Brachionus quadridentatus Hermann, 1783

Most likely ID: n.a.

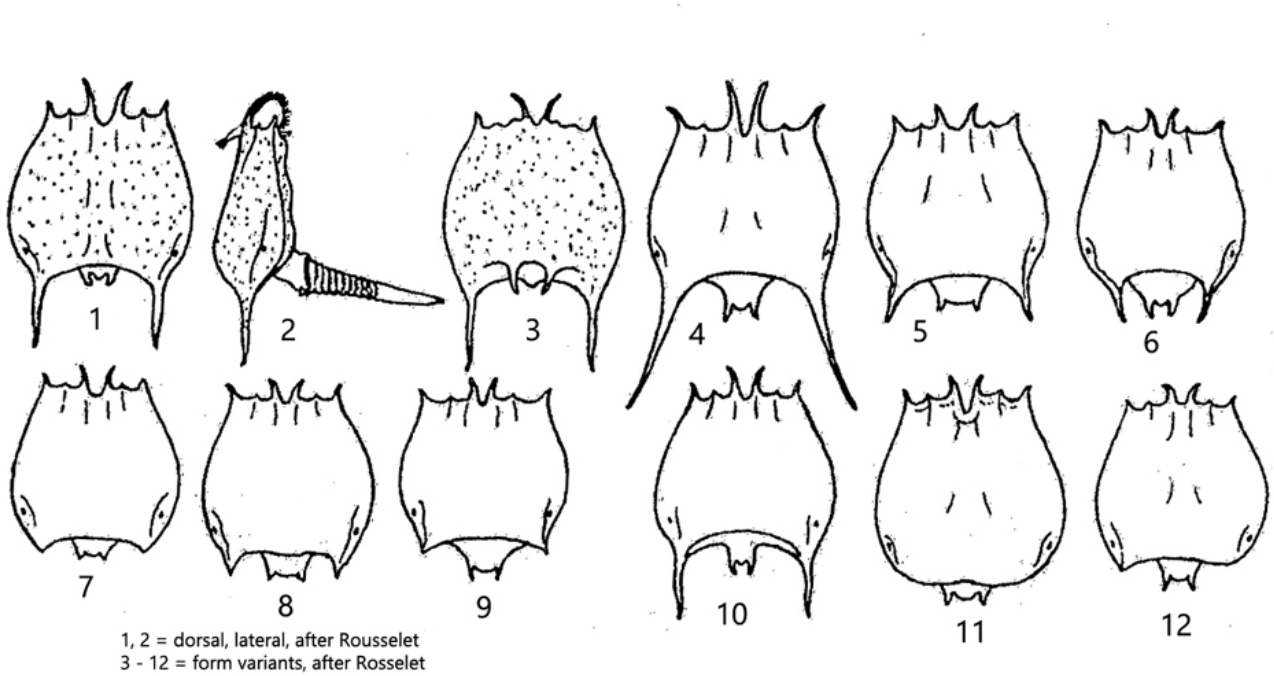
Synonym: n. a.

Sampling location: Mühlhalden pond, Hagstaffel pond, Ulmisried, Simmelried

Phylogenetic tree: ***Brachionus quadridentatus***

Diagnosis:

- length 160–415 µm
- median spines straight and long to medium long, outwardly bent
- posterior spines long to medium long
- lorica shape very variable
- lorica densely granulated, smooth, sometimes facetted
- central plate ornamented
- one eyespot
- foot long, partly curled, toes short
- foot tube with short, mostly asymmetrical lateral spines



Brachionus quadridentatus

Brachionus quadridentatus is a very common rotifer, which I regularly find in the plankton of various ponds but also between floating plants in the Simmelried. The species is very distinctive because of the long spines on the anterior and posterior margin of the lorica. However, there are many variants and intermediate forms (see drawings by Rousselet above) which can make identification difficult. The images below show the most common form.

More images and information on *Brachionus quadridentatus*: Michael Plewka-Freshwater life-*Brachionus quadridentatus*



Fig. 1 a-c: *Brachionus quadridentatus*. L = 390 µm (with foot). A freely swimming specimen in brightfield illumination. Obj. 20 X.

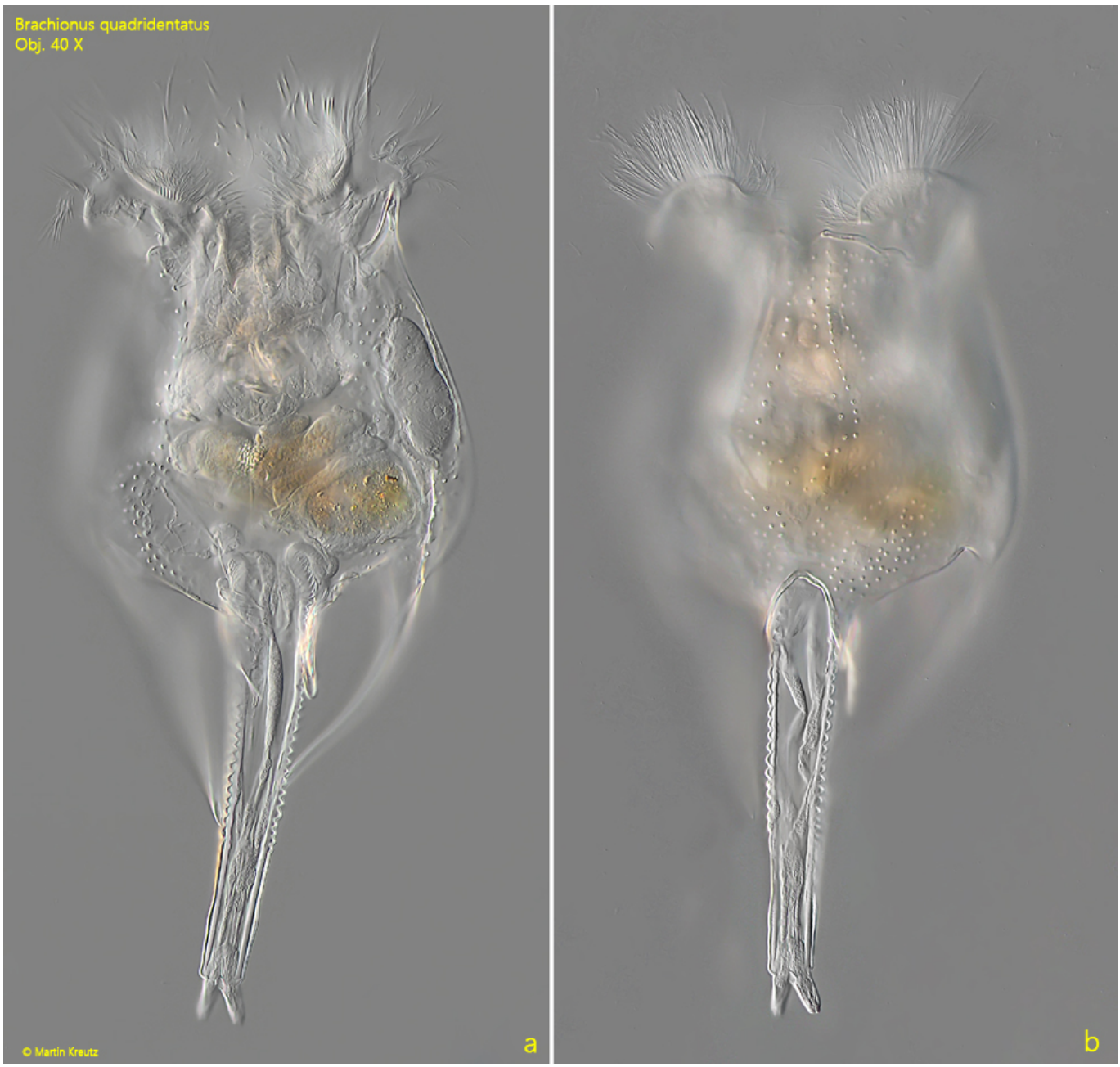


Fig. 2 a-b: *Brachionus quadridentatus*. L = 390 µm (with foot). The same specimen as shwon in fig. 1 a-c from ventral. Obj. 40 X.



Fig. 3: *Brachionus quadridentatus*. L = 360 µm (with foot). Ventral view of a slightly squashed specimen with a fully extended foot. Obj. 20 X.



Fig. 4 a-b: *Brachionus quadridentatus*. L = 330 µm. Ventral view (a) and dorsal view (b, focussed from ventral) of a slightly squashed specimen. MS = median spines, PS = posterior spines. Obj. 20 X.



Fig. 5: *Brachionus quadridentatus*. The ventral side of the lorica in detail. Note the notch at the anterior margin of the lorica (arrow). Obj. 100 X.



Fig. 6: *Brachionus quadridentatus*. Focal plane on the dorsal, anterior margin with the characteristic two spines in a strongly squashed specimen. Obj. 60 X.



Fig. 7: *Brachionus quadridentatus*. L = 385 µm (with foot). Dorsal view of a second squashed specimen. Note the ornamented lorica and the curled foot with the two short toes. Obj. 40 X.



Fig. 8: *Brachionus quadridentatus*. The trophi in a strongly squashed specimen. Obj. 60 X.