

species. Weinkauff (Conch. Cab., ed. Küster, p. 45, pl. v. figs. 9, 11) refers, I suppose, to this species, under the name of *Litorina (Tectarius) thiarrella*, Anton, though his description is vague,¹ and his figure might represent anything.

2. *Echinella*, Swainson, 1840.

Echinella (?) *tectiformis*, Watson (Pl. XLIII. fig. 1).

Echinella (?) *tectiformis*, Watson, Prelim. Report, pt. 5, Journ. Linn. Soc. Lond., vol. xv. p. 95.

Station 235. June 4, 1875. Lat. 34° 7' N., long. 138° E. Japan. Bottom temperature 38°.1 F. 565 fathoms. Green mud.

Shell.—High, conical, tectiform, carinated, umbilicated, with a flattish depressedly conical base. *Sculpture*: there are many sinuous, rather remote, longitudinal puckerings, minute below the suture, then evanescent, but on the whole lower half of the whorls rising into rarer, narrow, sharply rounded riblets, separated by flat intervals of fully twice their width; on the carina they rise into sharpish little longitudinal tubercles; below this they rapidly and almost wholly disappear, showing on the base only as slight undulations marking the very curved lines of growth. Besides these there are minute round threads which fret the whole surface. *Spirals*—the base of each whorl is thrown out into a narrow sharp expressed carina, which is rendered more prominent both by the longitudinal tubercles and by the imbrication of the whorls, which project markedly above the suture; the whole surface of the shell is, moreover, covered with fine unequal rounded threads, which are coarser in proportion to the development of the longitudinal puckerings, and which are crisply crimped by the finer longitudinals. On the base a slight swelling runs round near the outer edge. *Colour* a dead, faintly yellowish, chalky white, but which is not altogether without polish. *Spire* very high and narrow. *Apex* broken. *Whorls*: only four remain, of very regular increase; flatly and very straightly sloping down from the deep suture to the carina, below which they are sharply constricted; each whorl is thus imbricated over the one which succeeds it. *Suture* squarely angulated and deeply impressed. *Mouth* squarely rounded, rather small. *Outer lip* thin. *Pillar lip* broadly reflected over the umbilicus. *Umbilicus* small but deep, with a narrow swollen edge. H. 0.9 in (?). B. 0.65, least 0.58. Penultimate whorl, height 0.2. Mouth, height 0.25, breadth 0.25.

The only specimen of this species is badly broken, so that the measurements, that of height in particular, are somewhat imaginary. It is so remarkable a form, however, that it is well worth preservation and description. In the absence of apex, operculum, and animal, its generic place is somewhat doubtful. The texture of the shell rather suggests a *Solarium*, but its extraordinarily high and narrow form, its almost poriform umbilicus, and the character of its sculpture point more to *Echinella*. In shape it resembles *Helix schrammi*, Fischer (Journ. de conch., 1858, p. 184, pl. vii. fig. 8), more than anything else I know.

¹ Weinkauff says the "Embryonalende" is "ungeziert, glänzendglatt." Where unrubbed the surface shows spiral threads, of which the highest is tubercled, and these arise almost, if not quite, at the very top.