

## Cost of Producing Sugar Beets in Arizona

Dr. Scott Hathorn Jr., Extension Economist

Sugar beet production is concentrated in Maricopa and Pinal Counties where 94 percent of the 1979 crop was produced. Arizona produced 219,000 tons of sugar beets in 1979 on 11,400 acres with an average yield of 19.2 tons per acre. Compared with the 1972-76 five year average, 1979 production was down 29 percent and the yield declined 15 percent (see Table 1).

In 1980, the cost of producing an acre of sugar beets was \$629 and \$664 in Maricopa and Pinal Counties, respectively (see Table 2). The break-even price per ton for Maricopa production is \$25.26 in contrast with \$32.55 per ton for Pinal County production. The advantage of \$7.29 per ton in Maricopa County over Pinal County is largely accounted for by higher water cost in Pinal County.

Table 1. Sugar Beet Production Data for Arizona

County	1972-76 Average			1979		
	Acreage	Yield	Production	Acreage	Yield	Production
		(tons)	(tons)		(tons)	(tons)
Cochise	3,090	19.6	59,576	-	-	-
Maricopa	5,722	24.9	140,394	5,950	19.7	117,000
Pinal	2,840	20.4	57,588	5,000	17.8	89,000
Yuma	1,936	26.0	49,046	450	28.9	13,000
Arizona	13,660	22.6	307,800	11,400	19.2	219,000

Source: 1979 Arizona Agricultural Statistics.

Table 2. Projected Sugar Beet Production Costs in Selected Counties in Arizona, 1980

Item	Maricopa	Pinal
Seedbed preparation	\$ 27.00	39.00
Planting and cultivating	\$ 89.00	76.00
Crop irrigation	\$ 72.00	205.00
Chemicals and application	\$ 112.00	89.00
Harvest - post harvest	\$ 129.00	106.00
Overhead	\$ 200.00	150.00
Total cost per acre	\$ 629.00	664.00
Yield, tons per acre (1979)	24.9	20.4
Bread-even cost per ton	\$ 25.26	32.55
Variable cost per acre	\$ 452.92	494.73
Water cost per acre	\$ 58.00 <sup>a/</sup>	178.21 <sup>b/</sup>
Water cost per acre foot	\$ 10.55	31.45

<sup>a/</sup> Water supplied by Salt River Project.

<sup>b/</sup> Pump water (includes well depreciation, insurance, repairs, and energy).

Source: Yield data from 1979 Arizona Agricultural Statistics.

Cost data compiled from 1980 Field Crop Budgets for the Counties considered.

*Handwritten:*  
H<sub>2</sub>O