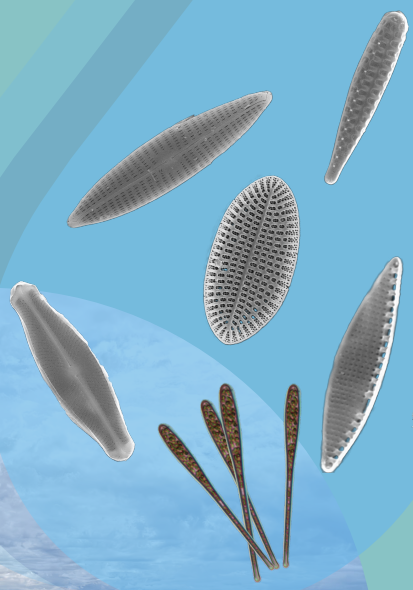
# XVI European Diatom meeting

## Murcia, 6–10 July 2026



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MAESE MICROALGAS EDÁFICAS DEL SURESTE

## Collections and Intercalibrations

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**P44** *"Digital diatom taxonomic intercalibration and harmonization – Lessons learned from the first exercise"* **Michael Kloster, Dina Abdelmguid, Andrea Burfeid Castellanos, Marco Cantonati, Elisa Falasco, Eva Herlitz, David Heudre, Martyn Kelly, Zlatko Levkov, Juha Miettinen, Rafal Olszyński, Benoit Paix, Bart Van de Vijver, Geurt Verweij, Danijela Vidakovic, Maria Kahlert, Frédéric Rimet & Bánk Beszteri**

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## Forensic Sciences and other applications

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**P52** *"Evaluation of dual-yield potential of lipid and silica co-production in Craspedostauros sp."* **Carl Edsbagge**

**P53** *"Analysis of Diatoms in Animal Tissues as a Forensic Tool"* **Ylenia López-Molina, Teresa Coronado-Parra & Marina Aboal**

**P54** *"Can diatoms power the future of nanocomposites?"* **Przemysław Dąbek, Piya Roychoudhury, Aleksandra Golubeva, Ewa Górecka, Rahul Bose & Andrzej Witkowski**

# *OBSERVATION ON THE GENUS MICROCOSTATUS JOHANSEN & SRAY (BACILLARIOPHYCEAE) IN MACEDONIA*

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The genus *Microcostatus* Johansen & Sray was separated from *Navicula* Bory on the basis of several ultrastructural features such as small costae extending across the axial area (microcosta), presence of two longitudinal lyre-shaped depressions located on both sides of raphe sternum and a simple raphe system. Most of the species inhabiting subaerial habitats, such as wet rocks and mosses, but some species inhabiting estuarine intertidal and marine habitats. Observations of *Microcostatus* from Macedonia reveal presence of 10 taxa: six of them belong to already described species, while four of them have different morphological and ultrastructural features than already known species. All taxa are illustrated by light and scanning electron microscope and their main differential characters are presented. *Microcostatus* sp. 1 has similar ultrastructural features as *Navicula naumanni* var. *simplex* Foged, but can be differentiated by the valve outline and shape of the central area. *Microcostatus* sp. 2 has similar hyaline appearance as *M. kuelbsii* (Lange-Bertalot) Lange-Bertalot, but can be differentiated by the valve shape and stria morphology. *Microcostatus* sp. 3 has similar stria structure as *Sellaphora terrestris* Glushchenko, Kezlya, Maltsev & Kulikovskiy, but differences can be noticed in the valve outline and the shape of the central area. *Microcostatus* sp. 4 can be differentiated from *M. turritus* P.B.Hamilton & D.Antoniades by the valve shape and size.

All *Microcostatus* species presented in this study were recorded from subaerial habitats or small alpine ponds/glacial lakes.