

**The University of Warwick
School of Engineering
ANDREW LITTLE LECTURE SERIES**



Innovation and the Role of the Universities

Professor Ben Mayo FEng, FIChemE

RAEng Visiting Professor at University of Warwick

Thursday, 2nd December 2010 at 16:00

Room S.021, Social Studies Building

Abstract

Given the inexorable rise in global population and the expectation of improved standard of living, we are presented with pressing technical challenges simply to meet the need for clean water, adequate food and reasonably priced energy. Add in the threat of climate change and the demands on engineering, and the opportunities for engineers, look more interesting than they have for many decades.

From a national perspective we are in a good position to contribute some of the solutions, but we also have to help secure the health our own economy. The migration of traditional businesses to countries offering a lower cost base requires their replacement with new, high value, products and services.

This explains the constant reference to the need for more 'creativity', 'innovation' and 'entrepreneurship' in UK business over the last 20 years and also the encouragement (and expectation) of a greater contribution from the universities.

Despite worldwide recognition for the excellence of UK research, we have found it frustratingly difficult to convert this into profitable enterprise. Dr Hermann Hauser's proposals to establish a national string of 'Technology and Innovation Centres' (TIC's), based on successful practice in Germany and elsewhere, have been designed to help and there are good grounds for believing they will do so. But there have been many other initiatives with similar objectives in recent times that have achieved limited results, and it is useful to remember that impressive innovations are sometimes achieved in spite of, rather than because of, 'the system'. After all, the role of government is not the only determinant of success.

The opportunities are unmistakable, but exploiting them will take foresight and good leadership. This lecture will consider the implications for academic engineering in the UK, and discuss some of the practical steps that can be taken.

Ben Mayo:

Ben is a Royal Academy Visiting Professor of Innovation at the School of Engineering. He is a management consultant with a particular interest in the effective exploitation of new energy technologies. He was formerly Research and Technology Director of ICI Films, and has extensive experience in large scale engineering and operations in the chemicals and related sectors. He conceived and developed the proposals for what is now the Centre for Process Innovation based on the former ICI Research Station at Wilton in the N.E. of England. He is a member of the N.E. Energy Leadership Council, involved particularly in current plans for Carbon Capture and Storage. He was also a member of the EU team that developed a Strategy and Implementation plans for Hydrogen and Fuel Cells. In 2003 he was engaged by the Faculty of Engineering at Imperial College to assist in the preparation and implementation of new plans for undergraduate teaching. He was a Vice President of the Institution of Chemical Engineers and Chairman of its Qualifications Board from 1998 to 2001.