

tion with the wholesale seed houses a *testing-ground*, the presence of which has a great tendency to strengthen the confidence of customers.

In England and Germany the law demands seedsmen to guarantee the *vitality, purity* and *cleanliness* of the seeds offered for sale.

This has had a most beneficial effect upon the seed sold in those countries to farmers and gardeners, but it does not interfere with export trade, so that while great care may be exercised to sell a good article at home, yet a much inferior may find its way into our country. Much loss is sustained yearly from seed being not *true* to name, not *clean* and low in *vitality*, and as yet there seems no redress for the unfortunate purchaser in Ontario. It is claimed that most seedsmen are sufficiently jealous of their reputation to be a safeguard against imposition. This may be true to some extent, but it is feared there are many who run the risk of selling seeds they would not if they knew the law was ready to protect the unlucky purchaser. There is no doubt the use of "testing-grounds" by seedsmen has lessened the trouble very much.

We would scarcely imagine that men would stoop to grind up quartz, sift and color it, so as to adulterate clover seed, and yet this has been conclusively shown to have been followed by some. Cases have occurred in which men have had hundreds of pounds of this spurious material sold to them in adulterated clover seed. Clover seed may be considered one of the most impure seeds in the market.

In making our observations, one-half ounce of the seed was taken from the sample obtained and the number of weed seeds, particles of sand, dirt, etc., carefully counted. The species of weed seed was also noted. One hundred seeds were tested for *vitality* by placing them in conditions favorable to germination, such as moisture, suitable temperature and darkness. The number that sprouted showed the per cent. vital.

The vitality of seeds can be fairly well ascertained by placing seeds between sheets of blotting paper laid on sand, and keeping the paper moist. The samples should be kept where the temperature is not lower than that of the air. If it can be kept about 75° to 85° F. all the better. Some place the seeds on a piece of flannel and cover them also with flannel. The whole is placed in a saucer or plate, kept moist in a warm room and allowed to germinate. If one hundred seeds are used the number germinating indicates the per cent. vital.

If seeds are scattered upon a piece of black cardboard the foreign grains, etc., can be readily detected.