

# **AK AQUA FOOD AND BEVERAGES**

## **INTERNSHIP REPORT 2022**



**Submitted By:**

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**Under the Guidance of**

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**2021-2022**

## **DECLARATION**

I do hereby solemnly declare that the work presented in this report entitled “AK Aqua Food and Beverages” has been carried out by me and has not been previously submitted to any other university or college /organization for academic qualifications /certificate or degree.

The work I have presented does not breach any existing Copywrite act and no portion of this report is copied from any other work done earlier for a degree or otherwise.

Place: Goa Business School

Allan Valentino D’cruz

Date: 13<sup>th</sup> July 2022

MBA PART 1

2111

## **ACKNOWLEDGEMENT**

I would like to express my sincere gratitude to Mr. Vishal Gawas (Managing Director) for his guidance and helpful advice throughout my placement. He generously provided me with the crucial information I needed for my project, and it was only because of his kind and essential cooperation that I was able to complete it.

I also want to express my gratitude to all of the managers at AK Food and Beverages who helped me finish this assignment successfully.

My sincere gratitude goes out to Mr. Suraj Velip and all of our faculty members for allowing me to participate in such assignments and exposing me to the realities of the day-to-day business environment.

I would also thank my Institution and my faculty members without whom this project would have been a distant reality

I view this opportunity as a significant turning point in my professional development, and I'll do everything in my power to make the greatest use of the knowledge I've learned and keep improving it to meet my intended career goals.

Allan D'Cruz

# A.K AQUA FOOD & BEVARAGES

Manufacturing of Package Drinking Water

Date: 13/07/2022

## TO WHOM SO EVER IT MAY CONCERN

This is to certify that Mr. Allan Valentino D'Cruz has completed internship in this organization from 16<sup>th</sup> May 2022 to 13<sup>th</sup> July 2022.

During the period of his internship program with us he had been exposed to different process and was found punctual, hardworking.

We wish him every success in his life and career.

This certificate is issued on his own request.

For A.K Aqua Food and Beverages

Authorized Signatory



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## **EXECUTIVE SUMMARY**

The report is based on a study done in AK Aqua Food and Beverages between May 16 and July 8, 2022 for the summer internship placement project.

During the first year of the MBA, the summer internship plays a crucial role. Students gain first-hand knowledge of how various departments in the firm operate, and it also helps us connect the concepts we study to how they are used in other departments in the workplace.

To gain as much exposure to the corporate world as possible, the primary goal of my training at AK Aqua Food and Beverages was to study organizational structure and function. to put the theoretical information gained from the MBA course into practice while comprehending the scope, duties, and responsibilities of numerous departments inside this firm.

## **INTRODUCTION**

The industry for bottled water has emerged as one of the most competitive and quickly expanding markets globally. A multibillion-dollar industry, bottled water is found all around the world. The sector has experienced a spectacular growth trajectory.

Although the earliest human civilizations used containers to store and transport water, the first water was bottled in the United Kingdom in 1622 at the Holy Well. Jackson's Spa in Boston bottled and sold the first water that was marketed for sale in America in 1767.

### **National (India)**

In 1965, the Italian-based company Bisleri Ltd. launched the first glass bottles of bottled water in India under the brand name "Bisleri" in Mumbai. There were two varieties available: still and bubbly.

Because of its widespread use there, the brand name Bisleri is now referred to generally as bottled water in India. In terms of consumption of bottled water, India is one of the top 10 nations. One of India's industries now experiencing the fastest growth is drinking water.

### **Domestic (Goa)**

In 1981, packaged drinking water first became available in Goa. The packaged drinking water market in Goa has grown significantly over time. Water firm "Jal" was the first to offer bottled drinking water.

Goa has more than 20 domestically produced packaged drinking water brands. The Goan market is seeing successful expansion in this sector.

### **Company Profile**

Mr. Vishal Gawas founded AK Aqua Food and Beverages as a small business in 2013. Its first brand was called "Spiritual" and it was into bottled drinking water business from the beginning. However, they quickly launched a different brand in 2015 called BrandX and completely rebranded with a new product called Briza in 2017, which is still in production today. With an annual revenue of Rs 4 crores and an average monthly sales volume of 45,000 crates of packaged

drinking water, AK Aqua Food and Beverages specialises only in packaged drinking water. The business is open from Monday to Saturday and only works one eight-hour shift every day.

### **Briza Packaged Drinking Water**

Briza, its newest product, is treated using micro filters and then ozonized and UV sterilised. Fully automated three station rinsing, four station progressive filling, capping, and shrink wrapping of bottles are all part of the packaging process. There are 2400 crates of production every day (28,800 bottles in an eight-hour shift). With an infeed conveyer, an outfeed conveyer, and an inspection cabinet, it can pack 60 bottles per minute. The bottles come in 500 millilitre and one litre bottles, respectively.

The infrastructure has a 49 kva capacity. With a 55 kVA generator and a bore well equipment producing 5000 litres per hour, the government provides energy. Up to 3500 crates of one-litre bottles can be kept in the storage area, while the storage tanks can hold over 16,000 litres of water (before treatment and the real procedure).

The equator premises are located 6 km from Vasco, which has a train station, and close to the Dabolim airport. It is possible and convenient for AK Aqua Food and Beverages to operate from this site.

## **PRODUCT**



*Figure 1: Briza (bottle of 1 litre)*



*Figure 2: Crates ready for dispatch*



## **SWOT ANALYSIS**

### **Strengths**

- B2B: • As it is a business-to-business transaction, the distributors makes it easy for channeling into the different retailers, thus saving cost for the company.
- Latest equipment: The firm uses modern machinery (automated) is used for operations which can package 60 bottles per minute utilizing minimum man power.
- Operations Management: AK Aqua Food and Beverages produces packaged drinking water as per order which avoids wastage of inventory and reduces warehousing costs. It reduces extra work required in handling the products in warehouse and loss of stocks.
- Skilled Labor: Firm has skilled labour in certain departments such as Quality Control where a proper check is maintained by the experts to ensure the standards. The chemist and biologist ensure that the water is of top quality and meets the required standards for consumption.
- Taste of the water: The packaged drinking water of 'Briza' is tastier than its competitors which gives it an edge over those, who have used the competitors' products.

### **Weakness**

- High Competition: The existence of high competition, such as Bisleri, Kinley, Bailey, etc., prevents AK Aqua Food and Beverages from increasing its market share.
- Lack of distinguishing characteristics: AK Aqua Food and Beverages has few characteristics that set it apart from the other brands in the Packaged Water area. Besides the taste (which only those who have actually tasted all brands would know) there is no much difference in any way from the competitors' products.
- Unorganized shop floor: The infrastructure and facility layout is cluttered and unorganized at the production unit. The preforms are developed into bottles in a separate room while the transforms are then stored in the separate area. However, it takes extra manual efforts in carrying the molded bottles to packaging area.

## **Opportunities**

- Tie-Ups: AK Aqua Food and beverages could seek out more partnerships with establishments including hotels, eateries, sports teams, institutions and others to boost sales and advertising.
- Product diversification: • They have the choice to experiment with alcoholic and nonalcoholic beverages. Having a unit already in place, AK Foods and Beverages have the opportunity to start aerated drinks (soft drinks) as locals drinks (especially lemon and ginger flavor) has demand in the state.
- Distribution: The greatest and only way for water firms to sell more products is to expand the product's distribution. Briza has its main market in North Goa, especially in Candolim and are mainly dependent on tourism. Since everyone needs water, the more places the brand is present, the more sales there will be. Distribution is, of course, hampered by manufacturing and shelf life.

## **Threats**

- Safety: Since there is no safety measure practiced, there are possibilities of employees getting seriously injured. The company should provide safety kits (masks, gloves etc) not only for the safety of the workers but also to maintain hygiene in the firm for better product.
- Water scarcity: Because the government can decide to restrict the water supply (both externally and even put a ceiling on extraction/pumping water from bore wells to 16,000 litres per day) to packaged drinking water firms, water scarcity poses a serious danger to AK Aqua Food and beverages.
- Low capital required: The packaged water sector requires less money to set up the plant making it simpler for newcomers to enter the market. The cost of setting up an industry and the process of making the packaged drinking water is simpler as compared to the other industries, which makes it easy for the new entrants.
- Local competition: As a result of being a barrier to industrial growth, local competition is also becoming a threat. Besides the multi-national brands, there are many local brands existing

in the market, which makes it a little difficult to grow and there is constant fear of competition.

- High brand switching: People rarely have a preference for one brand over another when it comes to packaged water, therefore sales are largely dependent on the retailer or seller. People will drink any brand of bottled drinking water that is offered to them as long as they are thirsty and it is packaged.

## **VRIN ANALYSIS**

The VRIN framework places a strong emphasis on the characteristics of resources that enable the company to create its sustained competitive advantage. These resources have four qualities: value, rarity, imitable nature, and non-substitutability. However, these attributes only become resources in a firm's environment when they seize opportunities or counter threats.

### **Valuable**

It must first be valuable. When resources help a company develop or put into practice plans that increase productivity and effectiveness, they are valuable. Water is the most precious resource at AK Aqua Food and Beverages, and as it is pumped from a borewell, there is a plentiful supply available for the production of packaged drinking water. Minerals have been added to the Briza water bottles. Potassium bicarbonate is one of them, and it has been suggested that bicarbonate-rich mineral water (BMW) can treat or prevent type 2 diabetes (T2D) in people. A case study claimed that consuming mineral water and an alkaline supplement like potassium bicarbonate was sufficient to dissolve uric acid kidney stones and lower uric acid levels.

### **Rare**

Second, resources must be uncommon compared to the firm's existing and potential rivals. When a firm is adopting a value-creating strategy that few other firms are doing at the same time, it has a competitive edge. Water is AK Aqua Food and Beverages' most valuable resource, and it is rare. Water is abundant in Goa, but what sets it apart from the competition is that it is pumped from a borewell, where the sedimentation of rocks at the bottom has made it possible to obtain a purer form of water with added natural minerals. The Bureau of Indian Standards has approved only two facilities for Type 1 groundwater purity: AK Aqua Food and Beverages and Kingfisher.

## **Inimitable**

It is more likely to offer a long-lasting competitive advantage the more expensive and challenging it is for rivals to copy. There is a demand for packaged drinking water throughout the tourist season, and the distributor has learned that the majority of sales take place in Calangute, ensuring a consistent increase in market size and demonstrating inimitable success.

## **Non-substitutable**

If there are resources that can completely replace the firm resources that are sources of its competitive advantage, it means that those firm resources are not rare and may not even be valuable, so they cannot be a source of sustainable competitive advantage for the firm. The Briza water packaging brand is interchangeable with any other water packaging brand, but its pure groundwater, which includes natural minerals is pumped and filtered, and its distinctive flavour sets it apart from the competition. In the end, it comes down to personal taste and preference; what one person may enjoy, another person may not.

## **PORTERS FIVE FORCES**

### **Threat of new entrants: moderate**

There is little danger of the introduction of new rivals. First off, there are currently powerful, dominant firms that control a sizable portion of the market. The competition for new market entrants will come from well-known companies like Coca-Cola, PepsiCo, and Nestle. These brands have years of expertise in the food and beverage sector, have built strong brand awareness and loyalty, and have achieved competitively low manufacturing and distribution costs.

### **Threat of Substitutes: High**

There are several bottled and unbottled goods that can replace bottled water with ease. Because it has no sugar and no calories, bottled water appeals to a market that is health-conscious, which is what sets it apart from other soft beverages. Today, there are a number of sugar-free, calorie-free sodas that are good substitutes for water. Examples include Coke Zero, crystal light powders, diet sodas, zero-calorie energy drinks, etc.

### **Bargaining power of Buyers: High**

First off, there are a ton of options for bottled water and other drinks. Second, consumers don't incur significant switching costs. The sales are based on tourism and since the customers are price sensitive, the pricing has to be very competitive.

### **Bargaining power of Suppliers: Low**

Since there are numerous suppliers of raw materials for bottles and labelling, the suppliers' influence and capacity to negotiate is restricted. However, they do have the choice to easily switch suppliers if they don't want to pay outrageous costs for raw materials.

### **Rivalry among existing competitors: High**

For market share, there is fierce competition. Competitors make significant marketing investments to sell their goods. The consumer has a lot choice at their disposal to choose from.

## **PESTLE ANALYSIS**

### **Political**

For the food and beverage sector to succeed, a stable political environment is essential. Here are a few factors that could affect the food and beverage industry:

- An increase in taxes and tariffs raises the price of the manufactured good. Considering this as the water packaging unit, there is an 18 per cent GST on the same, but a further increase on taxes would increase the price of the final product.
- The revenue of the company is impacted by modifications and changes in governmental policies. As in this case, there is a ceiling from the government for extraction of water from the bore wells (16,000 litres per day) it restricts the company to package just 16,000 litres a day as they are wholly depended on the bore wells for supply of water.
- The government may impose fines on manufacturers if they don't uphold legal requirements. Example: if the company is found extracting/ pumping out more water than the permissible limits.

## **Economic**

Even the packaged water bottle industry is affected by a country's economic downturn. The "PESTLE Analysis" found the following economic factors, which may or may not have an effect on the food and beverage industry:

- The company revenue is affected due to inflation and deflation in the market as and when arises. Any well-managed industry expands along with the economy when it is robust.
- The tourism sector was impacted by COVID and lockdown, which in turn decreased demand for bottled drinking water because most of its sales occur during the travel season. After the lockdown, the tourism sector is currently thriving, which has boosted the company's sales and generated income.
- Even a negative growth rate has the benefit of a low borrowing interest rate. As a result, firm is able to borrow money for product and technological research. The corporation would be able to launch new products on the market for less money because the cost of performing the research would be lower. This would encourage individuals to spend money on bottled water purchases because they would be more affordable.

## **Social**

The huge food and beverage industry is greatly influenced by sociological factors. The expansion of the food and beverage sector may be impacted by the sociological issues listed below:

- Everyone desires to live a long and healthy life. People are now becoming more aware of their nutrition. Due to consumers drinking more water and Coca-Cola than beer and alcoholic beverages, this had an impact on the alcoholic beverage industry. the popularity of bottled water, which is quite practical in daily life. As people get older, they take their health more seriously, which will keep the industry company in demand and continue to operate.
- It provides employment opportunities to the local people. The firm is located in Chicalim and have almost every employee from the same region (Mormugao taluka). However, the firm relies on daily wage workers for the manual labour work.

- There is huge scope of introducing job opportunities by introducing marketing and HR department in the organisation which would give expertise to the firm in getting the required task done.

## **Technology**

The food and beverage industries rely largely on the ongoing technological improvements because they are so prevalent nowadays. The PESTLE Analysis illustrates how technology has affected business:

- Advancement in technology brings down the cost of production. The use of plastic bottles and cans as packaging has benefitted customers by making it easier for them to purchase these goods. This makes it simpler to transport and discard.
- The bottled water sector needs to do proper marketing and advertising, including elegant television and internet advertisements. Bottles are now being produced in two sizes and forms, making them considerably easier to carry, dispose of when empty, and reuse. As technology advanced, new pieces of equipment were created that made it simpler to construct packing bottles with the use of a blower.
- The automation technology used in the production of bottled water has boosted the bottling plant's productivity. The bottling company uses cutting-edge technology, which yields products of the same quality while requiring less labour in production, maximising the use of available resources. Manual bottling can be replaced with other tasks requiring human labour.

## **Legal**

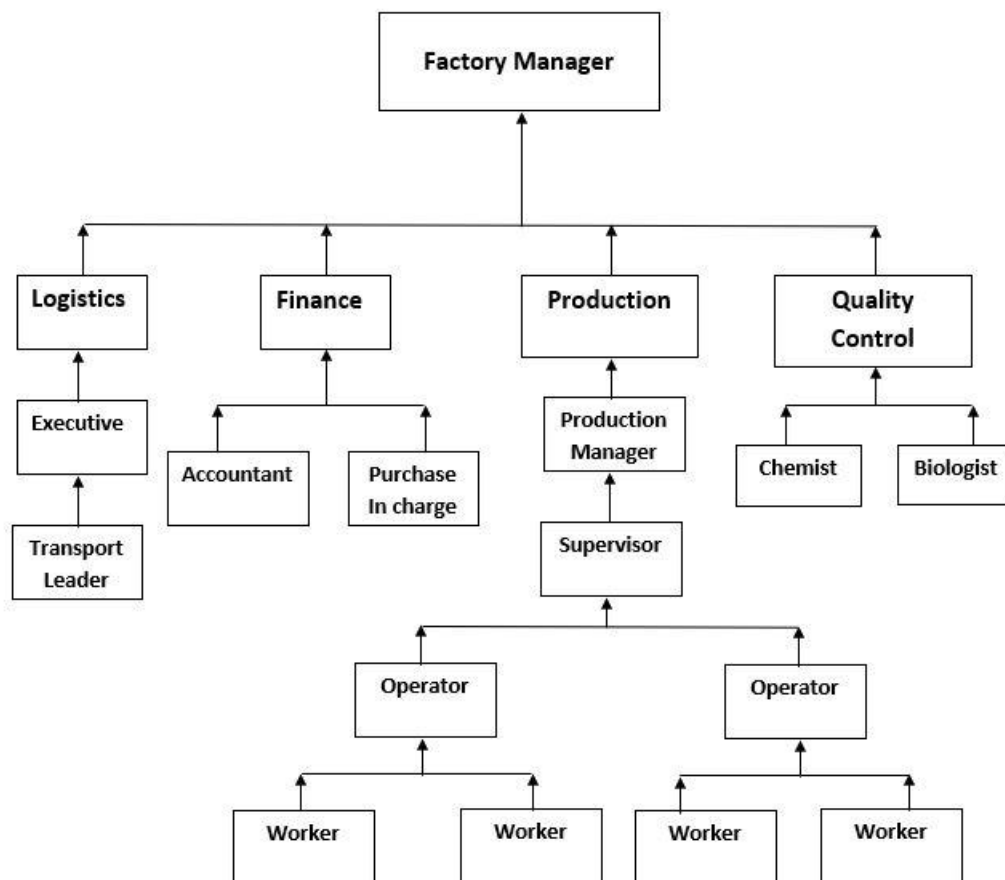
While governments uphold its laws and regulations, the legal system of a country has little impact on the food and beverage industry. To be eligible for the sale, the corporation must pass numerous requirements and safety checks, as well as deal with a lot of safety and security. To avoid any legal actions, AK Aqua Food and Beverages must make sure that all quality tests are carried out and that they are successful. Additionally, it must adhere to all regulations for constructing production facilities, and transportation permits are crucial for the organization. Since many firms didn't have FSSAI license earlier, the authority has made it mandatory for the firm to have one.

## Environmental

- A significant contributor to climate change is the usage of plastic by bottled water companies like AK Aqua Food and Beverages. The organization, therefore, makes an effort to maintain a safe and healthy atmosphere.
- It is crucial that the plant use sustainable practices because it works with both water and plastics. Additionally, the firm must monitor their waste management procedure.
- There is a wastage of 100kg of plastic bottles, which is sold for Rs 22/ kg to the scrap yard. The company tries to reduce the wastage by their possible means but haven't been able to stop it fully.

## ORGANIZATIONAL HEIRARCHY

### AK Aqua Food & Beverages





## **PRODUCTION DEPARTMENT**

The factory manager notifies the production manager as soon as a sales order is received specifying the quantity of packaged drinking water bottles needed. Pumping raw water from the bore well and turning it into filtered water start at the same time as the process of turning preforms into bottles.

The workers manually organize and store the preforms once they have been transformed into bottles. The supervisor is in charge of this work, and it is his responsibility to report to the production manager. The production manager must also keep track of how much water is pumped, cleaned, and stored and ensure that it does not exceed the amount needed.

When every bottle is prepared, the supervisor notifies the production manager, who then consults with the factory manager and approves the start of filling the bottles. The empty bottles are manually placed on the conveyer belt, where they are washed and rinsed thoroughly one at a time before being filled and sealed. The products are labelled followed by shrink packaging (12 bottles for -1 litre each bottle). The production manager and supervisor are present from the beginning of the filling process to the finish of the packing process. The production manager then submits a report to the factory manager.

### **Bottle Making Process**



*Figure 3: PET preforms for plastic bottles*

## **Preform**

PET preforms, also referred to as "preforms," are an intermediate good used in the production of bottles. The term "PET" refers to the polyethylene terephthalate that is used to make them. These Preforms are procured through an outside vendor and transformed into bottles.

## **Reheat**

Preforms are transported through a conveyor to an infrared heating device where they are heated until malleable. The thickness and shape of the plastic bottle can be affected by the heat level by adjusting it at different spots.

## **Stretch**

After being pressed by the stretching rod, preforms are stretched and prepared for blowing.

## **Bottle Blowing**

After being heated and stretched, the preform is blown with high-pressure air, which causes the bottle shape to come to life and fill the bottle mold. The preforms shape is altered through this technique without affecting the size or weight of its neck.

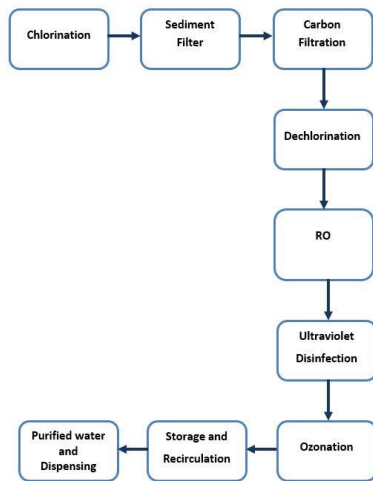
## **Demoulding**

The bottles are then removed from the molds after being opened. At AK Aqua Foods and Beverages, the equipment cranks out 60 bottles each minute.



*Figure 4: Bottles ready to be filled*

## **Water Purification Process**



*Figure 5: Carbon Filtration and Dechlorination process*

### **Chlorination**

Since AK Aqua Food and Beverages' water source is a bore well, the water must be chlorinated, which involves adding chlorine to the water to eliminate parasites, bacteria, and viruses.

### **Sediment Filter**

Larger particles like sand, mud, or grit are captured by the five-micron sediment filter. To avoid fouling and clogging the more delicate equipment employed later in the process, these big particles must be removed very early in the process.

### **Carbon Filtering**

Following the sediment Filtration, the water enters the carbon filtering stage, where it is cleaned of chlorine, pesticides, herbicides, and other organic contaminants like trihalomethanes (THMs).

### **Dechlorination**

After the carbon filtration procedure is finished, the water goes through a dechlorination process using a chemical agent called sodium meta bisulphate.

## **Reverse Osmosis**

The core of the AK Aqua Food and Beverages water purification system is reverse osmosis (RO). The height pressure is used to force water across a membrane in our cutting-edge reverse osmosis system, leaving contaminants behind. The membrane can only pass untainted water. Even the dissolved pollutants that conventional filtration cannot remove are caught and removed. This results in water that tastes fantastic and is purer than mineral water, spring water, or water that has been filtered at home.

## **Ultraviolet Disinfection**

The water is passed through a bigger ultraviolet (UV) light-containing chamber during this step. UV light has potent sterilant properties. The UV light eliminates any bacteria, viruses, or other microbiological pollutants that may be present. The first stage of chemical-free disinfection is this.

## **Ozonation**

The purified water is exposed to ozone (o<sub>3</sub>) during this stage of filtration and disinfection. Ozone is a potent oxidizer that may destroy a variety of pollutants, impurities, and pathogens, including cryptosporidium. Because ozone is not a stable condition for oxygen, it eventually returns to its original state. The disinfection procedure is straightforward but very efficient. The best part is that it doesn't use any odd chemicals or additions; all it needs is pure, natural oxygen.

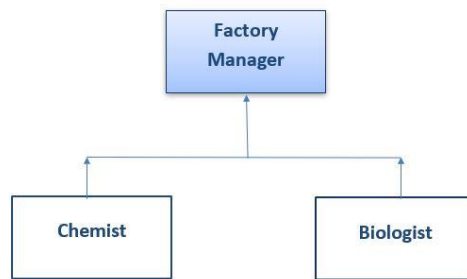
## **Storage and Recirculation**

The water is now transferred to a storage tank made of FDA-approved food-grade material, where it circulates continually. To keep the system clean and free of microorganisms, more ozone is periodically supplied during recirculation.

## **Purified Water Dispensing**

At AK Aqua Food and Beverages, water is pulled straight from the continuous recirculation loop when a bottle is filled. All surfaces that come into touch with the water in the dispensers are made of stainless steel for increased safety. Enough ozone is present in the water as it flows through the dispenser and into the bottle to sterilize the container.

## **QUALITY CONTROL DEPARTMENT**



The creation of the packaged drink water involves the Quality Control division of AK Aqua Food and Beverages from start to finish. It primarily comprises of two key individuals, a chemist and a biologist. Batch production is examined for microbial activity each time it is finished or stopped. Agar plates or media plates, which are kept at various locations throughout the facility, such as next to tables, conveyor belts, blowers, etc., are used to do this.

The media plates are exposed for about three to four hours, after which they are incubated and examined for evidence of microbial activity. If any are discovered or not, the facility is cleaned and checked to make sure there are no microorganisms present.

Water purification chemists, who are in charge of making sure the water is fit for human use and consumption, gather the samples of purified water before pouring and sealing the water into the bottles. The purified water is subsequently dispatched to fill the bottles after receiving the chemist's approval.

## **COMMERCIAL AND LOGISTICS DEPARTMENT**



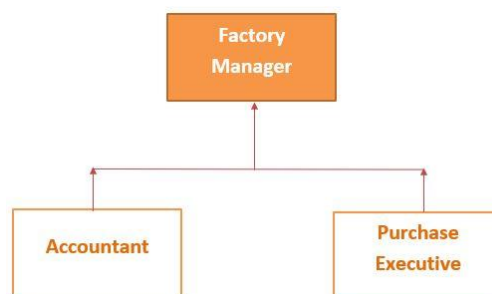
The Logistics department serves as a middleman between the company, clients and carriers. There are two key persons involved in this procedure. When a shipment is prepared for shipping, the executive makes arrangements for transport vehicles. The transport coordinator makes sure that the goods are picked up on schedule and delivered to the distributor in a timely manner. This is then relayed to the executive, who keeps track of the time of dispatch till the goods reach the distributors while also periodically updating the

factory manager. The success of any manufacturing company's operations depends heavily on logistics management, which also directly affects their bottom line.

The broad definition of logistics in this context often covers a wide range of topics, including order fulfillment, material handling, and transportation management. If logistics are ineffective, even if the company has a fantastic product at the right pricing, it could still fail miserably.

The logistics department at AK Aqua Food and Beverages has a few objectives, including quick response after product packing to dispatch and documentation, consolidated shipments, high-quality service, minimal inventory costs, and little fluctuation.

## **FINANCE DEPARTMENT**



A small-scale manufacturer of packaged drinking water bottles, AK Aqua Food and Beverages only creates one product, which is the financial department has a dual function in the accounting and the purchasing of packaged drinking water. The accountant and the procurement officer are two essential members of the financial department. They collaborate closely. The managing partner, who manages the sales order and works in concert with the relevant departments, forecasts the sales throughout the tourist season.

Every time a sales order is received, the purchase executive places an order for the raw materials needed, but he must first confirm that there is a need for that quantity of raw materials. For example, if a sales order for 500 crates were needed, but there was leftover inventory from the previous purchase and 600 units of polyethylene terephthalate preforms were already in the warehouse, the purchase officer would need to determine how many preforms will be needed to fill the order, keeping in mind the buffer stock. The accountant oversees all financial transactions that occur prior to, during, and following the production process. The accountant makes sure that monies are available when and where they are needed.

## **HUMAN RESOURCE DEPARTMENT**

Since AK Aqua Food and Beverages is a small-scale production company, the factory manager handles the functions of the human resources department. There were around 15 to 20 workers in the sector. Daily wage employees make up about 60% of the workforce.

The factory manager keeps track of the approved labor suppliers who provide the plant with day laborers on a daily wage. The plant manager monitors the daily wage workers' attendance and examines the labor contractor's filed payment bills accordingly. Based upon the funds required the Factory Manager then notifies the Finance Department of their payments and maintains the cost sheet.

The Factory Manager gives instructions to the labor contractor for the supply of additional manpower or the discontinuation of service of excessive manpower in the event of a decrease in workload based on the necessity or reduction of manpower from the production department.

The factory manager also keeps track of the contract security systems that the business has assigned. He assesses the payment vouchers they provided and sends them to the accounts for payments. Regarding staff attendance, candidate and visitor admission to the site, emergency situations, medical emergencies, and plant security concerns, the security officer immediately reports to the factory manager.

## **LEARNINGS, WORK DONE & PROBLEMS IDENTIFIED**

Nothing is as easy as we all think. Nothing is as waste as we feel. Everything we learn comes into practice. Theory cannot be ignored as it helps to read in between the lines. Though the internship was supposed to help us get first-hand experience in a production firm, there was much more learning and fun than it was anticipated.

In my first week, the operation of each piece of machinery and equipment employed at the site was briefly explained to me. I also discovered how each stage is crucial and how the industry's layout is planned for a hassle-free and efficient flow of activities.

I was first introduced to the production manager, who is in charge of all plant operations, and I

learned about the significance of his position as well as how he completes his duties. I assisted the production manager during the production process and kept a check on the activity. Communication plays an important role in any organization. During the production process, his cooperation with the supervisor is crucial. According to what I've seen, AK Aqua Food and Beverages has developed a really welcoming workplace for employees, and all employees, regardless of rank, are treated equally.

Time is of the essence in this industry, and the high demand for packaged drinking water during the tourist season has taught me how workloads must be managed during peak hours and how crucial time management is. From delivering raw PET preforms to turning them into finished bottles, purifying water and filling it in these bottles, and finally ensuring they meet customer demand to ensure they hold their market share and generate revenue.

During this course, I realized the firms don't get the finished bottles but instead preforms, and for the proper functioning there's a need for proper inventory management. The preforms and the bottles inventory had to be maintained considering the wastage occurred, to ensure a smooth and hassle free production process. Shortage of preforms could have hampered the process thus losing their business and here the production manager was more critical in keeping a check on his inventory.

I also discovered how crucial cleanliness is to a business that produces packaged water bottles and how SOPs must be adhered to. I also learnt about the various contaminants that can be found in raw water and the various filtering procedures that are used to remove them. I also learned about the various machines used in both the production of water bottles and the purification of water. I received training on how a bottle blowing machine functioned and how to handle it during my internship. Most of it being automated, it worked with a push of a button.

I have also assisted the Factory Manager and during his absence, he delegated certain duties to carry out. As the orders were received via emails, I would pass on the message to the production manager to start the process and get the inventory sorted for dispatch. I also worked in the logistics department where I had to keep a check on the crates dispatched for delivery and to sort the stock.

Since water was stored in plastic bottles, I had to ensure that the stock would move and be sorted in FIFO method (First in First out) this ensured the stock wouldn't remain for a longer period in



the warehouse. Keeping a check also helped the firm in reducing extra production and stocking of finished products in the warehouse.

Though I couldn't work in the quality control department, through my thorough observations, I learnt how microbial testing is done to keep the hygiene in check during the production process.

While that was with respect to the actual functioning of the industry, there were a lot of areas which raised questions in mind regarding whether the company is really doing well?

Through the interaction with the owner of the company, it was learnt that the firm was happy enough with their sales of an average 45,000 crates of water per month. Orally it sounded good enough, but through my one year of MBA study I had my other views on the same.

### **MBA course has helped me analyse the functioning of the organisation in better manner!**

My one year study of MBA has motivated and boosted my confidence to speak in front of people and share my views and ideas which I was lacking before joining MBA. In Fact, it has provided me with a strong base which has helped me in field work without many difficulties due to strong theoretical knowledge gained from the books, lectures, presentation, class seminars etc. The various management lessons that were read in books to see them natural practices were a great experience.

I felt that the firm's bosses have planned the business by having it in the right location and setting up a brand which would compete in the market. They have organised the structure well and controlled the cost in the most efficient way by doing most of the tasks they could do, also by finding cheaper alternatives in form of daily wage workers to work on the shop floor for unskilled work.

The company, earlier, had two other brands of similar products. One important marketing concept I learnt was the brand name should be easy to remember and Briza had it all as it was launched in 2017. The company smartly launched the product with a name which was close to their biggest rival 'Bisleri', interestingly they used a similar font and colours for the label.

In the production and operation department I learnt that though there is demand for the product, the company never went into continuous production but instead followed batch processing and

produced packaged drinking water in batches as and when the distributors demanded. The batches would range from 200 – to 1200 crates per day. The product was still in its growth stage and it was evident from its batch processing production.

Having situated close to airport and railways just six kms away, it was an ideal location for AK Aqua Food and Beverages to set up their plant at Chicalim. But that would be beneficial only if the firm was into export or were depended on imports of raw materials. However, it wasn't in the case of this firm, they had their preforms being sent by suppliers, the other major supply was their water, which they managed to get from their own premises through bore wells. The location is ideal for exporting in future if AK Aqua Food and Beverage decides to venture into other products like unique soft drinks (Lemon and ginger flavor aerated drinks etc).

**Tourism is the main market:** In my two months, I had seen that there is considerable demand for the water from the distributors, but the production isn't meeting the demand. Who would have imagined that the biggest consumer of the package drinking water was the tourists? It's mainly due to tourism there is considerable sale of packaged drinking water in the state.

From my oral interviews and casual talks with the distributors I was given to understand that Briza had its highest demand in North Goa specially in Candolim. The distributors even stated that the sales of Briza are higher in the area as compared to Bisleri in that region. Another learning, here that you can even beat a multinational brand if the product is good. And why not, Briza's tasted a lot better than its competitors.

**Capacity:** The machinery used by AK Aqua Food and Beverages is fully automated and can package 60 drinking water bottles per minutes thus making it 28,800 bottles in a day (having an eight-hour shift). In short it has a capacity of AK Aqua Food and Beverages for packaged drinking water is 2400 crates per day, thus making it around 62,400 crates a month. However, the firm is able to produce just 45,000 per month. That clearly states that the firm isn't meeting its actual capacity.

There is demand, and there is a huge possibility of meeting the demand if the machinery is properly utilized and proper planning is done.

AK Aqua Foods and Beverages are reliant only on bore well, however, there is a ceiling for pumping

the water from the bore wells fixed by the government. The firm can pump only 16,000 litres of water in a day. That makes it just 1333 crates in a day. Since the machinery has the capacity of producing more units, I have recommended and suggested to the manager to use an external source of water supply either from the government/municipal body or have another bore well in any other premises, which would lower the cost too. By using the government water – the firm could get the supply of just one tanker a day having a capacity of 15,000 litres which would meet the machinery capacity. 15,000 litres of water would help the firm produce 1200 packaged drinking water crates, thus meeting its demand.

Another observation in the industry is that there is minimal handling of raw material by the workforce. The water is directly pumped through all the processes, and isn't exposed to possible pollutants. However, despite having modern machinery there is a considerable amount of time being wasted on the shop floor. One of the main reasons for the same is the poor plant layout.

Unorganised plant layout increases the material handling in terms of preforms and finished bottles (before being used to package the water). The firm's shop floor was rather cluttered. The bottle making unit was set up in a separate room while the bottles were stored in another room next to the main packaging unit. This increases the handling time of the material.

Another interesting fact learnt was that the PET are actually supplied by one firm (owned by Reliance Group) to all the water packaging industries.

The labour had to manually move the raw materials to the final machine for packaging. Use of trolleys or even shifting the machinery to the main area would have made the work more easier and less time consuming. It was observed that the labour lost most time in walking to the other room and manually getting the bottles boxes to the main production area.

During the manual movement of the bottles, it was observed that some of them used to get damaged in the process, thus adding to the wastage and increasing costs. Learnings: A good plant layout can take care of installations of least handling process thus reducing costs.

**Market structure:** The firm is considered to be a monopolistic market since numerous firms sell the similar product but they try to differentiate it which are close substitute, but not perfect substitute of each other. The entry to and exit of the market is relatively easy as if profits are

encountered, more firms are likely to enter and in case of losses, firms might leave the market.

**Off season:** Though the tourism period in Goa was usually considered to be from November to May, now it's not like before. There is constant flow of tourists in the State even during monsoons, especially the domestic tourist and there is demand for the product even during this period. Many big firms considered the months of June to September as off seasons, but for Briza, it causes not much difference. The sales are not affected much as they use this time for wisely for service and maintenance. However, there is a slight drop during this time, but not as much that it affects the owners, the owners claimed.

**Absence of Marketing strategies :** This is one of the main area where I personally feel AK Aqua Food and Beverages should pay more attention. The owner, who is already burdened with extra work from the industry, is personally managing this department on his own. Though they depend on distributors for sales of the product, the owner Mr Gawas, should off load this responsibility from his shoulders and allow an expert to manage this area. AK Aqua Food and Beverages have no presence on social media and aren't advertising their product to the full potential.

Considering the distributor's views, it is given to understand that Briza, though being a local brand, has a better taste than its rival brands and products giving them an edge. However, this strength hasn't been utilised by the firm. It's mainly because the owner is overburdened with the responsibility of overlooking entire functioning, decision making etc. This has considerably affected their sales though it doesn't really matter to the owners, who are content with the sales.

**Factory manager handles HR role too:** The organisation having just 20 employees, the factory manager himself handles the HR role for the organisation. The vast knowledge of the Factory Manager made it easier for the firm to cut down on one department in the organisation, thus saving additional cost. However, it's not much for the Factory Manager, as just half the number of employees are contractual workers while the remaining are daily wage workers who are called at the plant as and when the production of packaging is done based on the quantity demanded.

An external agent provides the daily wage workers for which the payments are made either weekly or monthly based on the agreement between the two parties. However, this looked to be a cheaper option for this organisation which actually cut down on additional cost of having unwanted staff. Considering the capacity not being utilised fully, this option looked idle for this firm. The Factory

Manager kept a track record of all the employees attendance etc.

**Machinery maintenance:** Every machinery needs timely servicing and so it is with the manufacturing units. But having just machinery meant the production unit would be halted and the same was witnessed at AK Aqua Foods and Beverages, when they had to pull a stop on production for two days due to the maintenance of the machinery. The reason for such a huge delay is simply because of the lack of servicing facilities available in the state and the firm has to wait till the service team travels down from other states, this takes away crucial production time of the company.

It was learnt that a simple fault in one machine could bring down the entire production process since all the parts are interlinked. A proper and timely maintenance and check could do away with any faults and machine breakdowns.

**Business on credit:** Being a business which mainly worked on orders, I was surprised to learn that AK Aqua Food and Beverages' most business was on credit. Huge consignments are distributed to the distributors on credit basis wherein the amount is recovered on a later date. Credit period of one week is considered by the firm. The distributors often pay the amount when they came to pick up their next order.

**Low profit margin:** Though the financial statements weren't shown to me personally, the owner of the firm verbally revealed that they make a profit of Rs 15 on one crate, which is considerably low given the fact, the process considered. However, the firm has been doing the best to keep their unwanted cost away and reduce the expenses. However, the only way to make a huge profit is to sell in volumes. Though Rs 15 looks a small amount on a crate, considering the amount of sales (averaging 45,000 crates a month), the firm has a sales revenue of Rs 6,75,000 on an average monthly.

**No goal and vision:** It is learnt that the company doesn't have a vision, mission and objectives and their sole purpose was to package drinking water. When inquired with the owner, he didn't have the idea of these factors, which usually help the company to walk the path which is designed for the company growth and that's probably one reason the firm failed to grow, despite having various opportunities.

## **RECOMMENDATIONS**

### **Available of machinery and space could be used for alternative business**

**Aerated drinks:** At AK Aqua Food and Beverages has ample space in the shop floor which can accommodate more machinery. A lot of space has been wasted and the same could be utilized to launch another product. The firm could also consider investing in machinery to produce aerated drinks. Though there is substantial competition, a unique flavoured drink has always found a space in market shelves. Just like water, lemon and ginger flavoured drinks sell in the market too and it has been suggested to the owner to consider getting into aerated drinks, since there wouldn't be much cost involved.

**Supply to pharmaceuticals companies:** One of the main materials the pharmaceutical business uses is water. And are mostly utilised in the processing, formulation, and production of pharmaceutical products and analytical agents as raw materials and solvents. For pharmaceutical uses, many grades are employed. Since it was given to understand that the AK Aqua Food and Beverages boast of best potential of hydrogen level (ph) (5), the same could be considered in supplying to pharmaceuticals for their use and thus this could give more revenue for the firm in the form of continuous supply.

**Investing in marketing expert:** It's high time, AK Aqua Food and Beverages established their marketing team to make their market presence felt. They have a good product having considerable demand matching the prices of the competition, but what's lacking is the promotional activities. The firm could hire a marketing executive to promote the brand and also increase the sales by pitching to various corporate houses, institutions, associations, sports bodies etc.

AK Aqua Food and Beverages should also make their presence felt on social media platforms and engage in promotional activities which will create awareness of the Briza brand among the general public. They should also launch their website as bigger clients check for websites too.

**Approach sports bodies, clubs, corporates for increasing sales:** There are plenty of football teams in the state. Briza could associate themselves to sports clubs and bodies to increase their market presence and sales. A club like FC Goa, academies such as Dempo Sports Club and Sesa Football Academy consume packed water on a regular basis for all their teams (I.e they consume water for nearly 80-100 individuals per day).

**Aggressive marketing to beat the local competition:** AK Aqua Food and Beverages had done it in the past just to sustain in a region after having a fallout with a distributor. Since having the best quality water with even better taste than its competitors, the firm could launch another product with another name at a slightly lower price to beat the competition and gain full control in the region. Once the competitors are wiped out of the region, Briza could be the sole leader.

**Hygiene and safety factor:** Utmost importance should be given to the hygiene factor. Since the daily wage workers aren't aware of the importance of basic hygiene, there are chances of unhygienic practices by them. During my observation, I noticed that some workers enter and exit the production zone after using the washroom directly. A proper protocol should be followed in this instance and they should be briefed about the importance of hygiene. Proper hygiene should be maintained as this could save the firm from losses. Also the safety equipment should be worn by the labour throughout the process for their own safety.

**Training of the labour:** It was observed that, though the company has cut down its cost by hiring daily wage employees to work on the shop floor, it has actually ill effects. Sometimes there could be seen different faces every week and a lot of time was taken by the supervisors in briefing the simple task to be done. Being unfamiliar with the place, this not only contributes to wastage of time but also wastes plenty of bottles due to poor handling. An employee should be also trained to maintain the machinery, this will reduce the wastage of time which causes delay in production.

**Incentives to the labour:** Awards and recognitions play an important role in motivating the employees. Since maximum labourers are daily wage workers, the firm could introduce an incentive programme for them as this would encourage them to give their best and avoid time and product wastage. In this manner, the daily wage worker would prefer to return to the firm which will in turn save time for have better efficiency and productivity for the company.

**Getting into distribution:** Considering the amount of profits made by the distribution firms, AK Aqua is losing out on nearly double the amount of profits on a monthly basis. On 45,000 crates of water, the firm makes roughly Rs 6,75,000. However, the distributors' margin is Rs 11,25,000 per month. The firm has 10-12 distributors and are not involved in distribution at all. But if the firm gets into distribution, AK Aqua Foods and Beverages could double their monthly profits. Though there would be additional cost involved through man power and vehicles, in the long run, this itself

would give the company more profits.

## **CONCLUSION**

In a nutshell, this internship has been fantastic and fulfilling. I can say with certainty that working at AK Aqua Food and Beverages has taught me a great deal. It goes without saying that the technical components of the work I've done might be enhanced given enough time. Since I had no prior experience in the production unit at all, I feel that the time I spent there was well spent and helped to create a workable solution for the water packaging sector.

I had a fantastic opportunity to comprehend and examine the principles that were taught to me in my first year of my MBA and how, as a manager, I can apply these concepts to real-life scenarios by looking at how operations are handled and how crises are avoided.

My strength has always been in problem analysis, but because time is of the importance, working closely in an industry, in many divisions, has taught me how to look at things differently and come up with efficient answers. During this time, I have not only understood the organization, but how every artisan in an organization plays an important role and how crucial communication and coordination between employees is important. Being under the wing of the manager I have learned how certain decisions might affect in short term but over a long period has a positive implication on the company. I have also realised that, nearly 60-70 per cent of the sales are 1 litre bottles packs, whereas the 500 ml packaged water bottles sell just 30-40 percent.

Observation is the main element to find out an actual cause of the problem, and simply by observing it was noted that the distributors push for sales for the 1litre bottle packs as it gives them a scope of having a higher margin as compared to that of the 500ml bottles. Critical and analytical thinking, time management, communication, goal management are some of the important things I learnt during the internship.

This has been a fruitful experience for me and I am even more delighted that I could help the organisation alerting them of possible problems and also recommended solutions for the same. To conclude, the activities that I had learned during the internship training are useful for me in facing challenges in the future work environment.



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