

In page 123 of the same volume is a comparative statement of the result of a trial of four different kinds by Col. LeCouteur. The product of a kind called the Whittington was 33 bushels to the acre and the net profit £2 7s. 6d.; whereas the Bello-vue Talavera, raised on the same kind of soil, measured in the same manner, was 52 bushels to the acre and the net profit £8 12s. 9d. The difference of product in these cases is so striking as to make it evident that very much depends upon the kind of wheat now produced in England than formerly, is thought to be attributable to the greater attention given to the selection of seed from the best and most prolific varieties. The grain that ripens first in the ear and is separated with the greatest ease is the most proper for seed, as these circumstances shew that it is the most mature. A change of soil and climate has been highly beneficial to wheat. It seems as if it were an inscrutable law of nature that all seeds to maintain their vigour require a change of soil. The nature of the soil upon which the seed is to be sown should however be taken into consideration, and it is generally thought advisable to procure it from land of an inferior quality, as well as from a drier or warmer climate; for strong lands from poor light soils and for friable loam from stiff clays—for dike from upland and vice versa. Wheat raised on burnt land on the mountainous parts of our own township has also been strongly recommended for our old uplands and dike. It is extremely important to the preservation of grain for seed that it should be carefully guarded from dampness and heating. From experiments made in 1817 by the French Government, it was found that grain which has suffered a commencement of germination rises only in proportion of one half of the seed employed; if strongly germinated in the proportion of 1-3 and if fired or moulded of not more than 1-5. Wheat has been known to vegetate when 5 years old, but in general it should not be sown when more than one year old—seed should also be selected with regard to its ripening qualities: some varieties being earlier than others by 3 weeks. These different kinds ought by no means to be mixed and sown together. In such a field a part of the grain will be dead ripe, while another part will be perfectly green and not at all in a fit state to cut. It need hardly be said that the seed should be plump and perfectly clean. Some Farmers seem to think that any thing in the shape of wheat, however imperfect or defective the berry, if it will only grow, may be used as seed. This is very mistaken policy. It is impossible that the young plant should be as vigorous and perfect when springing from defective and shrunken seed as when growing from that in which the peculiar principles of the plant are fully developed, and the germination commences without check or hindrance. The expediency of clean seed will be admitted if we consider that weeds take strong hold of the land, are hard to eradicate, and are astonishingly gross feeders. It would be better for a farmer to pick over his seed wheat by single handfuls than to sow tares, cadlock and other vegetable nuisances; but the loss resulting from weeds will be hereafter more fully considered.

TIME OF SOWING.—In this Province much depends upon the time of committing the seed to the ground, and experience has proved that it is always desirable to sow our spring wheat on the frost. A little more seed may be required, but the larger produce will in general make ample compensation. The grain too has so much longer time to grow as to be placed beyond the danger of rust, which is hardly ever found to attack the early sown wheat. From statements made to me by different farmers it does not seem at all necessary to harrow the surface of the land at the time of sowing in order to cover the seed. Many have scattered the grain

on the snow—others have thrown it on the hard naked surface when the harrow could make no impression; and in both cases as good crops have been received as when the harrow was used. It is immaterial too how wet or soft the surface may be at the time of sowing, provided the frost is still in the ground, and that no water has been allowed to stand on the land. The action of the frost seems to answer every purpose of a harrow and as it leaves the soil, throws open its bosom and lets in the grain. If the land be well ploughed and the furrows well laid up, the grains when sown will roll into the hollow part of the furrow slices, and as the frost mellows and pulverizes the soil, the tops of these furrows will fall into the drills, as they may be called and completely cover the seed. In addition to the action of the frost we generally have heavy rains in spring which wash into the soil whatever is upon its surface, as they often wash out that which has been carefully covered by the harrow, later in the season. I would not however be understood as lightly esteeming the use of the harrow at any time. It can often be used before the frost is out of the ground when the surface is softened and dried by the sun and wind, and it is unquestionably better, if possible, in all cases to cover the seed, than to allow it to remain exposed on the surface for an indefinite time; but I would not delay to sow in consequence of not being able to use the harrow immediately, whether the frost be in or out of the land; for should neither the frost nor wet weather cover the seed, there always will be a time to harrow and a few days exposure of it cannot make any great difference. The advantages of early sowing are obvious. The spring work is not only much advanced and more time allowed for other indispensable operations of the farm, such as preparing compost heaps, &c. but the harvest is thereby brought on at a time when the weather is generally favourable and before the fall rains set in, which have frequently injured and in some cases entirely destroyed the crop. Sowing on the frost was, I believe, first introduced here on occasion of inclosing new lands from the sea. These were so soft in the spring as to render it impossible to take cattle upon them after the frost was out, until it became too late to sow wheat; and the farmers were consequently obliged to sow while the frost was still in the land and the surface sufficiently hard to bear up the team. At the time of inclosing the Dead Dike on the Eastern part of our Grand Prairie this course was followed and it appeared to James Harris, Esq. your present Secretary, that it might be applied to the old Dike or Grand Prairie and to all other lands. He immediately acted upon the idea and found his expectations fully answered, and this has now become the invariable practice with many of our best Farmers in this township. The early sown grain too, being exposed to the spring rains is much more likely to come up—this is an important consideration, as Wheat has been known to be so musted and spoiled by lying long in the ground before rain, that it never came up at all. This was the case with a good deal of the seed sown last year after the spring rains were past, which were succeeded by a long spell of dry weather. Moisture is indispensable to vegetation. After the frost has left the ground, it ought never to be worked or sown when it is wet and out of order. The difference of a few days in this respect is not of much consequence and the farmer who waits for the proper period of sowing or planting, has often the satisfaction of seeing his crop overtake and distance that of his more precipitate neighbour. While on this part of the subject I cannot refrain, in passing, from again urging the immense importance of thorough ditching and draining, by which soils naturally cold and wet may be rendered not only more productive, but fit for the reception of the seed several days earlier than if these are neglected.