

syn-4,6-dimethyl-1,2,3,5-tetrathiane

Inchi:	InChI=1S/C4H8S4/c1-3-5-4(2)7-8-6-3/h3-4H,1-2H3/t3-,4+
InchiKey:	LIAYFMNHMJEGEI-ZXZARUISSA-N
Formula:	C4H8S4
SMILES:	CC1SSSC(C)S1
Mol. weight [g/mol]:	184.37

Physical Properties

Property code	Value	Unit	Source
gf	158.98	kJ/mol	Joback Method
hf	89.13	kJ/mol	Joback Method
hfus	13.65	kJ/mol	Joback Method
hvap	47.87	kJ/mol	Joback Method
log10ws	-4.12		Crippen Method
logp	3.455		Crippen Method
mcvol	121.760	ml/mol	McGowan Method
pc	4730.11	kPa	Joback Method
rinqol	1389.00		NIST Webbook
tb	497.12	K	Joback Method
tc	778.61	K	Joback Method
tf	471.78	K	Joback Method
vc	0.376	m ³ /kmol	Joback Method

Temperature Dependent Properties

Property code	Value	Unit	Temperature [K]	Source
cpg	227.67	J/mol×K	497.12	Joback Method
cpg	240.52	J/mol×K	544.04	Joback Method
cpg	252.45	J/mol×K	590.95	Joback Method
cpg	263.51	J/mol×K	637.87	Joback Method
cpg	273.71	J/mol×K	684.78	Joback Method
cpg	283.10	J/mol×K	731.70	Joback Method
cpg	291.71	J/mol×K	778.61	Joback Method

Sources

Crippen Method:	https://www.chemeo.com/doc/models/crippen_log10ws
Joback Method:	https://en.wikipedia.org/wiki/Joback_method
McGowan Method:	http://link.springer.com/article/10.1007/BF02311772
NIST Webbook:	http://webbook.nist.gov/cgi/cbook.cgi?ID=R220181&Units=SI
Crippen Method:	http://pubs.acs.org/doi/abs/10.1021/ci990307I

Legend

cpg:	Ideal gas heat capacity
gf:	Standard Gibbs free energy of formation
hf:	Enthalpy of formation at standard conditions
hfus:	Enthalpy of fusion at standard conditions
hvac:	Enthalpy of vaporization at standard conditions
log10ws:	Log10 of Water solubility in mol/l
logp:	Octanol/Water partition coefficient
mccol:	McGowan's characteristic volume
pc:	Critical Pressure
rinpol:	Non-polar retention indices
tb:	Normal Boiling Point Temperature
tc:	Critical Temperature
tf:	Normal melting (fusion) point
vc:	Critical Volume

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