

# Methomyl

**Other names:** Ethanimidothioic acid, N-[[[(methylamino)carbonyl]oxy]-, methyl ester  
Acetimidic acid, N-[(methylcarbamoyl)oxy]thio-, methyl ester  
Du Pont Insecticide 1179  
Du Pont 1179  
Insecticide 1179  
IN 1179  
Lannate  
Mesomile  
Methyl N-[(Methylcarbamoyl)oxy]thioacetimidate  
Methyl O-(methylcarbamoyl)thiolacetohydroxamate  
Methyl O-(methylcarbamyl)thiolacetohydroxamate  
N-[(Methylcarbamoyl)oxy]thioacetimidic acid methyl ester  
SD 14999  
WL 18236  
Acetimidic acid, thio-N-((methylcarbamoyl)oxy)-, methyl ester  
Acetimidothioic acid, methyl-, N-(methylcarbamoyl) ester  
ENT 27,341  
Lannate L  
N-(((Methylamino)carbonyl)oxy)ethanimidothioic acid methyl ester  
Methyl N-(((methylamino)carbonyl)oxy)ethanimidothioate  
S-Methyl N-(methylcarbamoyloxy)thioacetimidate  
Methyl O-(methylcarbamoyl)thiolacethohydroxamate  
2-Methylthio-acetaldehyd-O-(methylcarbamoyl)-oxime  
Metomil  
NU-Bait II  
Nudrin  
Rcra waste number P066  
3-Thiabutan-2-one, O-(methylcarbamoyl)oxime  
Flytek  
Kipsin  
Lan Bait  
Lannate LB  
Lannate(R)  
Lanox  
Lanox 216  
Lanox 90  
Memilene  
Methomex  
S-Methyl N-[[[(methylamino)carbonyl]oxy]ethanimidothioate  
5-Methyl N-(methylcarbamoyloxy)thioacetimidate

**Inchi:** InChI=1S/C5H10N2O2S/c1-4(10-3)7-9-5(8)6-2/h1-3H3,(H,6,8)  
**InchiKey:** UHXUZOCRWCRNSJ-UHFFFAOYSA-N  
**Formula:** C5H10N2O2S  
**SMILES:** CNC(=O)ON=C(C)SC  
**Mol. weight [g/mol]:** 162.21  
**CAS:** 16752-77-5

## Physical Properties

Property code	Value	Unit	Source
hf	-223.56	kJ/mol	Joback Method
hvap	52.53	kJ/mol	Joback Method
log10ws	-1.48		Crippen Method
logp	1.039		Crippen Method
mcvol	120.760	ml/mol	McGowan Method
pc	3372.36	kPa	Joback Method
rinpol	1530.00		NIST Webbook
rinpol	1534.00		NIST Webbook
rinpol	1500.00		NIST Webbook
rinpol	1500.00		NIST Webbook
rinpol	1540.00		NIST Webbook
tb	585.60	K	Joback Method
tc	810.32	K	Joback Method
tf	353.24 ± 0.20	K	NIST Webbook
tf	352.00 ± 0.20	K	NIST Webbook

## Temperature Dependent Properties

Property code	Value	Unit	Temperature [K]	Source
hfust	21.73	kJ/mol	352.70	NIST Webbook

## Sources

**Crippen Method:** <http://pubs.acs.org/doi/abs/10.1021/ci9903071>

**Crippen Method:** [https://www.chemeo.com/doc/models/crippen\\_log10ws](https://www.chemeo.com/doc/models/crippen_log10ws)

**Joback Method:** [https://en.wikipedia.org/wiki/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=C16752775&Units=SI>

## Legend

**hf:** Enthalpy of formation at standard conditions  
**hfust:** Enthalpy of fusion at a given temperature  
**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

Latest version available from:

<https://www.cheméo.com/cid/39-459-0/Methomyl.pdf>

Generated by Cheméo on 2024-05-01 00:28:03.904546046 +0000 UTC m=+16812532.825123357.

Cheméo (<https://www.cheméo.com>) is the biggest free database of chemical and physical data for the process industry.