6-Tridecene, 7-methyl-

Other names: 7-Methyl-6-tridecene
Inchi: InChI=1S/C14H28/c1-4-6-8-10-12-14(3)13-11-9-7-5-2/h12H,4-11,13H2,1-3H3/b14-12+
InchiKey: OWBREJMGOOUEDR-WYMLVPIESA-N
Formula: C14H28
SMILES: CCCCCC=C(C)CCCCCC
Mol. weight [g/mol]: 196.37
CAS: 24949-42-6

Physical Properties

Property code	Value	Unit	Source
gf	138.67	kJ/mol	Joback Method
hf	-224.86	kJ/mol	Joback Method
hfus	30.91	kJ/mol	Joback Method
hvap	46.80	kJ/mol	Joback Method
log10ws	-5.54		Crippen Method
logp	5.483		Crippen Method
mcvol	203.820	ml/mol	McGowan Method
pc	1593.62	kPa	Joback Method
tb	523.76	K	Joback Method
tc	692.31	K	Joback Method
tf	228.50	K	Joback Method
vc	0.800	m3/kmol	Joback Method

Temperature Dependent Properties

Property code	Value	Unit	Temperature [K]	Source
cpg	488.72	J/mol×K	523.76	Joback Method
cpg	506.84	J/mol×K	551.85	Joback Method
cpg	524.20	J/mol×K	579.94	Joback Method
cpg	540.82	J/mol×K	608.04	Joback Method
cpg	556.72	J/mol×K	636.13	Joback Method
cpg	571.95	J/mol×K	664.22	Joback Method
cpg	586.51	J/mol×K	692.31	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=C24949426&Units=SI
Crippen Method:	http://pubs.acs.org/doi/abs/10.1021/ci990307l

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
tb:	Normal Boiling Point Temperature
tc:	Critical Temperature
tf:	Normal melting (fusion) point
vc:	Critical Volume