



BIE Homework Sheet – Year 10

Date Issued: Week commencing 10/11/2008

Date Due In: Week commencing 17/11/2008

Watch the video and answer the following questions:

Control-Basic Systems

Q1 What are the two main types of control systems?

Q2 Complete the following sentence by selecting one of the phrases from the list below:

Dedicated control systems...

- a) Carry out a pre-programmed set of instructions.
- b) Use a computer to process the data from sensors.
- c) Do not use sensors.
- d) Require human intervention to control their output devices.

Q3 Draw a block diagram of a typical computer control system with a feedback loop.

Q4

- a) Control systems are often required to drive analogue devices (like electronic motors or electric lights) by varying the current to the output device. What type of interface does the computer need to communicate with these types of device?

Many of the sensors used in control systems are analogue. What type of interface does the computer need to process the data provided by analogue sensors?