



1. How can a QR code be used in advertising?

You can use QR codes in your product packaging to win your consumers' trust by providing them the genuine ingredients or recipes of the product you offer when they scan the QR code

By simply scanning a QR code with a smartphone, consumers can be directed to a website, get additional information, or access special promotions. This technology gives marketers a quick and easy way to connect with consumers and drive engagement.

You can use the QR code to direct the consumers to your social media platforms such as Facebook, Instagram and give more details

2. Your brother who is a student of grade 9 needs a new laptop for his school work. He is comparing two different laptop specifications. How are you going to help your brother to select a suitable laptop for his needs. Justify your answer.

An embedded system is a microcontroller or microprocessor based system which is designed to perform a specific task.

An embedded system can be an independent system or it can be a part of a large system.

Examples : Wifi printer, Smart TV, Digital camera

3. What is an embedded system and give 3 examples

An embedded system is a microcontroller or microprocessor based system which is designed to perform a specific task.

An embedded system can be an independent system or it can be a part of a large system.

Examples : Wifi printer, Smart TV, Digital camera

4. More advanced smart TVs have features to assist those with disabilities. Describe two features of a smart TV's user interface that assist people with a visual impairment.

The remote controller comes with a brail keyboard. This way that person can feel with his fingers about what button he is pressing and identify what instructions he is giving.

Another feature is that the remote will read out the instruction using a speaker so that the user can clearly understand what instructions are gives.

5. When designing a battery for a portable digital device, what things the designer should consider of the battery?

Since it is a portable device, the battery designer should consider the weight of the battery. And also since it's portable the user should be able to use the device in a longer period without a power connection. So the battery power capacity should be high. Another good idea when designing battery I to be able to charge the battery rapidly. So the users who are on constant travel can charge the batteries soon.

6. Give real life examples for each of these technologies
 - a. RFID - Livestock farmers use RFID to track and manage their herds, monitor animal health, and improve breeding programs.
 - b. NFC - most commonly used for contactless payment with your payment card in super markets and parking bays.
 - c. GPS – GPS is used to track the vehicle fleets and courier services to track the location

- d. Sensor –Digital cameras sensor the light availability and auto on the flash when there is low light
- e. Biometrics – Biometrics are used when entering high critical security tighten places where only a selection of people are allowed to enter. Ex: Intelligent secret service offices use biometrics scanning when entering the premises such as finger print, retina, facial

Edexcel IT Guru