# 3-year PhD Fellowship in Molecular Pharmacology



The Molecular Pharmacology Group (Jensen group), Department of Drug Design and Pharmacology, University of Copenhagen, Copenhagen, Denmark and ENAMINE, Research and Development, Kiev, Ukraine wishes to employ a PhD Fellow in Molecular Pharmacology. The project starts 1. February 2018 and lasts for 3 years.

### Groups

You will first train 1,5 years jointly with all 5 PhD Fellows at the University of Copenhagen (Denmark). Subsequently, the last 1,5 years will be spent with two other fellow PhD students at ENAMINE (Kiev, Ukraine). The employer ENAMINE has the world's largest in-stock catalogue comprising over 2 million compounds and an excellent expertise in chemical databases and structure-based drug/ligand design.

The Jensen group conducts inter-disciplinary medicinal chemistry and molecular pharmacology studies on several neurotransmitter receptors and transporters, including G protein-coupled receptors (GPCRs). The main research interests of the group is the development of novel ligands of these receptors/targets, investigating the modes of action of these at their respective targets and employment of developed pharmacological tools for explorations of the physiological roles and therapeutic potential in these targets. The group currently consists of 7 members, and it is one of three subgroups in the Molecular Pharmacology group at the department (~30 members).

### Project

The PhD fellowship is one of five that are part of the EU-funded project, SAFER (www.safer-itn.eu). This is an ambitious interdisciplinary European Industrial Doctorates (EID) programme under the Horizon 2020 Marie Skłodowska-Curie Actions (MSCA-ITN-EID, Grant agreement: 765657), which offers positions with competitive salaries and family allowances. PhD students will obtain ample scientific, business and transferrable skills at excellent research environments meriting themselves for international academic or industrial careers.

The ultimate scientific goal for the SAFER program is to gain molecular understanding and improve selectivity in treatments of CNS-related disorders. This will be done with a particular focus on the serotonin 5-HT2A receptor – the primary target for many pharmaceuticals and hallucinogens. SAFER will design and prepare ligands for the receptor, generate and cross-interpret pharmacology and crystallographic data, and construct computational mechanistic models and databases that can explain and guide its experiments. This is fundamental to understand the biological and therapeutic effects, and to develop safer drugs.

### **Qualification requirements**

#### Mandatory requirements

- A MSc degree in pharmacology, pharmacy, biochemistry or similar
- Solid knowledge in molecular biology, molecular pharmacology and drug discovery
- Demonstrated ability to independently learn new concepts and solve biological problems
- Fluency in English and experience in writing scientific texts
- The candidate must have less than 4 years of research experience and must not have resided or carried out

his/her main activity in the country of Denmark for more than 12 months during A = 0 as 3 years immediately prior to the recruitment.

# Additional meriting qualifications

Experience of, and skills in:

• G protein-coupled receptors

- Cell culture
- In vitro pharmacological assays
- Analysis of in vitro pharmacological data

#### Key criteria for the assessment of applicants

- Professional qualifications relevant to the project
- Relevant work experience
- Publications
- Other professional activities
- Language skills
- Good interpersonal skills

### **Terms of employment**

The post will be filled according to the Agreement between the Danish Ministry of Finance and the Danish Confederation of Professional Associations. The post is covered by the Protocol on Job Structure.

#### Questions

For further information about the post, please contact Associate Professor Anders A. Jensen via aaj@sund.ku.dk or (+45) 23962434; or Professor Igor Komarov via <u>ik214@yahoo.com</u>.

#### Application

The application, in English, must be submitted in the online application form. The application must include the following appendices:

Appendix 1: curriculum vitae with documentation of education.

Appendix 2: a complete list of publications and list of submitted appendices.

Appendix 3: documentation of additional research qualifications.

In addition to the material the applicant wishes to be included in the assessment, the Assessment Committee may include further material in their assessment of the applicant, such as reference letters. In such circumstances, it is the responsibility of the applicant, on request, to send the material to the Committee. Following processing of the application, any application material sent will be destroyed.

The applicant will be assessed according to the Ministry of Science Technology and Innovation Executive Order no 284 of 25. April 2008.

### **University of Copenhagen and Denmark**

Founded in 1479, the University of Copenhagen is the oldest university in Denmark. With 37,000 students and 9,000 employees, it is among the largest universities in Scandinavia and one of the highest ranking in Europe. The University consists of six faculties, which cover Health and Medical Sciences, Humanities, Law, Science, Social Sciences and Theology. Read more at www.sund.ku.dk and www.drug.ku.dk.

Copenhagen is a modern capital with plenty of opportunities in culture, design, architecture, restaurants and a

diverse nightlife. At the same time, the city offers beaches, beautiful parks and green nature after after and the Copenhageners bike everywhere. The Danish society prioritises a good work-life balance, and the work culture is well adjusted for families with children. Read more at http://ism.ku.dk/.

# **ENAMINE and Ukraine**

ENAMINE Ltd was founded in 1991 based on the rapidly increasing demand for new chemical compounds due to increased high throughput screening at the time. In over 15 years ENAMINE has been a world leading provider of Screening Compounds and Building Blocks. In ENAMINE, great attention is paid to the development of original and unique chemistry as diverse techniques and methodologies are the main contributors to novel compounds in drug discovery and development. <u>http://www.enamine.net/</u>

Kiev, the capital of Ukraine with more than 3 million people is the administrative, economic, scientific, cultural and educational center of the country. The city is known for its beauty and invaluable historical and cultural monuments, the art and architecture of Kiev are considered world treasures. Kiev has a very rich cultural life, with theatre, art and musical events all year a round. Kiev is also the scientific and educational center of Ukraine with several universities and science academies. <u>http://www.kiev.info/about/general.htm</u>

**Deadline:** 20-10-2017 **Employer:** University of Copenhagen