GOVT. INTERVENTION IN THE NATURAL GAS MARKET

ARGENTINA ‘S PENDULUM CASE

Raúl García

Dec 12, 2017
This presentation is about Govt. Intervention in the gas market since the 90’s till today. It is based on a report being elaborated for the IoA

- A definition of regulation/intervention in markets.
- The cases of intervention analyzed:
  - Structuring/organization of markets and allocating roles;
  - Substituting markets and piling up roles/regulations.
- The periods: the reforms of the 90’s and integrating energy markets.
- The gas supply crisis of 2004; substituting the price mechanisms.
- Present Govt. administration and the transition toward deregulated markets.
- Lessons learned. Can we move to a different dynamics?
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• A definition of regulation/intervention.
  • Alfred Khan’s view.

• Allocation of competence/roles among stakeholders.
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Reforms of the 90’s

• Initial conditions and setting up scene for the reforms.
• Allocating roles among private/govt.
• Contracts and Obligations to serve from public utilities.
• Gas supply/demand balance and market forces.
• Price signals and resource allocation.
• Main results.
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Results from the Reforms of the 90’s

- Size and evolution of the ‘deregulated gas market’ for large users: it grew from few transactions in the deregulated market in 1993 to 60% of domestic/export gas sales 10 years later; in quantity of contracts: 25 contracts in 1993 and 1,520 contracts in 2001;
- Exports represented 17% of domestic gas supply;
- In 2001, industries contracted 61% of their demand on a firm basis, power generators only contracted 27%, a mix of interruptible/firm contracts.
- Reserves almost doubled in 10 years; and production increased by 50% in the same period.
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Gas Production and Proved Reserves

Argentina - Gas Production and Proved Reserves (1988-2016)
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Gas Market Opening - Deregulated gas market. International cases

Selected International Cases – Market Opening

<table>
<thead>
<tr>
<th>Country</th>
<th>Wholesale Market</th>
<th>Retail Market</th>
<th>Total</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Stages</td>
<td>Years</td>
<td>Stages</td>
</tr>
<tr>
<td>Argentina</td>
<td>4</td>
<td>12</td>
<td>-</td>
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<tr>
<td>United Kingdom</td>
<td>9</td>
<td>2</td>
<td>3</td>
</tr>
<tr>
<td>Australia-NSW</td>
<td>4</td>
<td>5</td>
<td>1</td>
</tr>
<tr>
<td>Spain</td>
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<td>4</td>
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<tr>
<td>Italy</td>
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<td>1</td>
</tr>
<tr>
<td>Australia-Victoria</td>
<td>3</td>
<td>3</td>
<td>-</td>
</tr>
</tbody>
</table>

Source: own elaboration.
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Argentine – Case on Market Opening

<table>
<thead>
<tr>
<th>Market opening</th>
<th>Consumption Threshold</th>
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</thead>
<tbody>
<tr>
<td>Rules</td>
<td></td>
</tr>
<tr>
<td>Dec 1995</td>
<td>Optional (since privatization, dec 92) &gt;350 MCFD</td>
</tr>
<tr>
<td>Dec 2000</td>
<td>Optional (since privatization, dec 92) &gt;175 MCFD</td>
</tr>
<tr>
<td>July 2005</td>
<td>Mandatoy (until July 2005) &gt;17,5 MCFD</td>
</tr>
<tr>
<td>Dec 2010</td>
<td>Mandatoy (since July 2005) &gt;17,5 MCFD</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Users (In number)</th>
<th>Bundled</th>
<th>Unbundling</th>
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</thead>
<tbody>
<tr>
<td></td>
<td>Medium Users</td>
<td>Large Users</td>
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<td>Dec 1995</td>
<td>44</td>
<td>356</td>
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<tr>
<td>Dec 2000</td>
<td>87</td>
<td>300</td>
</tr>
<tr>
<td>July 2005</td>
<td>102</td>
<td>99</td>
</tr>
<tr>
<td>Dec 2010</td>
<td>-</td>
<td>-</td>
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</tbody>
</table>

<table>
<thead>
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<th>Volume (In MMCFD)</th>
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<td>Bundled</td>
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</tbody>
</table>

Source: own elaboration.
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- The macro crisis of 2002.
- The Emergency Law (from 2002 till today).

  - Pesification of transactions, the tariff freeze, the suspension of pass-through rules.
  - De-contracting and ‘mutation’ of roles (obligation to supply shifts from distributors to producers).
  - The supply/demand imbalance.
  - Replacing market signals and economic pricing.
  - A ‘potpourri’ of measures; priority to allocate gas.
  - All the way until 2015..., results so far
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• Gas curtailments: from almost none in 2001 to an average of 20 MMm3/d;

• Gross gas production fell from 50 B M3/year in 2004 (unsustainable) to 40 B M3/year.

• Reserves (proven) were cut in half in 10 years (2002/2012).

• Imports increased (maximum today is near 34 MM m3/d in LNG and 17-20 pipeline gas from Bolivia, totaling near 50-54 MM m3/d or 40% of gas consumption;

• Direct national government subsidies to the energy sector scaled up from circa 500 MM USD in 2005 to 15 B USD in 2013 (30 x); and to the gas sector from 300 MM USD in 2006-7 to 6 B USD in 2013 or 40% of energy sector subsidy.
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Consumption per sector and total unrestricted demand
Period 2001-2013

Source: own elaboration.
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Curtailment to gas exports to Chile. Period 2004-09.

Restricciones de Gas desde Argentina

% respecto de valores nominados

Restricciones Gdo GasAndes
Restricciones Total Chile
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- The way forward... from new initial conditions.
- Painting one room... means repairing and painting all the house.
- Toward market deregulation, reallocation of roles and enforcement of Laws 24.076 and 24.069.
  - Main issues.
  - Main measures.
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NG end user rates. Sept 2016- Dec 2017

NG Rates to End Users

Source: Enargas. Own elaboration
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Lessons from Market Intervention

• Starting point in energy reforms. Macro situation: the big issue before any structuring intervention.
• Allocation of roles among stakeholder avoiding conflicts of interest.
• Economic energy pricing and contracting all along the gas chain.
Government intervention through price controls bring short term benefits to customers and votes to politicians.

But the devil is just around the corner. Sooner or later energy objectives are not met, supply/demand imbalances become evident and energy relative prices have to be changed.

In other words, economics 101 that ‘politicians’ pay little attention to.
Each regulatory environment faces its own obstacles and challenges in market liberalization processes. The government can play both a structuring and a supervisory role to ensure that competition develops.

Government intervention through price controls bring short term benefits to customers and votes to politicians.

But the devil is just around the corner. Sooner or later energy objectives are not met, supply/demand imbalances become evident and energy relative prices have to be changed.
Removing price controls and removing subsidies is certainly more difficult under both political and economic terms. It effects negatively on consumers in the short term and brings benefits in the medium term.

Possibly a very useful advice/lesson from regulatory experience is:

- Do not establish price controls and unrestricted subsidies which do not correct but worsens market imbalances
- and let the market and regulatory mechanisms work these out.
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The way forward

• The macro and micro problem to be tackled simultaneously!!

• Is the Government on the right path (measures) to recreate full operation of the market with extended contracting?

• Piece meal or overall approach for gas and electricity sector?
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