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## **PRESENTATION**

# **TELECOMMUNICATIONS IN CRISIS: PERSPECTIVES OF THE FINANCIAL SECTOR ON REGULATORY IMPEDIMENTS TO SUSTAINABLE INVESTMENT**

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## **Telecommunications in Crisis: Perspectives of the Financial Sector on Regulatory Impediments to Sustainable Investment**

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### **Introductory Observations**

- Adverse financial market conditions are focusing attention on the impact of regulation on investment flows
- Importance of regulators understanding how investors approach investment decisions
- Always an opportunity cost: higher risks and less attractive expected results mean finance will flow elsewhere
- Viability of investment is assessed by analysing estimated projections of future financial results and risks
- Financial analysts benchmark performance of telecom companies, relying on detailed operational and financial ratios

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| Introductory Observations  |   |  |
|--|---|--|
| Operating and financial ratios used in financial analysis of telecom companies |   |  |
| <u>Operating Statistics/Ratios</u>   | <u>Financial/Operating Ratios</u>             | <u>Financial Statistics/Ratios</u>   |
| Subscribers (or lines)   | Average revenue per user (ARPU)               | Operating revenues   |
| Employees per subscriber (or line)   | Revenue/minute                                | EBITDA (Earnings before interest, taxation, depreciation and amortization) |
| Minutes of use per subscriber (MOU/Sub)  | Subscriber acquisition costs (SAC)            | EBITDA margin (EBITDA over revenues)                                       |
| Churn rate   | Enterprise value (EV) per subscriber (EV/Sub) | Free cash flow (FCF)   |
| Country penetration  | Capex/Sub<br>Capex/Minutes of Use (MOU)       | Debt/EBITDA  |
|  |   | Debt/market capitalization   |
|  |   | Enterprise value (EV)/EBITDA   |
|  |   | Capex/revenues   |
|  |   | FCF yield  |
|  |   | Price/earnings (P/E) ratio   |
|  |   | Earnings per share (EPS)   |
|  |   | Return on equity (ROE)   |

## Introductory Observations

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- Regulatory conditions have a major effect on the ratios used to decide whether to invest
- The paper focuses on the effect of regulation on expected:
  - Revenues
  - Costs
  - Overall profile of regulatory risks
- Key concerns:
  - develop institutional mechanisms to increase input from investors into the regulatory process
  - improve transparency of regulatory process to investors

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**Revenues:**  
**Retail Price Regulation of Fixed Line Operators**

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- Historic distortions created by cross-subsidies and traditional price regulation
- Competitive pressures on traditional price structures
- Rebalancing of fixed line prices is not complete in most markets—both developed and developing markets
- Continued price regulation introduces many rigidities including inflexibility to respond to competitive markets, embedded subsidies to special groups and government entities
- In some markets inflexibility to respond to growing mobile and Internet-related traffic

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**Revenues:**  
**Disparity of Fixed and Mobile Price Regulation**

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- Global mobile penetration surpassed fixed in 2002
- Mobile penetration exceeds fixed in 97 markets
- Increasing evidence of fixed-mobile substitution in developed and developing markets
- Major telecom operators cite fixed-mobile substitution in their Management Discussion and Analyses as a competitive effect reducing revenues
- Notice the impact on investment flows of a light-handed mobile price regulation
- Justification for differing regulatory approaches?

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**Revenues:**  
**Effect of Retail Price Controls on Wholesale Services**

- Inappropriate retail price regulation can introduce significant distortions in wholesale services:
  - Create barriers to investment by new entrants
  - Create distortions between retail and wholesale price structures
- Concerns about mandating uneconomic investment by incumbents
- Concerns about price squeeze of new entrants

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**Revenues:**  
**Price Regulation of Wholesale Fixed Line Services**

- Risks of policies relating to wholesale price regulation that are not balanced and do not permit infrastructure-based approach to access
- Alternative approach based on tighter regulation of fixed line network has major flaws
- Concerns about separating fixed line network into a separate regulated public utility—the UK Railtrack model
- Creating adequate incentives to investment by incumbents and new entrants

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**Revenues:**  
**Mobile Roaming and Termination Charges**

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- Increased regulatory focus risks treating roaming and termination as isolated regulatory concerns
- Importance of cash flow in the sector as a whole
- Concern about competition policy focusing too narrowly and not dealing with the impact of regulation overall on the sector
- Provide leeway for market-driven pricing adjustments?
- Benefits of industry-regulator consultative processes

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**Impact of Regulation on Projected Costs**

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- Impact of regulation on cost structures of telecom service providers including the cost of licenses, spectrum, and build-out and USO obligations
- Conflict between government policies to develop telecom sector and incentives to finance other social programs and obligations
- Telecom sector has often been utilized as a cash cow to finance other budgetary priorities
- Impact on sector growth and long-term tax revenues

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## **Costs:**

### **Government Revenues and Licensing**

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- Imposing license/concession fees on revenues are “off the top” of revenues and independent of operators’ profitability
- Trade-off current revenues for long-term tax revenues
- Spectrum auctions put government in role of exclusive seller of a unique resource
- Disclosure of future regulatory initiatives can be real concern
- Structuring bidding to maximize revenues in face of operational and technological uncertainties—case of 3G specific auctions and WiFi developments

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## **Costs:**

### **Build-out and USO Obligations**

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- Effective pricing policies can reduce waiting lists and expand infrastructure
- Lesson from explosion of investment in mobile infrastructure
- Potential for new technologies including wireless LAN technologies to provide services in rural areas
- Establishing right price signals for investment in rural areas and then targeting subsidies
- Eliminating embedded subsidies in existing rate structures
- Risks of bureaucracy in USF administration

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## Improving the Risk Profile

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- Removing areas of uncertainty about key policy issues
- Dealing with jurisdictional conflicts and regulatory complexity
- Developing new mechanisms for dealing with dispute resolution and consensus building and strengthening the nexus between investors and regulators

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## Improving the Risk Profile: Reducing Regulatory Uncertainty

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- Complexities of transition from concession-based industry structure to license-based structure
- Process concerns about the transition from revenue division to interconnection-based relationship between local exchange and long distance operators
- Need to define the competitive arrangements between long distance and local exchange operators
- Addressing changes in jurisdictional roles of national and regional regulators

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## Improving the Risk Profile: New Institutional Mechanisms

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- Complexity of technical and economic issues implicated by regulation
- Creating avenues for more direct input by key industry players and investors
- Increasing the likelihood that outcomes will succeed through regulatory forbearance
- Increasing capabilities to deal with private dispute resolution
- Using virtual fora with access to benchmark-related information to facilitate dispute resolution and consensus building
- Critical opportunity to build new nexus between investors and regulators

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## Overview of Key Recommendations (1)

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- Focusing on investment-oriented regulatory policies and on better flow of information between regulators and investors
- Revisiting traditional approach to retail price regulation of fixed line services
- More attention to the implications of mobile-fixed substitution with respect to ongoing retail price regulation

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## Overview of Key Recommendations (2)

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- Focusing more attention on the nexus of retail and wholesale price regulation
- Removing distortions created by restrictive retail price regulation
- Creating new and more favorable environment for investment in alternative infrastructure
- Reducing the incentive of government policy makers to seek short-term financial return from the telecom sector

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## Overview of Key Recommendations (3)

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- Developing a more limited and focused approach to regulation, especially to achieving objectives of rapid expansion and accessibility of network infrastructure
- Developing new mechanisms to improve private dispute resolution and consensus building in the telecom sector
- Improving the flows of information between investors and regulators through institutional innovations

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