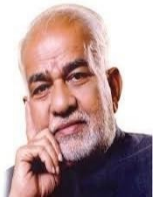
VISHNU
UNIVERSAL LEARNING

B.V.RAJU COLLEGE



(AUTONOMOUS)

BHIMAVARAM

Affiliated to Adikavi Nannaya University, Rajamahendravaram

(Re-accredited with 'B++' Grade by NAAC)

MCA

Department of MCA
Course Structure

DEPARTMENT OF MCA

B.V.RAJU COLLEGE (A), BHIMAVARAM

AP-534202

Branch/Course : Master of Computer Applications

(w.e.f.2024-25)

COURSE STRUCTURE

Semester I (First Year) Curriculum

Code	Course Title	Max Marks		Total Marks	Hours per week		Credits
		External	Internal		Theory	Practical	
PG24511T01	Discrete Mathematical Structures	60	40	100	4	-	4
PG24511T02	Management Accountancy	60	40	100	4	-	4
PG24511T03	C Programming & Data Structures	60	40	100	4	-	4
PG24511T04	Computer Organization	60	40	100	4	-	4
PG24511T05	Operating Systems	60	40	100	4	-	4
PG24511T06	Design & Analysis of Algorithms	60	40	100	4	-	4
PG24511T07	**Bridge Course** Fundamentals of Computers(For General B.Sc/B.A./B.Com Students)	60	40	100	4	-	
PG24511P01	C Programming & Data Structures Lab	50	50	100	-	3	2
PG24511P02	Operating Systems and Computer Organization Lab	50	50	100	-	3	2
PG24511P03	Skill Development Course/MOOCS	50	50	100	-	3	2
PG24511P04	**Bridge Course Lab*** Fundamentals of Computers Lab (For General B.Sc/B.A./B.Com Students)	50	50	100	-	3	
PG241A01	Communication skills in English (Add on certificate course)		50		3		
	Total Credits						30

Note: All the General B.Sc/B.A./B.Com Students must pass the **Bridge Course and Bridge CourseLab** with minimum 50% marks, the credits are not allotted for these courses.

Semester II (First Year)Curriculum

Code	Course Title	Max Marks		Total Marks	Hours per week		Credits
		External	Internal		Theory	Practical	
PG24512T01	Computer Networks	60	40	100	4	-	4
PG24512T02	Object Oriented Programming through JAVA	60	40	100	4	-	4
PG24512T03	Database Management Systems	60	40	100	4	-	4
PG24512T04	Formal Languages and Automata Theory	60	40	100	4	-	4
PG24512T05	Data Mining Concepts and Techniques	60	40	100	4	-	4
PG24512T06	**Elective-I** 1. Artificial Intelligence and Expert Systems **2. Internet of Things** 3. Image Processing	60	40	100	4	-	4
PG24512P01	Object Oriented Programming through JAVA Lab	50	50	100	-	3	2
PG24512P02	Database Management Systems Lab	50	50	100	-	3	2
PG24512P03	Skill Development Course With Python	50	50	100	1	2	2
	Total Credits						30

Note: 2 lab Hrs and 1TheoryHrs/Week or 2 Theory Hrs/Week for Skill Development Course and only Lab Exam will be conducted

Summer Internship (Mandatory) after First Year(to be evaluated during III semester).

Semester III (Second Year) Curriculum

Code	Course Title	Max Marks		Total Marks	Hours Per Week		Credits
		External	Internal		Theory	Practical	
PG24513T01	Information Security and Cryptography	60	40	100	4	-	4
PG24513T02	Big Data Analytics	60	40	100	4	-	4
PG24513T03	Object Oriented Software Engineering	60	40	100	4	-	4
PG24513T04	Web Technologies	60	40	100	4	-	4
PG24513T05	**Elective II** 1. Block chain Technology 2. **Cloud Computing** 3. Machine Learning and Deep Learning	60	40	100	4	-	4
PG24513T06	**Elective-III** 1. Business Intelligence and Visualization 2. Robotics 3. **Foundations of Data Science**	60	40	100	4	-	4
PG24513P01	Web Technologies and Object Oriented Software Engineering Lab	50	50	100	-	3	2
PG24513P02	Big Data Analytics and R Programming Lab	50	50	100	-	3	2
PG243A01	Innovation, Entrepreneurship and Intellectual Property Rights	-	50	50	2	-	0
PG24513P03	Summer Internship	50	50	100	-	-	2
PG243A02	Introduction to Quantum Computing (Skill development course through NPTEL/ 4 weeks)						
	Total Credits						30

Note: Summer Internship 2 Months (Mandatory) after First Year (to be evaluated during III semester).

Semester IV (Second Year) Curriculum

Code	Course Title	Max Marks		Total Marks	Hours Per Week		Credits
		Internal	External		Theory	Practical	
PG24514P01	Project Work	150	200	350	-	-	10
	Total Credits						10