

**DIVISION OF SCIENCES (HUMANITIES)**  
**Department: Computer Science**  
**Degree: Bachelor of Science (B.Sc.) – Honours**

**Semester I**

Course Category	Course Code	Course Title	L	T/P	Cr
ABILITY ENHANCEMENT	AECC 111	English Communication Skills	4		4
	AECC 112	Moral Principles	2		2
CORE COURSES	COMS 111	Programming Methodology	4		4
	COMS 112	Practicals in Programming Methodology		2	2
	COMS 113	Computer System Architecture	4		4
	COMS 114	Practicals in Computer System Architecture		2	2
GENERIC ELECTIVE	MATH 111	Numerical Methods	4		4
		<b>TOTAL</b>			<b>22</b>

**Semester II**

Course Category	Course Code	Course Title	L	T/P	Cr
ABILITY ENHANCEMENT	AECC 111	Environmental Studies	4		4
	AECC 112	Health and Wellness	2		2
CORE COURSES	COMS 121	Data Structure	4		4
	COMS 122	Practicals in Data Structure		2	2
	COMS 123	Discrete Structures	5	1	6
GENERIC ELECTIVE	MATH 121	Number Theory	4		4
		<b>TOTAL</b>			<b>22</b>

**Semester III**

Course Category	Course Code	Course Title	L	T/P	Cr
CORE COURSES	COMS 211	Algorithms	4		4
	COMS 212	Practicals in Algorithms		2	2
	COMS 213	Operating Systems	4		4
	COMS 214	Practicals in Operating Systems		2	2
	COMS 215	Computer Networks	4		4
	COMS 216	Practicals in Computer Networks		2	2
SKILL ENHANCEMENT	BOTA 217(A)	Nursery & Gardening	2		2
	BOTA 218(A)	Practicals in Nursery & Gardening		2	2
GENERIC ELECTIVE	MATH 211	Linear Programming & Game Theory	4		4
		<b>TOTAL</b>			<b>26</b>

## Semester IV

Course Category	Course Code	Course Title	L	T/P	Cr
<b>CORE COURSES</b>	COMS 221	Object Oriented Programming	4		4
	COMS 222	Practicals in Object Oriented Programming		2	2
	COMS 223	Software Engineering	4		4
	COMS 224	Practicals in Software Engineering		2	2
	COMS 225	Database Management Systems	4		4
	COMS 226	Practicals in Database Management Systems		2	2
<b>SKILL ENHANCEMENT</b>	COMS 227(A)	Web Programming	2		2
	COMS 228(A)	Practicals in Web Programming		2	2
<b>GENERIC ELECTIVE</b>	MATH 221	Probability & Statistics	4		4
		<b>TOTAL</b>			<b>26</b>

## Semester V

Course Category	Course Code	Course Title	L	T/P	Cr
<b>CORE COURSES</b>	COMS 311	Internet Technologies	4		4
	COMS 312	Practicals in Internet Technologies		2	2
	COMS 313	Artificial Intelligence	5	1	6
		Seminar			
<b>DISCIPLINE ELECTIVE (ANY TWO)</b>	COMS 314(A)	System Security	4		4
	COMS 315(A)	Practicals in System Security		2	2
	COMS 316(A)	Data Analytics	4		4
	COMS 317(A)	Practicals in Data Analytics		2	2
		<b>TOTAL</b>			<b>26</b>

## Semester VI

Course Category	Course Code	Course Title	L	T/P	Cr
<b>CORE COURSES</b>	COMS 321	Machine Learning	4		4
	COMS 322	Practicals in Machine Learning		2	2
	COMS 323	Computer Graphics	4		4
	COMS 324	Practicals in Computer Graphics		2	2
			Project		2
<b>DISCIPLINE ELECTIVE (ANY TWO)</b>	COMS 325(A)	Cloud Computing	4		4
	COMS 326(A)	Practicals in Cloud Computing		2	2
	COMS 327(A)	Data Mining	4		4
	COMS 328(A)	Practicals in Data Mining		2	2
		<b>TOTAL</b>			<b>26</b>