

Science
Chemistry

Study Program : Bachelor
Study Plan Type : Major
Academic Year : 2022

The requirements to obtain a Bachelor degree is :-

* The minimum requirements to get a Bachelor degree in / Chemistry / is to pass 132 credit hours, according to this study plan.

* The credit hours are distributed to get a Bachelor degree as follows :-

	Number of credit hours
University Requirements	27.000
Compulsory	18.000
Elective	9.000
Faculty Requirements	21.000
Compulsory	21.000
Specialization Requirments	81.000
Compulsory	67.000
Elective	14.000
Free Courses	3.000
	0.000
Pre-requist Courses	0.000
	0.000
Total :	132.000

University Requirements Credit Hours : 27
Requirement type : Compulsory Credit Hours :18

Course Number	Course Name	Credit Hours	Theoretical	Practical	Pre - Requisite	Cours e Type
2116011101	Arabic Communication Skills	3.000	3.000	0.000	121601099	online learning
2116021101	English Communication Skills	3.000	3.000	0.000	121602099	online learning
2214041117	Military Science	3.000	3.000			online learning
1714041118	National Education	3.000	3.000	0.000		online learning
2114041123	Leadership and Social Responsibility	2.000	2.000	0.000		online learning
2114041124	Enterpreneurship and Innovation	2.000	2.000	0.000		online learning
2114041125	Life Skills	2.000	2.000	0.000		online learning

University Requirements Credit Hours : 27
Requirement type : Elective Credit Hours :9

Course Number	Course Name	Credit Hours	Theoretical	Practical	Pre - Requisite	Cours e Type
1804001128	Cyber Hygiene	3.000	3.000	0.000	110108099	in class
2210031100	digital culture	3.000	3.000	0.000		
1916033201	Italian Language (2)	3.000	3.000	0.000	1716031101	in class
1916034101	Russian Language (1)	3.000	3.000	0.000		online learning
1916034102	Russian Language (2)	3.000	3.000	0.000		
1916034201	Japanese (2)	3.000	3.000	0.000	1716031102	in class
1916035101	Turkish Language (1)	3.000	3.000	0.000		in class
1916036101	Korean Language (1)	3.000	3.000	0.000		in class
1916036102	Korean Language(2)	3.000	3.000	0.000	1916036101	
1916037101	German Language (1)	3.000	3.000	0.000		in class
1916038101	Chinese Language (1)	3.000	3.000			online learning
1916039101	Polish Language (1)	3.000	3.000	0.000		in class
1714041101	University Life of Student	3.000	3.000			online learning
1714041102	Introduction to Psychology	3.000	3.000			online learning
1714041104	Family and Child Education	3.000	3.000			online learning
1714041107	Citizenship and Human Rights	3.000	3.000			in class
1714041110	Islam Current Issues	3.000	3.000			in class
1714041111	Islamic Thought	3.000	3.000			online learning
1714041112	Jerusalem : Histroy and Civilization	3.000	3.000			in class
1714041113	Citizenship and Human Rights	3.000	3.000	0.000		online learning
1714041114	Histroy and Civilization of Jordan	3.000	3.000			online learning
1714041115	Sociology	3.000	3.000			in class
1714041116	Archaeology and Tourism	3.000	3.000			online learning
1714041120	Economic and Management Science	3.000	3.000			

University Requirements Credit Hours : 27
Requirement type : Elective Credit Hours :9

Course Number	Course Name	Credit Hours	Theoretical	Practical	Pre - Requisite	Cours e Type
1714041121	Law and Ordering of Our Life	3.000	3.000			online learning
1714041122	Principles of Sign Language	3.000	3.000			in class
1714041126	Humanistic Moral and Values Education	3.000	3.000			online learning
1714041127	Conflict Resolution and Accept Others	3.000	3.000			online learning
1714041128	Culultural Heritage in Jordan	3.000	3.000			
1914041130	Integrity Transperancy and anti - Corruption	3.000	3.000	0.000		online learning
1714041193	Palestinian Cause	3.000	3.000			in class
1714041194	Arabic Language and Current Issues	3.000	3.000			online learning
1814041195	Disability and Healthy Community	3.000	3.000			online learning
1814041197	Selected Topics in National Trends	3.000	3.000			
1814041198	Education for Sustainable Development	3.000	3.000			online learning
1814041199	Adjustment and Mental Health	3.000	3.000			online learning
1814041200	Introduction to Education	3.000	3.000			online learning
1914042111	Media Education	3.000	3.000	0.000		online learning
2101081139	Physical Culture	3.000	3.000	0.000		online learning
2201081140	Development and Environment	3.000	3.000	0.000		online learning
0110108104	Energy and its Sources	3.000	3.000	0.000		online learning
0110108113	Biotechnology and Society	3.000	3.000	0.000		online learning
0110108114	Automobile Essentials	3.000	3.000	0.000		
0110108115	Computer Ethics	3.000	3.000	0.000		blended learning
0110108130	Health and Nutrients	3.000	3.000	0.000		online learning
0110108131	Health Education and First Aid	3.000	3.000	0.000		online learning
0110108132	Sport and Health	3.000	3.000	0.000		online learning

University Requirements Credit Hours : 27
Requirement type : Elective Credit Hours :9

Course Number	Course Name	Credit Hours	Theoretical	Practical	Pre - Requisite	Cours e Type
0140108134	Ethics in Natural Science	3.000	3.000	0.000		online learning
0170108135	Reproductive Health	3.000	3.000	0.000		online learning
0140108166	Pharmaceutical Edification	3.000	3.000	0.000		
0121601105	Applied Arabic Language	3.000	3.000			in class
0121602102	Applied English Language	3.000	3.000	0.000		blended learning
0121602103	Technical Translation	3.000	3.000	0.000		blended learning
0141603101	Italian Language	3.000	3.000			in class
0151603102	Japanese Language (Level 1)	3.000	3.000	0.000		in class
0121603201	Spanish Language (1)	3.000	3.000			blended learning

Faculty Requirements Credit Hours : 21
Requirement type : Compulsory Credit Hours :21

Course Number	Course Name	Credit Hours	Theoretical	Practical	Pre - Requisite	Cours e Type
1701081136	General Physics (1)	3.000	3.000	0.000		in class
1701081138	General Chemistry (1)	3.000	3.000	0.000		in class
0110101102	Calculus (2)	3.000	3.000	0.000	110108101	blended learning
0110102102	General Physics (2)	3.000	3.000	0.000	1701081136	in class
0110108101	Calculus (1)	3.000	3.000	0.000		online learning
0110108105	General Biology (1)	3.000	3.000	0.000		in class
0110108112	Computer Programming	3.000	3.000	0.000	(1001103 AND 1001104) OR (110108099 OR 1011100)	blended learning

Specialization Requirments Credit Hours : 81
Requirement type : Compulsory Credit Hours :67

Course Number	Course Name	Credit Hours	Theoretical	Practical	Pre - Requisite	Cours e Type
2001031311	Instrumental Analysis (1)	3.000	3.000	0.000	(110103211 AND 110103221 AND 110103213)	in class
2001031312	Instrumental Analysis (2)	3.000	3.000	0.000	2001031311	in class
2001031313	Practical Instrumental Analysis	1.000	0.000	3.000	2001031312 synchronous	in class
2001031321	Inorganic Chemistry (2)	3.000	3.000	0.000	110103221 AND 110103231	in class
2001031325	Practical Inorganic Chemistry□	3.000	1.000	5.000	(2001031321 AND 110103235 AND 110103213)	in class
2001031335	Identification of Organic Compounds	3.000	1.000	5.000	110103235 AND 110103331 synchronous	in class
2001031341	Physical Chemistry (2)	3.000	3.000	0.000	110103241 AND 110103221	in class
2001031342	Physical Chemistry (3)	3.000	3.000	0.000	110101203 AND 2001031341	in class
2001031345	Practical Physical Chemistry	3.000	1.000	6.000	2001031342 synchronous AND 2001031313 synchronous	in class
2001031412	Environmental Analytical Chemistry	3.000	3.000	0.000	2001031311	in class
2001031421	Inorganic Chemistry (3)	3.000	3.000	0.000	2001031321	in class
2001031432	Organic Biochemistry	3.000	3.000	0.000	110103232 AND 110103221	in class
2201031499	Graduation Project And Seminar	3.000	1.000	6.000		
1801041103	General Practical Biology (1)	1.000	0.000	3.000	110108105 synchronous	in class
0110101203	Ordinary Differential Equations (1)	3.000	3.000	0.000	110101102	in class
0110103102	General Chemistry (2)	3.000	3.000	0.000	110103101	in class
0110103105	General Chemistry Laboratory	2.000	1.000	3.000	110103102 synchronous	in class
0110103211	Analytical Chemistry	3.000	3.000	0.000	110103102 OR 110103107	blended learning
0110103213	Analytical Chemistry Laboratroy	1.000	0.000	3.000	(110103105 OR 110103108) AND 110103211 synchronous	in class
0110103221	Inorganic Chemistry (1)	3.000	3.000	0.000	110103102	in class
0110103231	Organic Chemistry (1)	3.000	3.000	0.000	110103102	in class

Specialization Requirments Credit Hours : 81
Requirement type : Compulsory Credit Hours :67

Course Number	Course Name	Credit Hours	Theoretical	Practical	Pre - Requisite	Cours e Type
0110103232	Organic Chemistry (2)	3.000	3.000	0.000	110103231	in class
0110103235	Practical Organic Chemistry	2.000	1.000	3.000	110103232 synchronous AND 110103105	in class
0110103241	Physical Chemistry (1)	3.000	3.000	0.000	110103102 AND 110101102	in class
0110103331	Spectroscopy of Organic Compounds	3.000	3.000	0.000	110103232	blended learning

Specialization Requirments Credit Hours : 81
Requirement type : Elective Credit Hours :14

Course Number	Course Name	Credit Hours	Theoretical	Practical	Pre - Requisite	Cours e Type
2001031413	Industrial Analysis	3.000	3.000	0.000	2001031311 AND 2001031313	blended learning
2201031422	Applied Inorganic Chemistry	3.000	3.000	0.000	2001031321	
2001031433	Natural Products Chemistry	3.000	3.000	0.000	2001031432 synchronous	in class
2001031435	Chemistry of Heterocyclic Compounds	3.000	3.000	0.000	2001031432	in class
2001031441	Molecular Spectroscopy	3.000	3.000	0.000	2001031342	in class
2001031443	Surface Chemistry	3.000	3.000	0.000	2001031341	
2001031444	Photochemistry	3.000	3.000	0.000	2001031342	
2001031445	Electrochemistry and Corrosion	3.000	3.000	0.000	2001031341	
2001031461	Industrial Chemistry	3.000	3.000	0.000	110103232 AND 2001031321	in class
1801041102	General Biology (2)	3.000	3.000	0.000	110108105	in class
1801041222	Biochemistry (1)	2.000	2.000	0.000	(110103236 OR 110103232 OR 1701081137) AND 1801041102	in class
1801041223	Practical Biochemistry (1)	1.000	0.000	3.000	1801041222 synchronous	in class
0110102103	General Physics Laboratory (1)	1.000	0.000	3.000	1701081136 synchronous	in class
0110102104	General Physics Laboratory (2)	1.000	0.000	3.000	110102102 synchronous AND 110102103	in class
0110102261	Modern Physics (1)	3.000	3.000	0.000	110102102 AND 110101102	in class
0110103464	Polymer Chemistry	3.000	3.000	0.000	110103232	blended learning
0110103495	Special Topics in Organic and Inorganic Chemistry	3.000	3.000	0.000		in class
0110103497	Special Topics in Physical and Analytical Chemistry	3.000	3.000	0.000		in class

Courses - Not Allowed To Study Credit Hours : 0
Requirement type : Compulsory Credit Hours :0

Course Number	Course Name	Credit Hours	Theoretical	Practical	Pre - Requisite	Cours e Type
2210041132	enterepreurship and innovation	2.000	2.000	0.000		online learning

Pre-Requist Courses Credit Hours : 0
Requirement type : Credit Hours :0

Course Number	Course Name	Credit Hours	Theoretical	Practical	Pre - Requisite	Cours e Type
0001001096	Computer Skills Test	0.000	0.000	0.000		in class
0110108099	Computer Skills/ Prerequisite	3.000	3.000	0.000	1001096	online learning
0002110096	Arabic Placement Test	0.000	0.000	0.000		in class
0002120096	English Placement Test	0.000	0.000	0.000		in class
0121601099	Arabic Language / Pre-requisite	3.000	3.000		2110096	online learning
0121602099	English Language / Pre-requisite	3.000	3.000		2120096	online learning

free study materials are (3) credit hours, The student chooses it from any of the courses offered by the university departments.