

## NAME AND FAMILY NAME

**Slavica Erić**

### EMPLOYEMENT INFORMATION:

**2011:** Associate professor at Department of Pharmaceutical Chemistry, F. Pharm- UB

**2005:** Assistant professor at Department of Pharmaceutical Chemistry, F. Pharm-UB

**1999:** Assistant at Department of Pharmaceutical Chemistry, F. Pharm-UB

**1995:** Research Assistant at Department of Pharmaceutical Chemistry, F. Pharm-UB

**1992:** Researcher at Department of Pharmaceutical Chemistry, F. Pharm-UB

**1991:** Practitioner in Biochemical Laboratory of Clinical Center of Serbia

### EDUCATION:

**2014:** Specialization in Drug Control (*The Application of UV Spectrophotometry and High-Performance Thin Layer Chromatography on the Analysis of Cephalosporins & Pharmacotherapy of Cephalosporins*, University of Belgrade-Faculty of Pharmacy)

**2004:** PhD in Pharmaceutical Chemistry ("*Molecular modeling and quantitative structure-activity/selectivity relationships of alpha<sub>1</sub> adrenergic antagonist*"; University of Belgrade-Faculty of Pharmacy and National Institute of Chemistry, Slovenia)

**1998:** Msc. in Pharmaceutical Chemistry ("*The influence of chemical structure on formation of Fe(III)-hydroxamates and retention behavior in planar chromatography*"; University of Belgrade-Faculty of Pharmacy)

**1991:** Bsc, University of Belgrade-Faculty of Pharmacy

### TRAINING:

**2006-2007:** postdoctoral training in physico-chemical characterization of drugs, Sirius Analytical Instruments, Forest Row, East Sussex, UK

**2002-2004:** training in the Laboratory of Chemometrics (prof. Jure Zupan) and Laboratory of Molecular Modeling (prof. Tomaz Solmajer) at National Institute of Chemistry in Ljubljana, Slovenia

**1991-1992:** training in the Biochemical laboratory of Clinical Center of Serbia

### ACADEMIC AWARDS AND DISTINCTIONS:

**2002** and **2003:** Postgraduate Scholarship Awards (Ministry of Higher Education, Science and Technology of Republic of Slovenia)

**TEACHING ACTIVITIES:****Undergraduate studies:**

Pharmaceutical Chemistry 1, Drug Design and Synthesis, Selected Topics in Pharmaceutical Chemistry (Medicinal Chemistry of Anticancer Drugs)

**PHD studies:** Target-based Drug Design, Advanced Methods in Drug Research, Selected Topics in Medicinal Chemistry

**QP specialization studies:** Pharmaceutical & Medicinal Chemistry

**MENTOR of Bsc, Msc and PhD:**

Mentor of one defended Msc thesis (2011) and one defended PhD dissertation (2013). The member of Commission for the defence of one PhD dissertation (2013) and two academic specializations (2012). Mentor of 15 defended diploma works and member of the commission for the defence of about 20 diploma works. Mentor of 5 ongoing PhD studies.

**TEXTBOOKS:**

Handbook for practical exercises in pharmaceutical chemistry

Z. Vujić, J. Brborić, O. Čudina, **S. Erić**, B. Ivković, K. Vučićević i B. Marković  
Faculty of Pharmacy, University of Belgrade, Science, Belgrade 2004;

**ACTIVITIES WITHIN THE FACULTY:**

**2013:** Chairman of the Organising Committee of the seminar "Simulations Plus software-its application in pharmacy and chemistry", held at Faculty of Pharmacy-UB

**2011-2012:** Member of the Programme Council on Continuing Education in Pharmacy

**2011-2012:** Member of the Website Editorial Board at F.Pharm.-UB

**2007-2009:** Member of the Commission for Students' Scientific Research at F.Pharm-UB

2003-2004: Member of the working group for creation of Syllabus of Faculty of Pharmacy-UB

**ACTIVITIES WITHIN WIDER ACADEMIC COMMUNITY:**

Member of Pharmaceutical Association of Serbia

Member of Serbian Chemical Society

Member of Medicinal Chemistry Section at UB

Member of European Federation for Medicinal Chemistry

Reviewer of journals: Molecular Pharmaceutics, Journal of Molecular Recognition, Current Medicinal Chemistry, QSAR&Combinatorial Science, Journal of Pharmaceutical and Biomedical Analysis, Journal of the Serbian Chemical Society, Acta Chromatographica, Arhiv za farmaciju

## **PROJECTS:**

### **National projects:**

**2011-2015:** "Computer-aided design, synthesis and biological evaluation of novel heterocyclic compounds as selective inhibitors of tumorigenesis", funded by Ministry of Education, Science and Technological Development of Republic of Serbia

**2006-2010:** "Synthesis, quantitative structure-property/activity relationships, physico-chemical characterization and analysis of pharmacologically active substances", funded by Ministry of Education, Science and Technological Development of Republic of Serbia

**2002-2005:** "Molecular structures, chemical transformations, physico-chemical characterization, pharmaceutical purity and analysis of pharmacologically active substances", funded by Ministry of Education, Science and Technological Development of Republic of Serbia

### **International projects:**

#### **Leader of the projects:**

**2010-2011:** "Quantitative structure-activity relationships, computational design and synthesis of pyridine derivatives as potential anticancer drugs", funded by Ministry of Higher Education, Science and Technology of Republic of Slovenia and Ministry of Education, Science and Technological Development of Republic of Serbia

#### **Participant in the projects:**

**2012-2013:** "Computer-aided design of novel anticancer drugs - protein kinases inhibitors", funded by Federal Ministry of Education and Science of Bosnia and Herzegovina

**2008-2009:** "The development of quantitative structure-property models for prediction of  $pK_a$ , solubility and resorption of drugs" funded by Federal Ministry of Education and Science of Bosnia and Herzegovina

**2007-2009:** "Analysis of active substances in dietary supplements" funded by Ministry of Higher Education, Science and Technology of Republic of Slovenia and Ministry of Education, Science and Technological Development of Republic of Serbia

**2003-2005:** "Chromatographic methods in the analysis of pharmacologically active substances and quantitative structure-activity/property relationships of drugs", funded by Ministry of Higher Education, Science and Technology of Republic of Slovenia and Ministry of Education, Science and Technological Development of Republic of Serbia

## SELECTED PUBLICATIONS:

Computational classification models for predicting the interaction of drugs with P-glycoprotein and Breast Cancer Resistance Protein

**Slavica Erić**, Marko Kalinić, Katarina Ilić, Mire Zloh

*SAR QSAR Environ. Res.*, (2014) in press

Structural insights into binding of small molecule inhibitors to Enhancer of Zeste Homolog 2

Kalinić Marko, Zloh Mire, **Erić Slavica** (2014).

*J. Comput. Aided Mol. Des.* online first. doi:10.1007/s10822-014-9788-1.

*In silico* design of small molecule inhibitors of CDK9 / cyclin T1 interaction

Randjelovic Jelena, **Erić Slavica**, Savic Vladimir

*Journal of Molecular Graphics and Modeling* (2014) **50**: 100-112

Insights into mechanism of anticancer activity of pentacyclic oxindole alkaloids of *Uncaria tomentosa* by means of a computational reverse virtual screening and molecular docking approach

Kozielewicz Pawel, Zloh Mire, Paradowska Katarzyna, **Erić Slavica**, Wawer Iwona

*Monatshefte fur Chemie - Chemical Monthly* (2014) **145**: 1201-1211

Computational study and peptide inhibitors design for the CDK9 –cyclin T1 complex

Jelena Randelović, **Slavica Erić**, Vladimir Savić

*Journal of Molecular Modeling* (2013) **19**: 1711-1725

Study of the selectivity of  $\alpha_1$ -adrenergic antagonists by molecular modeling of  $\alpha_{1a}$ -,  $\alpha_{1b}$ - and  $\alpha_{1d}$ -adrenergic receptor subtypes and docking simulations

**Slavica Erić**, Tom Šolmajer, Miha Kotnik, Mire Zloh, Danica Agbaba

*Monatshefte fur Chemie-Chemical Monthly* (2013) **144**: 903-912

Prediction of aqueous solubility of drug-like molecules using a novel algorithm for automatic adjustment of relative importance of descriptors implemented in counter-propagation artificial neural networks

**Erić Slavica**, Kalinic Marko, Popovic Aleksandar, Zloh Mire, Kuzmanovski Igor

*International Journal of Pharmaceutics* (2012) **437**: 232-241

Target fishing and docking studies of the novel derivatives of aryl-aminopyridines with potential anticancer activity

**Erić Slavica**, Ke Song, Barata Teresa, Solmajer Tom, Antic-Stankovic Jelena, Juranic Zorica, Savic Vladimir, Zloh Mire  
*Bioorganic & Medicinal Chemistry* (2012) 20: 5220-5228

Antiproliferative activity and QSAR studies of a series of new 4-aminomethylidene derivatives of some pyrazol-5-ones  
Markovic Violeta, **Erić Slavica**, Stanojković Tatjana, Gligorijević Nevenka, Arandelović Sandra, Todorović Nina, Trifunović Snežana, Manojlović Nedeljko, Jelić Ratomir, Joksović Milan  
*Bioorganic & Medicinal Chemistry Letters* (2011) 21: 4416-4421

Synthesis, antitumor activity and QSAR studies of some 4-aminomethylidene derivatives of edaravone  
Markovic Violeta, **Erić Slavica**, Juranic Zorica, Stanojkovic Tatjana, Joksovic Ljubinka, Rankovic Branislav, Kosanic Marijana, Joksovic Milan  
*Bioorganic Chemistry* (2011) 39: 18-27

Nataša Stojić, **Slavica Erić**, Igor Kuzmanovski  
Prediction of toxicity and data exploratory analysis of estrogen-active endocrine disruptors using counter-propagation artificial neural networks  
*Journal of Molecular Graphics and Modeling* (2010) 29: 450-460

Drakulic BJ, Juranic IO, **Erić S**, Zloh M  
Role of complexes formation between drugs and penetration enhancers in transdermal delivery  
*International Journal of Pharmaceutics* (2008) 363:40-9.

**Erić S**, Solmajer T, Zupan j, Novic M, Oblak M, Agbaba D  
Prediction of Selectivity of  $\alpha_1$  Adrenergic Antagonists by Counterpropagation Neural Network (CP-ANN), *Il Farmaco* (2004) 59: 389-395

**Erić S**, Solmajer T, Novic M, Oblak M, Agbaba D  
Quantitative Structure-Activity Relationships of  $\alpha_1$  Adrenergic Antagonists  
*Journal of Molecular Modeling* (2004) 10: 139-150