



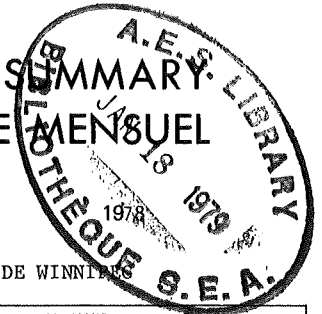
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MONTHLY METEOROLOGICAL SUMMARY / SOMMAIRE MÉTÉOROLOGIQUE MENSUEL

MONTH/MOIS DECEMBER / DECEMBRE

AT/A WINNIPEG INT'L AIRPORT / A L'AEROPORT INTER, DE WINNIPEG



LAT: 49° 54N		LONG: 97° 14 W		ELEVATION: ALTITUDE: METRES (ASL) / MÈTRES (NMM) 239.6 M		STANDARD TIME USED: HEURE NORMALE UTILISÉE: CENTRAL													
DATE	TEMPERATURE / TEMPÉRATURE			DEGREE-DAYS / DEGRÉS-JOURS		REL. HUMIDITY / HUMIDITÉ REL.		THUNDERSTORM / ORAGE	PRECIPITATION / PRÉCIPITATIONS			SNOW ON GROUND / NEIGE AU SOL	WIND / VENT			BRIGHT SUNSHINE / INSOLATION EFFECTIVE			
	MAXIMUM / MAXIMALE	MINIMUM / MINIMALE	MEAN / MOYENNE	HEATING / DE CHAUFFE	GROWING / DE CROISSANCE	MAXIMUM / MAXIMALE	MINIMUM / MINIMALE		RAINFALL / PLUIE (HAUTEUR)	SNOWFALL / NEIGE (HAUTEUR)	TOTAL PRECIP. / PRÉCIP. TOTALE		AVERAGE SPEED / VITESSE MOYENNE	PREVAILING DIRECTION / DIRECTION DOMINANTE	MAXIMUM SPEED AND DIRECTION / VITESSE MAXIMALE ET DIRECTION				
	°C	°C	°C	BASE 18.0°C	BASE 5.0°C	%	%		mm	cm	mm		km/h		km/h				
1	-19.5	-27.7	-23.6	41.6	0.0	86	57				26	10.0	WNW	W 13*	7.9				
2	-20.4	-28.8	-24.6	42.6	0.0	86	56				26	6.9	S	W 11	7.5				
3	-16.8	-27.9	-22.4	40.4	0.0	86	63			Tr.	26	12.9	S	S 26*	7.7				
4	0.3	-16.9	-8.3	26.3	0.0	93	74			0.5	23	24.5	WNW	S 31*	1.6				
5	-9.0	-22.1	-15.6	33.6	0.0	84	72			0.2	20	16.4	NNW	NNW 28	0.0				
6	-21.1	-25.5	-23.3	41.3	0.0	80	53			Tr.	20	7.1	W	WNW 11	8.0				
7	-20.7	-28.0	-24.4	42.4	0.0	81	68			Tr.	20	6.7	WSW	WSW 9*	6.9				
8	-21.5	-27.3	-24.4	42.4	0.0	86	66			Tr.	20	7.5	WNW	W 13	7.9				
9	-21.2	-28.8	-25.0	43.0	0.0	97	50			Tr.	20	7.6	WNW	WNW 11*	7.0				
10	-13.1	-27.8	-20.5	38.5	0.0	95	73			Tr.	20	9.0	S	SSW 15*	1.1				
11	-5.1	-13.2	-9.2	27.2	0.0	91	69			Tr.	20	13.5	S	S 24	4.1				
12	-5.0	-17.4	-11.2	29.2	0.0	91	76		Tr.	0.6	20	16.0	NNW	N 41	0.0				
13	-6.8	-17.8	-12.3	30.3	0.0	86	73			0.2	20	10.6	W	W 17	5.2				
14	-6.9	-16.1	-11.5	29.5	0.0	87	73				20	7.7	S	S 15	2.9				
15	-3.0	-9.8	-6.4	24.4	0.0	90	67				20	15.0	WNW	WNW 26	6.6				
16	-4.2	-12.4	-8.3	26.3	0.0	86	70				20	11.2	W	WNW 15*	2.2				
17	-10.8	-18.0	-14.4	32.4	0.0	89	79			Tr.	20	9.5	ENE	ENE 19	3.6				
18	-8.0	-16.2	-12.1	30.1	0.0	86	68				20	14.7	SE	ESE 22	6.7				
19	-6.0	-11.3	-8.7	26.7	0.0	91	74			7.0	20	17.0	SE	SE 30	0.0				
20	-9.1	-18.3	-13.7	31.7	0.0	88	68			Tr.	26	11.0	NW	NNW 22	4.4				
21	-6.0	-10.8	-8.4	26.4	0.0	91	78			1.6	24	13.6	S	S 30	0.0				
22	-6.0	-24.0	-15.0	33.0	0.0	93	73			Tr.	25	13.8	N,W,NW	NNW 30	4.0				
23	-20.5	-28.9	-24.7	42.7	0.0	96	78				25	8.9	NNW	NW 13*	7.0				
24	-19.0	-28.7	-23.9	41.9	0.0	97	76			Tr.	24	8.5	S	SSE 13*	1.6				
25	-15.7	-23.4	-19.6	37.6	0.0	85	76			0.2	24	10.1	S	NNW 19	0.1				
26	-16.9	-25.2	-21.1	39.1	0.0	81	64			Tr.	24	13.2	NW	NW 26	5.9				
27	-25.0	-34.7	-29.9	47.9	0.0	98	76			Tr.	24	3.7	calm	NNE 11	6.9				
28	-7.3	-32.9	-20.1	38.1	0.0	88	72			9.7	24	23.3	ENE	ENE 43	0.0				
29	-5.7	-24.4	-15.1	33.1	0.0	89	68			0.4	33	28.4	S	S 57	7.1				
30	-22.1	-27.9	-25.0	43.0	0.0	79	66				33	15.2	SW	WSW 20*	7.7				
31	-25.2	-31.5	-28.4	46.4	0.0	87	68				33	13.4	SW	SSW 19*	7.9				
MEAN / MOYENNE	-12.8	-22.7	-17.8	1109.1	0.0	88	69			Tr.		12.5	PREVAILING / SOUTH DOMINANTE	MAXIMUM / S 57	TOTAL / 139.5				
NORMAL / NORMALE	-9.2	-18.2	-13.7	983.0	0.0					0.8	23.9	22.9		19.5	SOUTH / 55	86.2			
DEGREE-DAY SUMMARY - SOMMAIRE DE DEGRÉS-JOURS										DAYS WITH TOTAL PRECIPITATION: JOURS AVEC PRÉCIPITATIONS TOTALES: mm					DAYS WITH SNOWFALL: JOURS AVEC CHÔTE DE NEIGE: cm				
BELOW 18°C / AU-DESSOUS DE 18°C	THIS YEAR / ANNÉE EN COURS	PREVIOUS YEAR / ANNÉE PRÉCÉDENTE	NORMAL / NORMALE	ABOVE 5°C / AU-DESSUS DE 5°C	THIS YEAR / ANNÉE EN COURS	PREVIOUS YEAR / ANNÉE PRÉCÉDENTE	NORMAL / NORMALE	0.2 OR MORE / OU PLUS	1.0 OR MORE / OU PLUS	2.0 OR MORE / OU PLUS	10.0 OR MORE / OU PLUS	50.0 OR MORE / OU PLUS	0.2 OR MORE / OU PLUS	1.0 OR MORE / OU PLUS	2.0 OR MORE / OU PLUS	10.0 OR MORE / OU PLUS	50.0 OR MORE / OU PLUS		
TOTAL FOR MONTH / TOTAL DU MOIS	1109.1	1098.7	983.0	TOTAL FOR MONTH / TOTAL DU MOIS	0.0	0.0	0.0	9	3	2	1	0	9	3	2	0	0		
ACCUMULATED SINCE JULY 1 / ACCUMULÉE DEPUIS LE 1 ^{ER} JUILLET	2491.7	2401.1	2246.0	ACCUMULATED SINCE APRIL 1 / ACCUMULÉE DEPUIS LE 1 ^{ER} AVRIL	1857.9	1930.7	1787.8												

UDC 551.506.1 (

)*Indicates more than one occurrence of same speed but not necessarily the same direction.

Subscription Price: \$1.00 monthly; \$10.00 per calendar year (January to December) / Prix d'abonnement: mensuel \$1.00; annuel \$10.00 (janvier à décembre)

COMPARATIVE RECORDS RELEVÉS COMPARATIFS		MONTH MOIS		DECEMBER / DECEMBRE		19 78							
Temperature/Température Precipitation/Précipitation Rainfall/Hauteur de pluie Snowfall/Hauteur de neige Wind speed/Vitesse du vent Station pressure/Pression à la station	°Celsius — Millimètres (mm) — Millimètres (mm) — Centimètres (cm) — Kilomètres/par heure (km/h) — Kilopascals (kPa)	THIS MONTH CE MOIS-CI		PREVIOUS YEAR ANNÉE PRÉCÉDENTE		NORMAL NORMALE	RECORD FOR THE MONTH RECORD POUR LE MOIS						YEARS OF RECORD D'OBSERVATIONS
		VALUE RELEVÉ	DATE	VALUE RELEVÉ	DATE		HIGHEST MAXIMUM ABSOLU			LOWEST MINIMUM ABSOLU			
							VALUE RELEVÉ	DAY JOUR	YEAR ANNÉE	VALUE RELEVÉ	DAY JOUR	YEAR ANNÉE	
HIGHEST TEMPERATURE TEMPÉRATURE LA PLUS ÉLEVÉE		0.3	4	1.8	18	2.8	11.7	6	1939	-5.0	4	1927	107
LOWEST TEMPERATURE TEMPÉRATURE LA PLUS BASSE		-34.7	27	-33.8	10	-31.7	-18.3	10	1877	-47.8	24	1879	107
MEAN MONTHLY TEMPERATURE TEMPÉRATURE MENSUELLE MOYENNE		-17.8		-17.4		-13.7	-3.4		1877	-25.9		1879	107
TOTAL MONTHLY RAINFALL HAUTEUR TOTALE MENSUELLE DE PLUIE		Tr.		1.6		0.8	23.4		1877	Nil	(several)		107
TOTAL MONTHLY SNOWFALL HAUTEUR TOTALE MENSUELLE DE NEIGE		20.4		18.3		23.9	101.3		1909	0.5		1877	107
TOTAL MONTHLY PRECIPITATION PRÉCIPITATION TOTALE MENSUELLE		20.9		18.8		22.9	101.3		1909	2.5		1892	107
NO OF DAYS WITH MEASURABLE PRECIPITATION NOMBRE DE JOURS AVEC PRÉCIPITATION MESURABLE		9		12		11	17		1955	2	(several)		95
GREATEST RAINFALL IN ONE DAY HAUTEUR DE PLUIE MAXIMALE EN UNE JOURNÉE		Tr.	12	1.1	18		15.2	22	1877				107
GREATEST SNOWFALL IN ONE DAY HAUTEUR DE NEIGE MAXIMALE EN UNE JOURNÉE		9.7*	28	9.9	17		30.5	26	1916				107
GREATEST PRECIPITATION IN ONE DAY PRÉCIPITATION MAXIMALE EN UNE JOURNÉE		10.0*	28	10.1	17		30.5	26	1916				107
MAXIMUM RAINFALL RECORDED IN: HAUTEUR DE PLUIE MAXIMALE ENREGISTRÉE EN:													
5 MINUTES													
10 MINUTES													
15 MINUTES													
30 MINUTES													
60 MINUTES													
24 CONSECUTIVE HOURS HEURES CONSECUTIVES		Tr.	12	1.1	18		15.2	22	1877				107
MEAN WIND SPEED (km/h) VITESSE MOYENNE DU VENT (km/h)		12.5		16.9		19.5	24.6		1943	12.5		1978	58
MAXIMUM SPEED (1 min.) (km/h) VITESSE MAXIMALE (1 min.) (km/h)		S 57	29	NNW 41	1,8		NW74	(several)					40
MAXIMUM GUST SPEED (km/h) POINTE DU VENT MAXIMALE (km/h)		S 85	29	S 56	11	55	NW100	11	1946				32
TOTAL HOURS OF SUNSHINE TOTAL DES HEURES INSOLATION		139.5		84.8		86.2	139.5		1978	31.7		1920	79
MEAN STATION PRESSURE (kPa) PRESSION MOYENNE À LA STATION (kPa)		98.35		98.59		98.77	99.12		1936	98.29		1953	40
GREATEST STATION PRESSURE (kPa) PRESSION MAXIMALE À LA STATION (kPa)		100.12	31	101.13	9	100.69	101.22	19	1955				40
LEAST STATION PRESSURE (kPa) PRESSION MINIMALE À LA STATION (kPa)		95.14	4	96.92	18	96.41				94.71	17	1967	40
CLIMATOLOGICAL DATA FOR THE PAST DONNÉES CLIMATOLOGIQUES POUR LES				TEN / DIX				YEARS DERNIÈRE ANNÉES					
YEAR ANNÉE	MAXIMUM TEMP. MAXIMALE	MINIMUM TEMP. MINIMALE	MEAN TEMP. MOYENNE	RAINFALL HAUTEUR DE PLUIE	SNOWFALL HAUTEUR DE NEIGE	TOTAL PRECIP. TOTALE	MEAN WINDSPEED VITESSE MOYENNE DES VENTS	MAXIMUM WINDSPEED VITESSE MAXIMALE DES VENTS	HOURS SUNSHINE HEURES INSOLATION	HEATING DEGREE-DAYS DEGRÉS-JOURS DE CHAUFFE	GROWING DEGREE-DAYS DEGRÉS-JOURS DE CROISSANCE		
1969	8.3	-27.2	-10.2	Tr.	26.2	18.8	17.1	S 43	71.2	870.0			
1970	0.0	-33.9	-17.3	2.5	27.7	23.4	19.5	WNW56	106.1	1092.8			
1971	0.6	-30.0	-15.2	0.3	7.1	5.8	19.2	NW 42	79.9	1028.9			
1972	-3.9	-32.8	-19.2	0.3	27.7	25.4	16.6	S 51	121.3	1155.0			
1973	1.1	-37.8	-15.8	6.4	15.7	19.1	16.7	NNW51	87.9	1046.7			
1974	4.4	-21.1	-8.6	Tr.	18.5	13.0	16.1	N 45	94.6	822.8			
1975	5.9	-33.7	-14.1	Tr.	18.9	17.1	17.9	ESE47	96.0	995.4			
1976	3.0	-34.7	-18.5	Nil	20.6	18.2	19.1	S 52	106.4	1131.3			
1977	1.8	-33.8	-17.4	1.6	18.3	18.8	16.9	NNW41	84.8	1098.7			
1978	0.3	-34.7	-17.8	Tr.	20.4	20.9	12.5	N 41 S 57	139.5	1109.1			

*Dec. 28-29 10.1

*Dec. 28-29 10.4

December 1978 was a cold very sunny month with precipitation and wind less than normal. The average temperature -17.8 was 4.1 less than normal. The high temperature 0.3 occurred December 4 and the low -34.7°C on December 27. December 28 had the greatest temperature difference between high and low for the entire year. Snowfall was 20.4 CM compared to normal of 23.9 CM. The snow melted down to precipitation of 20.9 MM compared to normal 22.9 MM

Most of our snow occurred in 2 blizzards -- December 19 and December 28-29th. The December 28-29 blizzard stranded numerous motorists. Sixty-two took refuge in one farm near Neepawa when visibility was reduced to zero in snow, and blowing snow, with winds gusty to 85 Kms/h. Sunshine total of 139.5 hours broke the all time record high of 129.5 hours set in 1943. The average wind 12.5 Kms. broke record low.

DAILY WEATHER SUMMARY FOR DECEMBER 1978AT WINNIPEG, MANITOBA

1. Cold. Sunny. Light winds.
2. Cold. Sunny. Light winds.
3. Cold. Sunny. Light winds except gusty south winds late evening. Drifting snow. Ice crystals 3:55 a.m. to 10:58 a.m. Ice fog over the city in the morning.
4. Above normal temperatures. Cloudy. Snow 1:40 a.m. to 10:45 a.m., 6:13 p.m. to 8:53 p.m. Moderate winds, Gusty S winds, Drifting snow. Visibility reduced in morning.
5. Below normal temperatures. Mostly light winds but occasional gusty NNW winds. Blowing snow 10:30 a.m. to 3:25 p.m. Snow 1:27 a.m. to 2:20 p.m. Ice crystals 2:20 p.m. to 5:40 p.m. Visibility restricted late morning and early afternoon.
6. Cold. Sunny. Light winds. Ice crystals 1:27 a.m. to 2:25 a.m.
7. Cold. Sunny. Light winds.
8. Cold. Sunny. Light winds.
9. Cold. Sunny. Light winds.
10. Cold. Cloudy. Light winds. Snow 6:12 p.m. to 8:19 p.m. Light ice fog in morning. Roads have been very icy. Numerous traffic accidents.
11. Above normal temperatures. Partly cloudy. Mostly light winds.
12. Above normal temperatures. Cloudy. Freezing drizzle 9:57 a.m. to 10:25 a.m. Snow or snowgrains 9:29 a.m. to 2:10 p.m. Blowing snow 1:55 p.m. to 5:08 p.m. Visibility restricted in the morning and afternoon. Gusty NNW winds in afternoon. Traffic accidents.
13. Above normal temperatures. Partly cloudy. Snow 4:34 a.m. to 6:20 a.m., 5:45 p.m. to 6:20 p.m. Light winds.
14. Above normal temperatures. Mostly cloudy. Light winds.
15. Mild. Mostly sunny. Mostly light winds.
16. Mild. Mostly cloudy. Light winds.
17. Normal temperatures. Partly cloudy. Ice crystals 12:50 p.m. to 3:17 p.m. Light ice fog in morning. Visibility slightly restricted.
18. Near normal temperatures. Mostly sunny, but cloudy in early morning and late evening. Mostly light winds.
19. Above normal temperatures. Cloudy. Snow 6:11 a.m. to 10:15 p.m. Visibility severely restricted. Gusty southeast winds in morning. Drifting snow. Roads dangerous.
20. Near normal temperatures. Partly cloudy. Ice crystals 3:48 a.m. to 10:34, 11:41 a.m. to 12:20 p.m. Snow 10:34 a.m. to 11:10 a.m., 6:42 p.m. continued. Light winds.
21. Above normal temperatures. Cloudy. Snow to 00:20 a.m., 10:22 a.m. to 8:30 p.m. Light winds except gusty south in evening. Visibility restricted in evening. Drifting snow.
22. Near normal temperatures. Partly cloudy. Snow 00:20 a.m. to 10:40 a.m., 2:53 p.m. to 3:27 p.m. Ice crystals 1:29 p.m. to 2:22 p.m. Ice fog 9:52 p.m. to 10:22 p.m. Visibility severely reduced. Mostly light winds, but gusty northwest wind in the morning.
23. Cold. Mostly sunny. Light winds. Light ice fog in morning. Smoke over the city in morning. Three men died of exposure near Thompson. One man severely frost bitten.
24. Cold. Mostly cloudy. Ice crystals 01:43 a.m. to 02:09 a.m. Snow 4:40 p.m. to 6:20 p.m. Light ice fog in morning. Visibility slightly reduced. Light winds. Smoke over the city.
25. Below normal temperatures. Cloudy. Ice crystals 00:27 a.m. to 5:44 a.m., 1:58 p.m. to 3:25 p.m. Snow 4:11 a.m. to 1:58 p.m., 3:25 p.m. continued. Visibility slightly reduced. Smoke over the city. Light winds.
26. Below normal temperatures. Partly cloudy. Light snow to 8:20 a.m. Ice crystals 11:58 p.m. continued. Light winds except gusty NNW wind in morning. Drifting snow.
27. Cold. Mostly sunny. Ice crystals to 11:07 a.m., 11:56 p.m. continued. Light ice fog in morning. Visibility slightly reduced. Smoke over the city. Light winds.
28. Severe blizzard. Many people stranded on highway especially near Neepawa. One farm family took in 62 travellers. Below normal temperatures. Cloudy. Ice crystals to 10:45 a.m. Snow 9:07 a.m. continued. Blowing snow 12:08 p.m. continued. Visibility severely reduced in the afternoon and evening. Patches of ice fog occurred in early morning. Strong gusty easterly winds.
29. Above normal temperatures. Mostly sunny. Snow to 01:17 a.m. Blowing snow to 10:15 a.m. Visibility severely reduced in morning. Very strong gusty south winds to 85 Km/h. till late afternoon. Drifting snow.
30. Below normal temperatures. Sunny. Mostly light winds but gusty WSW in the afternoon. Drifting snow in the afternoon.
31. Cold. Sunny. Light winds.

ALL TEMPERATURES IN DEGREES CELSIUS

DATE	00.	01.	02.	03.	04.	05.	06.	07.	08.	09.	10.	11.	12.	13.	14.	15.	16.	17.	18.	19.	20.	21.	22.	23.
1.	-25.5	-25.4	-26.0	-25.6	-26.5	-27.2	-26.2	-26.1	-26.5	-25.5	-25.0	-23.6	-23.0	-21.5	-20.4	-20.3	-20.5	-21.4	-21.1	-22.9	-22.9	-22.9	-24.1	-24.4
2.	-25.1	-24.9	-26.0	-26.1	-25.6	-25.7	-26.8	-28.3	-28.5	-27.8	-25.5	-23.5	-22.5	-21.8	-21.3	-20.8	-20.8	-21.5	-22.8	-23.6	-24.2	-24.0	-24.2	-24.8
3.	-25.5	-25.9	-26.4	-26.4	-26.8	-27.3	-27.7	-27.5	-26.7	-27.0	-24.6	-22.0	-20.4	-20.4	-19.6	-19.2	-19.2	-19.9	-20.4	-20.4	-20.0	-18.7	-17.6	-17.4
4.	-16.8	-16.1	-13.6	-12.6	-11.1	-9.6	-8.0	-5.3	-2.0	-1.4	-0.6	-0.6	-0.5	-0.2	-0.2	-0.5	-1.5	-2.5	-2.5	-2.8	-3.5	-4.6	-5.8	-7.4
5.	-9.0	-10.4	-9.7	-9.6	-10.8	-11.0	-11.5	-12.1	-13.3	-13.4	-14.0	-14.2	-14.8	-14.8	-14.8	-15.6	-16.6	-17.7	-18.5	-18.8	-19.5	-20.0	-20.9	-21.1
6.	-21.6	-22.6	-22.0	-23.8	-23.8	-24.1	-24.2	-24.5	-25.5	-24.8	-23.7	-23.4	-23.1	-22.8	-22.2	-21.9	-21.9	-23.4	-23.8	-24.5	-23.4	-24.7	-24.4	-25.5
7.	-24.9	-25.2	-25.8	-26.4	-26.8	-26.8	-25.5	-25.5	-27.6	-26.7	-24.3	-23.6	-23.7	-23.1	-21.4	-21.1	-21.2	-22.1	-22.0	-22.7	-23.1	-22.8	-23.9	-24.1
8.	-24.2	-24.6	-24.8	-25.0	-25.5	-26.0	-26.0	-26.0	-26.5	-27.1	-25.6	-25.0	-24.2	-23.1	-22.3	-22.2	-22.6	-23.1	-23.4	-23.7	-23.8	-24.8	-25.3	-25.1
9.	-25.9	-26.6	-27.0	-27.5	-28.0	-28.0	-28.0	-28.0	-28.8	-27.9	-26.1	-25.6	-22.6	-22.2	-21.8	-22.3	-23.8	-24.5	-25.2	-25.7	-25.6	-26.4	-26.6	-26.8
10	-27.0	-27.0	-27.0	-27.8	-27.8	-28.0	-28.0	-28.4	-25.3	-24.6	-23.6	-21.9	-20.5	-19.2	-18.1	-16.4	-17.9	-17.3	-16.8	-16.3	-15.8	-15.3	-14.7	-13.9
11	-13.1	-11.8	-10.6	-9.3	-9.4	-10.7	-9.5	-9.5	-8.8	-10.5	-9.5	-9.0	-8.3	-7.0	-7.5	-8.2	-8.1	-7.7	-7.6	-7.0	-6.2	-5.9	-5.6	-6.6
12	-7.4	-7.2	-9.0	-8.8	-9.5	-10.0	-10.0	-9.8	-8.2	-7.9	-8.1	-8.2	-7.3	-5.7	-5.4	-6.6	-8.0	-9.4	-11.0	-13.3	-14.4	-15.1	-15.7	-16.8
13	-17.0	-17.0	-16.4	-15.3	-14.5	-13.2	-12.0	-11.5	-12.1	-12.3	-10.2	-9.4	-8.4	-8.3	-8.1	-8.1	-8.5	-7.8	-7.3	-7.3	-6.8	-7.1	-7.1	-7.3
14	-7.5	-8.7	-10.3	-11.1	-11.6	-11.1	-11.8	-12.8	-14.2	-16.1	-13.2	-10.9	-9.9	-9.0	-9.0	-8.8	-9.2	-8.9	-8.6	-8.1	-8.1	-8.1	-8.8	-7.3
15	-7.8	-8.4	-7.5	-3.9	-3.9	-3.9	-4.2	-5.8	-6.1	-6.6	-6.1	-5.3	-4.4	-4.3	-4.6	-4.5	-3.4	-5.2	-6.6	-7.5	-6.2	-5.3	-7.2	-7.6
16	-9.7	-10.0	-11.0	-10.8	-11.2	-12.2	-11.7	-10.7	-10.2	-10.0	-8.9	-7.9	-7.0	-6.1	-5.2	-4.4	-5.8	-6.7	-6.8	-6.3	-9.5	-9.0	-10.5	-11.0
17	-11.8	-14.5	-14.7	-14.8	-15.2	-16.4	-17.5	-17.3	-16.7	-15.6	-16.4	-16.0	-14.8	-16.3	-16.5	-15.8	-17.3	-16.5	-11.8	-11.3	-12.3	-13.3	-14.2	-15.0
18	-16.2	-15.4	-14.9	-14.5	-14.7	-14.5	-13.9	-13.1	-13.3	-13.3	-13.3	-11.5	-10.8	-9.9	-9.0	-8.8	-9.1	-10.8	-11.2	-9.0	-8.5	-9.0	-8.8	-8.8
19	-10.8	-11.0	-10.5	-10.5	-9.9	-9.6	-8.7	-8.6	-8.2	-7.9	-7.3	-7.1	-6.9	-6.8	-6.2	-6.1	-6.1	-6.1	-6.1	-6.1	-6.0	-6.0	-6.8	-7.5
20	-9.3	-10.4	-13.5	-14.6	-14.6	-13.1	-13.6	-15.9	-17.8	-18.3	-17.6	-16.6	-16.6	-15.9	-15.4	-14.2	-16.0	-17.1	-15.2	-14.8	-14.8	-12.3	-11.0	-10.2
21	-9.6	-9.0	-9.0	-8.4	-7.8	-7.3	-7.0	-6.9	-6.9	-7.1	-8.0	-8.0	-6.8	-6.3	-7.3	-8.1	-8.4	-7.9	-7.3	-7.6	-7.8	-10.6	-10.2	-9.8
22	-8.4	-6.7	-6.2	-7.0	-9.0	-10.6	-11.6	-12.4	-13.8	-14.7	-15.3	-15.5	-15.4	-14.2	-14.0	-14.1	-14.4	-16.0	-17.6	-18.4	-17.9	-22.6	-17.8	-21.1
23	-23.2	-26.0	-26.2	-27.6	-27.0	-28.1	-28.2	-25.4	-24.1	-25.4	-25.5	-24.5	-24.0	-22.0	-21.2	-21.0	-22.0	-24.3	-25.1	-26.4	-24.7	-27.6	-26.7	-27.5
24	-28.2	-28.7	-28.4	-28.4	-28.2	-27.9	-27.2	-25.6	-25.0	-25.0	-24.2	-23.8	-22.6	-22.0	-21.2	-21.0	-20.3	-19.5	-19.1	-20.3	-20.6	-20.9	-22.3	-21.7
25	-21.6	-22.1	-22.4	-22.5	-23.1	-22.7	-22.5	-21.1	-21.2	-20.5	-19.6	-18.5	-17.0	-16.7	-16.0	-16.0	-15.8	-17.2	-18.1	-17.8	-14.9	-17.1	-17.3	-17.3
26	-17.2	-17.1	-17.0	-17.6	-18.4	-19.0	-19.2	-20.1	-20.9	-21.5	-21.7	-21.9	-20.9	-20.3	-20.7	-20.9	-21.8	-22.6	-24.1	-22.2	-21.7	-22.8	-24.1	-23.3
27	-25.2	-29.1	-28.1	-29.2	-28.9	-30.2	-31.1	-32.1	-32.0	-32.8	-27.7	-27.6	-27.2	-26.4	-26.9	-27.4	-27.3	-27.4	-29.5	-27.9	-30.9	-30.6	-31.8	-33.5
28	-32.5	-30.7	-32.3	-31.3	-29.0	-28.6	-27.8	-27.0	-25.9	-25.0	-23.9	-22.0	-20.4	-19.0	-17.9	-17.2	-16.0	-14.5	-14.1	-13.8	-13.0	-12.2	-10.0	-9.0
29	-7.3	-6.9	-15.1	-17.8	-19.2	-20.3	-21.0	-22.0	-22.6	-23.2	-22.8	-22.5	-23.8	-20.8	-20.3	-20.0	-20.0	-20.6	-21.9	-21.9	-23.2	-23.9	-24.0	-24.1
30	-24.4	-24.7	-26.1	-26.5	-25.7	-25.0	-25.5	-27.2	-27.9	-27.0	-25.2	-23.4	-23.5	-22.9	-22.6	-22.3	-22.6	-23.8	-24.5	-25.2	-25.1	-24.7	-24.4	-25.0
31	-25.5	-26.0	-26.4	-26.0	-28.0	-28.8	-29.5	-30.0	-31.5	-29.4	-28.9	-27.8	-27.6	-26.9	-26.5	-26.7	-26.9	-28.0	-28.6	-29.6	-29.6	-30.1	-30.8	-31.1

MEAN -17.9 -18.3 -18.7 -18.8 -19.0 -19.1 -19.1 -19.1 -19.2 -19.1 -18.2 -17.4 -16.6 -15.9 -15.5 -15.4 -15.8 -16.4 -16.6 -16.8 -14.9 -17.3 -17.4 -17.7

LOCAL STANDARD TIME

ALL TEMPERATURES IN DEGREES CELSIUS

DATE	00.	01.	02.	03.	04.	05.	06.	07.	08.	09.	10.	11.	12.	13.	14.	15.	16.	17.	18.	19.	20.	21.	22.	23.
1.	-25.4	-25.4	-26.0	-25.7	-26.5	-27.2	-26.2	-26.1	-26.5	-25.5	-25.1	-23.8	-23.2	-21.9	-20.7	-20.5	-20.8	-21.6	-21.2	-22.9	-22.9	-22.9	-24.1	-24.4
2.	-25.1	-24.9	-25.2	-25.8	-26.4	-27.2	-26.7	-28.2	-28.4	-27.8	-25.5	-23.6	-22.8	-22.2	-21.6	-21.0	-21.0	-21.6	-22.9	-23.6	-24.2	-24.0	-24.2	-24.8
3.	-25.5	-25.8	-26.3	-26.3	-26.7	-27.2	-27.6	-28.4	-26.6	-26.9	-24.6	-22.1	-20.6	-20.6	-19.9	-19.6	-19.5	-20.0	-20.5	-20.5	-20.2	-19.0	-17.9	-17.7
4.	-17.1	-16.3	-14.0	-12.8	-11.3	-9.8	-8.4	-5.7	-2.5	-2.1	-1.6	-1.6	-1.6	-1.5	-1.5	-1.6	-2.5	-3.5	-3.5	-3.2	-5.1	-6.3	-8.0	
5.	-9.5	-10.8	-10.1	-9.9	-11.3	-11.5	-11.8	-12.5	-13.5	-13.5	-14.4	-14.5	-15.0	-15.0	-15.0	-15.8	-16.8	-17.8	-18.6	-19.0	-19.7	-20.1	-21.0	-21.2
6.	-21.7	-22.7	-22.1	-23.8	-23.8	-24.1	-24.2	-24.5	-25.5	-24.8	-23.7	-23.6	-23.4	-23.2	-22.5	-22.1	-22.1	-23.5	-23.8	-24.5	-23.5	-24.7	-24.4	-25.5
7.	-24.9	-25.2	-25.2	-25.8	-26.4	-26.8	-25.5	-25.9	-27.6	-26.7	-24.4	-23.7	-22.8	-22.3	-21.6	-21.3	-21.4	-22.1	-22.0	-22.7	-23.1	-22.8	-23.9	-24.1
8.	-24.2	-24.6	-24.8	-24.9	-25.4	-25.9	-25.9	-26.4	-27.1	-25.6	-25.1	-24.3	-23.3	-23.3	-22.5	-22.4	-22.8	-23.2	-23.4	-23.7	-23.8	-24.8	-25.3	-25.1
9.	-25.9	-26.6	-27.0	-27.4	-27.9	-27.9	-27.9	-28.6	-27.8	-26.1	-25.7	-23.0	-22.7	-22.1	-22.6	-23.9	-24.6	-25.2	-25.7	-25.6	-26.4	-26.6	-26.8	
10	-26.9	-26.8	-26.9	-27.8	-27.8	-27.7	-26.3	-25.2	-24.6	-23.6	-22.0	-20.6	-19.4	-18.3	-16.7	-18.1	-17.5	-17.0	-16.5	-16.0	-15.5	-14.9	-14.1	
11	-13.2	-12.1	-10.8	-9.5	-8.4	-10.7	-9.7	-9.7	-9.4	-10.9	-9.9	-9.8	-9.2	-8.0	-8.5	-9.0	-8.7	-8.4	-8.2	-7.6	-7.0	-6.7	-6.4	-7.2
12	-7.8	-7.6	-9.2	-9.1	-9.7	-10.2	-10.2	-9.8	-8.4	-8.2	-8.4	-8.4	-7.5	-6.0	-5.8	-7.0	-8.4	-9.7	-11.3	-13.5	-14.6	-15.2	-15.9	-17.0
13	-17.1	-17.1	-16.5	-15.4	-14.6	-13.3	-12.1	-11.6	-12.2	-12.5	-10.5	-9.0	-9.0	-8.9	-8.9	-8.9	-9.2	-8.6	-8.1	-8.1	-7.5	-7.7	-7.8	-7.9
14	-8.1	-9.0	-10.5	-11.3	-11.7	-11.2	-11.9	-12.9	-14.3	-16.2	-13.5	-11.4	-10.5	-9.7	-9.6	-9.4	-9.9	-9.5	-9.2	-8.7	-8.7	-8.6	-9.1	-7.8
15	-8.1	-8.6	-7.7	-4.2	-4.2	-4.2	-4.8	-6.3	-6.5	-7.0	-6.8	-6.4	-5.8	-5.6	-5.7	-5.5	-4.5	-6.1	-7.3	-8.1	-6.8	-6.2	-7.7	-8.3
16	-10.1	-10.5	-11.4	-11.3	-11.7	-12.5	-12.0	-11.2	-10.7	-10.5	-9.6	-8.7	-8.0	-7.1	-6.3	-5.4	-6.7	-7.3	-7.4	-8.6	-9.7	-9.5	-10.9	-11.4
17	-12.1	-14.5	-14.7	-14.9	-15.3	-16.4	-17.4	-17.3	-16.6	-16.4	-16.0	-15.0	-15.0	-16.3	-16.5	-15.9	-17.3	-16.5	-11.8	-11.4	-12.3	-13.4	-14.3	-15.1
18	-16.2	-15.4	-15.0	-14.7	-14.8	-14.6	-14.0	-13.4	-13.5	-13.4	-13.5	-11.8	-11.2	-10.5	-9.8	-9.7	-10.0	-11.4	-11.7	-9.3	-8.8	-9.3	-9.2	-9.2
19	-11.3	-11.4	-11.0	-11.0	-10.5	-10.1	-9.3	-8.8	-8.4	-8.0	-7.5	-7.3	-7.1	-7.0	-6.5	-6.4	-6.3	-6.3	-6.3	-6.3	-6.2	-6.2	-6.9	-7.6
20	-9.4	-10.5	-13.5	-14.6	-14.6	-13.2	-13.8	-15.9	-17.8	-18.2	-17.6	-17.0	-16.8	-16.0	-15.6	-14.5	-16.2	-17.3	-15.4	-15.0	-15.0	-12.5	-11.2	-10.3
21	-9.9	-9.4	-9.4	-8.8	-8.2	-7.7	-7.5	-7.4	-7.4	-7.5	-8.4	-8.4	-7.3	-7.0	-7.8	-8.5	-8.5	-8.0	-7.5	-7.8	-8.0	-10.5	-10.2	-9.9
22	-8.7	-7.0	-6.5	-7.3	-9.3	-11.0	-12.0	-12.0	-12.0	-15.0	-15.6	-15.8	-15.7	-14.6	-14.3	-14.2	-14.5	-16.0	-17.5	-18.3	-17.5	-22.4	-17.6	-20.9
23	-23.0	-25.9	-26.1	-27.5	-26.9	-28.0	-28.1	-25.3	-24.1	-25.4	-25.5	-24.5	-24.0	-22.0	-21.2	-21.2	-24.2	-24.0	-24.2	-24.9	-26.2	-26.5	-27.4	-27.3
24	-28.0	-28.5	-28.2	-28.3	-28.1	-27.7	-27.1	-25.5	-24.9	-25.0	-24.2	-23.8	-22.6	-22.0	-21.2	-21.1	-20.4	-19.6	-19.1	-20.3	-20.6	-20.9	-22.3	-21.7
25	-21.6	-22.1	-22.4	-22.5	-23.1	-22.7	-22.5	-21.2	-21.3	-20.5	-19.7	-18.6	-17.0	-16.8	-16.1	-16.2	-15.9	-17.2	-18.1	-17.8	-16.9	-17.1	-17.3	-17.3
26	-17.2	-17.2	-17.1	-17.8	-18.6	-19.1	-19.3	-20.2	-21.0	-21.5	-21.8	-22.0	-21.0	-20.5	-21.0	-21.2	-22.0	-22.7	-24.1	-22.2	-21.7	-22.8	-24.1	-23.3
27	-25.2	-29.0	-28.0	-29.1	-28.8	-30.1	-31.0	-32.0	-31.9	-32.7	-27.7	-27.5	-27.1	-26.3	-26.8	-27.3	-27.2	-29.3	-29.3	-27.8	-30.8	-30.5	-31.7	-33.4
28	-32.4	-30.6	-32.2	-31.2	-28.9	-28.5	-27.7	-27.0	-25.9	-25.0	-24.0	-22.1	-20.5	-19.0	-18.0	-17.3	-16.0	-14.7	-14.2	-13.9	-13.1	-12.3	-10.1	-9.2
29	-7.5	-7.1	-15.2	-17.9	-19.3	-20.4	-21.1	-22.0	-22.7	-23.3	-22.9	-22.6	-22.0	-21.0	-20.5	-20.2	-20.2	-20.8	-22.0	-22.0	-23.3	-23.9	-24.0	-24.1
30	-24.4	-24.8	-26.1	-26.5	-25.7	-25.0	-25.6	-27.2	-27.9	-27.0	-25.2	-24.5	-23.7	-23.1	-22.7	-22.5	-22.7	-23.8	-24.5	-25.2	-25.2	-24.8	-24.5	-25.1
31	-25.5	-26.0	-26.4	-26.0	-28.0	-28.8	-29.4	-29.9	-31.4	-29.3	-28.9	-27.8	-27.6	-26.9	-26.6	-26.8	-26.9	-28.0	-28.6	-29.6	-29.6	-30.1	-30.7	-31.1

MEAN -18.1 -18.4 -18.8 -18.9 -19.1 -19.2 -19.2 -19.2 -19.3 -19.2 -18.4 -17.6 -16.9 -16.2 -15.9 -15.8 -16.1 -16.6 -16.8 -17.0 -17.1 -17.4 -17.5 -17.9

ALL TIMES ARE C.S.T. VELOCITY IN KILOMETERS PER HOUR INTERNATIONAL AIRPORT FOR THE MONTH OF DECEMBER

STARTING HOUR	00	01	02	03	04	05	06	07	08	09	10	11	12	13	14	15	16	17	18	19	20	21	22	23	PEAK GUSTS	HOUR
1	W	WNW	W	W	W	W	W	WNW	WNW	WNW	WNW	WNW	W	WNW	WNW	W	WNW	WNW	W	WNW	WNW	WNW	WNW	WNW		
2	W	WNW	W	W	C	C	S	SSW	S	S	S	S	S	S	S	S	SSW	S	S	S	S	S	S	S	S	S
3	S	S	S	S	S	S	S	S	S	S	S	S	SSW	S	S	S	SSW	S	S	S	S	S	S	S	S	S
4	S	SSW	S	SSW	SSW	SSW	SSW	W	WNW	WNW	WNW	WNW	WNW	WNW	WNW	WNW	WNW	W	WNW	WNW	WNW	WNW	WNW	WNW	WNW	WNW
5	NW	WNW	NW	NW	NW	NW	NW	NW	NW	NW	NW	NW	NW	NW	NW	NW	NW	NW	NW	NW	NW	NW	NW	NW	NW	NW
6	NW	W	W	WNW	WNW	WNW	W	WNW	WNW	W	WNW	WNW	W	WNW	W	WNW	W	WNW	W	WNW	W	WNW	W	WNW	W	WNW
7	W	W	SW	W	W	W	W	W	SW	SW	SW	W	SW	W	W	W	W	W	W	W	W	W	W	W	W	W
8	W	W	W	W	W	W	W	W	W	W	W	W	W	W	W	W	W	W	W	W	W	W	W	W	W	W
9	NW	WNW	WNW	WNW	WNW	WNW	WNW	WNW	WNW	WNW	WNW	WNW	W	WNW	W	WNW	W	WNW	W	WNW	W	WNW	W	WNW	W	WNW
10	S	SSW	S	SSE	S	S	S	S	S	S	S	S	S	S	S	S	S	S	S	S	S	S	S	S	S	S
11	SSW	SSW	SSW	SSW	SSW	SSW	SSW	SSW	SSW	SSW	SSW	SSW	SSW	SSW	SSW	SSW	SSW	SSW	SSW	SSW	SSW	SSW	SSW	SSW	SSW	SSW
12	SSW	SSW	SSW	SSW	SSW	SSW	SSW	SSW	SSW	SSW	SSW	SSW	SSW	SSW	SSW	SSW	SSW	SSW	SSW	SSW	SSW	SSW	SSW	SSW	SSW	SSW
13	NW	WNW	WNW	WNW	WNW	WNW	WNW	WNW	WNW	WNW	WNW	WNW	WNW	WNW	WNW	WNW	WNW	WNW	WNW	WNW	WNW	WNW	WNW	WNW	WNW	WNW
14	WSW	W	NW	WNW	W	NW	WNW	W	NW	WNW	W	NW	WNW	W	NW	WNW	W	NW	WNW	W	NW	WNW	W	NW	WNW	W
15	WNW	WNW	W	WNW	WNW	WNW	WNW	WNW	WNW	WNW	WNW	WNW	WNW	WNW	WNW	WNW	WNW	WNW	WNW	WNW	WNW	WNW	WNW	WNW	WNW	WNW
16	WNW	WNW	WNW	WNW	WNW	WNW	WNW	WNW	WNW	WNW	WNW	WNW	WNW	WNW	WNW	WNW	WNW	WNW	WNW	WNW	WNW	WNW	WNW	WNW	WNW	WNW

00 CST

01 CST

05 CST

14 CST

16 CST

03 CST

S 52

S 52

NNW48

S 32

NNW54

NNW35

