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DG Sanginga meets with DR Congo President Kabila, partnerships for profitable agribusiness to be developed

DG Sanginga in a hand shake with DR Congo's President, His excellency Joseph Kabila Kabange at the launch of the Agribusiness Park in Bukanga Lonzo

The President of the Democratic Republic of Congo (DRC), His Excellency Joseph Kabila Kabange and Dr Nteranya Sanginga, IITA's Director General met last Tuesday at the opening of the Bukanga Lonzo agribusiness park to exchange ideas on the role of agriculture and agribusiness for economic growth in the DR Congo.

Since most of the country's present growth heavily depends on the mining sector, the DR Congo could develop its agricultural potentials through applied research leading to the employment of more than 70% of its population. Also, the climatic and ecological diversity and abundant water enables two annual harvests of a wide variety of crops in-country, demonstrating why the DR Congo is also called "Land of Plenty".

President Kabila recognized the good prospects that IITA's research and post-harvest innovations are bringing to his country by inviting IITA as a potential partner in the establishment of agribusiness parks throughout the DR Congo. The parks will service small, medium and big size farmers with public-private partnerships.

The pace for facilitating the high-level meeting at Bukanga Lonzo was set throughout the establishment of the IITA Science Building in Bukavu, South Kivu province in Eastern DR Congo accompanied by IITA's high level advocacy efforts in Kinshasa. It led to the presence of various government officials at the official launch of the IITA Science building on June 6th, which included the Governors of North- and South Kivu and the Minister of Agriculture and Rural Development, Hon. Jean-Chrysostome V. Mukesyayira, who officially represented President Kabila. The launch was followed by a visit from DR Congo's First Lady, Madame Olive Lembe Kabila, to witness first-hand IITA's post-harvest innovations and cassava and soy bean value chain product development that IITA is pioneering in the DR Congo.

The meeting of DG Sanginga and President Kabila sets another milestone in validating the excellent relations between the Government of DR Congo and IITA.

DR Congo First Lady Madame Olive Lembe Kabila (in blue flowered outfit) and Marcellin Cishambo, South Kivu Govenor *with IITA Kalambo staff*

Hon. Mukesyayira representing President Joseph Kabila to officially unveil IITA Science building plaque in Bukavu

Got a story to share? Please email it with photos and captions to Andrea Gros (a.gros@cgiar.org), Katherine Lopez (k.lopez@cgiar.org), Jeffrey T. Oliver (j.oliver@cgiar.org), Catherine Njuguna (c.njuguna@cgiar.org), or Adaobi Umeokoro (a.umeokoro@cgiar.org)

Meet Andre Mayi, an Africa RISING lead farmer

While most smallholder farmers in sub-Saharan Africa are poor and struggle to eke out a living from their farms, a few of them have been able to make farming a profitable business that brings in a decent income and enables them to live with dignity.

One such farmer working with the IITA-led Africa RISING program is Andre Mayi, 58, from Seloto village in Babati District. He is also the village chairman. Mayi has 10 acres of land and grows maize, pigeon pea, beans, banana (cooking and dessert types), vegetables, fruit, and trees. He also keeps cows (for meat and milk), goats, local chickens, and pigs.

Mayi says he is comfortably able through farming to meet the needs of his immediate family of one wife, seven children, and seven other dependents—elderly relatives and orphaned nieces and nephews.

"I can say I am self-sufficient. I have educated all my children, six of them up to college level. Two have finished university and one is finishing this year. Two have completed diplomas in nursing and one is currently studying for a diploma in pharmacy. The youngest has just finished her O-levels and we expect her to go to high school," he said.

He is also learning a lot from the program and sees his farming only getting better.

Dispelling the fertilizer myth

For all his many years of farming, Mayi admits he had never used organic fertilizer until now. He believed that it ruined the soil and so did nearly everyone else in his village. However, through the Africa RISING initiative, this myth was proven false.

"I do not know where this information came from. But it's something we all believed in our village—that using fertilizer will ruin your soil. So we used only manure. But thanks to Africa RISING we now know that fertilizers improve the soil and sometimes manure alone is not enough," he said.

Mayi and his livestock

He has also learned better ways of farming, such as how to space and mix crops properly on his farm for maximum yield through Africa RISING's demonstration plots on farmers' fields.

On these demonstration plots, the Program scientists plant different improved varieties and follow recommended practices including spacing and use various fertilizers such as DAP, *Mijingu mazao,* and *Mijingu chenga*. They teach farmers better farming practices and at the same allow them to compare the modern farming methods with their own.

"This year, I also donated part of my land for demonstration and for the trials. We are looking at how the maize and pigeon pea varieties grow with and without fertilizer," he said. "I am also doing some testing of my own. This year, I applied fertilizer to a section of my land. I have seen a huge difference. I harvested 13 bags of maize from an area where I would normally get only three."

Mayi shows the difference between maize on the demo ploy and the maize on his farm

"The Project tested our soil and made us aware of the nutrients that were lacking. The area was found to be low in nitrogen. We were advised to use fertilizer with nitrogen, for example, *Minjingu mazao*, and also intercrop with legumes such as beans and cowpea," Mayi explained.

The Project is also addressing some of the challenges farmers face with their livestock.

"Livestock feed is a major issue in our village. We keep a lot of livestock—cows, goats, and sheep —but we do not have enough grazing land. They are therefore not well fed and not healthy. They give little milk and poor quality meat. So the farmers do not benefit from their livestock," Mayi said.

"The project has introduced livestock feed that we can grow on our farms. However, we don't have good breeds of animals. I don't know what breeds I have. I don't know what they need, such as minerals and vitamins. We need a lot of support still."

He says that the Project is supporting them in other areas, such as tackling pests and diseases and reducing postharvest losses including how to store crops without using pesticides.

He says the Project fills a large gap by teaching farmers new farming methods. "There are not enough researchers and extension workers in the ward. They are also not well equipped. But with Africa RISING, the Project is bringing knowledge to the farmers through the demo plots. We are seeing and learning in a practical way."

His parting shot was on how to support the other farmers who are struggling. "They need support to become smarter farmers. Though farmers work hard, they are often not strategic. They do not plan. They do not know how much money they are spending and making from their farm. They therefore often sell their produce at a loss."

N2Africa receives World Bank award

N2Africa has received a prestigious prize through the Harvesting Nutrition Contest, sponsored by the World Bank, which aimed at rewarding agricultural projects around the world that have bridged the gaps between nutrition, agriculture and food security. N2Africa was picked among 50 highly-acclaimed projects from around the world, all showcasing efforts to improve the impact of interventions in agriculture and food security on nutritional outcomes.

The contest was organized by the *Secure Nutrition Knowledge Platform* in partnership with the *Global Alliance for Improved Nutrition (GAIN)* and *Save the Children.*

N2Africa emerged winner alongside two other projects. It was chosen because of its positive impact on the nutrition of its beneficiaries, novelty in its approach to linking agriculture and nutrition, demonstration of an application of old approaches employed in an innovative way, and potential feasibility on a broad-scale basis.

In addition to getting the US$ 5000 prize money, N2Africa will also be documented in a multimedia portrait which will be made available for viewing on the Secure Nutrition website.

The N2Africa project focuses on maximizing benefits for smallholder farmers growing legumes, such as groundnut, cowpea and common bean – generally regarded as women's crops in Africa – through nitrogen fixation. This is a process that gives soil bacteria the ability to convert atmospheric nitrogen into plant-usable forms. IITA and Wageningen University are taking the lead in this project that is being implemented with funds from the Bill & Melinda Gates Foundation and the Howard G. Buffet Foundation.

The new look of the IITA Root and Tuber Improvement Team Center

Handlers of the Root and Tuber Improvement center during the opening of the facility

The popular yam barn offices in the IITA-Ibadan campus have been refurbished, giving them the look, ambience and name expected of a building where good science grows. The new facility will now be known as the "IITA Root and Tuber Improvement Team Center".

The office building is shared by scientists and researchers involved in all of IITA's yam and cassava research. It accommodates close to 50 of the 100-plus members of IITA's workforce comprising yam and cassava breeding staff, students, and technicians.

Describing the degeneration of the old yam barn offices before the decision was taken by management to refurbish them, Dr Elizabeth Parkes, HarvestPlus Cassava breeder, said, "The way the place looked before the renovation did not befit the kind of work we do."

The Center now has tastefully furnished offices for scientists and students, a laboratory, meeting room, 44 standard workstations, 55 lockers, and a lobby for guests. The entire building is fully air-conditioned and also equipped with CCTV cameras, internet facilities, and fire safety devices.

The new Center was commissioned on 8 July. It was an occasion for people to know and appreciate the building and to also charge those handling the facilities there to take good care and maintain them.

During the commissioning, Dr Robert Asiedu delivered a goodwill message where he told the story of the yam barn which had been in existence for over 45 years and the great transformation achieved. Dr Alfred Dixon added his voice, expressing his delight in the real transformation of the facility. He supported Mrs Charlotte Sanginga, the wife of the DG Dr Nteranya Sanginga, in officially opening the building.

The beneficiaries for whom the building was reconstructed expressed gratitude to the DG and management for this gesture. They also recognized the vital leadership of Dr Peter Kulakow, IITA cassava breeder, and the role the Facilities Maintenance Service (FMS) team played in the completion of this project.

Dr Parkes said, "Recently, management thought of the cassava and yam team and decided to refurbish the old buildings and put them in really good shape. It is now indeed like a modern office with a modest laboratory. The new building and the modern facilities for staff, students, and technicians alike, send a crystal-clear message to all who work for hours on the field in the tropical sun that their hard work, commitment, and efforts in driving forward IITA's R4D agenda are greatly appreciated. We are still looking for an excellent name for this building to describe the teamwork of the yam and cassava breeding programs. All ideas are welcome."

"There is no doubt that good science will take place here" Dr Parkes added.

Research article on Yam Aeroponics Technology published in world-renowned SDI Journal

On 12 July 2014, an aeroponics research article entitled "*Yam Propagation Using 'Aeroponics' Technology",* written by researchers working under the YIIFSWA project, was published in Sciencedomain International's (SDI) Annual Research and Review in the Biology Journal. The article was described as an important contribution towards achieving the YIIFSWA goal of "delivering key global good research products that will contribute to the longer term vision of improving yam productivity and livelihoods of yam-dependent farmers."

The article chronicles the development of the novel technique and research findings generated during the project's preliminary research. You can read the article at http://www.sciencedomain.org or visit YIIFSWA's webpage at http://

Tanzanian Youth Agripreneurs receive training on soymilk processing and weed management

A section of the IITA-Tanzania Agripreneurs received practical training on the processing of soymilk and other products such as yoghurt and tofu and on managing weeds. This is part of the Institute's efforts to equip the youth with knowledge of various forms of agribusiness in which they can engage to tackle the problem of unemployment and poverty in Africa.

The training was held from 10 to 15 July at the IITA hub in Dar es Salaam and the practical sessions on weed management were conducted in Mkuranga, about 50 km south of the city.

The training brought together over 20 Youth Agripreneurs who had expressed their interest in engaging in the two activities as ways to generate income. It was conducted by IITA scientists from Nigeria and a consultant from Kenya.

The hands-on training also included aspects of management and marketing. The young people received a soymilk processing machine to start them off in their soymilk business.

At the end of the training, IITA's Director for Eastern Africa, Victor Manyong, thanked them for their interest in agribusiness. He encouraged them to be committed and put an effort in implementing the ideas received as he assured them of IITA's support. "IITA and its partners, such as the Africa Development Bank, are in the process of constructing a youth training centre in Tanzania to support young people interested in agribusiness."

One of the trainers, Tom Agwa Agalo, a manager at the Kenya-based Agriculture Technology Development Centre, said the young people could take advantage of a good future in processing soymilk and its products.

IITA Youth Agripreneurs celebrating at the end their practical training on soy milk production at IITA-East Africa-Mikocheni hub

"There is a very good potential market in Tanzania. And from the training and equipment received, you can be able to earn USD1000 per month and even more. This in turn will push farmers to grow soybean due to the ready market and develop the industry even further."

The training on effective weed management was given by Dr Juma Kayeke, a scientist from Mikocheni Agricultural Research Institute and Dr Richard Okechukwu from IITA- Nigeria. They briefed the Agripreneurs on the correct uses of herbicide to control weeds.

They were further advised on how to be better farmers: "Many farmers sell products without thinking of costs. You should know what you want to do before you plant, identify your customers and market and input suppliers."

Dr Okechukwu encouraged them to diffuse the knowledge to more young people and educate farmers on the benefit of soy plantation and weed management while searching for improved varieties for high quality production.

The Agripreneurs were grateful for the training and urged the program to continue supporting them to engage in agriculture through such practical events. IITA's Youth Agripreneurs program in Tanzania has brought together over 40 energetic young people interested in engaging in agribusinesses. It was started in line with a similar program at the IITA Headquarters in Nigeria. The group in Tanzania has identified four ideas for agribusinesses in which to engage: weed management, and the processing of maize, cassava, and soybean.

IITA youth agripreneur during the practical training on use of herbicide for weed control at Kikoo village, Mkuranga, Tanzania

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2. Turned off air conditioners; and
3. Switched off all lights.