JOB OFFER

BIRA-IASB is looking for:

Aspiring PhD Candidate (M/F/X)

Deadline for applications : 31 May 2026
Start date: 1st October 2026
Statute: Fixed full time position of 4 years

Division and context

Within BIRA-IASB, the Tropospheric Modelling Team (D23) studies the emissions of key pollutants in the atmosphere and the chemistry and role of chemical compounds involved in the budget of oxidants. It also uses models to help interpreting satellite measurements of chemical species and derive emissions through inverse modelling methodologies. For more details about our activities see **http://tropo.aeronomie.be**.

Job description

The aim of this position is to contribute to an improved understanding of tropospheric composition using atmospheric models and inversion tools as well as spaceborne composition data and other observations. In the frame of the BEAM and QUOVADIS projects (both funded by the Belgian Science Policy Office, Belspo) aimed at assessing the variability, sources and sinks of reactive nitrogen over Europe, we seek **a PhD candidate holding a Master Degree in Sciences or Applied Sciences, for a (fixed term) full time position of 4 years, starting from October 1st, 2026.**

Numerical simulations with the WRF-Chem high-resolution model will be performed to investigate the distribution of relevant species at different spatial scales and interpret the satellite observations from recently launched satellite missions (IASI-NG, IRS, Sentinel 4/5) and their seasonal and interannual variability.

The successful candidate will have to (i) develop analysis tools for the visualization of model input/output and relevant Earth observations data, (ii) analyze multi-platform measurements of reactive nitrogen species (NO_x and NH_3) and use models for their interpretation; (iii) present the results in project meetings, workshops and international congresses (iv) lead the writing of reports and research articles in peer-reviewed journals, and (v) write and defend the PhD thesis.

The successful candidate will work in collaboration with the other D23 team members and with external national and/or international partners, will occasionally help supervise students during their internship or master thesis work, and will present the research results in conferences and project meetings.

More about BIRA-IASB

The Royal Belgian Institute for Space Aeronomy (BIRA-IASB) is a Belgian Federal Scientific Institute. Since its founding in 1964, BIRA-IASB has been conducting research and providing public services in space aeronomy, i.e. the physics and chemistry of Earth's atmosphere and other planets, and outer space. The research performed at BIRA-IASB addresses issues of societal interest such as atmospheric composition changes and their link with climate

Our scientists use instruments on the ground, in the air, on board balloons or in space and computer models.

www.aeronomie.be

Required qualifications

- The candidate holds a Master's degree in Sciences or Applied Sciences

Technical and generic skills

- Strong motivation, initiative, scientific curiosity, scientific rigor, and team spirit.
- Creative and pragmatic problem-solving approach, with a good sense of organization and respect for deadlines.
- Excellent oral and written communication skills, with the ability to work in a multilingual and international environment, and proficiency in English (oral and written).

Assets

- Experience in Atmospheric Sciences and scientific data formats (NetCdf, HDF)
- Knowledge of programming languages (e.g Python, Fortran, Matlab, LaTeX)
- Knowledge of French or Dutch

We offer

- The position is on a contractual basis and fixed for 4 years (initially for 2 years, 2 last years after mid-term review). The selected candidate will be recruited under a fellowship status. The position is remunerated with a salary, not a scholarship (grant). While the candidate does not have all the rights of a standard employee, but the fellowship allows progression (e.g., from SW10 to SW11 after 2 years).
- Dynamic working environment with many national and international contacts
- Refund of commuting expenses when using public transportation or bicycle
- Pleasant work environment in a scientific institution located in a green setting in Uccle, Brussels. Easy access via public transportation.
- Flexible schedule within the 38 hours week, possibility to occasionally telework
- Attractive annual leave policy (minimum 26 days by year)
- Possibility of training (to be followed during working hours)
- On-site childcare during school holidays in July and August.

BIRA•IASB

Interested?

Send your CV and motivation letter and if possible two or three references (all in PDF-format) to:
trissevgeni.stavrakou@aeronomie.be with hr-select@aeronomie.be in copy
with the following reference: "D23_TROPO"

Deadline for application : 31 May 2026