Status of Information Society in SAARC

Expert Group Meeting

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Status of Information Society in SAARC

Progress in and requirements for building an inclusive and people-oriented Information Society in SAARC Sub-region

Expert Group Meeting
On Regional Cooperation towards Building an Information Society in Asia and the Pacific

Bangkok, 20-22 July 2009
The Regional Action Plan

• Adopted by the Asia Pacific Regional Conference on WSIS, held in Tehran in 2005.

• Covers specific programs/projects with specific objectives, expected outputs, activities, indicative time frame for implementation and indicators for evaluating progress.
Overall Objective:
To review the progress in the implementation of the outcomes of the WSIS including WSIS goals/targets as contained in section B of the Plan of Action of the WSIS in Geneva.

This Study:
Examines the progress made after the Tunis summit 2005,
• Reports on the Current challenges faced in the development of ICTs,
• Reports on the Current issue of quality, speed and cost of access to ICTs-broadband and NGN, gender divide, in the access to Internet and ICTs enabling policy environment, and
• Makes practical recommendations to take up actions in future.
Methodology Adopted

- Simplification of the RAP
- Meetings/ discussions and questionnaire administration
- Information search through website
Role of Government and Stakeholders in the promotion of ICT for development

- Developed ICT policies and e-strategies (in early 2000)
- Regional meetings were held
- SAARC Second Working Group meeting on Communication Technology
  - NTA: South Asian Telecommunication Regulators’ Council in Kathmandu.
  - India: Universal Access and experience on Rolling out of Broadband Services
  - SAARC Third Working Group on ICT (2009)
  - Next Generation Network workshop at Colombo (2009)
Built ICT infrastructure to cover rural and remote areas

- India: ahead (with Tele-density of 23.89%),
  - developed world’s cheapest mobile handset.

- Developing optical fiber networks within the sub-region,
- Afghanistan working on laying optical fiber links with Pakistan.
Access to Information and Knowledge

- Develop integrated system & convert in digital format,
- Promote access to public hosting various websites and establish electronic mailing system,
- Use VSAT system for communication access,
- Feasibility study by India on establishing
  - intra-regional high bandwidth hub for leased lines,
  - submit the concept paper to the SAARC Secretariat for further consideration.
Capacity Building

- ICT literacy and ICT skill in education and training (India, Pakistan and Sri-Lanka)
- India develop special training scheme for women
- Sri Lanka set up 40 distance education learning centers and 2000 schools with Computer lab.
- In Afghanistan, five new ICT training Centers established in 5 provinces.
- India to implement Tele-Education in the SAARC sub-region.
- India and Pakistan to provide training for the human resources development.
Building confidence and security in the use of ICTs

- All commercial banks develop security applications.

- No information on the country wise cyber crimes but two cases in Nepal.

- Bangladesh establish e-Governance cell.

- Government to handle public grievances through ICT.
Enabling Environment

Conducive policy and environment for investment.

- Sri-Lanka: tax holiday

Software export

India: US $ 40.3 billion (2007/08),
Pakistan US $ 72.2 million.

Foreign equity

- India: 100% for Software Technology Parks of India.
- Nepal: 100% in IT and 80% in Telecom sector.
ICT applications

Special projects developed

- *Akshaya*, e-governance
- *Agrovoc*  agricultural information
- *e-Sagu* to reduce the cost of cultivation (The *Manthan* Award 2007 for the best e-Content for Development).
- *Chetna* empowering women and children on life skills, compulsory education, health, nutrition, child care, age care & HIV/AIDS.
- “*Anuman*” a real time weather forecasting for disaster management.
Cultural Diversity and Identity

• *e-Dharohar* a digital register of Museum articles customized,

• *Mantra* a Multilingual Computing and Heritage computing

Bangladesh: e-content.org ([www.e-content.org](http://www.e-content.org)) initiated a ‘World Summit Award’ to select and promote the best e-content worldwide.
Media

- Nepal: Right to Information Act, 2008
- Bhutan Infocomm and Media Act, 2006
- Telecom Regulatory Authority of India brought Right to Information Act, 2005
- Network for Radio and Communication (Nepal, Bangladesh)
Ethical dimension of the Information Society

• Not much stories on ethical dimension of the Information society,

International and Regional Cooperation

Afghanistan: a new training curriculum
   Islamic Republic of Iran (coordinated by ITU),
Bangladesh – master plan for ICT in education (UNESCO, UNDP, and the Spanish Cooperation Agency)
India- UNESCO publish book: an open access to knowledge and information,
Nepal develop master plan for ICT
   Agreement with Asian Development Bank
Pakistan- taking up Global Free and Open Source Software Movement (UNDP-UNIDO, Governments of the Netherlands and Tunisia),
Success stories of ICT Policy and applications

Nepal
“One child one laptop” program in education
Opening up a website for blood donation

India
*e-Swasthya* - health in a card
*e Seva* - run and managed by women self-help groups

Sri-Lanka
*Young Asia TV (YATV)* (media program, replicated in Africa and Latin America.)
Current Policies and Strategies

Afghanistan: *New Home, New Life*

Bhutan: *Gross National Happiness*

Bangladesh: E-Governance Cell

India: *National e-governance Plan*  
(27 Mission Mode Projects, eight supported component),

Nepal: enhancement of People’s Access to IT.
Investment policy on telecommunications sector through licensing new networks

<table>
<thead>
<tr>
<th>Country</th>
<th>Operator</th>
<th>Amount (US $ million)</th>
<th>Investors</th>
</tr>
</thead>
<tbody>
<tr>
<td>Afghanistan</td>
<td>Areeba Afghanistan</td>
<td>40</td>
<td>Fee paid by Invest.com (Lebanon) for a mobile license</td>
</tr>
<tr>
<td>Bangladesh</td>
<td>Warid Telecom</td>
<td>50</td>
<td>Fee paid by Warid Telecom (UAE) for a mobile license.</td>
</tr>
<tr>
<td>Maldives</td>
<td>Wataniya Telecom</td>
<td>1</td>
<td>Mobile license won by Wataniya (Kuwait).</td>
</tr>
</tbody>
</table>
Quality communications problems in SAARC sub-region.

Quality of Service is integrally connected to price.

A methodology developed, tested in two networks each in India (Chennai) and Sri-Lanka (Colombo).

The preliminary results showed that both download and upload speed better than other site (yahoo.com) on a given time.
Average monthly prepaid mobile cost for a low User, US $

Source: Mobile Benchmarks February 2009 (www.Irnesia.net)
Average monthly postpaid mobile cost for a low user, US $

Source: Mobile Benchmarks February 2009 (www.lirneasia.net)
# Broadband Prices in SAARC sub-region (US Dollar)

<table>
<thead>
<tr>
<th>Member States of SAARC sub-region</th>
<th>Annual Cost, 2Mbps Broadband business connection (unlimited download)</th>
<th>Annual Cost, 256kbps Broadband business connection (unlimited download)</th>
<th>Annual Cost, 256kbps Broadband residential connection (unlimited download)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Afghanistan</td>
<td>11,700</td>
<td>4,200</td>
<td>4,200</td>
</tr>
<tr>
<td>Bangladesh</td>
<td>Data not available</td>
<td>595</td>
<td>255</td>
</tr>
<tr>
<td>Bhutan</td>
<td>Data not available</td>
<td>Data not available</td>
<td>Data not available</td>
</tr>
<tr>
<td>India</td>
<td>2,225</td>
<td>145</td>
<td>145</td>
</tr>
<tr>
<td>Maldives</td>
<td>3,689</td>
<td>1,667</td>
<td>277</td>
</tr>
<tr>
<td>Nepal</td>
<td>1,395</td>
<td>225</td>
<td>225</td>
</tr>
<tr>
<td>Pakistan</td>
<td>759</td>
<td>182</td>
<td>182</td>
</tr>
<tr>
<td>Sri-Lanka</td>
<td>526</td>
<td>237</td>
<td>237</td>
</tr>
</tbody>
</table>
Next Generation Network

- Next Generation Network (NGN) deployment still in its infancy.
- Migration to NGN technologies in India by incumbents. Access network poor and take many years to be 100% transitioned to NGN,
- Transition to NGN access critically dependent on success of alternate access technologies (Cable TV, Power Line Communication and WiMax) and market success of triple play services (video, IP voice and data),
- Sri-Lanka, operators shift to GSM.
Digital divide

Exist within and between Member States of SRRAC sub-region

- Ease of connectivity, costs and level of literacy
  - Reduction of price increased the use of ICT in Afghanistan (from US $ 0.30 to under US $ 0.07 per minute)

- Location of ISPs
- Case specific
  - Maldives’s demand for higher speeds in urban area whereas access in case of rural areas.
Bridging the Digital Divide

- Accounting rates and Collection Charges
  Bangladesh update proposal on revising accounting rates and collection charges and submit to the SAARC Secretariat,

- Nepal formed a study group for
  - fully opening up of Voice Over Internet Protocol services
  - issues of “IP based Network Services and Network Security’s access and NGN and IMS.

- Sri Lanka, operating Village Portable Device
Existing Problems and Constraints

- The capacity to develop policies to effectively integrate ICT in the system

- Bangladesh
  - weak data communication infrastructure,
  - absence of legal infrastructure, lack of human resources

- Maldives
  - inequality of access on ICT appliance and connectivity.
  - Expensive telephone calls between the islands,

- Nepal
  - high up-front costs, absence of local contents and inefficient and cumbersome interactions process.
Requirements

- A coordinated and concentrated effort
- SAARC e-master Plan
- Gender divide measured and addressed effectively.
  1. *Pretty good business climate*
  2. *Well educated tranche of people*
  3. *Legal and Regulatory framework*
  4. *Empowering citizens in terms of access, confidence and motivation*
  5. *Setting up of ICT industries and business*
  6. *Leadership and Governance*
Conclusions

- All Member States of SAARC Sub-region have placed ICTs as one of the priority sectors
- Difficult to find indicators that would evaluate the RAP progress developed by UNESCAP
- No coherence between the SAARC action plans and WSIS/RAP developed by UNESCAP
- Speed and cost of access to ICTs in the member States of SAARC sub-region varies significantly.
- Technologies advancements forcing towards unification of networks, and setting up the stage for the emergence of NGN.
## 1. Access

| Indicators                                                      |          |
|                                                               |          |
| Telephone mainlines (per 100 people)                          | 3.3      |
| Mobile telephone subscribers (per 100 people)                 | 15.3     |
| Population covered by mobile telephony (%)                    | 60       |
| Internet users (per 100 people)                               | 4.9      |
| Personal computers (per 100 people)                           | 1.4      |
| Household with a television set (%)                           | 32       |

## 2 Quality

| Indicators                                                      |          |
|                                                               |          |
| Broadband subscribers (per 100 people)                         | 0.18     |
| International internet bandwidth (bits per person)             | 22       |
### 3. Affordability

<table>
<thead>
<tr>
<th>Service</th>
<th>Cost ($ a month)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Price basket for residential fixed line</td>
<td>4.0</td>
</tr>
<tr>
<td>Price basket for mobile telephone service</td>
<td>2.4</td>
</tr>
<tr>
<td>Price basket for internet service</td>
<td>6.8</td>
</tr>
<tr>
<td>Price of a call to</td>
<td>2.02</td>
</tr>
</tbody>
</table>

### 4 Institutional Efficiency & Sustainability

<table>
<thead>
<tr>
<th>Indicator</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Telecommunication revenue (% of GDP)</td>
<td>2.1</td>
</tr>
<tr>
<td>Telephone subscribers per employee</td>
<td>433</td>
</tr>
</tbody>
</table>

### 5 Applications

<table>
<thead>
<tr>
<th>Application</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Sector expenditure (% of GDP)</td>
<td>6.0</td>
</tr>
<tr>
<td>e-government readiness index (0-1, 1=most ready)</td>
<td>0.32</td>
</tr>
<tr>
<td>Secure Internet Service (per million people)</td>
<td>0.8</td>
</tr>
</tbody>
</table>
Recommendations

Establishment of WSIS/ RAP focal office

1. Identification of the performance indicator parameters relevant to the region.
2. Examining the feasibility of Calling Card Services due to difference in the exchange rate.
3. Examine the regulatory and licensing approaches in the area of NGN.
4. UNESCAP should convene a regional consultation meeting for NGN.

SAARC Secretariat should act as a repository body

1. SAARC Secretariat repository body of the WSIS.
2. SAARC Documentation Centre and SAARC Information Centre responsible for monitoring the WSIS activities as per the time frame.
3. Monitor various parameters constituting digital opportunity index.
Thank You Very Much