

Dairy.

The London, Eng., Dairy Show.

From our English exchanges we gather that the second annual exhibition of dairy produce, which opened in the Agricultural Hall, Islington, October 3rd, was one of the largest of the kind yet held. Over 1,000 entries appeared under twelve different departments. More than twenty foreign firms were represented in the cheese classes, and a considerable quantity of foreign butter was entered. Dairy utensils were splendidly represented. Owing to the stringent regulations in force regarding the movement of cattle—more particularly cows—no cows were shown.

As an illustration of the importance of such exhibitions, a London daily paper is responsible for the statement that in the one single district around Frome, where cheese to the value of about a million sterling is made annually, the quality has improved nearly 50 per cent. since the first cheese show was opened in 1870, representing an increased return to the district of not less than £200,000 annually.

The *Agricultural Gazette* has the following with regard to this exhibition:—

In the American or Canadian class, Mr. G. F. Jackson takes the first three prizes for some Cheddars of fine quality, and some which, it is to be hoped, many of our English makers will take care to look at, in order to see what a grand quality of cheese our Canadian cousins can produce. The foreigner, too, is everywhere improving his quality, and our own dairy farmers must jog on with the times. We are second to no country in the world so far as dairy produce is concerned; but other countries are progressing, and we must do the same if we are to maintain our supremacy.

Shorthorns for the Dairy.

Says the *American Agriculturist*:

The period of excitement, which has just passed away, has had the injurious effect of distracting attention from the advantages possessed by the Shorthorn cow for the dairy, and has presented her as a fancy animal. It may be that during the past few years cows of this breed have not been bred so much with a view to the dairy as to their possession of certain points and pedigree; and it has worked injury to them, that in every herd one might see "nurses" of other breeds employed to help bring up the calves. A cow that cannot support her own calf has no excuse for existence, although her pedigree may be long and her form may be all that "fancy painted" it. There are some such Shorthorn cows, but fortunately these are a small minority of the breed. As a rule, however, it must be acknowledged that we rarely ever find farmers' wives prejudiced in favor of the Shorthorns. This is probably because their husbands have been induced to buy "a grand cow," having bulk only to recommend her, and to lose their own judgment as to the proper qualifications of a good milker, in admiration of the proportions of the animal, and in expectation of the fine calves she would raise. But, nevertheless, the pure Shorthorn sometimes, and the grade frequently, are excellent dairy cows, and in addition have the valuable quality of quickly fattening for the market. That the Shorthorn cow has a good record as a milker may be seen by reference to the different volumes of the American Herd Book. Cows are there mentioned which gave 30 quarts, and even more, daily for a length of time; and which made 2 and even 3 pounds of butter per day. There are herds of pure Shorthorns, kept specially for the dairy. One in Herkimer Co., N. Y., owned by the well-known dairyman Harris Lewis, has a wide reputation. One of the largest and most profitable milk dairies near the city of New York, that of Mr. A. W. Powell, of Unionville, N. Y., consists of grade Shorthorns, and we know that the milk of this dairy is unsurpassed by that of any other cows.

To make the Shorthorn popular for the dairy, it only needs that breeders who have neglected the milking quality of their cows should retrace their steps, and that this chief use of a cow should be the first consideration in breeding, for a cow that is a poor milker fails to give the larger portion of the profit she ought to be made to yield. It is no disparagement to any other breed that the Shorthorn should be held first as a milking as well as a beef animal. It has its place to fill, in which no other breed can be so profitable, and the other

breeds find places where the Shorthorns could not be kept with profit. There is no reason why the Shorthorn should not be made to deserve this reputation without exception, as now it only gains it in comparatively few instances. When breeders fully learn, as they are beginning to discover, that they must make their stock popular with farmers and dairymen before they find the best market and make their business the most profitable, then will this be done, but not before.

Feed and Breed of Dairy Cows.

[Can all this be so and not overcome us, &c.? Let it be accepted as the *Ultima thule* of dairy knowledge—as the quintessence of wisdom.]

Dr. E. L. Sturtevant, of South Framington, Mass., makes the following summary of conclusions at which he had arrived on this subject, after many years of study and practical experiment:

1. The production of butter is largely dependent on breed.
2. There is a structural limit to the production of butter to each cow.
3. That when a cow is fed to this limit, increased food can not increase the product.
4. That the superior cow has this structural limit at a greater distance from ordinary feed, and more ready to respond to stimulants than the inferior cow.
5. That consequently the superior cow is seldom fed to her limit, and as a practical conclusion increased feed with a superior lot of cows, will increase the butter product; but if fed to an inferior lot of cows, waste can be but the result.
6. That the character of the food has some influences on the character of the butter, but even here breed influences more than food.
7. That there is no constant relation between the butter product and the cheese product.
8. That the caseine retains a constant percentage, and that the percentage does not appear to respond to increase of food.
9. That the caseine appears to remain constant without regard to the season.
10. That increase in the quality of milk is followed by an increase of the total amount of caseine.
11. That insufficient food acts directly to check the proportion of butter, and has a tendency to decrease the caseine of the milk and substitute albumen.
12. The best practice of feeding is to regulate the character of the food by the character of the animal fed; feeding superior cows nearer to the limit of their production than inferior cows; feeding, if for butter, more contracted and nutritious foods than for cheese; feeding for cheese product succulent material which will increase the quantity of the milk.—*Scientific Farmer*.

A contractor who keeps a great many cows to make concentrated milk for the navy says moles are of great service; they eat up the worms which eat the grass, and wherever the moles have been, afterwards the grass grows more luxuriantly. When the moles have eaten all the grubs and worms in a certain place they migrate to another, and repeat their gratuitous work. The grass where the moles have been is always the best for the cows. The rooks also help to keep down the wireworms.—*Land and Water*.

A NEW CATTLE PLAGUE IN ILLINOIS.—A terrible cattle disease is reported to have broken out in Fulton and adjoining counties in Central Illinois. This disease, according to the opinion of a number of veterinary surgeons, resembles the Texas fever, but it has so far proved more fatal in its results than that malady was ever known to. It is impossible to estimate the number of deaths that have resulted since the disease broke out. Stock-raisers are greatly alarmed at the spread of the infection, and no remedy for checking its ravages has yet been discovered. This new danger, taken in connection with the hog cholera in Ohio and Indiana, and the cattle disease lately reported from Cleveland, is causing much anxiety among stock-raisers and provision men in the West. The disease still makes great ravages.

Stock.

Variety of Diet for Cattle.

Many farmers are accustomed to feed through the winter upon one kind of hay, or, perhaps, upon straw or corn fodder. Our meadows are not composed of as many kinds of grasses as they should be. Timothy is very largely grown alone, and very few farmers add more than clover to it. One strong reason for sowing only timothy is the fact that horse-keepers in cities make it a point to buy only that kind when they can get it. They reject the fine grasses and seek the largest, coarsest timothy, and the farmer tries to supply this demand. If the city horse-keeper fed only hay, he would soon change his opinion of the value of fine grasses, but he only uses hay for bulk and to separate the grain in the stomach. In this view he might about as well use straw as the coarse, ripened timothy, which is only so far better than early-cut and nicely-cured straw as the amount of seed it contains. Its market value has beguiled farmers who live near a good hay market so largely as to raise timothy alone. I would not be understood as undervaluing timothy, for it is one of our most valuable single grasses, and should have a place in every meadow as well as pasture, but I only protest against its being the principal grass raised for stock. The objectionable feature of coarseness is much less when grown with half a dozen other grasses in the same sward. The stalks, then, instead of being large and hollow, will be fine and solid. It is not proper in this place to give a general view of grasses, as our purpose is to offer suggestions in reference to winter feeding with such materials as most farmers have; but the farmer will see the policy of being prepared with as great a variety of cured fodder as possible, and that he should avoid as far as he can the predicament of having in his mow only timothy hay. The motive for raising hay simply for market is now much less, since railroads have destroyed all merely local markets, as the rail offers facilities for bringing hay hundreds of miles, and thus rendering hay raised near a great market of little more value than that 500 miles away. Stubborn necessity is now compelling farmers to raise such crops as will pay the most to feed out upon the farm; and this again will compel them to study the greatest economy and the most prudent use of every crop raised. They will find that by combining the various qualities of food, they may not only save all, but produce a much greater result. Feeders have often observed that horses most carefully provided for, and supposed to be daintily fed, will occasionally eat straw, even their bedding, in preference to the timothy hay in their racks. It is not difficult to account for this. The straw possesses qualities the hay does not, and is a change from the monotonous ration of timothy and oats, so universally fed to the best horses. This ration is excellent—nothing is better, if you can only have one kind of grain and hay—but the horse, like his master, does not like to be confined to two articles of food. When the horse feeds upon the straw, he suggests an important lesson that his owner should learn, that every kind of food raised upon the farm has its value, and should be turned to account. Some years since we tried an experiment in wintering several colts, feeding half of them upon straw and clover hay, mixed in equal bulks of each, and timothy hay alone to the others. The result of four month's feeding showed, in the condition of the colts, that the mixture of straw and clover was quite equal to the timothy. But we have found that a mixture of clover, straw and timothy produced a still better result. This is true of cattle or sheep. Give the greatest variety you possess. If you have three or four kinds of hay, and several kinds of straw, feed one kind of hay mixed with one kind of straw for a few days, and then change to another mixture, going through the whole variety. You will find your efforts appreciated by the stock, and that you grow nothing upon the farm which will not be eaten, with a pleasant recognition of your judgment, if given systematically as a change. Let more than one kind of food be given each day. That plan of feeding the straw out in cold weather alone, and saving the hay till spring, is putting off your variety till the cattle get discouraged, often go into a decline, and are not prepared to appreciate the hay when it comes. The rule should be to combine the most palatable with that least so, having reference also to the nutritive constituents of each, so far as is practicable. For instance, clover is rich in muscle-forming matter, and wheat, oats or barley straw is very poor in that element—