

little while those trees lasted. I have reason to believe this substance to be highly nutritious. I have eaten the gruel, and think it fully as palatable as that made of the Sago we get from the Malay countries." *Roxb. op. cit.*

89. (2) *Caryota obtusa*, (n. sp.) arborea, pinnulis valde inæquilateralibus erosis dentibus brevibus obtusissimis, floribus masculis distantibus, antheris mucronulatis.

HABIT.—Mishmee Mountains in woods about Yen. Altitude above the sea 3-4000 feet.

DESCR.*—A very large palm; diameter of the trunk $1\frac{1}{2}$ -2 feet. Leaves very large; pinnules cuneate, very unequal sided, coriaceous, when dry remarkably striato-plicate; the outer side scarcely at all produced; the teeth short, very obtuse.

Branches of the male spadix long, flexuose, scurfy. Flowers distant, three together, the central (female) later in development. Males about 5 lines long. Sepals rounded, scurfy and ciliate. Petals $2\frac{1}{2}$ times longer than the sepals. Stamina indefinite. Anthers linear, mucronulate. Female flower (in bud.) Calyx as in the male. Petals much smaller, valvate. Sterile stamina 3, opposite to the sepals. Ovarium subturbinate with a trigonal vertex, 1-2 celled. Ovula solitary, erect. Stigmata 2, oblong, cordate-subreflexed.

I met with this palm in 1837, during a hurried journey to the Mishmee Mountains. Its habit is that of *C. urens*, from which the obtusely toothed pinnules at once distinguish it. The Assamese coolies who were with me called it Bura Suwar, their name for *C. urens*. The Mishmees make use of the central soft portion of the trunk as food.

The pinnulæ are not unlike those of *Seguaster major*, Rumph. Hb. Am. 1. t. 14; but my specimens do not contain an entire pinna, with the attaching part of the petiole.

I find in my notes mention made of a second species inhabiting the Mishmee Mountains, with the inflorescence of an

* Partly from notes made on the spot, from dried specimens of a portion of a leaf and a spadix.

orange yellow colour. Attention should also be directed to the "Semoong-koong"* of Sikkim, which is probably a species of *Caryota*.

90. (3) *C. sobolifera*, arbuscula, sobolifera, pinnulis sub-obtuse erosis et dentatis latere exteriori cuspidato-acuminatis, staminibus circiter 17, antheris mucronulatis, baccis sæpius monospermis depresso-globosis magnitudine globuli sclopetarii minoris.

C. sobolifera. *Mart. Palm. p.* 194.

HABIT.—About Malacca and on Pulo Bissar in woody places. Malayan name, *Tookkus*. *Doodoor* of Penang, *Mr. Lewes*. Introduced into the Botanic gardens in 1816 from the Mauritius, flowers during the greater part of the year.

DESCR.†—A very elegant *Palm*, forming by its offsets very thick compact tufts. *Stems* 12-15 feet high, 4-5 inches in diameter, greenish, distinctly annulate. *Leaves* 8-9 feet long, spreading, nodding towards the apex, glaucescent greenish; *petioles* and *sheaths* scurfy downy; *pinnulæ* (basilar) sub-opposite, (the rest alternate,) obtuse-deltoid, obliquely præmorse, the outer margin acuminate, regularly and rather obtusely jagged.

Spathes concealing the whole peduncle, almost boat-shaped, at length deciduous. *Spikes* very numerous about a foot long, altogether resembling a docked tail, axis or rachis green, sulcate. *Male flowers* very numerous, oblong, flesh-coloured, with reddish points. *Calyx* cup-shaped, sepals broad, imbricate. *Corolla* of three, coriaceous, striate, almost distinct, petals. *Stamina* about 17; *filaments* united at the base, very short; *anthers* linear, adnate, generally slightly mucronulate. *Pollen* ovato-lanceolate, 1-3 plicate.

Female flowers at the time of expansion of the males minute, rudimentary, not developed until after the males of the same spadix have fallen off. They are smaller than the males, not always solitary, but sometimes in pairs or threes, or solitary with a scar of one male only. *Bracteolæ* two, right and left. *Sepals* rounded, with a brown intromarginal line, and ciliate edges. *Corolla* twice as long, tripartite to a little below the

* See Journal of the Agricultural Society of India, vol. 2. p. 323.

† Description, excepting the female flowers, from the Malacca Plant.