

Vitamines.

In the planting of food crops and the preparation of a diet for the labour staff it is impressed on one that it is essential food containing vitamins be allowed. This is a comparatively new term in modern parlance and the following extracts may be of assistance to those concerned with these questions. The Chemist and Druggist February 14th 1920 in the course of an article states, "As is well known, the knowledge of the presence and importance of vitamins is comparatively new, and as yet nothing is known as to the chemical nature of vitamins. But of their importance in nutrition there is no doubt, although, strictly speaking, they are not nutritive in the same sense as proteins, fats, and carbohydrates. It has been established that the dietetic deficiencies which are the cause of beri-beri, scurvy, rickets, and pellagra are due to the absence or want of balance in the proportions of vitamins that should form part of the normal diet. The report deals with a large number of experiments that have been made of feeding animals on artificial diets with and without vitamins.

"The primary sources, however, are the green leaves of plants and the embryos of certain seeds."

The following is taken from Agricultural News, Feb. 21, 1920.

"In an interesting note in the Descriptive Catalogue of the British Scientific Products Exhibition, 1919, several important results of the (Lister) Institute's work are described.

"One of these is the manner in which scurvy was exterminated among the Indian troops in Mesopotamia during the war. At the beginning of the war those troops suffered very severely from scurvy. This disease is caused by the want in food of certain substances called vitamins. Vitamins occur only in the minutest quantities, but if they are wanting in human food a variety of diseases, according to which of the vitamins is deficient, result, with probably consequent death.

"In Mesopotamia, on account of the difficulty of transport, the Indian troops were at first fed principally on dried grains and pulses—good and concentrated foodstuffs, but wanting in one of the essential vitamins. The result was an epidemic of scurvy,

"The Government appealed to the Lister Institute for help, and this was at once forthcoming, as the discovery had been made by researches in the Institute that if a dry pea is allowed to germinate, large quantities of antiscorbutic vitamins are at once formed. All that was wanted was to damp the peas, and expose them to the warm Mesopotamia air for a few hours when they sprouted, and formed the necessary vitamins. This sprouting did not interfere in any way with the cooking of the peas, and, yet, when treated in this simple way, they became a perfectly wholesome food, and the scurvy disappeared."

T. F. C.