

# Chapter 14

## Skill Development in the Indian Food Processing Sector

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### ABSTRACT

*Known as the fruit and vegetable basket of the world, India ranks second in fruits and vegetables production in the world, after China. The food processing sector is one of the largest sectors in India in terms of production, growth, consumption, and export. There, however, exists a keen lack in processing and storage infrastructure and capabilities, which are essential to reducing the waste and enhancing the value addition and shelf life of the farm products. The government has ambitious plans to increase the level of processing from 6% to 20%, value addition from 20% to 35% and share in global food trade from 1.5% to 3% by 2015 (MOFPI, 2012). This will see a spike in the requirement for qualified and trained food processing professional across the food industry sectors. The purpose of this chapter is to discuss the importance of education for manpower development in the food industry and how it can be used to convert unemployable graduates into employable graduates for the food industry. The authors believe that private-public alliance between the private industry and public institutions (PPP) is the need of the hour and has the potential to create tremendous impact at the national level as the graduates coming out of the universities become more versatile with practical outlook.*

### GENERAL INTRODUCTION

India is the second largest producer of food and holds the potential to be the biggest on the global food and agriculture canvas, according to

a Corporate Catalyst India (CCI) survey. India annually produces 205 million tones of fruits and vegetables and is the second largest country in farm production in the world. Only 6% of this is processed. In contrast, countries, like USA

(65%), China (23%) and Philippines (78%) are far ahead of India in reducing the wastage and enhancing the value addition and shelf life of the farm products. This is an alarming signal for India as large volume of the agricultural produce is wasted. About 35% of the fruits and vegetables are wasted annually, due to poor storage facility, amounting to a revenue loss of Rs. 500 billion and 80% of the vegetables rot due to high water content and lack of processing facility, resulting in revenue loss of Rs 125 billion. India is very ambitious to increase the processing level to 20% by 2015! (MOFPI, 2011).

Between 1993 and 2006 the installed capacity of fruits and vegetables processing industry has increased from 1.1 million tons to 2.1 million tons, a meager 1 million ton increase in 13 years!!

The agriculture sector is vital for any nation and in India is the principal source of livelihood for more than 58 per cent of the population. The agriculture sector reached a growth rate of 4.4 per cent in the second quarter of 2010-11, achieving an overall growth rate of 3.8 per cent during the first half of 2010-11.

The area under food crops has increased from 122.78 million hectare (ha) in 2001-02 to 125.73 million ha in 2010-11 (4th advance estimate). The production of food grains has increased from 212.85 million tons (MT) in 2001-02 to 241.56 MT during 2010-11(4th advance estimates). The food grain production target for 2011-12 has been fixed at 245 MT, which is likely to be achieved with favorable weather conditions.

Considering this as the most important sector, this chapter will cover various aspects including the present status of the food industry and its scope in India, and the current education system in food science and technology, the gaps between capacity and industry needs, and a way forward.

## **INDIAN FOOD INDUSTRY**

The Indian food industry is projected to grow by US\$100 billion to US\$ 300 billion by 2015, according to a report by a leading industry body and Technopak. During the period, the share of processed food in terms of value is expected to increase from 43 per cent to 50 per cent of total food production.

The food processing industry is of enormous significance for India's development as it has efficiently and effectively linked the nation's economy, industry and agriculture.. The linking of these three pillars has synergized the development process and promoted the growth of the nation to a great extent.

There are 25,367 registered food-processing units in the country, with total invested capital of Rs 84,094 crore (US\$17.81 billion), as per a competitiveness report of the National Manufacturing Competitiveness Council. The food processing sector is presently growing at an average rate of 13.5 per cent per annum. The Vision Document 2015 envisages increasing the value addition from 20 per cent to 35 per cent by 2015.

Food processing industry is one of the largest industries operating in India and is divided into several segments.

The Food Processing Industry operates across various segments that include:

- Fruits and Vegetables
- Meat and Poultry
- Dairy
- Marine Products
- Grains and Consumer Foods (that includes packaged food, beverages and packaged drinking water)

The fruits and vegetables processing industry is highly decentralized, and a large number of units are in the cottage, household and small-scale sectors, having small capacities of up to 250 tones per annum. Since 2000, the food processing

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