ASE Northern Conference 2017 programme

Session 1 (9.45 – 10.45)

Potatoes to plastic - Jane Winter & Andy Maneffa (STEM Ambassador)

This highly engaging and manageable activity focuses on the 'materials' strand of KS2 science. You will have the opportunity to extract starch from a potato and turn it into bio-plastic. Meet a science ambassador who has worked on the pilot project in York schools.

Removing English Language Barriers in Science for EAL Learners - Kamil Trzebiatowski

This workshop will focus on the language used in science teaching materials and will consider which aspects might present challenges to EAL learners.

SMART PICKINGS: developing child led enquiry - Lynne Bianchi

Smart Pickings – a new children's book to stimulate child led enquiry. This workshop explores the book and its uses in the classroom.

Positive psychology for teachers - Ann MacAskill

This workshop will support teachers to use positive psychology to move from seeing work as stressful to understanding the opportunities it presents through the promotion of wellbeing. We will be examining current understandings of wellbeing and particularly teacher wellbeing.

Using isaacphysics.org in your teaching (KS4) - Heather Peck

Isaac Physics is a free online tool aimed to improve the problem-solving skills of Physics GCSE and A-level students. It can also save you time marking! Take a look at the new Isaac Physics GCSE resources and discover how to use them online for free with your students.

Rethinking how we represent energy 1. A primer - Charles Tracy

Outcomes: familiarity with using stores, start and end points in energy discussions.
In this session, we will discuss why it is opportune to rethink the way we represent energy in our teaching - particularly at key stage 3 - and look at some helpful ideas. This session is a good place to start if you have not used stores or start and end points in your teaching.

Session 2 (11.15 – 12.15)

Keynote - Perspectives on Inclusion: Conceptualisations, Experiences and Imagining Otherwise

Professor Nick Hodge, Professor of Inclusive Practice, Dr Jill Pluquailec and Stephen Connolly, of the Autism Centre, part of Sheffield Institute of Education at Sheffield Hallam University.

In this interactive session, we will present three different perspectives on the inclusion of pupils with SEND. These will act as a stimulus for panel and audience discussion. In his presentation Nick will evaluate what a rights based education might look like for pupils with SEND and what it might reveal about how they are currently conceptualised as learners in our schools. Jill will interrogate the ways in which disabled children become pathologised and psychologised in education to facilitate a conversation of how we might imagine otherwise of in/exclusion. Stephen's presentation will be a sharing of his experience as an autistic learner in educational settings to identify the inclusive and exclusionary practices that he encountered. The Autism Centre's blog can be found here: https://theautismcentre.wordpress.com/author/autismcentre/

Session 3 (13.15 – 14.15)

Enriching Science for Pupil Premium Children - Kathryn Horan

This session looks at simple ways of improving the experience of science at primary school for pupil premium children of all abilities, with a view to raising achievement and aspirations.

Creating a more inclusive culture in science teaching and learning - Zaitoon Bukhari

Break down the barriers and create an inclusive culture for all students, from all background and all languages within science.

Strategies for Teachers to Support Students' Mental Health - Michelle Sault

Managing SEND in the science classroom - Marion Frankland

This session will look at curriculum design to support students with SEND, and will include a range of strategies to help them to engage with science, including adaptations to equipment and the environment.

Genomics is the new Genetics – NHS

Genomic medicine - tailoring healthcare based on an individual's unique genetic code - is now transforming the way people are cared for by the NHS. Using a 'Genomics Game' and an amazing lego creation, find out how the transformational 100, 000 genomes project offers the potential to improve diagnosis and treatment choices for patients with rare diseases and cancer.

Rethinking how we represent energy 2: developing the ideas - Charles Tracy

Outcomes: familiarity with pathways; awareness of pitfalls in discussions that involve heating. We will consider processes that involve heating and think of the most important features of any changes in approach relating to the way that you talk about energy with students. This session is a good place to start if you have used the ideas of start and end points and would like to develop the approach.

Session 4 (14.45 – 15.45)

Science for All - Andy Bullough

Exploring academic theories related to autism and reapplying their findings to better informed teaching, learning and professional practice in the science classroom.

Raising attainment, maintaining curiosity and ensuring inclusion in science - Naveed Khan

Mainly aimed at KS3 & 4. A case study on two deprived schools but with very different intakes. Ideas and strategies shared to raise attainment, maintain curiosity and ensure that science is accessible and inclusive for all.

PSQM - so what? - Bryony Turford

What is the impact of PSQM after the award?

Identify strategies to support learning, engagement and "retention' of SEN students - Rob Butler

Rob will take you on a whistle-stop tour of the most common specific learning difficulties and strategies that you can take back to use in your own classroom. This workshop will concentrate primarily on KS3 & 4.

Developing links with Higher Education: an outline of available support and new opportunities - Mike Garnock-Jones (Higher Education Progression Partnership) and colleagues

This discussion-based workshop aims to give you a greater understanding of the new and well established initiatives within widening participation. We also want to understand your needs within schools, to break down potential barriers and raise aspirations and engagement in STEM activity, and to build improved links between schools and HE during 17/18 and beyond.

Rethinking how we represent energy 3: addressing concerns - Charles Tracy

Outcomes: improved confidence with using stores and pathways in discussions.
In this session we will look at some examples of using stores, pathways, start and end points to represent energy ideas to students and discuss any specific concerns or challenges with this - and other - approaches. This will follow on from previous sessions and is also a good place to start if you have thought about using, or tried using, stores and pathways in your discussions.