



**ROSMINI COLLEGE**

## **PRACTICE ASSESSMENT**

### **Level 1 Digital Technologies RAS 2024**

#### **92006: Demonstrate understanding of usability in human-computer interfaces**

Credits: Five

Achievement	Achievement with Merit	Achievement with Excellence
Demonstrate understanding of usability in human-computer interfaces.	Examine the usability of human-computer interfaces.	Evaluate the usability of human-computer interfaces.

Enter your National Student Number (NSN) and School Code into the space above.

**Complete ALL report prompts in this document.**

You should aim to write no more than **1200 words** in total.

Your answers should be presented within the expanding text boxes.

Your answers may include only information you produce during this assessment session.

Internet access is not permitted.

By saving your work at the end of the assessment session, you are declaring that this work is your own. NZQA may sample your work to ensure this is the case.

## PART A – SHORT-ANSWER QUESTIONS

- (i) Why should usability principles be considered and applied to human-computer interfaces?

- (ii) In interface design, which usability principle focuses primarily on delivering users clear, informative feedback regarding the system's operations?

- (iii) Give a definition of Nielsen's heuristic **Visibility of System Status**.

- (iv) In the context of web design, describe the difference between **internal** and **external consistency**.

## PART B – MATCHING QUESTIONS

In this question, match the usability principle with its description.

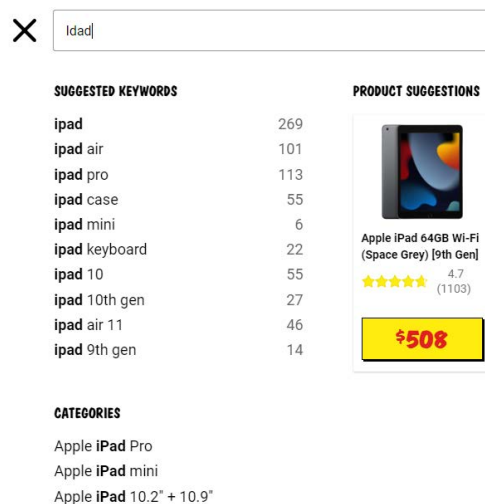
1.	A set of general principles that help evaluate the HCI design.
2.	This principle aims to ensure that users with disabilities can effectively use the HCI.
3.	This heuristic encourages the use of terms and concepts familiar to users, reducing the learning curve.
4.	This heuristic aims to help users avoid mistakes and provides easy ways to recover from errors.

Enter the number corresponding to the description above in the box next to the heuristic below:

Accessibility		Error prevention	
Match between the system and the real world		Nielsen's Usability Heuristics	

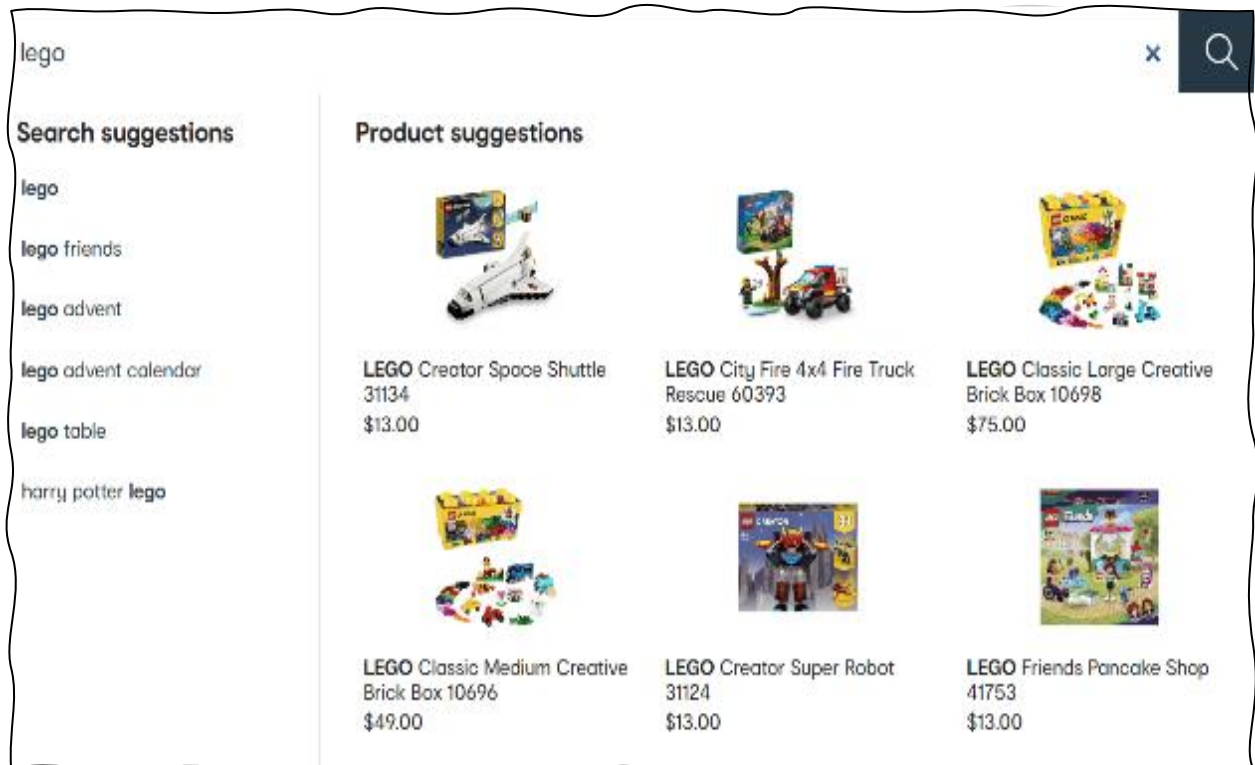
## PART C – REAL-WORLD EXAMPLES

Mr. John want to buy a new I-Pad for his druthers. He uses the JB Hi-Fi to shop.



- (i) What is the interface doing that helps Mr. John find his product even though it's wrong? Which of Nielsen's usability heuristics is shown in the screenshot?

- (ii) Mr. John has decided not to buy the Ipad. As it is his daughters Birthday he will get them some toys. He plan to purchase a Lego set to give them.



Identify the usability principles that Mr. John can see in the screenshot above.

## PART D – SCENARIO QUESTIONS

Choose ONE of the following scenarios and write your answer in the box below:

- (i) Imagine you are designing a mobile banking app specifically for users with visual impairments. How would you apply usability principles to create an interface that ensures accessibility and ease of use for these users? Discuss at least TWO usability principles you would consider, and how you would implement them.

OR

- (ii) Discuss specific ways in which Māori principles, such as using te reo Māori and incorporating tikanga Māori, can be implemented in a mobile app for Māori users to enable them to easily access transport in their local area. How would you apply Māori usability principles to create an interface that caters to their needs? Provide practical examples to illustrate your points.

Scenario chosen: \_\_\_\_\_

## PART E – OWN INTERFACE

In the following questions, discuss an interface you have studied in class e.g Air New Zealand, JB Hi-Fi.

Name of interface: \_\_\_\_\_

- (i) Provide examples of how applying usability principles has improved the overall user experience of the chosen interface.

- (ii) Referring to usability principles, suggest improvements that could be made to the interface you studied to improve usability.