HOW DAIRYING PAYS

Marketed Product for the Year Realizes $3,597,000—Income From Milk and Cream

OREGON'S dairy industry brought to the producers in the past year about $3,600,000. This does not include the entire production, but only that part of it which was actually put on the market. That used in the families of the producers or fed to the farm animals is excluded from this estimate. And the estimate of value is not based on the retail price of the articles but upon the producers' selling price. The items are as follows:

Creamery butter, 4,000,000 pounds, 22½c	$ 900,000
Dairy butter, 3,500,000 pounds at 18c	630,000
Cheese, 2,225,000 pounds, at 12c	267,000
Milk and cream	1,800,000
Total	$3,597,000

About half the income was from the raw milk and cream and half from the manufactured products. The State Dairy and Food Commissioner estimates from reports made to him (which the law directs to be held secret) that the production of butter and cheese has increased 50 per cent in the past two years, and it is still advancing at a rapid rate.

There are about 300 creameries and cheese factories in the state, nearly all of them west of the Cascade Mountains. The creameries number about twice as many as the cheese factories. There is official record of 141 creameries and 174 cheese factories, but these establishments have been springing up so rapidly that the Commissioner says he has not been able to keep track of all of them, and he estimates the total number at 300. The Pacific Coast counties are far in the lead in the production of cheese, 52 of the factories being located in that section of the state, 37 of them in the one County of Tillamook. Tillamook County also has more creameries on record than any other county in the state, 34, while Multnomah County follows with 25. The second cheese-producer is Coos County, which has nine factories. Clatsop has five and Multnomah four. Washington County is third in the number of creameries, with 15, Coos fourth with 12, Clackamas and Linn have nine each, and Clatsop seven. The others are scattered through the counties of Western Oregon, except eight creameries and one cheese factory east of the mountains. Malheur County has one of those creameries, Umatilla three, Baker two and Union two creameries and the cheese factory. These are the figures shown by the records of the State Dairy and Food Commissioner. About 33 per cent may be added to arrive at the whole number of these establishments in operation in the state.

While the dairy industry is flourishing in Oregon, the demand for dairy stock in other localities is so great that about 1000 dairy cows have been sold from the Willamette Valley in the year. Of course this does not represent the natural increase, but it shows that the industry would grow faster here if our stock were not held in such high esteem elsewhere. Western Oregon being pre-eminently a dairy country, it goes without saying that the milk breeds of cattle are more valued here than the beef breeds, although both are common. There is, however, a very good and popular practice which follows the rule of using only the dual-purpose breeds—like the Red-Polled and the milk type of the Shorthorns—excellent milkers and good beef-makers. But where dairying is carried on as a specialty on the basis of high-priced land, where the intensified system is employed, the best results are attained by using the strictly milk breeds, though there is naturally a good deal of loss connected with the product of males, which, when not wanted for sires, are almost worthless. They come to nothing in size, are hard to prepare for the block, and even when fat make poor beef.

But for dairy purposes the exclusive milk breeds, the Jersey being pre-eminent among them, will bring results which cannot be attained by any other stock. This has long been understood in Western Oregon, and with the revival of the creamery here there has been an enormous increase in Jersey blood. In truth, the Jersey grade is now almost universal in the Willamette Valley and in the Coast counties and Southern Oregon, and three out of every five animals seen by the roadside betray by form or markings some relationship to the Jersey family. The Jersey, while the standard dairy cow, is far from being the greatest milk-producer in point of quantity, being excelled in this respect by other breeds, very notably the Guernseys, which are strong on quantity and short on butter-content. But there are conditions under which this is a very positive advantage. The condensed milk factory, for example, prefers much milk to very rich milk, and if the business of condensing, just now being introduced here, should attain a great development, it would surely make a demand for the product of these large milkers.

Many causes have combined to bring about the recent activity in dairying. The active market for dairy products—not yet adequately supplied—has, of course, been the basis of it, for nothing can be done in any line without a market. The careful instruction in methods by the State Agricultural College has been an important factor. Another tremendous promoting cause has been the helpful attitude of the Southern Pacific Company. The railroad has given rates that have encouraged the importation of pure-bred stock, and it has also so arranged its schedules that shipments of milk to distant creameries can be made at a profit. This has been a great factor in building up the creamery business in the Willamette Valley, for it was difficult to get a local supply of milk sufficient to warrant investment in creameries before their advantages had been proved.

The market for Oregon butter and cheese has been largely in California. The coast counties have large trade connections with San Francisco, and there is always an eager demand at the south for the Oregon product.

J. W. Bailey, State Dairy and Food Commissioner, has just made his report for the year 1902, and from it the following is taken, being a summary from the official point of view:

"During the past two years this state has forged ahead in her dairy interests beyond all belief. Oregon butter and Oregon cheese are in favor wherever they are known, and the market for both has been very satisfactory. California has drawn on us largely for cheeses, paying from 2 to 5 cents more than for its own. Our butter finds a ready sale along the Alaskan coast and the conditions are such that the market is most active at that season of the year when it can be produced at the least cost, namely, May and June. It is at this time of the year that the steamers are leaving Portland for the north, and so far all the surplus and available butter goes north at that time.

"It is safe to say that the conditions are such that the producer of dairy products has secured from 5 to 7 cents more for his goods than in any other state in the Union. The facilities for cold storage in Portland are excellent, and when prices are low dealers can place their goods in cold storage until such time as best suits their convenience to sell. Oregon butter and cheese makers are adopting the most advanced and scientific methods, and these producers are putting Oregon dairy products on the same level with Oregon wheat, the best in the world.

"The law passed by the last Legislature requiring that all butter sold in the state representing to be two pounds shall contain 32 ounces full weight, has proved to be most satisfactory, not only to the consumer but to the manufacturer and dealer, and with but few exceptions the creamery men have put their butter upon the market in accordance with the law. There are some, however, who show a disposition to evade it by putting it up light weight and marking it, so as to be hardly seen, 28 ounces, full weight.

"Something more than two years ago I began an active campaign for a condensed milk plant in this state, and after two years of hard work along this line I am pleased to report that two are now under construction. One of them is located at Forest Grove, and is being put up by the Pacific Coast Condensed Milk Company, and will cost when complete something like $40,000, and will have a capacity for from 50,000 to 100,000 pounds per day. What this will mean to the state only time can tell, but its benefit will be wide and far-reaching. Another plant is being erected at Hillsboro by Dr. J. P. Tamiesie. At present, this is more of a private enterprise, but no doubt will grow and expand into one of large proportions.

"So rapid has the increase of creameries been that it has been almost impossible to keep pace with them. They have sprung up all over the state, and while our law requires that all such creameries apply to the State Dairy and Food Commissioner for plate or stencil, giving the name and place of the manufacturer, together with the state number, there are very many who have not done so, owing to the fact that the law has been but recently passed, and many are not familiar with it.

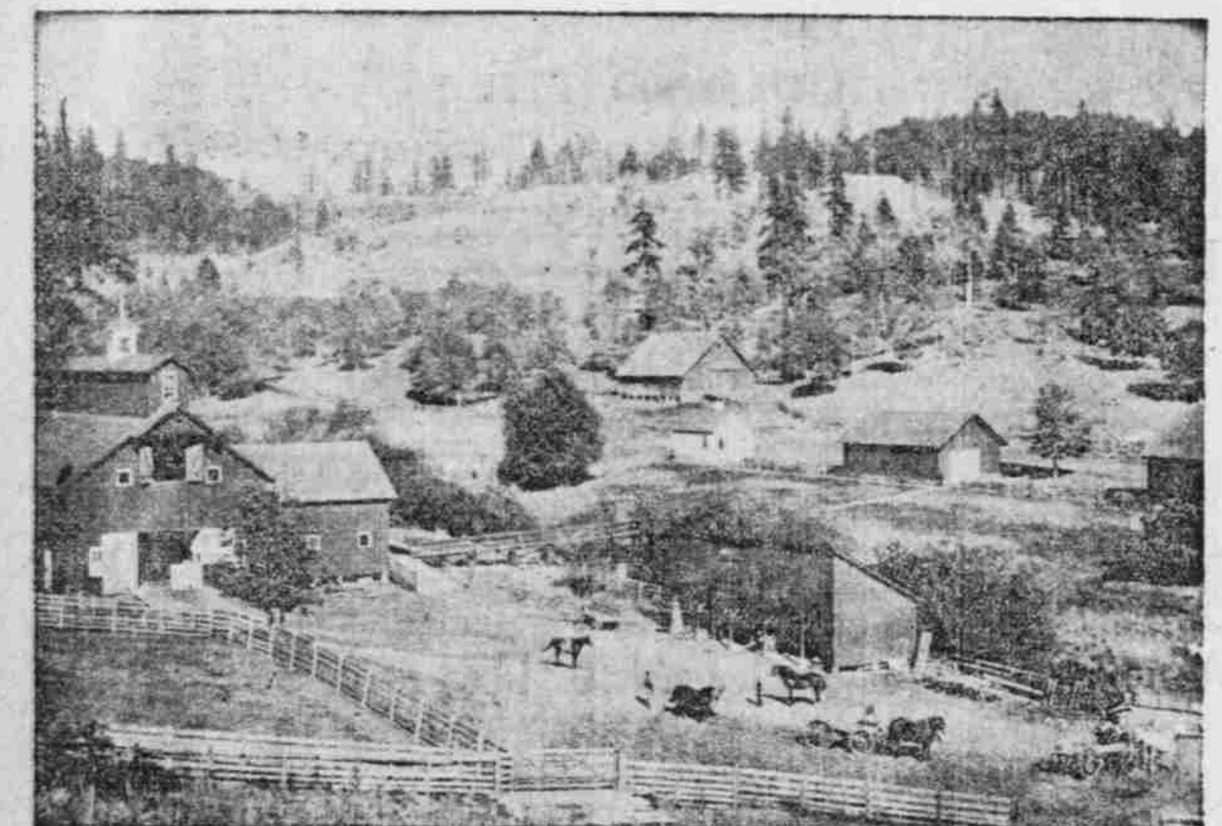
"The output of butter and cheese in the past two years has increased, according to the best information obtainable, about 50 per cent. Most of the larger creameries and cheese factories have made their report, but generally with the request "not to publish." From their figures and from other sources I have reached the above conclusion. The creameries will, during the past year, have made about 4,050,000 pounds of creamery butter and about 3,500,000 pounds of dairy butter, and the cheese factories 2,250,000 pounds of cheeses. The supply of dairy or store butter is constantly on the decrease, owing to the system of hand separators and the easy method of getting their cream to the creameries.

"At the present time there are about 200 dairies that furnish Portland with its milk supply for this purpose, and it takes 4000 cows to furnish this supply.

"The improved breeding of dairy cows has kept pace with the dairy industry, and dairymen have been liberal buyers of the most improved breeds, gradually improving their stock, so that the dairy stock of this state will compare favorably with those of any other section."

Market for Export Trade.

In the Oriental countries today within easy reach of export trade from the Pacific Coast ports are 600,000,000 people. The natural supply point for many of the staples of life required by this vast population is found in the productive field of the United States. The natural points of debarkation for this foreign export trade from the United States are the ports on the harbors of the Pacific Coast.—Oregonian Handbook.



A TYPICAL FARM HOME IN THE WILLAMETTE VALLEY. Photo by George M. Weister.

WEALTH IN DAIRYING.

Dairy products can be produced at a less cost in Oregon than in any other place in the world, according to Professor G. L. McKay, of the Iowa Agricultural College, who spent a year in Europe as a specialist from the United States Department of Agriculture for the purpose of studying dairying conditions. The market for dairy produce is almost unlimited. Oregon butter and cheese find a ready sale in the home market, which usually requires more than this state can supply. If the home demand be filled, the surplus finds a market at good prices for shipment to Alaska, Japan or other Oriental countries.

The advantages Oregon has in dairying lie in the absence of extremes of climatic conditions, the long period during which green feed may be had, and the wonderful productivity of Oregon soil when sown to forage plants. Grass is green in Western Oregon all Winter, and snow lies on the ground scarcely more than a week at a time. There is no hot season in the Summer such as prevails in the Eastern states. Clover produces better in Oregon than in any other state in the Union.

Production of pork is an industry that is closely related to dairying, for hogs are fed in part upon the waste products of the dairy. In this industry also Oregon has an advantage, for this climate is ideal for the growing of barley and peas, which make the best of bacon pork.

GOOD MONEY IN FRUITS

Harvest for 1902 Realizes to the Growers Over $2,000,000—Near a Banner Crop

HOOD RIVER, Or., Dec. 24.—Our fruit harvest, in 1901, was a record-breaker, and approximated in value $2,375,000. We did not do quite so well in 1902, solely for the reason that our prunes and cherries were but little above a half crop. France fared worse, and her prune harvest was practically a failure. This deficiency gave us a strong market, and made up in part for the lessened yield.

From the best available data collected by the Commissioners of the State Board of Horticulture, in their respective districts, we estimate the value of Oregon fruits and fruit products for the year 1902 at $2,229,000, falling but little below the banner crop of 1901. The grand total is made up of the following items:

Apples	$680,000
Apples, cured, manufactured into cider and vinegar	100,000
Prunes, cured	520,000
Prunes, fresh	15,000
Peaches	92,000
Peaches, cured	10,000
Pears	90,000
Pears, cured	10,000
Grapes	48,000
Small fruits	470,000
Cherries	33,000
Strawberries	162,000

Oregon is divided into five horticultural districts, three west and two east of the Cascade Range of mountains. The reports of the commissioners afford striking evidence of the adaptation, for fruit-growing, and the wide distribution of orchards over a large portion of the state.

A comparison of values of the horticultural products of the different portions of the state may be of interest. The first horticultural district embraces that portion of the state north of Marion County and west of the Cascade Range. The second district comprises the Counties south of Clackamas and north of Douglas County, in Western Oregon, also. The third district embraces that section south of Lane County to the California boundary, and also includes Klamath and Lake Counties, east of the Cascade Range. The fourth district is in Eastern Oregon and includes the Counties of Wasco, Gilliam, Morrow, Sherman and Crook. The fifth district embraces the rest of the state, in Eastern Oregon, and is of immense area, some 30,000 square miles. The value of the current year's fruit production in these respective districts is as follows:

First district	$475,000
Second district	415,000
Third district, 1901-2	703,000
Fourth district	450,000
Fifth district	300,000

Jackson County, in the southern portion of the state, leads in the production of apples, peaches and pears; Douglas and the Central Willamette section are great prune centers; Wasco is first in small fruits, with Multnomah a close second. Cherries grow to a size unknown elsewhere in the Willamette Valley, and the tender European grapes attain perfection in Southern Oregon and along the Columbia and Snake Rivers in the eastern part of the state, while the native varieties thrive in the cooled Willamette section.

The Grand Ronde Valley, in Union County, is rapidly increasing the area of its orchards, and here, owing to its late blossoming, the cherry is considered a certain crop.

The elevated plateau of Southeastern Oregon, some 4000 feet in altitude, produces excellent apples in the vicinity of its numerous lakes, especially in Lake and Klamath Counties.

The Yellow Newtown Pippin stands at the head of more than 5000 varieties of apples. It grows to perfection only in a few localities in the United States, notably in portions of Virginia, along the Hudson River, in Pajaro Valley, California, and in Southern and Eastern Oregon. During the past season I saw this splendid fruit, on thrifty trees, in the valleys of the upper John Day River, in Grant County, and a little later selected fine specimens from the apple bins of Douglas County, points nearly 400 miles apart. Jackson County leads in the production of this valuable apple, and Hood River Valley grows a lesser quantity, but of unsurpassed quality. I emphasize the fact that the possibilities for producing apples, prunes, pears and cherries of the highest quality in Oregon are practically unlimited.

It is, indeed, true that some portions are better adapted for fruit-growing than others, but there is not a county in the state but what can grow an orchard.

New orchards are being planted, especially in Southern and Eastern Oregon, and the nurseries are bare of leading varieties. It is, indeed, satisfactory to learn that only a few kinds, and those of highest quality, are being grown, for Oregon, in the past, has suffered greatly from growing too many varieties and of every grade as to quality.

During the past three years methods of cultivation have wonderfully improved, the power sprayer has become common and the entire business of growing, packing and marketing systematized. The fruit industry, however, is yet in its infancy in Oregon and the amount we produce seems trifling in comparison. We have at this date only some 60,000 acres of commercial orchards of all varieties of standard trees, while the Province of Ontario, in Canada, reports 500,000 acres in orchards, with 7,000,000 trees over 15 years of age. Coming a little nearer home, we cite the Pajaro Valley, comprising a portion of two counties in California. In this valley are found nearly 900,000 apple trees, of which 400,000 are Newtown Pippins. It produces 1,500,000 boxes of fruit, and bearing orchards are valued from $500 to $1000 per acre. At Watsonville, the commercial center of the valley, $1,000,000 is disbursed for a single crop.

Immense orchards are being planted in the Middle West, in Kansas, Missouri, Colorado and other states, and there is a natural inquiry as to the probable condition of the markets when these millions of trees come into bearing. Only a small percentage of trees planted live to bear marketable fruit; want of proper care, unsuitable location, disease, insects and rodents claim their share, and the fruit itself will be attacked by scale, moth and fungi, so that the production of clean, perfect fruit will be small, indeed, compared with orchard areas. All these adverse conditions are market regulators and bring a greater reward to the vigilant, intelligent grower.

At the Columbian and Pan-American Expositions, I scrutinized critically the deciduous fruits exhibited, and the brightest, highest-colored, cleanest and most perfect apples I saw there were grown in Oregon, Washington and Idaho. It is in evidence, also, that our fruits at Buffalo and Charleston were awarded more gold medals than those of any other state and more than were awarded to all other Oregon exhibits combined.

The consumption of fruit is rapidly increasing. Europe annually calls for larger quantities; transportation facilities are rapidly being improved and freight tariffs lessened, and yet our orchards occupy but one-tenth of our lands adapted to successful horticulture.

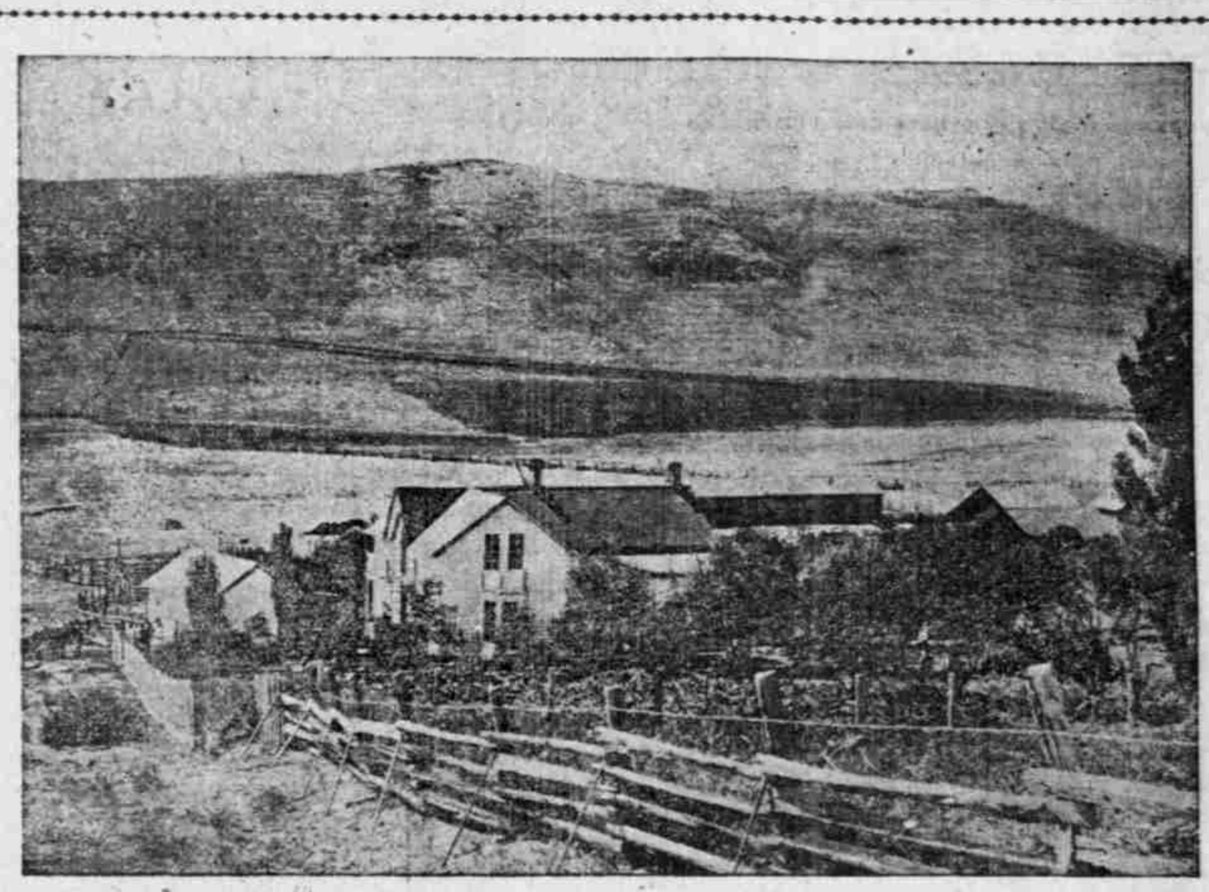
E. L. SMITH.

Great Area Drained.

The Columbia River drains an area of 245,000 square miles—an area equal to the six New England States, New York, Pennsylvania, New Jersey and Maryland combined. All this vast area is naturally tributary to Portland.

Its Significance.

The Lewis and Clark Centennial will signalize a movement, which has followed the western sun from the dawn of history.



A TYPICAL FARM HOME IN SOUTHERN OREGON. Photo by George M. Weister.

A TYPICAL HERD OF CATTLE ON ONE OF THE FARMS OF OREGON

THE BUTTER, CHEESE AND MILK OUTPUT OF OREGON IS NEAR $4,000,000 ANNUALLY, AND THE INDUSTRY IS GROWING RAPIDLY.