

Nauru Rock Phosphate.—This is the cheapest form of phosphoric acid, but fineness of grinding is essential for its efficiency.

NITROGEN.

Nitrate of Soda.—This salt is readily soluble in water, and is in a state that renders it immediately available to plants. It is of great value as a spur to lagging growth, and as an aid to the growth of most crops, especially those that require to make a large amount of green growth, such as the cabbage tribe, lettuces, onions, leeks, spinach, and asparagus. The effect of nitrate of soda is so pronounced that only quite moderate applications are necessary or safe. The effect of a proper amount is to promote a healthy state of growth. An overdose causes a rank and flabby growth. So potent a fertilizer is capable of doing a great amount of good, but it must in most cases be used in moderation. Being so readily soluble it should be applied only to growing crops, otherwise it is liable to be washed out of the soil before it can be used by the plants. Half an ounce per square yard, equal to $1\frac{1}{2}$ cwt. per acre, is a fair dressing for onions. Two applications should be made, one when thinning is completed, the other about a month later. There is no reason why this amount should not be doubled; it may be necessary in cases where growth is very poor.

Sulphate of Ammonia is another important nitrogenous fertilizer, differing from nitrate of soda in that it is more slowly available. This property renders it able to fill a part for which nitrate of soda is not adapted; all crops require some nitrogen, but not all are benefited by the pronounced effects of nitrate of soda. Again, plants that have special nitrogen-requirements need it all the time, and this requirement is supplied by sulphate of ammonia. The correct way to use it is to apply it in late winter or spring when other fertilizers are applied. Some amount of it is soon available, but a whole season is required for it to be all taken from the soil. In this way it has a double use; it is of itself sufficient for those plants whose nitrogen-requirements are low; and it gives a constant supply to plants that have a special nitrogen-requirement, any extra demand being very appropriately supplied by special applications of nitrate of soda.

Dried Blood.—Blood is essentially a nitrogenous fertilizer; it contains some amounts of other elements, but these are so small as not to be worth considering. It is not at first available as plant-food, but most of it can be taken up during the season it is applied. There is an amount of salt in blood sufficient to cause harm if used in excess.

Blood-and-bone.—Blood is more frequently used when combined with bone than separately. This combination forms a lasting nitrogenous and phosphatic fertilizer, useful as a change manure for all crops that require a considerable amount of nitrogen.

POTASH.

Potash forms starch and sugars, thus stiffening the tissues and making plants better able to withstand disease. It directly affects the fruit of plants, making them firmer. Potash has proved to be very beneficial to tomatoes, saving them from the destructive disease known as black-stripe, and improving the quality of the fruit. Pulse