GUEST COLUMN

BUSINESS INDIA • THE MAGAZINE OF THE CORPORATE WORLD



Giving back to the planet

Sustainability in agriculture means while we produce more, we restore even more



RACHNA PANDA

The prevailing geopolitical tensions around the world underline the importance of food security. Food and nutritional security are especially important for developing countries like India that are working towards their socioeconomic development goals. On the one hand, agriculture must meet the increasing food requirements of a steadily growing population and on the other hand, climate change and unabated consumption of natural resources are adversely impacting both agriculture and farmers. There is a need to make agricultural practices more sustainable and resilient to improve farmer livelihoods. The need of the hour is to give more than we take; to produce more, but also restore more.

Regenerative agriculture: A paradigm shift: Regenerative agriculture can help India address the challenges of land degradation, water scarcity, climate change, and food security. By integrating regenerative approaches like Direct-Seeded Rice (DSR) and Smart Corn Systems, we can transform the global agricultural system amid the challenges of climate change and food security. DSR is a modern alternative to traditional methods with an opportunity to reduce water usage by up to 40 per cent, lessen farmers' dependence on scarce manual labour by up to 50 per cent, and slash greenhouse gas emissions by up to 45 per cent.

The Smart Corn System harnesses the benefits of Short Stature Corn (SSC). SSC hybrids, which grow 30-40 per cent shorter than conventional corn provide several potential sustainable benefits for battling extreme weather, including the ability to grow more from the same land area, minimising land use, and allowing more precise application of crop protection products.

Building a gender-smart ecosystem: While regenerative agriculture benefits both farmers and the planet, sustainability in agriculture must go beyond and provide an equitable playing field for women. Gender-smart, inclusive farming practices can have a huge positive impact on the livelihood, empowerment, and health of women engaged in agriculture. This is hugely significant because women account for almost half of all smallholder farmers. As India transitions to agriculture 4.0, we can help more women become a part of this transformation by adopting inclusive, gender-smart solutions. Towards this end, Better Life Farming (BLF) – a global, multi-stakeholder alliance – is partnering with organisations and entrepreneurs

across the agri-value chain to provide flexible, accessible, and equitable solutions for farmers.

At the core of the program are Better Life Farming centres, which serve as a one-stop shop for farm inputs and crop advisories as well as knowledge and training on sustainable farming practices, social impact monitoring, finance and literacy solutions, and market linkages. On an average, a single BLF centre can serve 500 farmers from its nearby villages. By encouraging women in rural areas to turn agri-entrepreneurs and run these centres we can not only ensure their financial security but also empower them to transform the lives of smallholders. Owing to the female representation at these centres, the BLF programme has succeeded in securing the participation of more women farmers.

The role of supply chains: An important part of developing modern food value chains is to strengthen their capacity and improve their sustainability. Agricultural products and services are linked to emissions, both before and after an organisation's activities, and throughout the supply chain.

The supply chain starts with seeds. What if we could make them more resilient? What if we could digitalise agriculture to help farmers reimagine the way our food system works? The use of sustainable, data-driven solutions for optimal utilisation of resources is on the rise in agriculture. Automation is reconfiguring the entire food system. As supply chains expand to meet the growing demand for food, it is essential to restore sustainability to the supply chain at every step, from farm to household.

Addressing nutritional security: Sustainability encompasses many different but closely interlinked aspects – it isn't only about the environment or about natural resources; it is equally about people. A sustainable agricultural system should ensure food security and nutrition for all.

Through intervention, education and advocacy, we can begin to reverse the cycle of malnutrition among the underserved communities. When individuals understand the role of vitamins and minerals in a healthy diet, as well as the risk of deficiencies, they are empowered to transform their family's (as well as their own) health.

Sustainable development truly has meaning when it is inclusive and equitable. And it can only be so when we give back to the planet and the people at least as much as we take.

The author is VP & Country Group Head -Sustainability, Bayer South Asia

• 51 •

DECEMBER 11-24, 2023