Cyclopropane, trimethyl(2-methyl-1-propenylidene)-

Other names: Propene, 2-methyl-1-(trimethylcyclopropylidene)-
Inchi: InChI=1S/C10H16/c1-7(2)6-9-8(3)10(9,4)5/h8H,1-5H3
InchiKey: CRZLECOBVHRLLB-UHFFFAOYSA-N
Formula: C10H16
SMILES: CC(C)=C=C1C(C)C1(C)C
Mol. weight [g/mol]: 136.23
CAS: 14803-30-6

Physical Properties

Property code	Value	Unit	Source
gf	246.06	kJ/mol	Joback Method
hf	46.99	kJ/mol	Joback Method
hfus	15.71	kJ/mol	Joback Method
hvap	37.61	kJ/mol	Joback Method
ie	7.57	eV	NIST Webbook
log10ws	-3.15		Crippen Method
logp	3.154		Crippen Method
mcvol	132.300	ml/mol	McGowan Method
pc	2741.15	kPa	Joback Method
tb	440.30	K	Joback Method
tc	645.49	K	Joback Method
tf	242.97	K	Joback Method
vc	0.513	m3/kmol	Joback Method

Temperature Dependent Properties

Property code	Value	Unit	Temperature [K]	Source
cpg	277.37	J/mol×K	440.30	Joback Method
cpg	293.07	J/mol×K	474.50	Joback Method
cpg	307.75	J/mol×K	508.70	Joback Method
cpg	321.49	J/mol×K	542.90	Joback Method
cpg	334.42	J/mol×K	577.09	Joback Method
cpg	346.61	J/mol×K	611.29	Joback Method
cpg	358.18	J/mol×K	645.49	Joback Method

Sources

McGowan Method:	http://link.springer.com/article/10.1007/BF02311772
NIST Webbook:	http://webbook.nist.gov/cgi/cbook.cgi?ID=C14803306&Units=SI
Crippen Method:	http://pubs.acs.org/doi/abs/10.1021/ci990307l
Crippen Method:	https://www.chemeo.com/doc/models/crippen_log10ws
Joback Method:	https://en.wikipedia.org/wiki/Joback_method

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
ie:	Ionization energy
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