(Z)-5-(Pentadec-8-en-1-yl)benzene-1,3-diol

Inchi: InChI=1S/C21H34O2/c1-2-3-4-5-6-7-8-9-10-11-12-13-14-15-19-16-20(22)18-21(23)17-19
InchiKey: TUGAUFMQYWZJAB-FPLPWBNLSA-N
Formula: C21H34O2
SMILES: CCCCCCC=CCCCCCCCc1cc(O)cc(O)c1
Mol. weight [g/mol]: 318.49
CAS: 22910-86-7

Physical Properties

Property code	Value	Unit	Source
gf	9.33	kJ/mol	Joback Method
hf	-477.64	kJ/mol	Joback Method
hfus	55.95	kJ/mol	Joback Method
hvap	90.60	kJ/mol	Joback Method
log10ws	-6.67		Crippen Method
logp	6.508		Crippen Method
mcvol	290.430	ml/mol	McGowan Method
pc	1534.26	kPa	Joback Method
rinpol	2788.30		NIST Webbook
rinpol	2788.30		NIST Webbook
tb	871.96	K	Joback Method
tc	1080.84	K	Joback Method
tf	571.21	K	Joback Method
vc	1.016	m3/kmol	Joback Method

Temperature Dependent Properties

Property code	Value	Unit	Temperature [K]	Source
cpg	934.32	J/mol×K	871.96	Joback Method
cpg	952.22	J/mol×K	906.77	Joback Method
cpg	969.70	J/mol×K	941.59	Joback Method
cpg	986.89	J/mol×K	976.40	Joback Method
cpg	1003.96	J/mol×K	1011.21	Joback Method
cpg	1021.05	J/mol×K	1046.02	Joback Method
cpg	1038.29	J/mol×K	1080.84	Joback Method

dvisc	0.0000136	Pa×s	571.21	Joback Method
dvisc	0.0000048	Pa×s	621.34	Joback Method
dvisc	0.0000020	Pa×s	671.46	Joback Method
dvisc	0.0000009	Pa×s	721.59	Joback Method
dvisc	0.0000005	Pa×s	771.71	Joback Method
dvisc	0.0000003	Pa×s	821.84	Joback Method
dvisc	0.0000002	Pa×s	871.96	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=C22910867&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