genial | Equity Research

JBS

3Q25 Preview: Cycles cooling down

LatAm Meatpackers

Main takeaways:

(i) Seara: Adjusted EBITDA of **US$339mn Est.** (-13.5% q/q; -26.5% y/y), with a margin of **15.4%** (-2.7p.p. q/q; -5.6p.p. y/y), reflecting a gradual recovery in shipments after Brazil was recognized as free of avian influenza on September 4, but still without normalization in China, which only occurred at the turn of 4Q25; the -15% q/q drop in corn should ease COGS/kg, but is likely to be offset by seasonal winter factors; **(ii) JBS Brazil**: Adjusted EBITDA of **US$227mn Est.** (-0.8% q/q; -39.9% y/y), with a margin of **6.0%** (-0.4p.p. q/q; -5.6p.p. y/y), sustained by strong growth in beef exports (+22% y/y), offsetting the +50% US tariff and redirecting flows to China and Mexico; the cattle cost at R$305/arroba (-3% q/q; +27% y/y) remains high, limiting margin gains; **(iii) Beef North America:** Adjusted EBITDA of **-US$101mn Est.** (-56.7% q/q; -1.9x y/y), with a margin of **-1.4%** (+2.0p.p. q/q; -3.3 p.p. y/y), pressured by record cattle costs of US$232.5/cwt (+4% q/q; +21% y/y), which compress spreads even in the face of high cut-out; **(iv) JBS Australia:** Adjusted EBITDA of **US$246mn Est.** (-15.1% q/q; +41.4% y/y), with a margin of **12.5%** (-2.2p.p. q/q; +2.7p.p. y/y), impacted by the increase in cattle prices; **(v) USA Pork:** Adjusted EBITDA of **US$260mn Genial Est.** (+2.4% q/q; +5.3% y/y), with a margin of **12.2%** (-0.1p.p. q/q; +0.1p.p. y/y), sustained by competitive prices compared to beef (+13% YTD) and tradedown to more affordable proteins, partially offset by trade restrictions with China; **(vi) PPC:** Adjusted EBITDA of **US$764mn Est.** (+1.1% vs. Genial Est.; -6.6% q/q; -1.5% y/y), with a margin of **16.1%** (-0.1p.p. vs. Genial Est.; -1.1p.p. q/q; -0.9p.p. y/y), in line with expectations, reflecting a slight correction in chicken breast prices in the US and higher costs in inputs and SG&A, partially offset by operating gains; **(vii)** We decided to reflect a **more prudent scenario** in our model regarding the company's fundamentals, leading us to revise the **12M Target Price** to **R$85.00** (vs. R$109.00 previously) **BDRs-B3** and **US$16.00** (vs. US$20.00 previously) **JBS-NYSE**, which would imply an **upside** of **+22.4%**.

Analysts

Igor Guedes
+55 (11) 3206-8286
igor.guedes@genial.com.vc

Luca Vello
+55 (11) 3206-1457
luca.vello@genial.com.vc

Iago Souza
+55 (11) 3206-1457
iago.souza@genial.com.vc

Company

JBS US Equity
Buy

Price: US$ 13.10 (10-Nov-2025)
Target Price 12M: US$ 16.00 (NYSE)

JBSS32 BZ Equity
Target Price 12M: R$ 85.00 (B3)

Table 1. Income Statement JBS (3Q25 Genial Est.)

(US$ milhões)	3Q25E Genial Est.	2Q25 Reported	% q/q	3Q24 Reported	% y/y
Net Revenue	**21.563**	**20.998**	**2,7%**	**19.926**	**8,2%**
COGS	(18.691)	(18.165)	2,9%	(16.646)	12,3%
Adjusted EBITDA	**1.739**	**1.754**	**-0,8%**	**2.153**	**-19,2%**
EBITDA Margin (%)	8,1%	8,4%	-28,5%	10,8%	-2,7p.p
EBIT	**1.191**	**1.105**	**7,7%**	**1.554**	**-23,4%**
EBIT Margin (%)	5,5%	5,3%	25,8%	7,8%	-2,3p.p
D&A	(612)	(565)	8,3%	(543)	12,7%
Financial Result	(373)	(376)	-1,0%	(361)	3,3%
Net Income	**549**	**528**	**3,9%**	**693**	**-20,8%**
Net Margin (%)	2,5%	2,5%	2,9%	3,5%	-0,9p.p

Source: JBS, Genial Investimentos

JBS will release its **3Q25 results** on **Nov. 13**, after the market closes. It will be a quarter of **sequential margin contraction** in basically all business units. Consolidated **Net revenue** is expected to total **US$21.6bn Genial Est.** (+2.7% q/q; +8.2% y/y), sustained by the strong performance of **Seara**, **JBS Brazil**, **Beef North America**, and **USA Pork** divisions, which should **boost the top line** in an external environment that remains favorable and with firm demand domestically. In sequential terms, the increase should reflect the greater dynamism of Brazilian operations — especially Seara, with the **gradual resumption of chicken shipments** to various locations after the Ministry of Agriculture (MAPA) recognized the end of the avian flu, which had affected last quarter's figures. This will be added to the resilience of US consumption, which sustains the other business units. In the annual comparison, growth should be led by **JBS Brazil**, **Beef North America**, and **JBS Australia**, which continue to capture the **exports momentum**, offsetting the **stability** at **Seara y/y** and the just a moderate growth at **PPC**.

The **Adjusted EBITDA** is expected to reach **US$1.7bn Genial Est.** (-0.8% q/q; -19.2% y/y), with a **margin of 8.1%** (-0.3p.p. q/q; -2.7p.p. y/y). There will likely be a slight sequential decline due to **(i)** margin compression in **Seara** (15.4% Est.; -2.7p.p. q/q), reflecting seasonal effects with a harsher winter, even with a softening in corn costs; in addition to **(ii)** tightening at **JBS Australia** (12.5% Est.; -2.2p.p. q/q), pressured by the cattle acquisition cost, which rose to US$79c/Kg lwt (+15% q/q); and also **(iii)** at **PPC** (16.1%; -1.1p.p. q/q) — which has already released its results — impacted by higher input and SG&A expenses.

These effects should be only partially offset by the improvement — although far from ideal — in **Beef North America** (-1.4% Est.; +2.0p.p. q/q), which will benefit from a strong cut-out, but continues to experience high cattle acquisition costs in the face of very tight supply. We should also see stability in **USA Pork** (12.2% Est.; -0.1p.p. q/q), supported by healthy spreads.

On an annual basis, the decline in the consolidated margin should reflect the downtrend of the profitability cycle in basically all proteins in the portfolio — a move already expected vs. 2024. We believe that the most significant reductions will occur at **Seara** (15.4% Est.; -5.6p.p. y/y) and **JBS Brazil** (6% Est.; -5.6p.p. y/y), due to higher COGS/kg; while **Beef North America** (-1.4% Est.; -3.3p.p. w/y) should maintain negative margins given the scenario of restricted supply in the US.
On the other hand, **JBS Australia** (12.5% Est.; +2.7 p.p. y/y) should continue to reverse the impact of previous quarters, sustaining profitability close to historical levels. Finally, **Net Income** is projected at **US$549mn Genial Est.** (+3.9% q/q; -20.8% y/y), with a **margin** of **2.5%** (flat q/q; -0.9p.p. y/y).

3Q25 Preview: In detail!

Seara: shipments resumption; COGS/kg sideways. We project Net revenue of US$2.2bn Genial Est. (+1.6% q/q; +0.3% y/y), with a gradual recovery in exports after Brazil was recognized as avian flu-free by several global regions in Sep, allowing for the gradual rehabilitation of exporting plants. The outbreak recorded on May 15 at a breeding farm in Montenegro (RS) led to the temporary shipment's suspension and a 10% m/m reduction in volumes in May. Starting in Jul, however, flows began to recover — UAE (+12.6% m/m), Saudi Arabia (+4% m/m) — indicating the reopening of these geographies, according to SECEX data.

It is worth noting, however, that China — the main destination in 2024 (562Kt) —, maintained its restrictions during the quarter. The official release took place last week and will only be part of the 4Q25E result. In addition, in the domestic market, temporary oversupply caused chicken prices to fall, with the leg quarter retreating to US$2.0/kg in Jun (-9% q/q), before stabilizing at US$2.1/kg at the end of Sep.
On the cost side, the contraction in corn prices to R$64/bag (-15% q/q) should ease COGS/kg, but the seasonal technical particularities of winter — such as higher chicken mortality rates — and the increase in soybean prices to R$140/bag (+3% q/q) are expected to neutralize the reducing effect. Given this context, adjusted EBITDA should total US$339mn Genial Est. (-13.5% q/q; -26.5% y/y), with a margin of 15.4% (-2.7p.p. q/q; -5.6p.p. y/y).

JBS Brazil: Strong exports; cattle costs still quite high. Our model points to Net revenue of US$3.8bn Genial Est. (+5.6% q/q; +16.1% y/y), driven by strong growth in Brazilian beef exports, which rose both in terms of shipment volumes to 940Kt (+22% y/y) and in terms of price to US$5.6/Kg (+24.4% y/y), according to SECEX data. We note that although the US reduced imports of Brazilian beef amid a 50% tariff imposed by the Trump administration, exports continued to rise to other markets, such as Mexico and China. Asian demand, especially from China, remained the main driver, with Brazil's share of Chinese imports expanding to 47% (+6p.p. y/y), while shipments to the Middle East and other consolidated markets remained steady. In the domestic market, we estimate that consumption remained almost flat.

The cattle cost stood at R$305/arroba (-3% q/q; +27% y/y), with **(i)** a slight sequential reduction affected by the optimization of slaughter in part of the quarter, with a more complex tariff environment. Even so, it remains at **(ii)** a level considered quite high in the y/y comparison, given the persistent pressure from the cattle cycle — total slaughter reached 8.2 million head in 3Q25 (+9% q/q; +8% y/y), representing ~85% of the operation's COGS —, together with **(iii)** the USD/BRL FX rate softening (-4% q/q), which is reflected in a lower realized price, limiting margin gains. Thus, even with the advance in the top line, adjusted EBITDA is projected at US$227mn Genial Est. (-0.8% q/q; -39.9% y/y), with a margin of 6% (-0.4p.p. q/q; -5.6p.p. y/y).

Beef North America: Spreads still negative, despite strong cut-out. We estimate that Net revenue should clock in at US$7.0bn Genial Est. (+3.5% q/q; +11.5% y/y), reflecting the advance in US retail prices, which remain at historic highs, with ground beef at US$6.1/lb (+11.8% y/y) and steaks quoted at US$11.5/lb (+8.0% y/y), according to data from the U.S. Bureau of Labor Statistics.

This were further favored by the impact of tariffs on Brazilian beef – 26.4% when exporting beyond the pre-established quota, plus an additional surcharge (+50%) on that amount, which raises the tariff to ~76.4% in certain cases (as of Sep 1), even though exports to the US have fallen since the tariffs came into effect (-40% y/y). The average price of cuts in the red meat basket monitored by the USDA has risen by +13% since the beginning of the year, well above the normal CPI. Domestic demand remains surprisingly resilient, supported by high disposable income and a strong labor market, keeping per capita consumption at ~59lb/year, the highest in two decades.

Still, the obstacle remains the severely constrained supply scenario, with the U.S. cattle herd at 86.1 million head (-1.3% y/y; lowest since 1951), putting pressure on acquisition costs: the price of live cattle reached US$232.5/cwt (+4% q/q; +21% y/y). In addition, restrictions on cattle imports from Mexico since the end of 2024 — due to the outbreak of New World Screwworm — have also exacerbated the supply imbalance. This environment should keep spreads compressed, with the industry margin still negative. We project adjusted EBITDA of -US$101mn Genial Est. (-56.7% q/q; -186.1% y/y), with a margin of -1.4% (+2.0p.p. q/q; -3.3p.p. y/y), reflecting **(i)** the impact of record cattle costs and structural supply constraints, only partially offset by **(ii)** resilient domestic demand and **(iii)** acceleration in cut-out.

JBS Australia: Exports stable, but cattle costs continue to rise. We project Net revenue of US$2.0bn Genial Est. (-0.1% q/q; +10.4% y/y), a performance that should reflect the stability of export volumes after the series of records observed in 1H25 — when shipments exceeded ~700Kt, with emphasis on the US, Japan, South Korea, and China. Australia maintains a competitive position in the North American market, benefiting from a reduced tariff of 10% in the list announced by the Trump administration, while exports to the US remain up +37% y/y, driven by the shortage of domestic cattle in North America and restrictions on cattle imports from Mexico. The same trend can be seen in Canada (+40% y/y) and China (+62% y/y), with strong demand for grain fed beef (+41% y/y), which is sustaining international price levels.

On the other hand, cattle prices in Australia rose to US$79c/Kg lwt (+15% q/q; +34% y/y), according to MLA, significantly increasing the COGS/kg, which should compress spreads. Fattened cattle prices in Australia have been rising consistently, driven by a combination of strong international demand, mainly from the US and China, and restricted domestic supply. Dry weather conditions in some local regions have reduced the availability ready for slaughter, while producers have preferred to retain females in anticipation of higher prices. In addition, competition between local processors and exporters has pushed up prices at auctions ("saleyards"), with the national indicator exceeding US$0.4/kg of live weight (+30% y/y). Thus, we project adjusted EBITDA of US$246mn Genial Est. (-15.1% q/q; +41.4% y/y), with a margin of 12.5% (-2.2p.p. q/q; +2.7p.p. y/y), with sequential compression, although still higher on an annual basis, which had negative implications for the salmon business.

USA Pork: Margins remained at a healthy level. Our model points to Net revenue of US$2.1bn Genial Est. (+3.4% q/q; +4.3% y/y), a performance that should reflect the continued resilience of domestic demand and, consequently, the advance of US retail prices to ~US$80 in 3Q25 (+15% y/y).

Although prices are on the rise, we believe that trade down continues to occur vs. beef (+13% since the beginning of the year, well above the normal CPI)— with consumers gradually migrating to cheaper proteins due to historically high prices for red meat — favoring a partial shift in demand from premium proteins to pork. However, the effect should be offset by trade restrictions with China (which were still in place), limiting the full capture of margins in the export mix. Thus, we project adjusted EBITDA of US$260mn Genial Est. (+2.4% q/q; +5.3% y/y), with a margin of 12.2% (-0.1p.p. q/q; +0.1p.p. y/y), reflecting operational stability.

PPC: Slight positive deviation in revenue, but costs pressure margins. Pilgrim's Pride (PPC), JBS's chicken subsidiary focused mainly on the North American market, already released its 3Q25 results on Oct. 29. Net revenue totaled US$4.8bn (+1.7% vs. Genial Est.), basically flat sequentially (+0.1% q/q) and up +3.9% y/y, reflecting **(i)** the resilience of the North American market, with stable volumes in the main foodservice and retail channels, and **(ii)** prices remaining at historically high levels. The performance reflected dynamics similar to those observed throughout the year, with spreads in the US still solid, although with the beginning of a slight correction in chicken breast prices at the quarter end.

Adjusted EBITDA totaled US$764mn (+1.1% vs. Genial Est.), down -6.6% q/q and -1.5% y/y, basically in line with estimates, and as expected, showed impacts from input costs and higher SG&A, the latter due to increased legal provisions and legal defense expenses. Regionally, the results were mixed: in the US, profitability declined sequentially due to falling prices, partially offset by operational gains in efficiency and productivity; in Mexico, there was a reduction in margins due to higher production costs and lower sales prices, while Europe saw a slight decline in volume and a worse mix. As a result, the margin reached 16.1% (-0.1p.p. vs. Genial Est.; -1.1p.p. q/q; -0.9p.p. y/y), in a clear process of margin landing after the peak observed in 3Q24.

Our take on JBS

Brazil: Cycle turnaround faint, but prices are already on the rise. The cycle transition has been more gradual than expected due to the specific effects of the **imposition of a +50% surcharge by the US** (Sep 1) on Brazilian products, which at that time increased uncertainty regarding possible redirects of shipments, temporarily reducing the momentum of slaughterhouses and helping to drive down the price of fat cattle – **R$305/arroba in 3Q25** (-3% q/q). Thus, under this new scenario, we believe that the price of cattle for slaughter should move to the range of **R$320–330/arroba** in **4Q25E** vs. the previous R$340-350/arroba (currently trading at **~R$323/arroba**).

At this point, we expected a curve closer to R$340/arroba, showing that the catalyst for the reduction in cattle prices — after peaking at R$352/arroba in Nov — was in fact the tariffs imposition by the Trump administration, which created uncertainty about future shipments and abruptly slowed exports to the North American market. We emphasize that the US was a significant destination for Brazilian meat shipments, being the second most representative (12% of total exports in 1H25). The uncertainties generated by the tariffs, in turn, cooled the slaughter sequencing and ended up expanding the cattle supply, **causing price drops**.

This led large meatpackers to suspend purchases and reallocate destinations, with Mexico and China absorbing a significant portion of the shipments that would have gone to the US. In the domestic market, the combination of a **higher cattle supply in feedlots** and **longer slaughter schedules** (which now exceed nine business days on average) allowed meatpackers to renegotiate lower prices paid to producers. However, the situation is already reversing, as shipments have been accommodated in other regions, and slaughter has risen again to 2.7 million head in Oct (+5.5% vs. Aug).

Rerating: The wait is technical, not structural. In practice, we believe that the transition from primary listing on B3 to the NYSE will cause a disruption in the shareholders composition, especially regarding passive funds. With the company's exit from the main Brazilian indices (such as Ibovespa or IBrX), many ETFs and local index funds began to systematically divest, increasing the selling flow of the stock after the dual listing took effect. This lasted a few months. On the other hand, **passive funds in the US** — such as those replicating the Russell 1000 and, in the future, the S&P 500 — **have not yet established long positions**, since the company's eligibility for these indexes depends on factors such as liquidity history, free float, and listing time. The next window for entry into the indexes will only be in 2026/27.

Given this context, we interpret the **non-materialization of the rerating** as not reflecting a rejection of the thesis of repricing via multiples, but rather a **temporal misalignment** between the structural change in the listing and the rebalancing mechanics of global funds. Following confirmation of the NYSE listing (which took place in Jun), we expect that: **(i)** passive funds focused on the US will begin to gradually add JBS, as eligibility criteria are met (such as liquidity and trading history); and **(ii)** active funds will reassess their position based on still attractive valuation and the possibility of appreciation vs. peers.

As a result, for us, the scenario of share repricing remains credible: there is room for multiples convergence, but **the timing is influenced by technical** and regulatory factors. The market appears to be in a transition phase, with local investors reducing or eliminating positions after the considerable rise in shares between Jul-Aug, exactly as we predicted, while global funds do not yet seem to have generated sufficient buying flow.

Cycles cooling down. We believe that 3Q25 should reiterate the trend of **gradual compression** of the consolidated **margin**, already observed since the beginning of the year, reflecting the cycles profitability attenuation across different proteins in the main geographies. With a projected **margin** of **8.1% Est.** (-0.3p.p. q/q; -2.7p.p. y/y), we continue to **see no relevant catalysts** from a fundamental perspective. At **Seara**, the effect of the shipment's resumption to various regions after the end of the Avian Flu outbreak is not yet expected to fully offset the increase in COGS/kg, reinforcing the margin landing process (-2.7p.p. q/q). At **JBS Brazil**, the strong growth in beef exports (+22% y/y in 3Q25) should sustain the top line, but with cattle costs at R$305/arroba (+27% y/y), margins will continue to contract (-5.6p.p. y/y).

Meanwhile, **Beef North America** should endure pressure by the record cost of live cattle at US$232.5/cwt (+21% y/y) and still negative spreads, while **JBS Australia** will feel the effects of the robust increase in cattle prices, which reached US$79c/Kg lwt (+15% q/q), interrupting the margin recovery cycle that began in 1H25 after the resumption of operations at salmon farms. In addition, the effect derived from the **dual listing rerating** (NYSE with primary shares and B3 with BDRs) — the main driver of our thesis—, has been occurring at a slower pace. Although the listing has expanded the potential investor base vis-à-vis access to global indices (Russell 1000 and S&P 500) in the near future, absorption by funds (whether passive or active) has been slower than anticipated, with the company still trading at a multiple of **~4.2x EV/EBITDA**, implying a discount of **-50% vs. peers** (including Tyson Foods).

Given the above, although we maintain our **BUY rating** – supported by the natural hedge arising from portfolio and geographic diversification and the **thesis of rerating in the medium term**, which, although slower than expected, remains a structural driver of value – we have decided to reflect a **more prudent scenario** in our model in relation to the company's fundamentals, leading us to revise the **12M Target Price** to **R$85.00** (vs. R$109.00 previously) **BDRs-B3** and **US$16.00** (vs. US$20.00 previously) **JBS-NYSE**, which would imply an **upside** of **+22.4%**.

Appendix: JBS

Figure 1. JBS – Income Statement in R$ Millions (Genial Est. 25-28)

Income Statement	2025E	2026E	2027E	2028E
Net Revenue	**429.523**	**472.443**	**490.163**	**497.515**
(-) COGS	(371.424)	(417.085)	(425.918)	(432.307)
Gross Profit	**58.098**	**55.359**	**64.245**	**65.209**
(-) Expenses	(22.660)	(23.612)	(24.471)	(24.838)
Adjusted EBITDA	**35.439**	**31.747**	**39.774**	**40.370**
(-) D&A	(12.161)	(13.376)	(13.878)	(14.086)
EBIT	**22.268**	**18.471**	**25.997**	**26.387**
(+/-) Financial Result	(7.515)	(14.678)	(6.285)	(6.379)
(-) Taxes	(3.242)	(1.464)	(4.928)	(5.002)
Net income	**11.512**	**2.329**	**14.784**	**15.153**
Profitability				
Net margin (%)	2,7%	0,5%	3,0%	3,0%

Figure 2. JBS– Cash Flow in R$ Millions (Genial Est. 25-28)

Cash Flow (FCFF)	2025E	2026E	2027E	2028E
Net Revenue	**429.523**	**472.443**	**490.163**	**497.515**
(-) COGS	(371.424)	(417.085)	(425.918)	(432.307)
Adjusted EBITDA	**35.439**	**31.747**	**39.774**	**40.370**
EBIT	**22.268**	**18.471**	**25.997**	**26.387**
(-) Taxes	(3.242)	(1.464)	(4.928)	(5.002)
(+) D&A	12.161	13.376	13.878	14.086
(+/-) Δ WK	(342)	(1.441)	(801)	(1.448)
(-) Capex	(8.590)	(9.449)	(9.803)	(9.950)
FCFF	**22.255**	**19.495**	**24.343**	**24.073**

Disclosure Section

1. GENERAL DISCLAIMER

This report has been produced by the research department ("Genial Institutional Research") of Genial Institutional Corretora de Câmbio, Títulos e Valores Mobiliários S.A. ("GENIAL INSTITUTIONAL CCTVM"). Genial Institutional is a brand name of Genial Investimentos CCTVM.

Genial Rating

	Definition	Coverage
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%**
Sell	Expected return below -10% in relation to the Company's sector average	**5%**
under Review	Under review	**5%**

This report may not be reproduced or redistributed to any other person, in whole or in part, for any purpose, without the prior written consent of GENIAL INSTITUTIONAL CCTVM. GENIAL INSTITUTIONAL CCTVM accepts no liability whatsoever for the actions of third parties in this respect.

This research report is for distribution only under such circumstances as may be permitted by applicable law. This research report has no regard to the specific investment objectives, financial situation or particular needs of any specific recipient, even if sent only to a single recipient. This research report is not guaranteed to be a complete statement or summary of any securities, markets, reports or developments referred to in this research report. Neither GENIAL INSTITUTIONAL CCTVM nor any of its directors, officers, employees or agents shall have any liability, however arising, for any error, inaccuracy or incompleteness of fact or opinion in this research report or lack of care in this research report's preparation or publication, or any losses or damages which may arise from the use of this research report

GENIAL INSTITUTIONAL CCTVM may rely on information barriers, such as "Chinese Walls" to control the flow of information within the areas, units, divisions, groups, or affiliates of GENIAL INSTITUTIONAL CCTVM.

Investing in any non-U.S. securities or related financial instruments (including ADRs) discussed in this research report may present certain risks. The securities of non-U.S. issuers may not be registered with, or be subject to the regulations of, the U.S. Securities and Exchange Commission. Information on such non-U.S. securities or related financial instruments may be limited. Foreign companies may not be subject to audit and reporting standards and regulatory requirements comparable to those in effect within the United States.

The value of any investment or income from any securities or related financial instruments discussed in this research report denominated in a currency other than U.S. dollars is subject to exchange rate fluctuations that may have a positive or adverse effect on the value of or income from such securities or related financial instruments.

Past performance is not necessarily a guide to future performance and no representation or warranty, express or implied, is made by GENIAL INSTITUTIONAL CCTVM with respect to future performance. Income from investments may fluctuate. The price or value of the investments to which this research report relates, either directly or indirectly, may fall or rise against the interest of investors. Any recommendation or opinion contained in this research report may become outdated as a consequence of changes in the environment in which the issuer of the securities under analysis operates, in addition to changes in the estimates and forecasts, assumptions and valuation methodology used herein.

The locally listed shares of Brazilian companies may only be purchased by investors outside of Brazil who are "eligible investors" within the meaning of applicable laws and regulations.

2. ANALYST(S) DISCLOSURES AND CERTIFICATION

The principal analyst, IGOR GUEDES, is responsible for the content of this report and for meeting the requirements of Securities and Exchange Commission of Brazil (CVM) Instruction 598/2018.

The analysts hereby certify that the views expressed in this research report accurately reflect their personal views about the subject securities or issuers and it was prepared in an independent manner, including with respect to the person and to GENIAL INSTITUTIONAL.

The analyst hereby certifies that he (she) has no connection with any individual who works for the issuer(s) discussed in this report.

The analyst hereby certifies that he (she), or his (her) spouse or companion, either directly or indirectly, in his or her own name or on behalf of a third party, does not hold any of the securities covered in this report.

The analyst hereby certifies that he (she), or his (her) spouse or companion, is not directly or indirectly involved in the purchase, disposal or brokering of the securities covered in this report.

The analyst hereby certifies that he (she), or the his (her) spouse or companion, has no direct or indirect financial interest in the issuer covered in this report (other than trading shares in investment funds, in which the analyst cannot control, directly or indirectly, the administration or management of the fund, or which do not concentrate investments in sectors or companies that are covered by reports produced by the analyst).

The analyst's compensation is, directly or indirectly, determined by income from GENIAL INSTITUTIONAL´s business and financial operations.

In addition, the analysts certify that no part of their compensation was, is, or will be directly or indirectly related to the specific recommendations or views expressed in this research report.

The compensation of the analyst who prepared this report is determined by research management and senior management (not including investment banking). Analyst compensation is not based on investment banking revenues, however, compensation may relate to the revenues of GENIAL INSTITUTIONAL CCTVM, its affiliates and/or subsidiaries as a whole, of which investment banking, sales and trading are a part. Compensation paid to analysts is the sole responsibility of GENIAL INSTITUTIONAL CCTVM.

The analyst hereby certifies that he (she), or his (her) spouse or companion, does not serve as an officer, director, or advisory board member of the subject company.

The principal analyst is responsible for the content of this report and for meeting the requirements of Securities and Exchange Commission of Brazil (CVM) Instruction 598/2018.

Unless otherwise stated, the individuals listed on the cover page of this report are research analysts.

3. ADDITIONAL DISCLOSURE

(i) This document was prepared by GENIAL INSTITUTIONAL Research and is hereby supplied for the sole purpose of providing information about companies and their securities.

(ii) The information contained herein is provided for informational purposes only and does not constitute an offer to buy or sell, and should not be construed as a solicitation to acquire, any securities in any jurisdiction. The opinions expressed herein regarding the purchase, sale or holding of securities, or with respect to the weighting of such securities in a real or hypothetical portfolio, are based on careful analysis by the analysts who prepared this report and should not be construed by current or future investors as recommendations for any particular investment decision or action. The investor's final decision should be made considering all of the risks and fees involved. This report is based on information obtained from primary or secondary public sources, or directly from companies, and is combined with estimates and calculations prepared by GENIAL INSTITUTIONAL CCTVM. This report does not purport to be a complete statement of all material facts related to any company, industry, security or market strategy mentioned. The information has been obtained from sources believed to be reliable, but GENIAL INSTITUTIONAL CCTVM does not make any express or implied representation or warranty as to the completeness, reliability or accuracy of such information. The information, opinions, estimates and projections contained in this document are based on current data and are subject to change. Prices and availability of financial instruments are indicative only and subject to change without notice. GENIAL INSTITUTIONAL CCTVM is under no obligation to update or revise this document or to advise of any changes in such data.

(iii) The securities discussed in this report, as well as the opinions and recommendations contained herein, may not be appropriate for every type of investor. This report does not take into account the investments objectives, financial situation or particular needs of any particular investor. Investors who wish to buy, sell or invest in securities that are covered in this report should seek independent financial advice that takes individual characteristics and needs into consideration, before making any investment decision with respect to the securities in question. Each investor should make independent investment decisions after carefully analyzing the risks, fees and commissions involved. If a financial instrument is denominated in a currency other than an investor's currency, changes in exchange rates may adversely affect the price or value of, or the income derived from the financial instrument, and the reader of this report assumes all foreign exchange risks. Income from financial instruments may vary, and therefore their price or value may rise or fall, either directly or indirectly. The information, opinions and recommendations contained in this report do not constitute and should not be interpreted as a promise or guarantee of a particular return on any investment. Past performance does not necessarily indicate future results, and no representation or warranty, express or implied, is made herein regarding future performance. Therefore, GENIAL INSTITUTIONAL CCTVM, its affiliated companies, and the analysts involved in this report take no responsibility for any direct, indirect or consequential loss resulting from the use of the information contained in this report, and anyone using this report undertakes to irrevocably indemnify GENIAL INSTITUTIONAL CCTVM and its affiliates from any claims and demands.

(iv) Prices in this report are believed to be reliable as of the date on which this report was issued and are derived from one or more of the following: (i) sources as expressly specified alongside the relevant data; (ii) the quoted price on the main regulated market for the security in question; (iii) other public sources believed to be reliable; or (iv) GENIAL INSTITUTIONAL CCTVM's proprietary data or data available to GENIAL INSTITUTIONAL CCTVM.

(v) No representation or warranty, either express or implied, is provided in relation to the accuracy, completeness or reliability of the information contained herein, except with respect to information concerning GENIAL INSTITUTIONAL CCTVM, its subsidiaries and affiliates. In all cases, investors should conduct their own investigation and analysis of such information before taking or omitting to take any action in relation to securities or markets that are analyzed in this report.

(vi) GENIAL INSTITUTIONAL CCTVM makes no representations herein that investors will obtain profits. GENIAL INSTITUTIONAL CCTVM will not share with investors any investment profits nor accept any liability for any investment losses. Investments involve risks and investors should exercise prudence in making their investment decisions. GENIAL INSTITUTIONAL CCTVM accepts no fiduciary duties on behalf of recipients of this report and in communicating this report is not acting in a fiduciary capacity. This report is not to be relied upon in substitution for the exercise of recipient's independent judgment. Opinions, estimates, and projections expressed herein constitute the current judgment of the analyst responsible for the substance of this report as of the date on which the report was issued and are therefore subject to change without notice and may differ or be contrary to opinions expressed by other business areas or groups of GENIAL INSTITUTIONAL CCTVM as a result of using different assumptions and criteria. The information, opinions and recommendations contained in this report do not constitute and should not be interpreted as a promise or guarantee of a particular return on any investment.

(vii) Because the personal views of analysts may differ from one another, GENIAL INSTITUTIONAL CCTVM, its subsidiaries and affiliates may have issued or may issue reports that are inconsistent with, and/or reach different conclusions from, the information presented herein. Any such opinions, estimates, and projections must not be construed as a representation that the matters referred to therein will occur. Prices and availability of financial instruments are indicative only and subject to change without notice. Income from financial instruments may vary, and therefore their price or value may rise or fall, either directly or indirectly.

(viii) This document may not be: (a) photocopied or duplicated in any manner, in whole or in part, and/or (b) distributed without GENIAL INSTITUTIONAL CCTVM's prior written consent. GENIAL INSTITUTIONAL CCTVM accepts no liability whatsoever for the actions of third parties in this respect.

(ix) Neither GENIAL INSTITUTIONAL CCTVM nor any of its affiliates, nor any of their respective directors, employees or agents, accepts any liability for any loss or damage arising out of the use of all or any part of this report.

(x) GENIAL INSTITUTIONAL CCTVM (or its affiliates, officers, directors or employees) may, to the extent permitted by law, have acted upon or used the information herein contained before the publication of this report and may have a position in securities issued by the companies mentioned herein and may make a market or act as a principal in any transactions in any such securities. Genial Institutional may from time to time perform investment banking or other services to, or solicit investment banking or other business from, the companies mentioned herein.

4. IMPORTANT DISCLOSURES FOR U.S. PERSONS

This research report was prepared by Genial Institutional CCTVM, a company authorized to engage in securities activities in Brazil. Genial Institutional CCTVM is not a registered broker-dealer in the United States and, therefore, is not subject to U.S. rules regarding the preparation of research reports and the independence of research analysts. This research report is provided for distribution to “major U.S. institutional investors” in reliance on the exemption from registration provided by Rule 15a-6 of the U.S. Securities Exchange Act of 1934, as amended (the “Exchange Act”) and is not being provided pursuant to a soft-dollar arrangement.

Any U.S. recipient of this research report wishing to effect any transaction to buy or sell securities or related financial instruments based on the information provided in this research report should do so only through Auerbach Grayson & Company LLC ("AGCO"), a registered broker dealer in the United States with an office at 20 West 55th Street New York, NY 10019, (212) 453-3523 . Under no circumstances should any recipient of this research report effect any transaction to buy or sell securities or related financial instruments through Genial Institutional CCTVM.

If the report is to be distributed to anyone other than Major U.S. Institutional Investors in the United States. AGCO accepts responsibility for the contents of this report as provided for in relevant SEC releases and SEC staff no-action letters.

The analyst whose name appears in this research report is not registered or qualified as a research analyst with the Financial Industry Regulatory Authority (“FINRA”) and may not be an associated person at Auerbach Grayson & Company LLC ("AGCO") and, therefore, may not be subject to applicable restrictions under FINRA Rules on communications with a subject company, public appearances and trading securities held by a research analyst account.

The disclosures contained in research reports produced by GENIAL INSTITUTIONAL CCTVM and distributed by Auerbach Grayson & Company LLC ("AGCO") in the U.S. shall be governed by and construed in accordance with U.S. law. This report may not be reproduced or redistributed to any other person, in whole or in part, for any purpose, without the prior written consent of GENIAL INSTITUTIONAL CCTVM. Additional information relative to the financial instruments discussed in this report is available upon request.

UK Disclaimer:

(i) This document is STRICTLY CONFIDENTIAL to the recipient, may not be distributed to the press or other media and may not be reproduced in any form. this document is directed only at persons who are “INVESTMENT PROFESSIONALS” falling within article 19(5) of the FSMA 2000 (FINANCIAL PROMOTION) ORDER 2005, or HIGH NET WORTH BODIES falling within ARTICLE 49(2) of that order (together THE “RELEVANT PERSONS”). This document must not be acted on or relied on by persons who are not RELEVANT PERSONS.

(ii) The distribution of this document in other jurisdictions may be restricted by law and persons into whose possession this document comes should inform themselves about, and observe, any such restrictions. Any failure to comply with these restrictions may constitute a violation of the laws of any such other jurisdiction.