

ducted for two and the second for three years. The results of these experiments show that the phosphatic fertilizers gave the greatest yield of Alfalfa per acre. Of the different fertilizers used, the superphosphate gave the highest yield per acre in the first experiment, and the Thomas' phosphate powder the highest and the superphosphate the second highest in the other experiment. The greatest average annual yield of green Alfalfa per acre was produced on the land which had received the superphosphate at the time the seed was sown, but this increase, over the crop produced on the unfertilized land, was only one-half of a ton per acre.

USES OF ALFALFA.

Alfalfa can be used in Ontario for the production of hay, green fodder, pasture, seed, green manure, silage, a cover crop in orchards, etc. It is quite probable that its use in this Province will be in about the order in which the list is here given.

For the production of hay it is a most valuable crop. Under favorable conditions it produces large yields of hay of excellent quality. Very great care, however, should be taken to cut the Alfalfa just as it is starting to come into blossom, and always before it is more than one-third in bloom, as the crop very rapidly depreciates in digestibility after it has reached the stage of maturity referred to above. Great care should also be taken to not allow the Alfalfa to lie very long in the hot, dry sunshine, as the leaves soon become crisp and are easily broken from the plants. As the leaves are the richest part of the Alfalfa, special care should be exerted to have as few as possible lost. After the crop becomes sufficiently wilted it should be raked into winrows, and the curing process should be finished in the winrows or in the cocks.

The green fodder produced by Alfalfa is both nourishing and appetizing. It is often an advantage to start to cut Alfalfa for green fodder some time before it has started to bloom. The portion of the crop which cannot be used for this purpose before one-third of the blossoms have made their appearance should be cut and cured into hay. The fact that Alfalfa is a perennial plant, as well as the fact that it produces two, three or four cuttings in the one season, makes it a very desirable crop to use for the production of green fodder for feeding to farm stock.

In the average results of experiments conducted at the College in four different years, Alfalfa, when grown alone, gave a greater yield of pasture per acre than any one of the following crops: Common Red Clover, Mammoth Clover, Alsike Clover, White Clover, Yellow Trefoil, Sainfoin, or Burnet. When grown and pastured alone, however, there seems to be even a little greater risk of cattle and sheep becoming bloated when pasturing on Alfalfa than when pasturing on clover. There is also a danger of either cattle or sheep eating the Alfalfa so closely to the ground that they are apt to injure the crowns of the roots, and in some cases entirely kill the plants. Some very excellent results have been obtained from pasturing hogs and poultry on Alfalfa.