

# Flood Resilience Strategies

**A flood resilient community is one in which residents and institutions have the capacity to prepare for, respond to, and recover from flooding with minimal outside assistance.**

## Manage water where it falls

Slow it down. Spread it out. Soak it in.

There should be no adverse impacts to neighbors or downstream areas.

- Reduce and manage runoff from new development (NYS stormwater management standards and permits).
- Manage runoff from existing development (rain gardens, drywells, stormwater ponds, etc.).
- Maintain and improve drainage infrastructure—without transferring the problems elsewhere.
  - Roadway drainage, bridges, and culverts
  - Storm sewers
  - Private ditches, driveways, and drainage systems
- Manage land uses based on site characteristics in order to preserve natural features and drainage functions.
  - Healthy vegetation, especially forests
  - Healthy soils: not compacted and protected from erosion, especially on steep slopes
  - Wetlands and other ponding areas

## Make room for water

Keep the highest risk areas free from vulnerable development.

Allow natural stream and floodplain processes: sediment transport, storage of floodwaters, slowing flow.

- Identify areas that are unsafe for development due to erosion, water depths, or high flood velocities.
- Promote flood safety and resource protection in land use and development plans.
- Use land use regulations to prevent development and protect natural functions in high-risk areas.
  - Buffers for streams and waterbodies (building setbacks, require natural vegetation)
  - Conservation zone or other restrictions
  - Site planning and subdivision requirements
- Remove existing development from high-risk areas (buyouts, relocation).
- Restore healthy stream systems—including floodplains—to accommodate low and high flows.

## Live with floods

Enhance safety and reduce the potential for damage when development is located in flood-prone areas.

- Manage flooding with levees, dams, and channel modifications.
- Enforce floodplain development standards to reduce vulnerability of new construction.
- Floodproof existing development (elevate utilities, flood-resistant materials, flood vents, building elevation).
- Promote flood insurance to help pay for flood recovery.
- Develop emergency response plans for municipal operations, families, and businesses.
- Support water level and precipitation gauges for flood warnings.
- Develop a disaster recovery plan that proactively identifies opportunities for rebuilding a safer community.

## Educate the public

Knowledgeable citizens make informed decisions that balance flood risks with other concerns.

- Display maps, handouts, and resources at municipal offices.
- Inform general audiences through newsletters, website, social media, signs, and news coverage.
- Reach target audiences using direct mail, presentations, and exhibits.
- Provide training and individual assistance.

### Key flood education topics:

- Flood safety
- Local flood hazards
- Property protection techniques
- Beneficial natural features