Epistylis plicatilis (Ehrenberg, 1831)

Most likely ID: n.a.

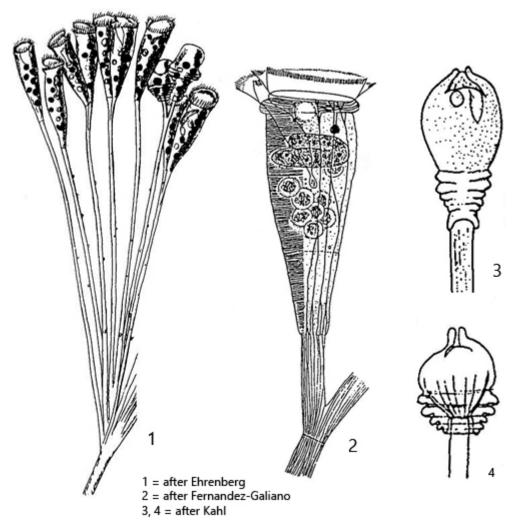
Synonym: n.a.

Sampling location: <u>Ulmisried</u>, <u>Simmelried</u>

Phylogenetic tree: *Epistylis plicatilis*

Diagnosis:

- zooids 90-120 μm long, width 25-50 μm
- extended zooids slenderly funnel-shape
- contracted zooids with snout-shaped anderior end, posterior part annullated
- macronucleus kidney-shaped to horseshoe-shaped, horizontal in anterior half
- micronucleus located between peristome and macronucleus
- one contractile vacuole near peristome
- pellicle with about 117 transverse striae
- stalk non-contractile with longitudinal striationd, width 7-18 µm, dichotomously branched
- colonies up to 4 mm long
- zooids are located in periphery of colony



Epistylis plicatilis

So far I have only found a few colonies of *Epistylis plicatilis* in <u>Ulmisried</u> and <u>Simmelried</u>. The zooids of *Epistylis plicatilis* are quite large with a length of about 100 µm and they are located in the periphery of the colony, which gives them an umbrella-shaped appearance (s. fig. 1). An important identification feature is the shape of the contracted zooids (s. fig. 3 b). The front end is snout-shaped, while the posterior half is annulated and extends over the stalk. The macronucleus can be horseshoe-shaped or kidney-shaped and lies transversely below the peristome. In my population the macronucleus was always kidney-shaped (s. fig. 4). I could not identify the spherical micronucleus. It should not be attached to the macronucleus, but should be shifted towards the peristome. The non-contractile stalk is thick and has a longitudinal striation, which can vary in intensity (s. fig. 5).



Fig. 1: Epistylis plicatilis. $L=105\text{-}126~\mu m$ (of zooids). A small colony of 10 zooids. Obj. 20 X.



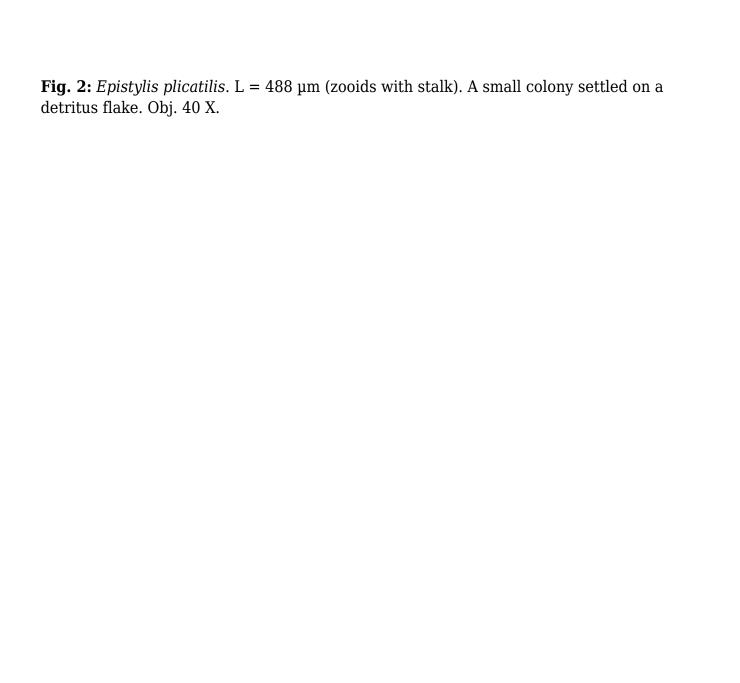




Fig. 3 a-b: Epistylis plicatilis. $L = 93-99 \mu m$ (of zooids). Fully elongated (a) and contracted zooids (b) in the colony as shown in fig. 2. The contracted zooids are $51-66~\mu m$ long, have a snout-shaped anterior end (SA) and an annulated posterior end (AP). Obj. 60 X.



Fig. 4: Epistylis plicatilis. In the strongly squashed zooids the kidney-shaped macronuclei (Ma) and the contractile vacuoles (CV) are visible. Obj. 100 X.

