

JOB OFFER – Master Thesis Project

Position in the project:	Master student
Scientific discipline:	Medical Physics
Job type:	Stipend
Number of job offers:	1
Stipend amount	1 650 PLN per month
Position starts on:	16.10.2017
Maximum period of contract/stipend agreement:	9 months
Institution:	Institute of Nuclear Physics PAN, Krakow, Poland
Project leader:	Dr. Antoni W. Rucinski, visiting prof. IFJ PAN
Project title:	<i>Quantification of biological range uncertainties towards an improved patient treatment in CCB Cracow proton beam therapy centre</i> <i>Project is carried out within the REINTEGRATION/POWROTY programme of the Foundation for Polish Science</i>
Project description:	This project is situated in the interdisciplinary research field of medical physics and aims to quantify biological uncertainties in proton beam therapy (PBT). The biological uncertainties of clinical treatment plan calculations performed with proton beams will be investigated using research and commercial treatment planning systems and Monte Carlo simulations. The software tools and procedures developed in this project will be integrated into the cancer patient treatment procedures in Cyclotron Center Bronowice (CCB) at the Institute of Nuclear Physics Polish Academy of Sciences (IFJ PAN) in Cracow providing additional information needed to improve and fully exploit the advantages of proton beams.
Key responsibilities include:	<ol style="list-style-type: none"> 1. Integration, interface and validation of analytical and Monte Carlo based treatment planning systems equipped with RBE (Radiobiological Effectiveness) models versus proton beam model used by Krakow proton beam therapy center (CCB) for patient treatment 2. Presentation and reporting of the results
Profile of candidates/requirements:	<ol style="list-style-type: none"> 1. Enrollment as a Master Student in the faculty of Physics, Natural Sciences, Engineering, Computer Science, Mathematics or related field of science 2. Experience in data analysis and computer programming 3. Good knowledge of English (spoken and written)
Required documents (in English or Polish):	<ol style="list-style-type: none"> 1. Scientific CV 2. Short application including motivation letter (max. two pages) 3. Certification of enrollment as a MS 4. Recommendation letter (preferentially send directly to antoni.rucinski@ifj.edu.pl)

We offer:	Work in a professional and friendly research team of IFJ PAN in close collaboration with CCB. Participation in selected professional training.
Please submit the following documents in a pdf format to:	antoni.rucinski@ifj.edu.pl
Application deadline:	30/09/2017 Interviews are preliminarily scheduled on 5/10/2017 and 10/10/2017.
For more details about the position please visit (website/webpage address):	www.ifj.edu.pl www.ifj.edu.pl/dept/no6/nz62/ar/
Euraxess job/stipend offer (in case of PhD and postdoc positions):	

Please include in your offer:

"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."