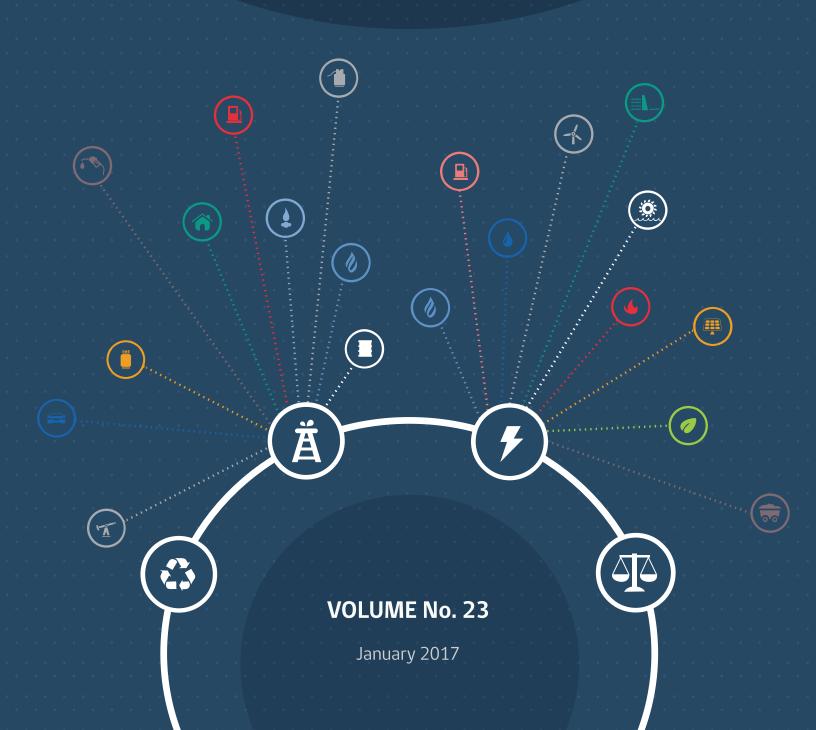
# MONTHLY ENERGY SECTOR REPORT NATIONAL ENERGY COMMISSION



#### **HIGHLIGHTS**

During the last month, the energy sector has witnessed a series of milestones that reflect the hard work of both the National Energy Commission and the Ministry of Energy. The following are among the principal achievements:

# National Congress approves and dispatches project that modifies the Gas Services Law

With broad support, the Chamber of Deputies approved and launched on December 21<sup>st</sup>, one last project to modify the Gas Services Law.

Due to the normative with organic constitutional range, this initiative must fulfil with the mandatory control process, before entering the Constitutional Court.

The session was attended by the Minister of Energy, Andrés Rebolledo and the Executive Secretary of the National Energy Commission, Andrés Romero.

The bill amending law entered to the National Congress in January 2015, and contains rules that prevent concessionaire network distributor from having fares which may exceed the 9% profitability limit established by law – and which will be reviewed by the CNE through its profitability annual check process.

It goes as a complement to the legal initiative were –in case a company exceeds the maximum profit rate– will be applied a rate fixing process, in which the company must return to the customers the equivalent amount exceeded of profitability obtained.

The project also addresses existing gaps in the pricing regime, including the concept of a "guaranteed rate", which will apply to residential and commercial gas services, as well as industrial gas services under certain conditions (monthly or less to 5,000 GJ).

Also, the initiative incorporates, for the first time for the gas distribution industry, an independent technical body for the resolution of tariff disputes and cost-benefit checks: the Panel of Experts.

The current gas services regulation was created in 1931 and the last relevant modification was in 1989, due to the arrival of natural gas as new fuel. Nowadays, this regulatory framework continues with some gaps.

# National Energy Commission defines new Governance and Civil Society Council

Within the framework of Law No. 20,500, about Associations and Citizen Participation in Public Management, the National Energy Commission announced the new Governance and Civil Society Council during the period 2017–2018.

This council will be formed by the Foundation Institute of Political Ecology, the Energy Generators Association of Chile, the Association of Electric Companies, the Unregulated Energy Consumers Association (ACENOR A.G.), the National Federation of Electric Cooperatives (FENACOPEL), the Chilean Association of Renewable Energies A.G. (ACERA A.G.), the Natural Gas Distribution Companies Association (AGN), the College of Engineers of Chile, Diego Portales University, Federico Santa María Technical University, the Freedom and Development Foundation, Aysén Private Development Corporation, the International Council of Large Electric Networks and finally, by the National Corporation Of Consumers and Users of Chile (CONADECUS).

# National Electric Coordinator starts operating on January 1st, 2017

In line with Transmission Law No. 20.936, launched on January 1st, 2017, the National Electricity Coordinator started its operation since the integration of both Energy Economic Coordinator Centers.

The Electricity Coordinator it's a technical and independent organization, in charge of the energy operation along Chilean territory.

The agency has enabled the new website www.coordinadorelectrico.cl and it's Twitter account is @coord\_electrico

# Ministry of Energy recognizes the both National Energy Coordinators

With the objective of recognizing the contribution to the development of the country made by both National Energy Coordinators (CDEC SINC & CDEC SIC), Ministry of Energy organized on December 27th an event to reward the trajectory of both institutions.

The Minister of Energy, Andrés Rebolledo, the Executive Secretary of the CNE, Andrés Romero and the Superintendent of Electricity and Fuels, Luis Avila, extended those awards to Executive Directors of both coordinators.

#### **SUMMARY**

This report was prepared in January 2017 in order to provide energy information and statistics December 2017.

The report's content has been organized into four chapters to facilitate analysis. These four chapters provide information about the electricity sector, international and domestic markets for oil and gas, the status and progress of environmental approvals for energy projects, and finally the main regulatory aspects affecting the sector during the month of December.

This publication contains official information from external sources as well as from the National Energy Commission (CNE).

To prepare the report, an average exchange rate of 667.17 CLP per USD observed during December 2017.

According to Exempt Resolution No. 914, there were 51 electricity generation projects under construction in the SIC and SING, equivalent to a capacity of 3,455 MW.

The installed capacity of the SIC in December was 16,825 MW and SING it was 5,032 MW, plus the installed capacity in the Aysén (SEA) and Magallanes (SEM) electricity systems. In aggregate, the four systems –including Easter Island and Los Lagos– reach up to an installed capacity of 22,031 MW.

Meanwhile, total electric power generation in the SIC during December was 4,649 GWh, and in the SING it reached 1,660 GWh. Therefore, the total generated was 6,308 GWh, 5.1% lower than in November 2016.

The maximum hourly demand recorded in the SIC and the SING in December were 7,788 MW and 2,460 MW, respectively. The maximum in the SIC was recorded on December 14nd while the measurement in the SING corresponds to December 29th, 2016.

Regarding electricity rates, it is important to note that the average marginal cost in December in the SIC was 46.7 USD/MWh, 1.8% higher compared to the previous month, November 2017. In the SING meanwhile, the average marginal cost was 80.6 USD/MWh, 33.7% higher than the previous month.

It is worth to highlight the average market prices recorded in December in the SIC and SING which were 94.2 USD/MWh and 77.1 USD/MWh, respectively.

In terms of international fuel prices, the Brent crude price was 53.6 USD/bbl, 18.7% higher than the previous month. Meanwhile, the average price of WTI crude was 52.0 USD/bbl, and 13.8% higher than the previous month. The Henry Hub price (international natural gas price reference) increase 42.0% compared to November, with an average value of 3.58 USD/MMBtu. The average price of coal was 116.5 USD/ton, increasing about 28.7% over the previous month.

In terms of gasoline prices, those of 93-octane gasoline (unleaded) and diesel should be noted. In December the average domestic price of the former was 698 CLP/liter, while the average price of the latter was 478 CLP/liter. In terms of percentages, these represent a down of -3.1% and -2.2% respectively in comparison to November 2017.

A total of 5 energy sector projects were submitted to the Environmental Impact Evaluation System (Sistema de Evaluación de Impacto Ambiental, SEIA): 1 were for electricity generation, 2 was for electricity transmission energy projects. Meanwhile, those projects which are already being evaluated represent a total investment of USD 30,343 million. In addition, 12 projects related to the energy sector obtained favorable environmental qualification resolutions (Resolución de Calificación Ambiental, or RCA) in December, and of those, 8 were for electricity generation, 2 were for high-voltage electricity transmission line projects and 1 was for oil and gas energy projects.

Finally, among the most relevant regulatory milestones taken place during October, is the publication in the Official Bulletin from October 12<sup>th</sup>, 2016, of Decree No. 128 of the Ministry of Energy, which approves regulations for pumping power plants without hydrological variability, which regulates technical characteristics, availability and systemic impact for its capacity as energy storage systems; subject to the coordination of the Independent Coordinator of the National Electric System according to what is indicated in the new article 72–2 of the General Electrical Services Law.

Also highlights the issuance from October 19<sup>th</sup>, 2016, of the Exempt Resolution No. 717 of the National Energy Commission which takes into account for all, legal and administrative purposes, the appointment of the first meeting of the managing board of the Independent Coordinator from the National Electricity System, carried out by the Special Nomination Committee.



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#### **ELECTRICITY SECTOR**

#### 1 Electricity Generation Projects Under Construction

As indicated in Article 31 of the Node Price Setting Regulation (0586/2012), "installations under construction" are defined as generation units, transmission lines and electrical substations that have been granted the respective construction permits for civil works or have been granted the order to proceed in the fabrication and/or installation of the corresponding electrical or electromagnetic equipment for electricity generation, transmission or transformation. For further information in NCRE projects, go to January 2017, NCRE Monthly Report.

According to Exempt Resolution Num. 914, "Works under Construction Update and Report," as of December 26 th there were 21 power generation projects under construction in the SING. Together they represent capacity of 1,225 MW and are projected to begin operation between December 2016 and June 2018.

#### **Projects under Construction in the SING**

Category	Date Project Name	Region	Technology	Capac. [MW]
	dic-16 Uribe Solar	II Region	Solar Photovoltaic	50
	dic–16 Cerro Pabellón	II Region	Geothermal	48
	dic-16 Bolero I	II Region	Solar Photovoltaic	84
	ene-17 Bolero II	II Region	Solar Photovoltaic	42
	feb-17 Bolero III	II Region	Solar Photovoltaic	20
	feb–17 Calama Solar 1	II Region	Solar Photovoltaic	9
	mar-17 Quillagua I	II Region	Solar Photovoltaic	23
	abr-17 PV Cerro Dominador	II Region	Solar Photovoltaic	100
	jun–17 Pular	II Region	Solar Photovoltaic	29
NCRE	jun-17 Paruma	II Region	Solar Photovoltaic	21
TVCILE	jun-17 Lascar I	II Region	Solar Photovoltaic	30
	jun–17 Lascar II	II Region	Solar Photovoltaic	35
	jun-17 Puerto Seco Solar	II Region	Solar Photovoltaic	9
	sep-17 Huatacondo	I Region	Solar Photovoltaic	98
	sep–17 Arica Solar I	XV Region	Solar Photovoltaic	18
	sep–17 Arica Solar II	XV Region	Solar Photovoltaic	22
	oct-17 Quillagua II	II Region	Solar Photovoltaic	27
	oct-17 Usya	II Region	Solar Photovoltaic	25
	jun-18 Cerro Dominador	II Region	Cogeneration	110
	jun–18 Quillagua III	II Region	Solar Photovoltaic	50
Thermoelectric	feb-18 IEM	II Region	Coal	375

Source: CNE

Source: CNE

#### Total under construction in the SING, by technology

# 4% 9% Coal Natural Gas 1,225 [MW] Solar Photovoltaic Concentrated Solar Power Source: CNE Geothermal

#### Projected operation start date, SING











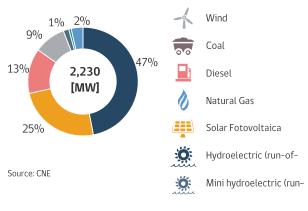
According to Exempt Resolution No. 914, "Works under Construction Update and Report," as of December 26 th there were **30** power generation projects under construction in the SIC. Together they represent capacity of 2,230 MW and are projected to begin operation between December 2016 and October 2020.

#### **Projects under Construction in the SIC**

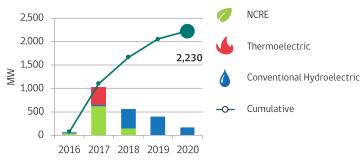
Category	Date Project Name	Region	Technology	Capac. [MW]
	dic-16 San Juan IV	III Region	Wind	33
	ene–17 Río Colorado	VII Region	Mini hydroelectric (run-of-river)	15
	ene-17 Valleland	III Region	Solar Photovoltaic	67
	ene-17 San Juan V	III Region	Wind	26
	ene-17 San Juan VI	III Region	Wind	33
	ene-17 El Boco	V Region	Solar Photovoltaic	3
	ene-17 Cintac	RM	Solar Photovoltaic	3
	ene-17 Marchigue II	VI Region	Solar Photovoltaic	9
	ene-17 Esperanza II	VI Region	Solar Photovoltaic	9
NCRE	abr-17 Malgarida	III Region	Solar Photovoltaic	28
	abr-17 El Pelícano	III Region	Solar Photovoltaic	100
	abr-17 Cabo Leones I	III Region	Wind	116
	may-17 Doña Carmen	V Region	Solar Photovoltaic	40
	ago-17 Divisadero	III Region	Solar Photovoltaic	65
	oct-17 Santiago Solar	RM	Solar Photovoltaic	98
	ene-18 Guanaco Solar	III Region	Solar Photovoltaic	50
	feb-18 Las Nieves	IX Region	Mini hydroelectric (run-of-river)	7
	jul-18 Cumbres	XIV Region	Mini hydroelectric (run-of-river)	15
	ago-18 Valle Solar	III Region	Solar Photovoltaic	74
	dic-16 La Mina	VII Region	Hydroelectric (run-of-river)	34
	jul–17 Ancoa	VII Region	Hydroelectric (run-of-river)	27
	oct-17 Convento Viejo	VI Region	Reservoir	16
Conventional	dic-18 Los Cóndores	VII Region	Hydroelectric (run-of-river)	150
Hydroelectric	dic-18 Las Lajas	RM	Hydroelectric (run-of-river)	267
	abr-19 Ñuble	VIII Region	Hydroelectric (run-of-river)	136
	may-19 Alfalfal II	RM	Hydroelectric (run-of-river)	264
	oct-20 San Pedro	XIV Region	Hydroelectric (run-of-river)	170
	may-17 Doña Carmen	V Region	Diesel	48
Thermoelectric	jun-17 CTM-3*	II Region	Diesel	251
	dic-17 Cogeneradora Aconcagua	V Region	NLG	77

Source: CNE

#### Total under construction in the SIC, by technology



#### Projected operation start date, SIC



Source: CNE





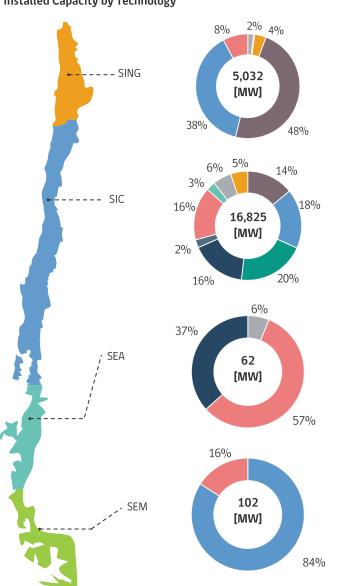




#### 2 Installed Electricity Generation Capacity

The installed electricity generation capacity as of December 2016 was (\*)22,031 MW. Of that, 16,825 MW (76.4%) corresponded to the SIC and 5,032 MW (22.8%) to the SING. The remaining 0,8% was distributed among the Aysén and Magallanes electricity systems. As of December, 58.4% the country's total installed capacity is represented by thermoelectric generation, 28.0% is conventional hydroelectric and 13.5% is NCRE. For further NCRE information got to our January 2017 NCRE Monthly Report.

#### **Installed Capacity by Technology**



#### Installed capacity by system

System	Capacity [MW]	Capacity [%]
<ul><li>SING</li></ul>	5,032	22.8%
<ul><li>SIC</li></ul>	16,825	76.4%
<ul><li>SEA</li></ul>	62	0.3%
<ul><li>SEM</li></ul>	102	0.5%

Source: CDEC-SIC / CDEC-SING and CNE



#### Power generation plants in testing phase

In addition to the total installed capacity, there are 31 synchronous power generation plants with their respective electricity systems that have not yet been approved for dispatch by the CDEC (in the testing phase). Of these, 28 plants are in the SIC (with a total capacity of 726.7 MW) and 3 are in the SING (with a total capacity of 164.3 MW). Thus, there is a total of 891.0 MW in the testing phase.

<sup>\*</sup> The total installed capacity also includes Los Lagos (6 MW) and Easter Island (4 MW) systems.

<sup>\*</sup>Is not considered in this total the Natural Gas power plant, located in Salta (Argentina); connected to the SING (380 MW)





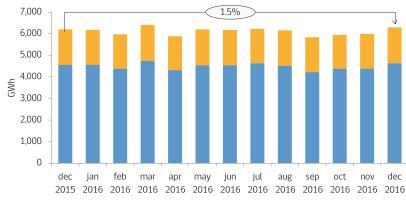




#### 3 Electricity Generation

Power generation in the SIC during December 2016 reached a total of 4,649 GWh, which were classified as 45% thermoelectric, 37% conventional hydroelectric and 18% NCRE. In the SING, 1,660 GWh of electric power were generated, 92% from thermoelectric plants and 8% from NCRE. Together the systems reached a total of 6,308 GWh, an increase of 5.1% over the previous month and 1.5% in comparison to December 2015. In resume, if we sort by generation category, we distinguish: 15.6% NCRE, 27.0% hydroelectric and 57.4% thermoelectric generation.

#### Evolution of gross electric power generation, SIC-SING



#### Generation variation, by system

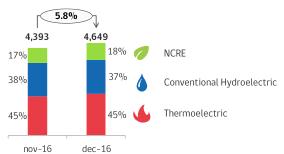
Energy Generation [GWh]		Мо	nthly	An	nual
● Total	6,308	<u> </u>	5.1%	_	1.5%
• SIC	4,649		5.8%		1.5%
SING	1,660		3.0%		1.5%

Source: CDEC-SIC / CDEC-SING

Source: CDEC-SIC / CDEC-SING

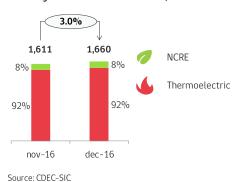
Following is a breakdown of power generation by technology in the SIC and SING.

#### Monthly Variation in Generation, SIC

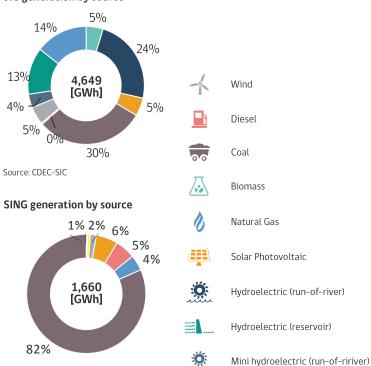


Source: CDEC-SIC

#### Monthly Variation in Generation, SING



#### SIC generation by source



Source: CDEC-SIC





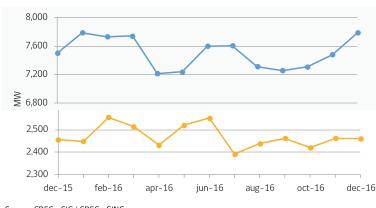




#### 4 Maximum Hourly Demand

In December 2017, the maximum hourly demand recorded in the SIC was 7,788 MW on December 14th, 4.1% higher than the previous month and 3.8% lower than the same month of 2016. In the SING, the maximum hourly demand recorded on December 29th was 2,460 MW, which represented a -0.1% lower compared to the maximum hourly demand recorded in the previous month and 0.1% under the same month of 2016.

#### Evolution of maximum hourly demand, SIC - SING



#### Variation in maximum hourly demand, by system

System	[MW]	Monthly		An	nual
• SIC	7,788	_	4.1%		3.8%
SING	2,460	$\overline{}$	-0.1%	_	0.1%

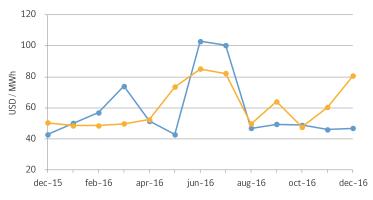
Source: CDEC - SIC / CDEC - SING

Source: CDEC - SIC / CDEC - SING

#### **5 Marginal Costs**

The marginal cost is the variable cost of the most expensive generation unit operating at a specific point in time. In this case, the Quillota 220 kV busbar was used as the reference to obtain the marginal cost in the SIC while the Crucero 220 kV busbar was used as the reference in the SING. The value given for each system corresponds to the monthly average of hourly marginal costs. In December, the average marginal cost in the SIC was 46.7 USD/MWh, 1.8% lower the previous month and 9.3% over in comparison to December 2016. In the SING, the average marginal cost was 80.6 USD/MWh, 33.7% less than he previous month and 60.6% than the same month of 2016.

#### Evolution of marginal costs, SIC - SING



#### Variation in marginal costs, SIC - SING

System	[USD/MWh]	Mo	onthly	A	nnual
<ul><li>Quillota 220</li></ul>	46.7	_	1.8%	_	9.3%
Crucero 220 kV	80.6		33.7%	_	60.6%

Source: CDEC - SIC / CDEC - SING

Source: CDEC - SIC / CDEC - SING









#### **6 Average Market Price**

The average market price (AMP) for each system is based on the average price of free customer contracts and long-term supply contracts held by distribution companies as applicable, reported to the National Energy Commission by the distribution companies operating in the Norte Grande Interconnected System and the Central Interconnected System. The AMP calculation takes into consideration a four-month window ending with the third month prior to the AMP publication date.

The AMP recorded in December 2016 for the SIC was 94.2 USD/MWh, -0.4% lower than the previous month and 7.0% higher than December 2015. On the northern system, the AMP registered was of 77.1 USD/MWh, -1.4% lower than the previous month and -7.7% less than December 2015.

#### Evolution of market prices, SIC - SING

### 100 95 90 85 80 75 dec-15 feb-16 apr-16 jun-16 aug-16 oct-16 dec-16 Source: CDEC - SIC / CDEC - SING

#### Variation in average market prices, by system

System	[USD/MWh]*	Monthly		A	nnual
• SIC	94.2	~	-0.4%	_	7.0%
SING	77.1	$\overline{}$	-1.4%	$\nabla$	-7.7%

Source: CDEC - SIC / CDEC - SING

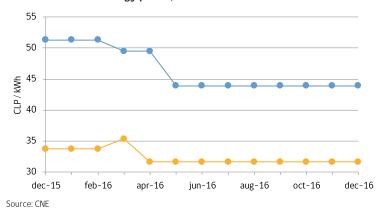
#### 7 Short-term Node Prices

Short-term node prices are set twice each year, in May and October. These prices may be indexed monthly, depending on the conditions established in the twice-a-year decree that sets node prices for electricity supply. The prices are calculated by the National Energy Commission (CNE) which submits a technical report with the results to the Energy Ministry. The ministry then proceeds to set the prices via a decree published in the Official Bulletin.

#### **Node Energy Price**

The node energy price is the average over time of the marginal cost of energy in the electricity system operating at the minimum, updated operation and rationing cost. The node energy price in the SIC in December 2016 was 43.9 CLP/kWh, -14.5% below the same month in 2015. In the SING, the node energy price in December 2016 was 31.6 CLP/kWh, -6.2% below the registered in December 2015.

#### Evolution of node energy prices, SIC - SING



#### Variation in node energy prices, by system

System	CLP/kWh	Monthly	Annual
<ul><li>PNE SIC</li></ul>	43.9	0.0%	-14.5%
PNE SING	31.6	0.0%	-6.2%

Source: CNE

<sup>\*</sup> Real value at the publish date, according to the CPI (consumer price index) of second previous month at the indicated date and the observed dollar of the previous month of the publish report date.





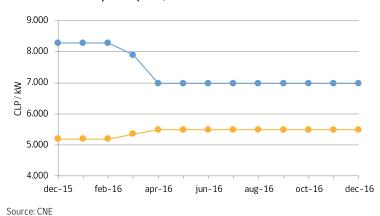




#### **Node Power Price**

The node power price is the annual marginal cost of increasing the installed capacity of the electricity system taking into consideration the most economic generation plants, required to supply additional capacity during the annual maximum hourly demand of the electricity system, increased by a percentage equal to the theoretical capacity reserve margin of the system. The node power price in the SIC in December 2016 was of 6,978 CLP/kW, with a -15.8% decrease in comparison to December 2015. On the other hand, the node power price for the SING was 5,485 CLP/kW, representing an increase of 5.8% over December 2015.

#### Evolution of node power price, SIC - SING



#### Variation in node power price

System	CLP/kW	Mor	nthly	Α	nnual
• PNP SIC	6,978		0.0%	$\overline{}$	-15.8%
PNP SING	5,485	_	0.0%		5.8%

Source: CNE

### 8 Node Price in Medium-size Systems

Below we present the node energy price and node power price in medium-size systems for December 2016. These node prices are applied to energy supply at the withdrawal busbars indicated in the following tables:

#### Variation in node energy price, medium-size systems

Busbar	[USD/MWh]	Index	Annual
Pta Arenas	66	0.0%	2.3%
Tres Puentes	66	0.0%	2.3%
Pto Natales	96	0.0%	1.6%
Porvenir	89	0.0%	1.9%
Pto Williams	274	0.0%	-6.9%
Aysén 23	84	0.0%	-6.6%
Chacab23	84	0.0%	-6.7%
Mañi23	84	0.0%	-6.6%
Ñire33	84	0.0%	-6.6%
Tehuel23	84	0.0%	-6.6%
Palena	88	0.0%	0.2%
G.Carrera	106	0.0%	<del>-10.0%</del>
Cochamó	164	0.0%	<del>-12.5</del> %
Hornopirén	154	0.0%	-6.2%

#### Variation in node power price, medium-size systems

Busbar	[USD/MW-mth]	Index		An	nual
Pta Arenas	15,627	(	0.0%		0.3%
Tres Puentes	15,627	(	0.0%		0.3%
Pto Natales	8,779	(	0.0%		0.1%
Porvenir	11,092	(	0.0%		0.9%
Pto Williams	21,094	(	0.0%		1.2%
Aysén 23	11,525	(	0.0%	$\overline{}$	-0.4%
Chacab23	11,525	(	0.0%	$\overline{}$	-0.4%
Mañi23	11,525	(	0.0%	$\overline{}$	-0.4%
Ñire33	11,525	(	0.0%	$\overline{}$	-0.4%
Tehuel23	11,525	(	0.0%	$\overline{}$	-0.4%
Palena	16,335	(	0.0%		0.1%
G.Carrera	22,409	(	0.0%		1.1%
Cochamó	22,099	(	0.0%	_	1.2%
Hornopirén	13,955	(	0.0%	$\overline{}$	-0.2%

Source: CNE

Source: CNE









#### 9 Evolution of Variable Distribution Cost Indexes

The distribution added value (DAV)\* is set every four years by the Energy Ministry, based on a technical report prepared by the CNE, and corresponds to the average cost of investment, administration, maintenance and operation of electricity distribution networks calculated for an efficient model company operating in Chile. The DAV has a fixed component and a variable component, both of which were established by Article 182 of the General Electrical Services Law and are indexed monthly. Below we provide variable index evolution, both for high and low voltage for December, 2016.

For more information about this, please go to the Decree No. 1T / 2012 Energy Distribution Fares, Fixing Process Tariffs 2012-2016

# 1,08 1,06 1,04 1,02 1,02 1 dec-15 feb-16 apr-16 jun-16 aug-16 oct-16 dec-16

#### Indexes variation

System	Index	Moi	nthly	Ar	nual
• CDAT	1.053		0.0%	$\overline{}$	-1.7%
<ul><li>CDBT</li></ul>	1.050	$\overline{}$	-0.1%	$\overline{}$	-1.6%

Source: CNE

#### 10 Hydrological Statistics

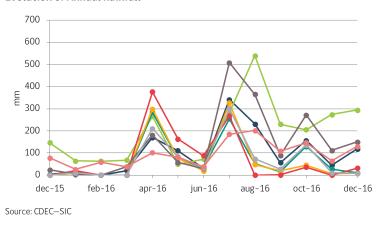
Source: CNE

Because of the hydro-thermal nature of the Central Interconnected System, which features large hydroelectric (reservoir) plants with for regulation in different periods of time and thermal plants (as well as other technologies), the use of reservoir water must be optimized in order to minimize the total cost of supplying the system. For this reason, we provide information below from monitoring and recording the important variables associated with hydrology, such as rainfall, and the operational status of infrastructure of the hydroelectric plants in relation to the respective reservoir levels and volumes.

#### **Rainfall Statistics**

The main monthly rainfall statistics published by CDEC-SIC and updated as of December 2016 are shown below:





#### **Annual Rainfall Variation**

Reservoir	[mm]	M	onthly	Annual
Abanico	119	_	>100%	>100%
Canutillar	295		7% 🗻	>100%
Cipreses	10	$\overline{}$	-64%	n/a
🥋 Colbún	8		44%	n/a
Otros (**)	31		n/a	n/a
Pangue	150		35% 🗻	>100%
Pehuenche	8	$\overline{}$	-14%	n/a
Pilmaiquén	129		>100%	66%
Overall total	750	_	39% 🗻	>100%

<sup>12</sup> 





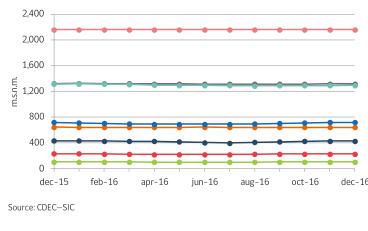




#### Reservoir, Lake and Lagoon Levels

According to information submitted by the CDEC-SIC, in December 2016 the final levels were found for the following reservoirs, lakes and lagoons:

#### **Evolution of Reservoir Levels**



#### Variation in Reservoir Levels

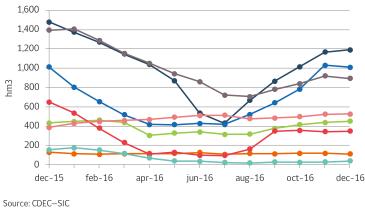
	Rese	rvoir	[m.s.n.m.]	Monthly	Annual
		Embalse Colbún	429	0.1%	-1.5%
		Embalse El Melado	642	-0.3%	-0.7%
		Embalse Ralco	720	<b>→</b> -0.1%	0.0%
		Embalse Rapel	104	0.2%	0.2%
		Lago Chapo	228	0.0%	-2.8%
		Lago Laja	1,318	0.0%	-0.5%
5		Laguna El Maule	2,164	0.0%	0.1%
		Laguna La Invernada	1,294	0.2%	<del>-</del> -1.6%

Source: CDEC-SIC

#### Reservoir, Lake and Lagoon Volumes

Based on levels reported by the CDEC-SIC for volumes of water stored in the largest reservoirs, lakes and lagoons, considering the characteristics of each one as of December 2016.

#### **Evolution of Reservoir Volume**



#### Variation in Reservoir Volume

	Rese	rvoir	[hm3]	Mo	onthly	Annual
	*****	Embalse Colbún	1,167	_	2.1%	<del>-</del> -19.5%
	*****	Embalse El Melado	117	$\overline{}$	-5.4%	-13.0%
	*****	Embalse Ralco	1,032	$\overline{}$	-2.0%	-0.2%
	*****	Embalse Rapel	438	_	2.7%	3.6%
	*****	Lago Chapo	344		1.0%	-46.6%
		Lago Laja	921	$\overline{}$	-2.9%	-35.8%
õ	******	Laguna El Maule	522	_	0.5%	35.4%
	*****	Laguna La Invernada	28	_	31.6%	-75.8%

Source: CDEC-SIC



#### 1 International Fuel Market Prices

The following information details the moving year evolution of the West Texas Intermediate (WTI) crude oil price index, which is used as a reference in the U.S. market, along with the BRENT oil price index which reflects oil prices for European markets. In December 2016 WTI oil prices was 52.0 USD/bbl., 13.8% over the previous month and 39.6% increased in comparison of December 2015. Meanwhile, the average BRENT oil prices was 53.6 USD/bbl, 18.7% higher than November 2016 and also higher by 40.9% in comparison to December 2015.

#### **Evolution of BRENT and WTI Oil Prices**



#### Crude Oil Variation (USD/bbl.)

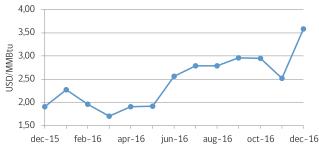
Index	USD/bbl.	Monthly	Annual
BRENT DTD	53.6	<b>1</b> 8.7%	40.9%
WTI	52.0	<b>1</b> 3.8%	<b>3</b> 9.6%

Source: CNE, based on data from Argus Media Inc.

Source: CNE, based on data from Argus Media Inc.

The following information details the evolution of the Henry Hub (Louisiana) price index, which serves as a reference for liquefied natural gas (LNG) imports to Chile. In December 2016, Henry Hub averaged 3.58 USD/MMBtu, which represent a 42.0% of increase in relation to November 2016 and 87.9% increase from the same month of 2015.

#### **Evolution of Natural Gas Price (Henry**



#### **Natural Gas Variation (Henry Hub)**

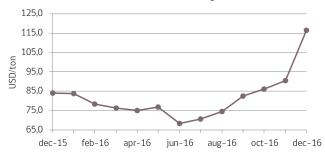
ı	ndex	USD/MMBtu	Monthly	Annual
0 +	HENRY HUB SPOT	3.58	42.0%	<b>87.9%</b>

Source: CNE, based on data from the Daily Gas Price Index, NGI Intelligence

Source: CNE, based on data from the Daily Gas Price Index, NGI Intelligence

The following information details the evolution of the price of EQ 7000 steam coal kCal/kg which in December 2016 averaged a price of 116.5 USD/ton, representing 28.7% increase over the previous month and 38.8% over December 2015.

#### Evolution of EQ 7000 Steam Coal kCal/kg



#### Variation in EQ 7000 Steam Coal kCal/kg

Index	USD/ton	Monthly	Annual
THERMAL COAL EQ. 7.000 kCal/kg	116.5	28.7%	<b>38.8%</b>

Source: CNE, based on data from Platts Coal Trader International

Source: CNE, based on data from Platts Coal Trader International







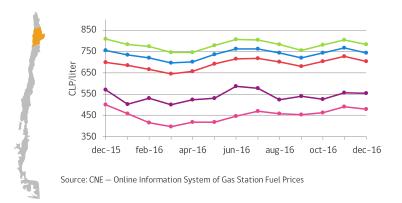


#### 2 Domestic Liquid Fuel Prices

The following information details the evolution of different types of petroleum-derived liquid fuels sold or commercialized at gas stations (93-, 95-, and 97-octane unleaded gas, diesel, household kerosene and diesel oil) during the last 12 months, along with the average monthly price in last month for the cities of Antofagasta, Concepción, Puerto Montt and the Santiago Metropolitan Region.

The information presented is prepared by the National Energy Commission which, as part of its legal functions and powers, developed the Online Information System of Gas Station Fuel Prices, <a href="https://www.bencinaenlinea.cl">www.bencinaenlinea.cl</a>

### Evolution of Liquid Fuel Prices Antofagasta

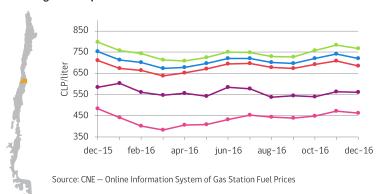


#### **Variation of Liquid Fuel Prices**

Fuel Type	CLP/liter	Monthly	Annual
Gasoline 93 SP	703	-3.2%	0.4%
🕒 Gasoline 95 SP	743	-3.0%	<del>-</del> -1.6%
Gasoline 97 SP	783	-2.8%	-3.3%
🖺 Kerosene	555	-0.4%	-2.7%
<b>□</b> Diesel	479	-2.2%	-4.4%

Source: CNE — Online Information System of Gas Station Fuel Prices

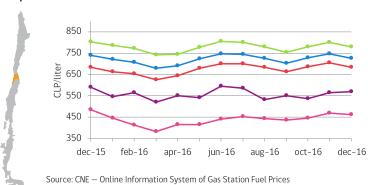
#### Santiago Metropolitan



Fuel Type	CLP/liter	Monthly	Annual
📔 Gasoline 93 SP	685	-3.3%	-3.8%
🖺 Gasoline 95 SP	721	-2.9%	-4.2%
📔 Gasoline 97 SP	768	-2.1%	-3.8%
🖺 Kerosene	561	-0.5%	<del>-4.1</del> %
Diesel	462	-2.3%	-4.5%

Source:  $\mathsf{CNE}-\mathsf{Online}$  Information System of Gas Station Fuel Prices

#### Valparaíso



Fuel Type	CLP/liter	Monthly	Annual
Gasoline 93 SP	684	-2.9%	0.0%
🕒 Gasoline 95 SP	728	-2.8%	<del>-</del> -1.6%
Gasoline 97 SP	779	-2.9%	-3.2%
■ Kerosene	569	0.6%	-3.7%
<b>□</b> Diesel	462	-1.3%	-4.5%

Source:  $\mathsf{CNE}-\mathsf{Online}$  Information System of Gas Station Fuel Prices



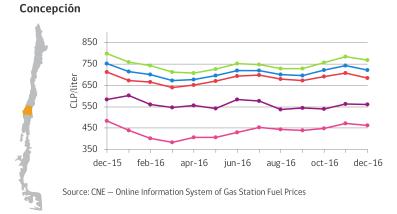






#### **Evolution of Liquid Fuel Prices**

#### Evolution of Eigula rate Frice

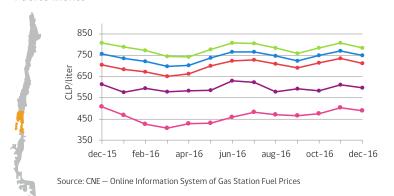


#### **Variation of Liquid Fuel Prices**

Fuel Type	CLP/liter	Monthly	Annual
■ Gasoline 93 SP	700	-2.6%	0.6%
🖺 Gasoline 95 SP	739	-2.6%	-2.0%
📔 Gasoline 97 SP	776	-2.6%	-2.9%
L Kerosene	571	-0.6%	1.3%
🖺 Diesel	477	-2.2%	<del>-6.7%</del>

Source:  ${\sf CNE-Online}$  Information System of Gas Station Fuel Prices

#### **Puerto Montt**



Fuel Type	CLP/liter	Monthly	Annual
■ Gasoline 93 SP	712	-3.1%	1.0%
🕒 Gasoline 95 SP	749	-2.9%	-1.0%
Gasoline 97 SP	785	-2.9%	-2.7%
■ Kerosene	598	-2.1%	-2.4%
■ Diesel	489	-2.7%	-3.7%

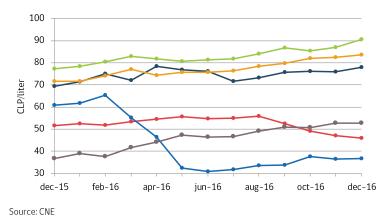
Source: CNE — Online Information System of Gas Station Fuel Prices

#### 3 Fuel Gross Margins

The retail sales price of fuels is structured as follows: sales price at the refinery, sales margin and taxes (VAT and specific tax). The following information shows the evolution of the sales margin for 93-octane gas and diesel in the 5th, 6th, 7th, 8th, 12th and Santiago Metropolitan regions.

#### 93-Octane Gasoline

#### **Evolution of Gross Sales Margin**



#### Variation in Gross Sales Margin

93-Octane Gas	CLP/liter	Mo	onthly	Annual
<b>\$ □</b> 5th Region	78	_	2.7%	12.4%
\$ <u>■</u> 6th Region	84	_	1.4%	16.7%
<b>\$</b>	37	_	1.2%	-39.5%
<b>\$■</b> 8th Region	91	_	4.1%	17.2%
Santiago  Metropolitana	46	$\overline{}$	-2.4%	-10.9%
\$₽1 12th Region	53	$\overline{}$	-0.2%	43.1%

Source: CNE





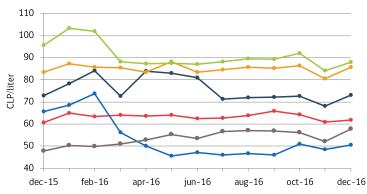




#### Diesel

Source: CNE

#### **Evolution of Gross Sales Margin**



, ,

#### Variation in Gross Sales Margin

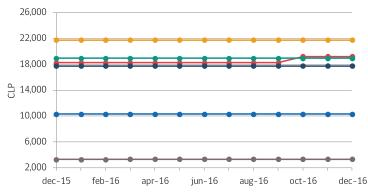
Diesel Oil	CLP/liter	Mc	onthly	Annual
<b>\$ □</b> 5th Region	73	_	7.1% 🗻	0.2%
\$ <u>■</u> 6th Region	86		6.3%	2.7%
<b>\$</b>	51	_	4.0% 🔷	-23.0%
\$ <u>■</u> 8th Region	88		4.7% 🔷	-8.0%
Santiago  Metropolitana	62		1.2% 📥	1.7%
\$ 12th Region	58		10.6% 🗻	20.4%

Source: CNE

#### 4 Domestic Prices of Network Gas Supplied through Concessions

The following information shows the price based on the energy equivalence of natural gas, city gas or propane air, whichever is applicable, distributed to the end consumer as network gas under concession equivalent to 15-kg cylinders of liquefied petroleum gas. This price also includes fixed costs and meter rental, charged by the network gas distribution companies when applicable.

#### **Evolution of Network Gas Prices**



Source: CNE — Online Gas Price System

#### Variation in Network Gas Prices

Company (Region)	CLP	Мо	nthly	An	nual
Lipigas (2th)	10.312	_	0.0%		0.0%
Gasvalpo (5th)	19.234	_	0.0%	_	5.2%
Metrogas (Metropolitana)	17.787	_	0.0%	_	0.0%
Gassur (8th)	18.979	_	0.0%	_	0.0%
Intergas (8th)	21.792	_	0.0%	_	0.0%
Gasco Magallanes (9th)	3.319	_	0.3%	_	1.6%

Source: CNE — Online Gas Price System







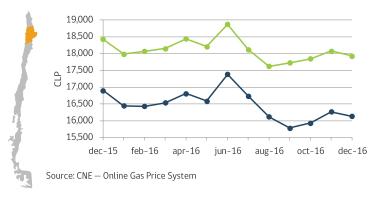


#### 5 Domestic Prices of Bottled Liquefied Petroleum Gas

Bottled LPG is liquefied gas fuel, i.e., propane and butane and their blends (with a maximum 30% of butane). The fuel is compressed for bottling in cylinders of varying sizes that are sold to end users for use in heaters, stoves and water heaters/boilers. The cylinders on the local market have a capacity of 2 kg, 5 kg, 11 kg, 15 kg and 45 kg. They are also sold according to quality; one is sold as normal or regular and the other as catalytic, a category required by some heating appliances that only use a fuel with a low content of olefins, diolefins and sulfur. The information below shows the evolution of the average price of bottled LPG in 15-kg cylinders for the cities of Antofagasta, Concepción, Puerto Montt and the Santiago Metropolitan Region.

#### **Evolution of Bottled LPG Prices**

#### Antofagasta

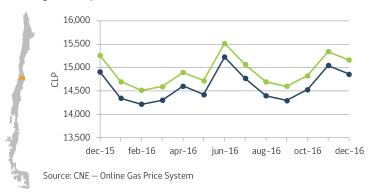


#### Variation in Bottled LPG Prices

Туре	CLP	Monthly	Yearly
Catalityc	17,925	-0.8%	-2.7%
<b>1</b> Regular	16,133	-0.8%	-4.5%

 ${\tt Source: CNE-Online\ Gas\ Price\ System}$ 

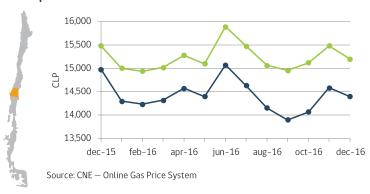
#### Santiago Metropolitan

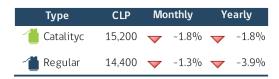


Type	CLP	Monthly	Yearly
Catalityc	15,163	<del>-1.2%</del>	-0.7%
<b>Regular</b>	14,863	-1.2%	-0.3%

Source:  $\mathsf{CNE} - \mathsf{Online}\ \mathsf{Gas}\ \mathsf{Price}\ \mathsf{System}$ 

#### Concepción





 ${\tt Source: CNE-Online\ Gas\ Price\ System}$ 



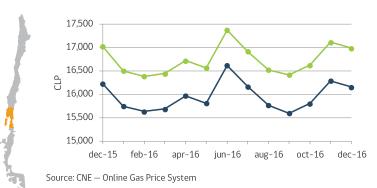






#### **Evolution of Bottled LPG Prices**

#### **Puerto Montt**



#### Variation in Bottled LPG Prices

Type	CLP	Мо	nthly	Υє	early
Catalityc	16,983	$\overline{}$	-0.7%	$\overline{}$	-0.2%
<b>Regular</b>	16,157	$\overline{}$	-0.8%	$\overline{}$	-0.4%

Source: CNE — Online Gas Price System

#### 6 Fuel imports and exports

Information on imports and exports of primary and secondary fuels corresponds to November 2016 given that the official information source has a two-month time lag. The information on imports mainly applies to coal, crude oil, diesel and natural gas, equivalent to more than 83.5% of total national imports (in tons) .

The total variation of imports registered a increase of -11.7% over the previous month and increase of 7.1% compared to November, 2015. Meanwhile, the total change in exports recorded an increase of 64.8% over previous month. Also important to highlight, the main fuel exported during the month of November was Coal, which represented about 74.6% of total exports in tons.

Imports of the main primary fuels during the month of November were: coal from Colombia, Australia, United States and Canada; crude oil from Brazil, Ecuador and Argentina; diesel oil from the United States and Japan; and liquefied natural gas bought from Trinidad and Tobago.

In the other hand, during November, the exports of diesel oil and fuel oil 6 recorded as country of destination Bolivia and Panamá; and the main fuel exported was Coal, mainly sent to India.

Here are the details for each of the fuels with percentage changes and countries of origin / destination.

#### Variation in Imports During the Period

Fuel	[Thous- Tons]	Monthly	Annual
👼 Coal	1,165	10.8%	49.4%
🛣 Crude Oil	534	-22.9%	-34.7%
📔 Diesel Oil	299	-32.3%	-9.7%
Natural Gas	171	-39.5%	0.3%
🚘 Gasoline	85	-23.9%	>100%
<b>L</b> PG	87	13.3%	34.0%
Household Kerosene	52.5	-1.6%	86.2%
Overall total	2.394	-11.7%	7.1%

#### Variation in Exports During the Period

Fuel	[Thous-Tons]	Mon	thly	Ar	nual
👼 Coal	206	_	25%	(*)	
<u> </u> Diesel Oil	12		>100%		>100%
Fuel Oil	58	(*)		(*)	
Natural Gas	0	(*)		(**)	
GLP	0	(*)		(**)	
<b>₩</b> IFO	0	(*)		(**)	
Overall total	276		65%	_	>100%

Source: Customs Office through COMEX (www.comexplusccs.cl)

Source: Customs Office through COMEX (www.comexplusccs.cl)









#### Imports by Country of Origin **Exports by Country of Origin** Coal Coal Australia United Remaining 441Mt States Fuels 37.8% 226Mt Remaining India 70Mt 19.4% 206Mt fuels 25.4% 100.0% 1,229Mt 51.3% Colombia Russia 34Mt 464Mt 39.8% 2.9% Fuel Oil 6 Crude Oil Ecuador 103Mt 19.3% Total Total 58Mt 534Mt Remaining 22.3% 21.2% Remaining Panama Brazil Fuels 58Mt fuels 428Mt 217Mt 100.0% 1,860Mt 80.2% Argentina 78.8% 77.7% 3Mt 0.6% Diesel Oil Diesel Oil Japan Total 86Mt Total 12Mt 299Mt 28.7% 4.2% United 12,5% States Remaining Remaining fuels 214Mt Fuels 2,095Mt 71.3% 264Mt 87.5% Bolivia 95.8% 12Mt 100.0% **Natural Gas** Total 171Mt 7.1% Remaining Trinidad fuels and 2,223Mt Tobago

Source: Customs Office through Comex Service, Santiago Chamber of Commerce.

92.9%

171Mt 100.0%









#### 7 Fuel Sales

The following information details the evolution and the variation in the sales of the principal oil-based fuels. The information available is presented with a one-month time lag. The fuels analyzed are: domestic kerosene, fuel oils, liquefied gas, diesel oil and unleaded 93-, 95- and 97-octane gas.

# Fuel Sales Evolution, by Type 1,600 1,400 1,200 200 400 200 0 1,600 1,400 1,2

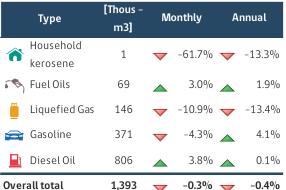
may-16

jul-16

sep-16

nov-16

#### Fuel Sales Variation, by Type



Source: CNE, based on ENAP data

jan-16

mar-16

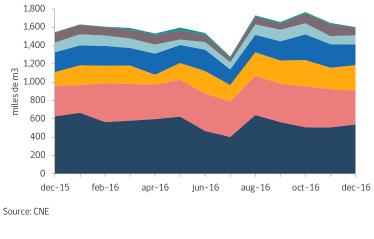
nov-15

Source: CNE, based on ENAP data

#### 8 Fuel Inventory

The following information presents monthly fuel inventory levels (aviation fuel, household kerosene, fuel oils, aviation kerosene, automotive gas, liquefied gas, diesel oil and crude oil) in thousands of m3 for the entire country. This value corresponds to the last business day of the respective month.

#### Fuel Inventory Evolution, by Type



#### Fuel Inventory Evolution, by Type

Туре	[Thous - m3]	Monthly	Annual
X Aviation gas	1	12.8%	-21.4%
A Household K	10	-19.6%	79.0%
Fuel Oils	80	-38.6%	-24.7%
Kerosene Av.	100	11.9%	-6.3%
Automotive gas	226	-12.0%	4.1%
Liquefied gas	277	18.5%	<b>83.1%</b>
Diesel oil	372	-11.1%	11.8%
Crude oil	539	6.2%	<del>-14.2%</del>
Overall total	1,604	<del>-2.7%</del>	3.6%

Source: CNE



#### **ENERGY PROJECTS UNDERGOING ENVIRONMENTAL EVALUATION**

#### 1 Projects Submitted for Environmental Evaluation

In December 2016, 5 energy projects were submitted to the Environmental Impact Evaluation System (SEIA), representing an investment of USD 28 million. Of these, 1 projects are for electric power generation, 2 project is for electrical transmission<sup>1</sup>.

#### Detail of energy projects submitted for environmental evaluation

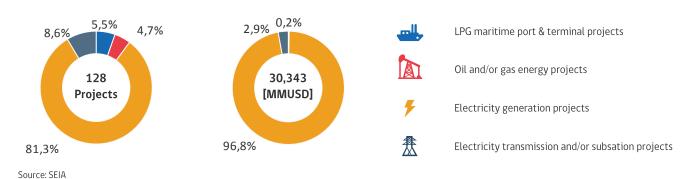
Project Type	Project Owner	Project Name	Presentation Date	Investment [MMUSD]	WEB
Generation	TECNORED S.A.	Planta Generadora Tapihue II	23-dic-2016	3,5	<u>Link</u>
Subestation	Sistema de Transmisión del Sur S.A.	Subestación Llanquihue	22-dic-2016	13,4	<u>Link</u>
Oil and/or gas energy projects	Empresa Nacional del Petróleo - Magallanes	Construcción de la Línea de Flujo Cahuil ZG–1	16-dic-2016	0,05	<u>Link</u>
Oil and/or gas energy projects	GeoPark Fell SpA	Fractura hidráulica y construcción de línea de flujo pozo Kimiri Aike 4		1,5	<u>Link</u>
High-voltage electricity transmission line	Chilquinta Energía S.A	PROYECTO LINEA 2X110kV A SUBESTACIÓN MAYACA	22-dic-2016	10,0	<u>Link</u>

Source: SEIA

#### 2 Energy Projects Currently Being Evaluated

In December 2016, **128** energy projects awaiting approval of their environmental qualification resolutions (RCA). Of these, **81%** are projects related to electric power generation, and the remaining are mixed projects. Together, they represent a total investment of **30,343 MMUSD**.

#### Distribution of Projects and their Investment [millions of USD]



22









#### 3 Projects with Approved Environmental Qualification Resolution

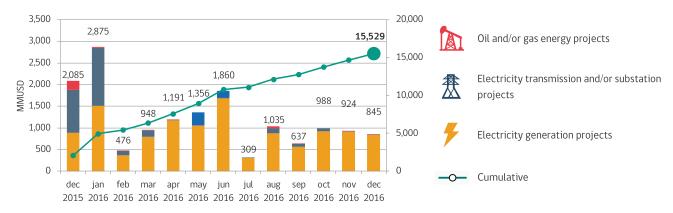
In December 2016, the environmental qualification resolutions (RCA) of 12 energy projects were approved. Of these, 8 projects are for electric power generation with total capacity of 462 MW and 2 projects are for electricity transmission<sup>1</sup> and 2 project is for oil and gas. Together they represent a total investment of USD 1,380 million.

Presentation Date	Project Type	Region	Project Owner	Investment [MMUSD]	Web
06-dic-2016	Generation	VI	Cidón Solar	18,4	<u>Link</u>
05-ene-2017	Generation	II	Ibereólica Solar Elena SpA.	535,0	<u>Link</u>
29-dic-2016	Generation	VIII	Parque Eólico El Nogal SpA.	25,0	<u>Link</u>
23-dic-2016	Generation	Ш	ACCIONA ENERGĪA CHILE SpA	101,0	<u>Link</u>
23-dic-2016	Generation	II	CEME1 SpA	608,0	<u>Link</u>
20-dic-2016	Generation	RM	CHESTER SOLAR IV SpA	15,0	<u>Link</u>
19-dic-2016	Generation	VII	CHESTER SOLAR VII SPA	20,0	<u>Link</u>
16-dic-2016	Generation	Ш	PRIME ENERGIA SPA	50,0	<u>Link</u>
15-dic-2016	Oil and/or gas energy projects	XII	Empresa Nacional del Petróleo - Maga- llanes	1,8	<u>Link</u>
15-dic-2016	Oil and/or gas energy projects	XII	Empresa Nacional del Petróleo - Maga- llanes	1,2	<u>Link</u>
14-dic-2016	Subestation	VI	Sociedad Concesionaria Embalse Convento Viejo S.A.	2,5	<u>Link</u>
13-dic-2016	High-voltage electricity transmission line	RM	CHILECTRA S.A.	2,31	<u>Link</u>

Source: SEIA

In line with the above table, the evolution is presented for the last mobile year of investment associated to energy projects have received a favourable RCA. The total investment to date totalled USD 15,529 million. In particular, energy power generation projects have a total investment of USD 11,851 million (76.3%), equivalent to 6,105 MW approved.

#### Investment evolution - Approved projects with RCA in the last 12 months



Source: SEIA

<sup>&</sup>lt;sup>1</sup>The high-voltage electricity transmission line and substation projects are included in the electricity transmission projects.



#### SECTORIAL REGULATIONS

#### 1 Proposed Legislations in Process

Bulletin Number	Subject of the Proposed Legisla- tion	Initiative and Urgency	Current Status	Bill Submittal Date	WEB
9890-08	Amends Decree-Law No. 323 of 1931 of the Ministry of Interior and other laws.	Extreme Urgency	Second Constitutional Procedure (Senate). Approved in general discussion. Delivered bulletin with indications on 02/09/2016.	29/01/2015	<u>Link</u>

#### 2 Sectorial Regulations Published in the Official Bulletin

Exempt Resolution No. 15,469 from September 30th, 2016, of the Electricity and Fuels Superintendency, establishes the conditions, stages and deadlines for the implementation of valuing the rights related to land use procedure, referred in twenty-third transitory article of Law No. 20,936, published in the Official Bulletin on December 3rd, 2016. Link

Supreme Decree No. 10T, from September 27th, 2016, of the Ministry of Energy, Rectifying previous Supreme Decree No. 9T, of 2016. It fixes average node prices in the Central Interconnected System and Interconnected System of the Great North, in order to Law No. 20,928, were are defined mechanisms of equity in electric service fares. It was published in the Official Bulletin on December 15th, 2016. Link

Supreme Decree No. 115, dated August 23rd, 2016 of the Ministry of Energy, which modifies Supreme Decree No. 7 of 2015, of the Ministry of Energy, which authorizes Aes Gener SA. to export electrical energy to the Republic of Argentina and the Supreme Decree No. 106, dated 2016, of the Ministry of Energy, published in the Official Bulletin on December 24th, 2016. Link

Supreme Decree No. 122, dated September 13th, 2016 of the Ministry of Energy, amending Supreme Decree No. 327 of 1997, of the Ministry of Mining, which establishes Regulations of the General Electric Services Law, published in the Official Bulletin December 30th, 2016. Link

Exempt Resolution No. 908, dated December 23rd, 2016, of the National Energy Commission, which approves the indicated consumption groups, in accordance with the provisions of CNE Article No. 6, from Exempt Resolution No. 164, 2010, were is established, consolidated, coordinated and systematized the Resolution No. 386 exempt, 2007, from the National Energy Commission, which establishes rules for the proper application of Article No. 148 of DFL No. 4, from the Ministry of Economy, Development and Reconstruction, of 2006, Electrical Services General Law, published in the Official Bulletin on December 30th, 2016. Link

#### 3 Sectorial Regulations Not Published in the Official Bulletin

Exempt Resolution No. 845, dated December 7th, 2016, which appoints members of the Special Consultative Committee that will collaborate in the elaboration of Technical Standard of Homologation of the matters contained in Procedures for the operation management and toll management of future Complementary Services mentioned in Decree No. 130 of 2011, of the Ministry of Energy. This in accordance with Resolution CNE No. 825 of 2016, and were is set a deadline for the holding of the first session of its constitution. Link

Exempt Resolution No. 846, dated December 12th, 2016, which approves final technical report for the average node pricing for both, Central Interconnected System and the Norte Grande Interconnected System of January 2017. Link









#### 3 Sectorial Regulations Not Published in the Official Bulletin

Exempt Resolution No. 849, dated December 12th, 2016, which approves preliminary bases for National and International Public power and electric energy tender supply for regulated consumers. Energy Tender Supply 2017/01. Link

Exempt Resolution No. 861, dated December 15th, 2016, which rectifies and replaces the final technical report for the establishment of average node prices for the Central Interconnected System and the Norte Grande Interconnected System of January 2017, approved by Exempt Resolution No. 846 from 2016. Link

Exempt Resolution No. 888, dated December 19th, 2016, which amends the text of the bidding bases in New Works contemplated in Exempt Decree No. 373 of 2016, of the Ministry of Energy, which establishes an Expansion Plan for the Electricity Transmission Trunk for the following twelve months, approved by Exempt Resolution CNE No. 567, of 2016. Link

Resolution Exempt No. 889, dated December 19th, 2016, Appoints representatives of the Civil Society Council of the National Energy Commission and sets deadline for its first meeting of constitution. Link

Exempt Resolution No. 910, dated December 23rd, 2016, which communicates value of the indices contained in the formulas applicable to energy supplies fares for regulated customers. Link

Exempt Resolution No. 914, dated December 26th, 2016, which declares and updates generation and transmission facilities under construction. <u>Link</u>

Resolution Exempt No. 921, dated December 28th, 2016, which establishes provisions indicating, for the publication of the information related to the yearly investment value and administration, management and operation costs of each transmission facilities, in accordance with Article 72–8 (i) of the General Electric Services Law, on the Public Information Systems of the Independent Coordinator of the National Electric System. Link

Exempt Resolution No. 938, dated December 29, 2016, which approves revision of the Report on the Definition and Programming of Complementary Services 2015 and the new Report on the Definition and Programming of Complementary Services 2016, all of the CDEC-SIC, according to schedule In Article 6 of Supreme Decree No. 130 of 2011 of the Ministry of Energy. Link

Exempt Resolution No. 939, dated December 29, 2016, which approves the Report on the Definition and Programming of Supplementary Services 2016 of the CDEC-SING, in accordance with the provisions of Article 6 of Supreme Decree No. 130 of 2011 of the Ministry Of Energy, with the exception of the section that indicates. Link

Exempt Resolution No. 940, dated December 29, 2016, approving Technical Report on the Eleventh Transitory Article of Law No. 20.936, on adjustments to the content of Supreme Decree No. 14 of 2012, which sets rates for Subtransmission Systems And Additional Transmission and its indexing formulas. Link

Resolution Exempt No. 941, dated December 29, 2016, Resolution of the beginning of the process of preparation of Annexes of the Technical Standard of Quality and Security of Service, in accordance with the provisions of Resolution CNE No. 754 of 2016, which Approves an annual work plan for the elaboration and development of the technical regulations corresponding to the year 2016. Link

Exempt Resolution No. 942, dated December 30, 2016, The process to form the register of interested institutions and users, referred to in article 131° ter of the General Electric Services Law, is hereby declared open. Link

#### 4 Expert Panel Rulings

During the period , the Panel of Experts did not issue any ruling.

## Comisión Nacional de Energía

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