INDUS UNIVERSITY

DEPARTMENT OF COMPUTER SCIENCE

Departmental Vision:

The department of Computer Applications aims to generate groomed, technically competent and skilled intellectual professionals to meet the current challenges of the modern computing industry with greater social impact.

Departmental Mission:

The missions of department are:

M1: To offer high-grade, value-based Graduate and Post-graduate program in the field of Computer Applications.

M2: To provide conducive environment so as to achieve excellence in teaching-learning, research and development activities.

M3: To facilitate students to nurture skills and professional competency to meet the ever-changing needs of society and industry.

M4: To provide students with the tools to become productive, participating global citizens and life-long learners.

PROGRAM SPECIFIC OUTCOMES (PSOs)

PSO1. Ability to demonstrate and implement model tools and technology to meets industry requirement.

PSO2. Able to incorporate extensive computer concept and interdisciplinary knowledge into computer application domain.

Program Ooutcomes (POs)

Computer Application & Information Technology graduates will be able to:

PO1. IT knowledge: Apply the knowledge of mathematics, science, IT fundamentals and specialization to the solution of complex problems.

PO2. Problem analysis: Ability to identify and formulate problems related to information technology and applies knowledge to solve industry problems.

PO3. Design/development of solutions: Ability to design, develop, test and maintain system as per the needs of industry.

PO4. Conduct investigations of complex problems: Ability to apply mathematical models, algorithms in the computer based system.

PO5. Modern tool usage: Create, select, and apply appropriate techniques, resources, and modern IT tools including prediction with an understanding of the limitations.

PO6. The digital youth and society: Apply reasoning informed by the contextual knowledge to assess societal, health, safety, legal and cultural issues and the consequent responsibilities relevant to the professional skill-set.

PO7. Ethics: Recognize and apply the ethical role and responsibility.

PO8. Individual and team work: Function effectively as an individual and as a member or leader in diverse teams, and in multidisciplinary.

PO9. Communication: Communicate effectively on complex activities with the IT community and with society at large, such as, being able to comprehend and write effective reports and design documentation, make effective presentations, and give and receive clear instructions.

PO10. Project management and finance: Demonstrate knowledge and understanding of the IT and management principles and apply these to one's own work, as a member and leader in a team, to manage projects and in multidisciplinary environments.

PO11. Life-long learning: Ability to engage in lifelong learning in the broadest context of technological change.

A.Y 2020-2021
Semester – IX
Subject Name: Big Data and Data Analytics (IMSC0902)

Course Outcomes:

CO1: Work with big data platform and explore the big data analytics techniques business applications. (BT 1)

CO2: Design efficient algorithms for mining the data from large volumes. (BT 2)

CO3: Analyze the HADOOP and Map Reduce technologies associated with big data analytics. (BT 3)

CO4: Explore on Big Data applications Using Pig and Hive. (BT 4)

CO5: Understand the fundamentals of various big data analytics techniques. (BT 5)

CO6: Build a complete business data analytics solution. (BT 6)

COURSE OUTCOME (CO) and PROGRAM OUTCOME (PO) Matrix

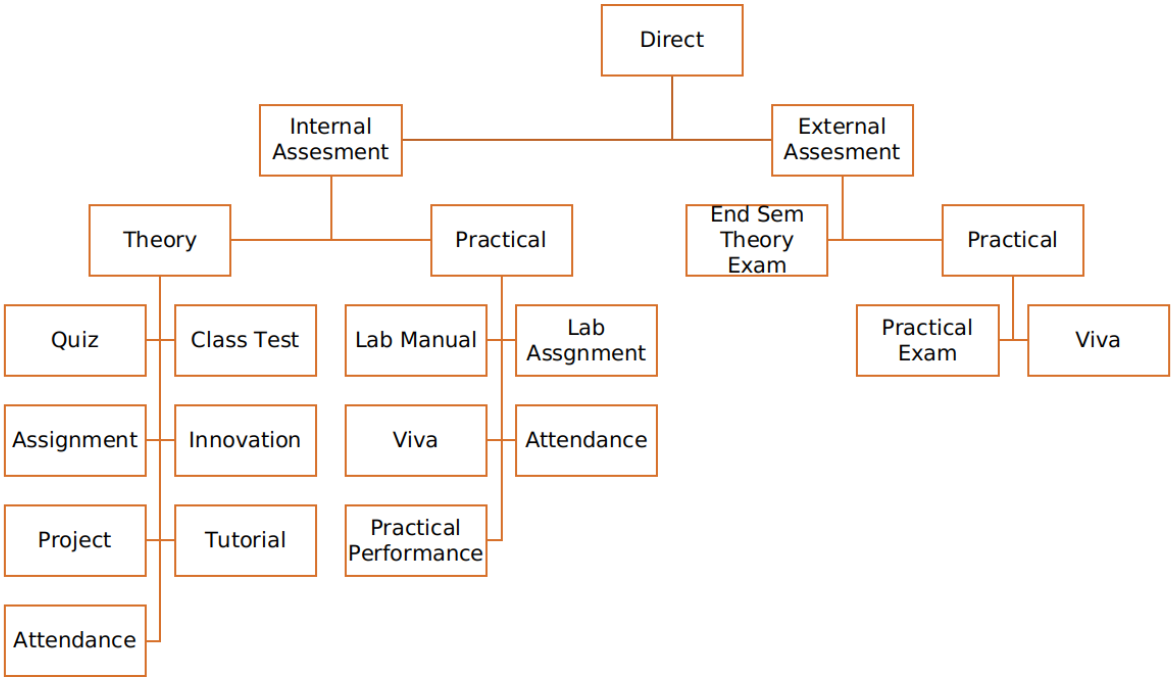
(1- Low, 2- Medium, 3- High)

CO	PO1	PO2	PO3	PO4	PO5	PO6	PO7	PO8	PO9	PO10	PO11
CO1	3	2	-	2	-	-	-	-	-	-	-
CO2	2	-	-	1	-	-	-	-	-	-	-
CO3	2	-	-	3	-	-	-	-	-	-	-
CO4	1	2	2	2	-	-	-	-	-	-	1
CO5	-	3	2	2	2	-	-	-	-	-	2
CO6	2	1	2	2	3	-	-	-	-	-	2
IMSC0902	2	2	2	2	2.5	-	-	0	0	0	1.6

COURSE OUTCOME and PRGORAM SPECIFIC OUTCOME Matrix

CO	PSO1	PSO2
CO1	2	1
CO2	-	2
CO3	-	-

CO4	3	2
CO5	2	2
CO6	3	2
IMSC0902	2.5	1.4



Direct Assessment method – The knowledge and skills learnt by the students are assessed directly from their performance through internal assessment and external assessment processes.

External assessment- Performance of student is recorded in university theory exams, laboratory exams and project evaluation.

Internal assessment- Performance of student is recorded through class assignments and tutorials, internal assessment tests, laboratory assignments, seminars and project progress review and evaluation.

Attainment of Course Outcomes (CO's)

For End Semester Theory Exams 1. Attainment Level 1: If < 45% students scoring ≥60% marks 2. Attainment Level 2: If >45-75% students scoring ≥60% marks 3. Attainment Level 3: If >75-100% students scoring ≥60% marks
For Internal Theory Exams 1. Attainment Level 1: If <45% students scoring ≥75% marks 2. Attainment Level 2: If >45-75% students scoring ≥75% marks 3. Attainment Level 3: If >75-100% students scoring ≥75% marks

Weights of Attainments are assigned as per University Evaluation criteria as below

For A.Y. 2020-21

1. For all courses except courses marked with (*)

INDUS University End Semester Examinations:	Weightage: 40%
Internal Assessment:	Weightage: 60%

2. Courses marked with (*)

INDUS University External Examinations:	Weightage: 0%
Internal Assessment:	Weightage: 100%

Internal Component with COs mapping

Component 1:	Mid Semester Examination (CO1, CO2, CO3, CO4, CO5, CO6) (40 marks)
Component 2:	Presentation (CO1, CO2, CO3, CO4, CO5, CO6) (05 marks)
Component 3:	Assignment (limited to 2) / Case Study (CO1, CO2, CO3, CO4, CO5, CO6) (10 marks)
Component 4:	Attendance (05 marks to all >80% attendance)

Course Attainment

Academic Year 2020-2021

Course Name with Code	**Big Data and Data Analytics – IMSC0902**
Class	**9th Semester, Integrated M.Sc.(CA&IT)**
Faculty Name	**Rajkumar Chalse**

CO Attainment Internal component	1	2	3	4	Internal assessment component total (1 to 4)
CO 1					
CO 2					
CO 3					
CO 4					
CO 5					
CO 6					

Indirect Attainment from the student's feedback for each Cos
1-Low (L), 2-Medium (M), 3-High (H)

Sr. No.	Course Outcome	L	M	H
CO1	Are you able to recognize the structure of Client-Server Architecture?			
CO2	Can you classify the components used for client and server both?			
CO3	Can you relate and illustrate the categories of client server applications?			
CO4	Can you plan client/server application using database middle-ware component?			
CO5	Are you able to change the existing system by implementing the concept of client-server architecture?			
CO6	Are you able to classify various upcoming technologies relate to client server applications?			

Total Student given feedback: 0 out of 43

Sr. No.	Course Outcome	Value

CO1	Are you able to recognize the structure of Client-Server Architecture?	
CO2	Can you classify the components used for client and server both?	
CO3	Can you relate and illustrate the categories of client server applications?	
CO4	Can you plan client/server application using database middle-ware component?	
CO5	Are you able to change the existing system by implementing the concept of client-server architecture?	
CO6	Are you able to classify various upcoming technologies relate to client server applications?	

% CO Attainment	**Internal Exam**	**Internal Exam *0.6**	**End sem Exam**	**End sem Exam* 0.4**	**Direct Attainment (DA)**	**Indirect Attainment (IA)**	**Overall = 0.8*DA + 0.2*IA**
CO 1							
CO 2							
CO 3							
CO 4							
CO 5							
CO 6							
	Overall Course Attainment						
	Set Target for the course						
	Course Attainment Status(Yes/No)						

Best Performing CO:	
Least Performing CO	

Observations:

1	

2	

Plan of Action:

1	
2	

Rajkumar Chalse

Faculty Signature