**Section A: Good vs Poor Interaction Design**

**What are the key features of good interaction design?**

1. Visibility

* Users must know what somethings action is without confusion.
* Example: On an application buttons labelled Home, Search and Settings make navigation easy.

2. Feedback

* Users will feel confident in the application when their action gives the required outcome.
* Example: When you send a message in WhatsApp, the different ticks show whether your messages is delivered, read or not delivered.

3. Affordance

* The design shows the user how to interact.
* Example: A trash bin icon visually suggests that pressing it will delete whatever you have selected.

**Describe a digital product that you think has poor interaction design. Why is it poor? What would you improve?**

**Product**: A poorly designed vending machine.

**Why its poor**: To many similar buttons – buttons that are the same shape and with text/writing that is grey on black make it hard to read in low light and make it hard to know which button is which.

**How to improve it**:

* Redesign layout to prioritize frequently used buttons with larger size.
* Use colour coding (e.g. red for power) and don’t make text a Gray on a black remote.

**Section B: Interaction Design & HCI**

**What is human-computer interaction (HCI), and how does it relate to interaction design?**

The study of Human-Computer Interaction (HCI) is a multidisciplinary field. As a part of HCI, interaction design deals with creating interactive systems that are made to the requirements, tastes and habits of users. Through effective design, it seeks to maximise human technology communication.

**Which other disciplines contribute to the field interaction design?**

1. Psychology

Helps designers understand user behaviour and their perception of a design.

2. Engineering

Assists in creating reliable and interactive systems.

3. Graphic Design

Enhances the visual appeal and usability through layout and colour.

**Section C: Usability vs User Experience**

**Differentiate between usability and user experience. How are they related?**

**Usability:** Refers to how easy and efficient a product is to use.

**User Experience**: Includes usability but it involves emotional and sensory responses, such as enjoyment, satisfaction and engagement.

**Relation**

A usable product forms the foundation for a good User Experience, but also User Experience also includes aesthetics and emotional satisfaction.

**Think of a product you enjoy using. Does it have a good usability, a good user experience or both? Explain.**

Product: Spotify

It has both usability and user experience. The app is easy to navigate (usability), and the personalized playlists and the yearly Spotify wrapped make it a enjoyable and engaging experience (UX).

**Section D: The Design Process**

**Who are the key stakeholders involved un the design process? List at least four)**

1. **Sponsors** – Define goals and fund the product.

2. **Project team** – Includes developers and designers building the product.

3. **Users** – Their needs and feedback shape the product design.

4. **Subcontractors** – Provide components or services affecting design.

**Importance of involving users in the process. Give one example.**

Involving users guarantees that the product is in line with their practical tasks and aids in identifying false assumptions. For example, designing a font size selector with input from older users avoids the assumption that all prefer large text.

**Section E: Guidance in Interaction Design**

**What forms of guidance help users? List 3 with examples.**

1. Tooltips

Hovering over a button shows a brief explanation of its function.

2. User Manuals

PDF or in-app guides that explain key functions.

3. Feedback Messages

Alerts that guide that the user hasn’t done something correctly for instance when you enter your password wrong “Password is incorrect” pops up.

Why is consistency important in interactive systems?

Interfaces that are consistent are simpler to use and learn. Users wont have to relearn tasks across different parts of the systems if operations follow the same rules, it will lower errors.

**Section F: Evaluation and Core Principles**

**Product:** Microwave oven

1. Visibility

Poor: Many microwaves lack clear labels—users don’t know whether a button means “reheat,” “defrost,” or “start.”

Improvement: Use labelled, backlit buttons and simple icons to clarify each function.

2. Feedback

Poor: Pressing “Start” sometimes gives no response, making users unsure it’s working.

Improvement: Add a beep, light flash, or animation to confirm button press and cooking progress.

3. Affordance

Poor: The dial or buttons aren’t always clear in how they function (e.g., does the knob control time or power?).

Improvement: Shape the dial to suggest rotation for time and label buttons with icons (e.g., snowflake for defrost).

**How would you redesign this product to better align with the goals of interaction design?**

I would redesign the microwave to include:

* A touch interface with clear icons and text (for improved visibility).
* Audio and visual feedback for every user action.
* Logical grouping of functions with consistent layout.
* A simple “quick start” button for everyday use.  
  This would make it more efficient, reduce user frustration, and improve the overall experience, aligning it with the goals of interaction design.