# FOOD & BEVERAGES MANUFACTURING SECTOR EDUCATION AND TRAINING AUTHORITY SECTOR SKILLS PLAN (2019-2020) ANNUAL UPDATE

FoodBev SETA

## AUTHORISATION AND OFFICIAL SIGN-OFF

We, the undersigned, hereby certify that with regards to this draft Sector Skills Plan:

- The development of the Sector Skills Plan is by the management of Food and Beverages Manufacturing SETA, under the guidance of the FoodBev SETA Accounting Authority and in consultation with the Department of Higher Education and Training;
- Is informed by extensive literature reviews, data analysis and research within the sector (primary and secondary);
- Considers all the relevant policies, legislation and other mandates for which FoodBev SETA is responsible;
- Includes representative stakeholder consultations; and
- Accurately reflects the findings, in terms of occupational shortages and skills gaps, within the documented limitations, to inform strategy planning and performance priorities.

**Ms. Nokuthula Selamolela**

**Chief Executive Officer (Acting)**

**Date: 1 August 2018**

**Mr. Blessing Mkhwanazi**

**Chairperson**

**Date: 1 August 2018**

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## FOREWORD

The Food and Beverage Manufacturing SETA (FoodBev SETA) is pleased to present the annual update of the Sector Skills Plan (SSP). The Sector Skills Plan is a result of the application of good practice research methods and meticulous stakeholder engagements and participation. Each Sector Education and Training Authority (SETA) is required to develop a five-year Sector Skills Plan (SSP) within the framework of the National Skills Development Strategy III (NSDS III). SSPs are planning documents informed by research aimed at identifying skills needs (i.e. demand), supply of skills, as well as opportunities and constraints in utilising and developing skills aligned to the National Skills Development Strategies.

Furthermore, this publication seeks to contribute towards achieving performance goals as set out by the Accounting Authority and the Department of Higher Education and Training (DHET) and to outline how the FoodBev SETA can contribute to the realization of those goals. This approach (i.e. alignment of the objectives of the SSP to the goals set out in NSDS III) ensures that the SSP is an accurate and credible reflection of the skills development needs of the Food and Beverage Manufacturing Sector.

The FoodBev SETA Sector Skills Plan (SSP) update has been prepared in line with DHET guidelines and framework for the development of a Sector Skills Plan and the National Skills Development Strategy III. It provides a comprehensive analysis of the labour market trends, supply and demand dynamics, highlights the occupations that are hard-to-fill and interventions that will be put in place by the SETA to respond to the skills needs of the sector. Semi-structured interviews were conducted with key stakeholders of the industry in the skills development fraternity and there were further engagements with the sector through chamber meetings. These semi-structured interviews and chamber engagements were conducted to augment and confirm data emanating from employers through the submission of Workplace Skills Plans, Annual Training Plans, Pivotal Plans and Pivotal Report submissions.

In order for the Food and Beverage Manufacturing Sector to achieve a skilled workforce and growth, there is a need to work with employers, higher education institutions, Technical Vocational Education and Training (TVET) colleges, Universities and Universities of Technology, private training providers, and other SETAs, and the use of research to achieve the NSDS III goals. This SSP is a valuable tool for the FoodBev sector stakeholders and provides a useful source of information.

**Mr. Blessing Mkhwanazi**

**Chairperson of the Board**

**Ms. Nokuthula Selamolela**

**Acting Chief Executive Officer**

## CRONYMS

| | |
|---|---|
| **APAP** | Agriculture Policy Action Plan |
| **APP** | Annual Performance Plan |
| **ATR** | Annual Training Reports |
| **BCCS** | Baking Cereals Confectionary and Snacks |
| **DHET** | Department of Higher Education and Training |
| **DPSA** | Disabled People South Africa |
| **DTI** | Department of Trade and Industry |
| **ETQA** | Education and Training Quality Assurance |
| **EMIS** | Education Management Information System |
| **FAWU** | Food and Allied Workers Union |
| **FEDCRAW** | Federal Council of Retail and Allied Workers |
| **FMCG** | Fast Moving Consumer Goods |
| **FoodBev SETA** | Food and Beverages Manufacturing Sector Education and Training Authority |
| **HEMIS** | Higher Education Management Information System |
| **HEI** | Higher Education Institution |
| **IPAP** | Industrial Policy Action Plan |
| **JSE** | Johannesburg Stock Exchange |
| **LSM** | Living Standard Measure |
| **MOU** | Memorandum of Understanding |
| **NGP** | New Growth Path |
| **NUFBWSAW** | National Union of Food Beverage Wine Spirits and Allied Workers |
| **OFO** | Organising Framework of Occupations |
| **PIVOTAL** | The Professional, Vocational Training and Academic Learning |
| **QCTO** | Quality Council for Trades and Occupations |
| **RAAVC** | Revitalisation of Agriculture and Agro-Processing Value Chain |
| **SACB** | South African Chamber of Baking |
| **SAMPRO** | South African Milk Processors Organisation |
| **SAQA** | South African Qualifications Authority |
| **SETA** | Sector Education and Training Authority |
| **SIC** | Standard Industrial Classification |
| **SIPs** | Strategic Infrastructure Projects |
| **SP** | Strategic Plan |
| **SSP** | Sector Skills Plan |
| **TVET** | Technical Vocational Education and Training College |
| **UOT** | University of Technology |
| **WSP** | Workplace Skills Plans |

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## EXECUTIVE SUMMARY

The annual update of the Sector Skills Plan (SSP) for the FoodBev SETA has been compiled in accordance with the National Skills Development Strategy (NSDS), and the DHET SSP framework. The SSP is aligned to the government's priorities and strategic framework. In addition, the SSP aims to address the current occupational shortages and skills gaps. Lastly, it aims to address how the FoodBev SETA will facilitate the relevant skills and educational opportunities to the sector in order to decrease the identified skills gaps.

A mixed method research approach has been adopted for the compilation of the SSP. The qualitative data was gathered through stakeholder engagement (i.e. face to face interviews). Primary quantitative data was also gathered from information from the workplace skills plans (WSPs), annual training reports (ATR) and workplace skills survey (WSS).

Chapter one presented the sector profile, transformation has been identified as one of the priority actions that must be undertaken by the sector. Presently, the trend of Africans occupying elementary occupations relative to management occupations continues. The employment of disabled people in the sector remains inadequate. The issue of race and disability with regards to skills development interventions are subsumed under the theme of transformation.

Chapter two outlines the change drivers in the Food and Beverage Manufacturing Sector and the associated implications for skills. The chapter addresses the alignment of the Food and Beverage Manufacturing Sector to the national strategies and plans. The salient change driver in this update, amongst others, is the impact of technological advancements on the Food and Beverage Manufacturing Sector.

In chapter three, the occupational shortages and skills gaps remains concentrated amongst artisans and industry related occupations in the Food and Beverage Manufacturing Sector. Chapter four covers the theme of partnerships. The FoodBev SETA has significant partnerships with TVET Colleges and industry regarding the need to build the capacity of college lecturers and facilitate the alignment of TVET learning programmes to the sector's needs.

Chapter five provides a summary of the key findings of the SSP and recommended actions. The main findings of the SSP are:

- Addressing artisan shortages: increase the interventions from FoodBev SETA through increased targets for the development of qualified artisans, coupled with the pursuit of a special project to develop underqualified or unqualified artisans into fully qualified artisans;
- Undergraduates bursaries: provide matriculants with bursaries especially those that are directly linked to food and beverages manufacturing sector e.g. food science and technology studies and engineering;
- Transformation: increase the number of bursaries awarded to African females in the sector. The SETA must set aside special grants aimed at addressing skills development of people with disability in the sector in order to augment their presence in the sector;

- Innovation: the drought has given rise to the adoption of innovative practices in food processing. The FoodBev SETA offers bursaries for PhD students (Doctoral) in Innovation and Research to assist in this regard;
- Skills Gaps: implement Skills Programmes and Adult Education and Training interventions for the employed learners that can address generic management skills, numeracy, literacy, soft skills and industry specific knowledge and skills that have emerged as significant skills gaps in the sector;
- Career guidance: conduct effective and efficient career guidance to young learners that will highlight scarce occupations in the sector and showcase differences amongst them; and
- Support national priorities and plans: The FoodBev SETA will need to support national priorities by entering Memoranda of Understanding (MOUs) with relevant government departments and Institutes of Higher Education and Training.

## RESEARCH PROCESS AND METHODS

The research method employed to compile the SSP for 2019/20, is a mixed method approach. The FoodBev SETA uses quantitative and qualitative approaches, in terms of the research design. The following objectives were addressed: The determination of the employment profile of the sector, the identification of occupational shortages and skills gaps outline the key skills issues within the Food and Beverage Manufacturing Sector, to indicate the sector partnerships between FoodBev SETA and relevant stakeholders, and the recommendation of skills development action plans to address the skill mismatches.

As part of the overarching research design, the FoodBev SETA uses a triangulated approach which is a combination of primary and secondary research. The secondary data emanates from the literature reviews and research reports conducted namely: Drivers of Change in the Food and Beverage Manufacturing Sector and Skills Needs Assessment of People with Disabilities in the Food and Beverage Manufacturing Sector. These reports amongst others provided a statistical and textual key insight, which is used to update the SSP for 2019-2020.

The FoodBev SETA amended the scarce skills sheet in the WSP template, in order to acquire vacancy information used to determine scarcity. The Professional Vocational Training and Academic Learning (PIVOTAL) list was collected from the WSP-ATR. The first phase of the compilation involved the quantitative analysis of the WSP-ATR database, specifically analysing the PIVOTAL list which deals with the reported number of vacancies. This analysis involves a simple count of companies that report vacancies for 12 months, or more. These companies are then ranked from the highest to the lowest number of reported vacancies. The highest numbers obtained, indicates the Hard-to-Fill Vacancies detailed in Chapter 3.

To verify the PIVOTAL list qualitatively, face-to-face interviews were conducted with all the 5 Chambers of the FoodBev SETA. There were 10 organisations interviewed representing 10 different companies in all 5 Chambers.

The second phase of the compilation involved the verification of the Hard-to-Fill Vacancies, through a qualitative approach. Personnel in Human Resources/Training and development or Skills Development Facilitator's (SDFs) of the companies that made the Top Ten hard-to-fill vacancies were contacted for semi-structured interviews. A total of seven Managers, two training coordinator and one SDF were contacted and interviewed.

The subsequent analysis used a combination of overall vacancy count for an occupation and hard-to-fill vacancy, to deduce which occupations were hard-to-fill in relation to others and these ones were included in the PIVOTAL List

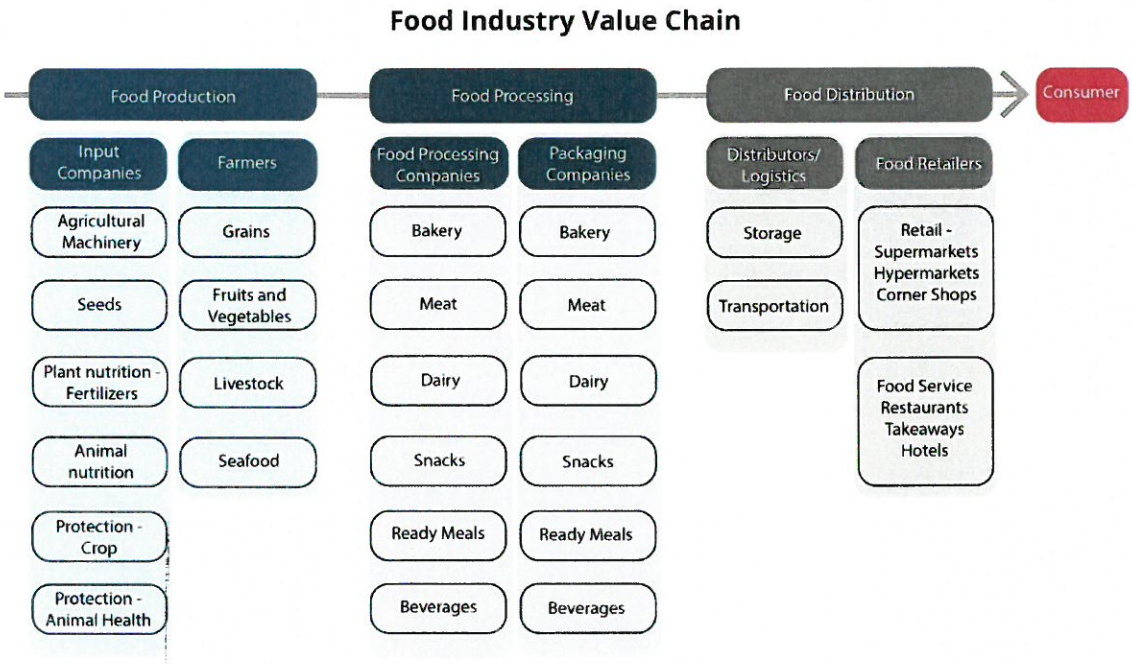
# 1. CHAPTER ONE: SECTOR PROFILE

## 1.1. INTRODUCTION

This chapter provides an overview of the Food and Beverages Manufacturing (FoodBev) sector. It is divided into four sections, namely; the scope of coverage, particularly in relation to the FoodBev stakeholders and key role players in the sector, economic performance, employer profile, and finally the labour market profile (race, gender, age and disability).

## 1.2. SCOPE OF COVERAGE

*Figure 1:Food Industry Value Chain*




**Source: Bing Images, 2018**

The Food and Beverages Manufacturing Sector is a fundamental element of the food industry value chain. Food in this context is inclusive of beverages. The value chain as illustrated above reflects linkages of various sub-sectors within the food and beverages manufacturing sector. The food industry value chain captures three main components namely: food production, food processing and food distribution. Food production highlights inputs required for producing food ranging from agricultural machinery to animal health. It also highlights farming as one of the key inputs in the production of food. Processing of food, beverages including packaging fall within the food and beverages manufacturing sector. Food distribution entails logistics (i.e. storage and transportation) and food retailers ranging from retail supermarkets to food service outlets such as restaurants, takeaways and hotels

Companies operating within the sector are clustered in line with their industrial activities, thereafter, grouped according to five sub-sectors or chambers set out in (Figure 2):

*Figure 2: Food and Beverage Manufacturing SETA Sub Sectors or Chambers*


**Source: 2014-2017 FoodBev SETA SSP**

The five chambers or sub-sectors are:

- **Baking, Cereals, Confectionary & Snacks Chamber**
  This sub-sector includes the manufacture of breakfast foods, bakery products, cocoa, chocolate, sugar-confectionary and nuts. It comprises mainly of companies involved in the salting, baking, drying and cooking processes.

- **Beverage Chamber**
  This sub-sector manufactures spirits, beer, malt, soft drinks and mineral water, with wine and beer being major outputs.

- **Dairy Chamber**
  In this chamber, dairy products are manufactured by companies. This includes fresh milk, cheese, butter, ice-cream, yoghurt and edible ice.

- **Food Preparation Products Chamber**
  This sub-sector produces goods that are used in making a meal or beverage. Examples of these products include noodles, spices and sauces.

- **Processed and Preserved Meat, Fish, Fruit and Vegetables Chamber**
  This sub-sector is split into the following:
  - Manufacture of prepared and preserved meat: such as canned, processed dehydrated fruit and vegetables, vegetable and animal oils and fats, processed fish crustacean and similar foods;
  - Production, processing and preserving of meat and meat products;

- Slaughtering, dressing and packing of livestock, including poultry and small game meat, lard and other edible fats; and
- Processing and preserving of fish and fish products, fruits and vegetables.

According to the classification of economic activities in South Africa, the Food and Beverage Manufacturing Sector includes the manufacture of food products and the manufacture of beverages, however, contrary to practice in most other countries, it excludes the manufacturing of tobacco. Tobacco manufacturing is included in the agricultural sector. The sub-sectors are assigned Standard Industrial Classification (SIC) Codes, which are categorised further into the following constituents:

Table 1: Constituents of the Food and Beverages Manufacturing Sector

| SIC code | Sub-sector/Chamber | Constituents |
|---|---|---|
| 301 | Processed and Preserved Meat, Fish, Fruit and Vegetables Chamber | 30112: Manufacture of prepared and preserved meat, including sausage |
| | | 30130: Processing and preserving of fruit and vegetables |
| | | 30131: Manufacture of canned, preserved, processed and dehydrated fruit and vegetables (except soups) |
| | | 30121: Manufacture of canned, preserved and processed fish, crustaceans and similar foods |
| | | 30140: Manufacture of vegetable and animal oils and fats |
| | | 30120: Processing and preserving of fish and fish products |
| | | 30100: Production, processing and preservation of meat, fish, fruit, vegetables, oils and fats |
| | | 30113: Production of lard and other edible fats |
| | | 30110: Production, processing and preserving of meat, and meat products |
| 302 | Dairy Chamber | 30200: Manufacture of dairy products |
| | | 30202: Manufacture of butter and cheese |
| | | 30201: Processing of fresh milk |
| | | 30203: Manufacture of ice cream and other edible ice |
| | | 30202: Manufacture of butter and cheese |
| 303 | Manufacture of Food Preparation Products Chamber | 30401: Manufacture of food preparation products |
| | | 30142: Manufacture of compound cooking fats, margarine & edible oils |
| | | 30141: Manufacture of crude oil and oil seed cake and meal |
| | | 30440: Manufacture of macaroni, noodles and similar farinaceous products |
| | | 30490: Manufacture of other food products n.e.c. |

| | | |
|---|---|---|
| | | 30499: Manufacture of spices, condiments, vinegar, yeast, egg products, soups and other food products |
| 304 | **Baking, Cereals, Confectionary & Snacks (BCCS) Chamber** | 3041: Manufacture of bakery products |
| | | 30491 Manufacture of coffee, coffee substitutes and tea |
| | | 3043: Manufacture of cocoa, chocolate and sugar confectionary |
| | | 30492 Manufacture of nut food |
| | | 30312 Manufacture of Breakfast Foods |
| 305 | **Beverage Chamber** | 30510: Distilling, rectifying and blending of spirits; ethyl alcohol production from fermented materials; manufacture of wine |
| | | 30520: Manufacture of beer and other malt liquors and malt |
| | | 30530: Manufacture of soft drinks; production of mineral waters |
| | | 30500: Manufacture of beverages |
| | | 30521: Breweries (except sorghum) |
| | | 30523: Manufacture of Malt |

**Source: STATS SA 2017**

## 1.3. KEY ROLE PLAYERS IN THE SECTOR

There are several public and private key role players in the Food and Beverage Manufacturing Sector, which contribute towards its efficient functioning, which includes: trade unions, industry bodies, national government departments and sector representatives.

### 1.3.1. TRADE UNIONS

There are three major trade unions in the Food and Beverage Sector, namely:

1. Food and Allied Workers Union (FAWU): is affiliated to the South African Federation of Trade Unions (SAFTU) and has a membership of about 111 000.
2. Federal Council of Retail and Allied Workers (FEDCRAW): is affiliated to the National Council of Trade Unions (NACTU) and has a current membership of 10 000.
3. National Union of Food Beverage Wine Spirits and Allied Workers (NUFBWSAW): is affiliate to NACTU and has a membership base of about 25 000.[1]

The core purpose of trade unions as it is elsewhere in the world is to regulate relations between employers and their employers. This role of trade unions is defined throughout the labour related legislative framework of SA.

[1] Input from stakeholders

### 1.3.2. INDUSTRY ASSOCIATIONS

There are a few industry associations in the Food and Beverage Sector such as;

- The South African Chamber of Baking (SACB): was formed in 1938 to promote the common interests of the baking industry as a non-profit organisation. It provides training, marketing, lobbying, market and technical information to members and has a membership base of approximately 100 including subsidiaries.

- The South African Milk Processors Organisation (SAMPRO): is a continuation of the associations established in the early 1980's as a voluntary organization for processors of milk and manufacturers of dairy products in SA. It is structured as an association of members that purchase and process 65% of all milk produced in SA. SAMPRO assists members with industry information, market conditions, consumer education, employee empowerment, research and development, lastly the improvement of quality and safety.

- The South African Liquor Brand Owners Association (SALBA): is a non-profit organisation established in 2005 with the sole objective to represent Members in the manufacturing and distribution of liquor products in the liquor industry of South Africa, on issues of common interest. These issues include, but are not limited to, the promotion of the long-term sustainability of the businesses of Members, through responsible brand building in a competitive environment. SALBA is also a key stakeholder of Winetec.

- Wine Industry Network of Expertise and Technology (Winetec): promotes collaboration between manufacturers based on technological transfer, research and skills development. Winetec is an association and network of expertise that provides the South African Wine Industry with a sustainable basis of forefront technology and human resources to strengthen both local and international competitiveness and profitability. Various committees are formed from industry partners' collaboration on technology transfer on technology transfer, research and skills development in achieving the objective of Winetec.

- Beverage Association of South Africa (BEVSA): a not for profit membership based organisation that represents the interests of the non-alcoholic beverage industry. The members include large to small beverage manufacturing companies who produce, import, distribute, and sell a variety of non-alcoholic sparkling and still beverages, including soft drinks, sports drinks, energy drinks, bottled waters, flavored and/or enhanced waters, ready-to-drink teas and coffees and dairy based beverages. The purpose of this association is to ensure sustainable growth of the non-alcoholic beverage sector in an open market whilst continuing to create and maintain a thriving business environment for the South African non-alcoholic beverage sector. As representative of manufacturers and distributors of a wide variety of non-alcoholic beverages, BEVSA believes that all of their products can be part of a healthy lifestyle. To that end, the non-alcoholic beverage industry has been working with government, industry (through the Consumer Goods

Council), academia and consumers to be part of the solution, and to promote healthy, balanced, and active lifestyles.[2]

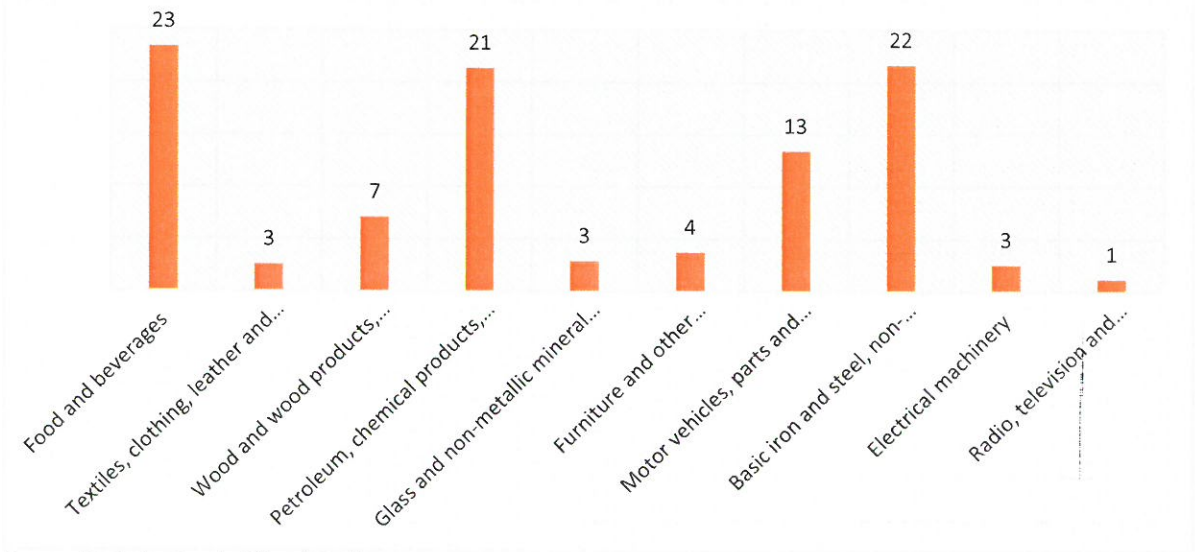
## 1.4. ECONOMIC PERFORMANCE OF THE SECTOR

### 1.4.1. KEY ECONOMIC INDICATORS

#### 1.4.1.1. Food and Beverages Contribution to Total Manufacturing and Gross Domestic Product

Figure 3 below illustrates the percentage contribution to GDP of the Food and Beverages Sector from November 2017 to January 2018 compared to other manufacturing subsectors in the economy. The highest manufacturing sectors was the Food and Beverage at 23%, followed by the Basic iron and steel, non-ferrous metal products, metal products and machinery at 22% in 2017. According to Statistics South Africa (2017), the manufacturing industry increased its activity by 4% in the fourth quarter and contributed 0.5% to the GDP.

*Figure 3: Food and Beverages Contribution (%) to GDP compared to other Manufacturing Sectors*




**Source: Statistics South Africa (2018)**

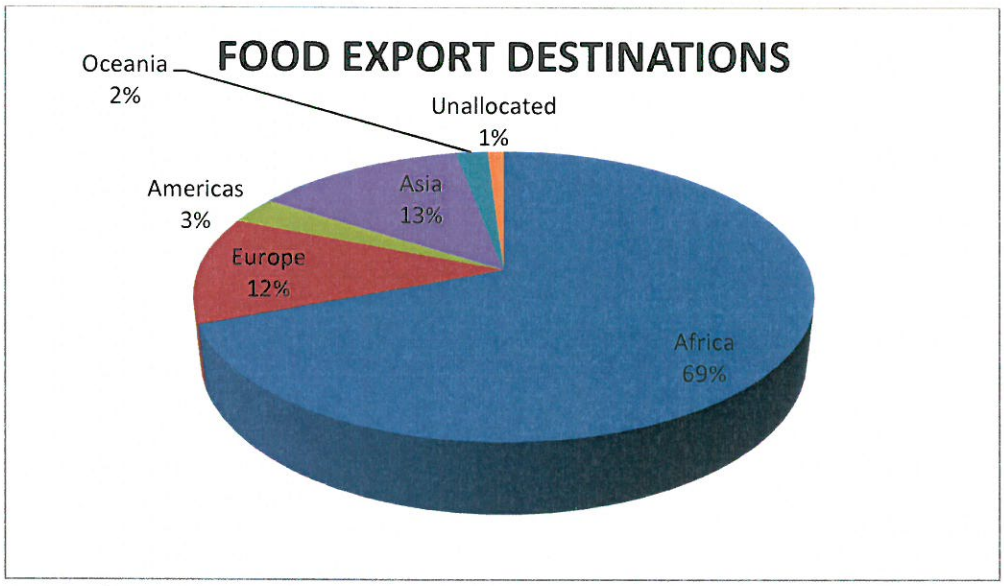
According to Statistics South Africa (2018) manufacturing production increased by 3% in January 2018 compared to January 2017. The biggest manufacturing contributors were the Food and Beverages Industry (10%), Motor Vehicles, Parts and Accessories and other Transport Equipment Industry (5%), and Basic Iron and Steel, Non-Ferrous Metal Products, Metal Products and Machinery Industry (4%).The increase in economic growth for 2017 can be attributed to the increase in activity from the Food and Beverages industry. It can be deduced that the tertiary sector experienced an upturn in demand for food and beverages.

[2] www.bevsa.co.za

### 1.4.1.2. Exports

Figure 4 below illustrates that Africa was the main export destination for food during the second quarter of 2017, accounting for 69% of exports, an increase of 58% from last quarter of 2016. This was followed by Asia (13%) and the destination with the least export was Oceania (2%). The trend during the past five years shows that Africa has the biggest share of food export and it indicates progressive growth of 49% from the second quarter of 2016 (DAFF,2017).

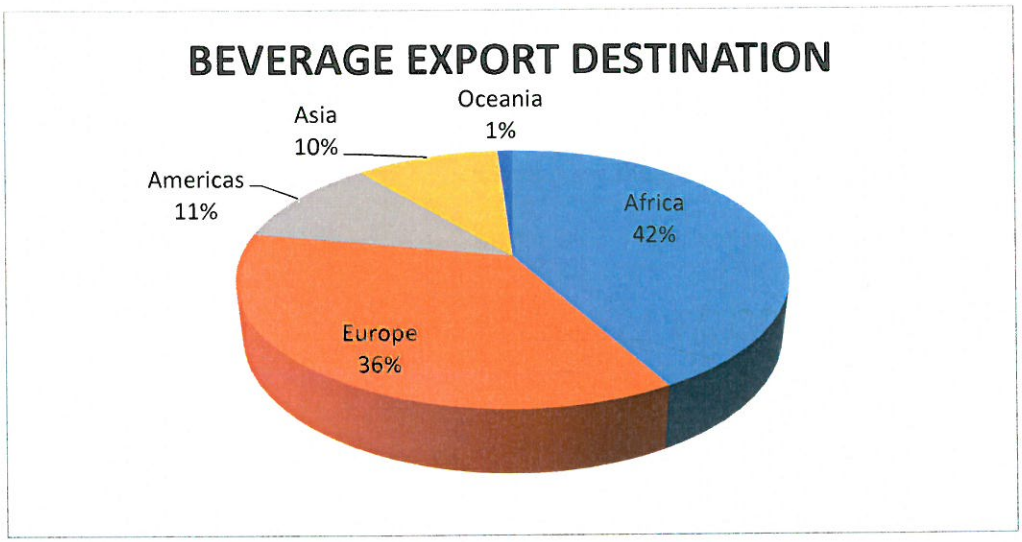
*Figure 4: Food Exports to Respective Continents in Quarter Two (2017)*




**Source: Department of Agriculture, Forestry and Fisheries (2017)**

Furthermore, the figure below shows that Africa was the largest export destination for South African beverages, accounting for 42% of the total exports in the last quarter of 2017, a decrease from 58% in the last quarter of 2016. It is followed by Europe (36%), Americas (11%) and Asia (10%). The trend of export destination's share during the past five year illustrates that Europe and Africa have been the two continents that have been playing the most significant roles, in beverages export share destinations. (DAFF: 2017)

*Figure 5: Beverage Exports to Respective Continents in Quarter in Two (2017)*




***Source: Department of Agriculture, Forestry and Fisheries (2017)***

### 1.4.1.3. Employment

Overall the results for total number of formal employment, in the food products division, show that the quarter-to-quarter food products division contracted by 0.1%, as compared to the 0.8% growth reported in the previous quarter. As a result, the employment in this sector decreased from 207 199 in quarter one of 2017, to 206 949 in the second quarter of 2017 (DAFF, 2017). However, in a study done by Thwala (2017), on the FoodBev Sector Skills Profile using the WSP-ATR submissions (2016/2017), the results showed that the number of employees in the sector increased at a rate of 7%, from 147 131 to 157 164, in the 2016/2017 financial year. This is indicative of the ever-changing employment patterns of the Food and Beverages Industry.

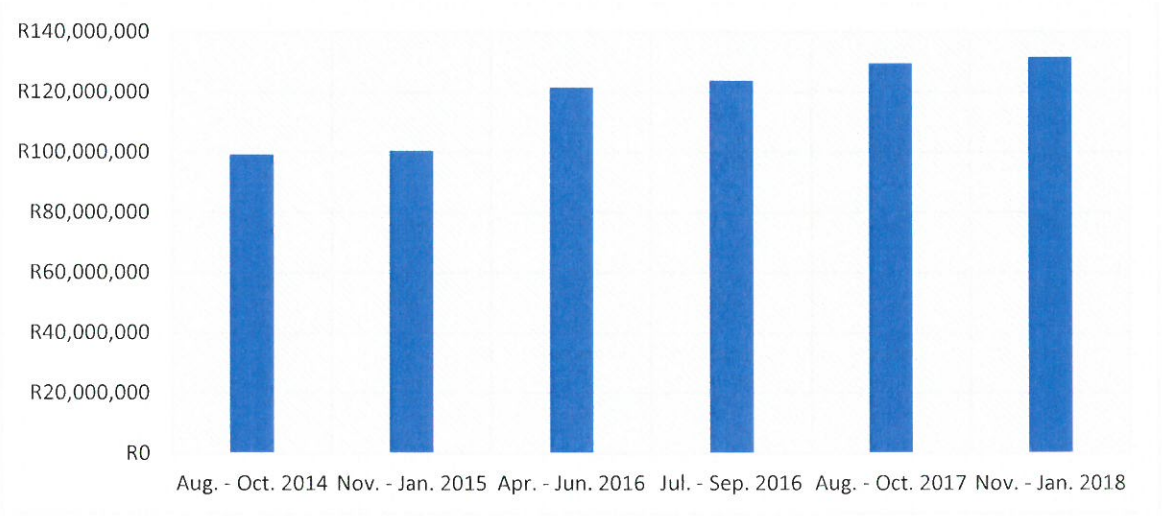
In the beginning of 2017, the quarter-to-quarter formal employment of (meat, fish, fruit, vegetables, oils and fats) decelerated from 3% to 2% in the 2$^{nd}$ quarter. The grain mill production contracted by 2% in the 1$^{st}$ quarter of 2017. However, dairy products showed an improvement by 4% following a contraction in the 1$^{st}$ quarter. Other food products averaged 2% from a 4% growth in the 1$^{st}$ quarter of 2017. Thus, the Dairy Products and Other Food Products are the only divisions that created jobs in the 2nd quarter of 2017, totalling 1 115 from 1 333 jobs in the 2$^{nd}$ quarter (DAFF: 2017).

This modest employment growth rate can be attributed to an array of formidable obstacles in the South African economy. The obstacles that the industry faces are multifaceted with various challenges overlapping each other. Demand for high quality food, increased productivity, government regulations, operating and labour costs are some of the recurring challenges the industry faces. This has compounded the lack of skilled labour, high turnover and insufficient opportunities for growth.

### 1.4.1.4. Other Economic Indicators

According to Statistics South Africa (2018) the inflation rate was 4% in January 2018, which decreased from just below 5% in December 2017. The inflation rate has been on a decline over the months, which has been a welcome change for consumers. However, the announcement of the VAT increase to 15% will predominately affect consumers and their spending patterns.

*Figure 6: Food and Beverage Manufacturing Sales in South Africa (2015-2018)*




**Data Source: Statistics SA (2016-2018)**

Figure 6 illustrates the Food and Beverage Manufacturing Sector sales over the selected period (2014-2018). There have not been significant increases in the sector over the indicated years and this is evident in the 4% increase in the total income generated in September 2017 compared to September 2016. Insufficient demand for certain food products, shortages of raw materials and low productivity were some of the causes for the lack of growth. However, the sector has managed to sustain itself between 120 and 132 million Rands from 2016 to 2018.

## 1.5. EMPLOYER PROFILE

This section looks at the employer profile in the sector which includes an overview of the major employers, size break down, number of enterprises and the employment per chamber.

### 1.5.1. OVERVIEW OF MAJOR EMPLOYERS IN THE SECTOR

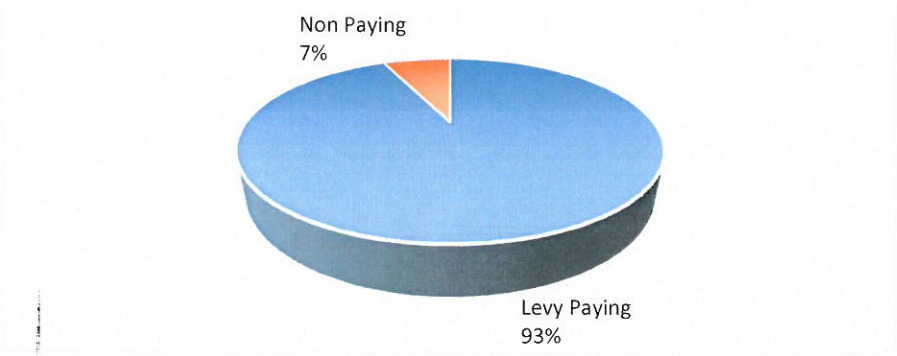
According to StatsSA (2017), the Food and Beverages Industry in South Africa is a sub sector in agro-processing that plays a dominant role in the employment of people and outputs of agro-processing sector of the country. In addition, it plays a vital role in supplying inputs to the food and beverage service industry, wholesale and retail sectors.

According to Food Processing Africa (2017) Tiger Brands, RCL Foods, Distell Group, Pioneer Foods Group and Tongaat Hulett were some of the highest grossing companies in Southern Africa. The revenues reported ranged from R31 billion reported by Tiger Brands to R 22,3 billion by the Distell Group[3]. The above-mentioned companies (i.e. Tiger Brands, RCL Foods, Distell Group, Pioneer Foods Group and Tongaat Hulett) are large companies with employees exceeding 150. This illustrates that large companies drive the sector in employment, production and distribution.

### 1.5.2. NUMBER OF REGISTERED ENTITIES IN THE SECTOR

Figure 7 shows that there was a total of 12 166 entities registered with the FoodBev SETA as of 1 May 2018 and 93% of those entities were registered as levy paying entities whilst only 7% are non-levy paying. Although the total number of registered companies has increased the percentage between levy paying and non-levy paying companies remains the same as compared to the previous two years, 2016 and 2017 SSP.

*Figure 7: Distribution of Registered Levy Paying and Non-Levy Paying Entities in the Sector*



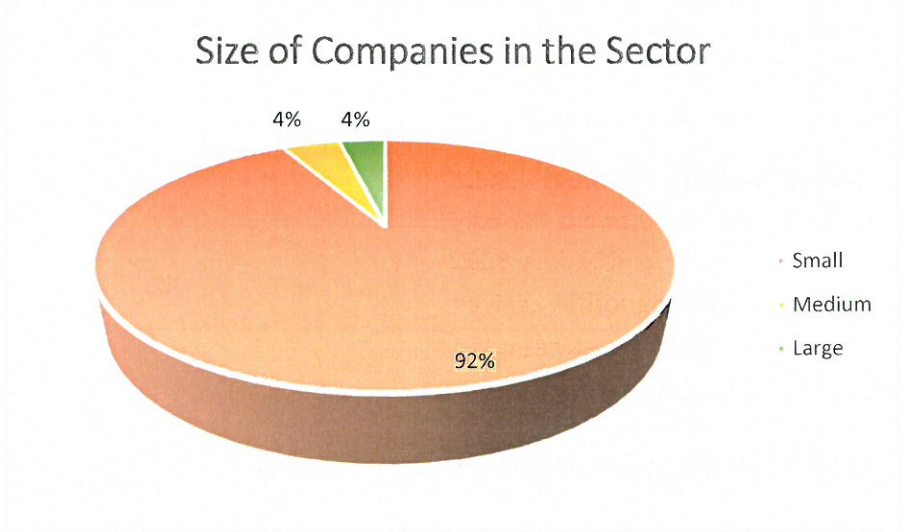

**Source: SARS Levy Paying Database, 2018**

### 1.5.3. SIZE OF COMPANIES IN THE SECTOR

Figure 8 below provides the size breakdown of the registered levy paying companies in the Food and Beverage Manufacturing Sector in 2018. There are a total number of 12 166 registered companies in the sector, of which 92% were small in size and the medium and large companies constituted 4%, respectively.[4] In 2016 and 2017, the percentages of small levy paying companies remained the same at 92%, medium sized companies was at 5% and large companies was at 3%. This pattern demonstrates that even when the total number of companies increased within the sector, the percentage distribution remains the same.[5]

[3] Distell Annual Report 2017
[4] FoodBev SETA WSP-ATR, 2017
[5] FoodBev SETA SSP, 2015/16 & FoodBev SETA SSP, 2016/17

*Figure 8: **Size of Companies in the Sector***

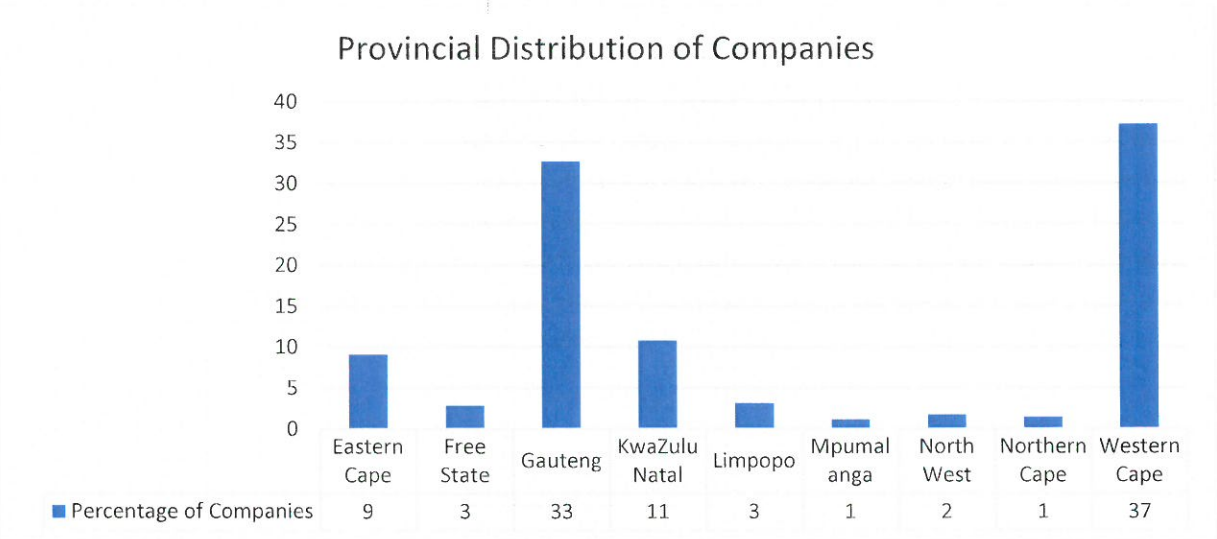



**SARS Levy Paying Database 2017**

### 1.5.4. GEOGRAPHICAL REPRESENTATION OF EMPLOYERS

Figure 9 below outlines the provincial breakdown of companies in the sector. The provinces with the majority company representation were the Western Cape (37%), Gauteng (33%) and Kwa-Zulu Natal (11%). These provinces contribute over 80% of the companies represented in the sector.

*Figure 9: Distribution of companies per province*

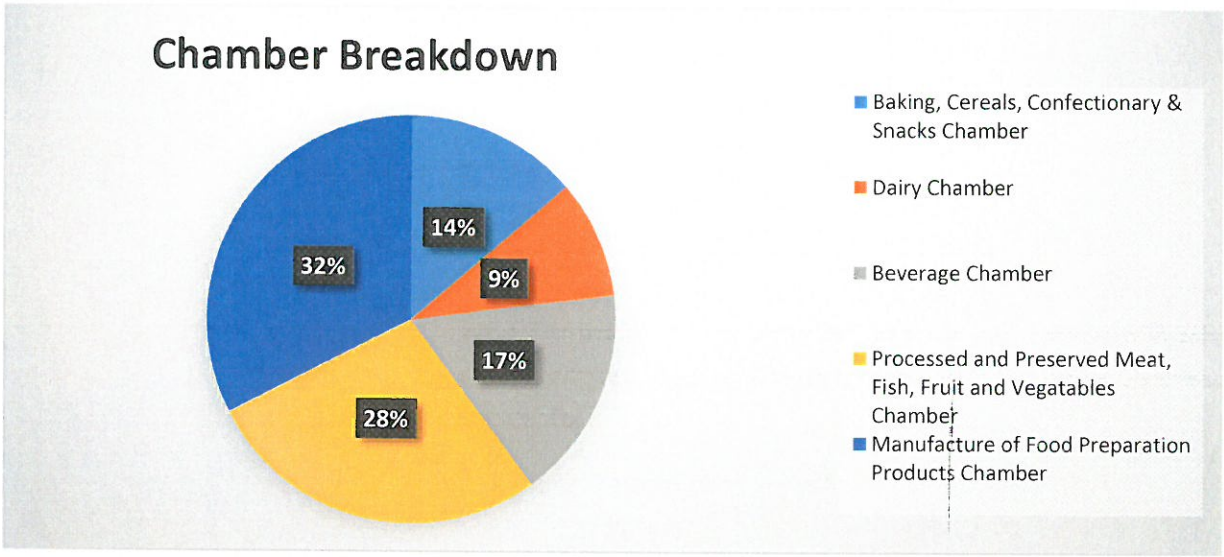



**Source: FoodBev SETA WSP-ATR, 2018**

### 1.5.5. COMPANY BREAKDOWN BY SUB SECTOR

Figure 10 presents the percentage of companies per sub sector from the 727 WSP-ATR submissions that were analysed. The chamber with the highest number of companies is the Manufacture of Food Preparation Products at 32% (234), and the chamber with the smallest share of companies is the Dairy Chamber at 9% companies (68). The other chambers range between 14 and 28 percent. This represents a 15% increase from the 633 submissions in 2017 and a 23% increase from 592 submissions in 2016. In 2017, chamber with the highest number of companies that submitted WSPs was the Manufacture of Food Preparation Products at 210 (33%); while the chamber with the smallest share of companies was Baking, Cereals, Confectionary and Snacks Chamber with 54 companies (9%)[5]. Whereas, in 2016, the Manufacture of Food Preparation Products Chamber had the largest share of companies while the Dairy Chamber had the smallest.[6]

*Figure 10: Company Breakdown by Sub-Sector*

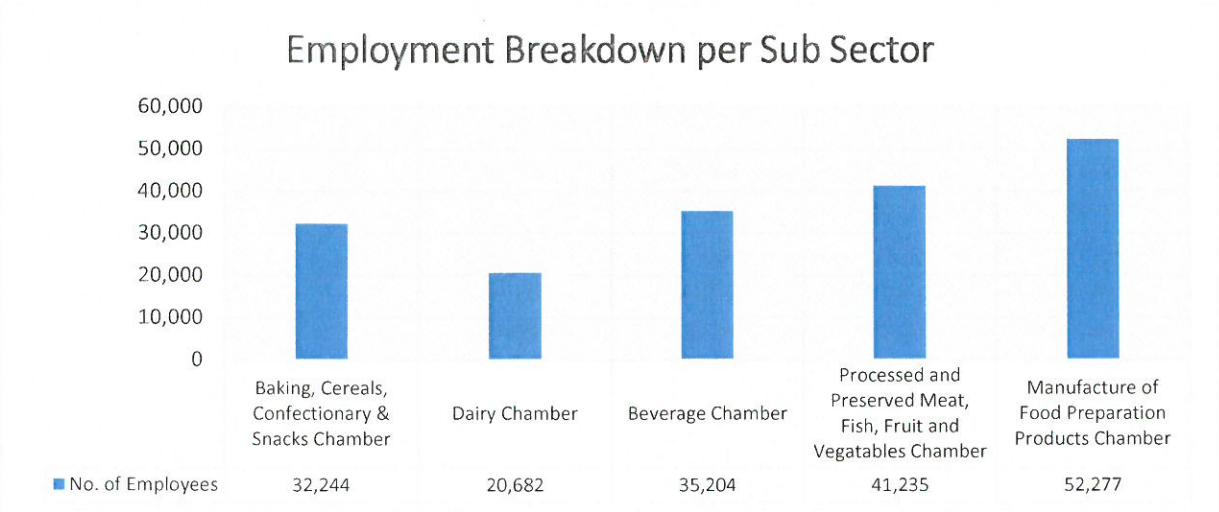



**Source: FoodBev SETA WSP-ATR, 2018**

### 1.5.6. EMPLOYMENT BREAKDOWN BY SUB SECTOR

Figure 11 highlights the employment breakdown for each sub-sector, in the Food and Beverage Manufacturing Sector, derived from the 727 analysed WSP-ATRs. The Manufacture of Food Preparation Products Chamber had the largest share of employees at 52 277 (28%), while Processed and Preserved Meat, Fish, Fruit and Vegetables Chamber had the second highest share with 41 235 (23%). Baking, Cereals, Confectionary and Snacks Chamber, and Beverage Chamber total share of employees was at 32 244 (18%) and 35 204 (19%), respectively. The Dairy Chamber had the least share of employees at 20 682 (12%). In 2017, the chamber with the largest share of employees was the Processed and Preserved of Meat, Fish, Fruit and Vegetables Chamber with 50 347 (30%) compared to the 43 803 in 2016. Whereas, in 2017 the Baking, Cereal, Confectionary and Snacks chamber had the least share of employees. While in 2016, the chamber with least share of employees was the Dairy Chamber.[5, 6]

*Figure 11:Employment Breakdown by Sub-Sector*



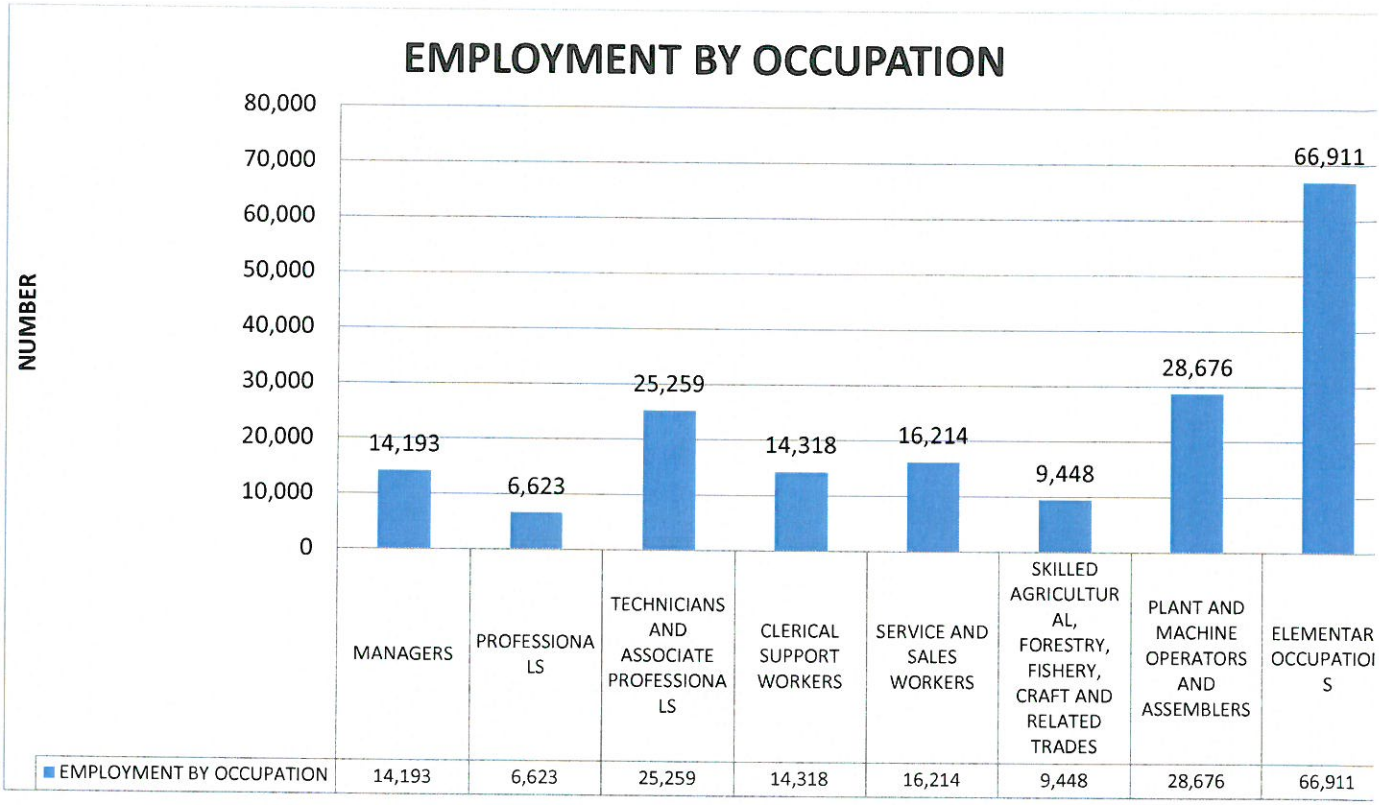

**Source: FoodBev SETA WSP-ATR, 2018**

## 1.6. LABOUR MARKET PROFILE OF THE SECTOR

### 1.6.1. LABOUR MARKET PROFILE

Figure 12 represents the breakdown of employment across the eight Organising Framework of Occupations (OFO) categories from the 727 analysed WSP-ATRs. The Food and Beverage Manufacturing Sector employed a total of 181 642 employees in 2017. Employment was concentrated in the Elementary occupations (66 911) which represents 37% of total employment, a two percent increase from the previous year, followed by Plant and Machine Operators and Assemblers (28 673). The occupational category with the least number of people was the Professionals category (6 623) followed by the Skilled Agricultural, Forestry, Fishery, Craft and Related Trades Workers (9 448). Employment concentration has been the same over the last two years irrespective of the actual number of employees.[6]

*Figure 12: Employment Breakdown by Occupational Categories*



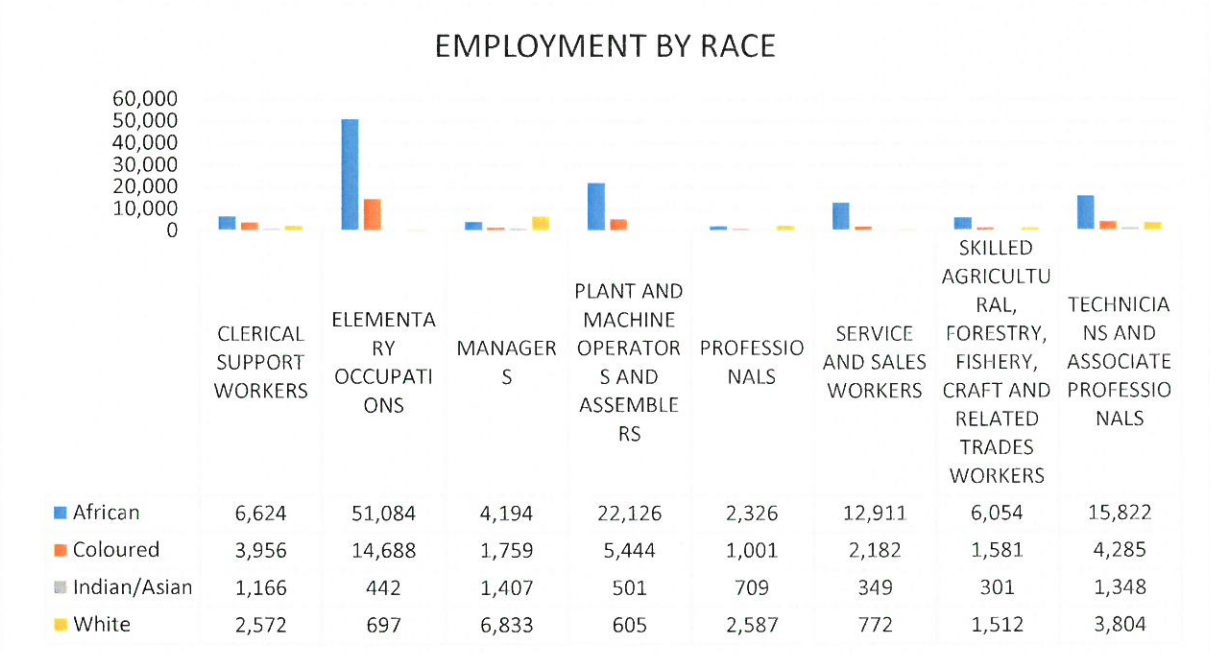

### 1.6.2 EMPLOYMENT BY RACE

The largest racial group employed in the Food and Beverages Manufacturing sector were Africans making up 121 141 (67%), followed by Coloured at 34 896 (19%), White 19 382 (11%) and Indian/Asian at 6 223 (3%). According to Figure 13 below, Africans featured prominently in the lower occupational categories namely, the Elementary occupational category. Africans constituted 44 786 (75%) of the total 62 911 employees in the Elementary occupational category. In contrast whites only account for 1% (655) of employees in the aforementioned occupational category.[5]

However, when one looks at the Managerial occupational category, Whites constitute the majority of employees in this category, accounting for 48% (6124) of total employment in the category. Africans on the other hand account for approximately 29% of the total employed in Managerial positions in the sector, a 1% increase from the last financial year.[5] The 2016 and the 2017 SSP reflected similar findings with regards to the race distribution of employees in the sector even though the actual numbers differ.[6] Considering this, there needs to be more effort channelled at increasing the number of Africans in Managerial positions, by upskilling this group

through different training initiatives which will in turn address transformation challenges within the sector.

*Figure 13:* ***Employment by Race***

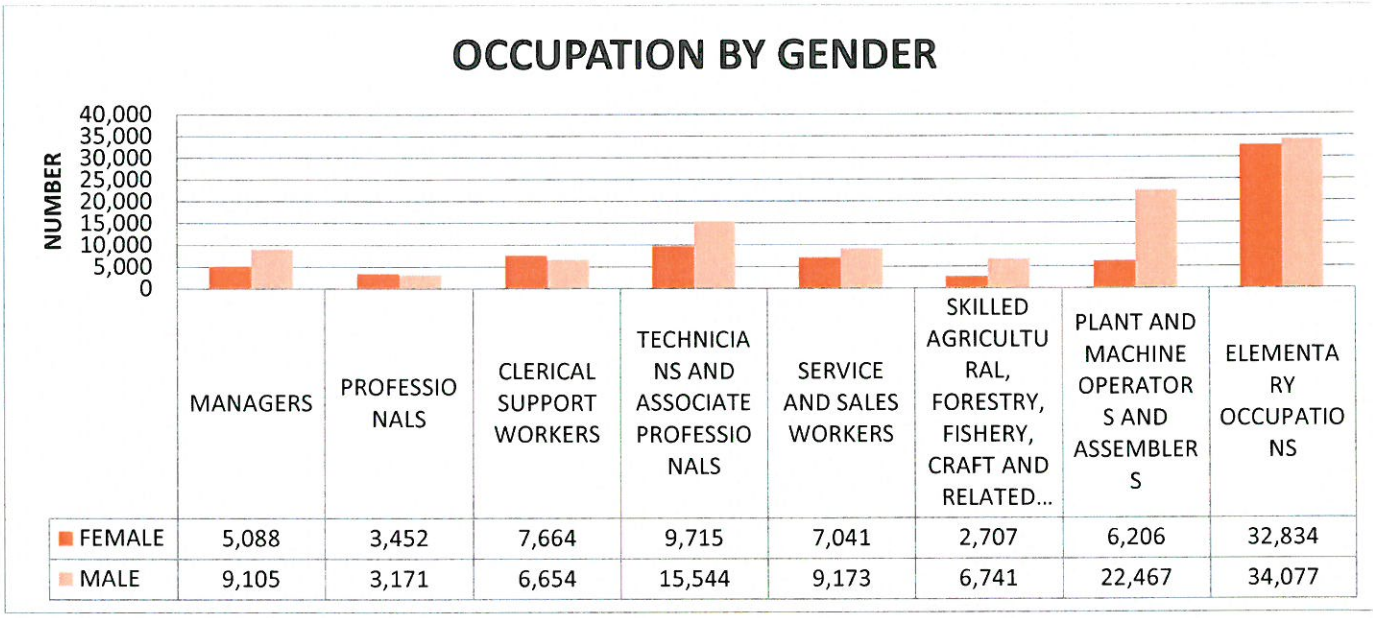



| | CLERICAL SUPPORT WORKERS | ELEMENTARY OCCUPATIONS | MANAGERS | PLANT AND MACHINE OPERATORS AND ASSEMBLERS | PROFESSIONALS | SERVICE AND SALES WORKERS | SKILLED AGRICULTURAL, FORESTRY, FISHERY, CRAFT AND RELATED TRADES WORKERS | TECHNICIANS AND ASSOCIATE PROFESSIONALS |
|---|---|---|---|---|---|---|---|---|
| African | 6,624 | 51,084 | 4,194 | 22,126 | 2,326 | 12,911 | 6,054 | 15,822 |
| Coloured | 3,956 | 14,688 | 1,759 | 5,444 | 1,001 | 2,182 | 1,581 | 4,285 |
| Indian/Asian | 1,166 | 442 | 1,407 | 501 | 709 | 349 | 301 | 1,348 |
| White | 2,572 | 697 | 6,833 | 605 | 2,587 | 772 | 1,512 | 3,804 |

### 1.6.3. EMPLOYMENT BY GENDER

Figure 14 below outlines the gender breakdown of employment in the sector. Most employees in the sector were male at 106 932 (59%), while females only made up 74 707 (41%) of total workforce. Similarly, males constituted the majority of employees in the Managerial occupational category at 9 105 (64%), even though there was a two percent increase in female employees at 36% (5 088). The gender breakdown of employment in the 2016 and 2017 SSPs portrayed male domination in the sector. This reinforces the need for transformation to be channelled to the Managerial occupational category, in terms of skills development initiatives, especially towards females. The intervention needs to be focused primarily on African females, as they comprise only 1 593 (11%) of Managers, as opposed to 2 300 White females (16%).

*Figure 14: **Employment by Gender Breakdown***

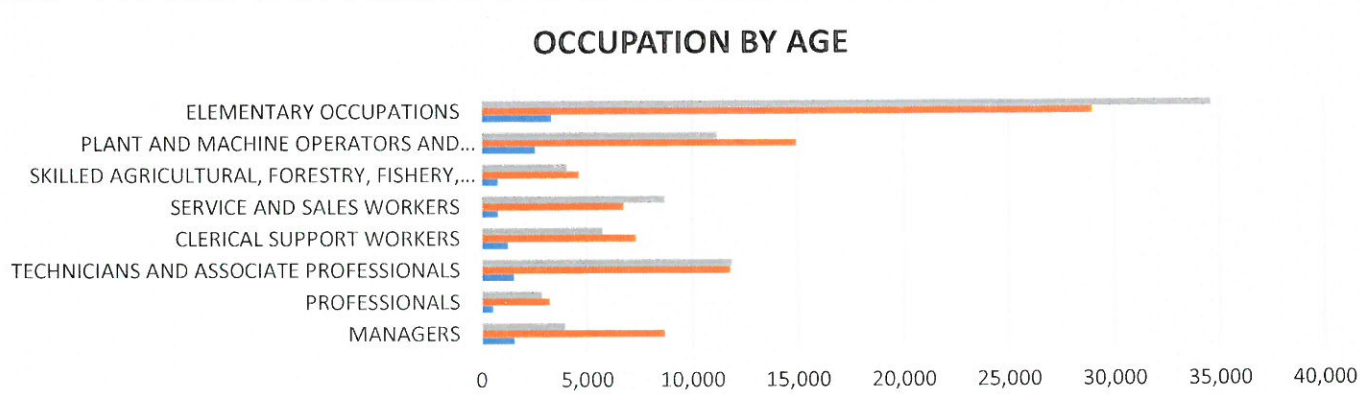



| | MANAGERS | PROFESSIONALS | CLERICAL SUPPORT WORKERS | TECHNICIANS AND ASSOCIATE PROFESSIONALS | SERVICE AND SALES WORKERS | SKILLED AGRICULTURAL, FORESTRY, FISHERY, CRAFT AND RELATED... | PLANT AND MACHINE OPERATORS AND ASSEMBLERS | ELEMENTARY OCCUPATIONS |
|---|---|---|---|---|---|---|---|---|
| FEMALE | 5,088 | 3,452 | 7,664 | 9,715 | 7,041 | 2,707 | 6,206 | 32,834 |
| MALE | 9,105 | 3,171 | 6,654 | 15,544 | 9,173 | 6,741 | 22,467 | 34,077 |

### 1.6.4. EMPLOYMENT BY AGE

Figure 15 below outlines the number of employees in the sector according to age. The figure illustrates that the majority of employees in the sector 86 370 (48%) fell within the 35-55 age category, while there were 83 012 (46%) employees that were younger than 35 years old. In addition, employees older than 55 years old comprised of only 12 257 (6%) of employees in the sector. Consequently, there is a sufficient pipeline of employees in the 35-55 and younger than 35 age categories to replace those approaching retirement. This indicated that replacement demand due to retirement is not a huge issue but the transfer of skills is. Thus, the younger than 35 age-cohort of employees (including graduates) need to be mentored and equipped with the necessary skills, to be able to replace workers in the over 55 age-cohort. This pattern is similar to the one identified in the 2016 and 2017 SSP updates.

*Figure 15: Employment by Age*

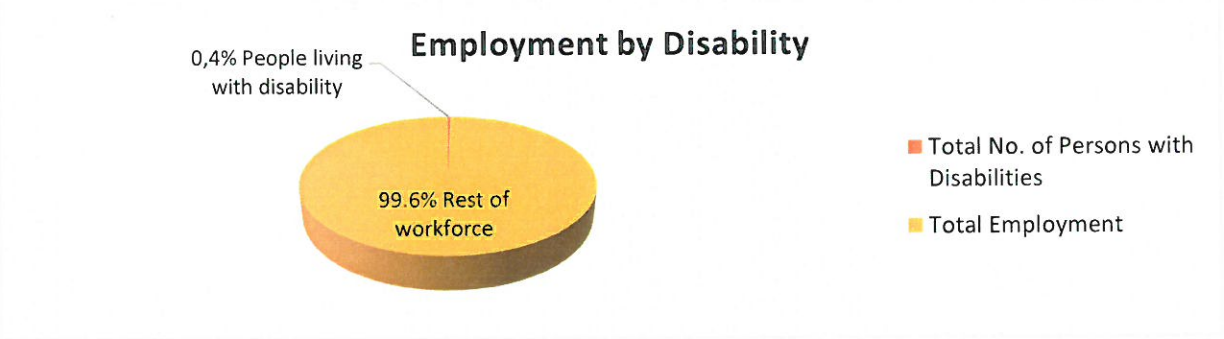



| | MANAGERS | PROFESSIONALS | TECHNICIANS AND ASSOCIATE PROFESSIONALS | CLERICAL SUPPORT WORKERS | SERVICE AND SALES WORKERS | SKILLED AGRICULTURAL, FORESTRY, FISHERY, CRAFT AND RELATED TRADES WORKERS | PLANT AND MACHINE OPERATORS AND ASSEMBLERS | ELEMENTARY OCCUPATIONS |
|---|---|---|---|---|---|---|---|---|
| Age Group - Less than 35 | 3,960 | 2,861 | 11,900 | 5,732 | 8,704 | 4,052 | 11,191 | 34,612 |
| Age Group - 35 to 55 | 8,682 | 3,231 | 11,822 | 7,347 | 6,750 | 4,631 | 14,931 | 28,976 |
| Age Group - Greater than 55 | 1,551 | 531 | 1,537 | 1,239 | 760 | 765 | 2,551 | 3,323 |

**Source: FoodBev SETA WSP-ATR, 2018**

### 1.6.5. EMPLOYMENT BY DISABILITY

*Figure 16: Employment by Disability*




**Source: FoodBev SETA WSP-ATR, 2018**

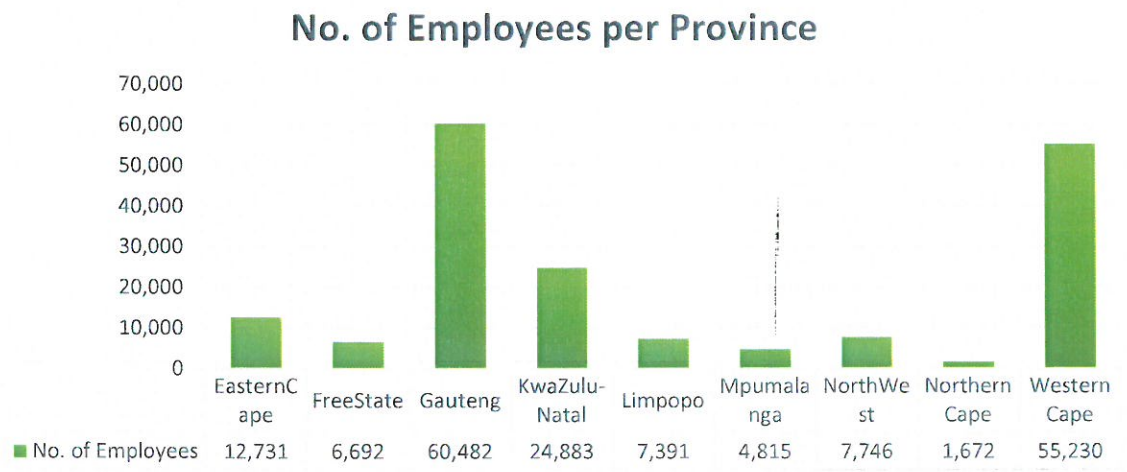
The figure above illustrates that employees with disabilities only comprise of 0.4% (595) out of the total employment of 181 642, in the sector. This represents a decrease of the employment of people with

disabilities compared to 0.6% as reflected in 2016 and 2017 SSP. These figures should be treated with a degree of circumspection, because some employees do not disclose their disability status. Notwithstanding this, the percentage mentioned above is used for reporting purposes and falls short of the 4% target that government has set for achievement. Consistent with this, the FoodBev SETA has to continue to fund projects that are aimed at increasing the number of people with disabilities in the sector.

### 1.6.6. EMPLOYEE PROFILE BY PROVINCE

Figure 17 shows the employee distribution across the nine provinces. Together Gauteng, Western Cape and KwaZulu Natal account for over 70% of the total employment in the sector. The provincial distribution is consistent with the findings of 2016 and 2017 SSP. The provinces with the least number of employee representation was the Mpumalanga and Northern Cape, accounting for only 1% of total employment in the sector.

*Figure 17: Provincial Distribution of Employees*




**Source: FoodBev SETA WSP-ATR, 2018**

## 1.7. CONCLUSION

In the racial profile of the sector, Africans (both male and female) constituted the majority of employees in the elementary occupational category at 75% relative to Whites (both male and female) who comprise 1%. Africans (both male and female) encompassed 29% of employees in the managerial occupational category compared to 48% (both male and female) of Whites. Africans represent fewer employees in the managerial occupational category relative to Whites therefore, transformation should be a strategic focus area in skills development, aimed at Africans to occupy higher skilled positions in the sector and have a greater percentage of managerial jobs that reflect the countries demographics. Regarding gender, males occupied 64% of managerial positions and females only 36%. The percentage

of African females is particularly low at 11%. Thus, a programme aimed at transformation in managerial positions in relation to skills development in higher skilled positions should be targeted mainly at African females.

Considering the age profile of the sector, the findings indicated that there is a sufficient pipeline of employees to replace those that are nearing retirement. However, these employees will need to be mentored and trained before the older employees retire. The disability figure of 0.4% for the sector falls woefully short of the 4% employment target set by government, hence FoodBev SETA needs to consider increasing the number of disabled learners entering learning programmes in the sector in order to achieve this target. One of the interventions could be to enter into agreements with Disabled People South Africa (DPSA) representing people living with disabilities and Learners with Special Education Needs (LSEN) schools to improve access of people living with disabilities into the food and beverage sector through skills development.

# 2. CHAPTER TWO: KEY SKILLS ISSUES

## 2.1. INTRODUCTION

This chapter highlights change drivers in the Food and Beverage Manufacturing Sector. Salient drivers covered are global competitiveness, nutritional foods, drought, expansion and technology. The skills implications of these drivers will also be explored. The chapter will also review the alignment of the sector to key national plans and priorities.

## 2.2. CHANGE DRIVERS

### 2.2.1. GLOBAL COMPETITIVENESS

As the competitive landscape shifts in tandem with changing consumer desires, the food production system must change to meet new needs. It's already under natural economic pressures, struggling to keep pace with consumption needs. To battle scarcity, react to climate changes, and meet the consumption needs of a growing urban population, the food production system will be rethought. That means the what, where, why and how of food production will be completely reinvented, and even stages of the food production system will shift. For example, product design will become more creative using new materials to create food; vertically managed portions of the system will convert to platform business models to improve efficiency; and distances between stages will decrease with technologically fuelled step changes in the economics of small scale growing methods. All of these changes point to a very different food production system that evolves quickly to deliver on new production needs (Salmon, 2017). In 2017/2018, South Africa was rated 61 and was previously 47 in 2016/2017. Covering 137 economies, the Global Competitiveness Index 2017–2018 measures national competitiveness—defined as the set of institutions, policies and factors that determine the level of productivity (World Economic Forum, 2017). There is a need for the Food and Beverage sector to improve their competitiveness through skills development. The BRICS countries are on various levels on the index, with China at 28, followed by Russia at 38, India at 40. Brazil is the lowest ranked BRICS country at 80. South Africa can learn some lessons from fellow BRICS country China on how to become more competitive, especially in the Food and Beverage sector. South Africa participated in the Worldskills Conference in 2017 held in Abu Dhabi. The 44th world skills competition was held on the 14th of October 2017 and ended on the 19th of October 2017 in Abu Dhabi. South Africa was one of the 59 countries that participated in the competitions. Twenty-two (22) competitors from the South African team competed in 20 skill areas. Member results on overall points confirmed South Africa's 30th position out of 56 member countries. Sadly, South African competitors did not achieve any medal status. This confirms the need for South Africa to gain the necessary skills to compete globally in skills development and be more attractive for investors. There is therefore a need for skills that will increase efficiency and global competitiveness across the Food and Beverage sector.

### 2.2.2. NUTRITIONAL FOODS

With high level of awareness and access to information sources, consumers are increasingly seeking food and drink products that are healthy, fresh and score high on nutritional value. Additionally,

customers gravitate towards products that are sugar free, gluten free, lactose free and have a low calorific value. Food and drink manufacturers are focusing on procuring natural ingredients and substituting them for artificial flavours and substances. This has brought a major change in the procurement strategies of the Food and Beverage companies across the globe. This coincides with consumer preference for transparency with regards to claims by food manufacturers of better health and quality is an overriding global concern currently.

Stakeholders agreed that the trend for organic food is relevant to South Africa because it is driven by a more health conscious consumer and an expanding Black middle class. In the poultry sector consumers require information on the origins of chickens and how much brine is in it. The larger companies in the poultry sub sector manage to meet the labelling regulations; companies such as Woolworths and Pick and Pay conduct intense assessment to ensure that they sell safe food to consumers. However, the smaller companies cannot meet the arduous labelling requirements. Nevertheless, some stakeholders were critical of the relevance of the international trend of purchasing organic food in South Africa, because it is an elitist practice characteristic of the higher living standard measure (LSM) categories who can afford it. In South Africa consumers from the lower LSM categories are predominantly driven by cost considerations, and the need to meet their staple needs.

In the Food and Beverage sector, labelling has impacted packaged products because nutritional information needs to be updated in accordance with the pending review of R429 regulations which prohibit manufacturers from making false and unsavoury health claims. According to Innova Market Insights clear and clean labelling is no longer just a trend in the Food and Beverages Manufacturing Sector it is not the "new rule of the game" (as cited in Menayang, 2016). Consumers do not only want to know what they are consuming but they need to be ensured that the product is as healthy as its labelling claims.

The trend of organic food linked to clear labelling underscores the need for innovation in organic food product development and its nexus to quality. Stakeholders therefore mentioned the need for people with skills in research and development, ensuring adherence to quality standards, testing and verifying claims as stated on labels. Nutrition, labelling and regulatory specialist, as a new proposed occupation, can ensure that the Food and Beverage Manufacturing Sector meets the regulations set out by government as well as consumer preference.

### 2.2.3 PACKAGING

Packaging is essential at different stages of the food and beverage production process. There is a growing need for packaging that will not only improve the stock management of raw material for processing, shelf life of products, enhance marketing but packaging that is also environmentally friendly (McClelland, 2017). Wastage occurs at different stages of the food and beverage value chain in South Africa. Agriculture/post-harvest stage has 50% wastage, 25% in the processing and production stage, 20% in the distribution and retail stage and lastly 5% wastage occurs at consumer level. Nighty-one percent of packaging, in the form of plastic, forms wastage (de Vries et al., 2017).

New innovations such as Radio-frequency Identification (RFID), re-closure and personalisation are some of the packing methods that Avery Dennision is developing (Gravanns, 2017). Even though plastic plays an imperative role in reducing food wastage and reducing carbon omission it still forms a large component of pollution. Plastic pollution in South Africa has led to the probable review of the plastic regulations that are in line with world standards (Business Tech, 2018). Research and development, material science engineers are some of the typical skill required for improved packaging in the Food and Beverages Manufacturing.

### 2.2.4 DROUGHT

In the last three years' drought has affected parts of the country especially the Western Cape and the sector at large. In the processed meat sub sector (beef), there was a dramatic decline in the quality and number of cattle coming into the feedlots. In current conditions, beef supply could drop by 30-40% this year alone. The Red Meat Producers Organisation (RPO) stated in November 2015 that more than 40,000 cattle have died and serious losses of livestock were experienced in the emerging sector countrywide. (Farming Portal: 2016). According to Farmer's Weekly (2017) livestock production continues to be affected by drought conditions particularly in the Western Cape, which accounts for just over eight percent of the livestock in the country. Drought conditions have severely affected feed and water supply thus increasing the cost of red meat year-on-year.

Most stakeholders have concurred that the current drought is having a debilitating impact on particularly the food processing industry, i.e. meat, maize processing and dairy. A stakeholder representing a company that processes maize stated that they need to import white maize due to the acute local shortage. In the dairy sub sector, water usage and consequent effluent emanating from the production process is substantial. The dairy sub sector treats the effluent and reuses this water through a tried and tested technological process called anaerobic digestion. The technology adopted by the dairy sub sector was not capital intensive but operationally expensive.

Despite the crippling effect in certain sectors, the drought did not have a harsh impact in other sectors, namely soft drinks and some parts of the meat processing sector (pork). According to a respondent from the pork sector, the drought did not have a devastating impact as it did on the beef sub sector. He mentioned, "The ability of the company to plan ahead shielded the sub sector from the harsh drought, in fact we never had a shortage of pigs".

In other regions, the drought has been broken in Gauteng, North West, Limpopo and the Free State. However, it has reached crisis levels in the Western Cape and the provincial government has implemented tough water restriction measures as an exigency initiative.

The primary skills need emanating from the drought is the need to be more innovative in food production, as the countries food security is of grave concern. This will entail a need for multidisciplinary skills such as: food and beverage scientists and microbiologists, amongst others. Another implication as suggested by stakeholders is the need for risk mitigation and planning skills, amongst managers and executives. The final skills implication is the need for waste water specialists, specialising in the use, reuse and conservation of water.

### 2.2.5 EXPANSION

Economic growth in South Africa remains weak. Stakeholders agreed with the poor growth projections prospects in the Food and Beverage Sector. However, company growth in the country and rest of Africa is expected to remain robust. According to Global African Network (2017) 30% of South African exports were to African countries and 83% of these exports were to Southern African countries.

Although companies are affected by the prevailing economic conditions, companies still have the desire to expand nationally and internationally. Stakeholders have indicated plans of expanding operations to other provinces and in, some cases, countries. The expansion plans have resulted in the need to recruit and employ more people to fill the positions created by the expansion. Some stakeholders have indicated that rather than employing new people, companies are promoting and training their current staff to fill positions. Company expansion is a catalyst for skills development in the sector because apart from the up skilling, it also brings about new occupations in logistics and provincial management.

The skills implication for successful African expansion is premised on the business strategy of the company as expressed by stakeholders. Greenfield investments are complex undertakings that require a suite of skills that are not amenable to FoodBev SETA grants as the recipients need to be South African nationals. Despite this, South African companies are expected to transfer and invest in the skills of personnel in African countries, particularly at management level. However, exporting into Africa is a strategy that requires different skills that could be considered such as labour relations.

These require research and development into new product development due to the expansion into different African countries, characterised by diverse consumer markets. In addition, advanced marketing skills will be required for the marketing of new products. Sales personnel possessing excellent selling skills will be required to convince consumers to buy new products in new markets. Finally, skills in logistical operations are relevant for an export driven strategy.

### 2.2.6 TECHNOLOGY

Food Engineering (2018) predicts that automation and robotics will rapidly be adopted by the Food and Beverage Manufacturing Sector. The sector's manufacturing plants are increasingly moving toward automation to reduce human error and increase productivity. This direction taken by the sector confirms the transition of business from the third to the fourth industrial revolution. The third and fourth revolution highlights technology and electronics as a key change driver for automation of production. However, the distinction between the third and fourth revolution is the pace of change, i.e. breakthroughs are happening at a rate unprecedented in history and industries are being transformed at an accelerated speed[6]. According to Buckus (2017), the drive for automation increases the level of

[6] Business Report, 28 March 2018. What is the Fourth Industrial Revolution? (Online) Available from: https://www.iol.co.za/business-report/opinion/what-is-the-fourth-industrial-revolution-14127465. Accessed April 2018.

complexity associated with such technology and the need for operators or low-level skills that currently operate machines will become redundant. Stakeholders highlighted the need for highly skilled employees and training of current staff to operate new or upgraded machines. However, in subsectors like poultry the level of automation is not as pronounced and it is still labour intensive.

Virtual Reality also known as VR is the method or techniques to simulate the feeling or experience of being inside a simulated or artificial environment which are usually generated by computer or machine. Virtual Reality can be effective and efficient with regards to the delivery of training for the employed and unemployed learners in the food and beverages manufacturing sector. It is envisaged that the current methods of implementing training will soon be replaced by Virtual Reality based type of training. Developed countries are already using Virtual Reality as means of delivering training. Careers linked to Virtual Reality includes amongst others occupations such Virtual Reality Specialist/Virtual Reality Consultants, Systems Analyst, Programmer/Software Developer, Trainer/Lecturer/Facilitator. Those responsible for providing training in the sector may have to be trained on soft skills to enable them to use Virtual Reality effectives.

Other skills implications for increased automation are firstly; the need to upgrade the skills of operators who need to operate complex machinery. Secondly, the need for instrumentation control and automation capability skills amongst artisans is necessary. Finally, skills in laboratory analysis need to be developed in order to adhere to regulations associated with technological advancements.

### 2.2.7 FOOD SAFETY

The recent outbreak of Listeria monocytogenes in South Africa has become a growing concern and food safety has become a priority for the Food and Beverages Manufacturing sector. The World Health Organisation (2017) states that there are more than 200 diseases that result from unsafe food due to bacteria, parasites or chemical substances. Food poising can be detrimental thus it is imperative that the correct measures are in place to ensure that the contamination of food is reduced if not entirely eliminated.

According to Botha (2018), South Africa has numerous regulations pertaining to food and beverage manufacturing safety. However, some of these regulations are outdated or exclusive such as Hazard Analysis and Critical Control Point system (HACCP) or they do not include some key areas of concern such as the monitoring the control of the Listeria monocytogenes. The HACCP is a system that ensures food safety, it analysis microbiological, physical and chemical hazards in every step of manufacturing, storage and distribution of food products. Thus, it is imperative that such regulations are inclusive of all manufacturers and handlers of food and beverages as indicated by the British Standards Institution Group South Africa, (2018). The South African government needs to update and formulate a new regulation that ensures compliance by food and beverage manufacturers. Subsequently, the SETA needs to engage in the formulation of the legislation to determine if they will not give rise to skills development opportunities that fall within the SETA scope and to facilitate skills development that will ensure food safety.

The World Health Organisation recommends that a country should have one environmental health practitioner per 10 000 people. Gous (2018), indicates that South Africa is lagging behind in this regard with one practitioner per 30 000 people. This may be considered as a clear indication of scarce skills within the country. Stakeholders have alluded to the need for more Quality Control Personnel to continue to adhere to the regulations around food security. This area of food security within the business is an important change driver that continues to encourage business to aspire to world class standards. The FoodBev SETA needs to actively facilitate the development of more Food Inspectors within the country to monitor food safety in its entirety as well as to develop or upskill the quality control personnel within industry. This includes the development of Agricultural and Food Scientists and Technicians, Microbiologists, Chemists and Materials Scientists which are some of the skills that are required to monitor food safety.

## 2.3 ALIGNMENT WITH NATIONAL PRIORITIES AND PLANS

### 2.3.1 INDUSTRIAL POLICY ACTION PLAN

Interaction with the agro-processing unit at the DTI revealed that it is currently busy with programmes such as unlocking value chains at a macro level, to refine the policy thrust of the latest (2016-17) Industrial Policy Action Plan (IPAP). Nevertheless, the 2016-17 stakeholder engagement sessions revealed that the Western Cape Government (WCG) is pursuing a project called Khulisa which identifies agro-processing as one of three growth sectors in the province. The WCG, in its Strategic Plan for period 2014 – 2019, has set itself five strategic goals called: Provincial Strategic Goals (PSG), and first of these Goals (PSG 1) is; *"to increase economic growth and employment"*. It is important to note that PSG 1 is derived from the National Outcome 4: Decent employment through inclusive economic growth. To guide the realisation of PSG 1, Project Khulisa was initiated to analyse the Western Cape Province's economic sectors, and through this rigorous exercise, three sectors were selected for the WCG to focus on, and one of these sectors is Agro-processing. Project Khulisa indicated that the Agro-processing sector has a potential to grow from the Gross Value Add of R12 billion to R26 billion, and also to increase the jobs from 79 000 to 179 000 during the aforementioned Strategic Plan period – 2014 to 2019.

Following the Steering Committee's selection of the six high-potential sectors, Project Khulisa undertook in-depth analysis of the growth, job opportunities and the challenges hindering each of those sectors. This analysis concluded with a specific detail on the action that the WCG and its public- and private sector partners could take to accelerate growth in each sector.

The three Strategic Intents (Key Focus Areas) identified by the WCG, namely:

- **Strategic Intent 1:** Increase exports of Wine and Brandy to China and Angola – Double the value of SA Wine exports to China and Angola by 2025;
- **Strategic Intent 2**: Capture a larger share of the global Halal market - To grow the Western Cape's share of the global Halal market from <1% to 2% by 2025; and

- **Strategic Intent 3**: Improve local production capacity for domestic and key strategic markets – Increase the value added by the Western Cape Agro-processing Sector by R7billion by 2020.

The Eastern Cape has realised that the agricultural sector, both primary and secondary sub-sectors, are not contributing to the provincial economy as expected, considering the endowment of natural resources such as climate, land, water and ocean. The drive currently is towards the Agro Industry Development focussing on the priority sectors red meat, grain industry – maize milling, fresh produce development and other niche sub-sectors. For the small-scale milling (these entities are currently being supported with a view of developing into independent co-operatives) which is operational, the following skills shortages have been identified; Millers, Repair and/or Maintenance technicians, Food Safety Controllers and Grain quality graders.

The skills implications of these programmes in the context of IPAP were determined through engagement with the agro-processing unit and skills for the economy unit at the DTI. The Skills implications would mean diversifying the primary economy by investing in the skills shortages identified. This would create employment and stimulate the primary sector to contribute more to the GDP than it is currently doing. In relation to project Khulisa the Western Cape Department of Economic Development and Tourism is on the cusp of undertaking research into the skills requirements for the agro-processing sector in the province and this can be formalised as one among other areas in a MOU.

### 2.3.2 NATIONAL SKILLS DEVELOPMENT STRATEGY

Each Sectorial Education and Training Authority (SETA) is required to develop a SSP within the framework of the NSDS. The NSDS III is a sub-component of and run concurrently with the Human Resource Development Council of South Africa (HRDSSA II). The HRDSSA is responsible for undertaking research into various areas related to skills supply in South Africa ("SA"). The NSDS III places great emphasis on relevance, quality and sustainability of skills training programmes to ensure that they impact positively on poverty reduction and inequality. Over and above the 8 NSDSIII goals, the SETA introduced 2 additional goals which focus on the SETA efficiency and effectiveness as well as quality assurance and monitoring. Goal 7 of the NSDS III which looks at developing capacity in the public service for improved service delivery and developing a developmental state is addressed by the FoodBev SETA through partnerships with public entities such as Mogale City.

### 2.3.3 NEW GROWTH PATH ("NGP")

The NGP is aimed at enhancing growth, employment creation and equity. It identifies strategies that will enable South Africa to grow in a more equitable and inclusive manner while attaining South Africa's developmental agenda. Key targets include the aim to produce 30 000 engineers by 2014, with a focus on Mathematics and Science as well as changes to university funding formulae to achieve this, and 50 000 artisans by 2020. Engineers and artisans appear on the 2018-19 PIVOTAL List of the FoodBev SETA and will be addressed through the discretionary grant allocations as fleshed out in the APP. Therefore, FoodBev SETA will be supporting this key national policy and strategy.

### 2.3.4 NATIONAL SKILLS ACCORD

This is one of three first outcomes of social dialogue on the New Growth Path. This accord was entered into between government, business, labour and civil society and consists of the following relevant commitments and associated contributions from FoodBev SETA:

| National Skills Accord commitments | FoodBev SETA contribution |
|---|---|
| To expand the level of training using existing facilities more fully. | Commitments 1 and 2 will be addressed through increased artisan training and TVET college partnerships as reflected in the APP. |
| To make internship and placement opportunities available within workplaces | |
| To improve the funding of training, the use of funds available for training and incentives for companies to train | The FoodBev SETA will continue allocating discretionary grant funding to companies which submit approved WSPs and ATRs in accordance with the PIVOTAL List. The discretionary grant funding is evaluated according to prescribed criteria. Awards are given to companies that have trained beyond their needs |
| To improve SETA governance and financial management, as well as stakeholder involvement | The various levels of authority at the Food Bev SETA adhere to corporate governance and treasury prescripts. Quarterly chamber meetings are convened with stakeholders addressing an array of issues (recommending research, qualification development etc. to the Board). |
| To align training to the New Growth Path and improve SSP | Providing support to NGOs, CBOs and co-operatives and SMMEs. The FoodBev SETA SSP aligns its skills priority actions to national government requirements. |
| To improve the role and performance of TVET colleges | The TVET guest lecturer programme entails the capacitation of TVER lecturers to meet industry needs. Opening of TVET offices to forge closer relationships with industry |

### 2.3.5 NATIONAL DEVELOPMENT PLAN

The National Development Plan (NDP) has set an ambitious target of creating 11 million jobs by 2030. In pursuance of this target, the NDP has identified sectors that possess high potential for economic and job growth. The agro-processing sector has been acknowledged as a sector with immense job creation potential. The agro-processing sector is subsumed under the land reform strategy in the NDP and proposes that small black owned agro-processing businesses should be the principle beneficiaries of support.

There is an aquaculture industry development initiative in the Eastern Cape, which involves the establishment of the entire value chain linked with each enterprise. The food safety controllers, operations managers and laboratory assistants are critical skills for this development. The agro-

processing ventures are in an embryonic stage of development and consequently the skills implications of these projects will be determined through the engagement of the Eastern Cape department of Economic Development, Tourism and Environmental Affairs.

### 2.3.6 REVITALIZATION OF THE AGRICULTURE AND AGRO-PROCESSING VALUE CHAIN, AND THE AGRICULTURE POLICY ACTION PLAN

The Revitalization of the Agriculture and Agro-processing Value Chain (RAAVC) and Agriculture Policy Action Plan (APAP) identified the latent potential of downstream agro-processing activities as a catalyst to spur growth and development through backward and forward linkages with other sectors of the economy. The backward linkage is through the contribution of the agro-processing industry with primary agriculture through provision of capital equipment, inputs such as fertilisers and pesticides for agricultural production; salaries and wages. Forward linkages relate to provision of raw material for manufacturing sector, support to packaging industries and services sectors such as logistics, transport and marketing (DAFF:2018).

Therefore, the agro-processing sector has over the years displayed the highest employment multiplier in the economy as articulated in the IPAP. However, the agro-processing industry still remains largely concentrated implying entry and active participation of small and medium enterprises remains limited. In an effort to facilitate this, the SETA has started registering SMEs, NGOs, NPOs, CBOs and Cooperatives to its internal database, ensuring that these organisations have access to discretionary grants to train on and bridge the scarce and critical skills gap, especially in business practices, amongst others.

### 2.3.7 THE STRATEGY ON SUPPORT AND DEVELOPMENT OF AGRO-PROCESSING ENTERPRISES IN SOUTH AFRICA

The strategy is an endeavour by the Department of Agriculture, Forestry and Fisheries (DAFF) to implement agro-processing development initiatives articulated in the NDP, RAAVAC, APAP and IPAP. The strategy is anchored on four (4) intervention pillars to mitigate barriers to entry but also improve competitiveness of agro-processing enterprises. One of the main barriers to active participation in the mainstream agro-processing industry identified by the Strategy and RAAVC, inhibits the competitive nature of enterprises is the none-compliance of facilities to pre-requisite agro-processing norms and standards. Understanding and compliance of agro-processing facilities with the pre-requisite norms and standards is expected to significantly improve the competitiveness of enterprises. Additionally, agro-processors will be able to bid for local and export market opportunities.

The high cost of being trained and certified on these norms and standards act as a barrier to entry and participation by particularly small and medium agro-processing enterprises.

## 2.3 CONCLUSION

This chapter highlighted change drivers in the sector. One of the main driver of change is nutritional foods which is fundamental to the growth of organic foods. This trend is relevant in South Africa but is more appropriate for the higher LSM categories. Global competitiveness is also an important change driver and the Food and Beverage sector has to become more competitive to ensure sustainability. The drought is a unique change driver in South Africa since 2016 as it is having a decimating effect on certain parts of the food and beverage processing sector. Companies expansion nationally and into Africa is another change driver that has continued to propel the sector forward. The impact of technological advancements on the Food and Beverage Manufacturing Sector is another salient change driver. Manufacturing plants within the sector are increasingly becoming more automated and the skills implications for this include the need to upgrade the skills of operators who need to operate complex machinery. Food safety has also been included as a change driver since the recent outbreak of Listeria monocytogenes in the country.

The key skills issues that can be inferred from the change drivers and the national plans and priorities are:

- Research and development for new innovation and new product development with regard to the challenges of drought, expansion and the preference for organic food.
- Marketing and sales skills in relation to African expansion. Marketing and sales skills will also be required to capture a growing share of the potential markets.
- The need for quality professionals with regards to clear labelling and compliance.
- The need for Food and Beverage Scientists, Food Inspector, Microbiologists, Chemists and Materials Scientists for testing the quality and health claims of food products to ensure food safety.
- Provision of training to small agro-processing entities to alleviate the high cost of compliance to norms and standards which act as a barrier to entry.

# 3 CHAPTER THREE: OCCUPATIONAL SHORTAGES AND SKILLS GAPS

## 3.1 INTRODUCTION

This chapter covers the extent of occupational shortages and skills gaps in the Food and Beverage Manufacturing Sector. The extent of demand is based on an analysis of vacancy rates of core occupations at the OFO six-digit levels. The demand analysis will be limited to the top ten occupations. This is followed by an analysis of the stock of occupations and supply of skills in the sector, commencing at school level as it is an important component of the skills pipeline feeding firstly, into the labour market at entry level and secondly, into tertiary education. Finally, the chapter identifies the PIVOTAL list, in relation to the issue of demand and supply.

## 3.2 OCCUPATIONAL SHORTAGES AND SKILLS GAPS

The approach taken to determine occupational shortages and skills gaps is twofold. This includes an analysis of the 2019-20 WSP-ATR submission and feedback from stakeholder engagements. The analysis of the WSP-ATR database focused on the section where hard to fill vacancies is reported. The analysis yielded 10 occupations that were hard to fill within 12 months or more. Stakeholder engagements were undertaken in the second phase of the SSP submission before 1st August 2018.

### 3.2.1 HARD TO FILL VACANCIES

The vacancy analysis that is presented as mentioned is limited to the top ten occupations that were in demand for 2017[1]. Table two presents the list of 10 occupations in demand over the 12 months. The results of the analysis show that the Manufacturer's Representative (18%) and Crop Production Farm Worker / Assistant (15%) were the highest reported vacancies of the financial year. These were followed by the Food and Beverage Factory Worker (12%), Millwright, Production/ Operations Supervisor (Manufacturing) (10%), Manufacturing Operations Manager (9%), and Food and Beverage Technician (8%). Food and Beverage Process Controller, Fitter and Turner and Electrician occupations were the lowest reported number of vacancies which ranged from 5-6%.

Table 2: List of Hard-to-fill Vacancies

| Occupation | No. of Vacancies | % |
|---|---|---|
| **Manufacturer's Representative** | 120 | 18 |
| **Crop Production Farm Worker / Assistant** | 102 | 15 |
| **Food and Beverage Factory Worker** | 79 | 12 |
| **Millwright** | 71 | 11 |
| **Production / Operations Supervisor (Manufacturing)** | 67 | 10 |
| **Manufacturing Operations Manager** | 59 | 9 |
| **Food and Beverage Technician** | 52 | 8 |
| **Food and Beverage Manufacturing Process Controller** | 41 | 6 |
| **Fitter and Turner** | 40 | 6 |
| **Electrician** | 33 | 5 |
| Total | 664 | 100 |

[1] The analysis is limited to the top ten as it correlates with the PIVOTAL list required for submission.

### 3.2.2 REASONS UNDERPINNING HARD TO FILL VACANCIES

Table 3 below presents the reasons that stakeholders have provided which underlies the demand for these occupations. Due to the new reporting format with regards to reasons given for the vacancies, the responses provided were not quantifiable and hence the table which indicates the reasons for the vacancies. Lack of relevant qualifications and experience were two of the most frequent reasons given for the vacancies of the last 12 months. All of the vacancies cited lack of experience as the main reason for the vacancy. Nine of the ten companies cited lack of relevant qualification as a main reason behind the vacancies. The occupation that would not ordinarily require any qualification like the Crop Production Worker/Assistant did not cite lack of relevant qualification as a reason for the vacancy. Geographic location, lack of specialised people in the subsector, poor remuneration and equity consideration were some of the less cited reasons offered as reasons for the vacancies. Even though less cited, the reasons still offer insight into some of the human resource challenges that companies are facing.

Table 3: Reasons Underpinning Vacancies that are Hard-to-fill

| Occupation | Geographic Location | Lack of Relevant Experience | Lack of Specialised People in Subsector | Poor Remuneration | Equity Considerations | Relevant Qualification | Other |
|---|---|---|---|---|---|---|---|
| Manufacturer's Representative | | x | | | | x | |
| Crop Production Farm Worker / Assistant | × | × | | | | | × |
| Food and Beverage Factory Worker | x | × | | × | | × | × |
| Millwright | × | × | | × | × | × | × |
| Production / Operations Supervisor (Manufacturing) | × | × | | × | × | × | × |
| Manufacturing Operations Manager | x | x | | x | x | x | x |
| Food and Beverage Technician | x | x | | | x | x | x |
| Food and Beverage Manufacturing Process Controller | x | × | | x | x | × | x |
| Fitter and Turner | × | × | × | | × | × | x |
| Electrician | x | x | | x | x | x | x |

### 3.2.3 SKILLS GAPS IN THE SECTOR

The skills gaps in the sector that requires improvements are the following, amongst others:

- Soft skills
- Generic management skills
- Industry knowledge
- Engineering skills

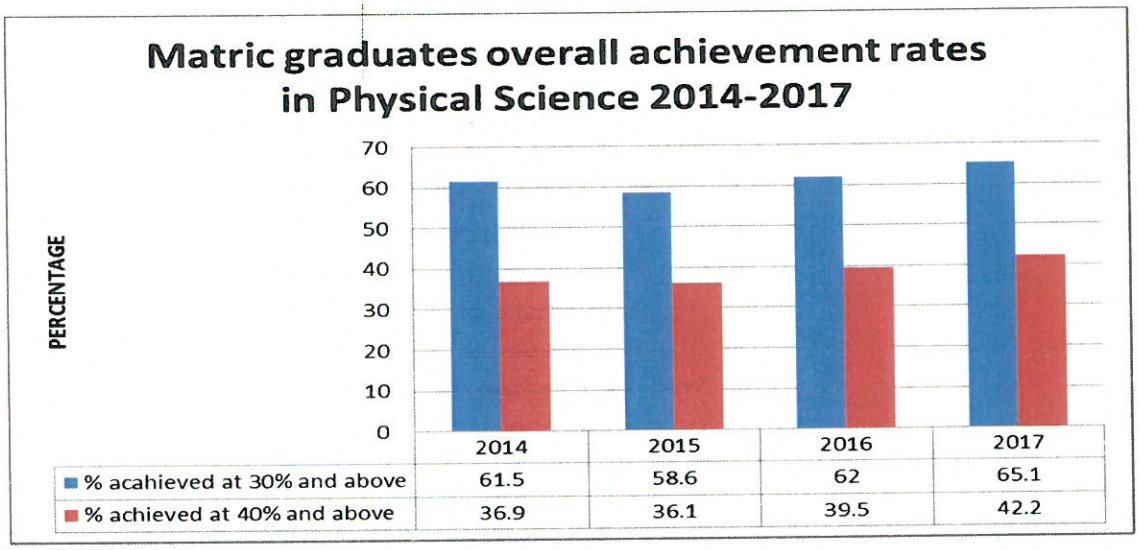
### 3.3 EXTENT AND NATURE OF SUPPLY

The point of departure regarding a supply side analysis for the Food and Beverage Manufacturing Sector is the senior certificate results, as it provides a pipeline directly into the sector for people entering the labour market, immediately after completing Grade 12. Secondly, it also provides a pipeline for those keen on entering Food and Beverage SETA learnerships or furthering their studies at tertiary level.

### 3.3.1 THROUGHPUT AT SCHOOL LEVEL

Figure 18 looks at the achievement of Matric students in Physical Science from 2014 to 2017. The pass rate has accelerated since it took a plunge in 2015 to 59%, this increased to 62% in 2016 and it continued to increase to 65% in 2017. The subject choice in Physical Science is required in order to enter a Food and Beverage related qualification such as Food Science and Technology at tertiary level. The SETA needs to provide support to enhance the number and quality of Physical Science teachers who are crucial in the supply side dynamics to the Food and Beverage Sector.

*Figure 18: Matric graduates overall achievement rates in Physical Science 2014 and 2017*



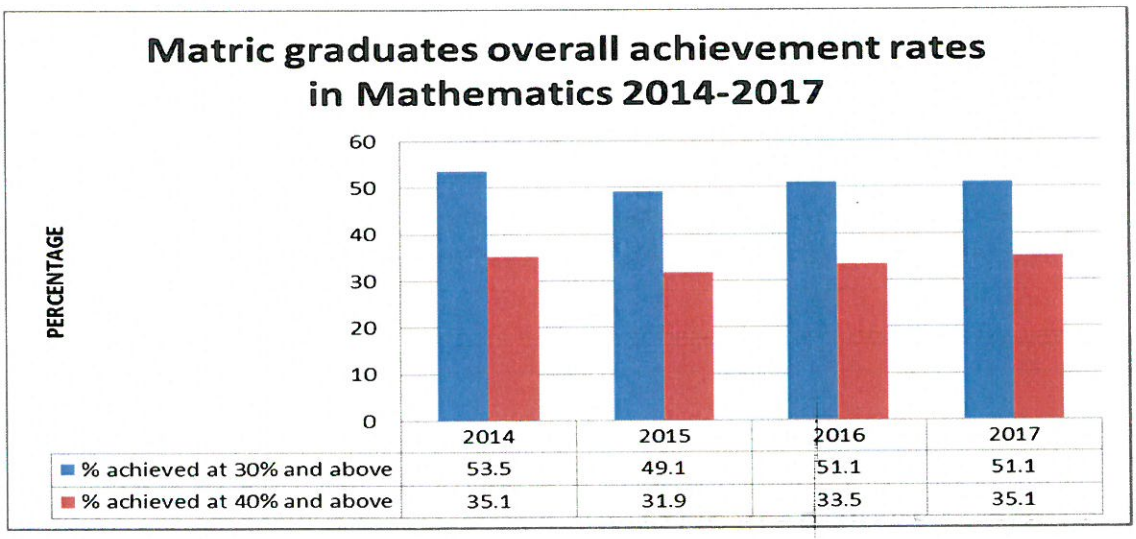

**Data Source: DoBE Diagnostic Report Part 1**

**NB: Data on matric graduates who achieved 50% or more in Physical Science is not available.**

Figure 19 looks at the achievement of matriculants in Mathematics from 2014-2016. The pass rate increased from 51% in 2016 to 52% in 2017. There is a relative acceleration from the decline in 2015. The proposal advanced above in relation to Physical Science teachers applies to Mathematics teachers as well so as to ensure continued growth in the pass rate of Mathematics learners.

Mathematics is paramount for entry into tertiary related qualifications such as Food Science and Technology and Engineering Manufacturing, which is crucial in a manufacturing sector such as food and beverages. The increase in the data throughput suggests there is a sufficient pipeline of graduates that could enter tertiary studies relevant to food and beverage requiring Mathematics as a prerequisite. Furthermore, there is a suitable amount of matriculants that can enter learnerships at NQF level 4 directly into the sector.

*Figure 19: Matric graduates overall achievement rates in Mathematics 2014-2017*




**Data Source: DoBE Diagnostic Report Part 1**

**NB: Data on matric graduates who achieved 50% or more in Mathematics is not available**

There is very little data on the TVETs enrolments and graduation rates which would provide a skills pool from which the sector would draw a significant portion of its employees. Therefore, the only reliable source of information on sector specific data resides in the FoodBev SETA and particularly amongst enrolments and the completions associated with discretionary grant allocations. Table 4 below presents the artisan enrolments and completions for 2017-18 in accordance with Discretionary Grant Allocations. It shows that 190 artisans were successfully enrolled in the 2017-18 financial year and the SETAs targets were achieved. Nonetheless, this achievement and the fact that the target was increased in the 2016-17 Annual Performance Plan (APP), shows that the need is great and therefore numbers need to increase in order to address the demand.

Table 4: Artisan throughput 2017/18

| ARTISANS | ENROLMENTS | COMPLETIONS |
|---|---|---|
| **Electrician** | **50** | **25** |
| **Fitter** | 19 | 6 |
| **Fitter & Turner** | **43** | **5** |
| **Instrumentation** | 5 | 3 |
| **Millwright** | **73** | **40** |
| **Instrument Mechanic** | . | 3 |
| **Mechanical Engineering** | . | **2** |
| **GRAND TOTAL** | **190** | **84** |

**Source: FoodBev SETA MIS 2017 (. Represents missing data)**

Table 5 shows the state of education and training in the Food and Beverages Manufacturing Sector. The table indicates the top 3 implemented qualifications in the sector for both unemployed and employed training interventions. The results show that most of the focus was given to training interventions for the unemployed, over 50%. Food and Beverage Packaging Operations, and Food and Beverage Handling Process were the most implemented qualification. These results indicate where the focus is with regards to training in the sector. Unfortunately, the outputs from the TVET colleges could not be found after various attempts to obtain the data. Furthermore, limited information can be found on the enrolment of TVET colleges. Thus, this table was included to show the state of training from a FoodBev SETA perspective. Completion rates can only be commented on at the end of the financial year because these training interventions overlap financial years.

*Table 5: Most implemented Qualification in the Sector (2017/18 Financial year QMR*

| Qualification Implemented | Total | % |
|---|---|---|
| Employed | | |
| **National Certificate: Food and Beverage Packaging Operations** | 429 | 22 |
| **General Education and Training Certificate: Food and Beverage Handling Process** | 277 | 14 |
| **FETC: Generic Management Level 4 (Food Manufacturing Electives)** | 234 | 12 |
| Unemployed | | |
| **National Certificate: Food and Beverage Packaging Operations** | 547 | 28 |
| **General Education and Training Certificate: Food and Beverage Handling Process** | 264 | 14 |
| **National Certificate: Fish and Seafood Processing** | 192 | 10 |
| Total | 1943 | 100 |

### 3.4 PIVOTAL LIST

The analysis between demand and supply culminates in the identification of the following occupations included in the PIVOTAL list for 2019-20. The compilation of the PIVOTAL list included the verification of the Hard-To-Fill vacancies list which was done through interviews in the second phase (i.e. 1st of August 2018 submission). The second phase entailed an intensive consultative process which involved face-to-

face interviews with company representatives where the numbers in the analysis were either confirmed or corrected. Proceeding the interviews, the PIVOTAL List was presented to stakeholders to get their inputs and comments for the final submission.

The PIVOTAL List below is the final version of the culmination of the hard-to-fill vacancies and verification interviews. Annexure B presents the PIVOTAL List with corresponding NQF levels and training interventions. This year's list is a mixture of industry specific occupations. There are three industry specific occupations Food and Beverage Technician, Wine Maker and Food and Beverage Manufacturing Process Controller amongst the ten occupations on the PIVOTAL List. There are three artisanal occupations, namely Millwrights, Electricians as well as Fitter and Turners on the list. Fitter and Turner is the only technical occupation from the previous year's list that is on the current list. This may be an indication of the demand for artisans across all sectors as it is not an industry specific occupation. Therefore, the amount of funding allocated for this occupation may not be enough to meet the demand of this sector alone.

All the interventions as indicated in Table 6 are informed by the training interventions internal system that the SETA has as well as stakeholder inputs. Production/Operations Supervisor (Manufacturing), Manufacturing Operations Manager, Food and Beverage Technician, Food and Beverage Process Controller, Packaging Manufacturing Machine Minder and Wine Maker occupations which are pitched at NQF levels 1 to 4 require training interventions such as Learnerships. Learnerships were noted by employers as the preferred training intervention because beneficiaries do not have to leave the work place for extended periods of time. Secondly, Learnerships give an opportunity for candidates to obtain integrated prior experience and new knowledge. The three artisanal occupations identified Millwrights, Electricians as well as Fitter and Turners require Technical related training interventions such as Apprenticeships. The difficulty in filling these occupations, apart from the ones noted in table 3, is the lack of work readiness demonstrated by candidates. The need for technical skills will be met by allocating more Apprenticeships, at minimum NQF Level 4, in order to increase the supply of technical skills in the sector. However, work readiness programmes should be considered when focusing on new entrants into the industry.

*Table 6: Top Ten PIVOTAL List Post Verification Phase (i.e. Semi-structured Interviews)*

| Occupation | No. of Vacancies | % |
|---|---|---|
| **Food and Beverage Factory Worker** | 79 | 16 |
| **Millwright** | 71 | 15 |
| **Production / Operations Supervisor (Manufacturing)** | 67 | 14 |
| **Manufacturing Operations Manager** | 59 | 12 |
| **Food and Beverage Technician** | 52 | 11 |
| **Food and Beverage Manufacturing Process Controller** | 41 | 8 |
| **Fitter and Turner** | 40 | 8 |
| **Electrician** | 33 | 7 |
| **Packaging Manufacturing Machine Minder** | 30 | 6 |
| **Wine Maker** | 19 | 3 |
| **Total** | 491 | 100 |

### 3.5 CONCLUSION

This chapter looked at the occupational shortages and skills gaps in the Food and Beverage Manufacturing Sector, the extent and nature of supply, and the PIVOTAL list. The results of the hard-to-vacancy analysis were used to determine demand. The results illustrate that demand is high for Technicians and Associate Professionals such as Food and Beverage Technician and Skilled Agricultural, Forestry, Fishery, Craft and Related Trades Workers such as Electricians, Millwrights and, Fitters and Turners. This illustrates the need for the FoodBev SETA to aggressively fund occupations that are industry specific in order to fill these vacancies. A supply side analysis was undertaken which showed that the throughput from school in terms of Physical Science, and Mathematics was sufficient as a feeder into tertiary education. However, some of the reasons for the supply side problem are the poor quality of matriculants' results and career guidance which limits the number of prospective students. There are interventions that the SETA has been pursuing in improving quality of provision at tertiary level and is explained in chapter five.

# 4 CHAPTER FOUR: SECTOR PARTNERSHIPS

## 4.1 INTRODUCTION

This chapter focuses on the partnerships the FoodBev SETA has within the Food and Beverages Manufacturing Sector, Institutions of Higher Education and other SETAs. An overview of the current partnerships, successful partnerships, new partnerships and partnerships with other SETAs is highlighted in this chapter.

## 4.2 CURRENT PARTNERSHIPS

The White Paper on Post School Education and Training looks at the issue of developing close relationships between TVET colleges, universities and employers. Partnerships between colleges and SETAs will be facilitated by the establishment of offices representing the SETAs in each college. These offices should represent all the SETAs in that college, and work to promote and facilitate the relationship between the college and individual SETAs in the interests of both (DHET: 2013).

## 4.3 OPENING UP OF OFFICES IN TVET COLLEGES

The FoodBev SETA responded to the imperative by partnering with 3 TVET colleges and opening up offices in all three TVET colleges. Offices were opened in Maluti, Ekurhuleni West and Tshwane South TVET colleges. The objectives of opening up offices in the colleges are to augment the presence of FoodBev SETA and to establish a closer relationship with colleges and employers. Sector Liaison Officers have been deployed to these offices to assist the FoodBev SETA in strengthening its presence.

## 4.4 PARTNERSHIP WITH TVET COLLEGES: CAPACITATION OF LECTURERS

The White Paper for Post School Education and Training also states that arrangements should be made for college staff to get regular workplace exposure, to keep abreast of developments in their industries. In this regard, the FoodBev SETA had 10 Memorandums of Understanding in the 2017/18 financial year with TVET colleges and companies. The TVET Colleges are South West Gauteng TVET College, Tshwane North TVET College, Johannesburg TVET College, Sedibeng TVET College, Mnambithi TVET College, South TVET College, Vhembe TVET College, TVET College, Capricorn TVET College and Northlink TVET College. The objectives of this partnership is to capacitate TVET college lecturers by offering them invaluable relevant workplace experience so that they can enhance the quality of learning to enable them to be more responsive to the Food and Beverage Manufacturing Sector employer's needs.

The Memorandums of Understanding for the 2018/19 financial year are being finalised. However, the SETA intends on engaging more host companies to participate in the capacitation of lecturers and to encourage TVET colleges to actively participate in the lecture capacitation. The FoodBev SETA is planning to increase the scope of the initiative to encompass partnerships with TVET colleges in rural areas.

## 4.5 EXAMPLE OF A SUCCESSFUL PARTNERSHIP

The FoodBev SETA entered into a 100 bursary and 100 internship partnership with Nestle in the 2016/2017 financial year. This target was over and above the discretionary grant allocation to Nestle. There are 100 learners that are currently registered on bursaries for their 3 year qualifications which

include diplomas and degrees. Of the 100 internships 70 leaners were mentored through the programme of which 20 have found full time employment with the business. The other 30 learners dropped out of the internship programme because they found opportunities elsewhere.[7]

The FoodBev SETA has partnered with WorldSkills SA as the collective voice for skills excellence and development in vocational, technological and service oriented careers around the globe. Its aim is to raise awareness amongst youth, as well as parents, teachers and employers, that our future depends on an effective skills training system. Through this partnership, FoodBev SETA was represented in Abu Dhabi. The sessions covering a wide range of topics under the theme: "Skills strategies for a globalised world". Twenty-two (22) competitors from the South African team competed in 20 skill areas. Member results on overall points confirmed South Africa's 30th position out of 56 member countries. Cooking missed the medal of excellence by 1 point scoring 699. Having the highest point score in the SA team the candidate was nominated for the best of nation award and received a stage appearance and medal for this achievement.

FoodBev SETA has a partnership with QCTO (Quality Council for Trades and Occupations) for the development of the following qualifications: Dairyman, Process machine Operator, Confectionary Baker and Winemaker. The qualifications are in various stages of development.

### 4.6 NEW PARTNERSHIPS

The following partnerships have been established by FoodBev SETA during the 2017/18 financial year:

Table 7: SETA Partnerships

| PARTNERSHIPS | PROJECT DESCRIPTION |
|---|---|
| **SACGC** | Work Experience, Internships and TVET Placements |
| **(AB InBev/SAB)** | Training of disabled learners on learnerships and Engineering bursaries |
| **Mogale City** | Baking Learnerships - Training of unemployed women and youth from 4 cooperatives. |
| **Rural Universities – University of Fort Hare, University of Venda, Sol Plaatjie University, University of Mpumalanga, University of Cape Town (UCT requested a once off funding for their Learners)** | Bursaries targeting historically disadvantaged universities located in rural areas |
| **Nestle SA** | Bursaries for unemployed learners |

Table 7 shows the new partnerships that FoodBev SETA has with other organisations where funds are provided to execute projects. All of these organisations have their specific need in skills training and development. The SETA agreed to fund these projects as they are aligned with the objectives of the

[7] Stakeholder input.

SETA. Bursaries for the unemployed, skills programmes for Baking and training of people with disabilities are priorities of the SETA.

In order to improve efficiency and effectiveness in the food and beverage sector, FoodBev SETA is embarking on a programme with a fellow BRICS country, namely China in an international Education Work Integrated Learning Exchange Programme. It intends to assist TVET Engineering learners with an opportunity to conclude their Work Integrated Learning module alongside their Chinese counterparts. This will not only assist the learners gain valuable work experience but assist in learning more effective ways of working as China is ranked highest on global competitive ranking amongst BRICS countries.

### 4.7 RESEARCH PARTNERSHIP

The FoodBev SETA entered into partnerships with Higher Education Institutions (HEIs). The partnerships are focused on the provision of bursaries to post graduate students to undertake research into the sector. It is envisioned that the research will produce knowledge that would assist the Food and Beverage Manufacturing Sector with new product development, food security, technology to boost productivity amongst others. The list of HEIs that FoodBev has established research partnerships with for the Postgraduate Research Bursary Programme include: University of Stellenbosch, University of Kwazulu-Natal, Tshwane University of Technology, University of Limpopo, University of Venda, Cape Peninsula University of Technology, Durban University of Technology, University of Johannesburg, Nelson Mandela Metropolitan University, University of the Western Cape, University of Free State, North West University, University of Fort Hare, University of Pretoria

### 4.8 PARTNERSHIPS WITH SETAS

FoodBev SETA currently has 12 partnerships with other SETAs which prescribes the principles of cooperation between the SETAs. The Memorandums of Understand with other SETAs are, principally, at two levels. Firstly, if an accredited training provider from either of the SETAs has to train on a qualification that cuts across sector, the training provider is free to do so. Secondly, the accreditation, moderation and quality assurance is a combined responsibility. This would, obviously, vary with each partnership. The list of partnerships with other SETAs aimed at promoting a coherent and effective quality assurance system for education and training include: AGRISETA, CATHSSETA, CHIETA, ETDP SETA, EWSETA, HWSETA, MERSETA, MICT SETA, SASSETA, SERVICES SETA, TETA and PSETA.

### 4.9 CONCLUSION

This chapter looked at the current partnerships FoodBev SETA has with TVET colleges, universities and employers for different training interventions in the Food and Beverage Manufacturing Sector. The initiative of having offices at TVET colleges seeks ultimately to establish more concrete relationships with colleges. Furthermore, the presence of FoodBev in colleges provides an additional pathway to market the sector to students. The partnership with TVETs to capacitate lecturers is a pathway of developing and gaining experience to augment theoretical knowledge. Most importantly, a partnership between FoodBev SETA and Mogale City Municipality was established to support cooperatives in the form of Baking Learnerships for women and youth. Our SETA to SETA partnerships are designed to ensure that there is consistency and best practise within and across sectors. All FoodBev's partnerships are designed to ensure the advancement of skills development

# 5 . CHAPTER FIVE: SKILLS PRIORITY ACTIONS

## 5.1 INTRODUCTION

This is the final chapter which recapitulate the main findings from the preceding chapters and suggest skills priority actions premised on these findings. Finally, the chapter also considers measures to support national policies and plans.

## 5.2 KEY FINDINGS

The key findings based on the previous chapters are:

- **Chapter One:** The Food and Beverage Manufacturing sector has remained quiet steady in its growth patterns however the lack of transformation is still an issue. The sector is the highest contributor to GDP compared to other manufacturing sectors. It has showed a relatively stable employment rate from year to year and WSPs submission rates have steadily increased. However, the chapter has showed that Africans and particularly African females still lag behind other racial cohorts in relation to managerial positions. Furthermore, chapter one reveals the current employment of people with disabilities sits at 0.04% and it still falls substantially short of the 4% target. The, skills development programmes should target African females and disabled people in the sector in order to improve the transformation goals.

- **Chapter Two:** The chapter identified various change drivers within the sector. Global competitiveness, Nutritional Foods, Technology, Drought and Expansion were cited as significant change drivers in business operations. These factors, amongst others, have forced business to change the way it operates to accommodate prevailing changes. In order to deal with factors like global competitiveness, nutritional foods, technology and expansion, companies have to continually train employees to adapt to the changing landscape. Furthermore, research and innovation are important in developing the sector and promoting business interests beyond South Africa's boarders.

- **Chapter Three:** The shortage of artisans and industry specific occupations in the sector captured in chapter was derived through an analysis of demand and supply of skills. The analysis revealed that three of the occupations on the 2019-20 PIVOTAL lists are artisans. Therefore, providing more resources and assistance to stakeholders regarding the alleviation of the shortage of artisans in the sector is required. The quality throughput rate from Basic Education for learning programmes relevant to the Food and Beverage Manufacturing Sector, as highlighted in this chapter, needs to be addressed. Consequently, bursary provision to high potential students who are eager to enter the sector should be pursued.

- **Chapter Four:** FoodBev SETA as a skills partner in education and training has expanded its collaborations with multiple private and public entities ranging from TVET Colleges to local municipalities, Universities, WorldSkills SA, QCTO as well as employers such as Nestle, SACGC, amongst others. These organisations have entered into partnerships with FoodBev SETA for the implementation of various skills development projects.

### 5.3 RECOMMENDED ACTIONS

Below are areas that need to be addressed and require further robust deliberation. These areas are linked to the main findings as presented above.

#### 5.3.1 ADDRESSING ARTISAN SHORTAGES AND DEVELOPMENT

The following areas are highlighted for consideration:

I. The FoodBev SETA has realized the need to assign higher targets for the training of Artisans, Millwrights, Fitter and Turners and Electricians. As a cohort, the target for the 2017/18 financial year was set at 181 and in 2018/19 it was set at 192. In the 2019/2020 APP the target is set to increase proportionately.

II. A multi-pronged strategy is recommended to alleviate the scarcity of Artisans in the Food and Beverage Sector.

#### 5.3.2 IMPROVING QUALITY OF PROVISION OF MATRICULANTS AND GRADUATES INTO THE FOOD AND BEVERAGE MANUFACTURING SECTOR

It is recommended that the FoodBev promote and fund significantly more bursaries for the sector. The SETA has to target matriculants who have performed remarkably well, particularly in Maths and Science as a means to enter into the Food Science and Technology learning programmes. Currently, there is very little emphasis placed on bursaries for matriculants to get into tertiary education. Placing more emphasis on bursaries into Food Science and Technology could potentially produce more industry specific occupations in the long run.

#### 5.3.3 TRANSFORMATION

Transformation should be a strategic focus area for the FoodBev SETA. The FoodBev SETA should consider increasing the allocation of bursaries for relevant post-graduate studies to Africans and particular African females in the Food and Beverage Sector. Therefore, the screening of these students so that they meet the selection criteria will be important. An increase in the number of bursaries for post graduate studies could ensure a pipeline of highly skilled (African males and females) entering the sector so that they have the necessary skills to occupy higher positions.

In relation to disability the FoodBev SETA should continue to set aside a special grant ring fenced for the training needs of disabled people as a means to augment their presence in the Food and Beverage Manufacturing Sector.

#### 5.3.4 ASSIST THE SECTOR TO BOOST INNOVATION THROUGH RESEARCH

The FoodBev SETA awards bursaries towards Masters and PhD studies in research and innovation to encourage innovation in the sector. The need for innovation in food processing as highlighted by the crippling nature of the current drought reinforces the need to realise this recommendation.

#### 5.3.5 SKILLS GAPS IN THE SECTOR

Generic management skills, numeracy, literacy, soft skills and industry specific knowledge skills have emerged as significant skills gaps in the sector. The SETA has various training interventions that can

address management skills, industry specific knowledge and some soft skills. However, the sector may not know what programmes the SETA funds and it may be beneficial to share with industry what programmes the SETA funds. This would ensure that employers are knowledgeable about the programmes the SETA funds. In addition, it would assist in tackling some of the skills gaps found in the sector. The SETA could keep the sector abreast of the learning programmes it funds.

### 5.3.6 CAREER GUIDANCE

Career guidance has emerged as an issue expressed by stakeholders in the broader sector as a reason for graduates not entering the Food and Beverage Manufacturing Sector which results in a shortage of suitable recruits for the sector in tertiary institutions. More aggressive marketing needs to be undertaken by tertiary institutions, industry and the FoodBev SETA. In this way, the FoodBev SETA jointly with industry could highlight core and scarce occupations in the Food and Beverage Manufacturing Sector, as well as showcase the differences amongst them.

### 5.3.7 MEASURES TO SUPPORT NATIONAL STRATEGIES AND PLANS

The primary measures that could be pursued by the FoodBev SETA to support national strategies and plans are:

- To enter into MOUs with rural universities to fund students doing qualifications linked to hard-to-fill occupations and to
- Explore and collaborate with institutions of higher learning for research and innovation that will help in the production of new products which will be accessible to small and medium enterprises.
- Partner with relevant institutions on mutual skills development areas such as Learnerships and Artisan training.
- Training of women owned rural cooperatives to upgrade themselves from subsistence to commercial.
- Support of TVET Colleges through capacity building projects to improve the quality of graduates and bridge the gap between the supplier (Colleges) and the consumer (sector).
- Provision of funding to projects that are aligned to IPAP, APAP and RAVAC.
- Development of a SMME toolkit to assist small companies in the food and beverage sector to cushion the adverse costs associated with complying with health, safety and quality standards.
- Partnerships with public and private institutions to address skills needs through the provision of relevant training.

## 5.4 CONCLUSION

This chapter concluded the SSP by covering the key findings and associated areas that need to be addressed. These areas however need to be deliberated further to ascertain the resources, timeframe and conduit of implementation which will occur during the strategic planning process ahead of the finalisation of the Annual Performance Plan and Strategic Plan for 2019-20. In so doing, this will give the Food and Beverage sector a clear direction in the implementation of its strategy in the enhancement of the sector.

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