Atmospheric Science M.Sc.

Application Information

| Application period: 15 February – 31 March (winter term) |
| Semester start: October 1st (winter term) |
| Language(s) of instruction: English |

Introduction

The MSc program in Atmospheric Science familiarizes you with the physics of the atmosphere across all scales from weather to climate and from turbulence to global waves. You will get a holistic picture of the atmosphere as an essential part of the Earth system. Atmospheric science aims at understanding the atmosphere to make its evolution predictable. Following this ambition, you will have the opportunity to explore a great variety of methodological approaches from numerical modeling, data analysis by artificial intelligence, physical theories to lab and field experiments.

Hamburg has a long-standing track record in excellent research in meteorology and climate science. Anthropogenic climate warming was detected here for the first time by Prof. Klaus Hasselmann, who received the Nobel Prize in 2021. Today, Universitaet Hamburg hosts the cluster of excellence “Climate, Climatic Change, and Society - CLICCS”. It has established the KlimaCampus Hamburg, a unique network of university partners and external research institutions, like the internationally renowned Max Planck Institute for Meteorology, or the German Climate Computing Center. This vibrant research environment offers many opportunities to join research groups as student assistants, for cooperative master thesis projects, and for interdisciplinary studies.

The MSc program provides profound and comprehensive training in core topics of atmospheric science. The mandatory courses familiarize you with modelling techniques with a focus on boundary layer, modern atmospheric observational technologies, a global view on atmospheric dynamics, and an understanding of the climate system from a radiation perspective. However, there is much more to atmospheric science. As advanced core elective you can choose from a wide variety of courses and specialize according to your own individual interests. As an option, you can also broaden your interdisciplinary profile by following courses of our partner programs “Ocean and Climate Physics”, “Geophysics” and “Integrated Climate System Science” as electives. Our principle “we only teach what we research” enables seamless transitions from teaching to research. And finally, your own research project is at the center of your studies when it comes to the master thesis in the second year. You will join a research group to develop your topic as part of the preparatory Atmospheric Study project and then discover new science while writing the master thesis. After graduation, this is the ideal starting point either to start an academic career or to receive an attractive position, e.g. in emerging fields like data science or renewable energies.
Admission Requirements

University degree

A Bachelor's degree in B.Sc. Meteorology of the Faculty for Mathematics, Informatics, and Natural Sciences of Universität Hamburg or a comparable degree program, or a Bachelor's degree in another natural science, mathematics or engineering Bachelor's degree program, provided that academic achievements amounting to at least 60 credit points (1 CP equals 30 hours of study) are comparable to the curriculum of the B. Sc. Meteorology at Universitaet Hamburg. If you have not received your degree certificate yet, you can submit this by the end of the first semester of your master's program.

Additional special admission requirements

Proof of proficiency in English:

- Common European Framework of Reference for Languages (CEFR) B2 certificate or
- International English Language Testing System (IELTS) Academic Test with a minimum score of 5.0 or
- Test of English as a Foreign Language (TOEFL) based test with a minimum score of 72 points or
- Cambridge First Certificate in English (FCE), Cambridge Certificate of Advanced English (CAE), Cambridge Certificate of Proficiency in English (CPE) or
- proof of at least 7 years of successfully completed English courses at a secondary German school

Please note that language tests should have been taken no longer than two years prior to enrollment.

For details of the legal basis for this regulation, please see the admission bylaws for your chosen degree program: [www.uni-hamburg.de/zugang-master](http://www.uni-hamburg.de/zugang-master)

Recognition of transcripts for degree programs completed at foreign higher education institutions

If you obtained your first degree abroad, your certificate will be reviewed during the application procedure in the faculty of your program.

If your degree certificate is not in English or German, please include a copy of a certified English or German translation of this together with your application documents.
Application

Online Application

You will need to complete the online application available on Universität Hamburg's application portal during the application period: www.uni-hamburg.de/online-application. Please create a user account, enter your information online, upload the required documents to your online application and submit your application online.

The application procedure for the master program is an online procedure. This means that you do not need to submit any documents in paper form or via email to Universität Hamburg. Instead, you have to upload the documents. Selection is based on the information you provide online and the documents you upload.

If you want to submit an additional special application (e.g. hardship application), you will need to send this special application separately via the online application portal together with the required proofs as an upload by the application deadline. For more information on special applications, please see www.uni-hamburg.de/sonderantrag and www.uni-hamburg.de/info-master.

Documents to submit

Please submit electronic copies of the documents. For documents not issued in English, a copy of a certified English translation is required.

- Your online application form
- Degree certificate or provisional Transcript of Records. If you are still studying when you apply and cannot yet provide a final certificate containing your grades, please submit your current Transcript of Records confirming your provisional grade point average. You will then need to submit your degree certificate by the end of the first semester of your master’s program.
- Proof of English proficiency
- Application letter detailing the motivation for the study of Atmospheric Sciences and advanced scientific education (optional)
- Descriptions of your Bachelor studies (optional)

Selection criteria

If the applications exceed the number of places, the selection will be based on

(a) the result of the first professionally qualifying degree,
(b) the content of the first professionally qualifying degree corresponds to the Bachelor's degree program in Meteorology at the Faculty of Mathematics, Informatics and Natural Sciences, and
(c) the justification for the desired course of study (motivation for the application in the letter of motivation).
These three criteria are evaluated according to the grading scale of the examination regulations for the Master's degree program in Atmospheric Sciences. Criteria a) and b) are weighted at 40% each, criterion c) at 20%.

For details of the legal basis for this regulation, please see the selection bylaws for your chosen master's program: www.uni-hamburg.de/auswahl-master.

Admission and enrollment

Once your application has been reviewed, an acceptance or rejection letter will be made available in your STiNE account under the Dokumente (Documents) tab. Please see the information at www.uni-hamburg.de/online-application. An enrollment deadline will be indicated in your acceptance letter - please submit the documents required for enrollment by this date. Detailed information about the enrollment process is provided at www.uni-hamburg.de/masterenrollment.

Please visit our website at https://www.mi.uni-hamburg.de/studium/master.html

Contact

Meteorologisches Institut
Universitaet Hamburg
Bundesstrasse 55
20146 Hamburg
E-Mail: atmoscience@uni-hamburg.de

Last updated: February 2024