

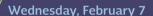




The Federal Government, through the Ministry of Energy, and the Tamaulipas state government are pleased to invite you to the

# UNCONVENTIONAL OIL AND GAS DEVELOPMENT IN TAMAULIPAS: CHALLENGES AND OPPORTUNITIES

February 7-8, 2018.



9:00 Registration

9:45 Presentation.

- -Andrés Fusco, Energy Commissioner of Tamaulipas.
- -Aldo Flores-Quiroga, Deputy Minister of Energy for Hydrocarbons.
- -Video: What are unconventional resources and hydraulic fracturing?
- 10:15 Plenary Session 1. The potential of unconventional resources for Tamaulipas.

The Burgos basin has prospective oil and gas resources in unconventional deposits estimated at 14 billion barrels of oil equivalent. These resources exceed by 55% the estimates for Eagle Ford (9 billion), one of the main production basins in the United States, and could satisfy Mexico's present demand for natural gas for 22 years.

In this panel, the participants will discuss the development potential of Tamaulipas' unconventional resources, their implications for the state's economy and their insertion in the North American regional hydrocarbons market.

- -Juan Carlos Zepeda, National Hydrocarbons Commission (CNH).
- -Ernesto Ríos Patrón, Mexican Petroleum Institute (IMP).
- -José Antonio Escalera Alcocer, Pemex Exploration and Production.
- -Ricardo Ferreiro, Mexican Hydrocarbons Companies Association (AMEXHI).
- -Juan Garoby, Vista Oil and Gas.
- -Jonathan Garrett, Wood Mackenzie.

**Discussant:** Isabelle Rousseau, *El Colegio de México*.

- 11:45 Inauguration with the interventions:
  Pedro Joaquín Coldwell, Minister of Energy
  and Francisco García Cabeza de Vaca, Governor of Tamaulipas.
- 12:30 Signing of SENER Government of Tamaulipas Agreement.









# UNCONVENTIONAL OIL AND GAS DEVELOPMENT IN TAMAULIPAS: CHALLENGES AND OPPORTUNITIES

### Wednesday, February 7

13:00 Plenary Session 2. Regulation.

The development of a modern hydrocarbon industry is based on a regulation that adopts the highest international standards of risk management and on the capacity of the State to implement it without exception. The Mexican regulatory agencies are prepared to face the challenge of exploration and production in unconventional resources.

The participants will discuss what the challenges of regulating a dynamic and constantly innovating industry will be and what recommendations can be shared by regulators with more experience in this field across the world.

- -Carlos de Régules, Energy and Environmental Safety Agency (ASEA).
- -Sergio Pimentel, CNH.
- -Leslie Savage, Railroad Commission of Texas.
- -Drew Nelson, Environmental Defense Fund.
- -Carlos Mena, Centro Mario Molina.

Discussant: Juan Carlos Belausteguigoitia, ITAM.

#### 14:30 Lunch.

16:30 Plenary Session 3. Business opportunities and value chains.

Mexico seeks to develop efficient and competitive value chains in its oil industry. The success of the unconventional industry in Tamaulipas depends on the ease with which national and international companies can do business, adopting the same standards of quality and efficiency, and on how companies can interact with higher education institutions in the state to promote the training of experts and technological innovation.

Participants in this panel will discuss how companies can rely on the oil and gas sector local content policy to create value, how the three levels of government can create a favorable business environment for the development of an unconventional oil and gas industry and what lessons Texas' dynamic industrial system offers.

- -Rogelio Garza, Deputy Minister for Industry and Trade,
- Ministry of Trade.
- -Paulo Carreño, ProMéxico.
- -Héctor Moreira, CNH.
- -Thomas Tunstall, UT San Antonio.
- -Roberto Blanco, Newpek ALFA.
- -Rogelio Montemayor, Coahuila Energy Cluster.
- -Jesús Villarreal, Economic Development Secretary of Tamaulipas.

Discussant: Gonzalo Monroy, GMEC.









### UNCONVENTIONAL OIL AND GAS DEVELOPMENT IN TAMAULIPAS: CHALLENGES AND OPPORTUNITIES

### Thursday, February 8

09:00 Introduction.

Rolando Pablos, Texas Secretary of State.

09:15 Plenary Session 4. Infrastructure.

To reach an efficient scale, the unconventional oil and gas industry in Tamaulipas needs a transportation infrastructure network that allows drilling supplies to be delivered to the well head and production to the markets. The required investments demand collaboration between private sector firms and the state and federal governments.

Participants in this panel will discuss the infrastructure needs of Tamaulipas state, alternatives to finance the construction of roads, ports, logistics networks and pipelines for oil and gas, international best practices to acquire rights of way, and how to guarantee open access to gas transportation infrastructure.

- -Oscar Callejo, Deputy Minister for Infrastructure, Ministry of Communications and Transportation (SCT).
- -Elim Luviano, SCT.
- -David Madero, National Natural Gas Control Center (CENAGAS).
- -Lorena Patterson, Mexican Natural Gas Association.
- -Ana B. Rausch, International Right of Way Association.
- -César Ortega, Lewis Energy.
- -Cecilia del Alto, Public Works Secretary of Tamaulipas.

Discussant: David Shields, Energía a Debate.

#### 10:45 Plenary Session 5. Water use.

Hydraulic fracturing is the technique used to produce oil and gas in unconventional deposits. The fracture of a well requires between 10 and 20 million liters of water, equivalent to between 4 and 8 Olympic pools, depending on its depth and length.

This panel will answer questions about the availability of water in Tamaulipas and the uses to which it is intended, the intensity of water use in the unconventional oil and gas industry, the distributive effects for other uses that will continue to be a priority and the conservation of the water cycle.

- -Rubén Chávez, National Water Commission (CONAGUA).
- -Mike Paque, Groundwater Protection Council.
- -Scott Perry, Department of Environmental Protection, State of Pennsylvania.
- -Luis Eduardo de Ávila, ETEISA.
- -Luis Javier Pinto Covarrubias, Water Commission of Tamaulipas.

**Discussant:** Juan Carlos Belausteguigoitia, ITAM.

12:15 Coffee break.









# UNCONVENTIONAL OIL AND GAS DEVELOPMENT IN TAMAULIPAS: CHALLENGES AND OPPORTUNITIES

### Thursday, February 8

12:30 Plenary Session 6. Social and environmental impact assessment.

Mexico's regulatory framework is endowed with several mechanisms to identify oil industry-related social and environmental impacts. These regulatory instruments mandate guidelines for the design of social management and impact management plans. Moreover, they clearly define responsibilities among the firms and regulators within the sector.

The speakers will explain the importance of the social and environmental impact assessment instruments, and will elaborate on the role different regulators play in identifying and managing such risks.

- -Ismael Orozco, Ministry of Energy (SENER).
- -Rodolfo Salazar, SENER.
- -Raúl Gómez, ASEA.
- -Gilberto Estrella, Environment and Urban Development of Tamaulipas.
- -Gerardo Peña, Social Welfare Secretary of Tamaulipas.

Discussant: Miriam Grunstein, Brilliant Energy.

14:00 Plenary Session 7. Surface occupation, benefits and land uses.

The successful development of unconventional resource deposits requires the granting of social license, i.e. long-term legal agreements on the legitimate uses of the land, including use of third parties' properties. Mexican legislation establishes a regulatory framework for this purpose, but it is necessary to clarify the legal-administrative implementation process that leads to finalized contracts.

Panel participants will explain the importance of social impact assessment, surface occupation rules and dispute resolution mechanisms, and potential economic benefits in the local economy.

- -Elizabeth Castro, SENER.
- -Claudio de la Cerda, SENER.
- -Xavier Gaytán, National Assets Administration and Appraisal Institute (INDAABIN)
- -Fernando Aguilera, Agrarian Attorney General's Office.
- -Jesús Rodríguez Dávalos, Rodríguez Dávalos Abogados.
- -Eric Suzan, Energy Projects Land Use Office, Ministry of Agrarian, Territorial and Urban Development (SEDATU).
- -Ariel Longoria García, Rural Development Secretary of Tamaulipas. **Discussant:** Andrés Fusco, Energy Commissioner of Tamaulipas.

15:30 Signing of the Mexican Petroleum Institute-Tamaulipas State University Collaboration Agreement.

