

Transcript

Electronic applications

SPEAKER:

To understand electronics you need to know about voltages and currents and the components that make up a circuit, such as resistors and capacitors, or more complex components like operational amplifiers and logic gates. But this doesn't really tell the whole story.

What makes electronics exciting is how it can create systems that make life in the 21st century not only possible but also enlivening.

One of the main examples of this is communications. We can talk to people and send information anywhere in the world or beyond using electronic signals travelling along wires or through space using radio waves.

Interpreting the messages that we get through communication involves processing the signals that we receive. Those signals could be sounds, images or just raw data. In this course you will look at signal processing. You will start with simple circuits made up of well-known components and show how these can be used to filter out the noise in signals.

As with much of electronics, the fundamental ideas have been around for some time and were developed when all electronics were analogue. Nowadays, it's more likely that the electronics will be digital, and so you will end this course by looking at the way that signals can be processed using computers.