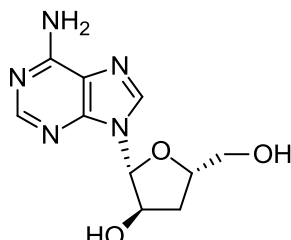


## Cordycepin

Code No.: **BIA-C1688**

Pack sizes: **1 mg, 5 mg**



Synonyms : 3'-Deoxyadenosine; 9-Cordyceposidoadenosine; Adenine coryceposide; Cordycepine; NSC 401022; NSC 63984

## Specifications

CAS #	: <b>73-03-0</b>
Molecular Formula	: <b>C<sub>10</sub>H<sub>13</sub>N<sub>5</sub>O<sub>3</sub></b>
Molecular Weight	: <b>251.2</b>
Source	: <b><i>Cordyceps</i> sp.</b>
Appearance	: <b>White to off-white solid</b>
Purity	: <b>&gt;95% by HPLC</b>
Long Term Storage	: <b>-20°C</b>
Solubility	: <b>Soluble in ethanol, methanol, DMF or DMSO.</b>

## Application Notes

Cordycepin is a nucleoside metabolite first isolated by Cunningham in 1951 as an antibacterial from *Cordyceps militaris*, an ascomycete that parasitises soil dwelling caterpillars. Cordycepin was subsequently proven to be a simple analogue of adenosine, 3'-deoxyadenosine. Cordycepin is a potent antitumor active. Its production, chemistry, biosynthesis and bioactivity were reviewed by Suhadolnik in 1970. More recently, natural medicinal preparations of *C. militaris* have found wide appeal and sparked re-investigation into cordycepin's effects on abnormal gut dwelling bacteria.

## References

1. Cordycepin, a metabolic product from cultures of *Cordyceps militaris* (Linn.) Link. Part I. Isolation and characterisation. Cunningham K.G. et al., J. Chem. Soc. 1951, 2299.
2. Cordycepin, a metabolic product from cultures of *Cordyceps militaris* (Linn.) Link. Part II. The structure of cordycepin. Bentley H.R. et al., J. Chem. Soc. 1951, 2301.
3. An improved method of isolation and determination of cordycepin. Kredich N.M. and Guarino A.J., Biochim. Biophys. Acta 1960, 41, 363.
4. Nucleoside antibiotics. Suhadolnik R.J. in Nucleoside Antibiotics, Wiley-Interscience 1970, 50.
5. Cordycepin: selective growth inhibitor derived from liquid culture of *Cordyceps militaris* against *Clostridium* spp. Ahn Y-J. et al., J. Agric. Food Chem. 2000, 48, 2744.