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## Molecular Cloning of a cDNA Encoding the Cu/Zn-Superoxide Dismutase in *Cordyceps militaris*

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Superoxide dismutase (SOD), one of the essential element of the antioxidant defense system, mainly removes  $O_2$  and also prevents  $O_2$  mediated reduction of iron and subsequent OH generation, which is highly toxic to the organism. This enzyme is classified into three forms based on its active site metal requirements namely Cu/Zn-SOD, Mn-SOD, and Fe-SOD. In general, Cu/Zn-SOD is present in the cytosol of eukaryotes, Mn-SOD is present in the mitochondria of both prokaryotes and eukaryotes, and Fe-SOD is found in both eubacteria and archaebacteria. We describe here the cloning and nucleotide sequencing of a cDNA encoding the Cu/Zn-SOD in Cordyceps militaris. The 462 bp cDNA has an open reading frame of 154 amino acid residues with a molecular mass of approximately 16 kDa. The leduced protein sequence of the Cu/Zn-SOD of C. militaris was aligned to that of known Cu/Zn-SOD from various organisms. Phylogenetic analysis esulted in a monophyletic group in the deduced protein sequences of the 'ungi Cu/Zn-SOD. The deduced protein sequence identity among fungi ranged from 89.4% - 67.1%.