Inspiring Young People in STEM: Planning activities

Example activities: feedback from educators

For each activity, identify how effective it would be to inspire and engage young people in STEM subjects or STEM careers.

Shopping centre - Chemistry science busking

Research staff and students worked with volunteers from their industry partners to deliver a series of ‘kitchen science’ demos to show the application of science to real life and as a means to introduce potential career options within chemistry and chemical engineering.

- Would these events be inspirational? – Yes.
- Are these events engaging? - Yes, they’re visual, interactive, fast, flashy.
- How could they be made more engaging? – Props or equipment from the research, ways to visualise or engage with potential careers, i.e. laptops or screens showing people/places in action.
- Are the delivery mechanisms effective or would other styles be more suitable? – Very effective for this type of audience.

Classroom visit - Clyde in the classroom

A hands-on project which uses the life history of a native Scottish species, the brown trout, to promote awareness of river ecology to upper primary school students.

- Would these events be inspirational? – Yes.
- Are these events engaging? – During the visit, live animals are brought into the classroom and a tank set up for children to rear fish over the terms. Includes very visually interesting info on local wildlife.
- How could they be made more engaging? – This is the initial step of a longer programme which involves a fieldtrip, where reared young fish are released into the wild.
• Are the delivery mechanisms effective or would other styles be more suitable? – As an intro session it is entirely appropriate. Hopefully leaners will pick up on the opportunity to do a site visit.

Skype call to researchers in LIGO (Laser Interferometer Gravitational-Wave Observatory)

A LIGO researcher in Louisiana, USA is interviewed over Skype by a physics class about their work on gravitational waves detection

• Would these events be inspirational? - Yes.

• Are these events engaging? - Being able to live question a researcher working on ground breaking research.

• How could they be made more engaging? – Involve other speakers, get shown around the facilities/ lab/ other appropriate space.

• Are the delivery mechanisms effective or would other styles be more suitable? - Teacher/volunteer could compliment it with related activity in the classroom that students participate in.