

Newsletter

Issue: CWMP/NL/001 November 2014

A new dawn for cassava farmers as weed management project makes progress



Women contribute more than 90 percent of the labor in keeping cassava farms free from weeds

For the cassava farmer who spends a fortune to control weeds, there is hope in the horizon as progress is being made by the Cassava Weed Management Project in assessing sustainable weed management technologies for cassava-based farming systems in Nigeria.

The project, which was launched in January, is developing state-of-the-art weed management practices, by combining improved cassava varieties with appropriate planting dates, plant populations, and plant nutrition options. Also included in the package under trials is the identification of herbicides—all of which currently meet globally-accepted conventions and safety

thresholds appropriate for smallholder farmers to make weed control in cassava more efficient.

The project's goal is to find solutions to the labor-intensive weeding usually performed by women and children and to increase cassava productivity for 125,000 Nigerian farm families. The project has the potential to serve as a livelihood transformation model for all cassava-producing states in Nigeria.

Cassava farmers and weeds

Grown generally by smallholder farmers, who appreciate its tolerance of drought and poor soils; cassava's prospects in Nigeria—

the world's largest producer—is being threatened by insufficiently developed weed management practices. Hand and hoe weeding are the predominant weed control practices on smallholder cassava farms, and it takes 50-80 percent of the total labor budget of cassava growers, with women contributing more than 90 percent of the labor and 69 percent of farm children between the ages of 5 and 14 forced to leave school to perform weeding.

Researchers estimate that weeding requires up to 500 hours of labor per hectare to prevent economic losses in cassava roots in Nigeria. This burden compromises the women's responsibilities and the children's education, and Nigerian farmers will continue to record low yields until weed control in cassava is improved.

"Farm families cannot plant a larger area than they can weed," says Dr Alfred Dixon, Project Leader, Cassava Weed Management Project.

Funding support

The IITA-managed project is supported by a US\$7.7million grant from the Bill & Melinda Gates Foundation, and involves the National Root Crops Research Institute (NRCRI), Umudike; the University of Agriculture, Makurdi; the Federal University of Agriculture, Abeokuta; government representatives, international cassava scientists, the donor community, and the private sector.

IITA Open Day: Cassava Weed Management Project creates awareness

The Cassava Weed Management Project participated in the 2014 IITA Open Day, with a colorful exhibition on weed science. The event provided an opportunity for farmers and staff to understand the impact of weeds, which has hitherto remained a major constraint to cassava production in tropical regions especially Africa. At the exhibition booth which attracted participants due to its uniqueness, weed science researchers were on standby attending to visitors and further reinforcing the need for greater attention

to weed science. For the children, the booth was an educational resource, as it helped them to better understand in practical terms the common weeds in cassava and the control options. Farmers who visited the stand were full of appreciation to IITA and partners for the renewed focus on weeds.



Visitors at the Cassava Weed Management Project's booth

Africa will not maximize gains of crop improvement if weeds are not tackled—Steering Committee

Rising from a two-day meeting at the International Institute of Tropical Agriculture (IITA) Ibadan, members of the Steering Committee of the Cassava Weed Management Project have called for more concerted efforts to tackle the menace of weeds in Africa.

They warn that unless the problem of weed infestation on farmers' field is addressed, Africa will not maximize the gains of crop improvement.

The Committee also commended the Director General of IITA, Dr Nteranya Sanginga and his management team for rejuvenating the weeds science program.

The meeting, which was held 18- 19 August 2014, lauded IITA for its new research agenda of investing in weed science and bringing weed science—a very important but often neglected component of agronomy—to the front burner, and for supporting partners in tackling the problem.

Steering Committee Chair, Dr Julius Okonkwo who is also the Executive Director of the National Root Crops Research Institute (NRCRI), Umudike specifically thanked IITA for the equipment given to his organization under the Cassava Weed Management Project to assist weed science research.

Under the new research focus, IITA committed to revive its weed management research; rehabilitated an office building, procured equipment, and hired staff. The building was commissioned during the Steering Committee meeting by the Deputy Director General (Partnerships & Capacity Development), Dr Kenton Dashiell, who dedicated it to resource-poor farmers, especially women and children.

Prof John Adisa Ayoade, Deputy Vice Chancellor, University of Agriculture



Dr Dashiell (IITA DDG PCD) inaugurating the Weed Science Center

Makurdi (UAM) commended IITA for investing in weed science and called on other institutions to emulate.

The Deputy Vice Chancellor who represented the Vice Chancellor of UAM specifically urged the IITA Cassava Weed Management Project to involve graduate students in the research to develop the critical human capital that would take research on weed science forward considering the fact that current weed scientists in Africa were aging.

Commending IITA for its renewed attention to weed science, Project Leader, Cassava Weed Management, Dr Alfred Dixon reiterated the project's goal of increasing cassava productivity for at least 125,000 Nigerian farm families through the provision of labor-saving solutions for cassava weeding which is usually done by women and children.

The Project Leader decried farmers' continuous use of obsolete herbicides despite their adverse effects on the environment and health. He said the project intended to change the situation by offering

farmers evidence-based information that would help them make better choices.

The project's progress report presented by the Principal Investigator of the Project, Professor Friday Ekeleme excited members of the Steering Committee. Consequently, they suggested new areas the project could explore for better performance and also developed a monitoring and evaluation guide for the project.

The Steering Committee comprise experts from the three collaborating institutions—the National Root Crops Research Institute (NRCRI), Umudike; University of Agriculture Makurdi; and Federal University of Agriculture Abeokuta. Other members include international cassava scientists, and representatives of the donor community, Federal Ministry of Agriculture and Rural Development, Nigeria, and the private sector.

The Committee also visited the IITA Business Incubation Platform and made field trips to experimental plots on cassava weed management control at IITA Campus and Moniya in Ibadan, Oyo State; and Ile-ogbo in Osun state.

Steering Committee meeting in photos



Prof Friday Ekeleme (right in white shirt) explaining field trials to members of the Steering Committee



Profs. S. O. Lagoke (FUNAAB), J. A. Ayoade (UAM), and Olusola Oyewole (Vice Chancellor of FUNAAB) during Steering Committee meeting



L-R: Drs Dixon, Okonkwo (Executive Director NRCRI and Chair of the Steering Committee), and Dashiell



At the IITA Business Incubation Platform (BIP), Dr Dashiell (left) explains to members of the Steering Committee the concept of the BIP

Weed control in cassava: Herbicides undergo trials ... as NAFDAC inspects trials

Different brands of herbicides are currently being evaluated across the different agroecological zones in Nigeria where cassava is a major staple and a priority crop for farmers. The weed control chemicals include different pre-emergence and post-emergence herbicides. They are being tested at different application rates to discover the best combinations for sustainable weed control in cassava. The goal is to identify herbicides that meet globally accepted conventions and safety thresholds appropriate for smallholders and that would make weed control in cassava more efficient and effective. The Cassava Weed Management Project which is driving the trials is partnering agencies including the National Agency for Food and Drug Administration and Control (NAFDAC), National Environmental Standards and Regulations Enforcement Agency (NESREA), and other regulatory agencies for the smooth conduct of the trials.

On 10 November 2014, NAFDAC



NAFDAC officials and IITA weed researchers on field visit

officials—Drs Damilola Adewusi and Idayat Mudashir visited the field trials. They were conducted round by Prof. Friday Ekeleme, Principal Investigator for the Cassava Weed Management Project. The officials were excited over the trials and called for more monitoring of the performance of the different herbicides.

Though the use of herbicides is one aspect of the project, other aspects include the development of integrated weed management practices, by combining improved cassava varieties with appropriate planting dates, plant populations and plant nutrition options.

Varsity head restates commitment to weed science ...as communication team draws strategic plan

The Vice Chancellor of the University of Agriculture Makurdi (UAM), Prof Emmanuel Kucha has reiterated the university's commitment to work with IITA and other partners to address the challenges to cassava production especially weeds.

The Vice Chancellor made the commitment during a courtesy visit to his office by members of the IITA Cassava Weed Management Project who were at the University to draw a communication plan for the project.

Prof Kucha called for joint efforts to address the thorny issue of weeds. Citing IITA for initiating the project, Prof Kucha said the university was ready to work with IITA on weeds and several other areas of agriculture to reduce hunger and alleviate poverty in sub-Saharan Africa. He also thanked IITA for providing equipment to facilitate cassava weed research and lauded

the transparent manner in which the project was being implemented.

Earlier, the Communication & Knowledge Exchange Expert for the Cassava Weed Management Project, Godwin Atser talked about the Cassava Weed Management Project, with its goal of increasing cassava productivity for about 125,000 farm families. After the courtesy visit, the communication focal persons from IITA, National Root Crops Research Institute (NRCRI) Umudike, UAM and Federal University of Agriculture Abeokuta (FUNAAB) proceeded to a separate meeting to develop a communication plan that will guide the implementation of the project in line with the project's Results Framework, and also to review communication and knowledge sharing products including the web portal, project brief, and newsletter; and to share lessons/experiences.

Communication focal persons in attendance were Katherine Lopez and Godwin Atser (IITA), Moses Okwusi (NRCRI), Grace Sokoya (FUNAAB), and Mary Agada (UAM).

Ms Osunde joins Cassava Weed Management Project as Social Media Officer



Timilehin Osunde has joined the Cassava Weed Management Project as a Social Media Officer. Ms Osunde is a mass communication graduate from the University of Benin. She has over

8 years of experience as a journalist with two national dailies, and as a content and information researcher with WANGONeT. Prior to this new appointment, she worked as an editor of the Development News Africa, a development based online magazine now known as Civil Society News. She also volunteered with several Non-Government Organizations as a media relations person, and social media content curator. Ms Osunde managed the social media platforms of a few organizations including that of the Nigerian Network of NGOs. She presently has her NIPR Diploma in Public Relations in view. She can be contacted via t.osunde@cgiar.org



Cassava farm over taken by *Mimosa invisa*

Weeds are the most challenging constraint to cassava farming—Youths

In an interactive discussion aimed at unraveling bottlenecks to farming, young farmers identified devastations by weeds as the most challenging constraint demoralizing cassava farming and hurting yields.

“Our experience is that even before you complete the first course of weeding, you see another set of grasses coming behind,” Akinyele Bankole, a youth agripreneur with the International Institute of Tropical Agriculture, said during a meeting with members of the Cassava Weed Management team at IITA.

“We have weeded about five times but it appears we are not doing anything when you see the weeds in the fields. This is the most difficult challenge we are facing,” he said.

“And sometimes it looks discouraging seeing our fields with weeds competing with cassava,” Evelyn Ohanwunsi, another youth agripreneur added. Generally, farmers weed cassava three times, but in cassava farms where perennial weeds such as spear grass are predominant, more weeding may be required.

Researchers estimate that weeding takes 50 to 80% of the total labor budget, and up to 200-500 hours of labour of mostly women and children per ha are required to prevent economic cassava root losses in Nigeria.

Dr Alfred Dixon, Project Leader for the Cassava Weed Management Project,



Youths using hoe to weed

said solutions on weed control in cassava farms were underway following efforts between IITA and partners to combat weeds in cassava.

Established two plus years ago under the leadership of Dr Nteranya Sang-inga, IITA Director General; the IITA Youth Agripreneur program which started in Ibadan is now transiting to an Africa-wide initiative aim at attracting youths back to agriculture by exposing the youth to the numerous opportunities that exist in the agricultural sector. Last year, the IITA youth agripreneurs

in Nigeria cultivated more than 50 hectares of cassava, maize and soybean. The group intends to more than double the hectareage this year as weather conditions look positive. Dr Dixon was accompanied by Dr Gbassey Tarawali, Representative of the IITA DG and Deputy Director General (Partnerships & Capacity Development); and Godwin Atser, Communication & Knowledge Exchange Expert. IITA DG Sanginga also dropped by and partook in the focus group discussion.

NRCRI, FUNAAB and UAM receive equipment



Dr Alfred Dixon (third from right) hands over equipment to Prof. S.O Lagoke of FUNAAB

Collaborating partners under the Cassava Weed Management Project have been given equipment to help tackle the menace of weeds in cassava farms.

The partners include the National Root Crops Research Institute (NRCRI), Umudike; Federal University of

Agriculture Abeokuta (FUNAAB), and the University of Agriculture Makurdi (UAM).

Each of the institutions received the following set of items: Toyota Hilux vehicle, office equipment, a motorcycle, and 20 sprayers.

Prof Friday Ekeleme, Principal Investigator of the Cassava Weed Management Project, said the equipment would facilitate research and called on partner institutions to carefully use and maintain them.

He urged the institutions to redouble efforts towards ensuring that the problem of weeds in cassava is solved.

Besides the collaborating institutions, other partners the project is working with include government representatives, Agricultural Development Programs across the States, international cassava scientists, the donor community, and the private sector.

Cassava Weed Management Project Partners

