

**Table S1.** Model performance for daily mean meteorological factors in the two simulation cases for the periods of one year and two months (from March to April) in 2014.

Site		FNL		ERA	
		year	Mar–Apr	year	Mar–Apr
<i>Temperature</i>					
<i>r</i>	Bangkok	0.73	0.58	0.77	0.57
	Chiang Mai	0.77	0.73	0.79	0.76
MB	Bangkok	-1.5	-0.2	-1.4	-0.2
(°C)	Chiang Mai	-0.6	2.3	-0.4	2.6
MAE	Bangkok	1.8	0.8	1.7	0.9
(°C)	Chiang Mai	2.0	2.4	2.1	2.7
RMSE	Bangkok	2.2	1.0	2.0	1.0
(°C)	Chiang Mai	2.3	2.6	2.5	2.9
<i>Relative humidity</i>					
<i>r</i>	Bangkok	0.65	0.37	0.67	0.41
	Chiang Mai	0.82	0.68	0.83	0.64
MB	Bangkok	8	0	7	0
(%)	Chiang Mai	4	-10	2	-13
MAE	Bangkok	12	5	11	5
(%)	Chiang Mai	14	13	13	15
RMSE	Bangkok	14	7	13	7
(%)	Chiang Mai	16	15	15	16
<i>Wind speed</i>					
<i>r</i>	Bangkok	0.56	0.79	0.50	0.78
	Chiang Mai	0.33	0.45	0.33	0.50
MB	Bangkok	-0.9	-0.8	-0.7	-0.7
(m s <sup>-1</sup> )	Chiang Mai	-0.2	0.0	-0.2	0.0
MAE	Bangkok	0.9	0.8	0.9	0.7
(m s <sup>-1</sup> )	Chiang Mai	0.6	0.4	0.6	0.4
RMSE	Bangkok	1.1	0.9	1.0	0.8
(m s <sup>-1</sup> )	Chiang Mai	0.7	0.5	0.7	0.5

Note: *r*—Pearson's correlation coefficient, MB—mean bias, MAE—mean absolute error, RMSE—root mean square error.

**Table S2.** Model performance for daily mean PM<sub>10</sub> concentrations in the four simulation cases for the periods of one full year (2014) and two months (from March to April 2014).

Site		FNL + FINN		FNL + GFED		ERA + FINN		ERA + GFED	
		year	Mar–Apr	year	Mar–Apr	year	Mar–Apr	year	Mar–Apr
<i>r</i>	Bangkok	0.80	0.82	0.78	0.80	0.76	0.78	0.75	0.75
	Chiang Mai	0.77	0.62	0.75	0.67	0.77	0.61	0.76	0.67
MB	Bangkok	-5	-7	-6	-11	-6	-4	-8	-9
(μg m <sup>-3</sup> )	Chiang Mai	-9	6	-16	-30	-7	19	-14	-21
MAE	Bangkok	10	12	11	12	12	12	12	12
(μg m <sup>-3</sup> )	Chiang Mai	20	38	20	37	20	43	19	33
RMSE	Bangkok	14	14	15	15	15	16	15	15
(μg m <sup>-3</sup> )	Chiang Mai	27	50	26	48	30	58	25	42

Note: *r*—Pearson's correlation coefficient, MB—mean bias, MAE—mean absolute error, RMSE—root mean square error.