Octadecane

Other names:	Octadecan
	n-Octadecane
Inchi:	InChI=1S/C18H38/c1-3-5-7-9-11-13-15-17-18-16-14-12-10-8-6-4-2/h3-18H2,1-2H3
InchiKey:	RZJRJXONCZWCBN-UHFFFAOYSA-N
Formula:	C18H38
SMILES:	CCCCCCCCCCCCCCCCCC
Mol. weight [g/mol]:	254.49
CAS:	593-45-3

Physical Properties

Property code	Value	Unit	Source
af	0.7900		KDB
chl	-12008.70 ± 2.40	kJ/mol	NIST Webbook
chs	-11946.50 ± 4.80	kJ/mol	NIST Webbook
gf	100.60	kJ/mol	KDB
hf	-414.60 ± 2.70	kJ/mol	NIST Webbook
hf	-414.80	kJ/mol	KDB
hfl	-505.40 ± 2.70	kJ/mol	NIST Webbook
hfs	-567.40 ± 4.80	kJ/mol	NIST Webbook
hfus	59.30	kJ/mol	Silver incorporated microencapsulation of n-hexadecane and noctadecane appropriate for dynamic thermal management in textiles
hfus	61.65	kJ/mol	Solid-liquid phase equilibria of (n-octadecane with myristic, and palmitic acid) binary mixtures used as phase change materials (PCMs)
hsub	152.70	kJ/mol	NIST Webbook
hvap	55.66	kJ/mol	Joback Method
log10ws	-7.36		Crippen Method
logp	7.268		Crippen Method
mcvol	264.480	ml/mol	McGowan Method
pc	1290.00	kPa	KDB
pc	1300.00 ± 200.00	kPa	NIST Webbook
pc	1292.00 ± 110.00	kPa	NIST Webbook
rhoc	214.03 ± 5.09	kg/m3	NIST Webbook

rhoc	203.60 ± 50.90	kg/m3	NIST Webbook
rinpol	301.71		NIST Webbook
rinpol	296.84		NIST Webbook
sl	696.60	J/mol×K	NIST Webbook
ss	480.20	J/mol×K	NIST Webbook
tb	589.30	K	NIST Webbook
tb	581.00 ± 3.00	K	NIST Webbook
tb	581.65 ± 2.50	K	NIST Webbook
tb	589.50	K	KDB
tb	585.65 ± 2.00	K	NIST Webbook
tc	747.00	K	KDB
tc	745.80 ± 3.40	K	NIST Webbook
tc	756.15 ± 0.01	K	NIST Webbook
tc	747.20	K	NIST Webbook
tc	747.70 ± 1.00	K	NIST Webbook
tc	747.00 ± 3.00	K	NIST Webbook
tf	301.00 ± 0.10	K	NIST Webbook
tf	301.40 ± 0.30	K	NIST Webbook
tf	301.31 ± 0.02	K	NIST Webbook
tf	301.31 ± 0.02	K	NIST Webbook
tf	301.33 ± 0.01	K	NIST Webbook
tf	301.00 ± 2.00	K	NIST Webbook
tf	301.35 ± 0.15	K	NIST Webbook
tf	301.65 ± 0.20	K	NIST Webbook
tf	301.25 ± 0.20	K	NIST Webbook
tf	301.25 ± 0.20	K	NIST Webbook
tf	301.15 ± 1.50	K	NIST Webbook
tf	301.00 ± 0.50	K	NIST Webbook
tf	301.00 ± 0.50	K	NIST Webbook
tf	300.85 ± 0.30	K	NIST Webbook
tf	301.30 ± 0.60	K	NIST Webbook
tf	300.15 ± 1.50	K	NIST Webbook
tf	301.20 ± 0.60	K	NIST Webbook
tf	300.90 ± 0.60	K	NIST Webbook
tf	301.20 ± 0.30	K	NIST Webbook
tf	300.30 ± 0.50	K	NIST Webbook
tf	300.09 ± 0.50	K	NIST Webbook
tf	301.60	K	Experimental measurements and thermodynamic modeling of wax disappearance temperature for the binary systems n-C14H30 + n-C16H34, n-C16H34 + n-C18H38 and n-C11H24 + n-C18H38
tf	300.00 ± 2.00	K	NIST Webbook

tf	301.01 ± 0.30	K	NIST Webbook
tf	301.00 ± 1.50	K	NIST Webbook
tf	301.00 ± 2.00	K	NIST Webbook
tf	301.00 ± 2.00	K	NIST Webbook
tf	301.00 ± 2.00	K	NIST Webbook
tf	301.00 ± 2.00	K	NIST Webbook
tf	301.00 ± 3.00	K	NIST Webbook
tf	299.00 ± 3.00	K	NIST Webbook
tf	300.30 ± 0.50	K	NIST Webbook
tf	301.00 ± 3.00	K	NIST Webbook
tf	300.70 ± 0.50	K	NIST Webbook
tf	300.95 ± 0.50	K	NIST Webbook
tf	301.22 ± 0.15	K	NIST Webbook
tf	301.15	K	Development of thermal enhanced n-octadecane/porous nano carbon-based materials using 3-step filtered vacuum impregnation method
tf	301.55	K	Fabrication, thermal properties and thermal stabilities of microencapsulated n-alkane with poly(lauryl methacrylate) as shell
tf	301.46	K	Vapour pressures of selected organic compounds down to 1 mPa, using mass-loss Knudsen effusion method
tf	302.90 ± 1.00	K	NIST Webbook
tf	301.30	K	KDB
tf	301.23 ± 0.20	K	NIST Webbook
tt	301.30 ± 0.20	K	NIST Webbook
tt	301.00 ± 0.04	K	NIST Webbook
tt	300.50	K	Solubilities of Some Long-Chain n-Alkanes in Dipropyl Ether, Dibutyl Ether, 1-Chlorobutane, and 1-Chlorooctane as Functions of Temperature
vc	1.189	m3/kmol	NIST Webbook
vc	1.189	m3/kmol	KDB
zc	0.2469530		KDB
zra	0.23		KDB

Temperature Dependent Properties

Property code	Value	Unit	Temperature [K]	Source
cpg	799.10	J/mol×K	717.14	Joback Method
cpg	723.50	J/mol×K	611.24	Joback Method
cpg	743.57	J/mol×K	637.71	Joback Method
cpg	762.85	J/mol×K	664.19	Joback Method
cpg	781.35	J/mol×K	690.66	Joback Method
cpg	816.13	J/mol×K	743.61	Joback Method
cpg	832.45	J/mol×K	770.08	Joback Method
cpl	568.00	J/mol×K	325.00	NIST Webbook
cpl	564.40	J/mol×K	300.00	NIST Webbook
cps	485.64	J/mol×K	298.15	NIST Webbook
dvisc	0.0032900	Pa×s	308.75	Intercomparative tests on viscosity measurements of phase change materials
dvisc	0.0028800	Pa×s	316.15	Intercomparative tests on viscosity measurements of phase change materials
dvisc	0.0028900	Pa×s	315.95	Intercomparative tests on viscosity measurements of phase change materials
dvisc	0.0029000	Pa×s	315.75	Intercomparative tests on viscosity measurements of phase change materials
dvisc	0.0029100	Pa×s	315.55	Intercomparative tests on viscosity measurements of phase change materials
dvisc	0.0029100	Pa×s	315.35	Intercomparative tests on viscosity measurements of phase change materials
dvisc	0.0029600	Pa×s	315.15	Intercomparative tests on viscosity measurements of phase change materials
dvisc	0.0029700	Pa×s	314.75	Intercomparative tests on viscosity measurements of phase change materials

dvisc	0.0028200	Pa×s	317.95	Intercomparative tests on viscosity measurements of phase change materials
dvisc	0.0029700	Pa×s	314.55	Intercomparative tests on viscosity measurements of phase change materials
dvisc	0.0033100	Pa×s	308.35	Intercomparative tests on viscosity measurements of phase change materials
dvisc	0.0029600	Pa×s	314.35	Intercomparative tests on viscosity measurements of phase change materials
dvisc	0.0029900	Pa×s	314.15	Intercomparative tests on viscosity measurements of phase change materials
dvisc	0.0030000	Pa×s	313.95	Intercomparative tests on viscosity measurements of phase change materials
dvisc	0.0030100	Pa×s	313.75	Intercomparative tests on viscosity measurements of phase change materials
dvisc	0.0030100	Pa×s	313.55	Intercomparative tests on viscosity measurements of phase change materials
dvisc	0.0030100	Pa×s	313.35	Intercomparative tests on viscosity measurements of phase change materials
dvisc	0.0030300	Pa×s	313.15	Intercomparative tests on viscosity measurements of phase change materials
dvisc	0.0030700	Pa×s	312.95	Intercomparative tests on viscosity measurements of phase change materials
dvisc	0.0030700	Pa×s	312.75	Intercomparative tests on viscosity measurements of phase change materials

dvisc	0.0030700	Pa×s	312.55	Intercomparative tests on viscosity measurements of phase change materials
dvisc	0.0031000	Pa×s	312.35	Intercomparative tests on viscosity measurements of phase change materials
dvisc	0.0031000	Pa×s	312.15	Intercomparative tests on viscosity measurements of phase change materials
dvisc	0.0031100	Pa×s	311.95	Intercomparative tests on viscosity measurements of phase change materials
dvisc	0.0031200	Pa×s	311.75	Intercomparative tests on viscosity measurements of phase change materials
dvisc	0.0031400	Pa×s	311.55	Intercomparative tests on viscosity measurements of phase change materials
dvisc	0.0031400	Pa×s	311.35	Intercomparative tests on viscosity measurements of phase change materials
dvisc	0.0031400	Pa×s	311.15	Intercomparative tests on viscosity measurements of phase change materials
dvisc	0.0031500	Pa×s	310.95	Intercomparative tests on viscosity measurements of phase change materials
dvisc	0.0028800	Pa×s	316.35	Intercomparative tests on viscosity measurements of phase change materials
dvisc	0.0031800	Pa×s	310.55	Intercomparative tests on viscosity measurements of phase change materials
dvisc	0.0032200	Pa×s	310.35	Intercomparative tests on viscosity measurements of phase change materials

dvisc	0.0032100	Pa×s	310.15	Intercomparative tests on viscosity measurements of phase change materials
dvisc	0.0032200	Pa×s	309.95	Intercomparative tests on viscosity measurements of phase change materials
dvisc	0.0032400	Pa×s	309.75	Intercomparative tests on viscosity measurements of phase change materials
dvisc	0.0032800	Pa×s	309.55	Intercomparative tests on viscosity measurements of phase change materials
dvisc	0.0028800	Pa×s	316.55	Intercomparative tests on viscosity measurements of phase change materials
dvisc	0.0032600	Pa×s	309.35	Intercomparative tests on viscosity measurements of phase change materials
dvisc	0.0032700	Pa×s	309.15	Intercomparative tests on viscosity measurements of phase change materials
dvisc	0.0028800	Pa×s	316.75	Intercomparative tests on viscosity measurements of phase change materials
dvisc	0.0028800	Pa×s	316.95	Intercomparative tests on viscosity measurements of phase change materials
dvisc	0.0031700	Pa×s	310.75	Intercomparative tests on viscosity measurements of phase change materials
dvisc	0.0028600	Pa×s	317.15	Intercomparative tests on viscosity measurements of phase change materials
dvisc	0.0028300	Pa×s	317.35	Intercomparative tests on viscosity measurements of phase change materials

dvisc	0.0028200	Pa×s	317.55	Intercomparative tests on viscosity measurements of phase change materials
dvisc	0.0028400	Pa×s	317.75	Intercomparative tests on viscosity measurements of phase change materials
dvisc	0.0039500	Pa×s	299.75	Intercomparative tests on viscosity measurements of phase change materials
dvisc	0.0039200	Pa×s	299.95	Intercomparative tests on viscosity measurements of phase change materials
dvisc	0.0039100	Pa×s	300.15	Intercomparative tests on viscosity measurements of phase change materials
dvisc	0.0038900	Pa×s	300.35	Intercomparative tests on viscosity measurements of phase change materials
dvisc	0.0038600	Pa×s	300.55	Intercomparative tests on viscosity measurements of phase change materials
dvisc	0.0038400	Pa×s	300.75	Intercomparative tests on viscosity measurements of phase change materials
dvisc	0.0038400	Pa×s	300.85	Intercomparative tests on viscosity measurements of phase change materials
dvisc	0.0038200	Pa×s	300.95	Intercomparative tests on viscosity measurements of phase change materials
dvisc	0.0038100	Pa×s	301.15	Intercomparative tests on viscosity measurements of phase change materials
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dvisc	0.0038000	Pa×s	301.55	Intercomparative tests on viscosity measurements of phase change materials
dvisc	0.0037600	Pa×s	301.75	Intercomparative tests on viscosity measurements of phase change materials
dvisc	0.0037700	Pa×s	301.95	Intercomparative tests on viscosity measurements of phase change materials
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dvisc	0.0037200	Pa×s	302.35	Intercomparative tests on viscosity measurements of phase change materials
dvisc	0.0037300	Pa×s	302.55	Intercomparative tests on viscosity measurements of phase change materials
dvisc	0.0037100	Pa×s	302.75	Intercomparative tests on viscosity measurements of phase change materials
dvisc	0.0036900	Pa×s	302.95	Intercomparative tests on viscosity measurements of phase change materials
dvisc	0.0036700	Pa×s	303.15	Intercomparative tests on viscosity measurements of phase change materials
dvisc	0.0036700	Pa×s	303.35	Intercomparative tests on viscosity measurements of phase change materials
dvisc	0.0036300	Pa×s	303.55	Intercomparative tests on viscosity measurements of phase change materials
dvisc	0.0036400	Pa×s	303.75	Intercomparative tests on viscosity measurements of phase change materials

dvisc	0.0036500	Pa×s	303.95	Intercomparative tests on viscosity measurements of phase change materials
dvisc	0.0036000	Pa×s	304.15	Intercomparative tests on viscosity measurements of phase change materials
dvisc	0.0035800	Pa×s	304.35	Intercomparative tests on viscosity measurements of phase change materials
dvisc	0.0035700	Pa×s	304.55	Intercomparative tests on viscosity measurements of phase change materials
dvisc	0.0035600	Pa×s	304.75	Intercomparative tests on viscosity measurements of phase change materials
dvisc	0.0035300	Pa×s	304.95	Intercomparative tests on viscosity measurements of phase change materials
dvisc	0.0035500	Pa×s	305.15	Intercomparative tests on viscosity measurements of phase change materials
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dvisc	0.0034800	Pa×s	305.75	Intercomparative tests on viscosity measurements of phase change materials
dvisc	0.0034600	Pa×s	305.95	Intercomparative tests on viscosity measurements of phase change materials
dvisc	0.0034700	Pa×s	306.15	Intercomparative tests on viscosity measurements of phase change materials

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dvisc	0.0034400	Pa×s	306.55	Intercomparative tests on viscosity measurements of phase change materials
dvisc	0.0034200	Pa×s	306.75	Intercomparative tests on viscosity measurements of phase change materials
dvisc	0.0034300	Pa×s	306.95	Intercomparative tests on viscosity measurements of phase change materials
dvisc	0.0034200	Pa×s	307.15	Intercomparative tests on viscosity measurements of phase change materials
dvisc	0.0034000	Pa×s	307.35	Intercomparative tests on viscosity measurements of phase change materials
dvisc	0.0033900	Pa×s	307.55	Intercomparative tests on viscosity measurements of phase change materials
dvisc	0.0033800	Pa×s	307.75	Intercomparative tests on viscosity measurements of phase change materials
dvisc	0.0033500	Pa×s	307.95	Intercomparative tests on viscosity measurements of phase change materials
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dvisc	0.0033400	Pa×s	308.15	Intercomparative tests on viscosity measurements of phase change materials
dvisc	0.0032900	Pa×s	308.95	Intercomparative tests on viscosity measurements of phase change materials

dvisc	0.0032900	Pa×s	308.55	Intercomparative tests on viscosity measurements of phase change materials
dvisc	0.0028300	Pa×s	318.15	Intercomparative tests on viscosity measurements of phase change materials
hfust	61.50	kJ/mol	301.50	NIST Webbook
hfust	61.50	kJ/mol	301.30	NIST Webbook
hfust	60.48	kJ/mol	301.30	NIST Webbook
hfust	60.76	kJ/mol	301.00	NIST Webbook
hfust	61.71	kJ/mol	301.33	NIST Webbook
hfust	60.10	kJ/mol	301.10	NIST Webbook
hfust	61.50	kJ/mol	301.30	NIST Webbook
hsubt	153.10 ± 5.00	kJ/mol	288.00	NIST Webbook
hsubt	153.00 ± 5.00	kJ/mol	293.00	NIST Webbook
hvapt	71.10	kJ/mol	363.00	NIST Webbook
hvapt	71.80	kJ/mol	353.00	NIST Webbook
hvapt	70.50	kJ/mol	373.00	NIST Webbook
hvapt	69.80	kJ/mol	383.00	NIST Webbook
hvapt	78.10	kJ/mol	460.50	NIST Webbook
hvapt	72.50	kJ/mol	343.00	NIST Webbook
hvapt	80.00	kJ/mol	387.00	NIST Webbook
hvapt	84.30	kJ/mol	339.50	NIST Webbook
hvapt	64.80	kJ/mol	524.50	NIST Webbook
hvapt	74.40	kJ/mol	500.50	NIST Webbook
hvapt	54.48	kJ/mol	589.50	KDB
hvapt	69.40	kJ/mol	518.50	NIST Webbook
rhol	700.00	kg/m3	422.60	Experimental Measurement and Equation of State Modeling of Liquid Saturated Properties (Solubility, Density, and Viscosity) of (Ethane + n-Octadecane) Binary Systems

rhol	701.00	kg/m3	422.60	Experimental Measurement and Equation of State Modeling of Liquid Saturated Properties (Solubility, Density, and Viscosity) of (Ethane + n-Octadecane) Binary Systems
rhol	702.00	kg/m3	422.60	Experimental Measurement and Equation of State Modeling of Liquid Saturated Properties (Solubility, Density, and Viscosity) of (Ethane + n-Octadecane) Binary Systems
rhol	699.00	kg/m3	422.60	Experimental Measurement and Equation of State Modeling of Liquid Saturated Properties (Solubility, Density, and Viscosity) of (Ethane + n-Octadecane) Binary Systems
rhol	697.00	kg/m3	422.60	Experimental Measurement and Equation of State Modeling of Liquid Saturated Properties (Solubility, Density, and Viscosity) of (Ethane + n-Octadecane) Binary Systems
rhol	695.00	kg/m3	422.60	Experimental Measurement and Equation of State Modeling of Liquid Saturated Properties (Solubility, Density, and Viscosity) of (Ethane + n-Octadecane) Binary Systems

rhol	704.00	kg/m3	422.50	Experimental Measurement and Equation of State Modeling of Liquid Saturated Properties (Solubility, Density, and Viscosity) of (Ethane + n-Octadecane) Binary Systems	
rhol	703.00	kg/m3	422.50	Experimental Measurement and Equation of State Modeling of Liquid Saturated Properties (Solubility, Density, and Viscosity) of (Ethane + n-Octadecane) Binary Systems	
rhol	736.00	kg/m3	372.80	Experimental Measurement and Equation of State Modeling of Liquid Saturated Properties (Solubility, Density, and Viscosity) of (Ethane + n-Octadecane) Binary Systems	
rhol	734.00	kg/m3	372.80	Experimental Measurement and Equation of State Modeling of Liquid Saturated Properties (Solubility, Density, and Viscosity) of (Ethane + n-Octadecane) Binary Systems	
rhol	733.00	kg/m3	372.80	Experimental Measurement and Equation of State Modeling of Liquid Saturated Properties (Solubility, Density, and Viscosity) of (Ethane + n-Octadecane) Binary Systems	

rhol	733.00	kg/m3	372.80	Experimental Measurement and Equation of State Modeling of Liquid Saturated Properties (Solubility, Density, and Viscosity) of (Ethane + n-Octadecane) Binary Systems	
rhol	731.00	kg/m3	372.80	Experimental Measurement and Equation of State Modeling of Liquid Saturated Properties (Solubility, Density, and Viscosity) of (Ethane + n-Octadecane) Binary Systems	
rhol	731.00	kg/m3	372.80	Experimental Measurement and Equation of State Modeling of Liquid Saturated Properties (Solubility, Density, and Viscosity) of (Ethane + n-Octadecane) Binary Systems	
rhol	730.00	kg/m3	372.80	Experimental Measurement and Equation of State Modeling of Liquid Saturated Properties (Solubility, Density, and Viscosity) of (Ethane + n-Octadecane) Binary Systems	
rhol	757.00	kg/m3	323.30	Experimental Measurement and Equation of State Modeling of Liquid Saturated Properties (Solubility, Density, and Viscosity) of (Ethane + n-Octadecane) Binary Systems	

rhol	756.00	kg/m3	323.30	Experimental Measurement and Equation of State Modeling of Liquid Saturated Properties (Solubility, Density, and Viscosity) of (Ethane + n-Octadecane) Binary Systems	
rhol	758.00	kg/m3	323.10	Experimental Measurement and Equation of State Modeling of Liquid Saturated Properties (Solubility, Density, and Viscosity) of (Ethane + n-Octadecane) Binary Systems	
rhol	757.00	kg/m3	323.10	Experimental Measurement and Equation of State Modeling of Liquid Saturated Properties (Solubility, Density, and Viscosity) of (Ethane + n-Octadecane) Binary Systems	
rhol	735.00	kg/m3	372.80	Experimental Measurement and Equation of State Modeling of Liquid Saturated Properties (Solubility, Density, and Viscosity) of (Ethane + n-Octadecane) Binary Systems	
rhol	755.00	kg/m3	323.10	Experimental Measurement and Equation of State Modeling of Liquid Saturated Properties (Solubility, Density, and Viscosity) of (Ethane + n-Octadecane) Binary Systems	
rhol	777.00	kg/m3	301.00	KDB	

rhol	756.00	kg/m3	323.10	Experimental Measurement and Equation of State Modeling of Liquid Saturated Properties (Solubility, Density, and Viscosity) of (Ethane + n-Octadecane) Binary Systems	
sfust	200.70	J/mol×K	301.30	NIST Webbook	
sfust	204.60	J/mol×K	301.33	NIST Webbook	
sfust	201.90	J/mol×K	301.00	NIST Webbook	
vols	0.00	m3/kg	568.25	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	
vols	0.00	m3/kg	566.35	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	
vols	0.00	m3/kg	563.45	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	

vols	0.00	m3/kg	560.45	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	
vols	0.00	m3/kg	558.55	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	
vols	0.00	m3/kg	555.65	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	
vols	0.00	m3/kg	553.65	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	

vols	0.00	m3/kg	550.75	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	
vols	0.00	m3/kg	548.85	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	
vols	0.00	m3/kg	545.95	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	
vols	0.00	m3/kg	543.05	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	

vols	0.00	m3/kg	541.05	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range
vols	0.00	m3/kg	538.15	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range
vols	0.00	m3/kg	535.25	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range
vols	0.00	m3/kg	527.45	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range

vols	0.00	m3/kg	533.25	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	
vols	0.00	m3/kg	530.35	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	
vols	0.00	m3/kg	525.55	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	
vols	0.00	m3/kg	523.55	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	

vols	0.00	m3/kg	520.65	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	
vols	0.00	m3/kg	518.75	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	
vols	0.00	m3/kg	515.85	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	
vols	0.00	m3/kg	512.95	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	

vols	0.00	m3/kg	510.95	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	
vols	0.00	m3/kg	508.05	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	
vols	0.00	m3/kg	505.15	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	
vols	0.00	m3/kg	503.15	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	

vols	0.00	m3/kg	500.25	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	
vols	0.00	m3/kg	498.35	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	
vols	0.00	m3/kg	496.35	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	
vols	0.00	m3/kg	493.45	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	

vols	0.00	m3/kg	491.55	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range
vols	0.00	m3/kg	488.65	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range
vols	0.00	m3/kg	486.65	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range
vols	0.00	m3/kg	483.75	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range

vols	0.00	m3/kg	481.85	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	
vols	0.00	m3/kg	478.95	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	
vols	0.00	m3/kg	476.95	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	
vols	0.00	m3/kg	474.05	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	

vols	0.00	m3/kg	472.15	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	
vols	0.00	m3/kg	469.15	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	
vols	0.00	m3/kg	467.25	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	
vols	0.00	m3/kg	464.35	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	

vols	0.00	m3/kg	462.45	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	
vols	0.00	m3/kg	459.45	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	
vols	0.00	m3/kg	457.55	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	
vols	0.00	m3/kg	454.65	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	

vols	0.00	m3/kg	452.65	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range
vols	0.00	m3/kg	449.75	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range
vols	0.00	m3/kg	444.95	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range
vols	0.00	m3/kg	442.95	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range

vols	0.00	m3/kg	440.05	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	
vols	0.00	m3/kg	438.15	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	
vols	0.00	m3/kg	435.25	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	
vols	0.00	m3/kg	433.25	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	

vols	0.00	m3/kg	430.35	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	
vols	0.00	m3/kg	428.45	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	
vols	0.00	m3/kg	425.45	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	
vols	0.00	m3/kg	423.55	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	

vols	0.00	m3/kg	420.65	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	
vols	0.00	m3/kg	418.65	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	
vols	0.00	m3/kg	415.75	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	
vols	0.00	m3/kg	413.85	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	

vols	0.00	m3/kg	410.95	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	
vols	0.00	m3/kg	408.95	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	
vols	0.00	m3/kg	406.05	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	
vols	0.00	m3/kg	404.15	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	

vols	0.00	m3/kg	401.25	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	
vols	0.00	m3/kg	399.25	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	
vols	0.00	m3/kg	396.35	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	
vols	0.00	m3/kg	394.45	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	

vols	0.00	m3/kg	391.55	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	
vols	0.00	m3/kg	389.55	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	
vols	0.00	m3/kg	386.65	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	
vols	0.00	m3/kg	384.75	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	

vols	0.00	m3/kg	381.75	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	
vols	0.00	m3/kg	379.85	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	
vols	0.00	m3/kg	376.95	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	
vols	0.00	m3/kg	374.95	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	

vols	0.00	m3/kg	372.05	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	
vols	0.00	m3/kg	370.15	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	
vols	0.00	m3/kg	367.25	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	
vols	0.00	m3/kg	365.25	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	

vols	0.00	m3/kg	362.35	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	
vols	0.00	m3/kg	360.45	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	
vols	0.00	m3/kg	357.55	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	
vols	0.00	m3/kg	355.55	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	

vols	0.00	m3/kg	352.65	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	
vols	0.00	m3/kg	350.75	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	
vols	0.00	m3/kg	347.85	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	
vols	0.00	m3/kg	345.85	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	

vols	0.00	m3/kg	342.95	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	
vols	0.00	m3/kg	341.05	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	
vols	0.00	m3/kg	338.05	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	
vols	0.00	m3/kg	335.15	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	

vols	0.00	m3/kg	333.25	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	
vols	0.00	m3/kg	330.35	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	
vols	0.00	m3/kg	328.35	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	
vols	0.00	m3/kg	325.45	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	

vols	0.00	m3/kg	323.55	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	
vols	0.00	m3/kg	320.65	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	
vols	0.00	m3/kg	319.85	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	
vols	0.00	m3/kg	318.65	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	

vols	0.00	m3/kg	317.75	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	
vols	0.00	m3/kg	315.75	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	
vols	0.00	m3/kg	313.65	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	
vols	0.00	m3/kg	311.65	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	

vols	0.00	m3/kg	309.55	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	
vols	0.00	m3/kg	307.55	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	
vols	0.00	m3/kg	305.45	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	
vols	0.00	m3/kg	303.35	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	

vols	0.00	m3/kg	301.35	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	
vols	0.00	m3/kg	299.25	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	
vols	0.00	m3/kg	447.85	A simple method to determine the specific volumes of liquids and melts as a function of the temperature. Application to four n-alkanes (C16H34, C18H38, C19H40 and C21H44) under saturating vapour pressure in the 298-573K range	

Pressure Dependent Properties

Property code	Value	Unit	Pressure [kPa]	Source

tbp	469.96	K	3.47	Improving a variation of the DSC technique for measuring the boiling points of pure compounds at low pressures
tfp	303.15	K	8860.00	Influence of size and shape effects on the high-pressure solubility of n-alkanes: Experimental data, correlation and prediction
tfp	323.15	K	94900.00	High pressure (solid + liquid) equilibria of n-alkane mixtures: experimental results, correlation and prediction
tfp	333.15	K	144780.00	High pressure (solid + liquid) equilibria of n-alkane mixtures: experimental results, correlation and prediction
tfp	343.15	K	199220.00	High pressure (solid + liquid) equilibria of n-alkane mixtures: experimental results, correlation and prediction
tfp	353.15	K	258230.00	High pressure (solid + liquid) equilibria of n-alkane mixtures: experimental results, correlation and prediction
tfp	313.15	K	49600.00	High pressure (solid + liquid) equilibria of n-alkane mixtures: experimental results, correlation and prediction

tfp	313.15	K	49600.00	Influence of size and shape effects on the high-pressure solubility of n-alkanes: Experimental data, correlation and prediction	
tfp	323.15	K	94900.00	Influence of size and shape effects on the high-pressure solubility of n-alkanes: Experimental data, correlation and prediction	
tfp	333.15	K	144780.00	Influence of size and shape effects on the high-pressure solubility of n-alkanes: Experimental data, correlation and prediction	
tfp	343.15	K	199220.00	Influence of size and shape effects on the high-pressure solubility of n-alkanes: Experimental data, correlation and prediction	
tfp	353.15	K	258230.00	Influence of size and shape effects on the high-pressure solubility of n-alkanes: Experimental data, correlation and prediction	
tfp	303.15	K	8860.00	High pressure (solid + liquid) equilibria of n-alkane mixtures: experimental results, correlation and prediction	

Correlations

Information	Value

Property code	pvap
Equation	ln(Pvp) = A + B/(T + C)
Coeff. A	1.50497e+01
Coeff. B	-5.05624e+03
Coeff. C	-1.04586e+02
Temperature range (K), min.	447.10
Temperature range (K), max.	623.80

Information	Value
Property code	pvap
Equation	ln(Pvp) = A + B/T + C*ln(T) + D*T^2
Coeff. A	1.68024e+02
Coeff. B	-1.69988e+04
Coeff. C	-2.14756e+01
Coeff. D	6.99410e-06
Temperature range (K), min.	301.33
Temperature range (K), max.	745.26

Datasets

Mass density, kg/m3

Temperature, K - Liquid	Pressure, kPa - Liquid	Mass density, kg/m3 - Liquid
323.65	7000.00	764.0
323.65	14400.00	769.0
323.65	28300.00	778.0
323.65	42200.00	788.0
323.65	55600.00	797.0
323.65	68900.00	800.0
422.85	7700.00	702.0
422.85	15100.00	711.0
422.85	29400.00	724.0
422.85	42500.00	732.0
422.85	56100.00	741.0
422.85	73200.00	752.0
422.85	84500.00	761.0
422.85	110000.00	774.0

422.85	138500.00	787.0
422.85	171700.00	801.0
422.85	206100.00	813.0
422.85	235500.00	823.0
422.85	255900.00	829.0
522.55	15300.00	651.0
522.55	29400.00	668.0
522.55	43200.00	681.0
522.55	56400.00	692.0
522.55	70800.00	703.0
522.55	84400.00	712.0
522.55	110000.00	727.0
522.55	137800.00	742.0
522.55	170400.00	757.0
522.55	205300.00	771.0
522.55	235700.00	782.0
522.55	257000.00	790.0

Reference *https://www.doi.org/10.1016/j.fluid.2011.08.020*

Temperature, K	Pressure, kPa	Mass density, kg/m3
323.00	8090.00	766.0
323.00	9490.00	767.0
323.10	2080.00	763.0
323.10	3570.00	764.0
323.10	5060.00	765.0
323.10	6500.00	766.0
347.90	2090.00	745.0
347.90	3520.00	746.0
347.90	5050.00	747.0
347.90	6530.00	749.0
347.90	8050.00	750.0
347.90	9470.00	751.0
397.20	3470.00	715.0
398.20	2030.00	713.0
398.20	4970.00	716.0
398.20	6480.00	718.0
398.20	9590.00	721.0
398.30	7940.00	719.0
447.50	7920.00	690.0
447.50	9510.00	692.0
447.60	1920.00	681.0
447.60	4900.00	686.0

447.60	6460.00	687.0
447.70	3450.00	684.0

Reference *https://www.doi.org/10.1016/j.fluid.2011.10.018*

Viscosity, Pa*s

Temperature, K - Liquid	Pressure, kPa - Liquid	Viscosity, Pa*s - Liquid
325.60	9800.00	0.0025980
325.60	16400.00	0.0027780
325.60	29600.00	0.0032470
325.60	37200.00	0.0035680
325.60	51000.00	0.0041570
325.60	60500.00	0.0045780
325.60	69000.00	0.0049800
325.60	70800.00	0.0050950
428.90	6800.00	0.0006850
428.90	21900.00	0.0008310
428.90	42100.00	0.0010230
428.90	63400.00	0.0012320
428.90	84300.00	0.0014460
428.90	104900.00	0.0016490
428.90	125500.00	0.0018780
428.90	147800.00	0.0021250
428.90	168000.00	0.0023920
428.90	188600.00	0.0026500
428.90	209600.00	0.0029280
428.90	230000.00	0.0032070
428.90	243100.00	0.0033960
533.90	9200.00	0.0003030
533.90	9500.00	0.0003050
533.90	15200.00	0.0003360
533.90	22500.00	0.0003800
533.90	44600.00	0.0004970
533.90	64000.00	0.0005790
533.90	85700.00	0.0006860
533.90	105900.00	0.0007840
533.90	126600.00	0.0008800
533.90	147600.00	0.0009750
533.90	147600.00	0.0009850
533.90	167700.00	0.0010770

533.90	188600.00	0.0012010
533.90	209100.00	0.0013130
533.90	229300.00	0.0014110
533.90	242900.00	0.0014910

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Legend

af:	Acentric Factor
chl:	Standard liquid enthalpy of combustion
chs:	Standard solid enthalpy of combustion
cpg:	Ideal gas heat capacity
cpl:	Liquid phase heat capacity
cps:	Solid phase heat capacity
dvisc:	Dynamic viscosity
gf:	Standard Gibbs free energy of formation
hf:	Enthalpy of formation at standard conditions
hfl:	Liquid phase enthalpy of formation at standard conditions
hfs:	Solid phase enthalpy of formation at standard conditions
hfus:	Enthalpy of fusion at standard conditions
hfust:	Enthalpy of fusion at a given temperature
hsub:	Enthalpy of sublimation at standard conditions
hsubt:	Enthalpy of sublimation at a given temperature
hvap:	Enthalpy of vaporization at standard conditions
hvapt:	Enthalpy of vaporization at a given temperature
log10ws:	Log10 of Water solubility in mol/l
logp:	Octanol/Water partition coefficient
mcvol:	McGowan's characteristic volume
pc:	Critical Pressure
pvap:	Vapor pressure
rhoc:	Critical density
rhol:	Liquid Density
rinpol:	Non-polar retention indices
sfust:	Entropy of fusion at a given temperature
sl:	Liquid phase molar entropy at standard conditions
ss:	Solid phase molar entropy at standard conditions
tb:	Normal Boiling Point Temperature
tbp:	Boiling point at given pressure
tc:	Critical Temperature
tf:	Normal melting (fusion) point
tfp:	Melting point
tt:	Triple Point Temperature
vc:	Critical Volume
vols:	Specific Volume
zc:	Critical Compressibility
zra:	Rackett Parameter