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CREDIT OPINION
10 May 2022

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RATINGS

EPSO-G UAB

Domicile	Vilnius, Lithuania
Long Term Rating	Baa1
Type	LT Issuer Rating - Dom Curr
Outlook	Stable

Please see the ratings section at the end of this report for more information. The ratings and outlook shown reflect information as of the publication date.

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EPSO-G UAB

First-time Baa1 issuer rating

Summary

EPSO-G UAB's (EPSO-G) credit profile is underpinned by the low business risk profile of its monopoly transmission network operations; a supportive, well developed while yet evolving regulatory framework in Lithuania; and a solid financial profile, reflected in a currently strong level of funds from operations (FFO) to net debt of around 31% in 2021, based on our financial adjustments, although credit metrics will likely weaken over the coming years, given the partly debt-funded planned large investment program.

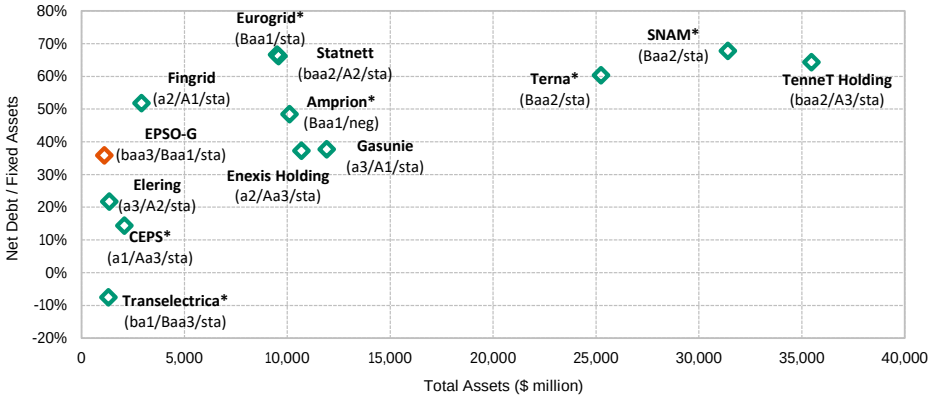
At the same time, EPSO-G's credit quality is constrained by the group's small size, compared to Western European peers (see exhibit 1), with total reported assets of €963 million as of 31 December 2021; some execution risks related to the planned significant capital expenditure program, which has a focus on the synchronisation of the country's electricity grid with the Continental European Network (CEN); and the structural subordination of EPSO-G's liabilities, given that the company primarily relies for its cash flows on its operating, debt-bearing subsidiaries Litgrid AB (Litgrid) and AB Amber Grid (Amber Grid).

EPSO-G's credit profile benefits from our expectation of a strong probability of support from its 100% ultimate owner, the Government of Lithuania (A2 stable).

Exhibit 1

EPSO-G is small compared with its European peers, but benefits from relatively low leverage

Total assets versus net debt/fixed assets, both Moody's-adjusted



[1] Ratings are expressed as the Baseline Credit Assessment (BCA), if applicable, and assigned final ratings. [2] Asterisk indicates the use of 2020 numbers where 2021 accounts or Moody's-adjusted metrics are not yet available.
Source: Moody's Investors Service

Credit strengths

» The low-risk nature of monopoly electricity and gas transmission network operations, which are regulated under a fairly well-developed and transparent regime

» Our expectation of a strong likelihood of government support because of EPSO-G's strategic importance to Lithuania's economy

Credit challenges

» Large planned capital investments (CAPEX) will weigh on key credit metrics, mitigated by partial funding from EU grants and congestion income

» Execution risks related to CAPEX, mitigated by the company's successful track record of completing larger projects, risk sharing with partners and performance guarantees from contractors and suppliers

Rating outlook

The stable outlook reflects our expectations that the company will be able to maintain FFO/net debt sustainably above 12%.

Factors that could lead to an upgrade

The rating could be upgraded if EPSO-G were to consistently maintain FFO/net debt of at least 15% and maintained net debt to fixed assets below 60%, further underpinned by the absence of materially adverse changes to the regulatory framework.

Factors that could lead to a downgrade

The rating could come under downward pressure if FFO/net debt were to decline below 12% for a sustained period. Downward pressure could also be exerted on the rating as a result of a deterioration in the credit quality of the Government of Lithuania; a reduction in the government support assumptions currently incorporated into our assessment; or a materially unfavorable change in the regulatory framework, leading to a significant increase in the company's business risk.

Key indicators

Exhibit 2

EPSO-G UAB

	Dec-18	Dec-19	Dec-20	Dec-21	12 - 18 month Forward View
(FFO + Interest Expense) / Interest Expense	19.4x	16.5x	29.6x	36.2x	11x - 13x
Net Debt / Fixed Assets	67.4%	59.2%	62.8%	35.9%	35% - 55%
FFO / Net Debt	14.7%	12.6%	17.3%	30.8%	11% - 14%
RCF / Net Debt	14.3%	12.3%	17.0%	30.3%	11% - 14%

All ratios are based on adjusted financial data and incorporate Moody's Global Standard Adjustments for Non-Financial Corporations. For definitions of Moody's common ratio terms, please see the accompanying User's Guide.

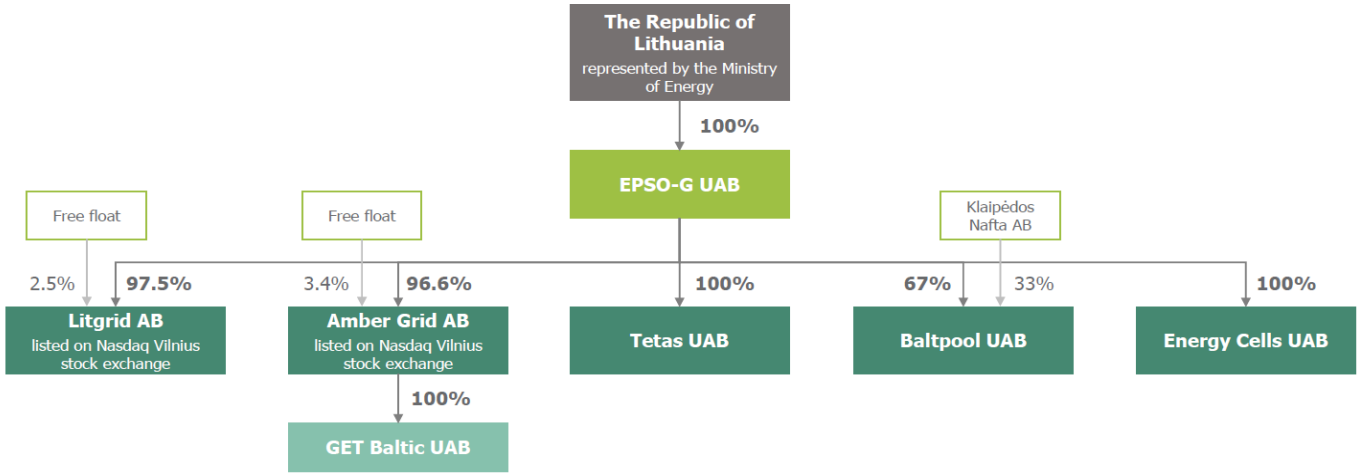
Source: Moody's Financial Metrics™

Profile

Lithuania-based, fully state-owned EPSO-G UAB (EPSO-G) was established in 2012 and is the holding company for Lithuania's transmission system operators (TSO) Litgrid AB (Litgrid; electricity) and AB Amber Grid (Amber Grid; gas). The company holds majority stakes in Litgrid (97.5%) and Amber Grid (96.6%), while both companies remain listed on the Nasdaq Baltic stock exchange. As of 6 May 2022, the market capitalisation of Litgrid was about €393 million, that of Amber Grid around €225 million.

Other subsidiaries include Tetas UAB (100%), a provider of grid development and maintenance services; GET Baltic UAB (100% owned by Amber Grid), an electronic natural gas exchange; Baltpool UAB (67%), an exchange for timber and biomass and administrator of Lithuania's renewables support scheme; and Energy Cells UAB (100%), a company implementing a 200 megawatt (MW) battery energy storage facility. In February 2022 the boards of EPSO-G and Amber Grid approved the search for a strategic partner for GET Baltic UAB who would become the 66% majority owner in the entity.

Exhibit 3
EPSO-G Organisational Structure

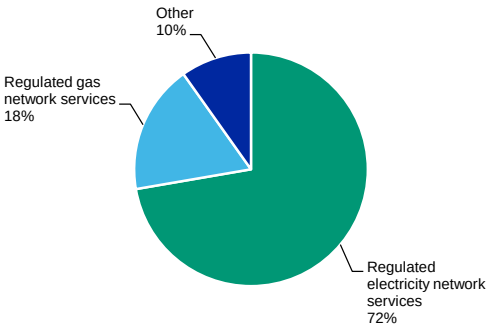


Source: EPSO-G

The TSOs amongst them account for over 98% of group EBITDA. EPSO-G's role is to supervise the implementation of Lithuania's energy policy related to transmission infrastructure by the TSOs and to manage these companies on behalf of the government.

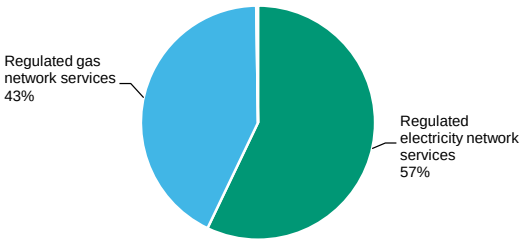
Given Lithuania's location as the southern-most Baltic country, its energy transmission infrastructure connects the region with continental Europe through electricity and gas interconnection points with Poland, namely the 500 megawatt (MW) LitPol link for electricity and the recently commissioned bi-directional Gas Interconnector Poland-Lithuania (GIPL), with an annual capacity of 2.4 billion cubic meters (bcm) in direction of Lithuania and 1.9 bcm to Poland, as well as with the Nordic countries, through the 700 MW NordBalt power interconnector to Sweden.

Exhibit 4
Electricity transmission accounts for the bulk of EPSO-G's earnings...
Revenue breakdown



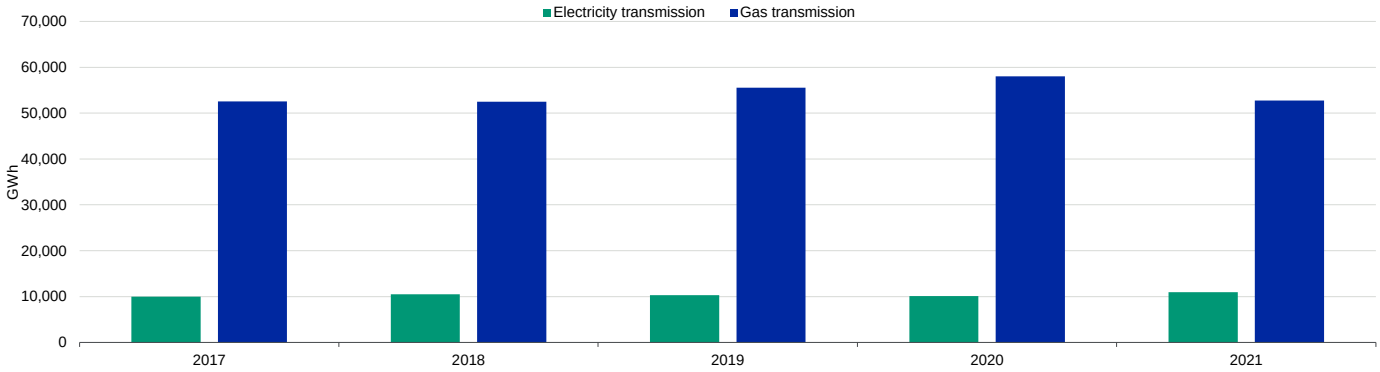
Source: EPSO-G annual reports

Exhibit 5
...and a substantial part of EBITDA
EBITDA breakdown



Rounded shares as aggregate EBITDA for 'other' activities in 2021 is negligible at less than 1.5%.
Source: EPSO-G annual reports

Exhibit 6
EPSO-G's power and gas transmission volumes



Source: EPSO-G annual reports

Detailed credit considerations

Low business risk profile, underpinned by a supportive regulatory framework

EPSO-G's credit profile is underpinned by the regulated income earned from Litgrid's and Amber Grid's TSO operations of their electricity and gas transmission assets. Both companies own the respective assets and the operational licences are granted in perpetuity. Electricity and gas network operations are generally characterised by low business risk because of their monopoly nature and the cash flow visibility stemming from regulated tariffs.

Litgrid's and Amber Grid's tariffs are regulated by the National Energy Regulatory Council (NERC), the independent national regulator in Lithuania, under an incentive-based hybrid price-cap regime for electricity transmission and under an incentive-based revenue-cap regime for gas transmission. The regime is relatively transparent as NERC publishes the applied methodologies, revenues components of the tariff decisions as well the returns calculation and the regulatory asset base (RAB) and also employs public consultations when methodology or tariff changes are planned. While the framework keeps evolving, network regulation is independent and well developed.

Exhibit 7
Stability and predictability of regulatory regime by country
Lithuania scores 'A'

Aaa	Aa	A	Baa
Great Britain[1]	Czech Republic	Belgium - Flanders	Belgium - Wallonia
Ireland (RoI & NI)[3]	Finland	Estonia	Poland
	France	Germany	Slovakia
	Italy	Portugal	Spain
	Netherlands[2]	**Lithuania**	
	Norway		

[1] Only onshore incumbent network operators, excludes Offshore Transmission Operators (OFTOs) (Aa). [2] Excludes N.V. Nederlandse Gasunie (A1 Stable) and TenneT Holding B.V. (A3 Stable). [3] Ireland and ROI for electricity distribution and transmission only.
Source: Moody's Investor Service

Regulatory principles and rules for both TSOs are generally fairly similar, and for both, Litgrid and Amber Grid, five-year regulatory periods apply. In 2022, Litgrid entered the first year of the regulatory period through 2026 while Amber Grid's current period will be completed at year-end 2023, having started in 2019.

NERC applies a building block approach with a timely, inflation-adjusted recovery of operating expenses which are subject to moderate efficiency adjustments (1-1.5% per annum). True-ups occur with a two-year time lag as is common in other European regulatory regimes. Expected grid losses are included in tariffs based on market prices, with any price and volume deviations being offset in future tariff decisions and thus can be considered pass-through costs.

Volume risk for Litgrid as electricity TSO is limited despite a flow-based share of around two-thirds of tariffs in allowed revenues, because a true-up occurs in the next tariff period (calendar year) unless the adjustment would be deemed so significant by NERC that it is spread over several years. In contrast, Amber Grid's tariffs are largely (nearly 90% in 2022) capacity-based and thus have low volume exposure.

Exhibit 8

Synopsis of Lithuanian regulatory environment

	Electricity transmission	Gas transmission
Regulatory body	National Energy Regulatory Council (NERC)	NERC
Regulatory framework	Hybrid price cap/rate of return	Revenue cap/rate of return
Regulatory period	2022-26 (5 years)	2019-23 (5 years)
RAB calculation	RAB includes fixed assets once commissioned (certain strategic assets may be included during construction phase), generally at historical cost; no working capital component, not included are assets financed with investment grants or congestion fees. Application of LRAIC ('long-run average incremental cost') approach for transformers and lines if they contribute to the theoretically efficient network architecture modeled under the LRAIC approach; pro-rata inclusion at current cost over the regulatory period. RAB at the beginning of 2022: EUR 330.3m	RAB includes fixed assets once commissioned (certain strategic assets may be included during construction phase) at historical cost; no working capital component, not included are assets financed with investment grants. RAB at the beginning of 2022: EUR 281.9m
Allowed returns (WACC) (nominal, pre-tax)	2021: 5.34% 2022: 4.03%	2021: 3.86% 2022: 3.94%
WACC parameters review	WACC parameters are fixed for the entire regulatory period, except cost of debt. Cost of debt: Actual cost, is capped by market average, adjusted annually. Risk-free rate: Derived from 10-year average of Lithuanian government bond yields, including bonds with a residual maturity of min. 3,468 days Cost of equity: Risk premium fixed at 5%; use arithmetic mean of EU asset betas of Electricity TSOs published by CEER and relevered for E-TSO. NERC may allow for up to 1% premiums of the WACC at their discretion for risky projects and 1% for ecological or innovative projects	WACC parameters are fixed for the entire regulatory period, except cost of debt. Cost of debt: Sector average, capped by market average, adjusted annually. If market average is above sector average, applied cost of debt is raised by half of the difference. Risk-free rate: Derived from 10-year average of Lithuanian government bond yields, including bonds with a residual maturity of min. 3,468 days Cost of equity: Based on US risk premium plus Lithuania country risk and on arithmetic mean of EU equity betas of Gas TSOs published by CEER. NERC may allow for up to 1% premiums of the WACC at their discretion for risky projects and 1% for ecological or innovative projects
Regulatory lag on investments	Accrue to RAB when investment is commissioned and has been approved beforehand by the regulator, with an exception for certain strategic assets that could be inculded during construction phase	Accrue to RAB when investment is commissioned and has been approved beforehand by the regulator, with an exception for certain strategic assets that could be inculded during construction phase
Allowed investments	TSO needs to submit detailed 10-year network development plan every 2 years and provide updates on annual investments	TSO needs to submit detailed 10-year network development plan every 2 years and provide updates on annual investments
Allowed costs	No split between controllable and non-controllable OPEX. Additional OPEX can be requested for inclusion in the tariff, if reasonably justified	No split between controllable and non-controllable OPEX. Additional OPEX can be requested for inclusion in the tariff, if reasonably justified
Allowed depreciation	Straight-line, based on regulatory asset values (normally close to accounting values). Regulator is allowed to determine shorter depreciation periods for faster investment recovery	Straight-line, based on regulatory asset values (normally close to accounting values). Regulator is allowed to determine shorter depreciation periods for faster investment recovery
Efficiency base and targets	General efficiency target applied to OPEX and set at 1% p.a.; for staff cost the efficiency target is set at 50% of the Ministry of Finance's projected wage growth rate, capped at 1.5%	General efficiency target applied to OPEX (incl. staff cost) and set at 1% p.a.
Volume risk	Though tariffs are largely flow-based, low volume risk as true-ups occur generally with the next tariff period (for the previous tariff period(s)). If larger adjustments are required, NERC may spread adjustments over over several tariff periods.	Largely capacity-based tariffs, therefore low volume risks. True-ups occur within the next tariff period (for the previous tariff period(s)). For larger adjustments, NERC may spread true-up over several tariff periods.
Inflation	CPI applied to "Material operating costs" (i.e. with exclusion of taxes, grid losses, depreciation) with adjustment for efficiency target. Wage costs are limited by Ministry of Finance forecast after efficiency target deduction.	CPI applied to "Material operating costs" (i.e. with exclusion of taxes, grid losses, depreciation) with adjustment for efficiency target. Wage costs are limited by Ministry of Finance forecast after efficiency target deduction.
TSO	Litgrid AB	Amber Grid AB

Source: NERC, EPSO-G and Moody's Investor Service

Returns on transmission assets will decrease from 2021 onwards

As part of their allowed revenues, the TSOs are allowed to realise a reasonable return, measured as pre-tax, nominal weighted average cost of capital (WACC) on the RAB. The returns that actually feed into the tariff calculation are calculated on the basis of the RAB at the beginning of a given tariff period (calendar year). The WACC is fixed for the entire five-year regulatory period and only adjusted annually for costs of debt. It is set at 4.03% for Litgrid and 3.94% for Amber Grid in 2022.

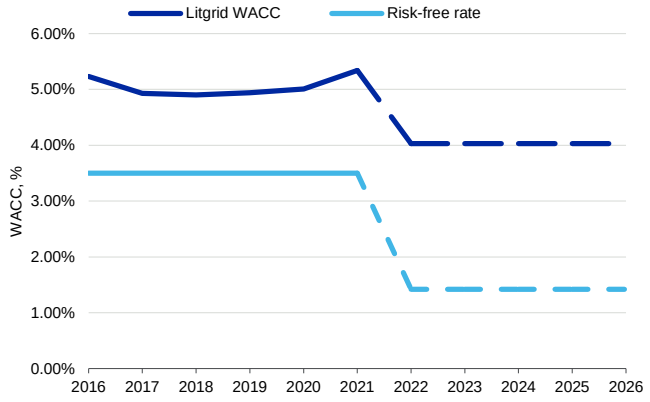
A key component of the WACC is the risk-free rate which in Lithuania is based on the average weighted yields of 10-year government bonds, auctioned over the past ten-year period. With the country's adoption of the Euro as currency in 2015, the risk-free rate decreased significantly. Since the risk-free rate is kept constant over the regulatory period, the lower rate only fed into the WACC calculation for the period following the currency switch, which for Litgrid started in 2016 and for Amber Grid in 2019.

Another recent and material methodology change was the introduction in 2020 of a new gearing ratio of 50% (previously 60%) as well as a fixed 5% equity-risk premium, replacing a reference to US premium levels, and a slight adjustment to the benchmarking of cost of debt. Given that these changes are effective only for periods starting in 2021 or later, Litgrid has been affected earlier than Amber Grid where the new parameters will only feature in the applicable WACC from 2024.

In 2021 NERC adopted provisions to assign on a discretionary basis an additional 1% premium to certain investment projects if these are either deemed innovative; contributing to climate change mitigation; or very risky. The practical relevance of the premium incentive will be seen over the coming years but we expect that the impact on EPSO-G's earnings will be limited, given that most of the CAPEX is spent on the synchronisation with the Western European electricity system or on relatively low-risk, general modernisation and maintenance projects which are difficult to link specifically to climate change mitigation.

Exhibit 9

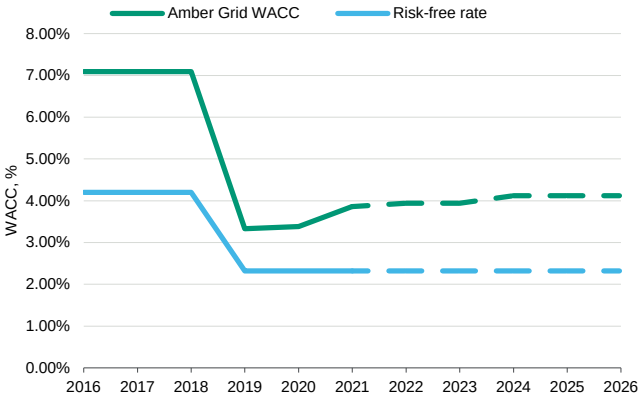
Evolution of the WACC and the risk-free rate for electricity transmission activities



Sources: NERC, EPSO-G and Moody's Investors Service

Exhibit 10

Evolution of the WACC and the risk-free rate for gas transmission activities



Sources: NERC, EPSO-G and Moody's Investors Service

Growth in the asset base will be driven by investments in electricity transmission

The RAB development is adjusted annually by additions of eligible grid investments, divestments and depreciation. As a rule, assets accrue to the RAB upon commissioning, though in the case of strategic investments that for example contribute to the achievement of domestic or EU energy objectives, NERC may allow to include such assets already in the construction phase. Generally investments require NERC's approval based on yearly investment plans which are complemented by a bi-annually updated Ten-Year Development Plan.

For Litgrid, investments in certain lines and transformers are further incentivised through the application of the long-run average incremental cost (LRAIC) approach. The LRAIC scheme is based on the notion of an optimised domestic electricity grid architecture, a theoretical construct with roots in telecommunication grid design, and rewards investments in grid assets that align with this approach. The eligible investment expenditures are determined ex-ante for the entire regulatory period and feature on a pro-rata basis in the tariff

calculation which amounts to a pre-funding at current cost in contrast to ex-post compensation through depreciation of historical values as part of the tariffs.

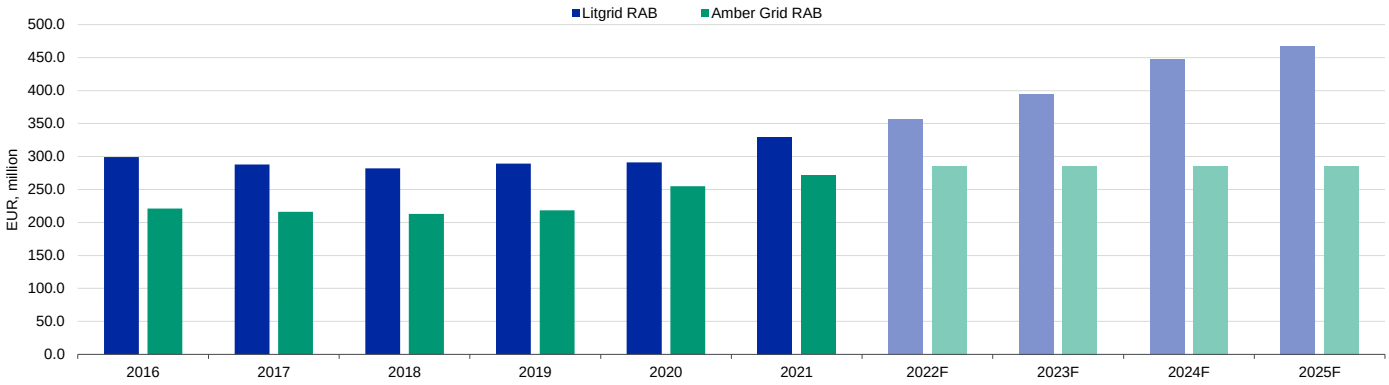
The latter is the approach for Litgrid's non-LRAIC CAPEX and all capital spending of Amber Grid. Depreciation applied to the electricity and the gas RAB is straight-line and based on regulatory values, mostly aligning with accounting depreciation. Assets financed with investment grants or, in the case of Litgrid, income from cross-border capacity auctions (congestion fees) do not accrue to the RAB.

We expect the group's consolidated RAB over the coming years to grow mostly as a result of investments into the power transmission grid which are needed to for the integration with the Western European networks and to accommodate renewable capacities that are necessary to achieve a higher share of domestically produced electricity and of renewables within final electricity consumption by 2030. Seeking to contribute to EU targets, the Lithuanian government has committed to raise the share of renewables in final electricity as well as in final energy consumption in 2030 to 45%, up from 20% respectively 27% in 2020. Investment in the gas transmission grid over the next few years will likely be on a similar level to depreciation and focus on maintenance and modernisation measures, which is reflected in our expectations of a stable gas RAB.

Exhibit 11

EPSO-G group's consolidated regulated asset base will primarily grow through investments in the electricity grid

Litgrid and Amber Grid RAB development



Source: NERC, EPSO-G and Moody's Investor Service

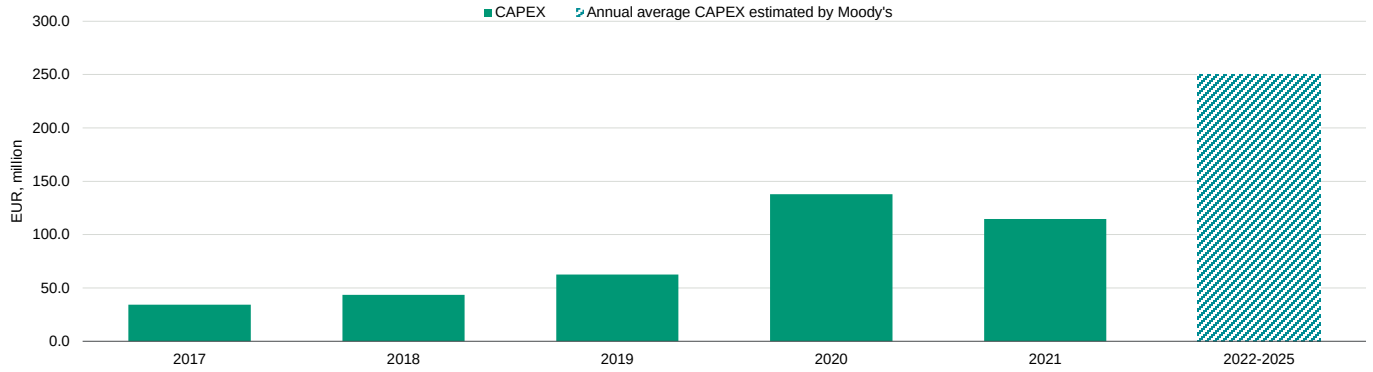
Sizable investment programme through 2030 brings some execution risk; funding by EU grants and congestion fees will contain leverage

EPSO-G forecasts investments for the group of €1.8 billion between 2020 and 2030, of which approximately €200 million were already spent in 2020 and 2021. The major investment undertaking over the period to 2025 will be the so-called Baltic Synchronisation project which will promote Lithuania's electricity integration with its neighbours and Western Europe. To this end, the Baltic countries are in the process of synchronising their electricity systems with CEN, the continental European frequency area, by year-end 2025. The aim of the project is the complete desynchronisation from Russia[1].

As of today, Lithuania and its Baltic peers Estonia (A1 stable) and Latvia (A3 stable) are still part of the unified energy system of Russia, Belarus (Ca negative), Estonia, Lithuania and Latvia (BRELL). For Litgrid, this project will lead to capital spending of some €580 million over the next 3-4 years, constituting the biggest part of EPSO-G's investments during that period.

Exhibit 12

Synchronisation with CEN is the main driver of the elevated level of EPSO-G's investments until 2025



Source: EPSO-G, Moody's Investor Service

Overall, we expect that capital expenditures for electricity-related projects will comprise well over 80% of the forecast volume through 2030, driven by the CEN synchronisation; and by Lithuania's renewables ambitions which require modernised and expanded grid capacities, complemented by battery storage to ensure grid stability. For that purpose a 200 MW battery at a cost of some €100 million is to be completed in 2022; the project is housed in EPSO-G's Energy Cells UAB subsidiary. Amber Grid's investments in gas assets are unlikely to include material expansions of the natural gas infrastructure since the GIPL connector completes Lithuania's regional gas integration and the company has stated to focus on green hydrogen projects, aligned with its renewable expansion targets.

Funding for these investments comes from the TSOs' own cash flows, congestions fees, external debt and, to a significant degree, from EU grants. EPSO-G estimates its own financing needs at around half of CAPEX since roughly one third would be paid from EU grants and the remainder (15-20%) from congestion fees which result from cross-border electricity trading. The outlays for the Baltic Synchronisation project are covered at around 75% by the Connecting Europe Facility (CEF) for energy, with all necessary approvals for the CEF grants being in place. Any amount of CAPEX spending not covered by EU funding or congestion revenue will be added to the respective RAB.

Given the material volume of expenditures spread across a multitude of projects, we see some execution risks for EPSO-G and the TSOs as those are relatively small companies; however, this is mitigated by a track record of successfully completed larger projects over the past decade, the absence of technologically complex projects and the risk sharing with suppliers and contractors through performance bonds. In addition, the high share of non-recourse, non-debt funding from grants and congestion fees underpins a solid financial risk profile.

Leverage metrics expected to remain within the guidance though timing of CAPEX and grants may introduce year-on-year volatility

In 2021, based on our adjustments, EPSO-G's key credit metrics improved significantly compared with 2020, expressed as FFO/net debt of 31%, up from around 17%, and net debt to fixed assets of 36%, down from 63%. While FFO only went up slightly to €68 million from €63 million in 2020, the combination of lower gross CAPEX of €115 million (2020: €138 million); higher inflows from grants and congestion revenues of €102 million against €58 million in 2020; and working capital improvements, were the main drivers of the improved leverage. While in 2020 lower economic activity and lower electricity prices due to the coronavirus pandemic were also reflected in reported net working capital outflows of €42 million, in 2021 a positive swing of €85 million was recorded, driven by higher payables for energy required for balancing and grid stability as well as a higher volume of deposits from traders using the exchanges for gas and biomass.

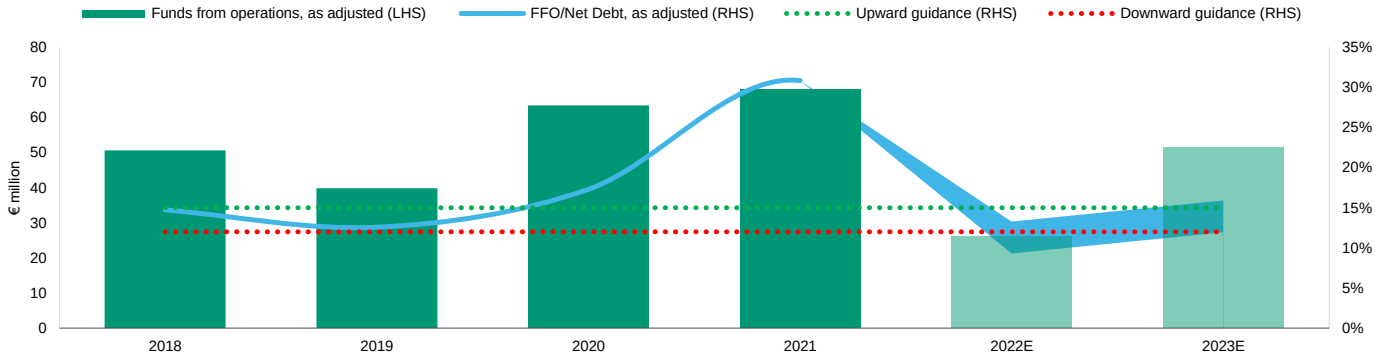
In 2022 true-ups for excess revenues, which occurred in both electricity and gas transmission and system services since 2018, will lead to lower FFO as tariffs are adjusted downward, assuming relatively stable transmission volumes. Given a high probability of energy prices remaining elevated at least this year, the coronavirus base effect underpinning the cash-accretive working capital changes in 2021 will likely not repeat. In addition, we expect CAPEX to be ramped up to well over €200 million in order to achieve the synchronisation with the CEN, which has gained additional urgency after Russia's invasion of Ukraine, and due to the completion of

the battery project. A large part of these expenditures is likely to be offset by inflows from grants and congestion fees, so we expect leverage, expressed as FFO/net debt, to weaken but to remain close to or in line with our guidance.

Given the significant investment program through 2025; the high share of funding through investment grants, which are mostly paid out ex post; the low predictability of congestion fee flows; and tariff true-ups, leverage is likely to fluctuate through 2025, when the Baltic Synchronisation project is planned to be completed. However, the approvals of the EU grants are now in place, reducing funding uncertainty, which is credit positive; and we expect EPSO-G and the TSOs to use available flexibility in the timing of expenditures and drawdowns of grants to maintain a robust credit profile, which is further underpinned by continued dividend restraint from EPSO-G's state owner through at least 2026.

Net debt/fixed assets should gradually increase to the low to mid 50s in percentage terms through 2025, driven by a significant increase of debt, combined with the growth in fixed assets, which are recorded net of grants, resulting from the investment projects. The netting of grants leads to a similar expected evolution of EPSO-G's net debt/RAB.

Exhibit 13
We expect FFO/net debt to revert to at least 12% in 2023

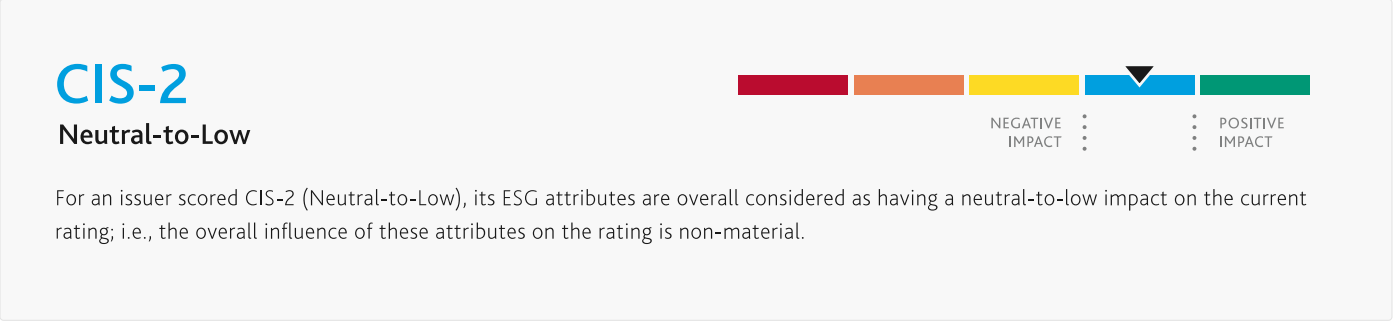


All ratios are based on adjusted financial data and incorporate Moody's Global Standard Adjustments for Non-Financial Corporations; 2021 adjustments are preliminary. This represents Moody's forward view, not the view of the issuer, and unless noted in the text, does not incorporate significant acquisitions and divestitures.
Sources: Moody's Financial Metrics™ and Moody's Investors Service forward view

ESG considerations

EPSO-G UAB's ESG Credit Impact Score is Neutral-to-Low CIS-2

Exhibit 14
ESG Credit Impact Score



Source: Moody's Investors Service

EPSO-G's ESG Credit Impact Score is low/neutral (**CIS-2**), indicating that its ESG attributes are not material for its credit rating. Its score reflects moderate environmental and social risk as well as low governance risks. The effect of ESG risks to the rating is mitigated by the expectation that its government shareholder would support the company, if this were to become necessary.

Exhibit 15
ESG Issuer Profile Scores

Source: Moody's Investors Service

Environmental

EPSO-G's moderately negative environmental risk (**E-3** issuer profile score) reflects the company's exposure to physical climate risk, as its electricity transmission grid assets are predominantly overground and thus may be affected by storms.

Social

EPSO-G's moderately negative social risk (**S-3** issuer profile score) reflects risks related to demographic & social trends, which include potential adverse regulatory decisions or government intervention in regulatory affairs. Lithuania's regulatory framework has allowed the company to recover its costs in a timely manner and also allowed the TSOs to earn adequate returns and displays a high degree of transparency, underpinned by the independence of the regulator.

Governance

EPSO-G's low/neutral governance risk (**G-2** issuer profile score) reflects our view of the company's solid governance structures, underpinned by a track record of non-interference by the shareholder and an independent regulatory regime. EPSO-G's financial policy is sound, with an adequate balance of shareholder and creditor interests. While EPSO-G has a status as a fully state-owned company, the company's boards have sufficient independence while the strategy is tightly linked to the domestic energy policy.

ESG Issuer Profile Scores and Credit Impact Scores for the rated entity/transaction are available on Moodys.com. In order to view the latest scores, please click here to go to the landing page for the entity/transaction on MDC and view the ESG Scores section.

Government support considerations

EPSO-G's rating incorporates two notches of uplift from its standalone credit quality, expressed as a Baseline Credit Assessment (BCA) of baa3. The uplift to the BCA reflects the combination of the credit quality of its 100% owner, the Government of Lithuania; the very high default dependence, resulting from the group's preponderance of domestic earnings and the exposure of the government and the company to common risks; and a strong likelihood of extraordinary support being provided by the Lithuanian government in case of financial distress, given the company's strategic importance to the domestic economy as responsible party for energy infrastructure.

EPSO-G as well as its subsidiaries Litgrid, Amber Grid and Energy Cells are on a government list of strategically important companies for the security of energy supply but also for national security. The role of the company for the country is defined in a so-called "Letter of expectations", issued by the government, which is reviewed annually and may be updated from time to time. Focus areas are Lithuania's energy independence from Russia and Belarus and integration with EU energy infrastructure; and the promotion the energy transition in the country in line with EU decarbonisation targets.

The main support for the company on an ongoing basis is the government's policy, enshrined in law, to extract barely any dividends through at least 2026. Furthermore, there are currently no privatisation plans, and the Government of Lithuania will remain the sole shareholder of EPSO-G.

Liquidity analysis

EPSO-G's cash balance amounted to around €41 million as of 31 December 2021. The company, which is also managing the group cash pool, can also resort to committed, undrawn and freely available bilateral bank facilities in an aggregate amount of €90 million, which fall due in mid-2023 or beyond.

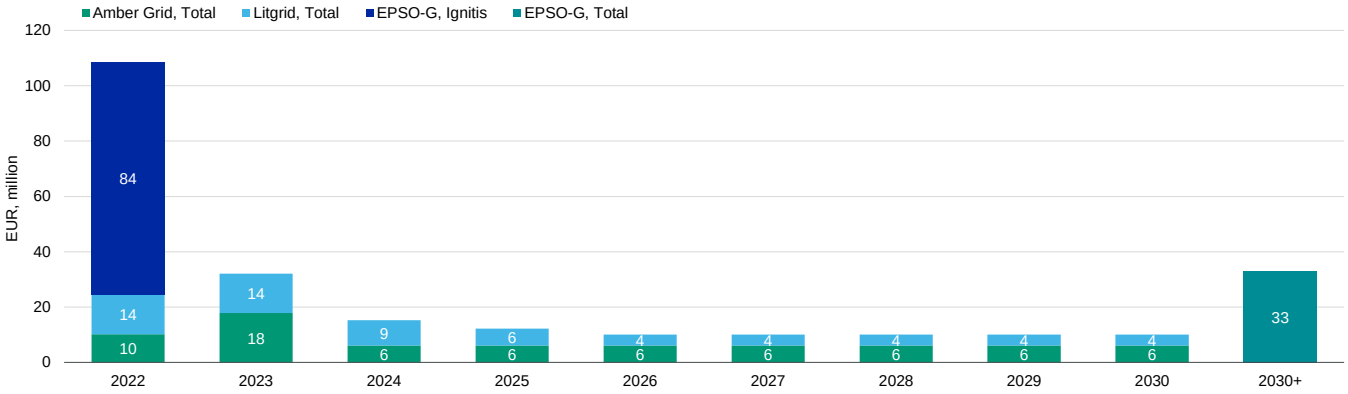
Over the next 12-18 months, we expect the company to be able fund its consolidated investments and scheduled repayments of around €25-30 million per year under various long-term loans granted by the European Investment Bank (Aaa stable) and the Nordic Investment Bank (Aaa stable) to the TSOs from the existing cash position and bank lines in conjunction with the cash flow from regulated earnings, income from European grants and congestion fees. Given the time lag to receive the larger share of approved grants only upon project completion and the uncertainty of the size of congestion revenues, the exposure to funding risks is greater for EPSO-G and its subsidiaries compared with other European network operators where a larger share of investments is incorporated in tariffs.

While the debt maturity profile of the group is rather balanced, a financial liability to Lithuanian utility company AB Ignitis Grupe (Ignitis) of €84 million was recorded as of 31 December 2021 by EPSO-G, which we consider debt-like. The item represents the remaining outstanding payment to Ignitis for the purchase of EPSO-G's holding in Litgrid. Given a comfortable cash position, EPSO-G prepaid the liability in full in March 2022. We expect that EPSO-G will carefully monitor its liquidity position post the repayment and may choose to replenish its cash reserves through debt issuance or bank loans.

Exhibit 16

Debt profile is well balanced after the early repayment of the financial liability owed to Ignitis

Debt maturities as of 31 December 2021



Source: EPSO-G, Moody's Investor Service

Structural considerations

Having repaid the Ignitis liability, EPSO-G has no outstanding external debt at parent company level as all investments are funded at the operating company level and thus sit with the TSOs Litgrid and Amber Grid. Therefore creditors of EPSO-G are structurally subordinated to those of the operating companies.

While we acknowledge EPSO-G's control over the operating companies and the low-risk nature of their regulated monopoly businesses, the company's reliance on cash flows from the operating subsidiaries and the priority claim of lenders to their cash flows, constitutes an element of material structural subordination and is thus reflected in EPSO-G's BCA through notching.

Methodology and scorecard

EPSO-G is rated in accordance with the Regulated Electric and Gas Networks rating methodology, published in April 2022, and the Government-Related Issuers rating methodology, published in February 2020.

The scorecard-indicated outcome is A3 (current view)/Baa2 (forward view), which is above the assigned BCA of baa3. EPSO-G's BCA also reflects its relatively small size compared with that of its continental European peers, the execution risks related to its substantial investment programme and the notching for structural subordination.

Exhibit 17

Rating Factors

EPSO-G UAB

Regulated Electric and Gas Networks Industry [1][2]	Current FY 12/31/2021		Moody's 12-18 Month Forward View As of May 2022 [3]	
Factor 1 : Regulatory Environment and Asset Ownership Model (40%)	**Measure**	**Score**	**Measure**	**Score**
a) Stability and Predictability of Regulatory Regime	A	A	A	A
b) Asset Ownership Model	Aa	Aa	Aa	Aa
c) Cost and Investment Recovery (Ability and Timeliness)	A	A	A	A
d) Revenue Risk	A	A	A	A
Factor 2 : Scale and Complexity of Capital Program (10%)				
a) Scale and Complexity of Capital Program	B	B	B	B
Factor 3 : Financial Policy (10%)				
a) Financial Policy	Baa	Baa	Baa	Baa
Factor 4 : Leverage and Coverage (40%)				
a) FFO Interest Coverage	36.2x	Aaa	11x - 13x	Aaa
b) Net Debt / Fixed Assets	36.0%	Aa	35% - 55%	A
c) FFO / Net Debt	30.9%	Aa	11% - 14%	Baa
d) RCF / Net Debt	30.3%	Aaa	11% - 14%	Baa
Rating:				
a) Scorecard-Indicated Outcome		A3		Baa1
b) Actual Rating Assigned				Baa1
Government-Related Issuer	**Factor**			
a) Baseline Credit Assessment	baa3			
b) Government Local Currency Rating	A2			
c) Default Dependence	Very High			
d) Support	Strong			
e) Actual Rating Assigned	Baa1			

[1] All ratios are based on adjusted financial data and incorporate Moody's Global Standard Adjustments for Non-Financial Corporations. [2] As of 12/31/2021. [3] This represents Moody's forward view, not the view of the issuer, and unless noted in the text, does not incorporate significant acquisitions and divestitures.

Source: Moody's Investors Service

Ratings

Exhibit 18

Category	Moody's Rating
EPSO-G UAB	
Outlook	Stable
Issuer Rating -Dom Curr	Baa1

Source: Moody's Investors Service

Appendix

Exhibit 19

EPSO-G UAB

Select historical Moody's financial data

(in EUR million)	FYE Dec-18	FYE Dec-19	FYE Dec-20	FYE Dec-21
INCOME STATEMENT				
Revenue	246	239	269	359
% Change in Sales (YoY)	9.1%	-2.9%	12.7%	33.3%
EBITDA	69	48	75	80
EBITDA margin %	28.2%	20.0%	27.9%	22.2%
EBIT	31	16	42	45
EBIT margin %	12.5%	6.7%	15.7%	12.5%
Interest Expense	3	3	2	2
Net Income	30	11	39	38
BALANCE SHEET				
Cash & Cash Equivalents	10	13	5	41
Current Assets	144	154	152	311
Net Property Plant and Equipment	510	535	584	614
Non-Current Assets	541	565	635	652
Total Assets	685	719	787	962
Current Liabilities	176	193	181	445
Long-term Debt - Gross	347	330	352	262
Non-Current Liabilities	335	342	384	257
Total Liabilities	510	535	565	703
Total Equity	174	184	222	260
Total Liabilities and Equity	685	719	787	962
CASH FLOW				
Funds from Operations (FFO)	51	40	63	68
Cash Flow From Operations (CFO)	59	48	31	163
Capital Expenditures	(11)	(42)	(113)	(59)
Dividends	2	1	1	1
Retained Cash Flow (RCF)	49	39	63	67
Free Cash Flow (FCF)	47	5	(83)	103
FFO / Net Debt	14.7%	12.6%	17.3%	30.8%
RCF / Net Debt	14.3%	12.3%	17.0%	30.3%
FCF / Net Debt	13.6%	1.6%	-22.6%	46.7%
INTEREST COVERAGE				
(FFO + Interest Expense) / Interest Expense	19.4x	16.5x	29.6x	36.2x
EBITDA / Interest Expense	25.2x	18.6x	33.9x	41.2x
LEVERAGE				
Debt / EBITDA	5.1x	6.9x	5.0x	3.3x
Net Debt / EBITDA	5.0x	6.6x	4.9x	2.8x
Net Debt / Fixed Assets	67.4%	59.2%	62.8%	35.9%

All metrics are based on adjusted financial data and incorporate Moody's Global Standard Adjustments for Non-Financial Corporations.
Source: Moody's Financial Metrics™

Exhibit 20

EPSO-G UAB

Peer comparison

	EPSO-G UAB Baa1 Stable			Elering AS A2 Stable			CEPS, a.s. Aa3 Stable			Fingrid Oyj A1 Stable			Statnett SF A2 Stable			Eurogrid GmbH Baa1 Stable		
(in USD million)	FYE Dec-19	FYE Dec-20	FYE Dec-21	FYE Dec-19	FYE Dec-20	FYE Dec-21	FYE Dec-18	FYE Dec-19	FYE Dec-20	FYE Dec-19	FYE Dec-20	FYE Dec-21	FYE Dec-19	FYE Dec-20	FYE Dec-21	FYE Dec-18	FYE Dec-19	FYE Dec-20
Revenue	267	307	424	159	156	238	661	657	642	884	779	1,291	1,042	1,121	1,623	12,177	12,017	12,600
EBITDA	54	86	94	76	80	58	234	275	229	270	255	278	636	753	940	778	653	656
EBITDA margin %	20.0%	27.9%	22.2%	48.0%	50.8%	24.5%	35.3%	41.9%	35.7%	30.5%	32.7%	21.5%	61.0%	67.2%	57.9%	6.4%	5.4%	5.2%
Total Debt	371	455	298	385	407	367	346	302	367	1,257	1,438	1,317	5,210	5,777	5,663	3,288	3,264	4,973
Net Debt	355	449	251	338	345	248	177	153	274	1,164	1,284	1,067	4,961	5,535	5,473	2,466	2,857	4,610
(FFO + Interest Expense) / Interest Expense	16.5x	29.6x	36.2x	25.1x	25.3x	20.2x	80.8x	60.9x	56.7x	14.1x	14.1x	18.0x	5.5x	7.1x	11.7x	6.0x	7.5x	8.0x
FFO / Net Debt	12.6%	17.3%	30.8%	19.2%	22.0%	21.4%	116.2%	162.3%	80.5%	18.6%	16.6%	22.9%	10.0%	11.6%	15.6%	14.4%	15.8%	11.8%
RCF / Net Debt	12.3%	17.0%	30.3%	9.4%	12.9%	16.9%	91.1%	130.6%	46.5%	2.0%	2.5%	8.5%	8.9%	8.9%	13.5%	9.4%	11.1%	8.6%
Net Debt / Fixed Assets	59.2%	62.8%	35.9%	32.7%	29.2%	21.8%	11.0%	9.1%	14.4%	61.9%	60.6%	51.8%	66.2%	67.6%	66.3%	44.6%	49.2%	66.6%
Net Debt / EBITDA	6.6x	4.9x	2.8x	4.4x	4.1x	4.4x	0.8x	0.6x	1.1x	4.3x	4.7x	4.0x	7.8x	6.7x	6.0x	3.3x	4.4x	6.6x

All metrics are based on adjusted financial data and incorporate Moody's Global Standard Adjustments for Non-Financial Corporations. FYE = Financial year end.
Source: Moody's Financial Metrics™

Exhibit 21

EPSO-G UAB

Adjusted net debt calculation

(in EUR million)		FYE Dec-18	FYE Dec-19	FYE Dec-20	FYE Dec-21
As Reported Total Debt		**197**	**174**	**223**	**178**
	Contingent Consideration	157	157	149	84
Moody's Adjusted Total Debt		**354**	**330**	**372**	**262**
	Cash & Cash Equivalents	(10)	(13)	(5)	(41)
Moody's Adjusted Net Debt		**344**	**317**	**367**	**221**

All metrics are based on adjusted financial data and incorporate Moody's Global Standard Adjustments for Non-Financial Corporations.
Source: Moody's Financial Metrics™

Exhibit 22

EPSO-G UAB

Adjusted EBITDA calculation

(in EUR million)		FYE Dec-18	FYE Dec-19	FYE Dec-20	FYE Dec-21
As Reported EBITDA		**68**	**48**	**75**	**80**
	Unusual Items - Income Statement	1	0	0	0
Moody's Adjusted EBITDA		**69**	**48**	**75**	**80**

All metrics are based on adjusted financial data and incorporate Moody's Global Standard Adjustments for Non-Financial Corporations.
Source: Moody's Financial Metrics™

Endnotes

1 Lithuania's projects are part of a broader agreement signed in 2018 among Poland, Estonia, Lithuania and Latvia through which the Baltics will be connected to continental Europe through Poland by 2025. As part of the project, the capacity on the LitPol interconnector between Lithuania and Poland will expand from the current 500 MW to 2 GW by 2025. These countries also plan to build a subsea cable, the so-called Harmony link, to improve integration because a single connection to the European grid could threaten the security of supply in the Baltic region if there is an outage.

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