

the science of... SPYING

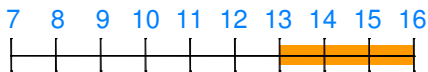
Spy gadgets of the future

Spy tools – Inventing, designing and making

Purpose

To stretch older students' skills in imagination and critical thinking by discussing technology trends and applying their thoughts and findings to their own design concepts.

Age range (years)



Subjects

Design &
Technology,
ICT



Background

Spies use many gadgets to observe suspects, collect data and communicate with other agents. Night vision goggles and miniature cameras are just two examples. Often spy gadgets represent the cutting edge of technology. They also need to be small and easily hidden.

This activity asks students to consider trends in technology and society and conceptualise spying tools for the future.

Steps

You will need:

- Paper & drawing tools
 - Computer Aided Design tools (optional)
 - Design & Technology equipment for making prototypes (optional)
1. Begin with a discussion about some key trends in spying-related technology. A selection of statements is provided on page two to get things started.
 2. Ask students:
 - Can you think of spy gadgets and technologies that are especially cool or scary?
 - Which gadgets might you like for yourself? Why?
 3. Either individually or in small groups, ask students to devise their own spy gadget and create a concept drawing with annotations.

Extensions

If the facilities are available these concept drawings can be the beginning of a project to create a prototype model.

Discussion

How will the increased accessibility and availability of spying technologies shape our lives in the future?

To take this discussion further, download the citizenship debate: 'Spy Implants'.

Spy gadgets of the future

Trends in spying technology

Technology is getting cheaper - putting high-tech spying equipment within reach of nearly everyone.

Biometric technologies such as retina and fingerprints scans are increasingly being used to access buildings, safes, clubs and bank accounts.

Organisations are keeping more and more digital information about individuals. Some people argue that this information can be used to make our lives easier while others worry it is an invasion of our privacy

Will RFID technology make our lives easier?

Surveillance and tracking equipment is getting smaller. It's now possible to hide bugs in clothing and mount cameras and microphones on tiny flying vehicles.

We can now implant digital technology into our bodies.

Growing processing power allows computers to analyse huge amounts of data about us. What might they conclude and would those findings be useful to us or worrying?