STANDARD COURSE OUTLINE

Annex 3

Hashemite University		Animal Tissue Culture 2401042333
Faculty of Science		Pre-requisite: 110104102
Department of Biology and Biotechnology	Course Syllabus	

Course Information	
Lecture's Time	Mon, Wed: 8:30-9:30 a.m.
Lecture Room	Biology Building Room 241
Instructor	Prof. Lubna Tahtamouni
Office Location	Biology Building 110
Office Hours	Sun, Tue: 1-2 p.m. or by appointment
Text Book Culture of Animal Cells, A Manual of Basic Techniques, R. Ian Freshney, Wiley, 2000, 4th edition.	
References(s)	

Grading Policy:

Theory		**Practical**	
1st Exam	15%	Quizzes	10 %
2nd Exam	15%	Midterm	40%
Other	30%	Reports	10%
Final Exam	40%	Final Exam	40%

Course Objectives
This course provides students with the skills and knowledge to work in a modern biological laboratory making use of cell culture techniques. Emphasis is placed on aseptic techniques for animal cell culture and the requirements for cell growth in vitro. Topics covered include sterile and aseptic techniques, media preparation, cell count and viability, cryopreservation, subculturing, and applications using cell cultures
Teaching and Learning Methods
Lectures **PowerPoint Slides** **Textbook**

Course Contents

Week	Topic
1	**Introduction**
2	**Biology of Animal Cells**
3	**Tissue Culture Lab Design and Equipment**
4	**Tissue Culture Vessels and Consumables**
5	**Tissue Culture Medium**
6	**Aseptic Techniques and Contamination**
7	**Types of Culture**
8	**Primary Cultures**
9	**Cell Lines**
10	**Maintenance of Cultures**
11	**Cryopreservation**
12	**Applications of Tissue Culture- Introduction**
13	**Applications of Tissue Culture I**
14	**Applications of Tissue Culture II**
15	**Applications of Tissue Culture III**
16	Final Examination