**BHARATHIARUNIVERSITY::COIMBATORE641046**

**B.Sc.Computer Science with DataAnalytics(CBCS PATTERN)**

(*Forthestudentsadmittedfromtheacademicyear****2022-2023****andonwards*)

**Scheme of Examination**

|  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- |
| **Part** | **TitleoftheCourse** | **Hours/Week** | **Examination** | | | | **Credits** |
| **Duration**  **inHours** | **MaximumMarks** | | |
| **CIA** | **CEE** | **Total** |
|  | **SemesterI** | | | | | | |
| I | Language-I | 6 | 3 | 50 | 50 | 100 | 4 |
| II | English-I | 6 | 3 | 50 | 50 | 100 | 4 |
| III | Core1:ProgramminginC | 4 | 3 | 50 | 50 | 100 | 4 |
| III | Core2:Datastructures | 4 | 3 | 50 | 50 | 100 | 4 |
| III | CoreLab1:ProgrammingLab-C | 3 | 3 | 50 | 50 | 100 | 4 |
| III | Allied1:IntroductiontoLinearalgebra | 5 | 3 | 50 | 50 | 100 | 4 |
| IV | EnvironmentalStudies\* | 2 | 3 | - | 50 | 50 | 2 |
|  | **Total** | **30** |  | **300** | **350** | **650** | **26** |
|  | **SemesterII** | | | | | | |
| I | Language–II | 6 | 3 | 50 | 50 | 100 | 4 |
| II | English–II | 4 | 3 | 25 | 25 | 50 | 3 |
| III | Core3:ProgramminginC++ | 5 | 3 | 50 | 50 | 100 | 4 |
| III | CoreLab2:ProgrammingLab-C++ | 4 | 3 | 50 | 50 | 100 | 4 |
| III | CoreLab3:InternetBasicsLab | 2 | 3 | 25 | 25 | 50 | 2 |
| III | Allied2:DiscreteMathematics | 5 | 3 | 50 | 50 | 100 | 3 |
| IV | ValueEducation– HumanRights\* | 2 | 3 | - | 50 | 50 | 2 |
|  | NaanMuthalvan - Skill Course Effective English http://kb.naanmudhalvan.in/images/c/c7/Cambridge\_Course\_Details.pdf | 2 |  | 25 | 25 | 50 | 2 |
|  | **Total** | **30** |  | **275** | **325** | **600** | **24** |
|  | **SemesterIII** | | | | | | |
| I | Language-III | 4 | 3 | 50 | 50 | 100 | 4 |
| II | English-III | 4 | 3 | 50 | 50 | 100 | 4 |
| III | Core4:JAVAProgramming | 4 | 3 | 50 | 50 | 100 | 3 |
| III | Core5:DatabaseManagementSystems | 4 | 3 | 50 | 50 | 100 | 3 |
| III | CoreLab4:JAVAProgrammingLab | 4 | 3 | 25 | 25 | 50 | 2 |
| III | Allied3:DataCommunicationandNetworks | 4 | 3 | 25 | 25 | 50 | 2 |
| III | SkillbasedSubject1: DataVisualization | 4 | 3 | 30 | 45 | 75 | 3 |
| IV | Tamil\*\*/ AdvancedTamil\*(OR)Non-  majorelective-I(YogaforHumanExcellence)\*/ Women’s Rights\* | 2 | 3 | - | 50 | 50 | 2 |
|  | Naan mudhalvan skill course-programming essential for employability | **2** | **3** | **25** | **75** | **100** | **2** |
|  | **Total** | **32** |  | **305** | **520** | **825** | **25** |
|  | **SemesterIV** | | | | | | |
| I | Language-IV | 4 | 3 | 50 | 50 | 100 | 4 |
| II | English-IV | 4 | 3 | 25 | 25 | 50 | 2 |
| III | Core6:PythonProgramming | 4 | 3 | 50 | 50 | 100 | 3 |
| III | Core7:DataWarehousingandDataMining | 4 | 3 | 50 | 50 | 100 | 3 |
| III | CoreLab5:PythonProgramming Lab | 3 | 3 | 25 | 25 | 50 | 2 |
| III | Allied4:DeepLearning | 4 | 3 | 25 | 25 | 50 | 2 |
| III | SkillbasedSubject2Lab:CapstoneProject  WorkPhaseI | 3 | 3 | 25 | 25 | 50 | 2 |
| IV | Tamil\*\*/Advanced Tamil\* (OR) Non-majorelective-II(GeneralAwareness\*) | 2 | 3 | - | 50 | 50 | 2 |
|  | NaanMuthalvan – Skill Course Office Fundamentals - Lab http://kb.naanmudhalvan.in/Bharathiar\_University\_(BU) | **2** |  | **25** | **25** | **50** | **2** |
|  | **Total** | **30** |  | **275** | **325** | **600** | **22** |

|  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- |
|  | **SemesterV** | | | | | | |
| III | Core8:RProgramming | 6 | 3 | 50 | 50 | 100 | 4 |
| III | Core9:Big DataAnalytics | 6 | 3 | 50 | 50 | 100 | 4 |
| III | CoreLab6:RProgrammingLab | 6 | 3 | 25 | 25 | 50 | 4 |
| III | Elective –IBusiness DataAnalytics/  SocialNetworkAnalysis/t/ArtificialNeuralNetworkand FuzzySystems | 6 | 3 | 50 | 50 | 100 | 4 |
| III | SkillbasedSubject 3:CapstoneProject  WorkPhaseII | 6 | 3 | 30 | 45 | 75 | 3 |
|  | Naan mudhalvan skill course-cloud and IT essential for employability | 2 | 3 | 25 | 75 | 100 | 2 |
|  | **Total** | **32** |  | **230** | **295** | **525** | **21** |
|  | **SemesterVI** | | | | | | |
| III | Core10:LinuxandShellProgramming | 6 | 3 | 50 | 50 | 100 | 4 |
| III | Core11:ProjectWorkLab%% | 6 | - | 40 | 60 | 100 | 4 |
| III | CoreLab7:LinuxandShellProgrammingLab | 3 | 3 | 25 | 25 | 50 | 3 |
| III | Elective–II:WebApplicationSecurity/  SoftwareAgents/Embeddedsystems | 5 | 3 | 50 | 50 | 100 | 4 |
| III | ElectiveIIIClientServerComputing/  Open source Software/ Principles ofSecure Coding | 5 | 3 | 50 | 50 | 100 | 4 |
| III | SkillBasedSubject4: MachineLearning | 3 | 3 | 25 | 25 | 50 | 3 |
| V | ExtensionActivities\*\* | - | - | 50 | - | 50 | 2 |
|  | Naan Muthalvan - Skill Course Cyber Security @ http://kb.naanmudhalvan.in/images/7/71/Cybersecurity.pdf (or) Machine Learning # http://kb.naanmudhalvan.in/images/1/19/PBL\_Google.pdf (or) Android APP Development $ http://kb.naanmudhalvan.in/images/0/08/Android\_App\_Dev.pdf | **2** |  | **25** | **25** | **50** | **2** |
|  | **Total** | **30** |  | **315** | **285** | **600** | **26** |
|  | **GrandTotal** |  |  | **1700** | **2000** | **3700** | **144** |

\*NoContinuousInternalAssessment(CIA).OnlyUniversityExaminations.

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