

Chemistry in ACTION

NOV
14
2022

Chemistry in Action

For A level and IB students

Join us for an amazing day of chemistry, taking students from their studies to cutting-edge research and future applications in great style! Five sessions from leading chemists in academia and industry will inspire the scientists of the future. Science comedian Steve Cross will chair the event and former secondary school chemistry teacher Peter Hoare will deliver a special session on examination success that will ensure students are equipped with the tools to excel. There will be plenty of interactivity throughout the day, with polls, quizzes and (of course) your chance to question the scientists – join us at Chemistry in Action this autumn!

- Terra Rara - The Unknown Elemental Sea
- New materials for green energy - batteries included
- How chiral materials will change the world!
- Chemistry in conflict
- The Quantum Rainbow



Emmanuel Centre, London,
London,
SW1P 3DW



Venue: £22 +VAT *

Plus one COMPLIMENTARY staff ticket per 10 students.

*VAT may be reclaimable. Please check with your finance department

Education in Action is the leading provider of inspirational, informative, Education in Action study days for A-level, IB, BTEC and GCSE students.

Award-winning, world-class speakers

Cutting-edge content

Thought-provoking demos and presentations

Examination hints, tips and guidance

Modestly priced to offer access to all

Complimentary staff ticket for every 10 students booked

Bookings can be amended up to 28 days before the event day

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Terra Rara - The Unknown Elemental Sea / Andrea Sella - Chemist and broadcaster, University College London



Rare earth elements - the 14 or so elements with romantic names such as neodymium, gadolinium and dysprosium - have been very much in the news over the past ten years. Their niche uses in electronics and in the renewable energy industry make them indispensable to today's society. Yet most people know nothing about them or why they have become so controversial.

Andrea is a synthetic chemist and broadcaster who is interested in the structure and bonding in the rare earths. He has been involved in numerous radio and television projects.



New materials for green energy - batteries included / Saiful Islam - University of Oxford



Development of new materials is crucial to advance low carbon energy applications. Saiful will highlight (with 3D specs) the use of atomic-scale modelling and structural techniques to understand new crystalline materials for lithium batteries and solar cells.

Saiful is Professor of Materials Science at the University of Oxford. His research deals with modelling insights into battery and solar cell materials. He presented the 2016 Royal Institution Christmas Lectures for BBC TV.



How chiral materials will change the world! / Jess Wade - Materials Scientist, Imperial College London



Nature has been nailing nanostructures for billions of years. Whether it is peacock feathers or butterfly wings, science can only aspire to manipulate matter so elegantly at the subatomic scale. Jess reveals that the most miraculous molecular structures of all exist as a pair of non-superimposable mirror images; where the left and right-handed forms can have remarkably different properties.

Jess is a materials scientist at Imperial College London where she studies chiral carbon-based semiconductors. She is a science communicator committed to improving diversity in science, both online and offline.



Chemistry in conflict / Kit Chapman - Author and chemist

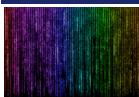


Why did Chile go to war over bird poo? Can you build an aircraft carrier out of ice? And why would a fighter jet fly into a mushroom cloud? Discover some of the weirdest ways chemistry has changed the course of military history.

Kit Chapman is an award-winning science journalist who currently writes for Chemistry World. His book on element discovery, Superheavy was published in 2019.



The Quantum Rainbow / Jamie Gallagher - Science Presenter



Since the earliest days of chemistry, colour and appearance have been used to understand the nature of materials. Now in the 21st century we can understand and control chemical colour as never before. From the quantum confinement effects of nanomaterials to the conjugated double bonds systems of organic molecules, colour chemistry is complex and beautiful.

Jamie is an award winning science communicator with a PhD in chemistry and electrical engineering. He has appeared on TV, radio, and stages around the world and was recognised as one of the 100 leading practicing scientists in the UK by the Science Council.



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