CHAPTER I. INTRODUCTION

1.1. Company History

PT Kalbe Milko Indonesia is a toll manufacturing company established on June 28, 2012 with the signing of a business agreement by PT Kalbe Nutritionals with PT Milko Beverage Industry. It is located at Jl. Mayjen HR Edi Sukma Km. 15, RT 005/RW 001 Kp. Bojong Koneng, Desa Ciherang Pondok, Kec. Caringin-Bogor, Jawa Barat. The land area is around ±41.000 m² and the factory facilities consists of a raw material storage, packaging material storage, preparation area where weighing and melting processes of raw material occurs, milk processing area where mixing tanks, storage tanks, pasteurizer are placed, filling area where filling machines are located, sterilization area where there are 4 units of retort machines, the production floor, the finished goods storage, 4 quality control points which includes incoming QC lab, in process QC lab, inline QC, and finished good QC lab (physicochemical and micro labs), cool storage area, water treatment plants, wastewater treatment plants, boiler, chiller, air compressor, hydrant system, and generator set rooms. There are prayer rooms, lockers, a canteen, office space, and security posts as well in the compound.

In April 2016, PT Kalbe Milko Indonesia began operating and producing several liquid products under PT. Sanghiang Perkasa (Kalbe Nutritionals) marketed to almost all of Indonesia and exported overseas. Moreover, PT Kalbe Milko Indonesia has participated in registering their products for halal audits and currently all products have received Halal Assurance System (HAS) certificate from LPPOM MUI. Additionally, PT Kalbe Milko Indonesia have received other certifications which are Food Safety System Certification FSSC 22000 5.1 by SGS, *Program Management Risiko* (PMR) by BPOM, *Cara Produksi Pangan Olahan yang Baik* (CPPOB) by BPOM, and Kontrol Veteriner (NKV). This is to contribute to the increasing awareness of consumers of consuming halal and hygienic safe food products.

1.2. Vision and Mission of Company

PT Kalbe Milko Indonesia has a vision of becoming a world class toll manufacturing company and a mission of providing excellent services to contribute sustainable growth for business partners.

1.3. Main Activity of Company

As previously mentioned, PT Kalbe Milko Indonesia focuses in manufacturing liquid products including sterilized liquid milk, fruit juice-flavored milk, and fiber-rich drink. The sterilized liquid milk product is packed into bottles with a net volume of 130 mL and has several flavor variants including chocolate, vanilla, and strawberry. It contains cholin, iron, iodine, vitamin B complex, inositol, zinc, vitamin A, and vitamin E. This product is targeted for children with the age range of 3 to 12 y.o. Moreover, this product has a shelf life duration of 10 months. The fruit juice-flavored milk product has a health benefit of reducing cholesterol due to the plant stanol ester contained inside. It has a net volume of 100 mL and its flavor variants include blackcurrant, lychee, strawberry, orange, and yoghurt. Moreover, its shelf life is 12 months. Lastly, the fiber-rich drink product contains juices from 16 fruits and vegetables to help maintain a healthy digestive tract. This product comes in 100 mL bottles and has a shelf life duration of 12 months.

1.4. Organizational Structure of Department

The author is not allowed to present the organizational structure of PT Kalbe Milko Indonesia as a whole and instead presents the structure of the student's department which is the QA Department, shown in **Figure 1**.

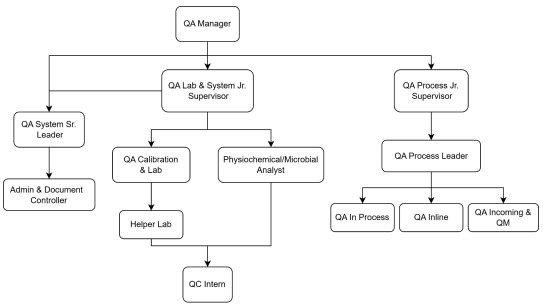


Figure 1. Organizational structure of QA department of PT Kalbe Milko Indonesia

The QA manager is the highest executive in the QA Department. Under the QA manager, there are two supervisors, one who is in charge of the finished goods lab and system which is the QA Lab & System Jr. Supervisor, and the other one is in charge of quality control through processes, which is the QA Process Jr. Supervisor. The QA Lab & System Jr. Supervisor supervises QA System Sr. Leader with an Admin and Document Controller underneath it, QA Calibration & Lab, Physicochemical and Microbial analysts, including a lab's helper. While the QA Process Jr. Supervisor supervises QA Process Leader that leads QA In Process, QA Inline, and QA Incoming & QM. However, the author included a summary of all departments available in PT Kalbe Milko Indonesia with their duties in Table 1.

Table 1. Summary of Departments with Their Duties

Department	Duties
Human Research (HR) and General Affairs (GA)	Establish systems and guidelines for managing human resources development and general affairs including workforce strategy, organizational development, recruitment management, performance management, people development, reward management, industrial relations, personnel management, and terminal management.
Finance and Accounting	Manage the company's cash flow to support regular operations, prepare financial reports and analyses each month, and maintain positive working relationships with banks, financial institutions, auditors, and the tax office.

Quality Assurance	Guarantee and ensure that the Food Safety Quality System is implemented in all plant activities, starting from the acquisition of raw materials and packaging materials throughout the storage of finished goods, manage the internal operation of quality system audit conducted at the plant, handle customer complaints related to product quality, and manage relationships with suppliers, principal, and customers.
Quality Control	Make sure that the materials utilized, production procedures followed, and goods generated adhere to accepted standards. Ensure efficient laboratory operations and make sure all records and documentation required for the work process are tightly managed.
Engineering	Monitor and verify that all engineering operations are carried out in accordance with established standards, guidelines, and plans.
PPIC	Construct a production schedule based on the principal's orders, the availability of materials, and the plant's availability in accordance with the QCS (Quality, Cost, and Speed) guidelines and ensure finished goods delivery comply with the production lead time and its delivery schedule.
Production	Manage the use of human resources, raw materials, and packaging materials, regulate the maintenance of good production facilities, the consistent application of quality systems (GM5P, HACCP, ISO, FSSC) to have an effective and efficient production process.
Warehouse	Take charge of receiving, storing, preparing, and distributing resources for the production process, periodically take stock of raw materials, packaging materials, and finished goods, assure that the warehousing facilities are accessible and in good condition.

1.5. Student's Department

Within the manufacturing processes of products done by PT Kalbe Milko Indonesia which generally consists of mixing, homogenization, pasteurization, filling, and sterilization, quality control (QC) are placed on four points. There is one placed near the incoming raw materials area, called as the incoming QC lab, two are placed in the production line, one called as the inprocess QC, which is in charge of product quality checking for before and after the pasteurization process, and the other is called as the inline QC, placed to check product quality from filling to packing area, and the last QC lab is to analyze finished goods which include microbial and physicochemical analyses. The author was a QC intern and placed in the physicochemical finished goods lab.