

E-México: Mexico's Digital Community Centers

In December the first, 2000, the president of Mexico, Mr., Vicente Fox Quesada, gave instructions to the Minister of Transport and Communication, Mr. Pedro Cerisola y Weber, "To initiate at the short time the e-Mexico Project, with the purpose that the information and communications has a true national character and reduce the digital divide between governments, enterprises, homes and individuals, reaching the last corner of our country".

The objective of the e-México National System is to reduce the existing digital divide within the different population country sectors. Its design has to answer the communication needs through the information highways. This will allow the people to get access to numerous opportunities for individual and collective development, the integration of the individuals and society groups, strength democracy and citizen's participation, the increment of knowledge, training and competitiveness, and an increase of development opportunities and life quality.

The specific objectives are:

- Develop the e-México National System as a technological system with social content to have a profound impact on the society development.
- Eliminate access barriers to information and services, and reduce the Mexicans digital divide between them and with the rest of the world, that through the voice, images and data transfer, allow the access to the information delivering, related with education, culture, health, government, commerce and other services.
- Achieve the integration of the more isolated communities with the rest of the country, by making accessible to all population the use of new Information and Communication Technologies in their multiple purposes increasing their development.
- Integrate efforts with the different government levels, social and private sectors as well as telecommunications network operators of the country
- Encourage digital connectivity services penetration and promote the use of information and communication technologies, and computers industry among the population, especially in the localities with less development level and where more attention to their impulse is required and integrate them to the new economy.
- Accelerate the historical tendencies in the services penetration in telecommunication and informatics with the objective to guaranty the social services and contents coverage of the e-México National System and to be present in all the national territory and at the reach of population.

In order to achieve these e-México National System objectives three central themes were defined, which principal strategies will be traced to do this important job. The three central themes are: Connectivity, Contents and Systems.

CONNECTIVITY

The connectivity focal point is about the integral communication services offering, carrying the access to internet to all country populations, using the actual coverage and encouraging the development of network operators. This concept has been materialized at the beginning through the Digital Community Centers (CCD's), who are the principal vehicles that will allow connecting the localities of the country.

To take charge of the e-Mexico National System connectivity, an initial budget has been designated through the e-Mexico trust fund, assigned to the System for the hiring of the necessary services and equipment, with the objective that the high speed digital connectivity will be provided at least in all the 2443 Municipalities, through the CCD's, that at the end of the year 2004 will be a total of 7200.

CONTENTS

The contents theme is an indispensable part of the system, because the offered connectivity has to be used for the distribution and the access to all kind of digital content that offer to all population: data, information, knowledge and services that can be traduced into a manifest benefit. The contents strategy is about four fundamental pillars in the themes of:

e-Learning

Provides new access options to education, training, stimulating the learning as a way for the integral development of the Mexicans, promoting that the education is accessible for any person, respecting its identity and cultural environment.

e-Health

Put integral health information available to all Mexican population, contributing to human and public health institutions development, eliminating the access barriers to information and health services.

e-Economy

Promotes the digital economy development process, en the enterprises, especially in the micro, small and middle ones, to increase Mexican economy competitiveness; as well as develop the society digital enlightenment, particularly in the consumers.

e-Government

Is an strategy for all the Mexicans in federal, regional, states and municipal aspect can make use of their rights to be informed and has access to the services offered by the state, through the e-México System Mega Net. In the same way, the state, through the different government instances, assume its obligation to guaranty the access of all population, to information, use and acknowledge of the diverse public services that he offers.

SYSTEMS

Through the computing programming systems the contents and their applications that through the connectivity are available to general population, are been integrated. To achieve this, an e-México National System Portalization platform was developed, these platform embrace the e-Health, Discpacinet and e-Migrants portals, as well as eleven virtual communities and the web services development platform.

THE DIGITAL COMMUNITY CENTERS, COMMUNITARIAN DEVELOPMENT ENGINES

The creation of the e-México CCD's is a Ministries joint effort and will have the power to proportionate services that will generate multiple benefits in the communities where they be installed, by combining the use of computing equipments interrelated with all the world through ground or satellite connectivity.

This way the population who has access to these services will know, use and experience the benefits of the computing systems use, by making possible the communication with peoples of other communities with in the country and abroad, receiving new knowledge, improve their cultural, educational, health, social and economical level. And These also increment the possibilities of business expansion and reach to the government entities.

In the first phase, the CCD's network has 3200 access points; those are installed in educational centers, particularly schools and libraries, in medical centers, particularly in rural and urban clinics, in Municipal Palaces of the more advanced municipalities in the automation activities, and in telegraph and postal offices among others. For the second and third phases, in this year of 2004, 4000 additional CCD's are being installed, this will add a total of 7200 network access points to Internet in the national territory.

Since every government department any of the Federal, State and Municipal levels, has well defined their circles and action spheres, as well as the delimitation of its functions and responsibilities with the society, for the interaction between them, when there is no formal dependency, becomes necessary the establishment of collaboration agreements that juridical fundament and establish the mutual agreement of responsibilities for each part for the obtaining of a common wealth.

For these reason, in June 5 of 2002, a collaboration agreement has been formalized for the establishment the high speed connectivity display, where the participants was:

- Public Education Ministry (SEP) - Latin American Institute of Educational Computing (ILCE)
- Social Development Ministry (SEDESOL)
- Health Ministry (SSA)
- National Federalism Institute (INAFED)
- Education for Life and Job National Council (CONEVyT) - Adults Education National Institute (INEA)

This agreements basically set the agreement for the Transport and Communications Ministry (SCT) offer by himself or through others, the high speed connectivity for the CCD's and the other agencies will install and operate in the different attention levels and in the ambit of their own competences.

TECHNOLOGICAL SOLUTION MODEL

For its technological advantages, with in the ambit of national geography, a satellite coverage solution model was selected. A pilot proves plan was made to verify their characteristics and validate its possible application, giving the following conclusions:

- Satellite communication is actually the way to get in less time to all localities in the National territory.
- The capable technology to integrate a satellite network for giving access to Internet is available in the market at reasonable cost.

Giving that the federal government through the SCT has the satellite capacity as part of the social coverage program of Mexican and foreign satellite operators, a support scheme was achieved and allowed to offer the satellite connectivity to all the country at a low cost, because as was referred the spatial segment represents an important part of the cost of a satellite connectivity service.

FUNCTION FO THE DIGITAL COMMUNITY CENTERS AND SERVICES OFFERED

The e-México CCD's are government places as: schools, libraries, hospitals, municipal palaces, post and telegraph offices, and other specific places, which has computing and communication equipment to proportionate to the general public, different computing and communication services offered at accessible prices for all socioeconomic levels in the benefited populations.

For the e-México CCD's function, each one has the adequate and perfectly prepared personal for their activities development This personal has as their principal functions, the operation, management, maintenance of the center, the security coordination, and the users tailoring and training, into specific and adequate schedules, for bring access to the public.

Within the services provided the most important are:

- Internet access
- Computing equipment services with divers programs
- Equipment use tailoring and training into the center installation
- Computer files impression and Internet information

COMMUNITY MEMBER'S PARTICIPATION WITH THE E-MÉXICO DIGITAL COMMUNITY CENTERS

One of the most important characteristics in the e-México National System is the integration of all the country communities, through the CCD's, because one of his objectives is to make the benefits that represent their own development available, through the proportionate services.

Into the community members that can make use of the CCD's services, the most representative are:

- All level and age students can make use of the equipment to develop their academic formation, through the use of Internet for consulting information and accessing diverse courses.
- Teachers for their academic updating and consulting educational contents for their functions development
- Housewives or entire families, who require information about available services in their communities, municipalities, states or any place in the country, regarding health, culture, sports, entertainment, main public services and others,.
- Business man and commerce people that through the Internet may offer their products or services to the community and the other users that have access to the e-México web portal pages.
- The federal, state and municipal authorities can inform every kind of issues that can be of social interest.

The e-México National System offer a great opportunity to promote a bigger equity in a relatively short time and a low cost answering to one of his basic functions “Develop the population wealth by achieving a high social and political impact”.

At this stage they are beginning with citizen attention services in the aspects of education, economy and government and other community services. The purpose of the e-México National System, are eminently of social character, because its essential objectives are:

- Promote connectivity and digital contents generation (data, sound and images) through the internet, at low prices, among those individuals and families with low incomes living in urban and rural communities with more than 400 inhabitants, this way support their integration to social and economical development and reducing the digital divide existing now a days in México.
- Capacitate in the use of new information technologies and knowledge spreading to those community families, focusing on self-sufficiency to consult and generate contents through internet supporting their particular educational, cultural, health and economic development needs.
- Make available to all population, information about provided by the federal, state and municipal governments, for increase transparency and equity and decrease the time required and efficiency of the citizen solicitations.

The e-México National System is a program with a high participative content, here concur, the efforts of the federal government through the SCT, providing the basic infrastructure for the operation and the efforts of other agencies about contents provided through the network, but also the private initiative and society who may have a low cost modern communication media, accessible in all the country to communicate every region among them and with the world having access to information technology benefits generated every day.

That is why in a Digital Participation model different state and municipal programs has been added to the e-México National System. Some of them are:

States:

Puebla, Colima, Tamaulipas, Querétaro, Morelos, Hidalgo, between others.

Municipalities:

Pueblo Nuevo, Durango; San Pedro Garza García, Nuevo León; Guadalajara, Jalisco; Delegación Miguel Hidalgo, Distrito Federal; Tijuana, Baja California.

Additionally, different non governmental and international organizations are developing communitarian connectivity schemas in schools and support and attention centers.

This is a project with no concentrated budget, but with the conjunction of efforts, where each participant realize his own duties within their competitiveness field and resources, searching for the maximum efficiency and participation of different sectors to generate economies of scale and make use of the information and communication technologies development as a tool to amplify the coverage and service quality.

Web page:

www.e-mexico.gob.mx