

Table S1 The Original Recorded Data of the Temperature and solar Radiation Intensity

TIME	Air Temperature	C25			PAC13			AC13			Solar Radiation Intensity	Thermal Imager (Upper)		
		a	b	c	a	b	c	a	b	c		C25	AC13	PAC13
	(°C)	(°C)	(°C)	(°C)	(°C)	(°C)	(°C)	(°C)	(°C)	(°C)	(J/kg·K ⁻¹)	(°C)	(°C)	(°C)
9:00	31.8	33.5	29.8	28.8	35.1	29.0	28.3	35.5	29.5	27.8	482.0	35.6	39.1	41.1
10:00	32.9	38.3	33.5	31.7	41.0	32.9	30.6	41.1	33.6	31.1	555.0	40.1	45.2	46.9
11:00	33.2	36.1	34.6	33.6	38.3	34.8	32.3	37.9	35.5	34.1	317.0	36.7	39.3	40.5
12:00	34.2	38.7	35.5	34.8	40.8	35.5	34.2	40.9	36.5	35.5	464.0	39.3	39.2	44.5
13:00	32.8	36.5	35.7	35.3	37.8	36.1	34.6	37.9	36.8	36.3	362.0	37.8	40.3	40.9
14:00	35.8	40.7	37.7	36.6	43.0	38.0	36.0	43.6	39.2	37.8	620.0	41.5	46.8	46.9
15:00	35.0	40.3	38.6	37.5	43.0	39.3	37.1	43.7	40.8	39.3	428.0	41.9	46.6	45.8
16:00	35.6	39.6	38.8	38.1	42.0	39.8	38.1	42.9	41.1	40.3	361.0	39.7	45.0	43.9
17:00	32.7	36.1	37.3	37.4	37.5	38.7	37.8	37.8	39.7	39.8	221.0	37.0	39.0	38.3
18:00	29.0	34.5	36.0	35.9	35.4	37.2	36.6	35.9	37.8	38.3	144.0	35.4	37.4	35.9
19:00	29.1	33.1	34.3	34.3	33.8	35.6	35.5	34.3	36.0	36.6	20.0	33.1	34.4	33.6
20:00	28.8	32.0	33.1	33.0	32.6	34.3	34.2	33.1	34.5	35.1	0.0	32.0	33.3	32.5
21:00	28.6	31.1	32.1	32.0	31.7	33.2	33.2	32.1	33.3	33.8	0.0	32.6	33.6	33.3
22:00	28.6	30.4	31.3	31.2	31.0	32.2	32.3	31.3	32.4	32.7	0.0	30.9	32.2	31.2
23:00	28.3	29.9	30.6	30.5	30.4	31.5	31.6	30.6	31.5	31.8	0.0	31.0	32.4	31.9
0:00	28.1	29.5	30.0	30.0	30.0	30.8	31.0	30.1	30.9	31.1	0.0	30.5	31.3	30.9
1:00	27.8	29.1	29.6	29.5	29.6	30.3	30.4	29.7	30.3	30.5	0.0	30.6	31.6	31.0
2:00	27.5	28.8	29.3	29.2	29.2	29.8	29.9	29.3	29.8	30.0	0.0	29.7	31.9	30.2
3:00	27.2	28.5	29.0	28.8	28.8	29.4	29.5	28.9	29.5	29.6	0.0	29.5	30.6	29.9
4:00	26.8	28.2	28.6	28.5	28.5	29.0	29.1	28.5	29.0	29.2	0.0	30.0	30.1	30.4
5:00	26.8	28.0	28.3	28.2	28.1	28.6	28.8	28.2	28.7	28.8	0.0	29.3	30.0	29.7
6:00	27.1	28.0	28.2	28.1	28.2	28.5	28.6	28.3	28.5	28.6	0.0	28.9	29.5	29.3
7:00	28.1	29.0	28.7	28.5	29.5	28.8	29.1	29.7	29.0	28.8	60.0	30.3	31.3	31.2
8:00	28.6	31.0	29.8	29.5	32.0	29.8	30.1	32.1	30.1	29.6	185.0	31.5	33.7	33.8
9:00	29.4	33.5	31.4	31.0	35.1	31.5	31.4	35.3	32.0	31.1	281.0	33.4	36.0	37.1

Table S2 The Data in Figure 10 and Figure 11

TIME	C25					PAC13					AC13					Solar Radiation Intensity (J/kg·K ⁻¹)
	a	b	c	Average	Heat Energy Variation	a	b	c	Average	Heat Energy Variation	a	b	c	Average	Heat Energy Variation	
	(°C)	(°C)	(°C)	(°C)	(kJ)	(°C)	(°C)	(°C)	(°C)	(kJ)	(°C)	(°C)	(°C)	(°C)	(kJ)	
9:00	33.5	29.8	28.8	30.70	\	35.1	29	28.3	30.80	\	35.5	29.5	27.8	30.93	\	482
10:00	38.3	33.5	31.7	34.50	26.08	41	32.9	30.6	34.83	21.84	41.1	33.6	31.1	35.27	26.65	555
11:00	36.1	34.6	33.6	34.77	1.83	38.3	34.8	32.3	35.13	1.62	37.9	35.5	34.1	35.83	3.48	317
12:00	38.7	35.5	34.8	36.33	10.75	40.8	35.5	34.2	36.83	9.21	40.9	36.5	35.5	37.63	11.07	464
13:00	36.5	35.7	35.3	35.83	-3.43	37.8	36.1	34.6	36.17	-3.61	37.9	36.8	36.3	37.00	-3.89	362
14:00	40.7	37.7	36.6	38.33	17.16	43	38	36	39.00	15.35	43.6	39.2	37.8	40.20	19.68	620
15:00	40.3	38.6	37.5	38.80	3.20	43	39.3	37.1	39.80	4.33	43.7	40.8	39.3	41.27	6.56	428
16:00	39.6	38.8	38.1	38.83	0.23	42	39.8	38.1	39.97	0.90	42.9	41.1	40.3	41.43	1.02	361
17:00	36.1	37.3	37.4	36.93	-13.04	37.5	38.7	37.8	38.00	-10.65	37.8	39.7	39.8	39.10	-14.35	221
18:00	34.5	36	35.9	35.47	-10.07	35.4	37.2	36.6	36.40	-8.67	35.9	37.8	38.3	37.33	-10.86	144
19:00	33.1	34.3	34.3	33.90	-10.75	33.8	35.6	35.5	34.97	-7.76	34.3	36	36.6	35.63	-10.45	20
20:00	32	33.1	33	32.70	-8.24	32.6	34.3	34.2	33.70	-6.86	33.1	34.5	35.1	34.23	-8.61	0
21:00	31.1	32.1	32	31.73	-6.64	31.7	33.2	33.2	32.70	-5.42	32.1	33.3	33.8	33.07	-7.17	0
22:00	30.4	31.3	31.2	30.97	-5.26	31	32.2	32.3	31.83	-4.69	31.3	32.4	32.7	32.13	-5.74	0
23:00	29.9	30.6	30.5	30.33	-4.35	30.4	31.5	31.6	31.17	-3.61	30.6	31.5	31.8	31.30	-5.12	0
24:00	29.5	30	30	29.83	-3.43	30	30.8	31	30.60	-3.07	30.1	30.9	31.1	30.70	-3.69	0
1:00	29.1	29.6	29.5	29.40	-2.97	29.6	30.3	30.4	30.10	-2.71	29.7	30.3	30.5	30.17	-3.28	0
2:00	28.8	29.3	29.2	29.10	-2.06	29.2	29.8	29.9	29.63	-2.53	29.3	29.8	30	29.70	-2.87	0
3:00	28.5	29	28.8	28.77	-2.29	28.8	29.4	29.5	29.23	-2.17	28.9	29.5	29.6	29.33	-2.25	0
4:00	28.2	28.6	28.5	28.43	-2.29	28.5	29	29.1	28.87	-1.99	28.5	29	29.2	28.90	-2.66	0
5:00	28	28.3	28.2	28.17	-1.83	28.1	28.6	28.8	28.50	-1.99	28.2	28.7	28.8	28.57	-2.05	0
6:00	28	28.2	28.1	28.10	-0.46	28.2	28.5	28.6	28.43	-0.36	28.3	28.5	28.6	28.47	-0.61	0
7:00	29	28.7	28.5	28.73	4.35	29.5	28.8	29.1	29.13	3.79	29.7	29	28.8	29.17	4.30	60
8:00	31	29.8	29.5	30.10	9.38	32	29.8	30.1	30.63	8.12	32.1	30.1	29.6	30.60	8.81	185
9:00	33.5	31.4	31	31.97	12.81	35.1	31.5	31.4	32.67	11.01	35.3	32	31.1	32.80	13.53	281

Note: The darker the red, the larger the value. The darker the green, the smaller the value.