Indian Institute of Information Technology, Allahabad
Department of Electronics and Communication Engineering
UG curriculum proposal (with effect from July 2018)

Total Credit: 160

Semester 1 (BEC - 1)					Total Credit : 20	
Sl.No.	Course Name	Code	Core/Elect	Credit	L-T-P	Pre-Requisite
1	Physics		Core (H)	4	2–1–1	Nil
2	Linear Algebra		Core (H)	4	3–1–0	Nil
3	Introduction to Programming in C		Core (H)	4	2–1–1	Nil
4	Fundamentals of Electrical & Electronics Engg.		Core (H)	4	2–1–1	Nil
5	Professional Communication		Core (H)	2	1--0--1	Nil
6	Principles of Management		Core (H)	2	1–1–0	Nil
					11–10–8	
	Total			20	29	

Semester 2 (BEC - 2)					Total Credit : 22	
Sl.No.	Course Name	Code	Core/Elect	Credit	L-T-P	Pre- Requisite
1	Univariate and Multivariate Calculus		Core (H)	4	3–1–0	Nil
2	Digital System Design		Core (H)	4	2–1–1	Nil
3	Data Structures		Core (H)	4	2–1–1	Introduction to Programming in C
4	Electronic Devices and Circuits		Core (H)	4	2–1–1	Nil
5	Electromagnetic Field and Waves		Core (H)	4	3–1–0	Nil
6	Electronic Workshop		Core (H)	2	0–0–2	Nil
					12–10–10	
	Total			22	32	

Semester 3 (BEC - 3)					Total Credit : 22	
Sl.No.	Course Name	Code	Core/Elect	Credit	L-T-P	Pre- Requisite
1	Analog Communication		Core (H)	4	2–1–1	Nil
2	Analog Electronics		Core (H)	4	2–1–1	Electronic Devices and Circuits
3	Electrical Engineering		Core (H)	3	2–0–1	Nil
4	Electronics Measurement and Instrumentation		Core (H)	3	2–0–1	Nil
5	Micro Processor Interface and Programming		Core (H)	4	2–1–1	Nil
6	Probability and Statistics		Core (H)	4	3–1–0	Nil
					13–8–10	
	Total			22	31	

Semester 4 (BEC - 4)					Total Credit : 20	
Sl.No.	Course Name	Code	Core/Elect	Credit	L-T-P	Pre- Requisite
1	Discrete Time Signals and Systems		Core (H)	3	2–1–0	Nil
2	Control Systems		Core (H)	4	2–1–1	Nil
3	Digital IC Design		Core (H)	3	2–0–1	Nil
4	Integrated Circuit Technology		Core (H)	3	2–1–0	Nil

5	Antenna and Wave Propagation		Core (H)	4	2–1–1	Electromagnetic Field and Waves
6	Operating Systems		Core (H)	3	2–0–1	Nil
					12–8–8	
		Total		20	28	

Semester 5(BEC - 5)					Total Credit : 20	
Sl.No.	Course Name	Code	Core/Elect	Credit	L-T-P	Pre-Requisite
1	Digital Communication		Core (H)	4	2–1–1	Nil
2	Computer Networks		Core (H)	4	2–1–1	Nil
3	Embedded System Design		Core (H)	4	3–0–1	Nil
4	Microwave Engineering		Core (H)	4	2–1–1	Nil
5	SMT Workshop		Core (H)	1	0–0–1	Nil
6	Power Electronics		Core (H)	3	2–1–0	Nil
					11–8–10	
		Total		20	29	

Semester 6(BEC - 6)					Total Credit : 22	
Sl.No.	Course Name	Code	Core/Elect	Credit	L-T-P	Pre-Requisite
1	Digital Signal Processing		Core (H)	4	2–1–1	Discrete Time Signals and Systems
2	Optical Communication		Core (H)	3	2–0–1	Nil
3	Principles of Wireless Communication		Core (H)	4	2–1–1	Nil
4	Elective 1		Core (S)	4	3–1–0	Nil
5	Elective 2		Core (S)	4	2–1–1	Nil
6	Mini Project		Core (S)	3	0–1–2	Nil
					11–10–12	
		Total		22	33	

Semester 7(BEC - 7)					Total Credit : 16	
Sl.No.	Course Name	Code	Core/Elect	Credit	L-T-P	Pre-Requisite
1	Minor Project		Core (S)	10	0–1–9	Nil
2	Elective 3		Core (S)	4	2–1–1	Nil
3	Elective 4		Core (S)	4	2–1–1	Nil
					4–6–22	
		Total		18	32	

Semester 8(BEC - 8)					Total Credit : 18	
Sl.No.	Course Name	Code	Core/Elect	Credit	L-T-P	Pre-Requisite
1	Major Project		Core (H)	12	0–2–10	Nil
2	Elective 5		Core (S)	4	3–1–0	Nil
					3–6–20	
		Total		16	29	

Note:

- A candidate can earn a maximum of 24 credits in any semester through regular registration including a dropped course.
- For dropped-out courses- Provision of Summer semester is introduced.
- A student has to take a minimum of 10 credit electives offered from ECE deptt for BTech in ECE stream.
- For the purpose of branch change, plz refer to Ordinance.
- A student can avail Add On's as per the list of even and odd semester baskets (provided it is offered by the respective department).

I Semester	II Semester	III Semester	IV Semester	V Semester	VI Semester	VII Semester	VIII Semester
+ 4 credits may be earned	+ 2 credits may be earned	+ 2 credits may be earned	+ 4 credits may be earned	+ 4 credits may be earned	+ 2 credits may be earned	+ 6 credits may be earned	+ 8 credits may be earned

Odd/Even Semester Basket [Subjects to be offered by Managamentdeptt, Applied Science and IT Deptt] [Subjects to be offered at the discretion of the deptt]	Even Semester Basket Name [Subjects to be offered by ECEDeptt – [Subjects to be offered at the discretion of the deptt]
Athletics, Yoga, community services, Society Services, Sports, Indian languages, Library management, Foreign Languages, Programming Languages (Python, C++) etc	Matlab programming, Microcontroller Programming, Emerging automotive technologies, Network Analysis, Electronic Testing equipments, Raspberry - Pi,Robotics , RF Planning and RF Engineering , Wavelets, Material Science, Electrical Power Systems, Nano Technologies, SDR, optical N/wetc