

(fig. 4), the twister makes the bow revolve round an arc, and walks backwards. The spinner sits on a stool, or on a bundle of straw, and nearly closing the left hand, lets out the straw gradually between the finger and thumb, retaining it until sufficiently twisted, while the right hand is engaged supplying small portions of straw in equal and sufficient quantities to make the rope of uniform thickness throughout, the twister drawing it away with her as fast as the spinner lets it out. When the rope is let out unequally, it breaks at the smaller part; when twisted too much it snaps; when not twisted enough it tumbles apart at the least pull; and when the twister does not keep the rope straight as fast as it is let out, it gets into *kinks*, like an ill dressed fishing-line, and is not easily made straight again.

Fig. 6 represents a straw rope coiled up. When the ends are made smaller than the middle, the rope can be easily taken hold of and carried, and when the form is oval rather than spherical, the coil can be more easily thrown upwards to the top of a stack.

Figs. 7 and 8 show two other modes of roping the thatch of a stack. In Cornwall, where winds run high, I have often seen the ropes kept down by heavy stones tied to them. It does not look pretty, but, in practice, is efficient enough.

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#### Ensilage in a Milk Dairy.

EDS. COUNTRY GENTLEMAN—Having received so many inquiries in regard to the construction of our silo, and of our manner of feeding, &c., we concluded to write you a detailed account of it for publication, and thus benefit many who have not written directly to us. In the first place, we knew nothing of silos or ensilage, except by reading accounts in agricultural papers from those who gave their experience with them. The greatest drawback was the cost of building a stone one, and having plenty of room in our barn, we conceived the idea of boarding up a bay for a silo, so as to make it tight. We made inquiries of men who had silos, and upon their advice we began it one year ago last June. We first placed tarred paper upon the studding, then over that we placed matched spruce planks  $1\frac{1}{2}$  inches thick. This bay was in a barn which was 20 by 24 feet, and about 20 feet deep, being all above ground. Around the bay under the sills we built a wall of stone and cement, and cemented the bottom, so that it was as smooth and hard as a floor.

In September we began filling, and owing to lack of help we were about three weeks putting in about 120 tons. After filling, no weight was put on until we began husking corn some time afterward. Then we piled the stalks upon the silo. We said that no weight was put upon it, but we will modify that a little by saying that we placed over the top tarred paper and rough hemlock boards. We had some misgivings as to its keeping well, so we opened it about a month after filling, and great was our surprise to find the fodder in splendid condition. When given to the cows, they ate it ravenously, and did not leave a particle in their mangers. A great many of our neighbors laughed at us when we were filling the silo. They said that "the stuff will be all rotten by spring." We replied that we expected it would be, but we intended to put it through the cows first. After opening, we could laugh at our neighbors, as the old saying is that "those laugh best who laugh last." We found several tons of the fodder spoiled in two corners that were not exactly air-tight; the remainder was in splendid condition.

Being so well pleased with our success with the silo, we sowed a large field of corn again last season, but, owing to the dry weather, we did not have a very large crop, and the frost came before we had the fodder all put into the silo. We put

in what we had, in just a week, and did not cut the stalks as short as last year. Last year we cut one-quarter inch: this year half an inch. We find that the ensilage is, if anything, better this year than last. We are now feeding twenty-five cows for milk, and find that upon the following ration they give as much milk as they would if in good pasture: About 6 o'clock in the morning they are milked, and then fed one bushel each of ensilage, upon which we put four quarts of buckwheat bran. At 9 o'clock they are turned out into a yard to drink and exercise, while the stables are cleaned and fresh bedding is put in, which consists of the manure from the horse stable, wheeled in and scattered in the trench to absorb the urine. The manure is all thrown into a building prepared expressly for protecting it from rains. At 11.30 o'clock the cows are put into the stables and fed one peck of carrots, and all the timothy hay they will eat. At 4 o'clock they are again milked and fed the same as in the morning.

We are getting as much milk by feeding ensilage, and a small amount of grain, as we would get on good pasture. For the purpose of comparison we will state that one of our neighbors is feeding cows for milk also, but he does not make ensilage of his corn fodder, but shocks it in the field and leaves it until he wishes to use it, then draws it in and runs it through a cutting machine. His rations are all the cut fodder the cows will eat, and a peck of buckwheat bran at each meal. You will thus see that he is feeding three times as much grain as we are. We fed slops up to December 1st, and then it became so cold that the slops would freeze at night, therefore we concluded to try dry bran, and are perfectly satisfied that cows will give fully as much milk on dry bran as they would on the same mixed up with water. In conclusion we would recommend to any farmer who keeps five or more cows to build a silo, believing that he can save enough in grain to pay its cost in one year.

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#### Early Maturity—Full Feeding.

After so much has been written upon this topic for the last few years, it is not surprising to find in the agricultural department of the New-York Times such reasoning as the following: After stating that by early maturity, pigs, sheep and cattle may be given the proper weights to fit them for slaughter in half the old time required, it says: "But it is a question if this forcing is profitable, either to the feeder or the consumer. On the one hand, the animal is forced to consume as much food in two years as was formerly spread over four years, so that, on the whole, there is no gain but in time; while on the other hand, the consumer has very immature and half-grown meat, which is devoid of flavor and nutritive quality, and the meat is overloaded with fat, which is a waste. Physiologically, it is a matter of doubt if the muscular growth of an animal can really be hastened by any process of feeding. Fat can be produced, no doubt, but fat is a diseased condition of the system, and an excessively fat animal would soon die under continued feeding." \* \* On the whole, it certainly does appear as if we had carried the forcing system of feeding to an unprofitable extreme."

It does not seem probable that this statement was carefully examined by the editor of that department of the Times. It is stated here that the steer that has matured in two years has eaten as much food as if it had taken four years to attain the same weight. This is leaving out of the account the entire food of support for two years. The writer of that statement ignored the first principles applicable to the growth of animals. The food of support represents from 55 to 66 per cent. of a full ration. Two-thirds of the ration is usually estimated as the food of support, and from one-third comes all the growth.