



3050 Spruce Street
Saint Louis, Missouri 63103 USA
Telephone 800-325-5832 • (314) 771-5765
Fax (314) 286-7828
email: techserv@sial.com
sigma-aldrich.com

Product Information

6-Thioguanine

Product Number **A 4882**
Store at Room Temperature

Product Description

Molecular Formula: $C_5H_5N_5S$
Molecular Weight: 167.2
CAS Number: 154-42-7
 λ_{max} : 347, 258 nm¹
Extinction Coefficient: E^{mM}
20.9 (347 nm), 8.1 (258 nm) 0.1 M HCl)

This product is most commonly used to generate DNA analogues. After incorporation into DNA, this product will inhibit DNA synthesis and can be used to inhibit the growth of neoplasms.²

For cell culture applications, please refer to the tissue culture tested product (Product No. A 4660).

Precautions and Disclaimer

For Laboratory Use Only. Not for drug, household or other uses.

Preparation Instructions

This product is soluble in 1 M NaOH (50 mg/ml), yielding a clear, faint yellow solution. The product is also very slightly soluble in ethanol, insoluble in water and chloroform.³

References

1. J. Am. Chem. Soc., **77**, 1676 (1955).
2. Data for Biochemical Research, 3rd ed., Dawson, R. M. C., et al., Oxford University Press (New York, NY: 1986), p. 275.
3. Martindale The Extra Pharmacopoeia, 30th ed., Reynolds, J. E. F., ed., The Pharmaceutical Press (London, England: 1993), p. 502.

MWM/RXR 12/02

Sigma brand products are sold through Sigma-Aldrich, Inc.

Sigma-Aldrich, Inc. warrants that its products conform to the information contained in this and other Sigma-Aldrich publications. Purchaser must determine the suitability of the product(s) for their particular use. Additional terms and conditions may apply. Please see reverse side of the invoice or packing slip.