Atlantic Council

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Mexico's Energy Reform: Ready to Launch

Mexico's initial, constitutional-level energy reforms, were passed on December 18, 2013. With the signing on August 11, 2014 of twenty-one implementing, or secondary, laws impacting oil, gas, power and energy finance, this constitutional framework has been translated into law.

According to a report released by the Atlantic Council's Adrienne Arsht Latin America Center and authored by former State Department Special Envoy and Coordinator for International Energy Affairs David Goldwyn, Mexico's recently-enacted energy reform will "transform Mexico into a major energy and industrial power."

KEY OBJECTIVES

- Generate more hydrocarbons at a lower cost, allowing private companies to complement PEMEX's investment through contracts or licenses for the exploration and extraction of oil and gas.
    - Oil production is expected to increase by nearly half a million barrels per day by 2018 and another half a million per day by 2025.
- Modernize the country's refining, transportation and storage infrastructure by allowing private companies to invest, but only under the fair and transparent regulation of Mexico's government.
- Double Mexico's installed gas generation capacity by 2028, to 110,000 MW, largely fueled by the addition of over 50,000 MW of natural gas-fired capacity.
- Create 2 million jobs by 2025 and lower the cost of gas and electric bills.
    - Less expensive fuel will also have a significant economic impact on the broader economy: adding 1 percent to economic growth by 2018 and 2 percent by 2025, improving Mexico's overall fiscal outlook, anPd decreasing electricity prices.
- Ensure international standards of efficiency, transparency and accountability, while effectively combating corruption in the energy sector.
- Reduce financial, geological and environmental risks in the exploration and extraction of oil and gas.

HYDROCARBON AND NATURAL GAS REFORM LAWS

- Conversion of PEMEX from a monopoly to a state-owned productive enterprise (SPE) with special legal status and required internal reforms.
- Enactment of a Round Zero process wherein PEMEX can request to keep some of its existing acreage, although SENER will decide what it may keep.
    - In Round Zero, PEMEX was granted its full request to keep its 1P (proven) reserves and 2P (proven and probable) reserves. It will also retain 67 percent of its 3P (proven, probable and possible) reserves, and will retain ownership of its midstream strategic assets.
- In Round 1, PEMEX will migrate to new forms of contracts and may take on new commercial partners approved by CNH. New acreage and acreage PEMEX is not allowed to keep will be subsequently auctioned in Round One and subsequent bids.
    - PEMEX will be required to share seismic information and divest its gas distribution programs. By January 2016, it will lose its monopoly on retail sales of gasoline and diesel, and by January 2017 the one on the import and export of crude oil, gasoline and diesel.
    - Companies have been invited to comment to the government on Round One acreage through November 2014. Contracts will be awarded on a rolling basis between May 2015 and November 2015, with 169 blocs expected to be awarded.

- Allowing individual contracts to contain customized terms, including requirements for national content in the procurement of goods and services for the sector.
- Near complete opening of mid and downstream oil and gas to private investment.
- Strengthening of independent self-funded regulators (CNH and CRE), with strict rules for transparent regulation of the sector, along with new regulators to manage the gas pipeline system.
- The laws limit vertical integration of natural gas companies and install the Energy Regulatory Commission (CRE) to provide oversight of all retail gas marketing. CRE will enforce open access provisions for both state-owned and private infrastructure.

Key Agencies of Administrative Supervision

- SENER will play the lead role in upstream policy formation: determining specific areas to be made available and the schedule of release; choosing which of the contract models to apply to which contract, approving the non-fiscal terms of the contract and development plans; and recovering abandoned areas.
- Hacienda will determine the fiscal terms to apply to each contract and will participate in audit functions.
- The National Hydrocarbons Commission (CNH) will be the primary interface for private companies entering Mexico and for PEMEX, and will be responsible for executing and managing exploration and production contracts. CNH will also manage the ongoing oversight of all contractors.
- The National Agency for Industrial Safety and Environmental Protection, part of the Environment Ministry, will regulate safety and environmental concerns across the energy sector.
- The new independent National Natural Gas Control Center (CENAGAS) will manage the national integrated system of gas transportation and storage, and for planning its expansion.
- CRE has permit jurisdiction over transportation, storage, distribution, compression, liquefaction, decompression, regasification, marketing and sale of crude oil, oil products, and natural gas, as well as ongoing monitoring of those activities.

Contracts & Profit Allocation

- Introduction of four types of contracts for exploration and exploitation of hydrocarbons, including service provider contracts in cash, profit-sharing contracts based on revenues, production-sharing contracts based on production, and/or licenses to explore and drill.
    - The constitution will still prohibit oil concessions, considered the most liberal kind of access.
- The contracts granted must comply with anti-corruption standards. Contracts shall employ mechanisms to ensure maximum transparency, may be inspected by any citizen, and will be subject to a system of external audits.
- Mexico will keep its oil profits, that is, all of the benefit obtained from oil and gas production once companies are paid to cover their capital and operating costs, in accordance with predetermined and transparent rules.
- Though constitutional reform paved the path for near complete opening of mid- and downstream segments of the energy sector, PEMEX will continue to play a leading role due to its legacy assets.
    - Numerous regulatory provisions are in place to encourage competition, keep PEMEX in check and transition to market pricing schemes attractive to investors.
    - CRE holds broad authority to regulate PEMEX pricing in oil, products and natural gas until a competitive market develops.
- Common and unique fiscal terms for each form of contract are provided, offering Hacienda great discretion to assess adjustment factors to make a contract attractive or costly.
    - All companies will pay the general corporate tax rate.
    - Royalties will be assessed on actual production and will be indexed to market prices.
    - Hacienda will assess an “adjustment mechanism” which could be low to incentivize investment in high risk areas, or higher to adjust for very high yield fields or those with very low geologic risk.

  - Contractors will have to pay surface rent on a monthly basis for holding the acreage.
  - New exploration and extraction taxes were introduced, intended to shift some of the rent directly to Mexican states and municipalities.
  - All payments except taxes will be directly sent to the Mexican Oil Fund, responsible for disbursing funds.
- A national target of 25 percent local content in the sector by 2015 and 35 percent by 2025, with specific and binding targets determined on a contract-by-contract basis.
  - It applies to and gas, except that deep and ultra—deepwater projects will have separately tailored targets determined by SENER and the Ministry of the Economy. Specific, binding targets for all upstream projects will still be determined on a contract-by-contract basis.
  - Capable Mexican companies will enjoy an additional competitive advantage by being given explicit preferential treatment under the law.

ELECTRICITY REFORM LAWS

- Private investment in generation is permitted, with the exception of nuclear energy, and electricity may be imported and bid into the wholesale market.
  - Current barriers to entry, including requirements to negotiate sales ("offtake") contracts with CFE or seek approval for bilateral contracts are eliminated.
  - CFE's existing and new generation assets will compete on a level playing field with new entrants.
- CFE retains all of its existing generation assets. Existing contracts and projects in advanced development for Independent Power Producers (IPPs) will be respected and continued.
  - CFE may now contract with private sector providers to introduce technology and expertise.
- CFE will be subjected to strict vertical separation for its activities of generation, transmission, distribution and commercialization; generation will be separated horizontally to foster free competition; and distribution will be separated regionally.
- Price alone will determine the priority of dispatch—the source of power used first by the ISO to sell to customers—meaning, the generator that produces power most inexpensively gets to sell first.
- The National Energy Control Center (CENACE), currently a part of CFE, will become a decentralized public agency with a constitutional mandate for the planning, control, and operation of the national electricity system.
- A wholesale electricity market will be created to allow trading among market participants that will include generators, qualified users and electricity suppliers.
  - Qualified users and providers (including CFE) can contract directly or buy and sell electricity through the market.
- CFE is required to guarantee continuity of electricity supply to basic service users in the event that their supplier goes out of business, until their contract is transferred to another supplier.
- Load centers will be required to ensure that a minimum percentage of their energy consumption is generated by sources with clean energy certificates.
- Laws anticipate a transition period of 1-2 years before the wholesale market is up and running.

Key Agencies of Administrative Supervision
- Policy, regulation and monitoring of the electricity sector will be headed by SENER and CRE.
- CRE will define tariff regulations, issue rules for the interaction of generators and distributors, issue permits and model contracts, impose sanctions, authorize auctions, establish interconnection requirements and resolve disputes, and generally regulate the market.

- SENER will serve as regulator for the first year of operation of the wholesale market, to allow CRE time to complete its transition. It will establish principles for awarding certificates to clean generation sources, including hydro, wind, solar, geothermal, biomass, and cogeneration.
- CENACE will publish models used to calculate wholesale prices and to develop transmission expansion plans.
- SERNA will publish SPE contracts. In the first trimester of every calendar year, it will determine the requirements of acquisition of energy certificates for the following three calendar years.

RECOMMENDATIONS

- Looking ahead, with major political compromises now behind them, Goldwyn's report argues Mexico must take six urgent steps to assure the success of the reforms:
    - Ensure fiscal and contract terms are competitive. Show market savvy in tailoring terms to differentiate the diverse risk profiles of acreage offered, return long-term value and be competitive.
    - Let PEMEX evolve. PEMEX must be allowed to become an efficient company and not the government's policy instrument. It must be allowed to improve efficiencies and allocate capital according to its own strategic planning.
    - Build Regulatory Capacity. CNH, CFE, CENAGAS and CRE must grow their internal staffs to manage the increased workload and promulgate new implementing regulations quickly.
    - Issue implementing regulations quickly. All of the rules for oil and gas exploration, energy transportation, and safety and environmental protection must be tailored for a system with nongovernmental actors.
    - Make the power sector strategy clearer. The Mexican government should lay out a roadmap with clear milestones and timetables to make the power sector strategy clear, including the publication of: the target date for open access rules; the pricing regime for transmission and gas pipelines; the plans for the build out of transmission and pipeline capacity; and selection of an external contractor to support CRE and CENAGAS.
    - Create a security strategy for energy investment areas. The government needs to publicly describe how it will secure pipelines, areas of onshore exploration and land bases for deep water development.
- According to Goldwyn's report, if Mexico seeks cooperation, the United States should be prepared to help in three key ways:
    - Facilitate regulatory harmonization on North American energy integration. Mexico's energy reforms will eventually invite further integration with the United States and Canada. These requirements beg for clear rules for swaps of oil and re-exports of oil and gas.
    - Fast track gas pipeline border crossings. The United States should facilitate gas trade with Mexico, which is a near-term priority since increasing its domestic production will take some time. The Federal Energy Regulatory Commission should increase its capacity to issue cross-border pipeline permits given the likelihood of increased Mexican demand for US gas.
    - Offer technical assistance if requested. The United States should make its own regulators privately available to engage with Mexican officials and provide lessons learned and assistance to Mexican agencies and regulators as they begin efforts to draft regulations and implement the reforms.
- With a constitutional mandate, a comprehensive legislative framework and courageous leadership and governance, the countdown is over. Based on Goldwyn's analysis, Mexico is ready to launch its energy reform.