convex, regulaly increasing, periphery of the last whorl rounded. *Umbilicus* narrow, open.

Diameter, about 3–4 mm.

HABITAT. Auckland Islands (Professor Benham)."

This species was not taken by Fleming on the Cape Expedition (Powell, 1955). It is hoped to produce a supplementary account of the Subantarctic species when the type, Cape Expedition, and further materials enabling study of the animal become available. It appears that *P. subantarctica* belongs to the sub-genus *Phenacohelix,* whereas the un-named species from the Auckland Islands belongs to the sub-genus *Neophenacohelix.*

Oliver (1950) and Fleming (1954) give relevant information on the geological history of these two isolated island groups. Fleming states, "There is no geological evidence for land connection between New Zealand and Campbell Island since the Pliocene volcano emerged from the sea, but its vegetation during early stages of vulcanism, judged by abundant pollen, contained extinct *Nothofagus* and *Triorites* (? Betulaceae) and rare *Meterosideros* suggesting ready access for the trees. Subsequently, Pleistocene glaciers extended below present sea-level, so that even if the sea receded 100 miles at the same time, only vegetation tolerant of sub-alpine conditions could have persisted. Auckland Islands were built as volcanoes about the same time as Campbell Island and were also severely glaciated in the Pleistocene. Pleistocene sea retreats are unlikely to have linked the islands with New Zealand."

Speculation as to the origin of the Campbell and Auckland Islands *Phenacohelix* may take three obvious lines. The first is that of land links. The vegetation requirements of these snails are all important here. It appears that species are vegetarians living on lichens and fungi. Although the mainland representatives live mainly in forested areas in close association with monocotyledonous plants and ferns, it is not difficult to imagine their survival in low-growing vegetation under extremes of seasonal cold. Representatives of the *P. pilula* complex which is the most widespead one and may be the closest approach to the Campbell Island *P. subantarctica* are commonly found at 2,000 feet in mid-New Zealand regions. Representatives of other genera occur at 4,500 feet in some South Island districts. Land-linked vegetation thus need not be very prolific for survival. The Campbell Island species is now apparently, or till recently, commonly associated with *Dracophyllum.* The second possibility is that the species arrived there transported on floating vegetation, something rather difficult to imagine under the circumstances known at present to prevail in these areas. The third possibility is that of accidental transport by sea-birds. The association of sea-birds with low-growing vegetation is apparently a relatively intense phenomenon in the areas concerned. The building and construction of nests, etc., involves close contact between such low-growing vegetation and birds, and it is not difficult to imagine the possibility that the small snails could crawl between feathers and adhere by their slime for some periods.

Powell (1955) indicates that in the Subantarctic Islands, the Auckland Islands with a total land snail fauna of 11 species, shares 3 in common with the mainland, and the Antipodes (4) shares 3. This is in contrast to the situation in the Three Kings Islands which are only 33 miles off the North Auckland peninsula and have about 15 species, only one of which is shared with the mainland. The species in common frequents low-growing matted coastal vegetation.

SYSTEMATIC KEY TO THE SPECIES OF *Phenacohelix*

A. Protoconch distinctly spirally striated (sub-genus *Phenacohelix*) *ponsonbyi*
  a. Diameter of shell at 3 post-nuclear whorls greater than 4.0 mm
  aa. Diameter of shell at 3 post-nuclear whorls less than 4.0 mm .....