

B. Tech Computer Science and Engineering (Artificial Intelligence and Machine Learning)
Scheme of Studies/Examination (w.e.f. Session 2021-22)
Semester III

S. No.	Course No.	Subject	L:T:P	Hours/Week	Credits	Examination Schedule				Duration of Exam (Hrs.)
						Major Test	Minor Test	Practical	Total	
1	BS- CS- AIML-201A	Applied Statistical Analysis for AI	3:0:0	3	3	75	25	0	100	3
2	ES- CS- AIML-203A	Data Structure	3:0:0	3	3	75	25	0	100	3
3	PC- CS- AIML-205A	Object Oriented Programming	3:0:0	3	3	75	25	0	100	3
4	PC- CS- AIML-207A	Introduction to AI	3:0:0	3	3	75	25	0	100	3
5	ES- CS- AIML-209A	Programming Language	3:0:0	3	3	75	25	0	100	3
6	HM-902A	Business Intelligence and Entrepreneurship	3:0:0	3	3	75	25	0	100	3
7	PC- CS- AIML-213LA	Data Structure Lab	0:0:2	2	1	0	40	60	100	3
8	PC- CS- AIML-215LA	Object Oriented Programming Lab	0:0:2	2	1	0	40	60	100	3
9	PC- CS- AIML-217LA	AI Lab(Python)	0:0:2	2	1	0	40	60	100	3
		Total		24	21	450	270	180	900	
11	SIM-201A*	Seminar on Summer Internship	2:0:0	2	0	0	50	0	50	

**B. Tech Computer Science and Engineering (Artificial Intelligence and Machine Learning)
Scheme of Studies/Examination (w.e.f. Session 2021-22)**

Semester IV

S. No.	Course No.	Subject	L:T:P	Hours/Week	Credits	Examination Schedule				Duration of Exam (Hrs.)
						Major Test	Minor Test	Practical	Total	
1	BS- CS-AIML- 202M	Mathematics for Machine Learning	3:0:0	3	3	75	25	0	100	3
2	PC- CS-AIML- 204A	Intelligent Systems	3:0:0	3	3	75	25	0	100	3
3	PC- CS-AIML- 206A	Database Management System	3:0:0	3	3	75	25	0	100	3
4	PC- CS-AIML- 208A	Internet and Web Technology	3:0:0	3	3	75	25	0	100	3
5	PC- CS-AIML- 210A	Operating System	3:0:0	3	3	75	25	0	100	3
6	PC- CS-AIML- 212A	Software Engineering	3:0:0	3	3	75	25	0	100	3
7	PC- CS-AIML- 216A	Database Management System Lab	0:0:2	2	1	0	40	60	100	3
8	PC- CS-AIML- 218A	Internet and Web Technology Lab	0:0:2	2	1	0	40	60	100	3
9	PC- CS-AIML- 220A	Introduction to Python Lab	0:0:2	2	1	0	40	60	100	3
		Total		24	21	450	270	180	900	
10	MC-901A	Environmental Sciences	3:0:0	3	0		100	0	100	3

B. Tech Computer Science and Engineering (Artificial Intelligence and Machine Learning)
Scheme of Studies/Examination (w.e.f. Session 2022-23)

Semester V

S. No.	Course No.	Subject	L:T:P	Hours/Week	Credits	Examination Schedule				Duration of Exam (Hrs.)
						Major Test	Minor Test	Practical	Total	
1	PC- CS- AIML- 301A	Automata	3:1:0	3	3	75	25	0	100	3
2	PC- CS- AIML- 303A	Design and Analysis of Algorithm	3:1:0	3	3	75	25	0	100	3
3	ES- CS- AIML- 305A	Computer Network	3:1:0	3	3	75	25	0	100	3
4	PC- CS- AIML- 307A	Artificial Neural Networks	3:1:0	3	3	75	25	0	100	3
5	ES- CS- AIML- 309A	Computer Architecture	3:1:0	3	3	75	25	0	100	3
6	PC- CS- AIML- 311A	Artificial Intelligence and Machine Learning	3:1:0	3	3	75	25	0	100	3
7	PC- CS- AIML- 313A	Artificial Intelligence and Machine Learning Lab	0:0:2	2	1	0	40	60	100	3
8	PC-AIML- 317A	Design and Analysis of Algorithm Lab	0:0:2	2	1	0	40	60	100	3
9	PC- CS- AIML- 315A	Artificial Neural Networks Lab	0:0:2	2	1	0	40	60	100	3
		Total		24	21	450	270	180	900	
10	MC-904A	Energy Resources & Management	3:0:0	3	0	0	100	0	100	3
11	SIM-301A*	Seminar on Summer Internship	2:0:0	2	0	0	50	0	50	

B. Tech Computer Science and Engineering (Artificial Intelligence and Machine Learning)
Scheme of Studies/Examination (w.e.f. Session 2022-23)
Semester VI

S. No.	Course No.	Subject	L:T:P	Hours/Week	Credits	Examination Schedule				Duration of Exam (Hrs.)
						Major Test	Minor Test	Practical	Total	
1	PC CS- - AIML- 302A	Human Computer Interaction	3:0:0	3	3	75	25	0	100	3
2	PC- CS- AIML- 304A	Applied Machine Learning	3:0:0	3	3	75	25	0	100	3
3	PC- CS- AIML- 306A	Expert Systems	3:0:0	3	3	75	25	0	100	3
4	PC-AIML- 308A	Software Testing	3:0:0	3	3	75	25	0	100	3
5	PC- CS- AIML- 310A	Computer Vision	3:0:0	3	3	75	25	0	100	3
6	OEC	OEC Elective-I	3:0:0	3	3	75	25	0	100	3
7	PC- CS- AIML- 312A	Applied Machine Learning Lab	0:0:2	2	1	0	40	60	100	3
8	PC- CS- AIML- 314A	Expert Systems Lab	0:0:2	2	1	0	40	60	100	3
9	PC- CS- AIML- 318A	Software Testing Lab	0:0:2	2	1	0	40	60	100	3
		Total		24	21	450	270	180	900	

OEC Elective-I
Soft Skills and Interpersonal Communication: OE-CS- AIML -302
Project Management: OE-CS- AIML -304
Enterprise Resource Planning: OE-CS- AIML -306
Stochastic Processes and Applications: OE-CS- AIML -308

***The students will choose any One Open Elective course out of the given elective list in VI Semester.**

B. Tech Computer Science and Engineering (Artificial Intelligence and Machine Learning)
Scheme of Studies/Examination (w.e.f. Session 2023-24)

Semester VII

S. No.	Course No.	Subject	L:T:P	Hours/Week	Credits	Examination Schedule				Duration of Exam (Hrs.)
						Major Test	Minor Test	Practical	Total	
1	PC- CS- AIML- 401A	Data Science with R Programming	3:0:0	3	3	75	25	0	100	3
2	OEC	OEC Elective-II	3:0:0	3	3	75	25	0	100	3
3	PE-I	Elective - I	3:0:0	3	3	75	25	0	100	3
4	PE-II	Elective - II	3:0:0	3	3	75	25	0	100	3
5	PC- CS- AIML- 405LA	Elective – II Lab	0:0:2	2	1	0	40	60	100	3
6	PC- CS- AIML- 407LA	R Programming Lab	0:0:2	2	1	0	40	60	100	3
7	PC- CS- AIML- 409LA	Project	0:0:6	6	3	0	40	60	100	3
8	PC- CS- AIML- 413LA	Industrial Training					100	0	100	
		Total		22	17	300	320	180	800	

Code	PE-I	Code	PE-II
PE- CS- AIML- 415A	Advance Computer Architecture	PE- CS- AIML- 421A	Big Data Analytics for Internet of Things
PE- CS- AIML- 417A	Soft Computing	PE- CS- AIML- 423A	Deep Learning
PE- CS- AIML- 419A	Data Mining & Predictive Modelling	PE- CS- AIML- 424A	Working with Raspberry pi & Arduino platform

OEC Elective-II
Robotics and Intelligent Systems: OE-CS- AIML--401
Probability for Data Science: OE-CS- AIML--403
Cluster Computing: OE-CS- AIML--405
Microprocessor: OE-CS- AIML--407

Note:

*The students will choose any two departmental Electives courses and One Open Elective course out of the given elective list in VII Semester.

**Project should be initiated in the beginning of 7th semester, and should be completed by the end of 8th semester with good Report and power-point Presentation etc.

***4-6 weeks hand on training completed after 6th Semester Exams

B. Tech Computer Science and Engineering (Artificial Intelligence and Machine Learning)
Scheme of Studies/Examination (w.e.f. Session 2023-24)
Semester VIII

S. No.	Course No.	Subject	L:T:P	Hours/Week	Credits	Examination Schedule				Duration of Exam (Hrs.)
						Major Test	Minor Test	Practical	Total	
1	PC- CS- AIML- 402A	Optimization Method in ML	3:0:0	3	3	75	25	0	100	3
2	OEC	OEC Elective-III	3:0:0	3	3	75	25	0	100	3
3	PE-III	Elective – III	3:0:0	3	3	75	25	0	100	3
4	PE-IV	Elective - IV	3:0:0	3	3	75	25	0	100	3
5	PC- CS- AIML- 406LA	Optimization Lab	0:0:2	2	1	0	40	60	100	3
6	PC- CS- AIML- 408LA	Advance AI Application Lab	0:0:2	2	1	0	40	60	100	3
7	PC- CS- AIML- 410LA	Project-II	0:0:8	8	4	0	100	100	200	3
8	HM- CS- AIML- 412A	General Fitness		2		0	0	100	100	
		Total		28	18	300	280	320	900	

Code	PE-III	Code	PE-IV
PE- CS- AIML- 402A	Reinforcement Learning	PE- CS- AIML- 422A	Augmented Reality
PE- CS- AIML- 416A	Social Networks	PE- CS- AIML- 424A	Advance Machine Learning
PE- CS- AIML- 420A	Neural Network and Fuzzy Logic systems	PE- CS- AIML- 426A	Natural Language Processing

OEC Elective-III
Cyber Law and Ethics: OE-CS- AIDS-402
Cryptographic Fundamentals: OE-CS- AIDS-404
Network Operating System: OE-CS- AIDS-406
Reasoning, Problem Solving and Robotics: OE-CS- AIDS-408
Image Processing and Recognition OE-CS- AIDS-410

Note:

***The students will choose any two departmental electives courses and One Open Elective course out of the given elective list in VIII**