

rather singular process, whereby its growth is checked, the object of which is to prevent the more forward shoots blossoming before the others, so that all the seed may ripen together. Although I heard this insisted on as of *vital importance* to the cultivation of rape, I did not pay that attention to its details which I should have done had I been aware that it could so easily be grown in Canada, but I shall obtain and communicate information on this head in due time.

The cutting and threshing are the nicest operations in the management of rape. It will not bear to be harvested when the seed is in the slightest degree green. When *thoroughly ripe* it is cut with a very sharp sickle, without the usual serrated edge. All hands should be employed at this work in the early morning, and stopped when the dew is off. A couple of hours after it is threshed in the same field in a winnowing sheet, it is carried from the rows, in which the reapers lay it, in a barrow made by attaching a sheet to a couple of poles.

About 39 bushels of rape seed weigh a ton, the cake of which after the oil has been extracted as much as possible, contains two hundred and twenty-four pounds of oil and one hundred and five pounds of nitrogen, equal for feeding or fertilizing purposes to thirty tons of turnips, an average yield of which, even in the highly cultivated farms of England, does not exceed twenty tons. Even were it possible to grow turnips here to advantage, we should find it difficult to feed animals on them in winter, whereas oil cakes are as easily fed as oats; they would enable us to turn out cattle very much fatter for the high prices of the spring, and give a richness and color to our winter butter, rendering it fully equal to that obtained in summer.

I should recommend that the rape straw sheaves should be piled up and covered with earth like a charcoal kiln, charred without being suffered to blaze, and scattered over the field, as they are hardly of any value in a country like ours where fuel is abundant.

I will do myself the honour of again addressing you on this interesting subject.

I am, Gentlemen,

Your obedient servant,

JOHN S. CUMMINS,

Agent B. A. Land Company.

Roxton Falls, 20th June, 1854.

I have considered flax seed as worth only five shillings the bushel, as it has hitherto only brought that price in Canada; it is however intrinsically worth *more* here than in England, and will, when its value is appreciated, readily bring seven shillings and six pence. Rape seed is of a like commercial value, yielding thirty-three per cent of oil.

J. S. C.

A SPLENDID BARN.

Few farmers can afford to erect a building equal to one that they can plan, and still fewer to build one like that described below.

Still, we publish a description of it, because he who cannot obtain all its advantages may secure a part. Perhaps some of them can be provided for in those already occupied. We ask especial attention to the manner of feeding. The italics in that paragraph are ours. The description was given, as appears below, by a correspondent of the *Rural New-Yorker*.

"A correspondent of the *Rural New-Yorker* gives an account of a barn belonging to David Leavitt, Esq., a merchant-prince of New-York city, who has a farm in Great Barrington, Massachusetts, pleasantly located upon the Housatonic.

"It is two hundred feet in length, with a centre wing on the east side, three stories high, with an arched roof covered with tin, and a cupola on the centre, and erected at an expense of nearly \$20,000. It is based in a ravine which it spans, thus affording an easy entrance into the third story. Through this ravine runs a durable stream, with which is formed a beautiful reservoir of water directly above the barn, that operates upon a wheel twenty feet in diameter, thus forming an excellent motive power, that is used for a great variety of purposes, such as sawing wood and lumber, threshing, cleaning, and elevating the grain, cutting straw and stalks, unloading the hay, depositing it in any desired loft, churning, grinding, &c.

"The first story is used as a manure vault; the second stabling; the third for grain, hay, and apartments for domestics. The arrangement for feeding the cattle is most ingenious and convenient, the following description of which I give in the language of Mr. Wilkinson, namely: 'All the manual labor required in feeding the cattle is to run a car which contains twenty-five bushels of feed, before the line of cattle, and shovel the food into the feeding-boxes, which are of cast-iron, quadrant-shaped, of about one bushel capacity, and one to each stall. The boxes are placed one on each side of a partition, that divides two stalls, and are each attached at the right angle corner of the box to the front partition-stud by hinges, so that the boxes may be swung around into the feeding-hall, in front of the cattle, and over the feeding-car, that the feed which spills in filling the boxes, may fall into the car instead of on the floor. After the boxes are filled, they are turned with a slight touch, before the cattle again. In the centre, between the next or adjoining pair of stalls, is an erect cylinder, two feet diameter at the bottom, and one foot eight inches at the top, which projects equally into each stall, and extends from about a horizontal line with the tops of feed-boxes (on the opposite side of the stalls) to the upper surface of the hay-loft floor, directly over the cattle, that it may be filled from that floor. There is a circular aperture six inches in diameter, in each side of the *hay-tube*, at a convenient height from the floor, so that two animals may eat from the tube at the same time.

Under the tube is a drawer into which all the loose hay-seed falls through its latticed bottom, which drawer, when full, is emptied, and when a large quantity of seed accumulates, it is cleaned for use or market. *The seed obtained is of a superior quality, and the quantity ordinarily saved by this arrangement will pay for all the manual labor required about the building throughout the year.* Across the front of the stalls there is also an ordinary box-manger, directly under which, and running the whole length of the stable, is a trough for water, with suitable opening in the bottom of the manger through which the cattle may be watered by removing the iron slides that close them, which is done by means of a lever opening the line of slides at once, and in an instant."

"The very great economy and convenience of this arrangement is obvious at a glance, and may be taken as a specimen of the perfection exhibited throughout. Under one of the drive-ways, into the third story, is an arched room, well ventilated, and lighted with a glass front, which is used as a milk-room, and has a great many conveniences connected with it for diminishing the labor of taking care of the dairy, which can all be performed without the least exposure to the weather, and within the compass of a few feet. The herd is fed with hay, cut feed, and steamed roots that are reduced to a pulp by the revolution of a cylinder in which the roots are placed after steaming, with four cannon-balls of ten pounds each; and, I believe, during the summer season, the boiling system is to be practised in part. The building is well lighted and ventilated, so that no diseases are generated by the confinement of impure air and the deleterious gases, an important feature that is too often overlooked. On the side of the barn facing the Housatonic, which is but a few hundred feet distant, are projections of cut stone, so arranged as to convert the water which falls over them into a sheet of foam, from which it justly derives its name of *Cascade Burn*."

—*The Plough, Loom & Anvil.*

AGRICULTURAL IMPLEMENTS.

From the *Agricultural Instructor*; or *Young Farmer's Class-Book*:

Free trade in corn being now established, it is only by producing abundant crops at the least possible expense, that the farmers of the United Kingdom can hope to compete successfully even in our own markets with those of many foreign, and, as regards rent of land and labour, much more favourably circumstanced countries. Efficient implements and machines being amongst the most obvious means of effecting this object, a short notice of some of the most important of them appears desirable.

1. *The Spade*.—This tool assumes a great variety of forms: in the boggy districts in some parts of the west of Ireland it