2-Propen-1-ol, 3-phenyl-, propanoate

Other names:	Cinnamyl alcohol, propionate
	Cinnamyl propionate
	Propionic acid, cinnamyl ester
	3-Phenyl-2-propen-1-yl propionate
	3-Phenyl-2-propenyl propionate
	Cinnamyl n-propionate
Inchi:	InChI=1S/C12H14O2/c1-2-12(13)14-10-6-9-11-7-4-3-5-8-11/h3-9H,2,10H2,1H3/b9-6+
InchiKey:	KGDJMNKPBUNHGY-RMKNXTFCSA-N
Formula:	C12H14O2
SMILES:	CCC(=O)OCC=Cc1ccccc1
Mol. weight [g/mol]:	190.24
CAS:	103-56-0

Physical Properties

Property code	Value	Unit	Source
gf	8.87	kJ/mol	Joback Method
hf	-182.06	kJ/mol	Joback Method
hfus	23.87	kJ/mol	Joback Method
hvap	53.70	kJ/mol	Joback Method
log10ws	-2.83		Crippen Method
logp	2.653		Crippen Method
mcvol	159.320	ml/mol	McGowan Method
pc	2654.29	kPa	Joback Method
rinpol	1519.00		NIST Webbook
ripol	2169.00		NIST Webbook
ripol	2194.00		NIST Webbook
tb	581.09	K	Joback Method
tc	796.06	K	Joback Method
tf	318.50	K	Joback Method
vc	0.604	m3/kmol	Joback Method

Temperature Dependent Properties

Property code	Value	Unit	Temperature [K]	Source

cpg	374.36	J/mol×K	581.09	Joback Method
cpg	438.98	J/mol×K	760.23	Joback Method
cpg	427.72	J/mol×K	724.40	Joback Method
cpg	415.66	J/mol×K	688.57	Joback Method
cpg	402.78	J/mol×K	652.75	Joback Method
cpg	389.03	J/mol×K	616.92	Joback Method
cpg	449.48	J/mol×K	796.06	Joback Method
dvisc	0.0001569	Pa×s	581.09	Joback Method
dvisc	0.0002025	Pa×s	537.33	Joback Method
dvisc	0.0002734	Pa×s	493.56	Joback Method
dvisc	0.0003912	Pa×s	449.80	Joback Method
dvisc	0.0006049	Pa×s	406.03	Joback Method
dvisc	0.0010390	Pa×s	362.26	Joback Method
dvisc	0.0020709	Pa×s	318.50	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=C103560&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
ripol: Polar retention indices
tb: Normal Boiling Point Temperature

tc:	Critical Temperature
tf:	Normal melting (fusion) point
vc:	Critical Volume