

AGRICULTURAL.

Who's God's Hand is Seen.

I like the city 'Stranger, 'tisn't like'y that I would. 'Tisn't likely that a ranger from the border ever could.

Git accustomed to the flury an' the loud, unearthly noise— Every body in a hurry, men an' wimmin, gals an' boys.

All a-rushin' like the Nation 'mid the rumble an' the 'lar. Jes' as if their souls' salvation hung upon their gittin' thar.

Like it! No. I love to wander 'Mid the vales and mountains green. In the border land out yonder, 'Ware the hand o' God is seen.

Nothin' 'yar but bricks and mortar, towerin' overhead so high, That you never see a quarter o' the overhang in sky.

Not a tree o' grassy meadow, not a runnin' brook in sight; Nothin' but the buildin's shadder, makin' gloom o' every light.

Like it! No. I love to wander 'Mid vales and mountains green. In the border land out yonder, 'Ware the hand o' God is seen.

Roarin' 'alroad trains above you, streets by wakened all defaced, Every body 'tryin' to shove you in the gutter in haste;

Car's an' carts and wazons rumblin' through the streets with deafenin' roar, Drivers yellin', swearin', grumblin', jes' like imps from shoel's shore.

Like it! No. I love to wander 'Mid vales and mountains green. In the border land out yonder, 'Ware the hand o' God is seen.

Yes, I love the western border; pine trees wavin' in the air, Rocks piled up in rough disorder; birds a-sing in every where;

Deer a-playin' in their gladness; elk a-feedin' in the glen; Not a trace o' pain or sadness campin' on the trail o' men.

Brooks o' crystal clearness flowin' o'er the rocks an' lovely flowers, In their tinted beauty growin' in the mountain dells and bowers.

Fairer pictur' the Creator Never threw on earthy screen Than this lovely home o' nature 'Ware the hand o' God is seen.

A Proposed Dairy Test.

The dairy test at the World's fair in Chicago will undoubtedly be the greatest test of dairy cattle ever held in this or any other country.

The great central idea is the obtaining information as to the products yielded by cows of different breeds in comparison with the cost of the food consumed, and to obtain this information from so large a number of cows that the results may be taken fairly represent the best that the breeds can do and also to have these records made in so public a manner, and the tests conducted so carefully by impartial and expert scientists that no question could possibly arise as to the fairness and correctness of the results.

The representatives of the three breeds above mentioned have been unable to enter the contest on account of inability to raise the large amount of money necessary to transport the cows to Chicago and take care of them while there. The result sought is information as to cost of production of a pound of milk, butter or cheese and the three points to be guarded are that cows be officially selected, that the expenses be not too heavy and that the records be so made that their accuracy cannot be called into question.

The first of these is easily done, the second can be obtained by having the cows tested at the home of the owner, and the third by having the records all made under the immediate supervision of some independent and impartial set of judges.

The managers of the World's Fair have finally closed in the experiment stations to serve through their representatives as the judges at Chicago, and probably no better judges could be obtained to take charge of a test of dairy cows at their homes. This home test could not of course be under the official charge of the World's Fair, but by conforming closely to the methods used at Chicago the results would be fairly comparable with the Chicago results. Such a test would indeed have one advantage over the Chicago test since it would allow the cows to be tested in their natural surroundings, on the food to which they were accustomed, under the watchful care of those who knew their individual characteristics.

It would seem as though the test might be made on somewhat the following lines. Let the cows be selected from all over the Union by the same persons, in the same numbers and in the same way that the selecting would have been done had the cows been sent to Chicago. Let these cows remain on the farms of their owners, and be cared for by the owners, the owner to use his own judgment as to the kind and quantity of food to be used, and to put the cow through any preparatory course of feeding he desires. Let the test be for thirty days and be at the same date as the thirty day test in Chicago, i.e., the month of September.

Let the stations, through their regular executive committee or through a special committee, detail a man to watch each cow, and record all food eaten, both as to kind and quantity. Let the owner milk the cow as often as he pleases, and the station representatives weigh the milk and take a small sample for chemical analysis, from which the cheese value of the milk could be calculated with great accuracy. Let the rest of the milk be handled by the owner and made into butter in any way he pleases, and the butter when finished weighed and sampled by the representative of the station for chemical analysis and the weight calculated to eighty per cent butter fat, due allowance being made for the amount of water milk taken for the sample. The station representative should also make weights and take samples of all skim-milks and buttermilks. Analysis

could be made at the farm and duplicate samples sent to the station as a further check, or all analyses could be made at the station. By using the same scale of prices (those used at Chicago) the two sets of tests could be readily compared.

The advantages of this test would be the cows would not be exposed to risk of shipment, they would be fed by their regular attendants who know the individual capacity of each cow, and lastly, the expense would be reduced to so small a sum that there should be no trouble in adjusting this part of the matter equitably between the associations and the stations.

Half Breeds.

At the meeting of the Massachusetts board of agriculture Secretary T. S. Gold of the Connecticut board related some interesting experiences which he has had with breeding cattle during the last 50 years. During that time the demands of the market have changed and Mr. Gold has changed his animals to correspond. In the earlier days of his breeding, beef was a profitable article for a farmer to raise. Then there was an increased demand for steers which in turn died away and milk for the New York market was the most advantageous source of farm income. The changing conditions, however, have made the production of cream for the creamery the most desirable source of dairy income to-day.

To meet these varying demands Secretary Gold has made few changes in his cows but has from time to time changed the breed of his bull. He began with a Short-horn and produced cows that were half blooded, the three-quarters, then seven-eighths, etc. Next he changed to a Devon bull which he kept till he had a herd of cows all alike, one being hardly distinguishable from another. This animal was in turn replaced by an Ayrshire bull which was kept till his cows were all mottled and spotted with kaleidoscope effects. Next came a Holstein bull and now he is using a Jersey. As a result of all this experience it is his impression that half blood is better animals than higher grades, and that his dairy has always done the best for the first year or two after changing the male head of the herd.

In connection with this discussion Mr. Richards of Marshfield said that the descendants of the famous cow Jersey Belle Saitate have not equalled or approached her wonderful production and that her blood seems to be more or less running out.

Farm Yard Manure.

Manure exerts a physical action upon the soil as well as a chemical agency. It gives stability to light sandy soils, making them more absorbent of moisture; renders tenacious clay soils more open and pliable in their nature, thereby admitting the freer passage of the rain and atmospheric air; as well as promotes the decomposition of those soils, thereby rendering them more fertile.

For dung to act mechanically in rendering a soil more open, and in overcoming its tenacious character, the farmer must let the manure retain much of the rigidity of the straw, or in other words, it must not be too rotten. In using it for very porous soils, which need to be compressed rather than rendered open, the natural toughness of the straw should be entirely overcome, and the dung used in a rotten state. There are many other duties discharged by dung which the mechanical agency to render the soil adapted for being traversed by the roots of the growing crop, the chemical powers supply that nourishment which is needed for the development of the crop. It is, therefore, in their combined action that the most desirable results become manifest. It is, however worthy of inquiring whether or not the use of fresh dung for stiff land and rotten dung for porous land is supported and confirmed by the chemical character of dung.

When fresh dung is used upon stiff land the decay which takes place acts upon the land, and renders the dormant ingredients of the soil active, and thereby converts matters which could not nourish a plant into valuable food for vegetation. It also imparts to the soil a beneficial warmth which is favorable to germination and vegetable growth. In addition to this the absorbent power of the soil seizes and retains the products of this fermentation of the dung, and secures them until required by the growing plant.

In the case of a sandy soil the circumstances as well as the powers of the soil, are totally different. The porous character of the soil is decidedly unfavorable to its powers of retaining manure, and consequently we cannot look upon such soils as safe guardians of manure, and for this reason the manure should be added so as to be immediately available for the crop. The manure, consequently, is more suitable grounds as well as upon a consideration of its mechanical character. The same principle is applicable to all the intermediate descriptions of soil, modified by the same rule.

Insect Traps.

Superintendent Forbush of the gypsy moth commission says that a band of burlap tied about the trees has proved an efficient trap for the gypsy moth, and that as many other species of insects injurious to trees were also found in these traps, he urges farmers apply them generally. Among the insects caught were many borers, and the application of this simple trap will be further efficacious in preventing the spread of the borers. The trap consists simply of a piece of burlap a few inches wide tied about the tree, the bark having been first scraped so as to furnish a smooth place to tie it on the tree. The upper part of the burlap is then loosely turned over the string and all those insects which crawl up the trunks of trees to secret themselves in the loose bark or other hiding places, will be found in the burlap if it is put on at the right time. It must be applied at the season when insects are ascending. The trap should be looked after every few days.

Source of Fat in Milk.

Dr. Collier of the Geneva experiment

station has made records of 14 cows during their first entire period of lactation. The results show that there was produced 4,058.7 pounds of fat in the milk from these fourteen cows, and that there was present in the food consumed by them during their entire period of lactation, of pure fat, 4,104.6 pounds. It will thus be seen that there was a little more than one and one quarter per cent of pure fat in the food consumed over and above the quantity found present in the milk.

During the first quarter of lactation the average quantity of pure fat in the food consumed was but 79.4 percent of that in the milk produced by these animals, while during the last quarter of lactation the pure fat in the food was 22.6 percent in excess of that present in the milk yielded.

Corn Ensilage.

We recommend corn ensilage, in particular, wherever corn can be matured for the reason that we do not know of any crop that will furnish so much feed for the same expense. Any good, sweet ensilage has a tendency to increase the quantity of milk because cows will eat more and digest better. Furthermore, we recommend ensilage because it is the cheapest and surest way of securing and storing fodder. It must be remembered, however, that corn ensilage is not a complete ration. It should have bran, or linseed meal, or cottonseed meal mixed with it.

The World's Annual Coal Output.

The coal pit is not inexhaustible. The blowing may not be in sight, nor its future cleaning up be of any immediate concern, but its eventualities is none the less predetermined fact. It may or it may not be of any appreciable concern when its last contribution to human service is dumped in a coal bin, as in the unseen process of its manufacture and storage it has evidenced a creative design, in which the provision of fuel for man's use was limited by an exhaustive article. The formation of fuel was not arrested when anthracite and bituminous coal became a mineral, but was the process of formulation stopped when what is known as the creative week had its Saturday night. This may qualify, but it does not annul the fact of a limit to future coal supplies.

The world's annual output of coal has, it is estimated, reached a total of 485,000,000 tons, and the countries contributing to that enormous total were as follows, together with the amounts they produced in 1890: Great Britain and Ireland, 128,000,000 tons; America, United States (estimated for 1891) 141,000,000 tons; Germany, 90,000,000 tons; France, 28,000,000 tons; Belgium, 20,000,000 tons; Austria, 9,000,000 tons; Russia (1888), 6,000,000 tons; others 9,000,000 tons.

During the last twenty years there has been a marked increase in the consumption of coal, which was, no doubt, commensurate with increased industrial activity. Thus, comparing European countries alone, the average annual output for the period of 1881-80 was upward of 62,000,000 tons, greater than during the previous decade, and that rate of increase bade fair to be maintained, so that the world's consumption of coal would soon reach 500,000,000 tons per annum, if it had not already done so.

In an investigation made by a royal commissioner as to the ascertainable sources of coal in Great Britain it was ascertained that not more than 148,773,000,000 tons were available at depths not exceeding 4,000 feet from the surface, a reserve which, at the present state of increase of population, and of coal consumption, would be practically exhausted in less than 300 years.

The law of limit in this, as in all other mineral products, is of course, without exception. It is simply a difference in tonnage. Industrial activity, to which under present conditions the use of coal is indispensable for steam and power purposes, is not only multiplying the demands of consumption, but has a widening area of use, to which the map of the two hemispheres is the only limit.

We cannot add a pound of coal to nature's deposit or build an addition to the planetary cellar, but it is possible to economize a product in the use of which civilization has been ignorantly wasteful.—[Age of Steel.

Black Something of Something.

The man was in a brown study when he went into the drug store.

"What can we do for you?" inquired the clerk.

"I want black something of something," he said. "Have you got any?"

"Probably we have," replied the clerk, "but you'll have to be more definite to get it."

The customer thought for a moment.

"Got any black sheepskin of something?" he asked.

"No, we don't keep sheep skins. We have chamois skins, though."

"That isn't it, I know," said the customer. "Got any other kind of skins?"

"No."

"Skins, skins, skins," repeated the man, struggling with his slippery memory. "Calfskin seems to be something like it. Got any black calf skins of anything?"

"No, not a one," and the clerk laughed. The customer grew red in the face.

"By jove," he said, "if it isn't a skin, what in thunder is it?"

"Possibly it is a hide?" suggested the clerk quietly.

"That's it! That's it!" exclaimed the man.

"Have you got any black hides of something or anything?"

"Not that I am aware of," and the customer became thoughtful again.

"Hide, hide, hide," he repeated. "Got any rawhide of anything?"

The clerk shook his head sadly as the man tramped up and down the store.

"Got any black cowhide of anything?" he asked after a minute's thought.

The clerk's face showed a gleam of intelligence and then broke into a smile.

"Possibly it is black oxide of manganese you want?" he said quietly.

The customer almost threw his arms around the clerk's neck.

"Of course, that's it," he exclaimed. "I knew there was a skin or something somewhere about the thing," and he calmed down and waited for what he wanted.

Had Heard Him Once.

Bilks—"Come up and hear our minister to-day."

Nobbs—"No, thanks; I heard him once and always regretted it."

"Why, I guess you are mistaken."

"Not a bit of it; he is the minister who married us."

It has been observed that the children of very young parents rarely attain vigor of mind or body, while the children of aged parents are usually old-fashioned and sedate.

I LOVE THE SHADOWS BEST.

A thousand voices hath the morn' That wake the dreaming light; A thousand shadows hath the eve, The children of the night. Of rapture and of bliss are born, I love the shadows best; For softly floating, meek and brown, They kiss my weary eyelids down, And soothe my heart to rest.

—[Samuel Minturn Peck

Men sigh for the wings of a dove that they may fly away and be at rest. But flying away will not help us. "The kingdom of God is within you." We aspire to the top to look for rest. It lies at the bottom. Water rests only when it gets to the lowest place. So do men. Hence be lowly.

Praying by machinery is done in parts of Thibet, China, and Japan. A wheel six or eight feet in diameter is covered with rolls of parchment, which is filled with written prayers. The wheel is placed in a temple, the faithful each give it a few whirrs, and the prayer is supposed to be repeated as many times as it is contained on the parchment. Sometimes the wheel is erected over a running stream. This keeps the wheel almost constantly in motion, and the faithful merely gaze at it, bow their heads and thus acknowledge the prayers as theirs.

Member of the Legislature.

In addition to the testimony of the Governor of the State of Maryland, U. S. A., a member of the Maryland Legislature, Hon. Wm. C. Harden, testifies as follows: "748 Dolphin St., Balto., Md., U. S. A., Jan. 18, '90. Gentlemen: I met with a severe accident by falling down the back stairs of my residence, in the darkness, and was bruised badly in my hip and side, and suffered severely. One and a half bottles of St. Jacobs Oil completely cured me. Wm. C. Harden." Member of State Legislature.

Some people are so prompt that they waste half their time getting there too soon.

Dr. Harvey's Southern Red Pine for coughs and colds is the most reliable and perfect cough medicine in the market. For sale everywhere.

GIBSON'S TOOTHACHE GUM acts as a temporary filling, and stops toothache instantly. Sold by druggists.

The only means of knowing one's size is to go out among one's fellows and use men as measures.

Scrofula in the Neck

The following is from Mrs. J. W. Tillbrook, wife of the Mayor of McKeesport, Penn.:

"My little boy Willie, now six years old, two years ago had a bunch under one ear which the doctor said was Scrofula. As it continued to grow he finally lanced it and it discharged for some time. We then began giving him Hood's Sarsaparilla and he improved very rapidly until the sore healed up. Last winter it broke out again, followed by Erysipelas. We again gave him Hood's Sarsaparilla with most excellent results and he has had no further trouble. His cure is due to Hood's Sarsaparilla."

Hood's Sarsaparilla

He has never been very robust, but now seems healthy and daily growing stronger."

HOOD'S PILLS do not weaken, but aid digestion and tone the stomach. 77y them. 25c.

"How are you?"

"Nicely, Thank You, Thank You?"

"Why the inventor of SCOTT'S EMULSION

Which cured me of CONSUMPTION."

Give thanks for his discovery. That it does not make you sick when you take it.

Give thanks. That it is three times as efficacious as the old-fashioned cod liver oil.

Give thanks. That it is such a wonderful flesh producer.

Give thanks. That it is the best remedy for Consumption, Scrofula, Bronchitis, Wasting Diseases, Coughs and Colds.

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EMPIRE BAKING POWDER

as containing strength, purity and safety. Guaranteed to give satisfaction. Manufacturer sold only by ELLIS & KESSELMAN, Toronto. Sold a 20c's pound tin. Ask your grocer for it.

"How delicious is the winning Of a kiss, as love's beginning— the poet, and his sentiment is true one possible exception. If either party the catarrh, even love's kiss loses its sweetness. Dr. Sage's Catarrh Remedy is a sure cure for the repulsive and distressing affliction. By its mild, soothing, antiseptic, cleansing and healing properties, it cures the worst cases. \$500 reward offered for an incurable case.

It is well enough that most mortals can not see themselves as others see them. The view which others have of them is quite as far wrong as the picture they see of themselves. Not in the same direction, however.

A. P. 640.



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