Corrigendum: The Unknown and the Unexplored: Insights Into the Pacific Deep-Sea Following NOAA CAPSTONE Expeditions

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A Corrigendum on

The Unknown and the Unexplored: Insights Into the Pacific Deep-Sea Following NOAA CAPSTONE Expeditions

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In the original article, there were three typographical errors. The number of hours of ROV video collected was incorrectly listed as 189 in two places in the article when it should have been 891.5 hours. These two typos were in the text only. All figures, effort correction calculations and conclusions were based on the correct number. There was a third, additional error in **Table 2**: Howland Island and Baker Island were listed as being a PRINMS when in fact it should have read PRIMNM.

A correction has been made to the abstract.

Corrected paragraph: Over a 3-year period, the National Oceanic and Atmospheric Administration (NOAA) organized and implemented a Pacific-wide field campaign entitled CAPSTONE: Campaign to Address Pacific monument Science, Technology, and Ocean NEeds. Under the auspices of CAPSTONE, NOAA mapped 597,230 km^2 of the Pacific seafloor (with ∼61% of mapped area located within US waters), including 323 seamounts, conducted 187 ROV dives totaling 891.5 h of ROV benthic imaging time, and documented >347,000 individual organisms. This comprehensive effort yielded dramatic insight into differences in biodiversity across depths, regions, and features, at multiple taxonomic scales. For all deep sea taxonomic groups large enough to be visualized with the ROV, we found that fewer than 20% of the species were able to be identified. The most abundant and highest diversity taxa across the dataset were from three phyla (Cnidaria, Porifera, and Echinodermata). We further examined these phyla for taxonomic assemblage patterns by depth, geographic region, and geologic feature. Within each taxa, there were multiple genera with specific distribution and abundance by depth, region, and feature. Additionally, we observed

TABLE 2 | CAPSTONE multibeam mapping accomplishments after 3 years of effort by the *Okeanos Explorer*.

Location	Total area (km^2)	Total mapped after CAPSTONE (km^2)	% Area mapped after CAPSTONE	Area mapped by CAPSTONE (km^2)	% Area mapped by CAPSTONE
Pacific Ocean	161,760,000	22,299,018	13.78	597,230	0.37
Papahanaumokuakea MNM	1,508,874	578,008	38.31	94,157	6.24
Johnston Atoll PRIMNM	442,443	122,804	27.76	62,482.4	14.12
Wake Island PRIMNM	406,970	111,580	27.42	53,259	13.09
Marianas Trench MNM	204,543	167,129	81.71	21,611	10.57
Phoenix Islands Protected Area	406,801	68,020	16.72	19,196	4.72
NMS of American Samoa (Muliava Sanctuary Unit/Rose Atoll MNM)	34,934	16,216	46.42	1,1955.4	34.22
Jarvis Island PRIMNM	315,339	58,889	18.67	11,911	3.78
NZ Territory of Tokelau	318,507	79,874	25.08	10,604.2	3.33
Howland Island and Baker Island PRIMNM	51,149	15,041	29.41	6,356.38	12.43
Kingman Reef and Palmyra Atoll PRIMNM	53,175	46,665	87.76	5,379.92	10.12
Marae Moana (proposed)	1,961,280	344,043	17.54	3,776.59	0.19
Swains Island Sanctuary Unit	135	135	99.61	11,2.645	83.22

CAPSTONE expeditions resulted in 597,230 km^2 area mapped for the entire Pacific Ocean (first row) and all marine protected areas depicted in km^2.

multiple genera with broad abundance and distribution, which may focus future ecological research efforts. Novel taxa, records, and behaviors were observed, suggestive of many new types of species interactions, drivers of community composition, and overall diversity patterns. To date, only 13.8% of the Pacific has been mapped using modern methods. Despite the incredible amount of new known and unknown information about the Pacific deep-sea, CAPSTONE is far from the culminating experience the name suggests. Rather, it marks the beginning of a new era for exploration that will offer extensive opportunities via mapping, technology, analysis, and insights.

A correction has been made to the Discussion, Paragraph 14 (last paragraph):

Ironically named, CAPSTONE is more of a beginning than a culminating experience. It is the launch of decades of data-mining, visual analyses, hypothesis-generation, and justification for future exploration. The trends highlighted in this paper offer a snapshot of what is known, and what remains unknown, in the Pacific Ocean. What we have learned from 3 years and 891.5 h on the seafloor is that the Pacific is not just a place of historical exploration and voyaging: it is a place that offers extensive opportunities for technology innovations, and insights. In other words, it is a place for future discovery.

Additionally, there was a mistake in **Table 2**. Row 11 should read Howland Island and Baker Island PRIMNM. The corrected **Table 2** appears above.

The authors apologize for these errors and state that these changes do not alter the scientific conclusions of the article in any way. The original article has been updated.