Thiazole, 4,5-dihydro-2-methyl-

Other names:	2-Thiazoline, 2-methyl-
	2-Methyl-«delta»2-thiazoline
	2-Methyl-2-thiazoline
	2-Methylthiazoline
	4,5-Dihydro-2-methylthiazole
Inchi:	InChI=1S/C4H7NS/c1-4-5-2-3-6-4/h2-3H2,1H3
InchiKey:	JUIQOABNSLTJSW-UHFFFAOYSA-N
Formula:	C4H7NS
SMILES:	CC1=NCCS1
Mol. weight [g/mol]:	101.17
CAS:	2346-00-1

Physical Properties

Property code	Value	Unit	Source
gf	204.03	kJ/mol	Joback Method
hf	117.47	kJ/mol	Joback Method
hfus	8.61	kJ/mol	Joback Method
hvap	38.04	kJ/mol	Joback Method
log10ws	-0.93		Crippen Method
logp	1.152		Crippen Method
mcvol	78.390	ml/mol	McGowan Method
pc	5304.68	kPa	Joback Method
rinpol	859.00		NIST Webbook
rinpol	880.00		NIST Webbook
rinpol	880.00		NIST Webbook
rinpol	883.00		NIST Webbook
rinpol	876.00		NIST Webbook
rinpol	876.00		NIST Webbook
rinpol	856.00		NIST Webbook
ripol	1312.00		NIST Webbook
ripol	1303.00		NIST Webbook
ripol	1299.00		NIST Webbook
ripol	1292.00		NIST Webbook
tb	418.20	K	NIST Webbook
tc	653.62	K	Joback Method
tf	318.25	K	Joback Method
vc	0.282	m3/kmol	Joback Method

Temperature Dependent Properties

Property code	Value	Unit	Temperature [K]	Source
cpg	141.82	J/mol×K	416.54	Joback Method
cpg	152.99	J/mol×K	456.05	Joback Method
cpg	163.53	J/mol×K	495.57	Joback Method
cpg	173.48	J/mol×K	535.08	Joback Method
cpg	182.82	J/mol×K	574.59	Joback Method
cpg	191.59	J/mol×K	614.10	Joback Method
cpg	199.78	J/mol×K	653.62	Joback Method

Sources

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=C2346001&Units=SI
Crippen Method:	http://pubs.acs.org/doi/abs/10.1021/ci990307l
Crippen Method:	https://www.chemeo.com/doc/models/crippen_log10ws

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
hvap:	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
rinpol:	Non-polar retention indices
ripol:	Polar retention indices
tb:	Normal Boiling Point Temperature
tc:	Critical Temperature

tf: Normal melting (fusion) point

vc: Critical Volume