Benzene, (2-methoxyethoxy)-

Other names:	1-Methoxy-2-phenoxyethane
	2-Methoxyethyl phenyl ether
	(2-Methoxy)ethoxybenzene
Inchi:	InChI=1S/C9H12O2/c1-10-7-8-11-9-5-3-2-4-6-9/h2-6H,7-8H2,1H3
InchiKey:	IFQVEYUAIINTRX-UHFFFAOYSA-N
Formula:	C9H12O2
SMILES:	COCCOc1ccccc1
Mol. weight [g/mol]:	152.19
CAS:	41532-81-4

Physical Properties

Property code	Value	Unit	Source
gf	-72.69	kJ/mol	Joback Method
hf	-257.00	kJ/mol	Joback Method
hfus	15.48	kJ/mol	Joback Method
hvap	42.72	kJ/mol	Joback Method
ie	8.41 ± 0.05	eV	NIST Webbook
log10ws	-1.52		Crippen Method
logp	1.712		Crippen Method
mcvol	125.650	ml/mol	McGowan Method
pc	3138.51	kPa	Joback Method
rinpol	1184.00		NIST Webbook
rinpol	1184.00		NIST Webbook
tb	476.84	K	Joback Method
tc	681.15	K	Joback Method
tf	262.07	K	Joback Method
vc	0.468	m3/kmol	Joback Method

Temperature Dependent Properties

Property code	Value	Unit	Temperature [K]	Source
cpg	262.18	J/mol×K	476.84	Joback Method
cpg	275.48	J/mol×K	510.89	Joback Method
cpg	288.18	J/mol×K	544.94	Joback Method

cpg	300.29	J/mol×K	579.00	Joback Method
cpg	311.81	J/mol×K	613.05	Joback Method
cpg	322.74	J/mol×K	647.10	Joback Method
cpg	333.09	J/mol×K	681.15	Joback Method
dvisc	0.0020573	Pa×s	262.07	Joback Method
dvisc	0.0010652	Pa×s	297.87	Joback Method
dvisc	0.0006352	Pa×s	333.66	Joback Method
dvisc	0.0004187	Pa×s	369.46	Joback Method
dvisc	0.0002970	Pa×s	405.25	Joback Method
dvisc	0.0002228	Pa×s	441.05	Joback Method
dvisc	0.0001745	Pa×s	476.84	Joback Method

Sources

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=C41532814&Units=SI
Crippen Method:	http://pubs.acs.org/doi/abs/10.1021/ci990307l
Crippen Method:	https://www.chemeo.com/doc/models/crippen_log10ws

Legend

cpg:	Ideal gas heat capacity
dvisc:	Dynamic viscosity
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
ie:	Ionization energy
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
vc:	Critical Volume