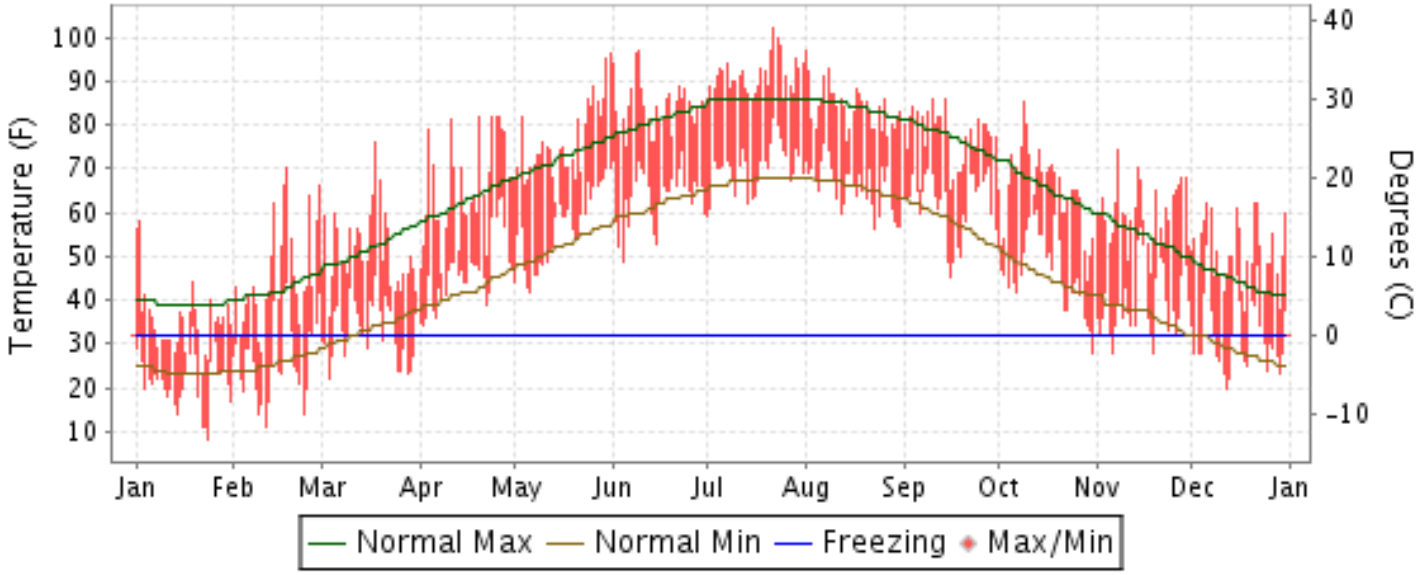
2011
LOCAL CLIMATOLOGICAL DATA
ANNUAL SUMMARY WITH COMPARATIVE DATA

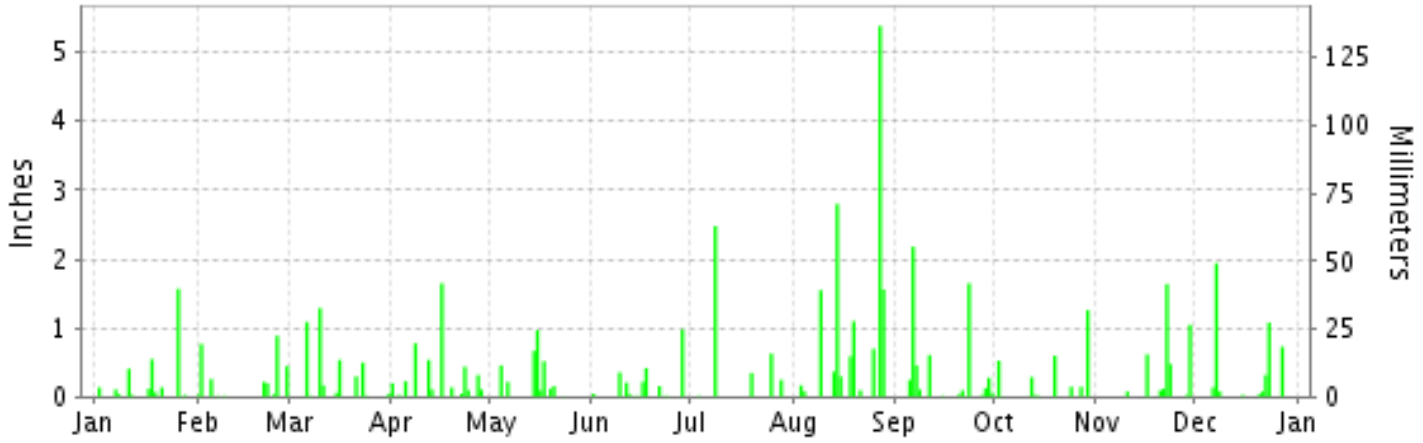
ISSN 0198-1145

WILMINGTON,
DELAWARE (KILG)

Daily Max/Min Temperature



Daily Precipitation



Daily Station Pressure

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NATIONAL OCEANIC AND ATMOSPHERIC ADMINISTRATION

NATIONAL ENVIRONMENTAL SATELLITE, DATA AND INFORMATION SERVICE

NATIONAL CLIMATIC DATA CENTER ASHEVILLE, NORTH CAROLINA

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METEOROLOGICAL DATA FOR 2011
WILMINGTON (KILG)

LATITUDE: 39° 40'N **LONGITUDE:** -75° 36'W **ELEVATION (FT):** GRND: 79 BARO: 77 **TIME ZONE:** EASTERN (UTC -5) **WBAN:** 13781

	ELEMENT	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	YEAR
TEMPERATURE °F	MEAN DAILY MAXIMUM	35.3	45.5	51.5	65.5	76.0	84.2	91.2	84.0	77.3	65.4	59.8	50.8	65.5
	HIGHEST DAILY MAXIMUM	58	70	76	82	96	97	102	97	86	85	74	62	102
	DATE OF OCCURRENCE	02	18	18	26+	31	09	22	01	14+	09	08	22+	JUL 22
	MEAN DAILY MINIMUM	21.6	26.3	33.0	46.4	56.5	63.8	70.4	65.9	62.2	46.8	39.3	31.9	47.0
	LOWEST DAILY MINIMUM	8	11	22	34	42	49	59	56	45	28	28	20	8
	DATE OF OCCURRENCE	24	11	03	02	06	04	01	23	16	31	19+	12	JAN 24
	AVERAGE DRY BULB	28.5	35.9	42.3	56.0	66.3	74.0	80.8	75.0	69.8	56.1	49.6	41.4	56.3
	MEAN WET BULB	26.0	31.9	37.3	51.1	61.1	67.6	72.8	69.6	67.5	52.1	46.2	39.1	51.9
	MEAN DEW POINT	19.7	24.0	29.1	46.5	58.2	63.2	68.8	66.5	65.5	48.3	41.7	34.5	47.2
	NUMBER OF DAYS WITH:													
	MAXIMUM >= 90°	0	0	0	0	2	3	18	4	0	0	0	0	27
	MAXIMUM <= 32°	11	4	0	0	0	0	0	0	0	0	0	0	15
	MINIMUM <= 32°	30	21	16	0	0	0	0	0	0	1	6	20	94
	MINIMUM <= 0°	0	0	0	0	0	0	0	0	0	0	0	0	0
H/C	HEATING DEGREE DAYS	1126	807	697	291	75	0	0	0	30	276	457	728	4487
	COOLING DEGREE DAYS	0	0	0	30	122	278	496	319	183	8	0	0	1436
RH	MEAN (PERCENT)	70	64	64	74	79	71	70	78	88	79	77	76	74
	HOUR 01 LST	76	72	72	83	92	86	87	91	97	92	88	87	85
	HOUR 07 LST	76	73	70	79	81	74	72	81	94	88	88	84	80
	HOUR 13 LST	60	52	52	63	63	53	50	62	73	60	58	61	59
	HOUR 19 LST	68	60	62	72	77	70	69	79	90	79	77	77	73
S	PERCENT POSSIBLE SUNSHINE													
W/O	NUMBER OF DAYS WITH:													
	HEAVY FOG(VISBY <= 1/4 MI)	1	3	0	1	2	1	1	3	3	2	5	2	24
	THUNDERSTORMS	0	1	1	0	5	4	2	7	1	0	0	0	21
CLOUDINESS	SUNRISE-SUNSET: (OKTAS)													
	CEILOMETER (<= 12,000 FT.)													
	SATELLITE (> 12,000 FT.)													
	MIDNIGHT-MIDNIGHT: (OKTAS)													
	CEILOMETER (<= 12,000 FT.)													
	SATELLITE (> 12,000 FT.)													
	NUMBER OF DAYS WITH:													
	CLEAR													
	PARTLY CLOUDY													
	CLOUDY													
PR	MEAN STATION PRESS. (IN.)	29.92	29.95	30.04	29.86	29.87	29.83	29.84	29.78	29.93	29.92	30.03	30.09	29.92
	MEAN SEA-LEVEL PRESS. (IN.)	30.00	30.04	30.13	29.94	29.97	29.92	29.93	29.87	30.01	30.01	30.12	30.18	30.01
WINDS	RESULTANT SPEED (MPH)	5.0	5.4	2.0	1.9	1.6	2.1	2.5	1.1	1.4	2.1	1.9	3.4	1.9
	RES. DIR. (TENS OF DEGS.)	31	29	33	22	16	28	25	25	13	30	26	28	28
	MEAN SPEED (MPH)	8.4		10.2	10.4	7.6	6.6	6.7	7.3	5.9	7.8	7.0	7.1	
	PREVAIL.DIR.(TENS OF DEGS.)	31	31	32	16	16	31	24	18	15	25	20	32	31
	MAXIMUM 2-MINUTE WIND													
	SPEED (MPH)	31	45	38	40	30	38	29	38	28	29	29	37	45
	DIR. (TENS OF DEGS.)	31	30	16	14	36	31	19	28	33	24	35	29	30
	DATE OF OCCURRENCE	09	25	10	16	07	09	08	28	15	15	23	28	FEB 25
	MAXIMUM 3-SECOND WIND:													
	SPEED (MPH)	40	58	51	54	38	48	38	56	35	39	40	45	58
	DIR. (TENS OF DEGS.)	30	28	15	14	35	32	19	03	32	08	32	29	28
	DATE OF OCCURRENCE	21	25	10	16	07	09	08	27	15	29	11	28	FEB 25
PRECIPITATION	WATER EQUIVALENT:													
	TOTAL (IN.)	3.22	2.90	4.05	4.71	3.23	2.49	3.73	14.70	5.93	3.05	4.13	4.44	56.58
	GREATEST 24-HOUR (IN.)	1.58	0.93	1.43	1.65	1.43	0.98	2.48	6.94	2.31	1.26	1.96	2.00	6.94
	DATE OF OCCURRENCE	26-27	24-25	10-11	16	14-15	28	08	27-28	06-07	29	22-23	07-08	AUG 27-28
	NUMBER OF DAYS WITH:													
	PRECIPITATION 0.01	12	10	11	14	9	11	5	12	14	10	9	9	126
	PRECIPITATION 0.10	7	6	6	11	8	6	4	11	9	6	6	5	85
	PRECIPITATION 1.00	1	0	2	1	0	0	1	5	2	1	2	2	17
SNOWFALL	SNOW,ICE PELLETS,HAIL													
	TOTAL (IN.)	18.0	5.0	T	0.0	0.0	0.0	0.0	0.0	0.0	0.3	0.0	0.1	23.4
	GREATEST 24-HOUR (IN.)	10.3	2.6	T	0.0	0.0	0.0	0.0	0.0	0.0	0.3	0.0	0.1	10.3
	DATE OF OCCURRENCE	26	22	24							29		18	JAN 26
	MAXIMUM SNOW DEPTH (IN.)	8	6	0	0	0	0	0	0	0	0	0	0	8
	DATE OF OCCURRENCE	27	01											JAN 27
	NUMBER OF DAYS WITH:													
	SNOWFALL >= 1.0	3	2	0	0	0	0	0	0	0	0	0	0	5

NORMALS, MEANS, AND EXTREMES
WILMINGTON (KILG)

LATITUDE: 39° 40'N **LONGITUDE:** -75° 36'W **ELEVATION (FT):** GRND: 79 BARO: 77 **TIME ZONE:** EASTERN (UTC -5) **WBAN:** 13781

	ELEMENT	POR	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	YEAR
TEMPERATURE °F	NORMAL DAILY MAXIMUM	30	39.3	42.5	51.9	62.6	72.5	81.1	86.0	84.1	77.2	65.9	55.0	44.4	63.5
	MEAN DAILY MAXIMUM	64	39.9	42.7	51.7	63.2	72.8	81.5	86.0	84.2	77.5	66.5	55.4	44.2	63.8
	HIGHEST DAILY MAXIMUM	64	75	78	86	94	96	100	103	101	100	91	85	75	103
	YEAR OF OCCURRENCE		1950	1985	1998	1985	2011	1994	2010	1955	1983	1951	1950	1998	JUL 2010
	MEAN OF EXTREME MAXS.	64	60.1	62.3	73.3	82.6	88.2	93.2	95.5	93.4	89.7	81.8	72.6	63.6	79.7
	NORMAL DAILY MINIMUM	30	23.7	25.8	33.4	42.1	52.4	61.8	67.3	65.8	58.1	45.6	36.9	28.4	45.1
	MEAN DAILY MINIMUM	64	24.0	25.6	33.0	42.3	52.1	61.6	66.9	65.5	58.0	46.0	36.9	28.0	45.0
	LOWEST DAILY MINIMUM	64	-14	-6	2	18	30	41	48	43	36	24	14	-7	-14
	YEAR OF OCCURRENCE		1985	1979	1984	1982	1978	1972	1988	1982	1974	1976	1955	1983	JAN 1985
	MEAN OF EXTREME MINS.	64	7.6	9.7	18.1	29.3	38.6	49.2	56.0	53.7	43.1	31.9	22.6	12.9	31.1
	NORMAL DRY BULB	30	31.5	34.2	42.7	52.4	62.5	71.5	76.6	75.0	67.7	55.8	45.9	36.4	54.4
	MEAN DRY BULB	64	32.0	34.2	42.3	52.8	62.5	71.7	76.5	74.9	67.8	56.3	46.1	36.1	54.4
	MEAN WET BULB	28	27.9	29.4	36.0	45.6	55.5	64.5	68.6	67.7	61.6	50.5	41.4	32.6	48.4
	MEAN DEW POINT	28	24.4	25.2	31.8	41.6	52.5	61.7	66.5	65.7	59.4	47.8	37.8	28.4	45.2
	NORMAL NO. DAYS WITH:														
	MAXIMUM >= 90	30	0.0	0.0	0.0	0.2	1.0	3.5	9.0	5.4	1.5	0.0	0.0	0.0	20.6
	MAXIMUM <= 32	30	7.7	5.0	0.7	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.1	3.5	17.0
	MINIMUM <= 32	30	24.9	21.0	13.7	2.8	*	0.0	0.0	0.0	0.0	1.3	9.8	21.2	94.7
	MINIMUM <= 0	30	0.5	0.3	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.1	0.9
H/C	NORMAL HEATING DEG. DAYS	30	1029	864	687	376	132	15	1	2	49	297	564	872	4888
	NORMAL COOLING DEG. DAYS	30	0	0	2	9	62	215	368	317	135	16	1	0	1125
RH	NORMAL (PERCENT)	30	68	65	63	63	68	69	70	72	73	72	69	69	68
	HOUR 01 LST	30	73	71	70	71	79	81	81	83	84	82	76	74	77
	HOUR 07 LST	30	76	74	73	72	76	77	79	83	85	85	80	76	78
	HOUR 13 LST	30	60	55	51	50	54	55	55	57	57	55	56	59	55
	HOUR 19 LST	30	67	62	59	57	63	64	64	68	71	69	67	67	65
S	PERCENT POSSIBLE SUNSHINE														
W/O	MEAN NO. DAYS WITH:														
	HEAVY FOG(VISBY <= 1/4 MI)	48	3.3	2.6	2.3	1.7	1.7	1.3	1.0	1.2	1.6	3.0	3.0	2.9	25.6
	THUNDERSTORMS	64	0.2	0.3	1.0	2.1	3.8	5.3	5.8	5.1	2.3	0.8	0.5	0.2	27.4
CLOUDINESS	MEAN:														
	SUNRISE-SUNSET (OKTAS)														
	MIDNIGHT-MIDNIGHT (OKTAS)														
	MEAN NO. DAYS WITH:														
	CLEAR	1	2.0	2.0	6.0		8.0	9.0	3.0	7.0	5.0	9.0		5.0	
	PARTLY CLOUDY	1	1.0	1.0	6.0		4.0	5.0	1.0	4.0	3.0	2.0		2.0	
	CLOUDY	1	4.0	5.0	11.0		6.0	8.0		2.0	7.0	3.0		8.0	
PR	MEAN STATION PRESSURE(IN)	28	30.00	29.98	29.96	29.89	29.91	29.88	29.90	29.93	29.98	30.00	30.01	30.02	29.96
	MEAN SEA-LEVEL PRES. (IN)	28	30.09	30.07	30.05	29.98	29.99	29.97	29.98	30.02	30.06	30.09	30.10	30.10	30.04
WINDS	MEAN SPEED (MPH)	28	9.2	9.8	10.3	9.9	8.5	7.8	7.5	7.0	7.5	7.6	8.5	8.9	8.5
	PREVAIL.DIR(TENS OF DEGS)	36	31	31	31	31	17	17	31	19	32	32	31	31	31
	MAXIMUM 2-MINUTE:														
	SPEED (MPH)	17	51	45	47	46	48	52	45	40	43	38	47	45	52
	DIR. (TENS OF DEGS)		15	30	24	33	24	31	32	14	13	29	29	31	31
	YEAR OF OCCURRENCE		1999	2011	2008	1995	1999	2009	1995	1997	2003	2009	2003	2010	JUN 2009
	MAXIMUM 3-SECOND														
	SPEED (MPH)	17	61	60	56	60	61	76	56	56	53	52	61	62	76
	DIR. (TENS OF DEGS)		23	26	24	29	23	31	26	03	12	29	29	31	31
	YEAR OF OCCURRENCE		1999	2009	2008	2007	1999	2009	2006	2011	2003	2009	2005	2010	JUN 2009
PRECIPITATION	NORMAL (IN)	30	3.43	2.81	3.97	3.39	4.15	3.59	4.28	3.51	4.01	3.08	3.19	3.40	42.81
	MAXIMUM MONTHLY (IN)	64	8.41	7.02	9.17	8.55	7.38	9.90	12.63	14.70	12.68	8.01	7.84	8.58	14.70
	YEAR OF OCCURRENCE		1978	1979	2000	2007	1983	2003	1989	2011	1999	1995	1972	2009	AUG 2011
	MINIMUM MONTHLY (IN)	64	0.52	0.30	0.29	0.35	0.22	0.21	0.16	0.25	.44	0.08	0.49	0.19	0.08
	YEAR OF OCCURRENCE		1981	2009	2006	1985	1964	1988	1955	1972	2005	2000	1976	1955	OCT 2000
	MAXIMUM IN 24 HOURS (IN)	64	2.53	2.35	4.87	4.39	2.72	4.35	6.83	6.94	8.43	3.88	3.83	2.38	8.43
	YEAR OF OCCURRENCE		1998	2003	2000	2007	1990	1972	1989	2011	1999	1966	1956	2008	SEP 1999
	NORMAL NO. DAYS WITH:														
	PRECIPITATION >= 0.01	30	10.9	9.5	10.5	10.7	11.5	10.4	9.3	8.5	9.0	8.0	9.2	10.3	117.8
	PRECIPITATION >= 1.00	30	1.0	0.6	1.1	0.8	0.9	0.8	1.2	1.1	1.2	0.8	0.8	1.0	11.3
SNOWFALL	NORMAL (IN)	30	7.5	6.3	2.2	0.3	0.0	0.0	0.0	0.0	0.0	0.1	0.6	1.9	18.9
	MAXIMUM MONTHLY (IN)	60	26.2	46.9	20.3	2.6	T	T	T	0.0	0.0	2.5	11.9	21.5	46.9
	YEAR OF OCCURRENCE		1996	2010	1958	1982	1991	1992	2007			1979	1953	1966	FEB 2010
	MAXIMUM IN 24 HOURS (IN)	60	22.0	19.4	15.6	2.4	T	T	T	0.0	0.0	2.5	11.9	17.0	22.0
	YEAR OF OCCURRENCE'		1996	2010	1958	1987	1991	1992	1990			1979	1953	2009	JAN 1996
	MAXIMUM SNOW DEPTH (IN)	55	13	25	8	2	0	0	0	0	0	T	9	13	25
	YEAR OF OCCURRENCE		1987	2003	1956	1987						1962	1953	2009	FEB 2003
	NORMAL NO. DAYS WITH:														
	SNOWFALL >= 1.0	30	2.2	1.4	0.5	0.2	0.0	0.0	0.0	0.0	0.0	0.0	0.2	0.7	5.2

PRECIPITATION (inches) 2011 WILMINGTON (KILG)

YEAR	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	ANNUAL
1982	3.75	2.71	2.87	5.41	3.72	4.70	2.70	4.68	2.30	1.97	3.87	2.39	41.07
1983	2.98	3.55	6.84	6.80	7.38	3.94	2.33	1.29	3.44	3.87	5.48	6.80	54.70
1984	1.25	4.27	5.40	4.24	5.03	4.54	6.53	1.56	2.02	3.31	1.63	1.94	41.72
1985	1.56	2.05	2.03	0.35	5.52	1.37	6.91	2.28	4.56	1.84	4.46	0.80	33.73
1986	4.21	2.77	1.19	2.77	1.69	4.05	3.99	2.88	2.75	4.04	6.42	6.11	42.87
1987	4.35	1.52	1.16	2.63	3.15	2.31	4.09	4.21	4.85	2.31	3.50	1.90	35.98
1988	2.46	4.14	1.82	2.59	4.95	0.21	8.29	3.03	2.18	1.94	5.29	0.90	37.80
1989	2.48	2.75	3.69	2.76	6.57	5.43	12.63	1.97	4.31	3.92	1.99	1.27	49.77
1990	3.56	1.35	2.15	3.42	7.03	3.94	4.27	6.15	2.64	2.85	1.61	5.16	44.13
1991	4.30	0.97	4.64	3.28	1.98	3.41	3.71	5.38	5.36	1.27	1.26	4.26	39.82
1992	1.05	1.81	4.36	1.76	4.48	3.14	4.34	2.21	4.30	1.11	4.27	4.21	37.04
1993	2.64	3.11	7.50	5.87	3.95	1.60	4.04	2.65	6.26	2.77	2.85	3.51	46.75
1994	5.00	3.55	7.36	2.85	3.69	2.11	7.01	5.68	2.10	0.85	2.96	2.24	45.40
1995	3.08	2.28	2.47	2.10	3.50	1.26	2.89	2.03	5.17	8.01	4.31	2.17	39.27
1996	4.58	1.19	3.63	4.98	3.27	5.00	6.25	3.04	4.05	4.70	3.25	7.96	51.90
1997	1.83	1.83	3.49	1.49	0.82	1.75	3.08	3.66	1.93	2.33	3.24	2.57	28.02
1998	4.80	2.95	4.86	2.91	4.13	4.66	2.18	3.14	1.76	2.80	1.26	1.01	36.46
1999	5.41	3.51	3.96	3.36	3.56	1.62	0.89	4.24	12.68	3.42	2.09	2.94	47.68
2000	3.83	2.00	9.17	3.43	2.94	4.83	4.64	2.47	7.30	0.08	2.54	2.80	46.03
2001	3.13	2.81	5.62	1.43	5.33	4.28	2.35	2.65	2.57	0.74	0.99	1.95	33.85
2002	2.72	0.43	4.05	2.26	3.40	4.96	1.40	2.03	3.42	6.16	4.47	4.50	39.80
2003	1.79	5.21	4.75	2.62	3.92	9.90	2.85	4.21	7.39	4.39	3.37	4.93	55.33
2004	1.66	2.33	2.96	5.61	4.41	6.98	8.24	5.33	9.29	2.43	4.65	2.84	56.73
2005	3.84	2.65	4.10	5.12	2.26	2.25	4.82	1.35	0.44	7.79	2.41	3.22	40.25
2006	4.14	2.38	0.29	4.36	2.22	9.40	6.05	2.59	6.18	5.56	4.31	1.93	49.41
2007	3.52	1.94	4.61	8.55	1.02	2.72	3.15	3.38	0.49	5.92	1.69	4.82	41.81
2008	1.57	4.32	4.00	1.97	5.12	2.71	4.69	1.16	5.19	1.81	3.51	4.39	40.44
2009	2.90	0.30	1.89	4.03	3.89	6.67	3.94	6.73	4.91	5.90	2.32	8.58	52.06
2010	2.52	5.87	5.37	2.43	2.32	1.83	6.15	1.34	5.95	5.48	2.29	2.41	43.96
2011	3.22	2.90	4.05	4.71	3.23	2.49	3.73	14.70	5.93	3.05	4.13	4.44	56.58
POR= 64 YRS	3.12	2.85	3.89	3.42	3.61	3.63	4.21	3.80	3.99	3.12	3.24	3.52	42.40

WBAN : 13781

AVERAGE TEMPERATURE (°F) 2011 WILMINGTON (KILG)

YEAR	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	ANNUAL
1982	24.2	34.2	41.8	50.6	65.0	69.9	77.3	72.0	67.4	56.0	47.5	41.3	53.9
1983	35.2	35.3	45.9	53.1	61.0	71.8	77.6	77.0	69.3	56.9	46.7	32.1	55.2
1984	24.8	38.6	35.6	50.7	61.2	73.8	75.2	75.2	63.7	61.2	43.3	42.1	53.8
1985	27.5	37.4	47.1	58.0	65.9	70.6	76.6	74.4	69.1	58.3	51.0	32.9	55.7
1986	32.2	31.6	43.6	52.4	65.7	72.1	77.1	72.5	67.5	57.2	44.1	37.3	54.4
1987	31.4	31.9	44.6	52.3	63.1	73.5	79.1	74.3	68.3	51.7	47.4	38.6	54.7
1988	27.4	34.8	44.2	50.8	62.9	71.6	79.4	77.3	65.8	51.0	46.7	35.1	53.9
1989	36.0	34.3	42.1	51.6	62.1	74.3	75.9	74.4	68.4	57.6	44.6	25.0	53.9
1990	40.5	41.1	46.0	53.7	61.5	72.1	77.4	74.6	66.7	60.0	48.4	41.0	56.9
1991	34.3	39.7	44.9	54.7	69.1	73.6	77.3	76.7	67.2	57.6	46.8	39.5	56.8
1992	35.2	37.2	41.5	52.0	60.7	69.6	76.3	72.2	67.3	53.2	47.2	38.3	54.2
1993	37.6	31.0	39.0	52.8	65.3	72.8	79.4	77.8	68.7	55.7	47.4	36.4	55.3
1994	26.3	31.6	41.8	58.4	60.0	75.8	79.8	73.2	67.2	53.9	49.7	40.0	54.8
1995	36.6	30.3	45.3	51.5	62.2	72.0	78.7	77.1	68.2	59.3	41.3	31.3	54.5
1996	29.9	33.3	38.4	52.6	60.1	73.0	74.1	74.0	67.7	55.1	40.1	39.2	53.1
1997	31.8	38.9	43.2	50.3	58.6	69.6	75.9	72.8	65.5	55.6	43.6	37.6	53.6
1998	39.8	41.0	44.7	54.2	65.3	70.5	75.1	75.5	70.9	57.0	46.9	41.0	56.8
1999	34.8	36.9	41.7	52.7	62.9	71.6	80.0	75.8	68.1	53.8	49.4	38.8	55.5
2000	31.5	36.6	47.3	51.9	63.8	72.0	72.9	72.7	65.0	56.4	44.2	30.1	53.7
2001	31.6	36.2	39.8	53.3	62.7	73.0	72.7	77.3	65.6	56.7	50.8	42.5	55.2
2002	37.8	39.4	44.3	55.7	61.4	71.8	77.5	77.8	69.3	55.5	43.6	34.3	55.7
2003	28.7	28.7	42.8	51.0	58.1	68.8	75.7	76.5	68.5	54.2	49.3	35.8	53.2
2004	25.4	34.0	44.6	53.7	68.2	70.1	74.7	73.1	68.8	54.6	47.0	36.7	54.2
2005	31.8	35.1	38.6	53.8	57.5	72.9	77.0	77.9	71.8	57.7	47.9	33.7	54.6
2006	39.7	34.9	44.1	55.6	62.7	71.3	78.1	76.8	65.5	54.9	49.6	41.6	56.2
2007	38.3	28.1	43.6	50.6	64.8	73.1	76.6	76.4	70.5	63.5	45.4	37.6	55.7
2008	35.7	36.9	44.5	54.7	60.2	75.1	78.1	73.2	69.7	55.6	45.3	38.5	55.6
2009	28.5	36.5	42.3	54.5	63.4	70.5	73.5	76.7	66.6	55.3	49.7	35.4	54.4
2010	32.4	30.9	47.9	56.3	65.6	76.7	79.6	77.0	70.8	57.2	46.5	31.6	56.0
2011	28.5	35.9	42.3	56.0	66.3	74.0	80.8	75.0	69.8	56.1	49.6	41.4	56.3
POR= 64 YRS	32.0	34.2	42.3	52.8	62.5	71.7	76.5	74.9	67.8	56.3	46.1	36.1	54.4

HEATING DEGREE DAYS (base 65°F) 2011 WILMINGTON (KILG)

YEAR	JUL	AUG	SEP	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	TOTAL
1982-83	0	14	29	305	519	724	919	822	587	368	163	7	4457
1983-84	0	0	74	275	542	1013	1240	758	904	422	162	5	5395
1984-85	0	2	113	149	641	701	1154	766	550	248	73	7	4404
1985-86	0	0	45	213	411	986	1011	930	653	373	99	11	4732
1986-87	0	27	36	276	619	848	1032	923	628	374	143	2	4908
1987-88	0	2	22	406	521	811	1159	869	637	419	121	38	5005
1988-89	3	0	52	434	541	923	893	854	710	395	142	0	4947
1989-90	0	2	54	236	605	1231	749	661	593	368	127	6	4632
1990-91	2	1	69	214	494	734	943	700	617	320	61	5	4160
1991-92	0	0	64	244	541	785	914	799	723	386	169	12	4637
1992-93	0	1	57	363	527	817	843	945	799	360	64	12	4788
1993-94	0	0	55	286	526	879	1193	929	715	223	189	2	4997
1994-95	0	0	29	343	454	770	875	967	598	401	122	0	4559
1995-96	0	0	41	208	703	1033	1083	912	816	378	206	10	5390
1996-97	0	0	43	304	741	794	1025	729	672	436	201	56	5001
1997-98	2	0	71	324	635	844	775	667	645	317	89	27	4396
1998-99	0	0	22	241	536	738	926	782	715	362	95	7	4424
1999-00	0	1	36	340	462	807	1032	816	544	390	117	15	4560
2000-01	0	2	99	274	619	1074	1029	801	776	361	110	10	5155
2001-02	1	0	73	271	418	691	836	712	633	324	159	7	4125
2002-03	0	1	11	325	636	945	1118	1011	683	419	215	49	5413
2003-04	0	0	21	330	466	898	1221	894	623	338	60	15	4866
2004-05	0	2	14	314	533	871	1024	831	810	334	225	13	4971
2005-06	0	0	15	243	507	964	777	834	640	277	122	9	4388
2006-07	0	0	53	321	454	718	820	1025	658	436	96	5	4586
2007-08	0	3	20	136	582	840	901	809	629	301	170	0	4391
2008-09	0	0	18	296	584	811	1126	789	697	347	107	19	4794
2009-10	0	0	33	302	453	910	1005	948	524	274	98	3	4550
2010-11	0	0	5	247	548	1029	1126	807	697	291	75	0	4825
2011-	0	0	30	276	457	728							

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COOLING DEGREE DAYS (base 65°F) 2011 WILMINGTON (KILG)

YEAR	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL
1982	0	0	0	2	75	163	391	238	107	32	1	0	1009
1983	0	0	0	17	47	218	398	378	209	29	0	0	1296
1984	0	0	0	0	50	276	321	327	80	34	0	0	1088
1985	0	0	4	47	106	181	366	300	174	13	0	0	1191
1986	0	0	0	0	129	227	379	267	116	40	0	0	1158
1987	0	0	0	3	91	264	446	295	129	0	0	0	1228
1988	0	0	0	0	62	242	455	389	80	5	0	0	1233
1989	0	0	6	0	61	287	345	299	162	17	0	0	1177
1990	0	0	10	36	23	227	395	304	127	66	0	0	1188
1991	0	0	1	18	197	271	390	371	135	23	2	0	1408
1992	0	0	0	3	39	156	358	230	134	3	0	0	923
1993	0	0	0	1	79	252	452	405	176	3	4	0	1372
1994	0	0	0	32	41	334	466	260	99	4	0	0	1236
1995	0	0	0	4	42	218	434	381	148	39	1	0	1267
1996	0	0	0	13	64	254	291	285	129	2	0	0	1038
1997	0	0	0	0	9	204	348	248	92	40	0	0	941
1998	0	0	22	0	106	195	320	337	204	2	0	0	1186
1999	0	0	0	0	40	211	476	342	139	1	0	0	1209
2000	0	0	0	3	89	230	253	247	106	11	0	0	939
2001	0	0	0	16	46	257	247	388	100	21	0	0	1075
2002	0	0	0	51	53	219	397	405	147	39	0	0	1311
2003	0	0	0	8	10	169	337	362	133	3	0	0	1022
2004	0	0	0	6	168	173	308	261	132	1	0	0	1049
2005	0	0	0	6	3	258	377	408	228	26	0	0	1306
2006	0	0	0	4	58	204	412	370	76	12	0	0	1136
2007	0	0	1	8	96	254	368	362	192	96	0	0	1377
2008	0	0	0	1	28	311	413	259	166	12	0	0	1190
2009	0	0	0	39	66	190	271	369	89	7	0	0	1031
2010	0	0	0	20	122	360	462	378	190	11	0	0	1543
2011	0	0	0	30	122	278	496	319	183	8	0	0	1436

SNOWFALL (inches) 2011 WILMINGTON (KILG)

YEAR	JUL	AUG	SEP	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	TOTAL
1982-83	0.0	0.0	0.0	0.0	T	5.8	T	18.5	0.3	0.5	0.0	0.0	25.1
1983-84	0.0	0.0	0.0	0.0	T	T	9.7	T	5.2	T	0.0	0.0	14.9
1984-85	0.0	0.0	0.0	0.0	T	0.3	14.2	0.7	T	0.4	0.0	0.0	15.6
1985-86	0.0	0.0	0.0	0.0	0.0	1.4	3.1	9.7	T	T	0.0	0.0	14.2
1986-87	0.0	0.0	0.0	0.0	T	0.3	21.4	15.7	0.2	2.4	0.0	0.0	40.0
1987-88	0.0	0.0	0.0	0.0	0.7	2.1	10.8	1.1	T	T	0.0	0.0	14.7
1988-89	0.0	0.0	0.0	0.0	T	0.2	6.7	2.9	1.2	0.0	0.0	0.0	11.0
1989-90	0.0	0.0	0.0	0.0	5.6	8.9	1.5	1.0	1.3	1.6	0.0	0.0	19.9
1990-91	T	0.0	0.0	0.0	0.0	6.4	5.2	0.6	0.9	T	T	0.0	13.1
1991-92	0.0	0.0	0.0	0.0	T	0.2	1.5	1.3	0.5	T	0.0	T	3.5
1992-93	0.0	0.0	0.0	0.0	T	0.1	1.4	10.0	13.9	0.0	0.0	0.0	25.4
1993-94	0.0	0.0	0.0	0.0	T	2.4	2.7	9.2	3.4	0.0	0.0	0.0	17.7
1994-95	0.0	0.0	0.0	0.0	T	0.0	T	8.3	T	0.0	0.0	0.0	8.3
1995-96	0.0	0.0	0.0	0.0	3.2	7.1	26.2	7.5	6.0	5.9	T	0.0	55.9
1996-97	0.0	0.0	0.0	0.0	0.0	T	0.8	5.6	6.5	2.8	0.0	0.0	15.7
1997-98	0.0	0.0	0.0	0.0	0.0	T	T	0.0	T	0.0	0.0	0.0	T
1998-99	0.0	0.0	0.0	0.0	0.0	2.0	4.5	0.0	2.0	0.0	0.0	0.0	8.5
1999-00	0.0	0.0	0.0	0.0	0.0	0.0	14.2	4.0	0.0	2.1	0.0	0.0	20.3
2000-01	0.0	0.0	0.0	0.0	0.0	2.1	4.8	5.0	0.7	T	0.0	0.0	12.6
2001-02	0.0	0.0	0.0	0.0	0.0	0.0	2.4	T	T	T	0.0	0.0	2.4
2002-03	0.0	0.0	0.0	T	T	9.0	5.4	31.6	T	T	0.0	0.0	46.0
2003-04	0.0	0.0	0.0	0.0	0.0	6.5	9.8	0.1	2.4	T	0.0	0.0	18.8
2004-05	0.0	0.0	0.0	0.0	0.0	0.3	12.1	13.5	1.0	0.0	0.0	0.0	26.9
2005-06	0.0	0.0	0.0	0.0	0.2	7.1	T	14.6	0.0	0.2	0.0	0.0	22.1
2006-07	0.0	0.0	0.0	0.0	0.0	T	1.5	7.3	3.8	T	0.0	0.0	12.6
2007-08	T	0.0	0.0	0.0	0.0	4.1	2.8	2.3	T	0.0	0.0	0.0	9.2
2008-09	0.0	0.0	0.0	0.0	0.2	1.0	2.9	1.5	10.5	T	0.0	0.0	16.1
2009-10	0.0	0.0	0.0	0.0	0.0	19.7	6.1	46.9	T	0.0	0.0	0.0	72.7
2010-11	0.0	0.0	0.0	0.0	T	4.0	18.0	5.0	T	0.0	0.0	0.0	27.0
2011-	0.0	0.0	0.0	0.3	0.0	0.1							
POR= 64 YRS	T	0.0	0.0	T	0.7	3.3	6.3	6.7	3.0	0.3	T	T	20.3

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REFERENCE NOTES :

PAGE 1:
THE TEMPERATURE GRAPH SHOWS NORMAL MAXIMUM AND NORMAL MINIMUM DAILY TEMPERATURES (SOLID CURVES) AND THE ACTUAL DAILY HIGH AND LOW TEMPERATURES (VERTICAL BARS).

PAGE 2 AND 3:
H/C INDICATES HEATING AND COOLING DEGREE DAYS.
RH INDICATES RELATIVE HUMIDITY
W/O INDICATES WEATHER AND OBSTRUCTIONS
S INDICATES SUNSHINE.
PR INDICATES PRESSURE.
CLOUDINESS ON PAGE 3 IS THE SUM OF THE CEILOMETER AND SATELLITE DATA NOT TO EXCEED EIGHT EIGHTHS(OKTAS).

GENERAL:
T INDICATES TRACE PRECIPITATION, AN AMOUNT GREATER THAN ZERO BUT LESS THAN THE LOWEST REPORTABLE VALUE.
+ INDICATES THE VALUE ALSO OCCURS ON EARLIER DATES.
BLANK ENTRIES DENOTE MISSING OR UNREPORTED DATA.
NORMALS ARE 30-YEAR AVERAGES (1971 - 2000).
ASOS INDICATES AUTOMATED SURFACE OBSERVING SYSTEM.
PM INDICATES THE LAST DAY OF THE PREVIOUS MONTH.
POR (PERIOD OF RECORD) BEGINS WITH THE JANUARY DATA MONTH AND IS THE NUMBER OF YEARS USED TO COMPUTE THE MEAN. INDIVIDUAL MONTHS WITHIN THE POR MAY BE MISSING.
WHEN THE POR FOR A NORMAL IS LESS THAN 30 YEARS, THE NORMAL IS PROVISIONAL AND IS BASED ON THE NUMBER OF YEARS INDICATED.
0.* OR * INDICATES THE VALUE OR MEAN-DAYS-WITH IS BETWEEN 0.00 AND 0.05.
CLOUDINESS FOR ASOS STATIONS DIFFERS FROM THE NON-ASOS OBSERVATION TAKEN BY A HUMAN OBSERVER. ASOS STATION CLOUDINESS IS BASED ON TIME-AVERAGED CEILOMETER DATA FOR CLOUDS AT OR BELOW 12,000 FEET AND ON SATELLITE DATA FOR CLOUDS ABOVE 12,000 FEET.
THE NUMBER OF DAYS WITH CLEAR, PARTLY CLOUDY, AND CLOUDY CONDITIONS FOR ASOS STATIONS IS THE SUM OF THE CEILOMETER AND SATELLITE DATA FOR THE SUNRISE TO SUNSET PERIOD.
CLEAR INDICATES 0 - 2 OKTAS, PARTLY CLOUDY INDICATES 3 - 6 OKTAS, AND CLOUDY INDICATES 7 OR 8 OKTAS.
WHEN AT LEAST ONE OF THE ELEMENTS (CEILOMETER OR SATELLITE) IS MISSING, THE DAILY CLOUDINESS IS NOT COMPUTED.

GENERAL CONTINUED:
WIND DIRECTION IS RECORDED IN TENS OF DEGREES (2 DIGITS) CLOCKWISE FROM TRUE NORTH. "00" INDICATES CALM. "36" INDICATES TRUE NORTH.
RESULTANT WIND IS THE VECTOR AVERAGE OF THE SPEED AND DIRECTION.
AVERAGE TEMPERATURE IS THE SUM OF THE MEAN DAILY MAXIMUM AND MINIMUM TEMPERATURE DIVIDED BY 2.
SNOWFALL DATA COMPRISE ALL FORMS OF FROZEN PRECIPITATION, INCLUDING HAIL.
A HEATING (COOLING) DEGREE DAY IS THE DIFFERENCE BETWEEN THE AVERAGE DAILY TEMPERATURE AND 65 F.
DRY BULB IS THE TEMPERATURE OF THE AMBIENT AIR.
DEW POINT IS THE TEMPERATURE TO WHICH THE AIR MUST BE COOLED TO ACHIEVE 100 PERCENT RELATIVE HUMIDITY.
WET BULB IS THE TEMPERATURE THE AIR WOULD HAVE IF THE MOISTURE CONTENT WAS INCREASED TO 100 PERCENT RELATIVE HUMIDITY.
ON JULY 1, 1996, THE NATIONAL WEATHER SERVICE BEGAN USING THE "METAR" OBSERVATION CODE THAT WAS ALREADY EMPLOYED BY MOST OTHER NATIONS OF THE WORLD. THE MOST NOTICEABLE DIFFERENCE IN THIS ANNUAL PUBLICATION WILL BE THE CHANGE IN UNITS FROM TENTHS TO EIGHTS(OKTAS) FOR REPORTING THE AMOUNT OF SKY COVER.
STATION HISTORY STOPPED WITH THE 2009 ANNUAL. IF YOU NEED HISTORY GO TO "MULTI-NETWORK MEDADATA SYSTEM", URL IS: https://mi3.ncdc.noaa.gov/mi3qry/login.cfm
SNOWFALL STOPPED MONTH & YEAR INDICATED ABOVE. NO FURTHER YEARS INCLUDED UNLESS RESTARTED.

NOTE:
The "Period of Record:(POR) for all "averages" is based on the "Summary of the Day First Order Station" and "Cooperative Summary of the Day" archives.

2011
WILMINGTON
DELAWARE (KILG)

Delaware is part of the Atlantic Coastal Plain consisting mainly of flat low land with many marshes. Small streams and tidal estuaries comprise the drainage of the State. Wilmington, at the northern end of the State, marks the beginning of low rolling hills extending northward and northwestward into Pennsylvania. The Delaware River, the Delaware Bay, and the Atlantic Ocean are along the eastern boundary of the State. The broad Chesapeake Bay lies 35 miles, or less, to the west of the western boundary of nearly the entire State. These large water areas considerably influence the climate of the Wilmington, Delaware region.

Summers are warm and humid, winters are usually mild. During the summer maximum temperatures are usually in the 80s. The temperature reaches 100 degrees on the average once in six years. During January, the coldest month of the year, the daily average temperature is 32 degrees. Temperatures of zero may be expected once in four years. Most of the winter precipitation falls as rain. Seasonal snowfall has been as little as 1 inch, and as much as 50 inches. Snow is frequently mixed with rain and sleet, and seldom remains on the ground more than a few days.

The proximity of large water areas and the inflow of southerly winds cause the relative humidity to be quite high all year. During the summer months the relative humidity is approximately 75 percent. Fog is relatively frequent and may occur in any month. Light southeast winds blowing up the Delaware Bay favor the formation of fog. Light north-northeast winds bring in smoke from Philadelphia and from the heavy industry area located along the Delaware River north of Wilmington.

Rainfall distribution throughout the year is fairly uniform, however, the greatest amounts normally come during the summer months. Mostly, the summer rainfall comes in the form of thunderstorms. Moisture deficiencies for crops occur occasionally, but severe droughts are rare. During the fall, winter, and spring seasons, much of the rainfall comes from storms forming over the southern states or the South Atlantic and moving northward along the coast. During the late summer and early fall, hurricanes occasionally cause heavy rainfall, but winds seldom reach hurricane force in Wilmington. Heavy rains occasionally cause minor flooding, but the streams and rivers of northern Delaware are not subject to major flooding. Strong easterly and southeasterly winds sometimes cause high tides in the Delaware Bay and the Delaware River, resulting in the flooding of lowlands and damage to bay front and river front properties.

Based on the 1951-1980 period, the average first occurrence of 32 degrees Fahrenheit in the fall is October 29 and the average last occurrence in the spring is April 13.

Station History

WILMINGTON, DE

NAME	Begin Date	End Date	Latitude	Longitude	Elevation Feet	Relocation	Platform
WILMINGTON NEW CASTLE COUNTY AP	2003-03-03	2011-09-15	39° 40'	-75° 36'	79		ASOS,COOP
WILMINGTON GREATER WILMINGTON AP	1961-12-01	1973-01-01	39° 40'	-75° 36'	74		AIRWAYS,COOP
WILMINGTON NEW CASTLE COUNTY AP	1990-08-28	1994-10-01	39° 40'	-75° 36'	74		COOP,WXSVC
WILMINGTON GREATER WILMINGTON AP	1973-01-01	1990-08-28	39° 40'	-75° 36'	74		COOP,WXSVC
WILMINGTON NEW CASTLE COUNTY AP	2011-09-15	Present	39° 40'	-75° 36'	79		ASOS,COOP
WILMINGTON NEW CASTLE COUNTY AP	1994-10-01	2003-03-03	39° 40'	-75° 36'	74		ASOS,COOP
WILMINGTON NEW CASTLE COUNTY AP	1947-11-07	1956-01-01	39° 40'	-75° 36'	79		AIRWAYS,COOP
WILMINGTON DUPONT AP	1942-04-27	1942-12-08	39° 46'	-76° 36'			AIRWAYS
NEW CASTLE BELLANCA FIELD	1929-06-01	1930-03-01	39° 40'	-75° 36'			AIRWAYS
WILMINGTON NEW CASTLE COUNTY AP	1956-01-01	1961-12-01	39° 40'	-75° 36'	74		AIRWAYS,COOP

Element History

Element	Begin Date	End Date	Frequency	Time Of Observation	Equipment *	Equipment * Modifications	Equipment Exposure
PRECIP	1929-06-01	1930-03-01	DAILY	2400	UNIV	RCRD	
TEMP	1929-06-01	1930-03-01	DAILY	2400	HYGR		
TEMP	1947-11-07	1970-10-01	DAILY	2400	HYGR		
PRECIP	2011-09-15	Present	HOURLY	2400	AHTB	RCRD;HTD	
TEMP	1942-04-27	1942-12-08	DAILY	2400	HYGR		
TEMP	1970-10-01	1995-07-01	DAILY	2400	HYGR		
PRECIP	1995-07-01	2003-03-03	DAILY	2400	UNIV	RCRD	
PRECIP	1970-10-01	1995-07-01	DAILY	2400	UNIV	RCRD	
PRECIP	2011-09-15	Present	DAILY	2400	PCPNX		
PRECIP	1942-04-27	1942-12-08	DAILY	2400	UNIV	RCRD	
PRECIP	1970-10-01	1995-07-01	HOURLY	2400			
TEMP	1995-07-01	2003-03-03	DAILY	2400	HYGR		
PRECIP	2003-03-03	2011-09-15	DAILY	2400	TB	RCRD	
PRECIP	2003-03-03	2011-09-15	HOURLY	2400	TB	RCRD	
TEMP	2003-03-03	2011-09-15	DAILY	2400	HYGR		
TEMP	2011-09-15	Present	DAILY	2400	ATEMP		
PRECIP	1947-11-07	1970-10-01	DAILY	2400	UNIV	RCRD	
PRECIP	1995-07-01	2003-03-03	HOURLY	2400	UNIV	RCRD	

* For explanation of codes and abbrevitions see Station Metadata link below.

Other Station Information can be found at:
ASOS Implementation by NWS: http://www.nws.noaa.gov/ops2/Surface/asosimplementation.htm
Station Metadata website: http://www.ncdc.noaa.gov/homr

INQUIRES/COMMENTS CALL: (828) 271-4800, option 2
Fax Number : (828) 271-4876
TDD : (828) 271-4010
Email : ncdc.info@noaa.gov

NOAA/National Climatic Data Center
Attn: User Engagement & Services Branch
151 Patton Avenue
Asheville, NC 28801-5001