Glutaric acid, diamide, N,N'-di(2-phenylpropyl)-

Inchi: InChI=1S/C23H30N2O2/c1-18(20-10-5-3-6-11-20)16-24-22(26)14-9-15-23(27)25-17-19(2
InchiKey: ZBQFBYHWYAYFSY-UHFFFAOYSA-N
Formula: C23H30N2O2
SMILES: CC(CNC(=O)CCCC(=O)NCC(C)c1ccccc1)c1ccccc1
Mol. weight [g/mol]: 366.50

Physical Properties

Property code	Value	Unit	Source
gf	283.66	kJ/mol	Joback Method
hf	-173.77	kJ/mol	Joback Method
hfus	49.76	kJ/mol	Joback Method
hvap	96.93	kJ/mol	Joback Method
log10ws	-5.51		Crippen Method
logp	3.996		Crippen Method
mcvol	310.510	ml/mol	McGowan Method
pc	1483.85	kPa	Joback Method
rinpol	3301.00		NIST Webbook
tb	986.20	K	Joback Method
tc	1217.26	K	Joback Method
tf	576.99	K	Joback Method
vc	1.177	m3/kmol	Joback Method

Temperature Dependent Properties

Property code	Value	Unit	Temperature [K]	Source
cpg	1016.53	J/mol×K	986.20	Joback Method
cpg	1030.75	J/mol×K	1024.71	Joback Method
cpg	1043.82	J/mol×K	1063.22	Joback Method
cpg	1055.85	J/mol×K	1101.73	Joback Method
cpg	1066.96	J/mol×K	1140.24	Joback Method
cpg	1077.24	J/mol×K	1178.75	Joback Method
cpg	1086.81	J/mol×K	1217.26	Joback Method

Sources

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
NIST Webbook:	http://webbook.nist.gov/cgi/cbook.cgi?ID=U360833&Units=SI

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