

A REPUTEDLY TOXIC *MALOUETIA* FROM THE AMAZON

BY
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ALONG the inundable forests of the uppermost Amazon River, one of the common understory trees is the apocynaceous *Malouetia Tamaquarina*. This species I found to be especially frequent along the small Amazonian tributary, Río Loretoyacu, in the Colombian "Trapecio Amazónico," in the vicinity of Leticia. It first attracted my attention during a study of *Hevea* and other lactiferous trees of that region in 1944, since its copious latex was often added to *Hevea*-latex as an adulterant.

What interested me most in my study of *Malouetia Tamaquarina* was the reputation which the fruits have as a poison. This reputation is widespread in the Leticia-area, and the many reports which I heard during my three-year stay in Leticia agree strictly in details.

According to the natives, the ripened fruit of *Malouetia Tamaquarina* is consumed by the *pajúil* (*Nothocrax urumutum* (Spix)), a wild bird frequently seen under domestication in this part of the Amazon. The flesh of the *pajúil* is a great delicacy which may be eaten at any time of the year. During the months of March through June, however, when *Malouetia Tamaquarina* is in fruit, the bones of the bird must not be thrown to the dogs, lest they poison the animal. This poisoning is of a curious kind: it causes immediate and violent upsetting of the digestive tract and, within four or five hours, a glassy-eyed stare and interference with normal muscular coordination of the legs. It sometimes may be fatal.

A recent study of apocynaceous alkaloids (Raffauf, R. F. and M. B. Flagler in *Econ. Bot.* 14 (1960) 37) indicates that alkaloids have not been reported from *Malouetia*. I have not seen this poisoning reported in the literature, and I encountered it only in the Leticia-area. An

incidental report appeared in one of my previous papers (Schultes, R. E. in Bot. Mus. Leaf. Harvard Univ. 16 (1953) 90). There would be every reason to give some credence to the reports because the *Apocynaceae* or Dog-bone Family is known to have highly toxic members.

Malouetia Tamaquarina is called *cuchara-caspi* ("spoon tree") in the Leticia-area, as the soft wood was formerly whittled into spoons. Some local rubber tappers refer to it as *chicle*. The tree may attain a height of fifty feet, averaging between thirty and forty. The usually straight, cylindrical trunk, with a diameter of twenty inches, is covered with a brownish or ashy-purple bark. The crown is light and irregular. The tree blossoms profusely, bearing white to yellowish, fragrant flowers. The free-flowing latex has a sweet flavor but causes a slight burning of the tongue. The wood is soft and white.

There are several closely related species of *Malouetia*, and these may be similarly poisonous. *Malouetia nitida* Spruce is reported to be used as an arrow poison. Hare, H. A., B. Caspari and H. H. Rusby "National Dispensatory," Ed. 2 (1908) 213). The leaves of what appears to be *Malouetia Tamaquarina* are sometimes added to the narcotic drink prepared from *Banisteriopsis Caapi* in the Colombian Vaupés (Schultes, R. E. in Bot. Mus. Leaf. Harvard Univ. 18 (1957) 39).

Malouetia Tamaquarina extends from the Guianas across the northwestern Amazon of Brazil, Colombia and Peru. A recent segregate has been described: *Malouetia peruviana* Woodson (in Ann. Mo. Bot. Gard. 22 (1935) 259), but the differences seem to be trivial. *Malouetia furfuracea* Spruce of Amazonian Peru is likewise known by the vernacular name *cuchara-caspi*.

An attempt to study *Malouetia Tamaquarina* or a related species chemically would seem to be worthy of consideration.

COLOMBIA: Comisaría del Amazonas, Trapecio Amazónica, Río Loretoyacu. Altitude about 100 m. September–November, 1944. Richard Evans Schultes 6034; 6083; 6112.