Cyclohexylamine, 2-tert-butyl

Inchi: InChI=1S/C10H21N/c1-10(2,3)8-6-4-5-7-9(8)11/h8-9H,4-7,11H2,1-3H3
InchiKey: GEYTUFUSXAMSQK-UHFFFAOYSA-N
Formula: C10H21N
SMILES: CC(C)(C)C1CCCCC1N
Mol. weight [g/mol]: 155.28
CAS: 35735-41-2

Physical Properties

Property code	Value	Unit	Source
gf	119.35	kJ/mol	Joback Method
hf	-190.71	kJ/mol	Joback Method
hfus	12.35	kJ/mol	Joback Method
hvap	47.32	kJ/mol	Joback Method
log10ws	-2.97		Crippen Method
logp	2.550		Crippen Method
mcvol	150.880	ml/mol	McGowan Method
pc	2684.64	kPa	Joback Method
tb	512.38	K	Joback Method
tc	734.15	K	Joback Method
tf	291.28	K	Joback Method
vc	0.545	m3/kmol	Joback Method

Temperature Dependent Properties

Property code	Value	Unit	Temperature [K]	Source
cpg	373.41	J/mol×K	512.38	Joback Method
cpg	394.65	J/mol×K	549.34	Joback Method
cpg	414.59	J/mol×K	586.30	Joback Method
cpg	433.28	J/mol×K	623.27	Joback Method
cpg	450.77	J/mol×K	660.23	Joback Method
cpg	467.11	J/mol×K	697.19	Joback Method
cpg	482.35	J/mol×K	734.15	Joback Method

Sources

NIST Webbook:	http://webbook.nist.gov/cgi/cbook.cgi?ID=C35735412&Units=SI
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
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
tc:	Critical Temperature
tf:	Normal melting (fusion) point
vc:	Critical Volume