

1,4-Cyclohexanedicarboxamide

Inchi:	InChI=1S/C8H14N2O2/c9-7(11)5-1-2-6(4-3-5)8(10)12/h5-6H,1-4H2,(H2,9,11)(H2,10,12)/
InchiKey:	ZWUNKULTLYLLTH-IZLXSQMJSA-N
Formula:	C8H14N2O2
SMILES:	NC(=O)C1CCCC(C(N)=O)CC1
Mol. weight [g/mol]:	170.21
CAS:	20101-86-4

Physical Properties

Property code	Value	Unit	Source
gf	-91.72	kJ/mol	Joback Method
hf	-332.05	kJ/mol	Joback Method
hfus	22.97	kJ/mol	Joback Method
hvap	68.30	kJ/mol	Joback Method
log10ws	-1.00		Crippen Method
logp	-0.237		Crippen Method
mcvol	135.820	ml/mol	McGowan Method
pc	4036.37	kPa	Joback Method
tb	650.12	K	Joback Method
tc	889.77	K	Joback Method
tf	449.44	K	Joback Method
vc	0.485	m3/kmol	Joback Method

Temperature Dependent Properties

Property code	Value	Unit	Temperature [K]	Source
cpg	379.91	J/molxK	650.12	Joback Method
cpg	394.64	J/molxK	690.06	Joback Method
cpg	408.27	J/molxK	730.00	Joback Method
cpg	420.84	J/molxK	769.94	Joback Method
cpg	432.36	J/molxK	809.88	Joback Method
cpg	442.87	J/molxK	849.83	Joback Method
cpg	452.40	J/molxK	889.77	Joback Method

Sources

NIST Webbook:	http://webbook.nist.gov/cgi/cbook.cgi?ID=C20101864&Units=SI
Crippen Method:	http://pubs.acs.org/doi/abs/10.1021/ci9903071
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
mccvol:	McGowan's characteristic volume
pc:	Critical Pressure
tb:	Normal Boiling Point Temperature
tc:	Critical Temperature
tf:	Normal melting (fusion) point
vc:	Critical Volume

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