

PTC India Foundation

Brief Proceedings of PTCIF Seminar 2011 on **‘Ubiquitous Broadband: Overcoming the Roadblocks’**

Held at India Habitat Centre, New Delhi
on Friday, 23 September 2011

The Seminar for the year 2011 by PTC India Foundation on **‘Ubiquitous Broadband: Overcoming the Roadblocks’** was held in four sessions as per the programme on 23 September 2011, at India Habitat Centre, Lodhi Road, New Delhi. The brief proceedings of the Seminar are given in the succeeding paragraphs.

Inaugural Session:

The Inaugural Session held at 10 AM onwards commenced by a welcome address by Mr. Kuldeep Goyal, Chairman, PTC India Foundation. The keynote addresses were delivered by Mr. Anuj Kapur, Country Manager, Telcordia India, Mr. VVR Sastry, Executive Director, C-DOT and Mr. Anil K. Jain Sr. General Manager, BSNL.

Welcome Address by the Chairman:

Mr. Kuldeep Goyal, Chairman, PTC India Foundation while welcoming the participants in the Seminar, said in his Presidential address that Indian Telecom Sector has done well in providing mobile telephony to the masses at affordable tariffs. Network coverage has reached most of the villages, though there is still wide gap in tele-density between the urban and rural areas. Now, with the operators thrust to expand their networks and provide mobile telephony services in rural areas, penetration in rural areas is expected to improve significantly.

Presently nearly 90 percent of the mobile users in India are for voice and SMS services, and very small number of the users also use for Internet / Broadband over their mobile devices. Measures are required to bring more mobile users in category of Internet / broadband users.

Some of the measures in this direction are options of use of USO FUND in funding the projects in rural areas, now being made available to operators. There is also a plan to evolve National Broadband Plan and this is under active consideration of DOT and TRAI. Availability of low-cost handsets with features of Internet / broadband use facility will also go a long way in this direction.

Dependence on foreign technologies, manufacturers and suppliers must become minimal and for this there is need of comprehensive policy and action plan on Telecom manufacturing in the country. There is a Panel Discussion Session on ‘Telecom Manufacturing in India’.

Keynote Addresses in the Inaugural Session:

Mr. Anuj Kapur, Country Manager Telcordia said that the times we live in now ubiquitous voice is already there but the need is of data. There are 578 million broadband connections in the world but in India there are just nearly 12 million broadband connections. He talked of correlation between increases in broadband connections to increase in GDP in developing countries as for every 10 % increase in broadband connections increases the GDP by 1.38%. India is targeting a 14 fold increase in broadband connections. He talked of roadblocks in achieving this growth and said that there is very low wire-line penetration and hence wireless is the way. He further discussed Operators business challenges and marketing challenges.

Mr. VVR Sastry, Executive Director, C-DOT in his address said that there always be roadblocks in any national endeavor. He further compared provision of broadband network to laying of roads / highways. Broadband has now become like roti / kapda / makan. Therefore broadband has to be affordable and people will become addicted to broadband use. How broad should be the band as 2 MBps bandwidth is not enough now for services like smart cards, video interface and even for village Panchayats for public services.

Mr. Anil Jain, Sr. General Manager, BSNL in his address said that huge growth of mobile at 70 percent penetration is very encouraging and the next revolution in the country is going to be of broadband penetration. We are 10 years behind at present, but India will catch up as India is the 11th largest broadband market. According to him the figure of 12 million broadband connections in India presently being quoted is not correct as mobile wireless broadband users are not being taken into account. He explained how the impact of broadband as catalyst for economic and social development is widely recognized. He further said that there is a need for a renewed Policy push to enable growth in broadband penetration. He talked of various IT infrastructure initiatives of the Government through BSNL, particularly the CSC Project for the rural areas.

Session I – ‘Emerging Technologies for Broadband Services

This session was chaired by Mr. J.P. Garg, Principal Advisor, Nokia Siemens Networks, India. Mr. J. P. Garg talked and initiated the discussion of the trends in bandwidth, data services and technologies like IMT-Advanced, LTE etc.

Mr. P.K. Nag, V P, Telcordia made his presentation on ‘Emerging Technologies for Broadband Services’. In his presentation he explained how operators can add value to the subscriber experience. He talked of next generation of service lifestyle management, of internal service innovation, hosted cloud solutions and finally Telcordia’s thrust towards revenue and service innovation.

Mr S. N. Gupta, Chief Regulatory Advisor, BT Global made a presentation on ‘Next Generation Broadband Network – Relevance of Wired Access’. He explained the evolution of copper / fiber based technologies; fiber-optic cable technologies; free space optics and Metro Ethernet Networks. He talked of various NGA deployment phases like FTTN, FTTC, FTTB and FTTH. According to him the new concept of Next Generation Broadband Access is for Superfast Broadband.

Mr. V.K. Arya, Senior GM, ALTTC-BSNL made his presentation on IPv6 Addressing. He talked of TCIP / IP Protocol and gave comparison between IPv4 Header and IPv6 Header. He also gave Review of IPv4 Address scheme. Finally he brought out advantages of IPv6 Addressing through mathematical details.

Mr. Nitin Dahiya, Manager, Head of Sales-India Region, Nokia Siemens Networks gave a presentation on ‘3G, 4G – The Mobile Broadband Revolution’. He mentioned of improvement in speed with LTE-A over the existing technologies like HSPA, WCDMA. He explained various technology options available for wireless broadband in cellular and non-cellular technologies. According to him there was proliferation of devices all around and a mobile is no longer a voice centric device.

All the presentations made in the Inaugural Session and in Session I are available on PTCIF website www.ptcif.org.in

Session II – Panel Discussion Session on Telecom Manufacturing in India

The Panel Discussion was chaired by Mr. N. K. Mathur, Advisor Strategy Planning-Telecom and he invited views of the panelists/participants including any differing views on telecom manufacturing and product deployment. He also moderated the panel discussion.

Following Panelists participated in the discussion:

1. Dr. Mahesh Uppal, Director Comfirst India
2. Air Cmde. (Retd.) S. S. Motial, former CMD, ITI
3. Mr. Lav Gupta, Principal Advisor, TRAI
4. Mr. Vipin Tyagi, Director, C-DOT

Dr. Mahesh Uppal said that there was huge import of telecom network equipment because of non-availability of equipment from indigenous manufactures. He further said that TRAI made some strong observations and recommendations on indigenous manufacturing. But Regulator should not pick winners but its job is only to select competitors. According to him, R & D and innovation are equally important.

Air Cmde. S. S. Motial in his address said that congenial atmosphere has to be generated in the country to carry on innovation and R & D. According to him manufacturing gives only 15 percent value addition but it gives employment and business activity.

Mr. Lav Gupta talked of Recommendations made by TRAI on Telecom Manufacturing in the country. He said that broadband connections are very low in India but there are about 400 million wireless devices which are enabled to GPRS and hence can be qualified as Internet / broadband connections. According to him we are to consider why manufacturing is not flourishing in the country. There is a need of cultivation of vendors and there should be an IPR.

Mr. Vipin Tyagi said that broadband and converged networks are the effective way for ubiquity. According to him the project model should be prepared taking the ground realities in the country into account.

On Session Chairman's proposal, there was unanimity that the country achieves self-reliance to a large degree in Indian telecom equipment manufacturing and product development. Only then the huge FE outflows on material and manpower can be minimized. Dr. Uppal pointed out certain deficits in TRAI's approach and emphasized on proven-ness. Sri Tyagi pointed out the important role that R&D, creation of IPR's and innovation has to play; generous funds would certainly be needed for the purpose. Air Cdre Motial pointed out the handicaps which manufacturing sector has to face and Sri Lav Gupta explained the background in which TRAI made recommendations on this subject. While appreciating the efforts of some Indian companies like VNL, HFCL, Shyam, Midas etc. in product innovation and that of manufacturers like Nokia, Ericsson, Alcatel, the need for strengthening the testing and quality control organizations was emphasized during the ensuing discussion. It was felt that the country's commitments in WTO need to be re-visited in order to achieve self reliance. Nearly all those present in the session took part in the discussions.

Session III – Valedictory Session and the Way Forward

This Session was chaired by Mr. S. D. Saxena, former Director (Finance), BSNL.

Mr. S.D. Saxena in his opening remarks said that the performance of indigenous telecom manufacturing in India has been very dismal due to lack of R&D and innovative efforts in the country. He further said that the growth of telecom services has in fact helped mainly the multinational manufacturing companies / vendors. The Keynote speakers were Mr. P.K. Garg, Member RRB ITU and Former Wireless Advisor, GOI; and Mr. H.C. Soni, Advisor, Videocon Telecom, on the 'Way Forward' to overcoming the roadblocks for providing ubiquitous broadband in India.

Based on the interaction, between the speakers and participants in the keynote address sessions, during the Panel Discussion Session and the Valedictory Session, following points emerged as conclusions / recommendations of the Seminar:

Points emerged during the Seminar as Recommendations

1. The facilitating & supporting role of the Government is essential in all aspects of Telecom Sector.
2. Development of Applications needed by Indian masses & creating awareness among masses and security aspects to be taken care of.
3. Innovative approaches to bring affordability; appropriate combination of wire-line and wireless systems; let us not insist on very high data speed to start with – once the broadband takes off and critical numbers/ usage are achieved, further growth of numbers and data rate would be automatic.
4. Adequate spectrum; ensuring optimum & efficient usage by all through various methods, including appropriate charging for all spectrum usage (Govt. as well as private); technology neutral usage to be allowed if it enhances efficiency, subject to compatibility with other nearby usages.
5. R&D and Indigenous manufacturing: Association of Universities/ academia for R&D efforts; Follow the successful elements of automobile and pharmaceutical industries in India; customer end terminals for OFC network can be one mass item for consideration; MNCs selling their products in India to ensure setting up of manufacturing facility in India with gradually increasingly indigenous value addition.

Date 20 October 2011

Place: New Delhi

Air Commodore (Retd.) N.K. Chhibber
Secretary General
PTC India Foundation