

ORGANISERS



UKSPA
BUILDING · TECHNOLOGY · BUSINESS

PLATINUM SPONSORS

essensys



WILLMOTT DIXON
SINCE 1852

PREMIER
romero



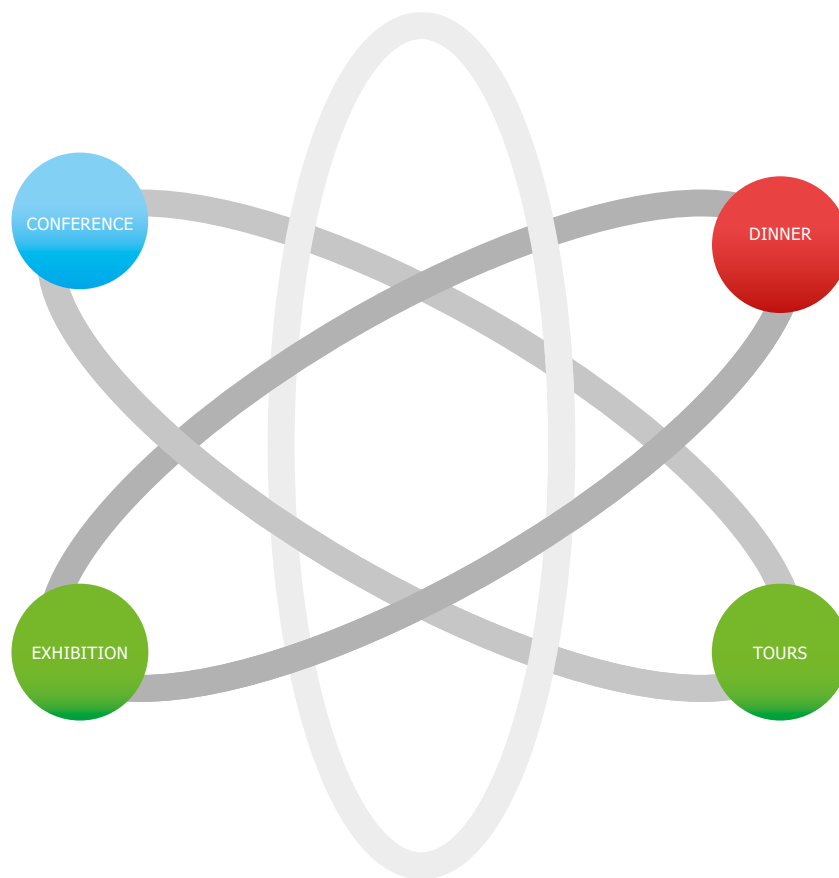
UNIVERSITY OF BIRMINGHAM

ENTERPRISE

SCIENCE, INNOVATION AND COLLABORATION:

FUTURE PLACES, PEOPLE, SUPPORT AND TECHNOLOGIES

UNIVERSITY OF BIRMINGHAM, APRIL 2-3 2019



- Jointly organised by S-Lab and the UK Science Park Association (UKSPA).
- Content relevant to the design, financing, knowledge transfer, managing, operation and strategies of learning, research, incubation and innovation facilities (see more overleaf).
- 100+ presentations, case-studies and tours with many by shortlisted applicants for S-Lab and UKSPA Awards
- Over 40 exhibition stands, and at least 300 delegates (the last such event had over 400).
- Low cost tickets for UKSPA, and S-Lab university and research institute network, members.

Booking and more details via www.ukspa.org.uk or www.effectivelab.org.uk

GREAT CONTENT AND NETWORKING

- The last joint S-Lab/UKSPA Conference - in May 2017 at York Racecourse - attracted over 500 key stakeholders in the design, financing, managing and operation of science research, incubation and innovation facilities.
- Feedback was very positive, with 75% of attendees rating the event as excellent or very good due to the quality and range of content, and the 'buzz' and unexpected interactions of diverse audiences coming together.



CONFERENCE KEYNOTES AND 100 PARALLEL SESSIONS (SEE END PAGES) WILL COVER:

- Design and fit-out of new and refurbished innovation, research and teaching facilities to maximise performance, efficiency and sustainability, and foster cross-disciplinary and academia/industry communication, collaboration and interaction in university, science park and commercial/public sector research environments.
- Efficient and effective operation of laboratories and related innovation/research spaces to support creativity, flexibility, productivity, resource efficiency, skills and workflows.
- Innovation, knowledge and learning futures and their implications: trends in automotive, digital, life science and other technologies; Brexit impacts; industry partnerships; facilities and locations; science and research workplaces; skills.
- Good practice in setting up, managing and developing incubators and science parks.
- 40-50 case studies, including ones with tours of facilities such as Biohub, Birmingham Research Park, the new Collaborative Teaching Laboratory (CTL) and other buildings at the University of Birmingham.
- Leadership and management careers and skills in innovation and research settings.
- A stream on innovative facilities for multi-disciplinary STEM teaching and learning, with cases from Birmingham, Loughborough and abroad, and a panel discussion.

AN EXHIBITION WITH AROUND 40 STANDS WILL:

- Provide opportunities to build and strengthen relationships between customers and suppliers.
- Highlight innovative developments in design, facilities, operation and knowledge transfer.

BAG SPONSOR



LANYARD SPONSOR



UNIVERSITY OF
BIRMINGHAM

ENTERPRISE

ADDITIONAL ACTIVITIES INCLUDE:

- A dinner and reception allowing relaxed networking with 240+ attendees.
- A pre-Conference Experience day at MIRA, the centre for automotive innovation, on April 1.

EVENT GOLD SPONSORS

AECOM

ARUP

**AVISON
YOUNG**

BDP.

bruntwood
SciTech

**BURO HAPPOLD
ENGINEERING**

criticalairflow

**SURREY
RESEARCH PARK**
A University of Surrey Enterprise

ThermoFisher
SCIENTIFIC

WHO SHOULD ATTEND?

Designers, operations directors, technical support staff, estates and facilities staff, equipment and service suppliers, and others concerned with the design, management, and operation of laboratory, incubation and innovation space to:

Hear about current best practice from around the world for science-based research and innovation space, and how this can maximise creativity and performance, and minimise cost.

Gain insights into making innovation space more adaptable and productive through IT infrastructure, flexible furniture and services, modular lay outs and other means.

Learn about innovations in the equipment and consumables used by laboratories, science park tenants and others.

Better understand how science facilities can become more sustainable by improving energy efficiency and reducing environmental impact.

Receive updates on the latest developments re certification, regulations and standards.

Learn about new approaches, and materials to support, jobs and careers within science environments.

Science park managers, developers and investors, incubation professionals, and others providing locations and assistance for innovation to:

Better understand how science-based workplaces are changing and the implications for design and management.

Discover the latest research on innovation and science park trends.

Learn from the latest insights and models for growing successful start-ups.

Network with colleagues and discuss strategic issues including investment, cluster development and business support to high growth companies.

Professionals supporting academic/business knowledge exchange and research collaboration to:

Consider how individuals and knowledge from different disciplines and sectors can be brought together more effectively to drive innovation.

Discuss how to identify and measure innovation value in pharmaceutical and other sectors.

Consider future developments in funding for innovation.

Researchers, technical staff, suppliers and others involved in the design and operation of translational research facilities to:

Learn about innovative developments from case studies and other presentation sessions.

Those concerned about the impact of Brexit on research and innovation to:

Reflect on the impact of Brexit just days after the scheduled departure date and consider the actions and policies that have emerged in the specialised areas addressed by the Conference.

Learn how the design, management and operation of innovation space can be improved to deliver even greater value for money in a more financially challenging post-Brexit environment.

All of the above communities in order to:

Hear about the many case studies of new and refurbished science park, research laboratory, incubator and other innovation-focused facilities that will be presented.

Benefit from the serendipitous encounters and learning that can occur in an event that enables interaction between different groups who seldom come together.

Meet CPD requirements through an accredited event.

S-LAB AND UKSPA SUPPORTERS



ABOUT THE CONFERENCE PARTNERS

S-Lab is a not-for-profit initiative that works with university, research institute and other laboratory sectors and stakeholders to support good practice in laboratory design, operation and management. It particularly focuses on improvement in operational efficiency and effectiveness, and good laboratory design guidelines. It does so through experience sharing events, the S-Lab Awards scheme and projects and publications. See www.effectivelab.org.uk.



The United Kingdom Science Park Association supports the work of its Members to plan, develop and sustain vital environments for around 4,000 innovative, high tech, knowledge based businesses that are located on their sites. These innovative companies choose to base their R&D and other activities in places that provide the right kind of facilities and services that support their growth. See www.ukspa.org.uk.

CONFERENCE CONTENT INCLUDES:



The Collaborative Teaching Laboratory

The CTL is a £40 million, BREEAM Excellent, facility which incorporates a wet lab, dry lab and e-lab and has brought together teaching of a range of STEM courses. It has created more effective use of staff time and resources and practical teaching space, and enabled innovations in teaching delivery and the reinvention of practical classes. Presentations on, and tours of, the CTL will form part of a stream on innovations in science teaching facilities in the UK, and internationally.

Birmingham Research Park and the Biohub

Biohub Birmingham is a fully serviced biomedical research laboratory which supports the set-up and growth of life science companies by access to expert help, and affordable laboratory facilities and equipment. It is situated on Birmingham Research Park on the University of Birmingham Campus and is at the heart of the Edgbaston Medical Quarter, a vibrant and collaborative health science community.



Science and Innovation Futures

Many presentations and discussions will consider possible changes in the activities, funding and management of science and innovation facilities, both generally and with regard to the many disciplines and sectors that will be present at the event. One concern will be the impact of Brexit: a topic that will be addressed by a number of speakers including Sarah Main, Executive Director of the Campaign for Science and Engineering.

2ND APRIL SESSIONS SUMMARY - 1

COLLABORATION, INNOVATION, INCUBATION & SCIENCE PARKS

| | A. Cases and Keynote Follow-Ons | B. Cases and Keynote Follow-Ons | C. Innovation Clusters & Connections | D. Innovation: City, Town & Country | E. Innovation Places |
|----------------------|---|---|--|--|--|
| 11.50 - 12.30 | A1 Science and Innovation at the University of Birmingham: Keynote Follow-on <i>Dr. James Wilkie, University of Birmingham</i> | B1 The Future of Science and Engineering: Keynote Follow-on <i>Sarah Main, Campaign for Science and Engineering</i> | C1 The Connected Science Park <i>Speaker TBC</i> | D1 Innovation and the City: Liverpool Case study <i>Colin Sinclair, CKQ Liverpool & KQ Development Company</i> | E1 Collaboration and Place <i>Jonathan Burroughs Creative Places</i> |
| 13.40 - 14.20 | A2 Institute of Translational Medicine, University of Birmingham <i>Speaker tbc</i> | B2 Offices Become Imperial College's Molecular Sciences Research Hub for Discovery and Industry Collaboration <i>Speaker Name</i> | C2 Clusters as Relationships: Getting the Most Out of the Network <i>Professor Mat Hughes, Loughborough University</i> | D2 Combined Session with E2: Science and Innovation in the City - The Impact of Innovation Districts on the National Innovation Ecosystem <i>David Hardman (MD, Innovation Birmingham) and Phil Kemp (CCO Bruntwood)</i> | E2 Combined Session with D2: Science and Innovation in the City - The Impact of Innovation Districts on the National Innovation Ecosystem <i>David Hardman (MD Innovation Birmingham) and Phil Kemp (CCO, Bruntwood)</i> |
| 14.30 - 15.10 | A3 Coventry University's Alison Gingell Building: Learning Through Exploration and Simulation <i>Speaker Name</i> | B3 The University of Liverpool's Materials Innovation Factory Creates Flexible and Shared Space for Academic-Industry Collaboration <i>Speaker Name</i> | C3 Building a University Innovation Cluster <i>Ian McFadzen, Plymouth Science Park</i> | D3 Science and Innovation in the City - The Impact of Innovation Districts on the National Innovation Ecosystem <i>Panellists: As D2 plus Tom Renn (MD, MSP) Chris Doherty (MD, Alderley Park)</i> | E3 Combined Session with D3: Science and Innovation in the City - The Impact of Innovation Districts on the National Innovation Ecosystem <i>Panellists: As E3 plus Tom Renn (MD, MSP) Chris Doherty (MD, Alderley Park)</i> |
| 15.50 - 16.20 | A4 The University of Copenhagen's Maersk Tower: Creating Scientific Communities and Public Green Space and Views <i>Teva Hess, CF Moller</i> | B4 The University of Oxford's Beecroft Building Deepens Physics Research <i>Rebecca Fode and Oliver Milton, Hawkins Brown</i> | C4 Ownership, Governance and Management of Science and Technology Parks <i>David Rowe, Warwick Enterprise</i> | D4 Innovation in Remote Places <i>Simon Coward, Hethel Innovation and Pryderi Ap Rhishart, Menai Science Park (M-SParc)</i> | E4 Effective Design for Research and Innovation Collaboration <i>Andy Parker, BuroHappold</i> |
| 16.30 - 17.10 | A5 Mid-Century Masterpiece: The Salk Institute <i>Oliver Milton, HawkinsBrown, and Andy Parker, BuroHappold (in collaboration with the Designers for Science Group)</i> | B5 Study Tour – Bio-Hub, Birmingham Research Park <i>Speaker TBC</i> | C5 The Science Park Brand <i>Mervyn Watley, Catalyst Inc</i> | D5 UK Creative Regions: Changing City Profiles 2019 <i>Andrew Marston, CBRE</i> | E5 Walking Tour of Birmingham Campus Health and Life Science Facilities <i>Tour Leader TBC</i> |

2ND APRIL SESSIONS SUMMARY - 2

SCIENCE FACILITIES DESIGN & OPERATION

| | F. Sectors: Taking Stock - Future Growth | G. STEM Building Cases | H. Estates, Services and Technical | J. Lab Ops, Services & Sustainability | K. Lab Ops & Sustainability |
|----------------------|---|---|--|--|---|
| 11.50 - 12.30 | F1 Tackling the Scale-up Challenge <i>Dr Uday Phadke</i> | G1 Designing for Collaboration and Sharing in Research and Analysis: Down Under Experience With Case Studies of the Australian Federal Police Forensic Facility and Example tbc <i>Mark Roehrs, Hassell</i> | H1 HSL Turns a 15-storey Central London Office Tower Into One of the World's Largest Pathology Laboratories <i>Speaker Name</i> | J1 Procuring Autoclaves: Lessons from Imperial College <i>Allison Hunter, Imperial College</i> | K1 A Systematic Laboratory Improvement Programme Creates Energy, Financial and Science Benefits at the University of California, Irvine <i>Matt Gudof, UC Irvine</i> |
| 13.40 - 14.20 | F2 Taking Stock: Life Science Perspectives <i>Martino Picardo, Discovery Park</i> | G2 S-Lab Award Shortlisted Application from Outside the UK See section V for possible options | H2 Safe Storage of Hazardous Substances and Flammable Liquids in Laboratories <i>Les Day, Asecos</i> | J2 Continuous Commissioning of Laboratories and Smart Ventilation at the University of California, Irvine <i>Matt Gudof, UC Irvine</i> | K2 Autoclaves Gone Green – How to Minimise Energy, Space and Heat Output <i>John Jerger, Triple Red / Avidity Science</i> |
| 14.30 - 15.10 | F3 Capturing Potential Lessons from the UK and Competitors on Growing Life-Science Markets <i>David Lupson, CAM-SCI Knowledge Economy Development Ltd</i> | G3 A Capital Projects Soft Landing Strategy, with Continuous and Seasonal Commissioning, at the University of Oxford: Laboratory Experience <i>Richard Jones, University of Oxford</i> | H3 Laboratory Equipment Connectivity and Remote Monitoring in the Cloud: Smart Freezers are Here <i>Kim Hughes, Thermo Fisher Scientific</i> | J3 Measured Containment Control: the Future for Laboratory Containment Devices - Now Available <i>Roy Allwood, Labway Services, and Richard Brown, Halton UK</i> | K3 Sustainable Labs in the University of Birmingham - Overview <i>Dan Smith, University of Birmingham</i> |
| 15.50 - 16.20 | F4 Taking Stock: The Industrial Strategy <i>Joe Manning, BEIS</i> | G4 S-Lab Award Shortlisted Application from Outside the UK <i>See section V for possible options</i> | H4 Dangerous Substances in Laboratories: Saving Money and Reducing Risk Through More Effective Specification <i>Roy Smith, DSC</i> | J4 Enabling Low-Noise and High Air Quality Environments for User Well-Being and Productivity, and Staff and Tenant Recruitment and Retention <i>David Hamlyn and Aimée Smith, RWDI</i> | K4 Sustainable Labs in the London School of Hygiene and Tropical Medicine Save Cash and Carbon <i>Deborah Coles, London School of Hygiene and Tropical Medicine</i> |
| 16.30 - 17.10 | F5 Addressing Innovation in its Local Industrial Strategy <i>Dr Pam Waddell, Innovation Alliance for the West Midlands</i> | G5 Designing and Building Low Vibration Laboratories <i>Panel discussion with inputs re the Beecroft Building, the new Cambridge Cavendish Lab and UCL's Sainsbury Wellcome Building</i> | H5 Ventilation <i>Mike Dockery, Sui Generis</i> | J5 The (Easy) Art of Networking in Science Environments <i>Suhel Miah, HEATED Programme Manager, National STEM Learning Network</i> | K5 A Unique Course Highlights Lab Sustainability Issues to Postgrads at the University of Strathclyde <i>Dr Rabbab Oun and Alaine Martin, University of Strathclyde</i> |

3RD APRIL SESSIONS SUMMARY - 1

COLLABORATION, INNOVATION, INCUBATION & SCIENCE PARKS

| | L. Cases & Keynote Follow-Ons | M. Cases & Keynote Follow-Ons | N. Innovation Clusters | O. Growing Technology Companies | P. Innovation Places |
|----------------------|--|---|---|--|--|
| 11.20 - 12.00 | L1 Keynote Follow-on <i>David Parfrey, Norwich Research Park</i> | M1 Innovation in Science Teaching and Learning: The University of Birmingham's New Collaborative Teaching Laboratory <i>Prof Jonathan Seville</i> | N1 Silverstone Technology Cluster (STC) and the UK's High-Tech Supercluster <i>Roz Bird, Silverstone Park</i> | O1 Growing Tech Businesses: Belfast and Sci-Tech Daresbury Case Studies <i>Sonya Kerr, Catalyst and John Leake, Sci-Tech Daresbury</i> | P1 Innovation Places: Shared Spaces <i>Daniel McDonald-Junor, Nottingham Trent University and Nigel Babb, University of Wolverhampton Science Park</i> |
| 12.10 - 12.50 | L2 How Adaptable Design Can Provide Enhanced Facilities for Modern Laboratories and Innovation Spaces <i>Ivan Carter, Romero UK/Premier Laboratory Systems</i> | M2 The Digital Laboratory: Experience at The University of Birmingham's New Collaborative Teaching Laboratory (CTL) <i>Joseph Berry and Edwin Kye, University of Birmingham</i> | N2 Innovation, Clusters, Culture and Cities <i>Christine Doel (SQW)</i> | O2 Tenant Collaboration and Investment – Session Two <i>Speaker TBC</i> | P2 Quadrum Institute <i>Speaker Name</i> |
| 14.00 - 14.40 | L3 The Future of Labs: Key Trends that will Impact the Design, Operation and Experience of Research Facilities <i>Jennifer Dimambro, Arup</i> | M3 Loughborough University's STEMLab Trains Scientists and Engineers in Tomorrow's Disciplines <i>Rachel Thomson, Loughborough University</i> | N3 Born of Rebellion – the NETPark Story <i>Catherine Johns, Business Durham</i> | O3 Innovation and Start-ups <i>Toni Harrison, Oxford Innovation and Chris Lipp, University of West England</i> | P3 Science Parks and Innovation : What About Town and Country? <i>Dr Malcolm Parry, Surrey Research Park and Richard Walters, Porton Science Park</i> |
| 14.50 - 15.30 | L4 The Future of Labs Now: Case Studies that Embody Key Trends <i>Speaker tbc</i> | M4 Multi-Disciplinary Science Teaching and Research Buildings in Australasia <i>Ken Collins, Lab-works Architecture</i> | N4 UKSPA Panel Session - Innovation Clusters <i>Speakers TBC</i> | O4 Incubation and Scale Ups <i>Simon Bond, SETSquared</i> | P4 Innovation Places <i>Avison Young/GVA</i> |
| 16.05 - 16.45 | L5 The Future of Labs - Panel Discussion <i>Speakers from session L3, L4 and other sessions</i> | M5 Designing and Operating Multi-Disciplinary Science Teaching and Research Buildings <i>Panel discussion reflecting on the day's session, and other experience</i> | N5 Knowledge Economy Ecosystem Analysis <i>Peter Baird, Perkins + Will</i> | O5 Session Name <i>Speaker Name</i> | P5 Walking Tour of Birmingham Campus Health and Life Science Facilities <i>Speaker Name</i> |

3RD APRIL SESSIONS SUMMARY - 2

SCIENCE FACILITIES DESIGN & OPERATION

| | Q. Taking Stock: Case Studies & Opportunities | R. STEM Building Cases | S. Lab Ops, Services & Sustainability | T. Lab Technical Management & Careers | U. Equipment Sharing & Core Facilities |
|---------------|---|---|--|---|---|
| 11.20 - 12.00 | Q1 UKSPA Awards: Case Study Session <i>Speaker TBC</i> | R1 The Chemical Engineering and Biotechnology Building at the University of Cambridge: Designing for Multi-Disciplinary Collaboration <i>Keith Papa, BDP</i> | S1 LEAF – A New Tool to Drive Sustainable Labs and Systemic Change <i>Martin Farley, UCL and King's College London, and Cristina Azevedo, UCL</i> | T1 Session tbc <i>Speaker tbc</i> | U1 Widening Access to Laboratory Equipment: Challenges and Solutions in Making it Available to Other Departments and External Users <i>Johannes Solzbach, Clustermarket</i> |
| 12.10 - 12.50 | Q2 Taking Stock – Science and Innovation <i>Speaker TBC</i> | R2 Nottingham Trent University's Interdisciplinary Science and Technology Centre Encourages Multi-Disciplinary and Student/Research Collaboration <i>Speaker Name</i> | S2 A Synergistic Design Approach to Safely Reduce Lab Energy Use by Up To 75% with No Extra Cost <i>Gordon Sharp, Aircuity</i> | T2 Implementing The Science Council's Technician Commitment at the University of Nottingham <i>Speaker Name</i> | U2 Shared Equipment session tbc <i>Speaker tbc</i> |
| 14.00 - 14.40 | Q3 Taking Stock – Science and Innovation <i>Speaker TBC</i> | R3 Designing for Adaptability Pays Off in Cardiff University's Conversion of Write-Up Space to Dementia Labs <i>Speaker Name</i> | S3 S-Lab Award Shortlisted Application from Outside the UK <i>See section V for possible options</i> | T3 Making the University of Birmingham's New Collaborative Teaching Laboratory Work: Technical Support <i>Mala Patel, University of Birmingham and colleagues</i> | U3 Sharing Equipment at the University of Birmingham - I <i>Andrew Lees, University of Birmingham</i> |
| 14.50 - 15.30 | Q4 Delivering Flexible and Sustainable Science Space: The Thames Valley Science Park Gateway Building <i>Iain Potter, AECOM and David Gillham, Thames Valley Science Park</i> | R4 S-Lab Award Shortlisted Application from Outside the UK <i>See section V for possible options</i> | S4 Sustainable Labs in the University of Birmingham - Case Studies of Collaborative Teaching Laboratory and Medical School <i>Dan Smith, University of Birmingham and colleagues</i> | T4 Technical Careers and Management at the University of Birmingham: The Technical Academy <i>Speaker Name</i> | U4 Sharing Equipment at the University of Birmingham - 2 <i>Dr. Andrea Mitchell, University of Birmingham</i> |
| 16.05 - 16.45 | Q5 Session Name <i>Speaker Name</i> | R5 Birmingham City University Uses Multi-Purpose Spaces to Maximise Collaboration and Space Utilisation <i>Speaker Name</i> | S5 S-Lab Award Shortlisted Application from Outside the UK <i>See section V for possible options</i> | T5 Technical Careers and CPD: Follow-on Discussion Session <i>Speaker Name</i> | U5 Making Core Facilities and Shared Equipment Successful: Discussion Session on Birmingham and Other Experiences <i>Panel discussion</i> |