

our readers will endeavour to supply themselves with good kinds.

RASPBERRIES are generally planted too late. In forming new beds it is found that when they are made in October or November, that several years elapse before they become very productive. Our plan is to plant as soon as they have done bearing, or as soon as the leaves begin to fade and curl; the canes are then as much at rest as at any period, and may be removed safely; they require plentiful watering until fully established. In the winter, a good supply of manure must be put about the roots, to be dug in spring, and the result will be a good crop of fruit the succeeding summer. Gooseberry and currant-trees should also be planted as soon as the leaves begin to fade.

Sir Charles Lyell, in his *Principles of Geology*, offers some excellent observations in point, in reference to the animal kingdom, which apply with equal force to the case of vegetables. He says:—

"The modifications in the system of which man is the instrument do not, in all probability, constitute so great a deviation from analogy as we usually imagine; we often, for example, form an exaggerated estimate of the extent of the power displayed by man in extirpating some of the inferior animals, and causing others to multiply; a power which is circumscribed within certain limits, and which, in all likelihood, is by no means exclusively exerted by our species. The growth of human population cannot take place without diminishing the numbers, or causing the entire destruction of many animals. The larger carnivorous species give way before us, but other quadrupeds of smaller size, and innumerable birds, insects, and plants, which are inimical to our interests, increase in spite of us, some attacking our food, others our raiment and persons, and others interfering with our agricultural and horticultural labors. We force the ox and the horse to labor for our advantage, and we deprive the bee of his store; but, on the other hand, we raise the rich harvest with the sweat of our brow, and behold it devoured by myriads of insects, and we are often as incapable of arresting their depredations, as of staying the shock of an earthquake, or the course of a stream of burning lava. The changes caused by other species, as they gradually diffuse themselves over the globe, are inferior probably in magnitude, but are yet extremely analogous to those which we occasion. The lion, for example, and the migratory locust, must necessarily, when they first made their way into districts now occupied by them, have committed immense havoc amongst the animals and plants which became their prey. They may have caused many species to diminish, perhaps wholly to disappear; but they must also have enabled

some others greatly to augment in number, by removing the natural enemies by which they had been previously kept down. It is probable from these and many other considerations, that as we enlarge our knowledge of the system, we shall become more and more convinced, that the alterations caused by the interference of man, deviate far less from the analogy of those effected by other animals than we usually suppose. We are often misled, when we institute such comparisons, by our knowledge of wide distinction between the instincts of animals, and the reasoning power of man; and we are apt hastily to infer, that the effects of a rational and an irrational species, considered merely *physical agents*, will differ almost as much as the faculties by which their actions are directed. A great philosopher has observed, that we can only command nature by obeying her laws, and this principle is true, even in regard to the astonishing changes which are superinduced in the qualities of certain animals and plants by domestication and garden culture. We can only effect such surprising alterations by assisting the development of certain instincts, or by availing ourselves of that mysterious law of their organization, by which individual peculiarities, are transmissible from one generation to another.

The distinctness, however, of the human from all other species, considered merely as an efficient cause in the physical world, is real, for we stand in a relation to contemporary species of animals, and plants, widely different from that which other irrational animals can ever be supposed to have held to each other. We modify their instincts, relative numbers, and geographical distribution in a manner superior in degree, and in some respects very different in kind from that in which any other species can affect the rest."

MOSS ON TREES.—Fruit trees growing in confined localities upon wet, undrained land, as well as those planted on hills in exposed situations, are most subject to mosses and lichens. That parasites prove most destructive to the tree they inhabit is well known to every pomologist, and though various means have been recommended, yet none is so efficacious and so simple in application as whitewashing the stem and principal branches as far as practicable; this not only destroys every germ of moss and lichen, but also every kind of insect harboured in the crevices of the bark. But should there be an objection to the white appearance of the tree, take two parts of beechwood ashes, one part of salt, adding a little soft soap; mix the whole in a pail of water, let it remain until it gets clear, when by washing the tree with this solution, the result will be equally satisfactory.—*Allgemeine Gartenzeitung*.—[The washing should be performed in the autumn as soon as the fruit is gathered.]