

# (1«alpha»,2«alpha»,3«beta»,6«beta»)-1,2,3,6-tetraanhydride

Other names	exo-5-norbornene-2,3-dicarboxylic anhydride
Inchi:	InChI=1S/C9H8O3/c10-8-6-4-1-2-5(3-4)7(6)9(11)12-8/h1-2,4-7H,3H2/t4-,5-,6-,7+/m1/s1
InchiKey:	KNDQHSIWLOJIGP-GBNDHIKLSA-N
Formula:	C9H8O3
SMILES:	O=C1OC(=O)C2C3C=CC(C3)C12
Mol. weight [g/mol]:	164.16
CAS:	2746-19-2

## Physical Properties

Property code	Value	Unit	Source
gf	-114.00	kJ/mol	Joback Method
hf	-386.81	kJ/mol	Joback Method
hfus	20.66	kJ/mol	Joback Method
hvap	48.53	kJ/mol	Joback Method
log10ws	-0.80		Crippen Method
logp	0.508		Crippen Method
mcvol	109.800	ml/mol	McGowan Method
pc	3891.64	kPa	Joback Method
tb	586.89	K	Joback Method
tc	837.54	K	Joback Method
tf	401.02	K	Joback Method
vc	0.422	m3/kmol	Joback Method

## Temperature Dependent Properties

Property code	Value	Unit	Temperature [K]	Source
cpg	304.71	J/molxK	586.89	Joback Method
cpg	320.44	J/molxK	628.67	Joback Method
cpg	335.09	J/molxK	670.44	Joback Method
cpg	348.69	J/molxK	712.22	Joback Method
cpg	361.29	J/molxK	753.99	Joback Method
cpg	372.95	J/molxK	795.77	Joback Method
cpg	383.70	J/molxK	837.54	Joback Method
hfust	21.77	kJ/mol	416.20	NIST Webbook

## Sources

<b>Crippen Method:</b>	<a href="http://pubs.acs.org/doi/abs/10.1021/ci9903071">http://pubs.acs.org/doi/abs/10.1021/ci9903071</a>
<b>Crippen Method:</b>	<a href="https://www.chemeo.com/doc/models/crippen_log10ws">https://www.chemeo.com/doc/models/crippen_log10ws</a>
<b>Joback Method:</b>	<a href="https://en.wikipedia.org/wiki/Joback_method">https://en.wikipedia.org/wiki/Joback_method</a>
<b>McGowan Method:</b>	<a href="http://link.springer.com/article/10.1007/BF02311772">http://link.springer.com/article/10.1007/BF02311772</a>
<b>NIST Webbook:</b>	<a href="http://webbook.nist.gov/cgi/cbook.cgi?ID=C2746192&amp;Units=SI">http://webbook.nist.gov/cgi/cbook.cgi?ID=C2746192&amp;Units=SI</a>

## Legend

<b>cpg:</b>	Ideal gas heat capacity
<b>gf:</b>	Standard Gibbs free energy of formation
<b>hf:</b>	Enthalpy of formation at standard conditions
<b>hfus:</b>	Enthalpy of fusion at standard conditions
<b>hfust:</b>	Enthalpy of fusion at a given temperature
<b>hvap:</b>	Enthalpy of vaporization at standard conditions
<b>log10ws:</b>	Log10 of Water solubility in mol/l
<b>logp:</b>	Octanol/Water partition coefficient
<b>mcvol:</b>	McGowan's characteristic volume
<b>pc:</b>	Critical Pressure
<b>tb:</b>	Normal Boiling Point Temperature
<b>tc:</b>	Critical Temperature
<b>tf:</b>	Normal melting (fusion) point
<b>vc:</b>	Critical Volume

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