



KMA'S BRIEFING IN CLIMATE CHARACTERISTICS

(total 4 pages)

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June 2009, Climate

- ◇ June mean temperature for the national average is 0.8°C higher than normal, making it the fourth highest record since 1973.
- ◇ June precipitation for the national average is 80% relative to normal.

□ Climate characteristics of June, and its long-term trends are analyzed based on 60 Korean meteorological stations (national average) for the period 1973-2009 (1908-2009 in Seoul).

□ **June, 2009 climate is as follows:**

o For the national average,

- the mean temperature (21.8°C) is 0.8°C higher than normal. The mean maximum (27.0°C) and the mean minimum (17.1°C) temperatures are 0.9°C and 0.6°C higher than normal, respectively.
- the amount of precipitation (136.7mm) is 79.8% relative to normal.
- the average rainy days (10.4 days) are the same as normal.

o For Seoul,

- the mean temperature (22.4°C) is 0.5°C higher than normal. The mean maximum (26.7°C) temperature is 0.2°C lower than normal. The mean minimum temperature (18.8°C) is 1.0°C higher than normal.
- The amount of precipitation (132.0mm) is 99.0% relative to normal.
- The average rainy days (11.0 days) are 1.0 day greater than normal.

□ **Long term trend of June climate**

- o For the national average, mean, mean maximum, and mean minimum temperatures of June 2000s are 0.5°C, 0.7°C, and 0.5°C higher than that of the 1970s.

- o For Seoul, the mean temperature of June 2000s is 1.5°C and 0.8°C higher than that of the 1910s and 1970s, respectively.
 - the mean maximum temperature of June 2000s is 0.3°C and 0.4°C higher than that of the 1910s and 1970s, respectively.
 - the mean minimum temperature of June 2000s is 2.4°C and 1.1°C higher than that of the 1910s and 1970s, respectively.
- o For the national average, precipitation intensity for 2000s increased 1.5mm/day compare to that of the 1970s.

※ Normal: average from 1971 to 2000.

※ National average is used average values of 60 meteorological stations starting from 1973.

※ In Seoul, data are analyzed from 1908.

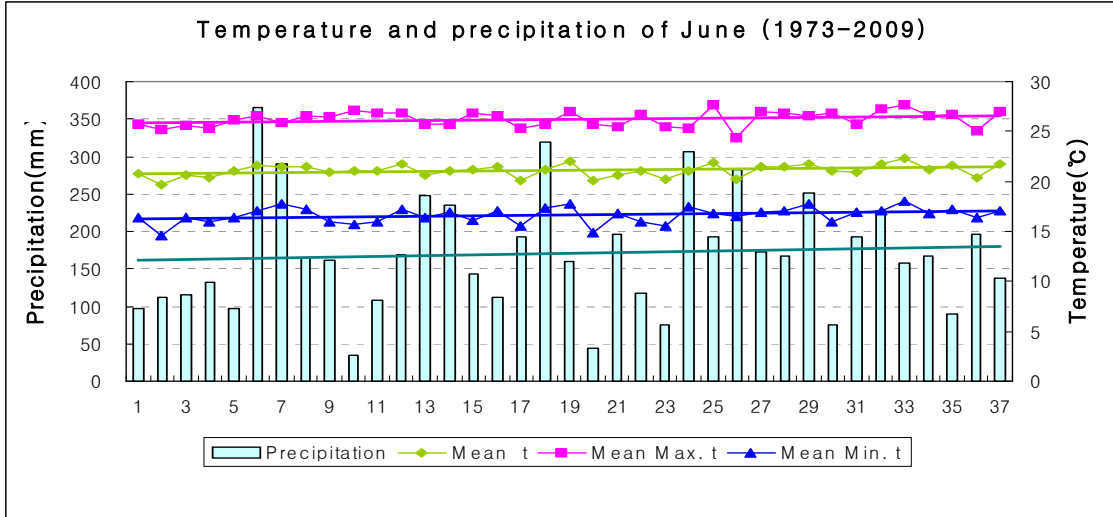
※ 1910s: average from 1911 to 1920

※ 1970s: average from 1973 to 1980

※ 2000s: average from 2001 to 2009

Appendix

Fig. 1. Time series of June temperatures (mean, mean maximum, and mean minimum), and precipitation across the South Korea for the period 1973–2009.



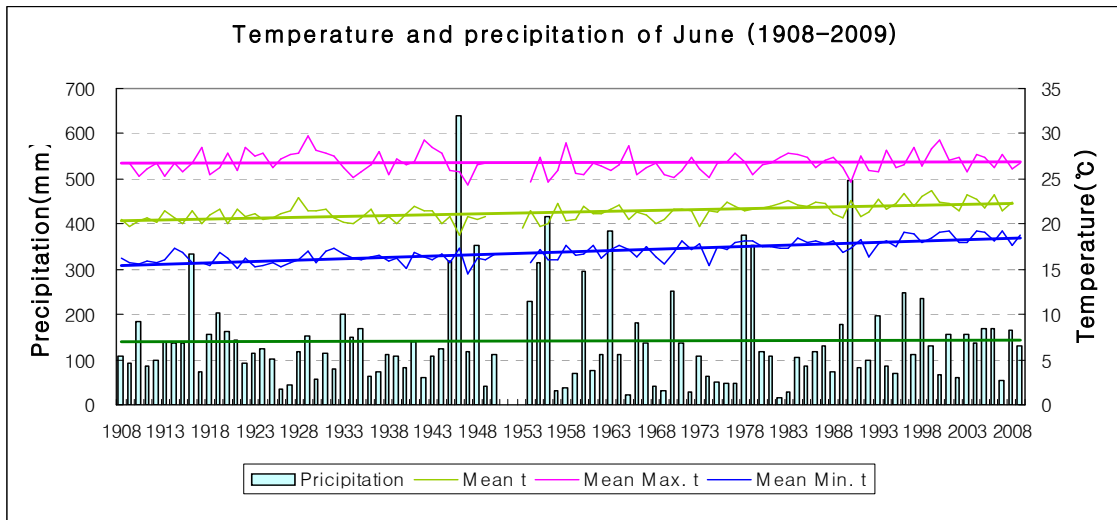
□ National average values of June meteorological elements (1973–2009)

Elements (National average)	June 2009 (a)	Normals of June (1971-2000) (b)	a-b	rank since 1973 (within 5th)
mean temperature(°C)	21.8	21.0	0.8	fourth highest
mean maximum t (°C)	27.0	26.1	0.9	fifth highest
mean minimum t(°C)	17.1	16.5	0.6	-
amount of precipitation (mm)	136.7	171.3	-34.6(79.8%)	-
rainy days	10.4	10.4	-	-
precipitation intensity (mm/ day)	13.1	16.5	-3.4	-

□ National average values of June meteorological elements in each decade (1973–2009)

Year	Mean t (°C)	Mean Maximum t (°C)	Mean Minimum t (°C)	Precipitation (mm)	rainy days	precipitation intensity (mm/ day)
1973-1980(a)	20.9	25.9	16.5	171.9	11.4	15.1
1981-1990(b)	21.0	26.3	16.4	172.2	9.8	17.6
1991-2000(c)	21.0	26.2	16.6	171.0	10.1	16.9
2001-2009(d)	21.4	26.6	17.0	166.1	10.0	16.6
d-a	0.5	0.7	0.5	-5.8	-1.4	1.5
d-b	0.4	0.3	0.6	-6.1	0.2	-1.0
d-c	0.4	0.4	0.4	-4.9	-0.1	-0.3

Fig. 2. Time series of June temperatures (mean, mean maximum, and mean minimum), and precipitation in Seoul for the period 1908–2009.



□ Average values of June meteorological elements in Seoul (1908–2009)

Elements (Seoul) average	June 2009 (a)	Normals of June (1971-2000) (b)	a-b	rank since 1908 (within 5th)
mean temperature(°C)	22.4	21.9	0.5	-
mean maximum t (°C)	26.7	26.9	-0.2	-
mean minimum t(°C)	18.8	17.8	1.0	-
amount of precipitation (mm)	132.0	133.3	-1.3	-
rainy days	11.0	10.0	1.0	-
precipitation intensity (mm/ day)	12.0	13.3	-1.3	-

□ June meteorological elements in Seoul in each decade (1911–2009)

Year	Mean t (°C)	Mean Maximum t (°C)	Mean Minimum t (°C)	Precipitation (mm)	rainy days	precipitation intensity (mm/day)
1911-1920년(a)	20.8	26.6	16.2	152.7	11.7	13.1
1921-1930	21.2	27.7	15.8	98.3	8.1	12.1
1931-1940	20.7	26.6	16.4	116.0	10.0	11.6
1941-1950	20.8	26.9	16.2	201.5	11.6	17.4
1954-1960	20.6	26.1	16.5	200.5	12.0	16.7
1961-1970	21.1	26.3	16.9	134.6	11.1	12.1
1971-1980	21.5	26.5	17.5	133.0	10.9	12.2
1981-1990	21.9	26.9	17.7	133.9	9.6	13.9
1991-2000	22.4	27.3	18.2	132.9	9.5	14.0
2001-2009(b)	22.3	26.9	18.6	133.5	10.7	12.5
b-a	1.5	0.3	2.4	-19.2	-1.0	-0.6