## THE

# NAUTILUS

## A MONTHLY DEVOTED TO THE INTERESTS OF CONCHOLOGISTS.

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This shell is not closely allied to any shell with which I am acquainted. On the one hand it resembles some of the *Pleurobemas* of the group typified by *P. fassinans*, Lea, and on the other hand it bears some resemblance to a young and thin *Q. aurea*, Lea. In the concentric coloring of the lines of growth, it reminds one of *Q. asperata*, Lea. Its deep and compressed beak cavities place it in the genus *Quadrula*, while its resemblances to the latter two species is too slight to cause any error in their direction. Four specimens were found in the Tallapoosa River, Ala., by Mr. A. A. Hinkley, who has kindly allowed me to retain the specimen figured.

### Quadrula rubidula n. sp. Plate I, figs. 3. 4.

Shell small, heavy, somewhat triangular; base emarginate, dorsum arched, posterior angle biangulate; ligament elevated, light red. Beaks not very high, umbones inflated, sides flattened, epidermis brown, rough, obsoletely rayed, and showing traces of a greenish tint.

Cardinals stout, short, rough, inclined to be double in both valves; laterals rather short, heavy, rough, and slightly curved; cavity of shell very irregular, excavated from beak to posterior margin; beak cavity deep and compressed, nacre white, sometimes pinkish, not very iridescent. Long. 36, alt. 32, diam. 22 mm.

The shell is close to *Q. rubida*, Lea, and some forms resemble some of the depauperated specimens of *Q. trigona*, Lea. From either of these species it may be differentiated by its small size, and by the biangulated posterior angle. Some 30 or 40 specimens from the Mulberry River; 20 or 30 from the Black Warrior, and a single specimen from the North River, Alabama, show a remarkable constancy in size and other characters. Examples may be seen in the cabinets of most of the collectors of Unionidæ in America, contributed by Mr. A. A. Hinkley, of Dubois, Illinois.

#### TWO UNDESCRIBED CALIFORNIAN SHELLS.

#### BY WILLIAM HEALEY DALL.

Murex (Phyllonotus) santarosana n. sp.

Shell small for the subgenus, with about six whorls, each bearing from five to seven strong, low, reflexed varices, with a prominent,

short, reflexed and inflexed grooved spine at the shoulder of the whorl; nuclear whorls one-and-a-half, smooth, minute; nepionic whorls two-and-a-half, with the whorls tabulate, two strong spiral cords at the shoulder, the varices thin, irregular laminæ low and obscure; subsequent whorls, with five (increasing in the adult to seven) strong, anteriorly crispate, amber-brown varices, under which the whorls are tabulate, the intervarical spaces whitish, nearly smooth or with very obscure revolving lines or threads; base of the whorls somewhat constricted with a short grooved spine on each varix where it crosses the concavity; aperture obovate, small, with the inner lip smooth, the outer one more or less denticulate on the edge, the enamel whitish; canal long, anteriorly attenuated, the margins adjacent but not adherent. Height of adult 45.0; max. diameter 28.0; max. diameter of aperture 10.5 mm.

Types, U. S. Nat. Museum, 130628 and 133945.

Dredged by U. S. F. C. Str. Albatross off Santa Rosa Island, in 82 fathoms sand, also found off San Pedro and Catalina Island by various collectors.

Specimens were named and distributed in 1895, but by some inadvertence the descriptions, both of this and the following species, seem to have remained unpublished.

Alaba oldroydi n. sp.

Shell small, polished, pale rufescent brown, with seven whorls, the protoconch smooth, swollen, globose, the following whorl smooth and rather inflated, the subsequent whorls sharply spirally grooved with wider interspaces, crossed especially the earlier ones with a few irregular, low, half obsolete wrinkles, the whorls are flattish and sometimes slightly constricted in front of the suture; the aperture patulous, recalling that of *Rissoina*, the base rounded with no umbilicus. Length 5.25; max. diam. 2.0; length of last whorl 2.5 mm.

Type, U. S. Nat. Mus., No. 158,771. San Pedro, 10 fathoms. Collected by Mrs. Oldroyd, Mr. Roper, Mr. Lowe, and others near San Pedro.

None of the specimens retain the operculum. The form of the shell, and especially of the aperture, recalls *Rissoina*, but the irregular varices, sculpture and apex are more like *Alaba*. A certain amount of doubt as to its true zoological position must remain until the operculum is known.