

FARM-FIELD GARDEN

FEEDING STEERS.

Interesting facts about feeding steers in barns and sheds have been recently worked out by the Pennsylvania experiment station under the direction of Prof. T. I. Mairs. The main points considered are comparative gains in live weight, health and vigor of the animals as indicated by the amount of food consumed and the relative economy of the method so far as it relates to the amount of feed consumed per pound gained. The steers were divided into two lots of 12 each and were selected from a carload lot bought for fattening purposes.

Lot 1 was fed in a large pen or box stall in the basement of the college barn. Lot 2 was fed in the yard adjoining the barn. A shed 14x40 feet was built across one side of this yard to give shelter to the animals. It was inclosed at both ends, while one side toward the southeast was opened. This was constructed of rough boards. A self-recording thermometer was placed in the shed and one in the barn. Both lots of animals had plenty of fresh water. The aim was to treat all as nearly alike as possible, except the shelter.

Shredded corn stover and clover hay were fed. The grain ration consisted of 12 parts corn and one part cottonseed meal. This was fed to February 11, after which, to the close of the experiment corn meal and cottonseed meal were fed in the same proportions. The steers were weighed on three consecutive days at the beginning of the experiment and the average of this was taken as the correct weight. During the experiment they were weighed two consecutive days every second week, the average of which was taken. Where there was a very great difference, a third weighing was made the following day. All materials fed to the animals were weighed and recorded. The foods uneaten were removed and weighed. The experiment began November 26 and closed April 1. Up to December 11, grain was fed three times a day, with stover at night and hay in the morning. After that the grain was fed twice a day, with hay at night and stover in the morning. It was thought that more stover would be eaten by this method than the other, with a considerable saving of clover hay.

At the beginning of the experiment Lot 1 averaged nine pounds less than Lot 2. At the close of the experiment the average of Lot 1 was ten pounds more than the other. Lot 2 ate slightly more grain and stover than Lot 1. On the other hand, Lot 1 ate more clover hay than Lot 2. The lot fed in the open shed produced a slightly smaller gain at the expense of a somewhat greater amount of food. It is not clear that the lower temperature to which Lot 2 was exposed was the cause of the difference, as the record of the temperature for two weeks does not show any particular relationship between temperature and gains. On the whole, while the bran-fed lot appear to have given slightly better results, the difference was not very marked. In view of the wide difference observed between individual animals in each lot, it is not at all impossible that the selection of animals and conditions other than temperature which surrounded them had quite as much to do with the difference as the exposure to cold. Experiments will be conducted by several other stations along the same line to get more definite information.

BREEDING SOWS.

Three things of great importance in the breeding of swine are ancestry, individuality and form. In commercial pork production, purity of blood in the sow is not so essential as with the boar, but good performance in the ancestry with reference to feeding, breeding and nursing qualities is important.

Among general individual qualities, size, strength of bone and length of coupling are very important. The size should be medium to large for the breed and the bone medium to fine, but strong and finer than in the male. The body should be rangy, but it would not be well to have the coupling unduly long.

In breeding sows of the most desirable form, the head, neck and limbs are medium to strong in size, but varying with the breed; neck broad and deep; varying in length and depth with the breed, even width at the shoulders, sides and hams; the top and bottom lines parallel, except that the top line should be a little arched in some breeds; the hair should be fine, especially on the neck and withers; the body should be deep and symmetrical in form, and the teats should be not less than 12 in number and they should be well placed.

The selection of the sows for breeding use should not be made until some time after the pigs are weaned. As they frequently change considerably in form after this time, the final choice should be delayed as long as possible. Sows for breeding should be chosen from litters of sows in full maturity, rather than from young and immature sows or from those of aged sows whose breeding qualities have begun to wane. They should be chosen from large spring litters rather than autumn litters, as they will usually be of better development and will be the right age for breeding in the autumn.

The age at which to breed sows is an important one. Young sows should not be bred under the age of eight to ten months; to breed them earlier would tend to arrest development in the sow and in her brood, and also tend to weaken the vitality of both.

Sows carrying much flesh, made while confined in small pens, will prove at best unsatisfactory breeders. In the summer, exercise is easily secured by the use of pasture, but winter conditions at the north are so adverse to outdoor life of the pig, that much ingenuity is called for on the part of the herdsman to attain the desired end. Sows will gain exercise in winter when the weather is not too cold if turned into sheltered yards, where horses and cattle will not annoy them. If litter from the stable is thrown in the yard, exercise will be gained while working this over in search of waste grains. Some exercise can also be forced by scattering grains of corn or oats very thinly over the feeding floor.

STORE CAVES FOR FRUIT.

Some years ago fruit growers thought that the introduction of cold storage would revolutionize the business and about do away with ordinary cellar storage, writes G. H. Van Houton. They believed that early apples could be kept in cold storage throughout the fall season, and thus come into competition with the winter apples. While great success has been had with refrigeration, the average farmer will still have no cause to change from the old-fashioned cellar method, if he uses common sense and care in preserving his apples. I know of nothing more desirable than first-class Genet apples buried in the ground and kept until spring.

In a properly constructed and well-managed cellar, fruit and vegetables should keep all winter. Farm-

ers should bear in mind that it does not hurt apples to freeze, so long as they are buried deep enough to prevent thawing before springtime. It is wise to put on a mulch of straw or litter, after the ground is frozen, to prevent the fruit from thawing during a warm spell. Generally I would say a cave is more desirable than a cellar. A well-bricked cave arched over and nicely cemented will not cost too much for the average farmer. The satisfaction of such a storage house will fully repay the extra work and expense.

Good results are obtained by sub-earth ventilators. In caves these are made as deep as the nature of the ground will permit, preferably so the top of the ventilator will not be above the level of the ground. Tiling should be laid from some point that is several rods from the cave; it should enter at the bottom of the cave, and be so constructed as to act as a drain in case water should seep into the cellar. Tiling should be large enough to allow a good inflow of air, and a good opening should be maintained for the exclusion of foul atmosphere in the cave. By the use of this system of ventilation, outside air is cooled and circulated in the cave while all impurities are carried off. If a farmer cannot see his way clear to build such a storage cave, his cellar should be opened in the fall, when the air is cool, and closed when the weather is yet warm. The cellar should be kept tightly closed during warm and windy days of the fall. My experience has been that apples stored in a well constructed cave may be kept with less average loss than in cold storage, and certainly at a greatly reduced cost.

BABY'S DANGER.

The summer months are a bad time for babies, and an anxious time for mothers. Fermentation and decomposition in the stomach and bowels are the cause of the many summer complaints of babies and young children. This is the reason why the hot weather months are more fatal to little ones than any other season. Baby's Own Tablets should always be found in every home, where there are young children and their prompt use during hot weather may save a precious little life. The tablets cure constipation, diarrhoea, and stomach troubles, and are guaranteed to contain no opiate or harmful drug. Mrs. Walter Rollins, Sissons Ridge, N.S., says: "Before using Baby's Own Tablets my little one cried almost continuously with stomach troubles. I can truthfully say I never had any medicine act so promptly and give such satisfaction as the tablets do. I do not think you make any claim for them which their use will not substantiate." The tablets can be had from any medicine dealer or by mail from The Dr. Williams' Medicine Co., Brockville, Ont. Price 25 cents a box.

RULES FOR LONGEVITY.

It is a Subject That Puzzles Many a Man.

All of us when in our right minds, want to live as long as possible and if at forty we say, "I don't care to live after I am eighty," at the latter age we rub out the eighty and insert a hundred; and even the centenarian is quite content to keep on though he knows his doing so does not excite popular approval. But what conducts to longevity is the question that puzzles the average man. To attempt to reason from specific instances involves him in a maze of glaring contradictions and leaves him hopelessly bewildered. Here are Cassius M. Clay and Leo XIII. dying within a few days of each other, and each in his 94th year. Could there be a stronger contrast than that between the manner of life of the rugged Kentucky fire-eater and the frail and abstemious scholar of the Vatican? A man died in Indiana the other day at the age of 89, who was noted for his enormous consumption of tobacco, and Jacob R. Smith, of Massachusetts, came forth to ascribe his good health at the age of 94 to the fact that he never used tobacco in his life.

But out of it all we may learn these undeniable facts—The human machine is like other machines; some are built to wear out early, and some to last a long time, and though the working time of the one may be increased by care and abstinence, worry, excesses and privations shorten the time for which the other can be kept running, even though that period should be extended over more than the number of years generally allotted to the life of man. The man who died from the excessive use of tobacco at 89 was as surely cut off before his time as one who died at 20 from the same cause; and the frail life of Gioacchino Pecci was as surely prolonged by his abstemious habits until he died as Leo XIII. at the age of 94.

TROPICAL GOLD MINE.

There is a gold mine in Australia which is three thousand feet deep, and the various tunnels are so hot that cold water has to be continually sprayed over the miners working the lode. The temperature is usually about 108 degrees, and the men have to work almost naked in order to stand the heat.

DIAMONDS BY THE TON.

\$15,000,000 Worth Taken From African Mines Annually.

It is possible for one to gain some idea of the enormous wealth of the South African mines from the fact that \$15,000,000 worth of diamonds are taken yearly from the four best mines. The cost of obtaining these diamonds amounts yearly to half their value, so that the annual net profit from the four mines is estimated at about \$7,500,000. Each ton of diamonds represents a value of \$30,000,000, and up to the year 1892 the four mines produced ten tons of diamonds, of an aggregate value of \$300,000,000. In 1895 no less than 2,435,541 carats of the precious stones, weighing about half a ton, were obtained. To the Johannesburg mines belongs the distinction of having produced the largest diamond ever mined in the world. It weighed 670 carats, and in its uncut state was the size of a hen's egg.

PRESCRIBING OUR WEST.

"I have strenuously objected to the easy-going ways of the majority of far Western druggists," said the commercial, "but thus far I don't seem to have made much of an impression on them. I was in a Wyoming town last month, and feeling awful I went to the drug store and got some quinine capsules. An hour after taking them I went to bed, and it was about midnight when I was aroused by the landlord, who asked: 'Stranger, are you feelin' all right?'"

"Yes, pretty well," I replied. "No horrible pains nor nothin'?" "No. But why do you ask?" "I guess you'd better come downstairs. The druggist says there's some mistake about them pills. I want to tell you, though, that he's a powerful good feller, and never pizes anybody on purpose."

"My hair began to curl before I was out of bed," continued the commercial. "I remembered that the druggist seemed to be careless in serving me, and, while the capsules had thus far had no bad effect, it did not take me long to imagine that I had swallowed ten grains of morphine and was good for an excursion somewhere. I made lightning work of climbing into my clothes and getting downstairs, and there I found the druggist as calm as an old shoe."

"I think I put up morphine for quinine for one of three persons," he explained, "and so I called round to see if you were dead. Let me look at the box."

"By John, man," I yelled at him, "but do you make a regular thing of killing somebody once a week with your old drugs? If you have poisoned me—"

"Those are quinine, sure enough," he interrupted, as he opened a capsule and tasted. "You can go back to bed, stranger."

"But I want to know about this thing. Why do you keep your morphine and quinine side by side? Why don't you have your mind—"

"You are all right and have no cause for complaint," he said, as he lighted a cigar and seemed somewhat relieved in his mind.

"But who got the morphine?" I asked.

"Lung Sing, the Chinaman, probably, and it's all right. It was either Lung Sing or old Bill Birdsall, and it don't matter which, as the boys are going to hang both of 'em to-morrow!"

OLD FASHIONED.

But Still in the Fashion.

It is an ever new and interesting story to hear how one can be entirely made over by change of food.

"For two years I was troubled with what my physician said was the old fashioned dyspepsia."

"There was nothing I could eat but 20 or 30 minutes later I would be spitting my food up in quantities until I would be very faint and weak. This went on from day to day until I was terribly wasted and without any prospects of being helped."

"One day I was advised by an old lady to try Grape-Nuts and cream leaving off all fatty food. I had no confidence that Grape-Nuts would do all she said for me as I had tried so many things without any help. But it was so simple I thought I would give it a trial, she insisted so."

"Well I ate some for breakfast and pretty soon the lady called to see her 'patient' as she called me and asked if I had tried her advice."

"Glad you did child, do you feel some better?"

"No," I said, "I do not know as I do, the only difference I can see is I have no sour stomach and come to think of it I haven't spit up your four teaspoons of Grape-Nuts yet."

"Nor did I ever have any trouble with Grape-Nuts then or any other time for this food always stays down and my stomach digests it perfectly; I soon got strong and well again and bless that old lady every time I see her."

"Once an invalid of 98 pounds I now weigh 125 pounds and feel strong and well and it is due entirely and only to having found the proper food in Grape-Nuts." Name given by Postum Co., Battle Creek, Mich.

Get the little book "The Road to Wellville" in each package.

DR. GIUSEPPE LAPPONI

PHYSICIAN TO THE POPE
PRAISES DR. WILLIAMS' PINK PILLS.

In Four Cases of Anaemia Their Effects Were so Satisfactory that He Will Go on Using Them.

Dr. Laponi, whose skill preserved the life of the late Pope Leo XIII. to the great age of 92, and to whose care the health of the present Pope, His Holiness Pius X., is confided, has written the remarkable letter of which the following is a translation:—

"I certify that I have tried Dr. Williams' Pink Pills in four cases of the simple Anaemia of development. After a few weeks of treatment, the result came fully up to my expectations. For that reason I shall not fail in the future to extend the use of this laudable preparation not only in the treatment of other morbid forms of the category of Anaemia or Chlorosis, but also in cases of Nourishment and the like."

DR. GIUSEPPE LAPPONI.



Dr. Giuseppe Laponi, Physician to the Pope, who has written a letter in praise of Dr. Williams' Pink Pills for Pale People.

It would be impossible to exaggerate the importance of this opinion. Dr. Laponi's high official position places his professional competence above question, and it is certain that he did not write as above without weighing his words, or without a full sense of the effect his opinion would have.

The "simple anaemia of development" referred to by Dr. Laponi is of course that tired, languid condition of young girls whose development to womanhood is tardy, and whose health, at the period of that development, is so often imperilled. A girl, bright and merry enough in childhood, will in her teens grow by degrees pale and languid. Frequent headaches, and a sense of uneasiness which she cannot understand, makes her miserable. Just when it is time for her to leave off being a girl and become a woman—a change which comes to different individuals at different ages—her development lingers—why? Because she has too little blood. That is what Dr. Laponi means when he speaks, in the scientific language natural to him, of "the anaemia of development." Dr. Williams' Pink Pills for Pale People have the power of making new blood. They cure anaemia just as food cures hunger. That is how they help growing girls, who, for want of this new blood, often drift into chronic ill-health, or "go into a decline"—which means consumption—and die. Dr. Williams' Pills could save them.

The value of Dr. Williams' Pink Pills as a nerve tonic, referred to by Dr. Laponi, makes them valuable to men as well as women. They act on the nerves through the blood and thus cure diseases like St. Vitus dance, neuralgia, paralysis and locomotor ataxia. When buying these pills it is important to see that the full name Dr. Williams' Pink Pills for Pale People is printed on the wrapper around each box. Never take a substitute, as it is worse than a waste of money—it is a menace to health. If you cannot get the genuine pills from your dealer write the Dr. Williams' Medicine Co., Brockville, Ont., and the pills will be sent you post paid at 50 cents a box or six boxes for \$2.50.

TOO SACRED TO TOUCH.

It is a tradition in Corea that the Imperial person is sacred, so sacred that to touch it with a steel or iron weapon constitutes high treason. A former Emperor, Tien-son-tai-on, about the end of the eighteenth century, preferred to die from an illness which could have been easily cured by a slight operation rather than submit his body to such a desecration.

The visitor was showing little Oswald the book of fairy-tales. "But wouldn't you live to have been the two-headed giant?" asked the visitor. "He had lots of fun!" "No indeed!" responded Oswald. "Think how he must have suffered when his mamma boxed his ears!"

DR. A. W. CHASE'S 25c. CATARRH CURE

is sent direct to the diseased parts by the Improved Blower. Heals the ulcers, clears the passages, stops droppings in the throat and permanently cures Catarrh and Hay Fever. Blower free. All dealers or Dr. A. W. Chase Medicine Co., Toronto and Buffalo.

Children Had Skin Disease

Itching so Bad They Would Tear Their Flesh—An Extraordinary Cure by

DR. CHASE'S OINTMENT.

Too many children are in agony from itching, burning skin disease.

Too many mothers are worn out by anxiety and loss of sleep in watching over their little ones who are tortured by such ailments.

Dr. Chase's Ointment is a prompt and positive cure for every form of itching skin disease, and has proven its marvellous power in thousands of cases, similar to the one described below.

Mrs. Lois McKay, Tiverton, Digby County, N.S., writes:—"My children were taken with an itching, burning skin disease and tore their flesh until it was sore and their shirts would sometimes be wet with blood. The doctor did not seem to know what ailed them and could give no relief,

so I began using Dr. Chase's Ointment."

"Wherever it was applied it did its work well, and has entirely cured them of this horrible disease. They suffered so they could not sleep nights, and I think if it had lasted much longer I would have gone crazy from the anxiety and loss of sleep. I cannot find words to praise Dr. Chase's Ointment enough for the good it has done my children, and hope other sufferers will try it."

Dr. Chase's Ointment, 60 cents a box, at all dealers, or Edmansons, Bates & Company, Toronto. To protect you against imitations, the portrait and signature of Dr. W. A. Chase, the famous receipt book author, are on every box.