

List of suggested reviewers

1. Dr. Nikola Maraković

Biochemistry and Organic Analytical Chemistry Unit, Institute for Medical Research and Occupational Health, Ksaverska cesta 2, HR-10 000 Zagreb, Croatia. nmarakovic@imi.hr

Fields of interest: Design and synthesis of biologically active compounds, enzyme kinetics, computational chemistry

Maraković, Nikola; Knežević, Anamarija; Rončević, Igor; Brazzolotto, Xavier; Kovarik, Zrinka; Šinko, Goran [Enantioseparation, in vitro testing, and structural characterization of triple-binding reactivators of organophosphate-inhibited cholinesterases](#) // *Biochemical Journal*, **477** (2020), 2771-2790 doi:10.1042/bcj20200192. **IP=4.097**

Zorbaz, Tamara; Malinak, David; **Maraković, Nikola**; Maček Hrvat, Nikolina; Zandona, Antonio; Novotny, Michal; Skarka, Adam; Andrys, Rudolf; Benkova, Marketa; Soukup, Ondrej et al. [Pyridinium oximes with ortho-positioned chlorine moiety exhibit improved physico- chemical properties and efficient reactivation of human acetylcholinesterase inhibited by several nerve agents](#) // *Journal of Medicinal Chemistry*, **61** (2018), 23; 10753-10766 doi:10.1021/acs.jmedchem.8b01398. **IP=7.446**

Marić P, Ahel M, **Maraković N**, Lončar J, Mihaljević I, Smital T. [Selective interaction of microcystin congeners with zebrafish \(*Danio rerio*\) Oatp1d1 transporter](#). *Chemosphere*. 2021 Nov;283:131155. doi: 10.1016/j.chemosphere.2021.131155. Epub 2021 Jun 10. PMID: 34182632 **IP=7.086**

2. Dr. Zrinka Kovarik

Biochemistry and Organic Analytical Chemistry Unit, Institute for Medical Research and Occupational Health, Ksaverska cesta 2, HR-10 000 Zagreb, Croatia. zkovarik@imi.hr

Fields of interest: Biochemistry, toxicology, enzyme kinetics, reactions of cholinesterases with various substrates and inhibitors, antidotes for treatment of organophosphorus poisoning

Zrinka Kovarik, Nikolina Maček Hrvat. [Efficient detoxification of nerve agents by oxime-assisted reactivation of acetylcholinesterase mutants](#). *Neuropharmacology* 171 (2020) 108111. **IP=5.25**

Tamara Zorbaz, Petra Mišetić, Nicolas Probst, Suzana Žunec, Antonio Zandona, Gordana Mendaš, Vedran Micek, Nikolina Maček Hrvat, Maja Katalinić, Anissa Braïki, Ludovic Jean, Pierre-Yves Renard, Vesna Gabelica Marković, **Zrinka Kovarik**. [Pharmacokinetic evaluation of brain penetrating morpholine-3-hydroxy-2-pyridine oxime as an antidote for nerve agent poisoning](#). *ACS Chem Neuroscience* 11(7) (2020) 1072-1084. **IP=4.418**

Zrinka Kovarik, Jarosław Kalisiak, Nikolina Maček Hrvat, Maja Katalinić, Tamara Zorbaz, Suzana Žunec, Carol Green, Zoran Radić, Valery V. Fokin, K. Barry Sharpless, Palmer Taylor. [Reversal of tabun toxicity, enabled by a triazole annulated oxime library-reactivators of acetylcholinesterase](#). *Chemistry – A European Journal* 25 (2019) 4100-4114. **IP=5.236**

3. Prof. dr. Zoran Radić

Skaggs School of Pharmacy and Pharmaceutical Sciences, University of California San Diego, La Jolla, CA 92093, USA. zradic@ucsd.edu

Fields of interest: Toxicology, enzyme kinetics, reactions of cholinesterases with various substrates and inhibitors, antidotes for treatment of organophosphorus poisoning

Gerlits O et al. (2021). [Room temperature crystallography of human acetylcholinesterase bound to a substrate analogue 4K-TMA: Towards a neutron structure.](#) *Curr. Res. Struct. Biol.* 3: 206-215. **IP=6.809**

Blumenthal D et al. (2021). [Covalent inhibition of hAChE by organophosphates causes homodimer dissociation through long-range allosteric effects.](#) *J. Biol. Chem.* 297: 101007. **IP=5.157**

4. Prof. dr. Patrick Masson

Kazan Federal University, Neuropharmacology Laboratory, 18 ul. Kremlevskaya, 48002, Kazan, Russian Federation. Electronic address: pym.masson@free.fr

Fields of interest: Enzyme kinetics, reactions of cholinesterases with various substrates and inhibitors

Mukhametgalieva AR, Lushchekina SV, Aglyamova AR, **Masson P.** Steady-state kinetic analysis of human cholinesterases over wide concentration ranges of competing substrates. *Biochim Biophys Acta Proteins Proteom.* 2022 Jan;1870(1):140733. doi: 10.1016/j.bbapap.2021.140733.

Zueva I, Lushchekina S, Shulnikova P, Lenina O, Petrov K, Molochkina E, **Masson P.** [α-tocopherol, a slow-binding inhibitor of acetylcholinesterase.](#) *Chem Biol Interact.* 2021 Oct 1;348:109646. doi: 10.1016/j.cbi.2021.109646.

5. Prof. dr. Palmer Taylor

Skaggs School of Pharmacy and Pharmaceutical Sciences, University of California San Diego, La Jolla, CA 92093, USA. pwtaylor@ucsd.edu

Fields of interest: Enzyme kinetics, reactions of cholinesterases with various substrates and inhibitors, acetylcholine receptor kinetic

Grimster, N.P., et al (2012). Generation of candidate ligands for nicotinic acetylcholine receptors via in situ click chemistry with a soluble acetylcholine binding protein template. *J Amer. Chem. Soc.*, 134:6732- 6740. **IP=11.486**

Kaczanowska, K., et al (2014). Structural basis for cooperative interactions of substituted 2-aminopyrimidines with the acetylcholine binding protein. *Proc. Natl. Acad. Sci.* 111:10749-54. **IP=10.896**

Sit, R.K., et al (2014). Imidazole aldoximes effective in assisting butyrylcholinesterase catalysis of organophosphate detoxification. *J. Med. Chem* 57:1378-89. **IP=5.951**