



Dr. C.S. Alina Gabriela Rusu

(UEFISCDI ID (UEF-iD): U-1700-037M-4070)

E-mail: rusu.alina@icmpp.ro

Researcher ID: I-9375-2016

ORCID: 0000-0002-8913-7446

Specialist in materials characterization using methods such as: Dynamic Light Scattering measurements, Infrared spectroscopy, Ultraviolet–visible spectroscopy, proton and carbon Nuclear Magnetic Resonance, thermogravimetric measurements including Thermogravimetric Analysis coupled with Fourier Transform Infrared Spectroscopy and Mass Spectrometry, Scanning Electron Microscopy, etc. The researcher scientific interests cover the fields of the design and preparation of biopolymers-based scaffolds and nanosystems with enhanced bioactivity for drug delivery and tissue engineering applications.

Scientific contributions: Articles published in international peer-reviewed journals (ISI ranked and included in international data bases): **23** (out of which 8 articles as main author; **3** book chapters; articles/studies published full-text in international conference volumes: **2**; Patents (national): **4 patent** applications at OSIM Bucharest. Research and development projects based on national grants: **6 projects, of which: 2 as project leader and 4 as member** of the project.

Scientific visibility: H-index: 9 (according to ISI Web of Science) and 10 (according to Google Scholar and Scopus); Sum of the times cited: 291 (253 without self-citations) (according to ISI Web of Science, July 2021).

SELECTED SCIENTIFIC ARTICLES

1. Alina Gabriela Rusu, Aurica P. Chiriac, Loredana Elena Nita, Irina Rosca, Mariana Pinteala, Liliana Mititelu-Tartau, “Chitosan derivatives in macromolecular co-assembly nanogels with potential for biomedical applications”, *Biomacromolecules*, 21(10), 4231-4243, 2020, *IF* = 6.988.
2. Loredana Elena Nita, Alina Ghilan, Alina Gabriela Rusu, Iordana Neamtu, Aurica P Chiriac, “New trends in bio-based aerogels”, *Pharmaceutics*, 12(5), 449, 2020, *IF* 6.321.
3. Alina Gabriela Rusu, Aurica P Chiriac, Loredana Elena Nita, Maria Bercea, Nita Tudorachi, Alina Ghilan, Daniela Pamfil, Daniela Rusu, Florina Daniela Cojocaru, “Interpenetrated polymer network with modified chitosan in composition and self-healing properties”, *International Journal of Biological Macromolecules*, 132, 374-384, 2019, *IF* =6.953.
4. Iordana Neamtu, Alina Gabriela Rusu, Alina Diaconu, Loredana Elena Nita, Aurica P. Chiriac, “Basic concepts and recent advances in nanogels as carriers for medical applications”, *Drug Delivery*, 24(1), 539-557, 2017, *IF*= 6.419.
5. Alina Gabriela Rusu, Marcel-Ionel Popa, Gabriela Lisa, Liliana Verestiuc, “Thermal behavior of hydrophobically modified hydrogels using TGA/FTIR/MS analysis technique”, *Thermochimica Acta*, 613, 28–40, 2015, *IF*= 3.115.