

Treatments at 120° F for 15 min. were the least injurious of this group, as shown in the table.

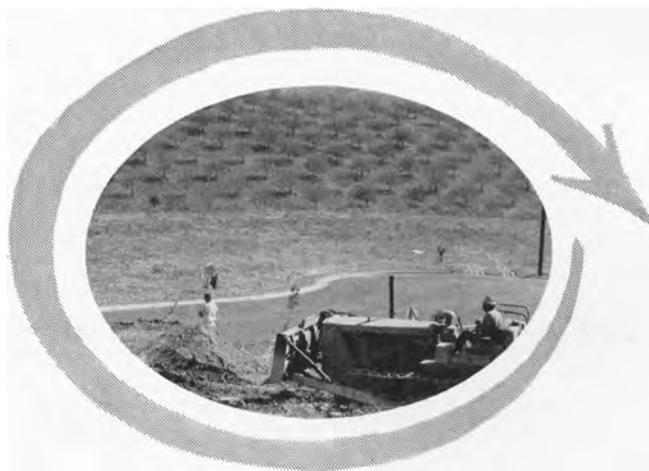
Mortality rate

Information obtained from this experiment and confirmed by hop growers indicates that the mortality rate of untreated hop rhizomes is between 10 and 15 per cent. The highest mortality observed in the treated rhizomes occurred at 135° F for 2 min. With this treatment, 63 per cent of the treated rhizomes failed to grow. With the 127° F for 4 min. treatment, a 44 per cent mortality was observed. The mortality rate among the other treatments was considerably lower: 118° F for 30 min. and 120° F for 15 min.—18 per cent; 130° F for 3 min. and check—12 per cent; 122° F for 10 min. and 125° F for 5 min.—6 per cent. The latter four conformed to the expected mortality rates observed in untreated field plantings with rhizomes.

A hot water treatment for hop rhizomes may be selected of 122° F for 10 min.; 125° F for 5 min. or 130° F for 3 min., according to these tests. These treatments were equally effective and showed no injury at either the .05 level of significance or at the .01 level of significance. Of these three, the 130° F for 3 min. treatment is probably the least desirable. A high temperature and short period of exposure allows the least margin of error. The desirable hot water treatment should combine low temperature and a long period of exposure. In this experiment, either 122° F for 10 min. or 125° F for 5 min. treatments would allow for a greater margin of error and are therefore more desirable.

Preplanting fumigation and subsequent planting with nematode free stock is now possible. Treatments with dichloropropene-dichloropropane mixture at rates of 20 gpa, 40 gpa and 60 gpa have been successful for nematode control in hop yards. Pretreatment sampling indicated an average population of two root-knot larvae per cc of soil and one dagger nematode per cc of soil. Three and one-half months after treatment (at all dosage rates) root-knot larvae and dagger nematodes could not be recovered either by the Baermann funnel or by wet screening. Eight months after treatment root-knot and dagger nematodes were recovered from the 20 gpa plots but not from the other treatments.

A. R. Maggenti is Lecturer and Assistant Nematologist in the Experiment Station, Department of Nematology, University of California, Davis.



The Econo FARM

Urban and suburban areas are moving closer to many California farms. More people create additional trouble and expense that may cause the farmer to consider selling and either moving to a new location or using the money to invest in other businesses. Any farmer facing such a decision should know the facts about relocation—how much his land is worth, how much actual profit he can make from its sale and how to go about the complicated process of selling.

THE INFLUX of additional people to a farming area creates several kinds of problems for the farmer. Costs are higher; taxes, water, and labor all take a larger share of the farmer's sales dollar. Too many people are a nuisance for the farmer; they complain about noise and dust, and sometimes trespass or pilfer his crops. Cars and factories bring smog which lowers his yields. Finally, the farmer finds himself cramped, unable to expand into additional acreage. All of these problems add up to a lower return on the farmer's investment.

Should a farmer faced with these problems relocate his farm? The economic time to relocate is when the returns on the value of the present operation become less than the returns which could be obtained if the money were invested in some other location or enterprise. In other words, a farmer should relocate if the money invested in his farm could be earning more at another location.

The first step for any farmer planning to relocate is to find out what his property is worth in its present use—what we shall call the agricultural value of the property.

Here are the steps for determining agricultural value.

Gross annual income

First, determine the gross annual income from the farm. Consider, for example, a 10-acre farm in floriculture producing Colum stock at the rate of 850 bundles per acre, or 8,500 bundles per year. If Colum stock sold for \$1.40 per bundle, the total income would be \$11,900; that is, production times price.

Then determine the expenses of production for one year. Include all cash costs; include the value of work done by the owner and his family; and include the interest and depreciation on equipment which would be taken along if the farm was relocated. If the farm is to remain at its present location for at least five more years, include the depreciation on fixed facilities such as buildings and irrigation systems. Do *not* include interest on the real estate.

To continue the example, let's assume that the total annual expenses on the Colum stock farm are \$9,000. Next, subtract the total annual expenses from the

mics of **RELOCATION**

gross income to find the net return from the land for one year. The net return from the 10 acres on the Column stock farm would be \$11,900 less \$9,000, or \$2,900.

Agricultural value

This net return can be thought of as the annual interest that the land is paying on its total agricultural value. To determine the agricultural value of the land, the farmer must decide what the interest rate on his land should be. In other words, what percentage of its total value the land should be paying each year. Finally, divide the net annual return by this percentage to find the agricultural value of the land. If the interest rate for the 10-acre Column stock farm is 6 per cent, the agricultural value of those 10 acres is \$2,900 divided by 6 per cent, or \$48,333.

After determining the agricultural value of the land, the next step is to figure out how much cash would be left to reinvest if the land were sold. To find this, subtract from the gross sale price (the total amount the buyer pays for the land) three deductions: the real estate commission (5 per cent), the capital gains tax (25 per cent of the taxable gain), and the cost of moving to a new location.

Assume that the owner of the 10-acre Column stock farm in the previous example is offered \$150,000 for his property. Five per cent of that money, \$7,500, would be paid to the real estate agent as his commission.

Taxable gain

The owner will also have to pay a capital gains tax of up to 25 per cent on the taxable gain from the sale. Taxable gain is defined as the gross sales price less

the real estate commission, the original purchase price of the land, the value of the owner's dwelling on the land, and the undepreciated value of other improvements made on or to the land.

The real estate commission on the Column stock farm as already mentioned, would be \$7,500. The original purchase price of this land was \$10,000; the value of the dwellings, another \$10,000. The undepreciated value of other improvements to the land, perhaps an irrigation system or an asphalt driveway, could be estimated at \$2,000.

These four expenses, which total \$29,500, are not part of the taxable gain. They are, therefore, subtracted from the gross sales price to determine the taxable gain: \$150,000 less \$29,500 or \$120,500. The owner of the Column stock farm must pay up to 25 per cent of this amount, \$30,125, as capital gains tax. Finally, the owner must pay the cost of moving, perhaps another \$2,000.

The three expenses to be subtracted from the sales price of the Column stock farm—the real estate agent's commission, the capital gains tax, and the cost of moving—total \$39,625. The net return to the farmer for the sale of his land would be the \$150,000 he was offered for the land less the \$39,625 of expenses involved in selling it or \$110,375.

Cash value

This \$110,375 is the cash value to the farm operator of the 10 acres of land. The agricultural value of the land was estimated above as \$48,333. From a strictly economical standpoint, therefore, the land is worth more to the farmer as cash than as soil upon which to raise his crop. The farmer may, therefore, decide to accept the offer and relocate his farm.

If the farmer decides to relocate, he will then have to determine the best method of selling his present property. The simplest method is an outright sale. The cash is received in a lump sum, and the new owner gets immediate title to the land. This method has the advantage of placing all of the money from the sale immediately at the farmer's disposal to buy new land or to invest in some other business. However, a large part of this money may go for income taxes since the total purchase price must be considered as income for the year during which the purchase was made.

Sales contract

Another method of selling property is to make a sales contract with the purchaser. He agrees to pay over a period

of years and the seller agrees to give him title to the land after payments are completed. This method of selling has a tax advantage. If the payments during the first year are not over 30 per cent of the total purchase price of the property, each payment can be treated as income for the year during which it is received. Taxes on the income from the sale are usually lower than taxes on the lump sum.

Instead of selling his farm, the owner may trade it for another farm. There is no income tax on property traded for like property. If the farmer is lucky enough to find another property owner willing to make such a trade, he may avoid a sizable tax burden. Of course the new property must have the conditions necessary for economical farm production.

Any farmer moving to a new location should be sure that the new location will give him the best possible return on the money he invests. The climate should be suited to farming his particular crops. Enough good-quality water should be available. The farm should be large enough to permit economies of scale: efficient use of farm machinery, a constant supply of flowers, shipping in truck-load lots. Finally, transportation facilities should be adequate and close by to provide economical marketing.

Sale preparations

Certain preparations are necessary when contemplating the sale of a farm. A title report may be needed and it may be desirable to clear up any clouds to title. A map should be prepared showing the boundary lines and topography of the property as well as an area map showing prices, zoning and planning for at least a mile around the property. The area map should include the location of utilities and drainage facilities.

Finally, the farmer should study and accept the complex process of making a deal, including the real estate contract and escrow proceedings. He should understand the problems that will confront him as a seller: the taxes he must pay on income from the sale; various possible types of land ownership such as joint tenancy and tenancy in common; and the different uses to which the proceeds from the sale may be put.

The decision to relocate a farm should be based on a clear understanding of the economics of relocation. The farmer should be sure that relocation will increase the income from his land.

A. D. Reed is Extension Economist, Agricultural Extension Service, University of California, Davis.