Title: Suppressive effect of of *Pseudomonas fluorescens* combined with chopped leaves of different plant species on *Abelmoschus esculentus* L. against *Meloidogyne incognita* and improve crop productivity in an eco-friendly manner

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I. Abstract

For protecting human health and environment nematicides are banned and highly restricted. Thus the needed to search a new alternative of synthetic pesticide for manage the root-knot nematode infestation. A glasshouse experiment was carried out to explore the efficacy of combined application of bacterial bioagent, *Pseudomonas fluorescens* with chopped leaves of different plant species against root-knot nematode, *Meloidogyne incognita* attacking *Ablemoschus esculentus* L. Many plant species having various types of phytochemical viz., alkaloids, diterpenes, fatty acids, glucosinolates, isothiocyanates, phenols, polyacetylenes, and sesquiterpenes. Combine application of *P. fluorescens+Achyranthes aspera* observed highly reduction in the pathological parameters and enhancement in growth and physiological parameters in comparison to untreated inoculated control. While combination of *P. fluorescnes* + *Senna sophera* showed least effective against root-knot infestation. Use of bioagents and organic amendments is an alternative substitute of synthetic pesticide. Synthetic pesticide is fastest method for manage the root-knot nematode infestation but it is harmful for environment as well as human beings. It is also responsible for disturb the microflora and microfauna. Organic amendments use for manage the infestation of *M. incognita* in an eco-friendly manner. It is responsible to maintain the soil fertility without disturb the number of microorganism.

II. Biography

Moh Tariq has completed Doctor of Philosophy (Ph. D) in Botany from Aligarh Muslim University, Aligarh (India). He is the Associate Editor in the "Saudi Journal of Pathology and Microbiology (SJPM) ISSN 2518-3370 **(Impact factor 0.24).** He has published more than 12 papers in reputed journals. He has a third recipient in poster presentation in National Conference. Moh Tariq and his group to promote the organic farming by utilizing the organic matter, biofertilizer and biocontrol agents for the sustainable management of plant-parasitic nematodes as well as enrich the soil with nutrients necessary for plant growth and development.

III. Presenting Author details



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