

## Moringa Value-Added Products: A New Source of Nutritional Supplement Foods

\*Ms. Janhvi G. Wuike

M.Tech. Student, College of Food Technology, VNMKV, Parbhani

\*Corresponding Author's email: [janhviwuike@gmail.com](mailto:janhviwuike@gmail.com)

Moringa, commonly known as the drumstick tree, is a traditional Indian plant that is now recognized worldwide as a “superfood.” Almost all parts of the plant—leaves, pods, seeds, and flowers—are nutritionally rich. Due to changing lifestyles, people are becoming more aware of their health, and the demand for nutritional supplement foods is rapidly increasing. In such a situation, moringa-based value-added products are beneficial for health and also create new sources of income for farmers and entrepreneurs.



### Nutritional Value of Moringa

Moringa leaves contain high-quality proteins, calcium, iron, and vitamins A, C, and E in significant amounts. In addition, they are rich in antioxidants, which help boost the body's immune system. Moringa is helpful in combating problems such as malnutrition, weakness, anemia, and low immunity.

### Moringa: A Medicinal Superfood

Due to today's busy lifestyle, people are increasingly turning toward nutritious and natural foods. Moringa is natural, organic, and chemical-free, making it widely used in the health food, nutraceutical, and pharmaceutical industries. There is a high demand for moringa in the form of powder, tea, capsules, soup mixes, and health drinks. Suitability of Moringa Cultivation in the Climate of Maharashtra. The hot and dry climate of Maharashtra is highly suitable for moringa cultivation. Particularly in Marathwada, Vidarbha, Khandesh, and Western Maharashtra, drumstick trees grow easily. This crop requires less water, less fertilizer, and low investment, making it beneficial for small and marginal farmers.



### Value-Added Products Prepared from Moringa

Moringa leaf powder is one of the most popular value-added products. It is prepared from dried moringa leaves and can be used in chapati, vegetables, soups, smoothies, and daily diets as a nutritional supplement. Moringa tea is prepared from dried leaves or seeds. It helps in detoxification of the body, as well as in weight control and diabetes management. Moringa capsules or tablets are widely used in the pharmaceutical and nutraceutical industries. Apart from these, moringa-fortified biscuits, laddus, and soup powder are used as nutritious snacks and school nutrition foods.

### Process of Preparing Moringa Leaf Powder

To prepare moringa leaf powder, fresh and tender leaves are first selected. These leaves are washed thoroughly with clean water and then dried in shade or at a temperature of 50–55°C. After complete drying, the leaves are ground into a fine powder. Finally, the powder is sieved

and packed in airtight packaging. The prepared powder has a shelf life of 6 to 12 months and can be produced at a low cost.

### Production of Moringa Tea and Capsules

To prepare moringa tea, dried leaves are lightly roasted and then converted into tea powder. This tea is useful for body detoxification, improving digestion, and weight management. For moringa capsules, moringa powder is filled into capsules and sealed.



**Process:** Moringa Powder → Capsule Filling → Sealing

Uses Nutraceutical industry

Health supplements, Market, Medical stores, Online health markets

### Moringa Soup (Drumstick Soup)

Moringa pod soup is very nutritious and delicious. Below is a simple recipe

**Ingredients :** Drumstick pods: 3–4 medium sized (cut into pieces)

- Onion: 1 medium (finely chopped)
- Garlic cloves: 4–5 (crushed or finely chopped)
- Ginger: ½ inch (grated)
- Black pepper powder: ½ teaspoon
- Cumin seeds: ½ teaspoon
- Turmeric powder: ¼ teaspoon
- Butter or ghee: 1 tablespoon
- Salt: As per taste



Coriander leaves: For garnishing

#### Preparation Steps

Cook the drumsticks

Cut drumsticks into 2–3 inch pieces and wash them. Add them to a pressure cooker with a little salt and 2 cups of water and cook for 2–3 whistles. Extract the pulp. After cooking, collect the water in a bowl. When the pods cool down, remove the pulp using a spoon and strain the water.

**Prepare the tempering:** Heat butter or ghee in a pan. Add cumin seeds, garlic, ginger, and onion, and sauté until light golden. Mix the ingredients. Add turmeric powder, drumstick pulp, and the stored water. Boil the soup. Add salt and pepper according to taste and let it boil on low heat for 5–7 minutes. If the soup is too thick, add some hot water. Serve. Garnish with chopped coriander leaves and serve hot. **Special Tips** if you want a creamier soup, add a little coconut milk or 1 spoon of cornflour paste. This soup is excellent for boosting immunity and strengthening bones. **Benefits for Farmers and Entrepreneurs** The moringa processing industry requires low investment, and raw material is available throughout the year. These products have demand in both domestic and international markets. The moringa industry can create self-employment opportunities for women, self-help groups, and rural youth.

### Market and Future Opportunities

Currently, the organic and health food market is growing rapidly. Moringa-based products have export potential, and with proper processing, quality control, and effective branding, they can bring significant economic development to rural areas.

### Conclusion

Moringa is not just a vegetable but an important source of nutritional supplements. Moringa value-added products can help improve health, generate employment, and increase farmers' income. Therefore, focusing on the moringa processing industry is an important need of the present time.