

### **Current posts**

Consultant, Apex Economics

Associate Fellow, Department of Economics, Warwick University

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# **University qualifications**

B.Sc. (Econ) First class honours, University College Wales, Cardiff, 1981

M.A. (Economics), University of Warwick, 1982

M.A. Cantab, University of Cambridge, 1986

Ph.D. Economics, University of Warwick, 1988

# **Expertise**

Spectrum economics: pricing and valuation models, auctions

Regulation of telecommunication networks

Competition cases in telecommunications

#### **Recent clients**

Telecom Italia: Co-funding of NGA networks

Australia Mobile Telecommunications Association: Licence terms

Tele2 Sweden: Auction design

Government of Bermuda: Market reviews
Optus Australia: Functional separation

Selex Galileo: Spectrum pricing and valuation

OTE Athens: NGN and NGA networks

**IDA Singapore: Spectrum pricing** 

Ofcom: Spectrum pricing and valuation

Hong Kong Broadband Network: Mobile termination and LRAIC

Solaris Mobile: Pricing of satellite spectrum

Australian Government: Spectrum management policies

BBC: Spectrum auction consultation

## Recent consulting reports

"The need for a conservative approach to the pricing of radio spectrum and the renewal of radio spectrum licences" for AMTA (Australian Mobile Telecommunications Association), 4 December 2010

"800MHz Band Auction Design: Externalities require a change to the auction design" for Tele2 Sweden, 25 November 2010

"Consultation on Draft Unified Licences" for BTRC (Bangladesh Telecommunications Regulatory Commission) December 2009 (with David Butcher Associates and HB Consultants)

"Review of spectrum pricing with reference to fixed links and trunked radio frequencies and services" for the IDA (Infocommunications Development Authority) Singapore, 17 May 2010 (with Martin Cave)

"Unbundling and the regulation of access – a brief outline of economic principles" for OTE, Greece, November 2009 (with Martin Cave)

"Calculating LRAIC for FMIC in the HKBN vs. MNOs case under determination by OFTA: The case for using HKBN company accounts to compute FMIC" for HKBN Hong Kong, 16 July 2009 (with Martin Cave)

"Regulatory Reform for 21st Century Broadband: Arguments in favour of the Structural Separation of Telstra" for Optus Australia, 2 June 2009

"The Proposed Merger of Hutchison and Vodafone: Why divestiture of some of the combined radio spectrum assets is desirable" for Optus Australia, 1 June 2009

"The 2GHz MSS bands, CGC and AIP: A Critique of Ofcom's Proposals and an Alternative Policy Proposal", for Solaris Mobile1 December 2008

"Analysis of functional separation and the impact on investment in the telecommunications sector of Poland" A report for Telekomunikacja Polska S.A. (TPSA), 3 September 2008

## **Recent publications**

"Your call: eBay and demand for the iPhone 4" *International Journal of Business and Economics*, forthcoming 2011 (with Mike Waterson)

"Contracting across separated networks: lessons from theory and practice", Communications and Strategies No 4, 2007 (with Martin Cave)

Essentials of Modern Spectrum Management [book] Cambridge University Press, August 2007 (with William Webb and Martin Cave)

"Market prices boost efficiency" *Policy Tracker*, pp. 10-12, March 2007

"Collective Dominance, Market Analysis and the 2002 EU Framework Directive: The case of mobile access and call origination in Ireland" in *Digital Economic Dynamics: Innovations, Networks and Regulations*, edited by Paul J.J. Welfens and Mathias Weske, chapter 7 pp. 141-170, Springer Press 2007

# **Recent presentations**

"ICT and the Digital Divide: Does it Matter?" ESRC-CAGE Workshop on Inequality University of Warwick 6 July 2011

"The socio-economic imperatives of achieving broadband for all" Forum Europe Conference *Every European Digital: the Challenge of Bridging the Broadband Gap*, Brussels 31 May 2011

"Spectrum Pricing" One Day Training Programme, Middle Eastern Spectrum Conference, Dubai, 31 March 2011

"Successful approaches to spectrum pricing" *Middle East Spectrum Conference* 2011, Dubai, UAE 30 March 2011

"Reforming Radio Spectrum Management: Successful Approaches to Spectrum Pricing" *Spectrum Regulation and Management Workshop*, Johannesburg, South Africa, 25 March 2011

"Penalties: Mixed Strategies or Mixed up about strategies?" *University of Warwick World Cup Workshop*, 7 July 2010