1-Methoxy-2,28-dimethylhentriacontane

Inchi: InChI=1S/C34H70O/c1-5-29-33(2)30-27-25-23-21-19-17-15-13-11-9-7-6-8-10-12-14-16-1
InchiKey: DEKHPSHONFJQNY-UHFFFAOYSA-N
Formula: C34H70O
SMILES: CCCC(C)CCCCCCCCCCCCCCCCCCCCCCCCCCC(C)COC
Mol. weight [g/mol]: 494.92

Physical Properties

Property code	Value	Unit	Source
gf	125.52	kJ/mol	Joback Method
hf	-887.87	kJ/mol	Joback Method
hfus	77.96	kJ/mol	Joback Method
hvap	92.91	kJ/mol	Joback Method
log10ws	-12.66		Crippen Method
logp	12.458		Crippen Method
mcvol	495.790	ml/mol	McGowan Method
pc	497.58	kPa	Joback Method
rinpol	3430.00		NIST Webbook
tb	998.86	K	Joback Method
tc	1258.82	K	Joback Method
tf	465.17	K	Joback Method
vc	1.946	m3/kmol	Joback Method

Temperature Dependent Properties

Property code	Value	Unit	Temperature [K]	Source
cpg	1792.14	J/mol×K	998.86	Joback Method
cpg	1925.72	J/mol×K	1215.49	Joback Method
cpg	1903.34	J/mol×K	1172.17	Joback Method
cpg	1878.96	J/mol×K	1128.84	Joback Method
cpg	1852.41	J/mol×K	1085.51	Joback Method
cpg	1823.52	J/mol×K	1042.19	Joback Method
cpg	1946.26	J/mol×K	1258.82	Joback Method
dvisc	0.0000079	Pa×s	998.86	Joback Method
dvisc	0.0000114	Pa×s	909.91	Joback Method

dvisc	0.0000178	Pa×s	820.96	Joback Method
dvisc	0.0000307	Pa×s	732.01	Joback Method
dvisc	0.0000620	Pa×s	643.07	Joback Method
dvisc	0.0001564	Pa×s	554.12	Joback Method
dvisc	0.0005627	Pa×s	465.17	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=R547203&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
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
tb:	Normal Boiling Point Temperature
tc:	Critical Temperature
tf:	Normal melting (fusion) point
vc:	Critical Volume