F28WP Web Programming

COURSE DETAILS
Course Code: F28WP
Full Course Title: Web Programming
SCQF Level: 8
SCAF Credits: 15
Available as Elective: No

DELIVERY LEVEL
Undergraduate: Yes  Postgraduate Taught: Yes  Postgraduate Research: No

COURSE AIMS
To familiarise students with current techniques and paradigms in web programming. To enable them to design and implement robust and scalable web based applications.

LEARNING OUTCOMES – SUBJECT MASTERY

- Broad knowledge and understanding of the history of web programming
- The ability to apply the concepts, patterns and architectures used in web programming to new problems
- Detailed technical skills to use a scripting language for both server side and client side programming
- The ability to make informed decisions about appropriate web technologies to use for a particular task

LEARNING OUTCOMES – PERSONAL ABILITIES

- Practice in working on a development project in a small group under the guidance of a tutor
- Practice in defining the subject and scope of a development project (PDP)
- Deconstructing a problem and synthesizing a solution
- Time management

SYLLABUS

- History of web development technologies
- Design patterns (such as REST, Separation of content and presentation, and abstraction of resources)
- Server side programming using an appropriate scripting language
- General architecture of a web server
- Templating systems
- Client side programming topics, including the Document Object Model
- Security relating to web applications
- Deployment, including coping with scale

COURSE RELATIONSHIPS

<table>
<thead>
<tr>
<th>Course Code</th>
<th>Level</th>
<th>Title</th>
<th>School</th>
<th>Type</th>
</tr>
</thead>
<tbody>
<tr>
<td>F27WD</td>
<td>7</td>
<td>Web Design and Databases</td>
<td>School of Math and Comp Sci.</td>
<td>Pre-Requisite</td>
</tr>
</tbody>
</table>
## LOCATION AND ASSESSMENT METHODS

<table>
<thead>
<tr>
<th>Edi</th>
<th>SBC</th>
<th>Ork</th>
<th>Dub</th>
<th>Malay</th>
<th>IDL</th>
<th>COLL</th>
<th>ALP</th>
<th>OTH</th>
<th>Method</th>
<th>Weight</th>
<th>Exam Mins</th>
<th>Type</th>
<th>Diet</th>
<th>Synoptic Course</th>
</tr>
</thead>
<tbody>
<tr>
<td>Y</td>
<td>Y</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>Coursework</td>
<td>50</td>
<td>120</td>
<td>Assessment</td>
<td>Semester 1</td>
<td></td>
</tr>
<tr>
<td>Y</td>
<td>Y</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>Examination</td>
<td>50</td>
<td>120</td>
<td>Assessment</td>
<td>Semester 1</td>
<td></td>
</tr>
<tr>
<td>Y</td>
<td>Y</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>Examination</td>
<td>100</td>
<td>120</td>
<td>Reassessment</td>
<td>Semester 3</td>
<td></td>
</tr>
</tbody>
</table>