

2-Oxazolidinethione, 5-ethenyl-

Other names:	DL-Goitrin 5-vinyloxazolidine-2-thione
Inchi:	InChI=1S/C5H7NOS/c1-2-4-3-6-5(8)7-4/h2,4H,1,3H2,(H,6,8)
InchiKey:	UZQVYLOFLQICCT-UHFFFAOYSA-N
Formula:	C5H7NOS
SMILES:	C=CC1CN=C(S)O1
Mol. weight [g/mol]:	129.18
CAS:	13190-34-6

Physical Properties

Property code	Value	Unit	Source
gf	195.99	kJ/mol	Joback Method
hf	63.14	kJ/mol	Joback Method
hfus	19.35	kJ/mol	Joback Method
hvap	44.72	kJ/mol	Joback Method
log10ws	-1.09		Crippen Method
logp	0.857		Crippen Method
mvol	94.050	ml/mol	McGowan Method
pc	5109.34	kPa	Joback Method
tb	473.41	K	Joback Method
tc	721.13	K	Joback Method
tf	303.10	K	Joback Method
vc	0.347	m ³ /kmol	Joback Method

Temperature Dependent Properties

Property code	Value	Unit	Temperature [K]	Source
cpg	193.99	J/molxK	473.41	Joback Method
cpg	206.32	J/molxK	514.70	Joback Method
cpg	217.90	J/molxK	555.98	Joback Method
cpg	228.74	J/molxK	597.27	Joback Method
cpg	238.85	J/molxK	638.55	Joback Method
cpg	248.23	J/molxK	679.84	Joback Method
cpg	256.89	J/molxK	721.13	Joback Method

Sources

Crippen Method:	http://pubs.acs.org/doi/abs/10.1021/ci990307l
Crippen Method:	https://www.cheméo.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=C13190346&Units=SI

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
h vap:	Enthalpy of vaporization at standard conditions
log10ws:	Log10 of Water solubility in mol/l
logp:	Octanol/Water partition coefficient
mcvol:	McGowan's characteristic volume
pc:	Critical Pressure
tb:	Normal Boiling Point Temperature
tc:	Critical Temperature
tf:	Normal melting (fusion) point
vc:	Critical Volume

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