Telecom Regulator and NSO Collaboration - Key to Better ICT Indicators

.........The Case of Pakistan

Muhammad Arif Sargana
Director (Economic Affairs)
Pakistan Telecommunication Authority
ICT Data Collection Agencies in Pakistan

- Market Research Organizations (BMI, Gallup, Ericsson Research Lab, etc)
- International organizations (ITU, GSMA, World Bank, etc.)
Challenges

• Need for a lead organization on pooling ICT data from all sources i.e, PTA in Pakistan (ownership)
• Lack of funds for inclusion of ICT data in regular surveys
• Insufficient coordination among stakeholders
  – NSO major source for Regular primary data Collection
• Overlap in regulatoryambits of Government bodies such as FBR, PTA, SBP, PBS (e.g. revenue reporting and tax collection; telecom indicators for GDP calculation)
• Requirement of immediate provision of urgent/ Top Priority information by the Government
• Issues in timely and accurate provision of data by operators
  – Manual data collection and management
Challenges (Contd..)

• Confidentiality of Financial information
• Legal Limitations to data provision
• Technical difficulties in calculation of some indicators
• Multifaceted Compliance to various Government departments for data reporting (Operator view)
• Non-availability of geographical and gender-based ICT data
  – Require periodic Household Surveys for detailed ICT indicators
PTA’s Efforts to Improve Data Collection

- **Ownership:** PTA agreed to lead on ICT data collection hub
  - Availability of funds from its own sources for NSO, if required
- PTA raised the issue at highest level i.e Minister of Finance and IT Minister to convince NSO to include ICT indicators in its PSLM and other regular HH surveys
- Engaged the Pakistan Bureau of Statistics (NSO) to carry out separate surveys for measuring ICT data at HH level and include few indicators in regular surveys
- Periodically ICT Indicators Symposium for all local stakeholders
- Formation of a National Working Group on ICT Data Collection representation from all stakeholders.
- Developing a centralized state-of-the-art ICT Indicators Database (in process).
- Revision/Updating of the data collection forms to collect quarterly data from telecom operators
The Outcome

- NSO agreed to include few ICT Indicators in its annual HH data collection survey
  - In the first phase, NSO incorporated ICT indicators in its HH survey
  - Based on survey results, ITU questionnaires have been updated
- Accuracy improved in ICT data provision to various international agencies – reflecting true ICT development in the country
  - IDI value of Pakistan improved
- Focused approach to use ICT indicators for the monitoring of SDGs – WG of MoIT, Planning Commission, NSO and PTA
- NSO agreed to have separate ICT survey after 2-5 years intervals subject to funds availability
- PTA on list of experts list of NSO to review questionnaires for HH data collection
**Way Forward**

**Collaboration between Government agencies—under a centralized lead agency**
- MoIT may take the lead role

**Regular consultation with telecom operators**

**Automation of ICT Indicators Database**
- On-line data reporting
- PTA’s in-house database
- Big data analytics

**Annual Symposium/Conference on ICT Indicators**
- Progress review
- New data requirements
Thank You
## ICT Data Sources

### Telecom Operators
- Cellular
- Local Loop
- Broadband
- LDIs
- VAS

### Government Bodies
- PBS
- SBP
- FBR
- FAB
- PEMRA
- BOI
- USF
- PSEB

### International Sources
- ITU
- GSMA
- Research firms (e.g. Deloitte)
- Online Data Portals

### Media reports
- News
- Blogs
- Articles
- Magazine
## ICT Indicators Collected by PTA

### By Frequency
- Monthly (subscribers and data usage)
- Quarterly (detailed/on prescribed format)
- As required

### By Type of Data
- General
- Network
- Financial
- Traffic
- Quality of Service
- Mobile Financial Services
- Economic Indicators (investment, employment, revenues, contributions etc)
- Need based indicators
ICT Indicators Collected by PTA (cont.)

- By Type of Operators
  - For each CMO
    • 57 indicators are collected at the end of each quarter
  - For each FLL Operator
    • 37 indicators are collected at the end of each quarter
  - For each WLL Operator
    • 26 indicators are collected at the end of each quarter
  - For each BB Operator
    • 30 indicators are collected at the end of each quarter
  - For each LDI operator
    • 30 indicators are collected at the end of each quarter
Importance of ICT Indicators

• Accurate, meaningful and objective analysis of ICT indicators help governments to:
  — Design and evaluate ICT policies and strategies
  — Country vs. region vs. world comparison of ICT development
  — Devise means and ways to bridge the digital divide

• ICT data is the key parameter for investors to make their business decisions

• ICT indicators help monitor the progress towards the road to information societies.

• The growth and development of ICT indicators require continuous review of ICT definitions and methodologies.
**Recommendations to ITU**

- Ranking of countries sensitive, which needs careful selection of indicators
- A single software for data collection (i.e., ICT EYE) across countries that enable to get ITU data immediately except confidential info
- Free of cost online data sharing platform for members by ITU
- Availability of latest data with ITU of all countries (normally there is lag)
- Play lead role for capacity building and to educate the countries on coordination for ICT data collection (needed in Pakistan)
- Working group on ICT Indicators should be made operational immediately and quarterly meetings to be held.
- Skills/education data for IDI ranking must be replaced with HH data of skills instead of mean education. Pakistan has serious concerns
- Technical support for data audit of operators for data accuracy