

# ADVANCED PROGRAMMING2 COURSE SPECIFICATION

HIGHER EDUCATION PERFORMANCE REVIEW: PROGRAMME REVIEW

## COURSE SPECIFICATION

This Course Specification provides a concise summary of the main features of the course and the learning outcomes that a typical student might reasonably be expected to achieve and demonstrate if he/she takes full advantage of the learning opportunities that are provided. It should be cross-referenced with the programme specification.

1. Teaching Institution	Baghdad University / College of Science for Women
2. University Department/Centre	Computer Science Department
3. Course title/code	Advanced Programming / 305 CAP1
4. Programme(s) to which it contributes	For intermediate level programmer
5. Modes of Attendance offered	Actual and Internal Mode of Attendance and there is no study remotely by the laws in force.

6. Semester/Year	second semester / Third Year
7. Number of hours tuition (total)	60 hours (30 hours a theoretical , 30 an hour practical)
8. Date of production/revision of this specification	11/4/2016
9. Aims of the Course	
<p>This course is training on Java programming language for the students who completed the course programming concepts or have some experience in the field of programming. Students will create Java applications with a focus on the correct object-oriented programming techniques, which will become subsequently familiar with object-oriented design, including the establishment of classes in Java and use the existing categories as set out in the current version of the Java programming interface applications.</p>	
<ul style="list-style-type: none"> <li>– Acquire the necessary programming skills in one of the high-level languages are modern.</li> <li>– This course aims to familiarize the student to write object-oriented programs by learning a language object-oriented.</li> <li>– This course aims to enable the student to understand the basics of advanced in the Java programming language.</li> </ul>	
<p>This course aims to give the student the skill required for programming the networks and the World Wide Web.</p>	

10. Learning Outcomes, Teaching ,Learning and Assessment Method
<p>KK- Knowledge and Understanding A1. Writing object-oriented programs through the Java language.</p>
<p>LL- B. Subject-specific skills B1. Learning the high-level object-oriented programming language such as (JAVA).</p>

## Teaching and Learning Methods

- Learning: provide printed lectures and modern, diverse and rich sources of examples.
- Learning: to use the blackboard to the goal of teaching students and explain the steps the solution and extraction results.
- Education: resolving some questions.
- Learning: asking questions and inquiries and make the student turn into a teaching explanation and solution on the blackboard at that stage.
- Learning: direct questions and each student is experimenting to see how interaction and the rest to pay attention to.
- Learning: give a group of questions as a duty to students to encourage them to follow up article where by solving those questions to know whether he has been absorbing material or not.

## Assessment methods

- Quizzes (quiz) semi-weekly.
- Questions sudden that overlapping with explain the article.
- Daily and quarterly tests.

## C. Thinking Skills

C1. ask for the same problem Solutions Group and discussed both individually and determine the appropriate method of solution to the problem at hand with a stand on the disadvantages of the rest of the methods.

C2. Put exceptional oral questions that need answers, where questions be of a specific gravity of evaluation and grading hand than be a strong incentive for student participation, competition and the race to solve them.

### Teaching and Learning Methods

Discussions that arise in the course of the lecture and try to involve the largest possible number of students, and touched on the details of things and discussed objectively and targeted discussion.

### Assessment methods

- Oral evaluated by involving students in discussions.
- quizzes.
- daily, quarterly exams.

### D. General and Transferable Skills (other skills relevant to employability and personal development)

D1- give duties to students and ask them to solve them to know where their strengths and weaknesses.

D2- alert on errors in the oral answers of students and discussed to see their mistake.

D3- alert on errors in the answers written by students and notation to clarify the student.

11. Course Structure					
Week	Hours	ILOs	Unit/Module or Topic Title	Teaching Method	Assessment Method
1	2	Understanding Exception Handling	Exception Handling	According to above point 10 and as needed	According to above point 10 and as needed
2	2	Know Java Built-in Exceptions	Java's Built-in Exceptions	According to above point 10 and as needed	According to above point 10 and as needed
3	2	Multithreaded programming learning	Multithreaded Programming	According to above point 10 and as needed	According to above point 10 and as needed
4	2	How to use the synchronization methods	Using Synchronized Methods	According to above point 10 and as needed	According to above point 10 and as needed
5	2	Interthread Communication learning	Interthread Communication	According to above point 10 and as needed	According to above point 10 and as needed
6	2	Know Suspending, Resuming, and Stopping Threads using Java	Suspending, Resuming, and Stopping Threads Using Java 2	According to above point 10 and as needed	According to above point 10 and as needed
7	2	Understanding of I / O and Applets	I/O and Applets	According to above point 10 and as needed	According to above point 10 and as needed
8	2	the first Exam	First		

			examination		
9	2	learning Input / Output Exploring java.io	Input/Output Exploring java.io	According to above point 10 and as needed	According to above point 10 and as needed
10	2	Understanding networks	Networking	According to above point 10 and as needed	According to above point 10 and as needed
11	2	Understanding Web sites	Internet Addressing	According to above point 10 and as needed	According to above point 10 and as needed
12	2	learning TCP / IP Client Sockets TCP / IP Server Sockets	TCP/IP Client Sockets TCP/IP Server Sockets	According to above point 10 and as needed	According to above point 10 and as needed
13	2	Understanding HttpURLConnection	HttpURLConnection	According to above point 10 and as needed	According to above point 10 and as needed
14	2	Understanding Event Handling	Event Handling	According to above point 10 and as needed	According to above point 10 and as needed
15	2	final exam	Final examination		

## 12. Infrastructure

13. Admissions	
Pre-requisites	Object Oriented programming language + Java Language
Minimum number of students	25
Maximum number of students	35
IT software, websites)	
Community-based facilities (include for example, guest Lectures , internship , field studies)	