Carbonic acid, tetradecyl vinyl ester

Inchi: InChI=1S/C17H32O3/c1-3-5-6-7-8-9-10-11-12-13-14-15-16-20-17(18)19-4-2/h4H,2-3,5-1
InchiKey: KZGILJTZQWZXQZ-UHFFFAOYSA-N
Formula: C17H32O3
SMILES: C=COC(=O)OCCCCCCCCCCCCCC
Mol. weight [g/mol]: 284.43

Physical Properties

Property code	Value	Unit	Source
gf	-158.82	kJ/mol	Joback Method
hf	-645.80	kJ/mol	Joback Method
hfus	42.48	kJ/mol	Joback Method
hvap	64.33	kJ/mol	Joback Method
log10ws	-6.21		Crippen Method
logp	5.984		Crippen Method
mcvol	259.400	ml/mol	McGowan Method
pc	1294.86	kPa	Joback Method
rinpol	1901.00		NIST Webbook
rinpol	1901.00		NIST Webbook
tb	683.75	K	Joback Method
tc	853.94	K	Joback Method
tf	373.98	K	Joback Method
vc	1.010	m3/kmol	Joback Method

Temperature Dependent Properties

Property code	Value	Unit	Temperature [K]	Source
cpg	739.74	J/mol×K	683.75	Joback Method
cpg	757.39	J/mol×K	712.11	Joback Method
cpg	774.25	J/mol×K	740.48	Joback Method
cpg	790.32	J/mol×K	768.84	Joback Method
cpg	805.63	J/mol×K	797.21	Joback Method
cpg	820.19	J/mol×K	825.57	Joback Method
cpg	834.01	J/mol×K	853.94	Joback Method
dvisc	0.0014838	Pa×s	373.98	Joback Method

dvisc	0.0006954	Pa×s	425.61	Joback Method
dvisc	0.0003840	Pa×s	477.24	Joback Method
dvisc	0.0002381	Pa×s	528.87	Joback Method
dvisc	0.0001607	Pa×s	580.49	Joback Method
dvisc	0.0001157	Pa×s	632.12	Joback Method
dvisc	0.0000875	Pa×s	683.75	Joback Method

Sources

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=U382545&Units=SI
Crippen Method: http://pubs.acs.org/doi/abs/10.1021/ci990307l

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