



The Big Bang

UK Young Scientists & Engineers Fair

Secondary post-Fair lesson

Lesson 2 of 2

Learning objective

- Students to reflect on their trip to The Big Bang Fair.
- Students can identify routes into a career in STEM.
- Students are aware of the variety of careers in STEM.

Resources

- Use the Tomorrow's Engineers resources you received at The Fair for extra information on careers in STEM. It is also available online at www.tomorrowsengineers.org.uk/careers
- Ask students to refer to their Big Bang Challenge cards which will help them to reflect on the Fair.

Starter

- Ask students if they completed the Big Bang Challenge and whether they talked to any scientists or engineers?

Teaching input and lesson overview

- This lesson consists of two in-class discussions to be completed after attending The Big Bang Fair.
- The discussions can be extended or shortened by the teacher depending on how much time is available. Part of the lesson can either be done in class using the internet or as a take home exercise.
- The discussions can be led by the teacher, or alternatively students can be divided into groups to discuss independently.
- There are many related resources that are aimed at students for future reference available at www.tomorrowsengineers.org.uk/careers
- At the end of the lesson students should understand the reach of science and engineering in the world around us and how there are multiple ways of working in these roles.
- The lesson should end with a summary of what has been discussed and to direct students to the careers resources online.

Plenary

The discussion should make students aware of the variety of roles available in STEM.

Assessment questions

- Do you feel more aware of the different routes towards pursuing a career in science, technology engineering or maths?

Curriculum links

This post-Fair lesson ties in with most of the 8 Gatsby benchmarks, specifically 'linking curriculum learning to careers' and 'encounters with employers and employees'. Whilst at The Fair, students will also have the opportunity for personal careers guidance and encounters with further and higher education.



Lesson in detail

1. A discussion to reflect on The Big Bang Fair and the student's experience:

As a class try to list as many jobs as possible that students weren't aware of before The Fair.

Once a list is compiled begin a discussion on the routes towards pursuing some of these suggested careers and job roles.

These routes can include examples such as apprenticeships, university degrees, vocational courses etc.

You could also discuss useful subjects, such as maths, physics, computing and D&T (for engineering); biology, chemistry, construction & the built environment, electronics, art and languages.

2. Internet research of careers and job roles:

Use the internet to research a career or job role you heard of at The Fair (perhaps choose one you didn't know before). It could be one that you learnt of through completing the Big Bang Challenge.

Ask students to research the following:

- Describe the job.
- Can you find any examples online of people who do that job?
(Perhaps direct them to: www.tomorrowsengineers.org.uk/realengineers, www.rsb.org.uk/make-a-difference, www.rsc.org/careers/future/, www.physics.org/careers, www.mathscareers.org.uk)
- How did they get into this field?
- Is there an interesting fact about what the work involves?
- Does this job overlap with any other sectors? (e.g. government policy, sports, health, fashion or entertainment)
- What are some routes towards pursuing this career? Is there more than one way to get into it?