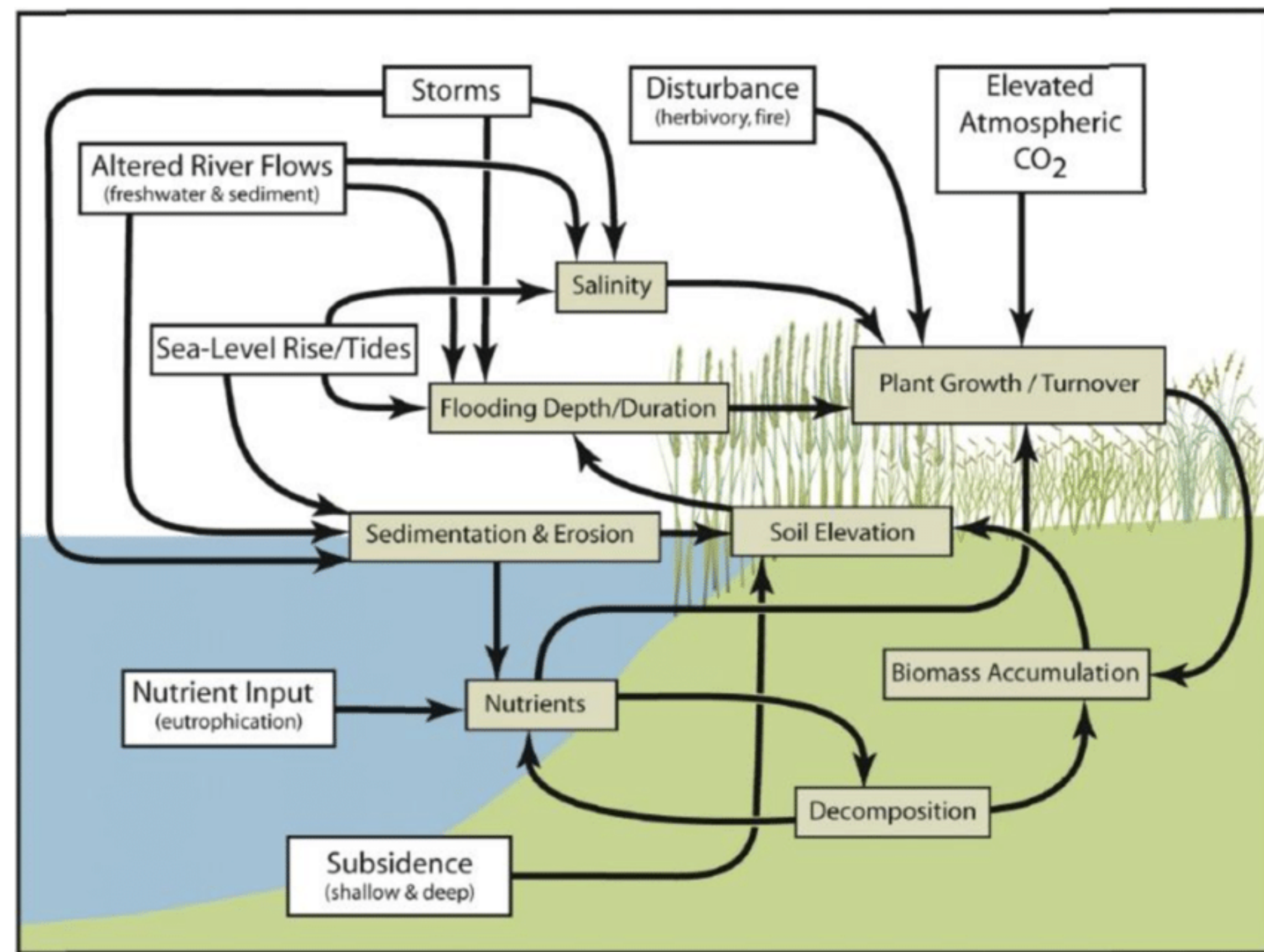


MONITORING & ADAPTIVE MANAGEMENT

MONITORING

We conduct pre and post-restoration monitoring to understand the current and future condition of tidal wetland function, structure and health. This informs future management and identifies any need for intervention (adaptive management) to ensure the restoration site in reaching expected outcomes.



ADAPTIVE MANAGEMENT

Adaptive management is integrated into monitoring efforts as needed when the health or function of the tidal wetland is not progressing as expected. This may include altering data collection and planting and/or earthworks to ensure the restoration site thrives.



Transition phase

- Ecological engineering phase
- Influx of sediment
- Water very visible
- New plants
- Short term!



Establishment

- Vegetation response phase
- Less sediment
- Plant community establishing
- Species competition
- Water less visible



Equilibrium

- Intermittent disturbances & future of site
- Tidal Wetland zonation
- Stable creek network

Soils & Sediments

Soils and sediments are monitored to understand the underlying processes controlling vegetation type, cover, and growth.

Methods include:

- Sediment Coring and Analysis
- Rod Surface Elevation Tables
- Marker Horizons
- RBR Turbidity Logger



Vegetation

Vegetation is monitored to understand vegetation type, cover, and growth.

Methods include:

- Vegetation Surveys
- Habitat Mapping



Geospatial

Geospatial attributes are collected to understand the form and function of rivers, floodplains and salt marshes and serve as the basis for other analyses.

Methods include:

- Georeferenced Aerial Photography
- Digital Surface Models
- Digital Elevation Models
- GNSS Elevation Surveys



Hydrology

Hydrology data is collected to understand the locations of fish habitat, changes in vegetation, and the overall structure and function of the marsh.

Methods include:

- Automated Water Level Recorders
- Sontek M9 River Surveyor
- Nortek ADCP
- DEM
- Tide Signal

