	School: .... Campus: ....
	Academic Year: .... Subject Name: .... Subject Code: ....
	Semester: .... Program: .... Branch: .... Specialization: ....
	Date: ....

Centurion
UNIVERSITY
Shaping Lives...
Empowering Communities...

Applied and Action Learning
(Learning by Doing and Discovery)

Name of the Experiement : Explore the Chain – Using a Blockchain Explorer

Objective/Aim:

To explore and analyze blockchain transactions, blocks, and addresses using a public blockchain explorer.

Apparatus/Software Used:

- Internet connection
- Blockchain Explorer (e.g., https://etherscan.io for Ethereum, https://www.blockchain.com/explorer for Bitcoin)
- Web browser

Theory/Concept:

A Blockchain Explorer is a web-based tool that allows users to interact with blockchain data. It provides an interface to search and view:

- Transactions (sender, receiver, amount, fees, timestamp)
- Blocks (block height, hash, miner, number of transactions, block reward)
- Addresses (balance, transaction history)
- Smart contract details (in case of Ethereum and similar blockchains)

Explorers make blockchain data transparent and accessible, helping developers, miners, and users verify and trace transactions in real time.

Procedure:

1. Open a blockchain explorer in a web browser (e.g., Etherscan or Blockchain.com).
2. Enter a **block number**, **transaction hash**, or **wallet address** in the search bar.
3. Observe the details displayed:
4. For transactions: hash, sender, receiver, value, gas/fee, confirmation status.
5. For blocks: block height, timestamp, miner, number of transactions, difficulty.
6. For addresses: balance, list of incoming and outgoing transactions.
7. Record the observations from at least one block and one transaction.
8. Compare values such as transaction fees and block confirmation times.

Observation Table:

Query Type	Example Input (Tx Hash / Block No. / Address)	Output Observed (Details)
Transaction	0x1234...abcd (sample Tx Hash)	Sender, Receiver, Amount, Gas Fee, Status
Block	15000000 (sample Block No.)	Block Hash, Miner, Timestamp, Tx Count
Wallet Address	0x5678...efgh (sample Address)	Balance, Total Transactions, Tx History

ASSESSMENT

Rubrics	Full Mark	Marks Obtained	Remarks
Concept	10		
Planning and Execution/ Practical Simulation/ Programming	10		
Result and Interpretation	10		
Record of Applied and Action Learning	10		
Viva	10		
Total	**50**		

Signature of the Student:

Name :

Regn. No.

Signature of the Faculty: