



Research Article

Boosting Bt cotton productivity through frontline demonstrations

N.S. DHALIWAL, GURDARSHAN SINGH, KARAMJIT SHARMA AND PARDEEP GOYAL

Abstract : The present study was conducted across 30 villages in Muktsar district of Punjab. Fifty front line demonstrations were conducted by KVK Muktsar from the year 2008 to 2010 during the *Kharif* seasons. The results of the study revealed that the average yield of Bt cotton under FLDs on integrated nutrient management (INM) varied between 22.40 q/ha to 24.20 q/ha, whereas, under the farmers' practice, it varied between 19.43 q/ha to 21.95 q/ha. The FLD plots recorded a per cent increase in yield to the tune of 6.88 to 15.28. The yield of Bt cotton was much better under FLD plots on integrated nutrient management (INM) as compared to under farmers' practice due to foliar application of potassium nitrate (13:0:45) @ 2 per cent at flowering initiation stage. The study further revealed that the increment in yield of cotton crop under front line demonstrations was due to dissemination of improved and latest technology *viz.*, fertilization and plant protection measures. The data depicted that ridge sowing accounted for approximately 30 per cent water saving without adversely affecting the yield of cotton under FLD plots.

Key Words : Frountline demonstration, Productivity, Integrated nutrient management, Technological interventions.

How to cite this Article : Dhaliwal, N.S., Singh, Gurdarshan, Sharma, Karamjit and Goyal, Pardeep (2012). Boosting Bt cotton productivity through frontline demonstrations, *Internat. J. Forestry & Crop Improv.*, 3 (1) : 13-15.

Article Chronical : Received : 14.03.2012; Revised : 11.05.2012; Accepted : 20.05.2012

INTRODUCTION

Cotton plays a key role in the national economy in terms of direct and indirect employment and income generation in the agricultural and industrial sectors. It is cultivated in tropical and sub tropical regions of more than 80 countries. Presently, the total area under cotton cultivation in India is 121.91 lakh hectares with production of 356 lakh bales of 170 kg (Cotton Advisory Board 2011-12).

The ICAR has always underlined the importance of

— MEMBERS OF RESEARCH FORUM —

Author of the Correspondence :

KARAMJIT SHARMA, Department of Extension Education, Krishi Vigyan Kendra, MUKTSAR (PUNJAB) INDIA

Address of the Coopted Authors :

N.S. DHALIWAL, Krishi Vigyan Kendra, MUKTSAR (PUNJAB) INDIA

GURDARSHAN SINGH, Department of Horticulture, Krishi Vigyan Kendra, MUKTSAR (PUNJAB) INDIA

PARDEEP GOYAL, Department of Agronomy, Krishi Vigyan Kendra, MUKTSAR (PUNJAB) INDIA

scientist-farmer linkage for the effective transfer of latest agricultural technologies. To achieve the desired objectives, the Government of India had established a "Technology Mission on cotton" under mini mission II in the year 2000. The main objectives of the mission were to enhance the production, per unit area through (a) technology transfer, (b) supply of quality seeds, (c) elevating IPM activities/ and (d) providing adequate and timely supply of critical inputs to the farmers. These demonstrations are conducted under the close supervision of scientists of Krishi Vigyan Kendras, SAUs and their Regional Research Stations. The FLD is an important tool for transfer of latest package of practices in totality to farmers and the main objective of this programme is to demonstrate newly released crop production and protection technologies and management practices at the farmers' field under real farming situation. Through this practice, the newly improved innovative technology having higher production potential under the specific cropping system can be popularized and simultaneously feedbacks from the farmers may be generated on the demonstrated technology.

The present study has been undertaken to study the