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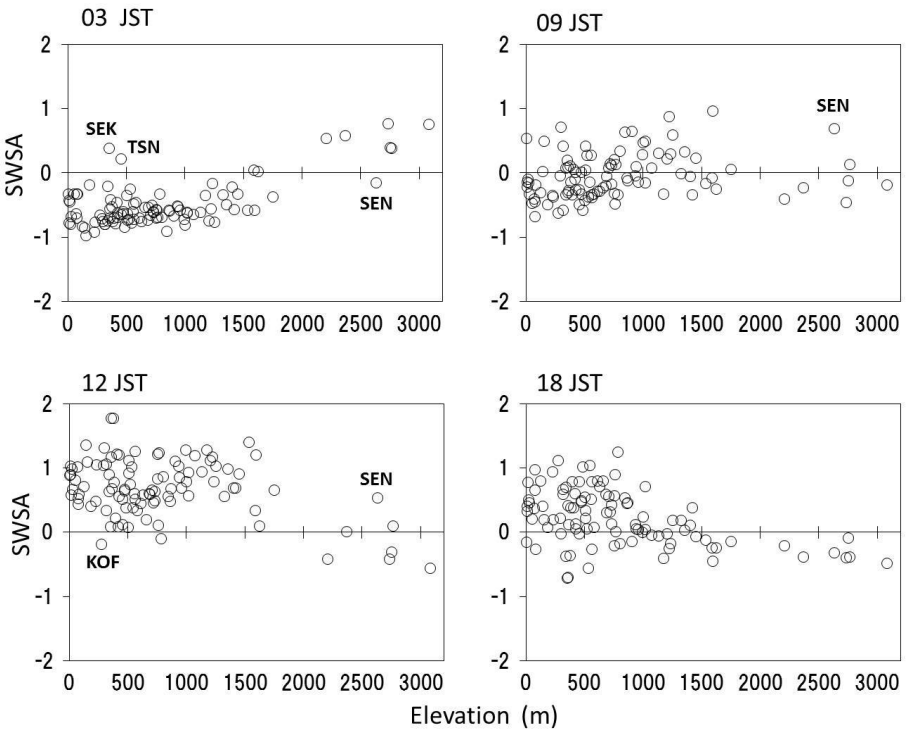

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Figure 1. Scattering diagrams between elevation (m) and standardized wind speed anomaly (SWSA) at four times. Abbreviations stand for the station names, such as Senjo-jiki (SEN), Sekiyama (SEK), Tsunan (TSN), and Kofu (KOF).

- Surface wind speed anomalies during fair weather in the summer in central Japan, including data at Automated Meteorological Data Acquisition System (AMeDAS) and mountain station data above 2000 m above the mean sea level (a.s.l.) archived by an inter-university cooperative project, showed remarkable diurnal differences depending on the elevations (Fig. 1).
- Nocturnal enhancement of wind speeds at representative mountaintop stations appeared with prevailing Pacific Highs in synoptic pressure patterns, but it did not always appear in the same day and the absolute nocturnal wind speed varied day by day.
- The degree of concavity was not clearly related to the wind speed anomaly, and the degree of convexity was linearly related to the wind speed anomaly at a scale of approximately 10 km.