

Table 4A. Income and Cash Operating Summary; Carrots, 2001

COUNTY: Maricopa FARM: Maricopa Veg WATER SOURCE: Salt River Project TILLAGE: Double Crop
 CROP: Carrots ACRES: 1.0 IRRIGATION SYSTEM: Flood Furrow SOIL: Sandy-Loam
 AREA: Salt River Project YIELD: 1,046.0 Ct / Acre PREVIOUS CROP: Wheat, Winter DATE: 9/12/01

Item	Unit	Quantity	Price/ Unit	Budgeted /Acre	Total /Acre	Your Farm Budget
INCOME -> Carrots	Crtn	1,046.00	\$3.09	\$3,232.14	\$3,232.14	_____
CASH LAND PREPARATION AND GROWING EXPENSES (including sales tax)						
Paid Labor (including benefits)					131.48	_____
Tractor/Self Propelled				44.49		_____
Irrigation				68.46		_____
Other/ Contract				18.52		_____
Chemicals and Custom Applications					233.37	_____
Fertilizer				69.67		_____
Herbicide				66.28		_____
Other Chemicals				97.41		_____
Farm Machinery and Vehicles					49.65	_____
Diesel Fuel				20.99		_____
Repairs and Maintenance				28.65		_____
Irrigation Water (excluding labor)					45.75	_____
Water Assessment (See Note Below) **						_____
Other Purchased Inputs &					49.51	_____
Seed/Transplants				46.51		_____
Other Services and Rentals				3.00		_____
TOTAL CASH LAND PREPARATION AND GROWING EXPENSES					509.75	_____
CASH HARVEST AND POST HARVEST EXPENSES						
Paid Labor (including benefits)					0.24	_____
Tractor/Self Propelled				0.24		_____
Farm Machinery and Vehicles					0.21	_____
Diesel Fuel				0.08		_____
Repairs and Maintenance				0.12		_____
Custom Harvest/Post Harvest					1234.28	_____
Other Materials					1050.34	_____
TOTAL HARVEST AND POST HARVEST EXPENSE					2285.07	_____
OPERATING OVERHEAD -> PICKUP USE					12.71	_____
OPERATING INTEREST AT 10.0%					20.31	_____
TOTAL CASH OPERATING EXPENSES					\$2,827.83	_____
RETURNS OVER CASH OPERATING EXPENSES					\$404.31	_____

Notes: The above figures do not include ownership costs, see table B for detailed cost allocation.

** A water assessment charge of \$10.14 per Acre is included as an ownership cost in Table B.

Table 4B. Allocations of Ownership Costs; Carrots, 2001

COUNTY: Maricopa FARM: Maricopa Veg WATER SOURCE: Salt River Project TILLAGE: Double Crop
 CROP: Carrots ACRES: 1.0 IRRIGATION SYSTEM: Flood Furrow SOIL: Sandy-Loam
 AREA: Salt River Project YIELD: 1,046.0 Ct / Acre PREVIOUS CROP: Wheat, Winter DATE: 9/12/01

17

Item	-- CASH COST BASIS (\$/ACRE) --		-- TOTAL COST BASIS (\$/ACRE) --	
	Income and Costs	Net Returns	Income and Costs	Net Returns
TOTAL INCOME at \$3.09 / Ct	\$3,232.14		\$3,232.14	
TOTAL OPERATING EXPENSES	\$2,827.83		\$2,827.83	
RETURN OVER CASH OPERATING EXPENSES		\$404.31		\$404.31
CASH OVERHEAD EXPENSES				
Taxes, Housing and Insurance, Farm Machinery	4.98		4.98	
General and Office Overhead (5.0% of Total Operating Exp.)	141.39		141.39	
General Farm Maintenance (3.0% of Total Operating Exp.)	84.84		84.84	
Total Cash Overhead Expenses	231.21		231.21	
Total Cash Operating and Overhead Cost	3,059.04		3,059.04	
RETURNS OVER CASH OPER. AND OVER. EXPENSES		\$173.10		\$173.10
CAPITAL ALLOCATIONS (100% Equity)				
Capital Replacement, Machinery and Vehicles			27.51	
Interest on Equity, Machinery and Vehicles			13.33	
Total Capital Allocations			40.84	
RETURNS TO LAND, CAPITAL, MANAGEMENT AND RISK ----->		\$173.10		
RETURNS TO LAND, MANAGEMENT AND RISK ----->				\$132.26
Land Cost / Rent or Lease	200.00		200.00	
Water Assessment **	10.14		10.14	
Total Land Costs	210.13		210.13	
RETURNS TO CAPITAL, MANAGEMENT AND RISK ----->		(\$37.04)		
RETURNS TO MANAGEMENT AND RISK ----->				(\$77.88)
Management Services (8% of Total Operation Expenses)			226.23	
TOTAL OWNERSHIP COST	441.34		708.41	
TOTAL COST	\$3,269.18		\$3,536.24	
RETURNS TO CAPITAL, MANAGEMENT AND RISK ----->		(\$37.04)		
RETURNS TO RISK (PROFITS) ----->				(\$304.10)
Item	-- CASH COST BASIS (\$/ACRE) --		-- TOTAL COST BASIS (\$/ACRE) --	
	Income and Costs	Net Returns	Income and Costs	Net Returns
BREAK-EVEN PRICE TO COVER OPERATING COST (PER Lb)		\$2.70		\$2.70
BREAK-EVEN PRICE TO COVER OWNERSHIP COST		\$0.42		\$0.68
BREAK-EVEN PRICE TO COVER TOTAL COST		\$3.13		\$3.38

Table 4C. Variable Operating Costs; Carrots, 2001

COUNTY: Maricopa FARM: Maricopa Veg WATER SOURCE: Salt River Project TILLAGE: Double Crop
 CROP: Carrots ACRES: 1.0 IRRIGATION SYSTEM: Flood Furrow SOIL: Sandy-Loam
 AREA: Salt River Project YIELD: 1,046.0 Ct / Acre PREVIOUS CROP: Wheat, Winter DATE: 9/12/01

No.	First Month Operation		---- Hours * ---- Machine Labor		---- Operating Costs (\$/ACRE *) Per Operation ----					Tot. Cash Expenses	Class	
	Fuel/Rps.	Labor	Cust/Serv.	Materials	Total	Times						
1	Jul	Rip	0.450	0.500	7.10	4.87			11.97	0.5	5.98	L
2	Jul	Plow	0.450	0.500	6.50	4.87			11.37	1.0	11.37	L
3	Jul	Disk	0.225	0.250	3.43	2.44			5.86	2.0	11.73	L
4	Jul	Laser Level	0.450	0.500	5.54	4.87			10.42	0.5	5.21	L
5	Aug	Soil Fertility					3.00		3.00	1.0	3.00	G
6	Aug	Apply Fert/Ground	0.112	0.125	1.13	1.22		39.72	42.06	1.0	42.06	G
7	Aug	List/Inject	0.225	0.250	3.50	2.44		97.41	103.35	1.0	103.35	L
8	Aug	Plant	0.450	1.000	3.38	9.75		46.51	59.64	1.0	59.64	L
9	Aug	Set Sprinklers	0.158	0.350	0.90	3.41			4.31	1.0	4.31	G
10	Aug	Irrigate/Sprinkler		0.091		0.89			0.89	3.0	2.66	G
11	Aug	Remove Sprinklers	0.158	0.350	0.90	3.41			4.31	1.0	4.31	G
12	Aug	Apply Herbicide/Ground	0.090	0.100	0.77	0.97		66.28	68.03	1.0	68.03	G
13	Aug	Buck Rows	0.045	0.050	0.34	0.49			0.82	4.0	3.30	G
14	Aug	Irrigate		0.800		7.80		5.72	13.52	8.0	108.14	G
15	Aug	Disk Ends	0.045	0.050	0.41	0.49			0.90	3.0	2.70	G
16	Aug	Cultivate	0.225	0.250	1.90	2.44			4.34	4.0	17.36	G
17	Oct	Apply Fert/Ground	0.257	0.286	3.47	2.79		14.98	21.23	2.0	42.46	G
18	Nov	Prepare Ends	0.023	0.025	0.21	0.24			0.45	1.0	0.45	H
19	Nov	Harvest 1046 Ct					1046.00	1050.34	2096.34	1.0	2096.34	H
20	Nov	Haul, Custom 1046 Ct					188.28		188.28	1.0	188.28	H
21	Dec	Disk Residue 1046 Ct	0.150	0.167	2.28	1.63			3.91	1.0	3.91	L
		Pickup Use 50 Mi/Acre	1.667		12.71						12.71	
		Operating Interest at 10.0						20.31			20.31	
TOTAL CASH OPERATING EXPENSES (includes all times over):											2827.83	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 \$10.14 per Acre is included as an ownership cost in Table B.

OPERATING COST SUMMARY BY CLASS

Land Preparation (L)	201.19
Growing (G)	308.56
Harvest (H)	2,285.07
Post Harvest (P)	0.00
Marketing (M)	0.00
Operating Overhead (O)	33.02
Total (T)	\$2,827.83

SENSITIVITY OF THE NET REVENUES OVER TOTAL CASH EXPENSES (\$/ACRE)

Prices ->	- 25%	- 10%	Budgeted	+ 10%	+ 25%		
Yields	\$2.32	\$2.78	\$3.09	\$3.40	\$3.86	Break-even Price	
- 25%	784.5	-407.94	-44.33	198.08	440.49	804.11	2.84
- 10%	941.4	-387.09	49.25	340.14	631.03	1,067.37	2.73
Budgeted	1,046.0	-373.19	111.63	434.85	758.06	1,242.88	2.67
+ 10%	1,150.6	-359.28	174.02	529.56	885.09	1,418.39	2.63
Break-even Yield		3,853.60	858.83	565.73	421.78	305.27	

Table 4D. Resource and Cash Flow Requirements; Carrots, 2001

COUNTY: Maricopa FARM: Maricopa Veg WATER SOURCE: Salt River Project TILLAGE: Double Crop
 CROP: Carrots ACRES: 1.0 IRRIGATION SYSTEM: Flood Furrow SOIL: Sandy-Loam
 AREA: Salt River Project YIELD: 1,046.0 Ct / Acre PREVIOUS CROP: Wheat, Winter DATE: 9/12/01

Month *	Number Irrigations	Water Applied (inches)	Total Labor (Hrs)	Operating Costs (\$/ACRE *)						
				Purchased Water	Fuel, Oil and Repairs	Labor	Chemicals	Other Purchases	Services	Total
JUL C			1.50		19.67	14.62				34.29
AUG C	5.0	27.0	5.45	2.50	13.22	53.11	203.41	46.51	3.00	321.75
SEP C	2.0	12.0	2.05	10.00	10.89	19.98				40.87
OCT C	2.0	12.0	2.44	10.00	7.61	23.75	14.98			56.33
NOV C	2.0	12.0	1.91	15.75	3.67	18.63	14.98	1050.34	1234.28	2337.65
DEC C			0.17		2.28	1.63				3.91
Pickup Use 50 Mi/Acre					12.71					12.71
Operating Interest at 10.0									20.31	20.31
Water Assessment				**						
Total	11.0	63.0	13.51	38.25	70.05	131.72	233.37	1096.85	1257.59	2820.99
%				1.35	2.48	4.66	8.25	38.79	44.47	100.00

TOTAL RESOURCE REQUIREMENTS (per Acre)

Total N 154.2
 Total P 60.0
 Total Labor 13.5
 Total Water 63.0

TOTAL ENERGY REQUIREMENTS (per Acre)

Diesel Fuel 24.8 Gal
 Unleaded Gas 5.0 Gal
 All Direct Energy 4.1 M BTU

EQUIPMENT REQUIREMENTS (per Acre)

Bed Shaper, 4 Rw	0.45 Hr	Cultivator, Sweep, 4 Rw	0.90 Hr	Drag Scraper, 14'	0.22 Hr
Fertilizer Broadcaster,	0.11 Hr	Fertilizer Injector, 4 Row	0.74 Hr	Laser, Complete System	0.22 Hr
Lister, 5 Bottom	0.22 Hr	Moldboard Plow, 4-16 2	0.45 Hr	Offset Disk, 10.5'	0.16 Hr
Offset Disk, 16.5'	0.60 Hr	Pickup Truck, 1/2 Ton	1.67 Hr	Rowbuck, 10'	0.18 Hr
Saddle Tk Sprayer, 2 Tk 8	0.09 Hr	Sprinkler Trailer	0.32 Hr	Subsoiler, Heavy Duty, 7	0.22 Hr
Tractor, 60 PTO HP	0.32 Hr	Tractor, 80 PTO HP	1.78 Hr	Tractor, 100 PTO HP	0.85 Hr
Tractor, 150 PTO HP,	1.27 Hr	Tractor, 175 PTO HP,	0.22 Hr		

MATERIALS REQUIREMENT (per Acre)

16-20-00, Dry	300.00 Lb	32-00-00, URAN 32, Lqd	30.00 Ga	Boxes & Supplies	1046.00 Ct
Carrot Seed (Raw/Hybrid)	200.00 Th	Dichloropropene	9.00 Ga	Linuron	1.00 Ga
Water, District	63.00 Al				

LABOR REQUIREMENT (per Acre)

Irrigators	7.02 Hr	Other	1.90 Hr	Tractor	4.59 Hr
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*NOTE: P = Previous Year C = Current Year N = Next Year

** A water assessment charge of \$10.14 per Acre is included as an ownership cost in Table B.

Table 4E. Schedule of Operations; Carrots, 2001

COUNTY: Maricopa FARM: Maricopa Veg WATER SOURCE: Salt River Project TILLAGE: Double Crop
 CROP: Carrots ACRES: 1.0 IRRIGATION SYSTEM: Flood Furrow SOIL: Sandy-Loam
 AREA: Salt River Project YIELD: 1,046.0 Ct / Acre PREVIOUS CROP: Wheat, Winter DATE: 9/12/01

First No. Month Times	Operation	Equipment/ Custom Oper HP Self-Prop./ Implement	Job Rate Acre/Hr	----- Material Use and Cost Name	----- Appl. Rate	----- \$ / Unit	----- Service Cost \$ / Unit	Labor Type
Jul	0.5 Rip	175 Subsoiler, Heavy Duty, 7	2.00					Tractor
Jul	1.0 Plow	150 Moldboard Plow, 4-16 2	2.00					Tractor
Jul	2.0 Disk	150 Offset Disk, 16.5'	4.00					Tractor
Jul	0.5 Laser Level	150 Drag Scraper, 14' Laser, Complete System	2.00					Tractor
Aug	1.0 Soil Fertility	CST Soil Analysis (Surface)					3.00 Ac	
Aug	1.0 Apply Fert/Ground	100 Fertilizer Broadcaster,	8.00	16-20-00, Dry	300.00 Lb	250.50 Tn		Tractor
Aug	1.0 List/Inject	100 Lister, 5 Bottom Fertilizer Injector, 4 Row	4.00	Dichloropropene	9.00 Ga	10.24 Ga		Tractor
Aug	1.0 Plant	80 Bed Shaper, 4 Rw	2.00	Carrot Seed	200.00 Th	0.22 Th		Tractor
Aug	1.0 Set Sprinklers	60 Sprinkler Trailer	5.70					Other Irrigators
Aug	3.0 Irrigate/Sprinkler		11.00	Water, District	5.00 Al	0.00 AF		Other Irrigators
Aug	1.0 Remove Sprinklers	60 Sprinkler Trailer	5.70					Other Irrigators
Aug	1.0 Apply Herbicide/Ground	80 Saddle Tk Sprayer, 2 Tk 8	10.00	Linuron	1.00 Ga	62.71 Ga		Tractor
Aug	4.0 Buck Rows	80 Rowbuck, 10'	20.00					Tractor
Aug	8.0 Irrigate		1.25	Water, District	6.00 Al	11.44 AF		Irrigators
Aug	3.0 Disk Ends	80 Offset Disk, 10.5'	20.00					Tractor
Aug	4.0 Cultivate	80 Cultivator, Sweep, 4 Rw	4.00					Tractor
Oct	2.0 Apply Fert/Ground	100 Fertilizer Injector, 4 Row	3.50	32-00-00, URAN 32,	15.00 Ga	170.80 Tn		Tractor
Nov	1.0 Prepare Ends	80 Offset Disk, 10.5'	40.00					Tractor
Nov	1.0 Harvest	CST Harvest Carrots		Boxes & Supplies	1046.00 Ct	0.95 Ct	1.00 Ct	
Nov	1.0 Haul, Custom	CST Harv/pack/haul Carrots					0.18 Ct	
Dec	1.0 Disk Residue	150 Offset Disk, 16.5'	6.00					Tractor
	Pickup use 50 Mi/Ac	Pickup Truck, 1/2 Ton	0.60					

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

Table 4F. Operations Calendar; Carrots, 2001

COUNTY: Maricopa FARM: Maricopa Veg WATER SOURCE: SRP TILLAGE: Double Crop
 CROP: Carrots ACRES: 1.0 IRRIGATION SYSTEM: Flood Furrow SOIL: Sandy-Loam
 AREA: Salt River Project YIELD: 915 Ct/Acre PREVIOUS CROP: Wheat, Winter DATE: 09/17/2001

No.	Operation	-----Month and Times Operation Performed-----											
		Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec
1	Rip							0.5 C					
2	Plow							1.0 C					
3	Disk							2.0 C					
4	Laser Level							0.5 C					
5	Soil Fertility								1.0 C				
6	Apply Fert/Ground								1.0 C				
7	List/Inject								1.0 C				
8	Plant								1.0 C				
9	Set Sprinkler								1.0 C				
10	Irrigate/Sprinkler								3.0 C				
11	Remove Sprinkler								1.0 C				
12	Apply Herbicide/Ground								1.0 C				
13	Buck Rows								1.0 C	2.0 C	1.0 C		
14	Irrigate								2.0 C	2.0 C	2.0 C	2.0 C	
15	Disk Ends								1.0 C	2.0 C			
16	Cultivate								1.0 C	1.0 C	2.0 C		
17	Apply Fert/Ground									1.0 C	1.0 C		
18	Prepare Ends											1.0 C	
19	Harvest											1.0 C	
20	Haul, Custom											1.0 C	
21	Disk Residue												1.0 C

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