67 tons: Harvest of first commercial-quality GMO beta carotene-enriched Golden Rice nears completion in Philippines

ore than 67 tons of fresh paddy of beta carotene-enriched rice have been harvested in 17 Golden Rice production sites in the country as of October 2022.

The harvested seeds will be dried, milled, and distributed to the target households with pre-school children identified at-risk for Vitamin A Deficiency (VAD) and undernutrition, as well as households with pregnant and lactating mothers.

Antique Governor Rhodora J. Cadiao expressed her elation on the harvest. She said that Golden Rice can be one of the ways to address the province's VAD problem among pre-school and school children. VAD can lead to night blindness, weak immune systems that make children prone to viral infections and other diseases, delayed growth and development.



Farmer cooperators also showed their support and delight as they were one of the first batch of farmers to plant Golden Rice in their respective provinces.

Nakita ko dito sa Golden Rice ay talagang maganda siyang binhi especially sa quality at gusto ko matikman ang lasa. Sa characteristics niya, maganda ang kalidad, mahaba ang kanyang uhay. Naengganyo ako maging cooperator ng Golden Rice upang makatulong masolve yung malnutrition ng mga bata, one way na magsupport ako sa Golden Rice upang matulungan ko ang government na mabawasan ang kaso ng malnutrition,

Mr. Leo Franco Ebardo, seed grower in Bayugan City, Agusan del Sur, said.

[As I have observed, Golden Rice has a good quality of seeds, and I want to taste it already. It also has good characteristics in terms of its elongated stem. I was encouraged to be a cooperator of Golden Rice to help the government minimize the case of malnutrition].

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Bill and Melinda Gates Foundation representative visits Golden Rice fields in the Philippines

Senior Program Officer for Global Development at the Bill & Melinda Gates Foundation (BMGF), Lawrence Kent, together with Executive Director of the Institute for International Crop Improvement, Danforth Plant Science Center, Dr. Don Mackenzie, lauded Golden Rice production areas and its taste during their visit to the Philippines on October 22-29, 2022.

Dr. Kent and Dr. Mackenzie first visited the seed production sites at DA- Cagayan Valley Research Center (CVRC) in Isabela and in Cabarroguis, Quirino where they also had a chance to talk to the farmer cooperators in the said provinces.

Meanwhile, Kent expressed his utmost appreciation of the efforts DA-PhilRice and IRRI have put into the successful distribution and cultivation of Golden Rice in the Philippines.

"On behalf of the Bill & Melinda Gates Foundation, I would like to express my appreciation to every person who worked for the milestones of Golden Rice in the Philippines," said Kent.

BMGF is an American private foundation founded by Bill and Melinda French Gates and has provided funding for the research and development of Golden Rice, in coordination with the International Rice Research Institute.

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Farm walks held in Golden Rice pilot production sites

Farm walks are one of the best ways to showcase the standing crop of Golden Rice to stakeholders. This is when farmer-cooperators are given opportunities

to personally share their experience in planting Golden Rice. For this reason, the Golden Rice Program Management Office held a series of farm walks in a number of Golden rice production sites

One farmer/seed grower from Samar said:

"1 am grateful to our local government through the municipal agriculture office that they chose me as one of the farmer-cooperators to establish a Golden Rice demo farm. Maybe they are confident that the demo will succeed under my care and I have proven this so that our government's efforts will not be put to waste."

All activities related to the pilot-scale deployment of Golden Rice are conducted in close coordination and in partnership with local government units concerned. Farm walks have been conducted in Piddig in Ilocos Norte, Urdaneta City in Pangasinan, Calbiga and Basey in Samar, and Bayugan City in Agusan del Sur. Harvesting of Golden Rice in pilot-scale deployment areas is ongoing and expected to be completed this fall.

Dr. Ronan G. Zagado, program lead of GR-PMO, mentioned that Golden Rice will also be introgressed into high -yielding and popular varieties that the farmers are already growing.

"In terms of the benefit, they will be getting the same in terms of yield. Aside from that, they will also be benefiting from its beta carotene content" he added.

Dr. Roel Suralta, center director of DA-Crop Biotechnology Center (DA-CBC) said that DA-CBC, in collaboration with the Plant Breeding and Biotechnology Division (PBBD), have produced several climatechange resilient varieties, identified traits and their associated genes for precision and marker-aided breeding, and actively participated in the evaluation of genetically engineered (GE) rice-based on the current regulatory environment on GE crops in the Philippines.

"One such GE crop that has been approved for commercialization is Golden Rice. This is just to show the importance of biotechnology as a viable tool for food security, resiliency, and sustainability" Dr. Suralta said.

Dr. Ronan Zagado, program leader of the Golden Rice Program Management Office (GR-PMO), also emphasized its nutritional benefits.

"With daily intake, Golden Rice can be a sustainable source of vitamin A, hence it is a promising complementary intervention to help address vitamin A deficiency (VAD)," he said.

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