Succinic acid, 2,2,3,3-tetrafluoropropyl 2-fluoroethyl ester

Inchi: InChI=1S/C9H11F5O4/c10-3-4-17-6(15)1-2-7(16)18-5-9(13,14)8(11)12/h8H,1-5H2

InchiKey: GIMDMRYOLCHWJB-UHFFFAOYSA-N

Formula: C9H11F5O4

SMILES: O=C(CCC(=O)OCC(F)(F)C(F)F)OCCF

Mol. weight [g/mol]: 278.17

Physical Properties

Property code	Value	Unit	Source
gf	-1416.59	kJ/mol	Joback Method
hf	-1713.27	kJ/mol	Joback Method
hfus	29.10	kJ/mol	Joback Method
hvap	48.17	kJ/mol	Joback Method
log10ws	-1.80		Crippen Method
logp	1.723		Crippen Method
mcvol	161.400	ml/mol	McGowan Method
pc	2088.84	kPa	Joback Method
rinpol	1291.00		NIST Webbook
rinpol	1291.00		NIST Webbook
tb	550.58	K	Joback Method
tc	708.70	K	Joback Method
tf	325.88	K	Joback Method
vc	0.660	m3/kmol	Joback Method

Temperature Dependent Properties

Property code	Value	Unit	Temperature [K]	Source
cpg	412.94	J/mol×K	550.58	Joback Method
cpg	423.73	J/mol×K	576.93	Joback Method
cpg	434.03	J/mol×K	603.29	Joback Method
cpg	443.85	J/mol×K	629.64	Joback Method
cpg	453.21	J/mol×K	655.99	Joback Method
cpg	462.11	J/mol×K	682.35	Joback Method
cpg	470.56	J/mol×K	708.70	Joback Method

Sources

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=U390879&Units=SI
Crippen Method:	http://pubs.acs.org/doi/abs/10.1021/ci990307l
Crippen Method:	https://www.chemeo.com/doc/models/crippen_log10ws

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