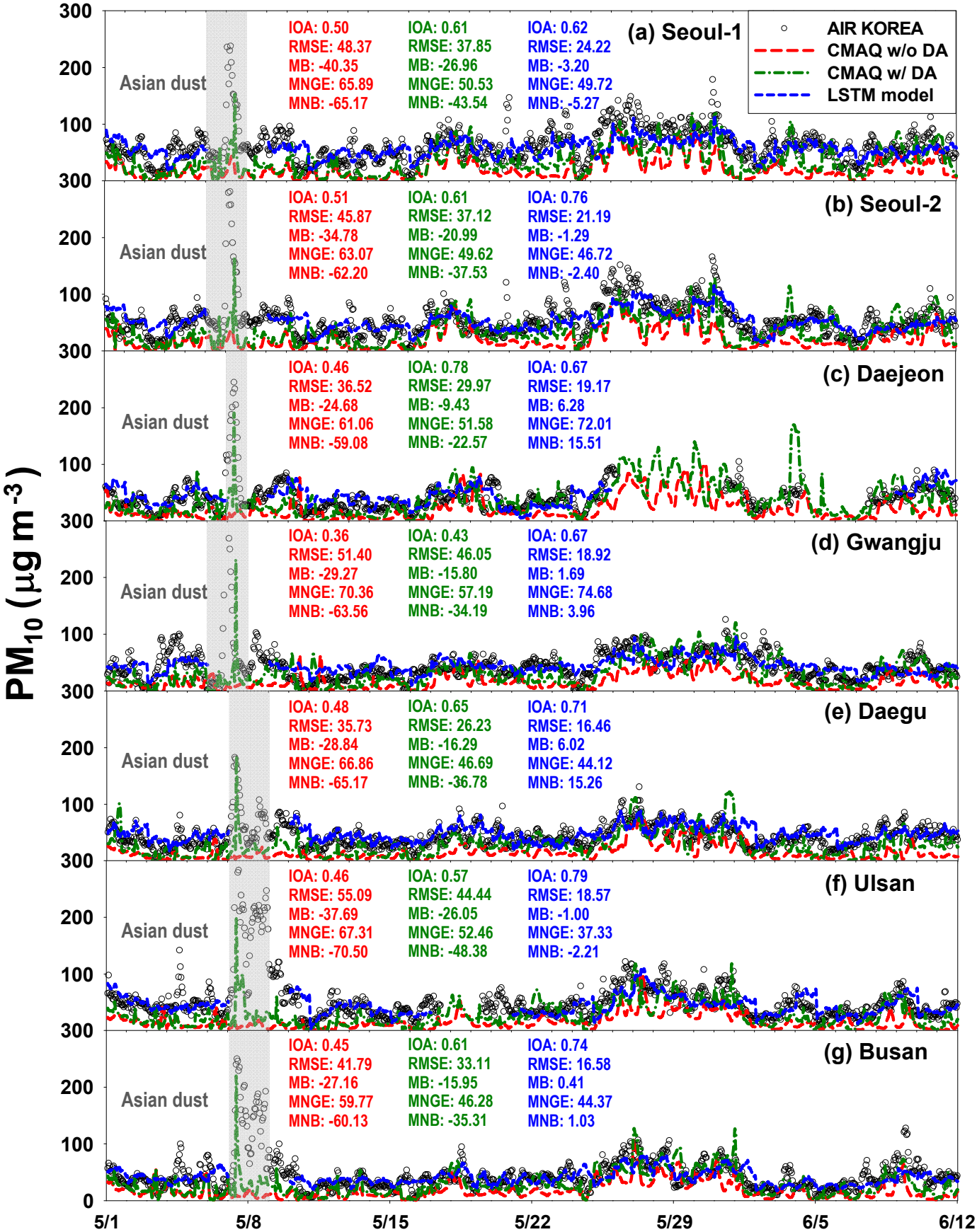
PM10 (μg m-3)
AIR KOREA
CMAQ w/o DA
CMAQ w/ DA
LSTM model
(a) Seoul-1
IOA: 0.50
RMSE: 48.37
MB: -40.35
MNGE: 65.89
MNB: -65.17
IOA: 0.61
RMSE: 37.85
MB: -26.96
MNGE: 50.53
MNB: -43.54
IOA: 0.62
RMSE: 24.22
MB: -3.20
MNGE: 49.72
MNB: -5.27
(b) Seoul-2
IOA: 0.51
RMSE: 45.87
MB: -34.78
MNGE: 63.07
MNB: -62.20
IOA: 0.61
RMSE: 37.12
MB: -20.99
MNGE: 49.62
MNB: -37.53
IOA: 0.76
RMSE: 21.19
MB: -1.29
MNGE: 46.72
MNB: -2.40
(c) Daejeon
IOA: 0.46
RMSE: 36.52
MB: -24.68
MNGE: 61.06
MNB: -59.08
IOA: 0.78
RMSE: 29.97
MB: -9.43
MNGE: 51.58
MNB: -22.57
IOA: 0.67
RMSE: 19.17
MB: 6.28
MNGE: 72.01
MNB: 15.51
(d) Gwangju
IOA: 0.36
RMSE: 51.40
MB: -29.27
MNGE: 70.36
MNB: -63.56
IOA: 0.43
RMSE: 46.05
MB: -15.80
MNGE: 57.19
MNB: -34.19
IOA: 0.67
RMSE: 18.92
MB: 1.69
MNGE: 74.68
MNB: 3.96
(e) Daegu
IOA: 0.48
RMSE: 35.73
MB: -28.84
MNGE: 66.86
MNB: -65.17
IOA: 0.65
RMSE: 26.23
MB: -16.29
MNGE: 46.69
MNB: -36.78
IOA: 0.71
RMSE: 16.46
MB: 6.02
MNGE: 44.12
MNB: 15.26
(f) Ulsan
IOA: 0.46
RMSE: 55.09
MB: -37.69
MNGE: 67.31
MNB: -70.50
IOA: 0.57
RMSE: 44.44
MB: -26.05
MNGE: 52.46
MNB: -48.38
IOA: 0.79
RMSE: 18.57
MB: -1.00
MNGE: 37.33
MNB: -2.21
(g) Busan
IOA: 0.45
RMSE: 41.79
MB: -27.16
MNGE: 59.77
MNB: -60.13
IOA: 0.61
RMSE: 33.11
MB: -15.95
MNGE: 46.28
MNB: -35.31
IOA: 0.74
RMSE: 16.58
MB: 0.41
MNGE: 44.37
MNB: 1.03
Asian dust
300
200
100
0
5/1
5/8
5/15
5/22
5/29
6/5
6/12