#### ment and Services for the Telecommunications Sector

# THE PROGRAM FOR THE MODERNIZATION OF TELECOMMUNICATIONS

The development of a modern telecommunications infrastructure is one of the highest priorities of the Mexican government. In the late 1980s, the government embarked on a series of sweeping economic reforms, including new policies of trade liberalization, privatization and deregulation. It recognized that telecommunications would be a critical element in promoting sustained economic growth. At that time, there were less than six telephones for every 100 persons, and the average waiting time for a new line was three years. Fax service was severely limited by import restrictions, and other "value-added" services such as paging and voice mail, were virtually non-existent.

The program for the modernization of telecommunications was published at the end of 1989 by the Secretaria de Comunicaciones y Transportes (SCT), Secretariat of Communications and Transportation. This program was designed to promote the modernization and expansion of the

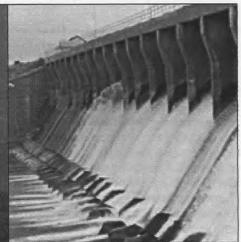


The Department of Foreign Affairs and International Trade has prepared this summary report on the **Equipment and Services for the Telecommunications**Sector. It has been published by Prospectus Inc. under the Access North America Program, along with other sector profiles and summaries on business opportunities in Mexico. It is available from:

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© Minister of Supply and Services Canada 1994 Cat. No. E73-9/26-1994-1E telecommunications network. It also



telecommunications network. It also liberalized the regulatory framework in order to encourage private investment and foster competition.

The modernization program included a budget of US \$1 billion over the 1989 to 1994 period. The state-

owned telecommunications company, called *Telecomunicaciones de México (TELECOM)*, was created to provide the basic communications infrastructure. *TELECOM* is a stateowned monopoly under the constitution. *Teléfonos de México (TELMEX)*, the state-owned telephone company,

#### **HIGHLIGHTS**

Mexico's telecommunications sector offers major opportunities for Canadian manufacturers of all types of telecommunications equipment:

- the development of a modern communications infrastructure is a major government priority, supported by important public programs;
- the national telephone company, Teléfonos de México (TELMEX), has been privatized and has been given a mandate to dramatically expand and modernize the telephone system;
- the operation of satellite and microwave systems, as well as
  other basic communications infrastructure has been split off from
  the Secretaria de Comunicaciones y Transportes (SCT), Secretariat
  of Communications and Transportation into Telecomunicaciones de
  México (TELECOM), the state-owned telecommunications company;
- the telecommunications system is being upgraded to incorporate digital and fibre optics components;
- hundreds of new radio and television licences are being issued to private sector operators;
- eight cellular telephone concessions have been granted to Mexican companies operating in partnership with foreign companies, of which two deals include Bell Canada; and
- foreign firms can now hold up to 49 percent of Mexican companies licensed to provide private telecommunications services to corporations.



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was privatized opening the market for telecommunications services to competition by foreign firms. Price supports were removed, and market pricing was established.

The top priority of the modernization program is to improve basic infrastructure. More than half of the budget is allocated to the federal microwave and fibre optic network operated by Telecomunicaciones de México (TELE-COMI, the state-owned telecommunication company. About 30 percent is devoted to improved satellite communications. The Secretaria de Comunicaciones y Transportes (SCT), Secretariat of Communications and Transportation, awarded contracts to Hughes Communications International and Aerospace to build and launch two satellites in 1993 and 1994 for the new Solidaridad satellite system. This infrastructure improvement, along with the issuance of 400 new radio and television licences, has stimulated considerable private sector activity. The modernization program anticipates that private spending on telecommunications will total US \$30 billion over the decade.

# THE MEXICAN TELECOMMUNICATIONS SECTOR

Teléfonos de México (TELMEX), the national telephone company, which was privatized in 1990, has the exclusive right to install, maintain and operate the public telephone network. It provides local, national and long distance telephone services, including both voice and data transmissions. In 1992-1993, TELMEX introduced new value-added services including fax mail, Centrex, telemarketing, voice mail and videotext. TELMEX has annual revenues exceeding US \$6 billion.

Private, majority-owned Mexican companies can be licensed to provide private communictions services between corporations. There are reportedly more than 1,000 private data networks in use, with almost 40,000 terminals. Some of these networks use small-scale VSAT satellite systems.

All other telecommunications services in Mexico are provided by Telecomunicaciones de México (TELECOM), the state-owned telecommunications company. This organization operates the basic telephone infrastructure, including satellite earth stations, marine radio and data communications. It also provides telephone service to small towns. TELECOM is owned by the Secretaria de Camunicaciones y Transportes (SCT), Secretariat of Communications and Transportation.

In addition to providing telecommunications services through TELECOM, the SCT also issues permits and licences for private sector telecommunications activities. These include radio and television broadcasting, mobile radiotelephones (including cellular phones), cable television, private data networks, amateur radio and paging systems.

## Telecomunicaciones de México (TELECOM)

Telecomunicaciones de México (TELECOM), the state-owned telecommunications company, was created in 1989 to take over the services formerly provided by the Directorate of Telecommunications of the Secretaría de Comunicaciones y Transportes (SCT), Secretariat of Communications and Transportation. It also merged with the national telegraph company. TELECOM provides a range of communications services including telegrams, telex, fax, money orders and electronic mail as well as microwave and satellite communications.

TELECOM operates one of the two branches of the Federal Microwave Network, with the other handled by Teléfonos de México (TELMEX), the national telephone company. TELECOM is responsible for Mexico's satellite system, which is the most advanced in Latin America. The Morelos I and Morelos II satellites, launched in 1985, were recently

replaced by Solidaridad I and Solidaridad II. These satellites operate in the C, KU and L bands and cover the southern United States, Central America and part of Brazil, as well as Mexico. TELECOM also operates a packet switching network called TELEPAC, and the national telex network.

#### Teléfonos de México (TELMEX)

Teléfonos de México (TELMEX), the national telephone company, was sold by the government of Mexico to private investors in December 1990 for approximately US \$1.8 billion. The new owner is a group of investors led by Grupo Carso, which includes participation from Southwestern Bell and France Telecom. In May 1991, another US \$2 billian worth of non-voting stock was sold on international stock exchanges. By law, foreign ownership of the company is limited to 49 percent.

Although the government is now a minority partner, it retains control over the telecommunication sector through the regulatory system and through supervision of TELMEX operations. The sector is regulated under the General Communications Law, and the Secretaria de Comunicaciones y Transportes (SCT), Secretariat of Communications and Transportation, approves the tariffs for telephone service. In addition, the concession granted to TELMEX, which runs for 30 years, will be reviewed every five years.

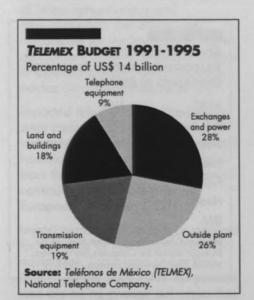
It is a condition of the TELMEX concession that it dramatically improve and expand the telephone network and it must publish a series of five-year plans that detail its modernization goals. In spite of dramatic increases since 1990, Mexico's telephone density is still one of the lowest in the world, with just under nine lines per 100 persons in 1993 as compared to at least 20 per 100 in most developed countries. Density is projected to increase to about 11 lines per 100 persons by 1995.



TELMEX is required to provide longdistance service to all towns with more than 500,000 inhabitants by the end of 1994. During the first five years the company will install four million new terminal lines. TELMEX is a participant in the Columbus II transatlantic submarine cable which is due to go into operation this year. It also operates part of Mexico's Federal Microwave System.

The first TELMEX five-year plan, which covers the period 1991 to 1995, calls for total spending over the period of US \$14 billion. More than a third of this is expected to be spent on imports.

| TELMEX SYSTEM EXPANSION                     |         |         |
|---|---------|---------|
|   | 1990    | 1995    |
| Trunk lines (percentage                     | 330,041 | 700,000 |
| 'digital)                                   | 55      | 85      |
| Toll switches (percentage                   | 137     | 250     |
| digital)                                    | 41      | 85      |
| Microwave<br>channels<br>(percentage        | 489,281 | 700,000 |
| digital)                                    | 21      | 50      |
| Fibre optic length                          | h 4,134 | 5,935   |
| Source: Teléfonos d<br>National Telephone ( |         | MEX),   |



#### **Cellular Telephone Service**

Concessions for cellular telephone service have been granted by the Secretaría de Comunicaciones y Transportes (SCT), Secretariat of Communications and Transportation, in each of Mexico's eight regions. Each of them was granted to a Mexican company associated with a foreign partner. Bell Canada is the foreign partner in two of the regions and one of the other systems is using Northern Telecom equipment. As of 1994, there are estimated 400,000 cellular customers in Mexico.

#### **Television and Radio** Broadcastina

There are seven television networks operating more than 500 stations in Mexico. Three of the networks are operated by Grupo Televisa, which is the largest producer of Spanishlanguage television programs in the world. It distributes its products in more than 50 countries and its Galavisión network is available in 20 American states. The Mexican government owns and operates more than 200 television stations, but it plans to sell some of them to the private sector.

There are more than one million cable TV subscribers in Mexico. The largest of these is Cablevisón, owned by Grupo Televisa with almost 200,000 subscribers. The major U.S. networks are among the roughly 25 channels available to cable customers.

Radio-broadcasting licences are granted by the Secretaria de Comunicaciones y Transportes (SCT), Secretariat of Communications and Transportation, on either a commercial or non-commercial basis. There are almost 800 AM stations and close to 300 FM stations. There are also about 30 short-wave stations.

#### THE MARKET FOR **EQUIPMENT AND SERVICES**

The Mexican market for telecommunications equipment was estimated at US \$2.3 billion in 1992, and was

expected to increase to US \$2.5 billion in 1993. Market growth is projected at 10 percent for each of 1994 and 1995. There is a related market for professional services needed for network design, system integration, maintenance and training. However, there are no reliable estimates of the size of the services market.

Import penetration was estimated, for 1992, at more than 60 percent. The United States accounts for close to half of the import market. Japan and Sweden are the other major suppliers with 14 percent and 11 percent market shares respectively. Canada 's share is estimated at just over two percent of the import market.

The efforts of Teléfonos de México (TELMEX), Mexico's recently-privatized national telephone company to modernize Mexico's outdated telephone system offers major opportunities for Canadian producers of all types of telephone equipment and services. This includes valueadded services such as voice mail. facsimile and data communications. Increasingly, the market is shifting towards digital and fibre optic equipment. TELMEX will have to expand Mexico's telephone system by ten times to reach Canada's level of service, so this is a long-run opportunity.

#### MARKET OPPORTUNITIES IN MEXICO FOR TELECOMUNICATIONS EQUIPMENT

Telephone switching equipment **PBXs** 

Data transmission equipment Customer premise equipment

Private networks

Fibre optics

Satellite support services

Cellular telephone systems

Digital switches

TV and broadcasting equipment Test and maintenance products



#### COMPAÑÍA NACIONAL DE SUBSISTENCIAS POPULARES

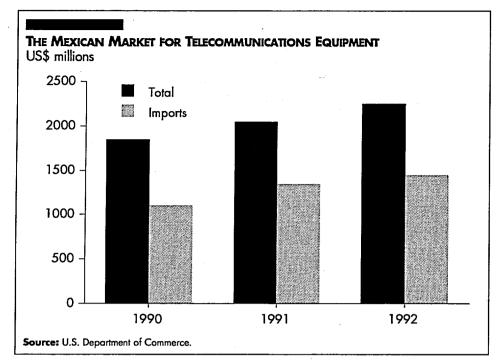
(CONASUPO) is a large purchaser and distributor of agricultural and food products which operates an extensive chain of retail stores. This organization uses mainframe computers to manage inventories and control distribution, and requires telecommunications to transfer this information between locations throughout Mexico.

**EDUCATION INSTITUTIONS** and many large corporations have been using the Morelos Satellite System to distribute educational video programs on private networks. There are more than 3,000 corporations in Mexico which operate their own training programs. Delivery systems for distance education are seen as a good prospect for the future.

#### COMPETITION

The Mexican telecommunications industry is highly competitive. Local production, which supplied 80 percent of apparent consumption for several years, dropped to less than 40 percent in 1992 and is expected to fall further as foreign companies take advantage of the government's trade liberalization policies.

There are about 70 manufacturers



There is a growing demand for equipment needed for the private networks operated by large corporations. In addition, the Secretaría de Comunicaciones y Transportes (SCT), Secretariat of Communications and Transportation, has allocated 250 new television broadcast licences and 150 radio licences. These licences will be issued exclusively to Mexican citizens, creating an important new market for manufacturers of broadcasting equipment.

#### **CUSTOMERS**

Government agencies have historically been the major purchasers of telecommunications equipment and services. This pattern is beginning to change, however, as the government's privatization policies have moved some major users, such as Teléfonos de México (TELMEX), the recentlyprivatized national telephone company and the banks, into the private sector. Foreign companies located in the maquiladora zones are also important users of telecommunications. Presently, about 60 percent of total sales are to private companies, with the rest accounted for by government.

Major users of telecommunications equipment and services include the following:

**PETRÓLEOS MEXICANOS** (PEMEX) is the state-owned oil company. It has offices and plants throughout Mexico and maintains contact between them, as well as with customers throughout the world, using voice and data telecommunications.

COMISIÓN FEDERAL DE ELECTRICIDAD (CFE), the Federal Electricity
Commission, has responsibility for generating and distributing electricity to Mexico. The CFE used the Morelos Satellite System to monitor, control and synchronize its generating and distribution networks.

THE BANKING SYSTEM is now in the process of privatization. There are about 20 banks in Mexico, in addition to the government-owned development banks. The banks use telecommunications for inter-branch communications, transactions with other banks, credit authorization and for security and confidentiality systems.

**INSTITUTO MEXICANO DEL SEGURO SOCIAL** (IMSS), the Mexican Institute for Social Security, operates more than 2,200 rural clinics. The IMSS is beginning to use the Solidaridad

## SOME INTERNATIONAL TELECOMMUNICATIONS COMPANIES OPERATING IN MEXICO

AT&T

MCI

Bull

NEC

General Electric

lectric Northern Telecom

Ericsson

Philips

Fujitsu

Siemens

Hitachi

U.S. Sprint

**IBM** 

Source: Cardine Verut. Market Study on the Mexican Market for Computers and Software, Mexico City: Canadian Embassy, 1994.



of telecommunications equipment in Mexico employing some 11,000 people. They concentrate in relatively few product areas, including transmission equipment, cable and radio systems.

#### THE REGULATORY **ENVIRONMENT**

The Secretaría de Comunicaciones y Transportes (SCT), Secretariat of Communications and Transportation, regulates all telecommunications activity. Through its agency, Telecomunicaciones de México (TELECOM), the national telecommunications company, the SCT operates the basic telecommunications infrastructure, including trunk lines, microwave and satellite systems. Teléfonos de México (TELMEX), the recently-privatized national telephone company, operates under a concession from the SCT that gives it the exclusive right to operate the public telephone system. Majority-owned Mexican companies are licensed by the SCT to offer private telecommunications services to corporations.

The branch of the Secretaria de Comunicaciones y Transportes (SCT) responsible for telecommunications is the Deputy Secretariat for Communications and Technological Development. It includes the General Directorate of Standards and Communications Policies and the General Directorate for Promotion of Telecommunications and Teleinformatics. The SCT is also responsible for the Instituto Mexicano de Comunicaciones, Mexican Institute of Communications, which provides advice on communications policy.

Imported telecommunications equipment must conform to international standards and in some cases special homologation permits are required from the SCT. Mexico's telecommunications standards are primarily European, including CCITT.

Import permits are no longer required for any type of telecommunications equipment. Tariff rates under the NAFTA range from 10 to 20 percent and are being phased out under that

agreement.

#### MARKET ENTRY STRATEGIES

Establishing a local presence in Mexico is a key part of any strategy to enter the market. Mexican buyers want to do business with companies that have demonstrated a long-term commitment, including a capability for after-sale's service. Canadian companies can accomplish this by entering into an agreement with a Mexican agent or by establishing joint ventures with Mexican partners. Some larger companies, such as Northern Telecom have set up their own sales and manufacturing operations in Mexico.

Mexican manufacturers of telecommunications equipment tend to specialize in relatively limited product lines and many of them are interested in technological partnerships with foreign companies that can fill gaps in their offerings. Such partnerships can combine Canadian technological expertise with the market knowledge and local contacts of the Mexican partner.

The Canadian Embassy in Mexico City and Mexican trade associations can help in locating potential agents or partners. Attending trade shows in Mexico is another good way to make contacts and learn about the market.

#### WHERE TO GO FOR Assistance

#### KEY CONTACTS IN CANADA

The Department of Foreign Affairs and International Trade (DFAIT) is the Canadian federal government department most directly responsible for trade development. The InfoCentre is the first contact point for advice on how to start exporting; it pravides information on export-related programs and services; helps find fast answers to export problems; acts as the entry point to DFAIT's trade information network; and can provide companies with copies of specialized export publications.

#### **InfoCentre**

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(613) 944-4000

Fax: (613) 996-9709 FaxLink: (613) 944-4500

The Commercial Division of the **Embassy of Canada** in Mexico City promotes trade with Mexico. There are several trade commissioners at the Embassy, and there is a satellite office in Monterrey. Trade Commissioners can provide a range of services including introducing Canadian companies to potential customers in Mexico, advising on marketing channels, assisting those wishing to participate in trade fairs, helping identify suitable Mexican firms to act as agents, and compiling credit and business information on potential foreign customers.

Note: to telephone Mexico City, dial: 011-52-5 before the number shown below. For contacts in other cities in Mexico, consult the international code listing at the front of your local telephone directory for the appropriate regional codes or contact the international operator.

Commercial Division The Embassy of Canada in Mexico Schiller No. 529 Col. Polanco Apartado Postal 105-05 11560 México, D.F. México

Tel.: 724-7900 Fax: 724-7982

Canadian Business Centre Centro Canadiense de Negocios Av. Ejército Nacional No. 926 Col. Polanco 11540 México, D.F. México

Tel.: 580-1176 Fax: 580-4494

Canadian Consulate Edificio Kalos, Piso C-1 Local 108A Zaragoza y Constitución 64000 Monterrey, Nuevo León México

Tel.: 344-3200 Fax: 344-3048



#### International Trade Centres

have been established across the country as a convenient point of contact to support the exporting efforts of Canadian firms. Co-located with the regional offices of Industry Canada (IC), the centres operate under the guidance of DFAIT and all have resident Trade Commissioners. They help companies determine whether or not they are ready to export; assist firms with marketing research and market planning; provide access to government programs designed to promote exports; and arrange for assistance from the Trade Development Division in Ottawa and trade officers abroad. Contact the International Trade Centre nearest you.

#### The World Information **Network for Exports (WIN**

**Exports)** is a computer-based information system designed by DFAIT to help Canada's trade development officers abroad match foreign needs to the capabilities, experience and interests of more than 30,000 Canadian exporters. To register on WIN Exports, call: (613) 996-5701.

The Market Intelligence Service provides Canadian business with detailed market information on a product-specific basis. The service assists Canadian companies in the exploitation of domestic, export, technology transfer, and new manufacturing investment opportunities. The intelligence is used by Conadian business in decisions regarding manufacturing, product development, marketing, and market expansion. The information includes values, valume and unit price of imports, characteristics of specific imports (e.g. material, grade, price, range, etc.), names of importers, major countries of export, identification of foreign exporters to Canada, Canadian production, Canadian exports, and U.S. imports. Two-thirds of the clientele for this service are small businesses. Call: (613) 954-4970.

Canadian International **Development Agency** 

An important possible source of financing for Canadian ventures in Mexico is the special fund available through the Canadian International Development Agency (CIDA) under the Industrial Cooperation Program or CIDA/INC. CIDA 's Industrial Cooperation Program provides financial contributions to stimulate Canadian private-sector involvement in developing countries by supporting long-term business relationships such as joint ventures and licensing arrangements. INC supports the development of linkages with the private sector in Mexico encouraging Canadian enterprises to share their skills and experiences with partners in Mexico, and other countries. A series of INC mechanisms help enterprises to establish mutually beneficial collaborative arrangements for the transfer of technology and the creation of employment.

Industrial Cooperation Division Canadian International Development Agency

200, Promenade du Portage Hull, PQ K1A 0G4

Tel.: (819) 997-7905/7906 Fax: (819) 953-5024

**Export Development** Corporation (EDC)

EDC is a unique financial institution that helps Canadian business compete internationally. EDC facilitates export trade and foreign investment by providing risk management services, including insurance and financing, to Canadian companies and their global customers.

EDC 's programs fall into four major categories:

- export credit insurance, covering short and medium-sized credits;
- performance-related guarantees and insurance, providing coverage for exporters and financial institutions against calls on various performance bonds and obligations normally issued either by banks or surety companies;

- foreign investment insurance, providing political risk protection for new Canadian investments abroad: and
- export financing, providing medium and long-term export financing to foreign buyers of Canadian goods and services.

Ottawa (Head Office) 151 O'Connor Street Ottawa, ON K1A 1K3 Tel.: (613) 598-2500

Fax: (613) 237-2690

International Financing Institutions, including the World Bank and the Inter-American Development Bank, provide funds to Mexico for a wide variety of specific projects. These banks can provide details of upcoming projects and identify the Mexican executing agencies.

The **Embassy of Mexico**, Mexican Trade Commissioners in Canada, and Mexican consulates can provide assistance and guidance to Canadian companies in need of information about doing business in Mexico.

Embassy of Mexico 45 O'Connor Street, Suite 1500 Ottawa ON K1P 1A4

Tel.: (613) 233-8988 Fax: (613) 235-9123

#### **Business and Professional Associations**

The Canadian Council for the Americas (CCA) is a non-profit organization formed in 1987 to promote business interests in Latin American and Caribbean countries. The CCA promotes events and programs targeted at expanding business and building networking contacts between Canada and the countries of the region. It also publishes a bimonthly newsletter.





#### The Canadian Council for the Americas (CCA)

Executive Offices, 145 Richmond Street West Third Floor

Toronto, ON M5H 2L2 Tel.: (416) 367-4313 Fax: (416) 367-5460

#### **Canadian Exporters'** Association (CEA)

99 Bank Street, Suite 250 Ottawa, ON K1P 6B9 Tel.: (613) 238-8888 Fax: (613) 563-9218

#### Canadian Manufacturers's Association (CMA)

75 International Boulevard Fourth Floor Etobicoke, ON M9W 6L9

Tel.: (416) 798-8000 Fax: (416) 798-8050

#### The Canadian Chamber of Commerce (CCC)

55 Metcalfe Street, Suite 1160 Ottawa, ON K1P 6N4 Tel.: (613) 238-4000 Fax: (613) 238-7643

#### Forum for International Trade and Training (FITT)

155 Queen Street, Suite 608 Ottawa, ON K1P 6L1 Tel.: (613) 230-3553 Fax: (613) 230-6808

#### **Language Information Centre**

240 Sparks Street, RPO Box 55011 Ottawa, ON K1P 1A1 Tel.: (613) 523-3510

#### **Canadian Standards** Association (CSA)

178 Rexdale Blvd. Rexdale, ON M9W 1R3 Tel.: (416) 747-4000 Fax: (416) 747-4149

#### Standards Council of Canada

45 O'Connor Street, Suite 1200 Ottawa, ON K1P 6N7 Tel.: (613) 238-3222

Fax: (613) 995-4564

#### KEY CONTACTS IN MEXICO

#### **National Telephone Company**

Teléfonos de México S.A. de C.V. (TELMEX) Parque Vía No.190

Col. Cuauhtémoc 06599 México, D.F. México

Tel.: 222-9650, 535-2041

Fax: 203-5104

#### Secretariat of Communications and Transportation

Secretaría de Comunicaciones v Transportes (SCT) Subsecretaría de Communicación y Desarrollo Tecnológico Av. Universidad y Xola, Cuerpo C Piso 1 Col. Narvarte 03020 México, D.F. México

Tel.: 519-5201 Fax: 559-8708

#### **National Telecommunications** Company

Telecomunicaciones de México **ITELECOM** Eje Central Lázaro Cárdenas No. 567 Piso 11, Ala Norte Col. Narvarte 03020 México, D.F. México Tel.: 519-4049, 530-3492

Fax: 559-9812

Instituto Mexicano de Comunicaciones Conjunto de Telecomunicaciones (CONTEL) Av. de las Telecomunicaciones s/n Col. Guadalupe del Moral 09300 México, D.F. México

Tel.: 613-5264, 613-0165

Fax: 613-6922

#### Mexican Institute for Social Security

Instituto Mexicano del Seguro Social (IMSS) Reforma 476, Piso 6 Col. Juárez 06600 México, D.F. México

Tel.: 211-0018 Fax: 211-2623

#### **National Oil Company**

Petróleos Mexicanos (PEMEX) Av. Marina Nacional 329 Col. Huasteca 11311 México, D.F.

México Tel.: 250-2611 Fax: 625-4385

#### **Federal Electricity Commission**

Comisión Federal de Electricidad (CFE)

Río Ródano No. 14 Col. Cuauhtémoc 06598 México, D.F. México

Tel.: 207-3962/3704, 553-7133

Fax: 553-6424

Compañía Nacional de Subsistencias Populares (CONASUPO) Av. Insurgentes 489, Piso 4 Col. Hipódromo Condesa 06100 México, D.F. México

Tel.: 272-2614/0472, 271-1131

Fax: 272-0607

#### Secretariat of Commerce and **Industrial Development**

Secretaría de Comercio y Fomento Industrial (SECOFI), Subsecretaria de Comercio Exterior Alfonso Reves No. 30 Col. Hipódromo Condesa 06170 México, D.F.

México

Tel.: 729-9256/9257 Fax: 729-9343

#### **Business and Professional Associations**

#### **Mexican Association of** Engineers in Electric and **Electronic Communications**

Asociación Mexicana de Ingenieros en Comunicación Eléctrica y Electrónica (AMICEE) Balderas No. 94 Col. Centro 06070 México, D.F.

México

Tel.: 510-3142 Fax: 512-5300



#### National Chamber of Electrical Manufacturers

Cámara Nacianal de Manufacturas Eléctricas (CANAME) Ibsen 13

Col. Chapultepec Polanco Apartado Postal 10527 11560 México, D.F. México

Tel.: 280-6658/6042

Fax: 280-1966

#### National Chamber of the Electronic Industry and Electronic Communications

Cámara Nacional de la Industria Electrónica y de Comunicaciones Eléctricas (CANIECE) Culiacán 71 Col. Hipódromo Condesa 06100 México, D.F. México

Tel.: 264-0808

Fax: 264-0808 ext. 250

## National Chamber of the Radio and Television Industry

Cámara Nacional de la Industria de Radio y Televisión Horacio No. 1013 Col. Chapultepec Polanco 11560 México, D.F.

Tel.: 726-9909, 254-1833

Fax: 545-6767

México

### National Chamber of the Cable Television Industry

Cámara Nacional de la Industria de Televisión por Cable Monte Albán No. 281 Col. Narvarte 03020 México, D.F. México

Tel.: 682-0173/0298 Fax: 682-0881

#### Technical Radio Transmission Engineers Association

Asociación Mexicana de Ingenieros Técnicos en Radiodifusión Eugenia No. 240, Despacho 4 Col. Narvarte 03020 México, D.F. México Tel.: 539-1596

#### Mexican Banks

#### **Mexico's Central Bank**

Banco de México Tacuba No. 4, Piso 1 Col. Centro 06059 México, D.F.

México

Tel.: 512-5817, 237-2378

Fax: 237-2370

Banco Nacional de México S.A.

(Banamex)

Av. 5 de Mayo No. 2, Piso 5

Col. Centro

06059 México, D.F.

México

Tel.: 512-2266/5817 Fax: 510-9337 Banco de Comercio (Bancomer) Av. Universidad No. 1200 Col. Xoco 03339 México, D.F. México

Tel.: 621-3653/5922 Fax: 621-3265, 604-1111

Banca Serfin Insurgentes Sur 1931, Piso 8 Col. Guadalupe Inn 06120 México, D.F. México

Tel.: 662-0914, 726-9200

ext. 9204/9369

Fax: 726-9201, 662-9911

Banco Nacional de Obras y Servicios Públicos (Banobras) Viena No. 4, Piso 5 06600 México, D.F. México

Tel.: 627-0785/0786 Fax: 705-6217

#### **Mexican Companies**

Grupo Carso Av. de las Palmas 265 Col. Lomas de Chapultepc 11000 México, D.F. México

Tel.: 520-8838

Fax: 520-8838 ext.124

Grupo Televisa Av. Chapultepec No. 28 Col. Doctores 06720 México, D.F. México

Tel.: 709-2314/3333 Fax: 709-3596



