dipropylene glycol, # 4

Inchi: InChI=1S/C6H14O3/c1-5(8)4-9-6(2)3-7/h5-8H,3-4H2,1-2H3
InchiKey: DUFKCOQISQKSAV-UHFFFAOYSA-N
Formula: C6H14O3
SMILES: CC(O)COC(C)CO
Mol. weight [g/mol]: 134.17

Physical Properties

Property code	Value	Unit	Source
gf	-383.88	kJ/mol	Joback Method
hf	-614.41	kJ/mol	Joback Method
hfus	13.61	kJ/mol	Joback Method
hvap	63.94	kJ/mol	Joback Method
log10ws	-0.17		Crippen Method
logp	-0.235		Crippen Method
mcvol	113.010	ml/mol	McGowan Method
pc	3853.09	kPa	Joback Method
rinpol	1044.00		NIST Webbook
rinpol	1044.00		NIST Webbook
ripol	1848.00		NIST Webbook
ripol	1848.00		NIST Webbook
tb	542.58	K	Joback Method
tc	705.59	K	Joback Method
tf	271.25	K	Joback Method
vc	0.415	m3/kmol	Joback Method

Temperature Dependent Properties

Property code	Value	Unit	Temperature [K]	Source
cpg	278.16	J/mol×K	542.58	Joback Method
cpg	286.98	J/mol×K	569.75	Joback Method
cpg	295.49	J/mol×K	596.92	Joback Method
cpg	303.67	J/mol×K	624.08	Joback Method
cpg	311.54	J/mol×K	651.25	Joback Method
cpg	319.10	J/mol×K	678.42	Joback Method

cpg	326.35	J/mol×K	705.59	Joback Method
dvisc	0.1960058	Pa×s	271.25	Joback Method
dvisc	0.0181938	Pa×s	316.47	Joback Method
dvisc	0.0030600	Pa×s	361.69	Joback Method
dvisc	0.0007649	Pa×s	406.91	Joback Method
dvisc	0.0002523	Pa×s	452.14	Joback Method
dvisc	0.0001018	Pa×s	497.36	Joback Method
dvisc	0.0000478	Pa×s	542.58	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=R410156&Units=SI
Crippen Method:	http://pubs.acs.org/doi/abs/10.1021/ci990307l

Legend

cpg:	Ideal gas heat capacity
dvisc:	Dynamic viscosity
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
ripol:	Polar retention indices
tb:	Normal Boiling Point Temperature
tc:	Critical Temperature
tf:	Normal melting (fusion) point
vc:	Critical Volume

Latest version available from:
https://www.chemeo.com/cid/92-511-2/dipropylene-glycol-4.pdf

Generated by Cheméo on 2024-10-12 09:13:39.331380566 +0000 UTC m=+3305281.968349815.

Cheméo (https://www.chemeo.com) is the biggest free database of chemical and physical data for the process industry.