Highlight 1: Biofortification’s Growing Global Reach

For millions of women and children in Africa, anemia is a significant health concern—and diets deficient in iron are often to blame. But consuming a new variety of pearl millet called chakti—with an additional 20 percent of the estimated average requirement of iron than traditional varieties—may improve their nutritional status and help them reach their physical and cognitive potential.

Iron-biofortified pearl millet was released in Niger—the first release of this variety in Africa. Well-suited for dryland cultivation, pearl millet is the major dietary energy source for millions of people in Africa’s Sahel region. This variety of the cereal helps combat iron-deficiency anemia and supports healthy cognitive and physical development in children. There is potential to expand the release of iron pearl millet to other West African countries.

Zinc plays a vital role in health, affecting virtually every organ in the body. Zinc-biofortified maize was released in three more countries in Latin America—Colombia, Guatemala, and Nicaragua—after Honduras in 2017. These high-zinc varieties will help address widespread stunting by improving childhood growth and immune system development. In Guatemala, for example, nearly half of children under five are stunted and 30 percent of the population is estimated to consume inadequate amounts of zinc.

Despite Indonesia’s status as a middle-income country, an estimated 30 percent of the population suffers from stunting and there is strong official interest in addressing the problem. As part of a project funded by the Australian government to raise interest in biofortification in several Southeast Asian countries, HarvestPlus organized a stakeholders’ meeting in December 2018 to explore how Indonesia can catalyze scaling and uptake of a high-zinc rice variety.

In collaboration with many partners, HarvestPlus has developed and disseminated 211 varieties of 11 staple food crops, benefiting more than 38 million farm family members to date.

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