

Sustainable Homestead Farming for Better Food and Nutrition Security

A Success Story of Farida Begum from Bangladesh

Bushra Humaira Sadaf¹, Md. Abdul Haque¹, Abdullah Miajy¹, Sharif Ahmed¹ and Humnath Bhandari¹



Author affiliation ¹International Rice Research Institute

Published by International Rice Research Institute

October, 2024

The [Sustainable Intensification of Mixed Farming Systems Initiative](#) aims to provide equitable, transformative pathways for improved livelihoods of actors in mixed farming systems through sustainable intensification within target agroecologies and socio-economic settings.

Through action research and development partnerships, the Initiative will improve smallholder farmers' resilience to weather-induced shocks, provide a more stable income and significant benefits in welfare, and enhance social justice and inclusion for 13 million people by 2030.

Activities will be implemented in six focus countries globally representing diverse mixed farming systems as follows: Ghana (cereal–root crop mixed), Ethiopia (highland mixed), Malawi: (maize mixed), Bangladesh (rice mixed), Nepal (highland mixed), and Lao People's Democratic Republic (upland intensive mixed/ highland extensive mixed).

© 2024



This publication is licensed for use under the Creative Commons Attribution 4.0 International Licence - <https://creativecommons.org/licenses/by/4.0>.

Unless otherwise noted, you are free to share (copy and redistribute the material in any medium or format), adapt (remix, transform, and build upon the material) for any purpose, even commercially, under the following conditions:

 **ATTRIBUTION.** The work must be attributed, but not in any way that suggests endorsement by the publisher or the author(s).

Contents

Abbreviations and acronyms	i
Introduction	1
Impact on Food Security, Nutrition, and Health	2
Broader Impact of the SI-MFS Initiative.....	4

Abbreviations and acronyms

ABC	Alliance of Bioversity International and the International Center for Tropical Agriculture (CIAT)
CIMMYT	International Maize and Wheat Improvement Center
ICARDA	International Center for Agricultural Research in the Dry Areas
IITA	International Institute of Tropical Agriculture
ILRI	International Livestock Research Institute
IRRI	International Rice Research Institute
IWMI	International Water Management Institute
SDG	Sustainable Development Goals
SI-MFS	Sustainable Intensification of Mixed Farming Systems Initiative
WP	Work Package
BDT	Bangladeshi Taka
USD	United States Dollar

Introduction

This article highlights Mrs. Farida Begum's success in improving food security, nutrition, and income through integrated year-round home-stead vegetable farming.

Mrs. Farida Begum, a 45-year-old mother of three, lives in Shahbajpur, Rangpur Sadar, Rangpur District in northwestern Bangladesh with her family. Together, they manage a 3.5-acre main crop field, where they cultivate rice, maize, sugarcane, and mustard. Besides, the family has a 2.5 decimal homestead area next to the house. While her husband primarily manages the field crops, Mrs. Farida and her children have taken the lead in transforming their homestead garden into a thriving source of year-round vegetables and fruits, thanks to the CGIAR Initiative on the Sustainable Intensification of Mixed Farming Systems (SI-MFS) for its excellent support.

The SI-MFS Initiative has been supporting over 9000 smallholder farmers, especially women, in northern and southern Bangladesh for sustainable intensification of homestead gardens since 2022. With SI-MFS staff's advice, Farida Begum is now following a year-round vegetable production model named "Saidpur Model". In open sunny areas, she plants radish, brinjal, tomato, and leafy vegetables during the Rabi Season (October-March), followed by red amaranth, okra, and leafy vegetables in the Kharif seasons (April-September). She uses garden fences and the roof of her house for beans, bottle gourds, ridge gourds, ash gourds, etc. Her backyard is filled with fruit trees like papaya and banana, while shaded areas host ginger. She also grows chilli and other greens throughout the year. The family utilizes kitchen wastes, cow dung, compost, etc. in the homestead garden. After the SI-MFS intervention, the previously underutilized homestead garden is now intensively cultivated with different vegetables and fruits year-round. This diverse planting ensures a steady supply of nutritious produce for her family, and an income for women, and serves as an inspiring example of sustainable, space-efficient farming.

Impact on Food Security, Nutrition, and Health

Farida's homestead garden has had a lasting impact on her family's food security and nutrition. Before, the family relied on a limited selection of market-bought vegetables, spending around 3,000 BDT (about USD 25) every month. Now, they enjoy a wide variety of fresh, nutritious vegetables grown at home, reduce food expenditure, and earn income from selling homestead produce. The increased diversity in their diet has not only improved their meals but also contributed to better overall health.

Previously, Mrs. Farida did not grow any vegetables around her home, relying entirely on market purchases. Today, in the fallow land near her house, she cultivates around 4,500 BDT worth of vegetables each month, with 3,000 BDT worth of vegetables going directly to her family's consumption. This variety of fresh, home-grown produce has greatly improved her family's nutrition and health.

In addition to feeding her family, Farida earns 1,000 to 1,500 BDT per month from selling surplus vegetables at the local market, which helps cover household expenses and contributes to her children's education. She added, *"Now I hardly buy any vegetables from the market. I have a great variety of vegetables available right next to my house every day, and they don't cost me anything."*

Farida herself has noticed significant health benefits. She now experiences fewer digestive issues and attributes this to the fresh vegetables she grows. The family's improved nutrition has also enhanced their energy levels and well-being, contributing to a healthier lifestyle. Having access to such a variety of home-grown produce has been key to improving their diet, ensuring they receive essential vitamins and minerals that were previously lacking. As Farida puts it, *"The vegetables we grow ourselves taste much better than what we used to buy from the market because we can cook them very fresh and use less chemical fertilizer."*

Additionally, Farida's efforts have strengthened her family's food security. They no longer depend on the fluctuating prices and limited variety of market vegetables, as they are able to produce enough to meet their own needs. By growing their own food, Farida's family has achieved greater self-sufficiency, cutting down on expenses and ensuring a steady supply of fresh vegetables throughout the year. This has been particularly valuable in times of economic uncertainty or when access to markets is limited.

The success of her homestead garden hasn't gone unnoticed. Initially, neighbors were skeptical, even taunting Farida's efforts. They now seek her advice on managing their own homestead gardens. Farida happily shares her knowledge and vegetables, empowering others in her community. She says, *"Before, everyone used to taunt me about why I would plant vegetables in my open spaces near my house. But now, everyone comes to me and asks me about farming techniques. They even come and ask for vegetables from my garden. I am very happy about it."*

For Farida, the benefits have also extended beyond nutrition and health. The extra income from selling surplus produce has given her more financial independence, allowing her to invest in her children's education and further improve her family's quality of life.

Looking ahead, Farida plans to expand her garden further by introducing other crops. Her family's five cows also contribute to the farm's sustainability, where she produces systematic compost and uses them in their field and homestead garden.



Photo 1: Farida Begum's homestead vegetable garden is full of different types of vegetables.

Broader Impact of the SI-MFS Initiative

Farida's story is just one example of how the SI-MFS Initiative is transforming agriculture and lives across rural Bangladesh. By promoting sustainable farming practices, providing technical training, and ensuring access to high-quality seeds, the SI-MFS is empowering smallholder farmers to maximize the potential of their land.

Through homestead gardening, families like Farida's are achieving greater food security, improving their nutrition, and reducing their reliance on price-fluctuating market-bought produce. The initiative has helped farmers enhance their health by encouraging the consumption of diverse, organic vegetables, while also supporting sustainable farming practices that are better for the environment. Besides, it has improved gender equality by empowering women through employment and income opportunities.

For Farida and many other smallholder farmers, especially women, this program has opened doors to a healthier, more secure future—one where sustainable farming practices offer a path to long-term prosperity. Farida's journey illustrates the powerful impact of investing in local communities, promoting food security, and empowering farmers to build better lives for themselves and their families.



Photo 2: Farida Begum's homestead vegetable garden is full of various vegetables.



INITIATIVE ON
Mixed Farming
Systems

cgiar.org/initiative/mixed-farming-systems

