

STATION 246.

abundant at the surface. It has a very long tail and spines, and has been described by Dohrn under the name of *Archizoëa* (his *Archizoëa gigas* is a larger form found in the Antarctic and on the coast of Chili). These nauplii are more like those of a Lepadid than of a Balanid, and as *Lepas fascicularis* has been floating on the surface in quantities lately it is probable they belong to that species."

STATION 247.

Station 247 (Sounding 389), Yokohama . Sandwich Islands (see Chart 36, and Diagrams 17 and 18).

July 3, 1875 ; lat. 35° 48' N., long. 179° 57' W.

Temperature of air at noon, 72°·3 ; mean for the day, 71°·3.

Temperature of water :—

Surface,	73·0	400 fathoms,	40·7
25 fathoms,	63·8	500 "	39·1
50 "	58·4	600 "	38·2
75 "	56·0	700 "	37·7
100 "	54·8	800 "	37·2
125 "	54·1	900 "	36·9
150 "	53·5	1000 "	36·6
175 "	52·5	1100 "	36·2
200 "	50·5	1200 "	35·9
225 "	48·7	1300 "	35·6
250 "	46·9	1400 "	35·3
275 "	45·0	1500 "	35·2
300 "	43·5	Bottom,	35·2

Density at 60° F. at surface, 1·02574 ; bottom, 1·02568.

Depth, 2530 fathoms ; deposit, Red Clay, containing 10·06 per cent. of carbonate of lime (see Murray and Renard, Deep-Sea Deposits Chall. Exp.).

Under steam all forenoon. At 2.20 P.M. stopped and sounded in 2530 fathoms. The upper part of the sounding-tube contained a dark red-coloured clay, about an inch in thickness, which did not effervesce with dilute acid, while the lower part was much lighter in colour, effervesced with acid, contained many *Globigerinæ*, Coccoliths, Echini spines, as well as Diatoms and Radiolaria. The line between the two layers was very sharply marked off by the colour, and judging from our experience in the North Pacific the deeper layer would appear to have been formed in a depth of about 2200 fathoms, so that there are indications here of a probable subsidence of the sea-floor. At 1 P.M. obtained serial temperatures down to 1500 fathoms. The carbonic acid was determined in the bottom water, and amounted to 38·2 milligrammes per litre. At 3 P.M. completed