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## Chrysophycean Stomatocysts in the Upper Pleistocene and Holocene Sediments from Lake Hovsgol, Northern Mongolia

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### ABSTRACT

Siliceous stomatocysts of chrysophyte algae, along with diatom frustules, are well preserved in bottom sediments of various water bodies. Analysis of microfossils from a core sample of the Upper Pleistocene and Holocene sediments from the southern part of Lake Hovsgol revealed 36 different morphotypes of chrysophycean stomatocysts. Some of them were attributed to species of the genera *Mallomonas* Perty, *Chrysophaerella* Lauterborn., *Paraphysomonas* (Stokes) De Saedeleer, and *Dinobryon* Ehr.; 20 morphotypes were described as novel. The abundance and diversity of stomatocyst morphotypes in the core sample varied depending on the age of sediments. The results obtained in the study broaden views on the biological diversity of microalgae and confirm that chrysophycean stomatocysts can serve as good environmental indicators in paleolimnological and paleoclimatic reconstructions.

### KEYWORDS

Chrysophycean Stomatocysts; Diatoms; Lake Hovsgol; Mongolia; Upper Pleistocene; Holocene

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