Ethylene glycol, 2-methoxybenzoate

Inchi: InChI=1S/C10H12O4/c1-13-9-5-3-2-4-8(9)10(12)14-7-6-11/h2-5,11H,6-7H2,1H3
InchiKey: PSJOKJLYYQYIKV-UHFFFAOYSA-N
Formula: C10H12O4
SMILES: COc1ccccc1C(=O)OCCO
Mol. weight [g/mol]: 196.20

Physical Properties

Property code	Value	Unit	Source
gf	-339.64	kJ/mol	Joback Method
hf	-553.92	kJ/mol	Joback Method
hfus	23.37	kJ/mol	Joback Method
hvap	69.04	kJ/mol	Joback Method
log10ws	-1.52		Crippen Method
logp	0.844		Crippen Method
mcvol	147.180	ml/mol	McGowan Method
pc	3299.15	kPa	Joback Method
rinpol	1647.00		NIST Webbook
tb	650.75	K	Joback Method
tc	848.60	K	Joback Method
tf	396.61	K	Joback Method
vc	0.548	m3/kmol	Joback Method

Temperature Dependent Properties

Property code	Value	Unit	Temperature [K]	Source
cpg	373.95	J/mol×K	650.75	Joback Method
cpg	422.16	J/mol×K	815.62	Joback Method
cpg	413.71	J/mol×K	782.65	Joback Method
cpg	404.67	J/mol×K	749.67	Joback Method
cpg	395.03	J/mol×K	716.70	Joback Method
cpg	384.79	J/mol×K	683.72	Joback Method
cpg	430.01	J/mol×K	848.60	Joback Method
dvisc	0.0000497	Pa×s	650.75	Joback Method
dvisc	0.0000718	Pa×s	608.39	Joback Method

dvisc	0.0001097	Pa×s	566.04	Joback Method
dvisc	0.0001794	Pa×s	523.68	Joback Method
dvisc	0.0003200	Pa×s	481.32	Joback Method
dvisc	0.0006382	Pa×s	438.97	Joback Method
dvisc	0.0014754	Pa×s	396.61	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=U374701&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
tb:	Normal Boiling Point Temperature
tc:	Critical Temperature
tf:	Normal melting (fusion) point
vc:	Critical Volume