# Dynamics of Industrial Consolidation: Mergers & Acquisitions in the Argentinean Electricity and Gas Sector

By Marc Petz, David A. Edgar, Bryan K. Temple and Klaus-Dieter Maier Dynamics of Industrial Consolidation

Industrial consolidation is a global mega trend that evolved during the last three decades. Privatisation, market liberalisation, new technologies and globalisation are the key drivers for the transformation processes – also in the energy industry. These drivers allowed new growth opportunities in new or emerging markets. While competitors seek to strengthen their market position, their underlying strategies reveal distinct and potentially differing degrees of performance.

The volume and number of international large-scale mergers increased and new multinational champions gained momentum (Graeme 2002). According to the industrial logic, the big players in the merger endgame focused on their core competences. The champions followed the theories of growth to realise economies of scale, scope and density (Panzar and Willig 1981; Chandler 1990).

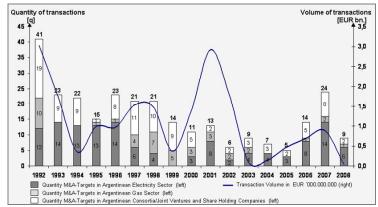
#### The Argentinean M&A Dynamics

Argentina was one of the first countries that privatised the gas and electricity sectors and created - from a regulatory point of view - a perfect market structure design. Argentina accomplished the main

goals set before privatisation: Attracting foreign investors and improving the infrastructure. Especially, in the electricity sector the generation capacity was extended by restructuring the existing infrastructure and building new plants to meet increasing demand.

The consolidation dynamics in Figure 1 illustrate the transaction development from 1992 to 2008 in several phases: The consolidation process started the privatisation of the state-owned companies in the year 1992, followed by the (electricity wholesale) market liberalisation in 1994.

The graph of the deal volume hit rock bottom at the following events: 1994/1995 'Tequila Crisis', 1998/1999 and 2002/2003 'Argentina Crisis', 2008 'Global Finance Crisis'. The only crisis-exception is the 'Argentinean Finance Crisis' in the year 2001: During that period, mayor acquisitions and divestures, portfolio restructuring and larger mergers took



Source: Own illustration, Global M&A Energy Database
Aalen University/Glasgow Caledonian University)

Figure 1

Argentinean M&A Dynamics 1992-2008

place (compare Appendix). The biggest deal took place in 2002 when the Brazilian Petrobras restructured its shares and made an investment transfer of its Argentinean entity PECOM with an amount of EUR 1.1 bn..

The industry's overall performance on sales measured in local currency achieved continuous growth according the increase of gas supply and production. This is due to the regulation with fixed the prices. The installed capacity remained the same and had to satisfy an increasing demand. On the other hand, the companies were unable to invest into expansion of the installed capacity. The massive drop of net sales and net income in 2002 is explained by a profound deterioration in social and economic conditions suffered in Argentina by the end of 2001, accompanied by high political and economic instability: 'The Argentina Crisis'.

Since then the government focused on low energy prices to nurture industrial recovery. This was a resounding success with the country notching up five years of growth but was total disincentive for new energy sector investment (Webber 2008:2). Consequently, the gas sector did not recover compared to the net income of the years 1993 and 2008.

## Conclusions

Firstly, after privatisation a combined set of economic determinants drove institutional and economic change, which created a friendly environment for foreign and new investors. The Argentinean government achieved in about EUR 8 bn. (ca. USD 9.6 bn.) from the sales of their state-owned enterprises (GdE, AyE,

\*Marc Petz is a PhD candidate at Glasgow Caledonian University. David A. Edgar is a professor and Bryan K. Temple a senior lecturer at Glasgow Caledonian University and Klaus-Dieter Maier is a professor at Aalen University.

See footnotes at end of text.

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SEGBA, ESEBA, provinces)<sup>2</sup> due to electricity and gas privatisation<sup>3</sup> from the year 1992 to 2000<sup>4</sup>.

Different crisis made a challenging environment for the companies involved in the sector during the years of reform. The government regulated domestic prices and tariffs and raised pressure on the established energy groups after the 'Argentina Crisis'. This happened predominantly through Argentinean investors, which was widely seen as a way of the government to regain influence over the previously state owned companies in the electricity sector. Consequently, foreign investors divested and exited the Argentinean electricity market. Nevertheless, the activities in the period from 2004 to 2008 remain mainly multi- and international (about 73% of the 59 transactions).

Leveraging the analysis into pre-crisis (1992-2001) and post-crisis (from 2002) the Argentinean companies benefited by the impact of M&A, but not in terms of higher income. The quantity of Argentinean companies in the mid- and downstream sector did not change since the reshape of the gas sector. This is due to the competition design of the framework that does not allow the Argentinean firms to merge horizontally or vertically. The crisis affected the Argentinean economy gravely. The international companies had mainly to struggle with high inflation and the regulated performance of the overall gas industry.

Comparing the dynamics of industrial consolidation with other regions, it remains remarkable that there can be observed a common trend: The privatisation was the initial process driver of the M&A activities in the most regions. Also, market liberalisation was accompanied by increasing M&A activities. There are some differences in the Argentinean market observed in comparison to other consolidation profiles:

- 1. The average deal size is comparatively small in an international context.
- The fixed tariffs, the market structure design and the competition framework for example limiting the economies of scale according the usual consolidation dynamics for future, pivotal investments
- 3. Also remarkable are that the transactions only seem to know one direction: There have been nearly no mentionable cross-boarder transaction activities from Argentina to other countries. Internationalisation in the Argentinean case was more likely to sell-off Argentinean assets to foreign investors
- 4. In addition, contrary to the global trend, wind parks (on-/off-shore) or solar parks played absolutely no role in those transactions.

### **Footnotes**

- <sup>1</sup> Remark: The data refers to targets in the Argentinean Electricity (up-, mid-, downstream) and Gas (mid-, downstream) sector and related Bidder Consortia, Joint Ventures and Holding Companies. Date of last revision: 2011/01/30
- <sup>2</sup> Without YPF-Privatisation sale, which amounted about USD 2 bn. (see DB Research 1999). Argentinean privatisation sales amount in total USD 23.8 bn. from 1990-1999.
- <sup>3</sup> Refers to electricity (up-, mid-, downstream) and gas (mid-, downstream) sector privatisation according research design.
  - <sup>4</sup> This reflects in total 75 privatisation sales (= transactions) from 1992-2000.
- <sup>5</sup> Remark: The data refers to targets in the Argentinean Electricity (up-, mid-, downstream) and Gas (mid-, downstream) sector and related Bidder Consortia, Joint Ventures and Holding Companies. Date of last revision: 20110130

#### References

Ente Nacional Regulador del Gas (2006). Informe Anual ENARGAS Año 2006. (English translation: Annual Report ENARGAS year 2006). Inversión Pública Y Servicios Ministro De Planificación Federal. Buenos Aires, Ente Nacional Regulador del Gas.

Baum, Heinz-Georg; Coenenberg, Adolf G.; and Günther, Thomas (1999). <u>Strategisches Controlling</u>. (<u>English translation</u>: <u>Strategic Controlling</u>). <u>Stuttgart</u>, <u>Schäffer-Poeschel Verlag</u>. <u>ISBN</u>: 978-3791013046

Bondorevsky, D.; Petrecolla, D. (2001). The Structure of Natural Gas Markets in Argentina and Antitrust Issues in Regional Energy Integration. <u>Sustainable Development Department Technical Paper Series</u>. Sustainable Development Department Infrastructure and Financial Markets Division. Washington, Inter-American Development Bank.

Chandler, Alfred E., Jr. (1990). <u>Scale and Scope. The Dynamics of Industrial Capitalism</u>. Cambridge MA, Harvard University Press. ISBN: 0674789954

Clark, P. B. (1961). "Industrial Organization School."

Gerchunov, P.; Greco, E.; Bondorevsky, D. (2003). <u>Comienzos diversos, distintas trayectorias y final abierto:</u> más de una década de privatizaciones en Argentina, 1990-2002. (English translation: Diverse beginnings, different paths and open end: More than one decade of privatization in Argentina, 1990-2002). New York, United Nations, Economic Commission for Latin America and the Caribbean. ISBN: 9789213221631

Graeme, K. D.; Kröger, F.; Zeisel, S. (2002). <u>Merger Endgames - Strategien für die Konsolidierungswelle.</u> (English translation: <u>Merger Endgames - Strategies for the Consolidation Wave</u>). Wiesbaden, Betriebswirtschaftlicher Verlag Dr. Th. Gabler GmbH. 1. Vol., ISBN: 0-07-140998-X

Müller-Stewens, G. and Lechner, C. (2001). <u>Strategisches Management - Wie strategische Initativen zum Wandel führen.</u> (English translation: <u>Strategic Management - How Initiatives Lead to Changes</u>). Stuttgart, Schäffer-Poeschel Verlag. ISBN: 3-7910-1840-X

Panzar, J. C. and Willig, R. D. (1981). "Sustainability Analysis - Economies of Scope." <u>The American Economic Review</u> Vol. 71(No. 2): pp. 268-272.

Porter, Michael E. (1981). "The Contributions of Industrial Organization to Strategic Management." <u>The Academy of Management Review</u> Vol. 6(No. 4.): pp. 609-620.

Rausch, A. E. et. al (1990). Privatization in Latin America in the early 1990s. Division for Public Economics and Public Administration Department of Economic and Social Affairs. New York, United Nations.

Stigler, George Joseph (1983). <u>The Organization of Industry</u>. Chicago, University of Chicago Press. ISBN: 0226774325

Webber, J. (2008). Argentine energy: new president, new policy? <u>Business News Americas</u>. Energy Intelligence Series: pp. 1-12.

**Appendix: Top 15 Argentinean Transactions 1992-2008** 

Ran	k Volume [EUR bn.]	Share [%]	Acquirer	Nation	Target	Year
1	1091.1	58.60	Petroleo Brasileiro SA - PETROBRAS	Brazil	Pérez Companc SA - PECOM	2002
2	770.0	49.70	EDF International SA	France	Empresa Distribuidora y Comercializadora Norte SA	2001
3	689.6	59.00	HidroInvest SA (ENDESA Chile, CMS Energy)	Argentina	Hidroelectrica El Chocon SA	1993
4	653.9	100.00	Total Austral SA (since 1996: TotalFinaElf, France)		TermoAndes SA	2001
5	460.4	20.61	TotalFinaElf Gas Transmission Argentina SA		Gasinvest SA	2000
		6.63	Total Fina Elf SA	France		
6	457.7	59.00	Hidroneuquén SA	Argentina		
7	452.2	70.00	Cía de Inversiones de Energía SA - CIESA	Argentina TGS		1992
8	441.6	65.00	Dolphin Energía S.A.	Argentina	Empresa Distribuidora y Comercializadora del Norte – EDENOR	2005
9	434.5	60.00	AES Corp	United States	Empresa de Distribucion de Energia Norte SA - EDEN	a 1997
		30.00	Public Service Enterprise Group Inc - PSEG	United States		
10	420.2	51.00	Distrilec Inversora SA - DISTRILEC	Argentina	Empresa Distribuidora y Comercializadora del Sur - EDESU	1992 R
11	415.8	100.00	AES Camille Ltd	Cayman Island	Empresa Distribuidora la Plata SA - EDELAP	- 2001
12	2 372.3	100.00	GPU Inc	United States	Empresa Distribuidora Electrica Regional SA - EMDERSA	1998
13	3 363.7	100.00	Total Austral SA	Argentina	Central Puerto SA	2001
14	346.1	51.00	Electricidad Argentina SA - EASA	Argentina	Empresa Distribuidora y Comercializadora del Norte – EDENOR	1992
1:	345.7	90.00	Inversora Electrica de Buenos Aires SA	Argentina	Empresa Distribuidora de Energía Atlántica - EDEA	1997

Source: Own illustration, Global M&A Energy Database Aalen University/Glasgow Caledonian University