

Q. Handwritten drawing on Layered Architecture Model of an Online Judge System in Software Engineering. Below give respective layer:

1. Presentation Layer:

- User interface (e.g. website or mobile app)
- Users submit code here, view results, and check the leaderboard

2. Application Layer:

- Implements business logic
- Manages authentication, contest logic, submission validation, etc.

3. Service Layer:

- Communicates between the application layer and external services.
- Example: Code execution services, plagiarism checking, email notifications.

4. Data Layer:

- Store data
- Example: Code execution services, user information, problems, submissions, contest results.

5. Infrastructure Layer:

- Manages low-high level system operations like server management, job queues, and container orchestration.
- Example: Cloud hosting, Docker, Kubernetes.

Diagram details: The diagram is like a flowchart, with the layers arranged sequentially from top to bottom. Arrows indicate how each layer interacts with the other.

Online Judge System - Layered Architecture

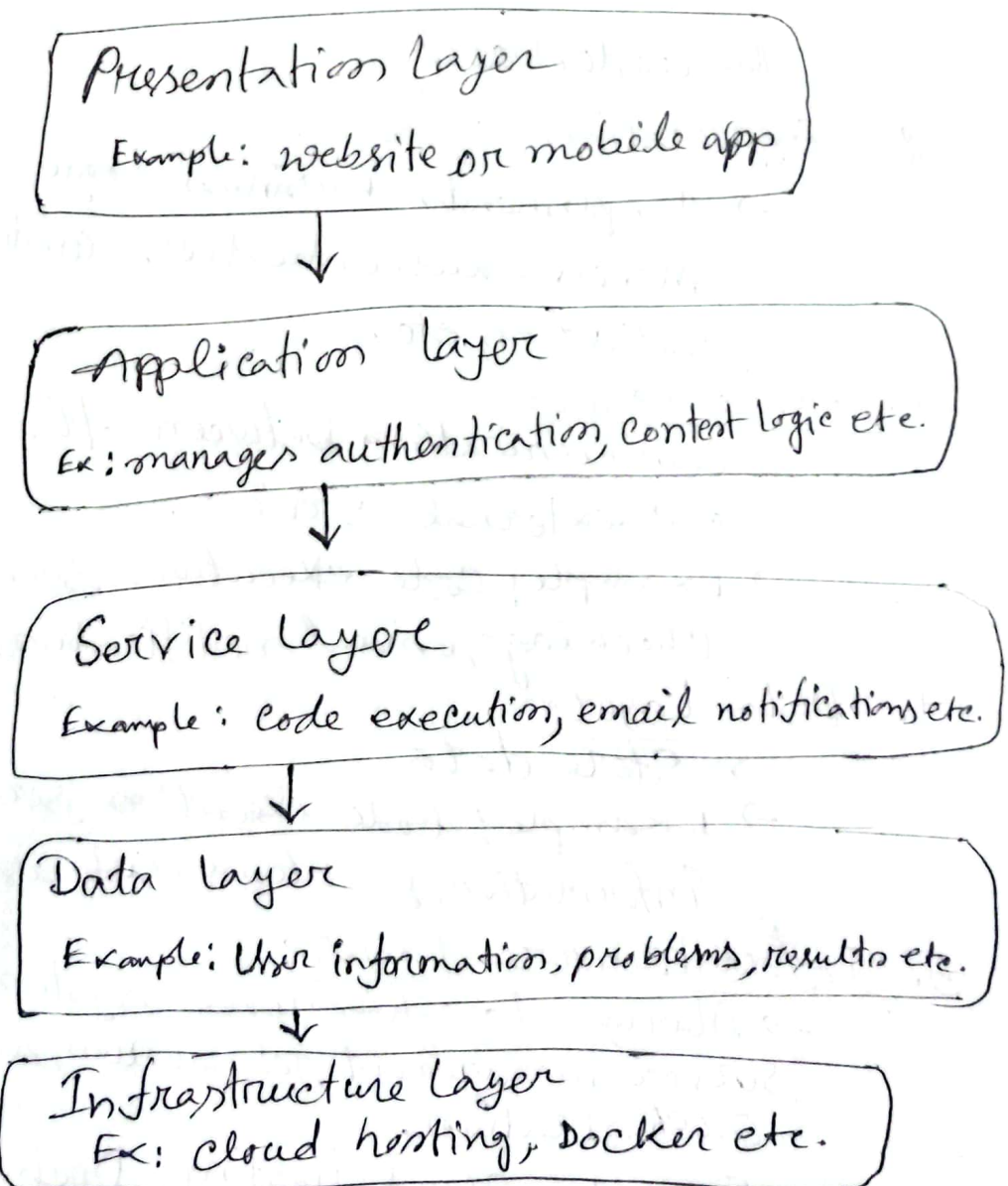


Fig: Layered Architecture of Online Judge System.