

Oxygen monofluoride

Inchi:	InChI=1S/FO/c1-2
InchiKey:	FXOFAYKVTOLJTJ-UHFFFAOYSA-N
Formula:	FO
SMILES:	[O]F
Mol. weight [g/mol]:	35.00
CAS:	12061-70-0

Physical Properties

Property code	Value	Unit	Source
affp	508.70	kJ/mol	NIST Webbook
basg	482.20	kJ/mol	NIST Webbook
ea	2.27 ± 0.01	eV	NIST Webbook
ea	2.05 ± 0.08	eV	NIST Webbook
ea	1.40 ± 0.50	eV	NIST Webbook
ie	12.77	eV	NIST Webbook
ie	12.78 ± 0.03	eV	NIST Webbook
ie	12.77	eV	NIST Webbook
ie	12.80 ± 0.10	eV	NIST Webbook
log10ws	-4.56		Crippen Method
logp	0.301		Crippen Method
mcvol	16.350	ml/mol	McGowan Method

Sources

Crippen Method:	http://pubs.acs.org/doi/abs/10.1021/ci990307l
Crippen Method:	https://www.chemeo.com/doc/models/crippen_log10ws
McGowan Method:	http://link.springer.com/article/10.1007/BF02311772
NIST Webbook:	http://webbook.nist.gov/cgi/cbook.cgi?ID=C12061700&Units=SI

Legend

affp:	Proton affinity
basg:	Gas basicity
ea:	Electron affinity
ie:	Ionization energy
log10ws:	Log10 of Water solubility in mol/l
logp:	Octanol/Water partition coefficient
mcvol:	McGowan's characteristic volume

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