# TRAFFIC CALMING

# Empire Boulevard

## between Utica and Bedford Avenues

## June 22, 2009

Presentation for Community Board 9

Commissioner Janette Sadik-Khan

Office of Research, Implementation & Safety

NEW YORK CITY DOT

# Why are we here?

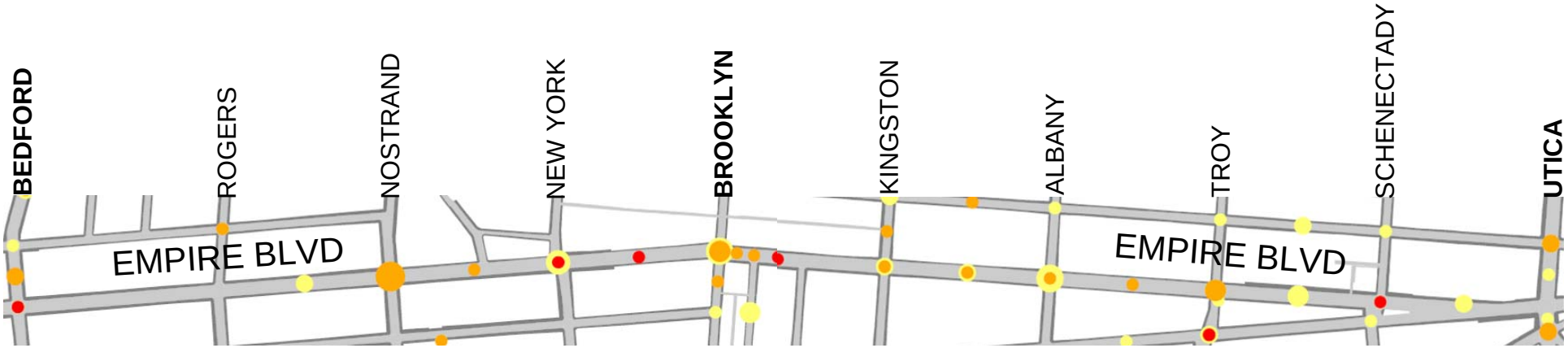
- Community concerns over speeding, pedestrian safety and desire for traffic calming
- Empire & Troy was one of NYC's Top 20 High Pedestrian Crash Locations in 2007


**Proposal aims to:**

1) **Improve Pedestrian Safety and Comfort**
2) **Calm Traffic**
3) **Improve the Streetscape**

# Background Data

- Empire & Troy 2007
  - 7 crashes
  - A Top 20 High Pedestrian Crash Location (tied for 2nd)
- Empire Blvd 1997-2007
  - 6 Fatalities
  - 33 Serious Injuries
  - High proportion of mid-block crashes



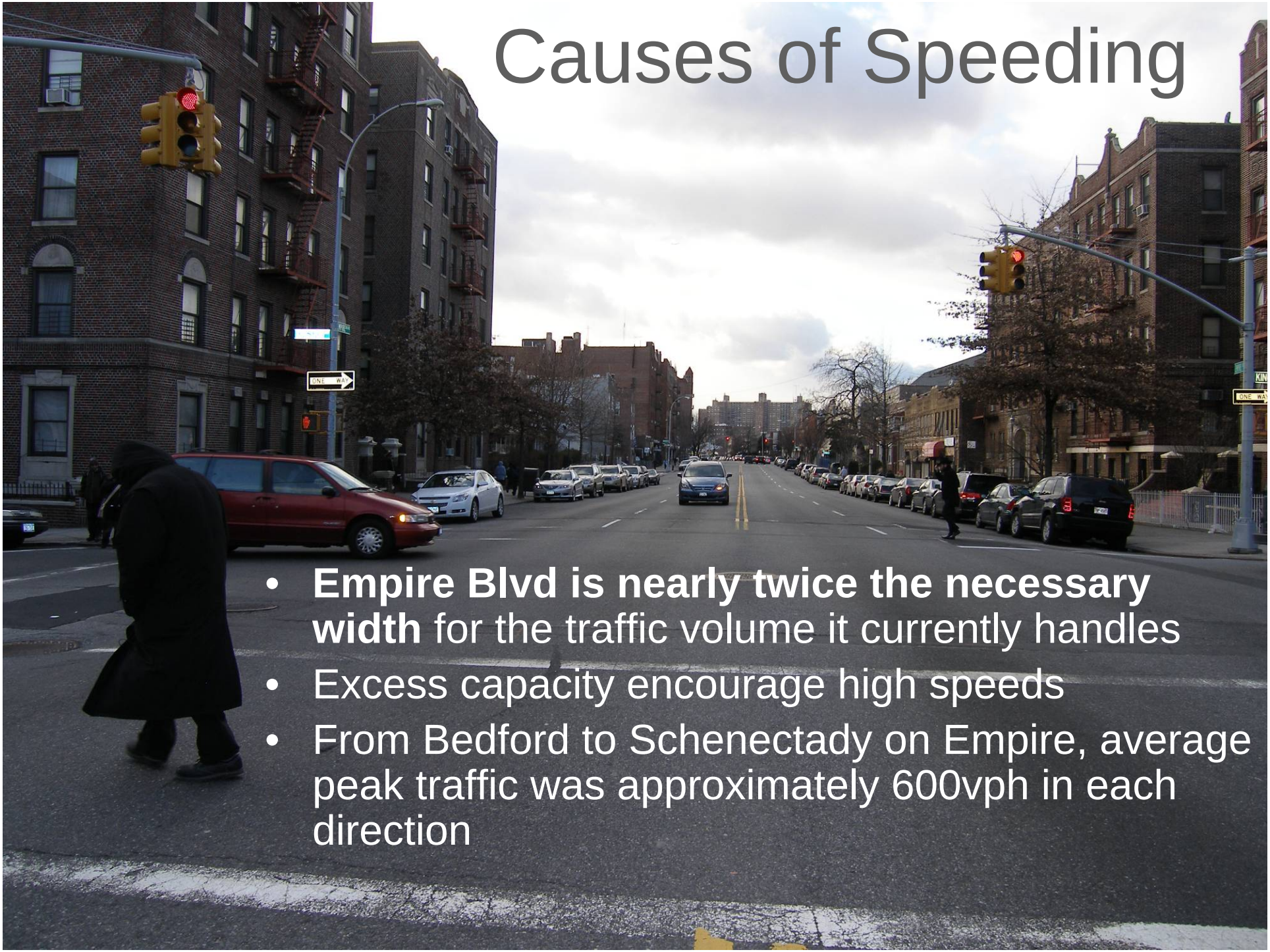
# Speeding

- Major factor in pedestrian injuries is speeding
- Small changes in speed lead to large differences in injuries
  - When a pedestrian is struck
    - At 20 mph = 5% chance of dying
    - At 30 mph = 45% chance of dying
    - At 40 mph = 85% chance of dying

Empire Blvd - 85% Percentile Speeds

| | Bedford-Rogers | | New York-Nostrand | | Brooklyn-Kingston | | Albany-Troy | | Utica-Schenectady | |
|---|---|---|---|---|---|---|---|---|---|---|
| | EB | WB | EB | WB | EB | WB | EB | WB | EB | WB |
| 1-3 pm | **31** | **31** | **38** | 26 | **34** | 30 | **33** | 29 | **37** | **31** |
| 3- 5 pm | 30 | 28 | **32** | 26 | **34** | **31** | **39** | 27 | **35** | 30 |
| 5-7 pm | **37** | **33** | **35** | **32** | **33** | **31** | **36** | **34** | **37** | **35** |
| 7-9 pm | **36** | **34** | **36** | **35** | **39** | **32** | **38** | **34** | **34** | **31** |

# Causes of Speeding



- **Empire Blvd is nearly twice the necessary width** for the traffic volume it currently handles
- Excess capacity encourage high speeds
- From Bedford to Schenectady on Empire, average peak traffic was approximately 600vph in each direction

# Other Safety Problems


60’ road = long crossing:

- 12 seconds to cross for typical adult
- 20 seconds for seniors and children

No raised medians to shelter crossing pedestrians

# Pedestrian Traffic

## Empire Blvd and Troy Ave

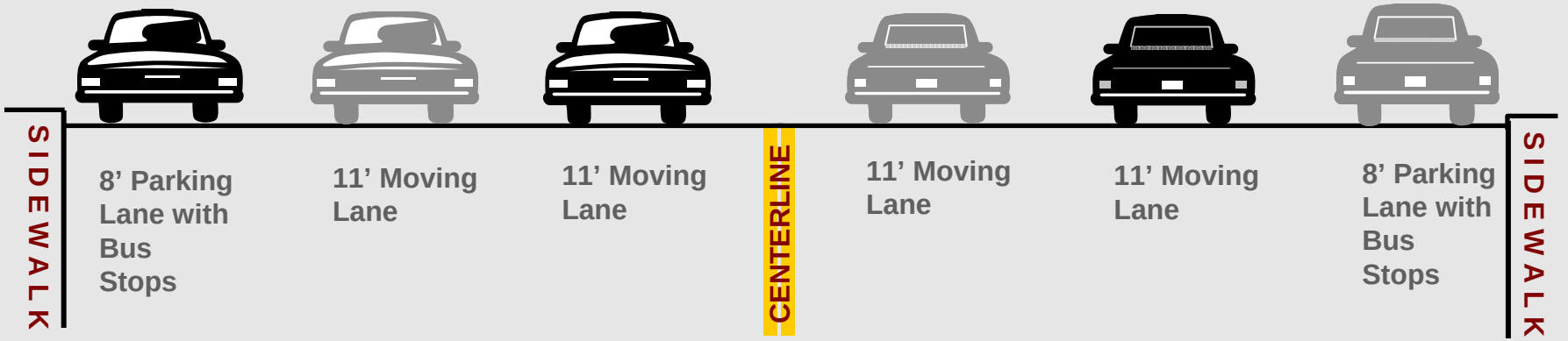
- Pedestrian traffic peaks in the morning and during school dismissal times
- Crashes were distributed evenly throughout the day and night
- Crashes result from unsafe street environment, rather than high pedestrian volumes

| | |
|---|---|
| 7:45am – 8:45am | 350 street crossings |
| 2:45pm – 3:45pm | 525 street crossings |

# Proposed solution

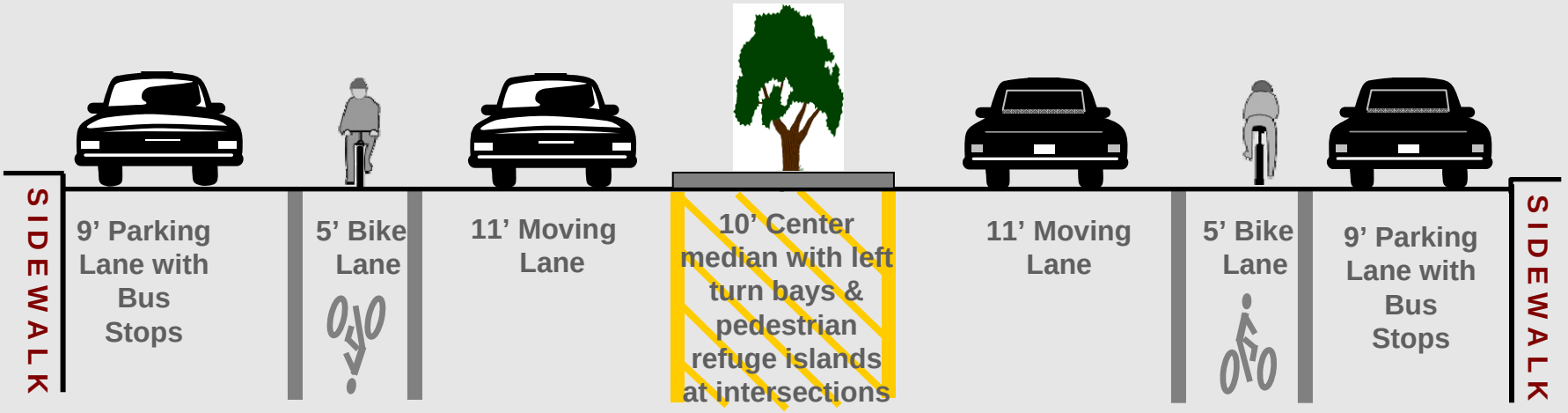
- **Road Diet**
  - Empire Blvd reconfigured to one moving lane in each direction
  - Bike lane installed in each direction
  - Narrowed road reduces speeding
  - Vehicles turning onto Empire Blvd. are slowed by reduced roadway width
  - Left turn bays reduce delays for through movements
  - Four raised and protected pedestrian islands to facilitate safe crossings
  - Trees and landscaping add to streetscape
  - All parking spaces are preserved

# Empire – Existing Conditions

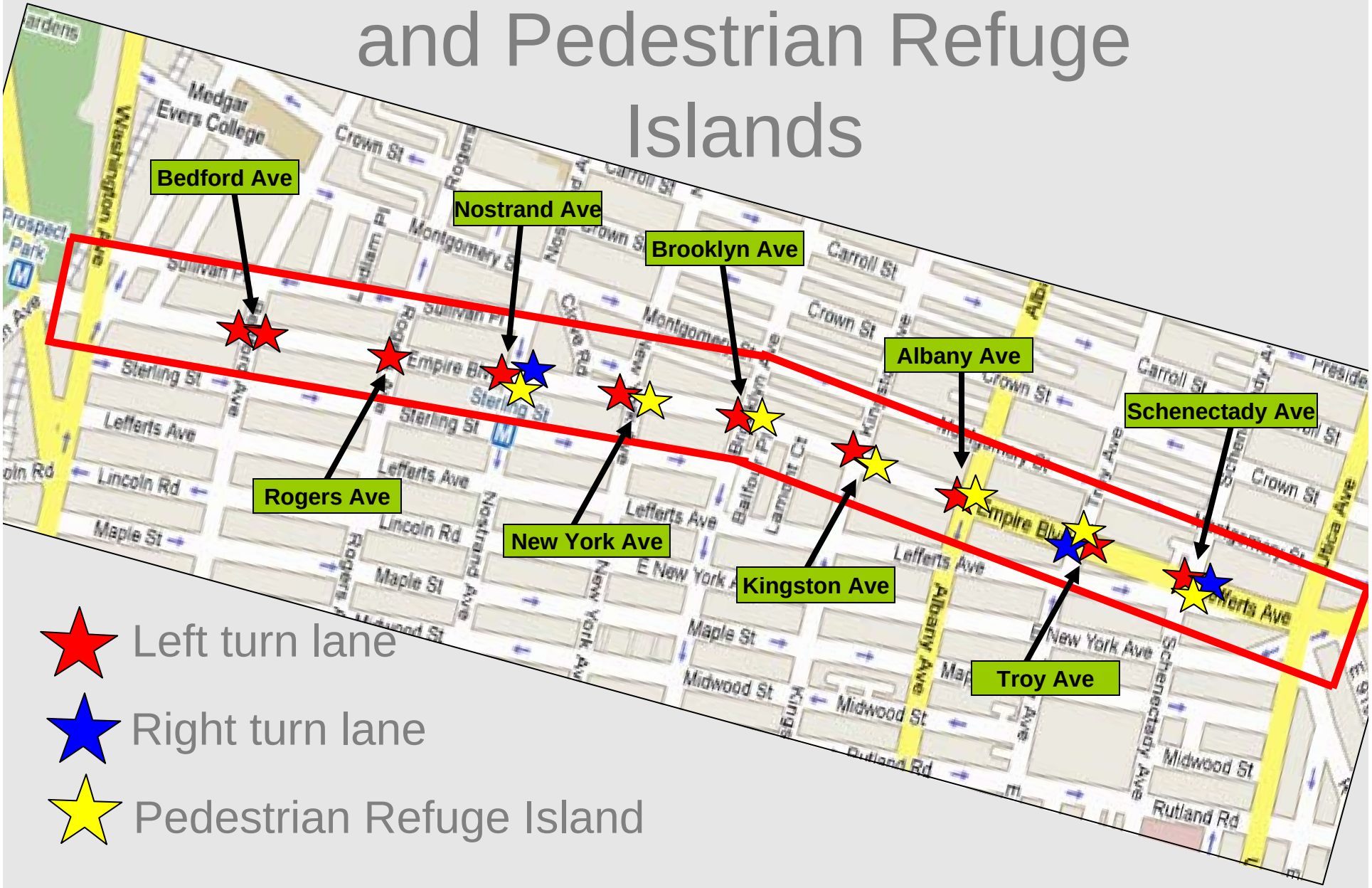


# Empire - Proposed Design


Broadway, Williamsburg



# Right & Left Turn Lanes and Pedestrian Refuge Islands



# Vanderbilt Avenue Traffic Calming Project (July 2008)

- Speeding
  - –21% decrease in average speeds
  - –64% decrease in number of speeders
- Crashes
  - –22% reduction in injuries since implementation


# Clarendon Road Traffic Calming Project – July 2008

- Speeding
  - 20% decrease in average speeds
  - 50% decrease in number of speeders
- Crashes
  - 25% decrease in pedestrian crashes


# Thank You!

## Questions and Comments

http://www.nyc.gov/html/dot/html/home/home.shtml

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