

Faculty of Physics University of Warsaw in the framework of OPUS 19 project: “*Stably-Stratified Atmospheric Boundary Layer: Beyond the standard Monin and Obukhov Approach*”

**offers
one 36-month student grant**

https://projekty.ncn.gov.pl/index.php?projekt_id=485030

Institute of Geophysics, Faculty of Physics, University of Warsaw is looking for a PhD candidate, who is going to work on a challenging research project of developing theories for the stably-stratified atmospheric boundary layer based on the multiscale asymptotic expansions and Lie algebra. The current theoretical research of the stably-stratified atmospheric boundary layer is dominated by the similarity theories based on dimensional analyses. The proposed project here departs significantly by examining the governing equation system of the boundary layer explicitly by these two mathematical methodologies. The two major goals of the project is to re-construct the standard Monin-Obukhov theories from these new perspectives, and to further extend them to the situations with spatial inhomogeneities, transiencies, and intermittencies. The student is also expected to perform extensive data analyses for verifying those theoretical results.

The three-year scholarship (36 months) is available for a graduate student under the OPUS 19 project, “Stably-Stratified Atmospheric Boundary Layer: Beyond the standard Monin and Obukhov Approach” (https://projekty.ncn.gov.pl/index.php?projekt_id=485030). The PhD candidate will be co-supervised by Marta Waclawczyk at University of Warsaw and Jun-Ichi Yano at CNRS, Météo France.

Requirements for the candidates:

- Good background in mathematics with the willingness to learn new mathematics (multiscale asymptotic expansions and Lie algebra), even if not yet be familiar with them.
- Basic knowledge of the fluid mechanics, the basic notions of the turbulence, and the willingness to learn the most updated theories of turbulence, which constitute the crucial background of the PhD project.
- Prior knowledge of atmospheric science is not imperative, but the student must be willing to learn its basics fairly rapidly, and also willing to go into the full details of the current atmospheric boundary-layer theories.
- Capacity to code and to analyze the observational data.
- The candidate should be a student (in the second or third cycle) in Physics, Technical Physics or similar discipline and should be enrolled in the Polish education system.
- Recruitment follows the rules for awarding scholarships set out in the Regulations for the awarding of scholarships in research projects financed from the resources of the National Science Center (annex to the resolution of the NCN Council 96/2016 of 27 October 2016)
https://ncn.gov.pl/sites/default/files/pliki/uchwaly-rady/2016/uchwala96_2016-zal1.pdf

Scholarship Details:

- Numer of available scholarships: **1**
- Scholarship: **5000 PLN per month**
- Duration: **36 months**, from September **1st, 2022**
- Submission deadline: **June 30th, 2022**
- In the case that students are from outside the Republic of Poland, the scholarship does not cover the costs of tuition fees or removal costs.

Application Procedure:

The candidate should provide the following documents by e-mail to the Secretariat IGF, Faculty of Physics, University of Warsaw e-mail: sekretariat.IGF@fuw.edu.pl :

1. Application for the position required together with the acceptance for the treatment of personal data -- the information clause and the consent clause attached to the announcement. In case of submitting the application by e-mail, please use the pdf-format and the file should contain a scanned signature.
2. The acquired diploma (Bsc or MSc) and information about students career.
3. Current CV and the list of publications
4. Contact details of two to three (maximum) persons who can provide information about the candidate.
5. In case of foreigners outside of EU, EFTA and the countries that are signatories to the Convention on the Recognition of Qualifications concerning Higher Education in the European Region - a document certifying a diploma in the territory of the Republic of Poland (<https://nawa.gov.pl/en/recognition/recognition-for-academic-purposes/applying-for-admission-to-doctoral-studies>).

The candidate, in case of being accepted, will be required to present the originals of all the documents.

The entire procedure will be concluded before 31th of July, 2022. The candidate might be asked for an interview with the recruitment commission. The candidate will be notified of the result of his/her application by e-mail.

Additional information about the project, please contact to: Dr. Marta Waclawczyk, marta.waclawczyk@igf.fuw.edu.pl, tel. (+48) 22 55 32 037.

INFORMATION ON THE PROCESSING OF PERSONAL DATA INFORMATION CLAUSE

Pursuant to Article 13 of Regulation (EU) 2016/679 of the European Parliament and of the Council of 27 April 2016 on the protection of natural persons with regard to the processing of personal data and on the free movement of such data, and repealing Directive 95/46/EC (General Data Protection Regulation), University of Warsaw hereby informs:

1. The Controller of your personal data is the University of Warsaw with its registered office at Krakowskie Przedmieście 26/28, 00-927 Warszawa;
2. The Controller has designated the Data Protection Officer who supervises the processing of personal data, and who can be contacted via the following e-mail address: iod@adm.uw.edu.pl;
2. Your personal data will be processed for the purpose of carrying out a recruitment process and selecting an employee and concluding a contract for employment at the University of Warsaw;
3. The provided data will be processed pursuant to Article 22¹ § 1 of the Act of 26 June 1974 Labor Code (uniformed text: Dz.U. of 2018, item 917) and your consent for processing of personal data;
4. Provision of data in the scope stipulated in the Labor Code is mandatory, and the remaining data are processed according to your consent for processing of personal data;
5. The data will not be shared with any external entities;
6. The data will be stored until you withdraw your consent for processing of personal data;
7. You have the right to access your personal data, to rectify, erase them, restrict their processing, object to processing, and to withdraw the consent at any time;
8. You have the right to lodge a complaint to the President of the Office for the Protection of Personal Data.

CONSENT CLAUSE

I hereby consent to have my personal data processed by the University of Warsaw with its registered office at ul. Krakowskie Przedmieście 26/28, 00-927 Warszawa for the purpose of carrying out a recruitment process and selecting an employee and concluding a contract for employment at the University of Warsaw.

I have been informed of my rights and duties. I understand that provision of my personal data is voluntary.

.....
(place and date)

.....
(signature of the person applying for employment)