

11 Nov 2022

Power

Non-rated

2023F thermal power: Make a killing

Splendid results for hydropower makers in 3Q22

In 8M22, hydropower volume soared up 36% yoy to 63.2bn kWh thanks to La Nina effect. As a result, hydropower generators' revenue and NPAT-MI went up to VND5,762bn (+58% yoy, +15% qoq) and VND2,676bn (+126% yoy, +23% qoq) respectively in 3Q22. The coal-fired and gas-fired power volumes plunged 16% yoy/1% yoy due to the rising global coal & fuel oil prices. Rising material prices and coal supply shortage boosted the average competitive market (CGM) price when it remained at a high level, VND1,541/kWh (+61% yoy, +12% qoq) in 3Q22.

Rising selling price saved coal thermal power makers' growth

HND and QTP's revenue jumped up to VND3,070bn (+40% yoy) and VND3,141bn (+59% yoy) thanks to rising Pc price which stemmed from hiking input coal prices in 3Q22. On the contrary, despite the decent growth of revenue to VND2,168bn (+73% yoy), NT2's net profit dropped 27% yoy to VND199bn mostly due to the VND187bn bad debt provision in 3Q22. The 3Q22 net profit of its parent company, POW sharply dropped to VND201bn (-67% yoy, -66% qoq) due to (1) swelling material prices (gas, coal), (2) increasing exchange rate loss and (3) VND187bn provision for bad debt. Generally, 8 thermal generators' revenue and NPAT-MI increased to VND30,137bn (+28% yoy, -4% qoq) and VND1,085bn (-42% yoy, -49% qoq) respectively in 3Q22.

Thermal power in 2023F: keep our fingers crossed

We believe the coal price will remain at high level due to coal shortage after EU imposed sanction on Russian coal imports. However, the coal price in 2023F is projected to slow down compared to the towering price in 2022. We expect the average CGM price will remain high in the following months and reach VND1,440/kWh (+44% yoy) in 2022F in the context of hovering material prices and recovering power demand.

The EIA has slashed its 2023 world oil demand growth forecast by 320,000 barrels per day, to 1.16mn bpd and OPEC+ announced the cut of 2mn barrels per day (bpd) of output – equal to 2% of global supply. Despite the uptrend pricing pressure, we estimate the price of a Brent barrel for next year is an average of USD88, down from an average of USD95 across 4Q22 which was lower than 9M22's average price.

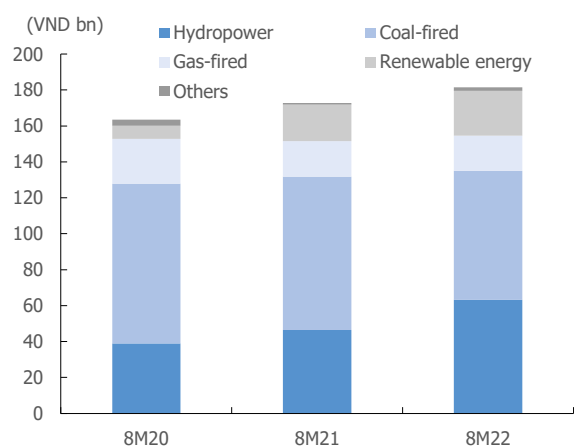
La Nina is expected to wane since early 2023, the water level in hydropower reservoirs is projected to drop in 2023. As a result, **we believe that EVN will mobilize thermal power as the alternative for shrinking hydropower output in 2023F.**

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We make a deep analysis of the specific producers of hydropower, gas-fired, and coal-fired. Some companies, namely BCG, PGV, and REE have penetrated into renewable energy (RE) projects but the proportion of RE revenue is still not accounting for the major portion, so we would not take RE into account in this earnings note.

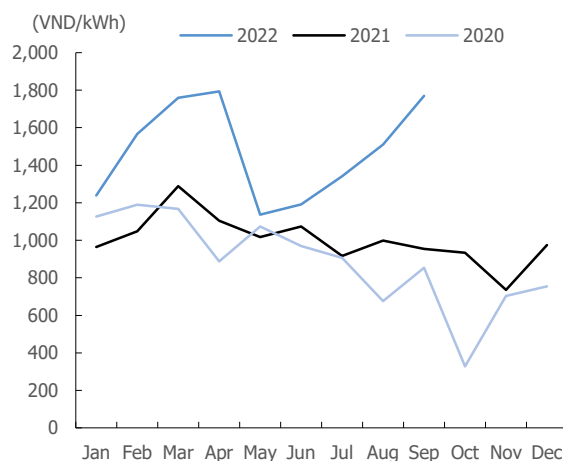
According to EVN, in 8M22, coal-fired power and gas thermal volume dropped to 71.7bn kWh (-16% yoy) and 19.7bn kWh (-1% yoy), respectively in the context of surging global coal price (+200% yoy) & Singapore fuel oil (FO) prices (the reference for gas supplied to domestic gas-fired power plants) (+53% yoy) and the tight coal supply. Gas thermal power plants were less affected thanks to their close proximity to southern industrial hubs and tepid base in 8M21. In addition, the La Nina effect resulted in a sharp increase of hydropower output when it surged to 63.2bn kWh (+36% yoy). Renewable energy (solar, wind and biomass) also had bright result when its output hovered to 24.9bn kWh (+23% yoy), stemming from new wind power plants.

Figure 1. Hydropower output boomed in 8M22



Source: EVN

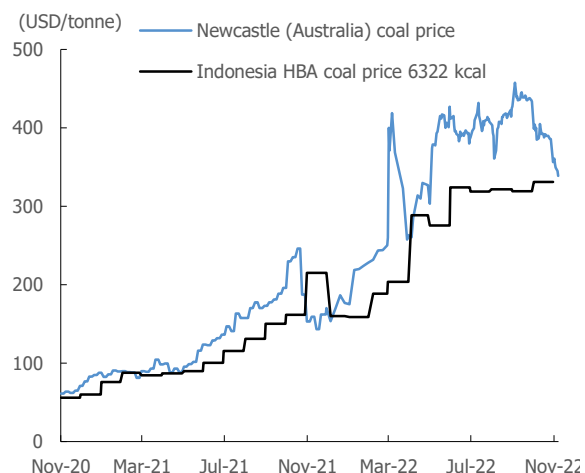
Figure 2. Average CGM price was back to its rising trend in 3Q22



Source: EVNGENCO3

Note: The average CGM price was updated as of Sep, 2022.

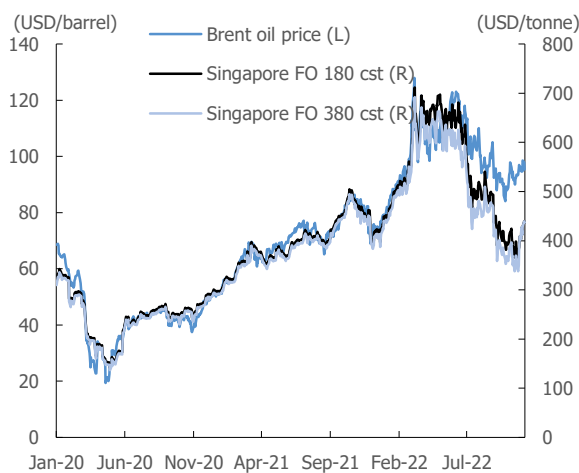
Figure 3. Rising global coal prices put pressure on domestic coal-fired power plants



Source: Bloomberg, Trading Economics

Note: The Newcastle coal price was updated as of Nov 8th.

Figure 4. Singapore FO prices gradually cooled down since 3Q22



Source: Bloomberg

Note: The Singapore fuel oil (FO) and Brent oil prices were updated as of Nov 8th.

Rising material prices (gas, coal...) and coal shortage boosted the average competitive market (CGM) price when it remained at a high level,

VND1,541/kWh (+61% yoy, +12% qoq). Faced with gas shortages, several EU members announced the reopening of coal-fired power plants which pushed global coal prices up. In 3Q22, Newcastle and Indonesian HBA coal prices averaged USD417/tonne (+149% yoy, +9% qoq) and USD320/tonne (+142% yoy, +7% qoq), respectively. According to Vinacomin, in 1H22, the mixed coal price supplied to domestic power plants had increased 30-35% yoy.

Although Singapore fuel oil (FO) prices (*the reference for gas supplied to domestic gas-fired power plants*) gradually cooled down in 3Q22 after a sharp hike in 1H22 (+60% yoy), the average FO prices in 3Q22 were still up 14% yoy. The stellar CGM price was an excellent factor in the growth of power generators.

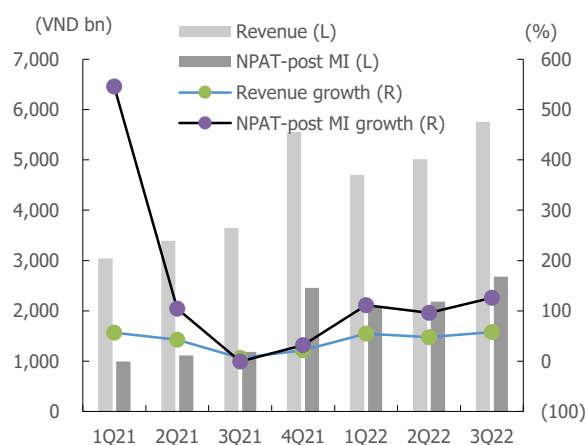
Table 1. 30 hydropower makers' aggregated earnings

	3Q21	2Q22	3Q22	YoY	QoQ
Revenue (VND bn)	3,648	5,014	5,762	57.9%	14.9%
Operating profit (VND bn)	1,380	2,538	3,082	123.3%	21.4%
NPAT-post MI (VND bn)	1,184	2,184	2,676	126.0%	22.5%

Source: Company data, KIS

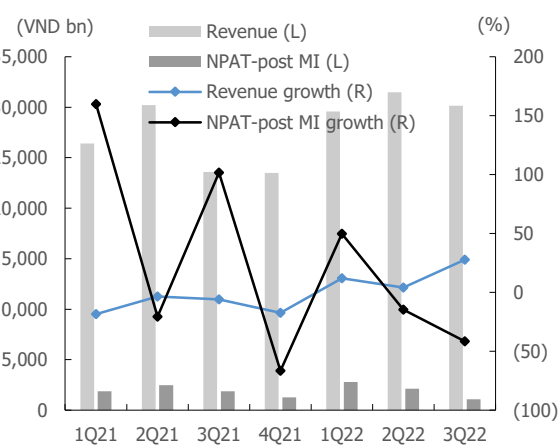
Based on our data collected from 30 listed hydropower companies, hydropower sector achieved solid results amid pleasant weather condition in 2Q22. The revenue growth pace was bolstered to 58% yoy, 15% qoq thanks to stellar selling price and output. NPAT post-MI growth accelerated to 126% yoy, higher than the impressive growth of 96% yoy in 2Q22.

Figure 5. 30 listed hydropower producers' earnings spiked in 3Q22



Source: Company data, KIS

Figure 6. Adverse profit growth of listed thermal power generators



Source: Company data, KIS

Table 2. 8 thermal power makers' aggregated earnings

	3Q21	2Q22	3Q22	YoY	QoQ
Revenue (VND bn)	23,579	31,484	30,137	27.8%	-4.3%
Operating profit (VND bn)	2,271	2,302	1,308	-42.4%	-43.2%
NPAT-post MI (VND bn)	1,858	1,955	1,085	-41.6%	-44.5%

Source: Company data, KIS

The total revenue of 8 listed thermal power producers accelerated 28% yoy thanks to rising average selling price (ASP) and increasing output from a tepid base in 3Q21. However, owing to the effects from rising input material and rising

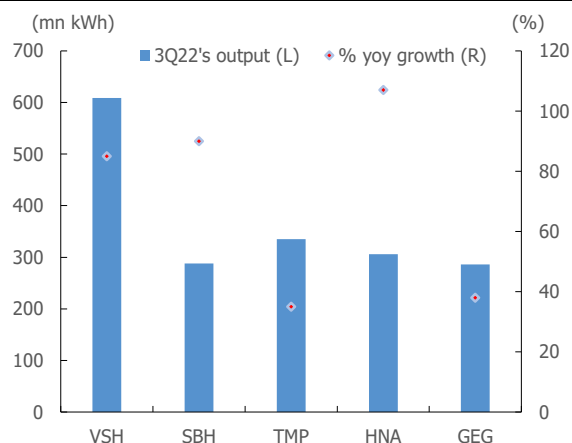
exchange rate, their earnings deteriorated 42% yoy in 3Q22, much worse than positive growth of 50% yoy in 1Q22.

Splendid results for hydropower makers in 3Q22

In the context of rising global coal & gas prices, hydropower makers emerged as bright starts of power sector.

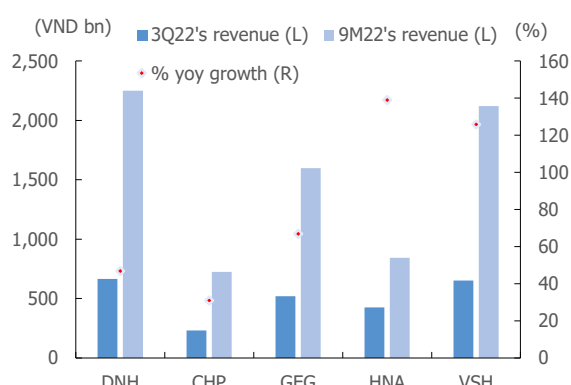
Breaking down aggregated revenue by a specific company, VSH reaped its growth momentum with revenue of VND652bn (+126% yoy) and PAT of VND221bn (up from the loss of -VND42bn in 3Q21) owing to surging ASP (+22% yoy) and volume when its output was up to 609mn kWh (+85% yoy) thanks to La Nina effect. The favorable weather condition was also beneficial to POW's subsidiary, Hua Na hydropower plant when its output and revenue spiked to 306mn kWh (+107% yoy, +107% qoq) and VND427bn (+139% yoy, +114% qoq) in 3Q22. The better-than-expected growth made listed hydropower makers' net margin slightly increased to 46.9% (+13.7%p yoy, +2.5%p qoq). Overall, hydropower generators already ramped up full-year revenue and profit guidance within 9M22.

Figure 7. Hydropower makers' output profited from La Nina



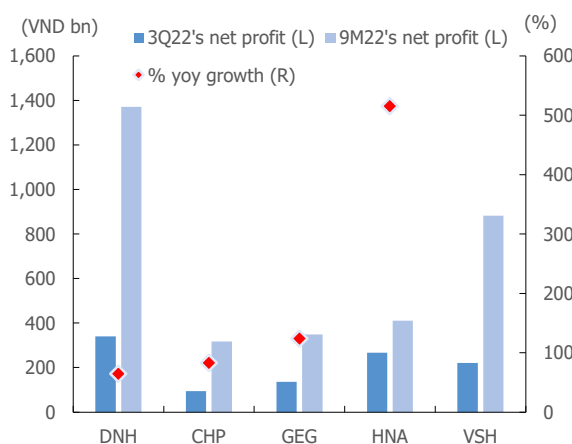
Source: Company data, KIS

Figure 8. Hydropower makers ramped up full-year revenue guidance in 9M22



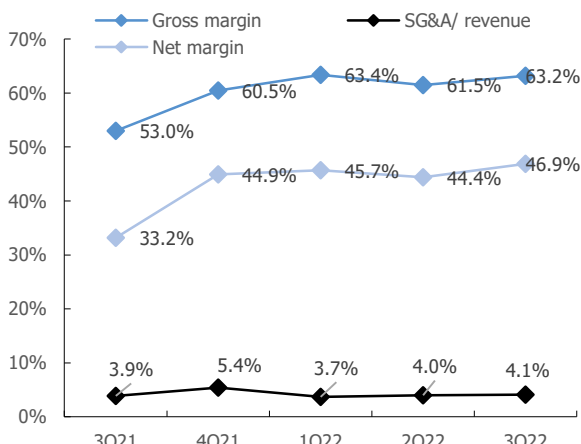
Source: Company data, Fiiipro

Figure 9. VSH reaped profit growth among hydropower makers



Source: Company data, Fiiipro

Figure 10. Hydropower's net margin spiked in 3Q22



Source: Company data, Fiiipro

Founded as a hydropower maker, GEG gradually diversified its portfolio through RE projects. The operation of 3 brand new wind farms since 4Q21 and the

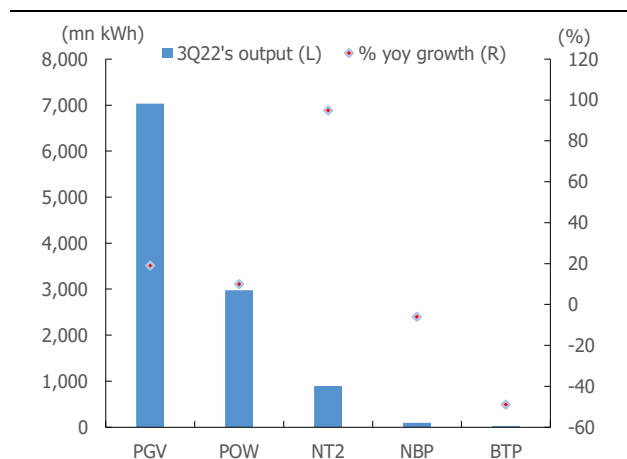
splendid output of hydropower (+22% yoy, +143% qoq) were key growth drivers when GEG's volume and revenue went up to 286mn kWh (+38% yoy, +32% qoq) and VND521bn (+67% yoy, 3% qoq). In addition, the company also made an income of VND166bn from the transfer of shares. Thus, its net profit was up to VND137bn (+124% yoy, +249% qoq).

Rising selling prices saved coal thermal power makers'

Rising selling price was beneficial to coal thermal producers. Although output dropped 137mn kWh compared to 3Q21, HND's revenue jumped up to VND3,070bn (+40% yoy) thanks to rising Pc price which stemmed from hiking input coal prices. As a result, its gross margin expanded to 3.5% (+1.9%p yoy).

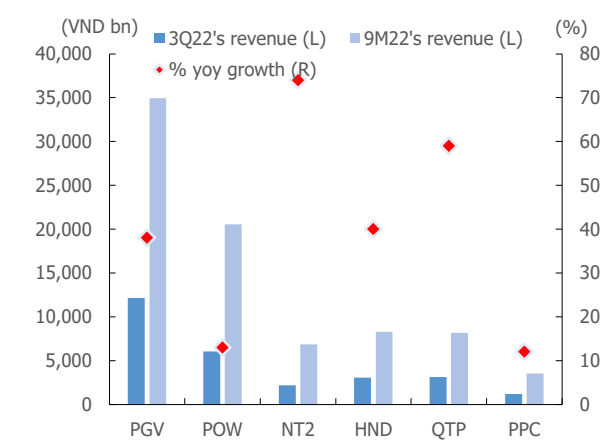
QTP also posted decent business results with revenue of VND3,141bn (+59% yoy) and net profit of VND147bn (+72% yoy) thanks to increasing output. Similarly, PPC's revenue and PAT rose to VND1,172bn (+12% yoy) and VND155bn (up from the loss of -VND35bn in 3Q21). Its splendid earnings resulted from lower COGS and the rising dividend income from its affiliates, HND and QTP. Overall, HND, QTP, PPC fulfilled 102%-171% their annual profit guidance within 9M22.

Figure 11. Thermal power makers' output grew up



Source: Company data, KIS

Figure 12. NT2 topped revenue growth from the tepid base in 3Q21



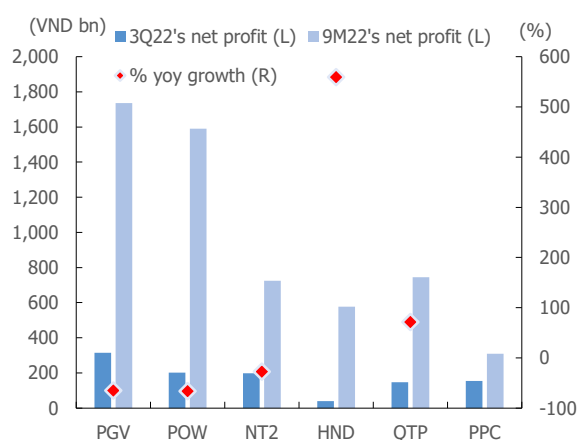
Source: Company data, Fiiipro

Another major thermal producer, PGV announced its 2Q22 business results with output of 7,032mn kWh (+19% yoy). Although its coal thermal plant, Mong Duong suffered the hassle of tight coal supplies when its output shrank to 1,424mn kWh (-11% yoy, -26% qoq), it was able to mobilize other plants namely Phu My, Vinh Tan and Buon Kuop thanks to its mixed portfolio. Coupled with rising selling price due to hiking input material prices, its revenue went up to VND12,135bn (+38% yoy). However, its net profit dropped to VND316bn (-65% yoy) and was mostly damaged by VND829bn exchange loss.

Although NT2's 3Q22 output was slightly down 24% qoq when it underwent a minor maintenance in early Sep, 2022, its output was still up +97% yoy to 897mn kWh from tepid base in 3Q21. 3Q21 was unfavorable when its business suffered from a nationwide lockdown. Moreover, NT2 recorded VND340bn compensation revenue for previous foreign exchange losses from the period of 2016-2020, much higher than our forecast of VND200bn. Despite the decent growth of revenue to VND2,168bn (+73% yoy), the company's net profit dropped 27% yoy to VND199bn mostly due to the VND187bn bad debt provision related to receivables from EPTC (Electricity Power Trading Company).

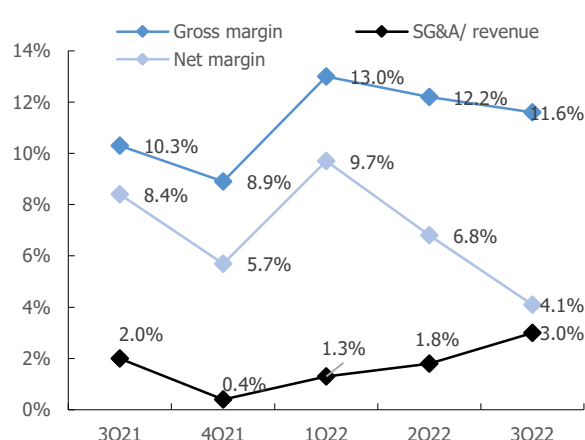
Its parent company, POW recorded a favorable revenue growth of 13% yoy in 3Q22 mostly thanks to decent output of hydropower sector (+80% yoy) and NT2 (+95% yoy). However, its output and revenue were sharply down 15% qoq and 19% qoq when its gas-fired power plants went through maintenance in 3Q22. Beside NT2, Ca Mau 1 & 2 also had major maintenance from the end of Jun to early Sep. The technical problems at S1 engine unit since Sep, 2021 coupled with the tight coal supply greatly reduced Vung Ang 1 coal thermal power plant's output to 818mn kWh (-18% yoy). According to POW, Vung Ang 1 received 1.24mn tonnes of coal in 9M22, made up for only 71% of 9M22 guidance and 55% of full year guidance. Overall, the company's PAT sharply dropped to VND201bn (-67% yoy, -66% qoq) due to (1) swelling material prices (gas, coal), (2) increasing exchange rate loss and (3) VND187bn provision for bad debt.

Figure 13. PGV and POW profits were crushed by rising exchange loss



Source: Company data, Fiinpro

Figure 14. Thermal power makers' net margin squeezed in 3Q22



Source: Company data, Fiinpro

Thermal power in 2023F: keep our fingers crossed

IRI forecasts a continuation of the La Nina event with moderate probability during Sep-Nov 2022, continuing into boreal fall and winter with 63-70% likelihood. We believe hydropower generators still benefited from favorable weather conditions in 4Q22. However, as La Nina is expected to wane since early 2023, the water level in hydropower reservoirs is projected to drop in 2023. As a result, **we believe that EVN will mobilize thermal power as the alternative for shrinking hydropower output in 2023F.**

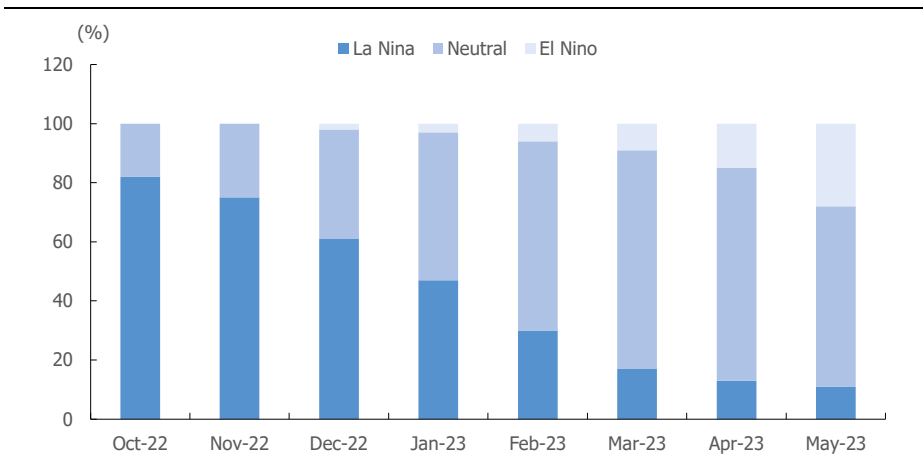
We believe the coal price will remain at high level due to coal shortage after EU imposed sanction on Russian coal imports. However, the coal price in 2023F is projected to slow down compared to the towering price in 2022. In particular, Newcastle coal price slowed down its rising trend when it averaged USD391/tonne in Oct, 2022 (-11% mom). We expect the average CGM price will remain high in the following months and reach VND1,440/kWh (+44% yoy) in 2022 in the context of hovering material prices and recovering power demand.

Global oil prices spiked in 1H22 as a result of long-lasting political conflicts and supply chain disruptions and gradually cooled down in 3Q22 (-27% qoq). The EIA has slashed its 2023 world oil demand growth forecast by 320,000 barrels per day, to 1.16mn bpd as OPEC+ announced 2mn barrels per day (bpd) cut in output – equal to 2% of global supply. Despite the uptrend pricing pressure, we estimate the price of a Brent barrel for next year is an average of USD88, down from an average of USD95 across 4Q22 which was lower than 9M22's average

price. We estimate NT2's output and revenue will reach 4,036mn kWh (+26% yoy) and VND8,857bn (+44% yoy) in 2022.

NT2 will suspend its operation for 40-45 days in 2023F to prepare for the major maintenance. However, we expect its output will slightly increase to 4,103mn kWh (+2% yoy) thanks to the lofty power demand, especially in the industrious Southern region. However, we project its revenue will dwindle to VND8,458bn (-4% yoy) in 2023F as NT2 is forecasted to receive the remaining VND80bn compensation for previous foreign exchange losses (for the period of 2016-2020), much lower than the VND340bn compensation revenue it recorded in 2022.

Figure 15. IRI's Probabilistic ENSO forecasts



Source: IRI, KIS Research

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