

Two novel additions to *Corynespora* Gussow from India

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SUMMARY

This paper deals with the descriptions, latin diagnosis and illustrations of two undescribed species of fungus genus *Corynespora* Gussow viz., *C. pongamicola* sp. nov. and *C. tomenticola* sp. nov. collected on living leaves of *Pongamia pinnata* (Fabaceae) and *Terminalia tomentosa* (Combretaceae), respectively from North Western Tarai Forest of U.P., India.

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During our survey of North Western Tarai Forests of U.P. a number of collections of living leaves exhibiting leaf spots and blights were encountered of these, upon critical examination and comparison of morphotaxonomic features with those of the allied forms, two taxa of species rank have found to be undescribed. These are described and illustrated novel species of genus *Corynespora* viz., *C. pongamicola* Singh and Mall sp. nov. and *C. tomenticola* Singh and Mall sp. nov. parasitizing on the living leaves of *Pongamia pinnata* (Fabaceae) and *Terminalia tomentosa* (Combretaceae), respectively are described and illustrated.

MATERIALS AND METHODS

During collection trip infected leaf samples were taken in separate polythene bags from Katarnighat Wildlife Sanctuary of North Western Tarai forest of Uttar Pradesh. Suitable mounts of surface scrapping and free hand cut sections were prepared from infected portions of the leaf samples. Microscopic slides were prepared in cotton- blue lactophenol mixture. Slides were examined and camera lucida drawing were made. Morphotaxonomic determinations of taxa were done with the help of current literature and resident expertise available. Holotypes have been deposited in HCIO, IARI, New Delhi and Isotype retained in the departmental herbarium for further reference.

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RESULTS AND DISCUSSION

The results obtained from the present investigation have been discussed in the following sub heads :

Corynespora pongamicola Singh and Mall sp. nov. (Fig. 1):

Maculae amphigenae, circulares vel irregulares, atro-brunneae ad spermae et infernae. Coloniae hypophyllae, discretiae, atro-griseae. Mycelium internum. Stromata absentia. Conidiophora moronematosa, ex hyphis oriunda singulata, recta vel leniter curvata, simplicia, cylindricata, laevia, crassitunicata 1-3 septata 0-1 proliferationes cylindricus, cellulae baasali-inflati, atro-olivaceo lutea vel pallide olivaceo brunneae, 92-220 x 8-10 μ m. Cellulae conidiogenae integratae, terminales, monotreticae, cicatrix incrassatae vel non incrassatae. Conidia solitaria, sicca, arogena, simplicia, laevia, tenuitunicata, recta vel leniter curvata, obclavata, ellipsoidea, clavata, ad apicem subobtusa vel rotundata, ad basim truncata, 1-6 pseudoseptata, hila incrassata vel non-incrassata, pallide olivaceo lutea, 18-65.2 x 8-16.5 μ m.

In foliis vivis *Pongamia pinnata* Vent. (Fabaceae), Katarnighat Wildlife Sanctuary, Bahraich (U.P.) India, 13th Jan; 2007, leg; D.P. Singh, BRH-1,580, DPS-0,180 (Isotypus), HCIO - 47,899 (Holotypus).

Infection spots amphigenous, circular to irregular, dark brown on both the surfaces with dark margin, later becoming necrotic. Colonies hypophyllous, discrete dark grey. Mycelium internal. Stromata absent. Conidiophores macronematous, mononematous, arising singly from hyphae, straight to slightly curved, simple cylindrical, smooth, thick walled, 1-3 septate with 0-1 cylindrical proliferation, basal cell swollen, dark olivaceous yellow to light olivaceous brown 92-220 x 8-10 μ m