

all to those of Messrs. Carter, that I mention the subject. I see that at least eight sorts, one gallon of each, and the whole eleven if the harvest proves satisfactory, are offered for five guineas. The eleven selections are described as follows in Carter's catalogue:—Selection A.—Red wheat crossed with White wheat, stout straw, medium length. B.—Red wheat crossed with Amber wheat, long, stout and valuable straw. C.—Red wheat crossed with Bearded White wheat, stout straw, medium length. D.—Velvet Chaff White wheat crossed with White Club-headed Smooth-chaff wheat, long, stout, useful straw. E.—White wheat crossed with Bearded Amber wheat, long, valuable straw. F.—Amber wheat crossed with Red wheat, straw rather thin, medium length. G.—Square-headed, Smooth-chaff wheat crossed with Bearded Amber wheat, straw very stout and short; impossible to layer; resists a deluge of rain. H.—Woolly-chaffed, square-headed White wheat crossed with Red Square-headed wheat, long, valuable straw. I.—Bearded Red wheat crossed with Bearded Amber wheat, useful straw, good length. J.—Smooth-chaffed, Club-headed, Amber-brown wheat crossed with White wheat, straw rather thin, good length. K.—Woolly-chaffed, Square-headed White wheat crossed with Bearded Amber wheat, stout straw, good length.

Turning to the private notes I made when examining these wheats just before they were cut last harvest, I am able to give their parentage and the opinions I formed of them. My remarks, taken from my note-book, are put in inverted commas. In each case the wheat first named is the female parent:—

A.—Royal Prize, a red wheat, crossed with Challenge White. "Very fine, long ears," is the remark made in my note-book.

B.—Royal Prize, crossed with Enobled Red, a thick set variety. "Cross better than either parent."

C.—Golden Drop, a famous old English red wheat of fine quality, crossed with Mammoth White, an American bearded wheat, coarse and very prolific. "Tougher straw than Golden Drop, and bigger ears. Healthy." This one is spiked, but not bearded.

D.—Imperial White, rough-chaffed, crossed with Club-headed, a smooth-chaffed white wheat. "Very good."

E.—Chidham, a famous old English white variety, a great favorite with millers, crossed with American bearded Golden Grain. "Like Chidham, but spiked. Bigger than Chidham. Grain not so white. A useful sort."

F.—Telavera, one of the finest quality among English varieties, and the earliest to come to harvest, but liable to blight. A delicate wheat, crossed with Royal Prize, red. "Earliest of all. Earlier than Talavera and thicker set. Worth trying. This is one of the varieties I specially recommend for Canada. Talavera is one of the few sorts sown here in the spring. The progeny appears to be one of the best varieties for sowing in the spring for early harvesting. It is much harder and healthier than Talavera."

G.—Squarehead, a prolific, stiff-strawed, red wheat, with white chaff, crossed with Bearded American Mammoth White. "Shortest wheat of all—yet neither parent short. Very thick-set ears and strong straw."

H.—Fill-measure, white, crossed with a white Squarehead. "Ears larger than Squarehead. Useful."

I.—April wheat, the variety sown here latest in the spring, and yet fairly early to harvest; crossed with American Golden Grain—both bearded wheats. "One of the best of all for spring sowing, and for colonies. Long ears, well set, bearded." This is another variety I should like to see tried in Manitoba.

J.—Club-headed, red, crossed with Hunter's White. "Ears thin and long. Don't care for it."

K.—Fill-measure, white, crossed with American Bearded Mammoth White. "Thick-set, stiff-strawed." This new variety is called "Bird-proof," because it is covered with short prickly arms, supposed to be unpleasant for the sparrows. Messrs. Carter think very highly of this sort, and have already grown it very extensively on their farms.

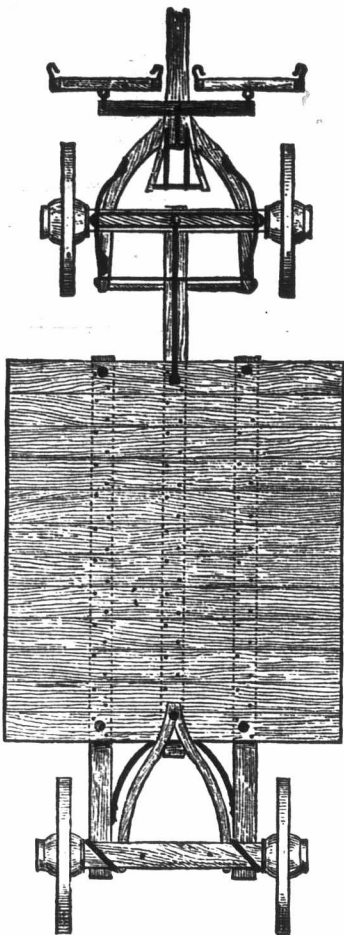
Of course, the people who buy these high-priced new varieties will dibble the seed in carefully, one grain in a hole, so as to make the most of them, and will sow the produce again to raise stock for selling for seed. The cost of producing the new varieties has been very great, and the producers, I should say, will never be directly repaid by the sale of them, or at any rate not for years to come. The stocks are very small, and probably they will be quickly bought up. That is why I mention the subject in good time. This is the first description of these particular selections that has been written.

How to Fill a Silo.

BY PROF. JAS. W. ROBERTSON, ONTARIO AGRICULTURAL COLLEGE, GUELPH.

ARTICLE III.

The tools, implements and conveniences should, as far as possible, be adapted to the cheap and easy performance of the work; this implies the making the best use of the machinery already owned on the farm. Reference has been made



to the cutting of the corn in the field. I prefer and recommend a common corn knife or an old-fashioned sickle. A strong reaper may do the work by horse power, but if the crop be heavy and the corn ten to twelve feet high, the rakes will not clean the board, and stalks will be dragged behind.

For a hauling convenience, an ordinary wagon may be made to serve by putting the hind wheels from a front axle on the hind axle. A truck or a wagon with low wheels and a large, flat platform may be used. In either of these cases, by trailing a gangway behind, the persons loading the fodder may carry it up in armfuls. These are not the best conveniences, nor do I recommend that way of loading. In the way now to be described, the handiest kind of a truck can be provided. I am indebted for part of the suggestions to my trip this winter into Wisconsin. Take three strong pieces of timber six inches by six inches, and each twelve feet long. Strong

poles will serve the purpose if flattened on one side. Place them sixteen inches apart, centre to centre. Let the middle piece extend three feet beyond the two outside ones. Then three feet from the other ends of the two outside pieces, bolt on securely a two-inch plank, eight feet long, across the three twelve feet pieces. Continue a covering of planks, each securely bolted, until the platform extends to the end of the two outside pieces, leaving the middle piece extending. Then, by removing the reach from a common farm wagon, the platform so constructed can be attached to the under side of the axles. The middle piece will serve the double purpose of a reach and the front support. It can best be attached to the front axle by a long king bolt passing down through it. A large flat washer and a screw nut with a key under it will make a strong, suitable and safe connection. A brace passing back from the top of the king bolt to the front plank of the platform will improve the attachment. The two pieces extending beyond the platform at the other end are to be attached to the hind axle on the under side. Two clamps passing over the axle, with a bar and nuts beneath the six by six pieces, will fasten it securely to the under side. The hounds can be used as a brace by attaching the end of it to the end of the middle piece through the hinder plank of the platform. I subjoin a rough sketch to make my description more easily understood.

The corn stalks may be filled into the silo without cutting, but more labor is involved, and the work of emptying for feeding is rendered doubly difficult. Any strong cutter, with capacity for a large quantity of cutting per day, will serve the purpose. Carriers should be attached unless the cutter stands on a level with the top of the silo, which, ordinarily, is neither practicable nor desirable. Horse power or engine may be used.

Then, everything in the way of machinery equipment being ready, the filling may be commenced. From six inches to a foot of cut or uncut straw should be placed evenly over the bottom of the silo. Every farmer with a large corn crop should provide two of the carrying platforms already described. If the field be near the silo one team will be enough for hauling. The stalks can be loaded most economically direct from the root. If the crop be as ripe as it should be, wilting will be unnecessary. The person cutting the corn might as well throw it on the low platform as on the ground, and thus avoid the double handling. The teamster may meanwhile be loading the corn, which would be laid in armfuls on the ground during his absence from the field with the previous load.

At the silo, the corn can be fed into the cutter from the same platform. The horses may be changed from the loaded to the empty wagon. At the cutting box two men will be required. A two-inch cut is as good as an inch and a-half, and both are better than one inch or less.

During the filling care should be taken to occasionally level the heavier parts of the stalks out against the sides of the silo. The filling may proceed every day or every second or third day as may be found convenient. In either case the contents should be tramped around the sides and in the corners just before the addition of a new layer. When the silo is full, after the lapse of two days, the sides and corners should be again thoroughly tramped and afterward covered with a layer from two to three feet thick of any kind of straw, cut or uncut. It should be laid on close, and for that reason cut straw is rather preferable. It should also be closely tucked around the sides and into the corners. The silage may be thus left to cure and to keep until wanted, be that time four weeks or ten months.