

Isolation of Endophytic Fungi from some Orchid Varieties

ชื่อโครงการ Isolation of Endophytic Fungi from some Orchid Varieties

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Abstract

First study on endophytic fungi from orchids in Chantaburi province, Thailand. Endophytic fungi were isolated from 9 orchid varieties in green house condition. Leaves and roots of *Grammatophyllum scriptum*, *Cymbidium dayanum*, *Dendrobium hercoglossum*, *Dendrobium palpebrae*, *Torenia fournieri*, *Doritis pulcherrima*, *Dendrobium crumenatum*, *Dendrobium friedericksianum* and *Grammatophyllum specinocum*. All samples were collected then brought to laboratory. Isolation was done by surface sterilization, removed the outer surface and got inner tissues then place on water agar and transferred culture to potato dextrose agar to be pure culture. The morphological identification based on colony and agar color, liquid drops, colony shapes, the growth rate and spores characteristic. Twelve species are identified as *Chaetomium cochliodes*, *Chaetomium cupreum*, *Xylaria* sp., *Colletotrichum* sp., *Nigrospora* sp., *Phoma* sp., *Curvularia* sp., *Fusarium* sp., *Pestalotiopsis* sp., *Corynascus* sp. and *Cladosporium*-like fungi, were obtained. Most of fungi that isolated were familiar to endophytic that isolated from many plant as previous study. All of the fungi have different benefit up to using.

Keywords: Endophytic fungi, Orchids

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