

**Underutilized horticultural crops: A Burst of Flavor and Potential**Hradesh Shivhare<sup>1</sup>, Razauddin<sup>2</sup>, Vipin<sup>1</sup>, A.K. Tripathi<sup>3</sup>, Ramkumar Rai<sup>4</sup>**Introduction**

Underutilized horticultural crops (UUHC) are those that are neither widely traded nor widely farmed commercially. The local farmers raise, trade, and eat these crops. These horticulture crops' value varies depending on the crop and the location, but it can be increased to a greater amount through publicity. There are several benefits to using horticultural crops that are underutilized (UUHC). These need less work to develop and are naturally hardy, producing a yield even under unfavorable soil and climate situations. Most of them are extremely abundant suppliers of nutritional vitamins and minerals and other nutrients like carbs, proteins, and lipids. Local people are aware of the nutritional and therapeutic benefits of the underutilized horticultural crops because they have been consumed for many years. One such strategy is to investigate unconventional approaches, such as expanding the use of UUCs as future potential crops since they are adaptable to a variety of agro ecologies, are highly nutritious, and provide more opportunities in low-input

agriculture in poor production areas. In fact, this strategy is a confirmation of the well-being of people and sustainable agriculture practices that indigenous local populations have understood for ages. Several problems related to intensive agriculture could be resolved by the domesticating of new crops, which would increase agricultural diversity. They have demonstrated promising future for nutrition and food security, wellness, and income generation, particularly for local people, owing to their a high level of nutrition. Utilizing innovative possibilities such as the application of current science to increase output, value addition, and utilization by agro-industries is essential.

**Consumption and use  
Underutilized horticultural crops**

The consumption and utilization of Underutilized horticultural crops As far as consumption pertains, the use of Underutilized horticultural crops has been documented for a very long time. They've been and still are consumed by the indigenous communities of the society for beneficial and cultural

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purposes. As per knowledge, the different tribal community of different tribal area depends on several underutilized plants during times of crisis. They use leaves, fruits and vegetables, and seeds of various underutilized plants that can be consumed either fresh or cooked up. In addition to their nutritional significance, underutilized horticulture crops are notable for their retentive value in Ayurvedic medicine and their therapeutic characteristics. The majority of people are aware of the therapeutic benefits of locally cultivated horticulture crops.

### Important concern of underutilized horticultural crops

- Plants must have a distinct character and being valuable to human interests.
- Plants must be indigenous to a confined region and not be widely cultivated.
- These plants shouldn't be grown in the same proportions as common crops.
- Plants that receive less attention by scholars, producers, and other officials of government.
- It might be highly nutritive, have curing qualities, and have other medicinal properties.
- These plants expected to boost diversity of crops and output from agriculture.

### There are some underutilized horticultural crops

- **Physalis (Cape Gooseberry):** These golden orbs, enclosed in papery husks, offer a sweet-tart explosion with hints of pineapple and passion fruit. Rich in vitamins A and C, they're perfect for snacking, jams, or adding a pop to salads.
  - **Tamarillo (Tree Tomato):** This egg-shaped fruit boasts a vibrant orange or red flesh with a tangy, citrusy flavor. Packed with vitamin C and antioxidants, it's a versatile ingredient for juices, chutneys, or even savory dishes.
  - **Jaboticaba:** Imagine tiny, grape-like berries erupting directly from a tree's trunk! Jaboticaba's sweet, slightly fermented taste is a unique treat, rich in vitamins and minerals. They're perfect for popping fresh or making jams and liqueurs.
- Vegetables:
- **Oca:** This knobby, potato-like root vegetable comes in a rainbow of colors, from yellow and pink to red and purple. Oca is naturally gluten-free and boasts a sweet, nutty flavor, making it a delicious addition to roasts, soups, or chips.

- **Chayote (Choko):** This pear-shaped gourd is a culinary chameleon, readily absorbing the flavors of its companions. Mild and versatile, it can be roasted, fried, stuffed, or even used to make noodles!
- **Ulluco:** These tiny, potato-sized tubers come in a variety of shapes and colors, offering a slightly earthy, nutty flavor. Rich in fiber and antioxidants, they're a nutritious addition to stews, salads, or even purees.  
Beyond Fruits and Vegetables:
- **Moringa:** This "miracle tree" boasts leaves packed with vitamins, minerals, and protein. Moringa leaves can be enjoyed fresh, dried, or powdered, adding a nutritional boost to smoothies, soups, or even baked goods.
- **Amaranth:** This ancient grain is a gluten-free powerhouse of protein, fiber, and essential nutrients. Amaranth seeds can be popped like popcorn, cooked like rice, or ground into flour for baking.

## Value addition and post harvest management of Underutilized horticultural crops

However, via processing, value addition, and a variety of uses, local and minor horticulture crops that are present in the area have the potential to reduce impoverishment

and provide food and nutritional security. These foods are high in nutrients such as minerals and vitamins. They are also abundant in secondary metabolites and possess medicinal benefits that could be used in the industrial and medical fields. The most popular processed food items eaten by consumers were jam, RTS - fruit beverages, chutneys, sweets, pickles, squashes, and concentrate. etc.

## Conclusion

Underutilized horticultural crops offer a wealth of potential for improving nutrition, boosting rural economies, and promoting environmental sustainability. Addressing the challenges through consumer education, market development, research investment, and value chain interventions is critical to unlocking the full potential of these hidden gems of the plant kingdom.