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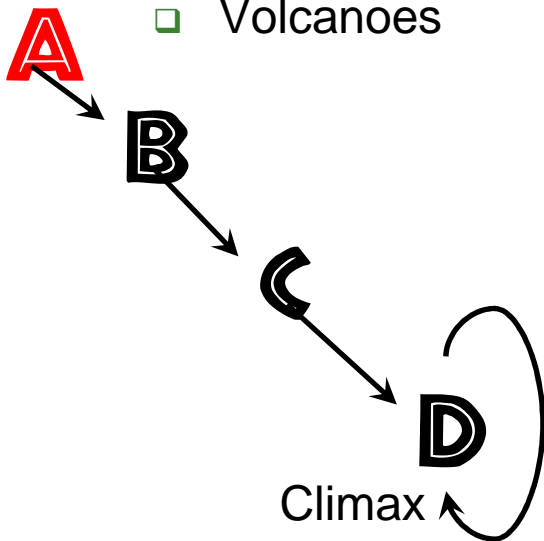
# Succession – Paradigms Lost

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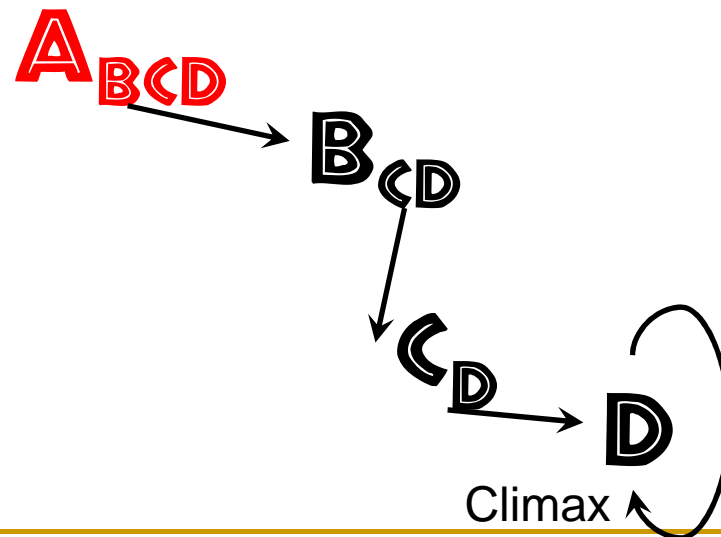
# Succession

## ■ Clementsian

- Facilitation model
- Primary succession
  - Not Common
  - Sterile area
    - Glacier moraines
    - Volcanoes



- Secondary succession
  - Common
  - Disturbed area
    - Plowed fields
    - Fires / floods / etc.



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# Succession

- Tolerance model
    - No need for early successional species
      - All may be present
      - Some are better competitors and will eventually dominate
    - Tolerance of limiting resources determines competitive advantage
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# Succession

- Inhibition model
    - Succession is not orderly
    - Depends on colonization pattern
    - Competitively equivalent
    - Trend from short lived to long lived species w/i the community
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# Succession

- Random colonization model
  - Chance survival for species
  - Random dispersal events



# Succession

## ■ Categorizing plants

Character	Early Succession	Late Succession
Photosynthetic rate	High	Low
Seed number	Many	Few
Seed size	Small	Large
Dispersal distance	Long	Short
Growth rate	Rapid	slow

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# Succession

- Multiple Stable States
    - More than one climax
    - Hysteresis
    - Sudden jumps
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# Succession – super organism

- Gaia Hypothesis

- Living environment influences physical environment
  - Biosphere acts as a self organizing system with large scale homeostasis
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