Faculty of Engineering
Department of Biological and Agricultural Engineering
Master Of Water Management

www.eng.upm.edu.my
This programme is designed to prepare professionals for efficient and effective management of water resources. Students in this programme are given exposure to water related problems and best practices in water resources management. Topics covered encompass integrated water resources management, irrigation and drainage issues, and efficient water management systems using tools such as remote sensing and geospatial information systems.

PROGRAMME REQUIREMENTS

Credit Requirements for Graduation

Students enrolling under this programme must fulfill 40 credits of course work to graduate. The credit distributions for compulsory courses, elective courses and project are as follows:

- Compulsory Courses: 22 credits
- Elective Course: 12 credits
- Project: 6 credits

Compulsory Courses

Students must take all the listed compulsory courses:

- EAB 5110 Crop Biosphere
- EAB 5300 Agricultural Water Management
- EAB 5304 Hydraulic Engineering Systems
- EAB 5306 Groundwater Engineering
- EAB 5308 Pressurized Irrigation Systems
- EAB 5318 Drainage Engineering
- EAB 5320 Water Resources Systems
- EAB 5977 Independent Study

- Credits: EAB 5110 - 3 credits, EAB 5300 - 3 credits, EAB 5304 - 3 credits, EAB 5306 - 3 credits, EAB 5308 - 3 credits, EAB 5318 - 3 credits, EAB 5320 - 3 credits, EAB 5977 - 1 credit

Elective Courses

Students must take four elective courses out of the listed courses:

- EAB 4208 Agricultural Waste Management
- EAB 4404 Global Navigation Satellite System
- EAB 5310 Natural Resource Conservation
- EAB 5314 Soil Erosion
- EAB 5955 Special Topic - Water Management
- ECV 5501 Technical Issues in Geographical Information System
- ECV 5503 Quantitative Remote Sensing
- ECV 5508 Remote Sensing and GIS Applications

- Credits: EAB 4208 - 3 credits, EAB 4404 - 3 credits, EAB 5310 - 3 credits, EAB 5314 - 3 credits, EAB 5955 - 3 credits, ECV 5501 - 3 credits, ECV 5503 - 3 credits, ECV 5508 - 3 credits

*Selection of the elective courses for the students will be made by the program coordinator.

Project

Students are required to register EAB 5988 – Project for 3 credits in the second semester and another 3 credits in the third semester. This course is a project paper on a special topic that was assigned to the students in the second semester. Students will be examined by a panel of examiners based on the submitted report and oral presentation at the end of the third semester.
<table>
<thead>
<tr>
<th>Course Code</th>
<th>Course Title</th>
<th>Credits</th>
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</thead>
<tbody>
<tr>
<td>EAB 5110</td>
<td>Crop Biosphere</td>
<td>3</td>
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<tr>
<td>EAB 5300</td>
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<td>EAB 5818</td>
<td>Drainage Engineering</td>
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<td>EAB 5320</td>
<td>Water Resources Systems</td>
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<td>EAB 5977</td>
<td>Independent Study</td>
<td>1</td>
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<tr>
<td>ECV 5508</td>
<td>Remote Sensing and GIS Applications</td>
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For more information
Please contact:

Deputy Dean (Research)
Faculty of Engineering
Universiti Putra Malaysia
43400 UPM, Serdang
Selangor Darul Ehsan
Malaysia
Tel: 603-89466266/6253
Fax: 603-86567103
Email: td@eng.upm.edu.my
Website: http://www.eng.upm.edu.my

Programme Coordinator:

Desa Ahmad (Prof. Ir. Dr.)
Department of Biological and Agricultural Engineering
Faculty of Engineering
Universiti Putra Malaysia
43400 UPM, Serdang
Selangor Darul Ehsan
Malaysia
Tel: 603-89466427
Fax: 603-8656425
Email: desa@eng.upm.edu.my
Website: http://www.eng.upm.edu.my
ADMISSION REQUIREMENTS

An applicant with a bachelor degree in engineering with CGPA 2.500/55%/Second Class Lower and at least three (3) years working experience experiences in relevant field; or
An applicant with a bachelor degree in engineering with CGPA 2.750/60%/Second Class Lower
An applicant with a bachelor degree in science with CGPA 3.000/65%/Second Class Upper OR CGPA 2.750/60%/ Second Class Lower and at least three (3) years working experience experiences in relevant field

* Please refer to programme coordinator for more information on admission requirements

FEES

<table>
<thead>
<tr>
<th>Fees</th>
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<tr>
<td></td>
<td>Malaysian Student</td>
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<tr>
<td>Basic Fees (1st semester)</td>
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<tr>
<td>Basic Fees (2nd and subsequent semester)</td>
<td>950.00</td>
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<tr>
<td>Credit Fees</td>
<td>250.00 / credit hour</td>
</tr>
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</table>

* subject to change

Language Requirement

• A Malaysian candidate must have obtained at least a credit in English at Sijil Pelajaran Malaysia level or have passed English courses conducted at the Diploma or Bachelor’s Level.

• All international candidates from countries where English is not a medium of instruction must have obtained a minimum score of 550 for TOEFL or Band 6 for IELTS. This requirement is not applicable to candidates applying for admission into the Malay Language Studies.

• A candidate without the requisite minimum score for TOEFL or IELTS may be granted a provisional admission. Such candidate will be required to pass an English Placement Test conducted by the University.

• A candidate who has failed the English Placement Test will be required in the first semester to pass a prescribed English course. Should the candidate fail to obtain the prescribed minimum grade, the University may allow him to repeat the prescribed English course in the second semester.

• A candidate who fails after the second attempt will have his candidature suspended until he passes the English course before being allowed to continue with his Masters programme.

Application For Admission

Please apply online via http://www.sgs.upm.edu.my and send your application supporting documents to the address below:

Dean
School of Graduate Studies
Universiti Putra Malaysia
Zon 4, Off Jalan Stadium
43400 UPM Serdang
Selangor Darul Ehsan
Malaysia

Tel. : (603) 8946 4218/4223/4228
Fax : (603) 8943 2509/8946 4232
Email : admission@putra.upm.edu.my
Website : http://www.sgs.upm.edu.my