

## Effect of Gibberellin on *in vitro* growth and biomass production of some soil fungi

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### **Abstract**

Effect of different concentrations of Gibberellin was studied on growth of four species of soil fungi namely, *Aspergillus oryzae*, *A. terreus*, *A. niger* and *Alternaria alternata*. The hormone was applied singly in various concentrations. Increased growth rate and biomass production revealed significant values when treated with dilute solutions of Gibberellin at 15, 30 and 45 mgL<sup>-1</sup> except *A. terreus*. Fresh weights and dry weight values were observed appreciably high when *Aspergillus terreus* was treated with 60 mgL<sup>-1</sup> concentration of the hormone solution. The data on fresh and dry biomass revealed that the highest biomass increase was obtained for *Alternaria alternata*. Fresh biomass of *Alternaria alternata* showed 75% increase when treated with 45 mgL<sup>-1</sup> concentration of hormone solution in comparison to control, whereas an increase of 77.8% was obtained in the case of dry weight. At 60 mgL<sup>-1</sup>, a significant fresh biomass suppression of 16.3% and 7.43% was observed for *Alternaria alternata* and *Aspergillus oryzae*, respectively. The highest loss for dry biomass was noticed in *Alternaria alternata* (33.33%).

**Key words:** Growth hormone, Gibberellin, in-vitro growth, biomass, fungi