Title: When pedagogy collides with physical reality: the (re)design
                     of teaching rooms to enable teaching excellence

Presenter: Gunter Saunders, Federica Oradini, Peter Hartley
                     University of Westminster, Edge Hill University

Session Learning Outcomes

By the end of this session, delegates will be able to:

- Identify aspects of teaching room design which have particular implications for the enhancement of teaching excellence and learning gain.
- Analyse the suitability of particular teaching rooms for different pedagogical approaches and formats.
- Compare different approaches to teaching rooms design in terms of their adaptability and effectiveness.
- Apply findings and principles from the work at Westminster and other related developments to their own teaching and institutional context.

Session Outline

Key issues to be addressed are:

- Relationships between different pedagogies and teaching room design, and implications of these relationships for teaching excellence.
- Relationships between different components of teaching spaces – interactions between pedagogy, room layout, and technology.
- Impact of changes in room design on teaching practices and student learning.

Much of the literature about teaching excellence and the concerns about learning gain (e.g. Arum et al, 2016) seem to assume that lecturers can readily employ the most effective pedagogy if they wish. There is little or no mention of physical constraints on teaching innovation. The growing literature on the impact of physical space on learning and teaching (e.g. Brooks, 2012; Scott-Webber et al., 2013; Harrison and Hutton, 2014) tends to examine broad institution initiatives such as transitions from 'traditional library' to 'flexible learning centre'. Within these developments, the status of the 'standard teaching room', accommodating seminar/workshop activities for groups of 20-40 students, is often neglected, apart from updating the data projection. This workshop is based on initiatives at the

University of Westminster, aiming to provide adaptable teaching rooms which support teaching excellence by enabling effective pedagogies.

Work at Westminster to date has included:
- Surveys of staff and student opinions on existing and redesigned spaces.
- Experimentation with different aspects of room design.
- Development of different room types to support innovation in teaching excellence.
- Incorporating new features in room design and technological support, such as 'mirroring'.

We have also monitored initiatives elsewhere, including: new-build developments such as Northampton; teaching room designs which specifically match new pedagogies such as Team-Based Learning (e.g. Bradford and Anglia Ruskin) or Scale-Up (e.g. Nottingham Trent); and other detailed room changes (e.g. plectrum tables). Most recently, the work has focussed on detailed examination of what lectures actually do in both 'traditional' and redesigned teaching rooms.

Session Activities and Approximate Timings

- 0-15 minutes
  Presentation on the teaching rooms initiative at University of Westminster and comparison with other UK and international activities to: highlight the interactions between pedagogy, room layout, and technology; identify common effects of these interactions on teaching excellence; and indicate the impact of different change approaches to date.
- 15-30 minutes
  Small group activity and discussion to compare different examples of teaching room redesign to accommodate different pedagogies.
- 30-45 minutes
  Plenary to identify general principles and discuss their application.

References

Arum, R., Roksa, J., & Cook, A. (2016) *Improving Quality in American Higher Education: Learning outcomes and assessment for the 21st Century*. San Francisco: Jossey-Bass.
Brooks, D.C. (2012) "Space and consequences: The impact of different formal learning spaces on instructor and student behaviour." *Journal of Learning Spaces*, Vol, 1, (2) http://www.partnershipsjournal.org/index.php/jls/article/viewArticle/285 (accessed 14/11/16)
Harrison, A. & Hutton, L. (2014) *Design for the Changing Educational Landscape: Space, place and the future of learning.* London: Routledge.
Scott-Webber, L., Strickland, A., & Kapitula, L. (2013). "Built environments impact behaviors: results of an active learning post-occupancy evaluation." *Planning for Higher Education*, Vol, 41(5) https://www.k12blueprint.com/sites/default/files/Built-Environments.pdf (accessed 14/11/16)