

WOKINGHAM METEOROLOGICAL DATA

Lat 51.425 N, Long 0.853 W, NGR (SU) 798701

Altitude 45 m ASL.

Emmbrook,

Wokingham,

Berkshire.

Annual

Summary

2019

Temperature

	°C	°F	Anom	Rank in 138 years
Mean maximum	15.9	60.6	(+1.0)	Equal 4th highest
Mean minimum	6.6	43.9	(+0.1)	18th highest
Daily mean	11.2	52.2	(+0.5)	Equal 10th highest
Highest maximum	36.8	98.2		on 25th July
Lowest maximum	1.5	34.7		on 1st February
Highest minimum	18.3	64.9		on 24th July
Lowest minimum	-6.5	20.3		on 31st January
Mean grass minimum	3.3	37.9	(-0.1)	
Lowest grass minimum	-10.4	13.3		on 3rd February
Mean 30cm earth temp.	12.2	54.0	(+0.4)	
Highest 30cm	21.5	70.7		on 26th July
Lowest 30cm	3.6	38.5		on 4th February
Mean 100cm earth temp	12.3	54.1		
Highest 100cm	18.5	65.3		on 29th July
Lowest 100cm	6.4	43.5		on 7th February
Warmest month	July,		daily mean 19.1°C,	66.4°F
Coollest month	January,		daily mean 4.1°C,	39.4°F

Table 1. Temperature category for each month. (See note 2, page 4)

Category	Month
1. Very cool	-
2. Cool	-
3. Normal	Jan, May, Oct, Nov
4. Warm	Feb, Apr, Jun, Sep, Dec
5. Very warm	Mar, Jul, Aug

Table 2. Number of days with max/min air temperature in given range.

Range, deg C	Number of days		Range, deg C	Number of days	
	Max	Min		Max	Min
-15.0 to -10.1	0	0	10.0 to 14.9	99	82
-10.0 to -5.1	0	2	15.0 to 19.9	82	21
-5.0 to -0.1	0	41	20.0 to 24.9	79	0
0.0 to 4.9	8	97	25.0 to 29.9	20	0
5.0 to 9.9	70	122	30.0 to 34.9	6	0
			35.0 to 39.9	1	0

Table 3. Monthly totals of Air Frost and Ground Frost.

	Jan	Feb	Mar	Apr	May	Jun	
Air frost	12 (+2)	11 (+1)	1 (-5)	5 (+1)	0 (-1)	0 (0)	
Ground frost	21 (+5)	21 (+4)	12 (-4)	20 (+6)	9 (+4)	0 (-1)	
	Jul	Aug	Sep	Oct	Nov	Dec	Annual
Air frost	0 (0)	0 (0)	0 (0)	1 (-10)	5 (-1)	8 (-3)	43 (-6)
Ground frost	0 (0)	0 (0)	2 (0)	7 (0)	19 (+6)	17 (+1)	128 (+20)

Date of: last spring air frost, 14th April ground frost, 16th May
 first autumn air frost, 28th October ground frost, 8th September
 Frost free period, air 196 days, (+6) ground 114 days, (-7).
 Annual total of air frost duration: 248.3 hours (-129.7)
 Frostiest month January. 85.0 hours

[Difference from 1981-2010 average in brackets]

Temperature anomaly in deg C

Rainfall.

Total	728.5 mm	28.68 inches	(112 %)	30th highest in 138 years
Number of : Rain days	172 (+11)	Wet days	126 (+13)	Days => 5mm 50 (+5)
	<small>A rain day has at least 0.2 mm</small>		<small>A wet day has at least 1.0 mm</small>	
Highest daily fall to 9am:	57.1 mm	on 10th June		
Wettest month,	June	111.7 mm	227 % of average	
Driest month,	April	25.8 mm	53 % of average	
Duration of measurable rainfall;	532.2 hours	Longest in a day;	19.0 hours on 12th October	
Highest monthly duration;	85.1 hours in October	Lowest ;	19.6 hours in April	
Number of dry spells, (5 or more consecutive dry days):	13			
Longest dry spell;	22 days, 25th June to 16th July			
Total number of : Dry days,	193 (-12)	Days in dry spells,	129	

Table 4. **Rainfall category for each month.**

Category	Month
1. Very wet	Jun
2. Wet	Sep, Oct, Nov, Dec
3. Normal	Jan, Feb, Mar, May, Jul
4. Dry	Apr, Aug
5. Very dry	-

(See note 2, page 4)

Table 4a **Rain rate, maximum daily, between given limits**

Rate mm/hr	Days	Rate mm/hr	Days
<10	107	50 to 100	13
10 to 25	31	100 to 250	2
25 to 50	18	>250	0
		Missing *	2
Highest rate	177 mm/hr on 22nd September		

Table 5. **Distribution of measurable rainfall duration.**

Hours	Days	Hours	Days	Hours	Days
0	181	6.1 to 9.0	15	18.1 to 21.0	1
0.1 to 1.0	65	9.1 to 12.0	8	21.1 to 24.0	0
1.1 to 3.0	52	12.1 to 15.0	1	Missing *	0
3.1 to 6.0	42	15.1 to 18.0	0	*Not available due to snow/ice	

Table 6. **Number of days with rainfall between given limits.**

Fall, mm	Days	Fall, mm	Days
0.0 to 0.1	193	10.0 to 19.9	11
0.2 to 0.9	46	20.0 to 29.9	2
1.0 to 4.9	76	30.0 to 39.9	0
5.0 to 9.9	36	> 39.9	1

Sunshine.

(Recorded on an electronic sunshine detector)

Total	1792.0 hours	Daily mean	4.91 hours	(111 %)
Sunniest day	15.2 hours on the 4th July			
Number of days:	Nil sun	41 (-16)	=>12 hrs	30 (+11)

Weather.

Number of days with:

Snow or sleet falling;	6	(-8)		
Snow lying at 0900 GMT;	4	(-2)		
Thunder heard;	10	(-6)		
Hail;	13	(0)	=>5mm; 2 (-1)	<5mm, 11 (+2)
Fog at 0900 GMT;	7	(-4)		

Air Pressure,

corrected to MSL.

Mean at 0900 GMT	1014.6 mbar	(-1.4)
Absolute highest	1044.7 mbar	on 2nd January
Absolute lowest	970.7 mbar	on 21st December
Span	74.0 mbar	(+4.6)

[Difference from 1981-2010 average in brackets]

Wind**Table 7. Summary of monthly wind speed at 10 metres**

Month	Mean speed mph	Windiest day		Highest gust		Calm 0.5 mph or less hours
		Mean mph	Date	mph	Date/time (GMT)	
January	6.0	12.3	27th	38	27 / 1611	9.3
February	6.7	14.7	8th	47	8 / 1138	14.1
March	9.0	17.3	16th	54	10 / 0825	9.8
April	5.8	15.3	27th	53	27 / 0931	23.5
May	5.3	9.2	30th	40	4 / 1527	15.1
June	6.6	12.1	8th	36	8 / 1407	6.1
July	6.0	10.7	31st	29	30 / 1334	7.3
August	6.9	16.2	10th	44	10 / 1208	14.6
September	6.5	11.3	28th	41	29 / 1707	17.0
October	6.2	11.9	26th	44	25 / 1830	17.1
November	5.5	12.9	2nd	41	2 / 1136	11.8
December	7.5	14.3	8th	50	14 / 1044	8.8
Year	6.5	17.3	16th March	54	10th March	154.7

Table 8. Summary of hourly mean wind direction. Number of hours with wind from given directions, in degrees from true north, summed over 30 degree segments.

	Direction											
	360 N	030 NNE	060 ENE	090 E	120 ESE	150 SSE	180 S	210 SSW	240 WSW	270 W	300 WNW	330 NNW
January	52	23	27	17	13	21	41	114	126	119	117	74
February	23	28	34	27	16	35	100	227	113	17	22	30
March	33	21	27	13	2	6	54	152	249	135	32	20
April	31	154	198	74	50	29	39	54	26	22	24	19
May	66	80	69	26	10	15	38	121	99	88	59	73
June	27	93	90	24	15	21	73	197	106	49	7	18
July	57	70	37	20	15	27	61	166	137	68	41	45
August	16	24	25	8	18	24	82	281	174	61	21	10
September	27	37	40	30	14	14	61	184	196	53	39	25
October	48	46	77	35	11	38	58	211	141	25	21	33
November	59	75	94	54	46	62	66	98	74	43	22	27
December	23	27	23	21	18	36	114	182	192	64	22	22
Year	462	678	741	349	228	328	787	1987	1633	744	427	396

Appendix 1.

Monthly statistics from the electronic sunshine detector, 2019.

Note:

Month	Total hours	Highest daily, hrs/date	Number of days with:			Hours		
			Nil	0.1 to 2.9	3.0 to 5.9	6.0 to 8.9	9.0 to 11.9	=>12.0 hrs
January	78.2	8.4 on 28th	9	11	5	6	0	0
February	135.5	10.3 on 26th	4	7	5	8	4	0
March	136.3	12.0 on 25th	2	10	11	2	5	1
April	176.9	13.6 on 21st	2	9	6	4	5	4
May	192.1	15.2 on 13th	0	10	8	3	3	7
June	174.7	14.8 on 29th	1	10	5	6	3	5
July	227.4	15.2 on 4th	2	4	7	7	5	6
August	228.5	13.5 on 26th	0	4	7	10	5	5
September	177.6	12.3 on 13th	1	10	6	3	8	2
October	101.1	9.2 on 2nd	7	9	6	8	1	0
November	75.3	8.0 on 7th	7	11	8	4	0	0
December	88.4	7.6 on 2nd	6	10	9	6	0	0
Year	1792.0	15.2	41	105	83	67	39	30

Appendix 2.

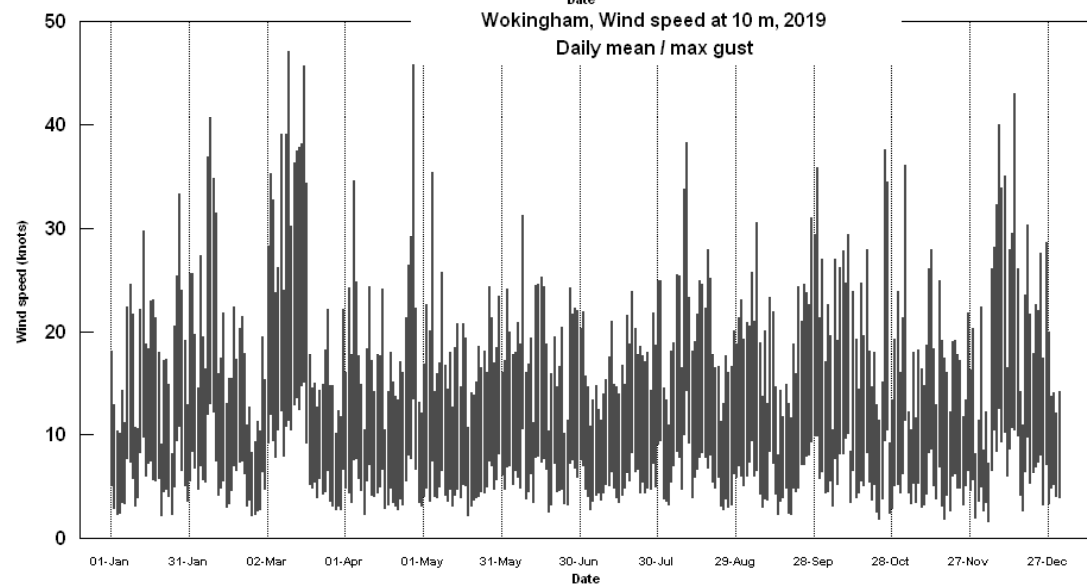
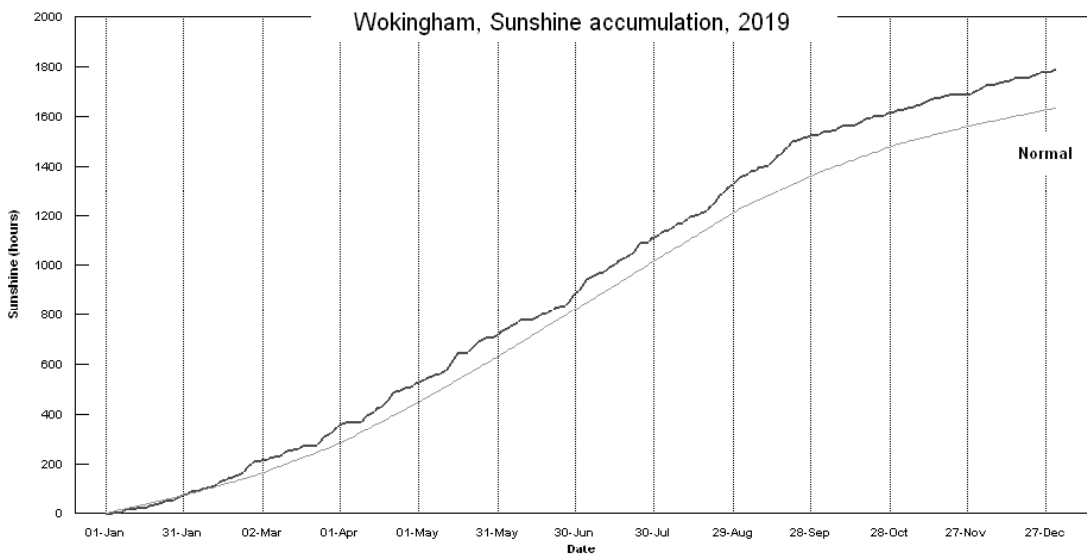
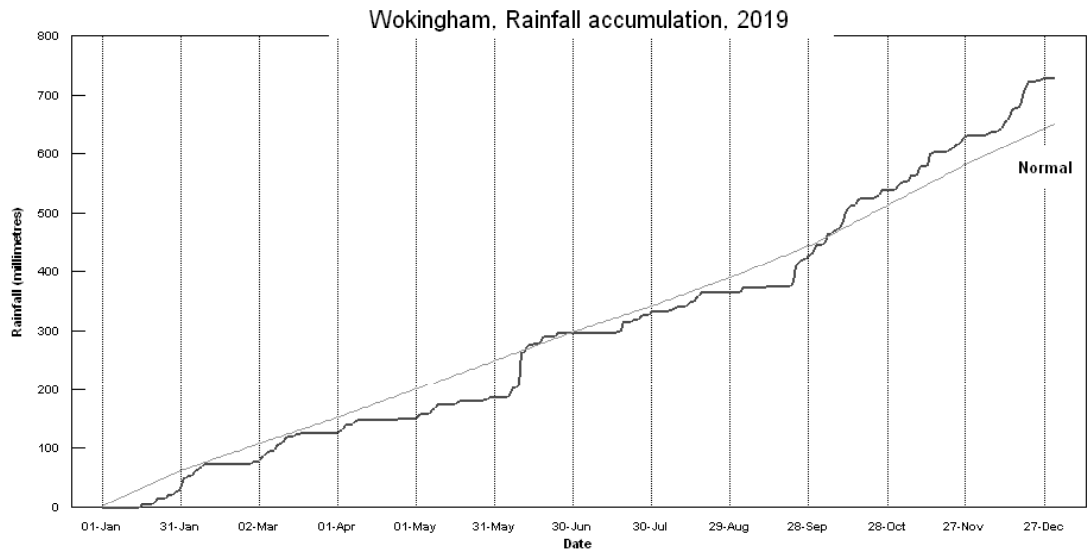
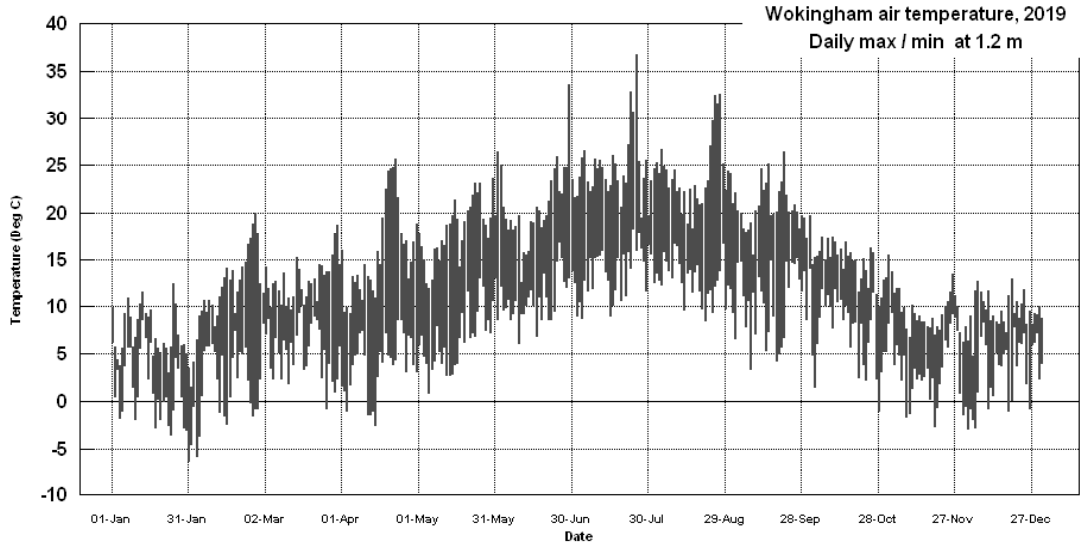
Monthly categories, quick look table, 2019.

Month	Temperature Category	Rainfall Category	Sunshine Category	Index	(see note 1)
January	3 Normal	3 Normal	5 Very sunny	11	
February	4 Mild	3 Normal	4 Sunny	11	
March	5 Very mild	3 Normal	4 Sunny	12	
April	4 Mild	4 Dry	4 Sunny	12	
May	3 Normal	3 Normal	3 Normal	9	
June	4 Mild	1 Very wet	2 Dull	7	
July	5 Very mild	3 Normal	4 Sunny	12	
August	5 Very mild	4 Dry	4 Sunny	13	
September	4 Mild	2 Wet	4 Sunny	10	
October	3 Normal	2 Wet	3 Normal	8	
November	3 Normal	2 Wet	3 Normal	8	
December	4 Mild	2 Wet	5 Very sunny	11	

Note 1). Index, on scale 3 to 15 between 'worst' and 'best' months.

Note 2). Definition of categories used in Tables 1 and 4 and in Appendix 2: Category 1; the value lies within the worst 10% of ranked values for all years available. Category 2; between 10% and 30% above the worst value. Category 3; within 20% of the median value. Category 4; between 10% and 30% below the best value. Category 5; within 10% of the best value. In this context, best (worst) refer to above (below) normal temperature and sunshine, but below (above) normal rainfall. For temperature and rainfall, data since 1882 are considered, and for sunshine since 1908.

Appendix 3	Annual Summary 2019		page5
	Summary of notable features during 2019.		
January	Colder and drier than average but quite sunny. 6 th coldest January this millennium. Driest since 2012 and 5 th driest this millennium. 20 day dry spell ended on the 14 th . 5 days had snow at times. Highest pressure is highest for January since 1992.		
February	A month of strong contrasts, very mild and sunny overall with near average rainfall. Mean maximum a new record highest, 0.4° above the previous highest. The mean minimum ranks only 59 th highest. Mean daily temperature range of 10.2° is 2 nd highest for February in 138 years. The highest max is a new record for the month, 2.2° above the previous record and 7.0° above the median. Anomalies for daily max exceeded +10° on the 25 th and 26 th . 10cm snow cover at 09 on 1 st had completely thawed by the 5 th . Near record breaking sunshine, 165% of the average for the past 20 years. RH fell to 26% on 25 th , lowest February value in 22 years.		
March	Very mild and quite sunny with above average rainfall. Very windy until mid-month. Mean temperature 5 th highest in 138 years. Lowest max is 3 rd highest in 107 years and lowest min is 5 th highest in 116 years. Number of air frosts 2 nd lowest since 1997. Whole month's rain fell before the 19 th . Dull up to the 23 rd , then very sunny. Mean wind 2 nd highest for March since 1995.		
April	Mild overall, dry and sunny. Mean maximum 10 th highest in 138 years. Highest max is 6 th highest in 116 years. Most air frost since 2013 and number of days with ground frost equal highest since 1984. Anomalies for daily max exceeded +10° from 19 th to 22 nd . Most of the month's rain fell before the 10 th , with a 14 day dry spell ending on the 23 rd . Windiest day 2 nd highest mean speed for April since 1998, and month's highest gust highest since 1999.		
May	Mean temperature and sunshine near normal and quite dry. Driest since 2012, only 5 Mays have been drier this millennium. The maximum air pressure, 1040.9 mbar, is highest for any May since before 1976.		
June	Dull and very wet with near average temperature. New record daily rainfall on 10 th . Highest max is 2 nd highest for June in 116 years. 6 th wettest June in 138 years with 227% of average. 57.1 mm of rain on 10 th is wettest June day since before 1904, and also the 5 th wettest day in that period. Mean sunshine in mid-third of the month only 51% of average.		
July	Very warm and sunny with rainfall below average. New July record highest temperature set. Short but intense heatwave 22 nd to 25 th , with 36.8° on 25 th just 0.1° below the all-time highest for Wokingham set in August 2003. The lowest max is 7 th highest in 107 years. 22 day dry spell ended on 16 th . Mean sun for the first 5 days 12.2 hours per day and 12.9 hr/day for the 3 days to the 25 th . The month's highest gust is lowest since 2000.		
August	Warm, dry and sunny with a heatwave late in month. Daily anomalies for max temperature exceeded +10° from the 25 th to 27 th . The lowest min is 5 th highest in 116 years. Sunshine mean of 13.0 hours per day for the 5 days to the 27 th , but quite dull before mid-month. Mean wind speed highest since 2008 and the max gust is highest for August since 1992.		
September	Mild, wet and sunny. This millennium 6 Septembers have been milder and 12 colder. Mainly dry for the first 20 days yet it is the 3 rd wettest September this millennium. Sunny from 13 th to 21 st with a 9 day mean of 10.5 hours per day.		
October	Wet with near average temperature and below average sunshine. Despite the near average temperature 13 October's have been milder this millennium. Over 100 mm of rain, and 2 nd lowest number of dry days in the past 44 years. Only one dry day before the 19 th . Rainfall duration 166% of average 2 nd highest since before 1993.		
November	Wet with below average temperature and sunshine. Mean maximum 2 nd lowest since 1998. 6 more ground frosts than average and 6 fewer dry days than average. Sunshine was rather poor, especially the 10 days to the 28 th with a mean of 0.48 hours per day.		
December	Mild, wet and sunny. The lowest max ranks 7 th highest in 107 years. The duration of air frost is almost 40 hours below average. The fourth consecutive wet month, wettest December since 2013 and 5 th wettest this millennium. Rainfall duration 46% above average. 2 days with thunder the most for the month since 1989. Hail >5 mm diameter fell on 15 th for the first December since 1983. Equal third sunniest December this millennium. The month's lowest pressure is lowest since 1989.		
Year	<p>Temperature: Another mild year, though the mean is 0.5° below the record set in 2006, it is nevertheless within the top 10% of values since 1882, all of which have occurred since 1989. The mean maximum ranks 4th highest in 138 years, 0.4° below the record set last year. The mean minimum ranks lower at 18th highest in 138 years. The highest max of 36.8° was on the 25th July, a new July record and only 0.1° below the annual record set in 2003. The lowest max is 1.9° above its median and the highest min is 1.1° above the median while the lowest min is 1.3° above its median. The mean grass min is close to average but the lowest value is 2.8° above average. The mean earth temperatures are slightly above average. July was the hottest month, mean 19.1°, and January the coldest, mean 4.1°. The duration of air frost was 66% of average, but the number of days with ground frost is 18 more than average. The frost free periods for air and ground frost was 196 and 114 days, +6 and -7 days compared with average respectively. Rainfall: This has been a wet year overall, the total highest since 2014. It is notable that there have been 7 wetter years than this since 1999, but in the 23 year period up to 1998 there was only one. The highest daily fall of 57.1 mm on the 10th June makes it the 5th wettest day in the past 116 years here. There were 12 fewer dry days than average, and rain duration was 103 % of average. Snow fell on just 6 days, 5 in January and 1 in February, with significant snowfall on the 31st January that produced a 10 cm deep covering on the next day. However, temperatures quickly recovered and only 10% of the snow remained by the morning of the 4th. The number of days with thunder is 5 fewer than average and 2014 and 2008 are the only recent years to have had more than the average. Large hail fell on 2 days, and small hail on 11 days, 2 more than average. June was the wettest month with 111.7 mm, but close behind was October with 101.3 mm. April was the driest month with 25.8 mm. Estimated soil moisture deficit reached a maximum of 257 mm on the 22nd September, and returned to soil capacity around mid-December. An index of stress for unirrigated shallow rooted plants was 107 in spring and 538 in summer, average 61 and 652. The period of stress ran from the end of April to the beginning of October, but with a 20 day gap in June. Sunshine: This has been a sunny year overall, but the daily mean of 4.91 hours is 0.34 hours below the record set last year. The number of days with 12 hours or more is 11 above average, and the number with nil sun is 16 below average. August was the sunniest month, mean 7.37 hours. And November the dullest with 2.51 hours. Wind: The mean speed for 2019 was 6.5 mph, 0.3 mph above average, equal lowest with 2016 since 2010. The windiest day was the 16th March, mean 17.0 mph, and the highest gust of 54 mph was on the 10th March. The annual mean direction was 226°(SW). There were 9279 minutes of calm. Compared with average, SW winds were 3.7% more frequent at the expense of NW and NE, 1.9 and 1.8% less frequent respectively. Humidity: The overall mean RH was 80.1%, and the minimum value of 24% was recorded in April and August. The mean water vapour content per kg of air at 0900 and 1500 GMT was 6.9g and 6.7g respectively.</p> <p style="text-align: center;">B.J.Burton. F.R.Met.S.</p> <p style="text-align: right;">5th January 2020</p>		



Appendix 4.

Summary of observations at 0900 GMT

Month	Monthly means								Visibility statistics						
	Vis	Cld	TT	Td	RH	WS	WG	pp	TF	FO	VP	PO	MO	GO	EX
January	19.8	76	3.4	1.4	87	5.3	11	1019.4	0	0	4	5	7	14	1
February	13.1	67	5.4	4.2	93	5.5	11	1020.3	2	2	5	11	2	4	2
March	22.7	69	8.9	5.5	79	8.5	17	1017.0	0	0	2	6	13	5	5
April	13.3	70	10.3	5.7	74	6.4	13	1014.5	0	0	6	12	5	7	0
May	28.2	71	13.7	7.8	69	5.5	12	1017.7	0	0	0	5	9	10	7
June	30.9	73	16.6	11.7	74	6.4	14	1014.8	0	0	1	4	5	13	7
July	36.2	64	19.7	13.6	70	5.5	12	1016.4	0	0	0	3	6	11	11
August	30.0	68	18.9	13.7	72	6.7	13	1014.7	0	0	1	3	5	16	6
September	31.3	57	15.9	11.6	76	6.7	14	1018.0	0	0	0	1	8	13	8
October	19.5	77	10.8	9.2	90	5.7	12	1011.6	0	0	1	9	13	5	3
November	12.3	72	6.0	5.1	94	4.5	9	1001.4	0	2	7	9	8	3	1
December	16.1	67	5.8	4.2	90	6.6	14	1010.0	0	1	5	10	7	6	2
Year	22.9	69	11.3	7.8	81	6.1	13	1014.6	2	5	32	78	88	107	53

Summary of observations at 1500 GMT

Month	Monthly means								Visibility statistics						
	Vis	Cld	TT	Td	RH	WS	WG	pp	TF	FO	VP	PO	MO	GO	EX
January	23.8	79	6.3	2.1	75	6.7	15	1018.1	0	0	3	4	9	11	4
February	21.2	62	11.2	4.7	67	8.0	16	1020.0	0	0	1	4	12	10	1
March	30.0	72	11.9	4.2	61	9.5	21	1016.6	0	0	0	2	9	15	5
April	21.6	73	14.2	4.9	57	6.9	16	1013.4	0	0	2	4	11	10	3
May	34.1	75	16.5	6.8	55	6.8	16	1016.7	0	0	1	1	7	13	9
June	33.7	73	19.5	11.6	63	7.6	16	1014.0	0	0	2	4	1	14	9
July	41.0	70	23.7	12.6	52	6.8	15	1015.3	0	0	0	2	1	13	15
August	31.9	68	22.8	12.2	53	8.5	18	1013.9	0	0	1	3	5	15	7
September	40.0	62	19.3	10.3	59	7.4	16	1016.9	0	0	0	4	1	13	12
October	29.8	78	13.6	9.1	75	7.3	17	1010.6	0	0	1	8	4	11	7
November	22.0	80	8.8	6.1	84	5.5	12	1000.8	0	0	3	5	10	11	1
December	22.0	68	8.1	5.2	82	7.4	17	1009.2	0	0	2	10	6	9	4
Year	29.3	71	14.7	7.5	65	7.4	16	1013.8	0	0	16	51	76	145	77

Legend: Vis = visibility in km. Cld = cloud amount %. TT = air temperature, deg C. Td = Dew point, deg C.
 RH = relative humidity %. WS = wind speed at 10 metres, knots. WG = Highest gust in past hour, knots.
 pp = Air pressure at MSL, mbar. TF = thick fog, <210 m. FO = fog, 210 to 900 m. VP = very poor, 1 to 4 km
 PO = poor, 4.1 to 10 km. MO = moderate, 11 to 20 km. GO = good, 21 to 40 km. EX = excellent, >40 km.

Summary of monthly climatic data.

Year 2019

Month	Max	Min	Mean	Anom	Rain	Grass	30cm	100cm	Sun	Frost	pp09	Af	Sf	Th	Ic	Rain							
	C	C	C	C	mm	min	C	C	hrs	hrs	mbar	Gf	Sl	Ha	Ic	Fg	ddd	ff	sp	hrs			
January	7.2	1.1	4.1	-0.7	38.4	-2.3	6.3	8.2	78.2	85.0	1019.4	12	21	5	1	0	0	0	0	260	2.9	5.2	35.0
February	11.8	1.6	6.7	+1.8	39.7	-2.2	5.7	7.0	135.5	49.3	1020.3	11	21	1	3	0	0	2	4	212	3.7	5.8	35.2
March	12.8	5.2	9.0	+1.8	48.0	1.8	8.5	8.3	136.3	3.1	1017.0	1	12	0	0	1	0	3	0	239	5.9	7.8	52.7
April	15.9	3.8	9.8	+0.6	25.8	-0.6	10.5	9.8	176.9	22.3	1014.5	5	20	0	0	0	0	2	0	73	1.5	5.0	19.6
May	18.2	6.6	12.4	-0.1	34.5	2.9	13.5	12.1	192.1	0.0	1017.7	0	9	0	0	0	1	2	0	276	1.4	4.6	23.2
June	20.9	10.7	15.8	+0.3	111.7	82.0	16.6	14.7	174.7	0.0	1014.8	0	0	0	0	0	0	0	0	208	2.0	5.7	54.7
July	24.7	13.5	19.1	+1.4	36.2	10.9	19.9	18.5	227.4	0.0	1016.4	0	0	0	0	2	0	0	0	235	2.3	5.2	21.3
August	24.2	12.7	18.5	+1.0	33.2	9.3	19.3	19.3	228.5	0.0	1014.7	0	0	0	0	0	0	0	0	217	4.8	6.0	20.5
September	20.6	10.2	15.4	+0.7	72.1	6.0	16.9	16.8	177.6	0.0	1018.0	0	2	0	0	0	0	0	0	227	3.5	5.6	35.3
October	14.8	7.3	11.0	-0.2	101.3	5.0	13.5	14.7	101.1	6.1	1011.6	1	7	0	0	2	0	0	0	217	2.6	5.4	85.1
November	9.6	3.4	6.5	-1.0	91.6	-0.1	9.1	11.0	75.3	31.1	1001.4	5	19	0	0	1	0	1	2	179	0.7	4.8	66.9
December	9.5	3.0	6.2	+1.2	96.0	-0.1	6.7	8.5	88.4	51.4	1010.0	8	17	0	0	2	1	1	1	219	4.5	6.5	82.7
Year	15.9	6.6	11.2	+0.5	728.5	3.3	12.2	12.3	1792.0	248.3	1014.6	43	128	6	4	10	2	11	7	226	2.6	5.6	532.2

Legend: Max/min/mean = Monthly mean of daily maximum/minimum/mean air temperature at 1.2 metres.
 Anom = Departure of mean temperature from climatic mean. Rain = monthly rainfall total.
 Grass min = Mean grass minimum temperature. 30cm/100cm = Mean earth temperature at 30 and 100 cm depth.
 Sun hrs = Hours of bright sunshine. Frost hrs = hours with air temperature below zero C. pp09 = Air pressure msl at 09 gmt.
 Days with: Af = air frost. Gf = ground frost. Sf = snow falling. Sl = snow lying. Th = thunder. Ha = hail >5mm. Ic = small hail or ice.
 Fg = Fog at 09 gmt. ddd ff = mean wind vector, degrees from true north, speed in knots. sp = mean scalar wind speed knots.
 Rain hrs = duration of measurable rain (excludes snowfall).

Appendix 5.

Wokingham annual climatic data for recent years.

Year	Mean max	Mean min	Mean	Anom	Hi max	Lo min	Rain mm	Grass min	30 cm	100 cm	Sun hrs	Frost hrs	pp09	Af	Sf Gf	Th Sl	Ic Ha	Fg	ddd	ff	sp			
2008	15.1	6.5	10.8	+0.5	28.7	-7.0	717	3.5	11.9	12.2	1582	304	1014.8	46	114	12	2	22	5	18	7	236	2.6	6.1
2009	15.3	6.5	10.9	+0.6	31.0	-8.6	643	3.3	11.8	11.9	1677	455	1014.2	54	101	19	17	14	0	8	7	241	0.5	5.6
2010	14.2	5.3	9.7	-0.6	30.0	-11.5	536	2.2	11.1	11.6	1557	821	1014.5	81	142	37	25	8	1	11	12	267	1.0	5.3
2011	15.9	7.0	11.5	+0.8	28.6	-5.6	589	3.9	12.3	12.6	1639	194	1016.6	36	96	5	0	10	0	3	8	229	2.7	5.8
2012	14.8	6.1	10.5	-0.2	29.6	-11.4	807	3.0	11.7	12.0	1564	475	1015.3	57	125	12	6	9	3	6	12	235	2.5	5.8
2013	14.6	6.0	10.3	-0.4	32.9	-6.8	604	2.8	11.6	11.7	1523	445	1015.6	66	133	33	11	9	0	14	7	244	1.4	6.0
2014	16.0	7.1	11.6	+0.9	29.2	-6.5	883	4.0	12.9	12.8	1666	195	1012.8	33	99	0	0	23	3	15	6	221	2.7	5.7
2015	15.5	6.7	11.1	+0.4	33.9	-7.2	547	3.5	12.3	12.2	1598	202	1017.4	38	107	12	2	6	3	8	4	230	3.2	6.3
2016	15.4	6.6	11.0	+0.3	33.0	-6.4	688	3.2	12.4	12.6	1552	351	1016.2	52	127	4	0	14	5	12	13	231	2.2	5.6
2017	15.6	7.1	11.4	+0.7	33.4	-6.7	642	3.9	12.5	12.5	1587	331	1016.9	45	108	13	1	9	1	6	6	232	3.1	5.8
2018	16.3	6.9	11.6	+0.9	34.1	-8.3	606	3.5	12.5	12.5	1916	322	1015.4	40	106	15	6	9	0	10	2	225	1.6	5.8
2019	15.9	6.6	11.2	+0.5	36.8	-6.5	783	3.3	12.2	12.3	1792	248	1015	43	128	6	4	10	2	11	7	226	2.6	5.6

Legend : See appendix 4.

Note: Anom is difference from the current 30 year average, up to 2010, this is 1971 to 2000, after 2010, 1981 to 2010

Wokingham area decadal annual means for the last century

See note 1 below

Decade Ending	Mean max	Mean min	Mean	Anom	Mean rain	Anom rain	Mean sun	Anom sun
1900	14.0	5.3	9.7	-1.0	600	-51	xx	
1910	13.7	5.4	9.5	-1.2	631	-20	xx	
1920	14.0	5.6	9.8	-0.9	700	+49	1588	+21
1930	14.2	5.4	9.8	-0.9	636	-15	1599	+32
1940	14.4	5.7	10.0	-0.7	641	-10	1527	-40
1950	14.6	5.8	10.2	-0.5	616	-35	1572	+5
1960	14.1	5.8	10.0	-0.7	678	+27	1500	-67
1970	13.8	5.8	9.8	-0.9	686	+35	1487	-80
1980	14.1	5.8	9.9	-0.8	655	+4	1538	-29
1990	14.4	6.1	10.3	-0.4	639	-12	1554	-13
2000	14.9	6.6	10.8	+0.1	660	+9	1569	+2
2010	15.3	6.7	11.0	+0.3	654	+3	1611	+44

Anom = difference from current 1981 to 2010 climatological average.

Temperatures in degrees C, Rainfall in mm, Sunshine in hours.

Extreme values from the Wokingham climatological series.

Highest annual mean maximum	16.3	in 2018
Lowest annual mean maximum	12.4	in 1888
Highest annual mean minimum	7.6	in 2006
Lowest annual mean minimum	3.9	in 1887
Highest annual mean temperature	11.7	in 2006
Lowest annual mean temperature	8.4	in 1887
Highest recorded temperature	36.9	on 10th August 2003
Lowest recorded temperature	-15.3	on 14th January 1982
Wettest year	952 mm	in 1903
Driest year	337 mm	in 1921
Highest daily rainfall	71.6 mm	on 20th September 1980
Sunniest year	1916 hours	in 2018
Dullest year	1274 hours	in 1958
Most days with snow falling	40	in 1917
Most days with snow lying	53	in 1963

Top ten since 1882

Warmest			Coldest		Wettest		Driest		Sunniest		Dullest	
Year	Deg C		Year	Deg C	Year	mm	Year	mm	Year	Mean	Year	Mean
1	2006	11.7	1892	8.5	1903	952	1921	337	2018	5.3	1958	3.5
2	2018	11.6	1888	8.7	1951	887	1990	459	2003	5.2	1932	3.7
3	2014	11.6	1887	8.7	2014	883	1902	477	1990	5.1	1968	3.7
4	2011	11.5	1891	8.7	2000	872	1887	487	1989	5.1	1981	3.7
5	2017	11.4	1963	8.8	1960	857	1947	491	1911	5.1	1912	3.8
6	2002	11.4	1919	8.9	2002	853	2005	492	1949	5.0	1931	3.8
7	1999	11.3	1962	8.9	1916	842	1996	508	1929	5.0	1936	3.8
8	1990	11.3	1917	9.0	1974	837	1933	509	1921	5.0	1960	3.8
9	1989	11.3	1890	9.0	1915	815	1898	510	1959	4.9	1966	3.8
10	2019	11.2	1922	9.1	1927	814	1938	511	1933	4.9	1993	3.8

Note1. Decadal means for the past century. The original data prior to 1970 have been updated, resulting in some slight changes in the decadal temperature means from data published in Annual Summaries up to and including 2014.