Succinic acid, dodec-2-en-1-yl diphenylmethyl ester

Inchi: InChI=1S/C29H38O4/c1-2-3-4-5-6-7-8-9-10-17-24-32-27(30)22-23-28(31)33-29(25-18-13

InchiKey: FKFITBHKOPIFCK-LICLKQGHSA-N

Formula: C29H38O4

SMILES: CCCCCCCCCC=CCOC(=O)CCC(=O)OC(c1ccccc1)c1ccccc1

Mol. weight [g/mol]: 450.61

Physical Properties

Property code	Value	Unit	Source
gf	28.06	kJ/mol	Joback Method
hf	-546.49	kJ/mol	Joback Method
hfus	61.20	kJ/mol	Joback Method
hvap	102.58	kJ/mol	Joback Method
log10ws	-8.31		Crippen Method
logp	7.340		Crippen Method
mcvol	382.530	ml/mol	McGowan Method
pc	983.93	kPa	Joback Method
rinpol	3340.00		NIST Webbook
rinpol	3340.00		NIST Webbook
tb	1072.58	K	Joback Method
tc	1313.14	K	Joback Method
tf	593.67	K	Joback Method
vc	1.466	m3/kmol	Joback Method

Temperature Dependent Properties

Property code	Value	Unit	Temperature [K]	Source
cpg	1294.79	J/mol×K	1072.58	Joback Method
cpg	1309.97	J/mol×K	1112.67	Joback Method
cpg	1323.78	J/mol×K	1152.77	Joback Method
cpg	1336.33	J/mol×K	1192.86	Joback Method
cpg	1347.74	J/mol×K	1232.96	Joback Method
cpg	1358.12	J/mol×K	1273.05	Joback Method
cpg	1367.59	J/mol×K	1313.14	Joback Method
dvisc	0.0002107	Pa×s	593.67	Joback Method

dvisc	0.0000975	Pa×s	673.49	Joback Method
dvisc	0.0000532	Pa×s	753.31	Joback Method
dvisc	0.0000325	Pa×s	833.12	Joback Method
dvisc	0.0000217	Pa×s	912.94	Joback Method
dvisc	0.0000155	Pa×s	992.76	Joback Method
dvisc	0.0000116	Pa×s	1072.58	Joback Method

Sources

McGowan Method:	http://link.springer.com/article/10.1007/BF02311772
NIST Webbook:	http://webbook.nist.gov/cgi/cbook.cgi?ID=U390175&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
dvisc:	Dynamic viscosity
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