



Student name: .....  
 Student No : .....  
 Academic Advisor: .....

**First: University Requirements (27) Cr.-Hr.**  
**A. First Field: University Compulsory Requirements: (18) Cr.-Hr.**

Course No.	Course Title	Cr.-Hr.	Prerequisite
111100	Military Science	3	---
116101	National Education	3	---
116103	Communication and Contact Skills (Arabic Language)	3	114099
116107	Communication and Contact Skills (English Language 1)	3	130099
116108	Communication and Contact Skills (English Language 2)	3	116107
116110	Entrepreneurship and Innovation	1	---
116102	Leadership and Social Responsibility	1	---
116104	Life Skills	1	---
116109	Voluntary Community Service	0	---

**B. University Elective Courses (9) Cr.-Hr.**  
 The student studies 9 credit hours from the table below

Course No.	Course Title	Cr.-Hr.	Prerequisite
116105	Thinking Skills	3	---
116133	Human Vision and Civilization	3	---
116111	Language Skills (1)	3	---
116112	Language Skills (2)	3	---
116113	Development & Environment	3	---
116114	Introduction to Project Management	3	---
116140	Human Rights	3	---
116143	Legal Culture	3	---
116106	Economic Culture	3	---
216104	Digital Culture	3	---
216102	Data Analysis Skills	3	---
216105	Health Culture	3	---
116144	Introduction to cycology and sociology	3	---

**Note:**  
 All students must take level examinations in Arabic Language, English Language, and Computer Skills. Student who failed to pass in any examination (less than 50%) must successfully pass the remedial course which he/she did not pass.  
**Codes used in Study Plan:**  
 (610) Electrical Eng.  
 (611) Renewable Eng.  
 (630) Computer Eng.  
 (650) Communications & Electronics Eng.  
 (670) Civil Eng.  
 (620) Mechanical Eng.  
 (615) Alternative Energy Technology  
 (640) Mechatronics Eng.  
 (660) Architectural Eng.

**Second: Faculty Requirements: (27) Cr.-Hr.**

Course No.	Course Title	Cr.-Hr.	Prerequisite
216111	Calculus (1)	3	---
250102	Calculus (2)	3	216111
216131	General Physics (1)	3	---
216132	General Physics (2)	3	216131
216141	General Chemistry (1)	3	---
660131	Manual Engineering Drawing	1	---
660132	Computer Engineering Drawing	1	660131
620171	Engineering Workshop (1)	1	---
610263	Programming Language	3	750099
640253	Engineering Skills	3	130108
610550	Entrepreneurship	3	640253

**Third: Department Requirements (106) Cr.-Hr.**  
**A. Compulsory Requirements: (80) Cr.-Hr.**

Course No.	Course Title	Cr.-Hr.	Prerequisite
610218	Electrical Circuits	3	216132
610216	Electrical Circuits Lab.	1	610218(*)
650242	Electronics (1)	3	610218
640234	Statics and Strength of Materials	3	216131
640233	Dynamics and Vibrations	3	640234
610220	Logic Circuit	3	610263
640221	Programming Lab for Mechatronics	1	610263 (*)
640327	Modeling and Simulation	3	640233+650260
610310	Electrical Machines	3	610218
640312	Power Electronics and Drives	3	610310+650242
640313	Communication for Mechatronics	3	650242
640242	Instruments and Transducers	3	650242
640337	Mechanics and Vibration lab	1	640233(*)
640328	Microprocessors and Microcontrollers	3	610220
640344	Automatic Control Theory	3	640327
620333	Machines Theory	3	640233
640342	Mechatronics Project	1	640328
640415	Machine and Power Electronics lab	1	640312(*)+640412(*)
640424	Machine Intelligence	3	610263+650364

Course No.	Course Title	Cr.-Hr.	Prerequisite
640445	Programmable Logic Controllers	3	640328
640441	Digital Control	3	640344+640328
640442	Automatic Control Lab	1	640344(*)
640412	Electronics and Transducers Lab	1	640242(*)+610216(*)
640448	Microcontrollers Lab	1	640328(*)
640458	Reverse Engineering	3	640342
640435	Pneumatic and Hydraulic Systems	3	640445(*)
640447	Mechatronics Systems Design	3	640344+640312
640545	Robotics	3	620333+640424
640544	Mechatronics Systems Design Lab	1	640447(*)
640541	CAD/CAM Lab	1	660132(*)
640531	Automation and Fluids Control Lab	1	640435(*)
640543	Signals Processing for Mechatronics	3	640441
640440	Engineering Project (1)	1	Passing 100 Cr.-Hr + 640447(*)
640540	Engineering Project (2)	2	640440+640499
640499	Engineering Training	3	Passing 115 Cr.-Hr(**)

**B. Compulsory Support Requirements: (17) Cr.-Hr.**

Course No.	Course Title	Cr.-Hr.	Prerequisite
250202	Calculus (3)	3	250102
250205	Linear Algebra and Vector Calculus	3	250102
650260	Engineering Analysis (1)	3	250102
610262	Engineering Analysis (2)	3	250205
650364	Probability and Random Variables	3	650260
620172	Engineering Workshop (2)	1	620171
216143	General Chemistry Lab (1).	1	216141

**C. Elective Requirements: (9) Cr.-Hr.**

Course No.	Course Title	Cr.-Hr.	Prerequisite
640516	Real Time Systems	3	640344
640593	Special Topics in Mechatronics	3	Dept. Approval.
640512	Computer Numerical Control	3	640541(*)
640462	Process Control	3	640344
640425	Machine Learning	3	640424
650562	Internet of Things	3	640313

(\*) Concurrent.  
 (\*\*\*) Seven weeks (280 hours) of training after completing (115) Cr.-Hrs.



*Handwritten signatures and dates:*  
 C-CC-19  
 C-CC-19-16  
 5/10/2022