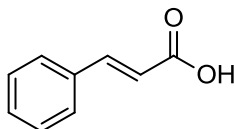


## Cinnamic acid

Code No.: **BIA-C1725**

Pack sizes: **5 mg, 25 mg**



Synonyms : 3-Phenyl-2-propenoic acid; 3-Phenylacrylic acid; NSC 623441; NSC 9189; Phenylacrylic acid; beta-Phenylacrylic acid

### Specifications

CAS #	: <b>621-82-9</b>
Molecular Formula	: <b>C<sub>9</sub>H<sub>8</sub>O<sub>2</sub></b>
Molecular Weight	: <b>148.2</b>
Source	: <b>Synthetic</b>
Appearance	: <b>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

Cinnamic acid is a common plant metabolite, biosynthetically formed by the action of phenylalanine ammonia-lyase (PAL) on phenylalanine. Cinnamic acid is a member of the phenylpropanoid class of lignin biosynthetic precursors. Cinnamic acid is produced by many microorganisms but is also readily produced by fermentation on media containing plant extracts. The biochemical and pharmacological activity of cinnamic acid has > 13,000 entries in SciFinder and is well reviewed by Guzman (2014) and Sharma (2011). Cinnamic acid a useful standard for analytical and bioassay dereplication.

### References

1. Production of *Streptoverticillium cinnamoneum* transglutaminase and cinnamic acid by recombinant *Streptomyces lividans* cultured on biomass-derived carbon sources. Noda S. et al., *Bioresource Tech.* 2012, 104, 648.
2. Mangrove actinomycetes as the source of ligninolytic enzymes. Niladevi K N. et al., *Actinomycetologica* 2005, 19, 40.
3. Chemical characterization and spectroscopic analysis of the solubilization products from wheat straw produced by *Streptomyces* strains grown in solid-state fermentation. Hernandez-Coronado M.J. et al., *Microbiology* 1997, 143, 1359.
4. Natural cinnamic acids, synthetic derivatives and hybrids with antimicrobial activity. Guzman J.D., *Molecules* 2014, 19, 19292.
5. Cinnamic acid derivatives: A new chapter of various pharmacological activities. Sharma P., *J. Chem. Pharm. Res.* 2011, 3, 403.