



## RATING ACTION COMMENTARY

# Fitch Revises Teollisuuden Voima Oyj's Outlook to Stable; Affirms IDR at 'BBB-'

Fri 18 Mar, 2022 - 8:31 AM ET

Fitch Ratings - Milan - 18 Mar 2022: Fitch Ratings has revised Teollisuuden Voima Oyj's (TVO) Outlook to Stable from Negative, while affirming the generation company's Long-Term Issuer Default Rating (IDR) and senior unsecured rating at 'BBB-'.

The Stable Outlook reflects operational progress on TVO's 1.6GW Olkiluoto 3 (OL3) nuclear power plant, following connection to the grid and the start of electricity production on 12 March 2022, as well as the satisfactory agreement reached with the Areva-Siemens supplier consortium for the partial financial coverage of the project delay until September 2022.

The affirmation reflects expected full ramp-up of electricity production and start of commercial operations in July 2022, as well as the solid operational performance of TVO's two existing nuclear power plants, Olkiluoto 1 and 2 (OL1 and OL2). It also incorporates tangible shareholder support for the OL3 project despite its multi-year delays and we expect the support to be forthcoming in case of further unexpected delays.

## KEY RATING DRIVERS

**Operational Progress on OL3:** Important operational milestones for OL3 have been achieved in the past year, such as nuclear fuel loading in April 2021 and its first electricity production and connection to the grid in March 2022. Before the start of commercial operations, now expected in July 2022 and marking an additional five-month delay, progressive increases in production will be tested, together with the related authority

approvals and hard transient trials. We therefore deem execution risks as lower relative to that of past years.

**Cost Overruns Still Reasonable:** If all goes as planned the entire OL3 construction will mark a 12-year delay to the original schedule, with a total cost of approximately EUR5.7 billion (or EUR3.6 million per MW). This is high, although lower than that of other nuclear projects under construction in Europe.

**Agreed Compensations for Delays:** The supplier consortium has agreed to pay EUR850 million of compensation for delays that occurred until June 2021, and a maximum EUR56.5 million for further delays from June 2021 to September 2022. The majority of the compensation (around EUR657 million) agreed by the supplier consortium has been cashed-in by TVO, while the remainder would be paid at the start of commercial operations, expected in 3Q22, or even directly set off against TVO's final milestone payment.

**Visibility of Compensation Payment:** OL3's trust mechanism currently includes all the funds needed for the project until the expected commercial operation in July 2022 as well as the ones to cover TVO's remaining compensation and the two-year guarantee period. In light of the above, the available EUR400 million shareholder loan commitment until end-2022 represents a liquidity buffer, which we do not expect to be drawn.

**Expected Progressive Debt Reduction:** The fixed-price, turn-key principle of the contract with Areva for the OL3 construction means that TVO's exposure to the delay is somehow limited. The cost overrun mainly stems from project management and commissioning, and additional financing cost due to the multi-year delay. Net debt is expected to increase up to EUR 5.4 billion in 2022, when OL3 is expected to start its commercial operation and shareholders will start to cover also its related interest expenses and asset depreciation, leading to an expected net debt reduction of around EUR100 million-EUR150 million per year.

**Value Creation:** Value creation for TVO's shareholders is one of the key rating considerations. TVO's current production cost is about EUR20/MWh. The blended production cost, which includes capital costs, is estimated to increase to about EUR30/MWh when OL3 comes onstream. Nord Pool futures for the Finnish area trend around EUR45/MWh for 2023-2025, indicating positive value creation once OL3 starts production.

**Not-for-Profit Nuclear Generator:** The ratings reflect TVO's position as a not-for-profit Finnish nuclear generator, producing at-cost electricity for the company's five shareholders. TVO's largest shareholder (58.5%) is Pohjolan Voima Oyj, a not-for-profit

electricity generator owned by a consortium of Finnish industrials (mainly pulp and paper companies UPM-Kymmene Oyj (through its 100%-owned subsidiary UPM Energy Oy) and Stora Enso Oyj (BBB-/Stable)) and utilities. Its second-largest shareholder (with 25.8%) is Fortum Power & Heat Oy, a 100% owned subsidiary of Fortum Oyj (BBB/Stable).

**No Merchant, Volume Risk:** TVO has no direct exposure to wholesale electricity prices or volumes, as its shareholders are at-cost off-takers of the electricity produced. If a shareholder fails to cover annual fixed costs (80% of total costs, paid one month in advance, which also includes debt instalments falling due annually) and variable costs (about 20% of costs) in proportion to their off-take, TVO would cut the supply and sell the electricity to another shareholder or at the Nord Pool exchange. The shareholders have a very long record of regular off-taking.

**Low Political Risk for Nuclear:** Finland's regulatory environment supports the construction of nuclear power plants, given the country's concerns over supply security, the need for reasonably priced electricity for its energy-intensive industries, and stringent EU CO<sub>2</sub> emission requirements driving the phase-out of thermal plants. TVO is a key generator of base-load electricity in Finland: it generates about 17% of the country's annual electricity consumption and will generate about 30% once OL3 is operational. Further, the inclusion of nuclear generation into the EU taxonomy for sustainable finance further reduces the risk of more onerous funding cost in the medium to long term.

## DERIVATION SUMMARY

TVO is a not-for-profit company. Fitch therefore considers traditional leverage or coverage ratios, which are weak compared with other European utilities focused on electricity generation such as Fortum Oyj, RWE AG (BBB+/Stable), Orsted A/S (BBB+/Stable) or Statkraft AS (BBB+/Stable), as less relevant for the ratings than for utilities operating on a fully commercial basis. TVO's FFO after cash interest paid is typically negative and its FFO interest coverage is usually below 1x as interest expense related to OL3 debt in the construction phase is not covered by shareholders, but capitalised.

We rate Finnish electricity generation companies operating under the Mankala principle using the same analytical framework as for utilities operating in a commercial environment - the corporate rating methodology and the key peer comparators described in "Global Electricity Generation: Ratings Navigator Companion".

However, given Mankala companies' specific features, such as the not-for-profit business model, we place more emphasis on the links with the shareholders and the value creation

for them. Given Mankala companies' cash-flow profiles, debt and liquidity management plays a crucial role in determining the ratings. We consider company-specific traits, such as asset base and concentration, market position, strategic importance, and legal and regulatory framework in the same way as typical electricity utilities.

## KEY ASSUMPTIONS

Fitch calculates projected EBITDA and credit ratios in a profit-making scenario, assuming that TVO is able to sell its electricity output at market prices instead of at cost. This measures the incentive for shareholders to maintain their at-cost offtakes, as well as the dividend that would be paid in a profit-making scenario

OL3 fully operational by July 2022

Average production cost of TVO to increase to about EUR30/MWh as OL3 becomes operational, from about EUR20/MWh (with OL1 and OL2 only)

Finnish area prices broadly in line with current forwards

## RATING SENSITIVITIES

Factors that could, individually or collectively, lead to positive rating action/upgrade:

- Solid record of OL3 operations together with satisfactory medium- to long-term power price environment sustaining value creation for TVO shareholders
- Record of progressive debt reduction

Factors that could, individually or collectively, lead to negative rating action/downgrade:

- Significant technical issues or further delays to the start of commercial operations of OL3 substantially beyond September 2022 leading to additional costs for TVO, if not covered by shareholders
- TVO's production costs significantly exceeding Finnish area prices on a sustained basis when OL3 is completed, leading to value destruction for TVO shareholders
- Evidence of weaker credit quality or support from shareholders or structural changes in the Mankala principle undermining the strength of shareholder support
- Adverse regulatory or fiscal changes

- Deterioration in operating performance, safety issues and significantly reduced liquidity reserves

## BEST/WORST CASE RATING SCENARIO

International scale credit ratings of Non-Financial Corporate issuers have a best-case rating upgrade scenario (defined as the 99th percentile of rating transitions, measured in a positive direction) of three notches over a three-year rating horizon; and a worst-case rating downgrade scenario (defined as the 99th percentile of rating transitions, measured in a negative direction) of four notches over three years. The complete span of best- and worst-case scenario credit ratings for all rating categories ranges from 'AAA' to 'D'. Best- and worst-case scenario credit ratings are based on historical performance. For more information about the methodology used to determine sector-specific best- and worst-case scenario credit ratings, visit <https://www.fitchratings.com/site/re/10111579>.

## LIQUIDITY AND DEBT STRUCTURE

**Adequate Liquidity:** Cash and cash equivalents at end-2021 were EUR172 million. Committed undrawn credit facilities were EUR1,000 million maturing in 2024, while TVO also has committed undrawn shareholder loans of EUR400 million valid until end-2022. Available liquidity is sufficient to meet TVO's operating needs, capex and cumulative debt repayments of EUR810 million in 2022-2023.

After OL3 comes onstream in 2022 and shareholders start to fully cover costs (including interest costs and asset depreciation), we expect total debt to gradually decline.

## ISSUER PROFILE

TVO has OL1, OL2 and OL3 nuclear power plants with more than 3GW capacity as its key assets. Once OL3 operates at full capacity, TVO is expected to cover around 30% of all electricity consumed in Finland.

## REFERENCES FOR SUBSTANTIALLY MATERIAL SOURCE CITED AS KEY DRIVER OF RATING

The principal sources of information used in the analysis are described in the Applicable Criteria.

## ESG CONSIDERATIONS

Unless otherwise disclosed in this section, the highest level of ESG credit relevance is a score of '3'. This means ESG issues are credit-neutral or have only a minimal credit impact on the entity, either due to their nature or the way in which they are being managed by the entity. For more information on Fitch's ESG Relevance Scores, visit

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**RATING ACTIONS**

<b>ENTITY / DEBT</b> ⚡	<b>RATING</b> ⚡			<b>PRIOR</b> ⚡
Teollisuuden Voima Oyj (TVO)	LT IDR	BBB- Rating Outlook Stable		BBB- Rating Outlook Negative
	Affirmed			
	ST IDR	F3	Affirmed	F3
senior unsecured	LT	BBB-	Affirmed	BBB-

[VIEW ADDITIONAL RATING DETAILS](#)

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**APPLICABLE CRITERIA**

[Corporates Recovery Ratings and Instrument Ratings Criteria \(pub. 09 Apr 2021\)](#)  
(including rating assumption sensitivity)

[Corporate Rating Criteria \(pub. 15 Oct 2021\)](#) (including rating assumption sensitivity)

**APPLICABLE MODELS**

Numbers in parentheses accompanying applicable model(s) contain hyperlinks to criteria providing description of model(s).

Corporate Monitoring & Forecasting Model (COMFORT Model), v7.9.0 (1)

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Teollisuuden Voima Oyj (TVO)

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