 150	32,700	150	8	0.106	2.41	1.48	1.31	0.43	5.64	2.50	2.63	10.78
Plant & Pre-Rigid	8R-30	MFWD 170	42,300	150	8	0.101	2.29	1.59	1.61	0.48	5.98	3.08	3.05	12.12

(continued)

Appendix Table 3. Towed equipment: estimated purchase price, annual use, useful life, performance rate, and direct and fixed cost per acre, Mississippi, 2018 (continued)

Item Name	Size	Power Unit	Purchase Price	Annual Use	Useful Life	Perf Rate	Labor	Fuel	---R&M---	Total Direct	---Fixed---	Total Cost		
			dollars	hours	years	hr/ac	-----\$/acre-----							
Plant & Pre-Rigid	8R-38	MFWD 170	38,500	150	8	0.080	1.81	1.26	1.15	0.38	4.61	2.21	2.41	9.25
Plant & Pre-Rigid	10R-30	MFWD 190	46,000	150	8	0.081	1.83	1.42	1.40	0.43	5.10	2.68	2.76	10.54
Plant & Pre-Rigid	11R-15	MFWD 170	49,600	150	8	0.148	3.34	2.33	2.75	0.70	9.14	5.27	4.46	18.88
Plant & Pre-Rigid	11R-20	MFWD 170	45,000	150	8	0.110	2.50	1.74	1.87	0.53	6.65	3.58	3.34	13.57
Plant & Pre-Rigid	12R-20	MFWD 190	50,700	150	8	0.101	2.29	1.78	1.93	0.54	6.55	3.69	3.45	13.70
Plant & Pre-Rigid	12R-30	MFWD 190	65,400	150	8	0.067	1.52	1.19	1.66	0.36	4.74	3.17	2.30	10.22
Plant & Pre-Rigid	13R-18/20	MFWD 225	55,400	150	8	0.093	2.11	1.95	1.94	0.61	6.62	3.71	3.86	14.20
Plant & Pre-Rigid	15R-15	MFWD 190	62,600	150	8	0.108	2.45	1.91	2.54	0.58	7.49	4.87	3.69	16.07
Plant & Pre-TwinRow	12R-30/40	MFWD 225	148,000	150	8	0.053	1.20	1.11	2.96	0.35	5.63	5.67	2.20	13.51
Plant & Pre-TwinRow	8R-30/40	MFWD 225	108,000	150	8	0.080	1.81	1.67	3.25	0.52	7.26	6.21	3.31	16.79
Plant - Folding	8R-38	MFWD 170	46,600	150	8	0.074	1.68	1.17	1.30	0.35	4.51	2.49	2.24	9.25
Plant - Folding	8R-38 2x1	MFWD 170	74,200	150	8	0.049	1.11	0.78	1.38	0.23	3.51	2.64	1.49	7.65
Plant - Folding	12R-20	MFWD 190	59,700	150	8	0.094	2.12	1.65	2.11	0.50	6.40	4.03	3.20	13.65
Plant - Folding	12R-30	MFWD 190	63,400	150	8	0.062	1.41	1.10	1.49	0.33	4.35	2.85	2.13	9.35
Plant - Folding	12R-38	MFWD 190	74,200	150	8	0.049	1.11	0.87	1.38	0.26	3.64	2.64	1.68	7.97
Plant - Folding	16R-30	MFWD 190	97,900	150	8	0.047	1.06	0.82	1.73	0.25	3.87	3.31	1.60	8.79
Plant - Folding	23R-15	MFWD 190	130,000	150	8	0.065	1.47	1.15	3.19	0.35	6.17	6.10	2.22	14.51
Plant - Folding	24R-15	MFWD 225	132,000	150	8	0.062	1.41	1.31	3.11	0.41	6.25	5.95	2.59	14.80
Plant - Folding	24R-20	MFWD 190	141,000	150	8	0.047	1.06	0.82	2.49	0.25	4.64	4.76	1.60	11.01
Plant - Folding	24R-30	MFWD 190	156,000	150	8	0.031	0.70	0.55	1.83	0.16	3.27	3.51	1.06	7.85
Plant - Folding	31R-15	MFWD 225	145,000	150	8	0.048	1.09	1.01	2.64	0.31	5.08	5.06	2.01	12.16
Plant - Folding	32R-15	MFWD 225	161,000	150	8	0.047	1.06	0.98	2.84	0.30	5.20	5.44	1.94	12.59
Plant - Rigid	4R-30	2WD 130	20,500	150	8	0.188	4.25	2.27	1.44	0.60	8.58	2.77	3.65	15.00
Plant - Rigid	4R-38	2WD 130	23,100	150	8	0.148	3.35	1.78	1.28	0.47	6.90	2.46	2.87	12.24
Plant - Rigid	6R-30	MFWD 150	30,500	150	8	0.125	2.83	1.74	1.43	0.51	6.53	2.75	3.09	12.38
Plant - Rigid	6R-38	MFWD 150	27,400	150	8	0.099	2.24	1.37	1.01	0.40	5.04	1.95	2.44	9.44
Plant - Rigid	8R-30	MFWD 170	36,900	150	8	0.094	2.12	1.48	1.30	0.45	5.36	2.49	2.83	10.70
Plant - Rigid	8R-38	MFWD 170	33,100	150	8	0.074	1.68	1.17	0.92	0.35	4.13	1.76	2.24	8.15
Plant - Rigid	10R-30	MFWD 190	40,700	150	8	0.075	1.70	1.32	1.15	0.40	4.58	2.20	2.56	9.35
Plant - Rigid	11R-15	MFWD 170	44,200	150	8	0.137	3.10	2.16	2.28	0.65	8.21	4.36	4.14	16.72
Plant - Rigid	11R-20	MFWD 170	39,600	150	8	0.103	2.32	1.62	1.53	0.49	5.97	2.92	3.10	12.00
Plant - Rigid	12R-20	MFWD 190	45,300	150	8	0.094	2.12	1.65	1.60	0.50	5.89	3.06	3.20	12.17
Plant - Rigid	12R-30	MFWD 190	58,300	150	8	0.062	1.41	1.10	1.37	0.33	4.23	2.62	2.13	9.00
Plant - Rigid	13R-18/20	MFWD 225	50,000	150	8	0.086	1.96	1.81	1.62	0.57	5.97	3.11	3.59	12.68
Plant - Rigid	15R-15	2WD 150	55,500	150	8	0.094	2.12	1.31	1.96	0.31	5.71	3.75	1.91	11.38
Plant - TwinRow	12R-30/40	MFWD 225	130,000	150	8	0.049	1.11	1.03	2.41	0.32	4.89	4.62	2.05	11.57
Plant - TwinRow	8R-30/40	MFWD 225	102,000	150	8	0.074	1.68	1.55	2.85	0.48	6.57	5.45	3.07	15.10
Roller/Cultipacker	12'	2WD 130	6,910	300	12	0.124	1.68	1.49	0.20	0.40	3.78	0.27	2.41	6.47
Roller/Cultipacker	20'	MFWD 150	17,000	300	12	0.074	1.00	1.03	0.29	0.30	2.65	0.41	1.83	4.90
Roller/Cultipacker	30'	MFWD 170	19,100	300	12	0.049	0.67	0.78	0.22	0.23	1.91	0.30	1.49	3.72
Roller/Cultipacker	38'	MFWD 225	21,300	300	12	0.039	0.53	0.81	0.19	0.25	1.80	0.27	1.62	3.70
Roller/Stubble	20'	2WD 50	13,500	300	12	0.074	1.00	0.34	0.23	0.04	1.64	0.32	0.29	2.26
Roller/Stubble	32'	MFWD 225	22,800	300	12	0.046	0.63	0.97	0.25	0.30	2.16	0.34	1.92	4.43
Rotary Cutter	7'	MFWD 130	4,760	185	10	0.168	2.27	2.02	0.64	0.59	5.54	0.45	3.57	9.58
Rotary Cutter	12'	2WD 150	11,600	185	10	0.098	1.32	1.36	0.92	0.33	3.94	0.65	1.99	6.59
Rotary Cutter-Flex	15'	MFWD 150	19,700	185	10	0.078	1.06	1.09	1.25	0.32	3.73	0.88	1.93	6.54
Rotary Cutter-Flex	20'	MFWD 150	27,700	185	10	0.058	0.79	0.81	1.32	0.24	3.17	0.93	1.45	5.56
Row Cond & Inc-Fold.	26'	MFWD 190	24,700	100	10	0.063	1.14	1.11	0.39	0.34	2.99	1.65	2.16	6.81
Row Cond & Inc-Fold.	38'	MFWD 225	33,200	100	10	0.043	0.78	0.90	0.36	0.28	2.33	1.52	1.79	5.65
Row Cond & Inc-Rigid	13'	2WD 130	14,600	100	10	0.126	2.28	1.52	0.46	0.40	4.69	1.95	2.45	9.10
Row Cond & Inc-Rigid	21'	2WD 170	18,400	100	10	0.078	1.41	1.23	0.36	0.29	3.30	1.52	1.83	6.67
Row Cond & Inc-Rigid	26'	MFWD 190	20,700	100	10	0.026	0.48	0.46	0.13	0.14	1.23	0.58	0.90	2.71
Row Cond Folding	26'	MFWD 225	19,300	100	10	0.059	0.80	1.24	0.28	0.39	2.73	1.21	2.46	6.41
Row Cond Folding	38'	MFWD 225	26,100	100	10	0.040	0.55	0.85	0.26	0.26	1.93	1.12	1.68	4.75
Row Cond Rigid	13'	2WD 130	9,260	100	10	0.119	1.61	1.43	0.27	0.38	3.71	1.16	2.31	7.19
Row Cond Rigid	21'	2WD 170	13,000	100	10	0.073	0.99	1.16	0.24	0.27	2.67	1.01	1.73	5.42
Row Cond Rigid	26'	MFWD 190	15,400	100	10	0.059	0.80	1.05	0.22	0.32	2.41	0.97	2.03	5.41
Row Cond./Roll-Fold.	26'	MFWD 190	26,800	160	10	0.072	0.97	1.26	0.48	0.38	3.11	1.27	2.45	6.84
Row Cond./Roll-Fold.	30'	MFWD 190	35,600	160	10	0.062	0.84	1.10	0.55	0.33	2.83	1.46	2.12	6.43
Row Cond./Roll-Fold.	40'	MFWD 225	29,400	160	10	0.046	0.63	0.97	0.34	0.30	2.26	0.91	1.93	5.11
Row Cond./Roll-Rigid	21'	MFWD 190	23,000	160	10	0.089	1.20	1.57	0.51	0.48	3.77	1.35	3.03	8.17
Row Cond./Roll-Rigid	26'	MFWD 190	25,800	160	10	0.072	0.97	1.26	0.46	0.38	3.09	1.22	2.45	6.78
Spin Spreader	5 ton	MFWD 190	12,400	100	8	0.042	0.94	0.74	0.29	0.22	2.21	0.58	1.43	4.23
Spray (ATV Ropewick)	75"	800 CC	700	200	8	0.260	4.69	0.38	0.08	0.40	5.57	0.10	1.60	7.27
Spray (ATV)	12'/17'	800 CC	2,280	200	8	0.112	2.03	0.16	0.12	0.17	2.49	0.14	0.69	3.33
Spray (ATV)	20'	800 CC	1,700	200	8	0.084	1.52	0.12	0.06	0.13	1.85	0.08	0.52	2.45
Spray (Band)	27' Fold	MFWD 170	5,350	200	8	0.062	1.13	0.98	0.15	0.29	2.57	0.18	1.88	4.65
Spray (Band)	40' Fold	MFWD 170	7,050	200	8	0.042	0.76	0.66	0.13	0.20	1.77	0.16	1.27	3.21
Spray (Band)	50' Fold	MFWD 170	11,200	200	8	0.033	0.61	0.53	0.17	0.16	1.48	0.21	1.01	2.71
Spray (Band)	53' Fold	MFWD 170	9,940	200	8	0.031	0.57	0.50	0.14	0.15	1.38	0.17	0.96	2.52
Spray (Band)	60' Fold	MFWD 170	17,800	200	8	0.028	0.50	0.44	0.23	0.13	1.32	0.28	0.84	2.45
Spray (Bcast/HB)	13' Rigid	MFWD 150	6,600	200	8	0.130	2.34	1.80	0.40	0.53	5.09	0.48	3.20	8.78
Spray (Bcast/HB)	20' Rigid	MFWD 150	7,700	200	8	0.084	1.52	1.17	0.30	0.34	3.35	0.36	2.08	5.80
Spray (Bcast/HB)	27' Fold	MFWD 170	11,000	200	8	0.062	1.13	0.98	0.32	0.29	2.74	0.38	1.88	5.01
Spray (Bcast/HB)	27' Rigid	MFWD 170	9,300	200	8	0.062	1.13	0.98	0.27	0.29	2.69	0.32	1.88	4.90
Spray (Bcast/HB)	30' Fold	MFWD 170	16,800	200	8	0.056	1.01	0.88	0.44	0.26	2.62	0.53	1.69	4.85

(continued)

Appendix Table 3. Towed equipment: estimated purchase price, annual use, useful life, performance rate, and direct and fixed cost per acre, Mississippi, 2018 (continued)

Item Name	Size	Power Unit	Purchase Price	Annual Use	Useful Life	Perf Rate	Labor	Fuel	---R&M---	Total Direct	---Fixed---	Total Cost		
			dollars	hours	years	hr/ac	-----\$/acre-----							
Spray (Bcast/HB)	40' Fold	MFWD 170	17,500	200	8	0.042	0.76	0.66	0.34	0.20	1.97	0.41	1.27	3.67
Spray (Broadcast)	27'	MFWD 170	5,350	200	8	0.062	1.13	0.98	0.15	0.29	2.57	0.18	1.88	4.65
Spray (Broadcast)	40'	MFWD 170	7,050	200	8	0.042	0.76	0.66	0.13	0.20	1.77	0.16	1.27	3.21
Spray (Broadcast)	50'	MFWD 170	11,200	200	8	0.033	0.61	0.53	0.17	0.16	1.48	0.21	1.01	2.71
Spray (Spot)	53'	MFWD 170	9,940	200	8	0.031	0.57	0.50	0.14	0.15	1.38	0.17	0.96	2.52
Spray (Spot)	60'	MFWD 225	17,800	200	8	0.028	0.50	0.58	0.23	0.18	1.51	0.28	1.16	2.96
Stalk Shredder	14'	MFWD 150	12,100	200	10	0.117	1.59	1.63	1.24	0.48	4.96	0.75	2.90	8.61
Stalk Shredder Flex	20'	MFWD 150	27,700	200	10	0.082	1.11	1.14	1.99	0.33	4.59	1.20	2.03	7.83
Stalk Shredder-Flail	12'	MFWD 150	21,800	200	10	0.137	1.85	1.91	2.62	0.56	6.95	1.58	3.38	11.92
Stalk Shredder-Flail	15'	MFWD 150	22,100	200	10	0.110	1.48	1.52	2.12	0.45	5.59	1.28	2.70	9.58
Stalk Shredder-Flail	18'	MFWD 150	27,100	200	10	0.091	1.23	1.27	2.17	0.37	5.06	1.31	2.25	8.63
Stalk Shredder-Flail	20'	MFWD 150	27,500	200	10	0.082	1.11	1.14	1.98	0.33	4.58	1.19	2.03	7.81
Stalk Shredder-Flail	25'	MFWD 150	36,700	200	10	0.066	0.89	0.91	2.11	0.27	4.19	1.27	1.62	7.10
Strip Till	8R-38	MFWD 225	37,700	150	10	0.061	0.83	1.28	1.00	0.40	3.52	1.63	2.54	7.71
Strip Till	12R-30	MFWD 225	59,700	150	10	0.061	0.83	1.28	1.59	0.40	4.11	2.59	2.54	9.25
Strip Till	12R-40	MFWD 225	64,800	150	10	0.046	0.62	0.96	1.29	0.30	3.18	2.10	1.91	7.20
Subsoiler	3 shank	MFWD 190	4,550	100	15	0.204	2.76	3.59	0.30	1.10	7.77	0.76	6.95	15.49
Subsoiler	4 shank	MFWD 225	8,900	100	15	0.153	2.07	3.20	0.45	1.00	6.74	1.12	6.34	14.21
Subsoiler	5 shank	MFWD 225	12,100	100	15	0.122	1.65	2.55	0.49	0.80	5.50	1.22	5.05	11.77
Subsoiler low-till	4 shank	MFWD 225	10,800	100	15	0.153	2.07	3.20	0.55	1.00	6.83	1.36	6.34	14.55
Subsoiler low-till	6 shank	MFWD 225	17,100	100	15	0.102	1.38	2.12	0.58	0.67	4.76	1.44	4.22	10.42
Subsoiler low-till	8 shank	MFWD 225	17,300	100	15	0.076	1.03	1.59	0.44	0.50	3.57	1.09	3.16	7.82

Notes:

Labor: Includes labor from Power unit plus additional labor from the implement.
 Total Direct: Does not include interest on operating capital.
 HB = Hooded Boom, HD = Hooded Direct

Appendix Table 4. Operating inputs: estimated prices, Mississippi, 2018

ITEM NAME	UNIT	PRICE	ITEM NAME	UNIT	PRICE
		dollars			dollars
ADJUVANTS					
Agri-Dex	pt	2.38	Captan 50 WP	lb	4.93
Class Act NG	pt	2.38	Cotton Seed Trt.	acre	20.00
Crop Oil Conc. (Pet.)	pt	2.74	CruiserMaxx	oz	4.25
Crop Oil Conc. (Veg.)	pt	2.61	Dithane F-45	qt	7.81
Dyne-A-Pak	pt	4.73	Enable 2F	oz	1.97
Herbimax	pt	1.88	Headline EC	oz	2.63
Induce	pt	3.31	Manzate 75 DF	lb	4.86
MSO	pt	2.61	Moncut 70 DF	lb	32.81
Penetrator Plus	pt	3.50	Propimax EC	pt	12.64
Prime Oil	pt	2.35	Prosaro	oz	5.57
Surfactant	pt	3.28	Provost	oz	2.43
CLEANING					
Cleaning Peanuts	ton	18.00	Quadris	oz	2.14
CROP CONSULTANT					
Corn Consultant	acre	6.00	Quadris Top	oz	2.55
Cotton Consultant	acre	8.00	Quadris Top SBX	oz	2.75
Peanut Consultant	acre	9.25	Quilt	pt	18.55
Rice Consultant	acre	8.00	Quilt XCEL	pt	25.43
Sorghum Consultant	acre	6.00	Ridomil Gold	oz	6.42
Soybeans Consultant	acre	6.50	Rovral 4F	pt	14.90
Wheat Consultant	acre	5.50	Stratego	pt	17.50
CUSTOM FERTILIZE					
App Fert by Air	cwt	7.00	Stratego YLD	oz	4.28
App Fert by Air (Mi)	appl	7.00	Tilt 3.6 EC	oz	0.75
Custom Apply Fert	acre	7.50	Tilt/ Bravo SE	oz	0.41
CUSTOM LIME					
Lime (Spread)	ton	46.00	Uniform	oz	4.63
CUSTOM PLANT					
Custom Plant	acre	7.50	GINNING		
Custom Plant Air	cwt	7.00	Gin & Haul	lb	0.11
CUSTOM SPRAY					
App by Air (3 gal)	appl	5.00	GROWTH REGULATORS		
App by Air (5 gal)	appl	6.50	Mepex	oz	0.08
App by Air (10 gal)	appl	9.00	Mepichlor 4.2%	oz	0.07
Custom Spray Ground	acre	7.00	Mepiquat	oz	0.07
DRYING					
Dry Corn	bu	0.19	Pentia	pt	6.46
Dry Grain Sorghum	cwt	0.25	Stance	oz	1.25
Dry Peanuts	ton	24.00	HARVEST AIDS		
Dry Rice	bu	0.40	Adios	oz	1.29
ERADICATION FEE					
Eradication	acre	1.00	Aim 2EC	oz	5.65
FERTILIZERS					
Agrotain Ultra	pt	9.00	Def/Folex	pt	10.54
Amm Sulfate (21% N)	cwt	13.43	Defol 5	gal	5.39
Boron Plus	pt	3.69	Ethephon 6E	pt	2.88
DAP	cwt	21.52	Finish 6	pt	9.61
Fert 10-34-0	cwt	22.25	Folex 6EC	pt	10.54
Fert 10-34-0	gal	2.59	Freefall SC	oz	1.50
Fert 11-37-0	cwt	23.05	Ginstar EC	pt	26.44
Fert 33-0-0-12S	cwt	18.00	Gramoxone SL	oz	0.15
Fert 41-0-0-4	cwt	13.50	Sharpen	oz	6.45
Lime	ton	46.00	Sodium Chlorate 5L	gal	5.39
NBPT	pt	9.00	SuperBoll	oz	0.19
Phosphorus (46% P2O5)	cwt	18.75	Thidiazuron 4lb	oz	1.50
Potash (60% K2O)	cwt	18.98	Tribufos 6lb	pt	10.54
Sulfur Plus	pt	2.62	HAULING		
UAN (32% N)	cwt	10.50	Haul Corn	bu	0.23
UAN (32%)	gal	1.17	Haul Peanuts	ton	14.50
UAN + Sulfur (28%)	cwt	11.75	Haul Rice	bu	0.35
UAN + Sulfur (28%)	gal	1.31	Haul Sorghum	bu	0.25
Urea, Solid (46% N)	cwt	14.19	Haul Soybeans	bu	0.27
Zinc Plus	pt	2.99	Haul Wheat	bu	0.26
FUNGICIDES					
Aframe	oz	1.96	HERBICIDES		
Alfa Guard	lb	1.48	2,4-D Amine 4	pt	2.40
Allegiance Flowable	pt	48.89	AAtrex 4L	pt	2.12
Apron Maxx RTA	oz	0.84	AAtrex NINE-O	lb	3.96
Artisan	oz	1.00	Accent Q	oz	21.51
Bravo Weather Stick	pt	6.56	Aim	oz	5.65
			Assure II	oz	0.74
			Atrazine 4L	pt	2.12
			Axial XL	oz	1.17
			Axiom	oz	1.92
			Banvel	pt	13.43
			Basagran	pt	12.31
			Beyond	oz	4.48
			Bicep II Magnum	qt	11.01
			Bicep Lite Magnum	pt	7.27

(continued)

Appendix Table 4. Operating inputs: estimated prices, Mississippi, 2018 (continued)

ITEM NAME	UNIT	PRICE	ITEM NAME	UNIT	PRICE
		dollars			dollars
Bolero	pt	7.73	Regiment	oz	44.90
Boundary	pt	11.20	Remedy Ultra	pt	9.60
Butyrac 175 (2,4-D)	pt	3.29	RiceBeaux	pt	5.86
Butyrac 200 (2,4-DB)	pt	4.34	Riceshot	pt	3.86
Cadre	oz	3.54	Ricestar HT	pt	24.35
Canopy	oz	2.74	Roundup Power Max	oz	0.17
Caparol	pt	4.60	Roundup PowerMax	pt	2.72
Capreno	oz	7.13	Roundup WeatherMax	oz	0.26
Clarity	pt	11.55	Roundup WeatherMax	pt	4.46
Classic	oz	17.18	Scepter 70 DG	oz	4.48
Clearpath	lb	61.26	Select Max	pt	12.64
Cobra	oz	1.72	Sequence	pt	5.95
Command 3ME	pt	19.93	Sharpen	oz	6.45
Corvus	oz	7.29	Simazine	pt	2.54
Cotoran	pt	6.42	Stalwart	pt	4.52
Cotton Pro	pt	3.52	Stam 80 EDF	lb	9.61
Credit Extra	pt	2.17	Stam M4	qt	7.80
Dicamba	pt	12.00	Staple LX	oz	7.63
Direx	pt	3.99	Steadfast	oz	12.26
Diuron	pt	3.90	Storm	pt	11.41
Diuron 80 DF	lb	5.09	Strada Pro	oz	7.27
Diuron 80%	lb	5.09	Strongarm	oz	56.42
Dual II Magnum	pt	14.83	Superwham	qt	9.18
Dual Magnum	pt	13.80	Surpass EC	qt	26.36
Duet	pt	5.35	Synchrony XP	oz	12.71
Envoke	oz	102.89	Touchdown Total	qt	5.16
Expert	pt	4.39	Treflan	pt	3.52
Facet L	pt	15.25	Tricor DF	lb	15.82
Fierce	oz	7.54	Trifluralin	pt	3.52
Finesse	oz	16.06	Ultra Blazer	pt	10.31
Flexstar	pt	8.41	Valor SX	oz	4.57
Fusilade DX	oz	1.00	Valor XLT	oz	5.00
Glyphosate 3lbs a.e	pt	2.25	Zidua	oz	9.05
Glyphosate 3lbs a.e	oz	0.14	INOCULANT		
Glystar Plus	pt	2.17	Optimize	oz	2.14
Goal 2XL	pt	9.89	Optimize LIFT	oz	0.59
Gramoxone SL 2.0	oz	0.15	Vault	oz	1.73
Grasp Xtra	oz	1.53	INSECTICIDES		
Halex GT	pt	7.80	Abamectin .15EC	oz	0.96
Halomax	oz	21.44	Acephate 90%	lb	7.43
Harmony Extra SG	oz	13.79	Acephate 90SP	lb	7.43
Harness XTRA	pt	9.45	Acramite-4SC	oz	1.71
Impact	oz	24.90	Admire Pro	oz	1.70
Leadoff	oz	5.82	Asana .66 XL	oz	0.58
Lexar	pt	7.96	Baythroid XL	oz	2.65
Liberty 280	oz	0.60	Belt	oz	7.90
Linex	pt	9.28	Bidrin 8EC	oz	1.17
Londax	oz	18.08	Bifenthrin	oz	0.78
Lorox	lb	24.12	Bifenture 2EC	pt	12.36
Metribuzin 75	lb	15.87	Brigade EC	pt	11.85
MSMA 6.6	pt	2.90	Capture LFR	oz	2.28
MSMA6 Plus	pt	3.63	Carbaryl 4L	pt	5.85
Newpath	oz	3.83	Carbine 50WG	oz	5.93
Osprey	oz	3.61	Centric 40WG	oz	5.38
Outlook	pt	17.47	Comite 1l	pt	8.45
Paraquat	oz	0.28	Confirm 2F	oz	2.06
Parazone 3SL	oz	0.28	Diamond .83EC	pt	22.36
Permit	oz	22.43	Diamond .83EC	oz	1.40
Poast	pt	12.77	Dimethoate 4E	pt	5.31
Prefix	pt	6.53	Dimilin 2L	oz	1.45
Prowl 3.3 EC	pt	6.07	Dipel DF	lb	13.13
Pursuit	oz	3.51	Dipel ES	pt	4.89
Quinstar 4L	oz	1.60	Endigo ZC	pt	24.86
Raptor	oz	4.38	Force 3G	lb	6.03
RealmQ	oz	4.97	Gaucha 600	oz	2.35
RebelEx	oz	2.67	Hero	pt	25.77
Reflex	pt	6.52	Imidacloprid 4F	oz	0.78

(continued)

Appendix Table 4. Operating inputs: estimated prices, Mississippi, 2018 (continued)

ITEM NAME	UNIT	PRICE	ITEM NAME	UNIT	PRICE
		dollars			dollars
Imidan 70 WSB	oz	0.67	Peanut Seed	lb	0.84
IncidentalPestTrt \$8	acre	8.00	Rice Clearfield	lb	0.95
IncidentalPestTrt\$22	acre	22.00	Rice Clrfld Hyb Trt	lb	5.55
IncidentalPestTrt\$30	acre	30.00	Rice Conv Hyb Trt	lb	5.66
Intrepid 2F	oz	2.00	Rice Seed CF (Levees)	lb	0.95
Intruder 70WSP	oz	9.71	Rice Seed CFH (Levee)	lb	1.78
Karate Z	oz	2.74	Rice Seed Conv.	lb	0.28
Lambda	oz	1.04	Rice Seed Cv (Levees)	lb	0.28
Lannate LV	pt	10.88	Rice Seed CvH (Levee)	lb	1.66
Leverage 2.7	oz	2.17	Rice Seed Trt/Insect	lbseed	0.23
Lorsban 15G	lb	2.35	Sorghum Concept	lb	2.57
Lorsban 4E	pt	6.10	Sorghum Concept+ Po	lb	3.92
Macho	oz	0.62	Soybean Seed LL	lb	1.28
Malathion 5E	pt	4.09	Soybean Seed RR2	lb	1.51
Malathion 8E	pt	5.50	Soybean Seed RR2X	lb	1.47
Mustang Max	oz	1.34	Wheat Seed Private	lb	0.29
Nuprid 4F	oz	0.88	SOIL TEST		
Oberon 4 SC	pt	59.84	Soil Test	acre	10.00
Pounce 25WP	lb	14.13	SURVEY & MARK LEVEES		
Prevathon	oz	1.32	Survey & Mark Levees	acre	4.50
Radiant	oz	6.82	Survey & Mark Levees	acre	4.50
Sevin 4F	pt	6.24	TECHNOLOGY FEE		
Sevin XLR Plus	qt	13.23	W3RF Cot Tech Fee	thous	1.45
Sivanto Prime	oz	2.55			
Transform WG	oz	8.18			
IRRIGATION SUPPLIES					
Roll-Out Pipe	ft	0.25			
SEED/PLANTS					
Corn Seed BtRR	thous	3.63			
Corn Seed Conv.	thous	2.89			
Corn Seed RR2	thous	3.24			
Cotton Seed GLB2	thous	3.10			
Cotton Seed W3RF	thous	0.73			

Appendix Table 5. Estimated fuel prices
and interest rates, Mississippi, 2018

ITEM NAME	UNIT	PRICE
		dollars
FUEL TYPES		
Diesel Fuel	gal	1.80
Gasoline	gal	2.10
LP Gas	gal	1.65
INTEREST RATES		
Short-term	%	4.75
Intermediate-term	%	5.00

Appendix Table 6. Labor types, wage rates and unallocated labor
multipliers for crop enterprises, Mississippi, 2018

Item name	Unit	Wage Rate
OPERATOR LABOR	hour	13.51
IRRIGATE LABOR	hour	9.06
HAND LABOR	hour	9.06
HAND. & STOR. LABOR	hour	9.06
RICE MGT. LABOR	hour	9.06
CROP ENTERPRISE	UNALLOCATED LABOR MULTIPLIERS (%)	
Corn		90
Cotton		80
Grain Sorghum		90
Peanuts		80
Rice		90
Soybeans		90
Wheat		80

Appendix Table 7. Futures contract prices, basis levels, forward contract prices, and loan rates used in row crop budgets, Mississippi, 2018

Crop	unit	Futures Contract Month	Futures Contract Price ^a	Basis ^b	Forward Contract Price ^c	Loan Rate ^d	Budget Price ^e
Corn	bu	Dec '18	3.96	-0.20	3.76	2.10	3.76
Cotton Lint	lb	Dec '18	0.6788	-0.0181	0.6607	0.52	0.6607
Cottonseed	lb						0.10 ^f
Grain Sorghum	bu				3.57	2.02	3.57
Peanuts	ton				385.00	355.00	385.00
Soybeans	bu	Nov '18	9.83	+0.07	9.90	5.21	9.90
Rice	bu	Nov '18	5.17	-0.27	4.90	2.96	4.90
Wheat	bu	Jul '18	4.88	-0.17	4.71	2.76	4.71

^a Average of the daily closing futures contract prices during the first 5 trading days in October 2017 for the stated contract months.

^b Basis is the cash price minus the futures contract price for the stated contract month. The reported basis is a daily average from 2009 to 2017 for corn, soybeans and wheat at Greenville, MS. Rice basis is a weekly average price for river point delivery. June harvest delivery for wheat. September harvest delivery for corn, rice and soybeans. October harvest delivery for cotton.

^c The forward contract price for corn, cotton, rice, soybeans and wheat is the futures contract price plus the basis. The forward contract price for grain sorghum is 95% of the forward contract price for corn. The forward contract price for peanuts is an estimate from a poll of Extension Peanut Marketing Specialists.

^d Average Mississippi County CCC Loan Rate for 2017 crop year for corn, grain sorghum, soybeans and wheat. Mississippi CCC 2017 Farm-stored Loan Rate for long grain rough rice. National 2018 Upland Cotton Marketing Assistance Loan Base Rate for cotton lint.

^e Price used in MSU Extension Service Planning Budgets.

^f Cottonseed price is the average marketing year price over the years 2007-2016

Appendix Table 8. Estimated costs for field operations, per acre
 Cotton irrigated with roll-out pipe
 160-acre roll-out pipe system, 10.5 ac-in., Delta Area, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	-----DIRECT COST-----							FIXED COST	TOTAL COST	
		OP INPUT	FUEL	R&M	LABOR	LEASE	INTER	TOTAL			
-----dollars-----											
Land Plane	50'x16'		0.67	0.31	0.51			0.01	1.50	1.58	3.08
Set Up Engine											
IRRIGATE LABOR	hour				0.23			0.01	0.24		0.24
Ditcher (1m/160a)			0.15	0.06	0.13			0.01	0.35	0.31	0.66
Roll-Out Pipe	ft	8.25						0.16	8.41		8.41
Lay Roll-out Pipe											
Pipe Spool 160ac	1/4m roll		0.20	0.09	0.40			0.01	0.70	0.66	1.36
IRRIGATE LABOR	hour				1.81			0.04	1.85		1.85
Apply Water											
IRRIGATE LABOR	hour				0.23				0.23		0.23
Apply Water											
IRRIGATE LABOR	hour				0.23				0.23		0.23
Apply Water											
IRRIGATE LABOR	hour				0.23				0.23		0.23
Pick Up Pipe											
Pipe Spool 160ac	1/4m roll		0.30	0.13	0.59			0.01	1.03	0.98	2.01
Land Forming (\$450)	each									31.93	31.93
Well & Pump, Furrow	each			2.96				0.06	3.02	8.74	11.76
Main Line Pipe	each									4.32	4.32
Engine, RPF, 75	each									8.43	8.43
June Irrigation	ac-in		5.13	1.31				0.13	6.57		6.57
July Irrigation	ac-in		5.13	1.31				0.10	6.54		6.54
August Irrigation	ac-in		5.13	1.31				0.08	6.52		6.52
TOTALS		8.25	16.71	7.48	4.36	0.00		0.62	37.42	56.95	94.37

Note: Cost of production estimates are based on 2017 input prices.

Appendix Table 9. Estimated costs for field operations, per acre
 Cotton irrigated with center pivot
 135-acre 1/4-mile pivot system, 7.5 ac-in., Delta Area, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	-----DIRECT COST-----							FIXED COST	TOTAL COST
		OP INPUT	FUEL	R&M	LABOR	LEASE	INTER	TOTAL		
-----dollars-----										
Set Up Engine										
IRRIGATE LABOR	hour				0.27			0.01	0.28	0.28
Maintenance										
IRRIGATE LABOR	hour				1.07			0.03	1.10	1.10
Apply Water										
IRRIGATE LABOR	hour				0.15				0.15	0.15
Apply Water										
IRRIGATE LABOR	hour				0.20				0.20	0.20
Apply Water										
IRRIGATE LABOR	hour				0.15				0.15	0.15
Pivot, 1/4 CP	each			13.48				0.27	13.75	54.09
Well & Pump, 1/4 CP	each			3.50				0.07	3.57	10.35
Engine, 1/4 CP, 65	each									9.99
June Irr. 3app@.75"	ac-in		6.05	1.40				0.15	7.60	7.60
July Irr. 4app@.75"	ac-in		8.06	1.87				0.16	10.09	10.09
Aug Irr. 3app@.75"	ac-in		6.05	1.40				0.09	7.54	7.54
TOTALS			0.00	20.16	21.65	1.84	0.00	0.78	44.43	74.43
										118.86

Note: Cost of production estimates are based on 2017 input prices.

Appendix Table 10. Estimated costs for field operations, per acre
 Full-season soybeans irrigated with roll-out pipe
 160-acre system, 9 ac-in., Delta Area, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	-----DIRECT COST-----							FIXED COST	TOTAL COST	
		OP INPUT	FUEL	R&M	LABOR	LEASE	INTER	TOTAL			
-----dollars-----											
Land Plane	50'x16'		0.67	0.31	0.51			0.07	1.56	1.58	3.14
Set Up Engine											
IRRIGATE LABOR	hour				0.23				0.23		0.23
Ditcher (1m/160a)			0.15	0.06	0.13			0.01	0.35	0.31	0.66
Roll-Out Pipe	ft	8.25						0.13	8.38		8.38
Lay Roll-out Pipe											
Pipe Spool 160ac	1/4m roll		0.20	0.09	0.40			0.01	0.70	0.66	1.36
IRRIGATE LABOR	hour				1.81			0.03	1.84		1.84
Apply Water											
IRRIGATE LABOR	hour				0.23				0.23		0.23
Apply Water											
IRRIGATE LABOR	hour				0.23				0.23		0.23
Apply Water											
IRRIGATE LABOR	hour				0.23				0.23		0.23
Pick Up Pipe											
Pipe Spool 160ac	1/4m roll		0.30	0.13	0.59				1.02	0.98	2.00
Land Forming (\$450)	each									31.93	31.93
Well & Pump, Furrow	each			2.96				0.05	3.01	8.74	11.75
Main Line Pipe	each									4.32	4.32
Engine, RPF, ESB	each									8.43	8.43
1st June Irrigation	ac-in		4.40	1.31				0.09	5.80		5.80
2nd June Irrigation	ac-in		4.40	1.31				0.09	5.80		5.80
July Irrigation	ac-in		4.40	1.31				0.07	5.78		5.78
TOTALS		8.25	14.52	7.48	4.36	0.00	0.55		35.16	56.95	92.11

Note: Cost of production estimates are based on 2017 input prices.

Appendix Table 11. Estimated costs for field operations, per acre
 Irrigation with a contour flood system
 80-acre system, 13.5 ac-in., Delta Area, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	-----DIRECT COST-----							FIXED COST	TOTAL COST
		OP INPUT	FUEL	R&M	LABOR	LEASE	INTER	TOTAL		
-----dollars-----										
Set Up Engine										
IRRIGATE LABOR	hour				0.45			0.01	0.46	0.46
Build Outside Levee										
Levee Pull (1m/80a)	8 blade		0.25	0.10	0.22			0.01	0.58	1.18
Survey & Mark Levees	acre	2.25						0.04	2.29	2.29
Build Inside Levees										
Levee Pull (1m/80a)	8 blade		0.34	0.13	0.29			0.02	0.78	1.59
Butt Levees										
Blade-Box	6'-7'		0.32	0.11	0.27			0.01	0.71	1.32
IRRIGATE LABOR	hour				0.68			0.01	0.69	0.69
Apply Water										
IRRIGATE LABOR	hour				0.11				0.11	0.11
Tear Down Levees										
Levee Splitter (1/80	32"		0.26	0.10	0.23			0.01	0.60	1.23
Build Inside Levees										
Levee Pull (1m/80a)	8 blade		0.34	0.13	0.29			0.01	0.77	1.58
Butt Levees										
Blade-Box	6'-7'		0.32	0.11	0.27			0.01	0.71	1.32
IRRIGATE LABOR	hour				0.68			0.01	0.69	0.69
Apply Water										
IRRIGATE LABOR	hour				0.11				0.11	0.11
Tear Down Levees										
Levee Splitter (1/80	32"		0.26	0.10	0.23			0.01	0.60	1.23
Build Inside Levees										
Levee Pull (1m/80a)	8 blade		0.34	0.13	0.29			0.01	0.77	1.58
Butt Levees										
Blade-Box	6'-7'		0.32	0.11	0.27			0.01	0.71	1.32
IRRIGATE LABOR	hour				0.68			0.01	0.69	0.69
Apply Water										
IRRIGATE LABOR	hour				0.11				0.11	0.11
Tear Down Levees										
Levee Splitter (1/80	32"		0.26	0.10	0.23			0.01	0.60	1.23
Tear Down Levees										
Levee Splitter (1/80	32"		0.20	0.08	0.17				0.45	0.92
Land Forming (\$113)	each								8.02	8.02
Well & Pump, Flood	each			5.91				0.12	6.03	23.50
Engine, CF, 75	each								16.85	16.85
June Irrigation	ac-in		6.60	2.63				0.18	9.41	9.41
July Irrigation	ac-in		6.60	2.63				0.15	9.38	9.38
August Irrigation	ac-in		6.60	2.63				0.11	9.34	9.34
TOTALS		2.25	23.01	15.00	5.58	0.00	0.75	46.59	49.56	96.15

Note: Cost of production estimates are based on 2017 input prices.

Appendix Table 12. Estimated costs for field operations, per acre
 Irrigation with a 1/2-mile center pivot system
 530-acre system, 7.5 ac-in., Delta Area, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	-----DIRECT COST-----							FIXED COST	TOTAL COST
		OP INPUT	FUEL	R&M	LABOR	LEASE	INTER	TOTAL		
-----dollars-----										
Set Up Engine										
IRRIGATE LABOR	hour				0.07				0.07	0.07
Maintenance										
IRRIGATE LABOR	hour				0.27		0.01		0.28	0.28
Apply Water										
IRRIGATE LABOR	hour				0.04				0.04	0.04
Apply Water										
IRRIGATE LABOR	hour				0.05				0.05	0.05
Apply Water										
IRRIGATE LABOR	hour				0.04				0.04	0.04
Pivot, 1/2 CP	each			8.60				0.17	8.77	34.52
Well & Pump, 1/2 CP	each			1.13				0.02	1.15	3.35
Engine, 1/2 CP, 174	each									3.94
June Irr. 3app@.75"	ac-in		8.86	0.55				0.19	9.60	9.60
July Irr. 4app@.75"	ac-in		11.81	0.74				0.20	12.75	12.75
Aug Irr. 3app@.75"	ac-in		8.86	0.55				0.11	9.52	9.52
TOTALS		0.00	29.53	11.57	0.47	0.00	0.70		42.27	41.81

Note: Cost of production estimates are based on 2017 input prices.

Appendix Table 13. Estimated costs for field operations, per acre
 Corn irrigated with roll-out pipe
 160-acre system, 13 ac-in., Delta Area, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	-----DIRECT COST-----							FIXED COST	TOTAL COST
		OP INPUT	FUEL	R&M	LABOR	LEASE	INTER	TOTAL		
-----dollars-----										
Land Plane	50'x16'		0.67	0.31	0.51		0.07	1.56	1.58	3.14
Set Up Engine										
IRRIGATE LABOR	hour				0.23			0.23		0.23
Ditcher (1m/160a)			0.15	0.06	0.13		0.01	0.35	0.31	0.66
Roll-Out Pipe	ft	8.25					0.13	8.38		8.38
Lay Roll-out Pipe										
Pipe Spool 160ac	1/4m roll		0.20	0.09	0.40		0.01	0.70	0.66	1.36
IRRIGATE LABOR	hour				1.81		0.03	1.84		1.84
Apply Water										
IRRIGATE LABOR	hour				0.23			0.23		0.23
Apply Water										
IRRIGATE LABOR	hour				0.23			0.23		0.23
Apply Water										
IRRIGATE LABOR	hour				0.23			0.23		0.23
Apply Water										
IRRIGATE LABOR	hour				0.23			0.23		0.23
Pick Up Pipe										
Pipe Spool 160ac	1/4m roll		0.30	0.13	0.59		0.01	1.03	0.98	2.01
Land Forming (\$450)	each								31.93	31.93
Well & Pump, Furrow	each			2.96			0.05	3.01	8.74	11.75
Main Line Pipe	each								4.32	4.32
Engine, RPF, Corn	each								8.43	8.43
1st June Irrigation	ac-in		4.77	0.98			0.09	5.84		5.84
2nd June Irrigation	ac-in		4.77	0.98			0.09	5.84		5.84
3rd June Irrigation	ac-in		4.77	0.98			0.09	5.84		5.84
July Irrigation	ac-in		4.77	0.98			0.07	5.82		5.82
TOTALS		8.25	20.40	7.47	4.59	0.00	0.65	41.36	56.95	98.31

Note: Cost of production estimates are based on 2017 input prices.

Appendix Table 14. Estimated costs for field operations, per acre
 Contour levee rice flood irrigation system
 80-acre system, 33 ac-in., Delta Area, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	-----DIRECT COST-----							FIXED COST	TOTAL COST
		OP INPUT	FUEL	R&M	LABOR	LEASE	INTER	TOTAL		
-----dollars-----										
Set Up Engine										
IRRIGATE LABOR	hour				0.45			0.01	0.46	0.46
Build Outside Levee										
Levee Pull (1m/80a)	8 blade		0.25	0.10	0.22			0.01	0.58	0.60
Survey & Mark Levees	acre	4.50						0.11	4.61	4.61
Build Inside Levees										
Levee Pull (1m/80a)	8 blade		0.67	0.26	0.58			0.04	1.55	1.62
Butt Levees										
Blade-Box	6'-7'		0.32	0.11	0.27			0.02	0.72	0.61
IRRIGATE LABOR	hour				0.68			0.02	0.70	0.70
Install Gates										
IRRIGATE LABOR	hour				2.72			0.06	2.78	2.78
Apply Water										
IRRIGATE LABOR	hour				6.80			0.16	6.96	6.96
Apply Water										
IRRIGATE LABOR	hour				6.80			0.13	6.93	6.93
Apply Water										
IRRIGATE LABOR	hour				6.80			0.11	6.91	6.91
Apply Water										
IRRIGATE LABOR	hour				6.80			0.08	6.88	6.88
Remove Gates										
IRRIGATE LABOR	hour				0.91			0.01	0.92	0.92
Tear Down Levees										
Levee Splitter (1/80)	32"		0.52	0.21	0.45			0.01	1.19	1.25
Tear Down Levees										
Levee Splitter (1/80)	32"		0.20	0.08	0.17				0.45	0.47
Land Forming (\$113)	each									8.02
Levee Gates	each									0.66
Well & Pump, Flood	each			5.91				0.12	6.03	17.47
Engine, Rice CL, 75	each									16.85
May Irrigation	ac-in		8.80	1.43				0.24	10.47	10.47
June Irrigation	ac-in		13.20	2.15				0.30	15.65	15.65
July Irrigation	ac-in		13.20	2.15				0.24	15.59	15.59
August Irrigation	ac-in		13.20	2.15				0.18	15.53	15.53
TOTALS		4.50	50.36	14.55	33.65	0.00	1.85	104.91	47.55	152.46

Note: Cost of production estimates are based on 2017 input prices.

Appendix Table 15. Estimated costs for field operations, per acre
 Straight levee rice flood irrigation system
 80-acre system, 27 ac-in., Delta Area, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	-----DIRECT COST-----							FIXED COST	TOTAL COST
		OP INPUT	FUEL	R&M	LABOR	LEASE	INTER	TOTAL		
-----dollars-----										
Set Up Engine										
IRRIGATE LABOR	hour				0.45			0.01	0.46	0.46
Survey & Mark Levees	acre	2.25						0.05	2.30	2.30
Build Inside Levees										
Levee Pull (1m/80a)	8 blade		0.51	0.20	0.43			0.03	1.17	1.21
Butt Levees										
Blade-Box	6'-7'		0.32	0.11	0.27			0.02	0.72	0.61
IRRIGATE LABOR	hour				0.68			0.02	0.70	0.70
Install Gates										
IRRIGATE LABOR	hour				1.36			0.03	1.39	1.39
Apply Water										
IRRIGATE LABOR	hour				4.53			0.11	4.64	4.64
Apply Water										
IRRIGATE LABOR	hour				4.53			0.09	4.62	4.62
Apply Water										
IRRIGATE LABOR	hour				4.53			0.07	4.60	4.60
Apply Water										
IRRIGATE LABOR	hour				4.53			0.05	4.58	4.58
Remove Gates										
IRRIGATE LABOR	hour				0.91			0.01	0.92	0.92
Tear Down Levees										
Levee Splitter (1/80	32"		0.39	0.16	0.34			0.01	0.90	0.94
Land Forming (\$450)	each								31.93	31.93
Levee Gates	each								0.66	0.66
Well & Pump, Flood	each			5.91				0.12	6.03	17.47
Engine, Rice SL, 75	each								16.85	16.85
May Irrigation	ac-in		8.80	1.75				0.25	10.80	10.80
June Irrigation	ac-in		10.26	2.04				0.24	12.54	12.54
July Irrigation	ac-in		10.26	2.04				0.19	12.49	12.49
August Irrigation	ac-in		10.26	2.04				0.15	12.45	12.45
TOTALS		2.25	40.80	14.25	22.56	0.00	1.45	81.31	69.67	150.98

Note: Cost of production estimates are based on 2017 input prices.

Appendix Table 16. Estimated costs for field operations, per acre
 Straight levee rice multi inlet flood irrigation system
 80-acre system, 23 ac-in., Delta Area, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	-----DIRECT COST-----							FIXED COST	TOTAL COST
		OP INPUT	FUEL	R&M	LABOR	LEASE	INTER	TOTAL		
-----dollars-----										
Set Up Engine										
IRRIGATE LABOR	hour				0.45			0.01	0.46	0.46
Survey & Mark Levees	acre	2.25						0.05	2.30	2.30
Build Inside Levees										
Levee Pull (1m/80a)	8 blade		0.51	0.20	0.43			0.03	1.17	1.21
Butt Levees										
Blade-Box	6'-7'		0.32	0.11	0.27			0.02	0.72	0.61
IRRIGATE LABOR	hour				0.68			0.02	0.70	0.70
Ditcher (1m/160a)			0.15	0.06	0.13			0.01	0.35	0.31
Roll-Out Pipe	ft	8.25						0.20	8.45	8.45
Lay Roll-out Pipe										
Pipe Spool 160ac	1/4m roll		0.20	0.09	0.40			0.02	0.71	0.66
Install Gates										
IRRIGATE LABOR	hour				1.36			0.03	1.39	1.39
Apply Water										
IRRIGATE LABOR	hour				1.81			0.04	1.85	1.85
Apply Water										
IRRIGATE LABOR	hour				1.81			0.04	1.85	1.85
Apply Water										
IRRIGATE LABOR	hour				1.81			0.03	1.84	1.84
Apply Water										
IRRIGATE LABOR	hour				1.81			0.02	1.83	1.83
Remove Gates										
IRRIGATE LABOR	hour				0.45				0.45	0.45
Tear Down Levees										
Levee Splitter (1/80)	32"		0.39	0.16	0.34			0.01	0.90	0.94
Pick Up Pipe										
Pipe Spool 160ac	1/4m roll		0.10	0.04	0.19				0.33	0.33
Land Forming (\$450)	each									31.93
Levee Gates	each									0.33
Well & Pump, Flood	each			5.91				0.12	6.03	17.47
Engine, Mult In Rice	each									16.85
May Irrigation	ac-in		7.33	1.64				0.21	9.18	9.18
June Irrigation	ac-in		8.80	1.97				0.21	10.98	10.98
July Irrigation	ac-in		8.80	1.97				0.17	10.94	10.94
August Irrigation	ac-in		8.80	1.97				0.13	10.90	10.90
TOTALS		10.50	35.40	14.12	11.94	0.00		1.37	73.33	70.64

Note: Cost of production estimates are based on 2017 input prices.

Appendix Table 17. Estimated costs for field operations, per acre
 Straight levee rice - zero grade flood irrigation
 80-acre system, 19 ac-in., Delta Area, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	-----DIRECT COST-----						FIXED COST	TOTAL COST	
		OP INPUT	FUEL	R&M	LABOR	LEASE	INTER			TOTAL
-----dollars-----										
Set Up Engine										
IRRIGATE LABOR	hour				0.45		0.01	0.46	0.46	
Apply Water										
IRRIGATE LABOR	hour				2.27		0.05	2.32	2.32	
Apply Water										
IRRIGATE LABOR	hour				2.27		0.04	2.31	2.31	
Apply Water										
IRRIGATE LABOR	hour				2.27		0.04	2.31	2.31	
Apply Water										
IRRIGATE LABOR	hour				2.27		0.03	2.30	2.30	
Land Forming (\$450)	each							31.93	31.93	
Well & Pump, Flood	each			5.91			0.12	6.03	17.47	
Engine, Rice SL, 75	each							16.85	16.85	
May Irrigation	ac-in		5.87	1.17			0.17	7.21	7.21	
June Irrigation	ac-in		7.33	1.46			0.17	8.96	8.96	
July Irrigation	ac-in		7.33	1.46			0.14	8.93	8.93	
August Irrigation	ac-in		7.33	1.46			0.10	8.89	8.89	
TOTALS		0.00	27.86	11.46	9.53	0.00	0.87	49.72	66.25	115.97

Note: Cost of production estimates are based on 2017 input prices.

Appendix Table 18. Estimated costs for field operations, per acre
 Peanuts irrigated with a roll-out pipe
 160-acre system, 12 ac-in., Delta Area, Mississippi, 2018

OPERATION/ OPERATING INPUT	SIZE/ UNIT	-----DIRECT COST-----							FIXED COST	TOTAL COST
		OP INPUT	FUEL	R&M	LABOR	LEASE	INTER	TOTAL		
-----dollars-----										
Land Plane	50'x16'		0.67	0.31	0.51		0.07	1.56	1.58	3.14
Set Up Engine										
IRRIGATE LABOR	hour				0.23		0.01	0.24		0.24
Ditcher (1m/160a)			0.15	0.06	0.13		0.01	0.35	0.31	0.66
Roll-Out Pipe	ft	8.25					0.16	8.41		8.41
Lay Roll-out Pipe										
Pipe Spool 160ac	1/4m roll		0.20	0.09	0.40		0.01	0.70	0.66	1.36
IRRIGATE LABOR	hour				1.81		0.04	1.85		1.85
Apply Water										
IRRIGATE LABOR	hour				0.23			0.23		0.23
Apply Water										
IRRIGATE LABOR	hour				0.23			0.23		0.23
Apply Water										
IRRIGATE LABOR	hour				0.23			0.23		0.23
Apply Water										
IRRIGATE LABOR	hour				0.23			0.23		0.23
Pick Up Pipe										
Pipe Spool 160ac	1/4m roll		0.30	0.13	0.59		0.01	1.03	0.98	2.01
Land Forming (\$450)	each								31.93	31.93
Well & Pump, Furrow	each			2.96			0.06	3.02	8.74	11.76
Main Line Pipe	each								4.32	4.32
Engine, RPF, PNUT	each								8.43	8.43
1st July Irrigation	ac-in		4.40	0.98			0.09	5.47		5.47
2nd Aug Irrigation	ac-in		4.40	0.98			0.06	5.44		5.44
2nd Aug Irrigation	ac-in		4.40	0.98			0.06	5.44		5.44
1st Sep Irrigation	ac-in		4.40	0.98			0.04	5.42		5.42
TOTALS		8.25	18.92	7.47	4.59	0.00	0.62	39.85	56.95	96.80

Note: Cost of production estimates are based on 2017 input prices

Literature Cited

1. Agricultural Engineers Yearbook of Standards. American Society of Agricultural Engineers, St. Joseph, Michigan.
2. Boehlje, M.D. and V.R. Eidman. *Farm Management*. New York: John Wiley and Sons, 1984.
3. Bolton, Bill, J.B. Penn, Fred T. Cooke Jr., and Arthur M. Heagler. "Days Suitable for Fieldwork, Mississippi River Delta Cotton Area." D.A.E. Research Report No. 384, Louisiana State University, November 1968."
4. Budgets for Major Farm Enterprises in the Mississippi River Delta of Arkansas, Louisiana, and Mississippi." D.A.E. Circular No. 281, Department of Agricultural Economics and Agribusiness, Agricultural Experiment Station, Louisiana State University, June 1961
5. Caillavet, DeWitt F. "An Economic Assessment of Production Alternatives Resulting From Changes in the Machinery Complement of Representative Farms in the Delta Area of Mississippi." Master of Science Thesis, Department of Agricultural Economics, Mississippi State University, May 1984.
6. Cooke, Fred T. Jr., J.M. Anderson, and Arthur M. Heagler. "Crop Budgets and Planning Data for Major Farm Enterprises in the Yazoo-Mississippi Delta." Mississippi Agricultural and Forestry Experiment Station Bulletin 794, July 1972.
7. Cooke, Fred T. Jr., J.M. Anderson, D.W. Parvin Jr., A.M. Heagler, Kenneth Paxton, Shelby Holders Jr., and James G. Hamill. "Crop Budgets and Planning Data for Major Farm Enterprises in the Mississippi-Louisiana Delta, 1975." Mississippi Agricultural and Forestry Experiment Station Bulletin 834, May 1975.
8. "Corn, Grain Sorghum & Wheat 2017 Planning Budgets." Budget Report No. 2016-03, Department of Agricultural Economics, Mississippi State University, October 2016.
9. "Costs of Producing Selected Crops in the U.S., 1974." Senate Committee Project No. 63-092, Committee on Agriculture and Forestry, U.S. Senate, January 8, 1976.
10. "Cotton 2017 Planning Budgets." Budget Report No. 2016-01, Department of Agricultural Economics, Mississippi State University, October 2016.
11. Cox, Laura Rebecca. "Overhead Labor Cost in the Delta Area of Mississippi." Master of Science Thesis, Department of Agricultural Economics, Mississippi State University, October 1982.
12. "Forage 2017 Planning Budgets." Budget Report No. 2016-08, Department of Agricultural Economics, Mississippi State University, November 2016.
13. Laughlin, David H. and Robert K. Mehrle. "An Economic Evaluation: Straight Versus Contour Levee Rice Production Practices in Mississippi." Mississippi Agricultural and Forestry Experiment Station Bulletin 1063. December 1996.
14. Laughlin, David H. and Stan Spurlock. "User's Guide for the Mississippi State Budget Generator Version 6.0 for Windows." AEC Staff Report No. 2003-01, Department of Agricultural Economics, Mississippi State University, March 2003.
15. "Mississippi Agricultural Statistics." Mississippi Department of Agriculture and Commerce and Department of Agriculture, Mississippi Agriculture Statistical Service, Jackson, Mississippi.
16. "Rice 2017 Planning Budgets." Budget Report No. 2016-04, Department of Agricultural Economics, Mississippi State University, October 2016.
17. "Soybeans 2017 Planning Budgets." Budget Report No. 2016-02, Department of Agricultural Economics, Mississippi State University, October 2016.
18. "Vegetables 2015 Planning Budgets." Budget Report No. 2014-08, Department of Agricultural Economics, Mississippi State University December 2014.
19. "Peanuts 2017 Planning Budgets." Budget Report No. 2016-07, Department of Agricultural Economics, Mississippi State University, October 2016.



MISSISSIPPI STATE
UNIVERSITY™

Mark E. Keenum, President

Division of Agriculture, Forestry, and Veterinary Medicine
Gregory Bohach, Vice President

Department of Agricultural Economics
Keith H. Coble, Head

MSU is an equal opportunity employer, and all qualified applicants will receive consideration for employment without regard to race, color, religion, sex, national origin, disability status, protected veteran status, or any other characteristic protected by law. We always welcome nominations and applications from women, members of any minority group, and others who share our passion for building a diverse community that reflects the diversity in our student population.