Unlocking Value in New Markets

- Enel Green Power stands out from competition due to its ambitious growth plan of adding 4.6 GW in 2018 focused on Latin America and new markets, that will unlock share value.
- New markets’s value comes from long-term cash flow contracts, that secure remuneration for the company (and its shareholders) and the strong pipeline of projects from increased support of governments.
- We expect further regulation changes in Europe to be minor in terms of impact for EGP and our biggest concern in this sector is related with the evolution of market prices, which were assumed to decrease in the short-term.
- We foresee that the cost efficiency plan together with the capacity addition will allow the company to increase earnings per share, from 0.11 in 2014 to 0.16 in 2017.
- We evaluate Enel Green Power with a target price for 2015 of 2.3€ and a buy recommendation. Based on a Sum-of-the-parts valuation through DCF method and the analysis of multiple scenarios that in our view cover the different business risks.
- Principal risks to consider are: exposure to market prices and regulatory changes in Europe, that could decrease the price to 1.6€; And emerging markets political environment uncertainty that could also impact PT by 30 cents.

Company description

Enel Green Power is an Italian multinational company, focused on development and management of energy generation from renewable sources present in Europe, North and Latin America. It currently owns 9485 MW installed in different technologies from wind, to solar, hydro and geothermal. It resulted as a carve-out of Enel in 2010 when it floated 30.8% of its stake into the markets.
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Recommendation

Currently the renewable sector in Europe is slowing down as most of the market players are moving towards other regions with less regulatory complexities, a more stable investment environment and greater pipeline of projects. EGP is doing its part by differentiating its geographical base and is directing the majority of its additional capacity to Latin American countries like Brazil and gradually other emergent markets, namely African and middle-east countries.

Latin America has been showing a great resilience in supporting investment in renewable technology, and I expect other emergent markets to follow the same track. Besides, the incrising population and modernization of these countries have led electricity demand to increase which is a good sign for those investing.

Another important aspect of these developing countries which is vital for EGP’s strategy is the their use of PPAs to contract new projects which imply stable long-term cash flows for the parent company.

With this strategy of new markets EGP will be a first mover and will be able to set a track record in these countries that will ease future projects of expansion in those regions and will position the company one step ahead of the competition in my opinion.

Another comparative advantage for the company is the diversification in terms of technology, which helps reducing availability risk significantly, reducing operational risk.

In the North American market we see a short-term source of growth mostly in the wind sector. However the company will probably keep focusing most of its growth in emerging markets, specially with this uncertainty regarding the extension or not of the Production Tax Credit.

However one aspect that seems to have been unlocking value in this markets is the appetite for renewable assets, seen in the yieldCo market and asset rotation deals, that could allow some crystallization of value in the future for EGP, enabling the company to accelerate its expansion plan.

My recommendation for the market is a buy on Enel Green Power, as can be seen by the price target for 2015 of 2.3€ that implies an expected price return of 37% in one year and a return on invested capital improving from 5% in 2014 to 7.5% in 2020.
Company overview

Enel Green Power (EGP) is an Italian multinational company, focused on development and management of energy generation from renewable sources around the world. It was created in December 2008 as a subsidiary of Italian principal energy player, Enel, and it is a publicly traded company on the Italian stock exchange since November 2010 when Enel floated in the markets 30.8% of its stake.

The main purpose of this IPO for Enel was to reduce the debt level and avoid a rating downgrade. This followed a market trend in place, since 2006, by other utilities like EDF, Iberdrola and EDP. Through these IPO’s of minority stakes utilities took advantage of very favourable market conditions regarding appetite for renewables, reaching multiples of 16 to 25 times EBITDA. This allowed utilities to raise high amounts of capital, which were then employed in financing their operations (growth), debt reimbursement or achieving investment-grade ratings. However some did not choose this path, as was the case of E.On or RWE, that chose to retain full control of their renewable operations. This can be related to perceiving their renewable portfolio to be small when compared to competitors, or not finding valuations attractive and the risk too high after the 2009 crisis, focusing their growth finance on institutional partners.

Business

The renewable business is characterized by renewable companies that own and manage plants that generate electricity from renewable natural sources, which is then distributed to the local grid. After that the transmission and sale of energy to the final consumer is of the responsibility of the distribution and retail company. EGP only operates in the first part of the electricity value model (generation) since it sold its retail business back in 2013.

The energy produced depends on the availability of the natural resource and the capacity of the devices to generate electricity (i.e load factor). Renewable Energy System (RES) load factors, when compared with non-renewable sources, are significantly lower because you cannot control your input. This important factor for competitiveness can grow either by an increase in availability or by improving the technology of the devices. For example wind load factor in US increased

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1 Enel Green Power flotation: testament to the resilience of the green industry? by Datamonitor
2 4-Year Moving Average
from 25% in 1999 to c. 34% in 2011, due to increase in hub height and rotor diameter\(^3\).

## Capacity

EGP has been growing in the past years to become one of the major players in the renewable sector, generating energy from a variety of renewable technologies such as wind, hydro, solar, geothermal and biomass. And in a multiplicity of locations from Italy, Spain and other European Countries, along with North and Latin American markets and a growing presence in other emergent countries. This makes the three operating segments in which the company is divided Europe, Latin America and North America.

### Table 1: Capacity Installed at September 2014

<table>
<thead>
<tr>
<th>MW</th>
<th>Europe</th>
<th>North America</th>
<th>Emergent Markets</th>
</tr>
</thead>
<tbody>
<tr>
<td>Wind</td>
<td>Italy</td>
<td>Iberia</td>
<td>Rest of Europe</td>
</tr>
<tr>
<td>2011</td>
<td>3077</td>
<td>1820</td>
<td>1080</td>
</tr>
</tbody>
</table>

Currently, EGP operates 750 plants in 16 countries. In September 2014 it had an installed capacity 9485 MW, being wind the most relevant energy source followed by Hydro generation. These two technologies alone already make more than 88% of the total capacity. These 9485 MW of installed capacity are distributed between Europe, the biggest share, North America and Latin America.

## Operations results and performance

Over the past four years, since its IPO, EGP has been able to maintain a constant and growing production level. With an increase in energy generated from 21.835 TWh in 2010 to 29.453TWh in 2013 which represents an output growth of 35% over the entire period. This growth was driven mostly by the successful expansion plan with the additional capacity installed throughout the years.

In terms of distribution of generation the technology that has gained more weight in relative terms is solar. On the other hand there has been a decrease in production by residual sources (“Other”) which is justified by the decommissioning of cogeneration plants in Iberia and Canada. Diversification has been improving as can be seen by the decreased weight of Europe.

\(^3\) 2011 Wind Technologies Market Report by US Department of Energy
production or by the more evenly distribution among energy produced from wind, hydro and geothermal.

When analysing the load factor it has remained relatively constant, but in most technologies EGP has been able to improve year after year the indicator as it can be seen in figure 12. However they differ from region to region.

Revenues increased 22%\(^4\) since 2010, while EBITDA increased by 36%. This growth is explained mostly by a volume effect, resulting from the increase in capacity and the ability to improve EBITDA margin from 60% to 65% in four years. In the renewable sector this high margins are justified by very limited variable costs. Because even though the sector is characterized by high fixed costs of installation, the variable ones are not relevant since you do not have to pay for a specific fuel, like coal, in order to produce energy or pollution costs for instance\(^5\). So variable costs, which increase with production, are close to zero in the renewable industry\(^6\).

EBITDA in 2010 was highly concentrated in Europe, and even though EGP wants to decrease this weight it is still very relevant. We should note the impact on EBITDA of the regulation changes in Spain last year which was negative in 50€ million in 2013 and in the first 9 months of 2014 was negative in 67€ million. In Latin America and North America EBITDA has been steadily increasing due to both a volume effect and a price effect, although the volume effect is much more significant.

**Strategic outlook**

The strategic outlook of EGP for the next years sits on four essential topics: international expansion to new markets; Diversification of operations; Optimization of costs; Solid Capital Structure.

- **International Expansion**

For the past years EGP has been directing its investment to new regions and countries and it intends to keep this strategy to take advantage of more stable long-term cash flows, through PPA agreements present in most developing countries. This allows the mitigation of part of the regulatory risk, that as became a significant problem in the most mature markets like the European one. However even though it mitigates the regulatory risks there are some new risks

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\(^4\) Excluding other income (related to sale of assets)

\(^5\) How to Compare Power Generation Choices by Renewable Energy World

\(^6\) Cost and Performance Assumptions for Modeling Electricity Generation Technologies by National Energy Renewable Laboratory
associated with this choice as the non-enforcement of the PPA contracts or the political risk inherent to some new markets like the African countries.

I do believe this is a value creating strategy, because as we will see further on there is a lot of potential for growth in emergent markets. However we still remain to see how well these markets will develop in terms of stability, cash flows, and production levels.

In order to avoid further risks or losses, the company vouches to a thorough scouting process in order to choose sites for new plants. This process favours high availability of resources and a stable regulatory framework, as some macroeconomic aspects like GDP and power demand growth, ease of doing business and dependency on energy.

- **Diversification of operations**

Another very important aspect is the diversification in terms of technology. The weight of wind capacity in EGP’s portfolio has been consistently increasing in the past years, from 43% in 2010 to 60.2% currently. Aligned with this the company has made an effort to diversify into other technologies, especially solar, decreasing its reliance on hydro capacity.

While in 2011 90% of the additional capacity was focused on wind, in the most recent plan the company’s intentions were to have a level of only 70% of the additions in the wind segment. This has the objective of reducing the availability risk to which the company is subject. So EGP’s targets continue to devote a high weight to wind energy, favouring however a more equally investment distribution among other sources.

In my opinion, this is a differentiating factor among the market, and it can decrease availability risk comparing with the competitors that operate only one technology. However it also can diminish the company’s evolution in the specific sectors. As it is focused in more than one technology it might not have the structure to be a leader in all of them, which can eventually lead to disposal of plants if they do not enhance value.

- **Optimization of Costs**

The third aspect of the strategy of the company is to optimize costs. Firstly this implies the optimization of Engineering, Procurement and Construction (EPC) costs, which is basically translated in the Capex/MW invested each year.

Secondly the company also has plans to grow on their integrated and global operation and maintenance (O&M) approach. This implies a reduction in portfolio volatility, lost production factor and O&M per MW. Basically this expresses a
decrease of the risk of non-performing operations which eventually decreases the risk of the business and improves stability.

I am sceptical about this cost reduction plan based on the fact that it is not completely clear how the company will effectively do it. However they have been able to decrease these costs when comparing with previous periods due to economies of scale and the reshuffling of the technology mix with additions at lower costs. So I do believe they might be able to sustain it for the rest of the plan.

### Solid Capital Structure

The last objective is related to capital structure as the company aims at keeping it constant. This is an aspect of vital importance because renewable energy is a capital intensive business and financing needs are essential to sustainability.

This strategy implies that growth will be financed mostly by generated cash flows with no need to increase leverage from the current 44% ratio. I do believe this is feasible considering that in the previous two years the company already employed an ambitious capacity plan and the cash flows were enough to meet capital expenditures, being able to resort to debt but without leveraging more the company. However we must recall that cash flows are not certain, and unpredictable changes, for instance in regulations or contracts terms, can affect a company’s flow and compromise these targets.

### Comparables

When comparing EGP’s strategy with some of its comparables we conclude that EGP additional capacity plan (4.6GW by 2018) is certainly the most ambitious one, considering EDPR aims to add only 2GW by 2017 and Iberdrola 1.2GW by 2016. The focus of the investment is also different, EDPR is also betting on security of cash flows through long-term contracts but, in opposition to EGP, more than half of the investment is directed to the United States. Iberdrola on the other hand is exploring and setting track records in new markets in terms of technology, especially wind offshore, exiting some non-core markets.

Optimization costs are also a priority for EDPR and Acciona. Not for Iberdrola since the company has already achieved its targets in terms of operation expenditure efficiency (initiated before). To be noted that EDPR has made a lot of use of asset rotation deals to finance its growth which is beginning to appear as a possibility for EGP (prospect deal in the US).

EGP’s strategy in terms of improved efficiency is in line with the market, however its capacity plan clearly stands out due to its ambitious scope and focus on new markets. I do believe this bet can bring a lot of value to the company, because...
the European market is saturated and does not favour renewables as they used to. The uncertainty in US regarding PTC is also a drawback. Regarding investment in new technologies like wind offshore they are still too pricey in my opinion for EGP to include it in its short to medium term plans.

**Additional capacity and track record**

As said we are now witnessing a great effort to diversify the business in terms of technology and geography. Considering projects in execution, which are the future plants that EGP is already constructing or that are ready to build, EGP has currently 1990 MW in execution, of which 1144 MW are already under construction, 857MW of which in Latin American.

**Table 2: Total Projects in Execution at September 2014**

<table>
<thead>
<tr>
<th>MW</th>
<th>Europe</th>
<th>North America</th>
<th>Emergent Markets</th>
<th>TOTAL</th>
</tr>
</thead>
<tbody>
<tr>
<td>Wind</td>
<td>30</td>
<td>424</td>
<td>610</td>
<td>199</td>
</tr>
<tr>
<td>Hydro</td>
<td>2</td>
<td>0</td>
<td>152</td>
<td>0</td>
</tr>
<tr>
<td>Solar</td>
<td>0</td>
<td>0</td>
<td>146</td>
<td>314</td>
</tr>
<tr>
<td>Geothermal</td>
<td>38</td>
<td>0</td>
<td>0</td>
<td>0</td>
</tr>
<tr>
<td>Other</td>
<td>75</td>
<td>0</td>
<td>0</td>
<td>75</td>
</tr>
<tr>
<td><strong>TOTAL</strong></td>
<td><strong>145</strong></td>
<td><strong>424</strong></td>
<td><strong>1421</strong></td>
<td><strong>1990</strong></td>
</tr>
</tbody>
</table>

Of these projects in execution 64% are in wind plants, 23% in solar, 7% Hydro.

All of this supports the business plan of EGP to increase its installed capacity by 4.6GW between 2014 and 2018 to a level of 13.5 GW.

In table 4 we can see EGP sustains a track record of close to 1GW installed per year since 2011 which has always been in line with the company’s targets that were proven to be reasonable. This and the fact that at September 2014, only 800MW were left to be contracted to reach the 4.6GW target in 2018 leads me to believe that the company will indeed be able to complete the capacity addition. Besides in my forecasts I assumed capacity addition in the end of 2018 to be up the target by 300MW to 4.9 GW.

When comparing with other players from Southern Europe, EGP is the second largest company in terms of installed capacity and it wishes to solidify even more this fact with the ambitious additional capacity proposed.

Even though both EDPR and Iberdrola are less dependent on European assets they are not as diversified as EGP since they only have two principal regions. Acciona also has some capacity in the emergent markets but 70% alone depend on Spanish capacity. Acciona, along with EGP, is present only in Mexico however it has projects under construction in Chile, Brazil, Costa Rica and South Africa. In terms of diversification of technology, both EDPR and Iberdrola have almost exclusively wind projects and the only one more diversified is Acciona.
We must also refer the company has made same divestments in the end of 2014, with the total sale of its French assets that totalled 196 MW and in 2013 contributed with 20€ million of consolidated EBITDA to the parent company. EGP justifies this sale by wanting to focus more on markets with greater potential. This seems a reasonable decision, that will free-up resources to apply in better investments, since France’s was not able to sustain an attractive market for renewable growth, proved by its inability to meet the EU interim renewable target.

EGP has also to complete an asset rotation deal in the US of 700MW of capacity in different technologies, yet no further disclosures have been made on this topic. However this would allow the company to finance part of its capacity additions plan and if we compare the most recent deal done by EDPR with an implied value of 2€ million per MW with our US valuation of 1.2€ million I am confident that this deal will indeed monetize some asset value for the company.

In operational terms, by analysing the past strategic plans of the company we can realize that EBITDA targets have been lowered since 2011 when the company believed it would have an EBITDA of 2.5€ billion in 2015 which is clearly unrealistic. I do believe however that the company will be able to meet its EBITDA targets for the next couple of years based on the fact that remuneration is now more dependent on contracted (lower risk) prices and I do not foresee more incentives adjustments in EGP principal European markets (Italy and Spain).

As it has been said EGP sold its retail business (Enel.Si) in June 2013 to Enel Energia, a subsidiary of Enel. Enel.Si operated in the Italian retail market in the installation of renewable generation devices for end users, in order to meet their demands regarding energy savings and efficiency. The total price paid to EGP was 92€ million and it was used to amortize debt having a positive impact in the capital structure. The impact on EBITDA of this transaction is not material since the contribution in 2012 of Enel.Si to EBITDA was 13€ million, which equals a 0.7% of the total amount. However in strategic terms it is relevant since it reinforces the strategy of maintaining a focus on developing and operating energy plants only.

In terms of margin and load factor comparing with other market players, it has indeed room to improve if we consider EDPR margin is significantly better as are both wind load factors of Iberdrola and EDPR.

**Capital Expenditure**

In terms of capital expenditure it has been decreasing on a yearly basis. While in 2011 65% of the annual investment was being allocated to Italy and the rest of
Europe (excluding Iberia), in 2013 only 32% of the Capex was directed to that region. On the other hand share of capex devoted to Latin America (including Iberia) went from 17% to 57%. In terms of technology, the majority of the investment has been on wind, but it is noted a shift from solar investment to geothermal last year. The focus of the investment has been, in all years, more than 85% devoted to expansion of capacity, and the rest to maintenance.

Table 6: Capex Data

<table>
<thead>
<tr>
<th>Year</th>
<th>Total Additional Capacity (MW)</th>
<th>Growth Capital Expenditure (Millions of €)</th>
<th>€/MW</th>
</tr>
</thead>
<tbody>
<tr>
<td>2010</td>
<td>392</td>
<td>934</td>
<td>2.38</td>
</tr>
<tr>
<td>2011</td>
<td>889</td>
<td>1444</td>
<td>1.62</td>
</tr>
<tr>
<td>2012</td>
<td>930</td>
<td>1339</td>
<td>1.44</td>
</tr>
<tr>
<td>2013</td>
<td>944</td>
<td>1148</td>
<td>1.22</td>
</tr>
<tr>
<td>2014-2018</td>
<td>4600</td>
<td>5400</td>
<td>1.17</td>
</tr>
</tbody>
</table>

By the table we can see that capital costs per MW installed have largely decrease since 2010, even though additional capacity per year has been increasing the total investment has been decreasing. This decrease in costs has been possible due to the increase in competition of manufactures and improvements of technology.

Future wise I expect market to become more efficient with a further increase in competition and consequent decrease in cost per unit, mostly fuelled by developments in China and other emergent countries manufactures.

**Capital Structure**

EGP structure sits on a 44% leverage ratio in 2013, which is a level the company wants to sustain for the future since they intend to fund their next years growth with generated cash flows.

In terms of financing and debt structure EGP gross debt total was €6.3 billion in 2013 of which the great majority is in Euros and has a long-term maturity. According to the company the average maturity is 6.5 years and close to three quarters were characterized by a fixed and hedged interest. From this total debt 48% was entitled to “third parties” such as Development financial institutions, Export Credit Agencies, Tax partnerships in the US or banks while EGP loans from related parties, namely from Enel Finance International, represented 52% of the nominal value of long-term debt. Net financial debt total was €5.4 billion in the end of 2013, an 18% increase when compared with 2012. The average cost of debt has been increasing from 3.5% in 2010 to 4.8% in 2013.

So far, the company has been financing its growth and operations using a mix of cash flow from operations and debt. However since 2012 the company has been able to finance its capex only with cash flow from operations, even though it

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7 Does not include maintenance investment.
resorts to debt to be able to meet all other expenses, like interests and dividends. This is what I expect to continue to happen in the coming years, with the increase in cash flows generated from new markets, reaching free cash flow parity in 2017. Again, there is always the risk that the expected cash flows do not materialize, but I am confident that the company has expertise enough to secure the new markets operations.

Future wise EGP also intends to have debt denominated in a more evenly distributed distribution of currencies, by “gearing up foreign subsidiaries with local currency debt” in order to exploit low cost opportunities of some of the new markets they’re entering. In my view there is an opportunity to secure debt financing from local development banks in Latin America, since the company has already secured some loans and according to Climatescope14 there are favourable conditions in these debt markets. And if we consider that most of these countries (Brazil, Chile, Mexico) have credit ratings similar to the Italian one the company is actually diversifying its currency base without increasing default risk.

Regarding credit rating, Italy’s credit rating outlook has been revised upwards by all agencies in 2014, but S&P has cut its rating in December 2014 due to limited GDP growth prospects. However Enel (EGP’s parent) did not suffer the same downgrade because the agency believes it not to be entirely constrained by the sovereign risk. Moodys and Fitch evaluations of Enel were adjusted last in 2012. They all reflect a “lower medium grade” for investment. With these outlooks we do not expect any major changes in EGP underlying cost of debt.

<p>| Table 7: Italy and Enel Credit Rating |</p>
<table>
<thead>
<tr>
<th>S&amp;P</th>
<th>Outlook</th>
<th>Moodys</th>
<th>Outlook</th>
<th>Fitch</th>
<th>Outlook</th>
</tr>
</thead>
<tbody>
<tr>
<td>Italy</td>
<td>BBB-</td>
<td>Stable</td>
<td>Baa2</td>
<td>Stable</td>
<td>BBB+</td>
</tr>
<tr>
<td>Enel</td>
<td>BBB</td>
<td>Stable</td>
<td>Baa2</td>
<td>Negative</td>
<td>BBB+</td>
</tr>
</tbody>
</table>

Source: S&P, Moody’s and Fitch Communications

EGP resulted from the spin-off of the renewable activities of Italian’s energy company Enel when it decided to put close to one third of the capital on free float in the Italian Stock exchange. This fact obviously has a big impact on shareholder structure since 68,29% of the total capital is controlled by Enel, privately. We also know that in terms of share capital composition, 68,3% is strategic (Enel), 13,9% is retail and 17,8% is institutional.

This structure implies that Enel still retains most of EGP’s created value, and so EGP is very dependent on the parent company’s strategy success but also failures which an independent shareholder must take into consideration. In my opinion, the support of Enel is beneficial to EGP due to the expertise the company already has in the Italian energy market and worldwide, which might
speed up some of EGP penetration processes in new markets and support its growth ambition.

A potential investor should bear in mind the risks of multiple transactions with related parties that might not always be equally beneficial for both parties. To prevent this EGP has a defined corporate governance structure and created an independent Related Parties Committee in 2013 to guarantee the fairness of these transactions.

The dividend policy of EGP has been to employ a 30% payout ratio, based on the group’s net income, and distribute them through the shareholder base, retaining the rest of the profits to reinvest in the business. With the continuing of the ambitious business plan there is no indication that this payout ratio should change in the close future. Shareholder structure also seems relatively stable, mostly secured by the heavy weight of Enel.

A final aspect to refer is the possible buyback of the public shares by the parent company Enel, as occurred with Iberdrola Renewables and EDF Energies Nouvelles in 2011. This happened for two different reasons, Iberdrola had achieved the goals intended with the IPO and took advantage of a low share price at their view (48% decline since IPO). On the other hand EDF buy back was related to two different reasons, the increase in complexity of renewable projects that were becoming more industrial but also to mitigate some of the company’s dependence on nuclear power.

In my opinion, what might motivate a buy back by Enel is the undervaluation of the share price. This can be a positive point for the current or future shareholder since Enel might be willing to buy back the share at some premium, as it is common in these cases.

### Market

#### Payment Mechanism

One aspect that we consider is very relevant and must be explained when exploring the renewable business and EGP is the payment mechanism, since it is not the most linear or simple process. In reality there is only one way to get the energy produced out the plant, through the grid. However there are various forms of payment. As renewable energy is a relatively recent market, consider that in 2002 only 1.6% of total electricity production came from renewable sources other

<table>
<thead>
<tr>
<th>Technology</th>
<th>Cost $/MWh</th>
</tr>
</thead>
<tbody>
<tr>
<td>Wind</td>
<td>80.3</td>
</tr>
<tr>
<td>Hydro</td>
<td>84.5</td>
</tr>
<tr>
<td>Biomass</td>
<td>102.6</td>
</tr>
<tr>
<td>Solar</td>
<td>130.0</td>
</tr>
<tr>
<td>Coal</td>
<td>95.6</td>
</tr>
<tr>
<td>Natural Gas</td>
<td>66.3</td>
</tr>
</tbody>
</table>

Source: International Energy Agency
than Hydro\(^8\), there were a series of incentives put in place to help the renewable companies enter the market. These incentives had the objective of helping companies face the higher generation cost of the industry, encouraging the investment in this type of energy production. This generation cost has been decreasing with time as can be seen in table 2.

The most common methods of payment in the market can be divided in two categories: Subsidies given by the governments or specific renewable energy auctions.

Subsidies are stated in the country’s regulation and can be of the following types:

- **Feed-in-tariffs\(^9\)** (FiT): characterized as a fixed price per MWh paid to the renewable energy generator in accordance to its technology cost, above the market price. Countries: Italy, Portugal, Greece, France;

- **Production Tax Credit\(^10\)**: is a per-kilowatt-hour (kWh) tax credit for electricity generated by qualified energy resources and sold by the taxpayer to an unrelated person during the taxable year. Countries: United States;

- **Investment Tax credits\(^11\)**: reduces the tax liability for individuals or businesses that purchase qualifying solar energy technologies. Countries: United states;

- **Green Certificates\(^5\)**: is a tradable commodity proving the production and the use of a certain amount of renewable energy. Countries: Italy, Romania.

- **Feed-in-Premium\(^6\)**: paid to the producers in addition to the market price.

The auction mechanism, mostly present in the US and developing countries, is the major source of growth expected by EGP, and is organized by government’s agencies. The government issues a call for tenders to install a certain capacity of renewable energy-based electricity with defined requirements, and the bidder proposes a certain electricity price at which they are able to do the project. The result is the signature of a Power Purchase Agreement (PPA) between the renewable company and the government which will guarantee that renewable companies will have all its electricity generated bought at a fixed price for a predefined number of years (usually 20 or 25). This guarantee can be used to facilitate the financing of the project\(^12\).

The incentive for renewables inherent in this mechanism is the certainty that all energy produced is sold, so as long as the price agreed is able to cover the full

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\(^8\) *Worldwide electricity production from renewable energy sources* by Observ’ER and Fondation Énergies pour le Monde

\(^9\) *Methodology for calculating subsidies to renewables*, by International Energy Agency (IEA)

\(^10\) *Database of State Incentives for Renewables & Efficiency*

\(^11\) *Solar Energy Industries Association*

\(^12\) *Renewable Energy Auctions in Developing Countries* by International Renewable Energy Agency (IRENA)
costs of the production expected, renewable investment is secured. To help prevent deficits, similar to the ones generated by FIT, the government can set a ceiling to the auction process, so it is not higher than the revenues collected from the overall electricity price paid by consumers.

Europe

For EGP the European renewable market in terms of growth prospects is already well explored and the company does not have many competitive advantages in growing in this “saturated” market. However it is still very dependent on it and in 2013 75% of EBITDA resulted from the region.

The first aspect to refer when analysing the European renewables is the climate and energy package adopted in 2009. The package defined targets for 2020 regarding renewable energy, the “20-20-20”, setting three different objectives for the European Union until that date: a 20% reduction of greenhouse gas emissions from 1990 levels, raising the consumption from renewable sources to 20% and a 20% improvement in the EU’s energy efficiency.

In order to comply with these targets there has been a great effort by the EU members to increase the presence of RES. In 2013 generation from renewable sources in the European Union was 9257.5TWh, which represents a share of 27.5% and a growth between 2003 and 2013 of 9%\textsuperscript{13}. This high growth was encouraged by national targets, adjacent to the European ones, that were supported by country-specific frameworks, like tax exemptions and price incentives. For example in Romania companies that produce energy from renewable sources can use accelerated depreciation for tax purposes or reinvest dividends with tax exemption.

This concern is not only present in Europe, but worldwide. According to REN 21, in early 2014 at least 144 countries had renewable targets imposed and 138 had renewable support policies in place. For example China has devoted a reasonable amount of resources to renewable energy, setting the 2020 target of 200GW\textsuperscript{14}, from 800 MW in 2010, to be installed in technologies such as wind, solar and biomass.

Another important driver of growth was the significant technological improvements, mostly in wind and solar, for example by increasing the size of turbine rotors\textsuperscript{15}, the height of the turbine tower, or the development of cells for

\textsuperscript{13} Enerdata
\textsuperscript{14} China Greentech Initiative
\textsuperscript{15} Advancements in Wind Turbine Technology: Improving Efficiency and Reducing Cost by Renewable Energy World
solar panels that use alternative materials to silicon, allowing a better performance.

However a slowdown in investment is to be noted, down 44% from 2012 to 2013, driven mostly by the change in the regulatory framework in the recent past and the retroactive tariff changes\textsuperscript{16} in the region.

- Italian Market

Italian electricity, or energy, market is not very competitive with other European countries since it faces three main challenges that limit its competitiveness\textsuperscript{17}: higher prices for businesses and households comparing with rest of Europe; suboptimal security of supply in terms of natural gas: high dependence on imported fuels; and economic and financial difficulties experience by market players. This negative scenario is completed by a decrease in electricity demand that in the first eleven months of 2014 was 2.8% adjusted\textsuperscript{18}.

To keep the needs of environment sustainability but also, to reach competitiveness, according to the national energy plan, Italy will focus on four main goals: reduce the cost gap; exceed 2020 environmental and decarbonisation targets; improve the security of supply especially in the gas sector; and endure sustainable economic growth. The second and last goals are the most relevant for EGP because they are closely related with green energy and the renewable sector.

Italian market prices, even with a 11% decrease since January, when compared to other European electricity prices have been one of the highest with an average in June 2014 of 49€/MW when the European average was 40€/MW for the same period. This is explained by the dependence on imports to meet domestic demand and the dependence on natural gas\textsuperscript{19}. As so, the recent decrease in the price of natural gas, and also, the renewable generation penetration in the Italian market have led the Italian prices to decrease.

The priorities of action for the country until 2020 are to turn the gas market into a competitive one, bringing costs down and trying to be a door for imported gas into southern Europe. In terms of sustainable development it must align the level of incentives with the European ones and endorse development in other renewable sectors, besides electricity, like thermal and use of waste. Finally an

\textsuperscript{16} Global Trends In Renewable Energy Investment 2014 by Frankfurt School-UNEP Centre
\textsuperscript{17} Italy’s National Energy Strategy: for a more competitive and sustainable energy by Ministero dello Sviluppo Economico
\textsuperscript{18} Terna
\textsuperscript{19} Quarterly Report on European Electricity Markets, Volume 6 and 7 by EU Market Observatory for Energy
important aspect for EGP in the priorities plan is the modernization of the system governance which is more cumbersome than other countries.

So for EGP this national Italian plan might not be all good news, even though a more stable market will eventually benefit the company. In terms of electricity price and its decrease, EGP is subject to their volatility in the hydro and geothermal sector which represent close to 59% of the generation of the European segment, and big changes in this indicator can diminish the company's performance. However the company has been investing in hedging sales at predefined prices in order to better control this fluctuations.

A final note, in a long view perspective, with the current business plan, this Italian exposure, and its setbacks, will decrease as EGP completes the expansion and diversification into other markets.

- Regulatory and Policy Environment

With respect to the region performance of the 20–20–20 targets: of the 28 member states, 22 met the interim 2011/2012 milestone. However due to the referred changes in European framework in terms of access to finance and the remuneration level of existing support schemes, there is some doubt of whether the EU-members will be able to meet their 2020 targets or not. According to EUFORES only nine countries are expected to meet their targets (being Italy, Romania and Bulgaria among them). While Spain, France, Greece and Portugal (part of EGP’s portfolio) are not expected to meet their targets.

A big player in this uncertain framework were the renewable subsidies that have, in the recent past, suffered a deep review, due to the unbalance they created in the government’s accounts. Namely huge tariff deficits resulting from a cost with incentives higher than the revenues collected from the access tariff charged to costumers.

These unbalance in subsidies is not only a European problem, one of Europe’s competitors in terms of renewable energy is the United States and in 2013 alone the Production Tax Credit cost tax payers $2 billion. This led to a big discussion regarding the continuance or not of this measure.

In EGP’s portfolio, last year Spain was marked by the big regulatory changes with the Royal Decree 9/2013 approved on July 12, 2013. The legislation eliminated the feed-in tariff scheme and established that electricity generated from renewable resources would be remunerated at the market price, although if the market price is not sufficient to ensure “reasonable profitability” an additional

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20 EU Tracking Roadmap by European Forum for Renewable Energy Sources (EUFORES)
21 Wind Production Tax Credit Imposes High Costs by The Institute for Policy Innovation
amount per MW would be paid. In Romania an emergency measure was taken that limited the amount of green certificates traded, from 2 certificates per MWh to 1 for wind energy, and from 6 to 2 certificates traded per MWh of solar energy produced.

In the following table we can see the tariff deficits situation at 2013 in Europe:

<table>
<thead>
<tr>
<th>Comulated Tariff Debt (€ Million)</th>
<th>Spain</th>
<th>Portugal</th>
<th>Greece</th>
<th>France</th>
<th>Italy</th>
</tr>
</thead>
<tbody>
<tr>
<td>% GDP</td>
<td>3%</td>
<td>2.2%</td>
<td>0.4%</td>
<td>0.2%</td>
<td>0.1%</td>
</tr>
</tbody>
</table>

Table 9: Tariff Deficit of Selected Countries for 2013

Source: European Commission

We must understand that the tariff deficit is not exclusively related to RES, but the high incentives the sector enjoyed in the past years had definitely an impact: for example the costs with support of renewable energy in Spain increased from €1.2 billion in 2005 to €8.4 bn in 2012. In Iberia, the region with the most serious deficits problems, costumers electricity cost is now composed of 45% related to the wholesale price of energy and 55% associated with the access tariff, that has been growing with subsidies and other regulated costs.

In my opinion, countries characterized by high tariff deficits, uncertainty in terms of future remuneration schemes and retroactive changes might not be able to meet their renewable energy targets. For example Greece has met its interim targets but it’s not even halfway to the final target, so I do not expect it to happen.

In Iberia, both Spain and Portugal have been acting on high tariff deficits which will certainty decrease the renewable growth in those countries, jeopardizing the 2020 targets. For example in Portugal, with the financial crisis most of the RES incentives were abolished and some institutions believe that the new regulatory framework lacks transparency. Spain is closer than Portugal to achieve its target (which is also less ambitious), however due to the retroactive changes happening, most investors do not feel safe investing in the country because their projects might fall short. Another big setback in this country was the forced competition at market levels which for some new renewable projects is not doable.

However I do believe governments will continue to impose renewable targets and will continue incentivising renewable energy development because it is the sustainable choice for the future. But some current incentives mechanisms must certainly be revised, as some already have been. This transition naturally brings uncertainty to the framework of the region and it will be a challenge to offer

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22 Enel Green Power 2013 Annual Report
23 Electricity Tariff Deficit: Temporary or Permanent Problem in the EU? By European Comission
24 Includes the tariffs for the Global Use of System, the Use of Transmission Network and the Use of Distribution Network are paid by each electricity consumer in the Regulated and Free Market (ERSE)
25 Pulling the Plug on Renewable Power in Spain, by The Oxford Institute for Energy Studies
remuneration certainty while moving to lower incentives and integrating greater levels of variable renewables into the grid system.\textsuperscript{26}

Regarding the overall regulatory environment in the European countries of EGP’s portfolio I do not expect much more changes, or significant ones, for the close future since: Spain already made a big restructuring last year to face the tariff deficit; Italy system of incentives “FER Decree”, put in place by the Ministerial Decree of 5 July 2012 that regarded mostly solar power, was abolished and, as a result, several energy incentives expired at the end of 2013; And also Romania made an adjustment in 2013 to lower the number of green certificates. These countries represent 92% of the generation in the region.

North America

According to the US Department of Energy, United States were the second country with most installed capacity in wind, which is able to meet 4.5% of the demand needs of the country. This is translated by the $1.8 billion invested in the sector only in 2013. In the end of 2013, 74% of the capacity installed of EGP in the United States was in fact wind, and this share is expected to increase to 79% in the end of 2014 as all the projects under construction are in this sector as well.

- **Production Tax Credit**

A very relevant factor when discussing the North American Renewable sector is the support in place, the Production Tax Credit (PTC). It establishes the full credit amount of 2.3-cents per kWh produced\textsuperscript{27} from wind, closed-loop biomass, and geothermal technologies.

However, in the end of 2013 this mechanism expired. What this means is that plants that entered into operation after the end of 2013 will no longer be allowed to receive a PTC. Yet this was modified later on, allowing plants that were already under construction by 1st of January of 2014 to still be eligible for a PTC, which mitigates some of the impact on EGP’s under completion projects in the US.

This is not the first time PTC has expired, and has been later renewed. The incentive first appeared as part of the Energy Policy Act of 1992 and has been expired and extended five times\textsuperscript{28}. This of course is not good for the long-term development and stability of wind energy since developers and investors, in order to invest, have to live under a very uncertain scenario.

\textsuperscript{26} EU News & policy debates, across languages (www.euractiv.com)
\textsuperscript{27} The Renewable Electricity Production Tax Credit: In Brief by Congressional Research Service
\textsuperscript{28} Production Tax Credit for Renewable Energy by Union of Concerned Scientists
Regarding the most recent events, the Capitol is still debating on multiple tax breaks. For now the only thing certain (since December 3rd) is a one-year retroactive extension of the PTC that would expire again in the end of 2014. We believe however that there is good chance that the PTC will be renewed. In this case it is a good sign for the remuneration of EGP in the region, that will remain constant. Impact on Enel US enterprise value of the non-renovation of PTC from 2015 onwards is negative in 240€ million.

In an outlook view, growth prospects for 2015 onwards are very shaky in the country, mostly due to the expiration (temporarily or not) of the PTC and also due to low natural gas prices, modest electricity demand growth, and limited near-term demand from state renewables portfolio standards.

- **YieldCo’s**

A second aspect that is worth our attention is the most recent trend in the renewable sector in terms of deals, which are YieldCo’s and asset rotation deals. YieldCo’s appeared in the renewable market last year. They consist on the generation of a vehicle from a parent company, EGP for instance, that owns a bundle of operating assets normally in multiple renewable technologies previously held by the parent company. This vehicle is listed in a stock-exchange as a public company, but the norm is that the parent company keeps a majority of the shares of the YieldCo. The new public company is expected to generate stable long term cash flows (derived normally from the PPA agreements inherent to their assets). These cash flows are then distributed as large dividends to the shareholders. Investors can expect low-risk returns.

For the parent company this is an effective way to monetize investments, somehow earlier than if it would have kept the assets to themselves. With the proceeds from the IPO they can either pay debt, or what it normally occurs, use them to invest in new projects, increasing the growth prospects and accelerating development. For example TerraForm yieldCo, spun out of American SunEdison, used part of the $436.2 million IPO proceeds to repay outstanding debts and fees. $86 million were intend to be used for further acquisitions and obligations of the current TerraForm portfolio and $194.4 million remain in the company for corporate purposes, such as, project acquisitions from SunEdison as well as unrelated third-parties. More recently for example SunEdison used TerraForm to acquire First Wind which permits an expectation of installing as much as 2.3

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29. U.S Department of Energy  
30. A Deeper Look into Yieldco Structuring, National Renewable Energy Laboratory  
31. SunEdison yield co nets extra cash from IPO by John Parnell, PV-Tech
gigawatts of capacity next year, up from a range of 1.6 gigawatts to 1.8 gigawatts before the acquisition.

This new market so far has been performing well with double digit returns. Even though this is a good sign, the reliability of the market is not certain, for example it has not been tested in a scenario of increased interest rates where high dividend yield securities could be substituted in investors’ appetite by higher interest rate fixed income securities.

As said, an advantage of YieldCo’s is their high dividend yield, average of 3.7% versus the S&P500 average of 1.97% and the increase in dividends themselves, as was the case of NRG yield that increased its quarterly dividend by 10% in 2014 going from $1.20 per share annualized to $1.32. This benefits both the parent company that owns a majority part of the YieldCo but also the new shareholders since both get paid the dividend.

Another upside for parent companies is the higher valuation of the assets obtained in these listings that are “cleaned” from the construction risk.

Last, in comparison for example with tax equity partnerships (popular alternative source of capital in the US), a YieldCo is a lower-cost source of capital for parent companies. The rationale of this partnerships is based on firms with big tax bills investing in renewable companies in order to later collect the tax exemptions.

To note that YieldCo’s are not risk-free however, because if they intend to deliver high growth they need to be able to materialize that growth into new projects which might not be as easy if the renewable markets decelerates.

Regarding EGP, I do not believe the company will be listing a YieldCo, at least in the near future, according to comments by the company in this mid-year. Besides there is still demand from institutional partners, which is less cumbersome and risky than a YieldCo.

With this, one aspect that the yieldCo phenomenon shows is the big appetite for renewable assets. And an alternative way to take advantage of this increased demand and consequently better valuation is through asset rotations, which is a much more common strategy in Europe. Namely in EDPR’s strategy and also EGP that has stated it is looking to rotate a portfolio of 700MW comprised of multiple technologies in the US for which they already have non-binding offers.

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22 Bloomberg and Yahoo Finance
23 S&P Dow Jones Indices – November 2014 Factsheet
24 NRG Yield Press Release
25 A Deeper Look into Yieldco Structuring by National Renewable Energy Laboratory
26 An Analysis of the Costs, Benefits, and Implications of Different Approaches to Capturing the Value of Renewable Energy Tax Incentives by Lawrence Berkeley National Laboratory
Regarding this option, I believe there is an appealing price in the market and that this type of transaction can help EGP monetizing investments (hence value). Just consider the price obtained in a deal of EDPR last August with an implied enterprise value per MW of €1.16, compared with our valuation of €1.02 per MW in the North America.

Asset rotation deals, when compared to YieldCo’s, are a safer choice and consist of practically the same: the sale of a minority interest in a portfolio of operating assets to some minority shareholders; but instead of doing it in the public market to a variety of different investors, they do it to institutional partners, such as financial institutions, insurance companies, other energy players and so on, in a privately way.

**Latin America**

As it has been mentioned, EGP’s growth is expected to be delivered mostly through capacity investments in Latin America and emergent markets in Africa.

The region is now experiencing what developed countries already have which is a high growth in the overall economy as can be seen in the MSCI Latin America and Emergent markets index performance graph. In 2013 Latin America GDP growth was 2.5%\(^\text{37}\) that compares with a neutral 0.1% in the European Union. Even though the trend has been for the GDP growth to slow down across all regions, the gap between them has been consistent.

The renewable sector specifically, has experienced a constant improvement in terms of investment in capacity, according to Inter-American Development Bank it went from only 1.5GW in 2007 of Renewable capacity in LA to 26.6GW in 2012.

Countries are realizing the large benefits renewable energy can bring such as “job generation, energy security, environmental advantages, climate change advantages and technology development”\(^\text{38}\). In terms of costs, for governments it is not as demanding as for European countries, for instance, because energy prices are higher in Latin America, than in Europe or US\(^\text{39}\). So they do not need to subsidize renewable energy so much as the market price is high enough to cover the renewable cost. In early 2014 at least 19 countries in the region had renewable energy policies, and at least 14 had renewable energy targets\(^\text{40}\).

Regarding availability of natural resources, LA has a very good potential. And IADB states that Latin America and the Caribbean could meet 100% of their

\(^{37}\) World Bank

\(^{38}\) *Latin America Enjoys Abundant Renewable Energy but Lacks Policies for Use*, by Scientific American

\(^{39}\) *The rise of renewables in Latin America* by Global Trade Review

\(^{40}\) *Renewables 2014 Global Status Report* by REN21
electricity needs by renewable capacity only, and that currently renewable energy is just as affordable as other fossil sources\textsuperscript{41}. Demand will also not be a limiting factor since the population is experiencing a big growth that will translate naturally in a higher demand for electricity.

- **Regional Grid**

The first aspect that must be discussed is the poor grid network and limited reach in terms of different regions. In 2012 31 million people still lacked access to electricity which implies that significant investment is still needed in this area in order to fully be able to materialize investments. To face this challenge the region is focusing on regional integration, aiming to connect different countries by the same grid in order for electricity to get to everyone at competitive prices and aiming to decrease the dependence of fuel prices and their volatility.

Efforts in this direction have been shown by multiple countries of the American continent, for example with the program “Connect 2022” presented by both Colombia and the United States and that boldly propose an integration of the electrical system for the continent. The SIEPAC\textsuperscript{42} initiative is a regional system of transmission of energy, that connects Guatemala, El Salvador, Honduras, Nicaragua, Costa Rica and Panama with a 1800Km grid and was commissioned in mid-2013. This was the first regional effort in the direction of regional integration of electricity in the region, but there are other projects in development phase both in the Andean region, as to connect Brazil and Argentina.

This is a big challenge for the region and whoever invests on it but in my view this investment will be made and we will see a rapid evolution in terms of grid connections because it is of the most important need for the population and the development of the different countries.

- **Brazil**

Brazil was the 7\textsuperscript{th} world largest nation in 2013 in terms of GDP acknowledging the tremendous influence the country's economy can have in any market.

The target for renewable energy set in *Plano Decenal de Expansão de Energia* is of 33\% of the new capacity in 2023 being from wind and solar\textsuperscript{43}, while the current renewable share of capacity installed is 15.3\%. This value excludes large-hydro which is a very developed sector in the country, representing 64\% of national capacity\textsuperscript{41}.

\textsuperscript{41} *Climatescope 14* by Bloomberg New Energy Finance
\textsuperscript{42} Sistema de Interconexión Eléctrica de los Países de América Central
\textsuperscript{43} Associação Brasileira de Energia Eólica
Whit this, the most recent event in the Brazilian renewable market has been the severe draught, which affected the entire country and naturally their electricity production from large-hydro dams leading to an escalation of prices. This alerts us to the fact that natural sources are unpredictable but also alerts Brazil for the need to explore other sources of energy, less capital and time extensive than large hydro dams as for example wind, solar and so on.

In terms of consumption, demand is expected to increase 4.3% a year in the next decade[^44], which represents in fact the modernization of the country and the entire continent in fact. The Brazilian government’s way of incentivising renewable investment has been through an auction mechanism, implemented in 2007, which assures the contraction of electricity capacity through long term PPAs. There have been auctions dedicated exclusively to renewable capacity in which EGP has been a recurrent participant and winner.

Investment in the country has decreased since 2011 due to slow economic growth, troubled ethanol sector and low contraction of projects in 2012[^45]. The focus of the investment has clearly move towards the wind sector in the past four years. However, even with only 167$Bn invested last year, solar energy has seen in 2014 the first exclusive auction for this source and I do believe there will be an increase in investment in this sector to explore the great abundance of irradiation of the country.

Costs of this market are more related with the manufacturing of renewable devices since Brazil has high tariffs on foreign-made equipment and besides to access BNDES low-interest loans, developers must use local equipment. This is a more relevant cost in wind than in solar.

I see Brazil has a stable country in terms of energy market and regulations and I believe investment will continue to flow in the country for those interested (EGP for instance). Also security of long-term cash flows is not gravely threatened by political or economic agents.

- **Chile**

Chile is a smaller country in terms of global influence when compared to Brazil, however it has also deployed some efforts to renewable growth. Currently from the total of its installed capacity only 8.4% are from renewable sources[^46], but in

[^44]: EPE - Empresa de Pesquisa Energética
[^45]: Climatescope 14 by Bloomberg New Energy Finance
[^46]: Excluding Large Hydro
2013 clean energy installed increased 24%\(^{47}\) and the renewable target for power generation coming from renewable sources in 2025 has doubled to 20%.

This energy investment is supported by an increase in power demand at an annual average growth of 4.3% since 2010\(^{47}\).

The Chilean market is characterized by high electricity prices, with peaks above $200/MWh, which are a result of the dependence on imported oil and gas because the country has no production of those fuels.

Due to the high electricity prices the government has no kind of incentives for renewables as wind and solar projects are being developed on a purely merchant basis. However renewable generators receive a reduction on the transmission tariff.

Investment in the country has totalled 1.6$Bn in 2013 where almost 1$bn went to finance 389MW of solar capacity, which enjoys exceptional insolation conditions and high power prices.

The major risk I see in this market is in fact the volatility of market prices. With the decrease in oil prices happening globally, energy prices, very dependent on those, will naturally decrease as well. This can lead for instance Chilean electricity prices to decrease too much, endangering the sustainability of renewable plants and their ability to breakeven.

- **Mexico**

Mexico is the second largest nation in south and central America in terms of GDP, and also a big player in EGP current and future renewable projects.

With respect to renewable targets the country expects to have 35% generated from “clean sources”, which include large hydro and nuclear, by 2024. A share that currently stands at 14%\(^{48}\).

In terms of electricity consumption between 2010 and 2013 it has grown 5%\(^{49}\) and demand is estimated to grow at a 4% annual rate in the close future\(^{50}\).

Mexico’s president Pena Nieto energy reform, accepted in late 2013, and discussed all throughout 2014 brings a lot of changes for the entire energy market since it aims to open the market to foreign and private investment, ending the long-time monopoly of national oil company Pemex and electricity utility CFE. Prior to the reform all output from independent producers was sold to CFE using auctions mechanisms.

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\(^{47}\) Climatescope 14 by Bloomberg New Energy Finance

\(^{48}\) Redefining Renewable Energy in Mexico by Institute of the Americas

\(^{49}\) Enerdata

\(^{50}\) Mexico’s Newly Opened Energy Market Attracts Renewables by Renewable Energy World
Mexican government offers no incentives to the renewable sector since the abundance of resources and the high cost electricity from fossil energy are a good incentive alone, but as a part of the energy reform it aims to implement a clean energy certification system.

Investment in 2013 was 30% lower than 2012 which reflected the uncertainty of the energy reform. The pipeline of projects for the future, according to ProMéxico, complies 80 projects totalling $8.5bn, focused mostly on wind (80%) and solar (15%).

However this new reform might have a negative impact in renewable aspirations and the “natural” incentives above, hence investment. With oil players able to enter, the market prices will became increasingly more competitive, and decrease, which might jeopardize the sustainability of renewable plants.

Another risk of this market is the infrastructure bottlenecks and ageing transmission lines, only 10% of the grid was built in the last decade. This lack of grid connections can and will limit the potential of renewable projects sometimes located in remote locations.51

Mexico is for me the biggest cause of alarm for EGP both due to the aged transmission grid but also due to the new reform which in my opinion will not have a positive impact in the RES development of the country, and can affect the remuneration of EGP.

### New Markets

EGP has a vast pipeline of projects in multiple geographies. Some of those are featured in the table below where it is clear the commitment to expand in to new countries with preference for PPA remunerations, with a diversified technological base, and a clear commitment to invest in renewable energy.

<table>
<thead>
<tr>
<th>Country</th>
<th>South Africa</th>
<th>Kenya</th>
<th>Uruguay</th>
<th>Peru</th>
</tr>
</thead>
<tbody>
<tr>
<td>Renewable %</td>
<td>1.2%</td>
<td>22.4%</td>
<td>10%</td>
<td>7.8%</td>
</tr>
<tr>
<td>Target</td>
<td>Add 17.8GW of RES by 2030</td>
<td>Add 3.3GW of RES by 2015 (from 2013)</td>
<td>Renewable generation at 15% in 2015</td>
<td>5% of clean energy – reached 2012.</td>
</tr>
<tr>
<td>Payment Mechanism</td>
<td>Auction – PPA</td>
<td>20Y FIT and PPA</td>
<td>Auction – PPA</td>
<td>Auction – PPA</td>
</tr>
<tr>
<td>Investment Focus</td>
<td>Solar and Wind</td>
<td>Geothermal</td>
<td>Wind</td>
<td>Wind and Small Hydro</td>
</tr>
</tbody>
</table>

Source: ClimateScope 14, REN21 and Export.gov

In my opinion a lot of value is going to be unlocked from this emergent countries and EGP is making the right choice to explore them and their growing electricity needs and great abundance of resources.

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51 Redefining Renewable Energy in Mexico by Institute of the Americas
**Valuation**

To reach a price target for EGP we considered more than one scenario and the prices per share associated to each of them. To each of the scenarios a probability was attributed and by multiplying each price target by the correspondent probability we reached a final price of 2.3€.

**Scenarios**

The most reliable scenario is the base model (2.5€), to which we have attributed a probability of 75%, based on our view of the proper market evolution, the company’s track record in achieving its capacity additions but also the company’s inability to reach its operational targets in the past. In this model we assume that the company will perform as expected, with no major setbacks in the future being able to perform and sustain its business plan.

The alternative scenarios account for pessimistic views, since we assumed that the base case, modelled according to the company plan was optimistic enough, assuming full compliance of the plan and a constant improvement of efficiency and operating results.

The alternative scenarios are:

1. **Regulation and prices in Italy (10%) – 1.6€**: Italy is the most important business of the European segment and even with the adjustment of the incentives already occurred, stability of the regulatory environment is not certain. As so we aim to account in this scenario for the possibility of further adjustments to renewable incentives. Besides, it is an objective of the government to bring the electricity price down, since it is higher than the European peers. So even though the hedged sales of the company until 2015 protect the company from an abrupt decrease, we assumed incentives in Italy to decrease by half in 2016 and the market prices to have a steep decrease in 2017 by 10% to a level that would be closer to the European average.

2. **Instability in Emergent Markets (10%) – 2€**: Even though PPA implies a steady and predictable income, there can always be a political or economic crisis in developing countries as we must recall the political historical path of Latin America that is somehow unstable. Risk factors could be: governments law adjustments that affect the enforceability of the contracts; Nationalizations even though recently it has occurred only in countries like Argentina and Venezuela (not part of EGP portfolio); And currency devaluations since multiple Latin American currencies have been losing value in the past years when confronted with the Euro. So in this

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**Price target of 2.3€ based on multiple scenarios**

**Table 13**: Base Case SOTP

<table>
<thead>
<tr>
<th>Base Case</th>
<th>EV 2015</th>
</tr>
</thead>
<tbody>
<tr>
<td>Europe</td>
<td>13 130</td>
</tr>
<tr>
<td>Latin Ame. &amp; Emergent</td>
<td>4 429</td>
</tr>
<tr>
<td>North America</td>
<td>2 567</td>
</tr>
<tr>
<td>Other - Non Operating</td>
<td>853</td>
</tr>
<tr>
<td>Total</td>
<td>20 980</td>
</tr>
<tr>
<td>Debt</td>
<td>7 408</td>
</tr>
<tr>
<td>Minorities</td>
<td>943</td>
</tr>
<tr>
<td>Shareholder’s Value</td>
<td>12 629</td>
</tr>
<tr>
<td>Price per share</td>
<td>2,53</td>
</tr>
</tbody>
</table>

Source: Analyst Estimates

**Table 14**: Scenario 1 SOTP

<table>
<thead>
<tr>
<th>Scenario 1</th>
<th>EV 2015</th>
</tr>
</thead>
<tbody>
<tr>
<td>Europe</td>
<td>8 599</td>
</tr>
<tr>
<td>Latin Ame. &amp; Emergent</td>
<td>4 429</td>
</tr>
<tr>
<td>North America</td>
<td>2 567</td>
</tr>
<tr>
<td>Other - Non Operating</td>
<td>853</td>
</tr>
<tr>
<td>Total</td>
<td>16 448</td>
</tr>
<tr>
<td>Debt</td>
<td>7 410</td>
</tr>
<tr>
<td>Minorities</td>
<td>943</td>
</tr>
<tr>
<td>Shareholder’s Value</td>
<td>8 095</td>
</tr>
<tr>
<td>Price per share</td>
<td>1,62</td>
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</table>

Source: Analyst Estimates

**Table 15**: Scenario 2 SOTP

<table>
<thead>
<tr>
<th>Scenario 2</th>
<th>EV 2015</th>
</tr>
</thead>
<tbody>
<tr>
<td>Europe</td>
<td>13 130</td>
</tr>
<tr>
<td>Latin Ame. &amp; Emergent</td>
<td>1 723</td>
</tr>
<tr>
<td>North America</td>
<td>2 567</td>
</tr>
<tr>
<td>Other - Non Operating</td>
<td>853</td>
</tr>
<tr>
<td>Total</td>
<td>18 274</td>
</tr>
<tr>
<td>Debt</td>
<td>7 419</td>
</tr>
<tr>
<td>Minorities</td>
<td>944</td>
</tr>
<tr>
<td>Shareholder’s Value</td>
<td>9 911</td>
</tr>
<tr>
<td>Price per share</td>
<td>1,98</td>
</tr>
</tbody>
</table>

Source: Analyst Estimates
scenario we assumed prices to be 25% lower than the ones forecasted in the base case.

3. Underperformance of load factors (10%) – 1.9€: Renewables energy production is mostly dependent on the availability of resources. In our base case I assumed that the availability would be constant and that technological advances would allow load factors to increase. However there is always the possibility that the availability of resources is bellow expectation, as was for example the case in Brazil in the previous months in the hydro sector when it just did not rain. To account for that possibility we assume a more volatile performance in terms of load factors, with different impacts in different regions.

We believe there is no need for a scenario of over performance of the load factor since the base model already assumes a constant improvement in this factor that we believe is optimistic enough.

### Sum-of-the-parts

All the price targets were calculated based on a Sum-of-The-Parts (SOTP) analysis of the segments of the company. Each segment’s “share” of enterprise value was determined based on the Discounted Cash Flow (DCF) method. The method for the different scenarios was the same but the assumptions changed.

First we divided our SOTP by geography, analysing three segments: Europe, Latin America (which includes emergent markets) and North America.

- **Segment Assumptions**

In Europe the prices for the less relevant markets were estimated based on the remuneration scheme in place and the prices available. In terms of Italy the market price was assumed based on the average of 2014 and the price of the forward sales announced by the company. The market price was assumed for the Hydro segment only, for the other technologies we assumed the tariff available in the legislation in addition to the market price.

In terms of Spain, and with a cautious point of view we assumed the market price forwarded by the company for all technologies. The forward prices are only available until 2015, from then onward we assume them to grow at inflation.

A note is due regarding the ENEOP joint investment in Portugal (with EDPR), 534 MW in wind for EGP, which is only consolidated in 2015, but will weight as 80% of the total capacity of EGP in the country. A price is set for this specific contract, which we assumed for the Portuguese generation.
In terms of remuneration in Latin American prices forecasts were not based on legislation or tariffs because the remuneration scheme is in its great majority a fixed contracted price or the market one. So we used known PPA agreement prices like it is the case of Brazil (ANEEL\textsuperscript{52}) or Panama, independent estimations for the case of Mexico and Chile, and the forward price disclosed by the company for the other countries. For the African emergent markets we used the most recent prices agreed in auctions in South Africa and Morocco (IRENA) as an estimation for the future. All these estimations were indexed to the inflation expected by the World Bank.

In terms of revenues in the USA, they are composed of the PPA price that normally does not grow at inflation but at an indexed rate slightly smaller (assumed 1.5%) or the market price of energy for which EGP has also forwarded sales for 2014 and 2015. To this price is added the Production Tax Credit paid to companies. This value is known and approximately 23 cents of a dollar per KWh. There is the possibility that the plants which started construction after 2014 might not be entitled to the PTC.

To finalize the remuneration analysis we must add that we assumed exchange rates to remain stable and in line with the current values for both US Dollar and the Brazilian Real. So exchange rates in the future reflect the inflation differentials between the foreign currencies and Euro.

In terms of operating costs we assume an improvement in efficiency, which will ultimately improve the EBITDA margin, possible from lowering costs. This is based on the company’s efforts to do so and their track record in the previous years improving gradually the cost level.

Generation resulted from the capacity available and the load factor. Capacity evolution is showed in the following table and we assumed the additions plan to be complete and actually slightly above, 300 MW, their initial target due to the effectiveness in securing contracts. In September 2014 only 17% of the total addition plan until 2018 was not contracted yet.

The load factors, for all three segments, were based on the historical value from 2012 and 2013 which were different between segments. From those starting points we assumed an evolution in accordance with the targets of the company and expected technological improvements.

Capex estimated had two major inputs: first the additional capacity cost for each year. To derive this value we assumed a cost per MW. This is the same for all the regions since the renewable technology market is a global one. It was based on

\textsuperscript{52} Agência Nacional de Energia Elétrica
values reported and expected by the company and market information. Here we assumed an improvement of the cost per MW in the future, since the renewable technology market is becoming more competitive each year and prices are decreasing.

The other input to capex is the maintenance investment made each year which was assumed equal to depreciation (calculated based on the historical depreciation rate of the company). For this maintenance investment we assume the company will do the repowering of the plants once they reached maturity. With this approach repowering is made by re-investing a portion each year.

Other assets and liabilities are operational related, such as inventories or tax receivables and are assumed to grow in proportion with sales.

The tax rate for each segment was calculated as a weighted average of the different tax rates of the countries, according to the generation produced by each country each year. The tax rates were assumed to remain constant.

Financial statements were computed until 2020 and from then onwards we assumed a perpetuity of the cash flows, based on a growth rate derived from the product of the reinvestment rate with the return on invested capital.

### Consolidation

Until the EBIT level, consolidation is made as the sum of the different segments with the exception of other income related to non-operating items. From then onward is made on a parent level. At the parent level the main assumptions were:

**Table 21: Income Statement Assumptions**

<table>
<thead>
<tr>
<th></th>
<th>2016</th>
<th>2017</th>
</tr>
</thead>
<tbody>
<tr>
<td>Return on Financial investment</td>
<td>5%</td>
<td>5%</td>
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<tr>
<td>Financial Cost</td>
<td>4.8%</td>
<td>4.8%</td>
</tr>
<tr>
<td>Income from equity investments</td>
<td>Assumed 9%</td>
<td>Assumed 9%</td>
</tr>
<tr>
<td>Net income from commodity management</td>
<td>Assumed 0%</td>
<td>Assumed 0%</td>
</tr>
</tbody>
</table>

**Source:** Analyst Estimates

We assume that all the debt was in name of the parent company, this is, in Italy and in Euros. So the segments analysis does not contemplate financial costs since they are all attributed to the parent company when consolidating results.

In terms of consolidation of balance sheet the leverage level of the company was assumed to stay at 44%, in line with the level of 2012 and 2013 which were 42% and 44% respectively. Debt increases only in proportion with company growth.

In terms of non-controlling interest we assume it to remain stable, with the same historical proportion. Equity investments were forecasted as a multiple of overall capacity installed.

---

**Table 19: Expected Capital Cost per MW**

<table>
<thead>
<tr>
<th></th>
<th>2014</th>
<th>2015</th>
<th>2016</th>
<th>2017</th>
</tr>
</thead>
<tbody>
<tr>
<td>Hydro</td>
<td>1.6</td>
<td>1.6</td>
<td>1.5</td>
<td>1.4</td>
</tr>
<tr>
<td>Wind</td>
<td>1.2</td>
<td>1.1</td>
<td>1</td>
<td>0.9</td>
</tr>
<tr>
<td>Geothermal</td>
<td>2.5</td>
<td>2.5</td>
<td>2</td>
<td>1.8</td>
</tr>
<tr>
<td>Solar</td>
<td>1.2</td>
<td>1</td>
<td>1</td>
<td>0.8</td>
</tr>
</tbody>
</table>

**Source:** EGP and Analyst Estimates

**Table 20: 2020 Rates Figures**

<table>
<thead>
<tr>
<th></th>
<th>Europe</th>
<th>LA &amp; Emergent</th>
<th>North America</th>
</tr>
</thead>
<tbody>
<tr>
<td>Growth Rate</td>
<td>0.4%</td>
<td>1.55%</td>
<td>0.55%</td>
</tr>
<tr>
<td>ROIC</td>
<td>7.8%</td>
<td>7.55%</td>
<td>6.5%</td>
</tr>
<tr>
<td>Reinv. Rate</td>
<td>5.6%</td>
<td>20.6%</td>
<td>8.5%</td>
</tr>
</tbody>
</table>

**Source:** Analyst Estimates
### Weighed Average Cost of Capital (WACC)

To get the discounted cash flows we need to calculate the implicit weighted average cost of capital (WACC) for each of the three segments. We should note that these cash flows were all calculated in euros and therefore the discount rates are all also in euros. To derive the WACC we needed multiple inputs: cost of equity, cost of debt, tax rate and the leverage ratio of the company.

In terms of cost of equity we used the CAPM approach, which implies that through an indicator of systematic risk of the company (Beta) in relation with the market, together with a risk-free rate and a market risk premium, we can derive a good approximation of the cost of equity.

The risk-free assumed is an expectation, based on current values, of the future German 10Y bond yield which is acknowledged to be a good indicator of the European risk free profile.

To define a beta we conducted an extensive analysis of comparable companies’ betas, from the different markets. Betas were derived in comparison with the MCSI World Index with weekly observations from 2011 to 2014. With this we built a 95% confidence interval that allowed us to specify a beta for EGP of 1.05. This value is supported because we believe the systematic risk of EGP is increasing, as the company becomes less exposed to regulated markets (tendency is for renewable incentives to cease) and becomes more exposed to liberalized prices, even if in a low order. The market risk premium was computed as the difference between the expected market return and the risk-free.

The cost of debt, as it has been said is evaluated at a parent company level so we assumed the average cost of debt reported by the company over the 2014 period as the appropriate rate. The tax rate used for each segment was the weighted average used when forecasting the cash flows. The leverage ratio is again the 44%, which is in line with the historical values.

Finally we must note that in the United States the capital structure can be different since renewables have three different ways of financing their operations: equity, debt or tax partnerships (TP). So in this specific segment the weight and “risk” of tax partnerships must also be accounted for in the WACC. In terms of weight TP account for close to 8.8% since the portion of net debt of EGP attributable to tax partnerships is 485 million euros. The cost associated with this type of financing is assumed to be 7.5% based on analysis of the market. Comparing with the company’s cost of debt it is a more expensive or riskier.
choice since there are limited investors and transaction costs are higher but when compared with cost of equity it is actually a good alternative solution.

**Risks**

To wrap up we will now summarize EGP’s principal risks which are:

**Exposure to market prices and its volatility:** The transition to a “fair” market at competitive prices with other sources, for example Italy or Spain, increases volatility of performance. As the market price works according to the lowest variable cost among all sources, if there is a great decrease on natural gas or coal price, it can threat the company’s performance and targets feasibility.

**Regulatory changes:** Is a reason of uncertainty mostly in Europe and in the US with the extension of PTC. If there are further “cuts” in these sector it can jeopardize EGP’s remuneration. But, as said, I expect the PTC to be extended at least in the short-term and I do not foresee relevant regulation changes in EGP’s European portfolio that can hurt the company’s value since relevant measures have already been taken.

**Underdevelopment of infrastructures:** Underdevelopment of grid infrastructure in some of the expansion countries threatens the viability of some investments prospects. However I am confident that EGP expertize in the sector and its thorough scouting process of sites will minimize this risk.

**Emerging Markets Political Environment:** EGP supports most of its growth in the developing world, mostly Latin America and Africa. As so we must note that these countries are more likely to be subject to a political crisis that can impact contracts (already signed or expected to occur) with the government, the renewable support policies, investment targets and exchange rates.

**Oil Prices:** Even though not intensively explored in this report, oil prices have been decreasing since mid-14 and their effect on the renewable global sector is not clear yet. In truth part of the growth of renewables was driven has an alternative for the dependence on high oil prices. So now some countries might scale-back on proposed investment. However, I do not believe this to be a sure event as climate change is still a big concern and the renewable market has been growing consistently, proving its value.
## Financial Statements

### BALANCE SHEET

<table>
<thead>
<tr>
<th></th>
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<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>Property Plant and Equipment</td>
<td>10878</td>
<td>11851</td>
<td>12744</td>
<td>13778</td>
<td>14958</td>
<td>15990</td>
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<td>2210</td>
<td>2242</td>
<td>2276</td>
<td>2285</td>
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<td>Trade receivables</td>
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<td>364</td>
<td>448</td>
<td>547</td>
<td>563</td>
<td>629</td>
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<td>Other Assets</td>
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<td>917</td>
<td>913</td>
<td>961</td>
<td>1018</td>
<td>1046</td>
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<td>Deferred Tax</td>
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<td>318</td>
<td>320</td>
<td>320</td>
<td>330</td>
<td>330</td>
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<td>Equity Investments</td>
<td>533</td>
<td>508</td>
<td>472</td>
<td>526</td>
<td>551</td>
<td>569</td>
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<td>587</td>
<td>600</td>
<td>600</td>
<td>600</td>
<td>600</td>
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<td>Cash</td>
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<td>180</td>
<td>180</td>
<td>180</td>
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<tr>
<td>Total Assets</td>
<td>16166</td>
<td>16936</td>
<td>17919</td>
<td>19188</td>
<td>20486</td>
<td>21634</td>
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<tr>
<td>Share Capital</td>
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<td>1000</td>
<td>1000</td>
<td>1000</td>
<td>1000</td>
<td>1000</td>
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<td>Reserves</td>
<td>5683</td>
<td>5762</td>
<td>6333</td>
<td>6953</td>
<td>7522</td>
<td>7964</td>
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<tr>
<td>Net income for the period</td>
<td>387</td>
<td>528</td>
<td>475</td>
<td>532</td>
<td>605</td>
<td>725</td>
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<tr>
<td>Non-controlling interests</td>
<td>883</td>
<td>973</td>
<td>965</td>
<td>943</td>
<td>1014</td>
<td>1077</td>
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<tr>
<td>Total Shareholder Equity</td>
<td>7953</td>
<td>8263</td>
<td>8774</td>
<td>9429</td>
<td>10141</td>
<td>10765</td>
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<td>Trade payables</td>
<td>1070</td>
<td>753</td>
<td>794</td>
<td>871</td>
<td>873</td>
<td>909</td>
</tr>
<tr>
<td>Provisions</td>
<td>103</td>
<td>132</td>
<td>133</td>
<td>135</td>
<td>136</td>
<td>137</td>
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<tr>
<td>Other</td>
<td>556</td>
<td>580</td>
<td>576</td>
<td>573</td>
<td>569</td>
<td>565</td>
</tr>
<tr>
<td>Deffered Tax</td>
<td>602</td>
<td>694</td>
<td>700</td>
<td>725</td>
<td>750</td>
<td>750</td>
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<tr>
<td>Post-employment and other employee benefits</td>
<td>89</td>
<td>48</td>
<td>48</td>
<td>48</td>
<td>48</td>
<td>48</td>
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<tr>
<td>Financial Liabilities</td>
<td>5793</td>
<td>6466</td>
<td>6893</td>
<td>7408</td>
<td>7968</td>
<td>8458</td>
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<td>9145</td>
<td>9760</td>
<td>10345</td>
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<tr>
<td>Total Liabilities &amp; Shareholder Equity</td>
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<td>16936</td>
<td>17919</td>
<td>19188</td>
<td>20486</td>
<td>21634</td>
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### INCOME STATEMENT

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<td>Total revenues</td>
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<td>2757</td>
<td>2761</td>
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<td>3618</td>
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<tr>
<td>Costs</td>
<td>850</td>
<td>991</td>
<td>925</td>
<td>975</td>
<td>1036</td>
<td>1154</td>
</tr>
<tr>
<td>Gross Operating Margin</td>
<td>1634</td>
<td>1766</td>
<td>1836</td>
<td>1981</td>
<td>2180</td>
<td>2464</td>
</tr>
<tr>
<td>Depreciation, amortization and impairment losses</td>
<td>696</td>
<td>722</td>
<td>775</td>
<td>825</td>
<td>884</td>
<td>950</td>
</tr>
<tr>
<td>Net income/ from commodity risk management</td>
<td>-8</td>
<td>21</td>
<td>0</td>
<td>0</td>
<td>0</td>
<td>0</td>
</tr>
<tr>
<td>Operating Income</td>
<td>930</td>
<td>1065</td>
<td>1062</td>
<td>1155</td>
<td>1296</td>
<td>1514</td>
</tr>
<tr>
<td>Financial Income</td>
<td>132</td>
<td>79</td>
<td>30</td>
<td>30</td>
<td>30</td>
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<td>Financial Cost</td>
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<td>-347</td>
<td>-345</td>
<td>-370</td>
<td>-398</td>
<td>-423</td>
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<td>Net interest income/expense</td>
<td>-228</td>
<td>-268</td>
<td>-315</td>
<td>-340</td>
<td>-368</td>
<td>-393</td>
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<td>Share of income from equity investments</td>
<td>47</td>
<td>64</td>
<td>70</td>
<td>76</td>
<td>82</td>
<td>86</td>
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<td>Earning Before Taxes</td>
<td>749</td>
<td>861</td>
<td>818</td>
<td>891</td>
<td>1009</td>
<td>1207</td>
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<td>Taxes</td>
<td>284</td>
<td>324</td>
<td>284</td>
<td>299</td>
<td>337</td>
<td>402</td>
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<tr>
<td>Net Income From Discontinued Operations</td>
<td>0</td>
<td>61</td>
<td>0</td>
<td>0</td>
<td>0</td>
<td>0</td>
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<tr>
<td>Net income</td>
<td>465</td>
<td>598</td>
<td>534</td>
<td>592</td>
<td>672</td>
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### FREE CASH FLOW

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<tr>
<th></th>
<th>2013</th>
<th>2014F</th>
<th>2015F</th>
<th>2016F</th>
<th>2017F</th>
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<tbody>
<tr>
<td>EBIT</td>
<td>1065</td>
<td>1062</td>
<td>1155</td>
<td>1296</td>
<td>1514</td>
</tr>
<tr>
<td>Notional Income Tax</td>
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<td>284</td>
<td>299</td>
<td>337</td>
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<tr>
<td>Tax adjustments</td>
<td>-30</td>
<td>0</td>
<td>0</td>
<td>0</td>
<td>0</td>
</tr>
<tr>
<td>NOPLAT</td>
<td>741</td>
<td>778</td>
<td>856</td>
<td>959</td>
<td>1112</td>
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<tr>
<td>Depreciation</td>
<td>722</td>
<td>775</td>
<td>825</td>
<td>884</td>
<td>950</td>
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<tr>
<td>Gross FCF</td>
<td>1463</td>
<td>1553</td>
<td>1681</td>
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<td>Net Capex</td>
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<td>-1699</td>
<td>-1894</td>
<td>-2073</td>
<td>-1986</td>
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<td>Net Working Capital</td>
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<td>-41</td>
<td>-21</td>
<td>-13</td>
<td>-28</td>
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<tr>
<td>Changes In Other operating Assets/Liabilities</td>
<td>-78</td>
<td>0</td>
<td>-52</td>
<td>-61</td>
<td>-32</td>
</tr>
<tr>
<td>Operating FCF</td>
<td>-445</td>
<td>-188</td>
<td>-285</td>
<td>-304</td>
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</tbody>
</table>
Disclosures and Disclaimer

Research Recommendations

<p>| | |</p>
<table>
<thead>
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<tbody>
<tr>
<td><strong>Buy</strong></td>
<td>Expected total return (including dividends) of more than 15% over a 12-month period.</td>
</tr>
<tr>
<td><strong>Hold</strong></td>
<td>Expected total return (including dividends) between 0% and 15% over a 12-month period.</td>
</tr>
<tr>
<td><strong>Sell</strong></td>
<td>Expected negative total return (including dividends) over a 12-month period.</td>
</tr>
</tbody>
</table>

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