



Al-Ahliyya Amman University
Faculty of Engineering
Department of Medical Engineering
(160) Credit Hours
Study Plan 2014-2015

First: University Requirements: (27) Credit Hours

1) Compulsory University Requirements: (12) Credit Hours

Course no.	Course Title	Cr.H.	Prerequisite	Exception
0121181	English Language Communication Skills (1)	3	0171100	-
0161101	Arabic Language Communication Skills (1)	3	0161100	-
0161200	Military Sciences	3	-	Non-Jordanians
0161201	National Education	3	-	-

2) Elective University Requirements: (15) Credit Hours

A) Humanities: (6) Credit Hours

Course no.	Course Title	Cr.H.	Prerequisite	Exception
0152102	English Language Communication Skills (2)	3	0121181	-
0161300	Islamic Culture	3	-	-
0162102	Arabic Language Communication Skills (2)	3	0161101	-
0162301	History of Jordan and Palestine	3	-	-
0411100	Human Rights	3	-	Law Students

B) Social and Economic Sciences: (6) Credit Hours

Course no.	Course Title	Cr.H.	Prerequisite	Exception
0132200	Psychology and Life	3	-	Psychology Students
0143301	Entrepreneurship	3	-	-
0161301	Islam and Life	3	-	-
0162302	Media and Public Relations	3	-	-
0561500	Tourism and Archaeology	3	-	Hotels & Tourism Students

C) Sciences, Technology, and Health: (3) Credit Hours

Course No	Course Title	Cr.H.	Prerequisite	Exception
0161303	Sport and Health	3	-	-
0162305	Environmental and Public Safety	3	-	-
0162306	Science and Life	3	-	-

Community Service is a Mandatory Graduation Requirement (10 hours of service).

* This prerequisite must be successfully passed before registering the course

Second: Faculty Compulsory Requirements: (33) Credit Hours

Course no.	Course Title	Cr.H.	Prerequisite	Co-requisite
0111101	Mathematics (1)	3	-	-
0111202	General Physics (1)	3	-	-
0111203	General Physics (2)	3	0111202	-
0111204	General Physics Lab .	1	-	0111202
0112102	Mathematics (2)	3	0111101	-
0811201	Computer Skills (Engineering)	3	0331200	-
0812101	Technical Writing	1	0121181	-
0812102	Engineering Ethics	1	0121181	-
0832103	Engineering Mathematics (1)	3	0112102 *	-
0832104	Engineering Mathematics (2)	3	0112102	-
0832107	Engineering Statistics	3	0111101	-
0833105	Numerical Analysis	3	0832104	-
0871101	Engineering Workshop	1	-	-
0871102	Engineering Drawing	2	-	-

Third: Major Requirements: (100) Credit Hours

A) Compulsory Major Requirements: (43) Credit Hours

Course no.	Course Title	Cr.H.	Prerequisite	Co-requisite
0832501	Biomechanics (1)	3	0111202	-
0833301	Medical Electronics	3	0822205	-
0833302	Simulation Lab. for Medical Engineering	1	0833301	-
0833502	Biomechanics (2)	3	0832501 *	-
0833503	Biomaterials	2	0832501	-
0834401	Medical Instrumentation (1)	3	0833301 0922263	-
0834402	Medical Sensors and Biotelemetry	3	0834401	-
0834403	Medical Instrumentation (2)	3	0834401 *	-
0834404	Medical Instrumentation Lab.	1	-	0834403
0834405	Medical Sensors and Biotelemetry Lab .	1	0834402	-
0834504	Medical Rehabilitation Engineering	3	0833503	0834402
0834505	Biomechanics and Rehabilitation Lab .	1	-	0834504
0834901	Field Training	3	Pass(110) Cr.H.	-
0835406	Design Concepts in Biomedical Engineering	2	-	0834403
0835407	Medical Technology Management	3	0834403	-
0835408	Medical Imaging Systems	3	0834403	-
0835507	Prosthetic and Artificial Organs	2	-	0834504
0835902	Graduation Project (1)	1	Pass (120) Cr.H.	0835406
0835903	Graduation Project (2)	2	0835902	-

B) Ancillary Major Requirements: (51) Credit Hours

Course no.	Course Title	Cr.H.	Prerequisite	Co-requisite
0812401	Digital Logic Circuits	3	-	-
0812402	Digital Logic Circuits Lab.	1	-	0812401
0813414	Microprocessors and Embedded Systems	3	0812401	-
0814415	Microprocessors and Embedded Systems Lab.	1	-	0813414
0814208	Digital Image Processing	3	0823501	-
0822205	Electronics	3	0872301	-
0823206	Electronics Lab.	1	-	0822205
0823207	Digital Electronics	3	0822205	-
0823208	Digital Electronics Lab	1	-	0823207
0823501	Signals and Systems	3	0832103	-
0824507	Digital Signal Processing	3	0823501	-
0872301	Electric Circuits (1)	3	0111202	-
0872302	Electric Circuits (2)	3	0872301 *	-
0872303	Electric circuits Lab.	1	-	0872302
0873305	Electrical Machines	3	0872302	-
0874312	Control Systems	3	0823501	-
0911567	General Chemistry for Engineers	3	-	-
0911568	General Chemistry Lab. for Engineers	1	-	0911567
0921769	Biology for ME	3	-	-
0921162	Anatomy	3	0921769	-
0922263	Physiology	3	0921162	-

C) Elective Major Requirements: (6) Credit Hours

Course no.	Course Title	Cr.H.	Prerequisite	Co-requisite
0834303	Computer Applications in ME	3	0811201	-
0834506	Fluid Mechanics for ME	3	0833502	-
0835409	Laboratory Instrumentation	3	-	0834403
0835508	Nanotechnology in ME	3	-	0833503
0835904	Selected Topics in Medical Engineering	3	Department Approval	-
0874106	Engineering Economy and Management	3	0111101	-
0874209	Power Electronics	3	0822205 0823501	-

Fourth: Remedial Requirements (to a student who has not passed the level exam)

Course no.	Course Title	Cr.H.	Prerequisite
0161100	Arabic Language (Remedial)	3	-
0171100	English Language (Remedial)	3	-
0331200	Computer Skills (Remedial)	3	-



Ref.: Deans' Council Session (09/2014-2015) Decision No: (06)

Date: 4,6/11/2014

