

(3S,3aS,6R,7[a]R)-Perhydro-3,6-dimethyl-benzo-[b]

Inchi:	InChI=1S/C10H16O2/c1-6-3-4-8-7(2)10(11)12-9(8)5-6/h6-9H,3-5H2,1-2H3/t6-,7+,8-,9-/m
InchiKey:	FGDINYRLQOKVQS-KZVJFYERSA-N
Formula:	C10H16O2
SMILES:	CC1CCC2C(C1)OC(=O)C2C
Mol. weight [g/mol]:	168.23

Physical Properties

Property code	Value	Unit	Source
gf	-105.61	kJ/mol	Joback Method
hf	-432.99	kJ/mol	Joback Method
hfus	21.26	kJ/mol	Joback Method
hvap	46.34	kJ/mol	Joback Method
log10ws	-2.05		Crippen Method
logp	1.984		Crippen Method
mvol	137.480	ml/mol	McGowan Method
pc	2820.33	kPa	Joback Method
ripol	2095.00		NIST Webbook
ripol	2095.00		NIST Webbook
tb	539.92	K	Joback Method
tc	767.98	K	Joback Method
tf	314.09	K	Joback Method
vc	0.511	m ³ /kmol	Joback Method

Temperature Dependent Properties

Property code	Value	Unit	Temperature [K]	Source
cpg	358.98	J/mol×K	539.92	Joback Method
cpg	379.23	J/mol×K	577.93	Joback Method
cpg	398.36	J/mol×K	615.94	Joback Method
cpg	416.39	J/mol×K	653.95	Joback Method
cpg	433.33	J/mol×K	691.96	Joback Method
cpg	449.20	J/mol×K	729.97	Joback Method
cpg	464.00	J/mol×K	767.98	Joback Method

Sources

Crippen Method:	http://pubs.acs.org/doi/abs/10.1021/ci9903071
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=R326219&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
ripol:	Polar retention indices
tb:	Normal Boiling Point Temperature
tc:	Critical Temperature
tf:	Normal melting (fusion) point
vc:	Critical Volume

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