

**Table 8A. Income and Cash Operating Summary; Generic Squash, 1998**

COUNTY: Pinal                      FARM: Pinal Vegetables 98                      WATER SOURCE: Maricopa-Stanfield Irrig.                      TILLAGE: Conventional  
 CROP: Squash, Summer                      ACRES: 1.0                      IRRIGATION SYSTEM: Flood Furrow                      SOIL: Sandy-Loam  
 AREA: Maricopa                      YIELD: 190.0 Ct / Acre                      PREVIOUS CROP: Cotton, Upland                      DATE: 9/2/99

Item	Unit	Quantity	Price/ Unit	Budgeted /Acre	Total /Acre	Your Farm Budget	
INCOME	Squash	Crtn	190.00	\$7.58	\$1,440.20	\$1,440.20	_____
CASH LAND PREPARATION AND GROWING EXPENSES (including sales tax)							
Paid Labor (including benefits)					104.10	_____	
Tractor/Self Propelled					57.94	_____	
Irrigation					41.61	_____	
Other/ Contract					4.55	_____	
Chemicals and Custom Applications					93.92	_____	
Fertilizer					52.70	_____	
Insecticide					5.18	_____	
Herbicide					36.04	_____	
Farm Machinery and Vehicles					46.60	_____	
Diesel Fuel					16.64	_____	
Repairs and Maintenance					29.96	_____	
Irrigation Water (excluding labor)					89.33	_____	
Water Assessment (See Note Below) **						_____	
Other Purchased Inputs &					560.14	_____	
Seed/Transplants					485.14	_____	
Other Services and Rentals					75.00	_____	
TOTAL CASH LAND PREPARATION AND GROWING EXPENSES					894.10	_____	
CASH HARVEST AND POST HARVEST EXPENSES							
Paid Labor (including benefits)					89.92	_____	
Other/Contract					89.92	_____	
Farm Machinery and Vehicles					77.76	_____	
Gasoline					36.46	_____	
Repairs and Maintenance					41.30	_____	
Other Materials					191.33	_____	
TOTAL HARVEST AND POST HARVEST EXPENSE					359.01	_____	
OPERATING OVERHEAD PICKUP USE					2.57	_____	
OPERATING INTEREST AT 10.0%					34.60	_____	
TOTAL CASH OPERATING EXPENSES					\$1,290.28	_____	
RETURNS OVER CASH OPERATING EXPENSES					\$149.92	_____	

Notes: The above figures do not include ownership costs, see table B for detailed cost allocation.  
 \*\* A water assessment charge of \$25.00 per Acre is included as an ownership cost in Table B.

**Table 8B. Allocations of Ownership Costs; Generic Squash, 1998**

COUNTY: Pinal FARM: Pinal Vegetables 98 WATER SOURCE: Maricopa-Stanfield Irrig. TILLAGE: Conventional  
 CROP: Squash, Summer ACRES: 1.0 IRRIGATION SYSTEM: Flood Furrow SOIL: Sandy-Loam  
 AREA: Maricopa YIELD: 190.0 Ct / Acre PREVIOUS CROP: Cotton, Upland DATE: 9/2/99

Item	-- CASH COST BASIS (\$/ACRE) --		-- TOTAL COST BASIS (\$/ACRE) --	
	Income and Costs	Net Returns	Income and Costs	Net Returns
TOTAL INCOME at \$7.58 / Ct	\$1,440.20		\$1,440.20	
TOTAL OPERATING EXPENSES	\$1,290.28		\$1,290.28	
RETURN OVER CASH OPERATING EXPENSES		\$149.92		\$149.92
CASH OVERHEAD EXPENSES				
Taxes, Housing and Insurance, Farm Machinery	15.29		15.29	
General and Office Overhead (5.0% of Total Operating Exp.)	64.51		64.51	
General Farm Maintenance (3.0% of Total Operating Exp.)	38.71		38.71	
Total Cash Overhead Expenses	118.52		118.52	
Total Cash Operating and Overhead Cost	1,408.79		1,408.79	
RETURNS OVER CASH OPER. AND OVER. EXPENSES		\$31.41		\$31.41
CAPITAL ALLOCATIONS (100% Equity)				
Capital Replacement, Machinery and Vehicles			68.54	
Interest on Equity, Machinery and Vehicles			34.37	
Total Capital Allocations			102.91	
RETURNS TO LAND, CAPITAL, MANAGEMENT AND RISK ----->		\$31.41		
RETURNS TO LAND, MANAGEMENT AND RISK ----->				(\$71.50)
Land Cost / Rent or Lease	100.00		100.00	
Water Assessment	25.00		25.00	
Total Land Costs	125.00		125.00	
RETURNS TO CAPITAL, MANAGEMENT AND RISK ----->		(\$93.59)		
RETURNS TO MANAGEMENT AND RISK ----->				(\$196.50)
Management Services (8% of Total Operation Expenses)			103.22	
TOTAL OWNERSHIP COST	243.52		449.65	
TOTAL COST	\$1,533.79		\$1,739.92	
RETURNS TO CAPITAL, MANAGEMENT AND RISK ----->		(\$93.59)		
RETURNS TO RISK (PROFITS) ----->				(\$299.72)
BREAK-EVEN PRICE TO COVER OPERATING COST ( PER Lb )		\$6.79		\$6.79
BREAK-EVEN PRICE TO COVER OWNERSHIP COST		\$1.28		\$2.37
BREAK-EVEN PRICE TO COVER TOTAL COST		\$8.07		\$9.16

**Table 8C. Variable Operating Costs; Generic Squash, 1998**

COUNTY: Pinal FARM: Pinal Vegetables 98 WATER SOURCE: Maricopa-Stanfield Irrig. TILLAGE: Conventional  
 CROP: Squash, Summer ACRES: 1.0 IRRIGATION SYSTEM: Flood Furrow SOIL: Sandy-Loam  
 AREA: Maricopa YIELD: 190.0 Ct / Acre PREVIOUS CROP: Cotton, Upland DATE: 9/2/99

No.	First Month	Operation	--- Hours * ---		--- Operating Costs (\$/ACRE *) Per Operation ---					Tot. Cash Expenses	Class	
			Machine	Labor	Fuel/Rps.	Labor	Cust/Serv.	Materials	Total			Times
1	Feb	Rip	0.300	0.333	3.61	2.73			6.33	1.0	6.33	L
2	Feb	Plow	0.900	1.000	7.25	8.19			15.44	1.0	15.44	L
3	Feb	Disk	0.180	0.200	1.15	1.64			2.78	3.0	8.35	L
4	Feb	Landplane	0.225	0.250	2.74	2.05			4.78	1.0	4.78	L
5	Feb	Apply Fert/Ground	0.090	0.100	0.67	0.82		22.74	24.23	1.0	24.23	G
6	Mar	List	0.300	0.333	1.99	2.73			4.71	1.0	4.71	L
7	Mar	Plant	0.600	1.334	8.16	10.01		485.14	503.31	1.0	503.31	L
8	Apr	Apply Herbicide/Ground	0.225	0.250	0.98	2.05		36.04	39.07	1.0	39.07	G
9	Apr	Buck Rows	0.045	0.050	0.18	0.41			0.59	2.0	1.19	G
10	Apr	Irrigate		0.667		5.20		11.17	16.37	8.0	130.95	G
11	Apr	Disk Ends	0.023	0.025	0.13	0.20			0.34	1.0	0.34	G
12	Apr	Cultivate	0.900	1.000	4.04	8.19			12.22	1.0	12.22	G
13	Apr	Thinning					75.00		75.00	1.0	75.00	G
14	Apr	Apply Insect./Ground	0.225	0.250	0.98	2.05		5.18	8.21	1.0	8.21	G
15	Apr	Cultivate	0.900	1.000	4.04	8.19			12.22	1.0	12.22	G
16	Apr	Apply Fert/Ground	0.900	1.000	7.25	8.19		29.97	45.40	1.0	45.40	G
17	May	Harvest, Load & Haul	5.000	10.00	77.76	89.92		191.33	359.01	1.0	359.01	H
18	Jun	Disk Residue	0.150	0.167	0.95	1.37			2.32	1.0	2.32	L
		Pickup Use 10 Mi/Acre	0.333		2.57				2.57		2.57	
		Operating Interest at 10.0					34.60		34.60		34.60	
TOTAL CASH OPERATING EXPENSES (includes all times over):											1,290.28	T

\*NOTES: Machine and labor hours and operating cost are for one time over the designated acreage. The "Tot. Cash Expense" column and the "TOTAL CASH OPERATING EXPENSES" row include all operations, all times over. Classes are defined below. A water assessment charge of \$25.00 per Acre is included as an ownership cost in Table B.

OPERATING COST SUMMARY BY CLASS		SENSITIVITY OF THE NET REVENUES OVER TOTAL CASH EXPENSES (\$/ACRE)							
		Prices	- 25%	- 10%	Budgeted	+ 10%	+ 25%		
Land Preparation (L)	545.26	Yields	\$5.68	\$6.82	\$7.58	\$8.34	\$9.48	Break-even Price	
Growing (G)	348.84								
Harvest (H)	359.01								
Post Harvest (P)	0.00	- 25%	142.5	-380.28	-218.26	-110.24	-2.23	159.80	8.35
Marketing (M)	0.00	- 10%	171.0	-269.70	-75.28	54.34	183.96	378.39	7.26
Operating Overhead (O)	37.17	Budgeted	190.0	-195.99	20.04	164.06	308.08	524.11	6.72
		+ 10%	209.0	-122.27	115.36	273.78	432.21	669.84	6.27
Total (T)	\$1,290.28	+ 25%	237.5	-11.70	258.34	438.37	618.39	888.43	5.73
		Break-even Yield		240.51	186.01	161.59	142.84	121.67	

**Table 8D. Resource and Cash Flow Requirements; Generic Squash, 1998**

COUNTY: Pinal FARM: Pinal Vegetables 98 WATER SOURCE: Maricopa-Stanfield Irrig. TILLAGE: Conventional  
 CROP: Squash, Summer ACRES: 1.0 IRRIGATION SYSTEM: Flood Furrow SOIL: Sandy-Loam  
 AREA: Maricopa YIELD: 190.0 Ct / Acre PREVIOUS CROP: Cotton, Upland DATE: 9/2/99

Month *	Number Irrigations	Water Applied (inches)	Total Labor (Hrs)	Operating Costs (\$/ACRE *)						
				Purchased Water	Fuel, Oil and Repairs	Labor	Chemicals	Other Purchases	Services	Total
FEB C			2.08		16.56	17.06	22.74			56.36
MAR C			1.87		11.29	14.38		485.14		510.81
APR C	2.0	8.0	4.96	22.33	17.79	40.09	71.19		75.00	226.40
MAY C	3.0	12.0	5.80	33.50	15.55	33.59		38.27		120.91
JUN C	3.0	12.0	17.37	33.50	63.16	88.91		153.06		338.64
Pickup Use 10 Mi/Acre					2.57					2.57
Operating Interest at 10.0									34.60	34.60
Water Assessment				**						
<b>Total</b>	<b>8.0</b>	<b>32.0</b>	<b>32.08</b>	<b>89.33</b>	<b>126.93</b>	<b>194.02</b>	<b>93.93</b>	<b>676.47</b>	<b>109.60</b>	<b>1,290.28</b>
<b>%</b>				<b>6.92</b>	<b>9.84</b>	<b>15.04</b>	<b>7.28</b>	<b>52.43</b>	<b>8.49</b>	<b>100.00</b>

TOTAL RESOURCE REQUIREMENTS ( per Acre)

Total N 115.5  
 Total P 62.4  
 Total Labor 32.1  
 Total Water 32.0

TOTAL ENERGY REQUIREMENTS ( per Acre)

Diesel Fuel 21.9 Gal  
 Unleaded Gas 28.5 Gal  
 All Direct Energy 6.6 M BTU

EQUIPMENT REQUIREMENTS ( per Acre)

Bed Shaper, 4 Rw	0.60 Hr	Cultivator, Sweep, 3 Rw	1.80 Hr	Fert. Side Dress Unit,	0.90 Hr
Fertilizer Broadcaster,	0.09 Hr	Flat Trailer	5.00 Hr	Landplane 12'X 45'	0.22 Hr
Lister, 5 Bottom	0.30 Hr	Manual Spray Rig, 150 g	0.45 Hr	Moldboard Plow, 3-16 2	0.90 Hr
Offset Disk, 10.5'	0.02 Hr	Offset Disk, 8'	0.69 Hr	Pickup Truck, 1 Ton	5.00 Hr
Pickup Truck, 1/2 Ton	0.33 Hr	Planter, Drill Type, 4 Row	0.60 Hr	Rowbuck, 10'	0.09 Hr
Tractor, 50 PTO HP,	3.26 Hr	Tractor, 70 PTO HP,	1.89 Hr	Tractor, 100 PTO HP,	0.69 Hr
Tractor, 150 PTO HP,	0.52 Hr	V-Ripper, 5 Shnk	0.30 Hr		

MATERIALS REQUIREMENT ( per Acre)

11-48-00, Dry	130.00 Lb	46-00-00, Urea 46	220.00 Lb	Boxes & Supplies	190.00 Ct
D CPA	5.00 Lb	Diazinon	1.50 Pt	Summer Squash	12.00 Lb
Water, District	32.00 AI				

LABOR REQUIREMENT ( per Acre)

Cutter	14.00 Hr	Irrigators	5.34 Hr	Other	0.67 Hr
Tractor	7.07 Hr	Truck Driver	5.00 Hr		

\*NOTE: P = Previous Year C = Current Year N = Next Year

\*\* A water assessment charge of \$25.00 per Acre is included as an ownership cost in Table B.

**Table 8E. Schedule of Operations; Generic Squash, 1998**

COUNTY: Pinal FARM: Pinal Vegetables 98 WATER SOURCE: Maricopa-Stanfield Irrig. TILLAGE: Conventional  
 CROP: Squash, Summer ACRES: 1.0 IRRIGATION SYSTEM: Flood Furrow SOIL: Sandy-Loam  
 AREA: Maricopa YIELD: 190.0 Ct / Acre PREVIOUS CROP: Cotton, Upland DATE: 9/2/99

First No.	Month	Times	Operation	Equipment/ Custom Oper		Job Rate Acres/Hr	Material Use and Cost				Service Cost \$ / Unit	Labor Type
				HP	Self-Prop./ Implement		Name	Appl. Rate	\$ / Unit			
1	Feb	1.0	Rip	150	V-Ripper, 5 Shnk	3.00						Tractor
2	Feb	1.0	Plow	70	Moldboard Plow, 3-16 2	1.00						Tractor
3	Feb	3.0	Disk	70	Offset Disk, 8'	5.00						Tractor
4	Feb	1.0	Landplane	150	Landplane 12'X 45'	4.00						Tractor
5	Feb	1.0	Apply Fert/Ground	100	Fertilizer Broadcaster,	10.00	11-48-00, Dry	130.00	Lb	330.00	Tn	Tractor
6	Mar	1.0	List	70	Lister, 5 Bottom	3.00						Tractor
7	Mar	1.0	Plant	100	Planter, Drill Type, 4 Row Bed Shaper, 4 Rw	1.50	Summer Squash	12.00	Lb	38.14	Lb	Tractor Other
8	Apr	1.0	Apply Herbicide/Ground	50	Manual Spray Rig, 150 g on	4.00	DCPA	5.00	Lb	6.80	Lb	Tractor
9	Apr	2.0	Buck Rows	50	Rowbuck, 10'	20.00						Tractor
10	Apr	8.0	Irrigate			1.50	Water, District	4.00	Al	33.50	AF	Irrigators
11	Apr	1.0	Disk Ends	50	Offset Disk, 10.5'	40.00						Tractor
12	Apr	1.0	Cultivate	50	Cultivator, Sweep, 3 Rw	1.00						Tractor
13	Apr	1.0	Thinning		CST Thinning						75.00	Ac
14	Apr	1.0	Apply Insect./Ground	50	Manual Spray Rig, 150 g on	4.00	Diazinon	1.50	Pt	26.06	Ga	Tractor
15	Apr	1.0	Cultivate	50	Cultivator, Sweep, 3 Rw	1.00						Tractor
16	Apr	1.0	Apply Fert/Ground	50	Fert. Side Dress Unit, 4Row	1.00	46-00-00, Urea 46	220.00	Lb	257.00	Tn	Tractor
17	May	1.0	Harvest, Load & Haul		Pickup Truck, 1 Ton	0.07	Boxes & Supplies	190.00	Ct	0.95	Ct	Truck Cutter
18	Jun	1.0	Disk Residue Pickup use 10 Mi/Ac	70	Offset Disk, 8' Pickup Truck, 1/2 Ton	6.00 3.00						Tractor

\*NOTES: Machine times, labor times, and material rates are for one time over the designated acreage.

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