IT FOR E-GOVERNANCE

India which takes pride in being one of the leaders in the field of information technology, especially software, however, ranks very low when it comes to Electronic governance-E-governance as it is called. It ranks 77 in a list of 133 countries that have been indexed for E-governance. It is, therefore, obvious that an attitudinal change, a change of mindset among political rulers, bureaucrats and the people are required to usher in this tool of modern administration. Computers and kiosks alone cannot do the job, though they are important. Computer literacy, access and connectivity also play a major part in the E-governance delivery system. Some of the State governments have taken the initiative to press ahead with E-governance in their own limited way. Some of them are on experimental basis. The Centre (Govt. of India) has decided to build a citizenship database over the next 12 to 18 months. This will be some kind of citizen’s identity that would then be used for all purposes. Perhaps as the permanent identity card. The objective is to adopt the E-governance system for the delivery of key services at the Central as well as State level: Income tax, immigration, passports, insurance and banking as far as the Central services are concerned and land records, road transport, property registration, municipal services, commercial taxes and the police among the State services. The current E-governance initiatives in states such as Punjab, Maharashtra, Andhra Pradesh, Karnataka, Kerala and Tamil Nadu are concerned, they are pilot schemes. For a full extension of the services, security remains the key factor. Unless E-security is established, it would be unwise to adopt E-governance in an extensive form.

The then Deputy Prime Minister (While inaugurating the 7th National E-governance conference during November, 2003) observed that “Globally India is recognized as one of the leading providers of information technology. Yet, we are way behind in introducing IT for E-governance. It is paradoxical.” It was pointed out that E-governance would succeed only when there is a commitment to g-governance (good governance) just as g-governance becomes easier with the introduction of E-governance. Unless E-governance is backed by administrative reforms in process, procedures and systems of governance, such initiatives tend to end up as mere computerization with no tangible benefit to the citizens. Various suggestions have been made from time to make it a reality that E-governance was applied and made effective. In such a context, this chapter highlights/explains the features relating to benefits and applications of IT, models of E-governance IT inequalities, key
initiatives taken so far, why E-governance projects fail, the Singapore experience and implementation needs and finally what should be the strategy and agenda and why (justification), have been covered to make E-governance a success.

The word ‘governance’ in relation to a country, means offering the people a system, competent to provide people various facilities for a quality life. Governance also means ‘control’ and ‘authority’. Where these two are to be exercised, they should be exercised keeping in mind the interests of people. Good governance should improve the management of public resources, like the government treasury, the central bank (RBI), public sector enterprises, revenue and expenditure, public distribution system, law and order machinery and the overall administrative machinery. Good governance combines on the one hand, superior management of government machinery and public resources and a regulatory environment conducive of efficient private entrepreneurial activities on the other. This presupposes a strong, efficient, responsive and sensitive government machinery empowered with modern facilities and mindset. E-governance of electronic governance has therefore become an indispensable tool, for the public good.

IT essentially means delivery of government services and information to people using electronic means. It also implies the ability of people at large to obtain government services through electronic means, enabling access to government information and completion of government transactions on an anywhere-anytime basis. A number of advantages are derived such as effective linkages between the government and the citizens, increased transparency and accountability in government business, quality of government services. IT is based on the concept of digitisation of information. It is basically a combination of computer hardware and software and communication networks, the most popular of which are telecommunication networks. Application of IT in government thus provides an opportunity and scope for reinvention of the government.

MODELS FOR E-GOVERNANCE

The general information dissemination model is regarded as the first step in transition from traditional government to E-government. It is limited to the dissemination of government information already in public domain, to a wider public domain through the application of IT. This is achieved model, by publishing government information on the internet. The second known as ‘The critical information dissemination model’ is applied for the following purpose: publishing on the internet corruption related information, research studies, enquiry reports, reports on human rights violations, environment and climate related information to be used by farmers/citizens. The third model known as the ‘Advocacy model’ may be viewed as an aid to civil society to influence the government decision-making process. It enables public debate on issues related welfare. It fosters public debate and discussions on issues of larger concerns. The fourth model called, ‘The interactive service model’ ensures direct connectivity and linkages of people with government representatives and officials. This model is now universally used in the delivery of public services to people in developed countries. In India, the application of this model is limited.

The cost of hardware, software and networking required for universalizing to use of IT in government may be a deterring factor in pushing E-governance in a developing country like India, where electronic technology is viewed more as a luxury than a necessity for administration. IT based inequalities are expected to persist in the coming years. Another important component of information system necessary for E-governance is the human resources with necessary skills to use
the IT. The manpower problem may perhaps the most formidable challenge in the promotion of E-governance. A comprehensive restructuring and reorganisation of the existing bureaucratic system and administrative hierarchy may be necessary. One more requirement is the enactment of necessary rules and regulations. Legal sanctity to IT, based processes and transactions is critical for maintaining the credibility of the E-governance model. A legal framework is also necessary for information security and for dealing with cyber crimes in an effective manner.

**E-GOVERNANCE INITIATIVES**

The following E-governance initiatives deserve to be mentioned:

(i) A center for E-governance in India; according to ORACLE Corporation, there is growing opportunity for various E-governance applications with government embarking on the process of rapid technology adoption to facilitate better citizen centric applications. Oracle India expects a focused traction towards E-governance applications. If has announced plans to develop new facility in Hyderabad with a capacity of 2500 staff.

(ii) Andhra Pradesh and Karnataka have taken various initiatives and these states are reported to be not lagging but leading despite hurdles. It Andhra Pradesh, Cisco has implemented the ‘E-Seva’ project wherein it connected 18 citizen utility services like bill payments and property tax payments among others.

(iii) In Kerala, the Mallappuram wireless network was proposed to be completed by end of January 2004 and if the system proved successful, it was proposed to extend both the Akshaya E-learning programme as well as the wireless ‘umbrella’ to the other 13 districts before 2006. The harnessing wires technologies to bridge the ‘digital divide’ and take internet access to the world’s remote and underprivileged areas is now a global UN-endorsed mandate.

(iv) The Union budget has placed greater emphasis on taking information technology to the masses. The same is evident from the higher outlays for the National Informatics Centre, electronic governance, community information centers and for the revival of the Media Lab Asia project. The emphasis is also seen in the case of community information centers with the outlay being increased by six times to Rs. 30 crores. The CICs would provide E-mail internet access and citizen centric services through the portal cic.nic.in and web-based services such as information on agro products, hospital books and board examinations.

(v) The United Progressive Alliance government, according to Union Communication and Information Technology Minister, had drawn up a national E-governance action plan to ensure that all citizens had the access from their village economic opportunities within the country and outside. These projects were being taken up by the Centre and States for implementation in a phased manner in the next three to four years. The IT kiosks in villages, which numbered about 8,000 at present would reach the one lakh mark within 2-3 years.

(vi) The World Bank has agreed in principle to provide 4500 million for India’s National E-Governance Plan over the next four years. The bank has approved the project concept and has given the green signal to support NEGP projects, a senior economist at the bank,
Mark Dutz, said. The Department of Information Technology also proposes to bring out shortly the guidelines for capacity building for E-governance projects.

(vii) E-governance projects. The E-governance spending in India is climbing 23% per annum. It has risen from Rs. 1,500 crore in 2002 to an estimated Rs. 2,200 crore in 2003-04. According to a survey conducted by skoch consultancy services, E-services delivery has contributed to a decline in corruption. The report on on-going projects has also shown that E-governance initiatives have scored high in terms of expectation and affordability. It is the latter that has ensured the monetary benefits accrue to local bodies like panchayats, which often run these schemes at the grassroots level. The survey has highlighted schemes like Uttaranchal’s computer aided education programme ‘Arohi’, computerization to ticketing services by the Railways, Bangalore’s line on bill payment facilities kaver-e-com and the citizen’s service facilitation centre by the Kalyan Dombivli Municipal Corporation (KDMC), which is being replicated across 240 municipalities in the State.

**WHY E-GOVERNMENT PROJECTS FAIL?**

One important question, in this connection, relates to the funding of E-services. The question seems to be whether it is economical to invest in E-governance and whether governments should expect any returns from the investments made. The limited experiments made in some of the municipalities have shown good results and their revenue collections have improved with the introduction of electronic systems. The States should therefore be encouraged to switch over to E-governance on an incremental basis; they should also work with the private sector to ensure that systems security is in place. According to K. Ashok Vardhan Shetty, “The simplistic assumption that E-governance is all about technology, and not reform, is one of the main reasons why many an E-governance project fails. Only countries strong in governance and committed to reform can hope succeed in their E-government efforts.” Some of the other reasons as identified in his paper “Why most E-government projects fail” are as follows:

marketing and PR; a poorly designed website, lack of incentives and lack of trust due to issues of security and privacy. On the government side, there are major constraints, such as budgetary constraints, human resources constraints, technology risks etc.

E-GOVERNANCE STRATEGY AND AGENDA

It should be recognized that E-government is an enabler in the effort to bring about better processes, improve transparency, and reduce corruption. Yet few states are really prepared to roll out service delivery systems. Karnataka, one of the early movers, provides a classic case of initial hopes not being fully realized. The State discovered that in the absence of institutionalized procedures, many key departments have no concrete plans to introduce intelligent government; technical expertise is another area of concern. Some experts from reputed institutions, including leading management institutes serving on technical advisory panels in the state are unable to suggest electronic alternatives to complex processes followed in government. If the National E-Governance Action Plan is to succeed, it must insist on the re-engineering of government processes. The focus must be on the largely un-attended ‘back-end’ where databases of entire classes of citizens have to be created; pensioners, welfare beneficiaries, traders, applicants for licences, and agriculturists must be able to conduct E-enabled transactions without encountering rent-seeking officials. The rural India may be unable to enjoy their entitlements mostly on account of poverty, illiteracy, unemployment, absence of health care and a largely corrupt and inefficient bureaucracy. Apart from paying attention to these and uplifting the society through various economic schemes and programmes, it should be realised that it will not be proper to apply a simple cost-benefit formula in economic terms to assess the outcomes of E-government. The policy must ensure that user charges are the exception rather than the rule and where they must be levied, are highly affordable. Red tape and bribery cost the poor more.

It should also be possible to learn from the experience and policy followed by Singapore, where the island nation began its initiatives just two decades ago. It has set for itself as one of the management objective that “every system that can go online, will go online, before the targeted date”. The policy followed by Singapore was to closely connect government, business and the citizen on a single platform, reduce all paperwork by encouraging online transactions with adequate security. Singapore’s effort was successful because of clear lines of management starting with an apex national commission. A sequence of steps followed, such as computer penetration, creation of segregated databases for people, business and land, broadband infrastructure, integration of all sectors and the will to do away with paperwork. An E-literate citizenry was a key component of the island’s E-governance strategy.

INTERNET USAGE

The Telecom Regulatory Authority of India (TRAI), which has started preparing a new policy for increasing the penetration of Internet and broadband, however has admitted that much needed to be done and this is because the situation was far from satisfactory in terms of capacity, subscriber base and growth rate of Internet and broadband usage. Current Internet subscriber base is only 0.4 per cent of the population and the growth rate of internet subscribers has become low; the usage of broadband services is on an even smaller scale—a mere 0.02 per cent. The number of internet connection per 100 persons is 58, 11 and 2 for Korea, Malaysia and China, as compared
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to India’s 0.4 per cent. On the other hand, the world over, Internet has evolved into a platform for free speech that is being accessed by nearly 850 million users. Its influence and impact on communications, commerce and intellectual freedom is unprecedented. Governments are therefore advised to set for themselves a deadline to create the basic infrastructure for wider access of the internet and adopt policies that would bridge the digital divide. It is believed that despite a national focus on E-governance and information and communication technology for development, few initiatives have become truly interactive. In order to widen the user base, a basket of measures such as attractive reductions in telephone charges for dial-up access, the commissioning of a national internet exchange and incentives for Internet service providers to offer diverse access choices is urgently called for.

REVIEW OF IT ACT

An expert committee has recently been constituted for an in-depth review of issues relating to the Information Technology Act, 2000. The committee which is ceased of the matter relating to suitable legislation for data protection (privacy), is understand to be in favour of widening the ambit of computer offences as defined under the legislation. There is a feeling the computer has been narrowly defined in the Act and hence computer offences too have not been defined in a manner that would reflect current technological advancements. The expert committee was setup in the wake of controversy generated over the arrest of Baazee.com CEO in December, 2004 in a case involving the sale of a sexually explicit clip on the auction site. The committee therefore is re-looking at ways of balancing the rights of enforcement authorities with the rights of those who could be potentially accused. In the United States, for instance the practice is that an auction site is given an opportunity to take an offending product off its website once intimated and if the site fails to take off, action is taken against it. On the issue of data protection and data privacy, the committee is believed to be looking at issues such as how data should be collected by entities such as hospitals, telephone companies and banks, and also how it should be used. The idea is to reassure Indian public that their information and data relating to credit card, mobile phone and even IPO issue application, is safe. While the E-Bay case is the proximate reason for a revise of the IT Act, the terms of reference of the expert committee, however, are wider and includes such vital areas as growth of E-commerce, cyber security, technology neutrality, regulation of cyber cafes and data protection. Public scrutiny of the recommendations have also been advocated so as to pave the way for a wider debate on these issues. While the IT Act covers digital signatures in detail, the technology has progressed towards biometrics and other means of recognition, creating the need to accommodate them in the IT Act. Similarly, in the area of security, notions of crime that did not go beyond backing of websites would be hopelessly inadequate of address the issues of impersonation or mis-representation that is easily possible in the cyber space. Similarly, in the area of data protection and privacy, India will have to create a well-defined regime by making suitable changes in the IT Act. In so far in concerns BPO (Business Process Outsourcing) work, a proper data protection law would not only help to sustain the buoyancy in the low-end such as a third party BPO market in telemarketing or insurance claims processing, but also create growth opportunities in the high-end areas such as banking or pharmaceuticals. The high-powered working committee, to improve the penetration of personal computers in Indian homes, has made a key recommendation that organizations such as the Indian Institute of Technology, the Indian Institute of Science or the Centre for Development of Advanced Computing (C-DAC) design an “India PC” at a price of Rs. 9,000 and
this is a welcome step. The mobile telephone revolution has raised the aspiration levels of consumers and that has provided hope for manufacturers of personal computers. Several multinationals are already in the fray to exploit the emerging market. The proposal for a low cost computer, perhaps could be worked out more successfully, through government-private partnership. The committee, in the short term, has recommended allowing home computer purchase as a deduction under the Income-Tax Act, multiple financing options from public sector banks at special rates, or making computer financing a part of priority sector lending, like agriculture. The Korea’s experience in enhancing Internet and broadband penetration through fiscal concessions may be emulated. But since PC penetration is also linked to Internet usage the user experience in a home dial-up situation has been so poor that there has been a marked reluctance to invest in PCs even in cities. The government has therefore been advised to take the initiative in improving bandwidth availability to all Internet service providers.

CONCLUSION

Dr. A.P.J. Abdul Kalam, the President has also suggested that a comprehensive E-governance framework should be evolved in the country, which would entail setting up an E-governance commission or an empowered board—with a view to ensure transparency in citizen-government interface. It would also entail setting up a multipurpose secure, authentic national citizen ID database as the primary data for all E-governance services and online issue of citizen ID cards seamlessly. Dr. Kalam also stressed the need for language—independent operating systems, databases and application servers and mail servers in Indian languages. He added that since India has proven core competence in IT and communications, the possibility of success to bringing in transparency in administration through E-governance is possible. Finally, to quote, “This is my dream. Is it possible? If possible when shall we have it? Can we provide governance to our one billion people?”