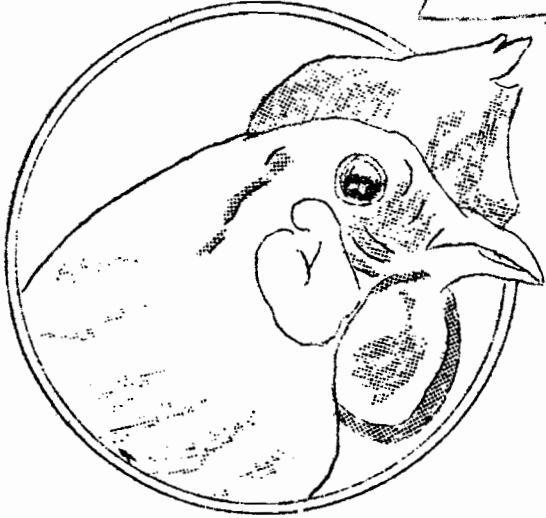


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POULTRY MANAGEMENT

COST STUDY

1959



**"GOOD MANAGEMENT
PAYS DIVIDENDS"**

UNIVERSITY OF CALIFORNIA
AGRICULTURAL EXTENSION SERVICE
RIVERSIDE COUNTY

TWENTY-FIRST ANNUAL
POULTRY MANAGEMENT STUDY
RIVERSIDE COUNTY

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INTRODUCTION

This is the twenty-first annual report of the Riverside County Poultry Management Cost Study. The study was conducted by the Agricultural Extension Service of the University of California in cooperation with interested poultrymen of Riverside County. The 1959 Management Study is based upon cost and production records from fourteen poultry enterprises.

The purpose of the study is to develop information pertaining to the most profitable management practices on commercial egg ranches in the County. The study should not only encourage poultrymen to keep more accurate production cost records but help them in analyzing their business to determine more efficient methods of operation. This, together with the opportunity of comparing costs and management practices with other co-operators, often brings about changes in management practices which result in greater returns to the producer.

A comparison and analysis of records in the following tables point up some of the reasons why some flocks were more profitable than others. More efficient management practices together with lower feed and labor costs paid off in 1959.

THE CHALLENGE TO EGG PRODUCERS

Poultrymen will long remember 1959 as an exceptionally poor year, profit-wise. In spite of this, some poultrymen did reasonably well. The explanation may be found in comparing and analyzing the 1959 management records. Total costs per bird were slightly lower in 1959 than in 1958. It cost 32.3 cents to produce a dozen eggs in 1959 compared to 34.2 cents per dozen in 1958. This was due to slightly lower feed costs the past year. You can still make some money in the egg business provided you cut production costs to the bone and follow good management. This was demonstrated by a few cooperators in the study who showed some management income last year.

POULTRY EGG PRODUCTION — OUTLOOK

The nation's laying flock is estimated to be three per cent smaller than a year ago March 1 and will probably continue to decline during 1960 according to U.S.D.A. reports. Egg production on March 1 was six per cent below the same period in 1959 and is expected to remain below production of a year ago with a tendency to decline seasonally. As a result, egg prices are likely to average higher during the last half of this year. However, the continued increase in rate of lay will tend to offset some of the expected drop in production.

Feed costs will probably be reasonably low, while egg prices will remain at lower levels than we have seen in recent years. On the other hand, egg production per hen is increasing, while egg consumption per capita has been decreasing. With this outlook and trend, egg producers have only one alternative and that is to cut production costs, maintain a high producing flock, and gear their operation to meet changing conditions.

TABLE I - INCOME AND EXPENSE PER HEN

| Serial No. | Income | | | | | Cash and Depreciation Cost | | | | | | Net Farm Income | Non-Cash Costs | | Total Cost | Management Income |
|------------|-----------|--------------|--------------|-------------------|--------------|----------------------------|------|-------|-------|--------------|-------|-----------------|----------------|------|------------|-------------------|
| | Egg Sales | Plytry Sales | Misc. Income | Stock Inv. Change | Total Income | Started Pullets, Feed | Chix | Misc. | Labor | Depreciation | Total | | Family Labor | Int. | | |
| 14 | 5.86 | .20 | .02 | .47 | 6.55 | 3.74 | .45 | .35 | -- | .33 | 4.87 | 1.68 | .71 | .17 | 5.75 | .80 |
| 19 | 5.93 | .22 | .07 | .06 | 6.28 | 4.06 | .37 | .23 | .19 | .20 | 5.05 | 1.23 | .73 | .21 | 5.99 | .30 |
| 2 | 6.96 | .19 | -- | .03 | 7.18 | 3.75 | .61 | .47 | .02 | .74 | 5.59 | 1.59 | 1.08 | .26 | 6.93 | .25 |
| 7 | 6.30 | .20 | .03 | .47 | 7.00 | 4.25 | .49 | .46 | .72 | .42 | 6.34 | .66 | .20 | .35 | 6.89 | .10 |
| 17 | 5.85 | .14 | .08 | .17 | 6.24 | 3.94 | .38 | .41 | .11 | .42 | 5.26 | .98 | .95 | .23 | 6.44 | -.20 |
| 6 | 5.74 | .21 | -- | .23 | 6.18 | 4.13 | .52 | .53 | .95 | .22 | 6.35 | -.17 | -- | .20 | 6.55 | -.37 |
| 22 | 6.26 | .37 | .03 | -.40 | 6.26 | 4.62 | .34 | .30 | .05 | .27 | 5.58 | .68 | .74 | .39 | 6.71 | -.45 |
| 4 | 5.12 | .22 | -- | .23 | 5.57 | 3.57 | .41 | .27 | -- | .16 | 4.41 | 1.16 | 1.28 | .33 | 6.02 | -.46 |
| 26 | 5.40 | .21 | .02 | .22 | 5.85 | 3.78 | .38 | .43 | .54 | .54 | 5.67 | .18 | .41 | .26 | 6.34 | -.48 |
| 1 | 5.36 | .16 | .06 | -.02 | 5.56 | 3.88 | .29 | .38 | .25 | .24 | 5.04 | .52 | .97 | .38 | 6.39 | -.83 |
| 18 | 5.73 | .19 | .02 | .03 | 5.97 | 4.51 | .45 | .32 | .02 | .17 | 5.47 | .50 | 1.44 | .14 | 7.05 | -1.07 |
| 16 | 5.09 | .30 | -- | -.02 | 5.37 | 4.35 | .50 | .39 | .08 | .47 | 5.79 | -.42 | .94 | .32 | 7.05 | -1.68 |
| 25 | 6.49 | .25 | -- | -.14 | 6.60 | 4.41 | .49 | 1.08 | .30 | .71 | 6.99 | -.39 | 1.34 | .29 | 8.62 | -2.04 |
| 24 | 5.74 | .23 | .03 | -.16 | 5.84 | 3.99 | .45 | .66 | .52 | .77 | 6.39 | -.55 | 1.11 | .44 | 7.94 | -2.09 |
| Avg. | 5.89 | .22 | .03 | .14 | 6.28 | 4.06 | .44 | .46 | .40 | .41 | 5.77 | .51 | .66 | .29 | 6.72 | -.44 |

Individual records are listed in the above table according to management income per hen which appears in the last column. Averages for the 14 flocks are shown at the bottom of the page.

Four flocks showed a management income ranging from a high of 80 cents to a low of 10 cents per hen while the average management income for all flocks was a minus 44 cents per hen. There were several factors partly responsible for this wide difference, but high egg production costs and reduction in brooding of replacement pullets together with lower rate of culling were important influencing factors.

TABLE II - FLOCK STATISTICS AND PRODUCTION FACTORS

| Serial No. | Ranch Size | Wire or Litter | Laying Flock | | | Price Per Cull Hen | Hours Labor Per Hen | Pounds Feed Per Hen | | | Feed Cost Per CWT | Egg Feed Ratio | Feed Cost Per Doz. | Feed-Egg Conversion | % Chick Mortality |
|------------|------------|----------------|--------------|----------|---------|--------------------|---------------------|---------------------|---------------|-------|-------------------|----------------|--------------------|---------------------|-------------------|
| | | | % Died | % Culled | % Added | | | Est. for Pullets | Est. for Hens | Total | | | | | |
| 14 | C | W | 8.5 | 73.5 | 89.7 | 27.7 | .5 | 22.4 | 90.4 | 112.8 | 3.28 | 9.5 | 19.9 | 4.7 | 15.5 |
| 19 | C | W | 11.4 | 77.2 | 87.5 | 29.3 | .7 | 21.9 | 102.0 | 123.9 | 3.27 | 8.9 | 19.9 | 4.9 | 13.8 |
| 2 | B | W | 3.7 | 71.1 | 100.4 | 26.9 | .7 | 25.1 | 103.9 | 129.0 | 2.91 | 10.7 | 16.8 | 4.6 | 5.3 |
| 7 | D | W | 19.9 | 75.1 | 141.7 | 26.9 | .6 | 35.4 | 95.3 | 130.7 | 3.26 | 9.2 | 20.2 | 4.5 | 6.0 |
| 17 | B | W | 10.0 | 68.8 | 115.1 | 20.7 | .7 | 28.8 | 93.7 | 122.5 | 3.22 | 9.3 | 20.1 | 4.7 | 9.1 |
| 6 | D | W | 8.2 | 75.6 | 92.7 | 27.2 | .7 | 23.2 | 103.5 | 126.7 | 3.26 | 9.2 | 21.6 | 5.2 | 5.2 |
| 22 | B | W | 6.1 | 117.8 | 122.8 | 31.0 | .5 | 30.7 | 103.5 | 134.2 | 3.44 | 8.7 | 21.8 | 4.9 | 4.3 |
| 4 | A | W | 11.6 | 81.8 | 90.3 | 29.6 | .9 | 22.6 | 80.7 | 103.3 | 3.29 | 9.7 | 22.4 | 4.7 | 9.8 |
| 26 | C | W | 6.9 | 77.4 | 83.1 | 27.4 | .8 | 20.8 | 91.3 | 112.1 | 3.37 | 8.9 | 20.8 | 5.0 | 11.5 |
| 1 | B | W | 8.1 | 72.0 | 100.5 | 23.8 | .9 | 25.1 | 89.5 | 114.6 | 3.38 | 8.6 | 20.7 | 4.6 | - - |
| 18 | B | W | 8.3 | 76.6 | 119.0 | 24.2 | .9 | 29.8 | 97.4 | 127.2 | 3.54 | 8.5 | 23.3 | 5.0 | 12.8 |
| 16 | A | L | 12.4 | 134.5 | 160.9 | 22.4 | .7 | 40.2 | 78.0 | 118.2 | 3.46 | 8.0 | 23.8 | 4.1 | 8.0 |
| 25 | B | W | 15.0 | 96.4 | 134.0 | 26.6 | 1.2 | 33.5 | 95.2 | 128.7 | 3.39 | 8.6 | 19.9 | 4.3 | 20.8 |
| 24 | C | W | 22.9 | 69.4 | 93.2 | 34.3 | 1.2 | 24.8 | 86.1 | 110.9 | 3.58 | 8.9 | 22.0 | 4.6 | 18.4 |
| Avg. | | | 11.6 | 79.9 | 107.6 | 27.4 | .8 | 26.9 | 95.0 | 121.9 | 3.31 | 9.1 | 20.7 | 4.7 | 9.6 |

A - below 2500 B: 2500-5000 C: 5000 - 10,000 D: 10,000 - 20,000

Hen mortality for 1959 was 11.6 per cent compared to 10.9 per cent in 1958. The rate of culling was 16.3 per cent below 1958 while the per cent of birds added to the flock was 3.3 per cent above 1958. The chick mortality was 9.1 per cent compared to 7.5 per cent in 1958.

TABLE III - EGG PRODUCTION AND SALES

| Serial Number | Wire or Litter | Eggs Per Hen | Per cent Prod. | Per Cent Market Eggs Sold | | | | Value Per Dozen | | |
|---------------|----------------|--------------|----------------|---------------------------|--------|-------|------------|-----------------|----------|-------------------|
| | | | | Large | Medium | Small | Commercial | Avg. Price | Net Cost | Management Income |
| 14 | W | 229 | 62.8 | 89.2 | 9.2 | 1.4 | .2 | 31.1 | 26.9 | 4.2 |
| 19 | W | 248 | 67.9 | 62.1 | 29.0 | 6.6 | 2.3 | 29.1 | 27.7 | 1.4 |
| 2 | W | 269 | 73.8 | 74.0 | 18.2 | 3.2 | 4.6 | 31.3 | 30.1 | 1.2 |
| 7 | W | 255 | 69.9 | 74.3 | 18.5 | 3.1 | 4.1 | 29.9 | 29.5 | .4 |
| 17 | W | 242 | 66.2 | 69.0 | 23.6 | 3.2 | 4.2 | 29.8 | 30.8 | -1.0 |
| 6 | W | 238 | 65.2 | 67.8 | 20.0 | 3.1 | 9.1 | 30.0 | 32.0 | -2.0 |
| 4 | W | 221 | 62.7 | 79.5 | 15.3 | 2.4 | 2.8 | 32.1 | 35.0 | -2.9 |
| 22 | W | 258 | 70.7 | 66.0 | 24.0 | 7.2 | 2.8 | 29.6 | 31.6 | -2.0 |
| 26 | W | 223 | 61.0 | 71.4 | 22.7 | 4.1 | 1.8 | 29.7 | 32.3 | -2.6 |
| 1 | W | 234 | 64.1 | 63.5 | 23.7 | 5.6 | 7.2 | 28.6 | 32.8 | -4.2 |
| 18 | W | 245 | 67.1 | 66.0 | 23.8 | 6.9 | 3.3 | 29.5 | 35.1 | -5.6 |
| 16 | L | 228 | 62.3 | 42.4 | 38.0 | 15.4 | 4.2 | 27.8 | 36.9 | -9.1 |
| 25 | W | 267 | 73.0 | 65.2 | 23.7 | .1 | 11.0 | 29.4 | 38.6 | -9.2 |
| 24 | W | 225 | 61.6 | 67.0 | 24.2 | 4.9 | 3.9 | 31.8 | 43.3 | -11.5 |
| Avg. | | 242 | 66.2 | 69.6 | 21.6 | 4.2 | 4.6 | 30.0 | 32.3 | -2.3 |

W - Wire floor (cage or community wire floor house).

L - Litter, floor house.

TABLE IV - SUMMARY OF RIVERSIDE COUNTY POULTRY MANAGEMENT STUDY SINCE 1950

| | 1950 | 1951 | 1952 | 1953 | 1954 | 1955 | 1956 | 1957 | 1958 | 1959 |
|----------------------------|------|-------|-------|-------|------|------|------|------|------|------|
| Number of Records | 25 | 19 | 22 | 20 | 23 | 28 | 20 | 17 | 16 | 14 |
| Average number of hens | 1237 | 1624 | 2158 | 2181 | 2805 | 2765 | 2693 | 3068 | 4444 | 5536 |
| Eggs per hen | 217 | 218 | 227 | 230 | 234 | 234 | 232 | 232 | 230 | 242 |
| Per cent hen mortality | | | | | | | 10.5 | 10.1 | 10.9 | 11.6 |
| Per cent chick mortality | | | | | | | 4.5 | 7.3 | 7.5 | 9.6 |
| Per cent culled | 97 | 87 | 94 | 92 | 96 | 87 | 94 | 74 | 90 | 80 |
| Per cent added | | | | | | | 121 | 101 | 104 | 108 |
| Hours labor per hen | 1.7 | 1.6 | 1.3 | 1.4 | 1.1 | 1.1 | 1.1 | .9 | 1.0 | .8 |
| Pounds feed per hen | 142 | 147 | 142 | 144 | 133 | 130 | 130 | 120 | 122 | 122 |
| Pounds feed per dozen eggs | | | | | | | 5.0 | 4.9 | 5.0 | 4.7 |
| Feed cost per 100 lbs. | 4.04 | 4.29 | 4.53 | 4.10 | 3.92 | 3.77 | 3.66 | 3.49 | 3.47 | 3.31 |
| Feed cost per dozen eggs | | | | | | | | | | 20.7 |
| Average price of eggs | 44.4 | 53.4 | 47.9 | 52.7 | 36.4 | 42.6 | 36.2 | 35.8 | 36.5 | 30.0 |
| Net cost per dozen | 41.5 | 44.0 | 43.9 | 41.2 | 36.4 | 36.4 | 34.2 | 33.2 | 34.0 | 32.3 |
| Mgt. income per dozen | 2.9 | 9.4 | 4.0 | 11.5 | - - | 6.2 | 2.0 | 3.1 | 2.5 | -2.3 |
| Total income per hen | 9.68 | 11.79 | 10.29 | 11.48 | 7.77 | 9.08 | 8.03 | 7.44 | 7.77 | 6.28 |
| Total expense per hen | 9.15 | 10.05 | 9.53 | 9.28 | 7.78 | 7.90 | 7.63 | 5.53 | 5.81 | 5.77 |
| Farm income per hen | 2.42 | 3.68 | 2.30 | 3.68 | 1.01 | 2.46 | 1.81 | 1.91 | 1.77 | .51 |
| Management income per hen | .53 | 1.74 | .76 | 2.20 | -.01 | 1.18 | .40 | .59 | .44 | -.44 |
| Egg-feed ratio | | | | | | | 9.8 | 10.3 | 10.5 | 9.1 |

Pounds of feed per hen includes feed consumed per layer plus twenty-five (25) pounds for each pullet replacement.

DEFINITIONS AND EXPLANATIONS OF TERMS

TOTAL INCOME is composed of returns from the sale of eggs, poultry manure, and other miscellaneous incomes; value of eggs eaten in the home and the net increase in the poultry stock inventory.

TOTAL EXPENSE comprises costs of all feed, chicks or poultry bought, hired labor, and other cash items. Value of family labor, depreciation on buildings and equipment, and interest on investments as taken from Internal Revenue report.

FARM INCOME - Total income minus cash and depreciation costs not including family labor and interest on investment as expenses.

MANAGEMENT INCOME - Total income minus total expense including family labor and interest on investment as expenses.

CHANGE IN STOCK INVENTORY is the change in value of poultry stock on hand at the beginning and end of the year.

AVERAGE NUMBER OF HENS is the average number of hens in the flock for the year. It is obtained by dividing the number of hen days for the year by the number of days in the year.

PER CENT MORTALITY is the per cent of the average number of hens that died during the year. It is obtained by dividing the number that died by the average number of hens.

PER CENT CULLED is the per cent of the average number of hens that were sold and eaten in the home during the year. The per cent is obtained by dividing the number disposed of in this manner by the average number of hens.

PER CENT ADDED is the per cent of the average number of hens which were actually added to the flock during the year. To obtain the per cent, divide total additions to flock by average number of hens. Pullets were added at twenty-four (24) weeks.

FEED CONVERSION is the pounds of feed to produce a dozen eggs.

EGG-FEED RATIO - Pounds of feed that can be purchased with one dozen eggs.

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