



D

adonis analysis on forward-selected factors

Number of permutations: 1999
Terms added sequentially (first to last)

	Df	SumsOfSqs	MeanSq	F.Model	R2	Pr(>F)
Mean_TemperatureC	1	0.905	0.905	5.548	0.017	5.00E-04
mFPAR	1	0.889	0.889	5.446	0.017	5.00E-04
mNO2	1	0.629	0.629	3.852	0.012	5.00E-04
spring	1	0.532	0.532	3.257	0.010	5.00E-04
Overall.AQI.Value	1	0.482	0.482	2.953	0.009	5.00E-04
summer	1	0.421	0.421	2.580	0.008	0.001
X_Mean_VisibilityKm	1	0.358	0.358	2.193	0.007	0.0035
winter	1	0.333	0.333	2.042	0.006	0.0085
mLAI	1	0.287	0.287	1.756	0.005	0.0165
date.month	1	0.253	0.253	1.551	0.005	0.034
longitude	1	0.335	0.335	2.050	0.006	0.0055
MEM1	1	0.498	0.498	3.050	0.010	5.00E-04
MEM91	1	0.484	0.484	2.965	0.009	5.00E-04
MEM39	1	0.282	0.282	1.730	0.005	0.0185
MEM83	1	0.286	0.286	1.750	0.005	0.0185
popdensity	1	0.251	0.251	1.535	0.005	0.0435
MEM69	1	0.331	0.331	2.029	0.006	0.0025
urban.bi	1	0.295	0.295	1.810	0.006	0.0135
Westcoast	1	0.258	0.258	1.580	0.005	0.028
Europe	1	0.187	0.187	1.148	0.004	0.2025
In_in_a_day	1	0.236	0.236	1.449	0.005	0.0505
P2	1	0.389	0.389	2.381	0.007	0.0025
P8	1	0.228	0.228	1.397	0.004	0.0695
P5	1	0.161	0.161	0.985	0.003	0.4215
others	1	0.211	0.211	1.295	0.004	0.1145
P1	1	0.194	0.194	1.191	0.004	0.166
P7	1	0.246	0.246	1.507	0.005	0.0515
batch	1	0.912	0.912	5.587	0.017	5.00E-04
Residuals	254	41.456	0.163		0.792	
Total	282	52.329			1.000	

E

All samples on forward-selected factors

Variation Partition Table	Df	R.square	Adj.R.square	Testable (significant)
Environmental Factors	10	0.0972	0.0641	TRUE
Spatial/lifestyle factors	17	0.1226	0.0663	TRUE
Technical artifacts	1	0.0263	0.0228	TRUE
All explained variation	28	0.20777	0.12044	TRUE

All samples on all factors

Variation Partition Table	Df	R.square	Adj.R.square	Testable (significant)
Environmental Factors	29	0.1707	0.0757	TRUE
Spatial/lifestyle factors	29	0.1646	0.0688	TRUE
Technical artifacts	1	0.0263	0.0228	TRUE
All explained variation	59	0.3126	0.1307	TRUE

Fig. S6