Comparison of 1971-2000 to 1981-2010 Monthly Normals

The 1981-2010 normals were calculated using different methods than the 1971-2000 normals. As such, the two databases should not be directly compared. However, the National Climatic Data Center, which is responsible for formulating U.S. normals, re-calculated the 1981-2010 normals in a separate database using the 1971-2000 methods so that the two normals packages could be compared "apples to apples."

In the tables below, the differences between the old and new normals are shown. The values show the increase or decrease from the old normals to the new normals. So, for example, the average January temperature at Bowling Green increased (got warmer) by 1.4° from the old normals to the new normals. For another example, average May precipitation at Louisville increased (got wetter) from the old normals to the new normals.

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Monthly Average Temperature:

Month	Bowling Green	Lexington	Louisville
January	+1.4°	+1.0°	+1.2°
February	+1.0°	+0.6°	+0.5°
March	+0.6°	0°	+0.2°
April	+0.8°	+0.8°	+0.9°
May	+0.5°	+0.5°	+0.6°
June	+0.5°	+0.6°	+0.6°
July	+0.2°	+0.2°	+0.1°
August	+0.6°	+0.6°	+0.7°
September	+0.3°	+0.2°	+0.3°
October	+0.8°	+0.4°	+0.5°
November	+0.8°	+0.5°	+0.6°
December	+0.2°	-0.3°	-0.3°

Monthly Average Maximum Temperature:

Month	Bowling Green	Lexington	Louisville
January	+1.5°	+0.9°	+1.1°
February	+0.7°	+0.3°	+0.3°
March	+0.7°	0	+0.1°
April	+0.7°	+0.6°	+0.8°
May	+0.3°	+0.3°	+0.2°
June	+0.3°	+0.5°	+0.4°
July	-0.2°	+0.1°	0°
August	+0.6°	+0.9°	+0.8°
September	+0.5°	+0.5°	+0.6°
October	+0.5°	+0.3°	+0.3°
November	+1.2°	+0.7°	+0.8°
December	0	-0.6°	-0.6°

Monthly Average Minimum Temperature:

Month	Bowling Green	Lexington	Louisville
January	+1.4°	+1.1°	+1.2°
February	+1.3°	+0.8°	+0.7°
March	+0.5°	+0.1°	+0.3°
April	+0.9°	+0.9°	+1.1°
May	+0.8°	+0.6°	+0.8°
June	+0.7°	+0.6°	+0.9°
July	+0.4°	+0.2°	+0.3°
August	+0.7°	+0.4°	+0.6°
September	+0.1°	-0.1°	+0.1°
October	+0.9°	+0.6°	+0.8°
November	+0.5°	+0.3°	+0.4°
December	+0.3°	-0.1°	-0.1°

Days with Maximum Temperature at or Above 90°:

Month	Bowling Green	Lexington	Louisville
January	0	0	0
February	0	0	0
March	0	0	0
April	-0.1	0	-0.1
May	-0.2	-0.1	+0.2
June	+0.1	+0.2	-0.1
July	-0.3	-0.1	+0.2
August	+0.8	+1.7	+1.7
September	-0.1	+0.6	+0.2
October	+0.1	+0.1	+0.2
November	0	0	0
December	0	0	0

Days with Maximum Temperature at or Below 32°:

Month	Bowling Green	Lexington	Louisville
January	-1.2	-1.2	-1.3
February	-0.7	-0.6	-0.5
March	-0.1	-0.2	-0.1
April	0	0	0
May	0	0	0
June	0	0	0
July	0	0	0
August	0	0	0
September	0	0	0
October	0	0	0
November	-0.1	0	0
December	-0.1	+0.5	0

Days with Minimum Temperature at or Below 32°:

Month	Bowling Green	Lexington	Louisville
January	-1.3	-0.9	-1.5
February	-0.7	+0.7	0
March	-0.8	0	-0.1
April	-0.1	-0.2	-0.4
May	0	0	0
June	0	0	0
July	0	0	0
August	0	0	0
September	0	0	0
October	-0.3	-0.6	-0.4
November	-0.5	-0.5	-0.2
December	-0.3	+0.2	+0.4

Days with Minimum Temperature at or Below 0° :

Month	Bowling Green	Lexington	Louisville
January	-0.2	-0.5	-0.3
February	-0.1	-0.2	0
March	0	-0.1	0
April	0	0	0
May	0	0	0
June	0	0	0
July	0	0	0
August	0	0	0
September	0	0	0
October	0	0	0
November	0	0	0
December	0	0	0

Average Monthly Precipitation:

Month	Bowling Green	Lexington	Louisville
January	-0.53	-0.14	-0.04
February	-0.26	-0.08	-0.07
March	-0.75	-0.34	-0.24
April	0.15	-0.07	0.1
May	0.31	0.48	0.38
June	-0.16	-0.14	0.03
July	-0.44	-0.16	-0.19
August	0.01	-0.52	-0.08
September	-0.07	-0.2	0
October	0.24	0.43	0.43
November	-0.23	0.08	-0.22
December	-0.3	-0.11	0.14

Days with at Least 0.01" Precipitation:

Month	Bowling Green	Lexington	Louisville
January	-1.3	-0.2	-0.6
February	-0.1	-0.2	-0.4
March	-1.2	-0.4	-1
April	0.1	0	0
May	0.2	0.3	0.4
June	0.4	0.4	-0.1
July	0.3	-0.2	0.1
August	-0.4	-0.2	-0.3
September	-0.6	-1	-0.8
October	0.3	0.4	0.2
November	-0.3	-0.2	-0.5
December	-0.2	0.3	0.2

Days with at Least 0.10" Precipitation:

Month	Bowling Green	Lexington	Louisville
January	-0.6	-0.5	-0.2
February	-0.2	0.2	0.1
March	-1.5	-0.8	-0.6
April	0.1	-0.1	-0.3
May	0.2	0.1	0
June	0	-0.3	0.1
July	0.5	0	0.4
August	-0.3	-0.2	-0.4
September	-0.4	-0.5	-0.9
October	0	0.2	0.2
November	-0.4	0.2	-0.4
December	0.1	0.4	0.3

Days with at Least 0.50" Precipitation:

Month	Bowling Green	Lexington	Louisville
January	0	0	0
February	-0.2	0.1	0.1
March	-0.5	-0.3	-0.1
April	0.2	-0.2	0.1
May	0.2	0	0
June	-0.2	0.1	-0.2
July	0	-0.1	0.2
August	0.1	-0.4	-0.2
September	-0.1	-0.2	-0.1
October	0.1	0.2	0.2
November	-0.1	0.2	-0.1
December	0.1	0	0.1

Days with at Least 1" Precipitation:

Month	Bowling Green	Lexington	Louisville
January	-0.1	0	0
February	0.1	-0.1	0
March	0	0	0
April	0.2	0	0
May	0.1	0.3	0.2
June	0	0.1	0.2
July	-0.2	-0.1	-0.1
August	0.1	-0.3	0.1
September	0	0.1	0.1
October	0	0.1	0.3
November	-0.1	-0.1	-0.2
December	-0.3	-0.1	-0.1

Average Snowfall:

Month	Bowling Green	Lexington	Louisville
January	-0.9	-1.3	-0.6
February	-0.9	-0.1	0
March	0	-0.7	-0.7
April	0	0	-0.1
May	0	0	0
June	0	0	0
July	0	0	0
August	0	0	0
September	0	0	0
October	1.1	1	0
November	-0.2	-0.2	-0.5
December	0.5	0.4	0.6

Number of Days with Measurable Snowfall:

Month	Bowling Green	Lexington	Louisville
January	-0.2	-0.4	-1.1
February	-0.2	-0.3	0
March	0	-0.7	-0.7
April	0.1	-0.1	-0.1
May	0	0	0
June	0	0	0
July	0	0	0
August	0	0	0
September	0	0	0
October	0.1	0	0
November	-0.1	-0.4	-0.2
December	0.4	0.2	0.5

Number of Days with at Least 1" of Snowfall:

Month	Bowling Green	Lexington	Louisville
January	-0.5	-0.4	-0.2
February	-0.6	0	0
March	0	-0.3	-0.2
April	0.1	0	-0.1
May	0	0	0
June	0	0	0
July	0	0	0
August	0	0	0
September	0	0	0
October	0	0	0
November	-0.1	-0.1	-0.2
December	0.2	0.2	0.2

Heating Degree Days:

Month	Bowling Green	Lexington	Louisville
January	-45	-31	-36
February	-28	-16	-15
March	-18	-2	-5
April	-16	-17	-18
May	-4	-6	-5
June	-2	-4	-1
July	0	0	0
August	0	0	-1
September	-3	-3	-2
October	-19	-12	-13
November	-25	-15	-18
December	-4	11	11

Cooling Degree Days:

Month	Bowling Green	Lexington	Louisville
January	0	0	0
February	0	0	0
March	1	-1	1
April	8	5	10
May	13	9	11
June	13	12	18
July	3	4	4
August	20	20	22
September	5	3	8
October	2	1	5
November	0	0	0
December	0	0	1