

# **Biotransformation of Two Cytotoxic Terpenes, $\alpha$ -Santonin and Sclareol by *Botrytis cinerea***

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Biotransformation,  $\alpha$ -Santonin, Sclareol, *Botrytis cinerea*

Two cytotoxic terpenes,  $\alpha$ -santonin (**1**) and sclareol (**3**) were biotransformed by a plant pathogenic fungus *Botrytis cinerea* to produce oxidized metabolites in high yields.  $\alpha$ -Santonin (**1**) on fermentation with the fungus for ten days afforded a hydroxylated metabolite identified as 11 $\beta$ -hydroxy- $\alpha$ -santonin (**2**) in a high yield (83%), while sclareol (**3**) was metabolized to epoxysclareol (**4**) (64%) and a new compound 8-deoxy-14,15-dihydro-15-chloro-14-hydroxy-8,9-dehydrosclareol (**5**) (7%), representing a rare example of microbial halogenation.