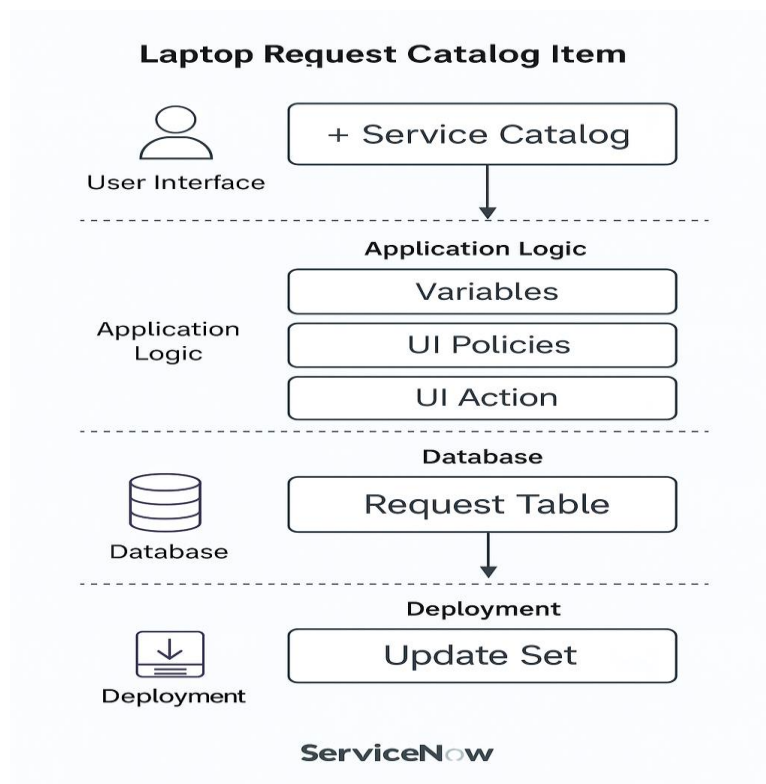


## Project Design Phase-II Technology Stack (Architecture & Stack)

|               |                             |
|---------------|-----------------------------|
| Date          | 27 June 2025                |
| Team ID       | LTVIP2025TMID31198          |
| Project Name  | Laptop Request Catalog Item |
| Maximum Marks | 4 Marks                     |

### Technical Architecture:

The Deliverable shall include the architectural diagram as below and the information as per the table1 & table 2



**Table-1 : Components & Technologies:**

| S.No | Component                       | Description                                               | Technology                           |
|------|---------------------------------|-----------------------------------------------------------|--------------------------------------|
| 1.   | User Interface                  | Web UI for form-based laptop requests                     | ServiceNow Service Catalog UI        |
| 2.   | Application Logic-1             | Dynamic variable behavior via Catalog UI Policies         | ServiceNow Catalog UI Policies       |
| 3.   | Application Logic-2             | Reset form functionality                                  | ServiceNow UI Actions (JavaScript)   |
| 4.   | Application Logic-3             | Form validation and visibility                            | ServiceNow Client Scripts            |
| 5.   | Database                        | Stores request data in catalog request tables             | ServiceNow Tables (sc_req_item etc.) |
| 6.   | Cloud Database                  | Cloud-hosted relational backend                           | ServiceNow internal CMDB/DB          |
| 7.   | File Storage                    | Not applicable                                            | -                                    |
| 8.   | External API-1                  | Not applicable                                            | -                                    |
| 9.   | External API-2                  | Not applicable                                            | -                                    |
| 10.  | Machine Learning Model          | Not applicable                                            | -                                    |
| 11.  | Infrastructure (Server / Cloud) | Cloud platform to host and deploy ServiceNow applications | ServiceNow (Cloud-based)             |

**Table-2: Application Characteristics:**

| S.No | Characteristics          | Description                                                         | Technology               |
|------|--------------------------|---------------------------------------------------------------------|--------------------------|
| 1.   | Open-Source Frameworks   | Not applicable (ServiceNow is proprietary)                          | -                        |
| 2.   | Security Implementations | Role-based access control, ACLs, and scoped apps                    | ServiceNow ACLs, RBAC    |
| 3.   | Scalable Architecture    | JCloud-hosted architecture that supports multi-instance deployments | ServiceNow SaaS Platform |

| S.No | Characteristics | Description                                                      | Technology                    |
|------|-----------------|------------------------------------------------------------------|-------------------------------|
| 4.   | Availability    | High availability ensured by ServiceNow with global data centers | Load-balanced Cloud Instances |
| 5.   | Performance     | Optimized catalog form with minimal client-side scripts          | Lightweight Catalog Scripts   |