

Biodiversity of Fungi in Strawberry Fields in Anamur, TURKEY

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Aim of the study: Strawberry is a delicious and aromatic fruit which can be consumed as fresh and also is suitable for industry. However, strawberry is exposed to many fungal diseases that end with the loss of the product up to 15% before harvest. The aim of this study is to determine the fungi that present in the field whether or not pathogenic.

Material and Methods: One hundred twenty three samples were collected from different strawberry fields in Anamur in April 2016. Samples were inoculated on PDA and RBA after collection and incubated at 27°C 7 days. Morphological identification was made according to the shape and color of the colonies, mycelium and spore structures. For molecular identification; DNA isolation was made according to Doyle and Doyle (1987)'s 2X CTAB DNA isolation method. ITS gene region was used to identify species on a molecular level. ITS region was amplified with using universal ITS primers in PCR. PCR products we sent to sequencing and sequence results were aligned with the sequences in GenBank using BLAST software.

Results: According to morphological and molecular methods ten different fungal genera were found on strawberries. These genera were *Rhizopus oryzae*, *Alternaria alternata*, *Fusarium proliferatum*, *Aspergillus niger*, *Trichoderma atroviride*, *Cladosporium cladosporioides*, *Talaromyces allahabadensis*, *Syncephalastrum monosporum*, *Syncephalastrum* sp. and *Bortyitis cinerea*. Another set of PCR products were sent to the sequencing and results were expected to be obtained shortly.

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