

**AB INBEV'S INVESTOR SEMINAR 2018**

**JOHANNESBURG, SOUTH AFRICA**

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**CHIEF FINANCE & SOLUTIONS OFFICER – FELIPE DUTRA**

**SLIDE 1**

Good morning, everyone. Thank you again for joining us for the last three days.

I hope you will be heading home with insight and optimism about our business and operating strategy.

**SLIDE 2**

Even if most of you know me, you may not know that I was born in Rio, my favorite beer is Michelob Ultra and I am most proud of being part of the team that built this company for the last 28 years.

Today, I would like to start by sharing an overview of our debt and risk management policies as we pursue our path to deleveraging.

And then I will switch hats into solutions, as we call our technology and services team, to provide you a glimpse of our digital platforms.  
Before we go there...

**SLIDE 3**

Let's get started.  
Our financial position today is very strong.

Compared to our company at the time of the AB combination in 2008, we have almost doubled our EBITDA, our debt is much cheaper and longer dated, we enjoy a significantly larger liquidity cushion, have limited short-term refinancing needs, and - unlike in 2008 - we do not have any financial covenants.

**SLIDE 4**

The scale and geographic diversification of our business have increased dramatically in the last 10 years.

We have more than doubled our global volumes and now have a leading presence in nearly all of the world's top beer markets.

In 2008, our revenue streams were highly concentrated in US Dollars and Brazilian Reals.

Today, we have a very different footprint, with nearly 60% of our revenues generated in currencies other than US Dollars and Brazilian Reals.

**SLIDE 5**

Not only is our business larger and more diversified than it was ten years ago, but the macroeconomic backdrop is also much more positive today.

In 2008, we were at the beginning of a deep global financial crisis. Today, the macro backdrop is one of stable global growth.

This translates into higher consumer confidence and disposable income, both of which are positive drivers for beer sales.

#### **SLIDE 6**

Because both our company and the global economy are in a healthier position today than they were during the AB combination, our path to deleveraging is also different than it was in 2008.

No drastic measures were required for us to deleverage as a result of the SAB combination. While economic and FX headwinds in certain markets may impact our results from time to time, the fundamentals of our business are strong. Unlike in 2008, we have ample liquidity and access to deep and liquid capital markets around the globe.

We have retained the flexibility to invest in the long-term future of our business while also employing our core strengths to maximize cash flow generation and deleverage to around 2x.

#### **SLIDE 7**

Our net debt to EBITDA ratio increased slightly from 4.80x as of December 2017 to 4.87x as of June 2018, as a result of our cash flow seasonality, which caused an increase in our net debt as well as adverse currency fluctuations in our EBITDA translation.

The increase in our net debt is consistent with prior increases in the first half of the year, given that approximately 65-75% of our cash flow is generated in the second half of the year. This is largely driven by high consumption occasions occurring during the second half of the year, including summer in the northern hemisphere and holiday seasons globally.

Most of our bond maturities and interest payments take place during the first half of the year, and we also had some specific tax payments that were more concentrated in the first half of this year. As a result, we expect to be toward the high end of the 65-75% range in 2018.

#### **SLIDE 8**

Our debt maturity profile provides us with significant flexibility. At the end of 2016, we had 43.3 billion dollars of debt maturing between 2018-2021.

Fast-forward to today, we have reduced the short-term maturity by more than half to a manageable 20.6 billion dollars due between now and 2021. We have a comfortable liquidity position of 16.9 billion dollars, composed of nearly 8 billion dollars of cash and a 9 billion dollar revolving credit facility, which far exceeds even our largest yearly maturity.

A diversified debt currency mix provides us with access to deep and liquid capital markets around the globe, and 93% of our debt portfolio is fixed rate to hedge against rising interest rates.

### **SLIDE 9**

As we primarily look at net debt to EBITDA as a reference for our leverage, starting with the denominator, our diverse set of EBITDA currencies has inherent FX volatility from the countries in which we have chosen to operate, other than the US.

A way to mitigate the impact of this on our leverage ratio is through the currency composition of the numerator, which is our net debt. In a hypothetical world of a perfect FX match between EBITDA and Net Debt portfolios, the net debt should be higher when FX is favorable for EBITDA translation purposes, and lower when FX is unfavorable for EBITDA translation purposes.

What I mean by that is in a perfectly-matched FX portfolio, net debt to EBITDA should remain broadly unchanged despite currency fluctuations.

### **SLIDE 10**

However, practical limitations make a perfectly-matched FX portfolio impossible.

Given our size, we focus on debt markets that can provide individual issuers with a minimum of 2 billion US dollars equivalent of capacity, and ideally, significantly more than this. We look for average tenors of at least 10 years so that we are not exposed to the risk of refinancing large chunks of our debt portfolio every year, given our size.

Another key consideration is cost. We look to fund in markets with comparable funding rates to the US. While debt in emerging markets is available, it is expensive due to high local interest rates, as we will see on the next page.

Finally, we seek to fund in jurisdictions where we can benefit from interest deductibility.

After taking into account these constraints, the most suitable debt financing markets for us are the US, Europe, the UK, Canada and Australia.

## **SLIDE 11**

Let us spend some time further illustrating the limitations to funding in emerging market debt.

In the first column, you can see the composition of our 2017 EBITDA by currency while the second column shows the currency composition of our 2017 debt portfolio. If we attempted to follow a perfect matching approach, we would need to carry 16% of our debt in Brazilian Real, which would require us to raise over 18 billion dollars of equivalent funding in Brazil. This quantum is unavailable to a single issuer in the Brazilian debt markets.

Even if it were available, the tenor would be extremely short, exposing us to almost constant refinancing risk, which would be irresponsible. Moreover, funding costs in Brazil are very expensive. It would cost approximately 7% more to raise debt in Brazil than in the US, and Brazil is even more expensive when compared to Europe.

The same restrictions apply in our other large emerging markets, namely Mexico, Colombia and South Africa.

## **SLIDE 12**

Now I would like to spend some time discussing our risk management principles and how they connect to our current debt portfolio.

The key objective of our risk management policy is to maximize our cash flow while minimizing our earnings volatility, taking into account our global footprint and exposure to a wide variety of currencies. We also seek to protect ourselves against tail risks, such as the 2008 global financial crisis.

Our current framework was developed over the past ten years, and was updated over time as our footprint has expanded and market conditions have changed to arrive at a more sophisticated efficient frontier model.

This model simulates FX rates over various long-term time horizons and extrapolates all mathematically possible debt portfolio combinations that produce the minimum level of net debt to EBITDA ratio volatility at a given interest expense.

Let's take a closer look at this...

## **SLIDE 13**

Here is an illustration of our efficient frontier. The orange curve represents the minimum risk portfolio at a given level of interest expense and is not bound by the market constraints we just discussed.

The extreme point to the left represents the lowest volatility portfolio, which matches the currency mix of our EBITDA closely.

The currency mix also makes this the highest cost portfolio. The extreme point to the right represents the lowest cost portfolio, which consists entirely of Euro debt. This is also the highest volatility portfolio, given concentration in a single currency.

However, as we discussed, neither portfolio is feasible given market constraints. Layering on market constraints, we arrive at the portfolios represented by the blue dots, which comprise the constrained efficient frontier.

#### **SLIDE 14**

This slide zooms in on the constrained efficient frontier and our current portfolio.

While all portfolios on this line are theoretically optimal, we have a targeted range that we prefer because after a certain point, a reduction in risk is not worth the erosion of cash flow. You see that our current portfolio is very close to our targeted range.

Offerings in our core non-US dollar markets bring us closer to our optimal range on the constrained efficient frontier by lowering our leverage ratio risk while maintaining or lowering our current cost of debt.

Currencies such as the Australian Dollar, Canadian Dollar and the Euro have especially strong correlations to the Brazilian Real, South African Rand and Colombian Peso.

#### **SLIDE 15**

Following our risk management framework, and factoring in the market constraints we discussed, we end up with a “mismatch” between the Brazilian Real, our largest non-US Dollar EBITDA currency, and the Euro, our largest non-US Dollar debt currency. However, the Euro has been an effective offset to the Brazilian Real over the long-run.

All of the graphs on this slide show the total and relative cost of a hypothetical \$100 loan denominated in both the Brazilian Real and the Euro over a 3-year rolling period for the last 10 years. The top left graph shows that the Euro loan has been consistently and materially cheaper than the Brazilian Real loan for the last ten years.

The bottom left graph illustrates the FX impact when translated to US Dollars. The Euro has been favorable more than 50% of the time.

Finally, the graph on the right shows the total cost of these loans, including both the interest costs and FX impact.

While the FX impact may fluctuate over the long run, with the Brazilian Real being better at times and the Euro being better at others, the interest savings on the Euro loan make it the more efficient option for the last ten years, except for a brief period in late 2011 through early 2012.

I hope this presentation has provided a helpful overview of our financial position, risk management policy and net debt mix rationale.

## **SLIDE 16**

I would now like to switch over and tell you about what we are doing in the Solutions team to leverage technology in my other role as Chief Solutions Officer.

## **SLIDE 17**

I will focus the solutions agenda specifically on the digital transformations we are driving.

We have defined 5 major areas, where new technologies will help us drive increased sales uplift, efficiencies and simplification in the way we run our operations. The 5 areas are customer, consumer, supply chain of the future, operations and data analytics.

Our customer interactions are fundamentally changing; where before we relied mainly on physical interactions at the point of connection, we are now driving to an increasingly digital way of interacting with our customers through B2B, Telesales, Chatbots or EDI, as part of the contact strategy.

In a similar way, our touchpoints with consumers are being significantly transformed. We are targeting to increase our earned media to 30% and already have e-commerce operations in 20 countries, as you'll hear more from Pedro shortly.

Just to mention upfront, we have been working very hard on GDPR compliance this past year and we are extending the same rules to all of our regions as compliance with consumer data privacy is the cornerstone for our interactions with consumers.

While Consumer and customer engagements will drive increased top line growth, by revamping our supply chain and infusing technology into supply, logistics and procurement, we will drive substantial savings over the next years. This will be achieved through a more efficient and sustainable supply chain.

Through automation, such as chatbots, Robotics Process Automation, Artificial Intelligence, or AI, and Machine Learning, as well as a fundamental revamp of our transactional backend platforms, we will target to move transactional activities to be performed by algorithms and allow our teams to focus on more strategic tasks.

All of this is supported by data platforms – currently being built in the cloud – and by extending our current analytics capabilities, which will ultimately be able to support our most relevant decisions by algorithms. We are seeing technology as a huge enabler for the future of our company.

Let me now give you some more details about each of these areas.

### **SLIDE 18**

Using our new market maturity framework, we have revamped and customized our contact strategy model, effectively enabling a full 360-degree customer experience.

This fundamentally changes the way our sales teams operate. The customer can order through our B2B platform, our telesales agent will call him or her to sell an additional promotion, and our sales rep will continue to visit the POC but with a focus on more value-adding activities.

And finally, the logistics team will play the role of ensuring the delivery is done in the best way possible, all of which was presented by David Almeida on Tuesday.

### **SLIDE 19**

These changes are currently being implemented across the globe, prioritized for our L2, L3 and C3 markets.

As you can see, the digital shift is already under way, effectively moving over 70% of our interactions to digital by 2021. With the number of users for B2B increasing to over 2.5 million, our cost to sell will reduce by 20% in the next 3 years.

### **SLIDE 20**

Our connected POC platform allows us to analyze consumer behavior at the POC level and provide valuable insights and recommendations to our customers. Let me show you a short example of how we can monetize the connected POC data.

Through machine learning and AI, we are able to gain much deeper consumer insights and work with our POCs to optimize their offerings. This allows us to bring the right product offering and combos to our consumers.

In a recent example, we found that while beer shares were declining after 10pm, overall alcohol sales continued to grow, especially whiskey.

### **SLIDE 21**

Based on this insight, we created a specific promotion of Whiskey and beer for late nights, for selected POCs, working together with our customers in our test market for this initiative.

### **SLIDE 22**

Through our connected POC platforms we can precisely measure our results. In this case we lifted the revenues for our customers by over 5% and also increased our volume by 3.8%. It is a real Win-Win-Win for our customers, consumers and our company.

The beauty of this platform is that we do not need to be in every single POC but rather in a sample of POCs that are representative of each region and roll out the programs accordingly.

### **SLIDE 23**

Our Connected POC initiative is at the intersection of customer and consumer, and therefore, let me now transition to talk about the digital transformation happening in the consumer space.

Let me reiterate that all our data initiatives are strictly compliant to the GDPR requirements, and we are now moving all our regions to the same guidelines as the EU.

So how do you get to know your consumers?

In the past, it was very difficult for us to exactly identify our consumers and therefore challenging to provide them with the most relevant experience. Through improvements in our data platforms we are now not only able to precisely identify our consumers but also tailor our interactions with them.

By using data we can now link different consumer habits let's use for example one of our Budweiser consumers from our B2C platforms, who is also a fan of soccer and more precisely of Colombia.

#### **SLIDE 24**

Matching the data, we can now offer promotions that are relevant for this particular consumer, effectively providing the best offering for him and showing him content that he will consider relevant.

#### **SLIDE 25**

By putting all of this together and leveraging our technology, we can create a consumer profile that we will further enrich, so that we can continuously improve our capabilities to provide consumers with the right beer at the right price at the right time now that we all know Miguel Santos.

#### **SLIDE 26**

Leveraging this data, we can also complement our survey-based consumer insights with real time social media insights, improve media efficiencies by 10% and support the B2C expansion through tailored content to drive top-line growth.

Let me now shift to how we are leveraging technology to improve our supply chain

#### **SLIDE 27**

We have changed our approach from one size fits all to a clear, tailored approach developing different capabilities for different types of breweries, so that we optimize our investments and their payback.

This means that we have split our supply operations into three clusters according to size and maturity. All breweries will profit from increased safety and quality programs – based on our foundational technology program.



We will connect the critical machines through Internet of Things (or IOT), leveraging the Connected Brewery Platform as you see on the bottom of this slide.

For the next layer, including approximately 75 breweries, we will not only connect all machines but also roll out our own Manufacturing Execution System (or MES) which is the most important part of our Managed Brewery platform. We will also be equipping our employees with a suite of mobile capabilities to drive productivity, energy and waste savings under our Mobile Brewery platform.

For our top 50 breweries, we are going ahead with the full breadth of our capabilities, fully connecting operating machines through IOT centralizing processes and automating most manual processes by leveraging AI under our Smart Brewery platform.

Regarding logistics, we have started to already centralize our operations – such as our international logistics, which are centrally operated out of Prague. And we are building increased technology capabilities for our Tier 1, Tier 2 and Warehouse operations.

Here we developed proprietary software allowing us to track trucks, or our loading and unloading processes via image recognition or new mobile platforms.

## **SLIDE 28**

Similar to our supply chain, we are working on automating our back-office operations. We started centralizing in shared service centers over 15 years ago, but now we can profit further from our extended global footprint.

We are focusing on 4 enablers to drive efficiencies in this area. To start we are using Robotics Process Automation to drive End-to-End process optimization globally. Ultimately, we believe that machine learning, AI and robots will increase these efficiencies even further.

We are increasing penetration of our global service catalogue, effectively being able to use best practices from each of our operations to implement the best way to operate in each of our geographies. Adding new capabilities such as the customer experience center, closely linked to our contact model, or supply chain activities allows us to further expand our centralization.

Finally, we continue on our journey to consolidate our shared service centers into five more specialized centers.

## **SLIDE 29**

As a result of the transformations in our back offices, we see transactional processes being more and more automated and we can have our teams focus on much more value-adding tasks.

We estimate that over the next 5 years we will be able to reduce significantly, if not entirely, all transactional processes through AI and machine learning. All of this is only possible due to a revamp of our data platforms and our analytical capabilities.

## **SLIDE 30**

Let me give you some details into these areas.

Our journey started back in 2013 when we founded the Bud Lab, an incubation center for analytics at the University of Illinois. In the early days we mainly focused on revenue management initiatives, but in 2016 we opened an analytics center in Bangalore which is now running analytics globally. We execute over 200 projects per year and have over 150 data engineers, scientists, architects and business analysts.

Regarding data, we have started to build a new data platform across all business units. We are prioritizing data, such as B2B transactional data which we use to develop suggested orders, behavioral analytics, out of stock alerts or consumer data for audience targeting or resource allocation algorithms.

Besides scaling up our analytics capabilities, we are changing our approach to analytics: we now have analytics members in all development stages of our technology products, working directly on algorithms to drive sales uplift and increase efficiency.

While all of this is already in progress, we are also looking toward the future to ensure we are not missing trends, so let me talk briefly now about innovation.

## **SLIDE 31**

Our main hub for innovation is currently the beer garage in Silicon Valley, and we are using our global footprint to connect into start up ecosystems with a focus on Israel and India, as well as our regional presences.

Working with start-ups and smaller technology providers is a key element for us to keep our platforms ready for integration of new trends and technologies driven towards increasing customer and consumer experience, sales uplift, increased efficiencies, better employee services and higher sustainability.

Where the bulk of our teams are focusing on scaling out the platforms I mentioned earlier, we have dedicated teams exploring the emerging technologies.

We are investing for the long term and working through the valley of despair, learning how to fail fast and iterate much like a startup. We want to innovate with our partners and seek out non-consensus, which is typically a fertile ground for innovation.

To staff the teams working on emerging technologies, we work with the concept of two pizza teams, meaning we can feed the team with two pizzas, and ensuring we keep the teams small and nimble.

At our company, as many of you know, we are continuously learning, adopting best practices and copying with pride. While there are a multitude of areas we believe we need to keep an eye on and continue exploring, let me provide you more details on three specific trends.

### **SLIDE 32**

We believe Natural Language Processing and voice capabilities will be transformational for our customer and consumer interactions in the future we are currently working on a pilot for connected homes, as well as voice enablement for our B2B platform and sales systems.

For smart packaging, we are currently working on tracking kegs and cases via RFID, and we are exploring tracking technologies for single units such as a bottle. This allows us to move units much more efficiently across our breweries and warehouses.

Imagine also the amazing consumer insights we could gain and in turn the better experiences we could provide to our consumers. We have three active pilot projects using blockchain.

In logistics, where we are looking to radically increase the speed while reducing overall costs for our supply chain for consumer loyalty programs, going live first for our employees to ensure we have a perfect product for our consumers ready and for age gating, where we had the first blockchain enabled age-gated vending machine launched in April in the US.

In conclusion, I am proud of the transformation we did over the past few years and I have been enjoying the solutions part of my role very much, but I will not rest until we complete our digital transformation journey.

I am optimistic that we will become a digital disruptor and create digitally-born new business models in the near future.

Thank you very much for your time.