Dichloroacetamide, N,N-dinonyl-

Inchi: InChI=1S/C20H39Cl2NO/c1-3-5-7-9-11-13-15-17-23(20(24)19(21)22)18-16-14-12-10-8-6
InchiKey: HRQKKFLEURNPRM-UHFFFAOYSA-N
Formula: C20H39Cl2NO
SMILES: CCCCCCCCCN(CCCCCCCCC)C(=O)C(Cl)Cl
Mol. weight [g/mol]: 380.44

Physical Properties

Property code	Value	Unit	Source
gf	73.08	kJ/mol	Joback Method
hf	-537.94	kJ/mol	Joback Method
hfus	57.05	kJ/mol	Joback Method
hvap	77.28	kJ/mol	Joback Method
log10ws	-7.45		Crippen Method
logp	7.120		Crippen Method
mcvol	328.690	ml/mol	McGowan Method
pc	1012.30	kPa	Joback Method
rinpol	2488.00		NIST Webbook
tb	797.73	K	Joback Method
tc	980.91	K	Joback Method
tf	442.40	K	Joback Method
vc	1.272	m3/kmol	Joback Method

Temperature Dependent Properties

Property code	Value	Unit	Temperature [K]	Source
cpg	989.72	J/mol×K	797.73	Joback Method
cpg	1008.20	J/mol×K	828.26	Joback Method
cpg	1025.70	J/mol×K	858.79	Joback Method
cpg	1042.27	J/mol×K	889.32	Joback Method
cpg	1057.96	J/mol×K	919.85	Joback Method
cpg	1072.81	J/mol×K	950.38	Joback Method
cpg	1086.87	J/mol×K	980.91	Joback Method

Sources

McGowan Method:	http://link.springer.com/article/10.1007/BF02311772
NIST Webbook:	http://webbook.nist.gov/cgi/cbook.cgi?ID=U308638&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

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