

- " *desidiata* Say. Winnipeg. Also by Christy.
 " *humilis* Say. Winnipeg. Also by Christy and Dawson.
Physa heterostrophia Say. On all the lists. Quite uncommon here.
 " *ampullacea* Gould? (Dawson.)
 " *ancillaria* Say. Lake of the Woods (Dawson). Also rarely at Winnipeg.
Aplexa hypnorum L. On all lists. Usually a fine shell here.
Planorbis corpulenta Say. Lake of the Woods (Dawson).
 " *trivoltis* Say. On all the lists.
 " *macrostomus* Whiteaves. Lake of the Woods (Dawson).
 " *bicarinatus* Say. (Bell and Dawson.)
 " *campanulatus* Say. Winnipeg, also by Bell and Dawson.
 " *exacutus* Say. Winnipeg, also by Christy, Dawson and Holland.
Planorbis albus Müll. (Holland and Taylor.)
 " *parvus* Say. On all the lists.
 " *umbilicellus* Ckll. (*umbilicatus* J. W. Taylor.) Brandon (Christy, etc.)
Planorbis cristatus L. A pair from this place, identified by Dr. Sterki.
Planorbula armigera Say. On all the lists.
Ancylus parvulus Hald. (Christy & Dawson.)
 " *risularis* Say. (Dawson.)

NEW SOUTHERN UNIOS.

BY BERLIN H. WRIGHT.

N. Harperi, sp. nov.

Shell smooth, with slightly elevated growth lines, black towards the umbos and tinged with red towards the base. Shining above, rayless, oblique or very inequilateral. Umbos elevated and nicely rounded; substance of the shell moderately thick, thinner posteriorly; bluntly pointed behind with an inclination to biangulation. Dorsum slightly arched, ligament red, basal margin slightly curved; umbonal ridge rounded above and decidedly flattened out at the posterior extremity; teeth double in the left and single in the right valve, cardinals pointed, compressed and oblique, with a supplemental tooth or pointed callosity in the right valve midway between the cardinal and

lateral teeth and an accompanying depression in the opposing valve; laterals straight with an elevated collar or ridge as an extension of the lower lateral tooth and extending up to the cardinal; cicatrices confluent, cavity of the beaks very slight, naere pale white in old and flesh-colored in young.

Diameter .75, length 1.25, width 2 inches.

Habitats.—Altamaha, Suwannee and Flint Rivers.

Type in National Museum.

Remarks: Two adults were first received from the Altamaha River, Liberty County, Ga. Later three others came from the Suwannee River, Madison County, Fla., and still later twenty others from Spring Creek, a branch of the Flint River, in Decatur County, Ga.—showing quite a range, and yet in all of these places it seems to be a rare shell, as so few were received in large lots of several hundred. The teeth are quite large and solid for the size of the shell. It is difficult to place it with any group, for which reason comparisons would seem out of place. The younger specimens bear some resemblance to *simulans* or *nux*, but it is less inflated in the umbonal region, and more compressed or flattened and pointed behind than either of them, and is also more oblique or inequilateral. It has heavier and blunter umbos and beaks than *N. perovatus* Con., and also a straighter base and less pointed behind.

We dedicate this species to Prof. George W. Harper, Principal of the Woodward High School, of Cincinnati, O.

V. Tinkert, sp. nov.

Shell black above, shading off to a lighter color posteriorly and around the base, covered with close elevated growth lines; nearly circular, somewhat inflated; rayless, except in the very young, which are covered with fine green rays; bluntly pointed behind, gracefully and continuously curved in front up to the dorsal margin; dorsum arched; base abruptly extended near its center by reason of the broad, rounded ridge which extends from umbo to base; cardinal teeth solid, direct and double in both valves; lateral teeth double in the left and single in the right valve, heavy, somewhat curved, very deeply indented and coarsely serrated; beak cavity considerable and very angular, anterior cicatrices separated by a mere thread, posterior cicatrices confluent; naere white or slightly flesh-colored.

Diam. 1, length 1.50, width 1.75 inches.

Habitat: Tombigbee River, Alabama.

Type in National Museum.

Remarks: This is another of those shells that is not strongly distinct from other known forms and yet sufficiently removed from any to make a name necessary. It seems to lie between *U. costaneus* Lea and *U. unicolor* Lea—from the former it differs in being more circular, thinner, not tumid, not so oblique, darker colored, shorter laterals, less capacious, beaks blunter and undulations fewer and coarser. From unicolor it differs in being thicker, rougher, more inflated, narrower, pallial margin and white nacre. Some forms of it approach *U. levi* Lea, but are less inclined to a quadrate outline and blacker, and the young are beautifully rayed.

We name this species for Prof. B. W. Tinker, Superintendent of Schools of Waterbury, Conn., who has a fine collection and takes special interest in this branch of natural science.

(To be continued.)

CREPIDULA CONVEXA SAY, VAR. GLAUCA SAY, SAN FRANCISCO BAY.

As will be seen by the following from a recent letter received from Mr. Hemphill, he has made another interesting discovery:

"I had a couple of hours a few days ago on the old oyster-beds at Alameda again, and have added *Crepidula glauca* Say to the introduced shells from the east. I send you samples of the dark and light varieties. The largest ones I send are as large as any among the 30 or 40 specimens I found."

The largest measured $12\frac{1}{2}$ mm. by not quite 9 mm. and are quite characteristic. It remains to be seen whether this species will attain as large size in this new environment as in its native haunts. The last (February) NAUTILUS, it will be remembered, contained a brief note, announcing the detection of *Fusus* (*Crossulpinax*) *cinereus*, in this same locality, on the eastern shore of the bay, a dozen miles or so distant from where *U. cinereus* was first discovered. This is Mr. Hemphill's third find of eastern forms in San Francisco Bay.

The specimens above noted are in the U. S. National Museum No. 158501.

ROBERT E. C. STEARNS.

Los Angeles, Cal., March 10, 1899.