Goldman Sachs | Equity Research

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China Machinery: Trucks & Engines

Replacement policy details announced: LNG trucks now eligible for subsidies - a major positive to Weichai (Buy)

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What's happened?

On March 18, the Ministry of Transport (MoT), National Development and Reform Commission (NDRC) and Ministry of Finance (MoF) jointly released a notice (see here) about the implementation of truck replacement/scrappage policy, with subsidy details unveiled. In addition to the expanded scope (now including China IV vs. China III only in 2024) which was first announced in early January (see our comment here), we see the subsidy offering to new purchases of broad-based China VI trucks (instead of China VI diesel trucks only as specified in the 2024 policy), in addition to new energy trucks, as the key change vs. the prior offering. Subsidy amounts offered across different categories are kept unchanged vs. those under last year's policy (Exhibit 1).

Our view: Weichai likely an outsized beneficiary

We view the inclusion of LNG trucks in the subsidy policy as a major upside surprise to Weichai, given the company's dominant market position in China's LNG HDT engine segment (60% in 2024, Exhibit 3 vs. its 17% share in the diesel HDT engine segment, Exhibit 2) - which also generates higher ASP and unit profitability (vs. diesel HDT engine), and that the market had previously expected the subsidy policy this year would stay the same as last year's – i.e. LNG trucks will be excluded in the scope of subsidies. We estimate that LNG HDT engine (Exhibit 5) accounted for c.65% of Weichai's HDT engine sales volume domestically in 2024 (Exhibit 4).

LNG HDT penetration dropped to 23% in 2H24 from 36% in 1H24 (Exhibit 10), as a result of the subsidies offered to China VI diesel trucks and new energy trucks (therefore less attractive return economics for LNG trucks vs. before), in addition to the seasonally higher gas prices (Exhibit 11). YTD, the LNG HDT penetration saw a strong comeback, exceeding 30% again in 2M25.

Modeling in the likely 2025 demand upside from the revised China IV truck replacement policy - ranging from 100k to 150k units based on industry participants' consensus (see our trip takeaway note), and benchmarking LNG HDT penetration to the level seen in 1H24, we estimate HSD% or as much as 10% EPS upside potential to our current 2025E estimates for Weichai. We maintain our Buy rating on Weichai

Power (A/H).

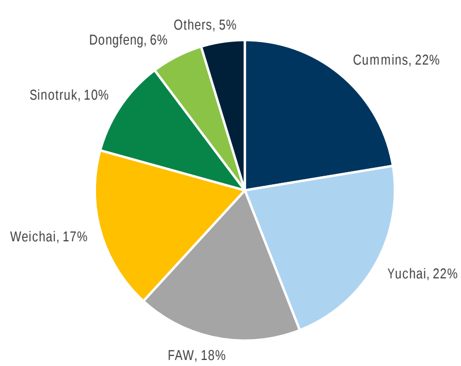
For Sinotruk, we see this change as mildly positive given its marginally higher market share in LNG HDT (Exhibit 7) vs. diesel HDT (Exhibit 6) but the company derives a majority of its earnings from exports (Exhibit 8), which is under pressure especially into the CIS region (see our latest trip takeaway note here). We maintain our Sell on Sinotruk.

Exhibit 1: We highlight the expanded subsidy scope for China VI truck purchases to LNG trucks in the 2025 replacement policy
Truck subsidy policy comparison (2025 vs. 2024)

	Scrap subsidy scope	New purchase subsidy scope	Subsidy amount	Announcement date	Deadline
2025 policy	China IV (and below) operating diesel truck	China VI truck; New energy truck	• Subsidy details for scrapping HDTs: - Scrap 1-<2 years ahead of schedule: Rmb12,000 - Scrap 2-<4 years ahead of schedule: Rmb35,000 - Scrap 4/4+ years ahead of schedule: Rmb45,000 • Subsidy details for new HDT purchase - 2-axle HDT: Rmb40,000 (China VI) / Rmb35,000 (NEV) - 3-axle HDT: Rmb55,000 (China VI) / Rmb85,000 (NEV) - 4-axle HDT: Rmb65,000 (China VI) / Rmb95,000 (NEV)	3/18/2025	12/31/2025
2024 policy	China III (and below) operating diesel truck	China VI diesel truck; New energy truck	• Subsidy details for scrapping HDTs: - Scrap 1-<2 years ahead of schedule: Rmb12,000 - Scrap 2-<4 years ahead of schedule: Rmb35,000 - Scrap 4/4+ years ahead of schedule: Rmb45,000 • Subsidy details for new HDT purchase - 2-axle HDT: Rmb40,000 (China VI diesel) / Rmb35,000 (NEV) - 3-axle HDT: Rmb55,000 (China VI diesel) / Rmb85,000 (NEV) - 4-axle HDT: Rmb65,000 (China VI diesel) / Rmb95,000 (NEV)	7/31/2024	12/31/2024

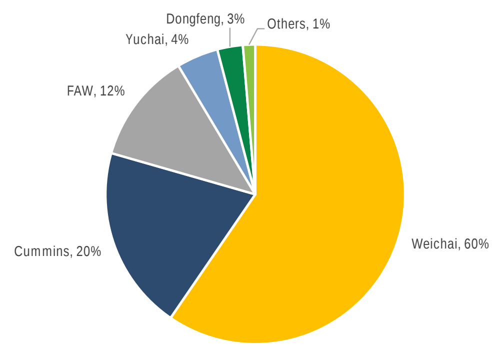
Source: Ministry of Transport

Exhibit 2: Weichai had 17% volume share in China's diesel HDT engine market in 2024, ranked No.4
Domestic diesel HDT engine market share by suppliers (2024)



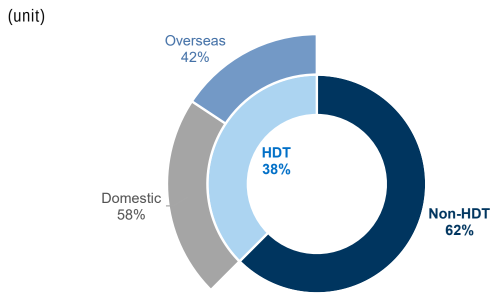
Source: ThinkerCar

Exhibit 3: However, Weichai dominates China's LNG HDT engine market, with 60% share in 2024
LNG HDT engine market share by supplier (2024)



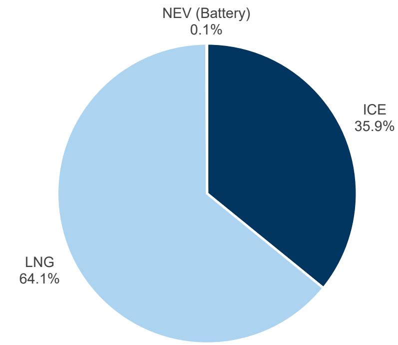
Source: ThinkerCar

Exhibit 4: We estimate Weichai's domestic HDT engine sales volume accounted for 22% of total engine sales in 2024...
Weichai engine sales volume breakdown by application and geography (2024E)



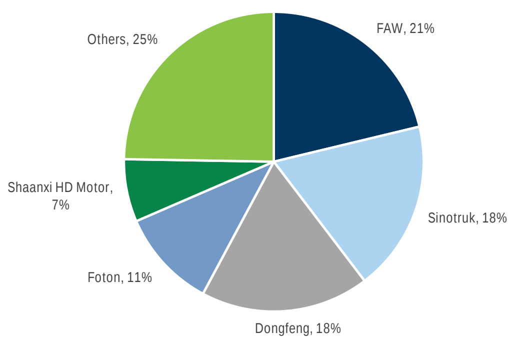
Source: Goldman Sachs Global Investment Research

Exhibit 5: ...and 64% of its domestic HDT engines sold were LNG engines
Weichai domestic HDT engine sales volume breakdown by powertrain (2024)



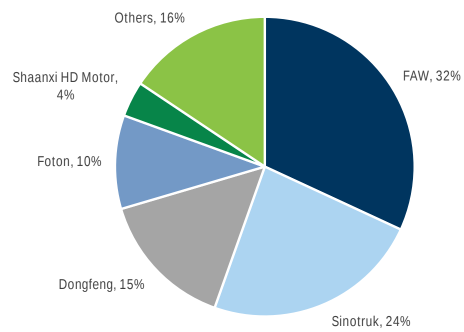
Source: ThinkerCar, Goldman Sachs Global Investment Research

Exhibit 6: Sinotruk had 18% volume share in China's domestic diesel HDT market in 2024
Domestic diesel HDT market share by OEMs (2024)



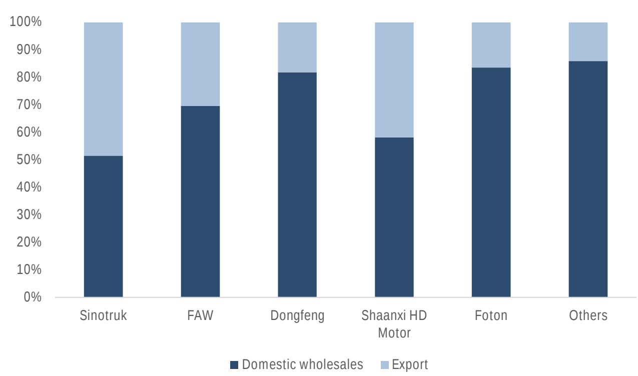
Source: ThinkerCar

Exhibit 7: ...and 24% volume share in China's domestic LNG HDT market
China's domestic LNG HDT market share by OEMs (2024)



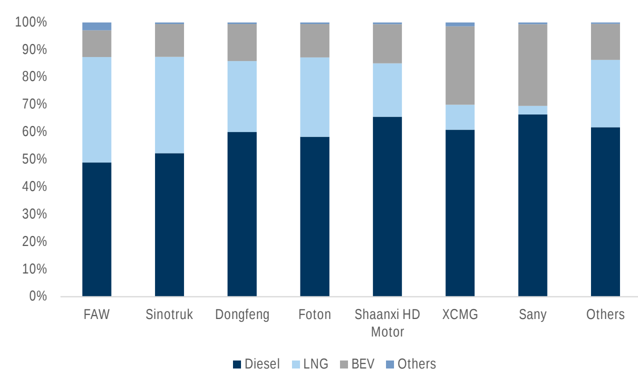
Source: ThinkerCar

Exhibit 8: Sinotruk has the highest exposure to exports among China's major HDT OEMs
Wholesale HDT sales volume split by domestic and overseas across major OEMs (2024)



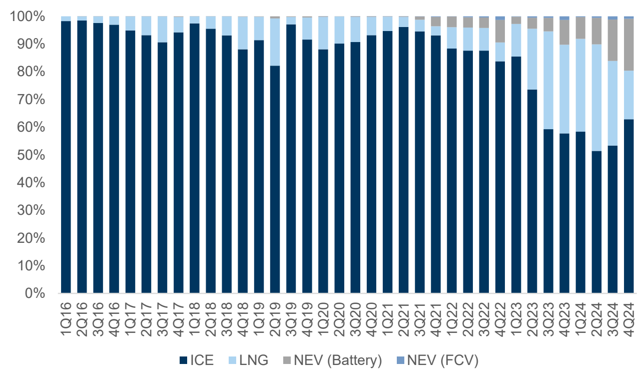
Source: CAAM

Exhibit 9: Sinotruk had relatively higher domestic exposure to LNG HDTs among major OEMs
Domestic retail HDT sales volume breakdown by powertrain across major OEMs (2024)



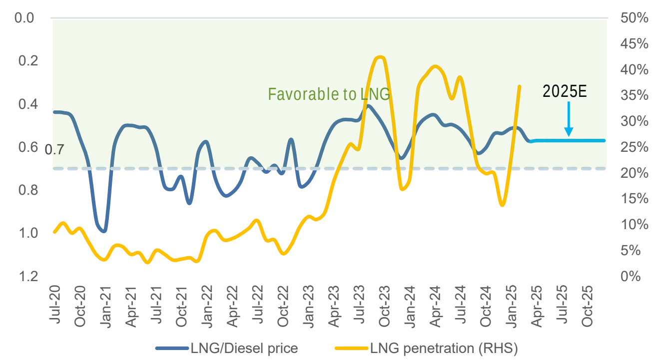
Source: ThinkerCar

Exhibit 10: LNG HDT has seen accelerated peneration since 1Q23 but has started to moderate in 2H24...
Domestic HDT quarterly sales volume by powertrain (2016-2024)



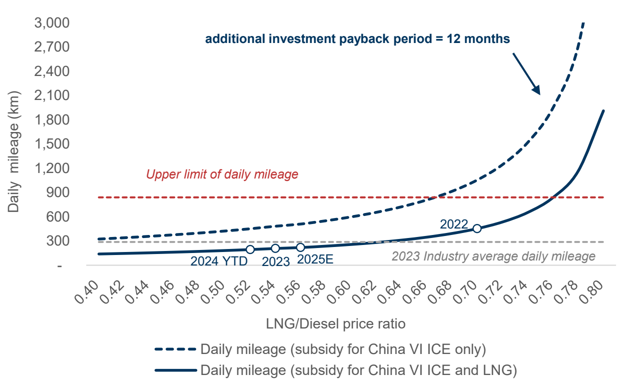
Source: ThinkerCar

Exhibit 11: ...as LNG/diesel price ratio turned less favorable due to seasonally higher gas prices, in addition to the implementation of the truck replacement policy
LNG HDT penetration vs. LNG/diesel price ratio



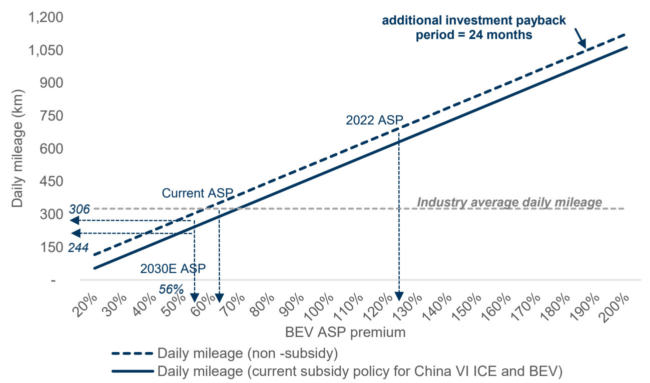
Source: ThinkerCar, Mysteel, Wind, Goldman Sachs Global Investment Research

Exhibit 12: Under the current subsidy policy, LNG HDT could meet the economic standard in most of the daily mileage scenarios (even with daily mileage below industry average of 300km)
The trend of daily mileage changing with LNG/diesel price ratio under the condition of 12-month additional investment payback period (subsidy for ICE only vs. subsidy for ICE/LNG)



Source: ICE, NBS, NYMEX, BP, Goldman Sachs Global Investment Research

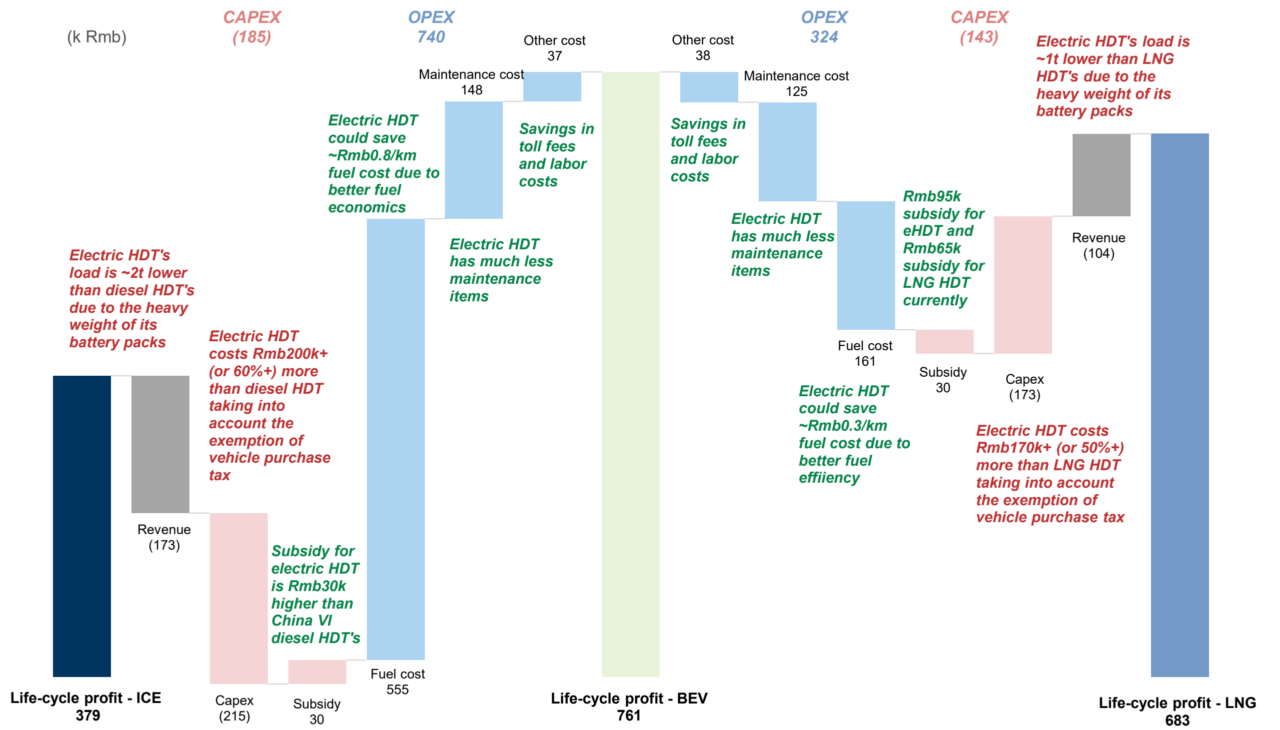
Exhibit 13: Electric HDT could meet the economic standard with current ASP and subsidy policy under most of the daily mileage scenarios
ASP difference (diesel vs. electric trucks) vs. daily mileage, for additional investment payback period to stay within 24 months



Source: Goldman Sachs Global Investment Research

Exhibit 14: Our return economics analysis suggests narrowed life-cycle NP gap between eHDT and LNG HDT in short-haul scenario under current subsidy policy (narrowed by 54% compared to the gap under 2024 subsidy policy), and LNG HDT has much shorter additional investment payback period in current scenario (8 months vs. 18 months for eHDT

Life-cycle total profit differential (in Rmb '000) under the short-haul scenario between electric HDTs vs. diesel/LNG HDTs (under current subsidy policy)



Key assumptions include 1) 5-year life cycle based on typical use case; 2) tractor-trailer in a short-haul use scenario (400km daily mileage); 3) current spot prices for diesel, LNG and electricity; 4) capex is financed by loan; 5) Rmb65k subsidies for China VI diesel/LNG HDT and Rmb95k for electric HDT.

Source: Goldman Sachs Global Investment Research

Investment Thesis, Price Target Risks and Methodology

Investment Thesis - Weichai Power

Weichai Power is China's largest manufacturer of internal combustion engines, with c.17% of volume market share in China's diesel engine segment, with key verticals across commercial vehicle (mainly heavy-duty trucks), construction machinery, agricultural equipment, marine and power generation. In addition to the engine business, Weichai has also managed to build a diversified business portfolio over the years that spans across **1) complete vehicles and auto components**, primarily through its 51% owned subsidiary Shaanxi Heavy-duty Motor (China's third largest heavy-duty truck producer) and 51% owned subsidiary Fast Gear (China's largest manufacturer of gear boxes); **2) agricultural equipment** which is operated under its 61.1% owned subsidiary Weichai Lovol - China's leading agricultural equipment manufacturer; and **3) intelligent logistics** (mainly sales of industrial trucks and supply chain solution) through its 46.5% owned subsidiary KION (KGX.DE, Coverage Suspended), who is the second largest producer of industrial trucks globally and the largest provider of supply chain solutions globally.

Our Buy thesis on both the A- and H-shares is built around our positive view on the potential cyclical inflection in domestic HDT industry demand into 2025E (we expect domestic demand to grow +7% yoy vs. down -10% yoy in 2024E) as the fleet size and current level of freight activity rebalance, the most important share price driver for the stock, with potential further upside from the extension or expansion of truck replacement policies into next year. While the HDT electrification trend will likely reshape the industry supply chain, impacting the company's HDT engine business, we think the market has already priced in an overly bearish outlook, with its core operation undervalued at only c.5x/c.2x 2025E ex-cash P/E for its A/H-shares. We see positively skewed risk-reward therefore rate both Weichai Power's A- and H-shares at Buy.

Price Target Risks and Methodology - Weichai Power

Valuation: We value Weichai's H-share at a 10x 2025E P/E (12-m TP at HK$14.61/share), slightly lower than its long-term mid-cycle average of 11x, to reflect the expected engine volume loss due to accelerating truck electrification in China. For the A-share, we apply a 22% premium to the H-share equity value, inline with the 6-month average A/H premium, leading to a 12-m target price of Rmb16.3/share.

Key risks: 1) slower-than-expected macro activities, particularly in road freight, infrastructure and property; 2) weaker-than-expected global economic growth; 3) powertrain shift to higher electrification penetration; 4) unfavorable change in Sinotruk's engine sourcing arrangement.

Investment Thesis - Sinotruk (Hong Kong)

Sinotruck is China's largest manufacturer of heavy-duty trucks (HDTs), with 25% market share (measured by wholesale volume in 2023). It also takes the lead in China HDT export market, with 44% of volume share in 2023. Other than the core HDT business (c. 88% of its 2023 topline), Sinotruk also engages in the production of light duty trucks and supply engines mainly for specialty HDTs.

While we are constructive on the domestic truck cycle heading into 2025E, we believe accelerating truck electrification in China and the corresponding disruption to the HDT competitive landscape and industry margin profile is not well understood by the market. Our 2025E-26E EPS estimates are 24-29% below the Visible Alpha consensus likely because we are factoring in a faster truck electrification trend as well as structural margin deterioration vs. the Street. With the stock trading at its historical mid-cycle average P/E level (11x) and close to 1SD above its 5-year average level (8.5x) despite structural margin pressure and muted earnings growth ahead, we view valuation as expensive and see better opportunities to ride the potential cyclical inflection of the domestic HDT industry elsewhere in our coverage. We therefore rate the shares at Sell.

Price Target Risks and Methodology - Sinotruk (Hong Kong)

Valuation: We value Sinotruk at 8x 2025E EPS (12-m TP at HK$17.3/share), lower than its long-term mid-cycle average of 11x as well as its average level of 8.5x during the previous cycle, to reflect the negative impact to both volume market share and margin. Sinotruk has derated in the most recent industry cycle (2016-2024) as margin contracted, and we expect with the further margin deterioration due to truck electrification the stock will likely continue to derate. We are Sell rated.

Key risks: 1) stronger-than-expected macro activities, particularly in road freight, infrastructure and property; 2) stronger-than-expected industry policy support; 3) stronger-than-expected overseas HDT demand, especially in EMs; 4) slower-than-expected truck electrification in China; 5) higher engine insourcing without compromising market share; 6) faster-than-expected market share expansion in the overseas market

Disclosure Appendix

Reg AC

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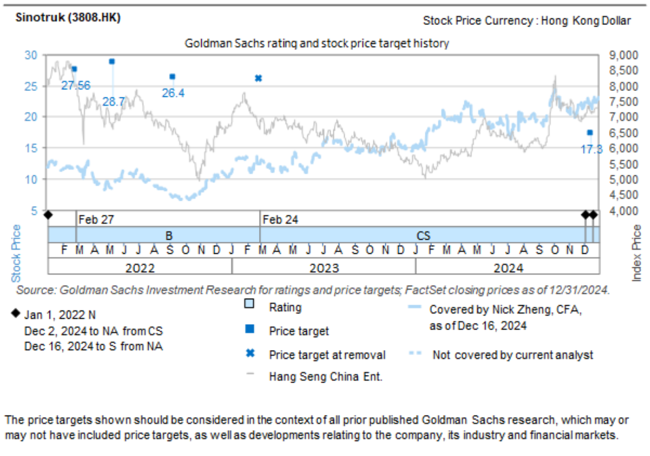

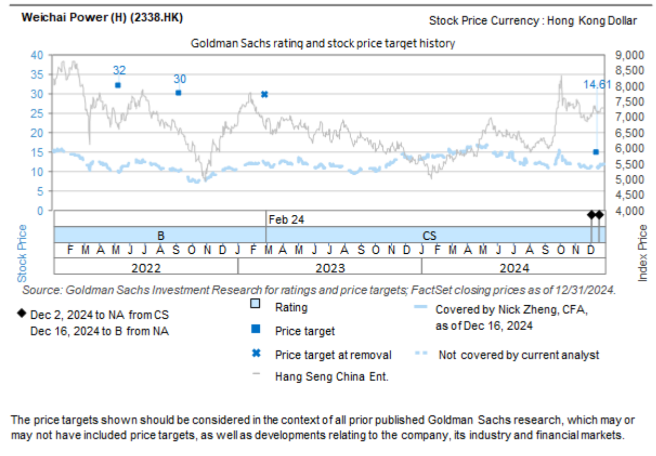

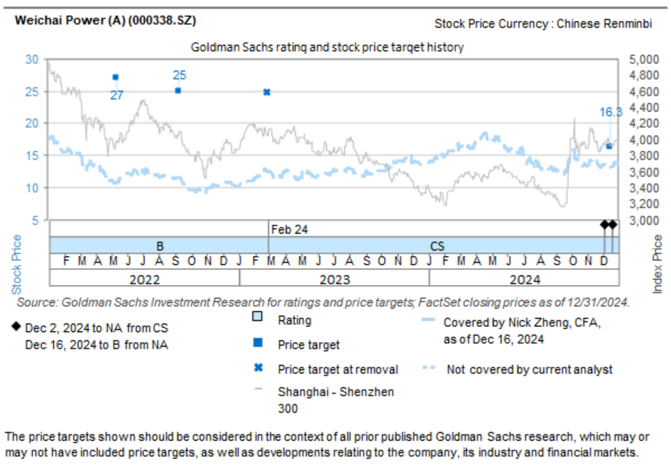

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