

## 47194 to 47197—Continued.

duced on every branch. The compound leaves are made up of oblong-ovate leaflets, about 4 inches in length and  $1\frac{1}{2}$  inches wide. In habit of growth the tree appears to be normally rather round topped and spreading, but as it is frequently planted among numerous other trees it is forced to grow tall and slender, branching only at a considerable height above the ground.

"According to J. D'Almeida Pereira, of Singapore, there are 8 or 10 varieties of the rambutan, the difference being in form and coloring. The natives, however, do not distinguish between any of these varieties. Among the varieties of the true rambutan the differences do not seem to be very well marked or of great importance.

"In appearance a cluster of rambutans, when highly colored, is exceptionally attractive. The best forms attain, when fully ripe, a rich crimson color, while the poorer ones are greenish or yellowish, sometimes a combination of these two and lacking any tinge of crimson. The individual fruits are slightly smaller than a hen's egg, but more elongated in form; they are covered with soft spines about half an inch in length, and are borne in clusters of rarely more than 10 or 12. The pericarp is not thick or tough, and to eat the fruit the basal end is usually torn off, exposing the aril. The flavor is mildly subacid and somewhat vinous. An oblong flattened seed is inclosed by the aril.

"A description of the rambutan, taking as a type one of the best forms, is as follows: General form oblong elliptical; weight averaging about 1 ounce; dimension, length  $1\frac{1}{8}$  inches, breadth  $1\frac{1}{4}$  inches; base rounded or slightly tapering; stem slender, short; peduncle 8 to 10 inches long, woody, medium stout, bearing 3 to 10 fruits; surface covered with slender, soft fleshy spines under half an inch in length; color when ripe, crimson or crimson maroon, yellowish when not fully ripe; pericarp one-sixteenth to one-eighth of an inch thick, firm, greenish, aril whitish, transparent, about one-fourth of an inch thick, meaty, very juicy, flavor subacid, vinous, pleasant; seeds one, large, oblong, compressed, pointed at the apex, the aril adhering to it closely. For inferior varieties about the only change to be made would be in the size and coloring of the fruit."

47196. *Pamboetan si kouto*.      47197. *Atjeh lebak boelaes*.

47198. *ABIES MARIESII KAWAKAMII* Hayata. Pinaceæ.      **Fir.**

From Formosa. Presented by the Arnold Arboretum, Jamaica Plain, Mass.  
Received February 21, 1919.

This differs from the type in having longer cylindrical cones and black seeds. *Abies mariesii* is a tree 40 to 50 (occasionally 80) feet high, of compact, pyramidal form; the young shoots are very densely covered with red-brown down which persists several years. The leaves, one-third to an inch long and one-twelfth of an inch wide, are dark shining green and deeply grooved above, glaucous beneath with two broad bands of stomata. The lower ranks spread horizontally, while the upper shorter ones point forward and completely hide the shoot. The egg-shaped cones, 3 to 4 inches long and about 2 inches wide, are purple when young. It is one of the rarest of the silver firs. (Adapted from *Bean, Trees and Shrubs Hardy in the British Isles, vol. 1, p. 123.*)