

*This is the **Foundation Separate** version — Higher Tier content has been removed.*

Transpiration drives water transport in plants. Plant hormones control growth responses to environmental stimuli.

Required Practical: Investigating transpiration rate — potometer at different conditions.

- Transpiration: water evaporates from leaves through stomata → pulls water up xylem from roots
- Rate increased by: higher temperature, more light, lower humidity, more wind
- Guard cells: turgid = stomata open (light conditions); flaccid = stomata close (water stress)

Key Terms

Transpiration

Evaporation of water from leaves — drives water movement in xylem