

Stimulating Investment in Information Infrastructure Development after the Dot.com Collapse: the Roles for Policy and Regulation

William H. Melody, LIRNE.NET
London School of Economics and Technical University of Denmark
Vodacom Foundation Visiting Professor
LINK Centre, Wits University

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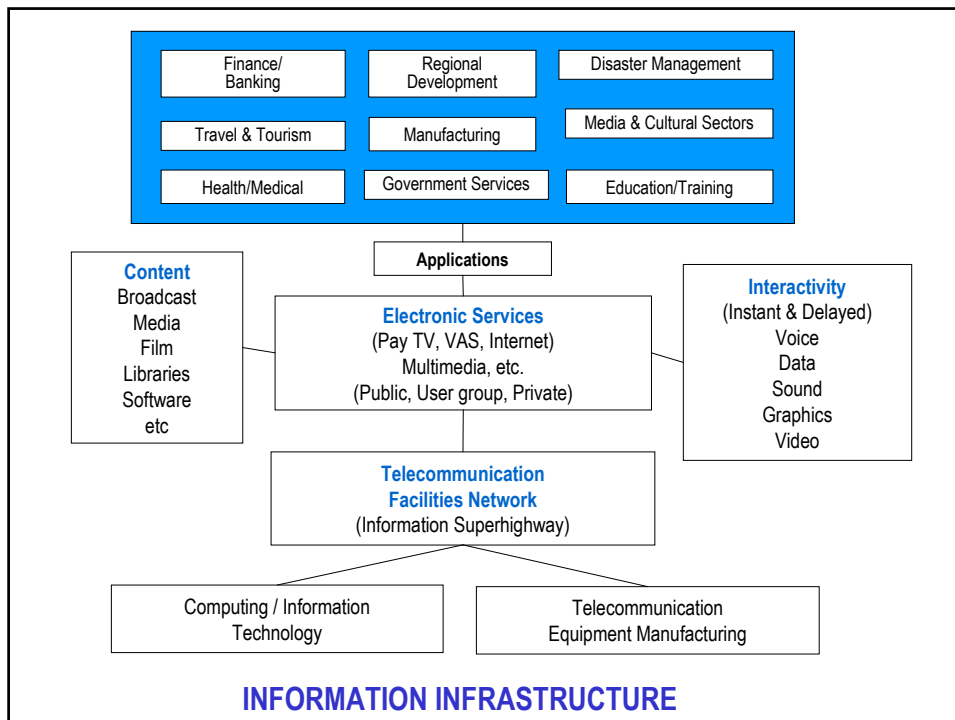
Characteristics of 21st Century Network Economies

- Driven by the services sectors
- Founded on info/communication networks – next generation Internet; e-economies
- Dependent on effective reforms in the telecom sector – information infrastructure
- Strengthening links among local, national, regional, international networks and markets

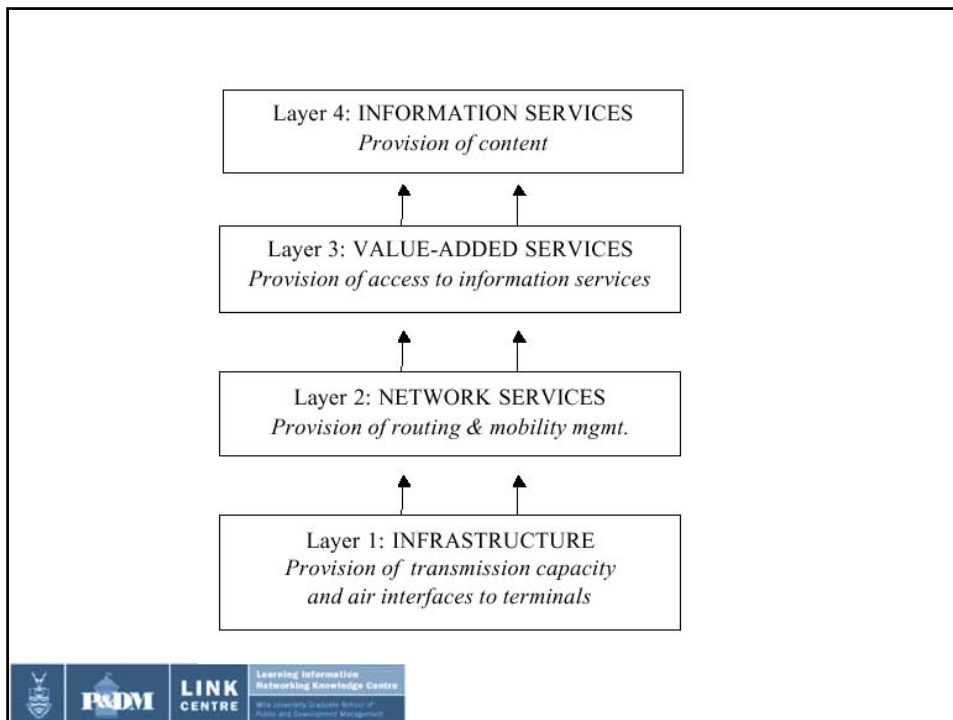
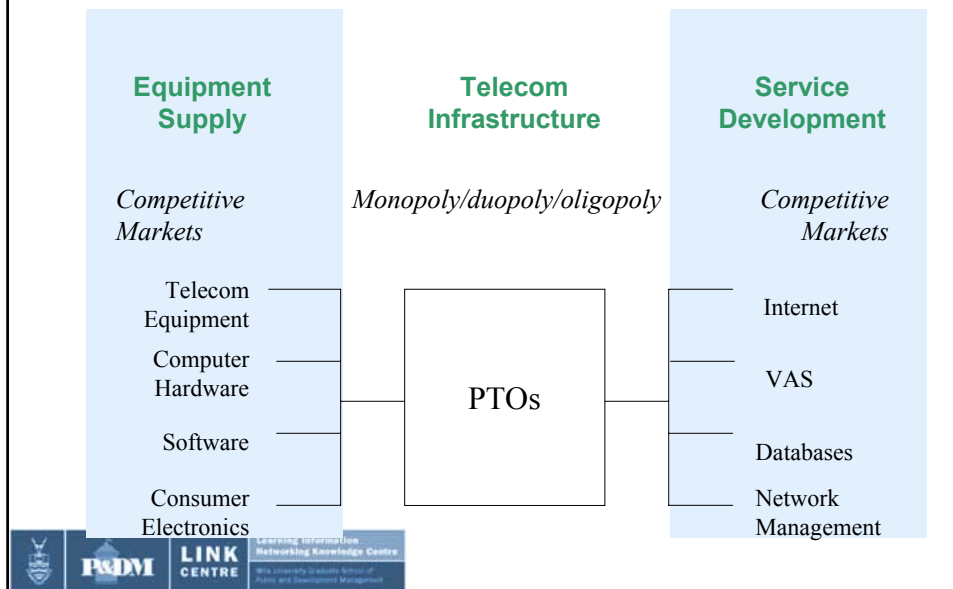


Stages of Telecom/Information Sector Reform

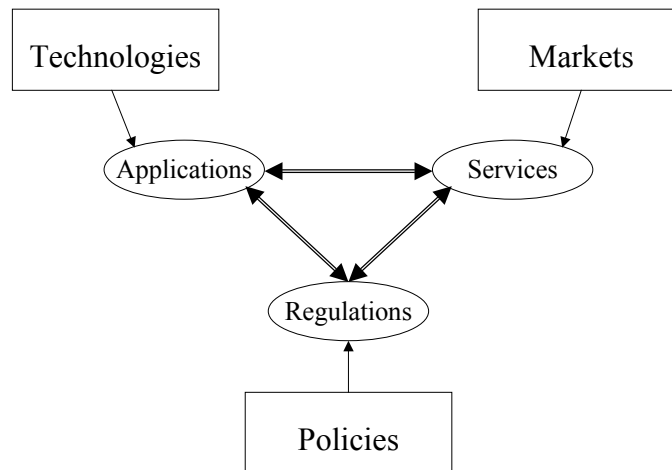
- Telecom Liberalization (Participation, Univ. Access)
- Expanding Network Capacity (Broadband)
- Preparing the Network Foundation for New Services
- Developing New Services – Applications Everywhere
- Applying Services Productively in Different Societies
- Telecom Reform & Regulation – Key Driver for Implementing Policy Reforms



The telecom sector value chain



Criteria for Economic Growth



Regulation: Catalyst for, or Constraint upon Growth?



Progress with Telecom Reform

- Now 120+ Countries with Separate Telecom Regulatory Authorities
- WTO Commitments to Liberalization
- Industry Specific Focus of Reforms
- Successes, Failures, Unanticipated Difficulties, Continuing Delays
- Telecom Reform is Proceeding at a Slower Pace than Technology Development or Market and Service Potential



Progress with Telecom Reform

- Inadequate regulation is the limiting factor constraining e-economy growth
- It is not a simple matter of removing regulations or eliminating regulators
- Sound regulatory foundations are needed to attract investment, foster applications of new technologies and development of new services.
- The speed of regulatory reforms must increase and be directed to stimulating investment in the infrastructure foundation for Network e-Economies



Information Infrastructure: Investment 1990s

- Mobile - licenses - operating; spectrum
 - network development
- Privatizing telecom incumbents
 - licenses – operating; IPO
 - network development
- Competitive network operators
 - fibre transmission
 - city / business LANs
- Software, services and content



Information Infrastructure: Investment Deficiencies 21st C

- Local - basic services access
 - broadband access
- Universal access - fixed
 - broadband
- Internet - local services and content
- Applications - e-economy; e-society



Policy, Regulation and Network Investment

- Licensing - paying for the privilege
- Annual Fees and charges
- Restrictions on investment opportunities
- Price and/or profit regulation
- Regulatory risk



Elements of Regulatory Risk

- Credibility - independence from politics
- Credibility - independence from incumbent
- Transparent processes
- Accountability
- Competence
- Commitment to implement policy objectives
- Evident fairness



Can Policy/Regulatory Structure Reduce Investment Risk?

- Morocco - licensing for mobile rollout
- Chile - making rural areas financially viable
- Denmark - minimizing barriers to entry
- Korea - multi-faceted programme promoting rollout



Are Policy/Regulatory Structures Increasing Investment Risk?

- Mexico - Telmex monopoly power
- Bangladesh - political nightmare
- US - tied up in administrative knots
- South Africa - Telkom and “confidential” politics

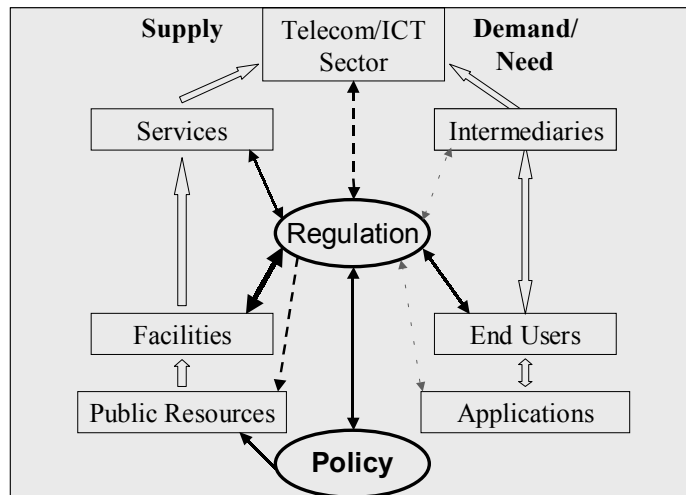


Shifting Policy/Regulatory Priorities to Stimulate Investment

- From supply of network facilities to stimulation of demand to justify investment
- From physical capital to human capital
 - awareness, skill, capabilities
 - applications by individuals & organisations
- Diverse sources of private and public investment
 - operators, service providers,
 - intermediaries, user applications



Regulatory Relations Affecting Sector Investment



Paths to Universal Access

- Voice - prepaid mobile
- Internet, e-economy, e-society
 - fixed & wireless network extensions
 - SNO and regional operators
 - radio and TV distribution networks
 - retail service suppliers, ISPs, VANS
 - greater role for intermediaries

Proactive Telecom Regulation

- Create a favourable investment environment for physical & human capital
- Minimize barriers to participation
- Facilitate demand as well as supply
- Apply skills and strategic management to achieve the spirit of the policy objectives
- Can only be done if regulatory structure is transparent and credible



World Dialogue on Regulation for Network Economies (WDR)

Dialogue Theme 2003:

Stimulating Investment in Network Development: Roles for Regulators



World Dialogue on Regulation for Network Economies 2003:

Research Partners

- Centre for Tele-Information, TU Denmark
- Economics of Infrastructures, TU Delft, NL
- LINK Centre, Wits University, S.A.
- Media@lse, London School of Economics



World Dialogue on Regulation for Network Economies 2003:

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- *infoDev*, World Bank
- ITU, BDT
- IDRC Canada
- LIRNE.NET
- Research Partner Universities



World Dialogue Theme 2003

Stimulating Investment in Network Development: Roles for Regulators

- Defining and Implementing Regulation to Facilitate Sector Investment in Network Development
- Establishing the Options and Priorities
- Determining the Boundaries?
- **The Challenge:** Creating regulation that leads rather than lags technology and market developments, providing a catalyst for investment and growth in network e-economies?



World Dialogue on Regulation for Network Economies

- Participate in the Dialogue; review and comment on the research, www.regulateonline.org
- For more information contact Merete Henriksen, WDR Coordinator, henriksen@lime.net
Tel. + 45 4525 5178; Fax + 45 4596 3171

LIRNE.NET, www.lirne.net

- A Strategic Collaboration for applied research, training, policy and regulation support, relating to information infrastructure and new network economy development
- Center for Tele-Information (CTI), TU Denmark
- Economics of Infrastructures, TU Delft, NL
- LINK Centre, Wits University, S.A.
- Media@lse, London School of Economics, UK

