



### ***Coral diseases and Drupella cornus invasion in the Red Sea***

Among the coral diseases listed and described by Antonius (1995), White Band Disease (WBD), Tissue Bleaching, and Shut-Down-Reaction were lumped as White Syndromes (WS). Damage to Red Sea corals by the corallivorous snail *Drupella cornus* was reported by Schuhmacher (1992), while the dominance of branching *Acropora hemprichi* on Red Sea reefs was pointed out by Riegl and Velimirov (1994).

During a 1996 large scale ecological investigation of coral reefs in the Gulf of Aqaba, 25 investigated reefs from Taba to Ras Mohamed were diagnosed to be in reasonably good health. There was one major exception, however. The reefs of Ras umm Sidd near Sharm el Sheikh were found to suffer from a deadly combination of a *Drupella cornus* population explosion and an epidemic outbreak of White Syndromes. The most abundant reef-building species there, also suffering the heaviest losses, is *Acropora hemprichi*. There appears to be a strong correlation between the abundance of snails and the prevalence of diseases. It is not clear, however, if massive coral die-offs (mostly due to WS) attract or benefit *Drupella cornus*, or whether a population explosion of *D. cornus* promotes an epidemic of WS among the corals.

**Fig.** A small WBD on a branch of *Acropora hemprichi*. *Drupella cornus* feeds at the exact interface of the WBD where the living coral tissue undergoes lysis

#### *Reference:*

- Antonius A (1995) Pathologic syndromes of corals: a review. Publ. Serv Geol. Lux., 23, Proc. 2nd Europ. Reg. Meet. ISRS: 161–169  
Riegl B, Velimirov B (1994) The structure of coral communities at Hurghada in the northern Red Sea. PSZNI Marine Ecology 15: 213–233  
Schuhmacher H (1992) Impact of some corallivorous snails on stony corals in the Red Sea. Proc. 7th Int. Coral Reef Symp., Guam 1992, 2: 840–846

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Reef sites

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