

## Mladen Žinić – List of Publications

### SCIENTIFIC ARTICLES

- [1] <sup>1</sup>H-NMR Study of the *Syn/Anti* Ratio of Oximes and 2,4-Dinitro-phenyl Hydrazones Determined by ASIS and LIS Methods. **M. Žinić**, M. Štromar, M. Malnar, and D. Kolbah, *Croatica Chemica Acta* **1974**, *46*, 45–50.
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- [3] Identification Methods for ( $\pm$ )- $\alpha$ -(3-Benzoylphenyl)-Propionic Acid (Ketoprofen) and its Enantiomers Based on Physico-Chemical Properties. N. Blažević, **M. Žinić**, T. Kovač, V. Šunjić, and F. Kajfež, *Acta Pharmaceutica Jugoslavica* **1975**, *25*, 135–192.
- [4] Synthesis of Some 7- $\alpha$ -Carboxyethyl-1,3-dihydro-(2H)-1,4-benzodiazepin-2-ones. **M. Žinić**, D. Kolbah, N. Blažević, F. Kajfež, and V. Šunjić, *Journal of Heterocyclic Chemistry* **1977**, *14*, 1225–1230.
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- [10] Physico-Chemical and Analytical Characteristics of Zomepirac. **M. Žinić**, J. Kuftinec, H. Hofman, B. Belin, F. Kajfež, N. Blažević, and Z. Meić, *Acta Pharmaceutica Jugoslavica* **1982**, *32*, 281–289.
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- [12] Selective Decarbethoxylation of Ethyl 1,4-Dimethyl-3-(ethoxycarbonyl)-1*H*-pyrrole-2-acetate in 85% Phosphoric Acid. **M. Žinić**, J. Kuftinec, H. Hofman, F. Kajfež, *Journal of Organic Chemistry* **1985**, *50*, 697–700.
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## SCIENTIFIC PROJECTS

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- [2] 1991 – 1995, “Nucleotide and peptide Analogues and Synthetic Molecular Receptors.; Croatian Ministry of Science and Technology, Project No. 1-07-181; principal investigator since 1993.

- [3] 1996 – 1998, “DNA Interactions with New Aromatic Compounds”; BMF-DLR, Bonn; Project No. KRO 004-96; in collaboration with Prof. Hans-Joerg Schneider, Universitat des Saarlandes, Saarbrucken.
- [4] 1996 – 2001, “Design and Synthesis of Supramolecular Systems. Studies of Molecular Recognition, Self-Organisation and Transport (Research Theme No. 00980703), principal investigator, Croatian Ministry of Science and Technology.
- [5] 1999 – 2001, “Stacking Interactions with Nucleosides, Nucleotides and Nucleic Acids”, DFG-Germany, 436 KRO 113/3/0; in collaboration with Prof. Hans-Joerg Schneider, Universitat des Saarlandes, Saarbrucken.
- [6] 2000 – 2003, EU COST D11/0015/99 “Low Molecular Weight Gelators of Organic Fluids and Water: Towards Engineered Supramolecular Gels for Advanced Applications”, (working group leader).
- [7] 2003 – 2006, “Supramolecular Organisation in Gels, Molecular Recognition and Catalysis. Research theme No. 0098053, principal investigator, Croatian Ministry of Science and Technology.
- [8] 2003 – 2006, Collaboration Programme: Synthesis, structures and mechanisms in functional molecular and supramolecular systems (Project No. 0098906, head of Collaboration Programme composed of 15 organic chemistry projects).
- [9] 2007 – 2010, “Self-assembly in gels and synthesis of hybrid functional materials, principal investigator, Croatian Ministry of Science and Technology.
- [10] 2003 – 2009, EU COST Action D31: Organising Non-Covalent Chemical Systems with Selected Functions (working group leader).
- [6] COST D11 Chemistry Meeting, Bordeaux University, France, 12-14 May 2000. “Bis(Amino Acid) Oxalamide Gelators of Water and Organic Fluids”
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- [11] 8th European Symposium on Organic Reactivity, ESOR-8, Cavtat (Dubrovnik), Croatia, September 1 – 6, 2001. “Phenanthridinium and 4,9-Diazapyrenium Intercalators. From Cyclo-bisintercaland Receptors to Selective Interactions with Nucleic Acids”.
- [12] Université Louis Pasteur de Strasbourg, Faculte de Chimie, Institut Le Bel, 27 05 2004, “Supramolecular Chemistry of Gels - Stereochemistry of Gel Assemblies”.
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- [15] XIX Meeting of Croatian Chemists and Chemical Engineers, Opatija, April 2005, “Supramolecular Chemistry of Gels-Stereochemistry of Gel Assemblies”.
- [16] ESF RESEARCH CONFERENCE Supramolecular Chemistry: Supramolecular Bottom-Up Approaches, Molecular Tectonics and Functional Chains, Obernai (Strasbourg), France, 14 - 19 October 2005. “Supramolecular chemistry and stereochemistry of organogels”.

## INVITED LECTURES

- [1] 1st Croatian Congress on Human Genetics, Zagreb, 22 - 25. 09. 1994. “Interactions of Planar aromatic Molecules with DNA. Intercalation”.
- [2] Croatian Chemical Society Colloquium, Zagreb, 30. 11. 1995. “Molecular Recognition in supramolecular systems. Synthetic receptors for amino acids, nucleotides and metal cations”.
- [3] Symposium Vladimir Prelog and Croatian Chemistry, Zagreb, 27. 09. 1996. lecture: “Vladimir Prelog and early stage of supramolecular chemistry.”
- [4] Internationales Minisymposium: Supramolecular Systems for Photochemical and Other Uses, Saarbrucken, July 5, 1996. “Cyclo-bisintercaland Receptors with Phenanthridinium Units”.
- [5] 10th European Symposium on Organic Chemistry, ESOC 10, Basel, Switzerland, 22. – 27. 06. 1997. “Cyclo-bisintercaland receptors with Phenanthridinium Units. Synthesis and Binding of Nucleotides in Aqueous media”.

- [17] From Solid State To BioPhysics III, June 24 - July 1, 2006, Cavtat, Dubrovnik, "Organic gels as dynamic soft materials: Supramolecular organization by self- and co- assembly".
- [18] University of Perugia, CEMIN, National Centre of Excellence for Innovative Nanostructural Materials for Chemical and Biochemical Applications, 26 01 2007, "Supramolecular chemistry and stereochemistry of gel assemblies".
- [19] HENKEL Corp. Research Unit, Düsseldorf, 2007, "Organogels"
- [9] Lidija-Marija Tumir, "Aromatic  $\pi$ - $\pi$  interactions. Molecular recognition of nucleotides by phenanthridinium-nucleobase conjugates." MSc thesis, Faculty of Science, University of Zagreb, **2000**.
- [10] Ivo Piantanida, "Synthesis of novel 4,9-diazaprenium and phenanthridinium derivatives and investigation of their interaction with nucleotides and DNA, PhD thesis, Faculty of Science, University of Zagreb, **2001**.
- [11] Irena Krizmanić, "Synthesis of novel sulfonylurea and sulfoamide derivatives of purine and pyrimidine bases and nucleosides." PhD thesis, Faculty of Science, University of Zagreb, **2002**.
- [12] Iva Juranović Cindrić "Interactions of intercalator-nucleo base conjugates with nucleotides and nucleic acids in aqueous media." MSc thesis, University of Zagreb, **2003**. In collaboration with Prof. Zlatko Meić, Faculty of Science.
- [13] Tomislav Portada, "Supramolecular organometallic catalyst with chiral reaction space." PhD thesis, Faculty of Science University of Zagreb, **2004**.
- [14] Kristina Wolsperger Danilovski, "NMR study of intermolecular organisation and self-assembly in organogels." MSc thesis, University of Zagreb, **2005**.
- [15] Lidija-Marija Tumir "Synthesis of nucleotide selective bis-intercaland receptors and their interactions with nucleotides and nucleic acids." PhD thesis, Faculty of Science, University of Zagreb, **2006**.
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- [17] Zoran Đolić, "Self-assembly, stereochemical and synergic effects in two component gels of constitutionally non-identical low molecular weight gelators." PhD thesis, Faculty of Science, University of Zagreb, **2007**.
- [18] Nataša Šijaković Vujičić, Chiral bisoxalamide gelators – gelation and preparation of hybrid and functional nanomaterials, PhD thesis, Faculty of Science, University of Zagreb, **2010**.
- [19] Tihomir Pospišil, Synthesis, characterization and self-assembly of small peptidic gelators based on amyloid  $\beta$ -protein, PhD thesis, Department of Biotechnology, University of Rijeka, **2017**. (co-mentor: Dr. Leo Frkanec)

## SUPERVISION OF MSc AND PhD THESES

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- [2] Leo Frkanec: "Synthetic molecular receptors and carriers of amino acids and peptides. Peptide derivatives of crown ethers." Master thesis, University of Zagreb, **1991**. (co-mentor: Prof. Vinko Škarić)
- [3] Sulejman Alihodžić: "N-benzyloxycarbonil (Z)-aziridine in synthesis of lariat and polyazacrown ethers." Master thesis, University of Zagreb, **1992**.
- [4] Sulejman Alihodžić: "Synthesis and properties of fluoroionophores with phenanthridine units." PhD thesis, Faculty of Science, University of Zagreb, **1995**.
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