

# **The gap between supply and demand in the sector of Food, beverages and tobacco Industry**

## **Executive Summary**

This study reveals the dual aspects of demand and supply, highlighting the gap between them in the food, beverage, and tobacco industry sector. The study indicates that there are approximately (4,860) establishments in the sector, employing around (49,838) workers. These establishments are distributed with approximately (56.8%) in the central region, around (35.8%) in the northern region, and about (7.4%) in the southern region. The establishments in the food, beverage, and tobacco sector are classified into small-sized establishments (1-4 workers) comprising (68%), followed by medium-sized establishments (5-19 workers) at (24%), and large-sized establishments (20 workers and above) at (8%). It's worth noting that (46%) of the establishments in this sector reported a decrease in demand for their production in 2022, as well as (50%) of the establishments reporting decreased demand for their products in 2023. Meanwhile, (34%) of the establishments expected no change in demand for their production in 2024, along with (33%) of the establishments reporting no change in demand for their products in 2025.

Workers in the sector are distributed with (89%) males and (11%) females. Additionally, (84%) of the workers in this sector are Jordanian nationals, compared to (16%) non-Jordanians. The study indicates that the most prevalent occupations in the food, beverage, and tobacco sector

are sellers (7.2%), sales representatives (5.1%), operators of food product manufacturing machines and related occupations (4.5%), pastry chefs (4%), mail and parcel distributors (3.7%), bakers (3.5%), and pastry makers (2.6%).

In general, the demand for professions in this sector for the period of (2023-2025) is approximately (8,157) workers, with a demand for male workers at (6,284) compared to (1,873) female workers. This demand primarily focuses on occupations such as operators of food product manufacturing machines and related occupations, pastry chefs, operators of packaging and labeling machines, pastry makers, sales representatives, mail and parcel distributors and carriers, bakers, and coffee makers meeting international standards. It's worth noting the emergence of the need for new workers based on expansion activities, where approximately (45%) of the demand for this period is expansion-based, while about (24%) is rotation-based.

The study reveals that the most required skill within the sector occupations includes: monitoring product preparation according to approved ratios, preparing raw materials and mixing and kneading them according to each type, preparing and shaping dough and fillings and baking, actual and trial operation of manufacturing machines and equipment, providing necessary raw materials for manufacturing, inspecting their suitability, in addition to operating the mixer and preparing the dough.

The study results show that (35%) of the establishments do not face any difficulties in hiring, while (46%) of the establishments face partial difficulties, and (19%) face difficulties in hiring due to a shortage of skilled labor. This shortage extends to labor with positive values and attitudes towards work. Regarding the hiring methods, the study shows that direct hiring through personal contacts is the most commonly used method at (68%), followed by hiring through newspaper advertisements and websites at (21%), and

hiring through employment offices at (4%). Employers were asked about the difficulties and challenges facing the food, beverage, and tobacco industry sector. (25%) of them indicated that tax increases affect sector performance, while (16%) pointed to laws and regulations governing work.

The number of training programs for this sector is approximately (11), with around (13,291) graduates during the years (2020-2022). The percentage of male graduates was (21%) compared to (79%) female graduates. The majority of them graduated from the home food manufacturing program at (57.9%), followed by the nutrition and dietary programs at (17.4%), and then the culinary chef program at (8.5%).

Regarding competency enhancement courses provided, they are limited to three entities: the Vocational Training Corporation, the Royal Academy of Culinary Arts, and Ammon Applied University College. The study reveals that the number of trainees in these institutions reached (846) during the period (2020-2022), with a concentration of (57.9%) in the Vocational Training Corporation, followed by Ammon Applied University College at (28.4%), and then the Royal Academy of Culinary Arts at (13.7%). On the other hand, competency enhancement courses offered by training providers varied, with trainees focusing during the period (2020-2022) on the course of preparing raw materials, mixing and kneading them, comprising (42.1%) of the total trainees, followed by the course of monitoring the manufacturing process, filling out work models by (25.9%), then the course of receiving and preparing raw materials for each dough, and placing them in the mixer, with a percentage of trainees at (17%).

In conclusion, there exists an initial numerical gap estimated at around (5,134) resembling a surplus in the supply volume in the food, beverage, and tobacco industry sector, indicating that the market is unable to absorb more workers in this sector in general. Regarding the technical skill that employers emphasized the necessity of its availability in workers in the workplace and in those intended for hiring, it is mostly not included in the training programs offered. Therefore, in light of the results of this study, it is recommended to provide training programs that provide these required technical skills, as the most important of these skills can be summarized as follows: monitoring product preparation according to approved ratios, applying safety procedures, preparing dough and fillings and baking and shaping them, preparing raw materials and mixing and kneading them according to each type, actual and trial operation of manufacturing machines and equipment, receiving and preparing raw materials for each dough, placing them in the mixer, in addition to the required salt or sugar solution for some products, shaping the product in the specified form for each type, understanding the environment and health and safety (operational level), operating the mixer, preparing the dough, preparing fillings and creams, decoration materials, filling the product, and decorating it, ability to taste, preparing and distinguishing between beverages, innovating with different types of coffee and non-alcoholic beverages, handling equipment, and knowledge of all types of coffee and non-alcoholic beverages.

Through this study, the gap between supply and demand in the food, beverage, and tobacco industry sector and its various fields has been identified. The study results show that the number of workers in this sector is (49,838) distributed among (4,860) establishments. In general, the total demand for the period (2023-2025) is approximately (8,157) job opportunities within this sector, while the total supply volume was (13,291) for the period (2020-2022), indicating an initial numerical gap estimated at around (5,134) resembling a surplus in supply. This means that the market is unable to absorb more workers in this sector in general.

As for the gap between supply and demand for female labor, the results revealed that the majority of establishments operating in the food, beverage, and tobacco sector expressed their reluctance to hire

females. While there is a modest future demand for females to work in this sector estimated at approximately (1,873) job opportunities only for the period (2023-2025), there were (10,512) female graduates during the period (2020-2022). It is noteworthy that the numerical gap between supply and demand for female labor in this sector is very high, estimated at around (8,645) resembling a surplus in the supply side of female labor in this sector.

Looking into the details of required occupations and available female graduates' specializations, it becomes evident that there is a mismatch in the labor market in this sector. There is a lack of alignment between supply and demand, with a gap in some specializations in favor of supply (**Unemployment Index**), and another gap in favor of demand despite an overall surplus in supply. The number of female graduates from training programs was (10,512), graduated from (11) training programs. After comparing the training programs with the available opportunities, it appears that the required number of female graduates from training programs is approximately (197) workers, graduated from only (4) training programs. While the data indicates the availability of (1,873) job opportunities for females in this sector for the period (2023-2025), this suggests that (1,676) job opportunities available for females in the sector do not align with the training programs offered by training providers, indicating poor planning and mismatch between market demands and the programs offered by training providers in Jordan.

Despite the numerical gap between supply and demand for labor in this sector estimated at (5,134) resembling a surplus in supply volume, this sector still manages to provide job opportunities for males, albeit fewer opportunities for females. However, the available opportunities do not align with the training programs offered by training providers. It is worth noting that the food industries sector overlaps with other sectors such as tourism and packaging, therefore, the surplus in the supply side of this sector may cover shortages in other sectors.