



>>Derivative: 3'-Tosyl, 5'-Ac

Molecular Formula: C₁₉H₂₁N₅O₆S

Molecular Weight: 447.471

Accurate Mass: 447.121255

Percentage Composition: C 51.00%; H 4.73%; N 15.65%; O 21.45%; S 7.17%

Physical Description: Plates (CHCl₃/petrol)

Melting Point: Mp 147-148°

>>Derivative: 5'-Trityl

Molecular Formula: C₂₉H₂₇N₅O₃

Molecular Weight: 493.564

Accurate Mass: 493.21139

Percentage Composition: C 70.57%; H 5.51%; N 14.19%; O 9.72%

Melting Point: Mp 195-197°

>>Derivative: 5'-(4,4'-Dimethoxytrityl), 6*N*-benzoyl

CAS Registry Number: 64325-78-6

Molecular Formula: C₃₈H₃₅N₅O₆

Molecular Weight: 657.724

Accurate Mass: 657.258735

Percentage Composition: C 69.39%; H 5.36%; N 10.65%; O 14.60%

Use/Importance: Research tool for antiviral and anticancer studies

Physical Description: Powder

References:

- Andersen, W. *et al.*, *J.C.S.*, 1954, 1882, (3'-Ac, 5'-Ac, di-Ac, 3'-tosyl 5'-Ac, 5'-trityl)
Hayes, D.H. *et al.*, *J.C.S.*, 1955, 808, (phosphates)
Lehman, I.R. *et al.*, *J. Biol. Chem.*, 1958, **233**, 163-170, (5'-triphosphate)
Pedersen, C. *et al.*, *J.A.C.S.*, 1960, **82**, 5210, (synth)
Biemann, K. *et al.*, *J.A.C.S.*, 1962, **84**, 2005, (ms)
Kuszmam, J. *et al.*, *Chem. Ber.*, 1963, **96**, 2327, (synth)
Schaller, H. *et al.*, *J.A.C.S.*, 1963, **85**, 3821-3827, (6*N*-benzoyl, 5'-(4,4-dimethoxytrityl) deriv)
Letsinger, R.L. *et al.*, *Tet. Lett.*, 1968, 2621, (3',5'-dibenzoyl)
Jones, A.J. *et al.*, *J.A.C.S.*, 1970, **92**, 4079, (cmr)
Davies, D.B. *et al.*, *J.C.S. Perkin 2*, 1975, 1703, (pmr)
Saneyoshi, M. *et al.*, *Nucleic Acids Res.*, 1981, **9**, 3129-3138, (5'-triphosphate)
Sato, T., *Acta Cryst. C*, 1984, **40**, 880, (cryst struct)
Kazimierczuk, Z. *et al.*, *J.A.C.S.*, 1984, **106**, 6379, (synth)
Ladner, W.E. *et al.*, *J.O.C.*, 1985, **50**, 1076-1079, (5'-triphosphate)
Tanaka, T. *et al.*, *Tet. Lett.*, 1986, **27**, 5641-5644, (5'-diphosphate)
Lewis, R.J., *Sax's Dangerous Properties of Industrial Materials*, 8th edn., Van Nostrand Reinhold, 1992, DAQ200