

**USE OF *PSEUDOMONAS AERUGINOSA* AND FUNGAL
ANTAGONISTS IN THE CONTROL OF ROOT
KNOT-ROOT ROT DISEASE COMPLEX
ON MUNGBEAN AND MASHBEAN**

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Abstract

Use of *Pseudomonas aeruginosa* alone or in combination with fungi viz., *Verticillium chlamydosporium*, *Paecilomyces lilacinus*, *Talaromyces flavus*, *Trichoderma harzianum* and *Stachybotrys atra* significantly ($p < 0.05$) reduced infection of *Meloidogyne javanica* root knot nematode and root infecting fungi viz., *Macrophomina phaseolina*, *Rhizoctonia solani*, *Fusarium solani* on mungbean and mashbean. Soil treatment with *P. aeruginosa* and *V. chlamydosporium* reduced gall formation mostly on mungbean, whereas *P. aeruginosa* mixed with *T. harzianum* showed reduction in gall formation on mashbean. *P. aeruginosa* used alone or in combination with *V. chlamydosporium* or *P. lilacinus* also significantly reduced egg mass production and number of juveniles in soil. *P. aeruginosa* used with fungal antagonists also significantly enhanced plant growth.