Promotion of Young Scientists

The promotion of young scientists is one of the most important tasks of the Medical Faculty and the University Medical Center. We offer a variety of compatible programs on different educational levels as described below in order to support and actively encourage our junior researchers.

Training of PhD Students

International Graduate School in Molecular Medicine Ulm (IGradU)
Speaker: Prof. Dr. Michael Kühl, Institute of Biochemistry and Molecular Biology; www.uni-ulm.de/mm

In February 2006, Ulm University founded the International Graduate School in Molecular Medicine Ulm with the intention of providing high-quality postgraduate training. The Graduate School has been supported by the Excellence Initiative of the German federal and state governments since 2007 and was positively reevaluated in 2012 for an additional five years. The goal of the Graduate School is to introduce doctoral candidates at Ulm University conducting research in the field of biomedicine to a structured postgraduate program. Today (as of August 2014), the Graduate School supervises around 192 natural science and 34 medical doctoral candidates. The Graduate School is directed by a board which in turn is advised by an international and scientific advisory committee. There are two structured training programs on offer: the International PhD Program in Molecular Medicine for doctoral candidates of the natural sciences; and the program Experimental Medicine for doctoral candidates of medicine.
The International PhD Program in Molecular Medicine
Speaker: Prof. Dr. Michael Kühl, Institute of Biochemistry and Molecular Biology; www.uni-ulm.de/mm

This English-language postgraduate course offers a three-year structured doctorate. The course was accredited in March 2009 and reaccredited in 2014. The admission regulations stipulate clear criteria for selection: above-average degrees (MSc, state exam); proof of proficiency in English; a presentation before members of the faculty; and individual interviews with supervisors and members of the examination board (PhD committee). During their postgraduate course, doctoral candidates are monitored by a Thesis Advisory Committee consisting of three supervisors. A recent development has been the possibility of including a fourth supervisor to allow the supervision of PhD students by members of the Junior Faculty of IGradU. Each student’s coursework is calculated and accredited according to the European Credit Transfer and Accumulation System (ECTS). After having successfully defended their thesis, graduates opt to receive either the international academic title of PhD or the German academic title Dr. rer. nat. The academic title of PhD can be extended in line with the subject area of the doctorate (e.g. PhD in Neurosciences). The course is also open to graduates of Human Medicine. The opportunity for graduates in this field to obtain the academic title of Dr. rer. nat. or PhD is a unique feature of the Medical Faculty and the Graduate School at Ulm University. This aspect will continue to make Ulm more attractive in the future and to strengthen its importance on an international level.

Experimental Medicine
Speaker: Prof. Dr. Thomas Wirth, Institute of Physiological Chemistry; www.uni-ulm.de/einrichtungen/mm/expmedizin.html

In 2005, in order to combat deficiencies in the supervision and quality of medical theses, the Medical Faculty implemented the structured training program International PhD Program in Experimental Medicine, which was subsequently adopted by the Graduate School in 2009. The requirement for entry is an above-average intermediate examination (part one of the national medical licensing exam). Doctoral candidates must interrupt their studies in medicine for nine months in order to concentrate fully on their experimental work. The Medical Faculty and IGradU support this program with up to 35 stipends yearly (€500 per month over ten months). Doctoral candidates submit reports on their research work in the program’s seminars in addition to giving presentations of up-to-date scientific literature in a Journal Club.
Further Graduate School Activities

The Graduate School also offers a broad spectrum of key competence events (biosafety, good scientific practice, bioethics, project management, patent law, writing scientific texts etc.) and mentoring programs (e.g. M4M; see www.uni-ulm.de/einrichtungen/zawiw/m4m.html). These are open to students from both programs as well as to members of the postgraduate program GRK 1789 – CEMMA: Cellular and Molecular Mechanisms in Aging.

Extracurricular activities

Extracurricular activities, such as mobility and gender programs, retreats, and interaction with industry, complete the portfolio. One further key area is to establish and develop international contacts. For this reason, the Graduate School has been running its Summer School in Molecular Medicine every year since 2007 by offering a range of regularly changing topics at one of ten leading Chinese universities: the Huazhong University of Science and Technology (HUST) in Wuhan. Following an external review by the DAAD in 2007, the Summer School series was granted support and now continues with the help of funds provided by the Excellence Initiative. This means of recruitment has proven to be very successful and several doctoral candidates with Chinese postgraduate scholarships are now engaged in research in the laboratories of the Medical Faculty. Furthermore, summer schools, workshops and symposia are being held jointly with the Graduate School of the Biocenter Oulu in Finland (e.g. a workshop on mouse genetics took place in 2009). As a result, a second joint bilateral postgraduate program has been set up with the Biocenter Oulu (double doctorate) where the kick-off meeting took place in September 2013 and another retreat will take place in Autenried in September 2014.

Already in 2010, a joint PhD program with the University of Padua in Italy was set up and the first doctoral candidate graduated from this program in December 2013. A close partnership with the University of North Carolina at Chapel Hill, USA, has also been developed. Joint retreats took place in Switzerland and in Asheville, North Carolina. In September 2013, the Graduate School established a further cooperation in China by setting up a scientific exchange program with the Medical School of Southeast University in Nanjing. The first Chinese students have already finished their practical work in the laboratories of Ulm University.
Guest Professor and Guest Scientist Programs

Furthermore, the International Graduate School in Molecular Medicine has established two Guest Professor and Guest Scientist Programs that aim to strengthen and improve international cooperation, enhance the international character of the Graduate School and expand the teaching offered to our students.

The first program is funded with a grant amounting to €50,000 by the state of Baden-Württemberg and aims to bring renowned and top-class experts to Ulm. This program includes the founding of a Junior Research Group in Ulm. The Guest Professor is expected to visit Ulm several times during the program and to contribute to research and teaching at the Graduate School.

The second program is a Guest Scientist/Guest Professor Program that allows collaborating partners to visit Ulm for a period of between 10 and 14 days to strengthen their collaboration and work in the labs as well as holding talks and offering courses for our students.

Junior Faculty

Moreover, the Junior Faculty (JF) at IGradU is a newly established program for junior researchers working at either Ulm University or the University Medical Center Ulm. Junior researchers have obtained a PhD but have yet to attain a permanent faculty position. The overall aim of the Junior Faculty is to promote the careers of young scientists through active interaction with the university, the faculty boards, and society. Joining the Junior Faculty offers the following benefits:

- The opportunity to conduct PhD-supervision as a member of a TAC (Thesis Advisory Committee)
- The support of supervisors
- Opportunities to receive financial support for further and continuing education
- Mentoring (gender programs, dyadic mentoring, peer-to-peer mentoring).

In order to become a member of the Junior Faculty, either a grant or secured outside funding, (e.g. outside funding from BMF, DFG, EU-Programs, Programs of the Medical Faculty of Ulm University, Margarethe von Wrangell-habilitation program for women etc.) or two corresponding authorships are required. There are currently 15 postdocs at Ulm University that are members of the Junior Faculty and are supervised by one speaker. They meet on a quarterly basis, discuss their projects and plan a number of additional activities. Activities of the Junior Faculty range from continuing education courses, support for pedagogic workshops (e.g. “The Teaching Certificate of the State of Baden-Württemberg”), to participation in the annual science fairs and JF-meetings.
Promoting the Early Scientific Independence of Young Scientists (Postdocs)

Alongside those projects mentioned above, the Medical Faculty also offers two programs to promote early scientific independence:

Individual Grants Program

Through the Individual Grants Program, the Medical Faculty awards start-up funding on a yearly basis and in a competitive manner for approximately 20 research projects proposed by junior physicians and natural scientists up to a maximum of €35,000 per annum. After the initial funding over a period of two to three years, these projects will subsequently be financed by external funding agencies.

Rotation Positions ("Gerok positions")

The aim of this funding is to allow junior clinicians with doctorates the freedom to conduct research over a period of one to two years without any clinical duties. The five “Gerok positions” are also awarded yearly and competitively in a manner similar to those distributed through the Individual Grants Program. One condition for funding is the full-time release of employees for this project.
Continuing Medical Education

Online Master's Program in Advanced Oncology: Study part-time – team up internationally!
Speaker: Dr. Uta Schmidt-Straßburger; www.masteroncology.de

The Medical Faculty of Ulm University has launched the international postgraduate, blended learning study program in Advanced Oncology aimed at clinical oncologists and scientists involved in the field of oncology. Founded by internationally renowned experts with leading cooperating partners, the study program prepares participants to face the growing worldwide demand for the harmonized health care of cancer patients. Successful completion of the program leads to an MSc degree and offers a relevant qualification for leading positions. The innovative curriculum includes modules such as interdisciplinary oncology, clinical research, advanced therapies and integrated concepts, management and business administration. The online lectures are completed by soft skill training and personal development coaching. This Master's program is not only taught but also requires the completion of a self-written Master's thesis.

The university's international study program was established with the financial support of the Ministry for Science, Research and Art of the State of Baden-Württemberg. By taking into consideration time and location, the program's structure has been designed to allow for a flexible approach to learning so that participants can successfully combine the demands of work, family and study at their place of residence.