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Numerical experiments and observations of the general circulation of the Venus atmosphere

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At the 65-km level of the Venus atmosphere, it rotates with the 60-times faster period than the surface rotation. The superrotation is termed "4-day circulation". Since the observation except for this height level is lack, global structure of the atmospheric general circulation is still unknown. The proposed mechanisms of superrotation, based on the previous observations, are reviewed. Waves and eddies are closely related to all of their theories The accumulation of experimental and observational data of clouds (e.g. optical properties and spatial distribution) and basic-state fields (e.g. temperature and wind), together with waves and eddies, are indispensable for discussing atmospheric dynamics of Venus.

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