

B.Sc. in Electrical Engineering Program Study Plan

1. 1st Level

	Course Title	Course Code	Contact Hrs		CRs	Prereq.
			Lec.	Lab		
1	English Language Skills I	ECE001	15	0	5	-
2	Learning & Thinking Skills	LTS001	3	0	3	-
3	General Biology	BIO101	3	0	3	-
4	Chemistry	CHEM101	3	0	3	-
5	Mathematics I	MATH100	3	0	3	-
Total			29	0	17	

2. 2nd Level

	Course Title	Course Code	Contact Hrs		CRs	Prereq.
			Lec.	Lab		
1	Comm. Skills	COMM001	2	0	2	-
2	Computer Skills & Applications	CSC001	3	0	3	-
3	English Language Skills (2)	ECE002	15	0	5	ECE001
4	Mathematics II	MATH101	3	0	3	MATH100
5	General Physics	PHYS101	3	0	3	-
Total			26	0	16	

3. 3rd Level

	Course Title	Course Code	Contact Hrs		CRs	Prereq.
			Lec.	Lab		
1	Eng. Drawing and Graphics	ENG201	3	0	3	-
2	Eng. Mechanics (1)	ENG203	2	0	2	PHYS101
3	Introduction to Eng. Design (1)	ENG205	2	2	3	MATH101 ECE002
4	Islamic Culture I	ISLS101	2	0	2	-
5	Mathematical Geometry (3)	MATH284	3	0	3	MATH101
6	Physics	PHYS205	3	2	4	PHYS101
7	General Phys Lab	PHYS281	0	2	1	PHYS101
Total			15	6	18	

4. 4th Level

	Course Title	Course Code	Contact Hrs		CRs	Prereq.
			Lec.	Lab		
1	Electrical Circuits I	ELEN200	3	0	3	MATH101 PHYS205
2	General Chem. Lab	CHEM203	0	2	1	CHEM101
3	Introduction to Eng. Design (2)	ENG213	2	0	2	ENG205
4	Complex Analysis and Discrete Math	ELEN220	3	0	3	MATH101
5	Linear Algebra	MATH241	3	0	3	MATH284
6	Production Tech. and Workshops	ENG202	3	0	3	ENG201
7	Differential Equ.	MATH383	3	0	3	MATH284
Total			17	1	18	

5. 5th level

	Course Title	Course Code	Contact Hrs		CRs	Pre(Co)req.
			Lec.	Lab		
1	Electrical Circuits II	ELEN202	3	0	3	ELEN200
2	Electric Circuits Lab	ELEN203	0	3	1	ELEN202, 200(Co)
3	Electronics I	ELEN210	3	0	3	ELEN200
4	Logic Design	ELEN250	3	0	3	ELEN200
5	Signals and Systems	ELEN230	3	0	3	ELEN200 MATH241
6	Electromagnetics I	ELEN240	3	0	3	PHYS205 MATH284
Total			15	1	16	

6. 6th level

	Course Title	Course Code	Contact Hrs		CRs	Pre(Co)req.
			Lec.	Lab		
1	Electromagnetics II	ELEN340	3	0	3	ELEN240 MATH383
2	Electromagnetics L.	ELEN341	0	3	1	ELEN203,240, 340(Co)
3	Eng. Programming	ELEN326	2	3	3	CSC001
4	Control Systems	ELEN232	3	0	3	ELEN230 MATH383
5	Electronics II	ELEN310	3	0	3	ELEN202,210
6	Electronic Lab	ELEN311	0	3	1	ELEN203,210, 310(Co)
7	Numerical Methods	ELEN322	3	0	3	MATH241
8	Logic Design Lab	ELEN251	0	3	1	ELEN250,203
Total			14	12	18	

7. 7th level

	Course Title	Course Code	Contact Hrs		CRs	Pre(Co)req.
			Lec.	Lab		
1	Engineering Econ.	ENG214	2	0	2	ENG213
2	Prob. Methods in EE	ELEN224	3	0	3	ELEN230
3	Embedded Systems	ELEN352	3	3	4	ELEN326,250
4	Electrical Machines	ELEN370	3	0	3	ELEN202 ,340
5	Islamic Culture II	ISLS201	2	0	2	ISLS101
6	Control lab	ELEN233	0	3	1	ELEN232,203
7	Scientific Computing	ELEN331	2	0	2	MATH241 ELEN200
Total			15	6	17	

8. 8th level

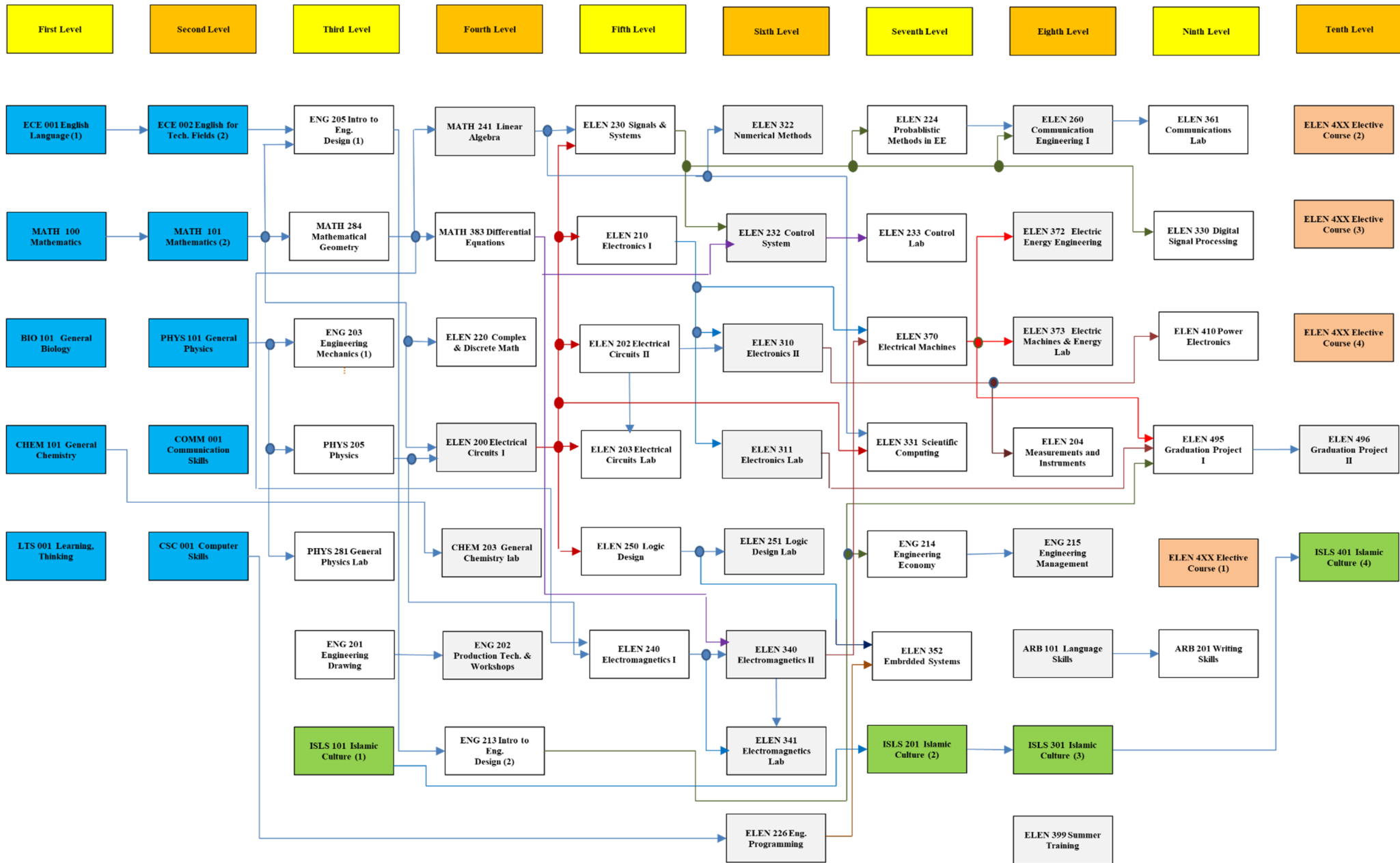
	Course Title	Course Code	Contact Hrs		CRs	Pre(Co)req.
			Lec.	Lab		
1	Measurements &inst.	ELEN204	2	0	2	ELEN310
2	Comm. Eng. I	ELEN260	3	0	3	ELEN224,230
3	Electric Energy Eng.	ELEN372	3	0	3	ELEN370
4	Electric Machines & Energy Lab	ELEN373	0	3	1	ELEN372(Co) ,203
5	Summer Training	ELEN399	0	0	2	-
6	Language Skills	ARB101	2	0	2	-
7	Islamic Culture III	ISLS301	2	0	2	ISLS201
8	Eng. Management	ENG215	2	0	2	ENG214
Total			14	3	17	

9. 9th level

	Course Title	Course Code	Contact Hrs		CRs	Pre(Co)req.
			Lec.	Lab		
1	Digital Signal Processing	ELEN330	3	0	3	ELEN230
2	Communication Engineering Lab	ELEN361	0	3	1	ELEN260 - ELEN203
3	Power electronics	ELEN410	3	0	3	ELEN310
4	Graduation Project I	ELEN495	0	2	1	ELEN311 - ELEN370 - ENG213
5	Writing Skills	ARB201	2	0	2	ARB101
6	Elective 1	ELEN4xx	3	0	3	-
7	Elective 2	ELEN4xx	3	0	3	-
Total			14	5	16	

10. 10th level

	Course Title	Course Code	Contact Hrs		CRs	Pre(Co)req.
			Lec.	Lab		
1	Graduation Project II	ELEN496	0	6	3	ELEN495
2	Islamic Culture IV	ISLS401	2	0	2	ISLS301
3	Elective 3	ELEN4xx	3	0	3	-
4	Elective 4	ELEN4xx	3	0	3	-
Total			8	6	11	



▪ ELEN 203 is a prerequisite for all Labs