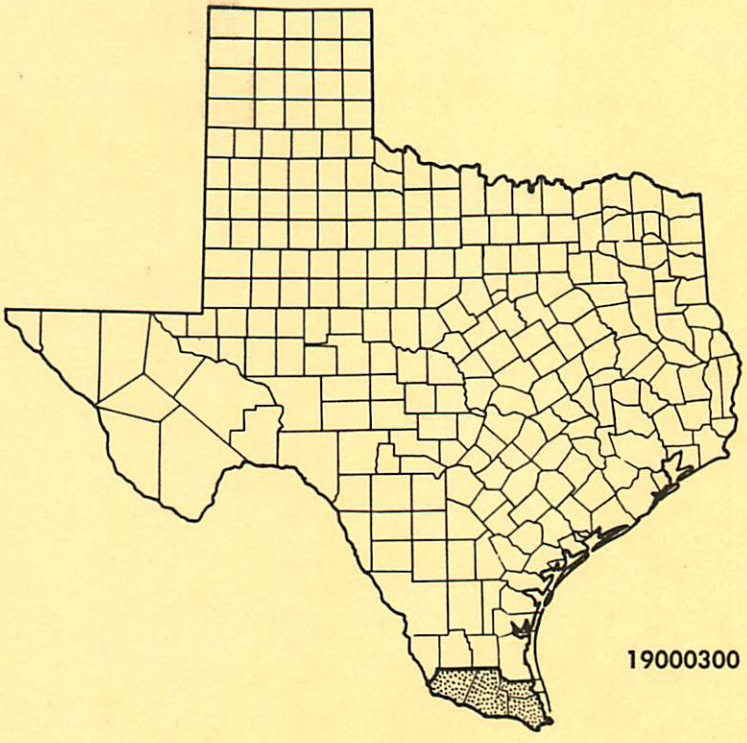

19000300

TEXAS RIO GRANDE VALLEY

FOREWORD

The enterprise budgets for the Rio Grande Valley are based on yields as shown on form 19000600. Differentiation of farm size between management levels was particularly difficult due to different tenure patterns, climatic conditions and soil resources across the four-county area. In addition, dryland farms are considerably larger than irrigated farms. Taking these factors into consideration, it was decided to base costs for a typical farm on 500 acres and a high level farm at 900 acres.

Little difference was determined in machinery complement between management levels. However, the high level operator generally has more 6-row equipment and implement size is more directly related to tractor size.

Much, if not most, of the difference in yields and overall management is a function of timing and doing things right rather than a difference in land, farm size, machinery complement, etc.

The citrus budgets are based on two primary assumption: (1) The most typical grove in the Rio Grande Valley is a small grove containing both young trees (planted since the 1962 freeze) and old partially freeze-damaged trees, operated under grove care by someone other than the owner. (2) The more productive groves are those which have not received any significant freeze damage and were either developed by the owner or purchased as young groves by the owner. These may be either owner-operated or under grove care. For the sake of time and space the budgets of these groves (from planting to bearing) are based on owner-operator costs only. *These budgets are not intended to indicate that good groves are owner-operated and poor groves are under grove care company management.*

Citrus budgets were developed for establishment, development and mature bearing groves for orange and grapefruit. Early and late oranges are combined by means of a weighted average.

Vegetable budgets are based upon an average harvested yield over time and a price received as shown footnoted at the bottom of each budget. The period used to determine prices is based on trends in price rather than using an across the board average of "x" numbers of years.

The primary source of irrigation water in the valley area is water sold by irrigation districts delivered to the farm. Water cost varies by district but an estimate of $2.50 per irrigation (in addition to flat rate and taxes) is used in all budgets. There are some irrigation wells along the Rio Grande River and in some other isolated areas, but well costs are not included.

Taxes are quite variable across the four county area, depending upon county, school district, drainage district, irrigation district, etc. However, taxes are held constant across the area.

Estimated Costs And Returns Per Acre Of Onions, High Level Management

Item	Unit	Price or Cost/Unit	Quantity	Value or Cost
1. Gross Receipts, From Production:				
Onions	50# bag	$ 2.10 1/	450	$945.00
2. Variable Costs:				
Pre-Harvest:				
Seed	lb	12.50	2.5	$ 31.25
Fertilizer (100-100-0)	acre	20.00	1	20.00
Herbicide	acre	13.50	1	13.50
Insecticide	acre	3.00	1	3.00
Insecticide Application	acre	.85	3	2.55
Fungicide	acre	8.00	1	8.00
Fungicide Application	acre	1.85	4	7.20
Machinery	acre	2.53	1	2.53
Tractor (1)	hour	1.01	1.07	1.08
Tractor (2)	hour	.76	.66	.50
Tractor (3)	hour	.74	1.35	1.00
Tractor (4)	hour	.54	1.00	.54
Tractor Labor	hour	1.75	5.09	8.91
Irrigation Water	appli	2.50	5	12.50
Irrigation Equipment	acre	1.50	1	1.50
Irrigation Labor	hour	1.30	7.5	9.75
Other Hand Labor	hour	1.30	10	13.00
Pickup Truck	acre	1.39	1	1.39
Interest on Operating Capital	$	.08	69.10	5.53
Sub-Total, Pre-Harvest				$143.73
Harvest:				
Harvesting	bag	.45	450	$202.50
Packing	bag	.80	450	360.00
Selling	bag	.21	450	94.50
Sub-Total, Harvest				$657.00
Total Variable Costs				$800.73
3. Income Above Variable Costs				$144.27
4. Fixed Costs:				
Machinery	acre	3.87	1	$ 3.87
Tractor (1)	hour	1.58	1.07	1.69
Tractor (2)	hour	1.57	.66	1.04
Tractor (3)	hour	1.25	1.35	1.69
Tractor (4)	hour	1.05	1.00	1.05
Irrigation Equipment	acre	6.50	1	6.50
Land (Net Rent-1/5) 2/	acre	52.49	1	52.49
Pickup Truck	acre	.99	1	.99
Total Fixed Costs				$ 69.32
5. Total Costs				$870.05
6. Net Returns				$ 74.95

1/ 1969-71 Seasons Average Price, 1970 Texas Vegetable Statistics, Texas Crop and Livestock Reporting Service; Texas Fruit and Vegetable Marketing News.

2/ One-fifth of (Gross Income minus Harvest Costs) less 1/5 of fertilizer and insecticide.

DEVELOPED BY EXTENSION ECONOMISTS-MANAGEMENT, TAES, TAMU. New, 1972

Cooperative Extension Work in Agriculture and Home Economics, Texas A&M University and the United States Department of Agriculture cooperating. Distributed in furtherance of the Acts of Congress of May 8, 1914, as amended, and June 30, 1914.

AECO 6

Estimated Costs, And Requirements Per Acre Of Onions, High Level Management

Operation	Item No.	Date	Times Over	Labor Hours (1)	Tractor or Mach. Hrs.	Fuel, Oil, Lub., Rep. Per Acre	Fixed costs Per Acre
Shred	3,14	Jul-Sep	1	.21	.17	$ .16	$ .31
Disc	1,10	Jul-Sep	1	.25	.20	.21	.48
Moldboard Plow	1,5	Jul-Sep	.5	.25	.20	.55	.48
Chisel Plow	1,6	Jul-Sep	.5	.21	.17	.17	.17
Disc	1,11	Jul-Sep	2	.31	.25	.25	.35
Float	1,15	Jul-Sep	1	.31	.25	.17	.40
Bed	2,8	Jul-Sep	1	.15	.12	.07	.07
Fertilize	3	Jul-Sep	1	.25	.20	-	-
Re-Bed	2,8	Jul-Sep	1	.15	.12	.07	.07
Run Middles	3,13	Jul-Sep	1	.16	.13	.11	.17
Plant	2,16	Sep,Nov	1	.31	.25	.19	.32
Spray Herbicide	2,17	Sep,Nov	1	.21	.17	.10	.13
Cultivate	3,13	Oct-Feb	2	.31	.25	.22	.34
Side Dress Fertilize	3	Oct-Feb	3	.75	.60	-	-
Make Ditches	4,18	Sep-Apr	5	.63	.50	.13	.29
Level Ditches	4,18	Sep-Apr	5	.63	.50	.13	.29
Total				5.09	4.08	$2.53	$3.87
Irrigate	23	Sep-Apr	5	7.50	5.00	1.50	$6.50
Hand Labor				10.0	-	-	-

(1) Labor hours calculated at 1.25 times tractor hours except where noted by *.

DEVELOPED BY EXTENSION ECONOMISTS-MANAGEMENT, TAES, TAMU.

Cooperative Extension Work in Agriculture and Home Economics, Texas A&M University and the United States Department of Agriculture cooperating. Distributed in furtherance of the Acts of Congress of May 8, 1914, as amended, and June 30, 1914.

AECO 6

ONIONS, IRRIGATED, RIO GRANDE VALLEY 19140122

Estimated Costs And Returns Per Acre Of Onions, Typical Management

Item	Unit	Price or Cost/Unit	Quantity	Value or Cost
1. Gross Receipts, From Production:				
Onions	50# bag	$ 2.10 1/	300	$630.00
2. Variable Costs:				
Pre-Harvest:				
Seed	lb	12.50	2.5	$ 31.25
Fertilizer (80-80-0)	acre	16.00	1	16.00
Herbicide	acre	10.00	1	10.00
Insecticide	acre	3.00	1	3.00
Insecticide Application	acre	.85	3	2.55
Fungicide	acre	8.00	1	8.00
Fungicide Application	acre	1.80	4	7.20
Machinery	acre	2.39	1	2.39
Tractor (1)	hour	.93	1.68	1.56
Tractor (2)	hour	.76	1.44	1.09
Tractor (4)	hour	.50	1.08	.54
Tractor Labor	hour	1.75	5.24	9.17
Irrigation Water	appli	2.50	4	10.00
Irrigation Equipment	acre	1.32	1	1.32
Irrigation Labor	hour	1.30	6	7.80
Other Hand Labor	hour	1.30	10	13.00
Pickup Truck	acre	2.00	1	2.00
Interest on Operating Capital	$	.085	63.44	5.39
Sub-Total, Pre-Harvest				$132.26
Harvest:				
Harvesting	bag	.45	300	$135.00
Packing	bag	.80	300	240.00
Selling	bag	.21	300	63.00
Sub-Total, Harvest				$438.00
Total Variable Costs				$570.26
3. Income Above Variable Costs				$ 59.74
4. Fixed Costs:				
Machinery	acre	4.49	1	$ 4.49
Tractor (1)	hour	1.94	1.68	3.26
Tractor (2)	hour	1.60	1.44	2.30
Tractor (4)	hour	1.30	1.08	1.40
Irrigation Equipment	acre	5.36	1	5.36
Land (Net Rent-1/5) 2/	acre	34.09	1	34.09
Pickup Truck	acre	1.58	1	1.58
Total Fixed Costs				$ 52.48
5. Total Costs				$622.74
6. Net Returns				$ 7.26

1/ 1969-70 Seasons Average Price, 1970 Texas Vegetable Statistics, Texas Crop and Livestock Reporting Service; Texas Fruit and Vegetable Marketing News.

2/ One-fifth of (Gross Income minus Harvest Costs) less 1/5 of fertilizer and insecticide.

DEVELOPED BY EXTENSION ECONOMISTS-MANAGEMENT, TAES, TAMU. New, 1972

Cooperative Extension Work in Agriculture and Home Economics, Texas A&M University and the United States Department of Agriculture cooperating. Distributed in furtherance of the Acts of Congress of May 8, 1914, as amended, and June 30, 1914.

AECO 6

ONIONS, IRRIGATED, RIO GRANDE VALLEY

19140121

Estimated Costs, And Requirements Per Acre Of Onions, Typical Management

Operation	Item No.	Date	Times Over	Labor Hours (1)	Tractor or Mach. Hrs.	Fuel, Oil, Lub., Rep. Per Acre	Fixed costs Per Acre
Shred	4,29	Jul-Sep	1	.36	.28	$ .15	$ .25
Disc	1,27	Jul-Sep	1	.31	.25	.14	.32
Moldboard Plow	1,25	Jul-Sep	.5	.31	.25	.36	.51
Chisel Plow	1,26	Jul-Sep	.5	.41	.33	.33	.21
Disc	2,28	Jul-Sep	2	.50	.40	.22	.52
Float	1,15	Jul-Sep	1	.31	.25	.21	.43
Bed	2,8	Jul-Sep	1	.15	.12	.08	.08
Fertilize	1	Jul-Sep	1	.25	.20	-	-
Re-Bed	2,8	Jul-Sep	1	.15	.12	.08	.08
Run Middles	2,13	Jul-Sep	1	.16	.13	.10	.16
Plant	2,16	Sep-Nov	1	.31	.25	.12	.66
Spray Herbicide	2,17	Sep-Nov	1	.21	.17	.12	.25
Cultivate	2,13	Oct-Feb	2	.31	.25	.20	.32
Side Dress Fertilize	1	Oct-Feb	2	.50	.40	-	-
Make Ditches	4,18	Sep-Apr	4	.50	.40	.14	.35
Level Ditches	4,18	Sep-Apr	4	.50	.40	.14	.35
Total				5.24	4.20	$2.39	$4.49
Irrigate	24	Sep-Apr	4	6.0*	4.0	1.32	$5.36
Hand Labor				10.0	-	-	-

(1) Labor hours calculated at 1.25 times tractor hours except where noted by *.

* Labor hours = 1.5 x Machine hours.

DEVELOPED BY EXTENSION ECONOMISTS-MANAGEMENT, TAES, TAMU.

Cooperative Extension Work in Agriculture and Home Economics, Texas A&M University and the United States Department of Agriculture cooperating. Distributed in furtherance of the Acts of Congress of May 8, 1914, as amended, and June 30, 1914.

AECO 6

FORAGE SORGHUM FOR SILAGE, IRRIGATED, RIO GRANDE VALLEY 19090122

Estimated Costs And Returns Per Acre Of Forage Sorghum For Silage, Typical Management

Item	Unit	Price or Cost/Unit	Quantity	Value or Cost
1. Gross Receipts, From Production:				
Sorghum Silage	ton	$ 4.00	17	$ 68.00
2. Variable Costs:				
Pre-Harvest:				
Seed	lb	.22	18	$ 3.96
Fertilizer (100-40-0)	acre	15.20	1	15.20
Machinery	acre	1.95	1	1.95
Tractor (1)	hour	.93	1.13	1.05
Tractor (2)	hour	.76	1.10	.84
Tractor (4)	hour	.50	.88	.44
Tractor Labor	hour	1.75	3.11	5.44
Irrigation Water	appli	2.50	3	7.50
Irrigation Equipment	acre	1.00	1	1.00
Irrigation Labor	hour	1.30	6	7.80
Pickup Truck	acre	2.00	1	2.00
Interest on Operating Capital	$	.085	23.59	2.01
Sub-Total, Pre-Harvest				$ 49.19
Harvest:				
Sold in Field				
Total Variable Costs				$ 49.19
3. Income Above Variable Costs				$ 18.81
4. Fixed Costs:				
Machinery	acre	3.30	1	$ 3.30
Tractor (1)	hour	1.94	1.13	2.19
Tractor (2)	hour	1.60	1.10	1.76
Tractor (4)	hour	1.10	.88	1.14
Irrigation Equipment	acre	4.02	1	4.02
Land (Net Rent-1/4) 1/	acre	13.20	1	13.20
Pickup Truck	acre	1.58	1	1.58
Total Fixed Costs				$ 27.19
5. Total Costs				$ 76.38
6. Net Returns				($ 8.38)

1/ Landlord pays 1/4 of fertilizer, insecticide, and harvest.

DEVELOPED BY EXTENSION ECONOMISTS-MANAGEMENT, TAES, TAMU. New, 1972

Cooperative Extension Work in Agriculture and Home Economics, Texas A&M University and the United States Department of Agriculture cooperating. Distributed in furtherance of the Acts of Congress of May 8, 1914, as amended, and June 30, 1914.

AECO 6

FORAGE SORGHUM FOR SILAGE, IRRIGATED, RIO GRANDE VALLEY

19090121

Estimated Costs, And Requirements Per Acre Of Sorghum Silage, Typical Management

Operation	Item No.	Date	Times Over	Labor Hours (1)	Tractor or Mach. Hrs.	Fuel, Oil, Lub., Rep. Per Acre	Fixed costs Per Acre
Shred Stalks	4,29	Jul-Sep	1	.36	.28	$ .15	$ .25
Disc	1,27	Jul-Sep	1	.31	.25	.14	.32
Moldboard Plow	1,25	Aug-Oct	.5	.31	.25	.36	.51
Chisel Plow	1,26	Aug-Oct	.5	.41	.33	.23	.21
Disc	2,28	Sep-Nov	2	.50	.40	.22	.52
Bed	2,8	Dec	1	.15	.12	.08	.08
Fertilize	1	Dec-Jan	1	.25	.20	-	-
Re-Bed	2,8	Dec-Jan	1	.15	.12	.08	.08
Rolling Cultivate	1,7	Feb	1	.13	.10	.12	.12
Plant	2,9	Feb	1.25	.26	.21	.15	.37
Cultivate	2,13	Mar-Apr	2	.31	.25	.20	.32
Make Ditches	4,18	Mar-May	3	.38	.30	.11	.26
Level Ditches	4,18	Mar-May	3	.38	.30	.11	.26
Total				3.90	3.11	$1.95	$3.30
Irrigate	25	Mar-May	3	6.00*	3.00	1.00	$4.02

(1) Labor hours calculated at 1.25 times tractor hours except where noted by *.

* Labor hours = 2 x Machine hours.

DEVELOPED BY EXTENSION ECONOMISTS-MANAGEMENT, TAES, TAMU.

Cooperative Extension Work in Agriculture and Home Economics, Texas A&M University and the United States Department of Agriculture cooperating. Distributed in furtherance of the Acts of Congress of May 8, 1914, as amended, and June 30, 1914.

AECO 6

FRESH SPRING TOMATOES, IRRIGATED, RIO GRANDE VALLEY 19216112

Estimated Costs And Returns Per Acre Of Fresh Spring Tomatoes, High Level Management

Item	Unit	Price or Cost/Unit	Quantity	Value or Cost
1. Gross Receipts, From Production:				
Tomatoes	40# lug	$ 4.50 1/	200	$900.00
2. Variable Costs:				
Pre-Harvest:				
Seed	lb	15.00	1.5	$ 22.50
Fertilizer (60-80-0)	acre	13.60	1	13.60
Herbicide	acre	7.00	1	7.00
Insecticide	acre	8.00	1	8.00
Insecticide Application	acre	1.00	4	4.00
Fungicide	acre	6.00	1	6.00
Fungicide Application	acre	2.00	4	8.00
Machinery	acre	2.91	1	2.91
Tractor (1)	hour	1.01	1.07	1.08
Tractor (2)	hour	.76	.89	.68
Tractor (3)	hour	.74	.77	.57
Tractor (4)	hour	.54	.60	.32
Tractor Labor	hour	1.75	4.17	7.30
Irrigation Water	appli	2.50	3	7.50
Irrigation Equipment	acre	.90	1	.90
Irrigation Labor	hour	1.30	4.5	5.85
Other Hand Labor	hour	1.30	5	6.50
Pickup Truck	acre	1.39	1	1.39
Interest on Operating Capital	$	.08	52.05	4.16
Sub-Total, Pre-Harvest				$108.26
Harvest:				
Hand Harvest & Haul	lug	1.20	200	$240.00
Packing	lug	1.30	200	260.00
Selling	lug	.25	200	50.00
Sub-Total, Harvest				$550.00
Total Variable Costs				$658.26
3. Income Above Variable Costs				$241.74
4. Fixed Costs:				
Machinery	acre	4.18	1	$ 4.18
Tractor (1)	hour	1.58	1.07	1.69
Tractor (2)	hour	1.57	.89	1.40
Tractor (3)	hour	1.25	.77	.96
Tractor (4)	hour	1.05	.60	.63
Irrigation Equipment	acre	3.90	1	3.90
Land (Net Rent-1/5) 2/	acre	64.88	1	64.88
Pickup Truck	acre	.99	1	.99
Total Fixed Costs				$ 78.63
5. Total Costs				$736.89
6. Net Returns				$163.11

1/ 1968-70 Seasons Average Prices, 1970 Texas Vegetable Statistics, Texas Crop and Livestock Reporting Service.

2/ One-fifth of (Gross Income minus Harvest Costs) less 1/5 of fertilizer and insecticide.

DEVELOPED BY EXTENSION ECONOMISTS-MANAGEMENT, TAES, TAMU. New, 1972

Cooperative Extension Work in Agriculture and Home Economics, Texas A&M University and the United States Department of Agriculture cooperating. Distributed in furtherance of the Acts of Congress of May 8, 1914, as amended, and June 30, 1914.

AECO 6

FRESH SPRING TOMATOES, IRRIGATED, RIO GRANDE VALLEY 19216111

Estimated Costs, And Requirements Per Acre Of Fresh Spring Tomatoes, High Level Management

Operation	Item No.	Date	Times Over	Labor Hours (1)	Tractor or Mach. Hrs.	Fuel, Oil, Lub., Rep. Per Acre	Fixed costs Per Acre
Shred	3,14	Jul-Sep	1	.21	.17	$ .16	$ .31
Disc	1,10	Jul-Sep	1	.25	.20	.21	.48
Moldboard Plow	1,5	Aug-Oct	.5	.25	.20	.55	.48
Chisel Plow	1,6	Aug-Oct	.5	.21	.17	.17	.17
Disc	1,11	Aug-Oct	2	.31	.25	.25	.35
Float	1,15	Aug-Oct	1	.31	.25	.17	.40
Bed	2,8	Nov-Dec	1	.15	.12	.07	.07
Fertilize	3	Nov-Dec	1	.25	.20	-	-
Re-Bed	2,8	Nov-Dec	1	.15	.12	.07	.07
Spray & Incorporate Herbicide	2,12 &17	Nov-Dec	1	.25	.20	.40	.64
Plant	2,16	Jan-Feb	1	.31	.25	.19	.32
Cultivate	3,7	Jan-Mar	1	.13	.10	.10	.10
Side Dress Fertilizer	3	Jan-Mar	1	.25	.20	-	-
Cultivate	3,7	Jan-Mar	1	.13	.10	.10	.10
Spray & Incorporate Herbicide	2,7 &17	Jan-Mar	1	.25	.20	.31	.35
Make Ditches	4,18	Jan-May	3	.38	.30	.08	.17
Level Ditches	4,18	Jan-May	3	.38	.30	.08	.17
Total				4.17	3.33	$2.91	$4.18
Irrigate	23	Jan-May	3	4.50*	3.00	.90	3.90
Hand Labor				5.00	-	-	-

(1) Labor hours calculated at 1.25 times tractor hours except where noted by *.

* Labor hours = 1.5 x Machine hours.

DEVELOPED BY EXTENSION ECONOMISTS-MANAGEMENT, TAES, TAMU.

Cooperative Extension Work in Agriculture and Home Economics, Texas A&M University and the United States Department of Agriculture cooperating. Distributed in furtherance of the Acts of Congress of May 8, 1914, as amended, and June 30, 1914.

AECO 6

FRESH SPRING TOMATOES, IRRIGATED, RIO GRANDE VALLEY 19216122

Estimated Costs And Returns Per Acre Of Fresh Spring Tomatoes, Typical Management

Item	Unit	Price of Cost/Unit	Quantity	Value or Cost
1. Gross Receipts, From Production:				
Tomatoes	40# lug	$ 4.50 1/	150	$675.00
2. Variable Costs:				
Pre-Harvest:				
Seed	lb	15.00	1.5	$ 22.50
Fertilizer (60-80-0)	acre	13.60	1	13.60
Herbicide	acre	6.00	1	6.00
Insecticide	acre	8.00	1	8.00
Insecticide Application	acre	1.00	4	4.00
Fungicide	acre	6.00	1	6.00
Fungicide Application	acre	2.00	4	8.00
Machinery	acre	2.71	1	2.71
Tractor (1)	hour	.93	1.48	1.38
Tractor (2)	hour	.76	1.44	1.09
Tractor (4)	hour	.50	.88	.44
Tractor Labor	hour	1.75	4.76	8.33
Irrigation Water	appli	2.50	3.00	7.50
Irrigation Equipment	acre	1.00	1	1.00
Irrigation Labor	hour	1.30	4.50	5.85
Other Hand Labor	hour	1.30	5	6.50
Pickup Truck	acre	2.00	1	2.00
Interest on Operating Capital	$	.085	52.45	4.46
Sub-Total, Pre-Harvest				$109.35
Harvest:				
Hand Harvest & Hawl	lub	1.20	150	$180.00
Packing	lub	1.30	150	195.00
Selling	lub	.25	150	37.50
Sub-Total, Harvest				$412.50
Total Variable Costs				$521.85
3. Income Above Variable Costs				$153.15
4. Fixed Costs:				
Machinery	acre	4.55	1	$ 4.55
Tractor (1)	hour	1.94	1.48	2.87
Tractor (2)	hour	1.60	1.44	2.30
Tractor (4)	hour	1.30	.88	1.14
Irrigation Equipment	acre	4.02	1	4.02
Land (Net Rent-1/5) 2/	acre	47.38	1	47.38
Pickup Truck	acre	1.58	1	1.58
Total Fixed Costs				$ 63.84
5. Total Costs				$585.69
6. Net Returns				$ 89.31

1/ 1968-70 Seasons Average Prices, 1970 Texas Vegetable Statistics, Texas Crop and Livestock Reporting Service.

2/ One-fifth of (Gross Income minus Harvest Costs) less 1/5 of fertilizer and insecticide.

DEVELOPED BY EXTENSION ECONOMISTS-MANAGEMENT, TAES, TAMU. New, 1972

Cooperative Extension Work in Agriculture and Home Economics, Texas A&M University and the United States Department of Agriculture cooperating. Distributed in furtherance of the Acts of Congress of May 8, 1914, as amended, and June 30, 1914.

AECO 6

FRESH SPRING TOMATOES, IRRIGATED, RIO GRANDE VALLEY 19216121

Estimated Costs, And Requirements Per Acre Of Fresh Spring Tomatoes, Typical Management

Operation	Item No.	Date	Times Over	Labor Hours (1)	Tractor or Mach. Hrs.	Fuel, Oil, Lub., Rep. Per Acre	Fixed costs Per Acre
Shred	4,29	Jul-Sep	1	.36	.28	$ .15	$ .25
Disc	1,27	Jul-Sep	1	.31	.25	.14	.32
Moldboard Plow	1,25	Aug-Oct	.5	.31	.25	.36	.51
Chisel Plow	1,26	Aug-Oct	.5	.41	.33	.33	.21
Disc	2,28	Aug-Oct	2	.50	.40	.22	.52
Float	1,15	Aug-Oct	1	.31	.25	.21	.43
Bed	2,8	Nov-Dec	1	.15	.12	.08	.08
Fertilizer	1	Nov-Dec	1	.25	.20	-	-
Re-Bed	2,8	Nov-Dec	1	.15	.12	.08	.08
Spray & Incorporate Herbicide	2,7 &17	Nov-Dec	1	.25	.20	.38	.54
Plant	2,16	Jan-Feb	1	.31	.25	.12	.66
Cultivate	2,7	Jan-Mar	1	.13	.10	.12	.12
Side Dress Fertilize	1	Jan-Mar	1	.25	.20	-	-
Cultivate	2,7	Jan-Mar	2	.31	.25	.30	.31
Make Ditches	4,18	Jan-May	3	.38	.30	.11	.26
Level Ditches	4,18	Jan-May	3	.38	.30	.11	.26
Total				4.76	3.80	$2.71	$4.55
Irrigate	24	Jan-May	3	4.5*	3.0	$1.00	$4.02
Hand Labor				5.0	-	-	-

(1) Labor hours calculated at 1.25 times tractor hours except where noted by *.

* Labor hours = 1.5 x Machine hours.

DEVELOPED BY EXTENSION ECONOMISTS-MANAGEMENT, TAES, TAMU.

Cooperative Extension Work in Agriculture and Home Economics, Texas A&M University and the United States Department of Agriculture cooperating. Distributed in furtherance of the Acts of Congress of May 8, 1914, as amended, and June 30, 1914.

AECO 6

CITRUS ESTABLISHMENT, 1ST YEAR, IRRIGATED, RIO GRANDE VALLEY 19156112

Estimated Costs And Returns Per Acre Of Citrus Establishment, 1st Year, High Level Management

Item	Unit	Price or Cost/Unit	Quantity	Value or Cost
1. No Income				
2. Variable Costs:				
Pre-Harvest:				
Fertilizer (14.5-0-0)	acre	$ 1.74	1	$ 1.74
Trees	tree	1.90	116	220.40
Herbicides	acre	9.00	1	9.00
Machinery	acre	.63	1	.63
Tractor	hour	.52	1.68	.87
Tractor Labor	hour	1.75	2.09	3.66
Irrigation Equipment	acre	.40	1	.40
Irrigation Labor	hour	1.30	2	2.60
Irrigation Water	acre	5.00	1	5.00
Custom Services:				
Land Preparation	acre	15.00	1	15.00
Tank Watering	tree	.06	1160 1/	69.60
Banking & Unbanking	tree	.10	116	11.60
Hand Labor	hour	1.30	10	13.00
Pickup Truck	acre	4.17	1	4.17
Miscellaneous	acre	5.00	1	5.00
Interest on Op. Cap.	$	.08	181.34	14.51
Subtotal, Pre-Harvest				$377.18
Harvest:				
None				
Total Variable Costs				$377.18
3. No Income Above Variable Costs				
4. Fixed Costs:				
Machinery	acre	1.57	1	$ 1.57
Tractor	hour	1.27	2.09	2.65
Irrigation Equipment	acre	6.08	1	6.08
Pickup Truck	acre	2.97	1	2.97
Land Charge	$	.06	600	36.00
Taxes	acre	18.00	1	18.00
Total Fixed Costs				$ 67.27
5. Total Costs				$444.45
6. Net Returns (Costs)				($444.45)

1/ 116 trees watered 10 times.

DEVELOPED BY EXTENSION ECONOMISTS-MANAGEMENT, TAES, TAMU. New, 1972

CITRUS ESTABLISHMENT, 1ST YEAR, IRRIGATED, RIO GRANDE VALLEY 19156111

Estimated Costs And Requirements Per Acre of Citrus Establishment, 1st Year, High Level Management

Operation	Item No.	Date	Times Over	Labor Hours (1)	Tractor or Mach. Hrs.	Fuel, Oil, Lub., Rep. Per Acre	Fixed costs Per Acre
Deep Break		Aug-Sep	1	Custom @ $7.00 per acre			
Disc		Aug-Sep	2	Custom @ $2.00 per acre per time over			
Float		Aug-Sep	2	Custom @ $2.00 per acre per time over			
Spray pre-emerge	1,5	Sep	1	.31	.25	$ .16	$ .24
Disc	1,3	Sep	2	.71	.57	.19	.53
Plant trees (includes trees)		Oct	1	Custom @ $1.90 per tree			
Disc	1,3	Oct-Sep	3	1.07	.86	.28	.80
Total				2.09	1.68	$ .63	$ 1.57
Strip Irrigate	9	May-Aug	2	2.00*	2.00	$ .40	$ 6.08
Tank Irrigate		Nov-Sep	10	Contract @ $.06 per tree per time over			
Bank and Unbank Trees		Nov-Feb	1	Contract @ $.10 per tree			
Hand Labor		Oct-Sep	-	10	-	-	-

(1) Labor hours calculated at 1.25 times tractor hours except where noted by *.

* Labor hours = Machine hours.

DEVELOPED BY EXTENSION ECONOMISTS-MANAGEMENT, TAES, TAMU.

Cooperative Extension Work in Agriculture and Home Economics, Texas A&M University and the United States Department of Agriculture cooperating. Distributed in furtherance of the Acts of Congress of May 8, 1914, as amended, and June 30, 1914.

AECO 6

CITRUS ESTABLISHMENT, 2ND YEAR, IRRIGATED, RIO GRANDE VALLEY 19256112

Estimated Costs And Returns Per Acre Of Citrus Establishment, 2nd Year, High Level Management

Item	Unit	Price or Cost/Unit	Quantity	Value or Cost
1. No Income				
2. Variable Costs:				
Pre-Harvest:				
Fertilizer (29-0-0)	acre	$ 3.48	1	$ 3.48
Herbicides	acre	20.00	1	20.00
Insecticides	acre	15.80	1	15.80
Machinery	acre	2.94	1	2.94
Tractor	hour	.52	5.29	2.75
Tractor Labor	hour	1.75	7.71	13.49
Irrigation Equipment	acre	1.00	1	1.00
Irrigation Labor	hour	1.30	6.25	8.13
Irrigation Water 1/	acre	17.50	1	17.50
Hand Labor	hour	1.30	19	24.60
Tree Replacement	acre	3.00	1	3.00
Pickup Truck	acre	4.17	1	4.17
Miscellaneous	acre	5.00	1	5.00
Interest on Op. Cap.	$	.08	60.93	4.87
Subtotal, Pre-Harvest				$126.73
3. No Income Above Variable Costs				
Total Variable Costs				$126.73
4. Fixed Costs:				
Machinery	acre	4.65	1	$ 4.65
Tractor	hour	1.27	4.79	6.08
Irrigation Equipment	acre	15.20	1	15.20
Pickup Truck	acre	2.97	1	2.97
Land Charge	$	.06	600	36.00
Interest on Investment 2/	$	.10	444.45	44.45
Taxes	acre	18.00	1	18.00
Total Fixed Costs				$127.35
5. Total Costs				$254.08
6. Net Returns (Costs)				($254.08)

1/ 5 irrigations @ $2.50 plus $5.00 for water purchased from another landowner.
2/ Interest on money spent in previous years; includes small risk factor.

DEVELOPED BY EXTENSION ECONOMISTS-MANAGEMENT, TAES, TAMU. New, 1972

Cooperative Extension Work in Agriculture and Home Economics, Texas A&M University and the United States Department of Agriculture cooperating. Distributed in furtherance of the Acts of Congress of May 8, 1914, as amended, and June 30, 1914.

AECO 6

CITRUS ESTABLISHMENT, 2ND YEAR, IRRIGATED, RIO GRANDE VALLEY

Estimated Costs, And Requirements Per Acre of Citrus Establishment, 2nd Year, High Level Management

Operation	Item No.	Date	Times Over	Labor Hours (1)	Tractor or Mach. Hrs.	Fuel, Oil, Lub., Rep. Per Acre	Fixed costs Per Acre
Disc	1,3	Mar	1	.36	.29	$ .10	$ .27
Make Borders	1,4	Mar	1	.63	.50	.06	.43
Spray Herbicide	1,5	Mar	1	.63	.50	.31	.47
Spot Spray Herbicide	1,5	May	1	.50*	.25	.13	.24
Spray Herbicide	1,5	Aug	1	.63	.50	.31	.47
Shred 1/2 Area	1,6	Mar-Oct	6	2.46	2.00	.64	1.56
Spot Spray Herbicide	1,5	Sep	1	.50*	.25	.13	.24
Spray Insecticide	1,2	Apr,Oct	2	2.00*	1.00	1.26	1.94
Total				7.71	5.29	$ 2.94	$ 5.62
Irrigate	9	Feb-Nov	5	6.25	5.00	1.00	15.20
Hand Labor		Annual		19.00	-	-	-

(1) Labor hours calculated at 1.25 times tractor hours except where noted by *.

* Labor hours = 2 x Machine hours.

DEVELOPED BY EXTENSION ECONOMISTS-MANAGEMENT, TAES, TAMU.

Cooperative Extension Work in Agriculture and Home Economics, Texas A&M University and the United States Department of Agriculture cooperating. Distributed in furtherance of the Acts of Congress of May 8, 1914, as amended, and June 30, 1914.

AECO 6

GRAPEFRUIT ESTABLISHMENT, 3RD YEAR, IRRIGATED, RIO GRANDE VALLEY 19356112

Estimated Costs And Returns Per Acre Of Grapefruit Establishment, 3rd Year, High Level Management

Item	Unit	Price or Cost/Unit	Quantity	Value or Cost
1. Gross receipts, from production:				
Grapefruit	ton	$ 37.73	1	$ 37.73
2. Variable Costs:				
Pre-Harvest:				
Fertilizer (58-0-0)	acre	6.96	1	$ 6.96
Herbicides	acre	20.00	1	20.00
Insecticides	acre	24.00	1	24.00
Machinery	acre	2.83	1	2.83
Tractor	hour	.52	4.5	2.34
Tractor Labor	hour	1.75	6.71	11.74
Irrigation Equipment	acre	1.00	1	1.00
Irrigation Labor	hour	1.30	5.0	6.50
Irrigation Water 1/	acre	17.50	1	17.50
Hand Labor	hour	1.30	19	24.60
Tree Replacement	acre	3.00	1	3.00
Pickup Truck	acre	4.17	1	4.17
Miscellaneous	acre	5.00	1	5.00
Interest on Op. Cap.	$	.08	64.82	5.19
Subtotal, Pre-Harvest				$134.83
Harvest:				
None 2/				
Total Variable Costs				$134.83
3. Income Above Variable Costs				($ 97.10)
4. Fixed Costs:				
Machinery	acre	4.90	1	$ 4.90
Tractor	hour	1.27	4.5	5.72
Irrigation Equipment	acre	15.20	1	15.20
Pickup Truck	acre	2.97	1	2.97
Land Charge	$	.06	600	36.00
Interest on Investment 3/	$	.10	698.53	69.85
Taxes	acre	18.00	1	18.00
Total Fixed Costs				$152.64
5. Total Costs				$287.47
6. Net Returns (Costs)				($249.74)

1/ 5 irrigations @ $2.50 plus 5.00 for water purchased from another landowner.
2/ Crop sold on tree.
3/ Interest on money spent in previous years; includes small risk factor.

DEVELOPED BY EXTENSION ECONOMISTS-MANAGEMENT, TAES, TAMU. New, 1972

Cooperative Extension Work in Agriculture and Home Economics, Texas A&M University and the United States Department of Agriculture cooperating. Distributed in furtherance of the Acts of Congress of May 8, 1914, as amended, and June 30, 1914.

AECO 6

GRAPEFRUIT ESTABLISHMENT, 3RD YEAR, IRRIGATED, RIO GRANDE VALLEY 19356111

Estimated Costs And Requirements Per Acre Of Grapefruit Establishment, 3rd Year, High Level Management

Operation	Item No.	Date	Times Over	Labor Hours (1)	Tractor or Mach. Hrs.	Fuel, Oil, Lub., Rep. Per Acre	Fixed costs Per Acre
Spray Herbicide	1,5	Mar,Aug	2	1.25	1.0	$ .62	$ .94
Shred 1/2 Area	1,6	Mar-Oct	6	2.46	2.0	.64	1.56
Spot Spray Herbicide	1,5	Mar,Oct	2	1.00*	.5	.31	.47
Spray Insecticide	1,2	Apr-Oct	1	2.00*	1.0	1.26	1.93
Total				6.71	4.5	$ 2.83	$ 4.90
Irrigate	9	Feb-Nov	5	5.00	4.0	1.00	15.20
Hand Labor	-	Annual	-	19.00	-	-	-

(1) Labor hours calculated at 1.25 times tractor hours except where noted by *.

* Labor hours = 2 x Machine hours.

DEVELOPED BY EXTENSION ECONOMISTS-MANAGEMENT, TAES, TAMU.

Cooperative Extension Work in Agriculture and Home Economics, Texas A&M University and the United States Department of Agriculture cooperating. Distributed in furtherance of the Acts of Congress of May 8, 1914, as amended, and June 30, 1914.

AECO 6

GRAPEFRUIT ESTABLISHMENT, 4TH YEAR, IRRIGATED, RIO GRANDE VALLEY 19456112

Estimated Costs And Returns Per Acre Of Grapefruit Establishment, 4th Year, High Level Management

Item	Unit	Price or Cost/Unit	Quantity	Value or Cost
1. Gross receipts, from production:				
Grapefruit	ton	$ 37.73	2.5	$ 94.33
2. Variable Costs:				
Pre-Harvest:				
Fertilizer (87-0-0)	acre	10.44	1	$ 10.44
Herbicides	acre	20.00	1	20.00
Insecticides	acre	32.00	1	32.00
Machinery	acre	4.72	1	4.72
Tractor	hour	.52	6.40	3.33
Tractor Labor	hour	1.75	10.21	17.87
Irrigation Equipment	acre	1.00	1	1.00
Irrigation Labor	hour	1.30	6.25	8.13
Irrigation Water 1/	acre	17.50	1	17.50
Hand Labor	hour	1.30	19.0	24.60
Tree Replacement	acre	3.00	1	3.00
Pickup Truck	acre	4.17	1	4.17
Miscellaneous	acre	5.00	1	5.00
Interest on Op. Cap.	$	.08	75.88	6.07
Subtotal, Pre-Harvest				$157.83
Harvest:				
None 2/				
Total Variable Costs				$157.83
3. Income Above Variable Costs				($ 63.50)
4. Fixed Costs:				
Machinery	acre	7.80	1	$ 7.80
Tractor	hour	1.27	6.40	8.13
Irrigation Equipment	acre	15.20	1	15.20
Pickup Truck	acre	2.97	1	2.97
Land Charge	$	.06	600	36.00
Interest on Investment 3/	$	.10	948.27	94.83
Taxes	acre	18.00	1	18.00
Total Fixed Costs				$182.93
5. Total Costs				$340.76
6. Net Returns (Costs)				($246.43)

1/ 5 irrigations @ $2.50 plus $5.00 for water purchased from another landowner.
2/ Crop sold on tree.
3/ Interest on money spent in previous years; includes small risk factor.

DEVELOPED BY EXTENSION ECONOMISTS-MANAGEMENT, TAES, TAMU. New, 1972

Cooperative Extension Work in Agriculture and Home Economics, Texas A&M University and the United States Department of Agriculture cooperating. Distributed in furtherance of the Acts of Congress of May 8, 1914, as amended, and June 30, 1914.

AECO 6

GRAPEFRUIT ESTABLISHMENT, 4TH YEAR, IRRIGATED, RIO GRANDE VALLEY 19456111

Estimated Costs And Requirements Per Acre Of Grapefruit Establishment, 4th Year, High Level Management

Operation	Item No.	Date	Times Over	Labor Hours (1)	Tractor or Mach. Hrs.	Fuel, Oil, Lub., Rep. Per Acre	Fixed costs Per Acre
Spray Herbicide	1,5	Mar,Aug	2	1.25	1.00	$ .62	$ .94
Spot Spray Herbicide	1,5	Mar,Oct	2	1.00*	.50	.31	.47
Shred 1/2 Area	1,6	Mar-Oct	6	2.46	2.00	.64	1.56
Spray Insecticide	1,2	Apr-Oct	2.5	5.00*	2.50	3.15	4.83
Fertilize	1	Jan-Feb	1	.5	.40	-	-
Total				10.21	6.40	$ 4.72	$ 7.80
Irrigate	9	Feb-Nov	5	6.25	5.0	1.00	15.20
Hand Labor	-	Annual	-	19.00	-	-	-

(1) Labor hours calculated at 1.25 times tractor hours except where noted by *.

* Labor hours = 2 x Machine hours.

DEVELOPED BY EXTENSION ECONOMISTS-MANAGEMENT, TAES, TAMU.

Cooperative Extension Work in Agriculture and Home Economics, Texas A&M University and the United States Department of Agriculture cooperating. Distributed in furtherance of the Acts of Congress of May 8, 1914, as amended, and June 30, 1914.

AECO 6

GRAPEFRUIT, DEVELOPED GROVE, IRRIGATED, RIO GRANDE VALLEY 19105112

Estimated Costs And Returns Per Acre Of Grapefruit,
Developed Grove, High Level Management

Item	Unit	Price or Cost/Unit	Quantity	Value or Cost
1. Gross receipts, from production:				
Grapefruit	ton	$ 37.73	20	$754.60
2. Variable Costs:				
Pre-Harvest:				
Fertilizer (116-0-0)	acre	13.92	1	$ 13.92
Herbicides	acre	20.00	1	20.00
Insecticides	acre	32.00	1	32.00
Machinery	acre	4.72	1	4.72
Tractor	hour	.52	6.4	3.33
Tractor Labor	hour	1.75	10.21	17.87
Irrigation Equipment	acre	1.00	1	1.00
Irrigation Water 2/	acre	17.50	1	17.50
Irrigation Labor	hour	1.30	6.25	8.13
Hand Labor	hour	1.30	10.0	13.00
Pickup Truck	acre	4.17	1	4.17
Tree Replacement	acre	3.00	1	3.00
Miscellaneous	acre	5.00	1	5.00
Interest on Op. Cap.	$	.08	71.82	5.75
Subtotal, Pre-Harvest				$149.39
Harvest:				
None 1/				
Total Variable Costs				$149.39
3. Income Above Variable Costs				$605.21
4. Fixed Costs:				
Machinery	acre	7.80	1	$ 7.80
Tractor	hour	1.27	6.4	8.13
Irrigation Equipment	acre	15.20	1	15.20
Pickup Truck	acre	2.97	1	2.97
Land Charge	$	.06	600	36.00
Interest on Investment 3/	$	.10	597.35 4/	59.74
Depreciation on Grove	$	.05	1194.70	59.73
Taxes	acre	18.00	1	18.00
Total Fixed Costs				$207.57
5. Total Costs				$356.96
6. Net Returns				$397.64

1/ Crop sold on tree.
2/ 5 irrigations @ $2.50 plus $5.00 for water purchased from another landowner.
3/ Interest on money spent in previous years; includes small risk factor.
4/ Average of 1/2 of total over life of grove.

DEVELOPED BY EXTENSION ECONOMISTS-MANAGEMENT, TAES, TAMU.

GRAPEFRUIT, DEVELOPED GROVE, IRRIGATED, RIO GRANDE VALLEY

Estimated Costs And Returns Per Acre Of Grapefruit, Developed Grove, High Level Management

Operation	Item No.	Date	Times Over	Labor Hours (1)	Tractor or Mach. Hrs.	Fuel, Oil, Lub., Rep. Per Acre	Fixed costs Per Acre
Spray Herbicide	1,5	Mar,Aug	2	1.25	1.0	$ .62	$ .94
Shred 1/2 Area	1,6	Mar-Oct	6	2.46	2.0	.64	1.56
Spot Spray Herbicide	1,5	Mar,Oct	2	1.00*	.5	.31	.47
Spray Insecticide	1,2	Apr-Oct	2.5	5.00*	2.5	3.15	4.83
Fertilize	1	Jan-Feb	1	.50	.4	-	-
Total				10.21	6.4	$ 4.72	$ 7.80
Irrigate	9	Feb-Nov	5	6.25	5.0	1.00	15.20
Hand Labor	-	Annual		1.0	-	-	-

(1) Labor hours calculated at 1.25 times tractor hours except where noted by *.

* Labor hours = 2 x Machine hours.

DEVELOPED BY EXTENSION ECONOMISTS-MANAGEMENT, TAES, TAMU.

Cooperative Extension Work in Agriculture and Home Economics, Texas A&M University and the United States Department of Agriculture cooperating. Distributed in furtherance of the Acts of Congress of May 8, 1914, as amended, and June 30, 1914.

AECO 6

ORANGES ESTABLISHMENT, 3RD YEAR, IRRIGATED, RIO GRANDE VALLEY 19556112

Estimated Costs And Returns Per Acre Of Oranges Establishment, 3rd Year, High Level Management

Item	Unit	Price or Cost/Unit	Quantity	Value or Cost
1. Gross receipts, from production:				
Oranges	ton	$ 29.26	.7	$ 20.48
2. Variable Costs:				
Pre-Harvest:				
Fertilizer (58-0-0)	acre	6.96	1	$ 6.96
Herbicides	acre	20.00	1	20.00
Insecticides	acre	24.00	1	24.00
Machinery	acre	2.83	1	2.83
Tractor	hour	.52	4.5	2.34
Tractor Labor	hour	1.75	6.71	11.74
Irrigation Equipment	acre	1.00	1	1.00
Irrigation Labor	hour	1.30	5.0	6.50
Irrigation Water 1/	acre	17.50	1	17.50
Hand Labor	hour	1.30	19	24.60
Tree Replacement	acre	3.00	1	3.00
Pickup Truck	acre	4.17	1	4.17
Miscellaneous	acre	5.00	1	5.00
Interest on Op. Cap.	$	.08	64.82	5.19
Subtotal, Pre-Harvest				$134.83
Harvest:				
None 2/				
Total Variable Costs				$134.83
3. Income Above Variable Costs				($114.35)
4. Fixed Costs:				
Machinery	acre	4.90	1	$ 4.90
Tractor	hour	1.27	4.5	5.72
Irrigation Equipment	acre	15.20	1	15.20
Pickup Truck	acre	2.97	1	2.97
Land Charge	$	.06	600	36.00
Interest on Investment 3/	$	.10	698.53	69.85
Taxes	acre	18.00	1	18.00
Total Fixed Costs				$152.64
5. Total Costs				$287.47
6. Net Returns (Costs)				($266.99)

1/ 5 irrigations @ $2.50 plus $5.00 for water purchased from another landowner.
2/ Crop sold on tree.
3/ Interest on money spent in previous years; includes small risk factor.

DEVELOPED BY EXTENSION ECONOMISTS-MANAGEMENT, TAES, TAMU. New, 1972

Cooperative Extension Work in Agriculture and Home Economics, Texas A&M University and the United States Department of Agriculture cooperating. Distributed in furtherance of the Acts of Congress of May 8, 1914, as amended, and June 30, 1914.

AECO 6

ORANGES ESTABLISHMENT, 3RD YEAR, IRRIGATED, RIO GRANDE VALLEY 19556111

Estimated Costs, And Requirements Per Acre Of Oranges Establishment, 3rd Year, High Level Management

Operation	Item No.	Date	Times Over	Labor Hours (1)	Tractor or Mach. Hrs.	Fuel, Oil, Lub., Rep. Per Acre	Fixed costs Per Acre
Spray Herbicide	1,5	Mar-Aug	2	1.25	1.0	$ .62	$ .94
Shred 1/2 Area	1,6	Mar-Oct	6	2.46	2.0	.64	1.56
Spot Spray Herbicide	1,6	May-Oct	2	1.00*	.5	.31	.47
Spray Insecticide	1,2	Apr-Oct	1	2.00*	1.0	1.26	1.93
Total				6.71	4.5	$ 2.83	$ 4.90
Irrigate	9	Feb-Nov	5	5.0	4.0	$ 1.00	$15.20
Hand Labor		Annual		19.0	-	-	-

(1) Labor hours calculated at 1.25 times tractor hours except where noted by *.

* Labor hours = 2 x machine hours.

DEVELOPED BY EXTENSION ECONOMISTS-MANAGEMENT, TAES, TAMU.

ORANGES ESTABLISHMENT, 4TH YEAR, IRRIGATED, RIO GRANDE VALLEY 19656112

Estimated Costs And Returns Per Acre Of Oranges Establishment, 4th Year, High Level Management

Item	Unit	Price or Cost/Unit	Quantity	Value or Cost
1. Gross receipts, from production:				
Oranges	ton	$ 29.26	1.2	$ 35.11
2. Variable Costs:				
Pre-Harvest:				
Fertilizer (87-0-0)	acre	10.44	1	$ 10.44
Herbicides	acre	20.00	1	20.00
Insecticides	acre	32.00	1	32.00
Machinery	acre	4.72	1	4.72
Tractor	hour	.52	6.40	3.33
Tractor Labor	hour	1.75	10.21	17.87
Irrigation Equipment	acre	1.00	1	1.00
Irrigation Labor	hour	1.30	6.25	8.13
Irrigation Water 1/	acre	17.50	1	17.50
Hand Labor	hour	1.30	19.0	24.60
Tree Replacement	acre	3.00	1	3.00
Pickup Truck	acre	4.17	1	4.17
Miscellaneous	acre	5.00	1	5.00
Interest on Op. Cap.	$	.08	75.88	6.07
Subtotal, Pre-Harvest				$157.83
Harvest:				
None 2/				
Total Variable Costs				$157.83
3. Income Above Variable Costs				($122.72)
4. Fixed Costs:				
Machinery	acre	7.80	1	$ 7.80
Tractor	hour	1.27	6.40	8.13
Irrigation Equipment	acre	15.20	1	15.20
Pickup Truck	acre	2.97	1	2.97
Land Charge	$	.06	600	36.00
Interest on Investment 3/	$	.10	965.52	96.55
Taxes	acre	18.00	1	18.00
Total Fixed Costs				$184.65
5. Total Costs				$342.48
6. Net Returns (Costs)				($307.37)

1/ 5 irrigations @ $2.50 plus $5.00 for water purchased from another landowner.
2/ Crop sold on tree.
3/ Interest on money spent in previous years; includes small risk factor.

DEVELOPED BY EXTENSION ECONOMISTS-MANAGEMENT, TAES, TAMU. New, 1972

Cooperative Extension Work in Agriculture and Home Economics, Texas A&M University and the United States Department of Agriculture cooperating. Distributed in furtherance of the Acts of Congress of May 8, 1914, as amended, and June 30, 1914.

AECO 6

ORANGES ESTABLISHMENT, 4TH YEAR, IRRIGATED, RIO GRANDE VALLEY 19656111

Estimated Costs, And Requirements Per Acre Of Oranges Establishment, 4th Year, High Level Management

Operation	Item No.	Date	Times Over	Labor Hours (1)	Tractor or Mach. Hrs.	Fuel, Oil, Lub., Rep. Per Acre	Fixed costs Per Acre
Spray Herbicide	1,5	Mar-Aug	2	1.25	1.00	$ .62	$ .94
Spot Spray Herbicide	1,5	Mar-Oct	2	1.00*	.50	.31	.47
Shred 1/2 Area	1,6	Mar-Oct	6	2.46	2.00	.64	1.56
Spray Insecticide	1,2	Apr-Oct	2.5	5.00*	2.50	3.15	4.83
Fertilize	1	Jan-Feb	1	.50	.40	-	-
Total				10.21	6.40	$ 4.72	$ 7.80
Irrigate	9	Feb-Nov	5	6.25	5.0	$ 1.00	$15.20
Hand Labor		Annual		19.0	-	-	-

(1) Labor hours calculated at 1.25 times tractor hours except where noted by *.

* Labor hours = 2 x machine hours.

DEVELOPED BY EXTENSION ECONOMISTS-MANAGEMENT, TAES, TAMU.

ORANGES, DEVELOPED GROVE, IRRIGATED, RIO GRANDE VALLEY 19145112

Estimated Costs And Returns Per Acre Of Oranges,
Developed Grove, High Level Management

	Item	Unit	Price or Cost/Unit	Quantity	Value or Cost
1.	Gross receipts, from production:				
	Oranges	ton	$ 29.26	12	$351.12
2.	Variable Costs:				
	Pre-Harvest:				
	Fertilizer (116-0-0)	acre	13.92	1	$ 13.92
	Herbicides	acre	20.00	1	20.00
	Insecticides	acre	32.00	1	32.00
	Machinery	acre	4.72	1	4.72
	Tractor	hour	.52	6.4	3.33
	Tractor Labor	hour	1.75	10.21	17.87
	Irrigation Equipment	acre	1.00	1	1.00
	Irrigation Water 1/	acre	17.50	1	17.50
	Irrigation Labor	hour	1.30	6.25	8.13
	Hand Labor	hour	1.30	10.0	13.00
	Pickup Truck	acre	4.17	1	4.17
	Tree Replacement	acre	3.00	1	3.00
	Miscellaneous	acre	5.00	1	5.00
	Interest on Op. Cap.	$	.08	71.82	5.75
	Subtotal, Pre-Harvest				$149.39
	Harvest:				
	None 2/				
	Total Variable Costs				$149.39
3.	Income Above Variable Costs				$201.76
4.	Fixed Costs:				
	Machinery	acre	7.80	1	$ 7.80
	Tractor	hour	1.27	6.4	8.13
	Irrigation Equipment	acre	15.20	1	15.20
	Pickup Truck	acre	2.97	1	2.97
	Land Charge	$	.06	600	36.00
	Interest on Investment 3/	$	.10	636.45 4/	63.65
	Depreciation on Grove	$	.05	1272.89	63.65
	Taxes	acre	18.00	1	$ 18.00
	Total Fixed Costs				$215.40
5.	Total Costs				$364.79
6.	Net Returns (Costs)				($ 13.67)

1/ 5 irrigations @ $2.50 plus $5.00 for water purchased from another landowner.
2/ Crop sold on tree.
3/ Interest on money spent in previous years; includes small risk factor.
4/ Average of 1/2 of total over life of grove.

DEVELOPED BY EXTENSION ECONOMISTS-MANAGEMENT, TAES, TAMU. New, 1972

AECO 6

ORANGES, DEVELOPED GROVE, IRRIGATED, RIO GRANDE VALLEY

19145111

Estimated Costs, And Requirements Per Acre
Of Oranges, Developed Grove, High Level Management

Operation	Item No.	Date	Times Over	Labor Hours (1)	Tractor or Mach. Hrs.	Fuel, Oil, Lub., Rep. Per Acre	Fixed costs Per Acre
Spray Herbicide	1,5	Mar-Aug	2	1.25	1.00	$ .62	$ .94
Shred 1/2 Area	1,6	Mar-Oct	6	2.46	2.00	.64	1.56
Spot Spray Herbicide	1,5	Mar-Oct	2	1.00*	.50	.31	.47
Spray Insecticide	1,2	Apr-Oct	2.5	5.00*	2.50	3.15	4.83
Fertilize	1	Jan-Feb	1	.50	.40	-	-
Total				10.21	6.40	$ 4.72	$ 7.80
Irrigate	9	Feb-Nov	5	6.25	5.00	$ 1.00	$15.20
Hand Labor		Annual	1	10.00	-	-	-

(1) Labor hours calculated at 1.25 times tractor hours except where noted by *.

* Labor hours = 2 x machine hours.

DEVELOPED BY EXTENSION ECONOMISTS-MANAGEMENT, TAES, TAMU.

Cooperative Extension Work in Agriculture and Home Economics, Texas A&M University and the United States Department of Agriculture cooperating. Distributed in furtherance of the Acts of Congress of May 8, 1914, as amended, and June 30, 1914.

AECO 6

CITRUS ESTABLISHMENT, 1ST YEAR, IRRIGATED, RIO GRANDE VALLEY 19156122

Estimated Costs And Returns Per Acre Of Citrus Establishment, 1st Year, Typical Management

Item	Unit	Price or Cost/Unit	Quantity	Value or Cost
1. No Income				
2. Variable Costs:				
Pre-Harvest:				
Fertilizer (14.5-0-0)	acre	$ 1.74	.1	$ 1.74
Trees	tree	1.90	116	220.40
Machinery	acre	.76	1	.76
Tractor	hour	.52	2.31	1.20
Tractor Labor	hour	1.75	2.89	5.06
Custom Services:				
Land Preparation	acre	15.00	1	15.00
Tank Watering	tree	.06	1160 1/	69.60
Bank & Unbank	tree	.10	116	11.60
Hand Labor	hour	1.30	15	19.50
Pickup Truck	acre	4.17	1	4.17
Miscellaneous	acre	5.00	1	5.00
Interest on Op. Cap.	$	.085	177.02	15.03
Subtotal, Pre-Harvest				$369.07
Harvest:				
None				
Total Variable Costs				$369.07
3. No Income Above Variable Costs				
4. Fixed Costs:				
Machinery	acre	2.14	1	$ 2.14
Tractor	hour	1.27	2.31	2.93
Pickup Truck	acre	2.97	1	2.97
Land Charge	$	.06	600	36.00
Taxes	acre	18.00	1	18.00
Total Fixed Costs				$ 62.04
5. Total Costs				$431.11
6. Net Returns (Costs)				($431.11)

1/ 116 trees watered 10 times.

DEVELOPED BY EXTENSION ECONOMISTS-MANAGEMENT, TAES, TAMU. New, 1972

Cooperative Extension Work in Agriculture and Home Economics, Texas A&M University and the United States Department of Agriculture cooperating. Distributed in furtherance of the Acts of Congress of May 8, 1914, as amended, and June 30, 1914.

AECO 6

CITRUS ESTABLISHMENT, 1ST YEAR, IRRIGATED, RIO GRANDE VALLEY

19156121

Estimated Costs And Requirements Per Acre of Citrus Establishment, 1st Year, Typical Management

Operation	Item No.	Date	Times Over	Labor Hours (1)	Tractor or Mach. Hrs.	Fuel, Oil, Lub., Rep. Per Acre	Fixed costs Per Acre
Deep Break		Aug-Sep	1	Custom @ $7.00 per acre			
Disc		Aug-Sep	2	Custom @ $2.00 per acre per time over			
Float		Aug-Sep	2	Custom @ $2.00 per acre per time over			
Disc	1,3	Sep	2	.83	.66	$ .22	$ .61
Plant Trees (includes trees)		Oct	1	Custom @ $1.90 per tree			
Disc	1,3	Oct-Sep	5	2.06	1.65	.54	1.53
Total				2.89	2.31	$ .76	$ 2.14
Tank Irrigate		Nov-Sep	10	Contract @ $.06 per tree per time over			
Bank and Unbank		Nov-Feb	1	Contract @ $.10 per tree			
Hand Labor		Oct-Sep		15.00			

(1) Labor hours calculated at 1.25 times tractor hours except where noted by *.

* Labor hours = 2 x Machine hours.

DEVELOPED BY EXTENSION ECONOMISTS-MANAGEMENT, TAES, TAMU.

Cooperative Extension Work in Agriculture and Home Economics, Texas A&M University and the United States Department of Agriculture cooperating. Distributed in furtherance of the Acts of Congress of May 8, 1914, as amended, and June 30, 1914.

AECO 6

CITRUS ESTABLISHMENT, 2ND YEAR, IRRIGATED, RIO GRANDE VALLEY 19256122

Estimated Costs And Returns Per Acre Of Citrus Establishment, 2nd Year, Typical Management

Item	Unit	Price or Cost/Unit	Quantity	Value or Cost
1. No Income				
2. Variable Costs:				
Pre-Harvest:				
Fertilizer (29-0-0)	acre	$ 3.48	1	$ 3.48
Insecticide	acre	7.90	1	7.90
Machinery	acre	2.92	1	2.92
Tractor	hour	.52	5.65	2.94
Tractor Labor	hour	1.75	8.01	14.02
Irrigation Equipment	acre	1.50	1	1.50
Irrigation Labor	hour	1.30	12.0	15.60
Irrigation Water 1/	acre	7.50	1	7.50
Hand Labor	hour	1.30	24	31.10
Pickup Truck	acre	4.17	1	4.17
Miscellaneous	acre	5.00	1	5.00
Interest on Op. Cap.	$	.085	48.07	4.09
Subtotal, Pre-Harvest				$100.23
Harvest:				
None				
Total Variable Costs				$100.23
3. No Income Above Variable Costs				
4. Fixed Costs:				
Machinery	acre	5.65	1	$ 5.65
Tractor	hour	1.27	5.65	7.18
Irrigation Equipment	acre	6.90	1	6.90
Pickup Truck	acre	2.97	1	2.97
Land Charge	$	.06	600	36.00
Interest on Investment 2/	$	.10	431.11	43.11
Taxes	acre	18.00	1	18.00
Total Fixed Costs				$119.81
5. Total Costs				$220.04
6. Net Returns (Costs)				($220.04)

1/ 3 irrigations @ $2.50.
2/ Interest on money spent in previous years, includes small risk factor.

DEVELOPED BY EXTENSION ECONOMISTS-MANAGEMENT, TAES, TAMU. New, 1972

Cooperative Extension Work in Agriculture and Home Economics, Texas A&M University and the United States Department of Agriculture cooperating. Distributed in furtherance of the Acts of Congress of May 8, 1914, as amended, and June 30, 1914.

AECO 6

CITRUS ESTABLISHMENT, 2ND YEAR, IRRIGATED, RIO GRANDE VALLEY

Estimated Costs, And Requirements Per Acre Of Citrus Establishment, 2nd Year, Typical Management

Operation	Item No.	Date	Times Over	Labor Hours (1)	Tractor or Mach. Hrs.	Fuel, Oil, Lub., Rep. Per Acre	Fixed costs Per Acre
Disc	1,3	Mar-Nov	5	2.06	1.65	$ .54	$ 1.53
Border	1,7	Feb-Nov	4	1.25	1.00	.31	.43
Level Borders	1,4	Feb-Nov	4	1.25	1.00	.12	.86
Tree Hoe	1,8	Feb-Nov	4	1.25	1.00	.69	.90
Spray Insecticide	1,2	Apr-Oct	1.0	2.00*	1.00	1.26	1.93
Total				8.01	5.65	$ 2.92	$ 5.65
Irrigate	10	Feb-Nov	3	12.00*	6.0	$1.50	$ 6.90
Hand Labor		annual		24.0			

(1) Labor hours calculated at 1.25 times tractor hours except where noted by *.

* Labor hours = 2 x Machine hours.

DEVELOPED BY EXTENSION ECONOMISTS-MANAGEMENT, TAES, TAMU.

Cooperative Extension Work in Agriculture and Home Economics, Texas A&M University and the United States Department of Agriculture cooperating. Distributed in furtherance of the Acts of Congress of May 8, 1914, as amended, and June 30, 1914.

AECO 6

GRAPEFRUIT ESTABLISHMENT, 3RD YEAR, IRRIGATED, RIO GRANDE VALLEY 19356122

Estimated Costs And Returns Per Acre Of Grapefruit
Establishment, 3rd Year, Typical Management

Item	Unit	Price or Cost/Unit	Quantity	Value or Cost
1. Gross receipts, from production:				
Grapefruit	ton	-	None	-
2. Variable Costs:				
Pre-Harvest:				
Fertilizer (58-0-0)	acre	$ 6.96	1	$ 6.96
Insecticide	acre	16.00	1	16.00
Machinery	acre	4.18	1	4.18
Tractor	hour	.52	6.65	3.46
Tractor Labor	hour	1.75	9.81	17.17
Irrigation Equipment	acre	1.50	1	1.50
Irrigation Labor	hour	1.30	12.00	15.60
Irrigation Water 1/	acre	7.50	1	7.50
Hand Labor	hour	1.30	24.0	31.10
Pickup Truck	acre	4.17	1	4.17
Miscellaneous	acre	5.00	1	5.00
Interest on Op. Cap.	$	.085	56.32	4.79
Subtotal, Pre-Harvest				$117.43
Harvest:				
None				
Total Variable Costs				$117.43
3. No Income Above Variable Costs				
4. Fixed Costs:				
Machinery	acre	7.58	1	$ 7.58
Tractor	hour	1.27	6.65	8.45
Irrigation Equipment	acre	6.90	1	6.90
Pickup Truck	acre	2.97	1	2.97
Land Charge	$	.06	600	36.00
Interest on Investment 2/	$	.10	651.15	65.12
Taxes	acre	18.00	1	18.00
Total Fixed Costs				$145.02
5. Total Costs				$262.45
6. Net Returns (Costs)				($262.45)

1/ 3 irrigations @ $2.50.
2/ Interest on money spent in previous years, includes small risk factor.

DEVELOPED BY EXTENSION ECONOMISTS-MANAGEMENT, TAES, TAMU. New, 1972

Cooperative Extension Work in Agriculture and Home Economics, Texas A&M University and the United States Department of Agriculture cooperating. Distributed in furtherance of the Acts of Congress of May 8, 1914, as amended, and June 30, 1914.
AECO 6

GRAPEFRUIT ESTABLISHMENT, 3RD YEAR, IRRIGATED, RIO GRANDE VALLEY 19356121

Estimated Costs, And Requirements Per Acre Of Grapefruit Establishment, 3rd Year, Typical Management

Operation	Item No.	Date	Times Over	Labor Hours (1)	Tractor or Mach. Hrs.	Fuel, Oil, Lub., Rep. Per Acre	Fixed costs Per Acre
Disc	1,3	Mar-Nov	5	2.06	1.65	$ .54	$ 1.53
Border	1,7	Feb-Nov	4	1.25	1.00	.31	.43
Level Borders	1,4	Feb-Nov	4	1.25	1.00	.12	.86
Tree Hoe	1,8	Feb-Nov	4	1.25	1.00	.69	.90
Spray Insecticide	1,2	Apr-Oct	2	4.00*	2.00	2.52	3.86
Total				9.81	6.65	$ 4.18	$ 7.58
Irrigate	10	Feb-Nov	3	12.00*	6.00	$ 1.50	$ 6.90
Hand Labor		Annual		24.0	-	-	-

(1) Labor hours calculated at 1.25 times tractor hours except where noted by *.

* Labor hours = 2 x Machine hours.

DEVELOPED BY EXTENSION ECONOMISTS-MANAGEMENT, TAES, TAMU.

Cooperative Extension Work in Agriculture and Home Economics, Texas A&M University and the United States Department of Agriculture cooperating. Distributed in furtherance of the Acts of Congress of May 8, 1914, as amended, and June 30, 1914.

AECO 6

GRAPEFRUIT ESTABLISHMENT, 4TH YEAR, IRRIGATED, RIO GRANDE VALLEY

19456122

Estimated Costs And Returns Per Acre Of Grapefruit Establishment, 4th Year, Typical Management

Item	Unit	Price or Cost/Unit	Quantity	Value or Cost
1. Gross receipts, from production:				
Grapefruit	ton	$ 34.30	1.25	$ 42.88
2. Variable Costs:				
Pre-Harvest:				
Fertilizer (87-0-0)	acre	10.44	1	$ 10.44
Insecticide	acre	44.00	1	44.00
Machinery	acre	6.07	1	6.07
Tractor	hour	.52	8.55	4.45
Tractor Labor	hour	1.75	13.31	23.29
Irrigation Equipment	acre	1.50	1	1.50
Irrigation Labor	hour	1.30	12.00	15.60
Irrigation Water 1/	acre	7.50	1	7.50
Hand Labor	hour	1.30	24.0	31.10
Pickup Truck	acre	4.17	1	4.17
Miscellaneous	acre	5.00	1	5.00
Interest on Op. Cap.	$	.085	76.56	6.51
Subtotal,Pre-Harvest				$159.63
Harvest:				
None 2/				
Total Variable Costs				$159.63
3. Income Above Variable Costs				($116.75)
4. Fixed Costs:				
Machinery	acre	10.48	1	$ 10.48
Tractor	hour	1.27	8.15	10.35
Irrigation Equipment	acre	6.90	1	6.90
Pickup Truck	acre	2.97	1	2.97
Land Charge	$	.06	600	36.00
Interest on Investment 3/	$	.10	913.60	91.36
Taxes	acre	18.00	1	18.00
Total Fixed Costs				$176.06
5. Total Costs				$335.69
6. Net Returns (Costs)				($292.81)

1/ 5 irrigations @ $2.50 plus $5.00 for water purchased from another landowner.
2/ Crop sold on tree.
3/ Interest on money spent in previous years; includes small risk factor.

DEVELOPED BY EXTENSION ECONOMISTS-MANAGEMENT, TAES, TAMU. New, 1972

Cooperative Extension Work in Agriculture and Home Economics, Texas A&M University and the United States Department of Agriculture cooperating. Distributed in furtherance of the Acts of Congress of May 8, 1914, as amended, and June 30, 1914.

AECO 6

GRAPEFRUIT ESTABLISHMENT, 4TH YEAR, IRRIGATED, RIO GRANDE VALLEY

19456121

Estimated Costs, And Requirements Per Acre Of Grapefruit Establishment, 4th Year, Typical Management

Operation	Item No.	Date	Times Over	Labor Hours (1)	Tractor or Mach. Hrs.	Fuel, Oil, Lub., Rep. Per Acre	Fixed costs Per Acre
Disc	1,3	Mar-Nov	5	2.06	1.65	$ .54	$ 1.53
Border	1,7	Feb-Nov	4	1.25	1.00	.31	.43
Level Borders	1,4	Feb-Nov	4	1.25	1.00	.12	.86
Tree Hoe	1,8	Feb-Nov	4	1.25	1.00	.69	.90
Spray Insecticide	1,2	Apr-Oct	3.5	7.00*	3.50	4.41	6.76
Fertilize	1	Jan-Feb	1.0	.50	.40	-	-
Total				13.31	8.55	$ 6.07	$10.48
Irrigate	10	Feb-Nov	3	12.00*	6.00	$ 1.50	$ 6.90
Hand Labor		Annual		24.00			

(1) Labor hours calculated at 1.25 times tractor hours except where noted by *.

* Labor hours = 2 x Machine hours.

DEVELOPED BY EXTENSION ECONOMISTS-MANAGEMENT, TAES, TAMU.

GRAPEFRUIT, DEVELOPED GROVE, IRRIGATED, RIO GRANDE VALLEY 19105122

Estimated Costs And Returns Per Acre Of Grapefruit,
Developed Grove, Typical Management

Item	Unit	Price or Cost/Unit	Quantity	Value or Cost
1. Gross receipts, from production:				
Grapefruit	ton	$ 34.30	16	$548.80
2. Variable Costs:				
Pre-Harvest:				
Fertilizer (116-0-0)	acre	13.92	1	$ 13.92
Insecticide	acre	44.00	1	44.00
Machinery	acre	6.07	1	6.07
Tractor	hour	.52	8.55	4.45
Tractor Labor	hour	1.75	13.31	23.29
Irrigation Equipment	acre	1.50	1	1.50
Irrigation Labor	hour	1.30	12.00	15.60
Irrigation Water 1/	acre	7.50	1	7.50
Hand Labor	hour	1.30	15.00	19.50
Pickup Truck	acre	4.17	1	4.17
Miscellanous	acre	5.00	1	5.00
Interest on Op. Cap.	$	.085	72.50	6.16
Subtotal, Pre-Harvest				$151.16
Harvest:				
None 2/				
Total Variable Costs				$151.16
3. Income Above Variable Costs				$397.64
4. Fixed Costs:				
Machinery	acre	10.48	1	$ 10.48
Tractor	hour	1.27	8.15	10.35
Irrigation Equipment	acre	6.90	1	6.90
Pickup Truck	acre	2.97	1	2.97
Land Charge	$	.06	600	36.00
Interest on Investment 3/	$	.10	603.21 4/	60.32
Depreciation on Grove	$	.05	1206.41	60.32
Taxes	acre	18.00	1	18.00
Total Fixed Costs				$205.34
5. Total Costs				$356.50
6. Net Returns				$192.30

1/ 5 irrigations @ $2.50 plus $5.00 for water purchased from another landowner.
2/ Crop sold in tree.
3/ Interest on money spent in previous years; includes small risk factor.
4/ Average of 1/2 of total over life of grove.

DEVELOPED BY EXTENSION ECONOMISTS-MANAGEMENT, TAES, TAMU. New, 1972

Cooperative Extension Work in Agriculture and Home Economics, Texas A&M University and the United States Department of Agriculture cooperating. Distributed in furtherance of the Acts of Congress of May 8, 1914, as amended, and June 30, 1914.

AECO 6

GRAPEFRUIT, DEVELOPED GROVE, IRRIGATED, RIO GRANDE VALLEY 19105121

Estimated Costs And Returns Per Acre Of Grapefruit,
Developed Grove, Typical Management

Operation	Item No.	Date	Times Over	Labor Hours (1)	Tractor or Mach. Hrs.	Fuel, Oil, Lub., Rep. Per Acre	Fixed costs Per Acre
Disc	1,3	Mar-Nov	5	2.06	1.65	$ .54	$ 1.53
Border	1,7	Feb-Nov	4	1.00	1.00	.31	.43
Level Borders	1,4	Feb-Nov	4	1.00	1.00	.12	.86
Tree Hoe	1,8	Feb-Nov	4	1.00	1.00	.69	.90
Spray Insecticide	1,2	Apr-Oct	3.5	7.00*	3.50	4.41	6.76
Fertilize	1	Jan-Feb	1.0	.50	.40	-	-
Total				13.51	8.55	$ 6.07	$10.48
Irrigate	10	Feb-Nov	3	12.00*	6.00	$ 1.50	$ 6.90
Hand Labor		Annual		15.00			

(1) Labor hours calculated at 1.25 times tractor hours except where noted by *.

* Labor hours = 2 x Machine hours.

DEVELOPED BY EXTENSION ECONOMISTS-MANAGEMENT, TAES, TAMU.

Cooperative Extension Work in Agriculture and Home Economics, Texas A&M University and the United States Department of Agriculture cooperating. Distributed in furtherance of the Acts of Congress of May 8, 1914, as amended, and June 30, 1914.

AECO 6

ORANGES ESTABLISHMENT, 3RD YEAR, IRRIGATED, RIO GRANDE VALLEY 19556122

Estimated Costs And Returns Per Acre Of Oranges Establishment, 3rd Year, Typical Management

Item	Unit	Price or Cost/Unit	Quantity	Value or Cost
1. Gross receipts, from production:				
Oranges	ton	-	None	-
2. Variable Costs:				
Pre-Harvest:				
Fertilizer (58-0-0)	acre	$ 6.96	1	$ 6.96
Insecticide	acre	16.00	1	16.00
Machinery	acre	4.18	1	4.18
Tractor	hour	.52	6.65	3.46
Tractor Labor	hour	1.75	9.81	17.17
Irrigation Equipment	acre	1.50	1	1.50
Irrigation Labor	hour	1.30	12.00	15.60
Irrigation Water 1/	acre	7.50	1	7.50
Hand Labor	hour	1.30	24.0	31.10
Pickup Truck	acre	4.17	1	4.17
Miscellaneous	acre	5.00	1	5.00
Interest on Op. Cap.	$	.085	56.32	4.79
Subtotal, Pre-Harvest				$117.43
Harvest:				
None				
Total Variable Costs				$117.43
3. No Income Above Variable Costs				
4. Fixed Costs:				
Machinery	acre	7.58	1	$ 7.58
Tractor	hour	1.27	6.65	8.45
Irrigation Equipment	acre	6.90	1	6.90
Pickup Truck	acre	2.97	1	2.97
Land Charge	$	.06	600	36.00
Interest on Investment 2/	$	.10	651.15	65.12
Taxes	acre	18.00	1	18.00
Total Fixed Costs				$145.02
5. Total Costs				$262.45
6. Net Returns (Costs)				($262.45)

1/ 3 irrigation @ $2.50.
2/ Interest on money spent in previous years; includes small risk factor.

DEVELOPED BY EXTENSION ECONOMISTS-MANAGEMENT, TAES, TAMU. New, 1972

Cooperative Extension Work in Agriculture and Home Economics, Texas A&M University and the United States Department of Agriculture cooperating. Distributed in furtherance of the Acts of Congress of May 8, 1914, as amended, and June 30, 1914.

AECO 6

ORANGES ESTABLISHMENT, 3RD YEAR, IRRIGATED, RIO GRANDE VALLEY 19556121

Estimated Costs, And Requirements Per Acre Of Oranges Establishment, 3rd Year, Typical Management

Operation	Item No.	Date	Times Over	Labor Hours (1)	Tractor or Mach. Hrs.	Fuel, Oil, Lub., Rep. Per Acre	Fixed costs Per Acre
Disc	1,3	Mar-Nov	5	2.06	1.65	$ .54	$ 1.53
Border	1,7	Feb-Nov	4	1.25	1.00	.31	.43
Level Borders	1,4	Feb-Nov	4	1.25	1.00	.12	.86
Tree Hoe	1,8	Feb-Nov	4	1.25	1.00	.69	.90
Spray Insecticide	1,2	Apr-Oct	2	4.00*	2.00	2.52	3.86
Total				9.81	6.65	$ 4.18	$ 7.58
Irrigate	10	Feb-Nov	3	12.00*	6.00	$ 1.50	$ 6.90
Hand Labor		Annual		24.0	-	-	-

(1) Labor hours calculated at 1.25 times tractor hours except where noted by *.

* Labor hours = 2 x machine hours.

DEVELOPED BY EXTENSION ECONOMISTS-MANAGEMENT, TAES, TAMU.

Cooperative Extension Work in Agriculture and Home Economics, Texas A&M University and the United States Department of Agriculture cooperating. Distributed in furtherance of the Acts of Congress of May 8, 1914, as amended, and June 30, 1914.

AECO 6

ORANGES ESTABLISHMENT, 4TH YEAR, IRRIGATED, RIO GRANDE VALLEY 19656122

Estimated Costs And Returns Per Acre Of Oranges Establishment, 4th Year, Typical Management

	Item	Unit	Price or Cost/Unit	Quantity	Value or Cost
1.	Gross receipts, from production:				
	Oranges	ton	$ 26.60	.8	$ 21.28
2.	Variable Costs:				
	Pre-Harvest:				
	Fertilizer (87-0-0)	acre	10.44	1	$ 10.44
	Insecticide	acre	44.00	1	44.00
	Machinery	acre	6.07	1	6.07
	Tractor	hour	.52	8.55	4.45
	Tractor Labor	hour	1.75	13.31	23.29
	Irrigation Equipment	acre	1.50	1	1.50
	Irrigation Labor	hour	1.30	12.00	15.60
	Irrigation Water 1/	acre	7.50	1	7.50
	Hand Labor	hour	1.30	24.0	31.10
	Pickup Truck	acre	4.17	1	4.17
	Miscellaneous	acre	5.00	1	5.00
	Interest on Op. Cap.	$	.085	76.56	6.51
	Subtotal, Pre-Harvest				$159.63
	Harvest:				
	None 2/				
	Total Variable Costs				$159.63
3.	Income Above Variable Costs				($138.35)
4.	Fixed Costs:				
	Machinery	acre	10.48	1	$ 10.48
	Tractor	hour	1.27	8.15	10.35
	Irrigation Equipment	acre	6.90	1	6.90
	Pickup Truck	acre	2.97	1	2.97
	Land Charge	$	.06	600	36.00
	Interest on Investment 3/	$	.10	913.60	91.36
	Taxes	acre	18.00	1	18.00
	Total Fixed Costs				$176.06
5.	Total Costs				$335.69
6.	Net Returns (Costs)				($314.41)

1/ 3 irrigations @ $2.50.
2/ Crop sold on tree.
3/ Interest on money spent in previous years; includes small risk factor.

DEVELOPED BY EXTENSION ECONOMISTS-MANAGEMENT, TAES, TAMU. New, 1972

Cooperative Extension Work in Agriculture and Home Economics, Texas A&M University and the United States Department of Agriculture cooperating. Distributed in furtherance of the Acts of Congress of May 8, 1914, as amended, and June 30, 1914.

AECO 6

ORANGES ESTABLISHMENT, 4TH YEAR, IRRIGATED, RIO GRANDE VALLEY 19656121

Estimated Costs, And Requirements Per Acre Of Oranges Establishment, 4th Year, Typical Management

Operation	Item No.	Date	Times Over	Labor Hours (1)	Tractor or Mach. Hrs.	Fuel, Oil, Lub., Rep. Per Acre	Fixed costs Per Acre
Disc	1,3	Mar-Nov	5	2.06	1.65	$ .54	$ 1.53
Border	1,7	Feb-Nov	4	1.25	1.00	.31	.43
Level Borders	1,4	Feb-Nov	4	1.25	1.00	.12	.86
Tree Hoe	1,8	Feb-Nov	4	1.25	1.00	.69	.90
Spray Insecticide	1,2	Apr-Oct	3.5	7.00*	3.50	4.41	6.76
Fertilize	1	Jan-Feb	1	.50	.40	-	-
Total				13.31	8.55	$ 6.07	$10.48
Irrigate	10	Feb-Nov	3	12.00*	6.00	$ 1.50	$ 6.90
Hand Labor		Annual		24.00	-	-	-

(1) Labor hours calculated at 1.25 times tractor hours except where noted by *.

* Labor hours = 2 x machine hours.

DEVELOPED BY EXTENSION ECONOMISTS-MANAGEMENT, TAES, TAMU.

ORANGES, DEVELOPED GROVE, IRRIGATED, RIO GRANDE VALLEY 19145122

Estimated Costs And Returns Per Acre Of Oranges,
Developed Grove, Typical Management

Item	Unit	Price or Cost/Unit	Quantity	Value or Cost
1. Gross receipts, from production:				
Oranges	ton	$ 26.60	9	$239.40
2. Variable Costs:				
Pre-Harvest:				
Fertilizer (116-0-0)	acre	13.92	1	$ 13.92
Insecticide	acre	44.00	1	44.00
Machinery	acre	6.07	1	6.07
Tractor	hour	.52	8.55	4.45
Tractor Labor	hour	1.75	13.31	23.29
Irrigation Equipment	acre	1.50	1	1.50
Irrigation Labor	hour	1.30	12.00	15.60
Irrigation Water 1/	acre	7.50	1	7.50
Hand Labor	hour	1.30	15.00	19.50
Pickup Truck	acre	4.17	1	4.17
Miscellaneous	acre	5.00	1	5.00
Interest on Op. Cap.	$	.085	72.50	6.16
Subtotal, Pre-Harvest				$151.16
Harvest:				
None 2/				
Total Variable Costs				$151.16
3. Income Above Variable Costs				$ 88.24
4. Fixed Costs:				
Machinery	acre	10.48	1	$ 10.48
Tractor	hour	1.27	8.15	10.35
Irrigation Equipment	acre	6.90	1	6.90
Pickup Truck	acre	2.97	1	2.97
Land Charge	$	.06	600	36.00
Interest on Investment 3/	$	.10	614.00 4/	61.40
Depreciation on Grove	$	.05	1228.01	61.40
Taxes	acre	18.00	1	18.00
Total Fixed Costs				$207.50
5. Total Costs				$358.66
6. Net Returns (Costs)				($119.26)

1/ 3 irrigations @ $2.50.
2/ Crop sold on tree.
3/ Interest on money spent in previous years; includes small risk factor.
4/ Average of 1/2 of total over life of grove.

DEVELOPED BY EXTENSION ECONOMISTS-MANAGEMENT, TAES, TAMU. New, 1972

Cooperative Extension Work in Agriculture and Home Economics, Texas A&M University and the United States Department of Agriculture cooperating. Distributed in furtherance of the Acts of Congress of May 8, 1914, as amended, and June 30, 1914.

AECO 6

ORANGES, DEVELOPED GROVE, IRRIGATED, RIO GRANDE VALLEY 19145121

Estimated Costs, And Requirements Per Acre
Of Oranges, Developed Grove, Typical Management

Operation	Item No.	Date	Times Over	Labor Hours (1)	Tractor or Mach. Hrs.	Fuel, Oil, Lub., Rep. Per Acre	Fixed costs Per Acre
Disc	1,3	Mar-Nov	5	2.06	1.65	$ .54	$ 1.53
Border	1,7	Feb-Nov	4	1.00	1.00	.31	.43
Level Borders	1,4	Feb-Nov	4	1.00	1.00	.12	.86
Tree Hoe	1,8	Feb-Nov	4	1.00	1.00	.69	.90
Spray Insecticide	1,2	Apr-Oct	3.5	7.00*	3.50	4.41	6.76
Fertilize	1	Jan-Feb	1	.50	.40	-	-
Total				13.31	8.55	$ 6.07	$10.48
Irrigate	10	Feb-Nov	3	12.00*	6.00	$ 1.50	$ 6.90
Hand Labor		Annual		15.00	-	-	-

(1) Labor hours calculated at 1.25 times tractor hours except where noted by *.

* Labor hours = 2 x machine hours.

DEVELOPED BY EXTENSION ECONOMISTS-MANAGEMENT, TAES, TAMU.

Cooperative Extension Work in Agriculture and Home Economics, Texas A&M University and the United States Department of Agriculture cooperating. Distributed in furtherance of the Acts of Congress of May 8, 1914, as amended, and June 30, 1914.

AECO 6

GRAPEFRUIT, PURCHASED MATURE GROVE, IRRIGATED, RIO GRANDE VALLEY 19105132

Estimated Costs And Returns Per Acre Of Grapefruit,
Purchased Mature Grove, Typical Management

Item	Unit	Price or Cost/Unit	Quantity	Value or Cost
1. Gross receipts, from production:				
Grapefruit	ton	$ 34.30	11	$388.30
2. Variable Costs:				
Pre-Harvest:				
Grove Care Charge	mo.	10.00	12	$120.00
Fertilizer (116-0-0)	acre	13.92	1	13.92
Herbicide	acre	18.00	1	18.00
Insecticide	acre	44.00	1	44.00
Insecticide Application	acre	10.00	3.5	35.00
Irrigation Water	irri.	2.50	3	7.50
Irrigation Equipment	acre	1.50	1	1.50
Interest on Op. Cap.	$	.06	119.96	7.20
Subtotal, Pre-Harvest				$247.12
Harvest:				
Selling Charge	$	.03	388.30	$ 11.65
Total Variable Costs				$258.77
3. Income Above Variable Costs				$129.53
4. Fixed Costs:				
Irrigation Equipment 1/	acre	6.90	1	$ 6.90
Land Charge	$	.06	600.00	36.00
Interest on Investment	$	.10	300.00	30.00
Depreciation on Grove	$	.05	600.00	30.00
Taxes	acre	18.00	1	18.00
Total Fixed Costs				$120.90
5. Total Costs				$379.67
6. Net Returns				$ 8.63

1/ Includes interest and depreciation.
2/ Interest charged on 1/2 of total investment to represent average amount over life of grove.

DEVELOPED BY EXTENSION ECONOMISTS-MANAGEMENT, TAES, TAMU. New, 1972

Cooperative Extension Work in Agriculture and Home Economics, Texas A&M University and the United States Department of Agriculture cooperating. Distributed in furtherance of the Acts of Congress of May 8, 1914, as amended, and June 30, 1914.
AECO 6

ORANGES, PURCHASED MATURE GROVE, IRRIGATED, RIO GRANDE VALLEY 19145132

Estimated Costs And Returns Per Acre Of Oranges,
Purchased Mature Grove, Typical Management

	Item	Unit	Price or Cost/Unit	Quantity	Value or Cost
1.	Gross receipts, from production:				
	Oranges	ton	$ 26.60	8	$212.80
2.	Variable Costs:				
	Pre-Harvest:				
	Grove Care Charge	mo.	10.00	12	$120.00
	Fertilizer (116-0-0)	acre	13.92	1	13.92
	Herbicide	acre	18.00	1	18.00
	Insecticide	acre	44.00	1	44.00
	Insecticide Application	acre	10.00	3.5	35.00
	Irrigation Water	irri.	2.50	3	7.50
	Irrigation Equipment	acre	1.50	1	1.50
	Interest on Op. Cap.	$	.06	119.96	7.20
	Subtotal, Pre-Harvest				$247.12
	Harvest:				
	Selling Charge	$	.03	212.80	$ 6.38
	Total Variable Costs				$253.50
3.	Income Above Variable Costs				($ 40.70)
4.	Fixed Costs:				
	Irrigation Equipment 1/	acre	6.90	1	$ 6.90
	Land Charge	$	.06	600	36.00
	Interest on Investment 2/	$	.10	300	30.00
	Depreciation on Grove	$	.05	600	30.00
	Taxes	acre	18.00	1	18.00
	Total Fixed Costs				$120.90
5.	Total Costs				$374.40
6.	Net Returns (Costs)				($161.60)

1/ Includes interest and depreciation.
2/ Interest charged on 1/2 of total investment to represent average amount over life of grove.

DEVELOPED BY EXTENSION ECONOMISTS-MANAGEMENT, TAES, TAMU. New, 1972

FORAGE SORGHUM FOR SILAGE, IRRIGATED, RIO GRANDE VALLEY 19090112

Estimated Costs And Returns Per Acre Of Forage Sorghum For Silage, High Level Management

Item	Unit	Price or Cost/Unit	Quantity	Value or Cost
1. Gross Receipts, From Production:				
Sorghum Silage	ton	$ 4.00	20	$ 80.00
2. Variable Costs:				
Pre-Harvest:				
Seed	lb	.22	18	$ 3.96
Fertilizer (150-60-0)	acre	22.80	1	22.80
Machinery	acre	2.19	1	2.19
Tractor (1)	hour	1.01	.82	.83
Tractor (2)	hour	.76	.81	.62
Tractor (3)	hour	.74	.57	.42
Tractor (4)	hour	.54	.60	.32
Tractor Labor	hour	1.75	3.50	6.13
Irrigation Water	appli	2.50	3	7.50
Irrigation Equipment	acre	.90	1	.90
Irrigation Labor	hour	1.30	4.5	5.85
Pickup Truck	acre	1.39	1	1.39
Interest on Operating Capital	$	.08	26.46	2.12
Sub-Total, Pre-Harvest				$ 55.03
Harvest:				
Sold in Field				
Total Variable Costs				$ 55.03
3. Income Above Variable Costs				$ 24.97
4. Fixed Costs:				
Machinery	acre	2.97	1	$ 2.97
Tractor (1)	hour	1.58	.82	1.30
Tractor (2)	hour	1.57	.81	1.27
Tractor (3)	hour	1.25	.57	.71
Tractor (4)	hour	1.05	.60	.63
Irrigation Equipment	acre	3.90	1	3.90
Land (Net Rent-1/4) 1/	acre	14.30	1	14.30
Pickup Truck	acre	.99	1	.99
Total Fixed Costs				$ 26.07
5. Total Costs				$ 81.10
6. Net Returns				($ 1.10)

1/ Landlord pays for 1/4 of fertilizer, insecticide, and harvest.

DEVELOPED BY EXTENSION ECONOMISTS-MANAGEMENT, TAES, TAMU. New, 1972

Cooperative Extension Work in Agriculture and Home Economics, Texas A&M University and the United States Department of Agriculture cooperating. Distributed in furtherance of the Acts of Congress of May 8, 1914, as amended, and June 30, 1914.

AECO 6

FORAGE SORGHUM FOR SILAGE, IRRIGATED, RIO GRANDE VALLEY

Estimated Costs, And Requirements Per Acre Of Sorghum Silage, High Level Management

Operation	Item No.	Date	Times Over	Labor Hours (1)	Tractor or Mach. Hrs.	Fuel, Oil, Lub., Rep. Per Acre	Fixed costs Per Acre
Shred Stalks	3,14	Jul-Sep	1	.21	.17	$ .16	$ .31
Disc	1,10	Jul-Sep	1	.25	.20	.21	.48
Moldboard Plow	1,5	Aug-Oct	.5	.25	.20	.55	.48
Chisel Plow	1,6	Aug-Oct	.5	.21	.17	.17	.17
Disc	1,11	Sep-Nov	2	.31	.25	.25	.35
Bed	2,8	Dec	1	.15	.12	.07	.07
Fertilize	3	Dec-Jan	1	.25	.20	-	-
Re-Bed	2,8	Dec-Jan	1	.15	.12	.07	.07
Rolling Cultivate	2,7	Feb	1	.13	.10	.10	.10
Plant	2,9	Feb	1.25	.26	.21	.15	.16
Cultivate	2,13	Mar	1	.16	.13	.11	.16
Side Dress Fertilize	3	Apr	1	.25	.20	-	-
Cultivate	2,13	Apr	1	.16	.13	.11	.16
Make Ditches	4,18	Mar-May	3	.38	.30	.12	.23
Level Ditches	4,18	Mar-May	3	.38	.30	.12	.23
Total				3.50	2.80	$2.19	$2.97
Irrigate	23	Mar-May	3	4.5*	3.00	$ .90	$3.90

(1) Labor hours calculated at 1.25 times tractor hours except where noted by *.

* Labor hours = 1.5 x Machine hours.

DEVELOPED BY EXTENSION ECONOMISTS-MANAGEMENT, TAES, TAMU.

GRAIN SORGHUM, DRYLAND, RIO GRANDE VALLEY 19095222

Estimated Costs And Returns Per Acre Of Grain Sorghum, Typical Management

Item	Unit	Price or Cost/Unit	Quantity	Value or Cost
1. Gross receipts, from production:				
Grain Sorghum	cwt.	$ 2.00	25	$ 50.00
2. Variable Costs:				
Pre-Harvest:				
Seed	lb.	.25	6	$ 1.50
Fertilizer (20-0-0)	acre	2.40	1	2.40
Herbicide	acre	2.00	.5	1.00
Herbicide Application	acre	1.00	.5	.50
Insecticide	acre	2.00	.33	.67
Insecticide Application	acre	.85	.33	.28
Machinery	acre	1.54	1	1.54
Tractor (1)	hour	.93	1.10	1.02
Tractor (2)	hour	.76	.55	.42
Tractor (4)	hour	.50	.53	.27
Tractor Labor	hour	1.75	2.73	4.78
Pickup Truck	acre	2.00	1	2.00
Interest on Op. Cap.	$	.085	8.19	.70
Subtotal, Pre-Harvest				$ 17.08
Harvest:				
Combine & Haul (custom)	cwt.	.25	25	$ 6.25
Total Variable Costs				$ 23.33
3. Income Above Variable Costs				$ 26.67
4. Fixed Costs:				
Machinery	acre	2.62	1	$ 2.62
Tractor (1)	hour	1.94	1.10	2.13
Tractor (2)	hour	1.60	.55	.88
Tractor (4)	hour	1.30	.53	.69
Land (Net Rent-1/4) 1/	acre	10.10	1	10.10
Pickup Truck	acre	1.58	1	1.58
Total Fixed Costs				$ 18.00
5. Total Costs				$ 41.33
6. Net Returns				$ 8.67

1/ Landlord pays 1/4 of fertilizer, insecticide, and harvest.

DEVELOPED BY EXTENSION ECONOMISTS-MANAGEMENT, TAES, TAMU. New, 1972

Cooperative Extension Work in Agriculture and Home Economics, Texas A&M University and the United States Department of Agriculture cooperating. Distributed in furtherance of the Acts of Congress of May 8, 1914, as amended, and June 30, 1914.

AECO 6

Estimated Costs, And Requirements Per Acre Of Grain Sorghum, Typical Management

Operation	Item No.	Date	Times Over	Labor Hours (1)	Tractor or Mach. Hrs.	Fuel, Oil, Lub., Rep. Per Acre	Fixed costs Per Acre
Shred	4,29	Jul-Sep	1	.36	.28	$ .15	$ .25
Moldboard Plow	1,25	Jul-Sep	.5	.31	.25	.36	.51
Disc	1,27	Jul-Sep	1	.31	.25	.14	.32
Till	1,30	Oct-Nov	1	.25	.20	.15	.31
Disc	1,27	Dec-Jan	1	.25	.20	.11	.26
Bed	2,8	Dec-Jan	1	.15	.12	.08	.08
Fertilize	1	Dec-Jan	1	.25	.20	-	-
Re-Bed	2,8	Dec-Jan	1	.15	.12	.08	.08
Rolling Cultivate	2,7	Feb	1	.13	.10	.12	.12
Plant	2,9	Feb-Mar	1.25	.26	.21	.15	.37
Cultivate	4,13	Mar-May	2	.31	.25	.20	.32
Total				2.73	2.18	$1.54	$2.62

(1) Labor hours calculated at 1.25 times tractor hours except where noted by *.

DEVELOPED BY EXTENSION ECONOMISTS-MANAGEMENT, TAES, TAMU.

Cooperative Extension Work in Agriculture and Home Economics, Texas A&M University and the United States Department of Agriculture cooperating. Distributed in furtherance of the Acts of Congress of May 8, 1914, as amended, and June 30, 1914.

AECO 6