

Carbamic acid, hydroxy-, ethyl ester

Other names:	Ethyl N-hydroxycarbamate Hydroxycarbamic acid ethyl ester Hydroxyurethane N-Carbethoxyhydroxylamine N-Hydroxyurethane NSC-71045 NSC-83629 SQ 16819 N-Hydroxy ethyl carbamate N-Hydroxyurethan NHU Ethylester kyseliny N-hydroxykarbaminove Carbamic acid, N-hydroxy-, ethyl ester ethyl hydroxycarbamate
Inchi:	InChI=1S/C3H7NO3/c1-2-7-3(5)4-6/h6H,2H2,1H3,(H,4,5)
InchiKey:	VGEWEGHHYWGXGG-UHFFFAOYSA-N
Formula:	C3H7NO3
SMILES:	CCOC(=O)NO
Mol. weight [g/mol]:	105.09
CAS:	589-41-3

Physical Properties

Property code	Value	Unit	Source
gf	-306.97	kJ/mol	Joback Method
hf	-448.81	kJ/mol	Joback Method
hfus	15.50	kJ/mol	Joback Method
hvap	54.54	kJ/mol	Joback Method
log10ws	0.24		Crippen Method
logp	0.122		Crippen Method
mvol	76.420	ml/mol	McGowan Method
pc	5446.55	kPa	Joback Method
tb	486.68	K	Joback Method
tc	664.80	K	Joback Method
tf	309.21	K	Joback Method
vc	0.281	m ³ /kmol	Joback Method

Temperature Dependent Properties

Property code	Value	Unit	Temperature [K]	Source
cpg	163.71	J/mol×K	486.68	Joback Method
cpg	169.78	J/mol×K	516.37	Joback Method
cpg	175.64	J/mol×K	546.05	Joback Method
cpg	181.29	J/mol×K	575.74	Joback Method
cpg	186.73	J/mol×K	605.43	Joback Method
cpg	191.95	J/mol×K	635.12	Joback Method
cpg	196.94	J/mol×K	664.80	Joback Method

Pressure Dependent Properties

Property code	Value	Unit	Pressure [kPa]	Source
tbrp	387.70	K	0.40	NIST Webbook

Sources

NIST Webbook:	http://webbook.nist.gov/cgi/cbook.cgi?ID=C589413&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
tbrp:	Boiling point at reduced pressure
tc:	Critical Temperature
tf:	Normal melting (fusion) point
vc:	Critical Volume

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