

Table 13A. Income and Cash Operating Summary; Fall Cantaloupe, 2001

COUNTY: La Paz FARM: LaPaz County WATER SOURCE: CRIR Irrigation Project TILLAGE: Double Crop
 CROP: Cantaloupes ACRES: 1.0 IRRIGATION SYSTEM: Flood Furrow SOIL: Sandy-Loam
 AREA: Parker CRIR YIELD: 237.0 Ct / Acre PREVIOUS CROP: Alfalfa Hay DATE: 11/1/01

| Item | Unit | Quantity | Price/ Unit | Budgeted /Acre | Total /Acre | Your Farm Budget |
|--|------|----------|----------------|-------------------|----------------|---------------------|
| INCOME -> Melons | Crtm | 237.00 | \$6.98 | \$1,654.26 | \$1,654.26 | _____ |
| CASH LAND PREPARATION AND GROWING EXPENSES (including sales tax) | | | | | | |
| Paid Labor (including benefits) | | | | | 91.10 | _____ |
| Tractor/Self Propelled | | | | 47.11 | | _____ |
| Irrigation | | | | 40.92 | | _____ |
| Other/ Contract | | | | 3.07 | | _____ |
| Chemicals and Custom Applications | | | | | 304.31 | _____ |
| Fertilizer | | | | 104.98 | | _____ |
| Insecticide | | | | 142.91 | | _____ |
| Herbicide | | | | 56.42 | | _____ |
| Farm Machinery and Vehicles | | | | | 52.57 | _____ |
| Diesel Fuel | | | | 24.95 | | _____ |
| Repairs and Maintenance | | | | 27.62 | | _____ |
| Irrigation Water (excluding labor) | | | | | 0.00 | _____ |
| Water Assessment (See Note Below) ** | | | | | | _____ |
| Other Purchased Inputs & Seed/Transplants | | | | 15.04 | 189.04 | _____ |
| Other Services and Rentals | | | | 174.00 | | _____ |
| TOTAL CASH LAND PREPARATION AND GROWING EXPENSES | | | | | 637.02 | _____ |
| CASH HARVEST AND POST HARVEST EXPENSES | | | | | | |
| Custom Harvest/Post Harvest | | | | | 367.35 | _____ |
| TOTAL HARVEST AND POST HARVEST EXPENSE | | | | | 367.35 | _____ |
| OPERATING OVERHEAD -> PICKUP USE | | | | | 13.69 | _____ |
| OPERATING INTEREST AT 10.0% | | | | | 5.29 | _____ |
| TOTAL CASH OPERATING EXPENSES | | | | | \$1,023.35 | _____ |
| RETURNS OVER CASH OPERATING EXPENSES | | | | | \$630.91 | _____ |

Notes: The above figures do not include ownership costs, see table B for detailed cost allocation.
 ** A water assessment charge of \$19.25 per Acre is included as an ownership cost in Table B.

Table 13B. Allocations of Ownership Costs; Fall Cantaloupe, 2001

COUNTY: La Paz FARM: LaPaz County WATER SOURCE: CRIR Irrigation Project TILLAGE: Double Crop
 CROP: Cantaloupes ACRES: 1.0 IRRIGATION SYSTEM: Flood Furrow SOIL: Sandy-Loam
 AREA: Parker CRIR YIELD: 237.0 Ct / Acre PREVIOUS CROP: Alfalfa Hay DATE: 11/1/01

| Item | -- CASH COST BASIS (\$/ACRE) -- | | -- TOTAL COST BASIS (\$/ACRE) -- | |
|--|---|-------------|--|-------------|
| | Income and Costs | Net Returns | Income and Costs | Net Returns |
| TOTAL INCOME at \$6.98 / Ct | \$1,654.26 | | \$1,654.26 | |
| TOTAL OPERATING EXPENSES | \$1,023.35 | | \$1,023.35 | |
| RETURN OVER CASH OPERATING EXPENSES | | \$630.91 | | \$630.91 |
| CASH OVERHEAD EXPENSES | | | | |
| Taxes, Housing and Insurance, Farm Machinery | 5.10 | | 5.10 | |
| General and Office Overhead (5.0% of Total Operating Exp.) | 51.17 | | 51.17 | |
| General Farm Maintenance (3.0% of Total Operating Exp.) | 30.70 | | 30.70 | |
| Total Cash Overhead Expenses | 86.97 | | 86.97 | |
| Total Cash Operating and Overhead Cost | 1,110.32 | | 1,110.32 | |
| RETURNS OVER CASH OPER. AND OVER. EXPENSES | | \$543.94 | | \$543.94 |
| CAPITAL ALLOCATIONS (100% Equity) | | | | |
| Capital Replacement, Machinery and Vehicles | | | 28.76 | |
| Interest on Equity, Machinery and Vehicles | | | 10.52 | |
| Total Capital Allocations | | | 39.28 | |
| RETURNS TO LAND, CAPITAL, MANAGEMENT AND RISK -----> | | \$543.94 | | |
| RETURNS TO LAND, MANAGEMENT AND RISK -----> | | | | \$504.66 |
| Land Cost / Rent or Lease | 150.00 | | 150.00 | |
| Water Assessment ** | 19.25 | | 19.25 | |
| Total Land Costs | 169.25 | | 169.25 | |
| RETURNS TO CAPITAL, MANAGEMENT AND RISK -----> | | \$374.69 | | |
| RETURNS TO MANAGEMENT AND RISK -----> | | | | \$335.41 |
| Management Services (8% of Total Operation Expenses) | | | 81.87 | |
| TOTAL OWNERSHIP COST | 256.22 | | 377.37 | |
| TOTAL COST | \$1,279.57 | | \$1,400.72 | |
| RETURNS TO CAPITAL, MANAGEMENT AND RISK -----> | | \$374.69 | | |
| RETURNS TO RISK (PROFITS) -----> | | | | \$253.54 |
| | | | | |
| Item | -- CASH COST BASIS (\$/ACRE) -- Income and Costs | Net Returns | -- TOTAL COST BASIS (\$/ACRE) -- Income and Costs | Net Returns |
| BREAK-EVEN PRICE TO COVER OPERATING COST (PER Lb) | | \$4.32 | | \$4.32 |
| BREAK-EVEN PRICE TO COVER OWNERSHIP COST | | \$1.08 | | \$1.59 |
| BREAK-EVEN PRICE TO COVER TOTAL COST | | \$5.40 | | \$5.91 |

Table 13C. Variable Operating Costs; Fall Cantaloupe, 2001

COUNTY: La Paz FARM: LaPaz County WATER SOURCE: CRIR Irrigation Project TILLAGE: Double Crop
 CROP: Cantaloupes ACRES: 1.0 IRRIGATION SYSTEM: Flood Furrow SOIL: Sandy-Loam
 AREA: Parker CRIR YIELD: 237.0 Ct / Acre PREVIOUS CROP: Alfalfa Hay DATE: 11/1/01

| 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 | Jun | Rip | 0.225 | 0.250 | 3.92 | 2.19 | | | 6.11 | 1.0 | 6.11 | L |
| 2 | Jun | Disk | 0.150 | 0.167 | 3.15 | 1.47 | | | 4.61 | 2.0 | 9.22 | L |
| 3 | Jun | Laser Level | 0.450 | 0.500 | 7.67 | 4.39 | | | 12.05 | 1.0 | 12.05 | L |
| 4 | Jun | Soil Fertility | | | | | 3.00 | | 3.00 | 1.0 | 3.00 | G |
| 5 | Jun | Apply Fert/Ground | 0.180 | 0.200 | 1.49 | 1.75 | | 34.98 | 38.23 | 1.0 | 38.23 | G |
| 6 | Jun | List | 0.225 | 0.250 | 2.10 | 2.19 | | | 4.29 | 1.0 | 4.29 | L |
| 7 | Jul | Plant | 0.360 | 0.800 | 5.18 | 6.58 | | 15.04 | 26.80 | 1.0 | 26.80 | L |
| 8 | Jul | Apply Herbicide/Ground | 0.225 | 0.250 | 1.24 | 2.19 | | 56.42 | 59.85 | 1.0 | 59.85 | G |
| 9 | Jul | Apply Insect./Ground | 0.180 | 0.200 | 0.95 | 1.75 | | 24.36 | 27.07 | 1.0 | 27.07 | G |
| 10 | Jul | Buck Rows | 0.045 | 0.050 | 0.20 | 0.44 | | | 0.64 | 5.0 | 3.20 | G |
| 11 | Jul | Irrigate | | 0.667 | | 5.12 | | | 5.12 | 7.0 | 35.81 | G |
| 12 | Jul | Cultivate | 0.225 | 0.250 | 1.55 | 2.19 | | | 3.74 | 9.0 | 33.67 | G |
| 13 | Jul | Plant Fertility | | | | | 6.00 | | 6.00 | 1.0 | 6.00 | G |
| 14 | Jul | Irrigate/Run Fertilizer | 0.600 | 0.667 | 2.00 | 5.12 | | 30.04 | 37.15 | 1.0 | 37.15 | G |
| 15 | Jul | Thinning | | | | | 75.00 | | 75.00 | 1.0 | 75.00 | G |
| 16 | Aug | Apply Insecticide/Air | | | | | 4.24 | 55.03 | 59.28 | 2.0 | 118.56 | G |
| 17 | Aug | Hand Weeding | | | | | 75.00 | | 75.00 | 1.0 | 75.00 | G |
| 18 | Aug | Apply Fert/Ground | 0.257 | 0.286 | 3.02 | 2.51 | | 39.96 | 45.49 | 1.0 | 45.49 | G |
| 19 | Aug | Pollinate | | | | | 15.00 | | 15.00 | 1.0 | 15.00 | G |
| 20 | Sep | Harvest 237 Ct | | | | | 367.35 | | 367.35 | 1.0 | 367.35 | H |
| 21 | Sep | Disk Residue 237 Ct | 0.180 | 0.200 | 3.78 | 1.75 | | | 5.53 | 1.0 | 5.53 | L |
| | | Pickup Use 50 Mi/Acre | 1.667 | | 13.69 | | | | | | 13.69 | |
| | | Operating Interest at 10.0 | | | | | 5.29 | | | | 5.29 | |
| TOTAL CASH OPERATING EXPENSES (includes all times over): | | | | | | | | | | | 1023.35 | 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 \$19.25 per Acre is included as an ownership cost in Table B.

OPERATING COST SUMMARY BY CLASS

| | |
|------------------------|------------|
| Land Preparation (L) | 64.01 |
| Growing (G) | 573.01 |
| Harvest (H) | 367.35 |
| Post Harvest (P) | 0.00 |
| Marketing (M) | 0.00 |
| Operating Overhead (O) | 18.98 |
| Total (T) | \$1,023.35 |

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

| Prices -> | Yields | - 25% | - 10% | Budgeted | + 10% | + 25% | Break-even Price |
|------------------|--------|--------|--------|----------|--------|----------|------------------|
| | | | | \$5.24 | \$6.28 | \$6.98 | |
| - 25% | 177.8 | -4.18 | 181.93 | 305.99 | 430.06 | 616.17 | 5.26 |
| - 10% | 213.3 | 126.82 | 350.15 | 499.03 | 647.91 | 871.24 | 4.64 |
| Budgeted | 237.0 | 214.16 | 462.30 | 627.72 | 793.15 | 1,041.29 | 4.33 |
| + 10% | 260.7 | 301.49 | 574.44 | 756.41 | 938.38 | 1,211.33 | 4.08 |
| Break-even Yield | | 178.88 | 139.30 | 121.40 | 107.57 | 91.87 | |

Table 13D. Resource and Cash Flow Requirements; Fall Cantaloupe, 2001

COUNTY: La Paz FARM: LaPaz County WATER SOURCE: CRIR Irrigation Project TILLAGE: Double Crop
 CROP: Cantaloupes ACRES: 1.0 IRRIGATION SYSTEM: Flood Furrow SOIL: Sandy-Loam
 AREA: Parker CRIR YIELD: 237.0 Ct / Acre PREVIOUS CROP: Alfalfa Hay DATE: 11/1/01

| Month * | Number Irrigations | Water Applied (inches) | Total Labor (Hrs) | Operating Costs (\$/ACRE *) | | | | | | |
|----------------------------|--------------------|------------------------|-------------------|-----------------------------|-----------------------|--------------|---------------|-----------------|---------------|----------------|
| | | | | Purchased Water | Fuel, Oil and Repairs | Labor | Chemicals | Other Purchases | Services | Total |
| JUN C | | | 1.53 | | 21.47 | 13.46 | 34.98 | | 3.00 | 72.91 |
| JUL C | 4.0 | 20.0 | 4.77 | | 14.42 | 38.44 | 110.82 | 15.04 | 81.00 | 259.72 |
| AUG C | 4.0 | 20.0 | 3.85 | | 8.26 | 30.87 | 95.00 | | 94.24 | 228.37 |
| SEP C | | | 0.95 | | 8.42 | 8.33 | 55.03 | | 371.59 | 443.37 |
| Pickup Use 50 Mi/Acre | | | | | 13.69 | | | | | 13.69 |
| Operating Interest at 10.0 | | | | | | | | | 5.29 | 5.29 |
| Water Assessment | | | | ** | | | | | | |
| Total | 8.0 | 40.0 | 11.11 | | 66.26 | 91.10 | 295.83 | 15.04 | 555.12 | 1023.35 |
| % | | | | | 6.47 | 8.90 | 28.91 | 1.47 | 54.25 | 100.00 |

TOTAL RESOURCE REQUIREMENTS (per Acre)

Total N 158.2
 Total P 126.0
 Total K 15.0
 Total Labor 11.1
 Total Water 40.0

TOTAL ENERGY REQUIREMENTS (per Acre)

Diesel Fuel 27.1 Gal
 Unleaded Gas 5.0 Gal
 All Direct Energy 4.4 M BTU

EQUIPMENT REQUIREMENTS (per Acre)

| | | | | | |
|--------------------------|---------|---------------------------|---------|----------------------------|---------|
| Bed Shaper, 4 Rw | 0.36 Hr | Cultivator, Sweep, 4 Rw | 2.02 Hr | Directed Spray Rig, 8 | 0.18 Hr |
| Drag Scraper, 14' | 0.45 Hr | Fertilizer Broadcaster, | 0.18 Hr | Fertilizer Injector, 4 Row | 0.26 Hr |
| Laser, Complete System | 0.45 Hr | Lister, 5 Bottom | 0.22 Hr | Offset Disk, 13.5' | 0.00 Hr |
| Offset Disk, 18' | 0.48 Hr | Pickup Truck, 1/2 Ton | 1.67 Hr | Planter, Drill Type, 4 Row | 0.36 Hr |
| Rowbuck, 10' | 0.23 Hr | Saddle Tk Sprayer, 2 Tk 8 | 0.22 Hr | Tractor, 35 PTO HP | 0.60 Hr |
| Tractor, 50 PTO HP, | 0.63 Hr | Tractor, 70 PTO HP, | 2.02 Hr | Tractor, 100 PTO HP, | 1.02 Hr |
| Tractor, 200 PTO HP, 4WD | 1.15 Hr | V-Ripper, 5 Shnk | 0.22 Hr | | |

MATERIALS REQUIREMENT (per Acre)

| | | | | | |
|-----------------|----------|---------------|-----------|------------------------|----------|
| 10-10-05, Lqd | 30.00 Ga | 11-48-00, Dry | 200.00 Lb | 32-00-00, URAN 32, Lqd | 30.00 Ga |
| Abamectin | 10.00 Oz | Bensulide | 10.00 Pt | Bifenthrin | 10.00 Oz |
| Cantaloupe Sd | 1.50 Lb | Endosulfan | 2.00 Pt | Imidacloprid | 5.00 Oz |
| Water, District | 40.00 Al | | | | |

LABOR REQUIREMENT (per Acre)

| | | | | | |
|------------|---------|-------|---------|---------|---------|
| Irrigators | 5.34 Hr | Other | 0.40 Hr | Tractor | 5.37 Hr |
|------------|---------|-------|---------|---------|---------|

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

** A water assessment charge of \$19.25 per Acre is included as an ownership cost in Table B.

Table 13E. Schedule of Operations; Fall Cantaloupe, 2001

COUNTY: La Paz FARM: LaPaz County WATER SOURCE: CRIR Irrigation Project TILLAGE: Double Crop
 CROP: Cantaloupes ACRES: 1.0 IRRIGATION SYSTEM: Flood Furrow SOIL: Sandy-Loam
 AREA: Parker CRIR YIELD: 237.0 Ct / Acre PREVIOUS CROP: Alfalfa Hay DATE: 11/1/01

| 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 |
|-----------------------|-------------------------|---|------------------|----------------------------|----------------------|------------------------|------------|
| Jun 1.0 | Rip | 200 V-Ripper, 5 Shnk | 4.00 | | | | Tractor |
| Jun 2.0 | Disk | 200 Offset Disk, 18' | 6.00 | | | | Tractor |
| Jun 1.0 | Laser Level | 200 Drag Scraper, 14' Laser, Complete System | 2.00 | | | | Tractor |
| Jun 1.0 | Soil Fertility | CST Soil Analysis (Surface) | | | | 3.00 Ac | |
| Jun 1.0 | Apply Fert/Ground | 100 Fertilizer Broadcaster, | 5.00 | 11-48-00, Dry | 200.00 Lb | 330.00 Tn | Tractor |
| Jun 1.0 | List | 100 Lister, 5 Bottom | 4.00 | | | | Tractor |
| Jul 1.0 | Plant | 100 Planter, Drill Type, 4 Row | 2.50 | Cantaloupe Sd | 1.50 Lb | 9.46 Lb | Tractor |
| Jul 1.0 | Apply Herbicide/Ground | 50 Saddle Tk Sprayer, 2 Tk 8 | 4.00 | Bensulide | 10.00 Pt | 42.58 Ga | Other |
| Jul 1.0 | Apply Insect./Ground | 50 Directed Spray Rig, 8 Row | 5.00 | Imidacloprid | 5.00 Oz | 588.40 Ga | Tractor |
| Jul 5.0 | Buck Rows | 50 Rowbuck, 10' | 20.00 | | | | Tractor |
| Jul 7.0 | Irrigate | 70 Cultivator, Sweep, 4 Rw | 1.50 | Water, District | 5.00 Al | 0.00 AF | Irrigators |
| Jul 9.0 | Cultivate | CST Plant Tissue Anal.(Petiole) | 4.00 | | | | Tractor |
| Jul 1.0 | Plant Fertility | Tractor, 35 PTO HP | 1.50 | Water, District | 5.00 Al | 0.00 AF | 6.00 Ac |
| Jul 1.0 | Irrigate/Run Fertilizer | CST Thinning | | 32-00-00, URAN 32, | 30.00 Ga | 170.80 Tn | Irrigators |
| Jul 1.0 | Thinning | CST Air Spray, 3 Gal Mix | | Bifenthrin | 5.00 Oz | 490.00 Ga | 75.00 Ac |
| Aug 2.0 | Apply Insecticide/Air | | | Endosulfan | 1.00 Pt | 33.17 Ga | 4.24 Ac |
| | | | | Abamectin | 5.00 Oz | 732.91 Ga | |
| Aug 1.0 | Hand Weeding | CST Hand Weeding | | | | | 75.00 Ac |
| Aug 1.0 | Apply Fert/Ground | 100 Fertilizer Injector, 4 Row | 3.50 | 10-10-05, Lqd | 30.00 Ga | 251.33 Tn | Tractor |
| Aug 1.0 | Pollinate | CST Bee Hive Rental | | | | | 15.00 Ac |
| Sep 1.0 | Harvest | CST Harv/pack/haul Melons | | | | | 1.55 Ct |
| Sep 1.0 | Disk Residue | 200 Offset Disk, 18' | 5.00 | | | | 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 13F Operations Calendar; Fall Cantaloupe, 2001

COUNTY: La Paz FARM: Western Arizona Vegetables WATER SOURCE: CRIR TILLAGE: Double Crop
 CROP: Cantaloupe ACRES: 1 IRRIGATION SYSTEM: Flood Furrow SOIL: Sandy-Loam
 AREA: Parker YIELD: 237 Ct/Acre PREVIOUS CROP: Cantaloupe DATE: 03/25/2001

| No. | Operation | Month and Times Operation Performed | | | | | | | | | | | |
|-----|-------------------------|-------------------------------------|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|
| | | Jan | Feb | Mar | Apr | May | Jun | Jul | Aug | Sep | Oct | Nov | Dec |
| 1 | Rip | | | | | | 1 C | | | | | | |
| 2 | Disk | | | | | | 2 C | | | | | | |
| 3 | Laser Level | | | | | | 1 C | | | | | | |
| 4 | Soil Fertility | | | | | | 1 C | | | | | | |
| 5 | Apply Fert/Ground | | | | | | 1 C | | | | | | |
| 6 | List | | | | | | 1 C | | | | | | |
| 7 | Plant | | | | | | | 1 C | | | | | |
| 8 | Apply Herbicide/Ground | | | | | | | 1 C | | | | | |
| 9 | Apply Insect/Ground | | | | | | | | 1 C | | | | |
| 10 | Buck Rows | | | | | | | 2 C | 3 C | | | | |
| 11 | Irrigate | | | | | | | 3 C | 4 C | | | | |
| 12 | Cultivate | | | | | | | 3 C | 3 C | 3 C | | | |
| 13 | Plant Fertility | | | | | | | 1 C | | | | | |
| 14 | Irrigate/Run Fertilizer | | | | | | | 1 C | | | | | |
| 15 | Thinning | | | | | | | 1 C | | | | | |
| 16 | Apply Insecticide/Air | | | | | | | | | 1 C | 1 C | | |
| 17 | Hand Weeding | | | | | | | | 1 C | | | | |
| 18 | Apply Fert/Ground | | | | | | | | 1 C | | | | |
| 19 | Pollinate | | | | | | | | 1 C | | | | |
| 20 | Harvest | | | | | | | | | 1 C | | | |
| 21 | Disk Residue | | | | | | | | | 1 C | | | |

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