

Three new Buccinidae (Mollusca:Gastropoda) from Brazil

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Abstract

Three new Buccinidae found in Central South Brazilian Coast are described. Two belongs to Genus *Engina* and are restricted to Southeast Coast, between Espírito Santo State and Rio de Janeiro State. The third species is a deep water *Metula* found between São Paulo State and Santa Catarina State.

Introduction

During many years some unusual *Engina* were found on Espírito Santo Coast and it was considered *Engina corinnae* Corvo, 1971. On comparison with Florida material, it shows to be a completely different species, restricted to the Paulista Province. Recently some other *Engina* appeared on the cold waters of Cabo Frio area. We had before some dredged material from Ilhabela, São Paulo State, that matches with this other species.

On these last three years some fishing boats started to trawl in deep water on Central-Southern Brazil and a new *Metula* was found. It is a medium sized species close to *Metula agassizi* from Caribbean Sea.

Systematics

Engina janowskyi new species
(Plate A, Fig.1-5)

Type Material: Holotype (13.2mm height x 7.4mm width) MZUSP 37178 (Plate A, Fig.1-3); Paratype 1 (12.3mm height x 7.2mm width) MORG 43853 (Plate A, Fig.4-5); Paratype 2 (13.1mm height x 7.1mm width) MNRJ; Paratype 3 (12.2mm height x 7.1mm width) P.M. Santos Costa collection; Paratype 4 (12.5mm height x 7.0mm width) R. Janowsky collection.

Type Locality: off Guarapari, Espírito Santo State, Brazil

Description

Protoconch mammilate of 1.5 whorls of 0.3-0.4mm, smooth. Teleoconch of 1.5 to 2 whorls.

Shell elongated, shouldered by 7 nodules in each whorl. Body covered by 6-8 strong spiral cords on central part and 4-5 obsolete lamellae cords near the siphonal canal. Small axial lamellae between the cords. Large thickened aperture (55-60% of the body) with 5-6 teeth on the lip and parietal callus. Small callus on the columella. Color from dark brown to orange with a pale band on the central body. Aperture white-cream on the orange specimens to pale brown on the brown specimens. Operculum corneous.

Habitat: Lives on rubble and coral bottom at 15-30 meters, between southern Bahia State to Espírito Santo State.

Etymology: Named after Mr. Robert Janowsky, from New York, USA.

Remarks: For many years this species was considered *E. corinnae* Corvo, 1971 (Plate A, Fig.8-10) (Rios, 1985 & 1994), but the Floridian species is shorter, covered by 8-10 nodulose spiral cords. The color on *E. corinnae* is ivory-white with brown. And *E. janowskyi* differs from the *E. turbinella* (Kiener, 1835) (Plate A, Fig.6-7) on shape and color.

Engina goncalvesi new species
(Plate B, Fig.1-11)

Type Material: Holotype (14.2mm height x 6.7mm width) MZUSP 37179 (Plate B, Fig.1-3); Paratype 1 (12.3mm height x 7.2mm width) MORG 43854 (Plate B, Fig.4-5); Paratype 2 (11.0mm height x 5.5mm width) MNRJ (Plate B, Fig.6-7); Paratype 3 (12.2mm height x 6.0mm width) MNRJ (Plate B, Fig.8-9); Paratype 4 (12.8mm height x 6.1mm width)

P.M. Santos Costa collection (Plate B, Fig.10-11).

Type Locality: off Cabo Frio, Rio de Janeiro State, Brazil

Description

Protoconch mammilate of 2-2.5 whorls of 0.5-0.6mm, smooth. Teleoconch of 1 to 1.5 whorls. Shell elongated, shouldered by 8-10 weak nodules in each whorl. Body covered by 12-13 strong spiral cords and 1 obsolete cord between those. Large thickened aperture (50-55% of the body) with 3-4 small teeth on the lip and small parietal callus. Obsolete callus on the columella. Color from dark brown with a pale band on the central body. Aperture white-purple with pale brown on the lip. Operculum corneus.

Habitat: Lives under rocks at 25-35 meters, between Cabo Frio, Rio de Janeiro State and Ilhabela, São Paulo State.

Etymology: Named after Mr. Paulo Cesar Pinto Gonçalves, from Arraial do Cabo, Rio de Janeiro State, who found the species.

Remarks: This species is close to *Bailya marijkae* De Jong & Coomans, 1988, from the Netherland Antilles, with mainly differences on the aperture. *B. marijkae* has 9 teeth on the lip and 8 knobs on the columella, absent on *E. goncalvesi*. *E. goncalvesi* is also close to *Engina demani* De Jong & Coomans, 1988, also from the Netherland Antilles with differences on the spiral cords and teeth on the aperture.

Metula gigliottii new species (Plate C, Fig.1-11)

Type Material: Holotype (35.1mm height x 13.8mm width) MZUSP 37180 (Plate C, Fig.1-3); Paratype 1 (36mm height x 15.2mm width) MORG 43855 (Plate C, Fig.4-5); Paratype 2 (38.1mm height x 15.4mm width) MNRJ (Plate C, Fig.6-7); Paratype 3 (33.2mm height x 13.0mm width) P.M. Santos Costa collection (Plate C, Fig.8-9); Paratype 4 (33.0mm height x 13.5mm width) S.Gigliotti collection (Plate C, Fig.10-11).

Type Locality: off Cabo de Santa Marta, Santa Catarina State, Brazil

Description

Large mammilate protoconch of 2-2.5 whorls of 1.5-2.0mm, normally broken in adult specimens, smooth. Teleoconch of 2 to 3 whorls (Fig.B1). Shell very elongated, fusiform. Body covered by 20-21 strong spiral cords, some nodulose. Large ovated aperture (30-35% of the body) (Fig.B2) with 13-14 small teeth on the outer lip. Smooth columella. Color from white to cream background with dark brown cords near the suture, white-cream cords in the middle of the body and pale brown cords near the siphonal canal. Aperture pure white. Operculum corneus, translucent.

Habitat: Lives on depths of 200-400 meters

Etymology: Named after Mr. Sidney Gigliotti, from São Paulo, Brazil

Remarks: *Metula gigliottii* n.sp. differs from the *Metula anfractura* Matthews & Rios, 1968 on the shape – *M. anfractura* is a light shell, slender, sculptured by spiral cords intersected by axial threads forming nodes. *M. anfractura* was considered wrongly as synonym of *Metula agassizi* Clenchi & Aguayo, 1941. *Metula gigliottii* n.sp. is close to *Metula agassizi*, from the Florida to Southern Caribbean, with mainly differences on aperture and shape. *Metula agassizi* is more cylindrical; the axial cords are more uniform and more nodulose; aperture is smaller. *M. gigliottii* also is close to *M. africana* Bouchet, 1988 from West Africa and *M. chetyzecchiaie* Bozzetti, 1992.

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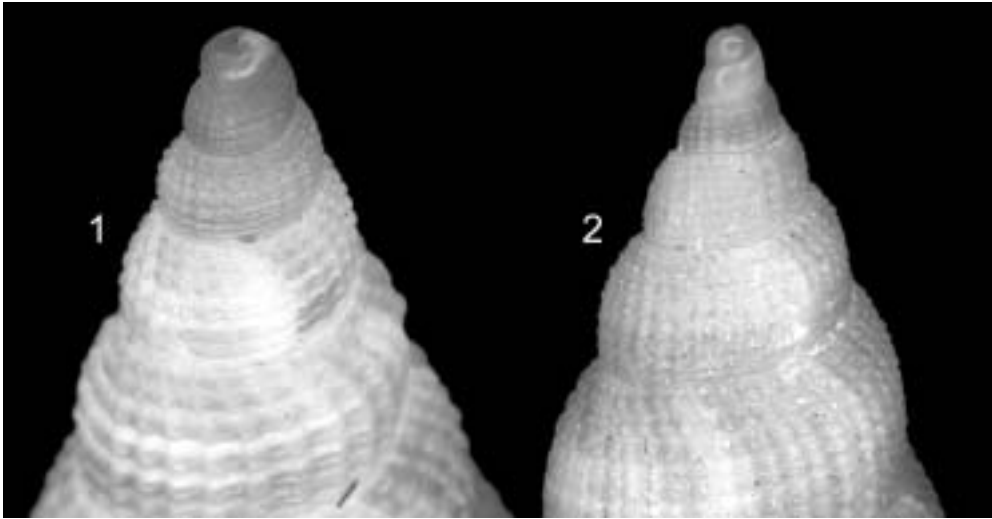


Fig.B1 – 1.*Metula gigliottii*; 2.*Metula anfractura*.

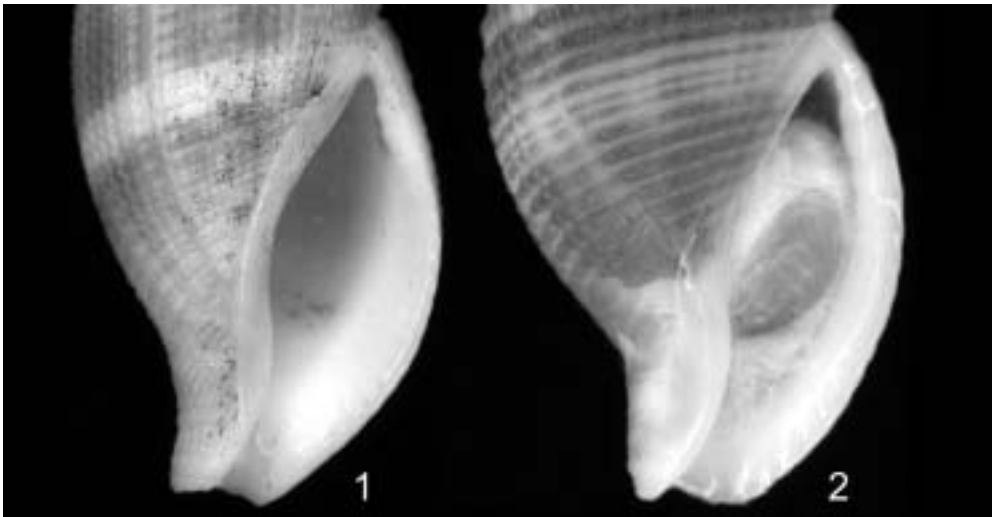


Fig.B2 – 1.*Metula gigliottii*; 2.*Metula anfractura*.

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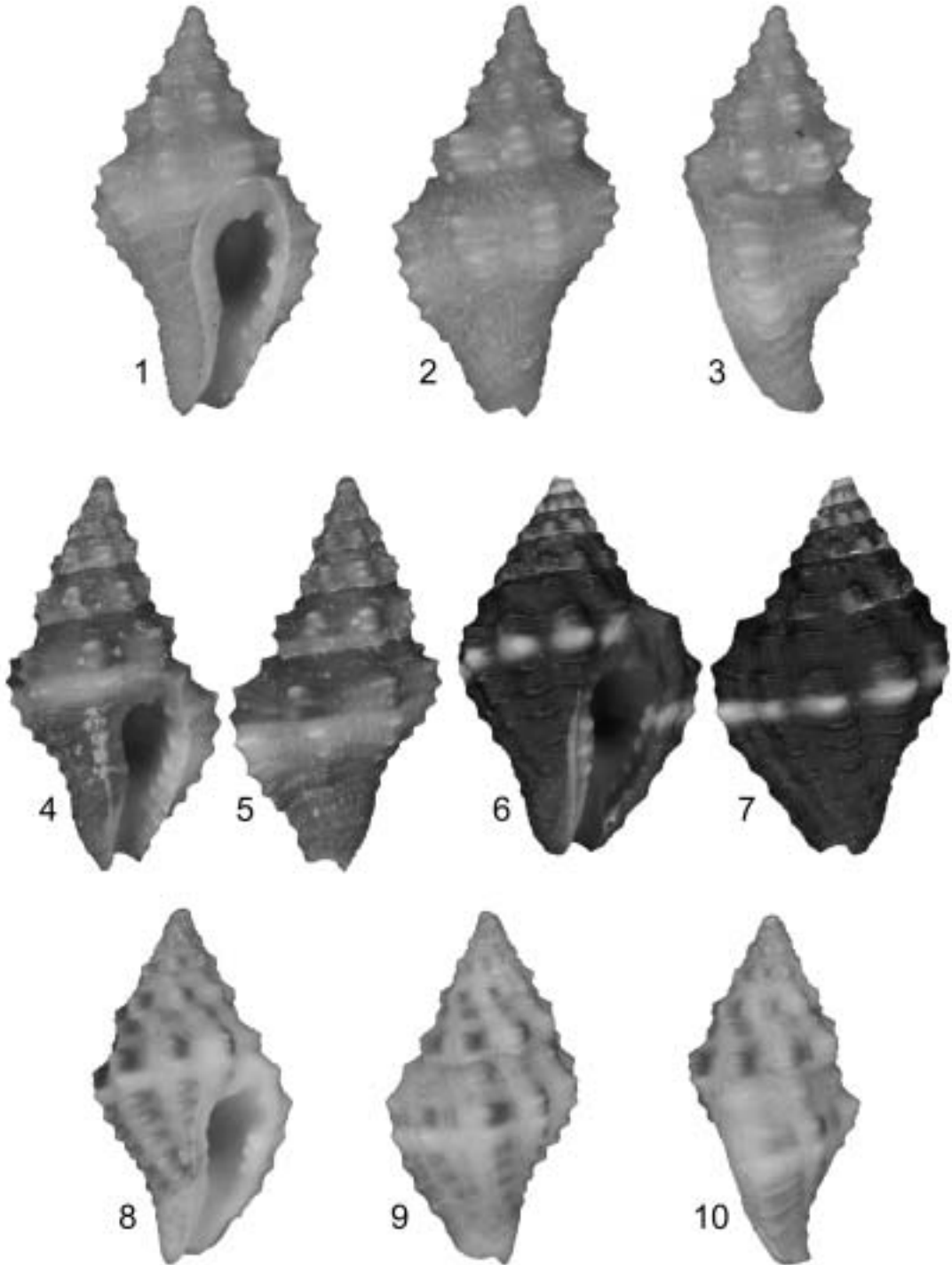


Plate A: Fig.: 1-5. *Engina janowskyi*; 1-3. Holotype; 4-5. Paratype 2; 6-7. *Engina turbinella*; 8-10. *Engina corinnae*

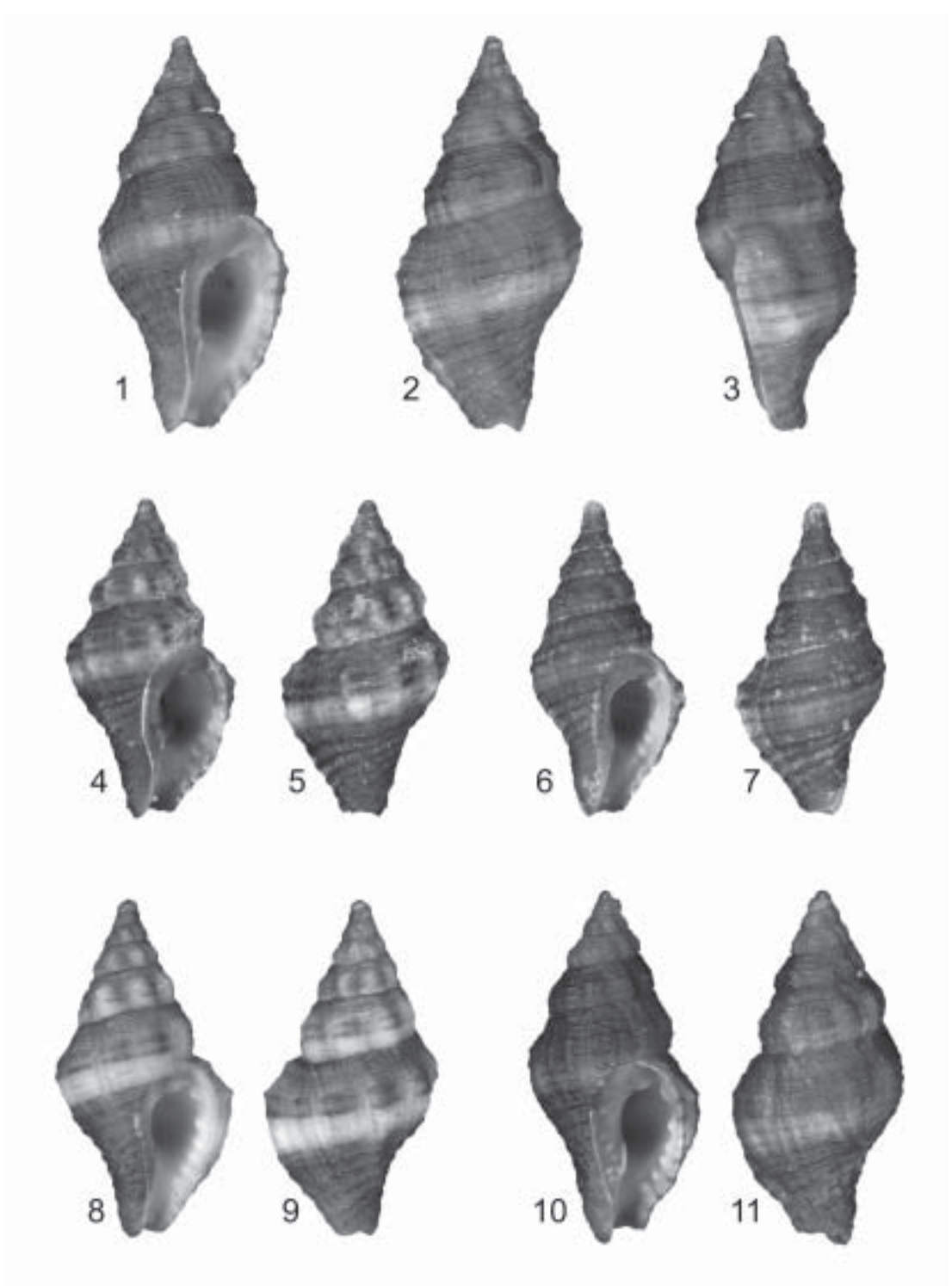


Plate B: Fig.: 1-11. *Engina goncalvesi*; 1-3. Holotype; 4-5. Paratype 1; 6-7. Paratype 2; 8-9. Paratype 3; 10-11. Paratype 4

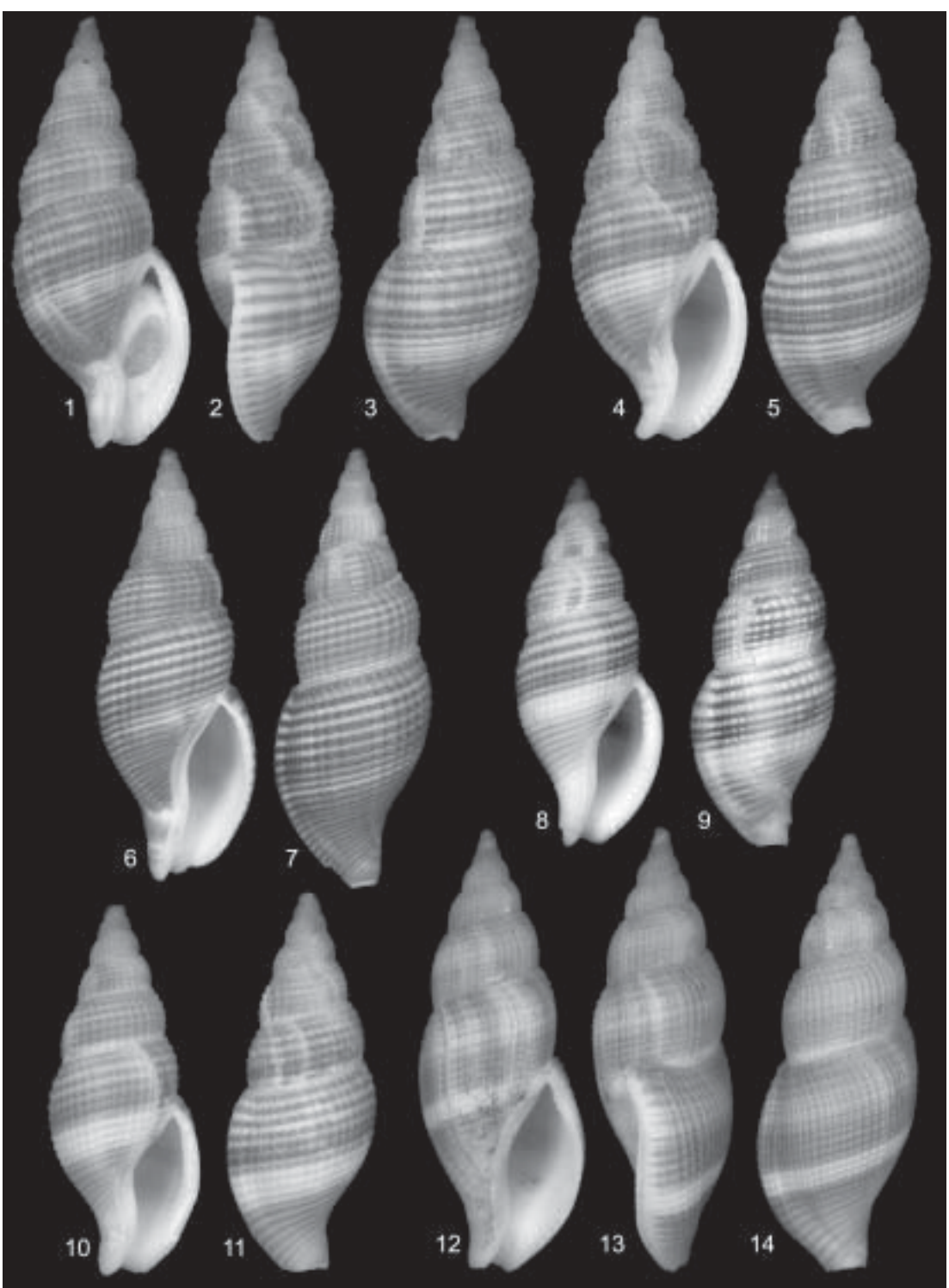


Plate C: Fig.: 1-11. *Metula gigliottii*; 1-3. Holotype; 4-5. Paratype 1; 6-7. Paratype 2; 8-9. Paratype 3; 10-11. Paratype 4; 12-14. *Metula anfractura*