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Case Study on Sustainable National Broadband Proliferation

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Abstract

Nepal is developing Broadband Policy. Data connectivity of at least 128 Kb/s is defined as broadband. Currently it has around 40,000 connections for a population of 28 millions. Technologies used are ADSL, EVDO, Fiber/Cable/Wi-Fi, 3G and VSAT in that order of magnitude, with 15,000 users in ADSL and only 300 in VSAT. There are around 350,000 occasional GPRS and EDGE users. Majority of the subscribers/users are urban with only EVDO and VSAT users in rural areas. Nepal has the lowest broadband penetration and the highest bandwidth costs in the South Asia Region. Proliferation of Broadband Services is taking place slowly. 60,000 new ADSL connections are to be installed within next two years. Only proliferation of broadband in rural areas will make it possible for government's policy of introducing e-governance up to the smallest rural entity called Village Development Committee (VDC). Broadband Services in rural areas are provided through Community Telecenters. For this purpose 1,500 such telecenters are planned and 300 plus have been already implemented. NTA is undertaking implementation of some 60 such multipurpose telecenters under WB assistance. With ADB assistance some 2,000 additional broadband telecenters are under consideration for rural services. Fiber backbone planned to all 75 district headquarters will allow extension of broadband services to villages and communities in rural areas through Wi-Fi and Wi-Max at a latter stage. However spectrum allocation and licensing for Wi-Max services is yet to take place. Proliferation of Broadband Services in rural areas is hindered by the absence of skilled manpower, local content and viable applications and perennial power supply problems. Need to deploy solar power system makes the service expensive and beyond the reach of the majority. Till now sustainability of broadband services in rural areas has been an issue. Various models for operating telecenters are under experiments. School, User Groups, Community Based Organizations, Post Offices and Local Governments are engaged as the Telecenter Operators. Private, Community, Government and Public-Private-Partnership (PPP) models are being implemented. Most viable model is being developed for different regions.