4th QTR – OCT/23

MACROECONOMIC SCENARIOS AND PERSPECTIVES ON BRAZIL 2023/2024

REDWOOD ASSET MANAGEMENT

Redwood

Summary

OPENING STATEMENT

Brazil: inconvenient truths and embarrassing irrelevance.

As if our economic and political difficulties were not enough, we insist on embarrassing ourselves in front of the world. In nine months of government, there is plenty of head-scratching and a lack – exhaustively so - of ideas that stand up and bear minimum rationality to the proper tackling of our internal problems. In this sense, regardless of the latest events of the Hamas terrorist attack on Israel, our Commander-in-Chief was already facing an existential dilemma: to focus on our problems and people or to pursue international notoriety? This has been the case with proposals for a solution to the Russia x Ukraine War, with their boring and disconnected speeches. Now, with the conflict – Israel x Hamas – intensifying with several other countries, our Chief President takes advantage of this crisis to try to expose himself and present our Celso Amorim-inspired diplomacy. We condemn the acts, but without naming the terrorists, and this reveals the power of the reigning ideology – forget the definitions and frameworks of the UN Security Council (UNSC) – only excuses. The blunt truth is that Brazil, and precisely at this moment when we are chairing the UNSC, has no international relevance whatsoever to change the course of negotiations under the aegis of those who govern us and dictate the pace and diplomatic conduct, be it with Russia x Ukraine, or Israel x Hamas – not on account of our diplomats' capacity, but above all due to the commitment and inability of the current ideology in adequately coordinating the situation. This new war, in addition to humanitarian issues, has the potential to profoundly impact the world.

The Political, Economic and Financial Scenarios – Brazil, presented below, updates the Q3 2023 scenarios with both domestic and international perspectives, but without a more detailed pricing of the consequences of the recent Israel x Hamas crisis. This is because the outbreak and further intensification of the conflict will depend on the eventual and direct involvement of other countries, the consequences of which are difficult to map at this time. But that doesn't mean that the results and possible trajectories do not change the economic and social challenges faced in several countries, possibly their intensities. The Brazilian political position, to no one's surprise, appears as expected: very confused.

The truth is war's first casualty (along with people's clear understanding).

Thus, towards the end of 2023, the possible "euphoria in the markets" we criticized in the last Scenarios as a – we were talking about cautious optimism at best – is now confirmed with a landscape about to face challenges of all sorts. Our prospects, if we escalate to a war with other explicit agents, do not deviate from the traditional core economic-financial field: oil prices soar, affecting inflation around the world – notably in the USA – which in turn will not miss the (FED) timing and will rise further US interest rates. Flight to quality will come as a consequence and, also to eventually mitigate this effect, our BACEN will likely hike interest rates... hence, the full circle. Should we suffer in anticipation? Of course not, but it is extremely important to reevaluate what was already a cautious optimism. However, if the world does not move on so positively and in 2024 it gets worse, we are left, once again, with the opportunity to do our homework (focus on our domestic problems, Reforms, etc.), and be ready for when the storm passes.

In the world, the Russia x Ukraine War will go out of focus (and who knows what Russia will do!) and this new Israel x Hamas crisis will begin. Unfortunately, we are about to enter a dark period, as the truth is war's first casualty (along with people's clear understanding). The relativization of attacks on innocent Israelis is absurd, and should not be confused with the rights of Palestinians. Even worse are the countless records of support and celebrations around the world, in complete disregard for life, fueling antisemitism in various segments of society and also in academia – notably in the USA.

This political-economic-financial scenario is potentially the most challenging in recent times. Never has short-term assessment been so important to assess the medium-long term. Count on us!

POLITICAL, ECONOMIC AND FINANCIAL SCENARIO

INTERNATIONAL OUTLOOK

POLITICAL, ECONOMIC AND FINANCIAL SCENARIOS

Overseas - World

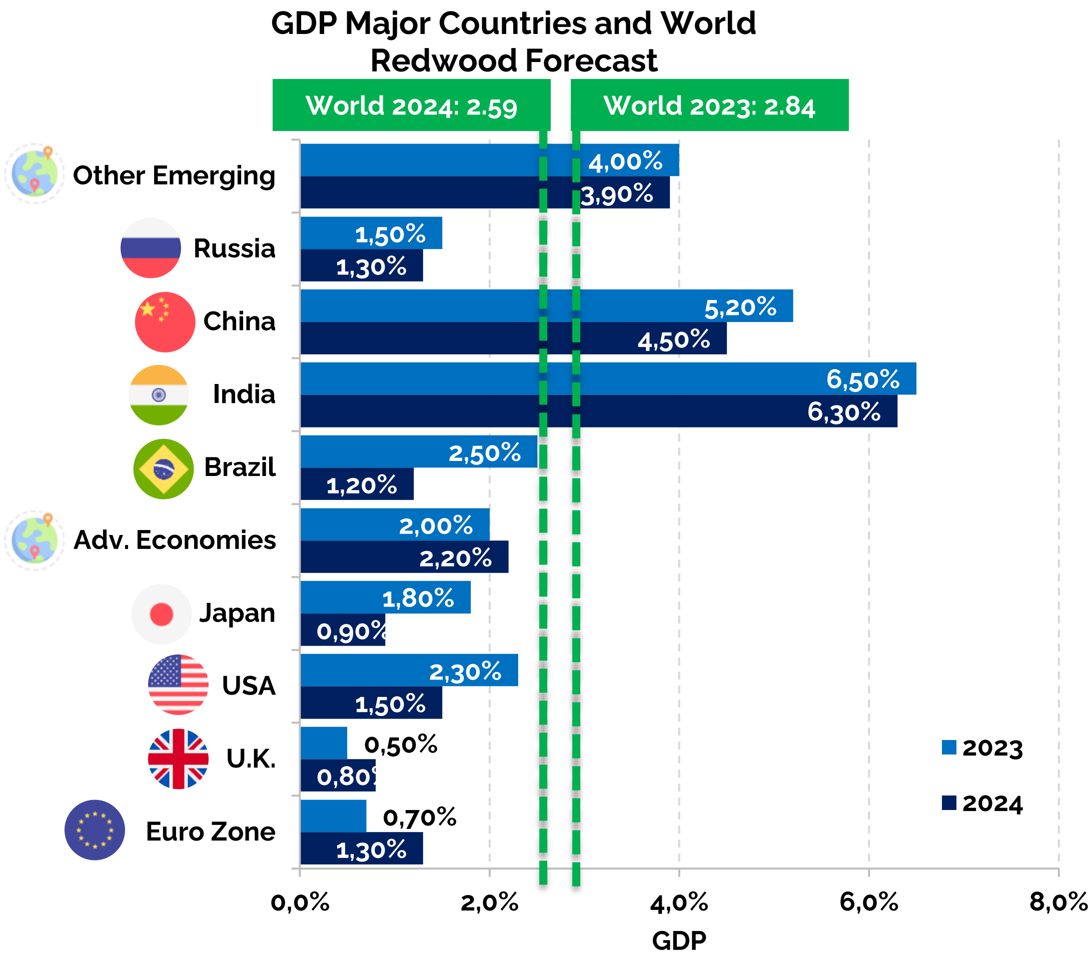
- 2.3% Growth is expected for 2023. A recession, even if mild, does not seem likely in the next few quarters;
- Despite the cooling of inflation in the country, the persistence of the high core may indicate a resumption of interest rate hikes by the FED. Inflation is expected to be near 3.5%;
- Driven largely by the services sector, employment data in the American labor market remains strong despite the level of interest rates. Creation of vacancies and the level of unemployment remains near lows;
- Trump's greater rejection and problems with justice could lead to another Republican candidate running in the 2024 elections against Biden;
- Joe Biden reaffirms his commitment to security and weapons supply for Ukraine, and now also for Israel, but public opinion does not see him as an "active" President;
- Several aspects, from a political point of view, strongly separate Democrats from Republicans, but Israel manages to unite everyone in the defense of that country;

- China's GDP grows at 4.9% in Q3 and makes Beijing's annual growth target (5%) feasible;
- The Chinese government maintains credit stimulus aimed at strengthening economic recovery. In Sept/23, USD 316.31 billion were issued in the form new loans. The Monetary Base (M2) had an annual increase of 10.3% in Sept/23;
- A small acceleration of prices was expected, but a slight deceleration was observed. Now, inflation is projected to be near 0.89% in 2023;
- PBoC maintained the 3.45% benchmark interest rate for 1-year loans, which is in line with measures to boost the economy;
- Chinese government calls for a ceasefire in the conflict between Israel and Hamas. The conflict could impact China in terms of oil imports - the country buys 71% of its oil from abroad, making it the largest oil importer in the world;
- The Lula administration seems to be naturally-inclined towards China, which definitely demarcates alignment and promising negotiations in the political and economic field;

- Even with persistent core-measure inflation, controlling inflation will be quite a challenge for the ECB in the coming months;
- The bloc's unemployment rate continues on a downward trend, returning to the lows at 6.4% in August;
- United Kingdom: BoE focused on reducing inflation (6.7% in 12 months) should continue with its tight monetary policy. Economic growth at 0.5% is expected in 2023;
- Germany: high 12-month cumulative inflation (3.8% in September) and worsening economic outlook (technical recession) with rising interest rates in the EZ and weak export markets. IMF projects -0.5% GDP growth in 2023;
- Ukraine: uncertain growth outlook depending on the end of the war. Growth is estimated at 2.0% (IMF) in 2023. The war records more than 200,000 deaths and 300,000 injuries;
- Russia: IMF projects 2.2% growth in 2023. OECD points to 0.8% growth. Non-alignment by Asian countries (especially India and China) contributes to that outcome.

POLITICAL, ECONOMIC AND FINANCIAL SCENARIOS

Overseas – GDP Countries and World



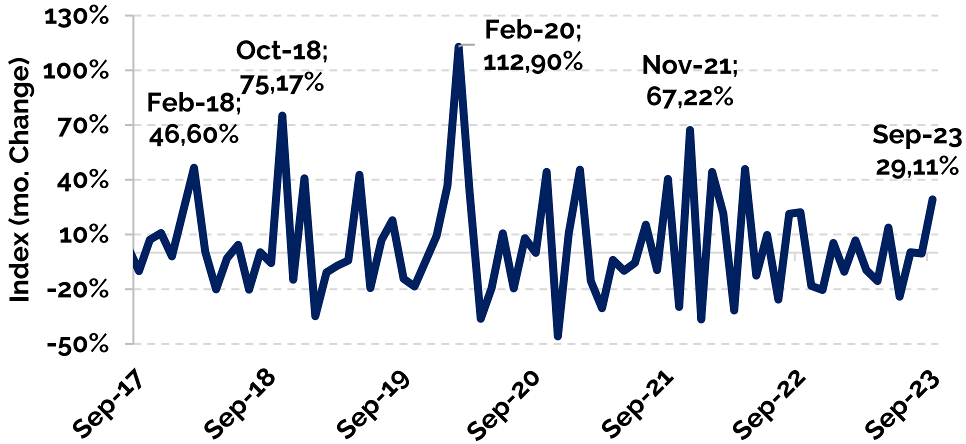
- Global economic activity improves forecasts for 2023, but without consequences for 2024;
- Supply chain normalization is insufficient to boost the economy;
- War [Russia x Ukraine] + crisis [Israel x Hamas] could intensify global economic and financial stress;
- Inflation in large economies begins to decline, but is still far from targets, faced with a new “challenge”;
- Central Banks will remain hawkish, especially in a geopolitically unstable environment.

Source: Redwood Forecast | Elaborated by Redwood

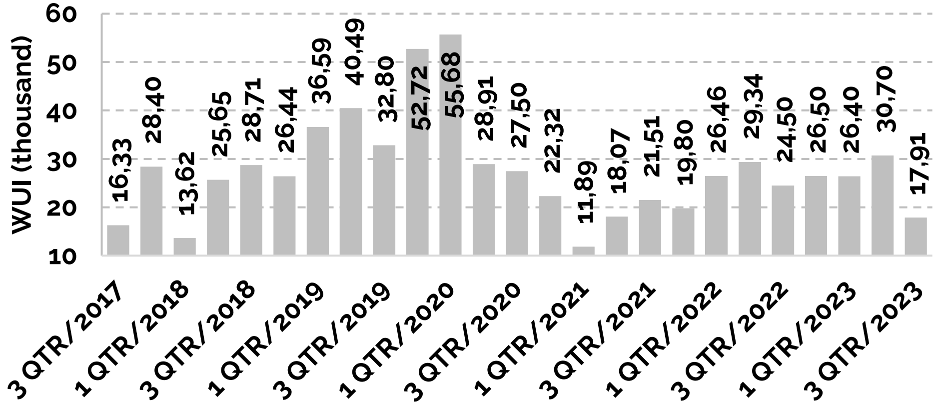
POLITICAL, ECONOMIC AND FINANCIAL SCENARIOS

Overseas – Risks, Uncertainties and Inflation

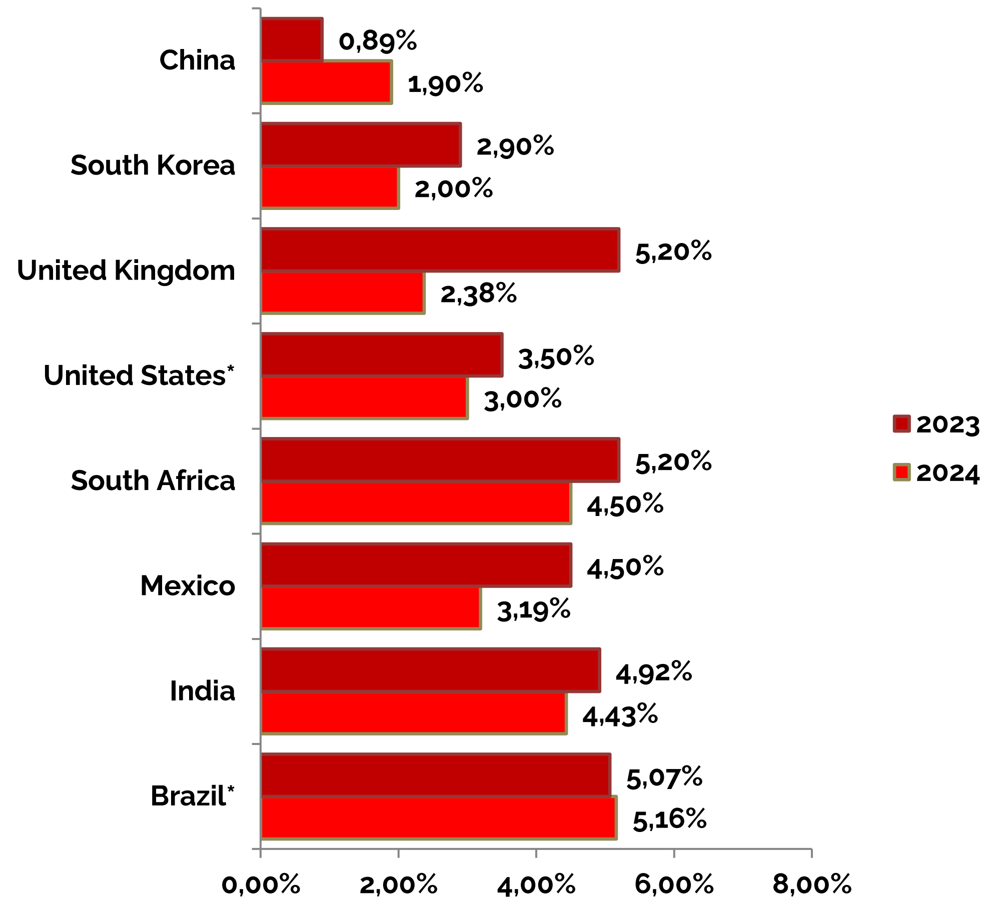
VIX Index



WUI Index



Inflation Forecast – IMF/Redwood(*)

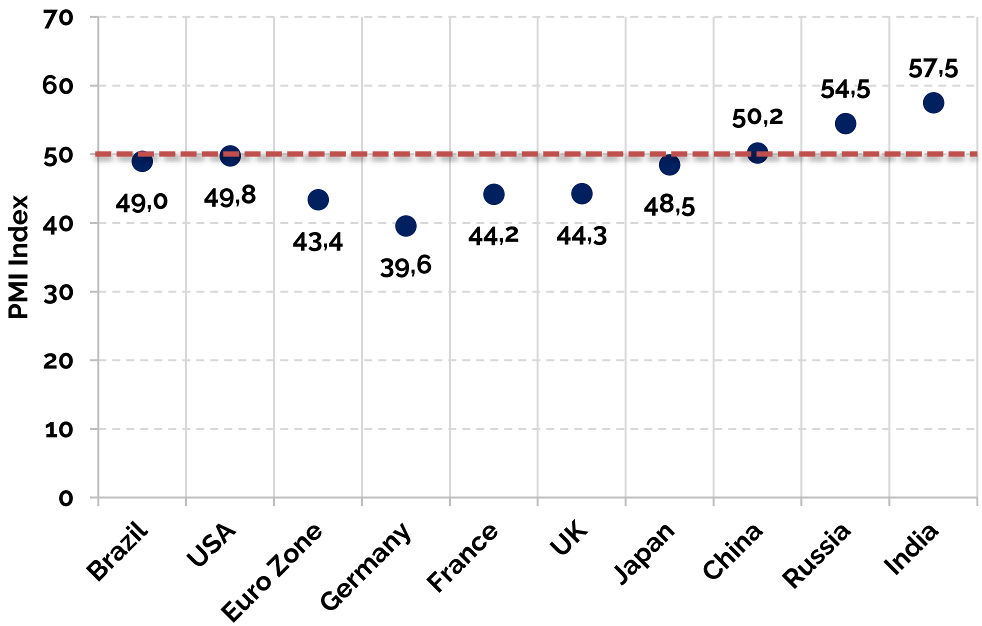


Source: Bloomberg; Worlduncertaintyindex.com; IMF | Elaborated by Redwood *Redwood Forecast

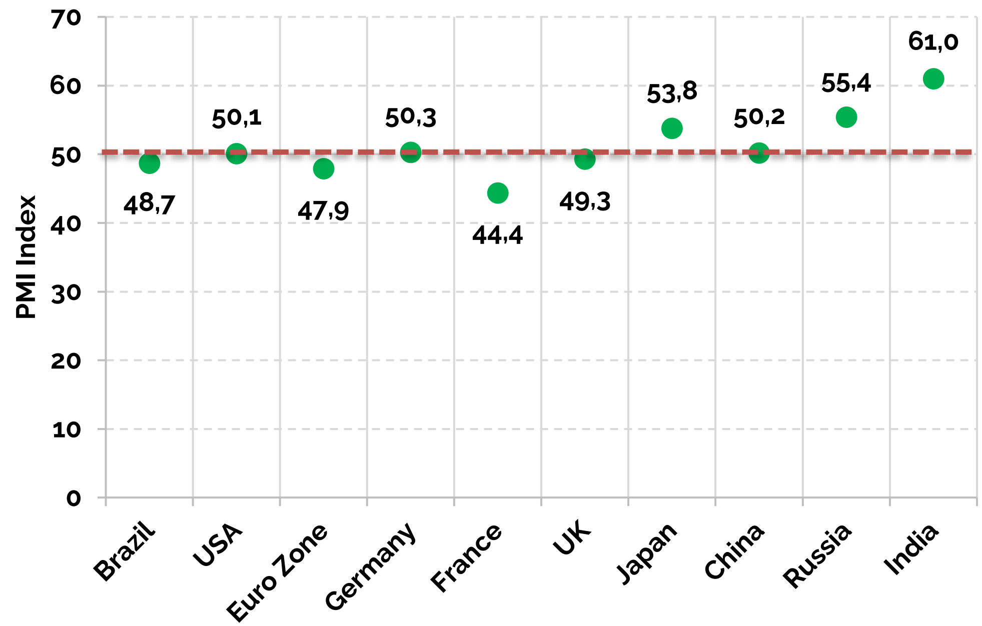
POLITICAL, ECONOMIC AND FINANCIAL SCENARIOS

Overseas– PMIs Main Economies

Manufaturing PMI Index - Sep/23



Services PMI Index -Sep/23



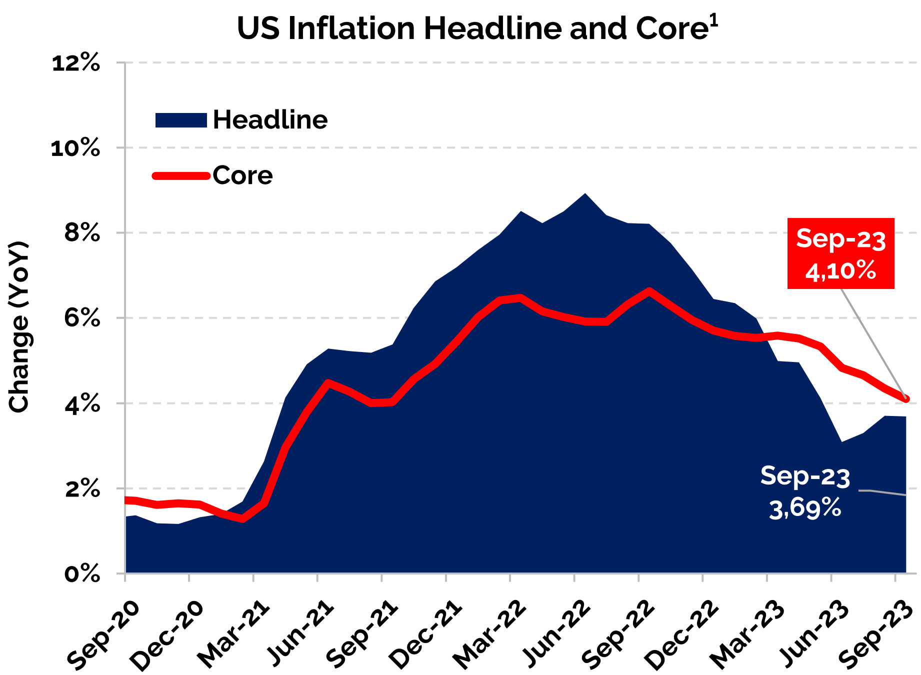
Source: Investing.com | Elaborated by Redwood

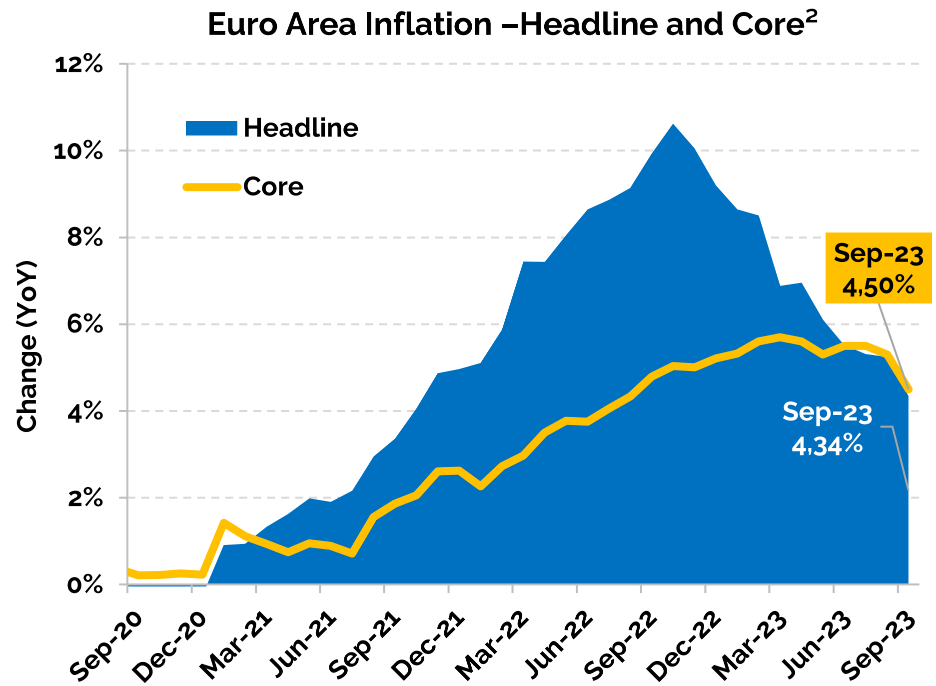
PMIs, or Purchasing Managers' Indexes (scale 0 to 100), for industries and services, measure the respective sectors' activities and, as a rule, for values above 50 they indicate that the sector is growing and, below that, it suggests contraction.

- **In Manufacturing, only Russia and India are above bar, the USA and China are in line, and the others are below: that sector is not "moving";**
- **In Services, the figure is a little better and helps a lot due to the important relative weight in several economies, but forecasts are still poor;**

POLITICAL, ECONOMIC AND FINANCIAL SCENARIOS

Overseas– Inflation: the core of the problem





[1]Excluding energy and food

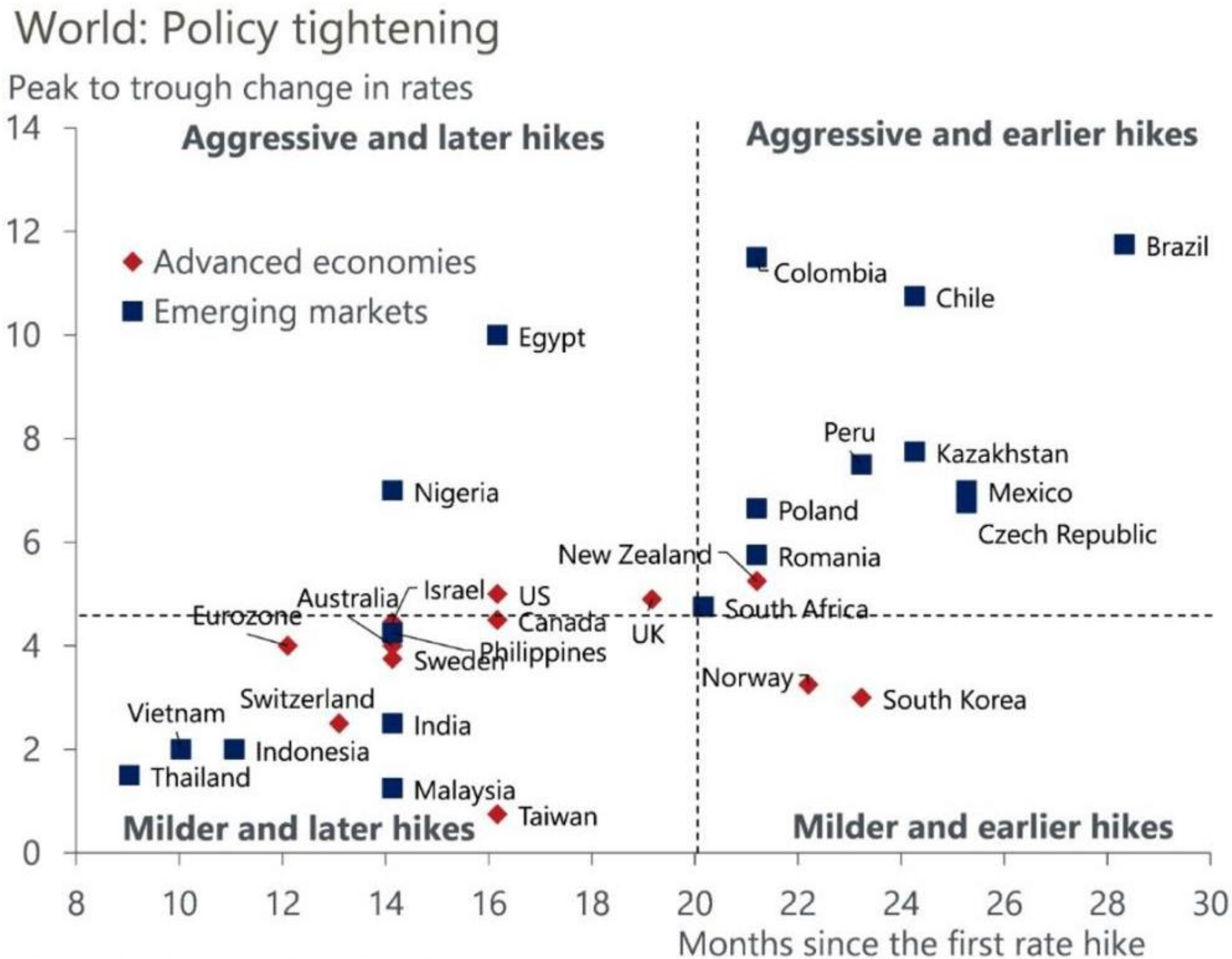
[2]Excluding energy, food, alcohol and tobacco

Source: FRED St. Louis; Eurostat; Trading Economics | Elaborated by Redwood

For the FED and the ECB, loosening their monetary policies does not deviate from assessing core inflation. There is no doubt that the direction of policy is now adjusted, and the signals sent by the authorities show that inflation has not been tamed. After miserably missing the timing of the monetary tightening, they will not faulter especially with two ongoing wars with the main economies involved, even if indirectly.

POLITICAL, ECONOMIC AND FINANCIAL SCENARIOS

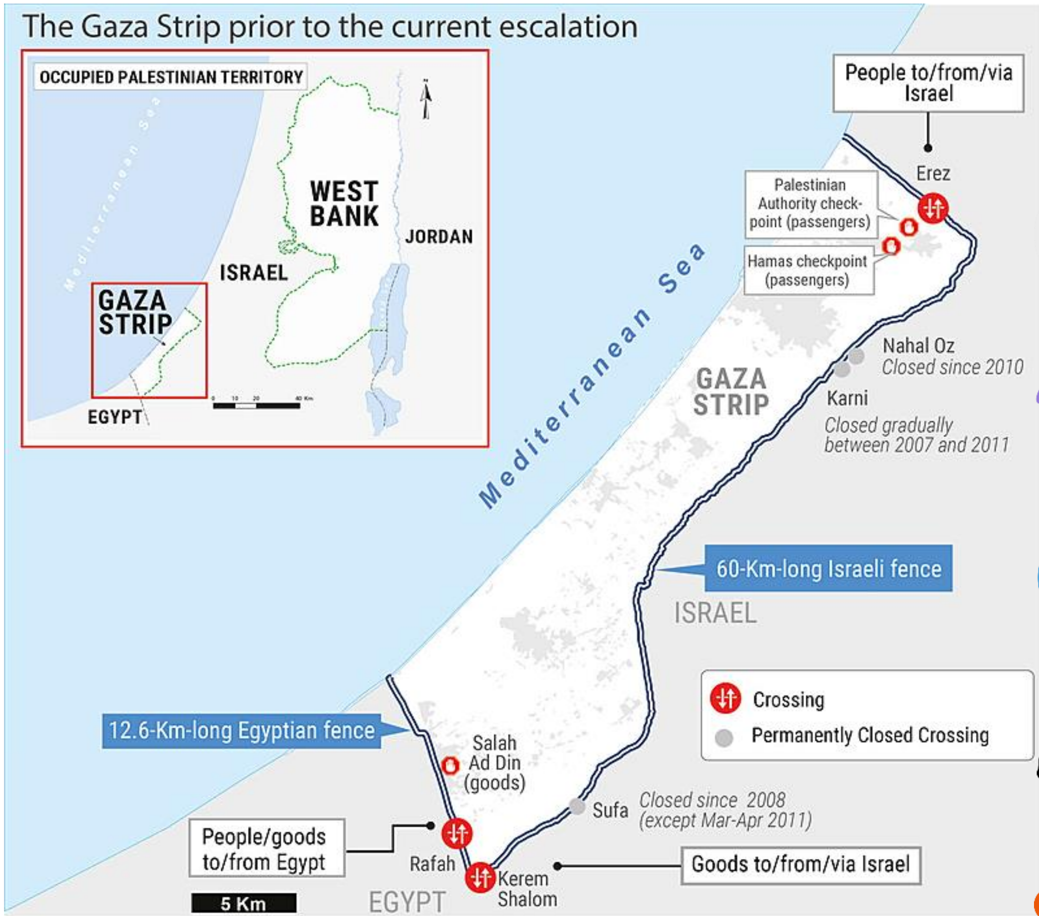
Overseas– Inflation: assessing reaction by Central Banks



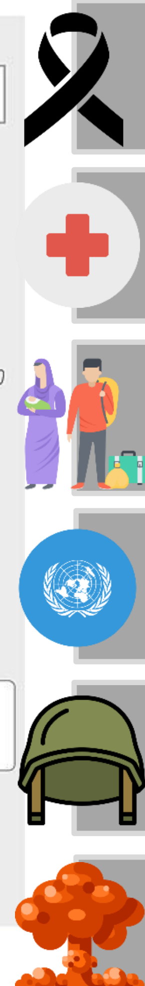
Source: Oxford Economics/Haver Analytics

POLITICAL, ECONOMIC AND FINANCIAL SCENARIOS

Overseas– A New War



Source: United Nations Office for the Coordination of Humanitarian Affairs



In the first ten days of the war, the death toll exceeded 4 thousand lives, with more than 10 thousand injured.

The humanitarian crisis grows larger every day. Thousands of people are missing amid the rubble in areas under missile attacks.

More than 1.1 million Palestinians left the north of the Gaza Strip towards the south due to the closure of borders with Israel and Egypt.

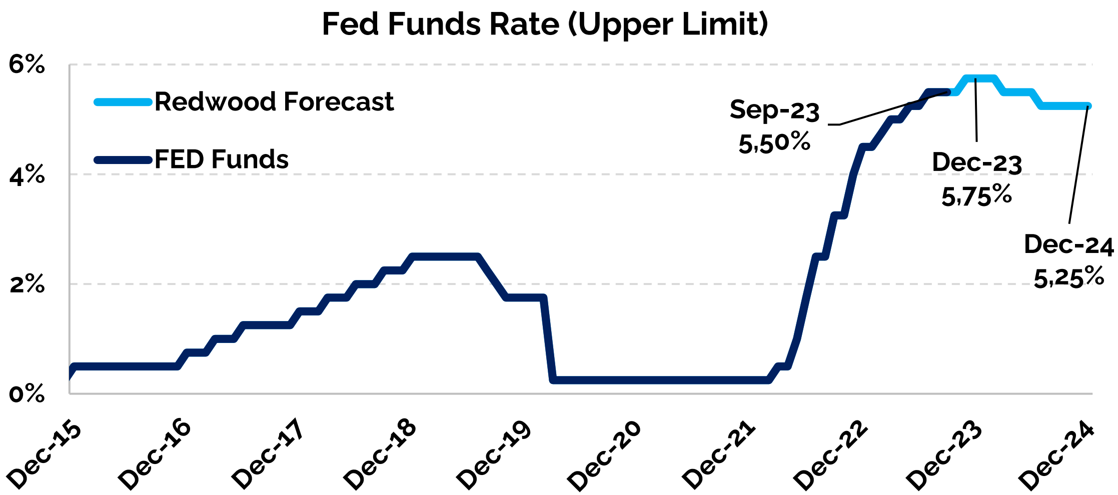
The UN Security Council meeting addressed the creation of a humanitarian corridor with Egypt, measures to resolve the conflict, among other topics, but ended with no consensus.

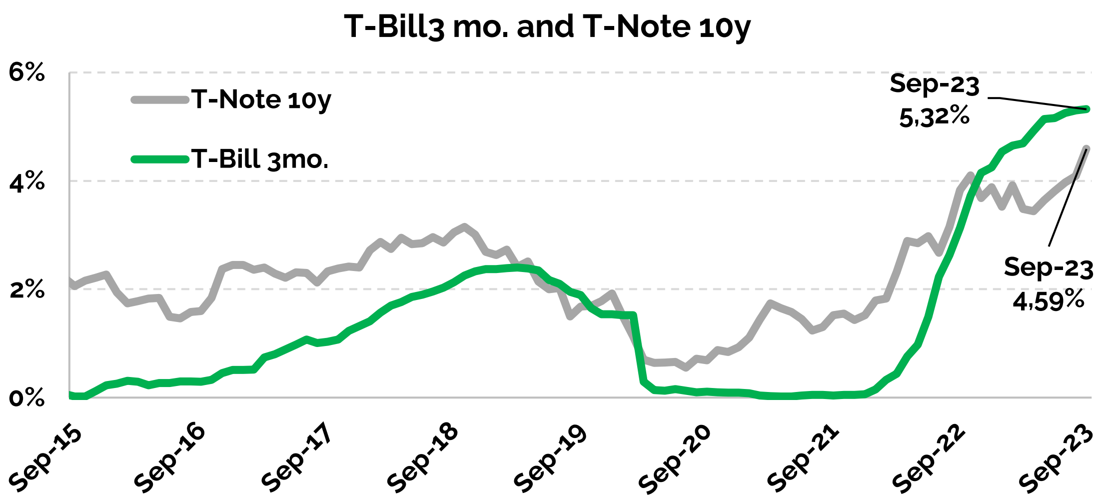
Israel prepares for ground attacks against Hamas with hundreds of soldiers.

The tension fueled by the conflict may increase with as other countries get involved (e.g. Iran, Lebanon) and terrorist groups such as Hezbollah.

POLITICAL, ECONOMIC AND FINANCIAL SCENARIOS

Overseas – FED Funds and Treasuries





Source: FRED | Elaborated by Redwood

FED:
No more mistakes!

Paul Volcker's "spirit" now present.

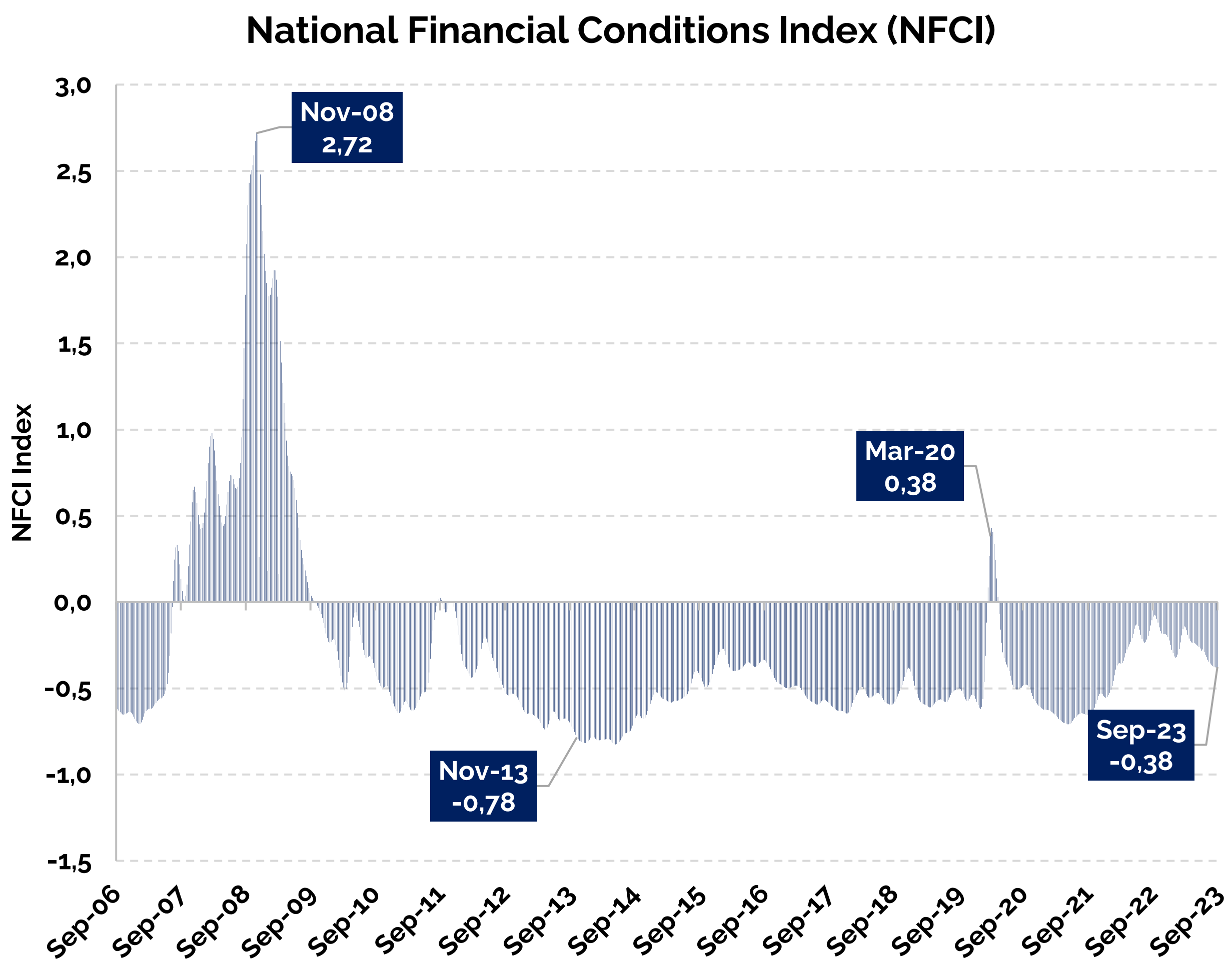
Summary ratified:

- **FED raises the rate – possibly up to 6%!**
- **Keeps it *higher for longer*;**
- **Reduces the number of rate cuts (market perspective to just 2 cuts – as per our forecast - in 2024)**

- **Short-term Treasuries well above longer maturities should signal a hard landing for the American economy, but other factors have mitigated this possibility;**
- **Despite the inversion of the curves and the time it has remained that way, returns at various maturities also stand out: at their highest since 2015;**

POLITICAL, ECONOMIC AND FINANCIAL SCENARIOS

Overseas – Financial Conditions Index USA



ICF – Positive values indicate “tighter” financial conditions, and negative values indicate “looser” ones.

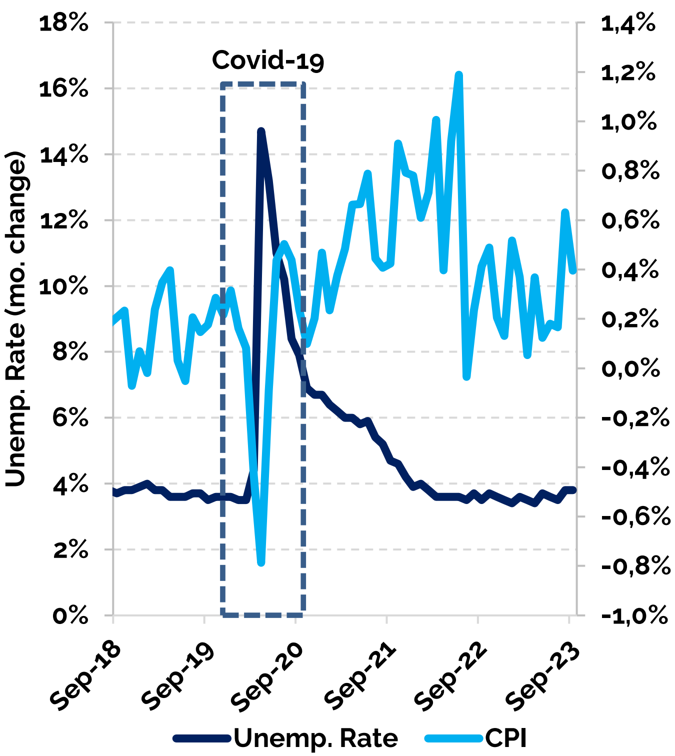
- Therefore, the chances of a strong recession in the American economy are low;
- However, as a reflection of the business cycle and impacting market expectations of economic performance, this “reality” can change quickly in a troubled world.

Source: FRED-St. Louis | Elaborated by Redwood

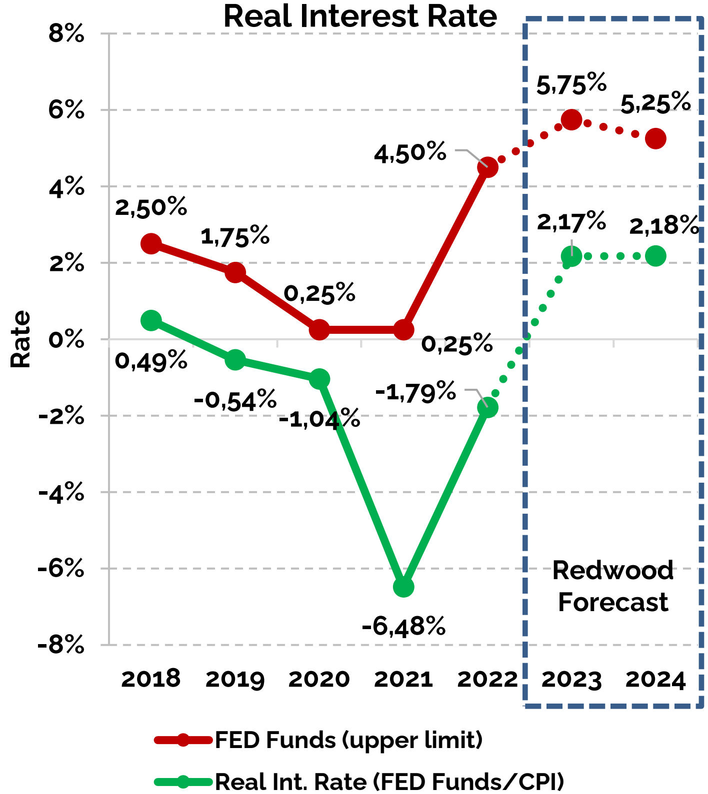
POLITICAL,
ECONOMIC AND FINANCIAL SCENARIOS

Overseas – FED Funds, Inflation and Unemployment

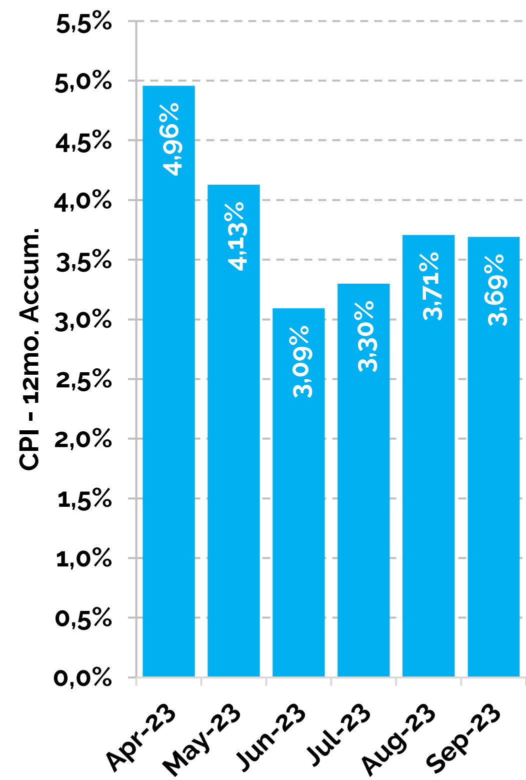
US -Unemployment Rate and CPI



US - FED Funds and Real Interest Rate



US CPI -12 mo. Accum

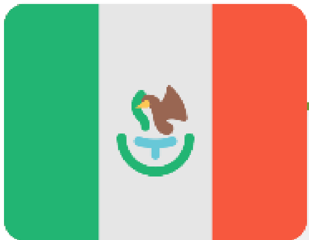


- Challenge to economists: do the charts above make any sense? Full employment, high interest rates and cooling inflation;
- The costs of FED missing the timing: higher interest rates for longer... not to mention the likely new (and difficult) scenario

Source: FRED | Elaborated by Redwood

POLITICAL, ECONOMIC AND FINANCIAL SCENARIOS

Overseas – Emerging Markets



MEXICO:
- Unemp. Rate[1]: 2023 = 2.88% | 2024 = 3.01%;
- Inflation[1]: 2023 = 4.50% | 2024 = 3.19%
- Interest Rate[2]: 2023 = 10.15% | 2024 = 9.53%
- GDP[1]: 2023 = 3.17% | 2024 = 2.14%

SOUTH KOREA:
- Unemp. Rate[1]: 2023 = 2.67% | 2024 = 3.20%;
- Inflation[1]: 2023 = 2.89% | 2024 = 2.00%
- Interest Rate[2]: 2023 = 3.75% | 2024 = 3.51%
- GDP[1]: 2023 = 1.44% | 2024 = 2.21%

INDIA:
- Unemp. Rate[4]: 2023 = 7.90% | 2024 = 7.50%;
- Inflation[1]: 2023 = 4.92% | 2024 = 4.43%
- Interest Rate[2]: 2023 = 7.00% | 2024 = 6.70%
- GDP[3]: 2023 = 6.50% | 2024 = 6.30%

SOUTH AFRICA:
- Unemp. Rate[1]: 2023 = 32.8% | 2024 = 32.7%;
- Inflation[1]: 2023 = 5.20% | 2024 = 4.50%
- Interest Rate[2]: 2023 = 11.17% | 2024 = 10.77%
- GDP[1]: 2023 = 0.92% | 2024 = 1.81%

Projections: [1]IMF; [2]OECD; [3]Redwood; [4]Trading Economics

POLITICAL, ECONOMIC AND FINANCIAL SCENARIOS

Exterior - Latam

Country	P/E	EV/Ebitda	Risk EMBI[1]	Exchange Rate	Interest Rate % p.a.	OBS
Argentina	*15,77*	*2,65*	*2.486*	*350,05*	*118,00*	*Minimun rate repurchase (CB) after 7 days*
Chile	*5,94*	8,53	132	890,50	9,50	Overnight rate
Colombia	*4,37*	4,79	329	4.058,84	13,25	Overnight rate
Mexico	*11,45*	5,67	368	17,40	11,28	Overnight rate
Peru	*6,61*	N/D	169	3,80	7,50	CB's reference rate
Brazil	6,88	5,43	201	5,01	12,75	Selic rate

Source: Bloomberg; Central Bank of Brasil | Elaborated by Redwood | Date: 29th, Sep. 2023
[1]Various sites: Argentina – Ámbito; Chile – Central Bank of Chile; Colombia and Mexico – Invenómica; Peru – Central Bank of Peru; Brazil - IPEA

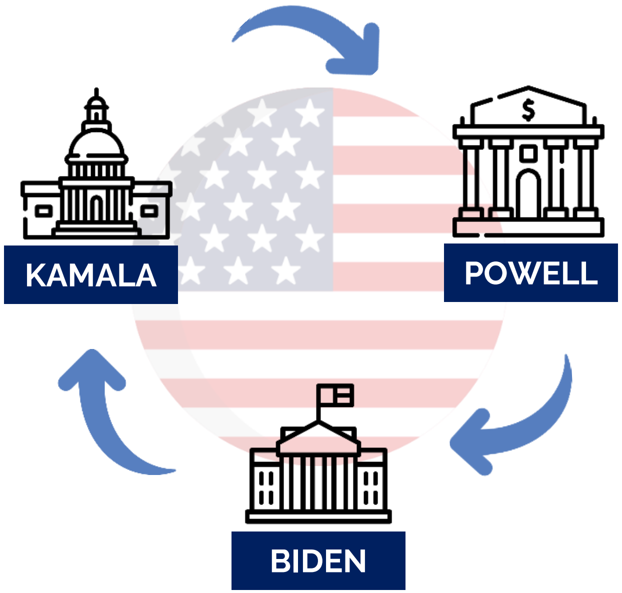
Region's Economics and Politics

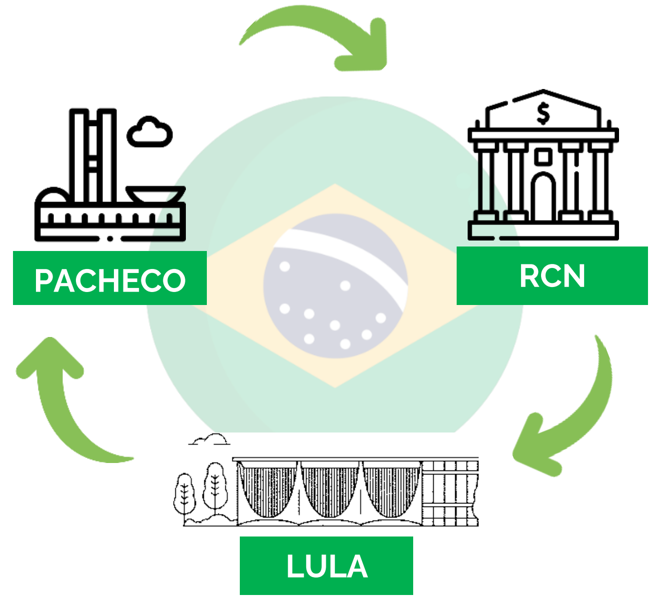
- **Argentina: broken and on the eve of an election that could define a generation;**
- **Chile on the 50th anniversary of the coup that overthrew President Salvador Allende: a divided, tense and polarized country;**
- **Colombia: the Government and ELN guerrilla group resume - but do not advance in - peace negotiations as expected. Highlight: The *Bahia model* for implementing public policies will be a model for Rural Development actions in the country;**
- **Mexico: without any control over immigration wave heading to US, the relationship between the two countries tends to deteriorate;**
- **Peru: After the dismissal of Pedro Castilho, they are now asking for Dina Boluarte's head... Constant protests and demonstrations;**

Brazil: in this environment, we could "sit back and enjoy the ride"... the largest economy, natural regional leader and protagonist, with dominance and wide exposure to the world with countless advantages, but...

POLITICAL, ECONOMIC AND FINANCIAL SCENARIOS

Institutions: each one in its rightful place





DATA/PROJECTIONS US 2023
Target: 2%
Interest Rate: 5.75%
GDP: 2.3%
Unemployment Rate: 3.5%
Inflation: 3.5%

Is it all the same or does it boil down to ideological bias?

Criticisms deployed from an ideological standpoint are always the same; they undermine technical assessment and distort outcomes.

CONCLUSION: we should strive for a country supported by autonomous and independent, strong and impartial institutions with strict focus on its goals.

DATA/PROJECTIONS Brazil 2023
Target: 3.25%
Interest Rate: 11.75%
GDP: 2.5%
Unemployment Rate: 8.53%
Inflation: 4.91%

POLITICAL, ECONOMIC AND FINANCIAL SCENARIO

BRAZIL

POLITICAL, ECONOMIC AND FINANCIAL SCENARIOS

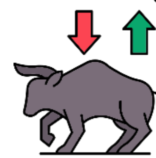
Political Aspects – Q4/23: it's time to govern

- ✓ President Lula: The distaste for governing "without power" is clear
  - Trips abroad: a mix of escape and diplomatic megalomania
  - BACEN: a "refreshment" for RCN and a softening of criticism... Galípolo effect?
  - Political articulation = The first year is honeymoon... and even then the "safe" had to be opened...

- ✓ Executive
  - Ministries: no one dares to say all the names...
  - Haddad: betting everything to increase revenue... GDP must grow, but it doesn't...
  - Reforms: overshadowed by ideology, overwhelmed by the urgency of results sooner than ever!
  - Change of Guard and 2nd echelon: Sun "Lula" Tzu knows the timing

- ✓ National Congress: Parlamentarism is here!
- ✓ STF: a "back-off" to National Congress came in good time

- ❖ *Brazil in highlights – Summary:*
  - Bolsonaro ineligible and indicted: a hunt down to prison
    - Incumbents wish Bolsonaro out of combat for the 2024 elections
    - The Right is slowly regrouping around the world... and here? Does Bolsonaro help in breeding a new leader?



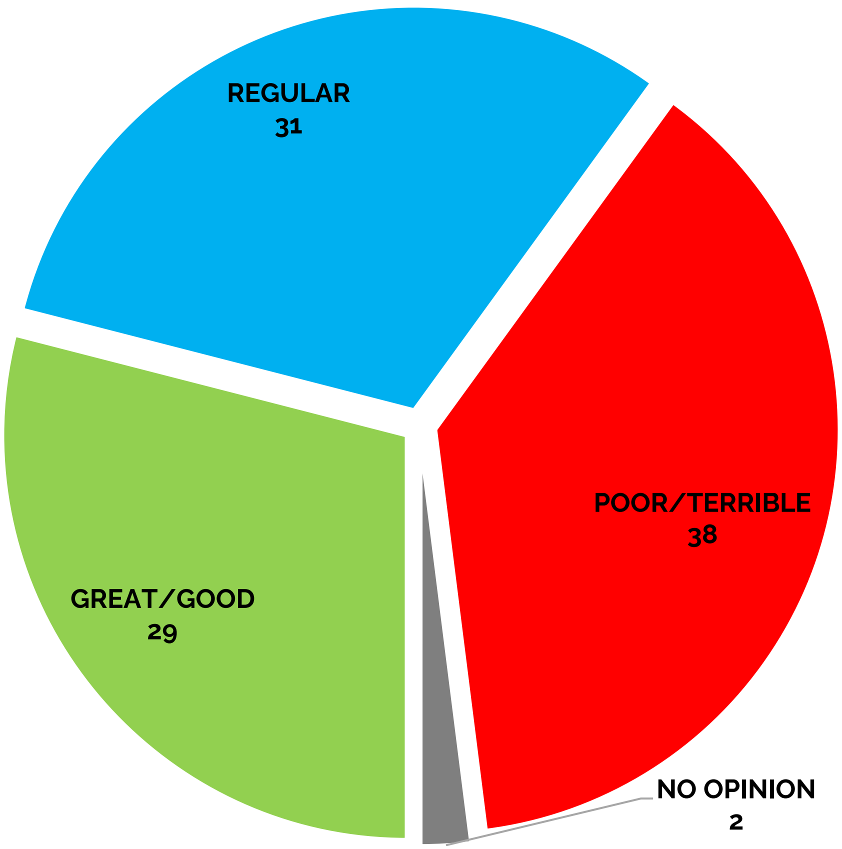
  - Financial market slips and so does the economy... is 2023 another chicken flight?
    - The real economy depends on low interest rates and a minimum of predictability
    - Ideology and political attacks of all sorts do impact markets
    - The axis of development and momentum of the economy (current administration) always comes via State induction: BNDES, CAIXA, BB and all others under government reach will be deployed in 2024

  - BACEN and new Directors: PT's "best" is yet to come
  - External scenario: very difficult, but at the same time a sound opportunity for us.

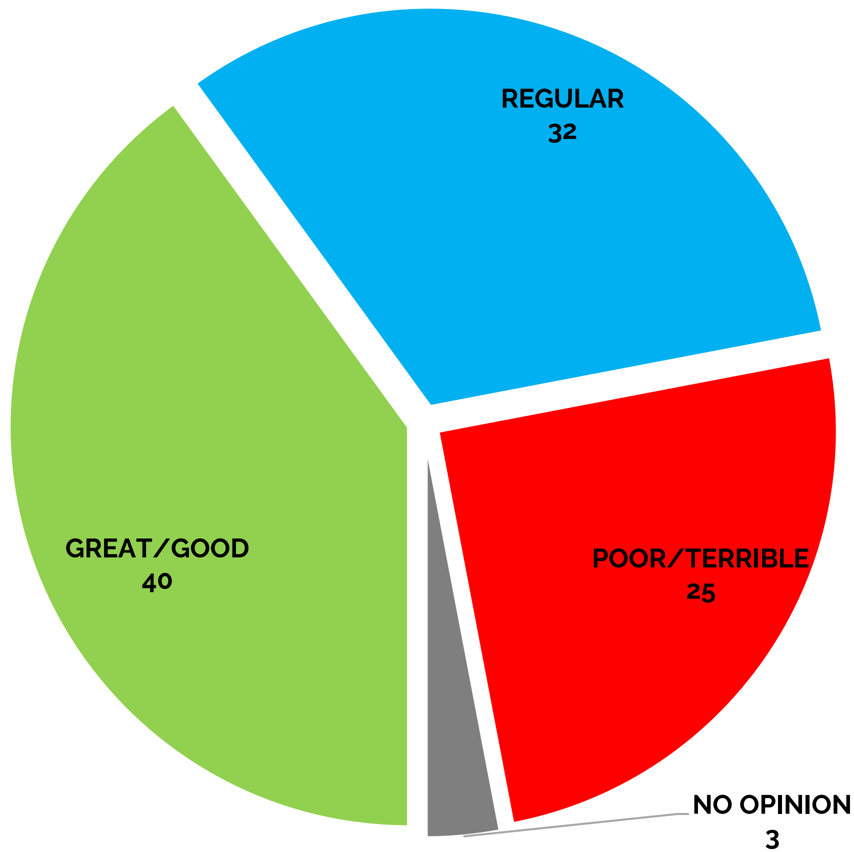
POLITICAL, ECONOMIC AND FINANCIAL SCENARIOS

Political Aspects – A Picture worth a thousand words

1st Year Assessment – Bolsonaro Adm
Ibope Survey: 12 Aug 2019



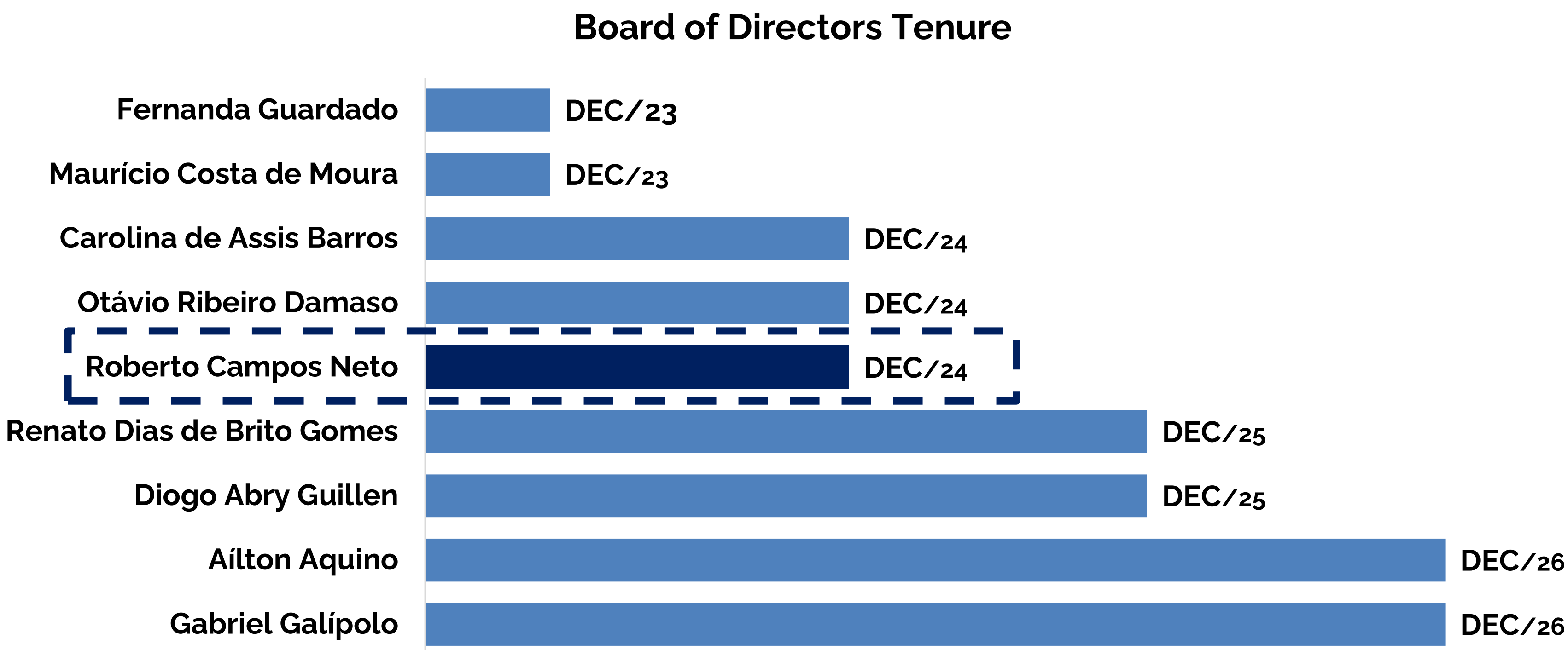
9-month Assessment – Lula Adm
IPEC Research: 09 June 2023



Source: IBOPE and IPEC Poll | Elaborated by Redwood

POLITICAL, ECONOMIC AND FINANCIAL SCENARIOS

Political Aspects – Slow and objective change in the Central Bank



Galípolo – First Steps/Declarations (Source: CNN – J. Safra Event)

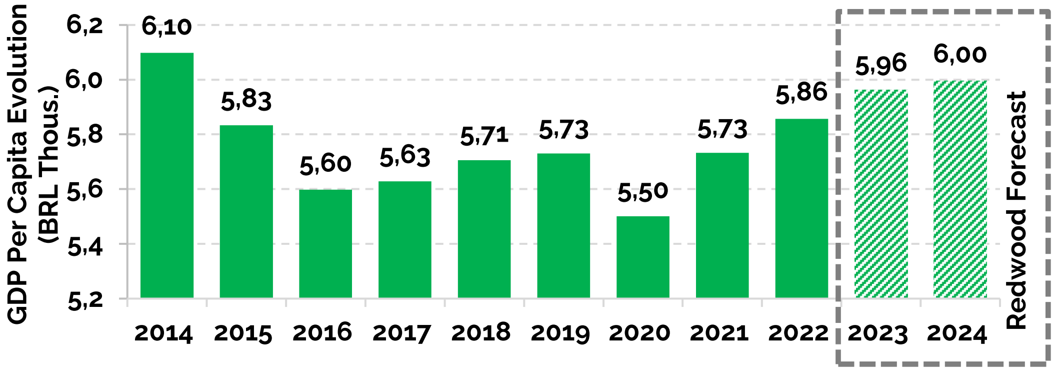
- **"The role of the BACEN director is almost always to make an institutional speech".**
- **He says he learned "that statements from BACEN directors must be, like water: tasteless, odorless and colorless so as not to generate disturbances in the market".**

We state once more: *The changes underway at the Central Bank of Brazil could completely change the way we see and understand the rationale behind its monetary and exchange rate policies.* Let's see the reaction when the first stress hits us.

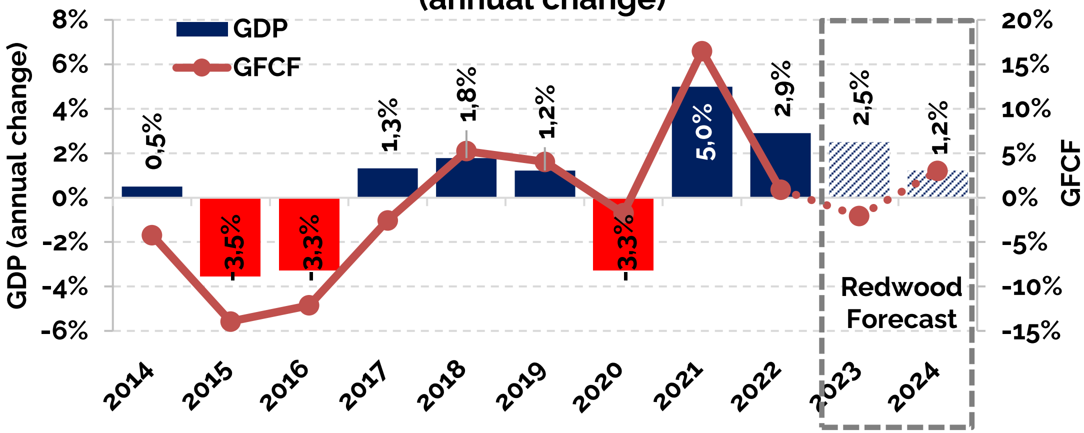
POLITICAL, ECONOMIC AND FINANCIAL SCENARIOS

GDP Brazil

GDP Per Capita Evolution (Chain-linked GDP Prices 1995 / IBGE Population)



GDP and GFCF Evolution (annual change)



Source: IBGE; Redwood Forecast – 2023/2024 | Elaborated by Redwood

<u>A Mona Lisa grin has turned into the Joker's grin to the economy</u>

Growth projections for 2023 surprise everyone... and what lies behind this effect? Growth without inflation (high interest rates), unemployment at 8.5%... could Potential GDP off-mark? The natural rate of interest is not the one we use, NAIRU wrong? Or is it all together and mixed? If so, why is there a convergence in projections for next year from the most important players in the market? Will we all make mistakes again, or do we have a specific, forceful, provisional effect and everything else will get back on track and models will work again and make proper forecasts?

Intellectual honesty requires us to review and advance the criteria we adopt. Furthermore, accepting the facts and (re)confirming hypotheses, challenging consolidated premises and dogmas.

POLITICAL, ECONOMIC AND FINANCIAL SCENARIOS

GDP Brazil - Stronger (2023) and feeble (2024) growth and other indicators in recovery

GDP

2022	2023*	2024*
2,91%	2,50%	1,20%

Inflation (IPCA)

2022	2023*	2024*
5,79%	4,91%	3,81%

Unemployment

2022 Avg. | Mg.	2023* Avg. | Mg.	2024* Avg. | Mg.
9,5% | 7,9%	8,5% | 9,9%	8,4% | 8,1%

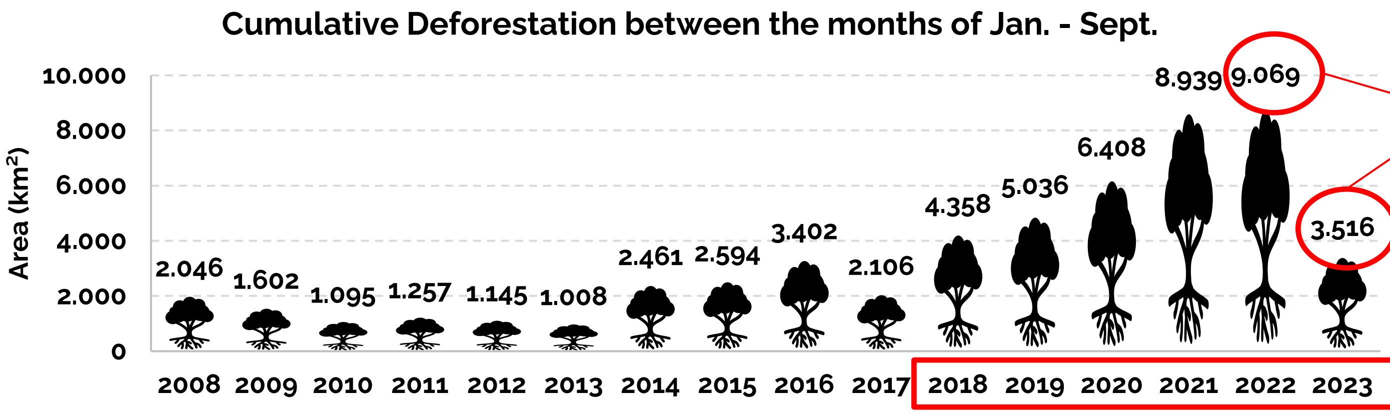
Avg. Real and Nominal Income[1]

2022 Nom. | Real	2023* Nom. | Real	2024* Nom. | Real
4,0% | 8,2%	0,6% | 1,5%	-0,03% | 1,0%

Source: IBGE; *Redwood Forecast | Elaborated by Redwood
[1] Real and Nominal Values subject to timely change

POLITICAL, ECONOMIC AND FINANCIAL SCENARIOS

Deforestation and Fires in Amazon "is going well, but it's bad"



Deforestation in the Amazon is almost 3 times lower than the same period last year.

Lowest destruction within the Jan-Sep period in the last 5 years

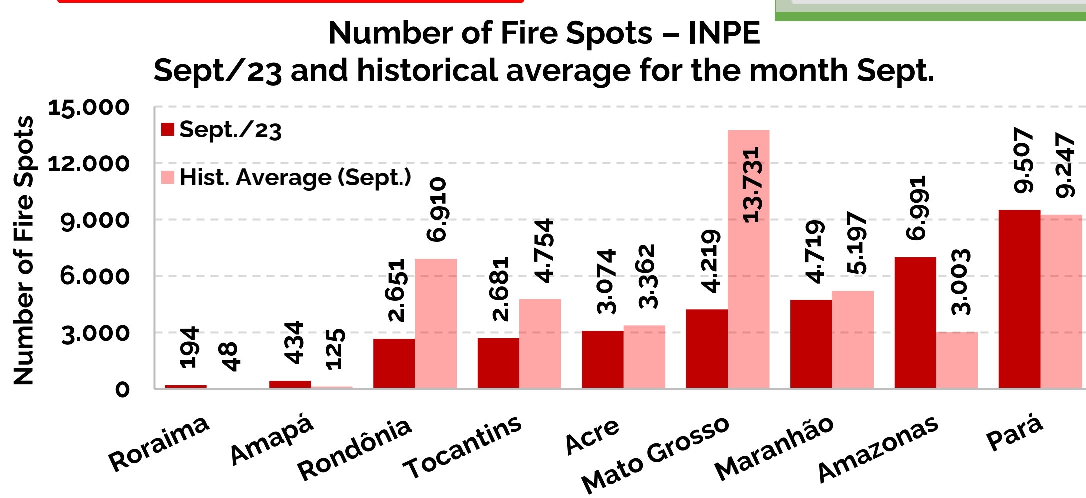
However...

The forest area devastated in the first three quarters of 2023 added up to **1,300 soccer fields** per day.

Deforestation by state, month by month in 2023, in km²:

State	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	Accum.	% of total
Pará	23	63	91	81	70	99	129	187	257	1.000	29%
Amazonas	21	55	104	92	100	103	145	143	73	836	24%
Mato Grosso	85	157	86	72	111	69	75	52	77	784	22%
Acre	3	7	3	5	7	19	89	108	57	298	9%
Rondônia	18	21	22	52	33	39	40	44	27	296	8%
Roraima	41	19	28	19	3	2	2	11	19	144	4%
Maranhão	5	2	9	13	13	30	18	21	20	131	4%
Tocantins	1	1	1	2	2	0	1	1	5	14	0%
Amapá	1	0	0	0	0	0	0	1	11	13	0%
Amazônia	*198*	*325*	*344*	*336*	*339*	*361*	*499*	*568*	*546*	*3.516*	*100%*

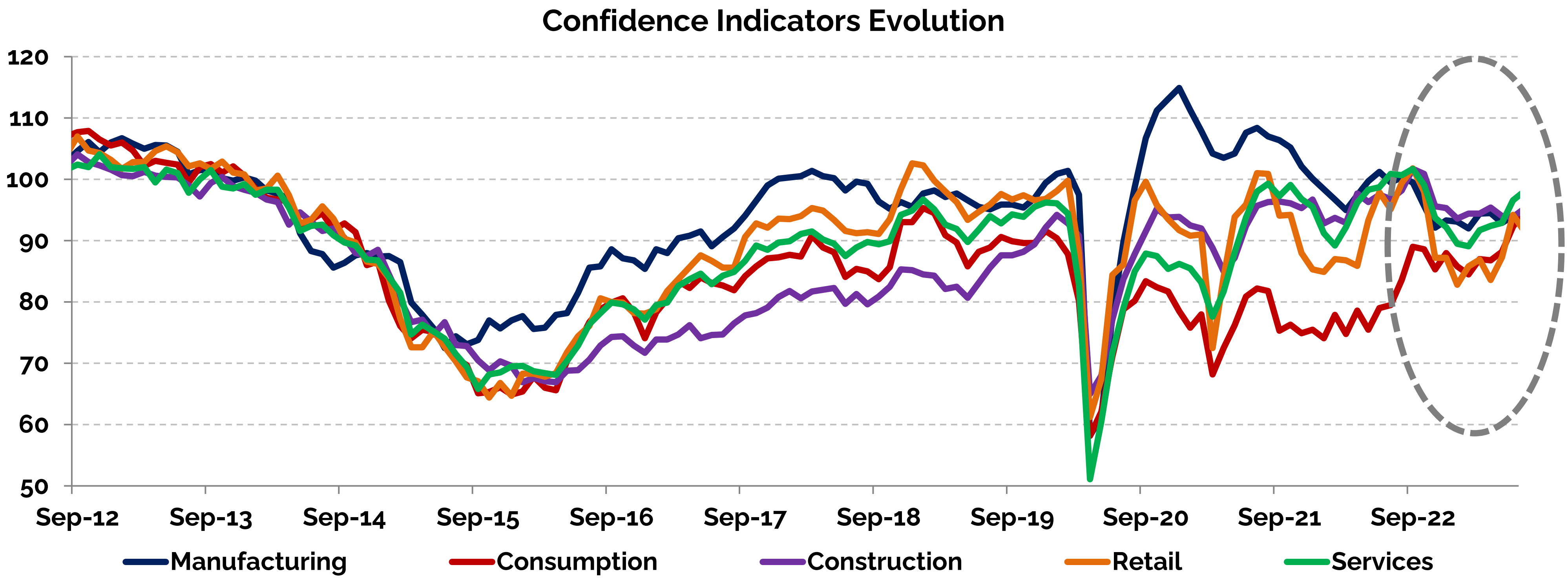
Pará, Amazonas and Mato Grosso were the 3 states with the most deforested areas in 2023



Source: Imazon; INPE | Elaborated by Redwood

POLITICAL, ECONOMIC AND FINANCIAL SCENARIOS

Confidence Index

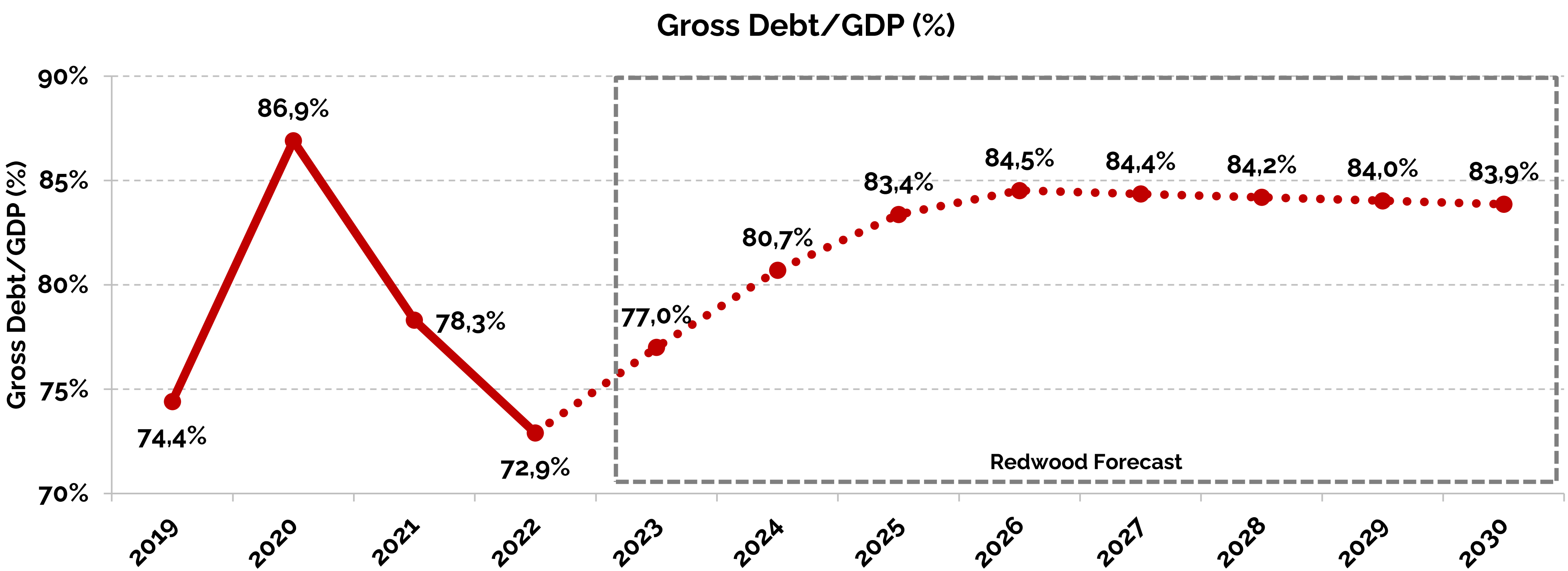


Source: FGV | Elaborated by Redwood

Confidence indicators fare slightly better, especially for Consumer, Commerce and Services, but overall are still very poor. The economic prospects, rising household debt, high interest rates and a lot of uncertainty do not help. This lack of confidence affects companies and families that hold back investments in productive projects, job openings, etc., and curb the consumption of goods and services, respectively. It is an indicator that signals opinions and expectations, which results in rational decision-making. It is about the optimism or pessimism of the current and future economy. Quite powerful!

POLITICAL, ECONOMIC AND FINANCIAL SCENARIOS

Fiscal – Economic policy must recognize its importance



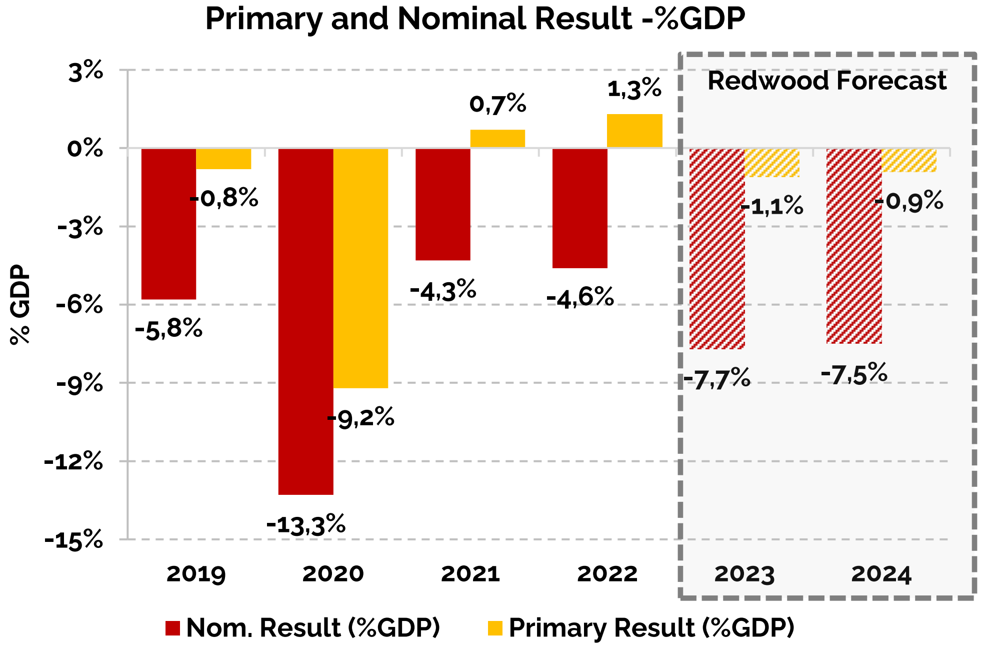
Source: STN; Redwood Forecast | Elaborated by Redwood

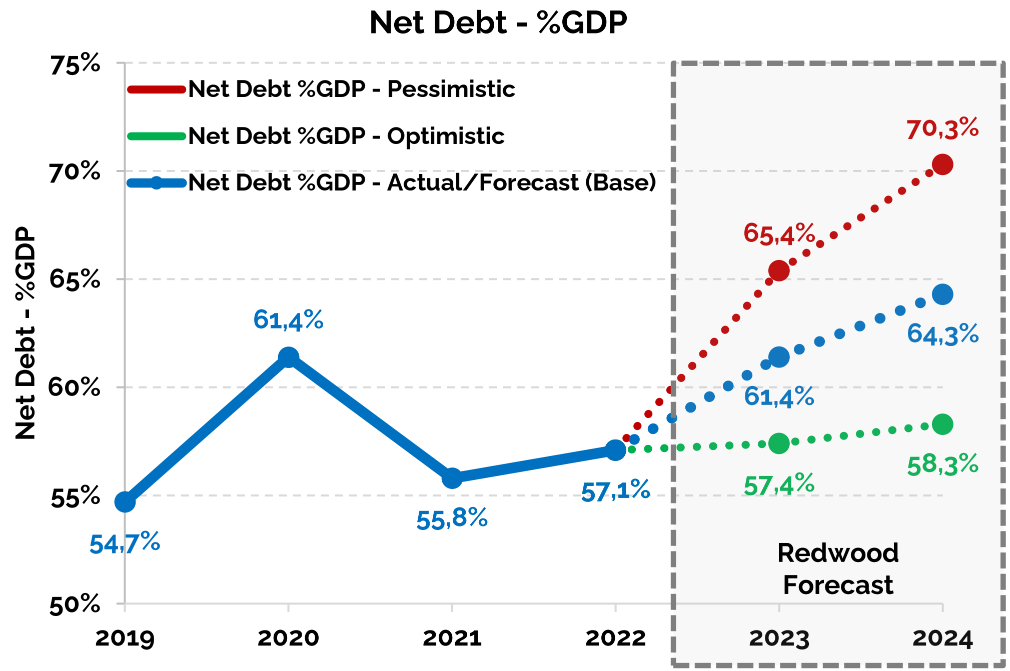
Absolute priority should be given to debt stabilization

- **Debt stability is not attainable in the short-run, perhaps later on;**
- **Current economic team defends GDP growth must drive spending;**
- **Useless dichotomy: economic x social balance;**
- **Spending Cap x Spending Floor.**

POLITICAL, ECONOMIC AND FINANCIAL SCENARIOS

Fiscal – Has fiscal consolidation faded into the background?





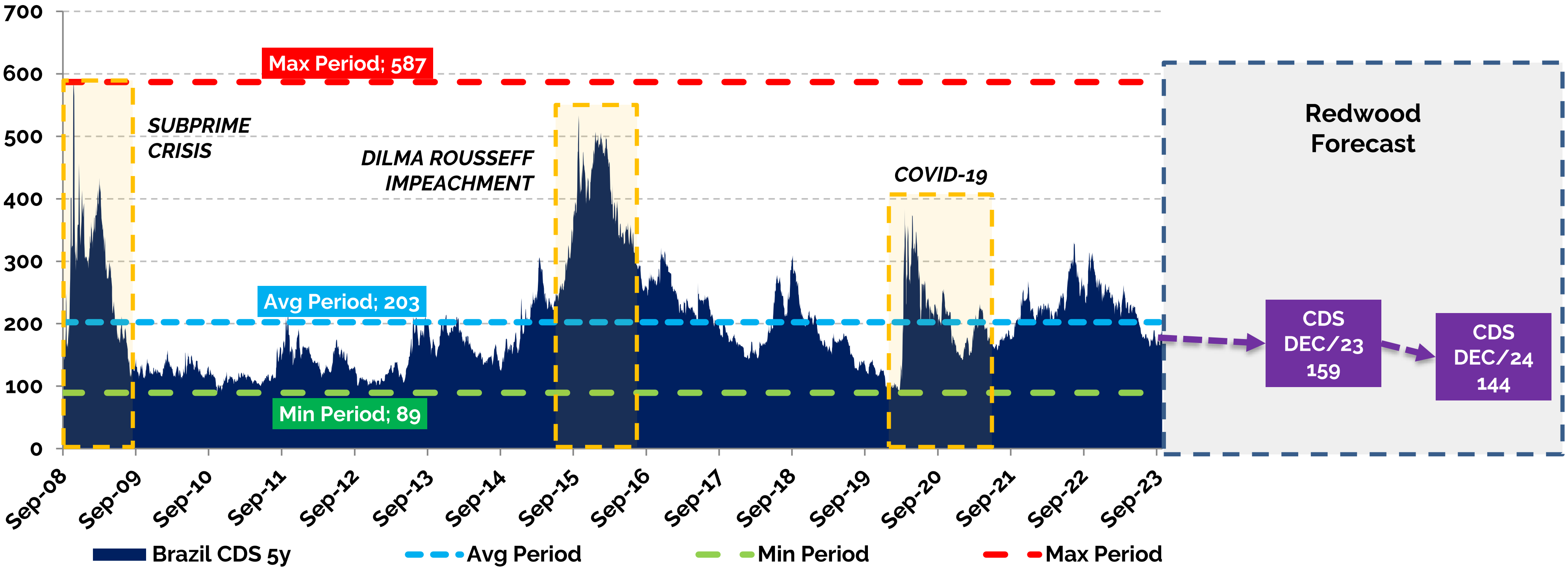
Source: STN; Redwood Forecast | Elaborated by Redwood

Not even the trees believe in a zero deficit in 2024:

- **In the worst case scenario, according to Minister Tebet, we would have a 0.25% deficit-to-GDP - or in the range of BRL25 billion to BRL30 billion: implausible;**
- **With the New Fiscal Framework approved, we need to recoup revenues and find other sources to support projected expenditure;**
- **The Executive wrestles with Congress to pass bills that could increase revenues going forward;**
- **Objectively, the deficits for 2023 and 2024 will be near 1% of GDP... and at this level, for this administration, this is great news!**

POLITICAL, ECONOMIC AND FINANCIAL SCENARIOS

Credit Default Swap (CDS) – 5 years



Source: Bloomberg | Elaborated by Redwood

Better risk, but no Investment Grade on the horizon yet:

- **Overall pessimism decreased, the prospective increase in credit rating by S&P and FITCH was positive, but no more than that;**
- **Political obstacles and conflicts may have their consequences after the administration's first-year honeymoon;**
- **Country risk relative to its peers appears to be adjusting, but the more challenging external scenario may affect the indicator;**

POLITICAL, ECONOMIC AND FINANCIAL SCENARIOS

Tax Reform (Consumption), Administrative and Political Reforms

I. TAX

- Neutrality and Equity
- Dual VAT
- Transition (Cons. 8 years/ Fed. entities 50 years)
- Special Regimes
- FNDR and FCBF (Fiscal benefits)

UPDATES

- PEC aproved in July following analysis by CCJ moves on to Senate and, in turn, returns to the House.

II. ADMINISTRATIVE

- Constitutional amendment to all the Federation's levels of government and branches of the Exec., Legislative and Judic.
- Higher productivity rates
- Better quality of services provided
- Extinction of political nominations/Meritocracy

UPDATES

- Ministry of Management is working on a new proposal. Manifesto issued by 16 Parliamentary Fronts

III. POLITICAL

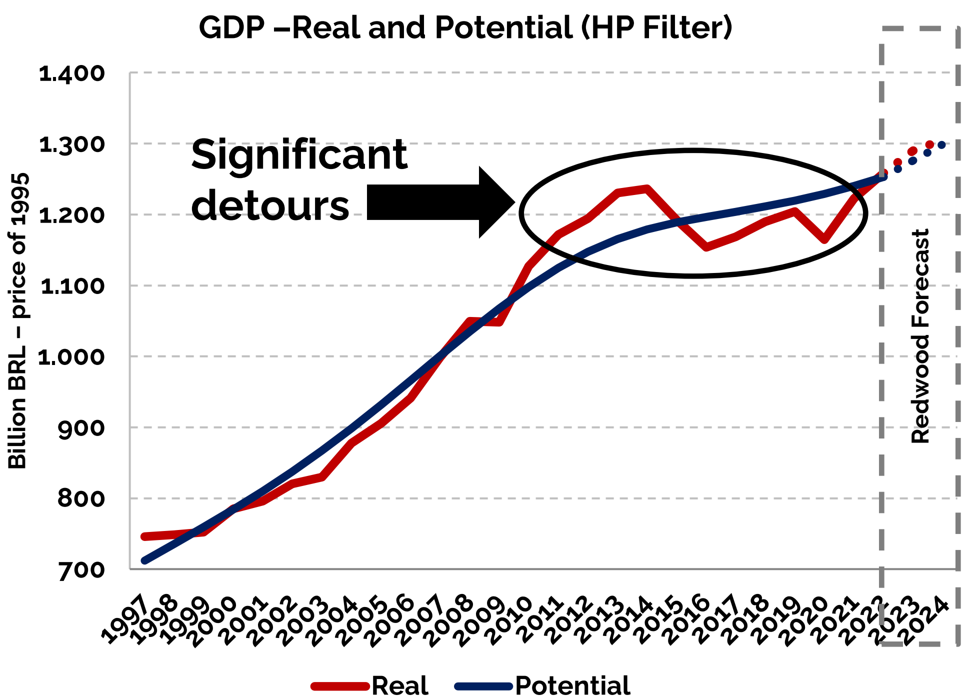
- Electoral Calendar
  - Registry/Candidacies' qualifying
  - Electoral conventions
- Accountability of campaign accounts
- Campaign Financing/Ineligibility

UPDATES

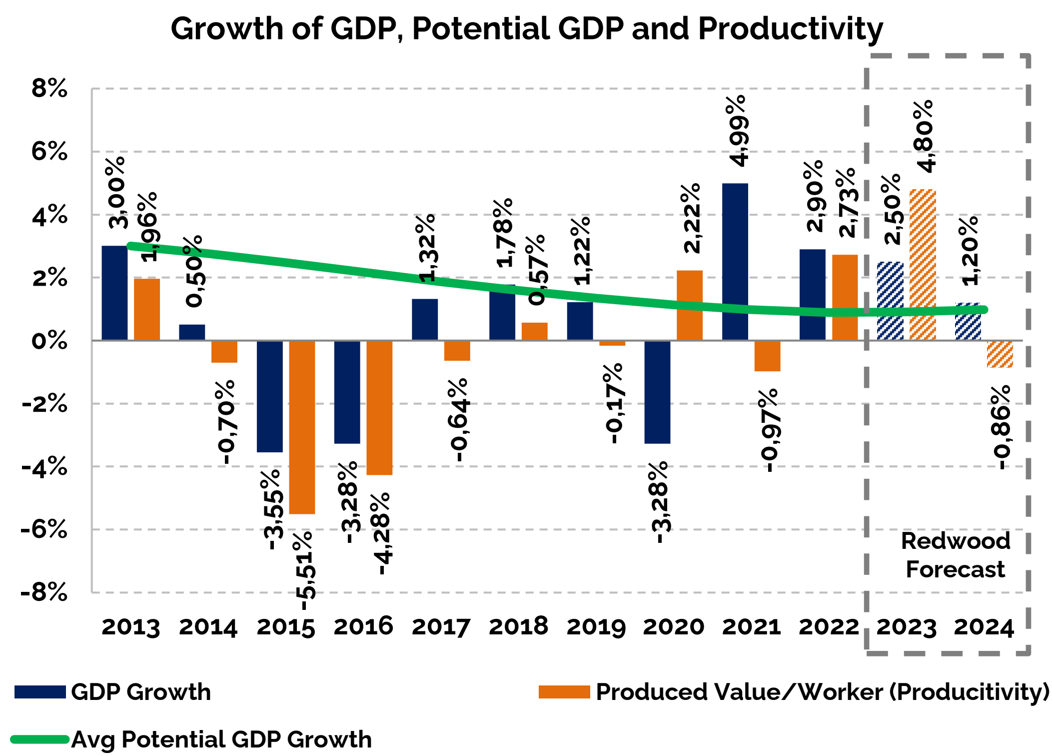
- SENATE (PL 4438/23) (awaiting analysis)

POLITICAL, ECONOMIC AND FINANCIAL SCENARIOS

Economic Activity and Productivity



Source: IBGE | Elaborated by Redwood

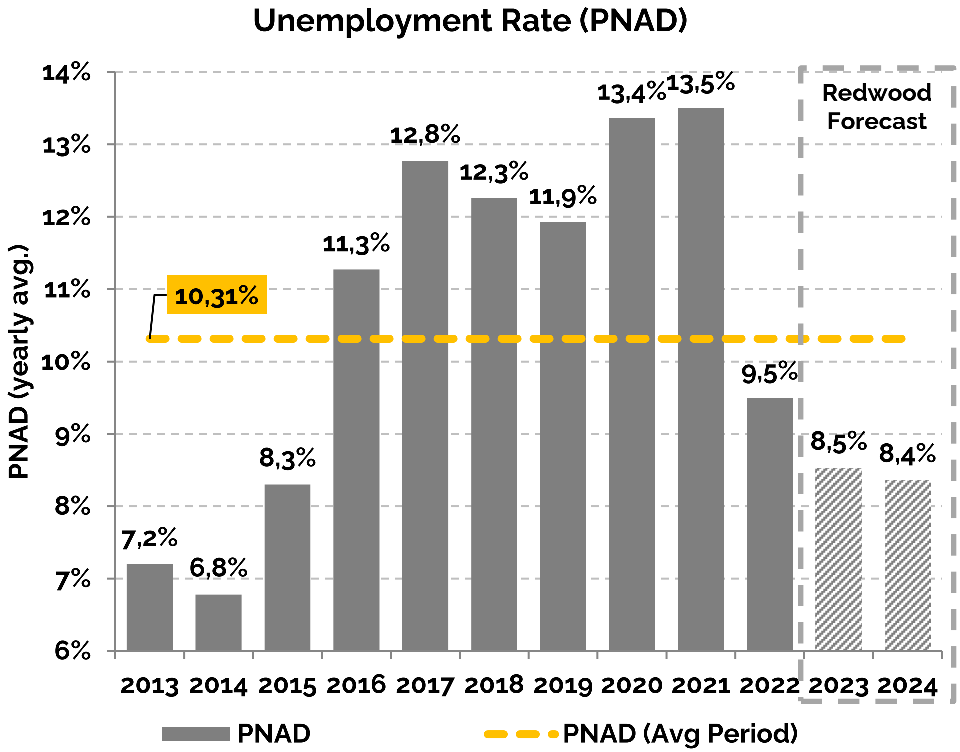


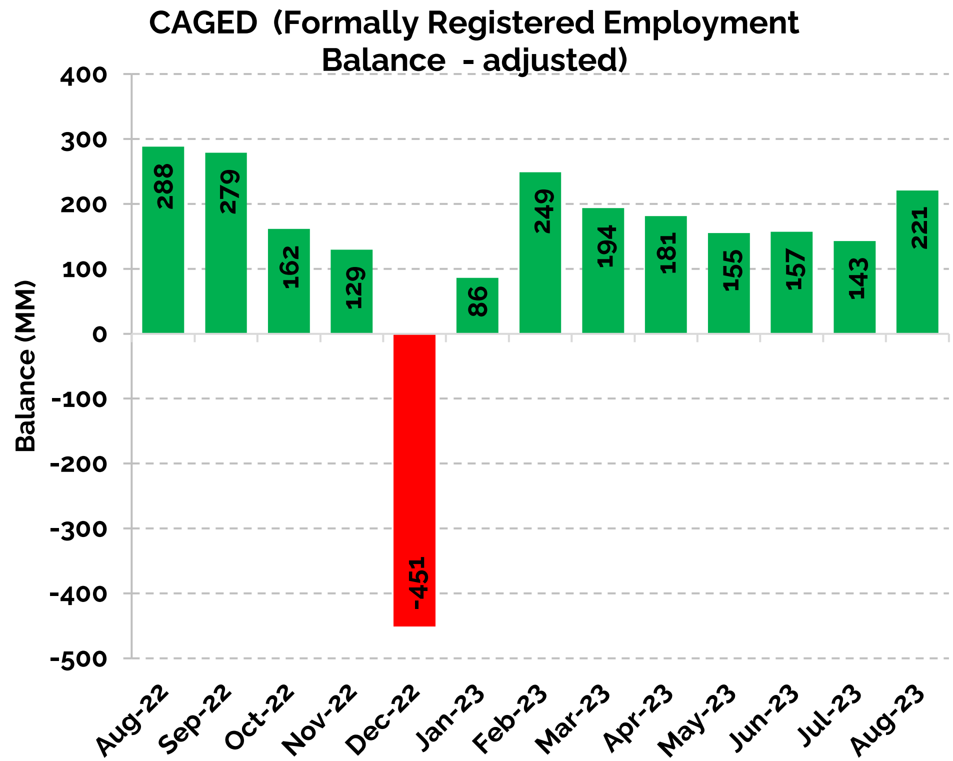
Consecutive crises and a deteriorated environment tend to adversely impact GDP growth (chained value series), with impacts on employment and value added/labour force.

- Significant drop in the series using HP Filter: Trend and cyclicality impact projections;
- Adjusted Potential GDP (Short Term brings asymmetry to "true" Output Gap) by 10-year moving averages;
- Productivity under statistical effects does not "hide" the lack of investment in education, the advancement of the informal economy and low competitiveness... as The Economist magazine (for Latin America) would say: "A land of useless workers".

POLITICAL, ECONOMIC AND FINANCIAL SCENARIOS

Labor market from different - but complementary - perspectives





Source: PNAD; IBGE | Elaborated by Redwood

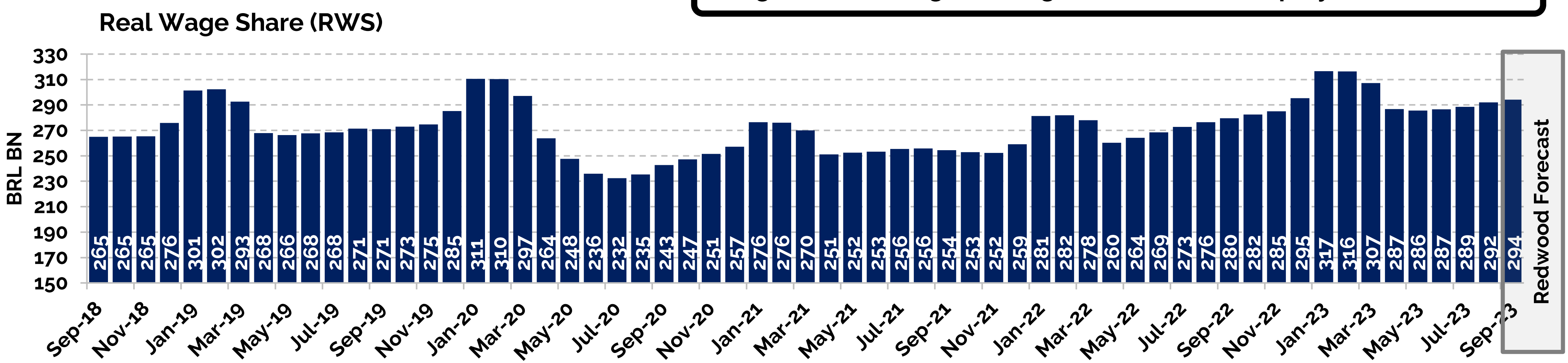
Unemployment rate:
The Brazilian economy has quite a resilient rate of unemployment. Even with a solid services sector (PMS in August already signals a loss of traction in activity), there is a probable accommodation by the labor market. High interest rates and lower GDP do compromise plans... thus the federal government takes action!

New CAGED:
- **Past 12-month downtrend reversed?**
- **The correlation with GDP is positive. Hence the projected slowdown in GDP – end of 2023 and 2024 – seasonality;**
- **Slowdown in the pace of job creation, but still enough to sustain (and even reduce) the unemployment rate.**

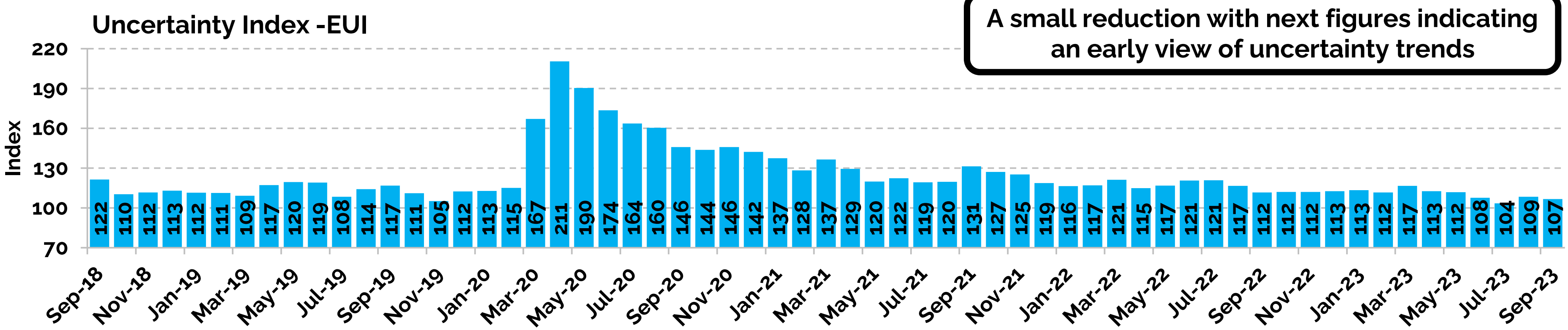
POLITICAL, ECONOMIC AND FINANCIAL SCENARIOS

Real Wage Bill (RWB) x Economic Uncertainty Index (EUI)

Wage bill = (Average earnings of workers) x (Employed labour force)



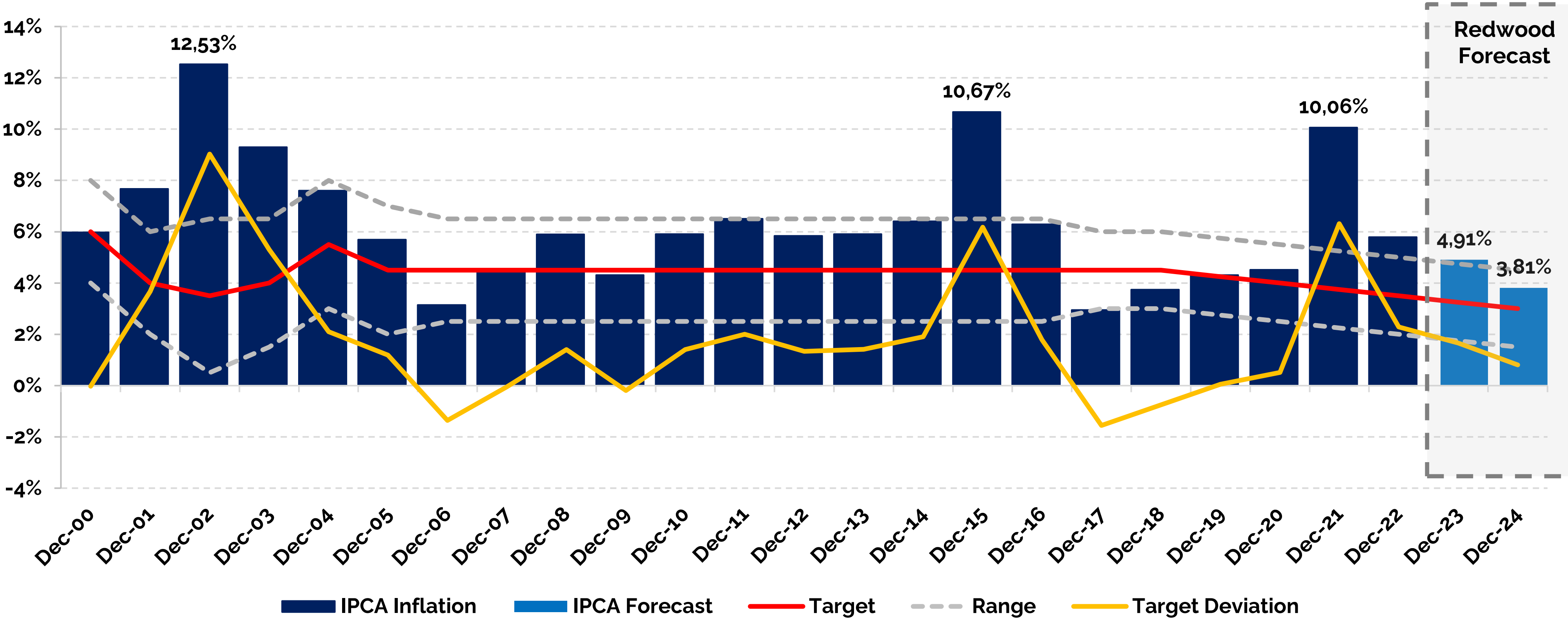
A small reduction with next figures indicating an early view of uncertainty trends



Source: IBGE; FGV | Elaborated by Redwood - Redwood Forecast RWS Sept./2023 – Average last QTR.

POLITICAL, ECONOMIC AND FINANCIAL SCENARIOS

Evolution of Headline IPCA, Inflation Targets and Deviation from Target

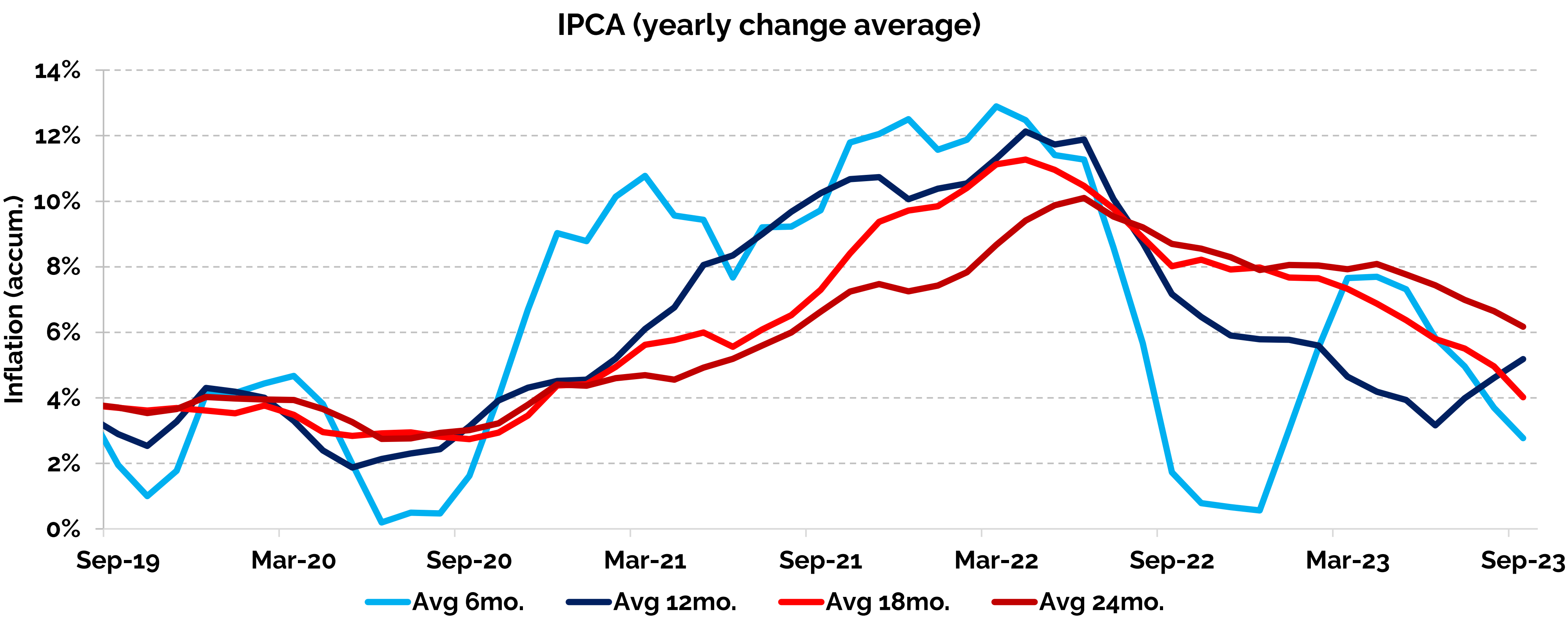


- Inflation falls at an “appropriate” pace;
- New director Galípolo’s “serenity” did not affect the normal course of BACEN discussions/decisions;
- The “refreshment” in the government’s political attacks on BACEN improved the landscape;
- A likely supply shock (oil) completely changes this scenario.

Source: IBGE; BACEN | Elaborated by Redwood

POLITICAL, ECONOMIC AND FINANCIAL SCENARIOS

Monetary Policy – Continuous target

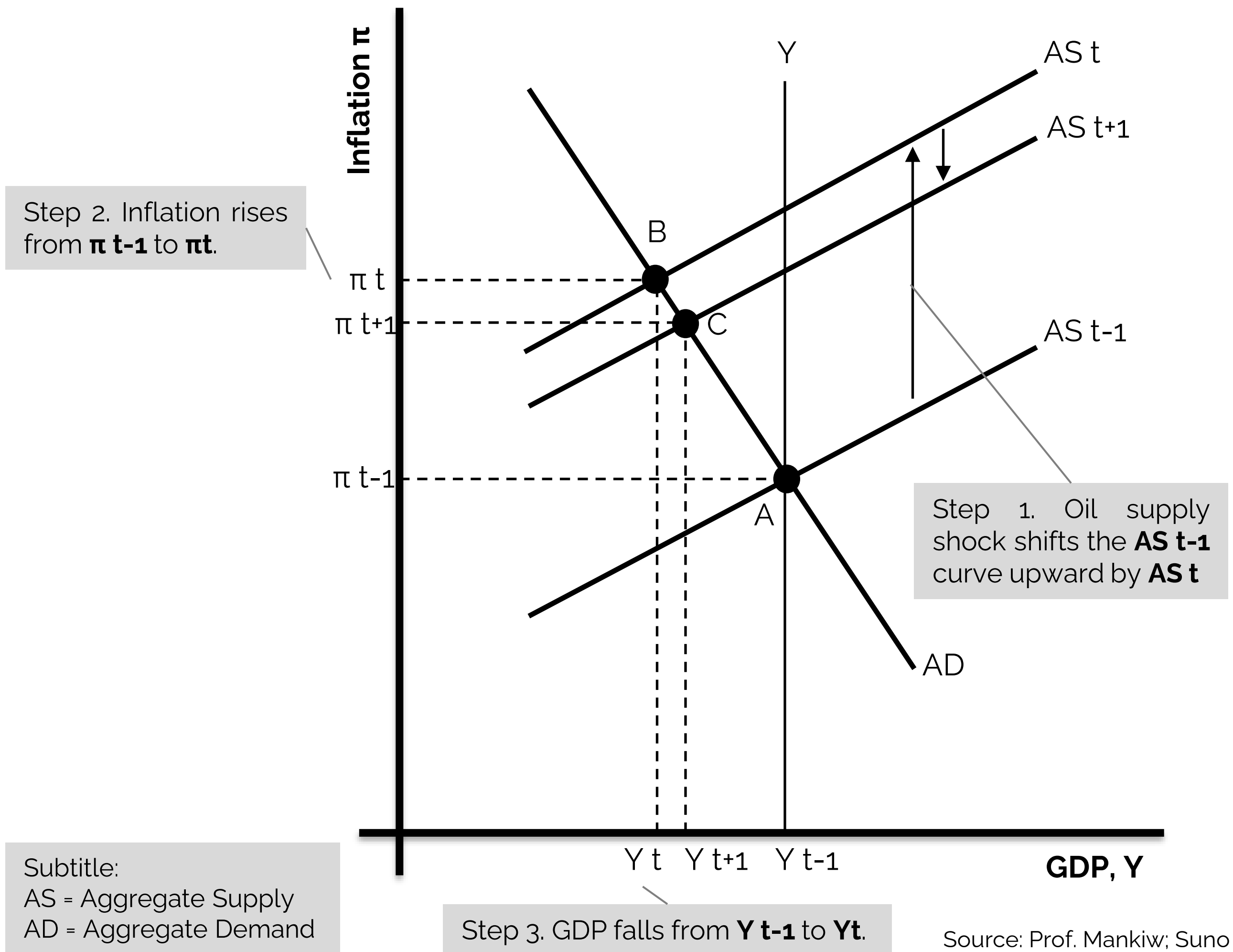


Source: IBGE| Elaborated by Redwood

- **System for monitoring compliance with the inflation target – Calendar-based or Continuous: in practice, at this moment, indifferent - Change of regime to continuous target: the dynamics will be the same;**
- **The correct decision to maintain the 3% long-term target reinforced BACEN's work and helped reduce future interest rates.**

POLITICAL,
ECONOMIC AND FINANCIAL SCENARIOS

Supply Shock and its consequences: we've seen this before!



Source: Prof. Mankiw; Suno | Elaboration/fit: Redwood

Eventual supply shock: Oil

- **Rate of inflation rises – 1st moment;**
- **BACEN should raise Selic, and will it? We will have a new board of Directors and COPOM. If so, we will see demand "cooling down" => we will have triggered chatter about a mistaken monetary policy;**
- **What will Petrobras' pricing policy look like in this environment under the PT administration? Will the typical Lula rhetoric continue?**

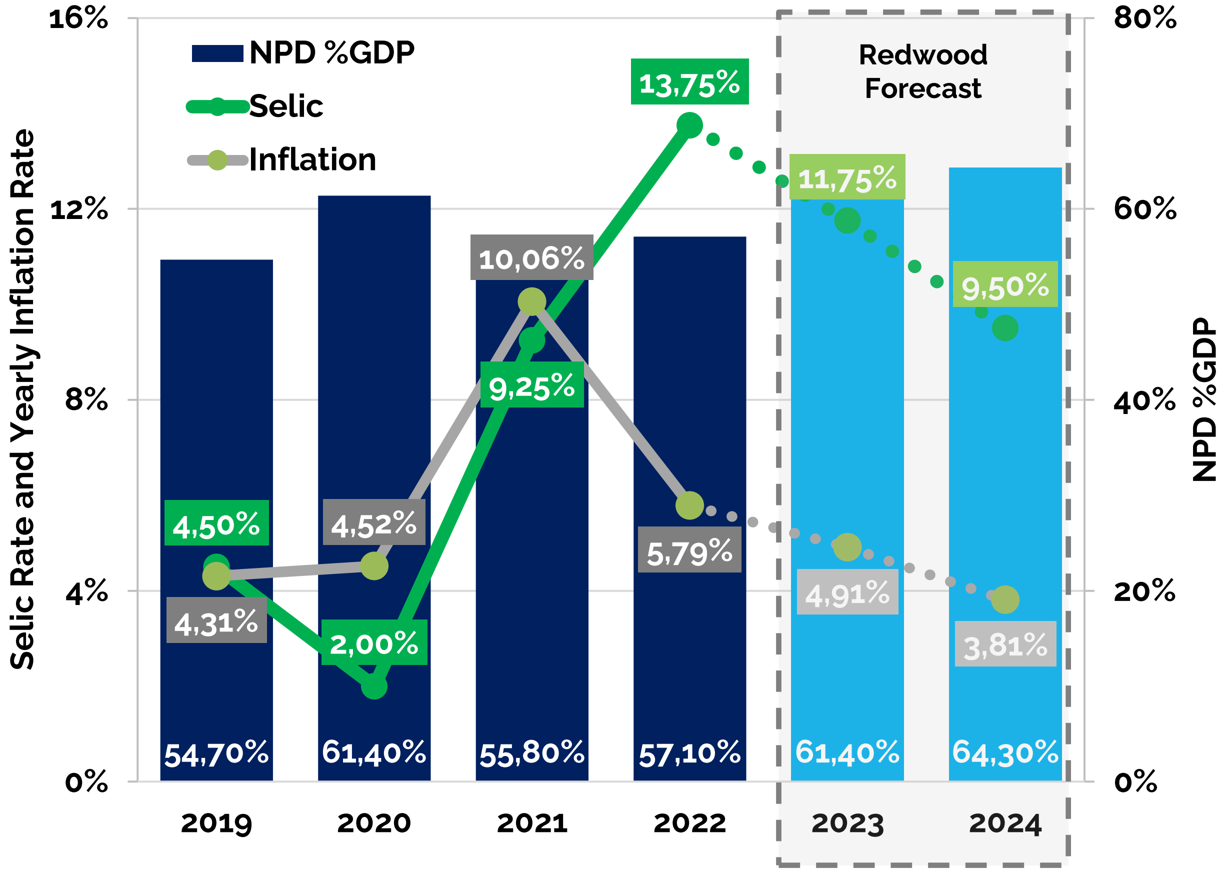
How does that affect finances?

- **Life gets more expensive;**
- **Markets adjust;**
  - **Fixed Income (more stressed yield curve);**
  - **Equities takes a hit, but with some selectivity.**

POLITICAL, ECONOMIC AND FINANCIAL SCENARIOS

Inflation: Do debt growth dynamics matter?

Net Public Debt (NPD % GDP), Inflation and Selic



Source: BACEN | Elaborated by Redwood

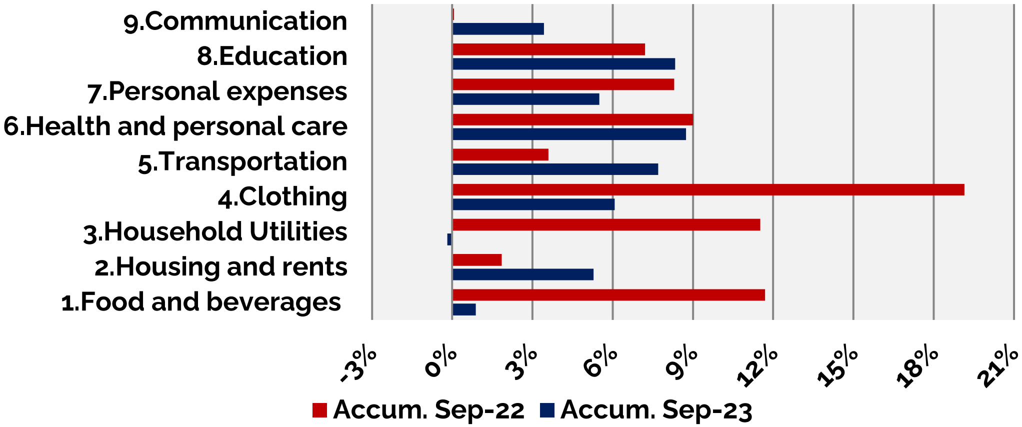
- Net Public Debt (DLSP), a Brazilian singularity (jaboticaba)...
- According to the Treasury Secretary: DLSP refers to the total obligations of the non-financial public sector minus its financial assets with non-financial private entities, public and private. Here, unlike other countries, it considers the CB's financial assets and liabilities, including international reserves (assets) and the monetary base (liabilities). Simple and useful, isn't it?
- With this definition, the DLSP will advance more than the gross public debt (DBGG)... one more indicator of things not going well.

POLITICAL, ECONOMIC AND FINANCIAL SCENARIOS

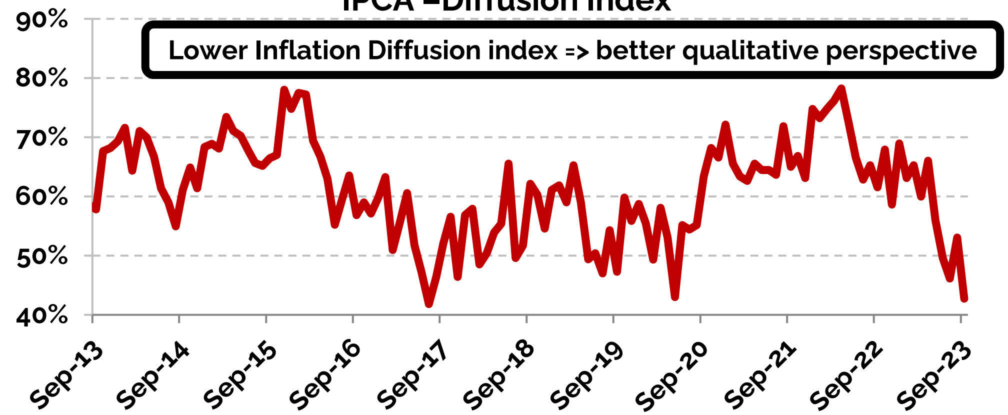
IPCA – Decomposition

Inflation: good performance and better than other countries
The medicine "interest rate" has been bitter, but efficient. Systematic drop in the Price Diffusion Index corroborates the improvement in inflationary trend. We hope to have learned that the "lesson" of monetary expansion is definitive for inflation, that the only and always responsible for it is the government, and that the less fortunate groups bear the greatest cost.

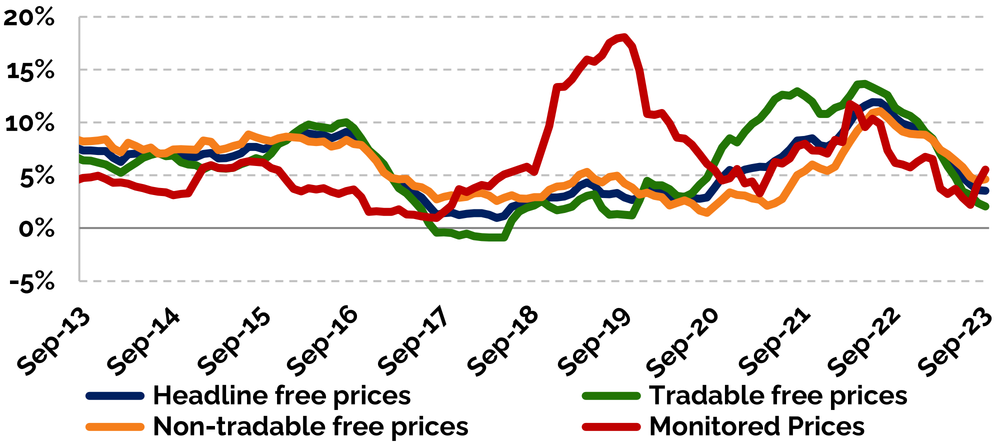
IPCA -Accum. Change in 12m. by Group



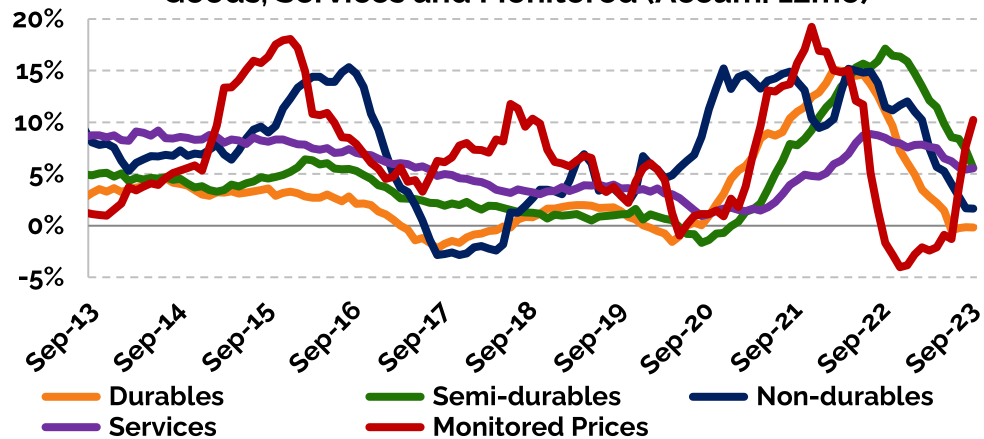
IPCA –Diffusion Index



Free and Monitored Prices (Accum. 12mo)



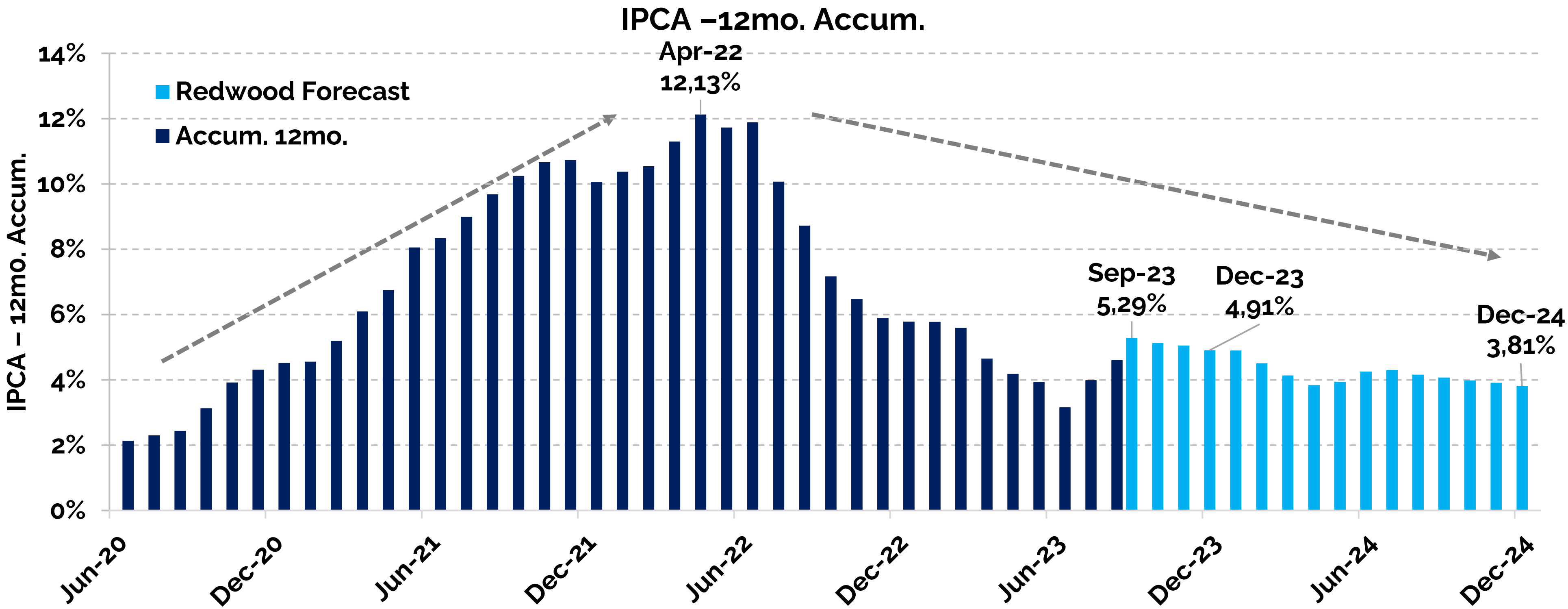
Goods, Services and Monitored (Accum. 12mo)



Source: IBGE; BACEN | Elaborated by Redwood

POLITICAL, ECONOMIC AND FINANCIAL SCENARIOS

IPCA – "Definitive" downswing in sight?



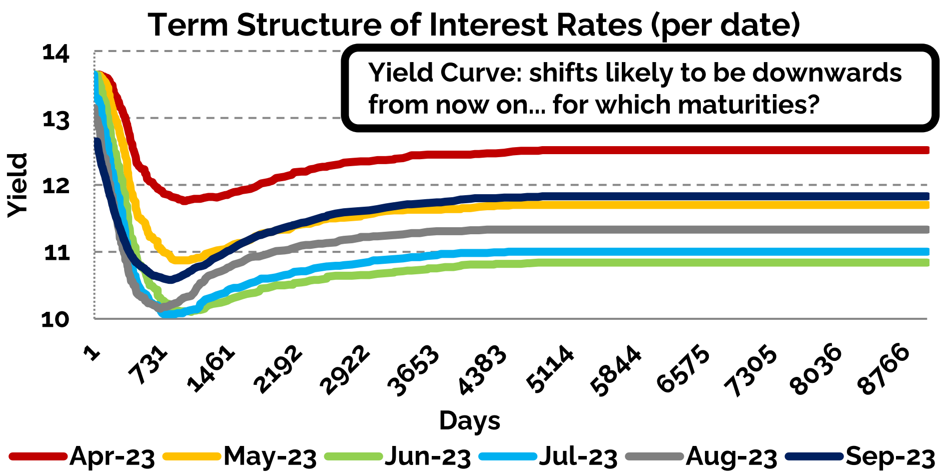
Source: IBGE; BACEN | Elaborated by Redwood

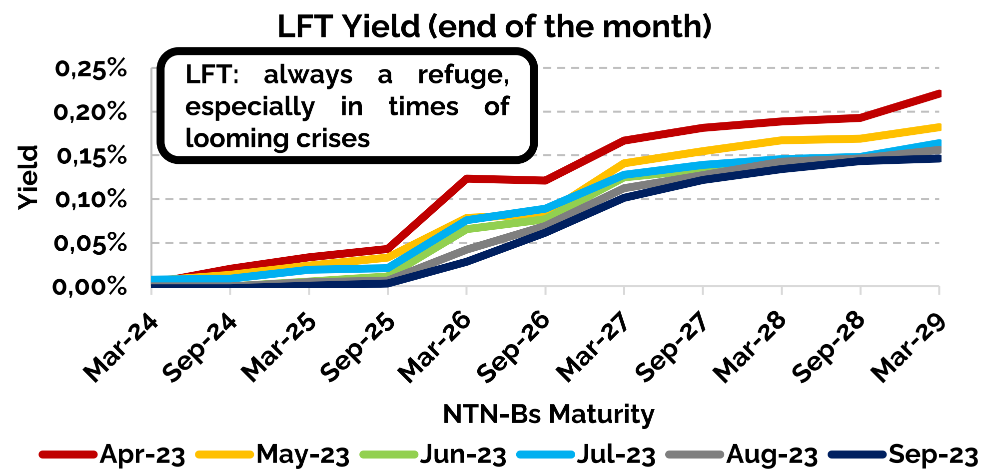
Inflation is constantly improving

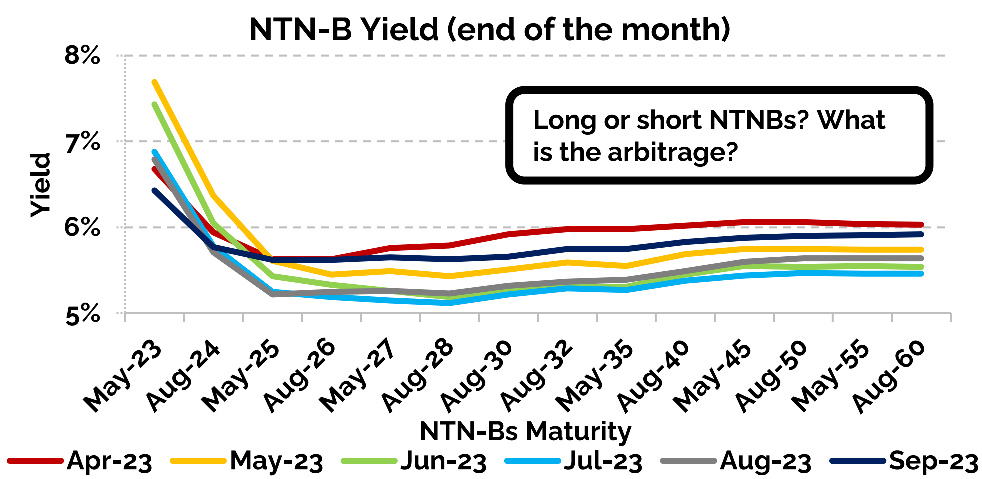
- **Where should we expect more "disinflation" coming from?**
- **An important factor in BACEN's balance of risks - the international scenario - has worsened;**
- **Lower diffusion, but all attention to regulated prices and other prices that had been falling and have now stabilized.**

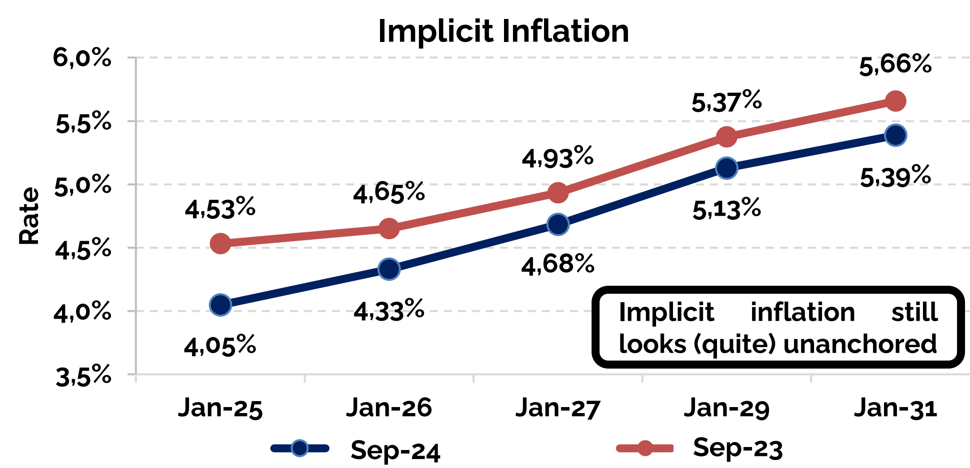
POLITICAL, ECONOMIC AND FINANCIAL SCENARIOS

Interest rate - what to expect from the Yield Curve and real interest rates





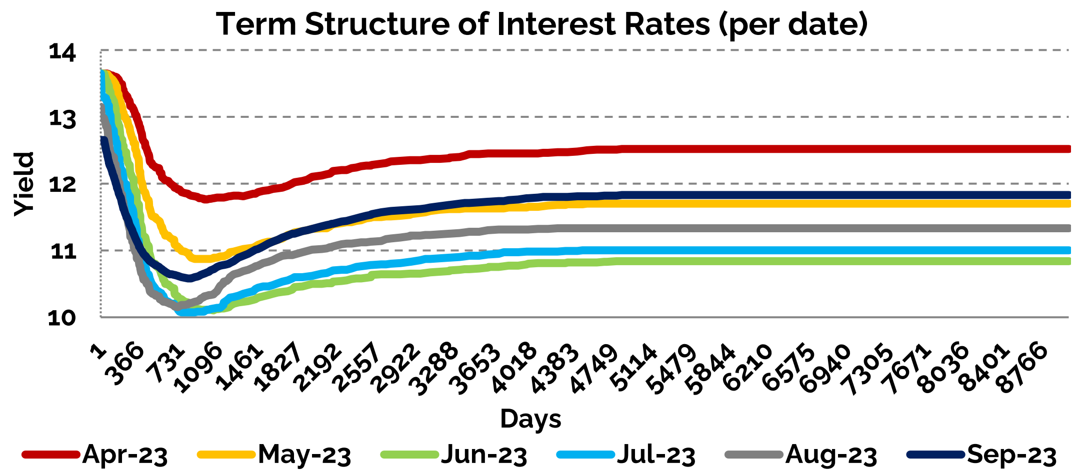


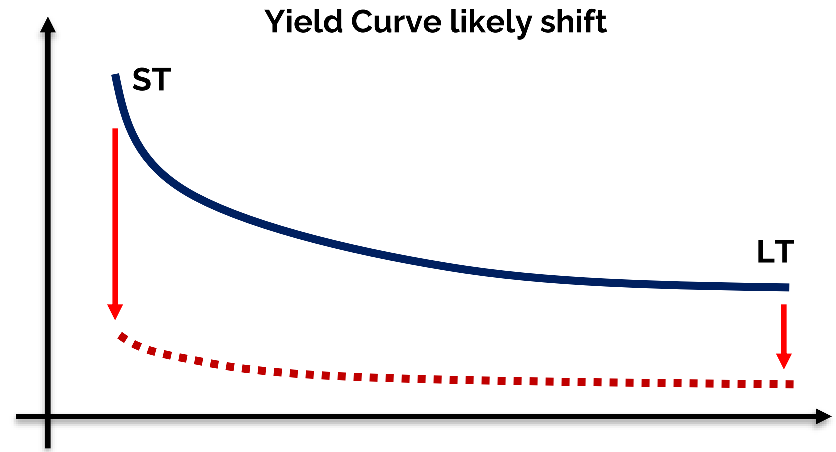


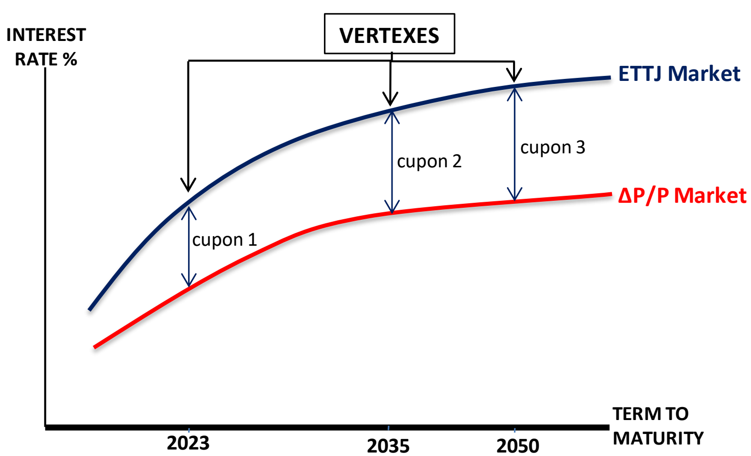
Source: B3; Anbima; Redwood Forecast| Elaborated by Redwood

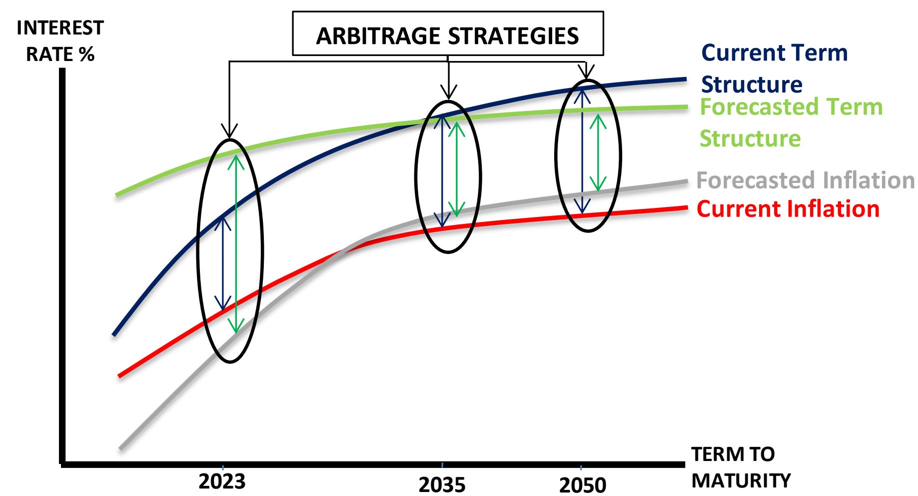
POLITICAL, ECONOMIC AND FINANCIAL SCENARIOS

Interest rates – Fixed Income Opportunities (TPF)



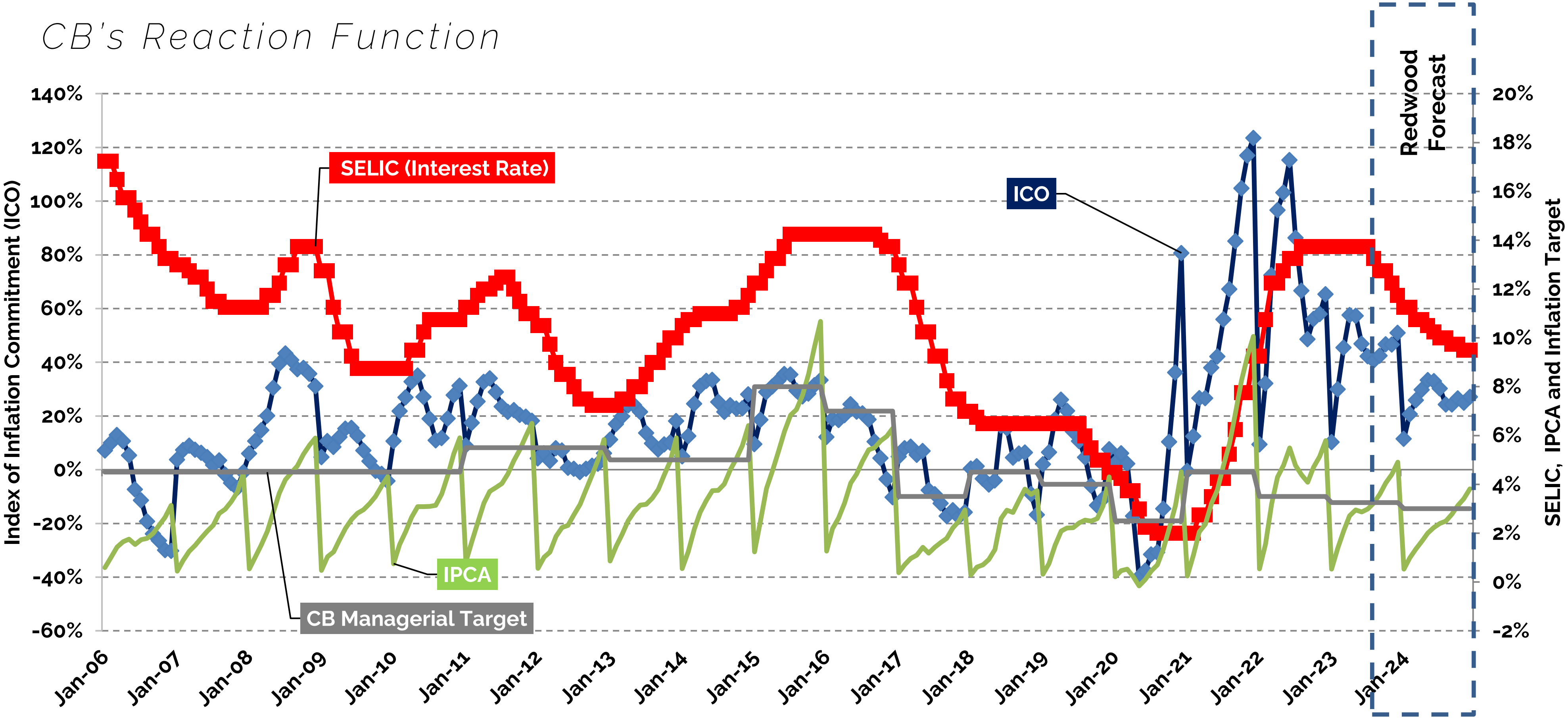






POLITICAL, ECONOMIC AND FINANCIAL SCENARIOS

CB's Reaction Function



Sources: IBGE; CB Brazil | Elaborated by Redwood (projections Redwood starting Sep-23)

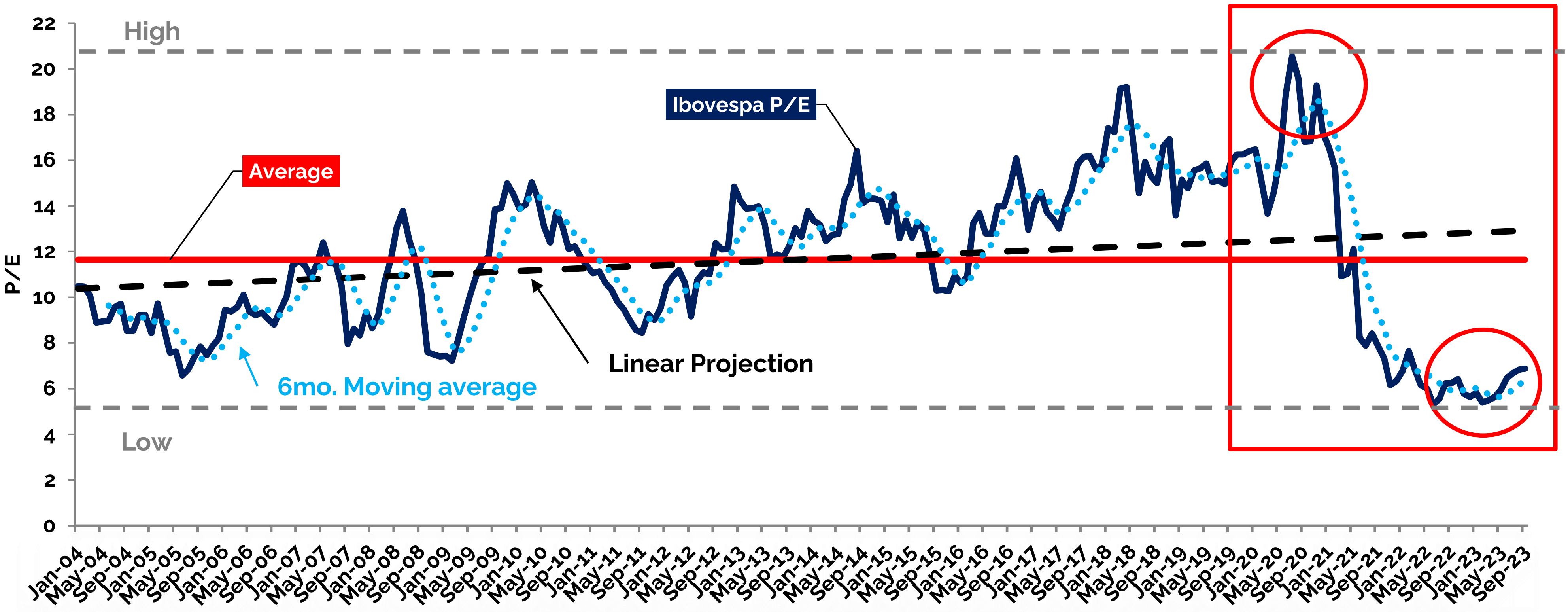
Redwood's CB Reaction Function Model is based on the annual inflation budget, and has been very useful.

- **CB's independence "strengthened" the model's performance;**
- **Combination of ICO (above 20%) and Inflation (near target), as well as ICO acceleration (point spread) triggers CB reaction;**
- **The new methodology approved by the CMN for a continuous target, from 2025 onwards, will require adjustments for proper interpretation;**
- **The Managerial Target used in the model should also be adjusted to reflect this dynamic.**

MARKETS

POLITICAL, ECONOMIC AND FINANCIAL SCENARIOS

Markets - Assessment Ibovespa – Price-to-Earnings Ratio

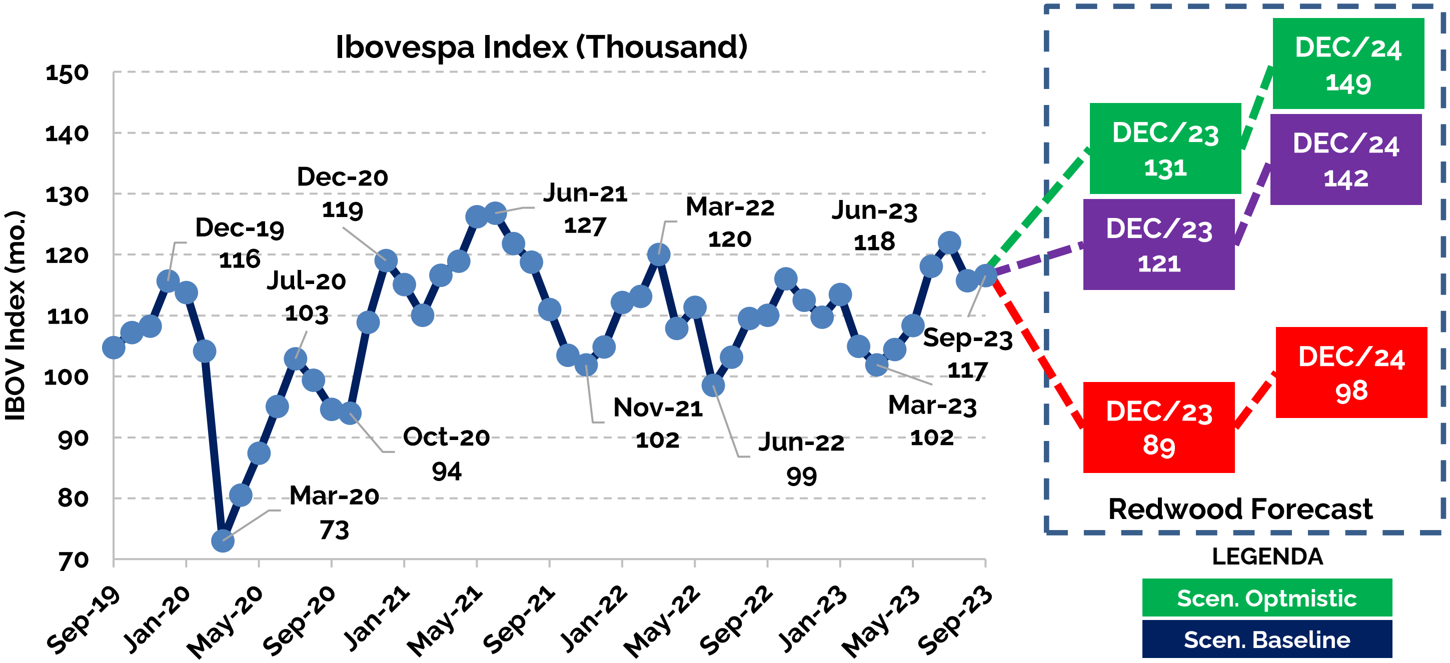


Period: 19.8 years
Source: Bloomberg
Elaborated by Redwood

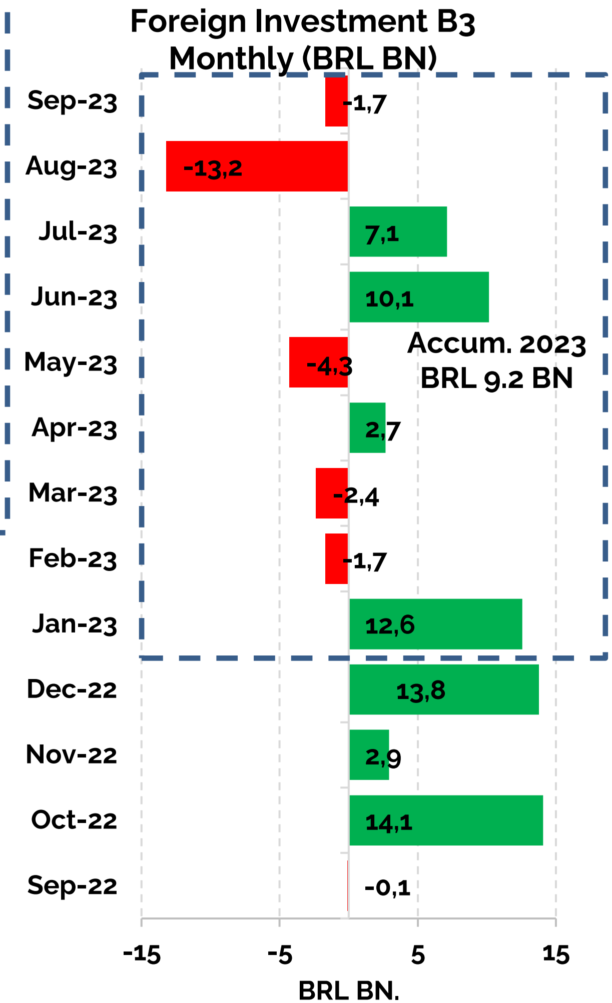
According to the Price-to-earnings ratio (P/E), Ibovespa remains below the Historical Average, the Linear Projection and the Highs, indicating that it is currently “cheap”. We continue hover above the six-month average, but without any truly consistent movement. With the risk of greater crises removed, the expectation of lower interest rates throughout the entire yield curve in the coming months, we may have some progress. Full attention! Selectivity always matters.

POLITICAL, ECONOMIC AND FINANCIAL SCENARIOS

Markets - Assessment Ibovespa – Comparative Projections



Source: Broadcast; B3 | Elaborated by Redwood

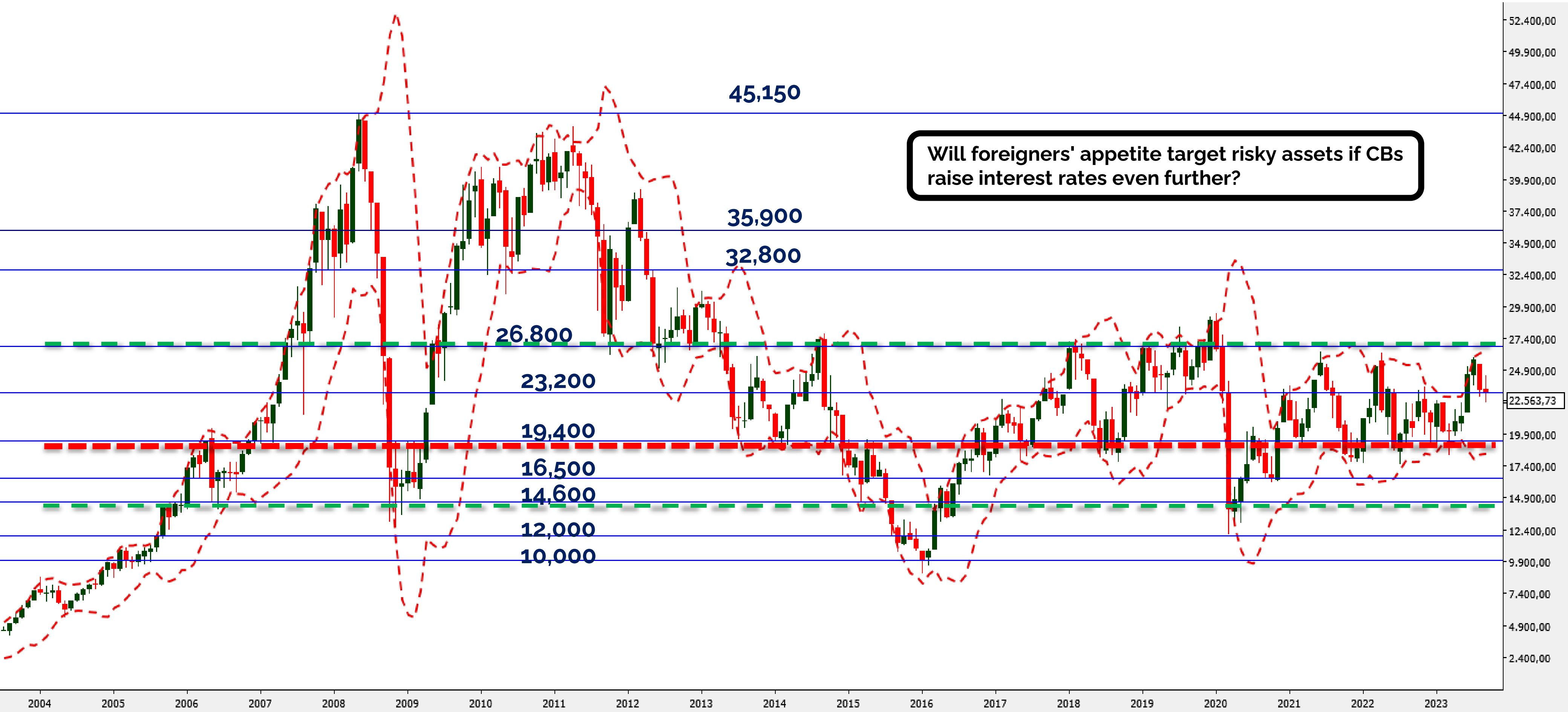


Stock Markets in anticipation of a likely crisis... it is worth evaluating

- Portfolio rebalancing;
- Reassess risk appetite, review cash flow, time horizon;
- More defensive stocks;
- Portfolio protection (hedge) as needed;
- Capital protection-oriented Structures;
- Specific reinforced positioning, adjusted to long-run strategies.

POLITICAL, ECONOMIC AND FINANCIAL SCENARIOS

Markets - Ibovespa Evolution in USD

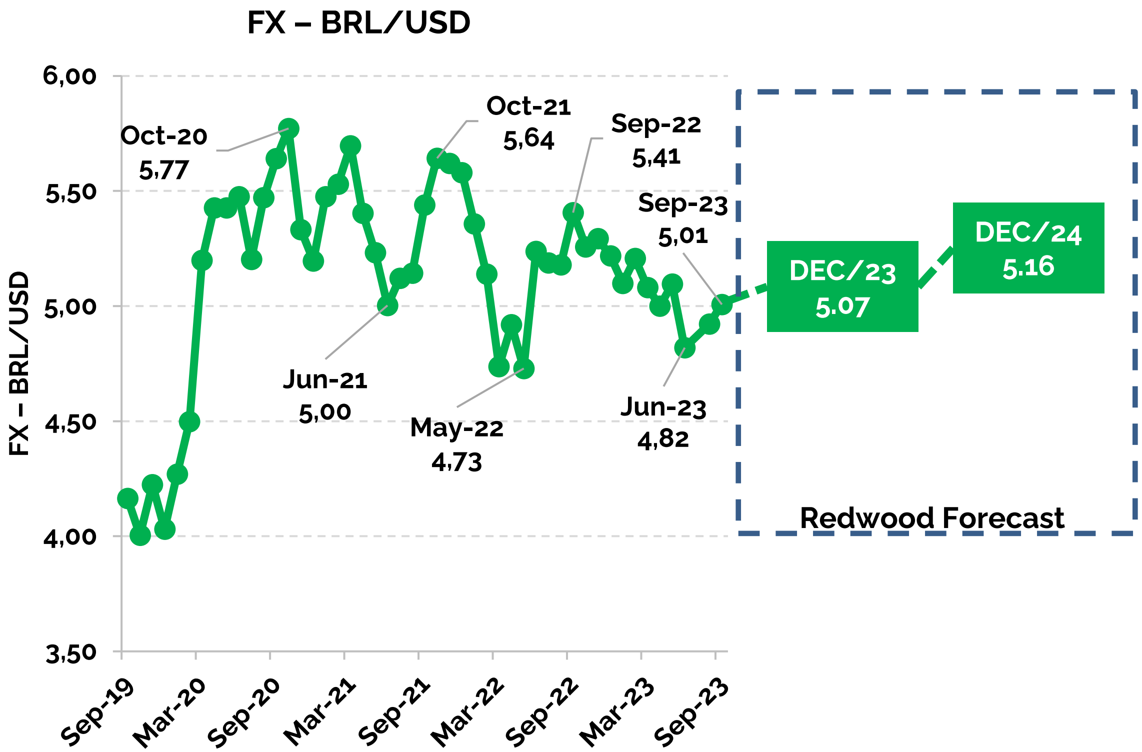


Monthly Candles – Base. 29th, Sept.. 2023

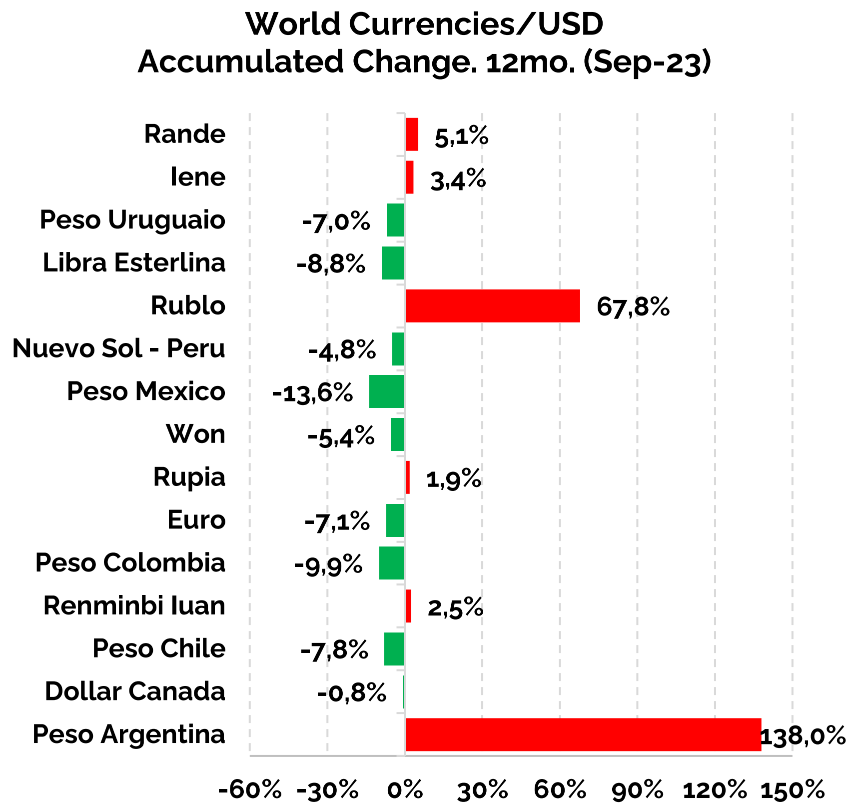
Source: Broadcast | Elaborated by Redwood

POLITICAL, ECONOMIC AND FINANCIAL SCENARIOS

Markets – Exchange rate evolution: could we be any more valued?



Source: Broadcast | Elaborated by Redwood



- **The price behavior of the Dollar this year has ranged from lows at BRL4.72 to highs at BRL5.45 so far – within-month assessment;**
- **We still expect a narrowing interest-rate differential (domestic x foreign) from now on... to be seen... important impacts;**
- **From some chance of (some) additional appreciation this year, we now move to (some) likely devaluation. For 2024, Real will depreciate further;**
- **In a more challenging external scenario, the exchange rate becomes even more important.**

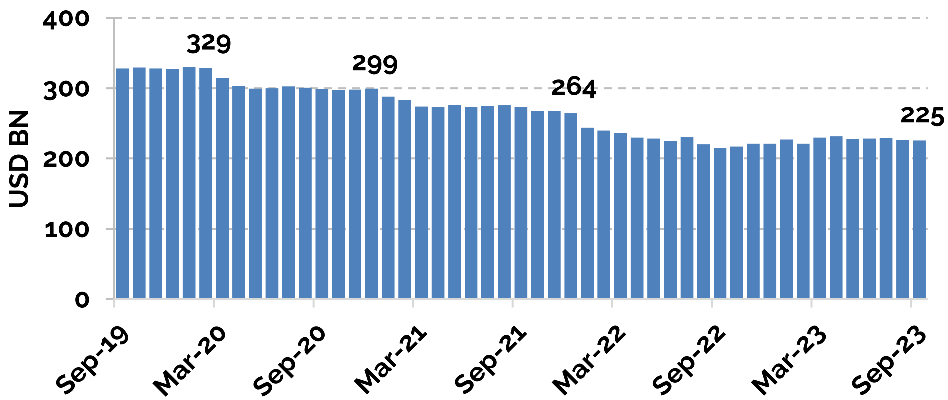
POLITICAL, ECONOMIC AND FINANCIAL SCENARIOS

Markets - Evolution of interest rates - Brazil x USA and parity condition

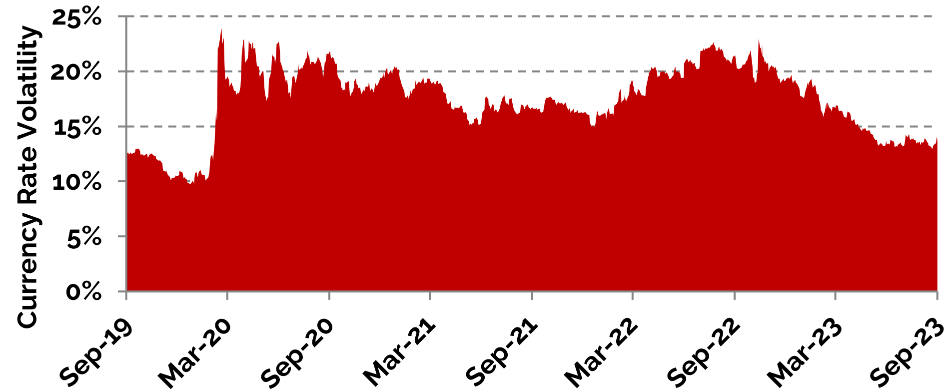
Highlights:

- *Currency Swap*: operations still ongoing;
- Volatility: significant and continuous reduction;
- Foreign Reserves: more than ever, they must be maintained;
- Price: if crisis arrives and volatility increases, BACEN intervenes even further;
- 5-year CDS: S&P helped out... FITCH too... and that is it.

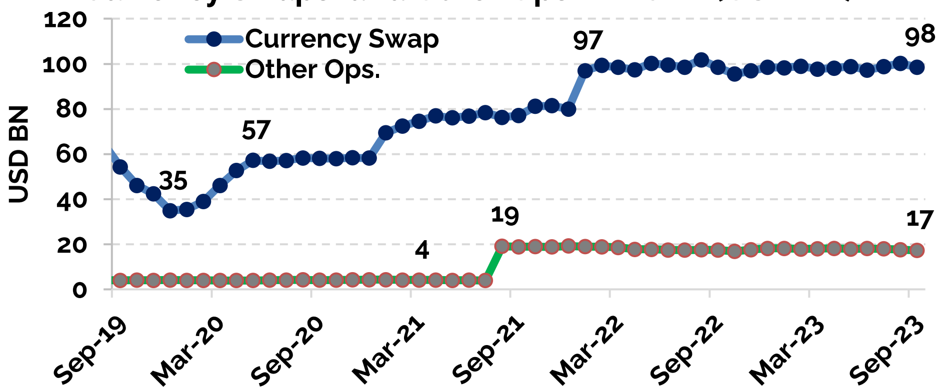
Foreign Reserve Position –Bacen (USD BN)



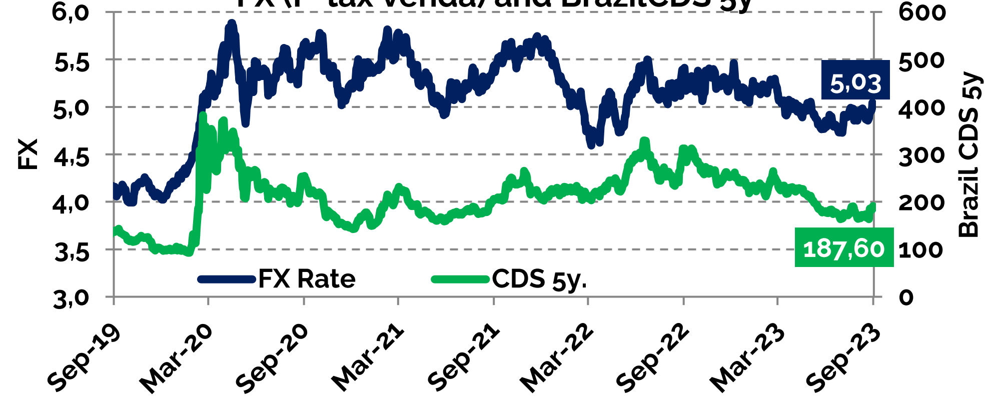
USD BRL Currency Rate Volatility (3 mo.)



Currency Swaps[1] and Other Ops.[2] BACEN (USD BN)



FX (P-tax venda) and BrazilCDS 5y



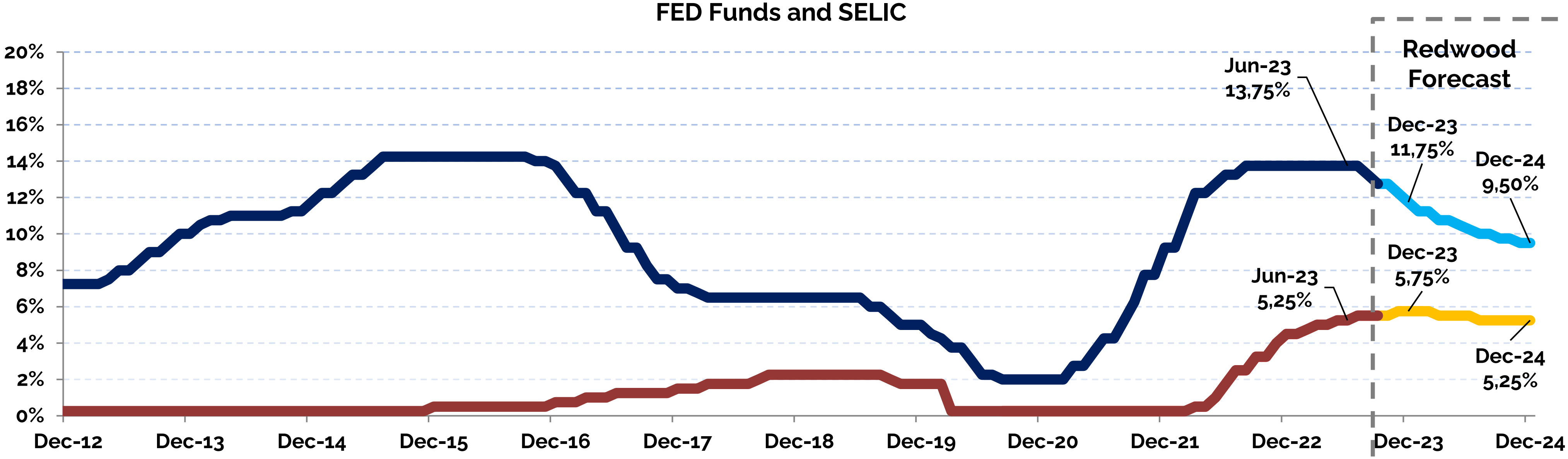
Source: BACEN; Bloomberg | Elaborated by Redwood

[1]Transactions carried out through open market auctions and registered at BM&F/B3 S.A. Notional value of debtor position assumed by CB converted at the end-of-period purchase rate of currency. [2]Assets and liabilities recorded in the CB balance sheet, except international reserves and stocks of repo lines and loans in foreign currency.

POLITICAL, ECONOMIC AND FINANCIAL SCENARIOS

Markets - Evolution of interest rates - Brazil x USA and parity condition

FED Funds and SELIC



SELIC - Redwood Proj. SELIC
Fed Funds - Redwood Proj. Fed Funds

Source: Bloomberg; IBGE | Elaborated by Redwood

Taylor Rule - Redwood
(2023) Target Rate = Neutral Rate + 0.5 × $(GDP_e - GDP_t)$ + 0.5 × $(I_e - I_t)$ = 11,72%
(2024) Target Rate = Neutral Rate + 0.5 × $(GDP_e - GDP_t)$ + 0.5 × $(I_e - I_t)$ = 9,42%

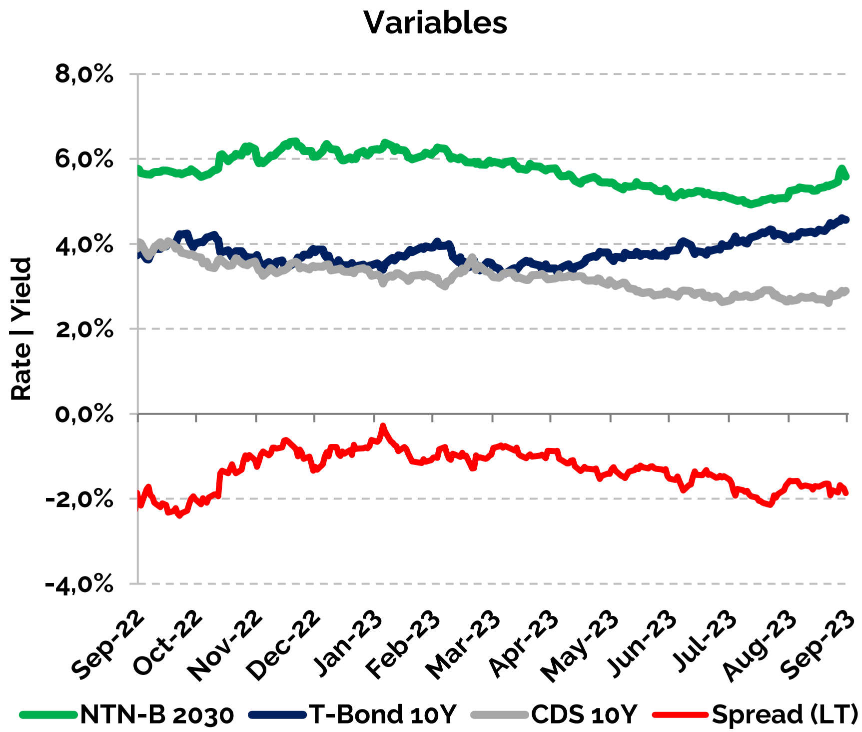
The attempt to make a soft landing in the US at any cost has led the FED to flirt with inflation. With a very tight job market and inflation cores still at worrying heights, this "error" does not seem likely to occur again – quite the opposite. On our side, the beginning of monetary easing keeps us on "comfortable" ground, but any "hiccup" out there will certainly reduce or stop this incipient shift. Remains to be seen.

POLITICAL, ECONOMIC AND FINANCIAL SCENARIOS

Markets - Evolution of interest rates - Brazil x USA and parity condition (Cont.)

International Interest Rate Parity - Redwood

	NTN-B	T-Bond	CDS	Spread
Average	5,72%	3,57%	3,31%	-1,20%
Standard Deviation	0,36%	0,45%	0,37%	0,47%
Sep-23	5,59%	4,57%	2,89%	-1,86%
Low stress 2023	5,59%	4,82%	2,45%	-1,67%
High stress 2023	6,86%	5,07%	2,45%	-0,73%
Low stress 2024	5,40%	4,57%	2,21%	-1,39%
High stress 2024	6,31%	5,07%	2,21%	-1,01%

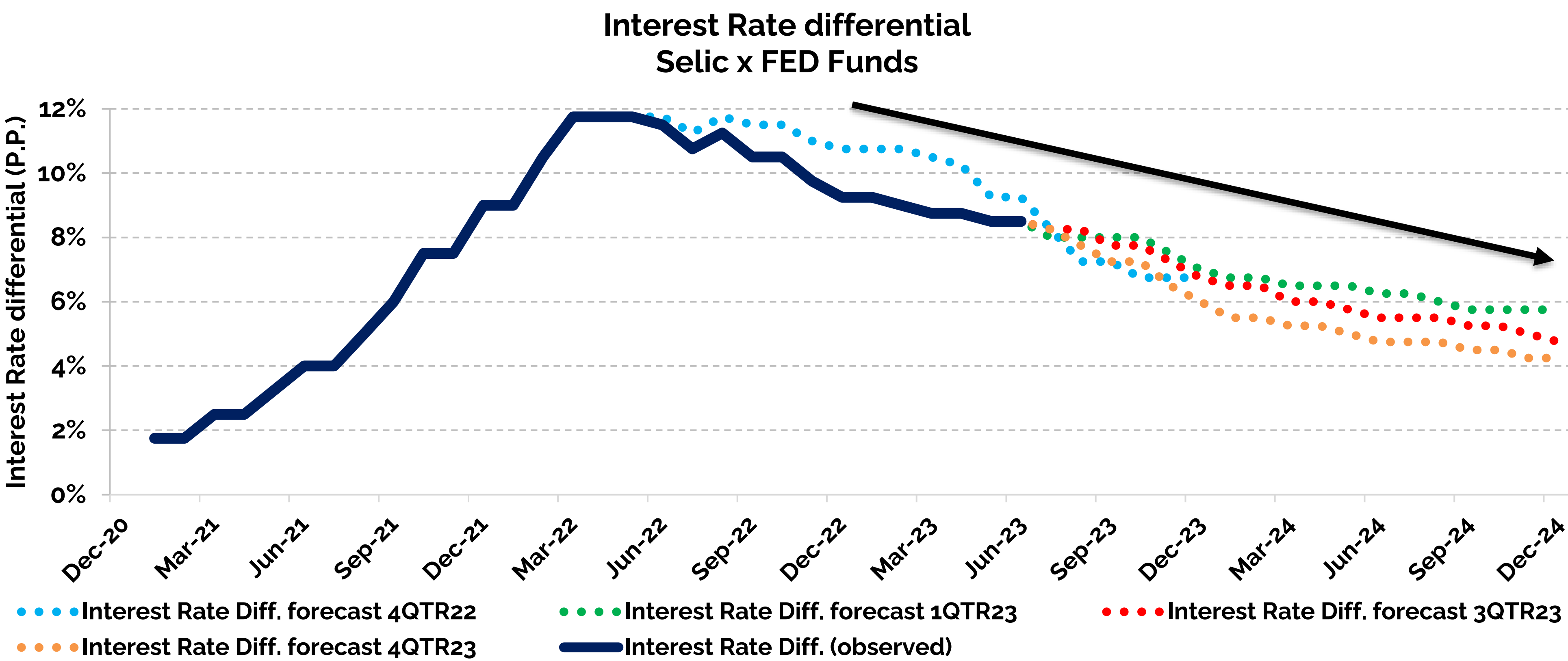


Source: Bloomberg; Economatica | Elaborated by Redwood

The FED's "inflation target" is 2% per year, but the fear of recession has curbed a more aggressive stance while hiking rates... the end result is: higher interest rates for longer... Perhaps (as we believe) new hikes should be on the radar. This reality directly affects our assets, particularly by way of interest rate paid by NTNBs.

POLITICAL, ECONOMIC AND FINANCIAL SCENARIOS

Markets – Carry trade tends to decrease. What are the consequences?

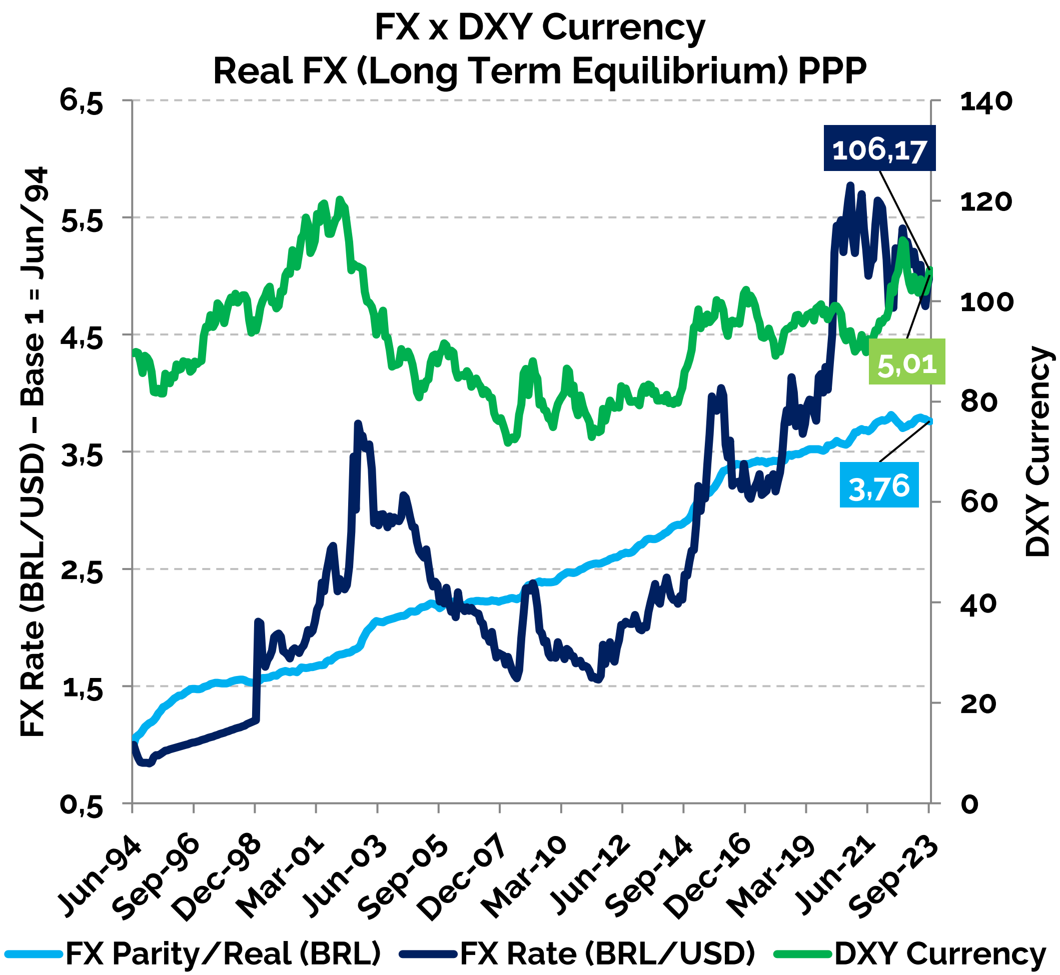


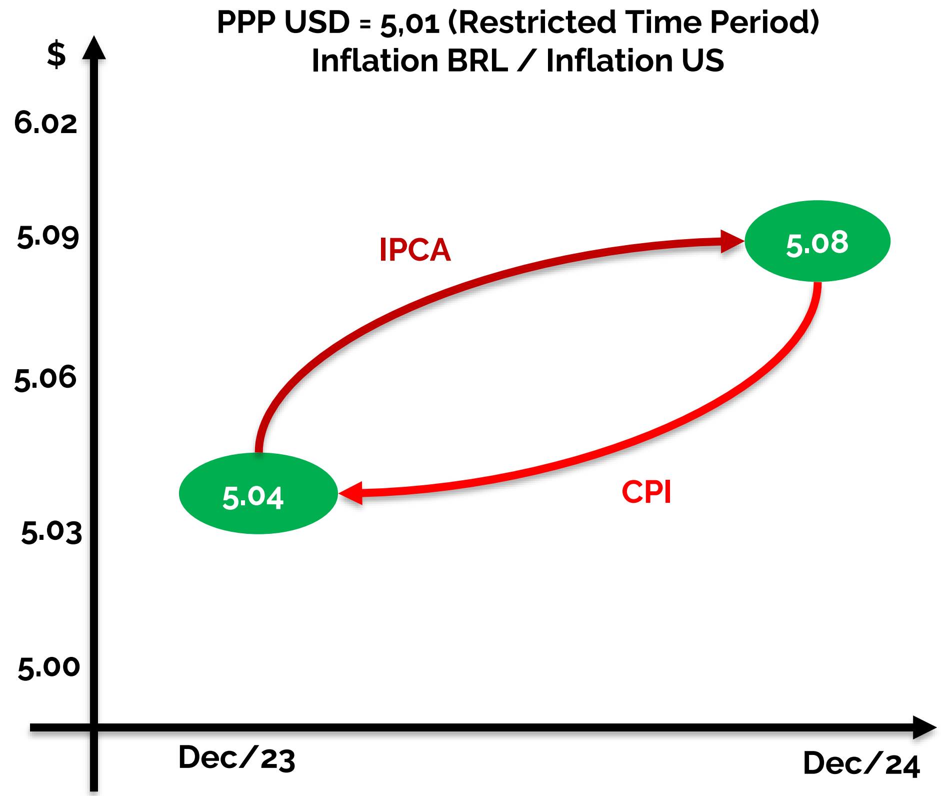
Source: Bloomberg; IBGE | Elaborated by Redwood

With the interest rate differential decreasing, with no other incentives and the country's less inviting conditions – and now also possibly a more troubled external scenario – we could see capital outflow from the country. This is not yet a scenario to which we attribute great probability or greater impact.

POLITICAL,
ECONOMIC AND FINANCIAL SCENARIOS

Markets - Evolution of interest rates - Brazil x USA and parity condition (Cont.)

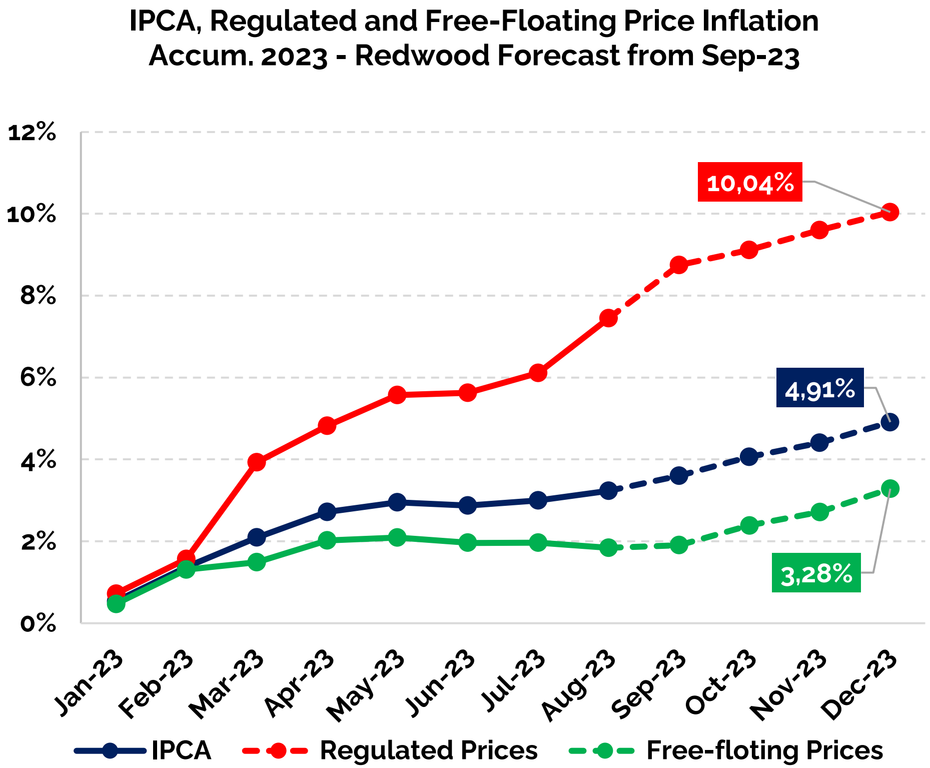


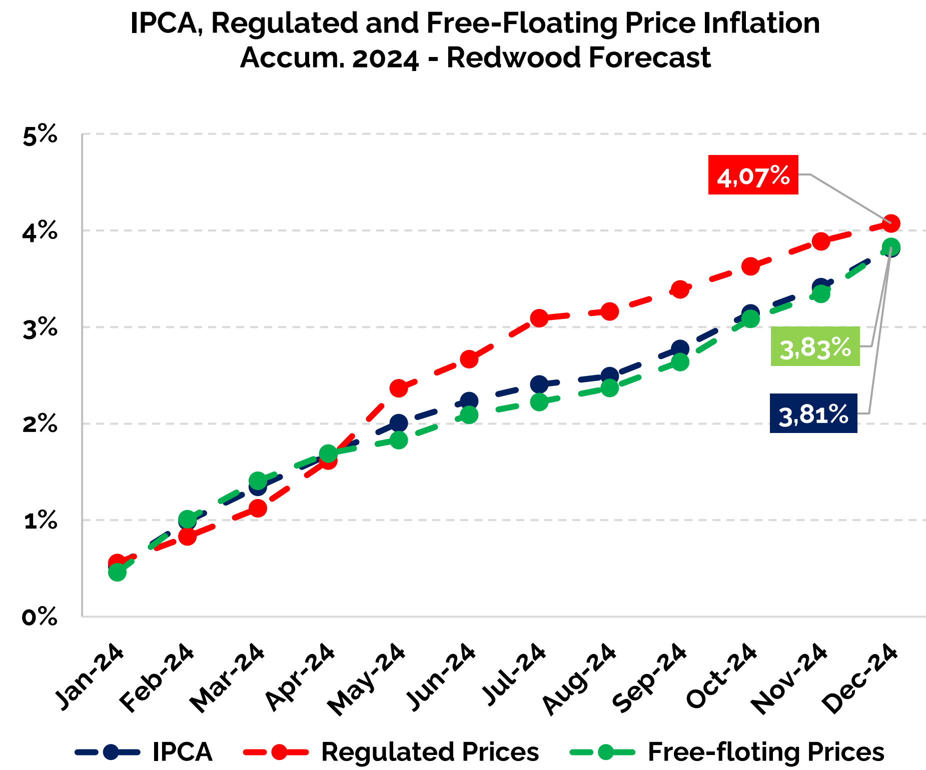


Source: FRED – St. Louis; Bloomberg | Elaborated by Redwood

POLITICAL, ECONOMIC AND FINANCIAL SCENARIOS

Markets – Inflation by IPCA Headline, Regulated and Free-floating Prices





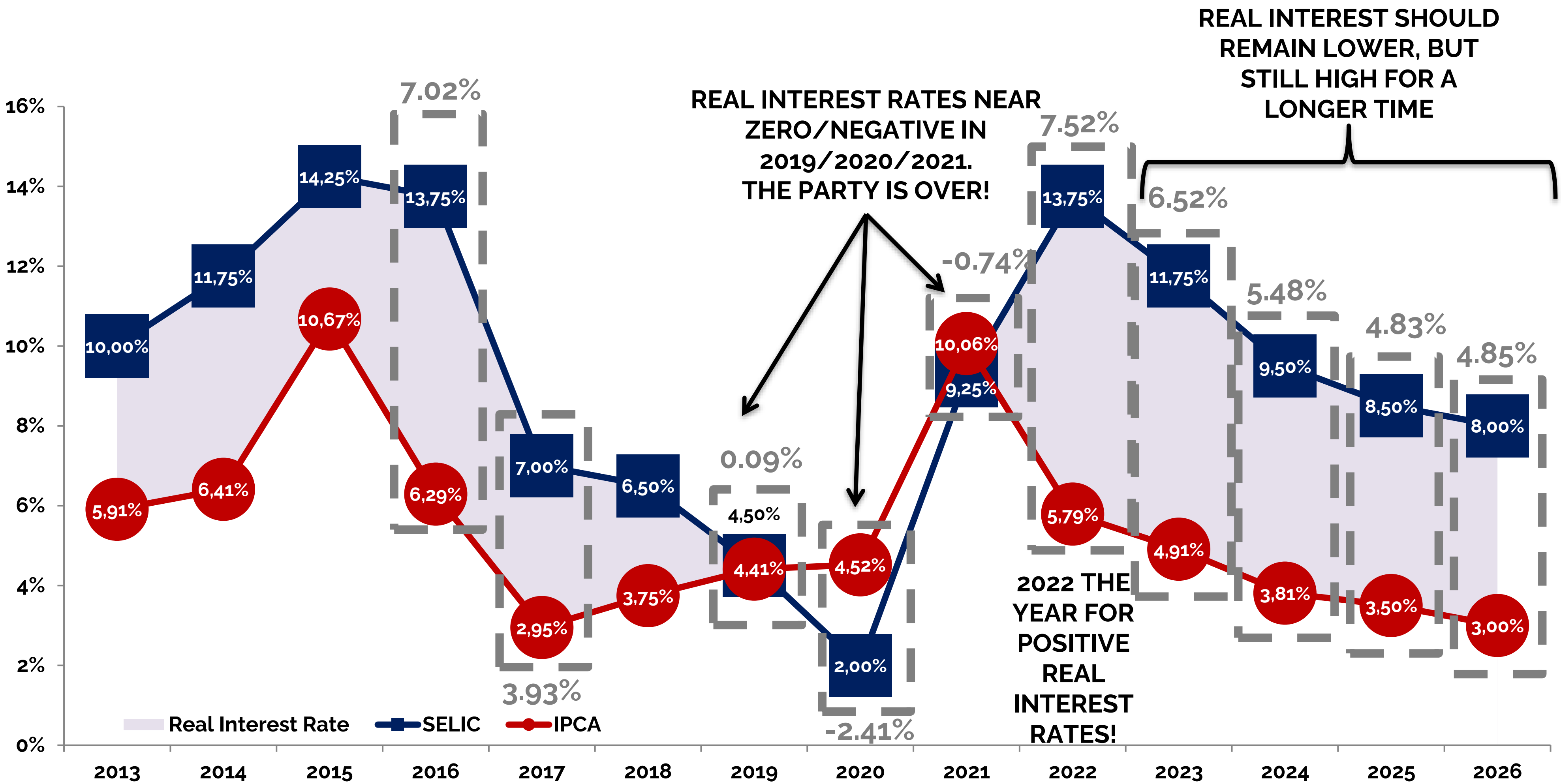
The composition and behavior of regulated and market-set prices from different perspectives in the two-year stretch

As predicted in our last Scenarios, regulated prices in 2023 are "undergoing" adjustments due to lagged effects of 2022 events... so far with no major interference market-set and regulated prices will be above the target in 2023, but in 2024, notably as a consequence of the monetary policy in course, both may fall within the inflation target range.

Source: IBGE | Elaborated by Redwood

POLITICAL,
ECONOMIC AND FINANCIAL SCENARIOS

Markets - Evolution of interest rate and inflation in Brazil

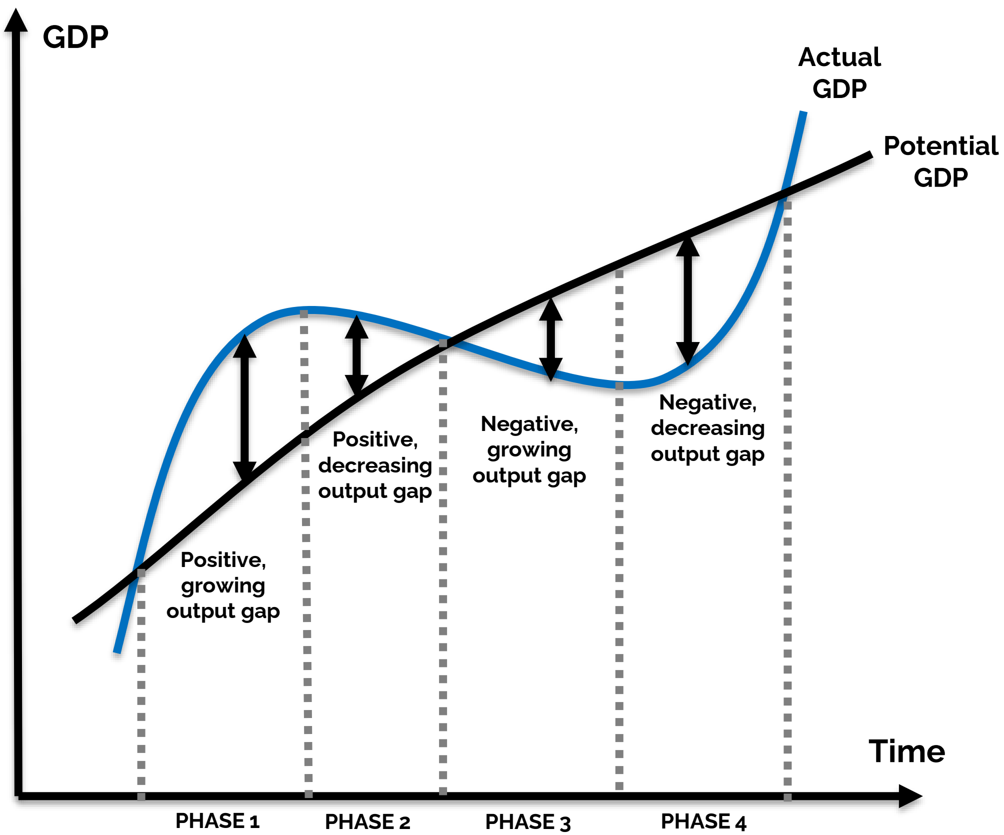


Source: BACEN; IBGE | Elaborated by Redwood – Obs: Redwood forecast for IPCA and SELIC – 2023-2026

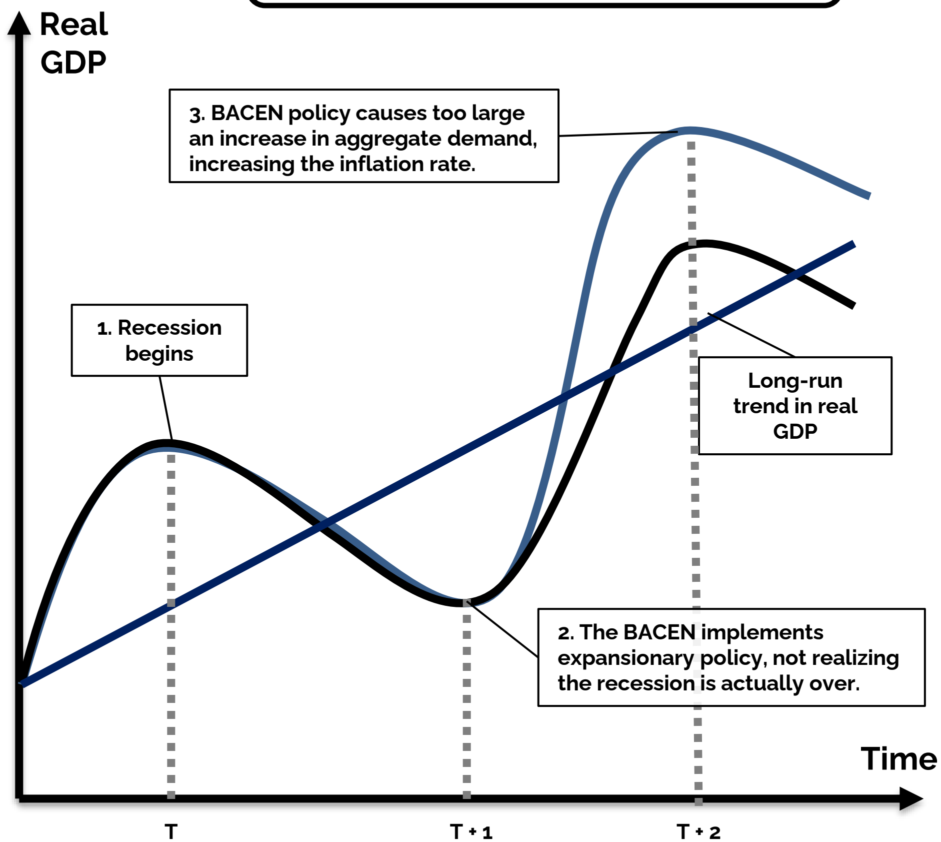
POLITICAL, ECONOMIC AND FINANCIAL SCENARIOS

Markets - Economic cycles and Central Bank performance

The four phases of an economic cycle

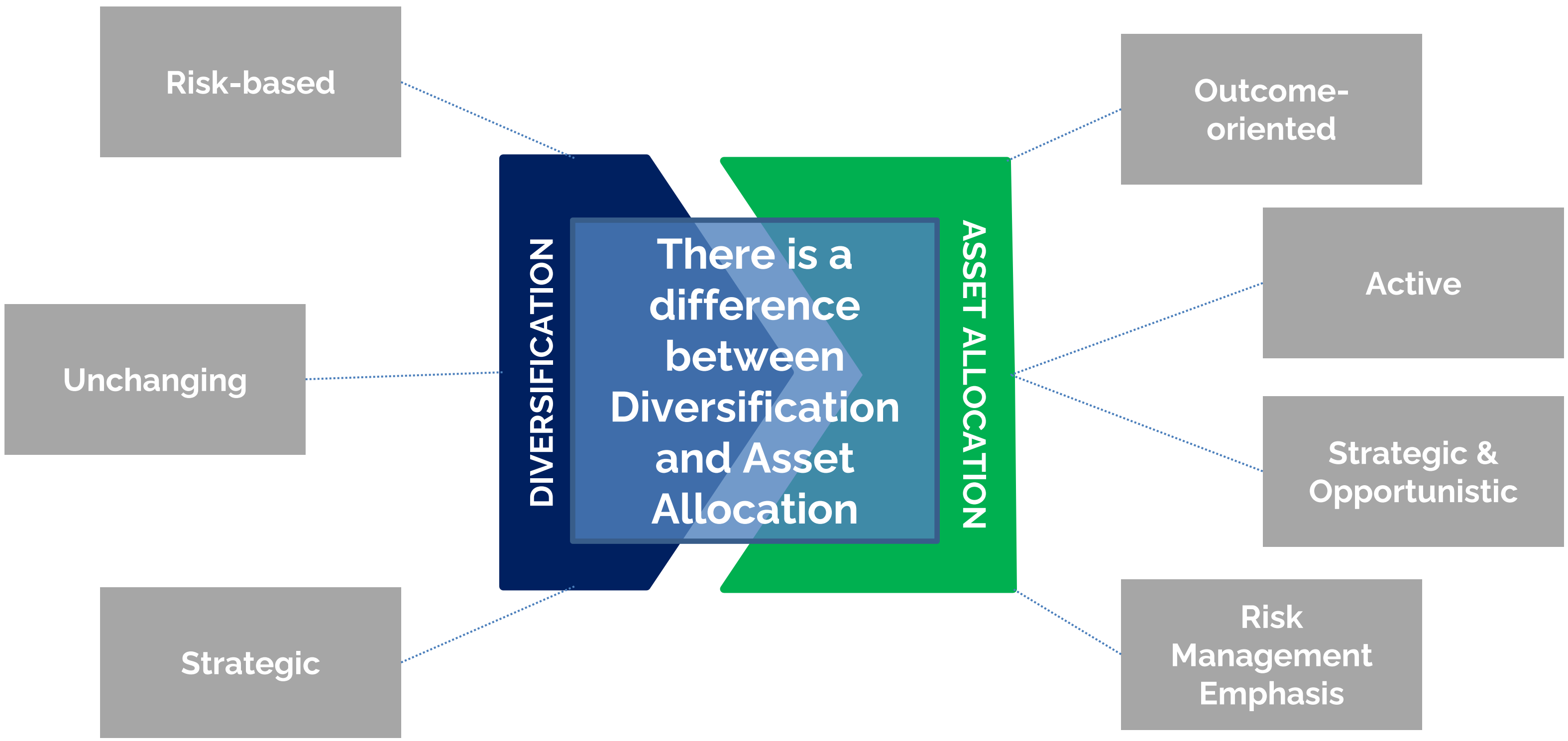


Independence and technique (robust models) make the difference!



POLITICAL, ECONOMIC AND FINANCIAL SCENARIOS

Markets - Economic cycles and asset macro-allocation

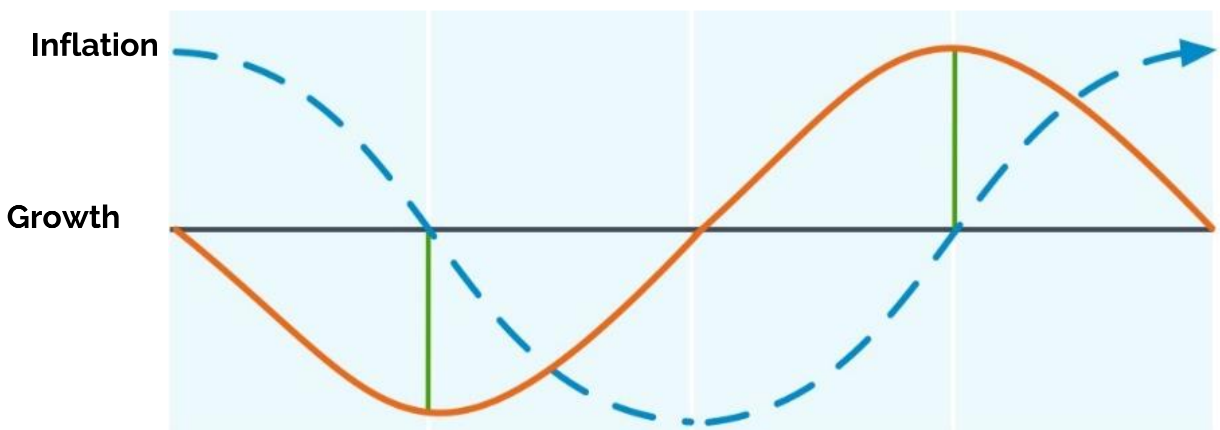


POLITICAL, ECONOMIC AND FINANCIAL SCENARIOS

Markets - Economic cycles and performance along the market cycle

Performance during a market cycle

	Disinflationary		Inflationary	
Cycle phase	**Reflation**	**Recovery**	**Overheat**	**Stagflation**
Best performing asset class	**Bonds**	**Equities**	**Commodities**	**Cash**



REDWOOD MACROECONOMIC FORECAST 2023 AND 2024

POLITICAL, ECONOMIC AND FINANCIAL SCENARIOS

Probability-based Prospect 2023 and 2024 – 4TH QTR 2023

INDICATORS		2019	2020	2021	2022	2023 (Base/Prob.)	2024 (Base/Prob.)
Economic Growth							
GDP Growth	%	1.20	-3.90	4.60	2.91	2.50	1.20
Investment Rate	% GDP	15.47	16.56	19.17	18.82	17.89	18.01
Labor Markets (PME-IBGE)							
Average Rate of unemployment (yearly rate)	%	12.1	13.4	13.5	9.5	8.53	8.36
Real Average Wages*	R$ const	2,881	2,952	2,634	2,850	2,893	2,923
Exchange. Interest and Inflation Rates							
Exchange Rate (December)	BRL/USD	4.03	5.20	5,58	5.22	5.07	5.16
Headline Inflation (IPCA)	Var. % yearly	4.31	4.52	10,06	5.79	4.91	3.81
Nominal Interest (Selic) - (December)	Var. % yearly	4.50	2.00	9,25	13.75	11.75	9.50
Real Interest (Selic/IPCA)	Var. % yearly	0.18	-2.41	-0,74	7.52	6.52	5.48
CDS Brazil – 5Y (end of year)	Percentage points	99	143	242	254	159	144
Balance of Payments							
Exports	USD Billions	221.1	209.2	280,8	340.7	337.3	330.6
Imports	USD Billions	185.9	158.8	219,4	296.3	259.4	265.8
Trade Balance	USD Billions	35.2	50.4	61,4	44.4	78.0	64.8
Current Account Balance (new methodology starting in 2019)	USD Billions	-65.0	-24.5	-27,9	-55.7	-52.9	-55.5
Current Account Balance	% GDP	-3.47	-1.69	-1,74	-2.70	-2.57	-2.69
Public Finances							
Primary Result	% GDP	-0.8	-9.2	0,7	1,3	-1.1	-0.9
Nominal Result	% GDP	-5.8	-13.3	-4,3	-4,6	-7.7	-7.5
Net Debt Stock	% GDP	54.7	61.4	55,8	57,1	61.4	64.3
Gross Debt Stock	% GDP	74.4	86.9	78,3	72,9	77.0	80.7
World & US Economies							
World GDP Growth Rate	%	2.76	-3.40	5,70	3,00	2.84	2.59
US Growth Rate	%	2.2	-3.5	5,7	2,0	2.30	1.50
CPI	Var. % yearly	2.3	1.3	7,1	6,4	3.50	3.00
Nominal interest rate (Fed Funds)	Var. % yearly	1.75	0.25	0,25	4,50	5.75	5.25

Elaborated by Redwood | Forecast in red

POLITICAL, ECONOMIC AND FINANCIAL SCENARIOS

Variables Chart – Summary Exchange Rate/Inflation/SELIC – Proj. 2023/24

Summary - 2023/2024						
Scenarios[1]	Exchange Rate[2]		Inflation (p.a.)		SELIC (p.a)	
	2023	2024	2023	2024	2023	2024
Optimistic	4.68	4.28	4.50%	3.25%	11.25%	8.50%
Baseline	5.07	5.16	4.91%	3.81%	11.75%	9.50%
Pessimistic	6.52	6.54	7.00%	5.50%	13.00%	12.25%
Probability-based Scenario	*5.07*	*5.16*	*4.91%*	*3.81%*	*11.75%*	*9.50%*

[1]Tax and Administrative Reform 2023/2024;
[2]December Quotes

GDP	2023	2024
	2.50%	1.20%

Unemployment	Ave. Rate		Dec. Rate	
	2023	2024	2023	2024
	8.53%	8.36%	9.96%	8.09%

POLITICAL, ECONOMIC AND FINANCIAL SCENARIOS

Conclusões – Brazil: Macroeconomic Scenario – Caution is back.

- ***Whereas the review of the total "hedge" proposed in the previous Scenarios warned of a Mona Lisa smile, the currently greater complications and two ongoing Wars, attention must be redoubled. Politically, in Brazil, our Commander-in-Chief keeps breeding controversy, still disoriented under the weight of his "power", while still behaving indolently. The National Congress seems to want to put an end to the STF's intrusions, and the Executive is heading towards the end of the year trying to pull out a positive agenda for 2024 - admitting legislative progress in bills such as the taxation of exclusive funds and offshore accounts and the definitive advancement of tax reform in the Senate, for example. The country's finances and economy face prospects of more relaxed financial conditions, which allow for an improvement in the environment, but with global disorder in the background, the challenge, once again, will be to lead the economy with technical and political skill - both currently scarce. Surrounded by uncertainty, risk aversion prevails.***

  - Monetary Policy: easing underway, but beyond the pace and intensities (Selic cuts) predicted, surprises may appear;
  - Fiscal Policy: The new Fiscal Framework and Tax Reform are not enough – Zero deficit in 2024? Nearly impossible;
  - Brazil Risk: The improvement in the perception of Brazil risk helped... but with no significant advances: GDP grows little, Debt-to-GDP is 20 pp above Investment Grade countries, deficit instead of primary surplus, very high nominal deficit, etc.;
  - Exchange Rate Policy: Once again reserves will be our "safe haven" in a restless world;
  - External scenario: The Israel x Hamas War overtakes the stage and "overshadows" the Russia x Ukraine War. In a highly troubled world, global caution is necessary. Externalities of various orders can arise, and markets anticipate movements;
  - Privatizations: Having passed the wild ideas of canceling privatizations, we now have to accept no progress in this realm;
  - Stock Markets: More relaxed financial conditions breed opportunities, but the scenario is not yet favorable;
  - Structured and Alternative Investments: Good paths and alternatives for those with time and appetite. Double attention!
  - Unemployment rate: With some worsening at the margin in 2023, it will return to 8.5% in 2024. Resilience?

There seems to be a consensus that we want to be bigger than we are – and we do little to change this reality, quite the contrary. Our poor performance at the head of the UNSC and the recent notes from the OECD in which it reveals "outright concern" about cases of transnational corruption involving the country, among others, drive away investors and tarnish our image and destiny. We hope for the President's good health, for he will need to be flexible and quick on his feet.

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