

# Warwick Grove Case Study



## Project Information

Level of Certification: Four Stars  
NGBS Certified

Location: Warwick, NY

Size of Site: 127 acres

Site Details: 30 acres developed, 97 acres of green space, 166 lots, 215 dwelling units, mix of single-family, townhomes and low-rise multifamily buildings

Year Site Development Began: 2005

## Project Team

Developer: Warwick Grove Company of Leyland Alliance LLC

Designer: Duany Plater-Zyberk & Company and Michael Watkins Architect, LLC

Verifier: Nu-Tech Energy Solutions

Meaningful Partnerships: Dr.

Klemens, herpetologist

## Key Features

Innovative Practices:

- Site design eliminated the need for driveways, increasing greenspace and limiting impervious surfaces. Garage pull-ins are located directly off the alleys, street parking is shared and multifamily parking does not exceed local minimums.

## Specifics

Green infill development is often tightly interwoven with green home design, but few integrate these as well as Warwick Grove. The buildings' high-quality architecture and energy-efficient design enhance the efforts of the developer to make Warwick Grove a green lifestyle neighborhood.

Built under the principles of New Urbanism and Smart Growth planning, Warwick Grove concentrates developed area on less than one-fourth of the total site. The rest of the 97 acres are reserved for the site's woodlands, a wetland conservation area and a wildlife corridor. Careful planning and attention were put into the design and reflect how conservation efforts can be a powerful aspect of a development's marketing strategy. Warwick Grove earned four out of four possible stars under the NGBS certification for site development and is a destination neighborhood in the Hudson Valley.

Site design concentrates the houses, townhomes and multifamily buildings in a way that responded to updated market demand in the mid-2000s. This mix of dwelling units is paired with community structures, including a neighborhood square, post office and neighborhood center. The neighborhood design promotes community and a connection to the outdoors with walking and bike paths, nearby parks and smaller lots with welcoming front porches.



*Neighborhood Center*

## Key Features Cont.

### Stormwater Management:

- Property naturally drained into low lying wetlands. This feature was maintained via a multi-stage wastewater management system.
- The system settles out silts and solids prior to releasing into wetlands.

### Landscape Plan:

- All landscape plantings and tree reintroduction were indigenous species grown at a local nursery.
- Species/locations for tree plantings were identified and utilized to moderate temperatures.

### Sensitive Areas:

- 97 acres of green space with wetland areas.

### Wildlife Habitat

- Preserved wetlands habitat, surrounding forest and the migratory path of the endangered bog turtle.
- Dark-Sky exterior lighting was used to prevent light pollution.

### Soil Disturbance and Erosion:

- Use of common utility trenches and shared easements.
- Limits on clearing and grading were demarcated in the plan.
- Silt fencing was established for the entire perimeter.

### Trees and Vegetation:

- Green space was cornered off via silt fencing, and no disturbance was allowed beyond that line.



Neighborhood Center Retaining Wall

Ensuring the protection of the site's natural resource, including wetlands, mature white oaks and a stream, was imperative throughout development. After consultations with a local wetland specialist, the project team found that they could incorporate wetlands as a tertiary treatment for the neighborhood's stormwater runoff.

A critically endangered species, the Bog Turtle, was accommodated with a bridge that acts as a wildlife corridor. The innovative techniques and materials used have become a best practice for species protection in other properties in the region.

The open space, wildlife protection and compact design of Warwick Grove also exhibit model qualities that future developments can look to.



Home Courtyard

*All information in this case study was provided by one or more members of the project team. For information on certifying your project to the NGBS, visit [homeinnovation.com/green](http://homeinnovation.com/green)*