

SAMPLE COSTS TO PRODUCE COTTON
SAN JOAQUIN VALLEY - 1985

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This sample cost data sheet is produced as a guide only. It should, however, assist producers in determining production cost for their operation or specific fields and aid in analyzing cost and procedures that might increase production efficiency. The figures shown are based on what are considered good management practices and do not represent industry averages.

The cost data sheet was developed on a microcomputer using the spread sheet program VISICALC. A program listing can be obtained by contacting the author. From the listing someone with a microcomputer and a spread sheet program like VISICALC, SUPERCALC, or MULTIPLAN could reconstruct the template. Then, by substituting their costs, they could customize the cost sheet for their operation. If you have any questions regarding the program, call the author of this section.

Yield - Yield is the most important variable affecting both cost of lint per pound and profit per acre. The cost of production per pound of lint is greatly reduced as the yield of lint per acre increases.

Irrigation - Sample cost for water is based on \$25/acre foot. This cost will vary depending on irrigation district, portion of water supplied from wells, depth of pumping, time of day the water is pumped, and type of irrigation system.

Irrigation labor costs will vary with number of irrigations per season, hourly wage rates, type of irrigation system, and other factors. Laser leveling of furrow irrigated fields can have a significant impact on irrigation cost.

Insect Control - Insect control costs will vary with location, year, and the degree of control expected by the grower. This cost data sheet is set up for one miticide spray, and one mid-season insect spray. Note that a systemic insecticide treatment at planting is not included.

Weed Control - Cost will vary greatly depending on methods used, and the magnitude of the weed problem in general. This cost sheet is set up for one preplant application of a Dinitroaniline herbicide, one hand weeding operation, three cultivations, and a layby application of a herbicide.

SAMPLE COSTS TO PRODUCE COTTON SAN JOAQUIN VALLEY 1985

DATA ENTRY SECTION

| | | |
|-----------------------|--------|-------|
| <u>Labor</u> | | |
| Field | \$/hr | 6.00 |
| Equipment Oper. | \$/hr | 7.00 |
| <u>Equipment Cost</u> | | |
| 80 HP Tractor | \$/hr | 12.40 |
| 130 HP Tractor | \$/hr | 18.00 |
| Yield | lbs/ac | 1000 |
| Gin Turnout | % | 33 |
| Estimated Price | \$/lbs | 0.65 |
| Seed to Lint Ratio | | 1.70 |
| Interest Rate | % | 12.5 |

SAMPLE COSTS TO PRODUCE COTTON (contined)

| ACTIVITY | UNIT COST | UNIT | RATE | UNIT | COST/ ACRE | COST/ LBS |
|---------------------------------------|-----------|---------|------|---------|------------|-----------|
| <u>PRE-HARVEST COST</u> | | | | | | |
| Land Preparation | | | | | | |
| Labor | 7.00 | \$/hr | 3 | hr/ac | 21.00 | |
| 130 HP Tractor | 18.00 | \$/hr | 1 | hr/ac | 18.00 | |
| 80 HP Tractor | 12.40 | \$/hr | 2 | hr/ac | 24.80 | |
| Nematode Control | | | | | | |
| if Needed | 66.00 | \$/ac | 0 | ac | 0.00 | |
| Preplant Herbicide | | | | | | |
| Material | 6.75 | \$/ac | 1 | ac | 6.75 | |
| Application | 8.00 | \$/ac | 1 | ac | 8.00 | |
| Incorporation | | | | | | |
| Labor | 7.00 | \$/hr | 0 | hr/ac | 3.50 | |
| 80 HP Tractor | 12.40 | \$/hr | 0 | hr/ac | 6.20 | |
| Planting | | | | | | |
| Seed | 0.50 | \$/lbs | 15 | lbs/ac | 7.50 | |
| Labor | 7.00 | \$/hr | 0 | hr/ac | 2.10 | |
| 80 HP Tractor | 12.40 | \$/hr | 0 | hr/ac | 3.72 | |
| Fertilizer | | | | | | |
| Material (NH3) | 0.18 | \$/lbs | 125 | lbs/ac | 22.50 | |
| Application | | | | | | |
| Custom | 7.00 | \$/ac | 1 | ac | 7.00 | |
| Irrigation | | | | | | |
| Water charge | 25.00 | \$/acft | 3 | acft/ac | 75.00 | |
| Labor (1 pre and 5 post irrig.) | | | | | | |
| | 6.00 | \$/hr | 6 | hr/ac | 36.00 | |
| Postplant weed control | | | | | | |
| Material | 15.00 | \$/ac | 1 | ac | 15.00 | |
| Application | 8.00 | \$/ac | 1 | ac | 8.00 | |
| Hand weeding (1x) | 6.00 | \$/hr | 4 | hr/ac | 24.00 | |
| Cultivation (3x) | | | | | | |
| Labor | 7.00 | \$/hr | 1.5 | hr/ac | 10.50 | |
| 80 HP Tractor | 12.40 | \$/hr | 1.5 | hr/ac | 18.60 | |
| Mite Control | | | | | | |
| Material | 11.00 | \$/ac | 1 | ac | 11.00 | |
| Application | 5.00 | \$/ac | 1 | ac | 5.00 | |
| Insect Control | | | | | | |
| Material | 10.00 | \$/ac | 1 | ac | 10.00 | |
| Application | 5.00 | \$/ac | 1 | ac | 5.00 | |
| Defoliation (2x) | | | | | | |
| Material | 10.00 | \$/ac | 1 | x/ac | 10.00 | |
| Application | 5.00 | \$/ac | 1 | x/ac | 5.00 | |
| Land Rent | 150.00 | \$/ac | 1 | ac | 150.00 | |
| Non-tractor repair | 20.00 | \$/ac | 1 | ac | 20.00 | |
| Misc. Labor | | | | | | |
| Labor | 7.00 | \$/hr | 1 | hr/ac | 7.00 | |
| 80 HP Tractor | 12.40 | \$/hr | 1 | hr/ac | 12.40 | |
| Office Expense | 20.00 | \$/ac | 1 | ac | 20.00 | |
| Interest on Loan (prod. cost/2)*IR | 286.79 | \$/ac | 12.5 | \$/ac | 35.85 | |

SAMPLE COSTS TO PRODUCE COTTON (continued)

| ACTIVITY | UNIT COST | UNIT | RATE | UNIT | COST/ACRE | COST/LBS |
|--------------------------------------|-----------|-----------|-------|---------|-----------|----------|
| TOTAL PREHARVEST COST | | | | | 609.42 | 0.61 |
| <hr/> | | | | | | |
| <u>HARVEST COST</u> | | | | | | |
| Picking + Hauling | | | | | | |
| 1st pick 90% | 3.20 | \$/cwt SC | 27.27 | cwt/ac | 87.27 | |
| 2nd pick 10% | 3.35 | \$/cwt SC | 3.03 | cwt/ac | 10.15 | |
| Ginning: (Bags, Ties, etc.) | 3.20 | \$/cwt SC | 30.30 | cwt/ac | 96.97 | |
| TOTAL HARVEST COST | | | | | 194.39 | 0.19 |
| <hr/> | | | | | | |
| <u>MISCELLANEOUS CASH COST</u> | | | | | | |
| CI Promotion \$1/bale & .6% of value | 1.00 | \$/bale | 2.08 | bale/ac | 2.08 | |
| | 650.00 | \$/ac | 0.6 | % | 3.90 | |
| Pink bollworm | 1.75 | \$/bale | 2.08 | bale/ac | 3.65 | |
| National Cotton C. | 0.45 | \$/bale | 2.08 | bale/ac | 0.94 | |
| West. Cotton G. A. | 0.03 | \$/bale | 2.08 | bale/ac | 0.06 | |
| Classing | 1.00 | \$/bale | 2.08 | bale/ac | 2.08 | |
| TOTAL MISCELLANEOUS COST | | | | | 12.71 | 0.01 |
| <hr/> | | | | | | |
| TOTAL CASH COST | | | | | 816.52 | 0.82 |
| <hr/> | | | | | | |
| <u>DEPRECIATION</u> | | | | | | |
| Irrigation system | 300.00 | \$/ac | 16 | years | 18.75 | |
| 80 HP Tractor | 2.58 | \$/hr | 5.25 | hr/ac | 13.55 | |
| 130 HP Tractor | 4.75 | \$/hr | 1 | hr/ac | 4.75 | |
| Other Equipment | 100.00 | \$/ac | 10 | years | 10.00 | |
| <hr/> | | | | | | |
| <u>INTEREST ON INVESTMENT</u> | | | | | | |
| Irrigation system | 160.00 | \$/ac | 12.5 | %/ \$ | 20.00 | |
| 80 HP Tractor | 1.94 | \$/hr | 5.25 | hr/ac | 10.19 | |
| 130 HP Tractor | 3.56 | \$/hr | 1 | hr/ac | 3.56 | |
| Other Equipment | 50.00 | \$/ac | 12.5 | %/ \$ | 6.20 | |
| TOTAL NON-CASH COST | | | | | 87.04 | 0.09 |
| <hr/> | | | | | | |
| TOTAL COST OF PRODUCTION | | | | | 990.60 | 0.99 |
| <hr/> | | | | | | |
| CREDIT FOR SEED | 125.00 | \$/ton | 0.85 | ton/ac | 106.25 | 0.11 |
| <hr/> | | | | | | |
| NET COST OF PRODUCTION | | | | | 884.35 | 0.88 |
| <hr/> | | | | | | |
| PROFIT OR LOSS | | | | | -234.35 | -0.23 |
| <hr/> | | | | | | |