

Reef sites

The coral-killing sponge *Terpios hoshinota* invades Indonesia

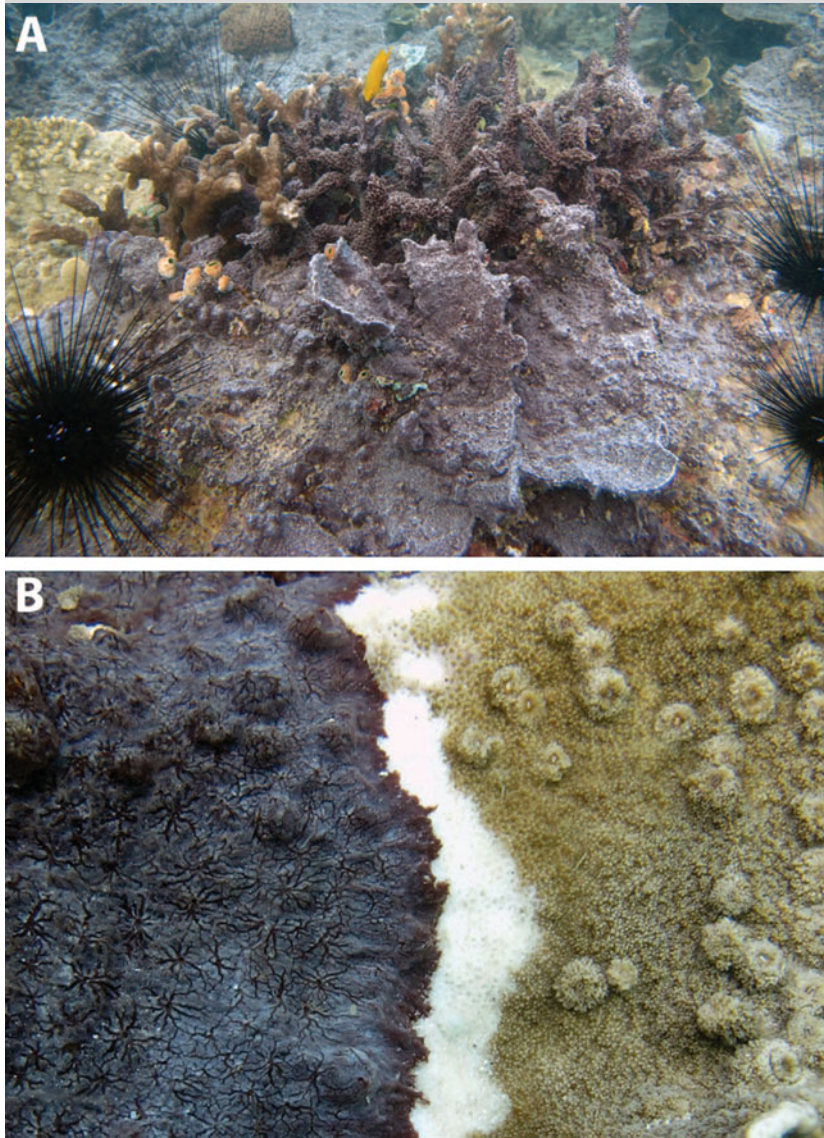


Fig. 1 a *Terpios hoshinota* overgrowing large patches of coral colonies at the reef of Dapur Island, off Jakarta, Java, August 2, 2011 (5°55'22.8"S, 106°43'23.0"E). b Close-up of the sponge overgrowing the coral *Montipora* sp.

Rützler K, Muzik K (1993) *Terpios hoshinota*, a new cyanobacteriosponge threatening Pacific Reefs. *Sci Mar* 57:395–403

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The coral-killing sponge *Terpios hoshinota* recently expanded its range from the Pacific Island of Guam to the northwestern Pacific (Reimer et al. 2012). The black-colored sponge grows symbiotically with several cyanobacteria and is known for occasional massive outbreaks where it smothers and kills corals and other sessile organisms (Rützler and Muzik 1993). The so-called black disease has mainly been recorded in Taiwan and Japan, and more recently in the Great Barrier Reef (Fujii et al. 2012), but so far it has never been reported in the Indonesian archipelago. In 2011 and 2012, we intensively searched for *Terpios* at several Indonesian reefs. The sponge was not found in NE Kalimantan and North Sulawesi, and only a few small patches were observed in SW Sulawesi. It was, however, found overgrowing large areas of coral in the Thousand Islands, Java (Fig. 1a, b). Examination of the spicules and COI mitochondrial DNA sequences confirmed the identity of these specimens as *T. hoshinota* (data not shown). This sponge is known to thrive in polluted and stressed coral reefs (Plucer-Rosario 1987). The coral reefs of the Thousand Islands have been adversely affected by a number of disturbances over the past decades leaving them in a poor state. Importantly, *T. hoshinota* has a wider western distribution than previously thought, and it is important to monitor more areas due to the threat it poses to coral reefs.

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