ALIMENTARY PROPERTIES OF TREES.

In examining the physical properties of animal and vegetable products, science displays them as closely linked together; but it strips them of what is marvellous, and perhaps, therefore, of a part of their charms. Nothing appears isolated; the chemical principles that were believed to be peculiar to animals are found in plants; a common chain links together all organic nature.

Long before chemists had recognized small portions of wax in the pollen of flowers, the varnish of leaves, and the whitish dust of our plums and grapes, the inhabitants of the Andes of Quindiu made tapers with the thick layer of wax that covers the trunk of a palm-tree.* It is but a few year since we discovered, in Europe, caseum, the basis of cheese, in the emulsion of almonds; yet for ages past, in the mountains of the coast of Venezuela, the milk of a tree, and the cheese separated from that vegetable milk, have been considered as a salutary aliment. How are we to account for this singular course in the development of knowledge? How have the unlearned inhabitants of one her-isphere become cognizant of a fact which, in the other, so long escaped the sagacity of the scientific? It is because a small number of elements and principles differently combined are spread through several families of plants; it is because the genera and species of these natural families are not equally distributed in the torrid, the frigid, and the temperate zones; it is that tribes, excited by want, and deriving almost all their subsistence from the vegetable kingdom, discover nutritive principles, farinaceous and alimentary substances, wherever nature has deposited them in the sap, the bark, the roots, or the fruits of vegetables. That amylaceous fecula which the seeds of the cereal plants furnish in all its purity, is found united with an acrid and sometimes even poisonous juice, in the roots of the arums, the Tacca pinnatifida, and the Jatropha manihot. The savage of America, like the savage of the South Sea islands, has learned to dulcify the fecula, by pressing and separating it from its juice. In the milk of plants, and in the milky emulsions, matter extremely nourishing, albumen, caseum, and sugar, are found mixed with caoutchouc and with deleterious and caustic principles, such as marphine

* Coroxylon andicola.

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