



# Green Infrastructure & Stormwater Management CASE STUDY

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## 219th Street

**Location:** Shoelace Park at 219th St., The Bronx, New York City, NY

**Client:** NYC Parks & Recreation

**Design Firm(s):** James Mituzas, NYC Parks & Recreation

**Landscape architect/Project contact:** Nette Compton

**Email:** [nette.compton@parks.nyc.gov](mailto:nette.compton@parks.nyc.gov)

**ASLA Chapter:** New York

## Project Specifications

**Project Description:** Stormwater runoff from the intersection is channeled to the Park through curb cuts to raingardens

### Project Type:

Open space - park

A retrofit of an existing property

**Design features:** Rain garden, porous pavers, curb cuts, and porous sub-surface storage tank.

**This project was designed to meet the following specific requirements or mandates:** To meet funding criteria

**Impervious area managed:** 5,000 sq/ft to 1 acre

**Amount of existing green space/open space conserved or preserved for managing stormwater on site:** less than 5,000 sq/ft

**The regulatory environment and regulator was** supportive of the project.

**Did the client request that other factors be considered, such as energy savings, usable green space, or property value enhancements?** Yes - safety, aesthetics, maintenance.

## Cost & Jobs Analysis

**Estimated Cost of Stormwater Project:** \$500,000-\$1,000,000 (Public funding: Local)

**Was a green vs. grey cost analysis performed?** No

**Cost impact of conserving green/open space to the overall costs of the site**

**design/development project:** It probably increased the construction and design costs, compared to a traditional design, since the long-term incremental costs of traditional designs are not assessed.

**Cost impact of conserving green/open space for stormwater management over traditional site design/site development approaches (grey infrastructure)?** Slightly increased.

**Number of jobs created:** 4 on average for 2-year project duration

**Job hours devoted to project:**

Planning and Design: 480

Construction: 640

Annual Maintenance: 24

**Performance Measures****Stormwater reduction performance analysis:**

The project was designed to capture a 10-year storm flow from the contributing area.

**Community & economic benefits that have resulted from the project:** Aesthetics, reduced erosion and downslope degradation, increased access