PhD (Science) (KA11099) and MSc (KA11039) Programmes at Faculty of Science (Perak Campus)

Overview

Science is the basis for technological progress in the country. Knowledge in these fields will enhance the capability of the nation to utilize the human and natural resources of the country more effectively.

The need for qualified and skilled workers in the fields of science is expected to continue to rise towards the year 2020, not only for research and development to solve both scientific and industrial problems but also to develop indigenous innovative technologies. UTAR's PhD(Science) and MSc postgraduate programmes endeavour to fulfill the evolving market needs for such professionals and technical expertise.

Science will provide the foundation for new and emerging competitive industries that are critical to the progress of the nation; such as biotechnology, nanotechnology, genetic algorithms, food technology, medicine, pharmaceuticals, agriculture, mathematical sciences, physical sciences, veterinary medicine, environment, and other identified important technology and industry segments.

The expected outcome from this programme is to produce competent and skilled science graduates, broaden and deepen knowledge in a range of current topics in science, develop advanced research skills and techniques and present findings in a documented scholarly form and encourage the development of transferable skills including the abilities to think strategically, critically and independently.

Mode of Study

By Research (Structure A)

The programme consists exclusively of a research-based mode of study (structure A). The research-based programme entails a specific programme of research under appropriate supervision. Research-based programmes generally have the objective of training candidates in research methodology and techniques, and in the critical evaluation of the research work carried out.

The research topic must relate to the discipline which it falls under. The research work produced in the form of a PhD or Master’s thesis must display original and critical thought and be a significant contribution to knowledge.

Duration of Study

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<th></th>
<th>PhD</th>
<th>MSc</th>
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<tr>
<td></td>
<td>Full-time</td>
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<tr>
<td></td>
<td>Minimum 2 years; Maximum 6 years</td>
<td>Minimum 1 year; Maximum 4 years</td>
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<td>Part-time</td>
<td>Part-time</td>
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<td></td>
<td>Minimum 4 years; Maximum 8 years</td>
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Medium of Instruction

English

Intakes

Open throughout the year

Minimum Entry Requirements

For PhD(Science) Programme

(i) a Master’s degree from UTAR and shows evidence of adequate related research or work experience to the satisfaction of the Senate; or

(ii) a Master’s degree of another university or equivalent qualification from an institution as approved by the Senate and shows evidence of adequate related research or work experience to the satisfaction of the Senate; or

(iii) any other qualifications equivalent to (i) or (ii) as approved by the Senate
For MSc Programme
(a) a Bachelor’s degree with Honours from UTAR; or
(b) a Bachelor’s Degree with Honours of another university or equivalent qualification of an institution approved by the Senate; or
(c) any other qualification equivalent to (a) or (b), as approved by the Senate.

English Requirements
SPM/O-Level English, minimum C4
Paper-based TOFEL, score > 580
Computer-based TOEFL, score > 237
Internet-based Testing (IBT), score > 92
International English Language Testing System (IELTS), score > 6.5
English 1119, credit
MUET, band 4.0
American College Testing Assessment (ACT), score > 22
Scholastic Assessment Test (SAT), score > 500
English Language Proficiency Test (ELPT), score > 980

Programme Structure
1. For PhD(Sc) Programme:

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<tr>
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<th>Unit Title</th>
<th>Type</th>
<th>Credit Hours</th>
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<tbody>
<tr>
<td>1</td>
<td>DDCA10100</td>
<td>Thesis</td>
<td>Core</td>
<td>-</td>
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<tr>
<td>2</td>
<td>DDCA10203</td>
<td>Research Methods in Science</td>
<td>Compulsory</td>
<td>3</td>
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<tr>
<td>3</td>
<td>DDCA10303</td>
<td>Directed Readings in Science</td>
<td>Compulsory</td>
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2. For MSc Programme:

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Process of Evaluation and Assessment
- Both Research Methods in Science and Directed Reading in Science subjects are coursework-based with no final exam.
- For Thesis, candidate must pass Proposal Defence and Work Completion Seminar with Satisfactory grade before candidate is allowed to submit Thesis for examination. A viva examination will also be held.
Financial Assistantship

To alleviate the financial burden shouldered by postgraduate students as well as to attract potential applicants to the postgraduate programmes, UTAR offers financial aid in the form of research assistantship. There are three types of assistantships in UTAR which are as follows:

(i) Project Research Assistantship
(ii) Research Scholarship Scheme
(iii) Student Assistantship

The purpose of these assistantships is to provide researchers of UTAR a platform to source assistance in research work and also to provide opportunity for students or research assistants to be involved and assist in research projects and thus enhancing their exposure and experience in research. However, the quantity of assistantships is limited and on a competitive basis.