

PhD student position in modeling of RNA-small molecule interactions Bujnicki group in IIMCB, Warsaw, Poland

We are looking for a PhD student interested in bioinformatics, molecular modeling and software development, and motivated to develop a career in an interdisciplinary and international team.

Our big goal is to model RNA-ligand interactions, towards the development of new drugs, and to design new RNA molecules that bind to selected ligands. This project offers opportunities for international collaborations with academia and industry. We are very successful in RNA 3D structure modeling: see rankings of RNA Puzzles (<http://ahsoka.u-strasbg.fr/rnapuzzlesv2>).

We offer you a chance to be a part of this success as a **software programmer** or **molecular modeler**.

To have an idea of the working activity of the group, check the website <http://genesilico.pl>

We are hosted by IIMCB (<http://iimcb.gov.pl>), the top-ranked (A+) Polish research institute in biology, which provides cutting-edge equipment and facilities and is distinguished by HR Excellence in Research logo.

TEAM-modeler: You will be involved in the application of modeling methods to predict RNA 3D structures and their complexes with small molecules.

You must have experience in structural bioinformatics, molecular simulations, and/or computational chemistry.

Experience in programming (especially C/C++ or Python) is advantageous, but not essential.

TEAM-programmer: You will be a leading programmer in the development of a new method for modeling of RNA-ligand complexes, based on our successful tool SimRNA.

You must have skills in programming: experience with C/C++ is essential, coding in Python is advantageous.

Experience in bioinformatics, molecular modeling etc. is advantageous, but not essential.

Requirements:

- MSc in life sciences, computer science or related area, and eligibility for PhD studies in Poland
- Documented experience in molecular modeling or in computer programming (C/C++ & Python)
- Priority will be given to candidates with expertise most relevant to the project and to the general profile of the laboratory. To have an idea of the working activity of the group, check the website <http://genesilico.pl>

We offer:

- PhD fellowship 3500 PLN/month
- Reduced-rate for individual medical care packages for you and your family
- Reduced-rate memberships in MultiSport programme (<https://www.benefitsystems.pl/en/for-you/multisport/>)
- Position with 100% focus on research (no teaching obligations)
- Appointment starting 2 October 2017, funding guaranteed for 3 years, possible extension beyond this project.
- Participation in courses, scientific training, support from peers, and academic mentoring

You will be a key member of a group working on a focused scientific project with well-defined goals that combines a big scientific challenge with opportunities to collaborate with other researchers. You will have access to modern equipment and support from other experienced researchers. The project provides opportunities for extensive interdisciplinary collaborations within the team and in the institute (e.g. with software developers, molecular modelers and experimentalists), as well as international collaborations with academia and industry. This project offers various opportunities including leading the development of a major software package, practical application of a new cutting edge modeling approach towards computational drug development. You will have many chances to make your collaborative research a success, and you will be supported to present your results at scientific conferences and co-authorize scientific publications, and ultimately to include them in your PhD thesis. We will also support you to make the next big step in your postdoctoral career.

How to apply:

- We will collect applications until 14 July 2017
- **Apply now** (or ask any questions you may have) to employment@genesilico.pl
- In the subject include "PhD-TEAM-programmer or PhD-TEAM-modeler" and your first and last name.
- Your application must be in English and should contain a CV, a motivation letter (What is your scientific dream and how to you want to fulfill it? What are your key strengths? Why do you want to work with us?), a list of your significant achievements, and contacts to at least two potential referees, including at least one former or current direct supervisor.
- Please include the following statement in your application: "I hereby give consent for my personal data included in my application to be processed for the purposes of the recruitment process under the Personal Data Protection Act as of 29 August 1997, consolidated text: Journal of Laws 2016, item 922 as amended."
- Best candidates will be invited for an interview that will take place 19-21 July.

The project "Modeling of dynamic interactions between RNA and small molecules and its practical applications" is carried out within the TEAM Programme, being a Grant Project of the Foundation for Polish Science funded by the European Regional Development Fund within the framework of Smart Growth Operational Programme 2014-2020 (SG OP), Axis IV: Increasing the research potential, Measure 4.4: Increasing the human potential in R&D sector.

