genial Equity Research

VALE

2Q24 Preview: There's nowhere to run!

LatAm Metals & Mining

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Company

VALE US Equity
Buy

Price: US$ 11.52 (16-Jul-2024)
Target Price 12M: US$ 14.50 (NYSE)

VALE3 BZ Equity
Target Price 12M: R$ 78.50 (B3)

Main takeaways:

(i) Slight disappointment in pellet production and sales; **(ii)** Prices in the ferrous division were lower than expected, with **very weak premium dynamics**, leaving **iron ore fines** negative at **-US$3.2/t** (vs. -US$1.5/t in 1Q24), and **realized price of US$98,2/t** (-4,7% vs. Genial Est.). Premiums which also took a hit in the **all-in, going into negative territory** when weighted with pellets, clocking in at -US$0.1/t (vs. +US$2.2/t in 1Q24), in the face of a **mix with a higher silica** (low grade); **(iii)** Base metal inventories built up in 1Q being disposed of in 2Q24, helping to maintain some level of sales even with scheduled maintenance in Sudbury, Canada; **(iv)** Net revenue remains the same as the previous estimate, at US$10.2bn Genial Est. (+19.1% q/q; +5.7% y/y), as **increased shipments offset weaker price realization dynamics in iron ore fines**; **(v)** C1/t should be a major drag in 2Q24. **We are projecting C1/t** (ex. purchase from third parties) **at US$25.3/t Genial Est**. (+7.8% q/q; +7.6% y/y); **(vi)** Freight costs should also be higher, at US$20/t Genial Est. (+3.9% q/q; +14.3% y/y), given greater exposure this quarter to spot freight; **(vii)** Nominal costs rising q/q and y/y; **(viii)** EBITDA will most likely show quarterly and annual growth. We have changed our projection for adjusted EBITDA to US$3.9bn Genial Est. (+10% q/q; +4.4% y/y), falling -4.9% vs. Previous Est; **(ix)** Net income projected to contract slightly q/q and expand y/y; **(x) Overhangs or China**, which is bothering investors more? We have the feeling that, as much as the overhangs being unblocked may help, **the big fear holding back investor interest is still related to the Chinese economy**; **(xi)** On the other hand, our outlook for crude steel production in China is not for an intense drop, since the increase in exports is partially offsetting weak domestic demand; **(xiii)** Our model points to the disclosure of **dividends, at US$0.38/share** for NYSE ADRs (~R$2/share for VALE3-B3), which would imply a **quarterly yield of 3.3%** (or ~13% annualized); **(xv)** Potentially close to sealing the Mariana agreement, removing one more overhang that was probing the shares, and with the maintenance of solid results, both in production volume and sales, **the company seems to be excessively penalized by the market**. Trading at an **EV/EBITDA 25E** of **3.3x** (vs. 5.0x in the historical average), we believe that the **discount level is unjustifiable** in the face of an **attractive risk/return ratio**, promoted by the current market valuation. We reiterate our **BUY rating**, with a **12M Target Price** for **VALE3** of **R$78.50** and **US$14.50** for the **NYSE ADRs**, with an **upside** of **+25.94%**.

Table1. Better figures than Est. in i.o. fines

(Thousand Tonnes - kt)	Reported	Genial Est.	
Summary	**2Q24**	**2Q24E**	**% Diff.**
Iron Ore Production	80.598	77.954	**3,4%**
Iron Ore Fines Shipments	68.512	63.532	**7,8%**
Pellets Production	8.895	9.145	**-2,7%**
Pellets Shipments	8.864	9.190	**-3,6%**

Source: Genial Investimentos, Vale

Table2. Reported vs. 1Q24 and 2Q23

Reported				
2Q24	**1Q24A**	**% q/q**	**2Q23A**	**% y/y**
80.598	70.838	**13,8%**	78.741	**2,4%**
68.512	52.546	**30,4%**	63.329	**8,2%**
8.895	8.465	**5,1%**	9.111	**-2,4%**
8.864	9.225	**-3,9%**	8.809	**0,6%**

Source: Genial Investimentos, Vale

Vale released its **2Q24 Production and Sales report** yesterday, July 16, after the market closed. For us, the **big negative highlight was the realized price for iron ore fines**, marked at US$98.2/t (-2.5% q/q; -0.3% y/y), below our expectation (-4.7% vs. Genial Est), in the face of very weak premium dynamics, with iron ore fines negative at -US$3.2/t (vs. -US$1.5/t in 1Q24), which also took the all-in into negative territory when weighted with pellets, coming in at -US$0.1/t (vs. +US$2.2/t in 1Q24), in the face of a mix with a higher silica content (low grade). The financial results will be released on July 25.

Despite weak prices, on the other hand, the **company showed superior production** (+3.4% vs. Genial Est.) **and sales** (+7.8% vs. Genial Est.) **figures for iron ore fines**, leading to a result close to what we expected, since **the increase in volume ended up compensating for the much weaker realized price**, which did not cause us to change the net revenue projection. However, in base metals the price and, in this case, volume figures were also unsatisfactory, which ended up widening the gap in **our downward revision of consolidated EBITDA**, causing an impact on costs by reducing the ability to dilute fixed costs, since **we also revised C1/t in ferrous metals upwards**. Our projection for **adjusted EBITDA in 2Q24** is now **US$3.9bn** (-4.9% vs. Old Estimate).

Table3. New 2Q24 Est. vs. Old one

(US$ millions)	Genial Est.	Previous Est.	
Income Statement	**2Q24E**	**2Q24E**	**% Diff.**
Net Revenue	10.230	10.230	**0,0%**
Adjusted EBITDA	3.945	4.146	**-4,9%**
Net Income	1.902	2.072	**-8,2%**

Source: Genial Investimentos

Table4. New 2Q24 Est. vs. 1Q24 and 2Q23

Genial Est.				
2Q24E	**1Q24A**	**% q/q**	**2Q23A**	**% y/y**
10.230	8.591	**19,1%**	9.676	**5,7%**
3.945	3.587	**10,0%**	3.778	**4,4%**
1.902	1.909	**-0,4%**	1.321	**44,0%**

Source: Genial Investimentos

Valuation and rating. Our opinion is that Vale presented positive results for volumes (production and shipments) in iron ore fines. However, the realized price was very weak, slowing to US$98.2/t (-4.7% vs. Genial Est.), comprising a drop of -2.5% q/q and -0.3% y/y. In pellets, price realization also fell short of what we expected, clocking in at US$157/t (-4.1% vs. Genial Est.), down -8.6% q/q and -2.0% y/y. This certainly amplifies investors' misgivings about the level of Chinese mills' ability to accept paying quality premiums for low-silica products. What we saw in 2Q24 was precisely the opposite, with a high level of dumping in the low-grade composition mix.

As we have already commented in past reports, Vale is losing one of its biggest competitive differentials against the other majors (BHP, Rio Tinto and Fortescue), which is precisely the quality of the mix, which would equate to an all-in premium much higher than the one we are witnessing at -US$0.1/t in 2Q24 (vs. +US$2.2/t in 1Q24). **The big problem with this is that the lack the premium on iron ore fines is linked to the low adherence of steelmakers in China to paying extra for low-silica products**, as their margins remain squeezed and dependent on subsidies.

Therefore, it is not a lack of operational management on the part of the company, but rather a market condition, vis-à-vis Vale's strategic decision to compensate with a higher volume of shipments for the low adherence to the premium, which drastically affected the realized price composition in 2Q24.

There is also the issue of **overhangs**. On this topic, we believe that the figures recently released on the Mariana (MG) agreement have helped to provide a “bottom” and a “cap” for investors, reducing the asymmetry of information in the market. We expect a resolution soon, which may lessen the negative impact on Vale's shares. However, investors remain concerned about the Chinese economy and possible stimulus in the real estate sector, influencing the perception and discount of the company's shares.

Although there is a perception among most investors we come into contact with, that Vale is in fact undervalued, **macroeconomic concerns related to China continue to weigh on the market's interest**. However, our strategy for trying to prove that the discount that fund managers (especially local ones) make on Vale shares is excessive is to **apply a bearish scenario to almost all the variables in our proprietary model and verify that the current market valuation still seems attractive to us.** Among the variables are **(i)** an iron ore curve 62% Fe below consensus, with a terminal value of ~US$75/t in 2028 and flat until 2030, when we go into perpetuity; **(ii)** a quality premium always below the bottom of the guidance, **(iii)** tighter conditions for the Mariana (MG) agreement than the average investor projects; **(iii)** C1/t aligned with the top band of the guidance. Even conjecturing all these variables to the downside, detracting value from our proprietary model, we still see that the model continues to generate upside for Vale's shares vs. the current market valuation.

We don't believe this is justifiable. Vale remains the most discounted mining major. Trading at an **EV/EBITDA 25E** of **3.3x** (vs. 5.0x historical average), we see the **company excessively penalized by the market**. We reiterate our **BUY rating**, with a **12M Target Price** of **VALE3** at **R$78.50** and a **12M Target Price** of **ADRs-NYSE** at **US$14.50**, with an **upside** of **+25.94%**.

2Q24 Preview: In detail!

Production of iron ore fines exceeded our expectations. As we pointed out in our last report (2Q24 Operational Preview), we expected a volume of iron ore fines production with a slight reduction of -1% y/y, but still at a satisfactory level, with a sequential advance due to the slightly more favorable seasonality of the 2Qs, a period in which the Southeast system is already going through days of drought. Even so, in this regard, Vale presented stronger figures than we were expecting, with production reaching 80.6Mt (+3.4% vs. Genial Est.), accelerating +13.8% % q/q and +2.4% y/y. Even with an annual base that was indeed difficult to beat, due to a 2Q23 with robust operational figures, Vale still grew production y/y, contrary to our more conservative expectations.

The destocking process exceeded estimates and shipments figures were strong. Regarding shipments, as we also commented in last report, during 1Q24 the company produced its best production in a 1Q since 2019 and decided to stockpile due to the unfavorable market dynamics observed, since the price opened the year for the 62% Fe benchmark at ~US$140/t and dropped to US$97/t at the beginning of April. Vale had therefore accumulated a reasonable amount of inventory to burn.

Even though the average price for the 62% Fe benchmark was lower in 2Q24 vs. 1Q24, the the curve was still a little less volatile at the end of the quarter, which would have helped the weight of the price markup in the forward provisioning system impact realization less compared to 1Q24. That's why we believed that Vale would destock a chunk of the accumulated last quarter. However, as the company decided to increase the discount by making up the mix with products with more silica, the premium became very low and the appetite for sales went up, meaning that Vale was able to increase shipments too much and reduce the gap built up in 1Q (production vs. sales). Shipments have checked in at 68.5Mt (7.8% vs. Genial Est.), up +30.4% q/q and +8.2% y/y.

Table 5. Production Summary Vale (2Q24 vs. Genial Est.)

Vale Production Summary (Kt)	2Q24 Reported	2Q24E Genial Est.	% R/E
Iron Ore[1]	80.598	77.954	3,4%
Pellets	8.895	9.145	-2,7%
Nickel	28	34	-17,9%
Copper	79	83	-5,6%

Production Summary (Kt)	2Q24 Reported	1Q24 Reported	% q/q	2Q23 Reported	% y/y
Iron Ore[1]	80.598	70.838	13,8%	78.741	2,4%
Pellets	8.895	8.465	5,1%	9.111	-2,4%
Nickel	28	40	-29,4%	37	-24,4%
Copper	79	82	-4,0%	79	-0,2%

[1] Including third-party purchases, run-of-mine and feed of other pelletization plants.

Source: Genial Investimentos, Vale

Slight disappointment in pellet production and sales. Pellet production fell slightly by -2.4% y/y to 8.9Mt (-2.7% vs. Genial Est.), growing by +5.1% q/q due to seasonality. Even with weaker production on an annual basis, the sequential improvement was due to the logistical delay between the extraction of iron ore fines in the Brucutu (MG) mining section in 1Q24, which would go through the pelletizing process in 2Q24. However, we believe that almost all of the ramp-up of the Brucutu mine has already been observed, due to the commissioning of the Torto dam being ~1 year old. Therefore, we should see growth on a smaller scale from now on. Shipments fell by -3.9% q/q and stabilized at +0.6% y/y, standing at 8.9Mt (-3.6% vs. Genial Est.), a slightly lower figure than expected.

Table 6. Shipments Summary Vale (2Q24 vs. Genial Est.)

Vale Shipments Summary (Kt)	2Q24 Reported	2Q24E Genial Est.	%R/E
Iron ore fines	68.512	63.532	7,8%
Pellets	8.864	9.190	-3,6%
ROM	2.416	2.236	8,1%
Nickel	34	33,3	3,0%
Copper	76	83,2	-8,6%

Shipments Summary (Kt)	2Q24 Reported	1Q24 Reported	% q/q	2Q23 Reported	% y/y
Iron ore fines	68.512	52.546	30,4%	63.329	8,2%
Pellets	8.864	9.225	-3,9%	8.809	0,6%
ROM	2.416	2.056	17,5%	2.236	8,1%
Nickel	34,3	33,1	3,6%	40,3	-14,9%
Copper	76,1	76,8	-0,9%	73,8	3,1%

[1] Including third-party purchases

Source: Genial Investimentos, Vale

Prices in the ferrous division misses estimates, with all-in premium much lower than desirable. The realized price of iron ore fines was US$98.2/t (-4.7% vs. Genial Est.), down -2.5% q/q and -0.3% y/y. Although we saw a smaller impact from the effect of the forward provisioned price system, price realization was still worse sequentially. We attribute the reason for this to **(i)** facing a 62% Fe lower average curve (US$112/t in 2Q24 vs. US$124/t in 1Q24), as well as **(ii)** Vale opting to ship volume with a higher silica content, and therefore lower quality, drastically affecting the premium. For iron ore fines, the premium widened the negative margin, being reported at -US$3.2/t (vs. -US$1.5/t in 1Q24).

For pellets, the situation wasn't favorable either. We saw the 65% Fe reference curve fall to an average of ~US$130/t in 2Q24 (-5.8% q/q). The realized price fell by -8.6% q/q and -2.0% y/y, standing at US$157/t (-4.1% vs. Genial Est.), with a premium of +US$3.13/t (-US$0.7/t vs. 1Q24). Compounding the weighted effect of iron ore pellets and fines, the all-in premium closed 2Q24 at -US$0.1/t (vs. +US$2.2/t in 1Q24).

Base metals inventories built up in 1Q being disposed of in 2Q24. Anticipating the effects of the maintenance stoppages in 2Q24, mainly at Sudbury in Canada, Vale stockpiled throughout 1Q24. Therefore, managing to take advantage of this inventory in 2Q24 to maintain sales levels, the company ended up recording nickel shipments of 34.3kt (+3.0% vs. Genial Est.), accelerating +3.6% q/q despite the -14.9% y/y drop. In copper, the situation was similar, but we thought that the addition of a more favorable seasonality in Brazil would help guide shipments a little more than it did. Sales reached 76.1kt (-8.6% vs. Genial Est.), down -0.9% q/q and an improvement of +3.1% y/y.

LME reference curve for nickel changing direction upwards after 3 quarters. Vale reported a realized nickel price of US$18,638/t (-2.9% vs. Genial Est.), accelerating +10.6% q/q despite the -19.2% y/y drop. As we monitored throughout 2Q24, nickel reached an average price of US$18,660/t (+10.8% q/q). A large part of the explanation for this increase is due to the separatist movements taking place in New Caledonia (an island located near Australia, annexed to France), which ended up interrupting operations in the territory's mines, which are responsible for ~6% of world production. In copper, we saw the reference curve reach an average of US$9,873/t in 2Q24 (+15.5% q/q), following the upward trend. As a result, Vale reported a realized price of US$9,202/t (-0.7% vs. Genial Est.), an increase of +20.6% q/q and +31.0% y/y.

With offsetting effects, the estimate for net revenue remains unchanged. The sale of iron ore fines offset the divergence in our estimate of the realized price vs. what was eventually reported. Therefore, total consolidated revenue is expected at US$10.2bn Genial Est. (+19.1% q/q; +5.7% y/y), same as before. Breaking down the top line, we are projecting iron ore fines revenue of US$6.7bn Genial Est. (+27.1% q/q; +7.9% y/y), due to the robust sales that Vale presented, mainly from the Northern system, even with very weak premiums. On the positive side, S11D reached a production record for a 2Q (19.5Mt; +0.4Mt y/y). For pellets, we expected a slightly stronger operation, both in terms of prices and sales volume. Conversely, figures were well below our initial projections. Our current revenue estimate for pellets is being downgraded to US$1.4bn Genial Est. (-12.1% q/q; -1.4% y/y). In base metals, to the detriment of the recovery of the nickel reference curve on the LME and the continuity of the copper price, we expect to see significant sequential advances. For nickel, we estimate revenues of US$1.1bn (+36.7% q/q; -6.5% y/y) and for copper US$700mn Genial Est. (+9.6% q/q; +30.2% y/y).

Table 7. Net Revenue Vale (2Q24 Genial Est.)

(US$ millions)	2Q24E Estimated	1Q24 Reported	% q/q	2Q23 Reported	% y/y
Net Revenue	**10.230**	**8.591**	**19,1%**	**9.676**	**5,7%**
Iron Ore Fines	6.728	5.291	27,1%	6.238	7,9%
Pellets	1.393	1.586	-12,1%	1.413	-1,4%
Nickel operations	1.143	836	36,7%	1.222	-6,5%
Copper operations	700	639	9,6%	538	30,2%
Others	155	175	-11,6%	154	0,4%

Source: Genial Investimentos, Vale

C1/t should become a major obstacle in 2Q24. As the 1Qs represent quarters of slower production, there is less dilution of fixed costs. Although the result is for Q2, shipments take ~45 days to arrive at China's ports. Therefore, a portion of what was produced in 1Q24 would naturally be counted as a sale in 2Q24. In addition, as Vale decided to compensate for the weak price dynamics with robust volume, it used inventory accumulated in the previous quarter, precisely that which has the least capacity to dilute fixed costs, given the seasonally unfavorable dynamics due to the greatest rainfall period. Q2s are usually the worst quarters of the year for Vale in terms of the expansionary effect of C1/t, and we believe that this 2Q24 could be even more challenging in terms of costs compared to the same period last year. Therefore, we are projecting C1/t (ex. third-party purchases) at US$25.3/t Genial Est. (+7.8% q/q; +7.6% y/y).

We also believe in an increase in freight costs. Vale has long shipping contracts and usually suffers little from fluctuations in freight prices. However, during 2Q24, we saw the company ship a significant amount of iron ore, as well as a queue of vessels to dock at Chinese ports. This leads us to believe that it therefore needed to contract spot freight services in order to transport more cargo, which led the company to be more exposed to the higher cost of market freight vs. long term contract with shipowners. We therefore project the freight cost at US$20/t Genial Est. (+3.9% q/q; +14.3% y/y).

Nominal cost rises y/y and t/t in our estimates. Our estimate suggests that the consolidated nominal cost will rise by +15.6% q/q and +3.5% y/y, to US$6.1bn Genial Est. The main driver of this increase is the COGS of iron ore fines, which would show a firm rise, calculated at US$3.5bn Genial Est (+28.2% q/q; +13.7% y/y). To sum up this trend in a few words: **(i)** costs resulting from the inventory in transit and destocking from last quarter production, with low capacity to dilute fixed costs and **(ii)** higher freight costs due to queues to dock at Chinese ports. The cost of base metals is expected to change little on a sequential basis. Nickel operations are expected to register an increase of +3.6% q/q and stand at US$801mn Genial Est., showing a drop of -9.6% y/y. As for copper, we estimate COGS to basically lateralize and stand at US$323mn Genial Est. (-1.7% q/q; +1.3% y/y).

Table 8. COGS Vale (2Q24 Genial Est.)

(US$ millions)	2Q24E Estimated	1Q24 Reported	% q/q	2Q23 Reported	% y/y
COGS	**(6.148)**	**(5.318)**	**15,6%**	**(5.940)**	**3,5%**
Iron Ore Fines	(3.466)	(2.703)	28,2%	(3.048)	13,7%
Pellets	(705)	(739)	-4,7%	(674)	4,5%
Nickel operations	(801)	(773)	3,6%	(886)	-9,6%
Copper operations	(323)	(329)	-1,7%	(319)	1,3%
Others	(85)	(60)	43,1%	(234)	-63,5%
Depreciação e Amort.	(768)	(714)	7,6%	(779)	-1,4%

Source: Genial Investimentos, Vale

Table 9. EBITDA Vale (2Q24 Genial Est.)

(US$ millions)	2Q24E Estimated	1Q24 Reported	% q/q	2Q23 Reported	% y/y
Proforma EBITDA	4.282	**3.628**	**18,0%**	**4.049**	**5,7%**
Iron Ore Fines	3.132	2.507	24,9%	3.087	1,5%
Pellets	767	882	-13,0%	818	-6,2%
Nickel operations	245	17	1341,9%	235	4,3%
Copper operations	328	284	15,6%	236	39,1%
Others	(191)	(62)	209,6%	(327)	-41,6%

Source: Genial Investimentos, Vale

EBITDA will most likely show quarterly and annual growth. Vale showed interesting sales figures in all operations, so we believe in an advance in adjusted EBITDA, which we forecast at US$3.9bn Genial Est. (+10% q/q; +4.4% y/y), down -4.9% vs. Previous Est. This is because, once again, we saw the company realize **(i)** a negative premium on iron ore fines (-US$3.3/t), **(ii)** an all-in premium of -US$0.1/t and **(iii)** we now project a higher C1/t cost due to the level of destocking. Our previous estimate already considered a high cost in 2Q24, but we were more optimistic than we were at this point. For iron ore fines, we project EBITDA of US$3.1bn Genial Est. (+24.9% q/q; +1.5% y/y). Another point that stands out in a negative way is the pellet operation, which was unable to support last quarter's good realized price. So, de division should deliver an EBITDA of US$767mn Genial Est. (-13% q/q; -6.2% y/y).

We expect net income to shrink slightly q/q but increase y/y. Despite a sequentially expanding EBITDA, we anticipate a very mild downturn in the bottom line. After a financial result projected at -US$700mn (+61.9% q/q; ~5x y/y), we arrive at a net income of US$1.9bn Genial Est. (-0.7% q/q; +43.5% y/y) in our model. It is important to mention that we are considering the provision for the Mariana (MG) settlement of ~US$195mn Genial Est. through the 2Q24 P&L.

Table 10. Income Statement Vale (2Q24 Genial Est.)

(US$ millions)	2Q24E Estimated	1Q24 Reported	% q/q	2Q23 Reported	% y/y
Net Revenue	**10.230**	**8.591**	**19,1%**	**9.676**	**5,7%**
COGS	(6.148)	(5.318)	15,6%	(5.940)	3,5%
Adjusted EBITDA	**3.945**	**3.587**	**10,0%**	**3.778**	**4,4%**
EBITDA Margin (%)	38,6%	41,8%	-3,2p.p	39,0%	-0,49p.p
Adjusted EBIT	**3.176**	**2.873**	**10,5%**	**2.999**	**5,9%**
EBIT Margin (%)	31,0%	33,4%	-2,4p.p	31,0%	0,05p.p
D&A	(768)	(714)	7,6%	(779)	-1,4%
Financial Result	(700)	(437)	60,3%	(157)	346,1%
Net Income	**1.902**	**1.909**	**-0,4%**	**1.321**	**44,0%**
Net Margin (%)	18,6%	22,2%	-3,63p.p	13,7%	4,94p.p

Source: Genial Investimentos, Vale

Our Take on Vale

Vale reported positive results for production and sales volumes, with increases in the most important products. However, the big disappointment was in the realized prices of iron ore fines and pellets. The price realization again raises suspicions about the demand from steel mills in China for low-silica products, which demanded a higher premium. The uncertainties about China's macroeconomic scenario, which directly involve the company's pricing, are already widely known by market participants. However, we believe that in 2Q24 it became clearer how much this could affect the raising of premiums for quality, Vale's great competitive advantage over the other majors (BHP, Rio Tinto and Fortescue).

We believe that as domestic demand in China weakens, steelmakers are going through a relatively long period of squeezed margins, thus reducing the impetus to pay premiums for iron ore fines. This should raise questions about the sustainability of Vale's strategy of opting to grow production with greater penetration of high-grade iron ore. Everyone already knows that there is distrust of Chinese demand for ore, but seeing Vale once again register a negative premium, this time of -US$3.3/t, increasing the discount, is yet another discouragement for investors, who already have a much lower than average allocation to the shares.

We expect dividends to be announced in 2Q24, with an annualized yield of 13%. Given a still resilient scenario for cash flow generation, with a **24E FCF Yield** of **14.5%**, and considering that there was no dividend announcement during 1Q24 release, we believe that Vale will probably announce a payment for September, during the 2Q24 disclosure on July 25. Our model points to **US$0.38/share** for NYSE ADRs (~$2/share for VALE3-B3), which would imply a quarterly yield of 3.3% (or ~13% annualized).

Overhangs or uncertainties about China, which is weighing more? The disclosure of values over the last 2M regarding the Mariana (MG) agreement, from Vale + BHP's proposal of R$127bn in April, through the AGU's counter-proposal of R$164bn over 12 years, to the latest proposal officially released by Vale + BHP on June 12, of R$140bn over 20 years, have provided more accurate data for investors, establishing a “bottom” and a “cap” for both the terminal value and the term, reducing the asymmetry of information in the market. We expect the Mariana overhang to be resolved in the next few days, given the rush to reach an agreement due to the change in the TRF-6 mediator, Judge Ricardo Rabelo, which should take place in August. We believe that the parties involved can reach a consensus before Mr. Rabelo leaves office.

We don't deny that the existing overhangs generate distrust among investors. Therefore, the tendency is that once the Mariana agreement is officially sewn up, the shares will narrow the gap with the iron ore curve (which has opened up again in the last ~60 days), freeing up some residual in the market valuation. However, we stress that we had no expectations that the shares would rise strongly without the weight of this overhang on Vale's shoulders.

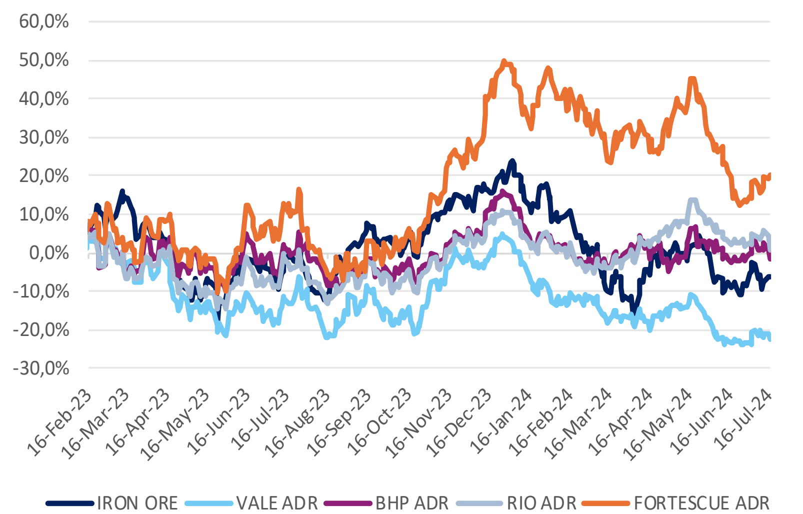
In rounds of conversations with investors, our perception is that most of them think Vale is too discounted. Although they hope that agreements such as those for Mariana and the railroads (EFVM and EFC) will be reached soon, **they are much more concerned about China's economic data** and signs of effective stimulus for the real estate sector. As we've already pointed out in several reports, the uncertainties surrounding China seem to be adding weight to the market's disinterest, especially among local fund managers, who have a much lower than average allocation to the name. This ends up influencing the discount level of stocks (which is excessively high vs. historical average).

Still discounted even using bearish assumptions. We built the worst-case scenario we could rationalize in our model in order to find out how far the share prices could go further down the road, assigning **(i)** harsher numbers on the Mariana agreement, **(ii)** considering a more aggressive than consensus iron ore 62% Fe curve reduction, reaching US$75/t in 3Q28, and **(iii)** an all-in premium slightly below the bottom of the guidance. However, even so, we see a severe discount to what we would consider a fair share price in our proprietary model, using these bearish assumptions vs. market valuation. We know that investors are very concerned about the Chinese economy and possible government stimulus, as well as overhangs, which are also not conducive to bullish sentiment at the moment. In fact, the macro situation in China is not encouraging, and iron ore inventories rose since May to their highest level in the last 5 years, reversing the thesis of supply restrictions for 2024, given the high level of shipments by Brazilian mining companies (as seen in Vale's 2Q24 figure) and the resumption of shipments by Australian mining companies, after a more troubled start to the year due to weather conditions.

There's nowhere to run! The considerable increase in shipments made by the company in 2Q24, in the production and sales data released yesterday, show that the supply and demand of iron ore is unbalanced. **If the majors keep up this robust pace of sales on the operational side, the price of iron ore will be knocked down by the build-up of inventories in China's ports**, as well as making it harder for Vale to negotiate the premium for quality, as it amplifies the negative sentiment hanging over the sector. For more details on China's economic situation and iron ore fundamentals, we strongly recommend reading our sector report for the week.

Even so, we believe that, fundamentally, Vale's shares have been discounted too much, penalizing the company in the face of the uncertainties that are evident to all investors. On the other hand, we believe that **many ignore the effect of the increase in exports on crude steel production**, which has continued to grow y/y over the last 2M in China, so there is no reason for such despair, although we also don't think that sentiment should be bullish on China's macroeconomic data. However, we have identified an exaggerated degree of risk aversion on the part of fund managers (especially local ones) to investment theses linked to iron ore, especially Vale.

Graph 1. Mining majors vs. iron ore (Since Jan. 2023)



Source: Genial Investimentos, Vale

When we look at the volatility share prices chart of the majors in the mining sector, we see that Vale is much further away gaped vs. the iron ore curve by 62% Fe than the other companies, consolidating the company as the most discounted in the world compared to its peers. Trading at an **EV/EBITDA 25E** of **3.3x** (vs. 5.0x historical average), we see the company **excessively penalized by the market**. We reiterate our **BUY rating**, with a **12M Target Price** of **VALE3-B3** at **R$78.50 and a 12M Target Price of ADRs-NYSE at US$14.50, with an upside of** +25.94%.

Appendix: Vale

Figure 1. Vale – Income Statement in US$ Millions (Genial Est. 2024-2029)

Income Statement	2024E	2025E	2026E	2027E	2028E	2029E
Net Revenue	**39.856**	**44.580**	**43.639**	**45.540**	**46.582**	**50.303**
(-) COGS	(25.001)	(27.973)	(28.162)	(29.333)	(30.901)	(33.368)
Gross Profit	**14.855**	**16.607**	**15.477**	**16.207**	**15.681**	**16.935**
(-) Expenses	(3.109)	(3.578)	(3.354)	(3.000)	(2.698)	(2.915)
Adjusted EBITDA	**14.914**	**16.284**	**15.617**	**16.866**	**16.819**	**18.022**
(-) D&A	(3.139)	(3.314)	(3.488)	(3.664)	(3.847)	(4.022)
EBIT	**11.774**	**12.970**	**12.129**	**13.202**	**12.971**	**14.000**
(+/-) Financial Result	(2.359)	(2.063)	(2.007)	(2.022)	(1.983)	(2.040)
(-) Taxes	(1.482)	(1.653)	(1.521)	(1.702)	(1.679)	(1.846)
Net income	**7.934**	**9.254**	**8.601**	**9.478**	**9.310**	**10.114**
Profitability						
Net margin (%)	19,91%	20,76%	19,71%	20,81%	19,99%	20,11%

Figure 2. Vale– Cash Flow in US$ Millions (Genial Est. 2024-2029)

Cash Flow (FCFF)	2024E	2025E	2026E	2027E	2028E	2029E
Net Revenue	**39.856**	**44.580**	**43.639**	**45.540**	**46.582**	**50.303**
(-) COGS	(25.001)	(27.973)	(28.162)	(29.333)	(30.901)	(33.368)
Adjusted EBITDA	**14.914**	**16.284**	**15.617**	**16.866**	**16.819**	**18.022**
Adjusted EBIT	**11.774**	**12.970**	**12.129**	**13.202**	**12.971**	**14.000**
(-) Taxes	(1.482)	(1.653)	(1.521)	(1.702)	(1.679)	(1.846)
(+) D&A	3.139	3.314	3.488	3.664	3.847	4.022
(+/-) Brumadinho and Samarco	(716)	(2.070)	(1.750)	(1.279)	(1.117)	(826)
(+/-) Δ WK	1.517	569	847	(393)	(244)	(463)
(-) Capex	(6.758)	(6.778)	(6.778)	(7.319)	(7.319)	(7.319)
FCFF	**7.475**	**6.352**	**6.416**	**6.173**	**6.459**	**7.568**

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Buy	Expected return above +10% in relation to the Company's sector average	49%
Neutral	Expected return between +10% and -10% relative to the Company's industry average	41%
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under Review	Under review	5%

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