Cyclopropane, 1,1-dimethyl-2-pentyl-

Other names: 1,1-Dimethyl-2-pentylcyclopropane
Inchi: InChI=1S/C10H20/c1-4-5-6-7-9-8-10(9,2)3/h9H,4-8H2,1-3H3
InchiKey: OGWQGGKDZIXSLA-UHFFFAOYSA-N
Formula: C10H20
SMILES: CCCCCC1CC1(C)C
Mol. weight [g/mol]: 140.27
CAS: 62167-97-9

Physical Properties

Property code	Value	Unit	Source
gf	80.87	kJ/mol	Joback Method
hf	-182.03	kJ/mol	Joback Method
hfus	14.56	kJ/mol	Joback Method
hvap	36.31	kJ/mol	Joback Method
log10ws	-3.42		Crippen Method
logp	3.613		Crippen Method
mcvol	140.900	ml/mol	McGowan Method
pc	2412.37	kPa	Joback Method
rinpol	919.60		NIST Webbook
rinpol	923.38		NIST Webbook
rinpol	922.28		NIST Webbook
rinpol	922.28		NIST Webbook
rinpol	920.71		NIST Webbook
rinpol	920.00		NIST Webbook
tb	430.51	K	Joback Method
tc	612.89	K	Joback Method
tf	240.06	K	Joback Method
vc	0.549	m3/kmol	Joback Method

Temperature Dependent Properties

Property code	Value	Unit	Temperature [K]	Source
cpg	301.75	J/mol×K	430.51	Joback Method
cpg	319.05	J/mol×K	460.91	Joback Method

cpg	335.32	J/mol×K	491.30	Joback Method
cpg	350.64	J/mol×K	521.70	Joback Method
cpg	365.08	J/mol×K	552.10	Joback Method
cpg	378.74	J/mol×K	582.49	Joback Method
cpg	391.68	J/mol×K	612.89	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=C62167979&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
tb:	Normal Boiling Point Temperature
tc:	Critical Temperature
tf:	Normal melting (fusion) point
vc:	Critical Volume