

Mintsulfide

Other names:	Mint sulphide Mintsulfite
Inchi:	InChI=1S/C15H24S/c1-9(2)11-8-12-15(4)7-5-6-10(3)14(16-12)13(11)15/h9,11-14H,3,5-8
InchiKey:	ALHAUSWZZFZREA-CQYKSGMSSA-N
Formula:	C15H24S
SMILES:	<chem>C=C1CCCC2(C)C3CC(C(C)C)C2C1S3</chem>
Mol. weight [g/mol]:	236.42

Physical Properties

Property code	Value	Unit	Source
gf	303.06	kJ/mol	Joback Method
hf	-48.07	kJ/mol	Joback Method
hfus	19.63	kJ/mol	Joback Method
hvap	52.88	kJ/mol	Joback Method
log10ws	-4.78		Crippen Method
logp	4.509		Crippen Method
mcvol	201.680	ml/mol	McGowan Method
pc	2032.72	kPa	Joback Method
rinpol	1718.00		NIST Webbook
rinpol	1750.00		NIST Webbook
rinpol	1742.00		NIST Webbook
rinpol	1750.00		NIST Webbook
rinpol	1738.00		NIST Webbook
rinpol	1739.00		NIST Webbook
rinpol	1724.00		NIST Webbook
rinpol	1743.00		NIST Webbook
rinpol	1777.00		NIST Webbook
rinpol	1750.00		NIST Webbook
rinpol	1738.00		NIST Webbook
rinpol	1750.00		NIST Webbook
rinpol	1747.00		NIST Webbook
rinpol	1741.00		NIST Webbook
rinpol	1741.00		NIST Webbook
rinpol	1742.00		NIST Webbook
rinpol	1730.00		NIST Webbook
rinpol	1720.00		NIST Webbook
rinpol	1722.00		NIST Webbook

ripol	1744.00		NIST Webbook
ripol	2192.00		NIST Webbook
ripol	2186.00		NIST Webbook
ripol	2186.00		NIST Webbook
ripol	2186.00		NIST Webbook
ripol	2186.00		NIST Webbook
tb	608.81	K	Joback Method
tc	839.95	K	Joback Method
tf	403.14	K	Joback Method
vc	0.750	m ³ /kmol	Joback Method

Temperature Dependent Properties

Property code	Value	Unit	Temperature [K]	Source
cpg	559.71	J/mol×K	608.81	Joback Method
cpg	582.66	J/mol×K	647.33	Joback Method
cpg	604.14	J/mol×K	685.86	Joback Method
cpg	624.36	J/mol×K	724.38	Joback Method
cpg	643.55	J/mol×K	762.90	Joback Method
cpg	661.91	J/mol×K	801.43	Joback Method
cpg	679.65	J/mol×K	839.95	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=R44928&Units=SI
Crippen Method:	http://pubs.acs.org/doi/abs/10.1021/ci9903071

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
log₁₀w_s:	Log ₁₀ of Water solubility in mol/l
log_p:	Octanol/Water partition coefficient
mc_{vol}:	McGowan's characteristic volume
p_c:	Critical Pressure
ri_{npol}:	Non-polar retention indices
ri_{pol}:	Polar retention indices
tb:	Normal Boiling Point Temperature
tc:	Critical Temperature
tf:	Normal melting (fusion) point
vc:	Critical Volume

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