p-Ethylbenzylchloride

Other names:	1-(Chloromethyl)-4-ethylbenzene
	4-(Chloromethyl)-1-ethylbenzene
	4-Ethylbenzyl chloride
	Benzene, 1-(chloromethyl)-4-ethyl-
Inchi:	InChI=1S/C9H11Cl/c1-2-8-3-5-9(7-10)6-4-8/h3-6H,2,7H2,1H3
InchiKey:	DUBCVXSYZVTCOC-UHFFFAOYSA-N
Formula:	C9H11Cl
SMILES:	CCc1ccc(CCl)cc1
Mol. weight [g/mol]:	154.64
CAS:	1467-05-6

Physical Properties

Property code	Value	Unit	Source
gf	115.75	kJ/mol	Joback Method
hf	-19.77	kJ/mol	Joback Method
hfus	16.92	kJ/mol	Joback Method
hvap	42.95	kJ/mol	Joback Method
log10ws	-3.31		Crippen Method
logp	2.988		Crippen Method
mcvol	126.150	ml/mol	McGowan Method
pc	3076.16	kPa	Joback Method
rinpol	1184.00		NIST Webbook
rinpol	1184.00		NIST Webbook
tb	474.41	K	Joback Method
tc	689.41	K	Joback Method
tf	260.05	K	Joback Method
vc	0.480	m3/kmol	Joback Method

Temperature Dependent Properties

Property code	Value	Unit	Temperature [K]	Source
cpg	242.90	J/mol×K	474.41	Joback Method
cpg	300.36	J/mol×K	653.58	Joback Method
cpg	290.24	J/mol×K	617.74	Joback Method

cpg	279.46	J/mol×K	581.91	Joback Method
cpg	267.99	J/mol×K	546.08	Joback Method
cpg	255.82	J/mol×K	510.24	Joback Method
cpg	309.86	J/mol×K	689.41	Joback Method
dvisc	0.0002456	Pa×s	474.41	Joback Method
dvisc	0.0003076	Pa×s	438.68	Joback Method
dvisc	0.0004010	Pa×s	402.96	Joback Method
dvisc	0.0005504	Pa×s	367.23	Joback Method
dvisc	0.0008087	Pa×s	331.50	Joback Method
dvisc	0.0013040	Pa×s	295.78	Joback Method
dvisc	0.0023979	Pa×s	260.05	Joback Method

Correlations

Information	Value
Property code	pvap
Equation	ln(Pvp) = A + B/(T + C)
Coeff. A	1.38272e+01
Coeff. B	-3.79701e+03
Coeff. C	-7.51370e+01
Temperature range (K), min.	355.57
Temperature range (K), max.	521.02

Sources

NIST Webbook: http://webbook.nist.gov/cgi/cbook.cgi?ID=C1467056&Units=SI

The Yaws Handbook of Vapor Pressure: https://www.sciencedirect.com/book/9780128029992/the-yaws-handbook-of-vapor-pressure

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

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
pvap:	Vapor pressure
rinpol:	Non-polar retention indices
tb:	Normal Boiling Point Temperature
tc:	Critical Temperature
tf:	Normal melting (fusion) point
vc:	Critical Volume