KEMIJSKI INŠTITUT

Vabilo na Forum40 / Invitation to the Forum40

Aljaž Pogorelec

Department of Polymer Chemistry and Technology

Četrtek / Thursday, 1. 10. 2026 ob / at 13:00
Velika predavalnica Kemijskega inštituta / Great Lecture Hall

WEBEX
https://ki-ljubljana.webex.com/ki-ljubljana/j.php?MTID=m1fb5b19592850db45f70d06a4d832210
Meeting number: 2787 178 2991
Meeting password: pxKe3eJUg89

Self-assembly of amphiphilic block copolymers in aqueous solutions

Depending on their chemical composition and macromolecular architecture, amphiphilic block copolymers can self-assemble into various supramolecular structures in aqueous solution. Self-assembled polymeric vesicles, also known as polymersomes, are particularly interesting for diverse applications, including drug delivery, diagnostics, nanoreactors, and artificial cells. Future development of these relatively novel applications could benefit from better understanding how the copolymer architecture affects certain properties of polymersomes, such as their membrane thickness. We compared the self-assembly of the more typical AB linear copolymers with their less commonly-used AB2 miktoarm star analogues, and observed important differences in morphology, size distribution, and membrane thickness of formed structures.

Vljudno vabljeni / Kindly invited