



Survey for the status of anthracnose of greengram in Northern Karnataka

SUNIL KULKARNI¹ AND V.I. BENAGI*

Department of Plant Pathology, University of Agricultural Sciences, DHARWAD (KARNATAKA) INDIA

Abstract : A roving survey was conducted to assess the incidence of anthracnose of greengram during *Kharif* season of 2007-08 and 2008-09 in Bagalkot, Belgaum, Bellary, Bidar, Bijapur, Dharwad, Gadag, Gulbarga, Haveri, Koppal and Raichur districts of northern Karnataka. The disease severity during *Kharif* 2008-09 (38.34%) was higher than *Kharif* 2007-08 (35.53 %). The disease severity was highest in Bidar district (49.43%) followed by Gulbarga district (48.12 %) Humnabad taluk of Bidar district and Chincholli taluk in Gulbarga district were worst hit due to disease. Indi taluk in Bijapur district recorded least disease severity in both the years. Some fields in Chitaguppa, Dubalgundi (Bidar district) and Nidagunda (Gulbarga district) recorded up to 60 per cent disease severity during *Kharif* 2008-09. The congenial weather conditions like frequent rains, moderate temperature coupled with higher humidity might have helped in building up of high disease pressure in Bidar and Gulbarga districts.

Key Words : Survey, Greengram, Anthracnose, Disease severity, Weather

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INTRODUCTION

Greengram (*Vigna radiata* L.) is one of the important pulse crops of India. It is quite versatile crop grown for seeds, green manure and forage and it is also considered as "Golden Bean". Presently in India greengram is cultivated over an area of 32.99 lakh hectare with a production of 13.74 lakh tones (Prasad, 2006). The major greengram growing states are Orissa, Maharashtra, Andra Pradesh, Rajasthan, Karnataka and Gujarat. It ranks third among all pulses grown in India after chickpea and pigeonpea. The Hyderabad Karnataka area particularly Bidar and Gulbarga districts has an extensive cultivated area of greengram, pigeonpea and chickpea hence this regions are called as "pulse bowl" of Karnataka. In Karnataka, anthracnose caused by *Colletotrichum truncatum* (Schw.) Andrus and Moore is one of the major diseases of greengram. In northern Karnataka, anthracnose severity was in the range of 18.2 to 86.57 per cent (Laxman, 2006). Very little work has been done on systematic survey of this disease in northern Karnataka. Hence, present investigation was initiated

on survey for anthracnose in major greengram growing districts of northern Karnataka, to identify the incidence of the disease over time and geographical locations.

MATERIALS AND METHODS

Roving method of survey was followed to assess the incidence of anthracnose in eleven major greengram growing districts of Northern Karnataka. The survey was conducted during *Kharif* 2007-08 and 2008-09 in three taluks of Bagalkot, one taluk of Belgaum, two taluks of Bellary, five taluks of Bidar, two talukas of Bijapur, four taluks of Dharwad, three taluks of Gadag, four taluks of Gulbarga, three taluks of Haveri, two taluks of Koppal and two taluks of Raichur districts. In each taluka, minimum of five villages were selected and in each village, minimum of five fields were selected to assess the severity of greengram anthracnose.

The anthracnose severity was recorded by following 0 – 9 scale of Mayee and Datar (1986). Further, these scales were converted to per cent disease index (PDI) using the formula

* Author for correspondence

¹Krishi Vigyan Kendra, Bidar, University of Agricultural Sciences, RAICHUR (KARNATAKA) INDIA