

# Mephobarbital

**Other names:** 2,4,6(1H,3H,5H)-Pyrimidinetrione, 5-ethyl-1-methyl-5-phenyl-Barbituric acid, 5-ethyl-1-methyl-5-phenyl-Enfenemal  
Enphenemal  
Isonal  
Isonal (Roussel)  
Mebaral  
Mephobarbitone  
Mephytal  
Methyl phenobarbitone  
Methyl-calminal  
Methylphenobarbital  
Metylphenemal  
Metyna  
Morbusan  
N-Methyl-5-phenyl-5-ethylbarbituric acid  
N-Methylethylphenylbarbituric acid  
N-Methylphenobarbital  
Phemetone  
Phemiton  
Phemitone  
Prominal  
1-Methylphenobarbital  
N-Ethylmethylphenylbarbituric acid  
5-Ethyl-N-methyl-5-phenylbarbituric acid  
5-Ethyl-1-methyl-5-phenylbarbituric acid  
5-Ethyl-5-phenyl-N-methyl-barbituric acid  
Meberal  
Menta-bal  
1-Methyl-5-ethyl-5-phenylbarbituric acid  
N-Methylphenolbarbitol  
Methylphenylbarbituric acid  
N-Methyl-5-phenyl-5-ethylbarbital  
1-Methyl-5-phenyl-5-ethylbarbituric acid  
5-Phenyl-5-ethyl-3-methylbarbituric acid  
5-Ethyl-1-methyl-5-phenyl-2,4,6(1H,3H,5H)-pyrimidinetrione  
1-Methyl-5-ethyl-5-phenyl-pyrimidine-2,4,6-trione  
Hexahydropyrimidine-2,4,6-trione, 1-methyl-5-ethyl-5-phenyl-Phenobarbital, mono-methyl  
(.+/-.)-Mephobarbital

**Inchi:** InChI=1S/C13H14N2O3/c1-3-13(9-7-5-4-6-8-9)10(16)14-12(18)15(2)11(13)17/h4-8H,3H2  
**InchiKey:** ALARQZQTBTVLJV-UHFFFAOYSA-N  
**Formula:** C13H14N2O3  
**SMILES:** CCC1(c2ccccc2)C(=O)NC(=O)N(C)C1=O  
**Mol. weight [g/mol]:** 246.26  
**CAS:** 115-38-8

## Physical Properties

Property code	Value	Unit	Source
log10ws	-2.00		Crippen Method
logp	1.043		Crippen Method
mcvol	184.080	ml/mol	McGowan Method
rinpol	1883.00		NIST Webbook
rinpol	1875.00		NIST Webbook
rinpol	1890.00		NIST Webbook
rinpol	1885.00		NIST Webbook
rinpol	1890.00		NIST Webbook
rinpol	1890.00		NIST Webbook
rinpol	1890.00		NIST Webbook
rinpol	1895.00		NIST Webbook
rinpol	1895.00		NIST Webbook
rinpol	1880.00		NIST Webbook
rinpol	1875.00		NIST Webbook
rinpol	1898.00		NIST Webbook
rinpol	1888.00		NIST Webbook
rinpol	1869.00		NIST Webbook
rinpol	1874.00		NIST Webbook
rinpol	1876.00		NIST Webbook
rinpol	1885.00		NIST Webbook
rinpol	1895.00		NIST Webbook
rinpol	1885.00		NIST Webbook
rinpol	1885.00		NIST Webbook
rinpol	1891.00		NIST Webbook
rinpol	1874.00		NIST Webbook
rinpol	1885.00		NIST Webbook
rinpol	1883.00		NIST Webbook
rinpol	1890.00		NIST Webbook
rinpol	1891.00		NIST Webbook
rinpol	1895.00		NIST Webbook
rinpol	1869.00		NIST Webbook

# Sources

<b>Crippen Method:</b>	<a href="https://www.chemeo.com/doc/models/crippen_log10ws">https://www.chemeo.com/doc/models/crippen_log10ws</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=C115388&amp;Units=SI">http://webbook.nist.gov/cgi/cbook.cgi?ID=C115388&amp;Units=SI</a>
<b>Crippen Method:</b>	<a href="http://pubs.acs.org/doi/abs/10.1021/ci990307I">http://pubs.acs.org/doi/abs/10.1021/ci990307I</a>

# Legend

<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>rinpol:</b>	Non-polar retention indices

Latest version available from:

<https://www.chemeo.com/cid/32-568-6/Mephobarbital.pdf>

Generated by Cheméo on 2024-04-26 08:32:10.862606311 +0000 UTC m=+16409579.783183626.

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