

Fostering Gender Equity and Climate Resilience in Arid zone: The Success of the Shree Aaimata Millets Rajivika Self Help Group

The transformation of traditional millet cultivation into a profitable enterprise in Udaliyawas village, located in the Bilara Tehsil of Jodhpur, stands as a powerful testament to how climate resilience and gender equity can be achieved simultaneously when rural women are given the tools to lead. Arid regions have long faced persistent challenges of food insecurity, depleting groundwater reserves, and human health, particularly micronutrient deficiencies like iron and zinc. During 2022, on getting motivation and support from the ICAR-Central Arid Zone Research Institute (CAZRI), Jodhpur, progressive farmer Shyama Devi, alongside her husband Pusaram (associated with the Adianna Farmer Producer Company), set out to break this cycle by following the suggested holistic "One Health" framework that connects the health of the soil directly to human well-being. By mobilizing fifteen women from the neighbourhood—traditionally restricted to domestic spheres and unpaid agricultural labour—Shyama Devi formed the Shree Aaimata Millets Rajivika Self-Help Group (SHG UID 27150040657). This institutional association served as the bedrock for true women empowerment, shifting the social paradigm by organizing isolated rural women into a cohesive, self-governing economic powerhouse.

Rather than remaining passive beneficiaries, these women took ownership of the agricultural cycle alongside their male counterparts, starting with natural resource management to build climate resilience from the ground up. To restore the depleted, drought-prone soil, they implemented their learning of managing manures and crop residues through composting. This circular practice enriched the soil organic carbon, stabilized beneficial microbial activity, and unlocked the soil's natural capacity to transfer vital nutrients to crops. To combat critical water scarcity in the Jodhpur region, the many women transitioned their fields from traditional flood irrigation to precision drip irrigation systems. On this revitalized and efficiently managed soil, 50 field demonstrations of the HHB-299 bio-fortified pearl millet variety were given to them by CAZRI, producing an impressive 73 ppm of iron and 41ppm of zinc containing grains. This directly addressed the region's hidden hunger by providing a natural, nutrient-dense solution to combat this deficiency in children and women.

The true transformation toward absolute gender equity occurred when the women stepped out for village-level value addition. Backed by institutional support from ICAR-CAZRI and financial assistance from NABARD, the group established a small-scale processing unit in Udaliyawas village, successfully eliminating the geographical and domestic transit barriers that traditionally restricted women's economic participation. Through intensive training at CAZRI, these women underwent a radical professional evolution. They mastered the operation of commercial dough kneaders, rolling machines, automated bakery ovens, and vacuum packaging systems. To ensure commercial viability and consumer trust, the group's signature pearl millet biscuits were tested at a National Accreditation Board for Testing and Calibration Laboratories (NABL) accredited facility and officially secured Food Safety and Standards Authority of India License Number 22225074000159.

With a certified product in hand, the women entrepreneurs looked far beyond local village markets. Recognizing a deep cultural nostalgia and a growing demand for premium wellness products, the SHG targeted the affluent Non-Resident Marwari diaspora residing outside Rajasthan in major metropolitan hubs across India. By positioning their brand, "Bajra Cookies," as a healthy, premium, and authentic connection to their homeland, the women bypassed local middlemen, negotiated directly with pan-India supply chains, and commanded premium prices. This sophisticated market linkage enabled the group to successfully produce and market 400 kilograms of cookies, generating an initial income of two lakh rupees. Building on this solid foundation, they have now expanded their business and started value addition to other farm products as well, including traditional Papad, Moong Badi, grounded spices, and pure cow ghee. This direct financial influx drastically improved the household income and economic status of the rural women, granting them independent purchasing power, personal bank savings, and financial security. By transforming their collective effort into a thriving, independent business, these women have gained a powerful voice in family and village decision-making processes, command immense social respect, and serve as inspirational role models. This self-sustaining business model proves that putting women at the absolute center of technology adoption, industrial processing, and market innovation is the most effective way to build economic resilience, foster gender equity, and eradicate malnutrition in the world's most fragile arid ecosystems.

