RESEARCH PAPER

Asian Journal of Bio Science Vol. 6 Issue 1 (April, 2011) : 74-78

Microbiolgical study of root nodule bacteria from wild legumes

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(Received: January, 2011; Accepted : February, 2011)

Nitrogen fixing microorganism of genus *Rhizobium* lives in root nodules of legumes and also in the soil. An attempt has been made to isolate and characterize this *Rhizobium* strains from different wild legumes like *Meliolotus indicus, Medicago denticulate, Desmodium triflorum* and *Alycicarpus hamosum*. Phosphorus is one of the major nutrients next to nitrogen which is present in the soil in insoluble form. Characterization of the isolated strains form wild legume plants was done by using certain other biochemical test, this included indole production, MR-VP, cirate utilization ketolactose production, nitrate reduection, phosphate solubilization, pH and Salt tolerance. Five isolates DT02, DT03, DT04, MI01, EH04 showed good phosphatase activity. Isolate DT02, DT03, DT04, MI01, EH04 grew well at concentration of 2%, 3% salt and grew well in alkaline and acid condition *i.e.* at pH10 and pH4.

Key words : Root nodule bacteria, Microbiological study, Wild legume *Rhizobium*

Agrawal, Pooja, Athiya, Arti and Jain, P.C. (2011). Microbiolgical study of root nodule bacteria from wild legumes. *Asian J. Bio. Sci.*, **6** (1) : 74-78.