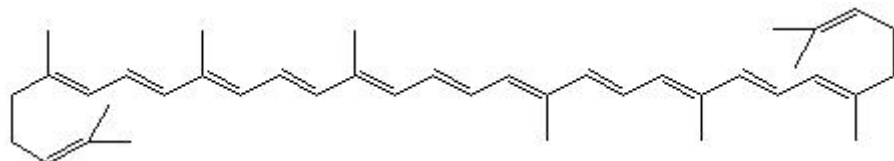


TECHNICAL INFORMATION

Catalog Number: 198684

Lycopene

Structure:



Molecular Formula: C₄₀H₅₆

Molecular Weight: 537

CAS # : 502-65-8

Synonym: γ , γ carotene

Source: Isolated from commercially-grown tomatoes (*L. esculentum*) and once recrystallized and hexane washed.

Physical Appearance: Red crystalline needles, store under nitrogen.

Description: Natural tomato lycopene is a mixture of isomers, primarily (all-*E*), but also some (5-*Z*) and two lesser and unidentified *cis* isomers, all of which are difficult to resolve by LC ¹.

Purity: ~90% overall. ~95.0% by visible absorbance measurement ($\lambda = 502$ nm, $\epsilon = 1.72 \times 10^5$, methylene chloride: hexane 98:2 + BHT.) and ~97% peak-pure at 502 nm by LC.

Solubility: Soluble in methylene chloride

References:

- Zumbrunn et al. *Helv.Chim.Acta* **68**, 1540-1542 (1985)
- Zumbrunn et al. *Helv.Chim.Acta* **68**, 1519-1539 (1985)
- Hengartner et al. *Helv.Chim.Acta.* **75**, 1848-1965 (1992)