

Nomenclatural observations on the *Ercella* Monterosato, 1894 species (*Gastropoda*, *Helicidae*) from the “Rocca” of Cefalù (Italy, Sicily)

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ABSTRACT

The taxon “*cephalaeditana*” was introduced in 1986 by the authors to indicate a endemic species from the “Rocca” of Cefalù; this species was discovered, named, but never described by E. Pirajno sicilian naturalist (1809-1864). The unusual description was accepted under Articles 11d and 13a of the ICZN Code edition in use at that time, but not to create nomenclatural uncertainties that would be obviously aggravated by the possible introduction of other names, different from the one Pirajno wanted to use for this discovery, we proceed here to a formal (re-)description of the taxon in question.

KEY WORDS

Helicidae; *Ercella*; *cephalaeditana*; ICZN; Cefalù.

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INTRODUCTION

During the restoration of Enrico Pirajno of Mandalisca's collection, carried out around 1980, we found the types of species of terrestrial molluscs described by this Sicilian naturalist.

In the paper we later published on this topic (Giannuzzi-Savelli et al., 1986), we introduced the new taxon *Helix cephalaeiditana* using a name that Pirajno had not published but that he had intended to use, as demonstrated by the original labels found in his collection, to an endemic rupicolous species of the “Rocca” of Cefalù. This species was already mentioned by Pirajno (1840), without describing it, as “*Helix mazzulli* var. β ”.

In our work (Giannuzzi-Savelli et al., 1986) it is clearly shown that we are dealing with a distinct species and that this was also the evident intention of Pirajno, in fact we wrote (p. 205): “Appare evidente che il Pirajno ...abbia elevato a rango di buona specie la sua varietà dell’*Helix mazzulli*”.

Sharing Pirajno's taxonomic approach, we conducted a detailed differential analysis between *Helix cephalaeiditana* and the similar *H. mazzulli* (De Cristofori & Jan, 1832) showing the morphological differences between the two taxa (“Infatti i caratteri conchiliari ... dei materiali tipici e topotipici sono peculiari e costanti e non si ritrovano in nessun'altra popolazione da noi esaminata.”). Moreover, talking about its ecology, we characterized *Helix cephalaeiditana* as “specie rupicola”, thus confirming once again our assessment of the taxon in question as a good species.

In the same work (Giannuzzi-Savelli et al., 1986) we designated the type material that we intended to present indeed as holotype and paratypes, respectively, but at that time, acting somewhat like perfecting a taxonomic choice already made by Pirajno and using his original material, we designed those specimens improperly as lectotype and paralectotypes.

We put no condition to the recognition of *H. cephalaeiditana* as valid taxon of species group,



Figures 1-3. Holotypus of *Ercella cephaloeditana* from "Rocca" of Cefalù. Figure 4. Original label from the Pirajno collection. Figures 5-7. *E. mazzulii* from Monte Pellegrino 500 m. s.l.m., 11.VIII.2007, leg. F. Liberto (H: 31 mm, D: 24,6 mm). Figures 8-10. *E. insolida* from Custonaci, Rocca Rumena, 4.II.2012, leg. F. Liberto (H: 37,4 mm, D: 34,7 mm).

leaving only a margin of uncertainty in the choice between considering this taxon as a distinct species or a subspecies of *H. mazzullii*.

Subsequently, Manganelli et al. (1995) recognized in our work of 1986 the formal extremes for the description of a new species, in accordance with Articles 11d and 13a of the ICZN Code edition in use at that time. Manganelli et al. (1995) regarded "cephalaeditana" as a junior synonym of *Cantareus mazzullii*.

This taxon was later quoted as valid by Cossignani & Cossignani (1995 sub *Helix mazzullii cephaloeditana*), Piazza (2003, sub *Helix mazzullii cephaloeditana* var. *piazzensis*), Colomba et al. (2008, sub *Cornu mazzullii cephaloeditanum*), Liberto et al. (2010, sub *Erctella cephaloeditana*), and Giglio (2002). In this papers, the taxon *cephalaeditana* is only mentioned with reference at Giannuzzi-Savelli et al. (1985); the "var. *piazzensis*" (see Piazza, 2003) has no taxonomic value: it is infrasubspecific rank and the author has expressly used the term "variety".

In the broad debate on the Internet after the publication of this monograph, where this group of endemic and rupicolous terrestrial molluscs from North-Western Sicily is re-evaluated, some colleagues have proposed that the taxon "*cephalaeditana*" should not be considered valid under Article 15.1 of the ICZN Code.

The description of "*cephalaeditana*" in Giannuzzi Savelli et al. (1986), as reported by Manganelli et al. (1995), was certainly unusual, but, surely as well, we placed no condition ("... proposed conditionally ...") on the specific merits of this taxon of whose validity we, like Pirajno, were convinced. As mentioned above, from all the work (Giannuzzi-Savelli et al., 1986) it emerges clearly that we were treating it as a distinct species, without any doubt.

However, to avoid to create nomenclatural uncertainties that would be obviously aggravated by the possible introduction of other names, different from the one Pirajno wanted to use for this discovery, we proceed here to a formal (re-)description of the taxon in question.

Contextually, we are applying to the International Commission on Zoological Nomenclature in order to have all previous uses of *cephalaeditana* for this taxon being suppressed for the purposes of both the Principle of Priority and the Principle of Homonymy.

Erctella cephaloeditana n. sp.

EXAMINED MATERIAL. Holotypus (Lectotipo n. 571/B in Giannuzzi-Savelli et al., 1986) (Figs. 1-3) and 10 paratypi (Paralectotipi n. 571/A, C, D, E e n. 572/A, B, C, D, E, F see Giannuzzi-Savelli et al., 1986).

This material is kept in the malacological collection of the Mandralisca Museum of Cefalù; it is kept in two containers where there are also two labels, referring to Enrico Pirajno, bearing the inscription: "H. Cephaloeditana Mandralisca/Cefalù" (Fig. 4).

DESCRIPTION OF HOLOTYPE. Shell globose-conical; height 28.3 mm; maximum diameter 25.3 mm; aperture height 20 mm; aperture maximum diameter 22 mm; uniformly yellowish; spire elevated; external surface of last two whorls, strongly wrinkled and irregularly reticulated; peristome thickened and well reflected; aperture oval.

VARIABILITY. Paratypes do not show substantial differences from the described holotypus. The length of the shells is between 25 mm and 29.4 mm, the width is between 22.3 mm and 27 mm, the surface of the shell can be more wrinkled and reticulated.

ETYMOLOGY. From the name found on the labels assigned to this species by Enrico Pirajno and referring to the latin name of Cefalù (*Cephaloedium* or *Cephaloedium*), locus typicus of this species.

BIOLOGY AND DISTRIBUTION. Saxicolous and rupicolous species, endemic of the "Rocca" of Cefalù (North Sicily).

COMPARATIVE NOTES. *E. mazzullii* from the mountains of Palermo (Figs. 5-7) differs from *E. cephaloeditana* for the external surface of the shell, especially in the last two whorls, with thin, uniform, and axial wrinkles (more wrinkled, raised and reticulated in *E. cephaloeditana*) and for the peristome simple, little thickened and little reflected.

Another related species, *E. insolidi* (Monterosato, 1892) occurs in some localities in the surroundings of Trapani (Figs. 8-10), is characterized by larger shell (height 33-40 mm; maximum diameter 29-35 mm) spire less elevated, external surface with very thin growth lines, peristome thickened, simple or little reflected, and different anatomical and molecular characters. *E. mazzullii* and *E. insolidi* differ, also, from *E. cephaloeditana* for other anatomical and molecular characters.

CONCLUSIONS

In conclusion, as maintained by Pirajno, *E. cephaloeditana* appears clearly differentiated from *E. mazzullii*, from which is also geographically well isolated. A detailed analysis of the species of the genus *Erctella* Monterosato, 1894 in Sicily by Liberto et al. (2010) and Colomba et al. (2011) offers additional anatomical features and molecular data for *E. cephaloeditana*.

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REFERENCES

- Colomba M.S., Gregorini A., Liberto F., Reitano A., Giglio S. & Sparacio I., 2011. Monographic revision of the endemic *Helix mazzullii* De Cristofori & Jan, 1832 complex from Sicily and re-introduction of the genus *Erctella* Monterosato, 1894 (Pulmonata, Stylommatophora, Helicidae). *Zootaxa* 3134: 1-42.
- Colomba M.S., Liberto F., Reitano A., Gregorini A., Giglio S. & Sparacio I., 2008. Le popolazioni di *Cornu mazzullii* (De Cristofori & Jan, 1832) in Sicilia. (Gastropoda Pulmonata Helicidae). 37 Congresso Nazionale della Società Italiana di Biogeografia, Catania, 7-10 ottobre 2008, 90.
- Cossignani T. & Cossignani V. 1995. Atlante delle conchiglie terrestri e dulciacquicole italiane. L'Informatore Piceno, Ancona, 208 pp.
- Giannuzzi-Savelli, R., Sparacio, I. & Oliva, N., 1986. I tipi di molluschi terrestri della collezione Pirajno del Museo Mandralisca di Cefalù. *Lavori della Società Italiana di Malacologia*, 22: 195-208.
- Giglio S., 2012. Peculiari molluschi della Rocca di Cefalù. In: *Kephalphil 2012. La fotografia a Cefalù nel 50° anniversario di Angelo Varzi*: 14-17.
- International Commission on Zoological Nomenclature (ICZN) 1985. International code of zoological nomenclature, third edition. The International Trust for Zoological Nomenclature, London, xx+338 pp.
- Liberto F., Giglio S., Reitano A., Colomba M.S. & Sparacio I., 2010. I Molluschi terrestri e dulciacquicoli di Sicilia della collezione F. Minà Palumbo di Castelbuono. *Monografie Naturalistiche 2. Edizioni Danaus, Palermo*, 136 pp.
- Manganelli G., Bodon M., Favilli L. & Giusti F., 1995. Gastropoda Pulmonata. In: Minelli, A., Ruffo, S., La Posta, S. (Eds.), *Checklist delle specie della fauna italiana*, 16. Edizioni Calderini, Bologna, 60 pp.
- Piazza I., 2003. Note storiche sulla rara *Helix mazzulli cephaloeditana* e il suo "Locus Typicus" (Rocca di Cefalù). *Cefalù*, 46 pp.
- Pirajno E., 1840. *Catalogo dei Molluschi terrestri e fluviali delle Madonie e luoghi adiacenti*. Stamperia Oreste, Palermo, 40 pp.