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SAN JUAN AERO, Argentina

WMO#: **873110**

Lat: **31.40S** Long: **68.42W** Elev: **597** StdP: **94.36** Time Zone: **-3.00 (SAE)** Period: **86-10** WBAN: **99999**

Annual Heating and Humidification Design Conditions

	Coldest Month	Heating DB		Humidification DP/MCDB and HR						Coldest month WS/MCDB				MCWS/PCWD to 99.6% DB		
				99.6%			99%			0.4%		1%				
		99.6%	99%	DP	HR	MCDB	DP	HR	MCDB	WS	MCDB	WS	MCDB	MCWS	PCWD	
	(a)	(b)	(c)	(d)	(e)	(f)	(g)	(h)	(i)	(j)	(k)	(l)	(m)	(n)	(o)	
(1)	7	-2.1	-0.5	-15.2	1.1	18.5	-11.6	1.5	15.0	13.7	15.1	12.0	13.8	0.7	0	(1)

Annual Cooling, Dehumidification, and Enthalpy Design Conditions

	Hottest Month	Hottest Month DB Range	Cooling DB/MCWB						Evaporation WB/MCDB						MCWS/PCWD to 0.4% DB		
			0.4%		1%		2%		0.4%		1%		2%				
			DB	MCWB	DB	MCWB	DB	MCWB	WB	MCDB	WB	MCDB	WB	MCDB	MCWS	PCWD	
	(a)	(b)	(c)	(d)	(e)	(f)	(g)	(h)	(i)	(j)	(k)	(l)	(m)	(n)	(o)	(p)	
(2)	1	13.9	38.0	19.8	36.5	19.6	35.1	19.3	22.5	33.5	21.7	32.4	21.0	31.7	5.1	180	(2)

	Dehumidification DP/MCDB and HR									Enthalpy/MCDB						Hours 8 to 4 & 12.8/20.6	
	0.4%			1%			2%			0.4%		1%		2%			
	DP	HR	MCDB	DP	HR	MCDB	DP	HR	MCDB	Enth	MCDB	Enth	MCDB	Enth	MCDB		
	(a)	(b)	(c)	(d)	(e)	(f)	(g)	(h)	(i)	(j)	(k)	(l)	(m)	(n)	(o)	(p)	
(3)	19.1	15.0	27.5	18.2	14.1	27.1	17.3	13.3	26.6	69.6	33.5	66.5	32.4	63.8	31.6	946	(3)

Extreme Annual Design Conditions

	Extreme Annual WS			Extreme Max WB	Extreme Annual DB				n-Year Return Period Values of Extreme DB								
					Mean		Standard deviation		n=5 years		n=10 years		n=20 years		n=50 years		
	1%	2.5%	5%		Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	Min	Max	
	(a)	(b)	(c)	(d)	(e)	(f)	(g)	(h)	(i)	(j)	(k)	(l)	(m)	(n)	(o)	(p)	
(4)	13.8	11.7	10.1	26.7	-4.9	41.9	1.7	1.7	-6.1	43.1	-7.1	44.1	-8.0	45.0	-9.2	46.2	(4)

Monthly Climatic Design Conditions

				Annual (d)	Jan (e)	Feb (f)	Mar (g)	Apr (h)	May (i)	Jun (j)	Jul (k)	Aug (l)	Sep (m)	Oct (n)	Nov (o)	Dec (p)	
(5)	Temperatures, Degree-Days and Degree-Hours	Tavg		18.3	27.2	25.7	23.3	17.9	12.9	9.4	8.5	11.4	14.8	19.8	23.2	25.9	(5)
(6)		Sd			2.79	3.12	3.18	3.36	3.54	2.77	3.31	3.70	3.88	3.63	3.51	3.05	(6)
(7)		HDD10.0		156	0	0	0	1	11	42	68	27	6	0	0	0	(7)
(8)		HDD18.3		1167	1	1	3	48	172	269	307	219	117	26	5	1	(8)
(9)		CDD10.0		3179	533	440	411	237	102	24	21	69	151	303	396	494	(9)
(10)		CDD18.3		1148	274	207	156	33	4	0	1	2	12	71	151	236	(10)
(11)		CDH23.3		14114	3424	2405	1546	383	86	17	25	99	274	967	1901	2986	(11)
(12)		CDH26.7		6991	1869	1249	681	105	26	6	7	33	90	401	927	1597	(12)
(13)	Precipitation	PrecAvg		92	18	19	11	4	2	3	3	2	4	5	9	12	(13)
(14)		PrecMax		1855	199	199	197	172	145	143	133	134	147	154	170	185	(14)
(15)		PrecMin		1653	173	164	153	132	2	105	5	1	111	23	142	156	(15)
(16)		PrecSD		61.3	7.1	8.5	10.4	10.1	30.7	9.5	26.5	41.1	10.5	29.0	8.1	7.4	(16)
(17)	Monthly Design Dry Bulb and Mean Coincident Wet Bulb Temperatures	0.4%	DB		39.8	38.9	36.5	32.1	30.1	25.3	26.8	30.8	33.2	36.8	38.4	39.7	(17)
(18)			MCWB		20.9	19.6	20.2	19.0	13.5	10.3	11.2	12.3	14.9	16.3	18.8	20.1	(18)
(19)		2%	DB		37.7	36.6	34.1	29.3	25.2	20.1	21.3	26.0	29.1	33.2	36.0	37.4	(19)
(20)			MCWB		20.5	20.2	20.0	17.4	14.3	10.7	10.1	11.9	13.6	16.3	18.2	19.5	(20)
(21)		5%	DB		36.1	35.0	32.5	27.5	22.5	18.1	18.5	22.8	26.5	30.9	33.9	35.7	(21)
(22)			MCWB		20.4	19.5	19.7	16.5	13.4	10.1	9.1	10.9	12.6	15.6	17.8	19.1	(22)
(23)		10%	DB		34.5	33.3	30.7	25.4	20.3	16.4	16.3	20.2	23.9	28.7	31.9	34.0	(23)
(24)			MCWB		19.9	19.3	19.2	15.7	12.3	9.3	8.2	9.8	11.7	14.7	17.3	18.8	(24)
(25)	Monthly Design Wet Bulb and Mean Coincident Dry Bulb Temperatures	0.4%	WB		23.6	23.5	23.4	19.8	17.1	12.9	12.6	14.5	15.9	18.9	21.4	22.8	(25)
(26)			MCDB		35.5	34.2	32.0	28.8	25.2	19.6	21.6	26.7	27.0	32.3	33.8	35.2	(26)
(27)		2%	WB		22.5	22.2	21.5	18.5	15.4	11.8	11.1	12.6	14.5	17.7	20.0	21.7	(27)
(28)			MCDB		33.7	32.7	30.9	27.2	22.8	18.3	19.9	23.6	26.7	29.7	32.0	33.3	(28)
(29)		5%	WB		21.7	21.4	20.5	17.4	14.0	10.8	9.7	11.3	13.2	16.5	18.9	20.7	(29)
(30)			MCDB		32.6	31.5	29.8	25.5	21.2	16.8	17.2	21.4	24.4	27.9	30.9	32.2	(30)
(31)		10%	WB		20.9	20.5	19.7	16.3	12.7	9.7	8.6	10.1	12.1	15.4	17.9	19.9	(31)
(32)			MCDB		31.6	30.4	28.5	24.3	19.3	15.6	15.6	19.6	22.6	26.3	29.8	30.8	(32)
(33)	Mean Daily Temperature Range		MDBR		13.9	13.5	12.6	13.2	13.2	14.0	14.7	15.5	15.2	15.1	15.3	14.6	(33)
(34)		5% DB	MCDBR		16.0	16.2	15.5	16.4	16.5	17.3	18.6	20.4	20.0	19.1	18.4	17.6	(34)
(35)			MCWBR		4.7	4.9	5.2	7.0	8.2	9.6	9.8	9.8	8.5	7.1	6.4	5.8	(35)
(36)		5% WB	MCDBR		14.0	13.8	13.5	14.4	15.1	14.9	17.0	18.5	17.9	16.5	16.0	14.7	(36)
(37)			MCWBR		5.1	5.0	5.3	6.6	8.0	8.8	9.4	9.3	8.0	6.7	6.7	5.4	(37)
(38)	Clear Sky Solar Irradiance	taub			0.412	0.382	0.369	0.312	0.290	0.278	0.289	0.316	0.342	0.355	0.381	0.396	(38)
(39)		taud			2.454	2.500	2.474	2.546	2.539	2.546	2.461	2.404	2.362	2.435	2.443	2.478	(39)
(40)		Ebn,noon			929	938	916	922	896	884	884	901	927	954	952	947	(40)
(41)		Edh,noon			120	111	107	89	79	74	84	100	117	117	121	118	(41)

Nomenclature: See separate page