

## DAIRY HINTS.

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U. S. Baer, Ass't Dairy & Food Commissioner, Madison, Wis.

Wisconsin takes a high rank among the foremost dairy states of the Union. She is conspicuous for the production of both cheese and butter. She contains the greatest number of cheese factories and creameries combined of any state in the Union, has the largest number of cheese factories, ranks second in the number of creameries and second in the quantity of cheese produced. Wisconsin today produces more than one fourth of all the cheese made in the United States. Our nearly 1700 cheese factories made approximately 100,000,000 pounds of cheese last year, of which about 70,000,000 was American Cheddar and some 30,000,000 of Swiss, Brick, Limburger and other varieties.

A very large proportion of our factory make of cheese is not of a true clean flavor and it is safe to assert that over 75 per cent of all the imperfections in our cheese products are caused by bacteria ferments, the source of which is traceable directly to carelessness and unclean practices in the stabling, handling and milking of the cows and in using unclean milking utensils.

A large proportion of the faulty milk is mixed with the better milk at the factory and thereby all of it is contaminated, making it impossible to turn out a perfect product. It is clear that the patron who delivers clean milk needs protection against his neighbors whose dirty milk goes into the same cheese vat or kettle and the consuming public needs protection against contaminated dairy products.

The patrons of the factories of this state have a direct financial interest in supplying only good, pure milk, free from taints or bad flavors. The greatest amount of care and skill with which the factory operator may do his work will not enable him to make a superior quality of cheese or to secure the largest yield of it from milk which is not in good condition. Whenever a patron delivers tainted or sour milk to the factory, it means a direct loss of dollars and cents to him and his neighbors associated with him and is an imposition upon the consuming public. If a factory of 10,000 pounds of milk per day accepts three or four cans of sour, tainted or gassy milk, at the very lowest estimate it will take one pound more milk to make a pound of cheese than if all the milk had been sweet, clean and well flavored. Suppose cheese to be worth 10 cents per pound, the loss to the patrons in this case would be \$8.00. In 30 days the loss sustained would reach the sum of \$240.00. Not only is the quantity affected, but the quality of our cheese is impaired and its market value diminished by every can of tainted or defected milk accepted at the factory intake. That cheesemaker does not exist who can make a first class product from unclean milk. If extra or even good cheese products are to be made, the milk supply of our factories must be obtained from healthy cows, fed on pure food and kept in clean stables. It must not readily undergo fermentation and it must be clean.

In cheese, flavor is the quality most noticed by the consumer and hence is of first importance in market demands. Good flavor in milk, cream, butter and cheese insures a ready market at remunerative prices; poor flavor condemns them and no one seeks them at any price.

There is no question but that the value of our cheese products would be enhanced to the extent of many thousands of dollars a year if all of the milk delivered to our cheese factories were uniformly clean and sanitary. The value of milk when it is delivered to the factory depends largely upon the care it has received previous to delivery and its

condition with reference to cleanliness as well as its fat content, influences the quality and quantity of the products made from it. Cleaner methods in our dairies are of the greatest importance to the success and reputation of Wisconsin dairying.

It is to the financial interest of every patron of a cheese factory that the milk delivered shall be the best and purest that can be produced. The man who increases his monthly check by skimming or watering his milk, is stealing that amount from others to whom it belongs, but that man who delivers contaminated milk to a factory does infinitely worse, as his milk will injuriously affect the entire production of the day and thus decrease the returns to every patron and rob the consuming public of a clean and wholesome product.

The losses in this state caused by taints or changes in the milk due to the lack of proper knowledge or neglect and carelessness are enormous as compared with the losses caused by skimming or watering. Butter and cheesemakers should absolutely refuse to accept milk tainted or unfit for use; they should do this in justice to themselves and to patrons who deliver good milk and in obedience to the laws of the state.

The greater part of our cheesemakers are of a progressive nature and seem to realize the fact that their business is one in which any circumstance tending to throw any additional light upon their work is not to be disregarded. However, we occasionally encounter that maker who has (unfortunately for him) reached the top round of the ladder. That is he gives you to understand that what he does not know about the business is not of sufficient importance to admit of discussion.

Recently I inspected a cheese factory which in its surroundings gave the impression that the swine had been making the pools of whey and slop-water underneath the factory floors sort of headquarters for some time. Filth had accumulated everywhere. The maker immediately began

to complain of his milk supply, saying that his patrons did not keep their cans clean and that the milk was very seldom delivered in first class condition. He gave me to understand that he had made cheese for nearly fourteen years and had learned how to make fine cheese from very bad milk but could not accomplish this feat with the rotten stuff such as he had been getting all the fall and winter.

In order that a maker of this stamp may rightly demand of his patrons that they bring their milk to him in good condition, he must first preach by example. He must show that his factory is well kept in every sense. He must take more care of his personal appearance. Wash his face oftener, also his hands and arms. Clean his finger nails, otherwise than in stirring cheese curds. Change his work clothes which were in this case disgustingly filthy. Then he must begin scouring and scalding at his reception porch, not forgetting the weigh can and scales; in fact everything that comes in contact with milk or curd must be thoroughly washed and dressed down with salt or lye. His factory doors, windows, walls, ceilings and floors must be put in spotless condition. Then he must look after the outside, cleaning out the drain that carries off the water used for washing; clean out the whey tubs inside and out; shut up his neighbor's hogs; learn to be cleanly, orderly, active, quiet and civil.

Until he does possess these qualifications he has no right to ask his patrons to clean up or supply him with good milk. He cannot expect to have sufficient influence on his patrons to persuade them that they should bring their milk in better condition than they usually do, unless he himself practices thorough cleanliness, I know of nothing more inconsistent than for a cheesemaker to scold and berate his patrons for having dirty milk cans and untidy surroundings when the weigh can and floors of his factory are not perfectly clean. The cheesemaker himself should be a living example of cleanliness in all his surroundings.

Nothing is more detrimental to the making of uniformly

fine cheese than untidy cheese factories. Not only that which is outwardly apparent must be kept tidy, but every corner must be kept so too or the flavor of the cheese will tell tales of these neglected corners that the eye does not perceive.

If the proprietors have good buildings, well fitted up, and the makers keep these establishments neat and in first class order, then I assert that the cheesemaker has a just right to exact from every patron milk of good quality in every respect, and to refuse positively any that is not so. By acting differently they are unfair to those patrons who, attentive to their duties, bring only good milk, for these are made to suffer loss by the careless deeds of others. Milk is either good or bad; if it is good accept it and credit the patron with full weight; if it is bad, refuse it.

I have made use of this circumstance, not for the purpose of venting any ill will toward any one but to show forth the narrow minded meanness of those who have acquired that habit of shifting responsibility on to others. They seem to be incapable of appreciating the noble praiseworthy motive to raise if possible the industry to a higher plane of excellence, not for selfish purposes, but for the general good of the community and consuming public.