

Master of Science in Physics



DURATION

2 years (full-time), 120 ECTS

APPLICATION DEADLINE

1 March (for non-EEA citizens)

1 June (for EEA citizens)

ACADEMIC CALENDAR



1st semester: 3rd week of September → end of January (exams in January)



2nd semester: 2nd week of February → July (exams in June)

www.kuleuven.be/academiccalendar

“As a Master student, I am not only immersed in the research, but also completely immersed in the group, teaming up with its members and its many international collaborators. This opens up the world not only scientifically but also personally.”

(international master of Physics student)

The mission of the Department of Physics and Astronomy is exploring, understanding and modelling physical realities using mathematical, computational, experimental and observational techniques. Fifteen teams perform research at an international level. Publication of research results in leading journals and attracting top-level scientists are priorities for the department.

New physics and innovation in the development of new techniques are important aspects of our mission. The interaction with industry (consulting, patents ...) and society (science popularisation) are additional points of interest. Furthermore, the department is responsible for teaching basic physics courses in several study programmes.

Programme

The Master of Science in Physics (120 ECTS) is a research-based master's programme in which you can specialize in the following fields of physics:

- **Condensed Matter Physics:** Cluster Physics, Surface and Interface Physics, Correlated Electron Systems, Semiconductor Physics, Soft Matter Physics, Physics of Biosystems;
- **Nuclear Physics:** Physics Beyond the Standard Model, Structure of Exotic Nuclei: Decay, Reactions and Laser Spectroscopy, Theoretical Nuclear Physics;
- **Theoretical Physics:** Complex Systems, Cosmology, Mathematical Physics, String Theory

After a semester with advanced courses in different disciplines of physics, you choose a **major research specialization** consisting of advanced and specialized courses and a master's thesis of 30 ECTS.

The remaining 30 ECTS allow you to follow one of two options: **Research** or **Physics in Society**.

- The Research option prepares you for a research career in academia or industry. You broaden your research skills by choosing a minor research domain, including at least 12 ECTS courses from that domain and complemented by a research internship or with other courses.
- The Physics and Society option offers you the opportunity to prepare for a career as a physicist outside academia, through courses preparing you for entrepreneurship or via an internship in a company.

For detailed descriptions of the courses and for the course timetable, please consult www.kuleuven.be/ma/mphysl/programme.

Admission requirements

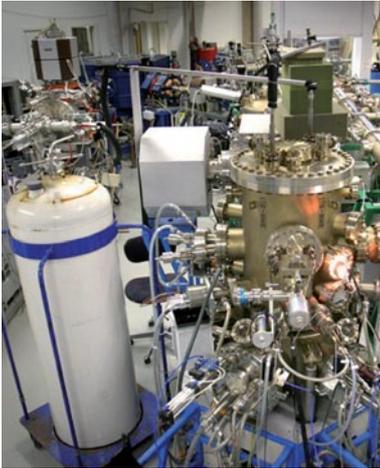
To be eligible for the master of Physics, you must have obtained an academic bachelor's degree in the field of physics. You also have to provide evidence of your English proficiency.

Good knowledge of the English language is essential. Unless you are of Anglo-Saxon origin, you will be asked to submit a TOEFL or IELTS certificate. If you have already completed an English-language academic programme at an Anglo-Saxon university, your degree will be considered sufficient proof of your English proficiency.

Programme admission: www.kuleuven.be/ma/mphysl

General admission: www.kuleuven.be/admissions

Master of Science in Physics



Discover KU Leuven

Founded in 1425, the University of Leuven (KU Leuven) has been a centre of learning for almost six centuries. Today, it is Belgium's largest and highest-ranked university as well as one of the oldest and most renowned universities in Europe. As a leading European research university and co-founder of the League of European Research Universities (LERU), KU Leuven offers a wide variety of programmes in English supported by high-quality interdisciplinary research.

Within the field of science, engineering, and technology, KU Leuven offers five academic educational profiles organized in five faculties: Science, Engineering Science, Bioscience Engineering, Engineering Technology, and Architecture. Boasting an outstanding central location in the heart of Europe, KU Leuven offers a truly international experience, high-quality education, world-class research and cutting-edge innovation.



KU Leuven is a founding member of
the League of European Research Universities

Tuition fees

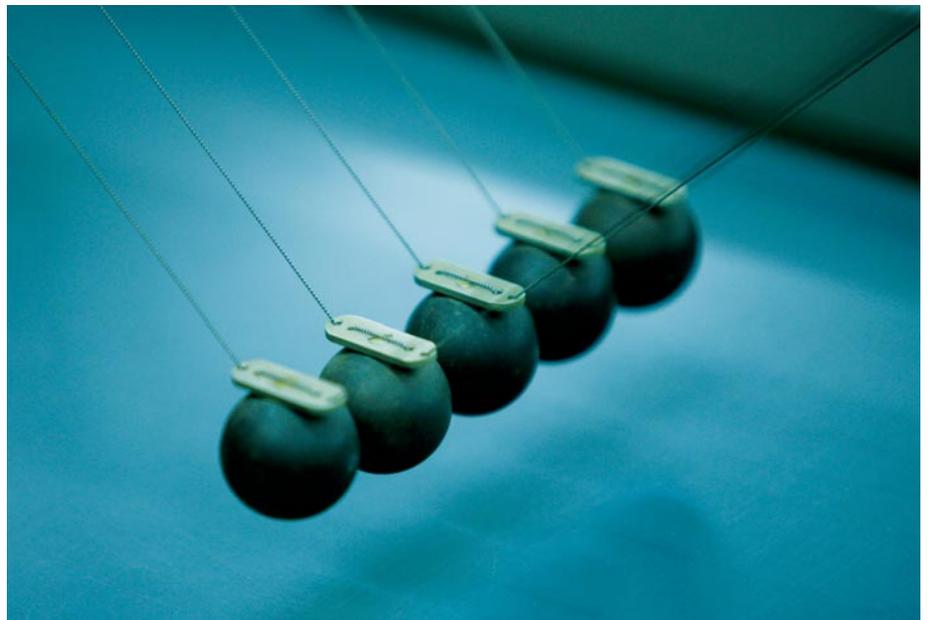
The tuition fee for the 2016-2017 academic year is € 890 for all students. The tuition fee for future academic years can be higher as a result of indexation. Please consult the website for the most recent information: www.kuleuven.be/tuitionfees.

Application procedure

KU Leuven uses an online application system. You can download and submit your application form via www.kuleuven.be/application. Students with a Flemish degree can consult www.kuleuven.be/studentenadministratie.

Career perspectives

The Department of Physics and Astronomy at KU Leuven generates substantial research funding. Consequently, many research positions are available, and more than half the students obtaining a master's degree in physics eventually start a PhD programme in one of the department's research groups. A number of graduates prefer to pursue a second master's degree, with medical radiation physics, environmental sciences, and statistics as the most popular subjects. There are also excellent career opportunities in industry (ICT, material research, electronics), consulting, government, banking (statistics), and higher education. Unemployment is non-existent among newly graduated physicists.



Contact:

www.kuleuven.be/ma/mphysl