

# SUSTAINABLE REFURBISHMENT: BALANCING DESIGN SOLUTIONS WITH BUILDING PHYSICS

## AN INTRODUCTION TO OUR SPEAKERS

**Benjamin Lesser**, an Architect by background, Benjamin moved into development in 2004, after completing his MBA. Having delivered large-scale projects such as Chiswick Park whilst at Stanhope, he moved to Derwent London in 2010. Since joining Derwent, Benjamin has been responsible for delivering a number of major office schemes such as the Buckley Building, Stephen Street, 40 Chancery Lane and the forward-thinking White Collar Factory. Benjamin has been a Board Member of the BCO since 2011, endeavouring to challenge some of the industry norms through innovation and collaborative thinking.



**Jeremy Melvin**, consultant Curator & Curator, studied architecture and history of architecture at The Bartlett, UCL. Career combines academic architectural history (eg FRS Yorke and the Evolution of English Modernism, 2003) and now visiting professor at The Bartlett; curating (consultant curator for architecture at the RA, 2000-2014, responsible inter alia for the RA Forum and curator of Richard Rogers: Inside Out [2013] and curator of the World Architecture Festival since 2008); and journalism, currently as contributing editor to the Architectural Review and contributor to the Sunday Times.



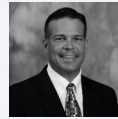
**Chris Twinn**, a leading sustainability consultant, has a background in building services and architectural engineering which widened into planning and policy; as a director of Arup he led their London Building Engineering Sustainability Group. Winner of numerous design awards and in constant demand as a presenter and columnist, Chris is a member of CABE Design Review Panel, the Historic England Urban Panel, served on the BRE Global Sustainability Board, the RIBA Sustainable Futures committee and the UKGBC Zero Carbon Task Group.



**Jude Kelly** is artistic director of the Southbank Centre, overseeing the Royal Festival Hall, the Hayward Gallery, The Queen Elizabeth Hall, the Saison Poetry Library, and the Arts Council Collection. She has represented Britain within UNESCO, served on the Arts Advisory Committee for the Royal Society of Arts and the Cultural Olympiad Board which responsible for delivering the creative, cultural and educational aspects of London's Olympic and Paralympic Games. Joint chair of the Curricula Advisory Committee on Arts and Creativity, Jude is currently chair of Metal and of the trustees for World Book Night, a member of the London Cultural Consortium, a member of the Dishaa Advisory Group. She is a visiting Professor at Kingston University, Leeds University, and Shanghai Performing Arts School, and holds several honorary degrees from national and international universities.



**Daniel Lemieux**, is Principal and Director in the International Operations group for Wiss, Janney, Elstner Associates (WJE). Since 1996, Dan has completed hundreds of projects involving building enclosure failure investigation, repair design, and rehabilitation. As manager of our Washington, DC office, Dan supported our post-earthquake assessment of the Washington Monument and Washington National Cathedral. He is a graduate of the Georgia Institute of Technology, licensed architect in the United States and co-manager of our practice in the United Arab Emirates.



**Justin Boone** is an Architect, Associate Principal, and Unit Manager in the Houston office of Wiss, Janney, Elstner Associates. He has broad-based experience in enclosure design, field-based evaluation, testing, and building simulation. His expertise includes the design and analysis of high performance building enclosure systems, building enclosure commissioning, and forensic analysis of existing buildings with enclosure-related deficiencies. Justin also serves as the Vice-Chairman of the U.S. Building Enclosure Council National Executive Committee.



**Elain Harwood**, a senior architectural investigator with Historic England, formerly part of English Heritage. Between 1996 and 2004 she was primarily responsible for the latter's post-war research and listing programme, which led to the books Space, Hope and Brutalism, and England's Post-War Listed Buildings (both 2015). She completed a PhD on London's South Bank Centre in 2010 and is currently working on new towns, Ernő Goldfinger and post-modernism.



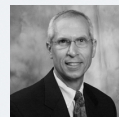
**Emily Gee**, FSA IHBC, was appointed as Historic England's London Planning Director in October 2016. She has worked at Historic England since 2001 and served as Head of Listing Advice from 2011 to 2016. Emily also leads HE's Twentieth Century Network. She has an undergraduate degree from Smith College, a MA in Architectural History from the University of Virginia and a diploma in Building Conservation from the Architectural Association. She has published on Victorian and Edwardian housing for working women and on listing, including post-war buildings and issues of diversity.



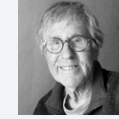
**Geoff Rich**, Managing Partner for the Bath and Manchester offices of Fielden Clegg Bradley Studios, trained as an architect at Newcastle University, and was a Lethaby scholar of the Society for the Protection of Ancient Buildings, and a Winston Churchill Fellow. His project work has ranged from major developments within World Heritage Cities to detailed proposals for repair, adaptation and re-use. Geoff is a Built Environment Expert for Design Council Caba, a member of the South West Design Review Panel, and chair of the Fabric Advisory Committee for Exeter Cathedral.



**Michael Scheffler**, PE, is a principal with Wiss, Janney, Elstner Associates; and for more than 35 years he has been involved in thousands of investigations of deterioration and distress in buildings and other structures. Many of these investigations have involved notable, modern and historic, masonry and stone-clad buildings. He also has extensive experience performing laboratory and in-situ testing primarily related to evaluating material properties, performance, durability, and structural performance of dimension stone. He has authored numerous articles and papers on evaluating and testing related to exterior façade performance. He is a member of ASTM technical committees C18 (Dimension Stone), C24 (Building Seals and Sealants), and E06 (Building Performance).



**Dr Nick Baker** studied physics, but has spent the majority of his professional life working in building physics as a teacher, researcher and consultant. His particular interests lie in energy modelling, thermal comfort and daylighting, on which topics he has published widely. His recent work has focused on the refurbishment of the existing building stock, and on the impact of human behaviour on energy consumption in buildings.



**Paul Finch** is deputy chair of the Design Council and editorial director of the Architectural Review and Architects' Journal, as well as programme director of the World Architecture Festival and joint editor of Planning in London. Deputy chair of CABE from 1999-2005, and chair from 2009-2011, he also chaired the CABE Olympic Design Review panel from 2006-2012. An honorary FRIBA since 1994, he has an honorary doctorate from the University of Westminster, an honorary fellowship from University College London, and is also an honorary fellow of the Royal Incorporation of Architects in Scotland, an honorary member of the Royal Society of Architects in Wales, and an honorary member of the British Council for Offices. In 2002 he was awarded an OBE for services to architecture.



**Patrick Finch**, joined the University of Bristol as Bursar/ Director of Estates in October 2008. He is a Chartered Surveyor with over thirty years of experience of property development, management and strategic planning of operational estates. He was educated at Queen Elizabeth's Hospital School in Bristol, at the College of Estate Management at Reading University, and at Henley Management College, where he completed an MBA in 1999.



**Peter Clegg**, a founding partner of Feilden Clegg Bradley Studios, helped pioneer environmental design and has more than 30 years' experience in low-energy architecture, including involvement in The New Environmental Office, the Building Research Establishment, and the European Research Institute University of Birmingham. He is Professor of Architecture at The University of Bath, and in 2012-3 was the Sir Arthur Marshall visiting Professor of Sustainable Urban Design at the University of Cambridge. He is currently chair of the South West Design Review Panel, the RIBA awards group, and a trustee of the Yorkshire Sculpture Park. In 2010 he was made a Royal Designer for Industry, and remains actively involved in research and design as well as education.



**Robin Nicholson** has been a partner of Cullinan Studio/ Edward Cullinan Architects since 1980, and is Convenor of the Edge, a campaigning built-environment think tank that stresses the need for multi-disciplinary solutions. He is Chairman of the Cambridgeshire Quality Forum, a Design Council CABE Design Review Chair, an Honorary Professor at University of Nottingham, a member of NHBC Foundation's Expert Panel, and a member of the editorial panel of Building Research and Information. Robin sat on the RIBA Council from 1991 until 1997, and chaired the DCSF Zero Carbon Task Force from 2008 until 2010. He has also been a CABE Commissioner, a member of NHBC Board, and chair of the Construction Industry Council.



**Sherry Bates**, Chair of the Association for Studies in the Conservation of Historic Buildings (ASCHB), is an architect and academic whose work embraces new buildings and conservation, particularly of old churches. He is a past president of the Ecclesiastical Architects and Surveyors Association, a visiting professor at the School of the Art Institute of Chicago, and has taught in most of the London schools of architecture. Before becoming an architect, he took a degree in Physics at Oxford University.



**Tobit Curteis**, an alumnus of the Courtauld Institute's Conservation of Wall Paintings course, has spent more than twenty years developing innovative environmental surveying and monitoring techniques, and is the building-performance consultant for many of the most important historic buildings in Britain. Fellow of the Society of Antiquaries and the International Institute for Conservation, Tobit is an advisor to the National Trust, and undertakes research for Historic England (he was a co-editor of the *Building Environment* volume of their *Practical Building Conservation* series).



**Tamsin Tweddell** is a senior partner at Max Fordham, and leads the Practice's work on building performance. Closely involved in the development of Soft Landings for several years, she is currently leading the Soft Landings initiative for a number of clients including the London School of Economics and Heriot Watt University. Tamsin has worked with University College London to investigate the energy performance gap in schools. In 2016 she received the construction industry's 'Woman of the Year' award.



**Dr Robyn Pender** is a physicist working in Historic England's Building Conservation and Research Team, advising principally on building performance. A physicist, she studied wall-painting conservation at the Courtauld Institute; her PhD research looked at how environmental conditions influence moisture movement in stone. After studying climate-change impacts for UCL's Bartlett Graduate School, Robyn joined English Heritage/Historic England to work on their "Practical Building Conservation" books, and is principle editor of three: Metals, Glass & Glazing, and Building Environment.



With special thanks to **Deborah Slaton** for assisting with the organisation of the symposium. Deborah is a principal with Wiss, Janney, Elstner Associates. She holds an M. Arch. in architectural engineering and a Master of Arts in writing, and is a Fellow of the Association for Preservation Technology International, a Director of the Historic Preservation Education Foundation, and a member of the Society of Architectural Historians Heritage Conservation Committee. She is author of numerous publications and co-editor of the proceedings of several international conferences on modernist resources.

