

## Our Views on Genetic Testing

### Lesson Plan One

- 1) Start with a group talk on genetic testing. As an introduction you can use a power point presentation on genetic testing and it's implications, which can be downloaded from the Sensation website: (insert Sensation link) (10 minutes)
- 2) Following an introduction into genetic testing, divide the class into groups (consisting of 5 students). If you feel it is appropriate and your pupils agree, you can group them according to genetic characteristics (5 minutes):
  - a. Put their hands together, fingers interlocked. Those who have their left thumb uppermost form one group, those with the right thumb form the other.
  - b. Look at earlobes and divide group further into those who have attached or pendulous earlobes.
  - c. Divide the groups up according to whether they have straight or curly hair.
  - d. Try right handed and left handed
  - e. Eye colour (blue, brown, green.)
  - f. Hair colour (brown, black, natural blonde, auburn,)
- 3) To each group allocate the cards labelled A-E, which can be downloaded from the Sensation website: (insert Sensation link). These cards contain information about different aspects of gene testing.
- 4) Ask all the A's to go and sit at table 1, B's to table 2 etc to form a number of 'expert' groups. In these groups, 'experts' work together on their chosen area, reading the material that they have been given, making notes about the important points, and checking understanding with others in the group. (Allow 15 minutes).
- 5) After this 'expert' analysis of the information, they return to their original group to report back on their area of expertise. The pupils should summarise the main aspects behind genetic testing, using the information and knowledge gained from each expert. (15 minutes)
- 6) Each group should now decide upon a question to focus on (allocated one of the suggested questions below). Ensure they each have a different issue to discuss as the aim is for the whole group to cover a range of issues. (5 minutes)

### **Suggested questions for groups to think about:**

- Should consent be necessary for a genetic test to be done on a person?
- Often a genetic test shows that a person has a genetic condition for which there is no cure. How is the information given by a genetic test helpful to the person?
- Can the information someone gets from a genetic test cause discrimination for or against them?
- Who would you share your genetic information with, and why?
- Should samples of DNA taken during a genetic test be kept, and why?

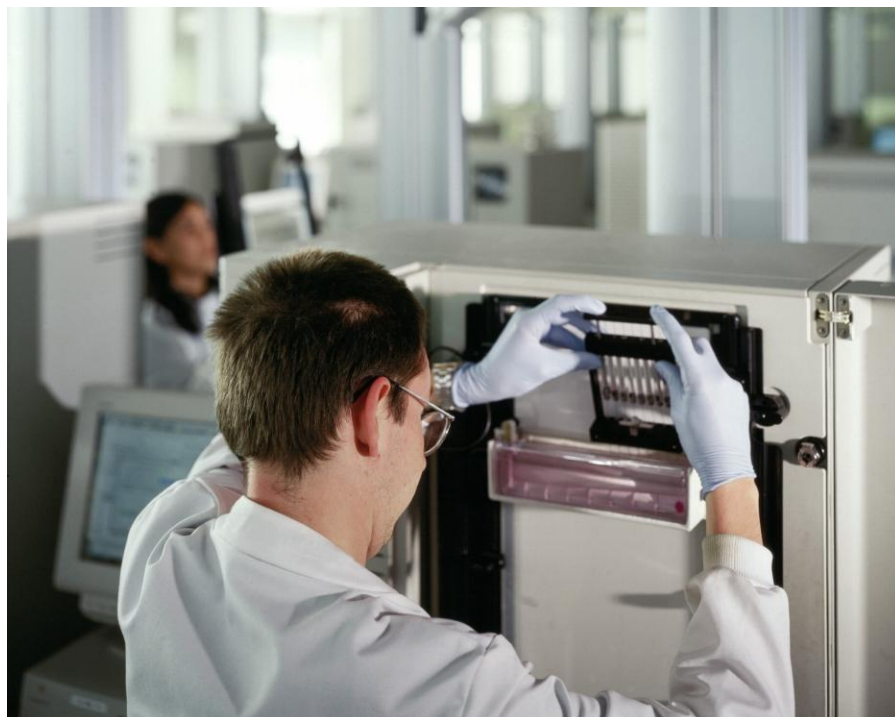
Resource kindly provided by Science Communication Unit, UWE, Bristol.

<http://scu.uwe.ac.uk>

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### Lesson Plan Two

- 1) The pupils should re-form their groups and use the internet or other forms of media to search and collect information to provide an informed answer to the question they chose (15 minutes).
- 2) They should then put a 5 minute presentation together; it can be a visual presentation such as a diagram or picture or just a short talk. Stress that the information should be in their own words and that any quotations should be acknowledged (15 minutes).
- 3) The groups should now show their presentations to the rest of the class. Depending on how much time you have left, you may wish to leave the actual presentations for a third lesson (20 minutes).
- 4) As an incentive each presentation could be assessed by the rest of the class, using agreed criteria discussed beforehand. Marks could be awarded for aspects such as sequencing of material, coverage of material, quality of preparation, delivery and ability to answer questions.



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