# Human Computer Interaction-OBE

## Answer any 2

### 1.Cognitive Models — KLM / GOMS *(5 marks)*

**Scenario:**
A company wants to improve the **speed of data entry** in their billing software. Currently, users take too long to complete a transaction.

**Question:**
Demonstrate how you would apply the **Keystroke-Level Model (KLM)** or **GOMS model** to analyze and improve the workflow. Show a sample task breakdown and discuss what insights the model provides.

### 2.Shneiderman's Eight Golden Rules *(5 marks)*

**Scenario:**
A bank's **mobile app** receives complaints that users find it confusing to transfer funds or view statements.

**Question:**
Evaluate the app using **Shneiderman's Eight Golden Rules**. Identify **three violated rules** and propose corresponding design changes.

### 3.Norman's Seven Principles & Model of Interaction *(5 marks)*

**Scenario:**
A new **smart home control panel** allows users to set lighting, temperature, and security alarms, but many users report that it feels "hard to control."

**Question:**
Using **Norman's Seven Principles** and his **Model of Interaction**, analyze the usability problems and recommend **three specific improvements** to reduce the "gulf of execution" and "gulf of evaluation."

### 4.Nielsen's Heuristics with Example *(5 marks)*

**Scenario:**
You are evaluating a **university portal** where students register for courses and check grades. Users report frustration during registration.

**Question:**
Apply **Nielsen's Ten Usability Heuristics** to identify and explain **at least three usability violations**. Suggest how each could be fixed to enhance the user experience.