2-(1-Naphthyl)ethyl bromide

Other names: 1-(2-Bromoethyl)naphthalene
2-(«alpha»-Naphthyl)ethyl bromide
Inchi: InChI=1S/C12H11Br/c13-9-8-11-6-3-5-10-4-1-2-7-12(10)11/h1-7H,8-9H2
InchiKey: GPHCPUFIWQJZOI-UHFFFAOYSA-N
Formula: C12H11Br
SMILES: BrCCc1cccc2ccccc12
Mol. weight [g/mol]: 235.12
CAS: 13686-49-2

Physical Properties

Property code	Value	Unit	Source
gf	273.91	kJ/mol	Joback Method
hf	151.45	kJ/mol	Joback Method
hfus	22.79	kJ/mol	Joback Method
hvap	53.32	kJ/mol	Joback Method
log10ws	-4.51		Crippen Method
logp	3.777		Crippen Method
mcvol	154.220	ml/mol	McGowan Method
pc	3302.95	kPa	Joback Method
tb	590.76	K	Joback Method
tc	835.38	K	Joback Method
tf	356.44	K	Joback Method
vc	0.584	m3/kmol	Joback Method

Temperature Dependent Properties

Property code	Value	Unit	Temperature [K]	Source
cpg	334.82	J/mol×K	590.76	Joback Method
cpg	348.59	J/mol×K	631.53	Joback Method
cpg	361.26	J/mol×K	672.30	Joback Method
cpg	372.92	J/mol×K	713.07	Joback Method
cpg	383.68	J/mol×K	753.84	Joback Method
cpg	393.63	J/mol×K	794.61	Joback Method
cpg	402.88	J/mol×K	835.38	Joback Method

dvisc	0.0016602	Pa×s	356.44	Joback Method
dvisc	0.0011234	Pa×s	395.49	Joback Method
dvisc	0.0008155	Pa×s	434.55	Joback Method
dvisc	0.0006241	Pa×s	473.60	Joback Method
dvisc	0.0004975	Pa×s	512.65	Joback Method
dvisc	0.0004095	Pa×s	551.71	Joback Method
dvisc	0.0003458	Pa×s	590.76	Joback Method

Pressure Dependent Properties

Property code	Value	Unit	Pressure [kPa]	Source
tbrp	415.50 ± 2.50	K	0.07	NIST Webbook

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=C13686492&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
tb: Normal Boiling Point Temperature
tbrp: Boiling point at reduced pressure

tc:	Critical Temperature
tf:	Normal melting (fusion) point
vc:	Critical Volume