Production efficiency of maize with legumes intercropping and weed management under rainfed condition

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ABSTRACT : A field experiment was conducted during *kharif* seasons of 2006, 2007 and 2008 at Central Crop Research Farm, SHIATS, Allahabad to assess the productivity of *kharif* maize (*Zea mays* L.) under legumes viz., blackgram, greengram, cowpea and soybean intercropping system and its effect on weeds. The association of maize with blackgram, greengram and cowpea showed the highest land equivalent ratio (1.38) which were statistically at par. Maximum relative crowding coefficient values (10.79) was recorded in maize+greengram intercropping followed by intercropping of maize+blackgram, aggressivity index (0.60) was statistically similar and significantly higher under intercropping of maize+soybean but it was statistically similar to intercropping of maize+blackgram, maize+greengram and maize+cowpea, respectively.

Key Words : Maize (*Zea mays* L.), land equivalent ratio (LER), relative crowding coefficient (RCC), Aggressivity Index (AI), legume, intercropping yield.