
Micro Greens - A Novel Nutrient-Packed Venture for the Improvement of Health and Income

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ABSTRACT

Microgreens are a stage between sprouts and fully grown greens, often known as Thalirkeerai in Tamil. About 4 to 40 times more nutrients are available in micro greens than their mature counterparts. Even picky eaters, especially kids, can enjoy them, offering a solution to malnutrition issues. Starting a microgreens business is affordable, with an initial investment of Rs. 5000 to 10000 only. Microgreens cultivation is ideal for women at home or students due to its low labor requirements. Seeds like fenugreek, mustard, sesame (black & white), wheat, barley, rye, green gram, black gram, horse gram, green and red amaranth, radish, cabbage, beetroot etc. can be used for micro greens purpose. Media



used for cultivation of micro greens are potting mixture, coca peat, hydroponic, tissue paper etc.

INTRODUCTION

Microgreens are a stage between sprouts and fully grown greens, often known as Thalirkeerai in Tamil. They are popular in the West and gaining attraction in India. Unlike regular greens, microgreens include not only traditional leafy greens but also vegetables, pulses, and grains. Micro greens are tiny edible plants that are older than sprout, but younger than a full grown plant harvested from 1-2 weeks after germination. They are harvested after the first “TRUE” leaves have developed. They have three basic parts such as a central stem, cotyledon leaf or leaves and typically the first pair of very young true leaves. About 4 to 40 times more nutrients are available in micro greens than their mature counter parts. They're rich in nutrients, easy to grow at home, and can be harvested within a week for freshness. Even picky eaters, especially kids, can enjoy them, offering a solution to malnutrition issues.



INVESTMENT COST

Starting a microgreens business is affordable, with an initial investment of Rs. 5000 to 10000. Quality seeds are the main expense. Home cultivation on racks is a good start before venturing into a business. Microgreens require minimal water, no soil medium, and can be grown without chemical fertilizers or pesticides, providing complete nutrition and chemical-free food.

A WOMAN-FRIENDLY CAREER

Microgreens cultivation is ideal for women at home or students due to its low labor requirements. The method allows for value addition, creating opportunities for additional income. Government



incentives for food processing and value addition further support this venture. Besides being consumed fresh, microgreens can be dried and powdered, adding nutritional value to various foods.

CHALLENGES

However, challenges include the need for immediate sale due to moisture loss, understanding market demand, and preventing fungal damage through proper ventilation and water drainage. Choosing a sunny spot with five to six hours of sunlight daily can help overcome some challenges.



CULTIVATION OF MICRO GREENS

Various seeds can be used for microgreens, making it profitable for farmers, especially in Tamil Nadu, where pulses like green gram, black gram, horse gram etc., are cultivated more. Seeds like fenugreek, mustard, sesame (black & white), wheat, barley, rye, green gram, black gram, horse gram, green and red amaranth, radish, cabbage, beetroot etc. can be used for microgreens purpose. Microgreens can even be grown hydroponically with just water. Overall, this technology not only provides nutritious greens but also offers self-employment opportunities for women and additional income for farmers, contributing to overall economic well-being. Media used for cultivation of micro greens are potting mixture, coca peat, hydroponic, tissue paper etc.



VALUE ADDITION OF MICRO GREENS

Microgreens can be used anywhere and everywhere in the diet like Salads, Smoothies, Rolls, Sandwiches, Chutneys, Raw consumption, Many Recipes from microgreens like Uttappa, Pulav, Potatao tikka, Idly, Poha, Paratha, Green Punch etc., Micro greens can be dried and powdered and can be incorporated in the doughs prepared for cookies production.



ADVANTAGES OF MICRO GREENS

- Microgreens: Bridging the Gap between sprouts and fully grown greens.
- Diverse cultivation options beyond traditional greens.
- Harvesting within a week for optimum freshness.
- Expanding nutritional choices beyond regular greens.
- Encouraging children to eat healthier with microgreens.
- Tackling malnutrition through innovative dietary solutions.
- Affordable minimum investment.
- Focusing on quality seeds as the key to success.
- Recommending home cultivation on racks as a starting point.
- Gradually transitioning from home cultivation to a business.
- Highlighting the eco-friendly aspects of microgreens.
- Empowering women and students through microgreens cultivation.
- Utilizing spare time for a rewarding and flexible venture.
- Exploring opportunities for additional income through value addition.
- Government incentives for food processing and value addition.
- Utilizing a versatile crop seeds for profitable cultivation.
- Tailoring microgreens to suit the pulse-centric agricultural landscape of Tamil Nadu.

CONCLUSION

Microgreens can be utilised for improving health and prosperity. Microgreens can act as a solution for self-employment and increased income. It can be recommended for encouraging farmers to embrace microgreens cultivation for their economic improvement.