Closterium cynthia De Notaris, 1867

Most likely ID: n.a.

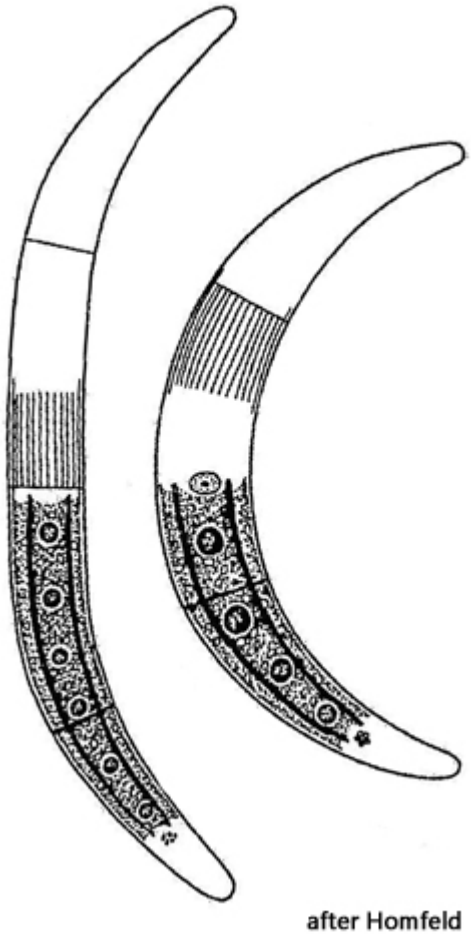
Synonym: n.a.

Sampling location: Paradieswiesen (Austria)

Phylogenetic tree: *Closterium cynthia*

Diagnosis:

- cell almost straigt in mid-region, towards apices strongly curved
- apices broadly rounded, without terminal pore
- length 70–170 µm, width 11–20
- cell wall smooth with tight striation
- two chloroplasts, each with 3–7 longitudinal ridges
- only few pyrenoids arranged along cell axis
- girdle bands present
- cell wall often brownish
- terminal vacuoles with single compound crystal or several single crystals
- nucleus central



Closterium cynthia

So far I have only found *Closterium cynthia* in the Paradieswiesen in Austria. This species is easily recognizable by its strongly curved ends, while the middle part is almost straight or only slightly curved. The specimens in my population were almost all about 200 µm long or even slightly longer. However, there can be no confusion with the similar species *Closterium jenneri*, as this species is smaller than *Closterium cynthia* at 60–120 µm and also has a smooth cell wall without striation.



Fig. 1 a-b: *Closterium cynthia*. L = 216 µm. Two focal planes of a specimen from the Paradieswiesen. Obj. 40 X.



Fig. 2 a-b: *Closterium cynthia*. L = 216 µm. The same specimen as shown in fig. 1 a-b in brightfield illumination. Obj. 40 X.

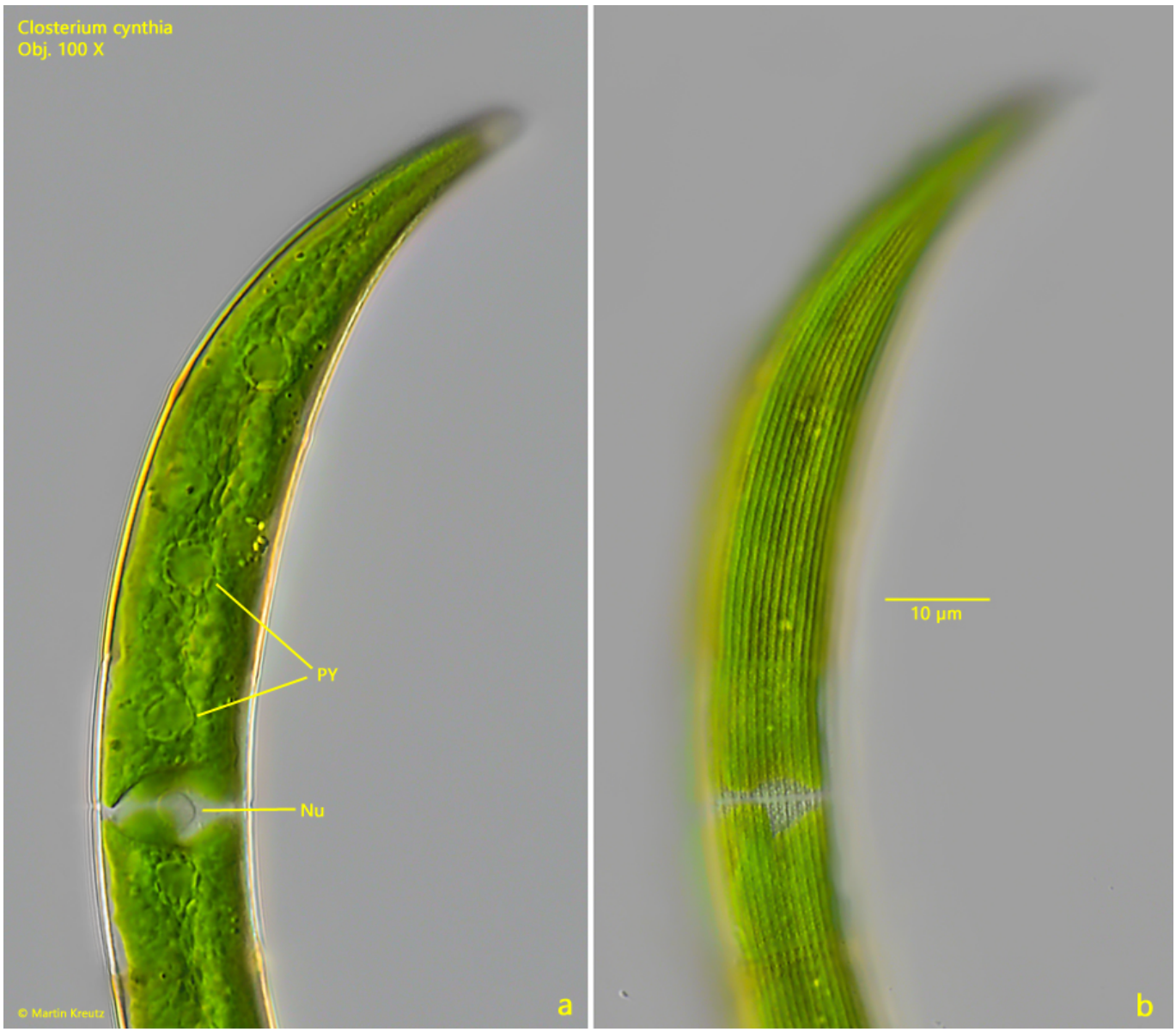


Fig. 3 a-b: *Closterium cynthia*. L = 216 µm. Focal plane on the pyrenoids (a, PY) and the striation of the cell wall (b) at higher magnification. Nu = nucleus. Obj. 100 X.



Fig. 4: *Closterium cynthia*. The terminal vacuole (TV) of this specimen is filled with a compound crystal. Obj. 100 X.