

W3.3 “*Orobanche crenata* on Faba bean in Tadla Region (Morocco): Importance and training activities for farmers”

AUTHORS: Y. Baye, K. Saffour and S. Lhaloui

PRESENTER ADDRESS and EMAIL: BP 567, INRA, Beni Mellal, Morocco
yahyabaye@yahoo.fr

ABSTRACT: The broomrape (*Orobanche crenata* Forsk), parasitic plant, causes significant damage to food legumes in the Taghzirte region (Tadla, Morocco) and is the origine of very significant decrease in the reserved area for these crops. The objective of this work was to investigate the farmers on the importance of this problem and to study the effect of different volumes of water bouillie on the effectiveness of glyphosate on faba bean against this parasite. Results showed that the infestation plots of beans and peas is general and that 95% of fields are affected by the problem. Yield losses vary with the level of infestation and may be total. The area reserved for these crops fall over 65% due to this parasite. The spray volumes tested were 400, 300, 250, 200, 160 and 120 liters/ha, in addition to a none sprayed control. The glyphosate dose utilized was 60g/ha at the first application when faba bean was at the flowering stage, followed by a second similar application 15 days after the first one, giving a total of 120g/ha. All the spray volumes recorded a good to a very good effectiveness against the parasite (90 to 100%) and there was no significant difference between the treatments. These results let suppose that the spray volume could be reduced to one third and would thus facilitate the control technique for its generalization. Many actions of extention and training were accomplished for farmers to understand and resolve the problem across the IPM Cereales and Legumes INRA/ICARDA project.

BIOGRAPHY: Mr BAYE is Moroccan. He is an engineer researcher in weed science at The National Institute of Agricultural Research (INRA, Morocco) . He works on the bio-ecology of weeds and control in many crops. He worked on parasitic plants mainly *Cuscuta*. He was implicated in the project “Integrated Contol of Invasive Plants particularly *Solanum elaeagnifolium* in Morocco and Tunisia” initiated by FAO as an international Consultant.