(5Z)-2,6-dimethyl-5,7-octadiene-2,3-diol

Inchi: InChI=1S/C10H18O2/c1-5-8(2)6-7-9(11)10(3,4)12/h5-6,9,11-12H,1,7H2,2-4H3/b8-6-
InchiKey: BTHAWHOTHGQIKC-VURMDHGXSA-N
Formula: C10H18O2
SMILES: C=CC(C)=CCC(O)C(C)(C)O
Mol. weight [g/mol]: 170.25

Physical Properties

Property code	Value	Unit	Source
gf	-80.41	kJ/mol	Joback Method
hf	-335.36	kJ/mol	Joback Method
hfus	16.51	kJ/mol	Joback Method
hvap	68.90	kJ/mol	Joback Method
log10ws	-2.47		Crippen Method
logp	1.641		Crippen Method
mcvol	154.900	ml/mol	McGowan Method
pc	2865.80	kPa	Joback Method
ripol	2101.00		NIST Webbook
ripol	2101.00		NIST Webbook
tb	609.61	K	Joback Method
tc	785.25	K	Joback Method
tf	290.72	K	Joback Method
vc	0.579	m3/kmol	Joback Method

Temperature Dependent Properties

Property code	Value	Unit	Temperature [K]	Source
cpg	403.19	J/mol×K	609.61	Joback Method
cpg	414.43	J/mol×K	638.88	Joback Method
cpg	425.05	J/mol×K	668.16	Joback Method
cpg	435.11	J/mol×K	697.43	Joback Method
cpg	444.63	J/mol×K	726.70	Joback Method
cpg	453.67	J/mol×K	755.98	Joback Method
cpg	462.25	J/mol×K	785.25	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=R334502&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
ripol:	Polar retention indices
tb:	Normal Boiling Point Temperature
tc:	Critical Temperature
tf:	Normal melting (fusion) point
vc:	Critical Volume