Benzenemethanol, 4-(1,1-dimethylethyl)-

Other names:	p-tert-Butylbenzyl alcohol
	4-tert-Butylbenzyl alcohol
	4(t-Butyl)benzylalcohol
Inchi:	InChI=1S/C11H16O/c1-11(2,3)10-6-4-9(8-12)5-7-10/h4-7,12H,8H2,1-3H3
InchiKey:	FVEINXLJOJPHLH-UHFFFAOYSA-N
Formula:	C11H16O
SMILES:	CC(C)(C)c1ccc(CO)cc1
Mol. weight [g/mol]:	164.24
CAS:	877-65-6

Physical Properties

Property code	Value	Unit	Source
gf	10.54	kJ/mol	Joback Method
hf	-206.29	kJ/mol	Joback Method
hfus	14.57	kJ/mol	Joback Method
hvap	58.40	kJ/mol	Joback Method
log10ws	-2.93		Crippen Method
logp	2.476		Crippen Method
mcvol	147.960	ml/mol	McGowan Method
pc	2931.34	kPa	Joback Method
rinpol	1336.00		NIST Webbook
tb	571.69	K	Joback Method
tc	773.69	K	Joback Method
tf	315.91	K	Joback Method
vc	0.551	m3/kmol	Joback Method

Temperature Dependent Properties

Property code	Value	Unit	Temperature [K]	Source
cpg	361.53	J/mol×K	571.69	Joback Method
cpg	375.27	J/mol×K	605.36	Joback Method
cpg	388.16	J/mol×K	639.02	Joback Method
cpg	400.25	J/mol×K	672.69	Joback Method
cpg	411.58	J/mol×K	706.36	Joback Method

cpg	422.21	J/mol×K	740.03	Joback Method
cpg	432.17	J/mol×K	773.69	Joback Method
dvisc	0.0083872	Pa×s	315.91	Joback Method
dvisc	0.0024328	Pa×s	358.54	Joback Method
dvisc	0.0009179	Pa×s	401.17	Joback Method
dvisc	0.0004177	Pa×s	443.80	Joback Method
dvisc	0.0002182	Pa×s	486.43	Joback Method
dvisc	0.0001265	Pa×s	529.06	Joback Method
dvisc	0.0000796	Pa×s	571.69	Joback Method

Pressure Dependent Properties

Property code	Value	Unit	Pressure [kPa]	Source
tbrp	413.20	K	2.70	NIST Webbook

Sources

Crippen Method: http://pubs.acs.org/doi/abs/10.1021/ci990307l
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=C877656&Units=SI

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
tbrp:	Boiling point at reduced pressure
tc:	Critical Temperature
tf:	Normal melting (fusion) point
vc:	Critical Volume