

lithium sulfate

60-lithium sulfate (CAS# 10377-48-7)															
Table 1a. Sub-lethal acute poisoning (single dose): Clinical observations (time related)															
Ref No.	Reference (linked to full source)	Case No.	Case age/sex	Case category	Dose: g	Notes (case, dose, time)	Time (exposure to sampling): h	Notes (blood sample)	Blood conc.: mg/l	Blood conc.: µM	Metabolite Blood conc.: mg/l	Metabolite Blood conc.: µM	Symptoms and signs	Treatment	Time (exposure to recovery): h
1	SPC 1973:3	1	20M	S, A	5.7	(a)	6.5		20.0	2900			0h: NS	0h: ST	
		1					30	p	20.7	3000			6h: V, MS, K, PS	2h: PD 70h	
		1					54		10.4	1500					
		1					78		6.9	1000					78
2	SPC 1976:1	2	28F	S, A	2.5	(a), (b)	3.5	(a)	53.8	7800			0h: MS, CY	0h: ST, FD	
		2				E	13.5		17.6	2550				E4h: PD 48h	48
3	SPC 1987:1	3	Ad,M	S, Z	NR	(c)	1.5		12.4	1800			0h: C	0h: ST, AR,	
		3					5	p	22.8	3300			16h: RM	FD 120h	
		3					8		20.0	2900					
		3					16		15.9	2300					
		3					24		10.4	1500					
		3					72		6.2	900					
		3					120		2.1	300					120
4	SPC 1988: 3	4	16M	S, A	NR	(d), (e)	3	p	38.0	5500			0h: MS	0h: ST, FD, HD	
		4					9		11.8	1700			l: K, E (f)		
		4					16		13.1	1900					
		4					21.5		11.7	1700					
		4					75		3.5	500					72
5	Horowitz 1969	5	58F	S, A	4.2	(d), (g)	2.5	s, p	56.6	8200			ba: V, G	0h: ST, FD	
		5					24	s, (h)	23.2	3360			0h: NS		
		5					48	s	11.5	1660					3
6	Gaind 1970	6	45F	S, Z	1		9	s	22.1	3200			0h: C, SZ, LP	0h: ST; 3h: AC	E24
		6											4h: RM		
7	von Hartitzsch 1972	7	50F	U, Z	2.6	(i)	0	s	34.5	5000			ba: C, SZ	0h: ST, PD 7h	
		7					7	s	17.3	2500			0h: LP	7h: HD 4h, AR	
		7					11	s	10.4	1500			7h: DC, R, K	l: HD x 3	
		7					144	s	1.4	200			8d: RM; SS: N		288
8	Marshall 1981	8	55F	S, A	2.26	(a), (j)	3	s	26.8	3880			0h: DC	0h: ST, AR	
		8					8	s	40.7	5900			11d: RM	5h: PD 6d	
		8					29	s	44.2	6400					
		8					53	s, p	66.2	9600					
		8					77	s	41.4	6000					
		8					101	s	22.3	3230					
		8					125	s	11.0	1600					
		8					149	s	6.3	920					
		8					173	s	2.1	310					
		8					197	s	0.7	100					432

lithium sulfate

9	Unger 1982	9	38M	S, Z	2.8	(k)	96	s	6.6	950			0h: NS	0h: ST	
		9					120	s	6.7	975			I: MS	96h: AR	
		9					168	s, p	9.3	1350			96h: C, F, LP, K, SZ	120h: HD 3x4hx	
		9					192	s, y	2.1	300			120h: KF	17d	
		9					360	s	0.7	100			SS: N		1440
10	Sawyer 1983	10	Ad?	S, Z	NR		4	s, p	37.3	5400			0h: MS	0h: ST	
		10	Ad?	S, Z	NR		10	s, p	38.6	5600			0h: MS	0h: ST	
		10	Ad?	S, Z	NR		2	s, p	39.3	5700			0h: MS	0h: ST	
11	Kondziela 1984	11	28M	U, Z	5.64	(l), ET	12	s, p	69.0	10000			ba: G 3d	0h: ST	
		11				ET	26	s	65.6	9500			0h: MS	22h: HD 3h	
		11				ET	34	s	34.5	5000			14h: MS		
		11				ET	37	s	27.6	4000			22h: K		
		11				ET	60	s	21.4	3100					
		11				ET	84	s	10.4	1500					216 (336) (n)
12	Dyson 1987	12	Ad?	S, Z	4.7		2.5	s	47.6	6900			0h: MS, K	0h: ST	
		12	Ad?	S, Z	NR		8	s	44.2	6400			0h: MS, K	0h: ST	
13	Tunkel 1988	13	33M	S, A	5.1	(a), (m)	2	s	5.9	860			0h: NS	0h: ST	
		13					5	s	27.3	3950			16h: MS	I: HDx3	
		13					8	s	40.6	5890					
		13					17	s	45.4	6580					
		13					20	s	29.7	4310					
		13					25	s	39.0	5650					
		13					45	s	20.8	3010					
		13					68	s	13.3	1930					
		13					88	s	10.8	1560					
14	GIZ-Nord 2004:201319	14	63F	NR			11		10.4	1499			11h: MS	ST	
Footnotes [General Glossary (via link) lists definitions of common abbreviations (general terms, symptoms and signs, treatment)]															
MW lithium = 6.9															
(a) acute on chronic?															
(b) plus biperiden 120 mg.															
(c) a week's lithium dose plus some diazepam, tricyclic antidepressant, and ethanol.															
(d) documented acute overdose (not on lithium before).															
(e) plus propranolol, thioridazine and maprotiline.															
(f) hypokalemia.															
(g) plus 1.25 g thioridazine.															
(h) lithium level in cerebrospinal fluid was 1010 µM.															
(i) 9 days therapy only; plus chlorpromazine 100-200 mg daily.															
(j) plus 375 mg flurazepam and 1.5 g doxepin.															
(k) plus nortriptyline, meprobamate, benzodiazepines, and salicylates.															
(l) overdose during the last three days.															
(m) plus 45 mg benzotropine.															
(n) time to remission (time at hospital).															

Table 1b. Sub-lethal acute poisoning (single dose): Clinical observations (without time information)															
Ref No.	Reference (linked to full source)	Case No.	Case age/sex	Case category	Dose: g	Notes (case, dose, time)	Time (exposure to sampling): h	Notes (blood sample)	Blood conc.: mg/l	Blood conc.: µM	Metabolite Blood conc.: mg/l	Metabolite Blood conc.: µM	Symptoms and signs	Treatment	Time (exposure to recovery): h
1	Clendeninn 1982	1	50F	S, A	NR	(a)		s	31.05	4500			0h: C	0h: ST, AR, HD	
2	Leeman 1983	2	42F	S, A	NR	(a), (b)		pl	39.33	5700			0h: DC	0h: ST, AR, HD	504
3	Gadallah 1988	3	Ad	S, Z	NR			s	46.92	6800			0h: MS	HDx1	
		4	Ad	S, Z	NR			s	44.44	6440			0h: MS	HDx1	
		5	Ad	S, Z	NR			s	41.4	6000			0h: MS	HDx3	
		6	Ad	S, Z	NR			s	38.64	5600			0h: MS	HDx2	
4	Bellomo 1991	8	58F	NR	NR			s	43.47	6300			0h: MS	0h: ST; l: CH	72
		9	46M	S, A	NR	(c)		pl	96.6	14000			0h: C	0h: ST, HD	288
6	Bailey 2000	10	174 cases	NR	7.8	(d)	NR	(e), p	14.85	2140			l: KF, CI, LP, BD	ST, HD	
		10						6	(f)	13.46	1940			N, (g)	
7	GIZ-Nord 1997:29388	11	76F	NR	NR				16.74	2579			MS	HD, ST	
Footnotes [General Glossary (via link) lists definitions of common abbreviations (general terms, symptoms and signs, treatment)]															
MW lithium = 6.9															
(a) acute on chronic?															
(b) plus other drugs (not reported).															
(c) allegedly, but not documented, acute on chronic intoxication.															
(d) acute on chronic overdose; the mean age was 36.2 ± 10.4 years, median 34; average ingested dose 7.8 ± 7.4 g (n=114, median 6.0, range 0.6-45.0).															
(e) median (range): 2140 (0-8920), (n=141).															
(f) median (range): 1940 (0-8640), (n=117).															
(g) cardiovascular symptoms.															

Table 2a. Lethal acute poisoning (single dose): Clinical observations (time related)																	
Ref No.	Reference (linked to full source)	Case No.	Case age/sex	Case category	Dose: g	Notes (case, dose, time)	Time (exposure to sampling): h	Notes (blood sample)	Blood conc.: mg/l	Blood conc.: µM	Metabolite Blood conc.: mg/l	Metabolite Blood conc.: µM	Symptoms and signs	Treatment	Time (exposure to death): h		
1	Schou 1968	1	57F	S, Z	NR	E	24	s	41.4	6000			NR	NR			
						E	180	s	1.4	200					360(a)		
2	Hawkins 1969	2	57M	U, Z	1.8	(b)	0	s, (c)	21.9	3170			0h: MS	24h: ST			
							24	s	25.5	3700			24h: C, LP, KF	E30h: HD17.5h			
							2		ET	30	s	24.8	3600			E45h: F	
							2		ET	36	s	13.5	1950				
							2		ET	45	s	11.7	1700				
							2		ET	47.5	s	11.0	1600				
3	Achong 1975	3	29F	S, Z	11.3	(d)	2	s	25.5	3700			ba: V	0h: ST			
							14	s	41.4	6000			0h: MS, LP	51h: PD			
							26	s	51.1	7400			40h: MS, G	57h: HD			
							38	s	55.2	8000			49h: C, K	73h: AR			
							50	s	103.5	15000			73h: KF, R	97h: CR			
							62	s, p	379.5	55000			97h: CA				
							74	s	10.4	1500						97	
4	Rose 1987	4	65F	S, Z	NR	(e)	9	s, p	58.7	8500			0h: MS; 48h: K	0h: ST			
							33	s	41.4	6000			72h: KF, CA, LP	48h: HD			
							57	s	49.0	7100							
							81	s	38.6	5600					108		
Footnotes [General Glossary (via link) lists definitions of common abbreviations (general terms, symptoms and signs, treatment)]																	
MW lithium = 6.9																	
(a) the acute lithium intoxication (coma etc.) was survived, but the patient died on day 15 due to pulmonary infection secondary to the poisoning induced atelectasis.																	
(b) six days therapy only.																	
(c) the day he stopped therapy.																	
(d) plus 15 g chlorpromazine and 0.9 g flurazepam HCl.																	
(e) no other drugs.																	

Table 2b. Lethal acute poisoning (single dose): Clinical observations (without time information)															
Ref No.	Reference (linked to full source)	Case No.	Case age/sex	Case category	Dose: g	Notes (case, dose, time)	Time (exposure to sampling): h	Notes (blood sample)	Blood conc.: mg/l	Blood conc.: µM	Metabolite Blood conc.: mg/l	Metabolite Blood conc.: µM	Symptoms and signs	Treatment	Time (exposure to death): h
1	AAPCC 1987:244	1	23	S, A	NR	(a)			48.3	7000					
2	AAPCC 1992:427	2	46	S, A	NR	(a)			38.64	5600					
3	Amdisen 1974	3	43F	S, Z	NR	(b)	>48		46.92	6800			0h: NS; 24h: MS	0h: ST; I: FD	
		3					>98	y	13.8	2000			48h: C, SZ	48h: AR,	
		3					>194		6.9	1000			72h: DC, K	HD 3x8h	
		3											11d: B, KF		480
		3											OL: B, K		
Footnotes [General Glossary (via link) lists definitions of common abbreviations (general terms, symptoms and signs, treatment)]															
MW lithium = 6.9															
(a) acute on chronic?															
(b) same case as in table: Post-mortem observations (time-related).															
Table 3a. Post-mortem observations (time related)															
Ref No.	Reference (linked to full source)	Case No.	Case age/sex	Case category	Dose: g	Notes (case, dose, time)	Time (exposure to sampling): h	Notes (blood sample)	Blood conc.: mg/l	Blood conc.: µM	Metabolite Blood conc.: mg/l	Metabolite Blood conc.: µM	Symptoms and signs	Treatment	Time (exposure to death): h
1	Amdisen 1974	1	43F	S, Z	NR	(a)		T	3.4	500			OL:B, K		480
Footnotes [General Glossary (via link) lists definitions of common abbreviations (general terms, symptoms and signs, treatment)]															
MW lithium = 6.9															
(a) same case as in table: Lethal acute poisoning (single dose): Clinical observations (without time information).															
Table 3b. Post-mortem observations (without time information)															
Ref No.	Reference (linked to full source)	Case No.	Case age/sex	Case category	Dose: g	Notes (case, dose, time)	Time (exposure to sampling): h	Notes (blood sample)	Blood conc.: mg/l	Blood conc.: µM	Metabolite Blood conc.: mg/l	Metabolite Blood conc.: µM	Symptoms and signs	Treatment	Time (exposure to death): h
no cases															
Footnotes [General Glossary (via link) lists definitions of common abbreviations (general terms, symptoms and signs, treatment)]															
MW lithium = 6.9															