XIII. MIOCENE MOLLUSCA FROM THE D268 SAMPLES IN THE OFFSHORE AREA OF THE HOKURIKU

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Some rock specimens containing fossil molluscs were dredged at St.1085. St.1085 (36°26.0′–36°26.0′N, 136°02.0′–136°02.2′E, 152–145 m depth) is located about 25 km northwest of Tojinbo, Fukui Prefecture on the Japan sea coast.

The following molluscan species were found in the samples at D268 sample which is compris of pebble to granule conglomerate cemented by tuffaceous matter.

Chlamys otukae MASUDA and SAWADA .....7 specimens (valves)
Chlamys sp., indet. .....1 specimen (valve)
Placopecten protomollitus (NOMURA) .....1 specimen (valve)
Turbonilla sp., indet. .....1 specimen

Characteristic species from the D268 samples are *Chlamys otukae* MASUDA and SAWADA and *Placopecten protomollitus* (NOMURA). *Chlamys otukae* was first illustrated by OTUKA as *Chlamys* sp. from the Nanao Formation, Ishikawa Prefecture, and subsequently it was described by MASUDA and SAWADA (1961) as *Chlamys otukae*, n. sp. from the Oido Formation, Miyagi Prefecture, Nanao Formation, Ishikawa Prefecture and Imagane Formation, Hokkaido. Isolated, rather ill-preserved specimens of *otukae* are found which are characterized by small, thin shell, and 21 to 23, the ribs, somewhat

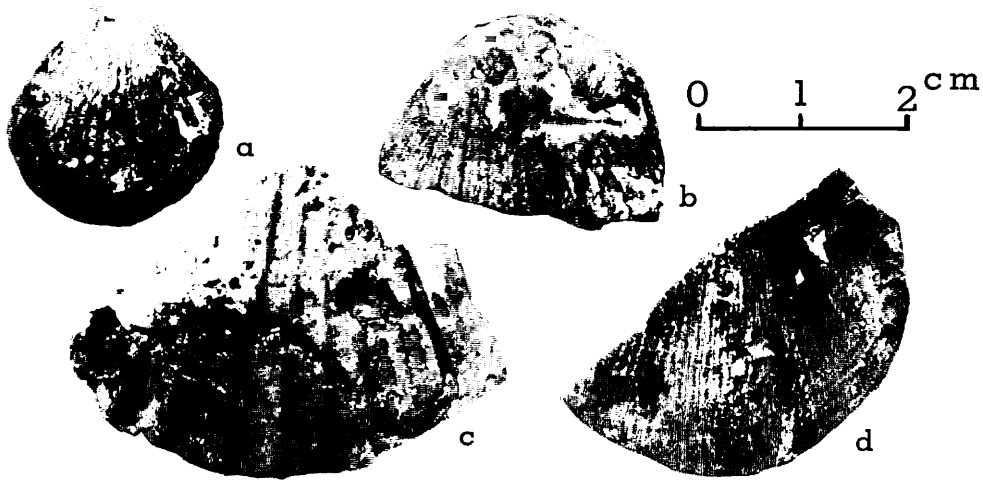

Fig. XIII-1 Fossil Pectinids from D268 a, b. *Chlamys otukae* MASUDA and SAWADA, c. *Chelamys* sp., indet., d. *Placopecten protomollitus* (NONURA).

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elevated, flatly round-topped, smooth radial ribs which tend to divide into two subequal riblets by a shallow longitudinal furrow with growth. The present species is known from the Miocene formations in Japan.

Placopecten protomollitus was described by NOMURA (1935) from the Tanosawa Formation, Aomori Prefecture, and among the Miocene pectinids of Japan it has been considered to be one of the most important species for the age determination and correlation. Although the present specimen is rather poorly preserved, it can be safely matched with *Placopecten protomollitus* (NOMURA) on the basis of the slightly inflated, thin shell and numerous, very low, fine radial threads and fine, very low intercalary threads at rather regular interval. This species has hitherto been described from the Miocene Formations distributed along the Japan Sea borderland such as in the Tanosawa Formation (Aomori Prefecture), Kurosedani Formation (Toyama Prefecture), Higashi-Innai Formation (Ishikawa Prefecture) and Orito Formation (Niigata Prefecture).

From the above mentioned, it is evident that the conglomerates collected from St.1085 can be correlated with the Kurosedani Formation and its equivalent formations. Thus, it appears that the geological age is considered to be Early to earliest Middle Miocene.

The specimens are now preserved in the collections of Chugoku Office of the Geological Survey of Japan, Hiroshima City.

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