

ABSTRACT

The present analysis was directed to assess the pharmacological activity of *Aspergillus* species. Two strains, *Aspergillus flavus* and *Aspergillus oryzae* were isolated from soil sample and their organic extract was used for the pharmacological assessment. These extracts showed antibacterial activity by disc and well diffusion method against *Staphylococcus aureus*, *Bacillus subtilis* and *E. coli*. These extracts exhibited no antifungal activity against *A. Niger*, *A. fumigatus*, *A. oryzae*, *C. albicans* and *S. cerevisiae*. Antioxidant activity was performed with DPPH assay method and maximum percentage of radical scavenging activity with *Aspergillus flavus* was 72.82%, the lowest was 57.19%. Through *A. oryzae* extract highest percentage of radical scavenging activity (%RSA) was 36.47% and the lowest was given 27.17%. Extract of *Aspergillus flavus* and *Aspergillus oryzae* showed significant results against anti-inflammatory activity. Antidiabetic activity was also checked with these extracts and maximum percentage of decrease in the blood glucose levels after the treatment of *Aspergillus flavus* and *Aspergillus oryzae* extract with the dose of 400mg/kg was 55.1% and 52.1%. There was no oral acute toxicity with the dose of 1000mg/ml. This study also encourages the use for fungi at large scale to improve the fungal values against drugs.