Project Design Phase II Technology Stack (Architecture & Stack)

| Date | 22 June 2025 |
|---------------|--------------------|
| Team ID | LTVIP2025TMID57363 |
| Project Name | LearnHub |
| Maximum Marks | 4 Marks |

Technical Architecture:

The Deliverable shall include the architectural diagram as below and the information as per the table 1 & table 2

Example: Order processing during pandemics for offline mode

Reference: https://www.coursera.org

Table-1 : Components & Technologies:

| S.No | Component | Description | Technology |
|------|---------------------|--|---------------------------------------|
| 1. | User Interface | Web-based interface for Online Learning | HTML, CSS, JavaScript/ React JS, etc. |
| 2. | Application Logic-1 | Creating courses by individual educators | Node.js, Express.js |
| 3. | Application Logic-2 | Enrolling in courses by learners or students | Node.js, Express.js |
| 4. | Database | Stores course content, Users' details | MongoDB |

Table 2: Application Characteristics:

| S.No | Characteristics | Description | Technology |
|------|------------------------|---------------------------------------|-------------------------------|
| 1. | Open-Source Frameworks | Frontend frameworks | React.js, Node.js, Express.js |
| 2. | Scalable Architecture | 3-tier architecture with RESTful APIs | Microservices |

References:

React.js Documentation

Node.js Best Practice

https://medium.com/the-internal-startup/how-to-draw-useful-technical-architecture-diagrams-2d20c9fda90d