# EDP – Energias de Portugal, S.A.

The Positive Outlook on EDP – Energias de Portugal, S.A. reflects Fitch Ratings' expectations of a sustainable improvement in leverage and coverage metrics from 2020, in line with the positive sensitivities for the rating, and the sound delivery of its business plan targets for 2019. Fitch expects EDP to complete the sale of its hydro assets for EUR2.2 billion by 2H20, and to make steady progress on its asset-rotation plan in 2H20. We forecast that prices will weaken in Iberia, affecting generation earnings predominantly from 2021, when the current hedges start to roll over.

The 'BBB-' rating affirmation reflects EDP's market-leading position in Portugal with a large share of regulated plus quasi-regulated activities and the company's high leverage and large capex plan to 2022. We expect EDP's business risk profile to improve marginally until 2022.

We expect management to pursue delivery of its business plan goals, including a reported net debt-to-EBITDA metric of below 3.0x by 2022, which is consistent with a higher rating.

### **Key Rating Drivers**

**Credit-Positive Hydro Sale:** EDP agreed to sell 1.7GW of hydro generation assets in Portugal for EUR2.2 billion to a consortium led by Engie S.A. (A/Stable) and it has lessened the execution risk from EDP's ambitious asset-disposal plan. EDP reiterated its intention to use the bulk of the sale proceeds to reduce net debt, which is credit positive.

The transaction dilutes EBITDA by around EUR150 million annually, under normalised hydro conditions, and marginally de-risks EDP's portfolio from merchant risk and concentration in Portugal. The deal is pending regulatory approvals. We assume the transaction will complete by 2H20 in line with the agreed terms.

**Progress on Metrics Target:** The Portuguese hydro asset sale is key to achieving EDP's net debt-to-EBITDA targets (as reported by EDP, not including regulatory receivables (RR)) of below 3.2x by end-2020 and 3.0x by end-2022. Our forecast of post-sale funds from operations (FFO) adjusted net debt at end-2020 is 4.3x compared with 4.8x by end-2019, and a positive rating sensitivity of 4.5x. In addition, FFO-based coverage improves consistently above the positive guideline, due to a lower amount and cost of debt.

**Sustainably Lower Leverage:** We expect EDP to be well on track from 2021 to deliver an increase in earnings from a growing renewables (the US, Brazil and Europe) and networks (Brazil) asset base, and to deploy strong capex from largely secured investments. We therefore forecast EDP's FFO-based leverage metrics consistently below the current positive sensitivity from 2021.

**Management Commitment:** We expect EDP's management to introduce credit-protective measures in a timely manner to offset accelerated capex growth or unexpected weaker performance (such as through an acceleration of asset rotation, future tariff deficit securitisations, or further efficiencies). A stable dividend policy based on a dividend floor of EUR0.19/share is also relevant to maintain broadly stable credit metrics from 2020.

**Medium-Term Target on Track:** EDP is progressing with the implementation of its strategic plan for 2019-2022, with improved visibility on the achievement of its mid-term targets. By February 2020, EDP: had secured power purchase agreements for 5.4GW of renewable capacity growth for 2022, which is 76% of the total 7.0GW for 2019-2022; had signed and agreed the terms of a JV agreement to develop offshore wind projects with Engie; and has

### Ratings

| Rating Type       | Rating | Outlook  | Last Rating<br>Action |
|-------------------|--------|----------|-----------------------|
| Long Term<br>IDR  | BBB-   | Positive | Affirmed<br>28 Feb 20 |
| Short Term<br>IDR | F3     |          | Affirmed<br>28 Feb 20 |

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# Applicable Criteria and Related Research

Corporate Rating Criteria (February 2019) Parent and Subsidiary Rating Linkage (September 2019) Corporates Notching and Recovery Ratings

Criteria (October 2019) Corporate Hybrids Treatment and Notching Criteria (November 2019)

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been implementing six transmission projects in Brazil with one project that started operations by end-2018 and another partially commissioned in early 2020.

**Less Capital-Intensive Model:** EDP's strategy includes the sale of majority stakes in wind farms as a recurring part of its renewable business model. The company has targeted EUR4.0 billion of majority stakes' sales for 2019-2022, with the aim to crystallize value and accelerate the growth in renewables. As of December 2019, the company had completed 25% of the plan with the sale of 997MW (around 51% owned) of its wind portfolio in Europe and 137MW in Brazil.

**Cash Capital Gains in FFO:** Total proceeds of its "farm down" approach accounted for around EUR1.1 billion (EUR0.15 billion cashed in February 2020) including capital gains of EUR313 million. Fitch projects around EUR3.0 billion of additional sales of wind farms until 2022, including capital gains of EUR150 million on average a year. We see this strategy and the gains as achievable, although some additional risks, such as delay in execution, may arise from the current market turmoil. We classify capital gains from this recurring activity as part of the company's FFO.

Acceleration in Growth Capex: Fitch forecasts EDP's growth capex of EUR9 billion for 2019-2022, which is significantly higher (more than 50%) than in the previous four years. This is due to the acceleration of solar and US wind farm capex to capture full tax credits incentives before they are phased out from 2020 and 2021, and to the rapid progress in its Brazilian transmission projects (59% of BRL3.9 billion capex executed).

We consider EDP's higher capex in conjunction with its EUR4 billion asset-rotation plan. The execution risk in this strategy is mitigated by the management's assurance that it would deploy capex in the business largely in parallel with asset rotation and the progress the company has made with its asset rotation.

**Marginal Improvement in Business Mix:** We expect EDP to moderately improve the weight of regulated and quasi-regulated earnings to 77% by 2022 from 71% by 2019, excluding capital gains. This is supported by the sale of merchant hydro assets in Portugal, the commissioning of Brazilian transmission lines, the positive regulatory reviews in distribution concessions in Brazil, and the growth of renewables over the period, net of asset rotation.

**Lower Regulatory and Political Risk:** We expect there to be limited impact from the regulatory review in Portugal from 2021 due to the rate of return (5.13% for 2020) being low compared with other European countries. Recent regulatory reviews for distribution networks in Spain and Brazil provide stability for network earnings. For renewables, an extension of tax incentives in the US (60% extended up to 2024, compared to 2022 previously) and EU decarbonisation targets suggest a supportive regulatory environment for EDP.

Similarly, political risk in Portugal has decreased with the recently elected government and the required commitment to prepare the country for the energy transition. The decision to gradually reduce the energy tax in line with the system debt reduction, included in the national budget (approved by law), is a positive development for the company's cash flow.

**Declining Portuguese RRs:** RRs owned by EDP declined to EUR0.4 billion at end-2019, from a peak of EUR2.5 billion in 2014. In 2019, EDP sold EUR1.1 billion of Portuguese RRs and in March 2020 it sold 70.6% of the 2020 tariff deficit, related with special regime generation, for a total amount of EUR825 million. We expect EDP to continue selling its RRs at a pace that will largely mirror new annual, decreasing electricity tariff deficits in the system. This implies there will be a limited impact on working capital and cash taxes forecast for 2020-2022.

## **Financial Summary**

| (EURm)   | Dec<br>2017 | Dec<br>2018 | Dec<br>2019F | Dec<br>2020F | Dec<br>2021F | Dec<br>2022F |
|--|-------------|-------------|--------------|--------------|--------------|--------------|
| Operating EBITDA (before income from associates) | 3,523       | 3,287       | 3,651        | 3,498        | 3,523        | 3,734        |
| Operating EBITDAR margin (%)                     | 23.2        | 22.4        | 27.2         | 26.4         | 26.4         | 26.4         |
| FFO margin (%)                                   | 12.3        | 14.9        | 16.5         | 16.3         | 16.5         | 16.5         |
| FFO fixed charge coverage (x)                    | 3.0         | 4.0         | 3.8          | 3.8          | 4.0          | 4.3          |
| FFO adjusted net leverage (x)                    | 5.3         | 4.8         | 4.8          | 4.3          | 4.5          | 4.4          |
| Source: Fitch Ratings Fitch Solutions            |             |             |              |              |              |              |

Source: Fitch Ratings, Fitch Solutions

## **Rating Derivation Relative to Peers**

EDP is a vertically integrated utility and the incumbent in Portugal. EDP, along with Iberdrola, S.A. (BBB+/Stable) and Enel S.p.A. (A-/Stable), anticipated the energy transition ahead of most other European utilities, although it has smaller scale and its business risk profile is not fully comparable due to having lower share of fully regulated businesses. EDP benefits from a higher share of long-term contracted and incentivised renewables business, which brings its overall regulated plus quasi-regulated share to a high 71% by end-2019. The higher leverage and higher business risk justify the two- and three-notch rating differential, respectively, from peers mentioned above.

We consider that Naturgy Energy Group, S.A. (BBB/Stable) has a stronger business risk profile than EDP, due to the former's larger share in regulated business; this is partly offset by Naturgy's bias towards more volatile gas activities, subdued growth, and a shareholderfriendly strategy. The companies' leverage over the rating horizon is broadly comparable. A one-notch rating differential is justified by Naturgy's stronger business profile.

We do not apply the one-notch uplift to EDP's senior unsecured rating as the fully regulated EBITDA share is below 50% (or 40% plus 10% of contribution from renewables).

### Navigator Peer Comparison

| lssuer                    |             |    | Business profile |                          |       |                              |            |           |                 |                  | Financial profile        |  |       |                      |               |         |                |  |
|---------------------------|-------------|----|------------------|--------------------------|-------|------------------------------|------------|-----------|-----------------|------------------|--------------------------|--|-------|----------------------|---------------|---------|----------------|--|
|                           | IDR/Outlook |    | rating           | Manager<br>Corp<br>Gover | orate | d Positio<br>Cash F<br>Profi | low        | gulation  | Market T<br>Ris | rends and<br>sks | I Asset Base<br>Operatio |  |       | bility and<br>I Flow | Fina<br>Strue |         | Fina<br>Flexil |  |
| )P                        | BBB-/Sta    | a- |                  | a-                       |       | bbb                          | bbb        |           | bbb             |                  | a-                       |  | bbb   |                      | bbb-          |         | bbb-           |  |
| ON SE                     | BBB+/Sta    | aa |                  | а                        |       | bbb+                         | bbb        |           | bbb+            |                  | bbb+                     |  | bbb+  |                      | bbb           |         | bbb-           |  |
| nel S.p.A.                | A-/Sta      | a- |                  | a-                       |       | а                            | bbb        |           | bbb             |                  | а                        |  | a-    |                      | bbb+          |         | a-             |  |
| erdrola, S.A.             | BBB+/Sta    | а  |                  | a-                       |       | а                            | bbb        |           | bbb             |                  | a-                       |  | bbb   |                      | bbb           |         | bbb+           |  |
| aturgy Energy Group, S.A. | BBB/Sta     | а  |                  | bbb                      |       | bbb+                         | bbb        |           | bbb             |                  | bbb+                     |  | bbb-  |                      | bbb           |         | bbb+           |  |
| ource: Fitch Ratings.     |             |    |                  |                          |       |                              | Importance |           | Higher          |                  | Moderate                 |  | Lower |                      |               |         |                |  |
| Issuer                    |             |    |                  |                          |       |                              | Busines    | s profile |                 |                  |                          |  |       |                      | Financia      | profile | •              |  |

| Name                       | IDR/Outlook | Operating<br>Environment | Corporate<br>Governance | Cash Flow<br>Profile | Regulation   | Market Trends and<br>Risks | Asset Base and<br>Operations | Profitability and<br>Cash Flow | Financial<br>Structure | Financial<br>Flexibility |
|----------------------------|-------------|--------------------------|-------------------------|----------------------|--------------|----------------------------|------------------------------|--------------------------------|------------------------|--------------------------|
| EDP                        | BBB-/Sta    | 3.0                      | 3.0                     | 1.0                  | 1.0          | 1.0                        | 3.0                          | 1.0                            | 0.0                    | 0.0                      |
| E.ON SE                    | BBB+/Sta    | 5.0                      | 2.0                     | 0.0                  | -1.0         | 0.0                        | 0.0                          | 0.0                            | -1.0                   | -2.0                     |
| Enel S.p.A.                | A-/Sta      | 0.0                      | 0.0                     | 1.0                  | -1.0         | -2.0                       | 1.0                          | 0.0                            | -1.0                   | 0.0                      |
| Iberdrola, S.A.            | BBB+/Sta    | 2.0                      | 1.0                     | 2.0                  | -1.0         | -1.0                       | 1.0                          | -1.0                           | -1.0                   | 0.0                      |
| Naturgy Energy Group, S.A. | BBB/Sta     | 3.0                      | 0.0                     | 1.0                  | 0.0          | 0.0                        | 1.0                          | -1.0                           | 0.0                    | 1.0                      |
| Source: Fitch Ratings.     |             |                          |                         | Worse position       | ned than IDR | In line with ID            | DR 📃                         | Better positioned that         | n IDR                  |                          |

## **Rating Sensitivities**

# Developments That May, Individually or Collectively, Lead to Positive Rating Action

- Improvement of the business mix towards higher weight on regulated activities
- FFO adjusted net leverage trending towards 4.5x (2020E: 4.3x) and FFO fixedcharge coverage above 3.7x (2020E: 4.0x) on a sustained basis, assuming no major changes in the activities' mix other than that expected by Fitch
- Sustained positive free cash flows (FCF) after divestments, together with a consistent reduction of the tariff deficit in Portugal in line with Fitch's expectations

# Developments That May, Individually or Collectively, Lead to Negative Rating Action

- FFO net adjusted leverage above 5.0x and FFO fixed-charge coverage below 3.2x for a sustained period, for example as a result of delays in the divestment plan or greater regulatory or political scrutiny
- Evolution of the business mix towards riskier activities or countries of exposure could weaken the company's debt capacity

### Liquidity and Debt Structure

**Strong Liquidity:** EDP had EUR1.5 billion of available cash and cash equivalents, and EUR5.5 billion of available committed credit lines at end-December 2019 (EUR5.1 billion due after 2021). This liquidity position is sufficient to cover debt maturities and operating requirements to end-2021.

**Standard Funding Structure:** EDP has a largely centralised debt structure with no impact on its ratings. Capital-market debt issued by EDP is mostly via Dutch-registered finance subsidiary EDP Finance B.V. (BBB-/Positive). The relationship between EDP and EDP Finance is governed by a keep-well agreement under English law.

EDP Brazil, which is 51% owned by EDP and fully consolidated, is ring-fenced, self-funded in local currency and non-recourse to EDP. As of December 2019, around 80% of EDP Renovaveis' gross debt was inter-company (ie parent) funded.

### **ESG Considerations**

ESG issues are credit neutral or have only a minimal credit impact on the entity(ies), either due to their nature or the way in which they are being managed by the entity(ies). For more information on Fitch's ESG Relevance Scores, visit www.fitchratings.com/esg.

## Liquidity and Debt Maturity Scenario with No Refinancing

| Available liquidity (EURm)                          | 2020F    | 2021F  | 2022F  | 2023F  |
|---|----------|--------|--------|--------|
| Beginning cash balance <sup>a</sup>                 | 1,482    | 32     | -2,338 | -4,045 |
| Rating case FCF after acquisitions and divestitures | 1,717    | -674   | -266   | -385   |
| Total available liquidity (A)                       | 3,199    | -642   | -2,604 | -4,431 |
| Liquidity uses                                      | <u>.</u> |        |        |        |
| Debt maturities                                     | -3,167   | -1,695 | -1,442 | -2,022 |
| <other liquidity="" of="" uses=""></other>          |          | -      |        |        |
| Total liquidity uses (B)                            | -3,167   | -1,695 | -1,442 | -2,022 |
| Liquidity calculation                               |          |        |        |        |
| Ending cash balance (A+B)                           | 32       | -2,338 | -4,045 | -6,452 |
| Revolver availability                               | 5,215    | 5,090  | 5,090  | 5,085  |
| Ending liquidity                                    | 5,247    | 2,752  | 1,045  | -1,367 |
| Liquidity score                                     | 2.7      | 2.6    | 1.7    | 0.3    |

Source: Fitch Ratings, Fitch solutions, EDP

| 3,167<br>1,695 |
|----------------|
| 1,695          |
|                |
| 1,442          |
| 2,022          |
| 2,872          |
| 5,093          |
| 16,292         |
|                |

## **Key Assumptions**

### Fitch's Key Assumptions Within Our Rating Case for the Issuer

- 2020 EBITDA of about EUR3.5 billion (excluding IFRS 16) and a CAGR 2018-2022 of about 3.2%, due to organic growth largely in renewables and transmission projects in Brazil
- Average gross capex of EUR2.9 billion (including financial investments) for 2019-2022
- Asset rotation plan for cumulative EUR4 billion during 2019-2022
- EUR2.2 billion of cash-in from the Portuguese hydro asset disposal in 2H20
- Dividends in line with a dividend floor of EUR0.19 a share
- Declining Portuguese RRs on balance sheet driven by TD sales of EUR0.8 billion on average for 2020-2022, in line with new TD generated in the period, and no meaningful TD created in Spain and Brazil
- Brazilian real and US dollar to depreciate against the euro

## **Financial Data**

|   | Historical |        | Fored  | ast    |        |
|---|------------|--------|--------|--------|--------|
|   | Dec        | Dec    | Dec    | Dec    | Dec    |
| (EURm)  | 2018       | 2019F  | 2020F  | 2021F  | 2022F  |
| Summary income statement                                  |            |        |        |        |        |
| Gross revenue   | 15,278     | 13,929 | 13,733 | 13,831 | 14,659 |
| Revenue growth (%)  | -3.0       | -8.8   | -1.4   | 0.7    | 6.0    |
| Operating EBITDA (before income from associates)          | 3,287      | 3,651  | 3,498  | 3,523  | 3,734  |
| Operating EBITDA margin (%)                               | 21.5       | 26.2   | 25.5   | 25.5   | 25.5   |
| Operating EBITDAR   | 3,418      | 3,782  | 3,629  | 3,654  | 3,865  |
| Operating EBITDAR margin (%)                              | 22.4       | 27.2   | 26.4   | 26.4   | 26.4   |
| Operating EBIT  | 1,842      | 2,101  | 1,948  | 1,923  | 2,084  |
| Operating EBIT margin (%)                                 | 12.1       | 15.1   | 14.2   | 13.9   | 14.2   |
| Gross interest expense                                    | -566       | -657   | -639   | -610   | -598   |
| Pretax income (including associate income/loss)           | 976        | 1,402  | 1,515  | 1,519  | 1,692  |
| Summary balance sheet                                     |            |        |        |        |        |
| Readily available cash and equivalents                    | 1,913      | 1,462  | 2,599  | 1,017  | 1,001  |
| Total debt with equity credit                             | 15,457     | 15,229 | 14,544 | 13,536 | 13,687 |
| Total adjusted debt with equity credit                    | 16,298     | 16,070 | 15,384 | 14,376 | 14,527 |
| Net debt  | 13,544     | 13,768 | 11,945 | 12,519 | 12,686 |
| Summary cash flow statement                               |            |        |        |        |        |
| Operating EBITDA  | 3,287      | 3,651  | 3,498  | 3,523  | 3,734  |
| Cash interest paid  | -621       | -657   | -639   | -610   | -598   |
| Cash tax  | -123       | -146   | -210   | -248   | -292   |
| Dividends received less dividends paid to minorities      | -141       | -180   | -230   | -250   | -280   |
| (inflow/(out)flow)  |            |        |        |        |        |
| Other items before FFO                                    | -160       | -431   | -236   | -189   | -191   |
| Funds flow from operations                                | 2,278      | 2,297  | 2,233  | 2,276  | 2,423  |
| FFO margin (%)  | 14.9       | 16.5   | 16.3   | 16.5   | 16.5   |
| Change in working capital                                 | -32        | -291   | -170   | -135   | -135   |
| Cash flow from operations (Fitch defined)                 | 2,246      | 2,006  | 2,063  | 2,141  | 2,288  |
| Total non-operating/non-recurring cash flow               | -69        |        |        |        |        |
| Capital expenditure                                       | -1,685     |        |        |        |        |
| Capital intensity (capex/revenue) (%)                     | 11.0       |        |        |        |        |
| Common dividends  | -691       |        |        |        |        |
| Free cash flow  | -198       |        |        |        |        |
| Net acquisitions and divestitures                         | 373        |        |        |        |        |
| Other investing and financing cash flow items             | 506        | 105    | 100    | 100    | 100    |
| Net debt proceeds   | -974       | 272    | -680   | -1,007 | 151    |
| Net equity proceeds                                       | -72        | 0      | 0      | 0      | 0      |
| Total change in cash                                      | -365       | -452   | 1,137  | -1,582 | -16    |
| Calculations for forecast publication                     |            |        |        |        |        |
| Capex, dividends, acquisitions and other items before FCF | -2,071     | -2,835 | -346   | -2,815 | -2,555 |
| Free cash flow after acquisitions and divestitures        | 175        | -829   | 1,717  | -674   | -266   |
| Free cash flow margin (after net acquisitions) (%)        | 1.1        | -6.0   | 12.5   | -4.9   | -1.8   |
| Coverage ratios   |            |        |        |        |        |
| FFO interest coverage (x)                                 | 4.6        | 4.4    | 4.4    | 4.6    | 5.0    |
| FFO fixed charge coverage (x)                             | 4.0        | 3.8    | 3.8    | 4.0    | 4.3    |
| Operating EBITDAR/interest paid + rents (x)               | 4.4        | 4.6    | 4.4    | 4.6    | 4.9    |
| Operating EBITDA/interest paid (x)                        | 5.1        | 5.3    | 5.1    | 5.4    | 5.8    |
| Leverage ratios   |            |        |        |        |        |
| Total adjusted debt/operating EBITDAR(x)                  | 5.0        | 4.5    | 4.5    | 4.2    | 4.1    |
| Total adjusted net debt/operating EBITDAR (x)             | 4.4        | 4.1    | 3.8    | 3.9    | 3.8    |
| Total debt with equity credit/operating EBITDA (x)        | 4.9        | 4.4    | 4.5    | 4.1    | 4.0    |
| FFO adjusted leverage (x)                                 | 5.4        | 5.3    | 5.2    | 4.8    | 4.7    |
| FFO adjusted net leverage (x)                             | 4.8        | 4.8    | 4.3    | 4.5    | 4.4    |
| Source: Fitch Ratings, Fitch Solutions                    |            |        |        |        |        |

How to Interpret the Forecast Presented

The forecast presented is based on Fitch Ratings' internally produced, conservative rating case forecast. It does not represent the forecast of the rated issuer. The forecast set out above is only one component used by Fitch Ratings to assign a rating or determine a rating outlook, and the information in the forecast reflects material but not exhaustive elements of Fitch Ratings' rating assumptions for the issuer's financial performance. As such, it cannot be used to establish a rating, and it should not be relied on for that purpose. Fitch Ratings' forecasts are constructed using a proprietary internal forecasting tool, which employs Fitch Ratings' own assumptions on operating and financial performance that may not reflect the assumptions that you would make. Fitch Ratings' own definitions of financial terms such as EBITDA, debt or free cash flow may differ from your own such definitions. Fitch Ratings may be granted access, from time to time, to confidential information on certain elements of the issuer's forward planning. Certain elements of such information may be omitted from this forecast, even where they are included in Fitch Ratings' own internal deliberations, where Fitch Ratings, at its sole discretion, considers the data may be potentially sensitive in a commercial, legal or regulatory context. The forecast (as with the entirety of this report) is produced strictly subject to the disclaimers set out at the end of this report. Fitch Ratings may update the forecast in future reports but assumes no responsibility to do so. Original financial statement data for historical periods is processed by Fitch Solutions on behalf of Fitch Ratings. Key financial adjustments and all financial forecasts credited to Fitch Ratings are generated by rating agency staff.

## **Ratings Navigator**

| Fite             | hRatings            | 5                     | EDP - En                               | ergias de                         | Portugal         | , <b>S.A</b> .             | ESG Relevance:               |                                | Corp                | orates Ratin          | gs Navigator<br>EMEA Utilities |
|------------------|---------------------|-----------------------|--|-----------------------------------|------------------|----------------------------|------------------------------|--------------------------------|---------------------|-----------------------|--------------------------------|
| _                |                     |                       |  |                                   | Business Profile |                            |                              |                                | Financial Profile   |                       |                                |
| Factor<br>Levels | Sector Risk Profile | Operating Environment | Management and<br>Corporate Governance | Position and Cash<br>Flow Profile | Regulation       | Market Trends and<br>Risks | Asset Base and<br>Operations | Profitability and Cash<br>Flow | Financial Structure | Financial Flexibility | Issuer Default Rating          |
| aaa              |                     |                       |  |                                   |                  |                            |                              |                                |                     |                       | AAA                            |
| aa+              |                     |                       |  |                                   |                  |                            |                              |                                |                     |                       | AA+                            |
| aa               |                     |                       |  |                                   |                  |                            |                              |                                |                     |                       | AA                             |
| aa-              |                     |                       |  |                                   |                  |                            |                              |                                |                     |                       | AA-                            |
| a+               | 1                   |                       |  |                                   |                  |                            |                              |                                |                     |                       | A+                             |
| а                |                     |                       | T                                      |                                   |                  |                            |                              |                                |                     |                       | A                              |
| a-               |                     |                       |  |                                   |                  |                            |                              |                                |                     |                       | A-                             |
| bbb+             |                     |                       |  | T                                 |                  |                            |                              |                                |                     | _                     | BBB+                           |
| bbb              |                     |                       |  |                                   |                  |                            |                              |                                | <b>↓</b>            |                       | BBB                            |
| bbb-             |                     |                       |  | <b>1</b>                          |                  |                            |                              | L                              |                     |                       | BBB- Stable                    |
| bb+              |                     |                       |  |                                   |                  |                            |                              |                                |                     |                       | BB+                            |
| bb               |                     |                       |  |                                   |                  |                            |                              |                                |                     |                       | BB                             |
| bb-              | _                   |                       |  |                                   |                  |                            |                              |                                |                     |                       | BB-                            |
| b+               |                     |                       |  |                                   |                  |                            |                              |                                |                     |                       | B+                             |
| b                |                     |                       |  |                                   |                  |                            |                              |                                |                     |                       | В                              |
| b-               | - <b>-</b>          | 1 A A                 |  |                                   |                  |                            |                              |                                |                     |                       | B-                             |
| ccc+             |                     |                       |  |                                   |                  |                            |                              |                                |                     |                       | CCC+                           |
| ccc              |                     |                       |  |                                   |                  |                            |                              |                                |                     |                       | ccc                            |
| ccc-             |                     |                       |  |                                   |                  |                            |                              |                                |                     |                       | ccc-                           |
| сс               |                     |                       |  |                                   |                  |                            |                              |                                |                     |                       | сс                             |
| с                |                     |                       |  |                                   |                  |                            |                              |                                |                     |                       | с                              |
| d or rd          |                     |                       |  |                                   |                  |                            |                              |                                |                     |                       | D or RD                        |

### **Corporates** Electric-Corporate Portugal

## **Fitch**Ratings

### EDP - Energias de Portugal, S.A.

| Opera | ting E | nvironment           |     | and Corporate Governance   |  |      |   |                        |
|-------|--------|----------------------|-----|--|--|------|---|------------------------|
| а     |        | Economic Environment | bbb | Average combination of countries where economic value is created and where assets are<br>located.  |  | a+   |   | Management Strategy    |
| a-    | Т      | Financial Access     | а   | Strong combination of issuer-specific funding characteristics and the strength of the<br>relevant local financial market.                    |  | а    | ľ | Governance Structure   |
|       |        | Systemic Governance  | aa  | Systemic governance (eg rule of law, corruption, government effectiveness) of the issuer's<br>country of incorporation consistent with 'aa'. |  | a-   |   | Group Structure        |
| b-    | Т      |                      |     |  |  | bbb+ |   | Financial Transparency |
| ccc+  |        |                      |     |  |  | bbb  |   |                        |

## **Corporates Ratings Navigator**

EMEA Utilities

Overall ESG

### Position and Cash Flow Profile

|      | • |   |     |   |
|------|---|---|-----|---|
| a-   |   | Market Presence and Integration           |     | Top-tier position in at least one market. Partially integrated (typically including<br>generation, distribution and supply).            |
| bbb+ | I | Earnings from Regulated Network<br>Assets | bbb | Less than 40% of EBITDA comes from high-quality regulated network assets.   |
| bbb  |   | Quasi-Regulated Earnings                  | а   | Over 20% of EBITDA comes from quasi-regulated assets in markets or from long-term<br>contracted sales with creditworthy counterparties. |
| bbb- |   |   |     |   |
| bb+  |   |   |     |   |

#### Market Trends and Risks

| a-   |   | Fundamental Market Trends           | bb  | Markets with structural challenges.   |
|------|---|-------------------------------------|-----|---|
| bbb+ | T | Generation and Supply Positioning   | а   | Strong position in the merit order; effective hedging; flexible fuel procurement.<br>Generation balanced with strong position in supply and services. |
| bbb  |   | Customer Base and Counterparty Risk | bbb | Economy of area served provides structurally stable background; medium counterparty<br>risk; fair collection rates for supply operations.             |
| bbb- |   |                                     |     |   |
| bb+  |   |                                     |     |   |

#### Profitability and Cash Flow

| a-   |   | Free Cashflow               | bbb | Structurally neutral to negative FCF across the investment cycle.   |
|------|---|-----------------------------|-----|---|
| bbb+ | T | Volatility of Profitability | bbb | Stability and predictability of profits in line with utility peers. |
| bbb  |   |                             |     |   |
| bbb- |   |                             |     |   |
| bb+  |   |                             |     |   |

#### Financial Flexibility

| bbb+ |   | Financial Discipline   | а   | Clear commitment to maintain a conservative policy with only modest deviations<br>allowed.      |
|------|---|------------------------|-----|---|
| bbb  | T | Liquidity              | а   | Very comfortable liquidity. Well-spread debt maturity schedule. Diversified sources of funding. |
| bbb- |   | FFO Fixed Charge Cover | bb  | 3.5x  |
| bb+  | L | FX Exposure            | bbb | Some FX exposure on profitability and/or debt/cash flow match. Effective hedging.               |
| bb   |   |                        |     |   |

How to Read This Page: The left column shows the three-notch band assessment for the overall Factor, illustrated by a bar. The right column breaks down the Factor into Sub-Factors, with a description appropriate for each Sub-Factor and its corresponding category.

| +ddd  |       | Financial Transparency                | а   | High-quality and timely financial reporting.   |
|-------|-------|---------------------------------------|-----|--|
| bbb   |       |                                       |     |  |
| Regul | ation |                                       |     |  |
| a-    |       | Regulatory Framew ork and Policy Risk | bbb | Less transparent frameworks, with emerging track record and multi-year tariffs, exposed to political risk. Medium-term predictability.   |
| bbb+  | T     | Cost Recovery and Risk Exposure       | bbb | Tariff setting that may limit efficiently incurred cost and investment recovery, with moderate<br>regulatory lag, price and volume risk. |
| bbb   |       |                                       |     |  |
| bbb-  |       |                                       |     |  |

among several shareholders.

Link quality and timely financial manufic.

а

bbb

bbb Strategy may include opportunistic elements but soundly implemented.

Experienced board exercising effective checks and balances. Ownership can be concentrated

Some group complexity leading to somewhat less transparent accounting statements. No significant related-party transactions.

#### Asset Base and Operations

bb+

| a+   |   | Asset Quality   | а | High asset quality likely to benefit opex and capex requirements compared with peers.  |
|------|---|-----------------|---|--|
| а    | T | Asset Diversity | а | High diversification by geography, generation source, supplied product; multi-jurisdictional utility or<br>regional multi-utility. |
| a-   |   | Carbon Exposure | а | Energy production mostly from clean sources and low carbon exposure (< 300gCO2/kWh).   |
| bbb+ | L |                 |   |  |
| bbb  |   |                 |   |  |

#### Financial Structure

| bbb+ |   | Lease Adjusted FFO Gross Leverage | bbb | 5.0x |
|------|---|-----------------------------------|-----|------|
| bbb  |   | Lease Adjusted FFO Net Leverage   | bbb | 4.5x |
| bbb- |   |                                   |     |      |
| bb+  | 1 |                                   |     |      |
| bb   |   |                                   |     |      |

#### **Credit-Relevant ESG Derivation**

| EDP - Energias de  | Portugal, S.A. has 12 ESG potential rating drivers         | key<br>driver    | 0  | issues | 5 |  |
|--------------------|--|------------------|----|--------|---|--|
|                    | Emissions from operations                                  | driver           | 0  | issues | 4 |  |
|                    | Fuel use to generate energy                                | potential        |    |        |   |  |
|                    | Plants' and networks' exposure to extreme weather          | driver           | 12 | issues | 3 |  |
| →<br>→             | Product affordability and access                           |                  |    | issues | 2 |  |
| ⇒                  | Quality and safety of products and services; data security | rating<br>driver | 0  | issues | 1 |  |
| Showing top 6 issu | ies  |                  |    |        |   |  |

For further details on Credit-Relevant ESG scoring, see page 3.

**Corporates** Electric-Corporate Portugal

### **Fitch**Ratings

### EDP - Energias de Portugal, S.A.

#### **Corporates Ratings Navigator** EMEA Utilities

| Credit-Relevant ESG Derivation  |                     |    |        |   |  |  |  |
|---|---------------------|----|--------|---|--|--|--|
| PP - Energias de Portugal, S.A. has 12 ESG potential rating drivers 0 issues  |                     |    |        |   |  |  |  |
| 📂 EDP - Energias de Portugal, S.A. has exposure to emissions regulatory risk but this has very low impact on the rating.    |                     |    |        |   |  |  |  |
| EDP - Energias de Portugal, S.A. has exposure to energy productivity risk but this has very low impact on the rating.       | driver              | 0  | issues | 4 |  |  |  |
| EDP - Energias de Portugal, S.A. has exposure to waste & impact management risk but this has very low impact on the rating. | potential driver    | 12 | issues | 3 |  |  |  |
| 📫 EDP - Energias de Portugal, S.A. has exposure to extreme weather events but this has very low impact on the rating.       |                     |    |        |   |  |  |  |
| EDP - Energias de Portugal, S.A. has exposure to access/affordability risk but this has very low impact on the rating.      |                     | 2  | issues | 2 |  |  |  |
| EDP - Energias de Portugal, S.A. has exposure to customer accountability risk but this has very low impact on the rating.   | not a rating driver | 0  | issues | 1 |  |  |  |
| Showing top 6 issues  |                     |    |        |   |  |  |  |

#### Environmental (E)

| General Issues  | E Score | Sector-Specific Issues   | Reference  | E ? | Sca |
|---|---------|--|--|-----|-----|
| GHG Emissions & Air Quality                                   | 3       | Emissions from operations  | Asset Base and Operations; Profitability and Cash Flow                             | 5   |     |
| Energy Management   | 3       | Fuel use to generate energy  | Asset Base and Operations; Market Trends and Risks;<br>Profitability and Cash Flow | 4   |     |
| Water & Wastew ater Management                                | 2       | Water used by hydro plants or by other generation plants; effluent<br>management | Asset Base and Operations; Market Trends and Risks;<br>Profitability and Cash Flow | 3   |     |
| Waste & Hazardous Materials Management;<br>Ecological Impacts | 3       | Impact of waste from operations  | Asset Base and Operations; Profitability and Cash Flow                             | 2   |     |
| Exposure to Environmental Impacts                             | 3       | Plants' and networks' exposure to extreme weather                                | Asset Base and Operations; Profitability and Cash Flow                             | 1   |     |

#### Social (S)

| General Issues  | S Score | Sector-Specific Issues  | Reference  | S S | Scale |
|---|---------|---|--|-----|-------|
| Human Rights, Community Relations, Access & Affordability     | 3       | Product affordability and access  | Profitability and Cash Flow; Regulation                                    | 5   |       |
| Customer Welfare - Fair Messaging, Privacy &<br>Data Security | 3       | Quality and safety of products and services; data security                  | Profitability and Cash Flow  | 4   |       |
| Labor Relations & Practices                                   | 3       | Impact of labor negotiations and employee (dis)satisfaction                 | Profitability and Cash Flow; Financial Structure; Financial<br>Flexibility | 3   |       |
| Employee Wellbeing  | 2       | Worker safety and accident prevention                                       | Profitability and Cash Flow; Financial Structure; Financial<br>Flexibility | 2   |       |
| Exposure to Social Impacts                                    | 3       | Social resistance to major projects that leads to delays and cost increases | Asset Base and Operations; Profitability and Cash Flow                     | 1   |       |

#### Governance (G)

| General Issues G       |   | Sector-Specific Issues   | Reference                           |
|------------------------|---|--|-------------------------------------|
| Management Strategy    | 3 | Strategy development and implementation                        | Management and Corporate Governance |
| Governance Structure   | 3 | Board independence and effectiveness; ow nership concentration | Management and Corporate Governance |
| Group Structure        | 3 | Complexity, transparency and related-party transactions        | Management and Corporate Governance |
| Financial Transparency | 3 | Quality and timing of financial disclosure                     | Management and Corporate Governance |
|                        |   |  |                                     |



#### How to Read This Page

ESG scores range from 1 to 5 based on a 15-level color gradation. Red (5) is most relevant and green (1) is least relevant

The Environmental (E), Social (S) and Governance (G) tables break out the individual components of the scale. The right-hand box shows the aggregate E, S, or G score. General Issues are relevant across all markets with Sector-Specific Issues unique to a particular industry group. Scores are assigned to each sector-specific issue. These scores signify the credit-relevance of the sector-specific issues to the issuing entity's overall credit rating. The Reference box highlights the factor(s) within which the corresponding ESG issues are captured in Fitch's credit analysis.

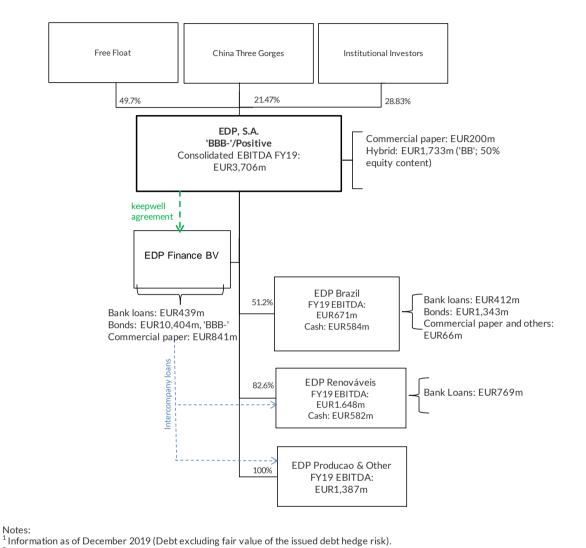
The Credit-Relevant ESG Derivation table shows the overall ESG score. This score signifies the credit relevance of combined E, S and G issues to the entity's credit rating. The three columns to the left of the overall ESG score summarize the issuing entity's sub-component ESG scores. The box on the far left identifies the some of the main ESG issues that are drivers or potential drivers of the issuing entity's credit rating (corresponding with scores of 3, 4 or 5) and provides a brief explanation for the score.

Classification of ESG issues has been developed from Fitch's sector ratings criteria. The General Issues and Sector-Specific Issues draw on the classification standards published by the United Nations Priniciples for Responsible Investing (PRI) and the Sustainability Accounting Standards Board(SASB).

#### CREDIT-RELEVANT ESG SCALE

| н | ow relevant are E, S and G issues to the overall credit rating?   |
|---|---|
| 5 | Highly relevant, a key rating driver that has a significant impact on the rating<br>on an individual basis. Equivalent to "higher" relative importance within<br>Navigator.                         |
| 4 | Relevant to rating, not a key rating driver but has an impact on the rating in<br>combination with other factors. Equivalent to "moderate" relative importance<br>within Navigator.                 |
| 3 | Minimally relevant to rating, either very low impact or actively managed in a<br>way that results in no impact on the entity rating. Equivalent to "lower" relative<br>importance within Navigator. |
| 2 | Inelevant to the entity rating but relevant to the sector.  |
| 1 | Irrelevant to the entity rating and irrelevant to the sector.   |

## **Simplified Group Structure Diagram**



<sup>2</sup> Dividends paid to minorities of EUR134 million in 2019, EUR49 million to EDP Renováveis and EUR86 million to EDP

Brazil.

Source: Fitch Ratings, Fitch Solutions, EDP

## Peer Financial Summary

| Company   | IDR  | Financial<br>Statement<br>Date | Associates) | Operating<br>EBITDAR<br>Margin (%) | FFO<br>Margin (%) | FFO Fixed<br>Charge<br>Coverage<br>(x) | FFO<br>Adjusted<br>Net<br>Leverage<br>(x) |
|---|------|--------------------------------|-------------|------------------------------------|-------------------|--|---|
| EDP - Energias de<br>Portugal, S.A.                 | BBB- |                                |             |                                    |                   |  |   |
|   |      | 2022F                          | 3,734       | 26.4                               | 16.5              | 4.3                                    | 4.4                                       |
|   |      | 2021F                          | 3,523       | 26.4                               | 16.5              | 4.0                                    | 4.5                                       |
|   | -    | 2020F                          | 3,498       | 26.4                               | 16.3              | 3.8                                    | 4.3                                       |
|   |      | 2019F                          | 3,651       | 27.2                               | 16.5              | 3.8                                    | 4.8                                       |
|   | BBB- | 2018                           | 3,287       | 22.4                               | 14.9              | 4.0                                    | 4.8                                       |
| Enel S.p.A.   | A-   | _                              |             |                                    |                   | · · · ·                                |   |
|   |      | 2021F                          | 18,857      | 24.2                               | 14.8              | 4.8                                    | 4.0                                       |
|   | -    | 2020F                          | 18,096      | 23.6                               | 14.5              | 4.9                                    | 4.0                                       |
|   |      | 2019F                          | 17,660      | 23.3                               | 14.0              | 4.7                                    | 3.9                                       |
|   | BBB+ | 2018                           | 16,158      | 21.6                               | 13.3              | 4.7                                    | 4.0                                       |
| Iberdrola, S.A.                                     | BBB+ |                                |             |                                    |                   |  |   |
|   | -    | 2021F                          | 10,375      | 26.4                               | 19.1              | 5.3                                    | 4.4                                       |
|   | -    | 2020F                          | 9,897       | 26.3                               | 19.0              | 5.4                                    | 4.5                                       |
|   |      | 2019F                          | 9,598       | 25.7                               | 18.8              | 5.8                                    | 4.5                                       |
|   | BBB+ | 2018                           | 9,349       | 27.1                               | 20.8              | 6.6                                    | 4.4                                       |
| E.ON SE   | BBB+ |                                |             |                                    |                   |  |   |
|   | -    | 2021F                          | 7,335       | 11.2                               | 7.8               | 5.2                                    | 3.7                                       |
|   | -    | 2020F                          | 7,544       | 11.6                               | 8.1               | 5.2                                    | 3.5                                       |
|   | -    | 2019F                          | 3,839       | 13.5                               | 7.6               | 3.3                                    | 7.5                                       |
|   | BBB+ | 2018                           | 3,563       | 12.5                               | 9.6               | 3.9                                    | 1.7                                       |
| Naturgy Energy Group,<br>S.A.                       | BBB  |                                |             |                                    |                   |  |   |
|   |      | 2021F                          | 4,770       | 16.7                               | 10.8              | 4.7                                    | 4.4                                       |
|   | -    | 2020F                          | 4,707       | 16.7                               | 11.0              | 4.9                                    | 4.4                                       |
|   | BBB  | 2019                           | 4,460       | 19.8                               | 12.4              | 4.5                                    | 4.3                                       |
|   | BBB  | 2018                           | 4,019       | 17.1                               | 10.6              | 4.1                                    | 5.1                                       |
| REN - Redes<br>Energeticas Nacionais,<br>SGPS, S.A. | BBB  | -                              |             |                                    |                   |  |   |
|   |      | 2020F                          | 455         | 82.3                               | 58.5              | 7.1                                    | 6.7                                       |
|   | -    | 2019F                          | 469         | 82.0                               | 65.3              | 7.7                                    | 6.0                                       |
|   | BBB  | 2018                           | 487         | 85.8                               | 58.5              | 6.1                                    | 6.7                                       |
|   | BBB  | 2017                           | 487         | 86.7                               | 60.1              | 6.0                                    | 6.8                                       |
| Source: Fitch Ratings, Fitch                        |      | -                              |             |                                    |                   |  |   |

## **Reconciliation of Key Financial Metrics**

| (EUR Millions, As reported)   | 31 Dec 2018 |
|---|-------------|
| Income Statement Summary  |             |
| Operating EBITDA  | 3,287       |
| + Recurring Dividends Paid to Non-controlling Interest  | -168        |
| + Recurring Dividends Received from Associates  | 27          |
| + Additional Analyst Adjustment for Recurring I/S Minorities and Associates                                       | 0           |
| = Operating EBITDA After Associates and Minorities (k)  | 3,146       |
| + Operating Lease Expense Treated as Capitalised (h)  | 131         |
| = Operating EBITDAR after Associates and Minorities (j)   | 3,278       |
| Debt & Cash Summary   |             |
| Total Debt with Equity Credit (I)   | 15,457      |
| + Lease-Equivalent Debt   | 840         |
| + Other Off-Balance-Sheet Debt  | 0           |
| = Total Adjusted Debt with Equity Credit (a)  | 16,298      |
| Readily Available Cash [Fitch-Defined]  | 1,913       |
| + Readily Available Marketable Securities [Fitch-Defined]   | 0           |
| = Readily Available Cash & Equivalents (o)  | 1,913       |
| Total Adjusted Net Debt (b)   | 14,384      |
| Cash-Flow Summary   |             |
| Preferred Dividends (Paid) (f)  | 0           |
| Interest Received   | 36          |
| + Interest (Paid) (d)   | -621        |
|   | -585        |
| = Net Finance Charge (e)  | 2,278       |
| Funds From Operations [FFO] ( c)  | -32         |
| + Change in Working Capital [Fitch-Defined]   |             |
| = Cash Flow from Operations [CFO] (n)   | 2,246       |
| Capital Expenditures (m)  | -1,685      |
| Multiple applied to Capitalised Leases  | 6           |
| Gross Leverage  |             |
| Total Adjusted Debt / Op. EBITDAR* [x] (a/j)  | 5.0         |
| FFO Adjusted Gross Leverage [x] (a/(c-e+h-f))   | 5.4         |
| Total Adjusted Debt/(FFO - Net Finance Charge + Capitalised Leases - Pref. Div. Paid)                             |             |
| Total Debt With Equity Credit / Op. EBITDA* [x] (l/k)   | 4.9         |
| NetLeverage   |             |
| Total Adjusted Net Debt / Op. EBITDAR*[x] (b/j)   | 4.4         |
| FFO Adjusted Net Leverage [x] (b/(c-e+h-f))   | 4.8         |
| Total Adjusted Net Debt/(FFO - Net Finance Charge + Capitalised Leases - Pref. Div. Paid)                         |             |
| Total Net Debt / (CFO - Capex) [x] ((I-o)/(n+m))  | 24.1        |
| Coverage  |             |
| Op. EBITDAR / (Interest Paid + Lease Expense)* [x] (j/-d+h)   | 4.4         |
| Op. EBITDA / Interest Paid* [x] (k/(-d))  | 5.1         |
| FFO Fixed Charge Cover [x] ((c+e+h-f)/(-d+h-f))   | 4.0         |
| (FFO + Net Finance Charge + Capit. Leases - Pref. Div Paid) / (Gross Int. Paid + Capit. Leases - Pref. Div. Paid) |             |
| FFO Gross Interest Coverage [x] ((c+e-f)/(-d-f))  | 4.6         |
| (FFO + Net Finance Charge - Pref. Div Paid) / (Gross Int. Paid - Pref. Div. Paid)                                 |             |
| *EBITDA/R after Dividends to Associates and Minorities  |             |
| Source: Fitch Ratings, based on information from company reports.   |             |
|   |             |

## **Fitch Adjustment Reconciliation**

| 31 Dec 18 | Adjustments   | Associates and<br>Minorities Cash<br>Adjustments   |   | Restricted and<br>freely<br>available cash            | Adjusted<br>Values                                    |
|-----------|---|--|---|---|---|
|           | Aujustitients   | Aujustments  | II- Various   | available cash  | Values  |
| 15 278    | 0   |  |   |   | 15.278  |
| ., .      |   |  | -30   |   | 3,418   |
|           |   | -141   |   |   | 3,278   |
|           |   |  |   |   | 131   |
|           |   |  | -30   |   | 3,287   |
|           |   | -141   |   |   | 3,146   |
|           |   |  |   |   | 1,842   |
| 1,072     |   |  |   |   | 2,012   |
| 15,457    | 0   |  |   |   | 15,457  |
|           | -210  |  |   | -210  | 16,298  |
|           |   |  |   |   | 840   |
| 0         | 0   |  |   |   | 0   |
| 1.803     | 110   |  |   | 110   | 1.913   |
| 0         | 83  |  |   | 83  | 83  |
|           |   |  |   |   |   |
| 0         | 0   |  |   |   | 0   |
| 36        | 0   |  |   |   | 36  |
| -656      | 35  |  | 35  |   | -621  |
| 2,380     | -102  | -141   | 39  |   | 2,278   |
| -62       | 30  |  | 30  |   | -32   |
| 2,318     | -72   | -141   | 69  |   | 2,246   |
| 0         | -69   |  | -69   |   | -69   |
| -1,685    | 0   |  |   |   | -1,685  |
| -691      | 0   |  |   |   | -691  |
| -57       | -141  | -141   |   |   | -198  |
|           |   |  |   |   |   |
| 4.8       |   |  |   |   | 5.0   |
| 5.3       |   |  |   |   | 5.4   |
| 4.7       |   |  |   |   | 4.9   |
|           |   |  |   |   |   |
| 4.3       |   |  |   |   | 4.4   |
| 4.7       |   |  |   |   | 4.8   |
| 21.5      |   |  |   |   | 24.1  |
|           |   |  |   |   |   |
| 4.4       |   |  |   |   | 4.4   |
| 5.1       |   |  |   |   | 5.1   |
| 4.0       |   |  |   |   | 4.0   |
| 4.6       |   |  |   |   | 4.6   |
|           | 1,803<br>0<br>0<br>36<br>-656<br>2,380<br>-62<br>2,318<br>0<br>-1,685<br>-691<br>-57<br>-57<br>-<br>57<br>-<br>57<br>-<br>57<br>-<br>57<br>-<br>57<br>-<br>57 | 3,448 -30   3,448 -171   131 0   3,317 -30   3,317 -171   1,872 -30   15,457 0   16,508 -210   0 0   0 0   1,050 -210   0 0   0 0   1,050 -210   0 0   0 0   1,050 -210   0 0   0 0   36 0   -656 35   2,380 -102   -62 30   2,318 -72   0 -69   -1,685 0   -691 0   -57 -141   4.8 5.3   4.7 -141   4.3 4.7   21.5 -144 | $\begin{array}{c ccccccccccccccccccccccccccccccccccc$ | $\begin{array}{c ccccccccccccccccccccccccccccccccccc$ | $\begin{array}{c ccccccccccccccccccccccccccccccccccc$ |

\*EBITDA/R after Dividends to Associates and Minorities Source: Fitch Ratings, based on information from company reports.

The ratings above were solicited and assigned or maintained at the request of the rated entity/issuer or a related third party. Any exceptions follow below.

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