Max-Planck-Institut für Meteorologie

The Max Planck Institute for Meteorology (MPI-M) is a multidisciplinary centre for climate research located in Hamburg, Germany. It has an internationally recognised reputation in climate modelling. The MPI-M is located in the heart of one of Europe's most livable and vibrant cities. It provides a highly international and interdisciplinary environment for conducting scientific research as well as access to state-of-the-art scientific and computational facilities.
Within the German Ministry for Education and Research (BMBF) funded collaborative JPI Climate-Belmont project “The potential of seasonal-to-decadal-scale inter-regional linkages to advance climate predictions” (InterDec-MPI), the department for The Ocean in the Earth System (Director's research group) is looking for a

Postdoctoral Scientist/Research Scientist (m/f, Ref. W029)

to investigate the inter-linkages among seasonal-to-decadal scale variability in the Arctic, mid-latitudes and tropics, their mechanisms and their implications for reliable climate predictions through coordinated multi-model sensitivity experiments and suites of initialized climate predictions. The project InterDec-MPI coordinates the research activities of an international consortium of European and Asian elite universities and research climate centers within the Belmont Forum/JPI-Climate initiative "Climate services collaborative research action on climate predictability and inter-regional linkages" (**http://www.jpi-climate.eu/2015projects/interdec**).

Specific objectives of InterDec are

- To investigate the mechanisms that govern the fast atmospheric linkages through both tropospheric and stratospheric processes between polar and lower latitudes and explore the potential for predictions on sub-seasonal to seasonal time scales.
- To advance our understanding of how frequency and amplitude of extreme weather events can be modulated by decadal-multidecadal changes in the background climate conditions.
- To explore the role of the ocean for low frequency signal communication between high and low latitudes and the implications for decadal predictability.
- To explore the added value of increased climate model resolution for a more realistic representation of processes linking high and low latitudes and for enhancing the predict-ability of high-impact climate and extreme weather events on regional scales.

Responsibilities

- Develop original research and analysis strategy to address research questions relevant to the InterDec project objectives.
- Conduct and analyze coordinated sensitivity and hindcast climate simulations with the Max Planck Earth System Model aimed at improving our understanding of Arctic-Midlatitude-Tropics linkages at seasonal-to-decadal time scale and their potential predictability, with a focus on monsoon systems, Eurasian climate extremes and hiatus like events.
- Contribute to project and task coordination, as well as to the writing and assembling of project reports.
- Disseminate the results through publications in high-impact peer-reviewed journals and presentations at project annual meetings, national and international conferences.
- Attend training, coordination, and dissemination activities that are organized by InterDec.

Qualifications / experience

- A PhD in Meteorology, Oceanography, Physics, or a related area is required for this position.
- Good knowledge of climate dynamics and predictability, in particular of atmospheric and/or ocean dynamics, atmosphere/ocean interactions and teleconnections. Expertise in initialising and evaluating the skill of seasonal-to-decadal climate predictions is an advantage.
- Experience in performing and evaluating coupled atmosphere-ocean system simulations is desired.
- Programming skills in Fortran and statistical post-processing (e.g. cdo, R) and visualization software (e.g. MATLAB, FERRET, NCL, IDL, GRADS), as well as experience in handling large climate data sets.
- Good knowledge of advance statistical techniques for climate analyses. Experience in extreme events statistics is an advantage.
- Ability to coordinate cross-institutional research work and reporting tasks is desired.
- Ability to work both independently and within a team.
- Excellent written and verbal communication skills in English.

Selection criteria

The selection criteria will value the qualifications, the experience and the ability of the candidates to fulfill the responsibilities of the opening as outlined above.

Employment conditions

- The position is offered for 38 months, with a starting date between September and November 2016.
- Payment will be in accordance with German public service positions (TVoeD E 14), including extensive social security plans. The conditions of employment, including upgrades and duration, follow the rules of the Max Planck Society for the Advancement of Sciences and those of the German civil service.

Selection process

A selection panel will be established. The selection will follow the rules of the Code of Conduct for Researcher Recruitment (http://ec.europa.eu/euraxess/index.cfm/rights/codeOfConduct)
The Max Planck Institute for Meteorology seeks to increase the number of female scientist and encourages them to apply. Handicapped persons with comparable qualifications receive preferential status.

How to submit your application for this post

Please submit:

- A cover letter
- A detailed curriculum vitae
- The names, addresses, and telephone numbers of two references

By uploading the documents in our online Webtool:

https://s-lotus.gwdg.de/mpg/mhmt/perso/mpim_w029.nsf/application

Deadline for applying

This vacancy has been opened on 21 July 2016. The vacancy will be kept open until filled.
A first cut-off date for the collection of the applications is foreseen on **30 August 2016**. If the position is not filled, this vacancy announcement will be re-published indicating a second cut-off date.

For further information, please contact Dr. Daniela Matei (daniela.matei(at)mpimet.mpg.de) and Dr. Jürgen Bader (juergen.bader(at)mpimet.mpg.de). Do not forward your application to these email addresses; the application needs to be submitted through the online Webtool (see link above).