

Seed Treatment Technology

Healthy seedlings make a difference

An exchange visit organized at Adami Tulu Agricultural Research Centre (ARC) in Septemeber was attended by four researchers (from Sekota and Fedis) who are involved in FRG based seed treatment research activities.

FRG II project currently supports three research projects targeted to identify the efficacy of seed treatment on the crop stand establishment (including survival rate of the sown seed) at early growing stages. Effective seed treatment together with appropriate chemical application technology has a decisive influence on the final yield and product quality.

On a discussion session facilitated by Dr. Girma Tegegn, senior researcher in plant pathology at Melkassa ARC, progresses made with the seed treatment research on hot pepper, onion, groundnut and teff were reported by the researchers. Besides, the visit to an on-farm vegetable seed treatment trial conducted by Adami Tulu ARC also stimulated active discussion and information exchange among researchers and farmers.

The researchers appreciated the experience gained from visiting one of the similar on-farm research activities conducted by other research teams and exchanging technical information/advice from experienced senior researcher. They requested next visits to be conducted at their own research sites.

Second Step FRG Approach Training

Improving the practice in the fields

The second step training was conducted in October at Adami Tulu for those who were trained the basics of the FRG approach early this year. Thirty nine participants drawn from eighteen institutions including research centres and universities discussed their ongoing participatory research activities. The experience of Bako ARC on participatory varietal selection (PVS) of barley and triticale at Farmer Training Centers (FTCs) suggested quick technology uptake of the identified technologies by farmers as they had been parts of the process in identifying the characteristics of the varieties. MayTsebrri ARC was implementing FRG based research on rice, which farmers in the area had been growing for the last three to four years. The activity tries to establish appropriate agronomic practice of the crop in the area. An FRG based research on seed treatments of groundnuts by Fedis ARC was making use of the centre's sub-station to work with nearby farmers for evaluating the efficacy of seed treatment.

The participant researchers visited an FRG farmer at Meki, who had been engaged in agro-forestry FRG. The farmer was well experienced in working with researchers and impressed the visiting researchers by explaining his own research activities.

During the training, challenges for implementing research with farmers were raised. These includes: (1) making the multidisciplinary research team functional, (2) involving wives of male headed households, (3) cost sharing by farmers and, (4) information sharing among stakeholders.

The training was closed by sharing important points for effective implementation of the participatory research such as (1) involving all the multi-disciplinary research team members, pertinent development actors and farmers from the planning stage so as to secure their active participation, and (2) timely and

continuous information sharing among stakeholders.

Monitoring on the Ground

Variety of activities by participants

More than 68% of the researchers who attended the FRG approach training are now involved in participatory research activities. Monitoring trips were conducted to observe farmers participation, application of the knowledge gained from the training, and variations in implementing participatory researches by different institutions.

Monitoring visit was conducted at four research centres



and two universities during August and September this year. Hawassa University's Local Seed Business Project (LSB) was a unique programme that tries to establish sustainable solution to the current seed shortage by focusing on technical as well as promotional aspects of small-scale seed business. Hawassa ARC was actively conducting participatory research on soil and water conservation using vegetative materials. Farmers prevented soil erosion at their field and harvested forage for their livestock from the bunds which trapped soil and water. Adet ARC worked on FRG based research on rice at Fogera plains, an extensive rice production area of 30,000ha. The research includes variety trial, transplanting, and weeding. Bahir Dar Agricultural Mechanisation Food Science Research Centre was conducting an FRG research on farm implements. The center was working on compactor for teff (soil compactor to be applied after seed sowing) in collaboration with researchers from Adet ARC. Bahir Dar University, with the initiative from FRG farmers, was conducting FRG based research on seed rate of wheat. The monitoring team also visited the research site of Gonder ARC, which worked on home gardens targeting women and HIV positive members in peri-urban areas.

FRG II Project is intending to visit all the participants of the basic FRG training. The lesson learnt from these trainees will be used for further improvement of the follow up trainings as well as the FRG Guideline.

OTHER INFORMATION RELATED TO THE PROJECT

- The following FRG based activities are in pipeline.
 - Vegetable production technology under irrigation
 - Forage and feeding management technology in dry land
- If you have been forwarded this newsletter and would like to receive it in future, please send e-mail to <research4farmers@gmail.com>

