



Masters Degree Program

Tel Aviv - Central Arava



Tel Aviv University and the Arava International Center for Agricultural Training (AICAT) are pleased to invite students to participate in a unique and innovative MSc degree in Plant Science, with an emphasis in Food Safety and Security.

The program is intended for students with relevant BSc degrees from recognized universities all over the world. The program will be held over four semesters, with most of the studies physically taking place in the Arava campus. The summer semester will be an intensive session given in Tel Aviv campus. For most of the year, the students will live on farms in the Arava region where they will be able to gain relevant agriculture experience as part of their studies for the Msc degree.

Our Partners

Tel Aviv University

Tel Aviv University is Israel's largest, attracting over 30,000 talented students and renowned faculty from around the globe. The university has a strong interdisciplinary focus and collaborates closely with leading institutions worldwide. The campus is located in Tel Aviv, which is known for its entrepreneurial atmosphere and large number of start-up companies. With the growth of high-tech industries, the Tel Aviv metropolis has become an international hotspot for business and innovation – an ideal setting for an enriching study experience.

Manna Center Program for Food Safety & Security

The International MSc Program in Plant Science is housed in the Faculty of Life Sciences and is operated by the Manna Program for Food Safety and Security at Tel Aviv University. The Manna Center Program seeks to bring together researchers from diverse academic disciplines to promote innovative research, to forge ties with professionals and academics around the world, and to prepare the next generation of scientists and policymakers to guide global food security issues.

AICAT

AICAT was established in 1994, with the support of the Ministry of Foreign Affairs and the Ministry of Agriculture. The Center trains 1,000 students from academic institutes in Asia (Vietnam, Myanmar, Nepal, Indonesia, Cambodia, Thailand, Laos, EastTimor) as well as Africa (Ethiopia and South Sudan).

The Center provides theoretical, practical knowledge, as well as professional skills in agriculture.

Additionally, students are exposed to modern and advanced technology in the Arava farms, Israel's vegetable basin.

The MSc program meets a growing demand on the part of International students to pursue academic studies in Israel. Furthermore, the program contributes to the global need for depth and specialization in both understanding the biology and practicality of growing food for the world's population, in the hopes of developing a solution for the global problem of food insecurity.

The "yair" R&D Center

The program works in close cooperation with the Agricultural Research and Development Center in the Arava. The Center is a leading scientific research and development center established in 1986, with the aim of advancing sustainable methods of cultivation in the arid region, raising the quality of the produce, finding new crops and opening new markets. This unique research institute combines practical research in the fields of sustainable agriculture, water management and aquaculture – providing critical knowledge to the regional farming community as well as to other countries around the world.



For more details

Roy Patrick
Program Coordinator, AICAT
roy@arava.co.il

Maya Oren
Program Coordinator, Tel-Aviv University
foofsecurity@post.tau.ac.il

Courses

Prep Course: English

Prep Course: Biochemistry and Genetics

Prep Course: Introduction to Plant Biology

Spring Semester

Principles of Experimental Statistics

Scientific Writing

Student Seminar

Structure and Function of Plant Roots

Photosynthesis - Theory and Practice

Practicum

Summer Semester

Introduction to Food Security

Plant Response to Abiotic Stress

Food Security & Public Health

Bioethics and Biotechnology

Fall Semester

Essentials of fertigation

Seminar - Selected Topics in Plant Sciences

Student seminar

Marine Biology

Practicum



**Masters Degree
Program
Tel Aviv – Central
Arava**



3/2016

STUDENTS INVITATION

**MSc program in Plant Biology at Tel Aviv University in partnership with
AICAT in the Arava**

Tel Aviv University, in partnership with the Arava International Center for Agricultural Training (AICAT) are pleased to **invite students to participate in the third cohort of an innovative MSc program that combines academics and practical skills.** The MSc degree in Plant Biology, with an emphasis in Food Safety and Security will take place in Israel and is a unique program designed for international students.

We would like you to announce the information and encourage your excellent BSc graduates who have a science background and good English skills to apply to the program.

Included is a short document detailing the program. We will be happy to provide any additional information.

Sincerely yours,

Dr. Eyal Blum
Mayor, Central Arava Regional
Council

Hanni Arnon
Director, AICAT

Dr. Haya Kisos
Academic Director, AICAT

Roy Patrick
Program Coordinator, AICAT

Professor Danny Chamovitz
Dean, George S. Wise Faculty of life
Sciences, Tel Aviv University

Professor Nir Ohad
Director, Manna Center Program for Food
Safety & Security, Tel Aviv University

Maya Oren
Program Coordinator, Tel Aviv University

Maureen Meyer-Adiri
Director, TAU International

The Graduate Degree Program

A cooperation agreement was signed between AICAT and Tel Aviv University, initiating a program of studies toward a Masters degree in Plant Biology with an emphasis in Food Safety & Security at Tel Aviv University. The courses will take place in both the Arava and Tel Aviv, in partnership with AICAT. Graduates of this program will receive a **fully accredited MSc degree in Plant Biology with an emphasis in Food Safety and Security from Tel Aviv University**. The program is intended for students with relevant BSc degrees from recognized universities all over the world.

The program will be held over four semesters, with most of the studies physically taking place in the Arava. The summer semester will be an intensive session given in Tel Aviv. For most of the year, the students will live on farms in the Arava region where they will be able to gain hands-on experience 2-3 days per week, as part of their internship arrangement for tuition assistance.

The program will work in close cooperation with the Agricultural Research and Development Center (at the Yair R&D Station). Some of the lecturers will be researchers from the Center and students will conduct their practicum research with the assistance of R&D researchers.

The program will be academically supervised by Tel Aviv University and is of an equivalent level to the Hebrew-speaking program. Many of the programs' lecturers are tenured faculty members of Tel Aviv University.

Program Schedule

October 2016: Arrival to Israel

October 2016 - February 2017: Preparatory Semester

Preparatory studies in Arava with a focus on:

- Improving English abilities
- Refresher Plant Biology, Genetics, and Biochemistry courses

February 2017: Internal entrance exams. These special exams, administered by Tel Aviv University, will test the candidates' academic levels

Candidates who pass the exams will be accepted to the MSc program

The program will continue as follows:

March 2017 - June 2017: First Semester – MSc studies in Arava

July 2017: Second Semester – Food Safety & Security Summer Institute, will take place at Tel Aviv University and will be taken with other international students

October 2017 - March 2018: Third Semester – MSc studies continue in Arava

March 2018: Completion of MSc degree and Graduation

Eligibility

The program is open to excellent students who have completed an undergraduate degree in biology, agriculture, or a related field. Prerequisites include undergraduate courses in plant biology, genetics, and cell biology and a minimum GPA of 80 on a scale of 100, 3.0 on a scale of 4.0, or equivalent (based on US standards). Exceptions may be made in the case of an exceptionally strong application with a lower GPA.

Candidates will have a personal interview with representatives of the program from Tel Aviv University and AICAT.

Application Process

1. Open a **personal profile in the TAU International Student Portal** and begin to submit required information. Student Portal link: <https://portal.telavivuniv.org/login.php?accesscheck=/index.php>. For detailed information on how to apply, see this link on the Tel Aviv University website: https://international.tau.ac.il/msc_plant_sciences/?id=term-1

If there are any issues with uploading documents, please contact: foodsecurity@post.tau.ac.il

The following information for each candidate, in English, should be uploaded to the Student Portal by **June 12, 2016**.

- CV/Resume
 - Official academic transcript
 - University degree diploma (if the degree has been completed)
 - Two recommendations, where one is from the Head of the Department where the student received their Bachelor's degree
 - Short personal essay in English (one page) explaining the student's background, why they are interested in the program, and what they expect to do with the degree once completed
 - English Language Proficiency Exam: Official TOEFL or IELTS scores or proof of registration to take the exam
 - Passport photo
 - Passport copy
2. **Demonstrated Command of English:** It is important for the Program to know the English levels of the applicants in order to evaluate and prepare the language strengthening course of the Preparatory Semester. Therefore, all applicants must prove their English language proficiency validated through a TOEFL or IELTS exam. Official scores must be submitted by **July 12, 2016** and uploaded to the TAU International Student Portal. Please note that scores are usually sent out one month after the exam, therefore students must take the exam ahead of time.
 3. **Interviews:** Representatives of Tel Aviv University and AICAT will interview qualified students who have submitted the required documents listed.

Program and Application Fee

- Total tuition for Preparatory Semester: \$850 including health insurance. Students will cover \$850.
- Total tuition for the degree in the framework of this program is \$15,500. Students will pay \$5,000, **and a scholarship will be given to all students for the balance**
- Students' share of tuition will be paid throughout the program and before its completion.
- Students will be able to practice in farms (paid practicum) 3 days per week; the rest of the time will be devoted to studies.
- Flight tickets will be paid by the student
- Each student must have a laptop
- Student must pass a medical checkup

Academic Program

Courses	Semester Hours
Prep Course: English	Preparatory Semester
Prep Course: Biochemistry and Genetics	
Prep Course: Introduction to Plant Biology	
Spring Semester	
Principles of Experimental Statistics	3
Scientific Writing	2
Student Seminar	1
Marine biology	4
Photosynthesis - Theory and Practice	3
Practicum	2
Summer Semester	
Introduction to Food Security	3
Plant Response to Abiotic Stress	2
Food Security & Public Health	2
Bioethics and Biotechnology	2
Fall Semester	
Principles of fertigation	4
Seminar - Selected Topics in Plant Sciences	2
Student seminar	1
Structure and Function of Plant Roots	4
Practicum	3
Total	38

About the Partners

Tel Aviv University

Tel Aviv University is Israel's largest and most comprehensive university, attracting over 30,000 talented students and renowned faculty from around the globe. Ranked among the world's top 100 universities, the university has a strong interdisciplinary focus and collaborates closely with leading institutions worldwide. The campus is located in Tel Aviv, the financial and technology capital of Israel – which is known for its entrepreneurial atmosphere and large number of start-up companies. With the growth of high-tech industries, the Tel Aviv metropolis has become an international hotspot for business and innovation – an ideal setting for an enriching study experience

Manna Center Program for Food Safety & Security

The International MSc Program in Plant Biology is housed in the Faculty of Life Sciences and part of the Manna Center Program for Food Safety and Security at Tel Aviv University.

The Manna Center Program for Food Safety and Security seeks to bring together researchers from diverse academic disciplines to promote innovative research, to forge ties with professionals and academics around the world, and to prepare the next generation of scientists and policymakers to guide global food security issues.

AICAT

The **Arava International Center for Agriculture Training** ("AICAT") currently accommodates **1,000 students** from academic teaching institutions in East Asia (Myanmar, Nepal, Indonesia, Cambodia, Thailand, Vietnam, Laos), as well as Africa (Ethiopia, Ruanda, and South Sudan). The Center operates within the framework of the Central Arava Regional Council; the main goal is to impart professional agricultural knowledge and skills in modern and advanced farms.

The new MSc program meets a growing demand on the part of international students to pursue academic studies in Israel reflects the region's expertise, and takes advantage of the regional capacity to provide both accommodation and practical experience in modern agriculture and science. In addition, the program could contribute to the global need for depth and specialization in growing food for the world's population and finding a solution for the global problem of food insecurity.

Arava R&D center

The program works in close cooperation with the Agricultural Research and Development Center in the Arava. The Center is a leading scientific research and development center established in 1986, with the aim of advancing sustainable methods of cultivation in the arid region, raising the quality of the produce, finding new crops and opening new markets. This unique Center combines practical research in the fields of sustainable agriculture, water management and aquaculture – providing critical knowledge to the regional farming community as well as to other countries around the world.