Brazil



Marcelo Guimarães – ICONIC Base Oil Executive Manager / Fernanda Ribeiro, ICONIC Product Manager and Thiago Junqueira, ICONIC Market Intelligence Manager.

Being the sixth largest lubricant market in the world, with a volume size of approximately 1.35 billion litres or 8.5 million barrels, Brazil reached approximately 5% volume growth in the last year, the highest growth since the severe impact of the COVID-19 pandemic. Its figures match closely to market volumes pre-pandemic.

In addition to the escalation in prices caused by the disruption of the supply chain, on top of extensive lay-offs, we also noticed in 2023 the reversal of a deterioration process in the mix of products at the oil change and replenishment of the oil level.

The reduction in political uncertainties, continuous growth in agriculture production, and the automotive market recovery were levers for the resumption of volume and profitability, which are good winds expected to continue in the next three years. ICONIC's forecast is that the market will continue to grow at an average rate of 2.4%, as it did in 2023.

The agricultural market, for example, reaches record grain production year after year, and has been the biggest driver of lubricant consumption. Considered one of the highest rates of mechanisation and automation within the industries, by the usage of mobile working machines (MWMs), top-notch technologies like AI, the internet of things, machine learning, and drone mapping for seeding and harvests, bring positive expectations despite the challenges of El Nino and global warming.

Brazil's lubricant business is undergoing transformation, demand for premium products, driven by a highly efficient low-carbon economy, and the advent of electrification are no longer a trend but a potential reality. As in other markets, there is a significant correlation with the sale of diesel and gasoline for automotive lubricants and with Industrial GDP, for Industrial lubricants.

Companies that managed to build a strategic raw

material and finished fluid supply with trusted partners in this period differentiated themselves through efficiency, flexibility, and reliability to their customers, which is in a nutshell, readiness to embark on this period of expected growth.

Growing demand for Premium Base Oils

Due to the scarcity of refineries within Latin America, Brazil is a net importer of Base Oils. It is estimated that 50% of the base oil was of imported origin, 60% being Group II and Group III. A large part of the imported volume is concentrated in market leaders (80%), much for their lubricant production but also for those that act as official distributors and global producers. The volume has seen linear growth every quarter over the last two years.

Demand for Group II Base Oil is expected to grow at a compound annual growth rate (CAGR) of 6.3% and Group III at 4.8%, according to an estimate adopted by Iconic Base Oil.



Figure 1

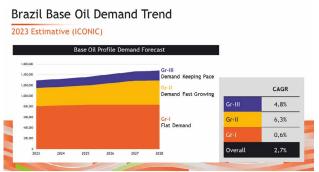


Figure 2

There is also an "open highway" of upgrade opportunities in the market that will positively impact the base oil matrix in Brazil.

The volume sold to the market of high-quality oils needed to meet the requirements of modern engines is not yet compatible with the number of new vehicles on the market, and this is expected to change. The important thing is that the lubricant supply chain in Brazil has all the necessary resources to support this movement, such as additive technology and the availability of quality base oils.



Figure 3



Figure 4

Some points that also require a lot of attention and careful analysis are issues related to distribution logistics and tax management, due to the large distances between cities in the country and different tax regimes in the states of the federation.

ICE Technology Resilience

Another important topic is the resilience of internal combustion engine (ICE) technology, due to the use of ethanol. When the focus is on CO₂ emissions from exhaust gases, ICE flex engines with ethanol have an average of 37 kg of CO₂ equivalent per 240 km, while a battery electric engine (BEV) would produce 54 kg of CO₂ equivalent per 240 km. ICE Flex in Brazil allows the usage from 25% up to 100% Ethanol Fuel. Gasoline, by law, considers up to 27% Ethanol in its composition, as a measure to promote the use of

renewable fuels, even when the user's choice is for a fossil fuel like Gasoline.

When we discuss the production stage of fuels and measure the carbon footprint of producing type A diesel (diesel without biodiesel) versus B10 diesel (diesel with 10% biodiesel), we observe a 7% reduction in this footprint. When examining the fuels used in flex engines - E27 (gasoline with 27% anhydrous ethanol) versus E100 (hydrated fuel ethanol) – the values decrease significantly, reaching a carbon footprint approximately 70% lower. This directly impacts the emissions of the overall vehicle operation.

This means that the transition to electrification will not occur only due to Sustainability purposes, but also due to competitiveness, better-embarked technology, and/or higher customer satisfaction offered by the automotive industry in the electric segment.

Brazil is a few steps ahead in the use of renewables at both the energy and electrical matrix when compared to other markets. For example, the Renewable Energy Matrix accounts for 48% over 15% from a Global Perspective. The same happens to the Electricity Matrix which shows a content of 83% of Renewables versus 17% in a Global Average.



Figure 5

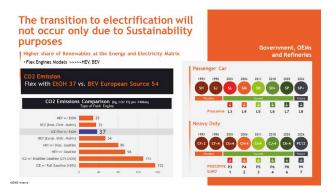


Figure 6

The paramount role of the Regulatory Agency

One of the advantages that needs to be highlighted in the Brazilian market is the preponderant role of the regulatory agent – ANP – National Petroleum Agency.

Its regulatory and educational activities include the rules that need to be adopted for those who want to step into the lubricant business, such as adherence to a lubricant producer or importer registration, which includes audits at the plant, and the need to register all automotive products and some types of industrial lubricants.

The Registration process of lubricant has its purpose of evaluating compliance which is indicated on the product label. It is made through quality audits by analyzing lubricant samples collected from the market. In the end, it promotes, in a certain way, equal competition and quality confidence to the end-users. The closed-loop concept is also a key imperative in the Brazilian lubricant market, and the agency has its leadership in monitoring and auditing the volume of used oil that needs to be collected. Those who do not abide by the rules of percentage that need to be collected, get severe fines. In 2024, the average target will be 48.3% of the total volume produced. In this case, some types of lubricants, mainly those for loss lubrication, are exempt.

Considering all the elements above, we can say that the Brazilian lubricant market is a stable, prepared market, with good opportunities for those thinking about diversifying their business on a global level.

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