lithium chloride

Inchi: InChl=1S/CIH.Li/h1H;/q;+1/p-1

InchiKey: KWGKDLIKAYFUFQ-UHFFFAOYSA-M

Formula: CILi

SMILES: [CI-].[Li+] **Mol. weight [g/mol]:** 42.39

CAS: 7447-41-8

Physical Properties

Property code	Value	Unit	Source
affp	827.00	kJ/mol	NIST Webbook
basg	800.50	kJ/mol	NIST Webbook
ea	0.59 ± 0.01	eV	NIST Webbook
ea	0.61 ± 0.02	eV	NIST Webbook
ea	1.28	eV	NIST Webbook
ie	10.00	eV	NIST Webbook
ie	9.57	eV	NIST Webbook
ie	10.10	eV	NIST Webbook
ie	10.01 ± 0.02	eV	NIST Webbook
ie	9.80 ± 0.10	eV	NIST Webbook
ie	9.57	eV	NIST Webbook

Temperature Dependent Properties

Property code	Value	Unit	Temperature [K]	Source
speedsl	1988.00	m/s	950.00	Sound Velocity and Adiabatic Compressibility of Molten MCI + NdCI3 Mixtures (M = Li, Na, K, and Cs)
speedsl	1973.00	m/s	976.00	Sound Velocity and Adiabatic Compressibility of Molten MCI + NdCI3 Mixtures (M = Li, Na, K, and Cs)

speedsl	1945.00	m/s	1003.00	Sound Velocity and Adiabatic Compressibility of Molten MCI + NdCI3 Mixtures (M = Li, Na, K, and Cs)	
speedsl	1924.00	m/s	1030.00	Sound Velocity and Adiabatic Compressibility of Molten MCI + NdCI3 Mixtures (M = Li, Na, K, and Cs)	
speedsl	1894.00	m/s	1062.00	Sound Velocity and Adiabatic Compressibility of Molten MCI + NdCl3 Mixtures (M = Li, Na, K, and Cs)	
speedsl	1879.00	m/s	1082.00	Sound Velocity and Adiabatic Compressibility of Molten MCI + NdCI3 Mixtures (M = Li, Na, K, and Cs)	
speedsl	1858.00	m/s	1110.00	Sound Velocity and Adiabatic Compressibility of Molten MCI + NdCI3 Mixtures (M = Li, Na, K, and Cs)	
speedsl	1825.00	m/s	1148.00	Sound Velocity and Adiabatic Compressibility of Molten MCI + NdCI3 Mixtures (M = Li, Na, K, and Cs)	
speedsl	1791.00	m/s	1181.00	Sound Velocity and Adiabatic Compressibility of Molten MCI + NdCl3 Mixtures (M = Li, Na, K, and Cs)	

Correlations

Information Value

Property code	pvap
Equation	ln(Pvp) = A + B/(T + C)

Coeff. A	1.53336e+01
Coeff. B	-1.68081e+04
Coeff. C	-8.75400e+01
Temperature range (K), min.	1056.15
Temperature range (K), max.	1656.15

Sources

temperatures from (323.15 to 423.15) K:

Phase Equilibria in the Ternary System (LiCl + Li2SO4 + H2O) at T = (288.15 Endrates of thermodynamic properties of binary solutions of lithium browing or https://www.doi.org/10.1016/j.fluid.2005.07.002 binary solutions of lithium bromide or หนาสหายแบบ เกิดเลือน เพิ่มใหญ่ เกิดเลือน การ lonic Liquid, 1-Ethyl-3-methyl ได้มีใช่เรียกสุดเลือน การ Aqueous https://www.doi.org/10.1021/acs.jced.5b00329 https://www.doi.org/10.1016/j.fluid.2013.12.017 Through the control of the control o https://www.doi.org/10.1021/acs.jced.5b00987 Desmostik coefficients and activity https://www.doi.org/10.1016/j.jct.2019.105878 ହୁମାନିଆର୍ ଦେବନ ଓ ସେ । ଅଧାର ପ୍ରଧାନ ଓ ପ୍ରଧାନ ଓ ଅଧାର ଅଧିକ । ଅଧାର ଅଧିକ । ଅ https://www.doi.org/10.1016/j.jct.2011.03.002 https://www.doi.org/10.1021/acs.jced.9b00561 https://www.doi.org/10.1016/j.fluid.2011.09.016 พุชเคพละสาดกุนเหนือกาพหมาใจราช 1298 ใช้เหล่ะ Study on solid liquid phase equilibria in https://www.doi.org/10.1016/j.fluid.2006.10.018 ionic liquid 1. The solubility of alkali subarde amerifia hartequagitymise: https://www.doi.org/10.1016/j.jct.2013.1 typical lithium chloride liquid https://www.doi.org/10.1021/je700438d Properties and Apparent Molar Wearners and Apparent Molar Herrical action of the Outerparty https://www.doi.org/10.1021/acs.jced.9b https://www.doi.org/10.1016/j.jct.2013.10.028 https://www.doi.org/10.1021/acs.jced.9b00271 TESTING THE PROBLEM TO THE PROBLEM TO THE PROBLEM TO THE PROBLEM TO THE PROBLEM THE PROBLE https://www.doi.org/10.1021/acs.jced.5b00121 https://www.doi.org/10.1021/acs.jced.7b01012 https://www.doi.org/10.1016/j.jct.2018.12.011 The control of the https://www.doi.org/10.1016/j.jct.2017.02.004 https://www.doi.org/10.1016/j.fluid.2017.12.034 https://www.doi.org/10.1016/j.tca.2012.08.009 https://www.sciencedirect.com/book/9780128029992/the-yaws-handbook-of-vapor-pressure Tithetitiessyttien olicentratritie perbled by Tight the salid the control of the c https://www.doi.org/10.1021/acs.jced.6b00046 Surface Tension of Glycine, Alanine, Aminobutyric Acid, Norvaline, and Reliabilities in Principles of the Acideous Bolines and Reliabilities in Principles of the Acideous Felines of the Acideous Felines of the System Water + Lithium Chloride + Thremodynamican Chase Equilibria of the Acideous Ternary Systems LiCl + Roliability Phrase Ecculibria in the Ternary Systems (LiCl + MgCl2 + H2O) Anticascore and solubility behaviour of some https://www.doi.org/10.1021/acs.jced.7b00433 https://www.doi.org/10.1021/acs.jced.9b00118 https://www.doi.org/10.1016/j.fluid.2019.04.018 urfural https://www.doi.org/10.1021/je800588p https://www.doi.org/10.1021/je500700d https://www.doi.org/10.1021/je500946w https://www.doi.org/10.1016/j.jct.2006.06.014 gn the solubility behaviour of some Thermodynamicurepartiestef (LiCl + N,N-dimethylacetamide) and (LiBr + https://www.doi.org/10.1016/j.jct.2004.09.015 N,N-dimethylacetamide) at

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Legend

affp: Proton affinity
basg: Gas basicity
ea: Electron affinity
ie: Ionization energy
pvap: Vapor pressure

speedsl: Speed of sound in fluid

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