Climate Smart Communities
http://www.dec.ny.gov/energy/50845.html

Office of Climate Change
New York State
Department of Environmental Conservation
625 Broadway, Albany, NY 12233-1030
(518) 402-8448,
climatechange@gw.dec.state.ny.us
www.dec.ny.gov/energy/44992.htm
NYSDOT GreenLITES Program and Local Communities

NYSDEC Climate Smart Communities Webinar Series
May 4, 2011

Paul Krekeler, NYSDOT GreenLITES Manager
NYS Multi-Modal System
Diverse, Complex and Vital

7,632 State Bridges
9,800 Local Bridges

4,137 Rail Route Miles

40,000 State Lane Miles

> 80 Million Passengers through airports

141 billion vehicle miles annually
NYS Geography and Demographics
also Diverse, Complex and Vital

- Diverse Landscape
- Climate
- Population

• 47,000 sq. miles land area
• Drained by > 70,000 miles of streams
• 10 major river systems
• 64% population in NYC metro area
• ~87% land area is rural
Our System is Built
Our System is Aging

Shift in investments from new construction to preservation of infrastructure.
What’s Next?
Sometimes we know, sometimes we do not know....
Sustainability and Transportation

Need for Sustainable Decisions:
- Support a sustainable society
- Environmental, Economic and Social Benefits
- Global perspective

Includes, but goes beyond:
- Sustainable Projects and Actions
  - Life cycle costs, recycled materials, impact avoidance, enhancements – local context
- Sustainable Transportation System
  - Access, mobility, multi-modal linkages – regional context
Sustainability – Triple Bottom Line

- Environment
- Economy
- Community
Sustainability Principles

“A society grows great when old men plant trees in whose shade they will not sit.” Ancient Greek Proverb

“In every deliberation, we must consider the impact on the seventh generation . . .” Great Law of the Iroquois

The Congress . . . declares that it is the continuing policy . . . to create and maintain conditions under which man and nature can exist in productive harmony, and fulfill social, economic and other requirements of present and future generations of Americans.” Section 101, National Environmental Policy Act, 1969
NYSDOT Sustainability Commitment

“*The Department is more than concrete, asphalt and steel. We are, in fact, a vital connection to and part of the path toward economic recovery. As we plan for the future, our transportation investments must be done in a manner that is both environmentally sensitive and sustainable. GreenLITES is the Department’s nationally recognized program which keeps us focused on making transportation decisions that support a sustainable society.*”

- Commissioner McDonald, Earth Day 2011
We Can’t Do It Alone
NYSDOT GreenLITES Program

- Program used to:
  - Measure our sustainability performance,
  - Recognize and promote sustainability best practices and
  - Identify areas where we need to improve our sustainability practices.

- GreenLITES Design Modeled after:
  - Building industry LEED program.
  - University of Washington Greenroads initiative.

- A self certification program.
- A way to demonstrate to public officials and the public how NYSDOT is advancing sustainable practices.
- Includes Design, Operations, Local Projects, Planning & DOT Regions
The Right Tool for the Job
What gets measured gets done

Evaluates individual projects for incorporation of sustainable practices.

Ensures balanced approach in selecting projects and making sustainable transportation decisions.

Integrates sustainability into Maintenance and Operations Plan.

Considers current and desired state of economy, environment and social equity as related to transportation.
GreenLITES Guiding Principles

- Not prescriptive
- Intent is to have all staff consider sustainability
- Promotes/encourages team decisions
- Flexibility in what to include
- Recognizes that cost is a competing priority
- Keep it simple
GreenLITES Design

Project designs are evaluated for over 175 possible sustainable practices in the five categories.
GreenLITES Design Categories

- **Five categories:**
  - Sustainable Sites
  - Water Quality
  - Materials and Resources
  - Energy and Atmosphere
  - Innovation/Unlisted
Sustainable Sites

- Alignment Selection
- Context Sensitive Solutions
- Land Use/Community Planning
- Protect, Enhance or Restore Wildlife Habitat
- Protect, Plant or Mitigate for Removal of Tree and Plant Communities