



Planting dreams with soybeans

Cross-continental collaboration between China and Pakistan aims to revolutionize agriculture, combat climate change, and foster international friendship through innovative soybean research

By XUE JINGQI in Hong Kong
idaxue@chinadailyhk.com

Hafiz Mamoon Rehman, born in a small village in Pakistan's Punjab province, grew up surrounded by golden wheat and cotton as white as snow. Unlike the generations before him who toiled the land, he chased academic excellence and sought knowledge beyond the familiar terrain of his homeland.

"Agriculture is food for poor countries," he says.

Rehman's journey led him to the fields of biotechnology, where he grappled with the intricacies of herbicide resistance and genetically modified wheat. In 2016, while pursuing his doctorate at Chonnam National University in South Korea, he chose soybeans as the subject of his long-term research.

He cast his resume into the world, reaching out to soybean experts across the globe. It was a message from Professor Lam Hon-ming of the Chinese University of Hong Kong's School of Life Sciences that set the stage for what was to come.

Lam, a prominent expert in agricultural science, has decoded the genomes of 31 soybean varieties and bred non-genetically modified germplasms that are tolerant to drought and salinity. He was also the first researcher from Hong Kong to participate in a national-level space agricultural research project.

Two years later, Rehman joined Lam's lab, completing a successful three-year postdoctoral stint. Hong Kong became a dream for him, a place where he built up a family and memories, including the birth of his child at Prince of Wales Hospital.

Yet, despite the allure of the



Collaborative teams from China and Pakistan dedicated to high-quality soybean breeding gather for a group photo during a field excursion in Pakistan. PROVIDED TO CHINA DAILY

vibrant city, Rehman never lost sight of his goal — returning home and using his knowledge to help his people. "Hong Kong has a better life. But I think if you really want to serve the farmer community, you should come to some agricultural country and serve."

Sowing hope

After years of growth and learn-

ing, Rehman became a beacon of hope at the University of Agriculture Faisalabad, developing local soybean varieties suited for the conditions in Pakistan.

Pakistan, primarily an agrarian nation, faces challenges due to limited crop diversity and the adverse effects of climate change. With most of its agricultural land dedicated to five traditional crops and suffering

from low soybean yield and quality, the country relies heavily on soybean imports for animal feed, unlike China's familiarity and consumption of soy products.

United Nations Secretary-General Antonio Guterres labeled Pakistan as one of the countries most severely affected by climate change — a fact not lost on Rehman as he sought to introduce soybeans as a

sustainable crop in his homeland.

Professor Iqrar Ahmad Khan, vice-chancellor of the University of Agriculture Faisalabad, explains that Pakistan spends up to \$2 billion annually importing around 300,000 metric tons of soybeans. "What's important now is to bring in soybean as a mainstream green crop."

Achieving this goal meant finding

the right seeds, and that's where Lam's expertise came into the picture. He had already cultivated the Longhuang soybean series in northwestern China's Gansu province, which is known for its high yield and quality, even in arid and saline conditions.

In 2023, Lam, for the first time, visited Pakistan, taking with him a branch of seeds. Unlike the Longhuang series, what Lam prepared for Pakistan are genetically unstable soybean seeds, still undergoing change, with the hope of developing a variety that could thrive in the local environment.

In March this year, the news of a terror attack targeting a Chinese construction project in Pakistan's Cape province sent shock waves across the globe. The incident raised serious concerns for Lam and his team's upcoming visit.

Departure and arrival

Although the attack loomed large over the trip, members of Lam's team, including agricultural scientists, engineers and seed experts from Hong Kong and the Chinese mainland, alongside a group of Pakistani students from two Hong Kong secondary schools, were not deterred, converging on Hong Kong International Airport in early May.

Lam said he hopes these students could observe their homeland from a different perspective and understand the connection between Hong Kong and Pakistan.

After a 10-hour flight and a layover, Lam and his team touched down in Lahore amid tight security. The trip, meant to be a straightforward agricultural exchange, now

See page S11

Congratulations on the 75th Anniversary of the Founding of The People's Republic of China



With compliments from



THE
LAW SOCIETY
OF HONG KONG
香港律師會