Electronic Supplementary Material to: Nocturnal Low-level Winds and Their Impacts on Particulate Matter over the Beijing Area*

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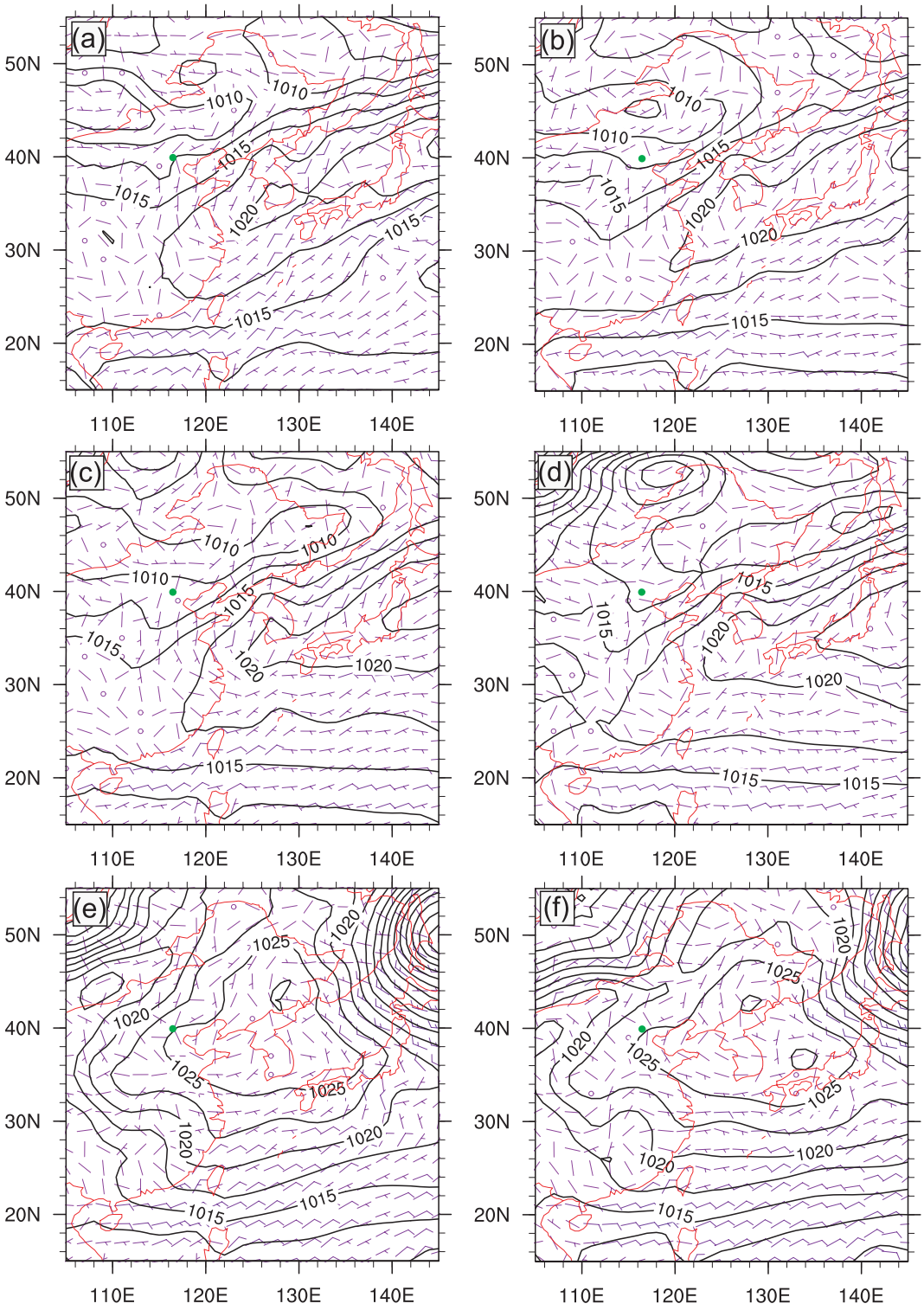

Fig. S1. Sea level pressure field (units: hPa) and 10-m wind field (unit: m s^{-1}) at (a) 2000 LST 23 October, (b) 0800 LST 24 October, (c) 2000 LST 24 October, (d) 0800 LST 25 October, (e) 2000 LST 28 October, and (f) 0800 LST 29 October, based on NCEP ($1° \times 1°$) reanalysis data. The green dot denotes the location of Beijing.

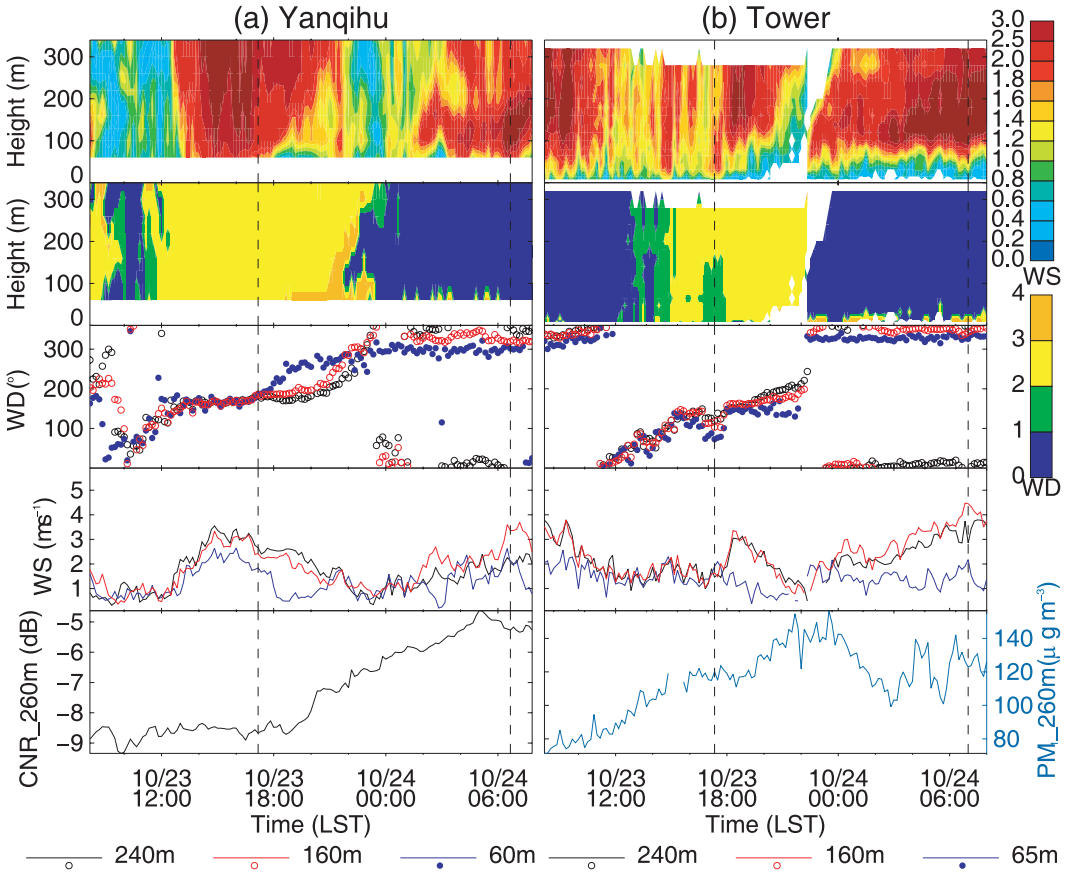

Fig. S2. Horizontal wind profiles, CNRs, and PM_1 mass concentrations observed at the Yanqihu and tower sites on 23 October 2014 (WS, horizontal wind speed; WD, wind direction, where a WD of 292.5°–360° and 0°–67.5° is represented by 0–1, and a WD of 112.5°–247.5° is represented by 2–3). The dashed lines mark the sunset and sunrise times.

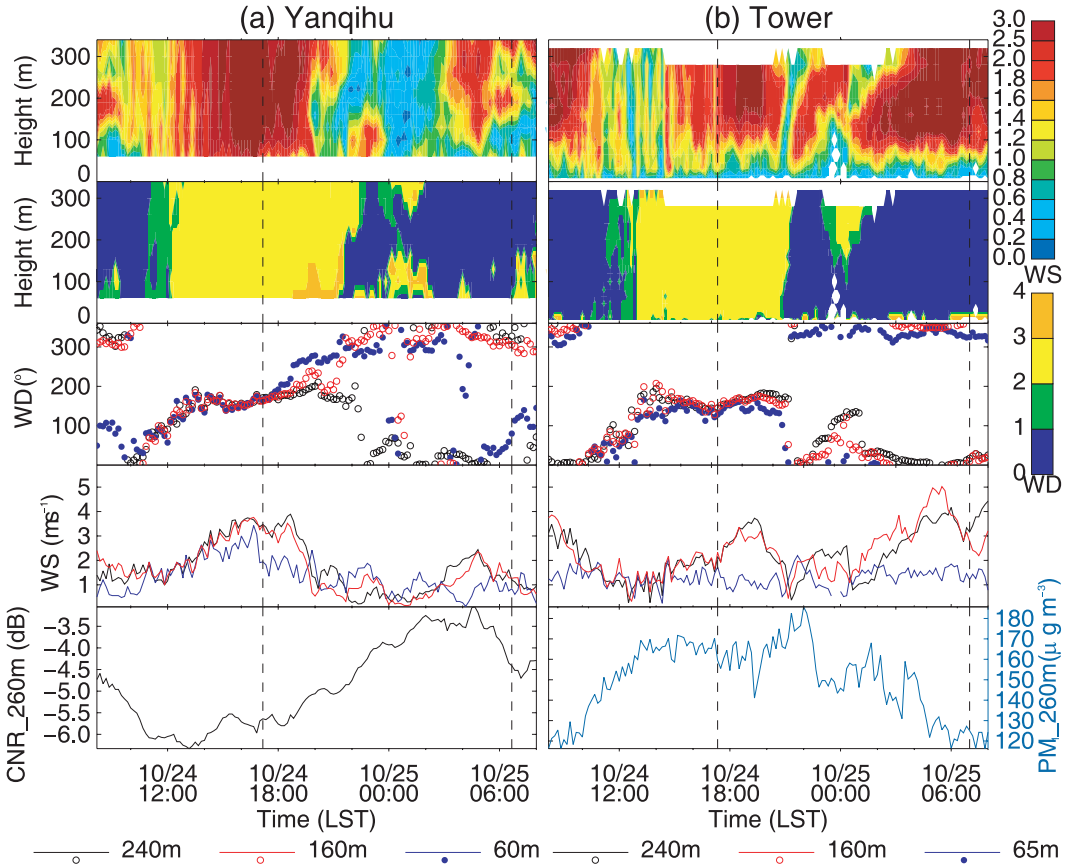

Fig. S3. Horizontal wind profiles, CNRs, and PM_1 mass concentrations observed at the Yanqihu and tower sites on 24 October 2014.

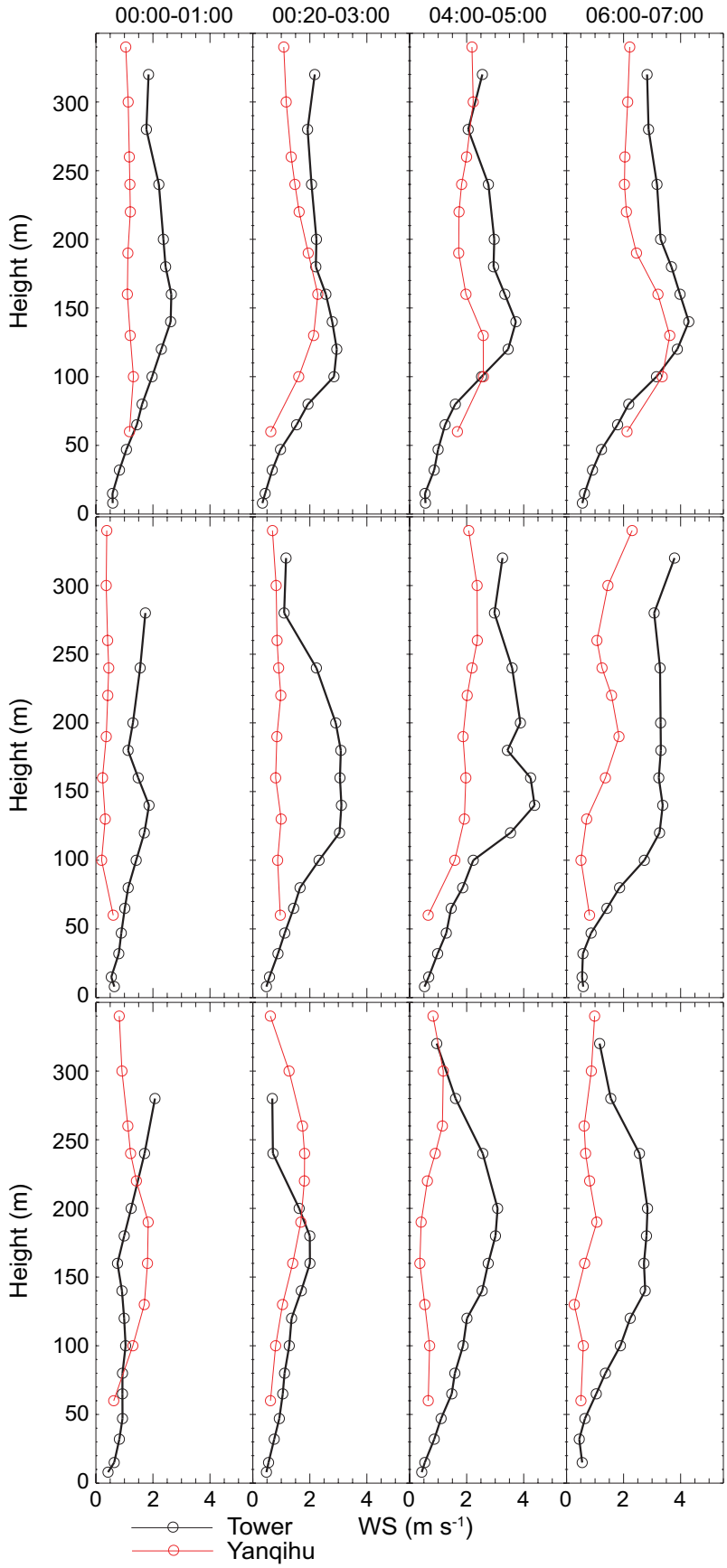

Fig. S4. Hourly mean wind speed (WS) profiles for three events on 23 (upper panel), 24 (middle panel) and 28 (lower panel) October 2014.