A bi-monthly progress update by the African Agricultural Technology Foundation for stakeholders in the Striga Control Project

March, 2008

better tools, better harvests, better lives

A section of seed stockists during the training in western Kenya

Strides is...
a quarterly progress update by AATF for stakeholders in the Striga Control Project.

For comments, contributions or more information, contact:
The Communications & Partnerships Unit, African Agricultural Technology Foundation PO Box 30709-00100, Nairobi, Kenya
Tel.: +254 20 422 3700; Fax: +254 20 422 3701;
Via USA: Tel. + 1 650 833 6660 3700, Fax: +1 650 833 6661 3701
email: aatf@aatf-africa.org
www.aatf-africa.org

AATF acknowledges input and contributions from CIMMYT and BASF

Training stockists to increase StrigaAway® maize efficiency

Agro-input dealers or stockists are the retail distributors of agricultural inputs such as seeds, tools, pesticides, and fertilizer. Kenya has a fairly developed network of agro-input dealers with over 3,000 rural stockists serving farmers across the country. These retail outlets are often seen as a credible source of agricultural information especially regarding use of inputs.

Recognising the stockists’ crucial role of informing and educating farmers, the African Agricultural Technology Foundation (AATF) teamed up with the International Maize and Wheat Improvement Centre (CIMMYT), Western Seed Company (WSC) and BASF to train stockists in western Kenya and equip them with pertinent information on StrigaAway maize technology.

StrigaAway maize, also referred to as Imazapyr Resistant (IR) maize, was developed in response to the menace posed by Striga, a parasitic weed responsible for over 80% maize crop loss in western Kenya. The weed is common in Nyanza and Western provinces.

The training conducted through the Striga Control Project delivered practical lessons on safe handling of the StrigaAway maize, now retailing in western Kenya as Jua Kayongo hybrid maize. Through the seed stewardship role of AATF, the Striga Control Project aims to increase efficiency in the use of the technology in fighting Striga. This entails strengthening the technical knowledge of stockists and farmers by giving them access to relevant technology use information.

The stockists learnt that StrigaAway maize is coated with a low dose of Imazapyr, a systemic herbicide that is harmful to non-resistant seeds. The herbicide dust from StrigaAway maize may reduce viability or cause the death of non-resistant crop seeds. Stockists should therefore ensure that the Imazapyr-coated maize does not come into contact with non-resistant seeds, at any point and especially in storage.

Safety practices, including washing hands after handling the herbicide-coated maize and before handling other non-resistant seeds, were underscored. Similar instructions have been passed on to the farmers through field days, demonstrations, and in users’ guides contained in the StrigaAway maize pack.

The stockists further learnt that StrigaAway maize is a shelf-life maize. Maize seeds that are more than 12 months old should be returned to the appointed dealers for safe disposal. If such seed is planted, the germination rate would be too low since the herbicide seeps through the seed coat, reducing the seed’s viability. Stockists were advised to ask farmers to return seed that is not planted within two consecutive seasons since its efficacy is compromised due to long storage.

The training equipped stockists with technical knowledge that would help them in answering farmers’ questions and enquiries. One of the frequently asked questions is whether StrigaAway maize can be intercropped with other plants. Smallholder farmers prefer mixed cropping for nutritional advantages and maximizing land use. The trainers assured stockists that StrigaAway maize can be intercropped with legumes as long as the intercrop is planted 10 cm or more away from the maize. The non-resistant intercrop should however not be handled together with the StrigaAway maize. Stockists were reminded to emphasize to the farmers the importance of thoroughly washing hands after planting the herbicide-coated maize and before handling other seeds.

Stockists are an important link in agro-inputs supply chain playing the role of retail distributors. They buy inputs from appointed dealers who receive their supplies from the seed companies. Through better informed stockists, the Striga Control Project is contributing to the long-term and efficient use of StrigaAway maize.

More StrigaAway® maize demos in Uganda

Maize is an important cereal crop in Uganda, providing over 40% of the calories consumed in both rural and urban areas. According to Africa 2000 Network-Uganda, small-scale farmers account for the largest share of maize production. However, the yields are dismal, fluctuating between 0.8 and 1.5 t/ha. In eastern Uganda, farmers have rated Striga as the number one constraint to maize production.

The African Agricultural Technology Foundation (AATF) is collaborating with various partners in implementing a project that aims at deploying the StrigaAway maize technology in the Striga infested countries of east, west and southern Africa. In Uganda, AATF has partnered with Africa 2000 Network, the International Wheat and Maize Improvement Centre (CIMMYT), BASF, Farm Inputs Care Centre (Fica) Seeds Ltd, National Agricultural Research Organisation (NARO), National Agricultural Advisory Services (NAADS), and the Ministry of Agriculture in implementing the Striga Control Project. The project is operational in Budaka, Namutumba, Tororo and Busia districts in eastern Uganda, the districts that are severely infested by Striga weeds.

During the short rains season (October 2007 – January 2008), a total of 662 demos covering 94.5 acres were planted utilizing 945 kg of StrigaAway maize. This was a sharp increase from the long rains season (February – April 2007) in which 146 trials were established in Budaka and Tororo districts. With the assistance of AATF Fica Seeds, imported 1,000 kg of StrigaAway maize from Western Seed Company in Kenya for the establishment of trials during the short rains season. Data collected from the trials indicate that StrigaAway maize planted with fertilizer yielded three times more than similar seed without fertilizer. Poor soil fertility coupled with little or no use of fertilizer greatly reduced the yields. StrigaAway maize planted in poor soils and without fertilizer yielded less than the local seed varieties.

The 662 trials implemented in the short rains season utilized 2,050 kg of DAP + Urea fertilizer and 70 kg of Bull dock pesticide. Budaka district recorded the highest number of trials (426) followed by Tororo with 122. In Namutumba, 89 trials were planted and 25 in Busia.

The quality of these trials is said to have improved greatly as a result of experience and lessons learnt from the long rains season. For instance, technical support to farmers was increased through a higher number of field extension staff who had oversight in planting of the demos. In the short rains season, trials were planted on time with the project having overcome the challenge of importing the inputs. However, rodents posed a challenge in some trial sites in Ngaro, Bulange, Budaka, and Busia, where squirrels fed on the germinating maize shoots and seeds.

Africa 2000 Network continued raising awareness to increase the technology adoption among farmers. The Network facilitated three field days in Busia, Budaka, and Tororo districts involving farmers and farmer groups, extension staff, NAADS officials, representatives NGOs, private sector players, and agro-input dealers.

During the long rains season of 2008 (February to August), the project will install 5,000 trials with a similar number scheduled for the short rains season (October 2008 – January 2009). Africa 2000 Network is also planning a farmers’ exchange visit to western Kenya, a region that shares similar climatic and socioeconomic conditions with eastern Uganda.