

# ROAD DIETS



**Before**



**After**

# “Classic Road Diet”



4 to 3 lanes



**On-street parking**

**Median**

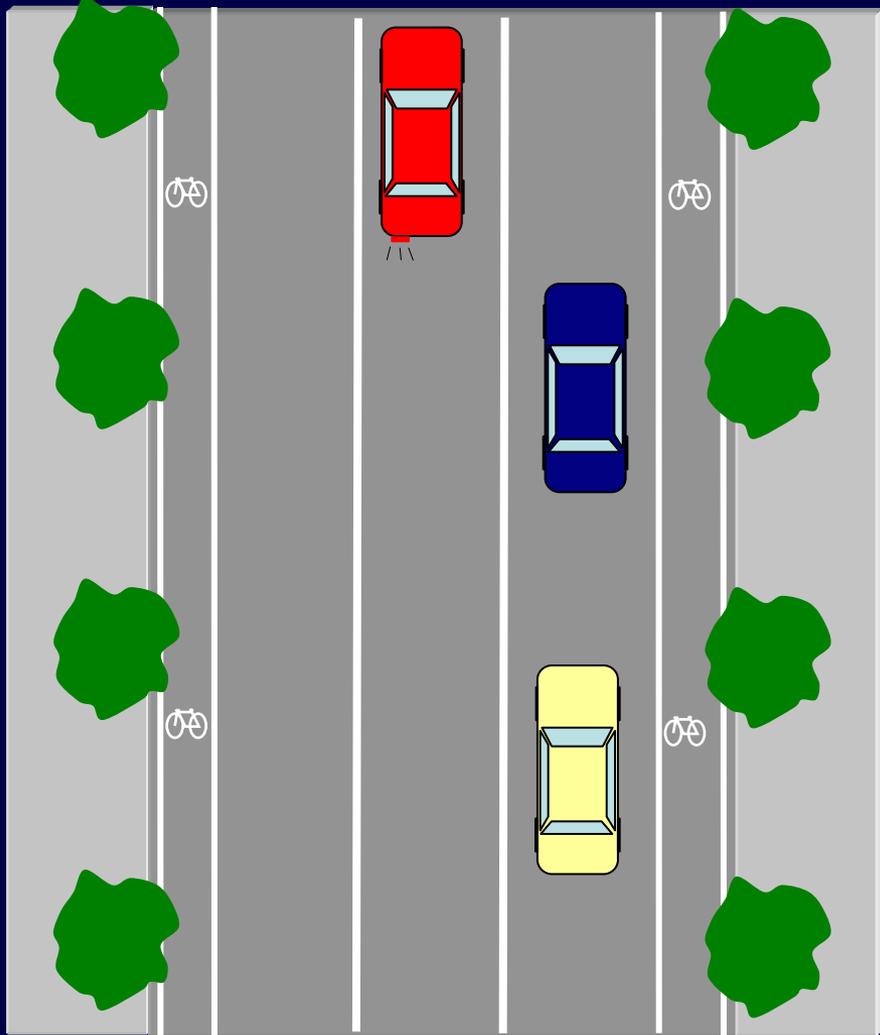
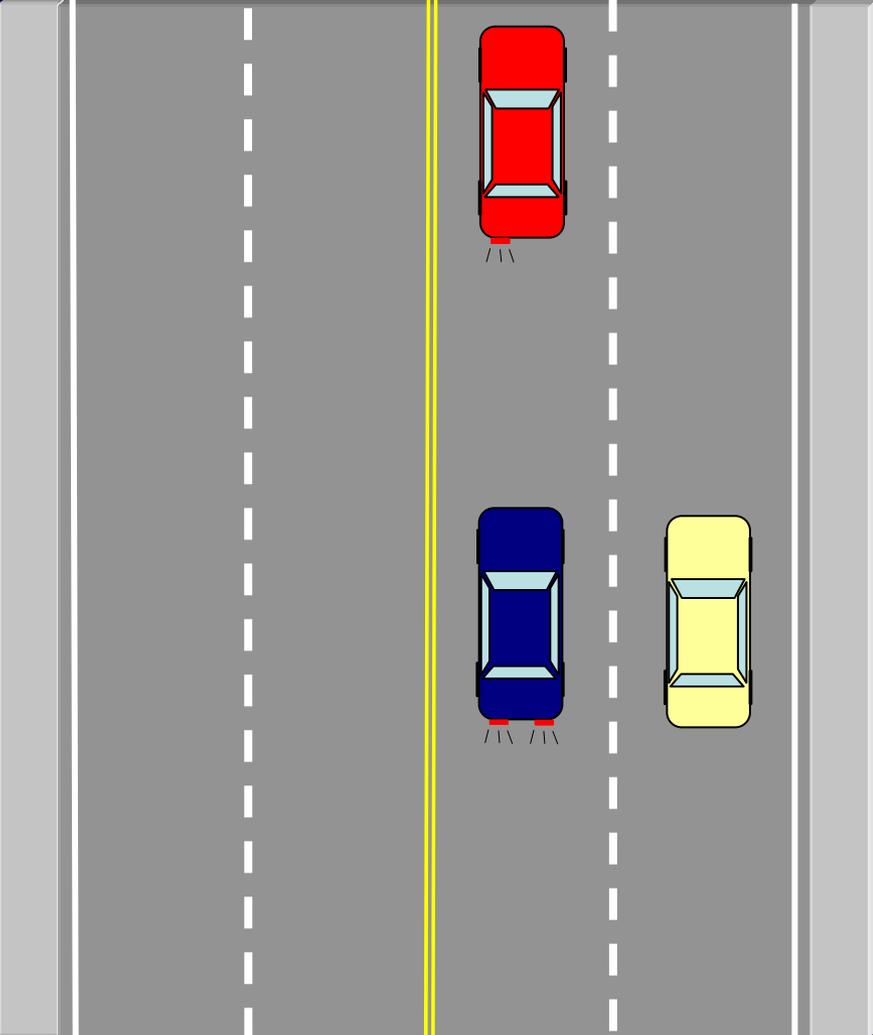
**Bike  
Lanes**

**Center Turn-Lane**

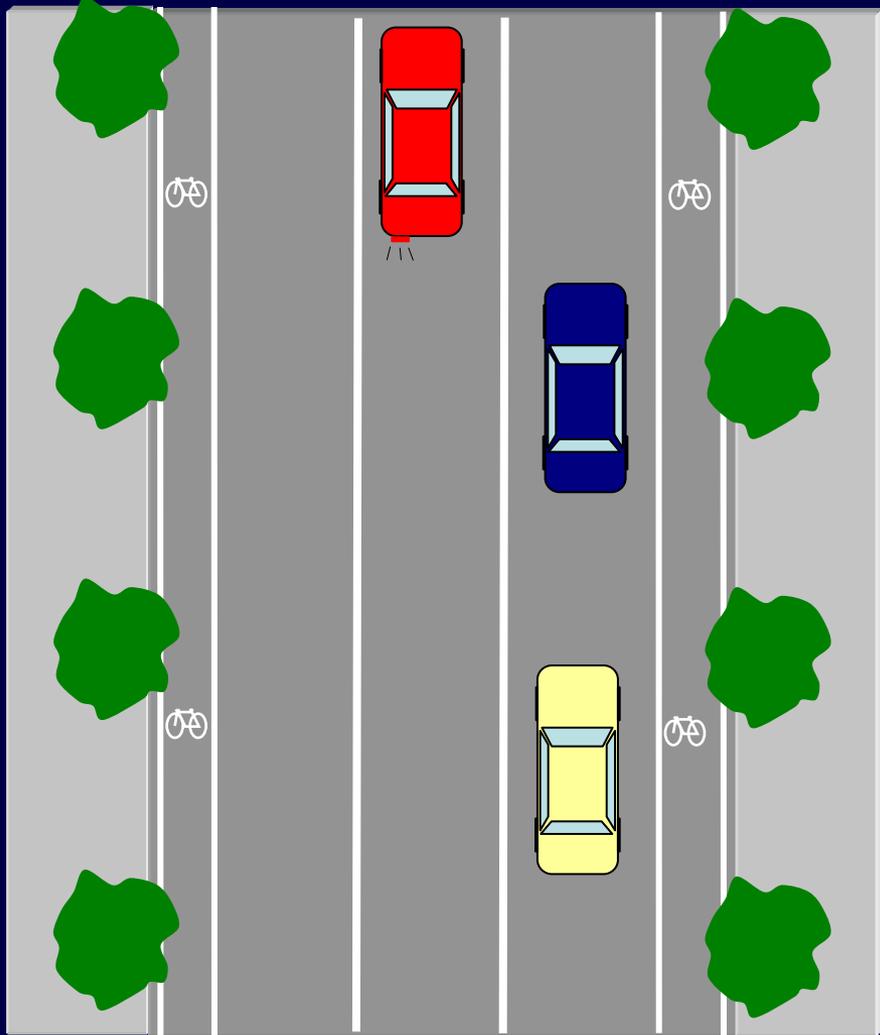
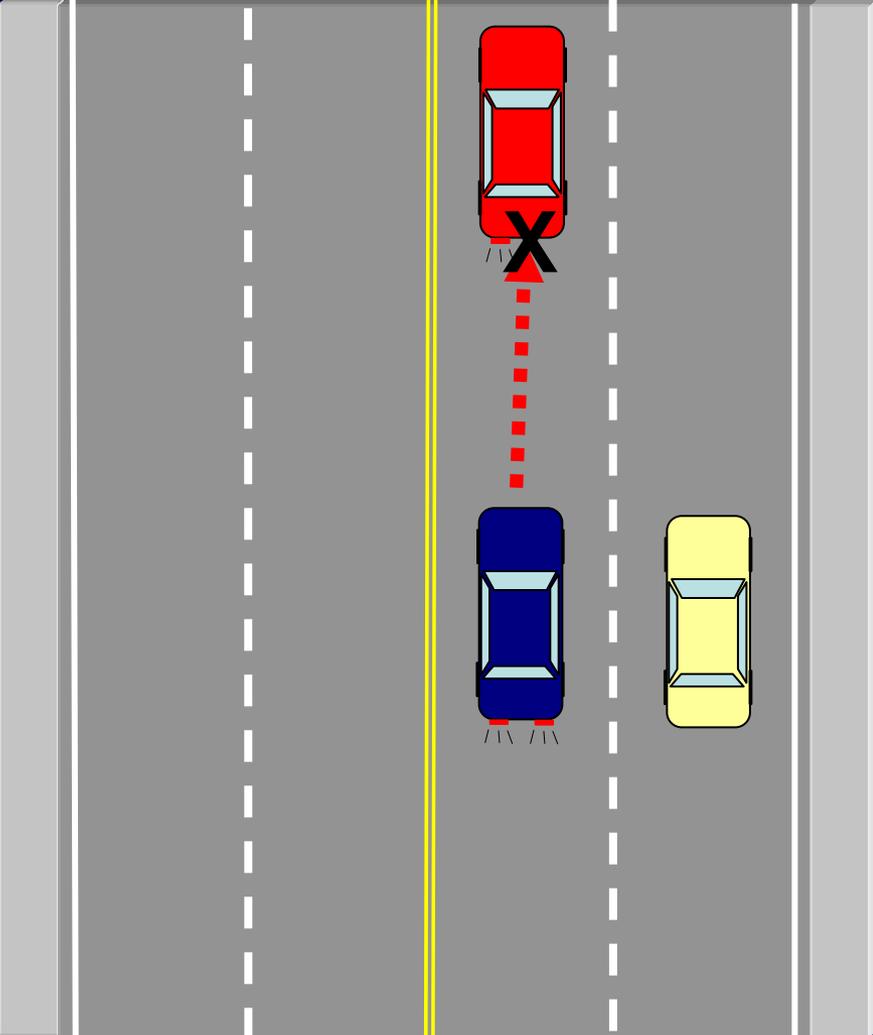
## **Road diets: reclaim street space for other uses**

# Road Diets and Traffic Operations

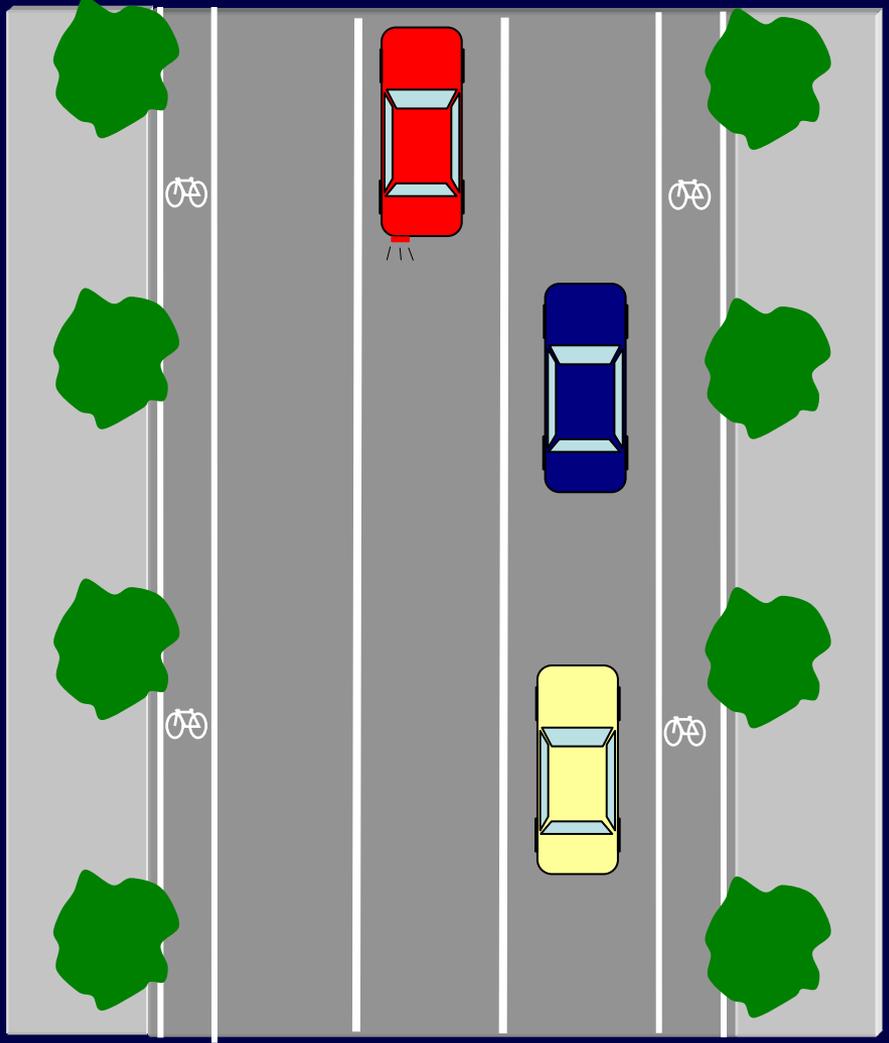
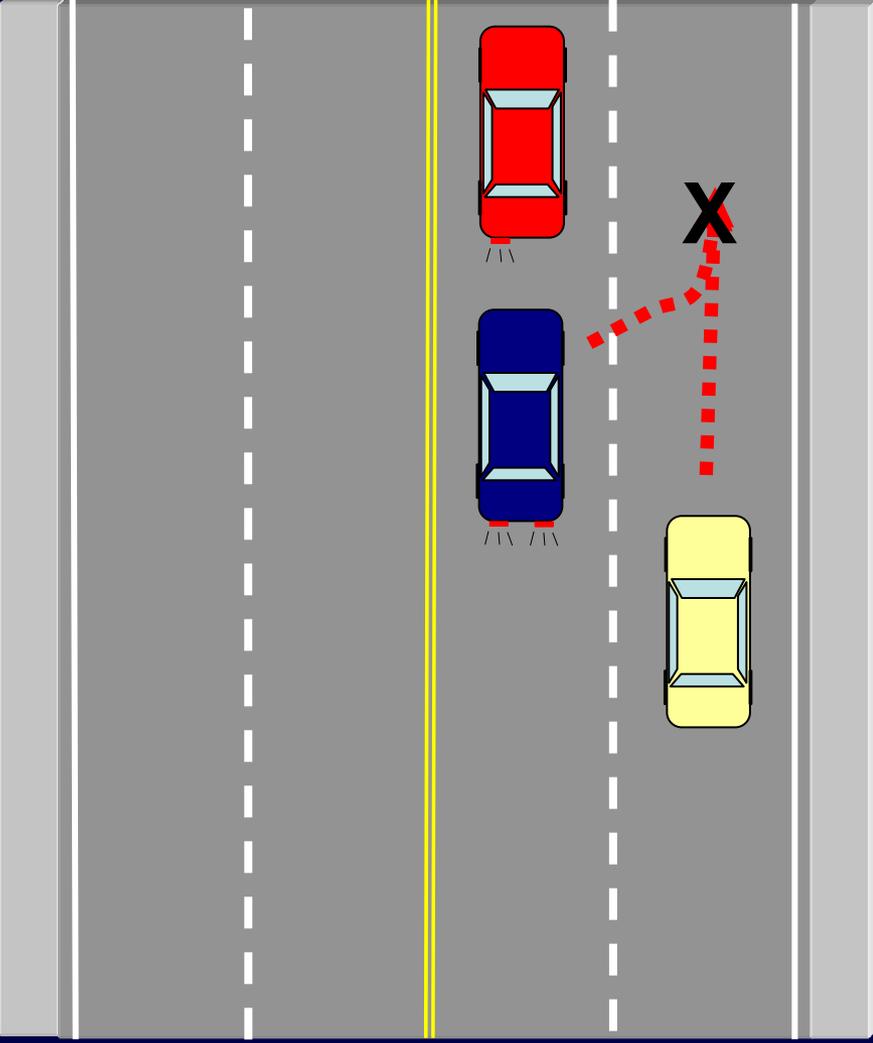
# 3 crash types can be reduced by going from 4 to 3 lanes: which ones?



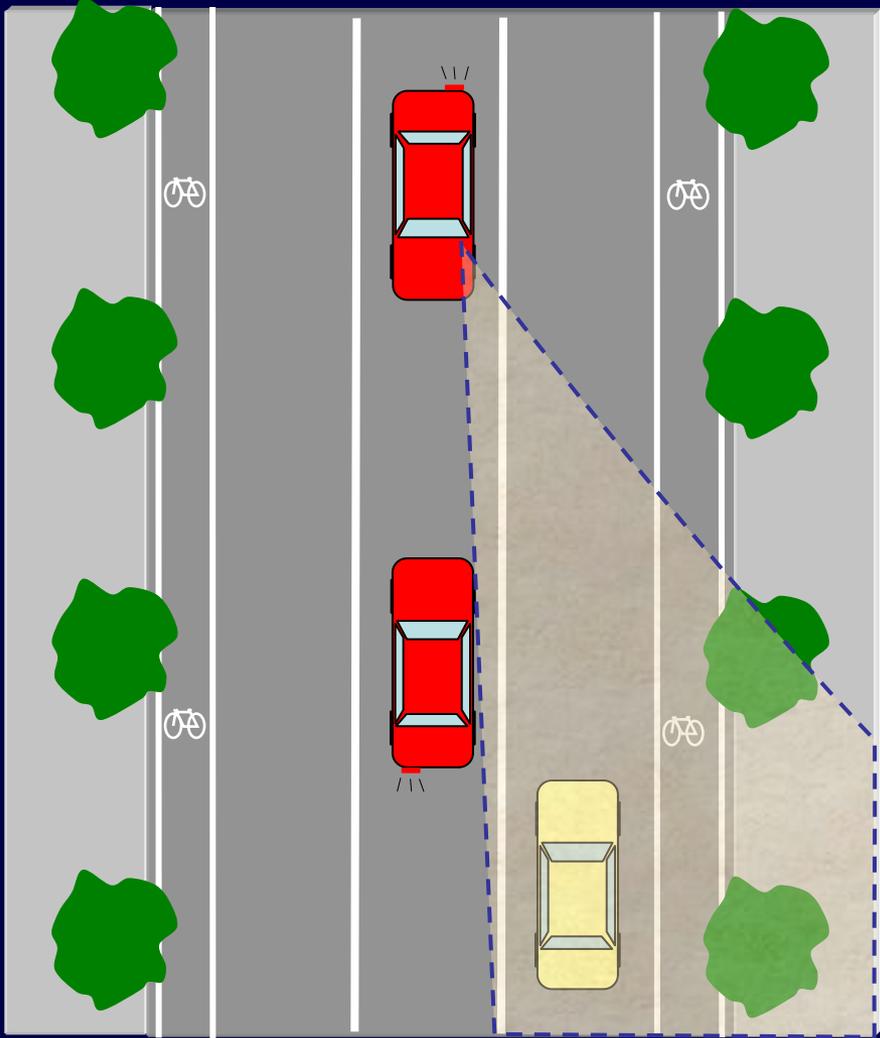
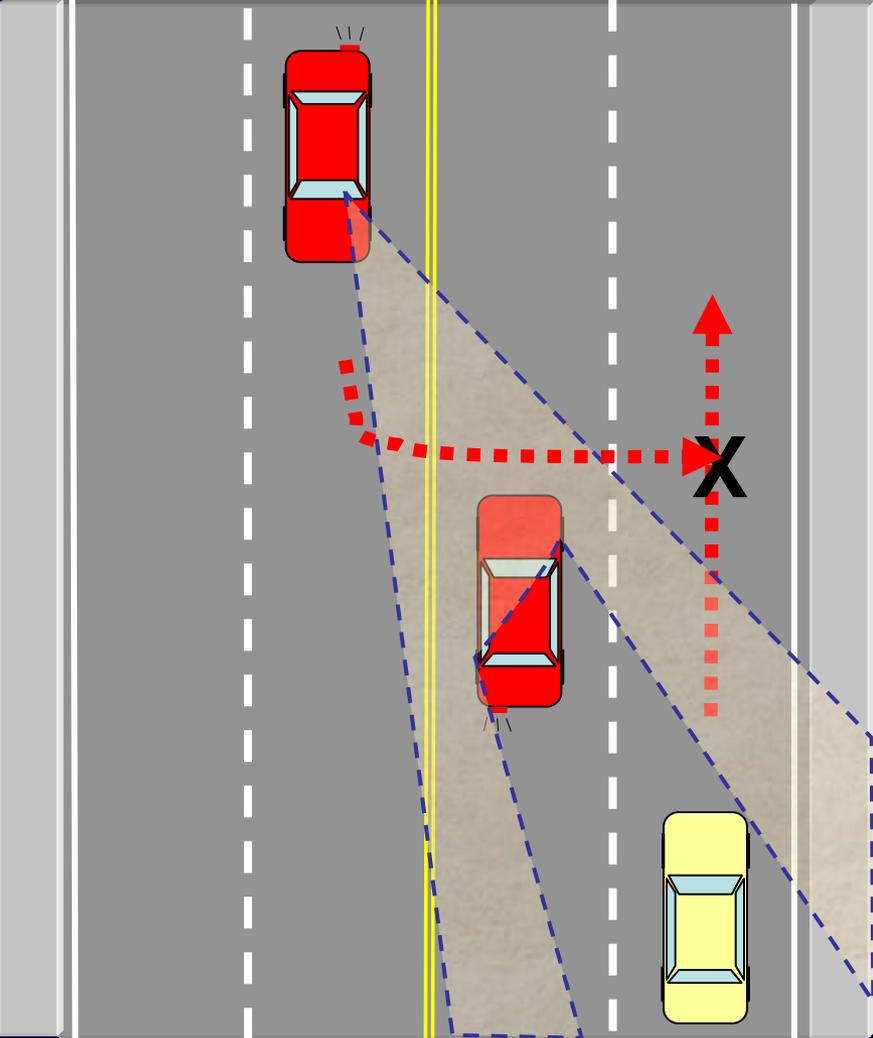
# 3 crash types can be reduced by going from 4 to 3 lanes: 1 – rear enders



# 3 crash types can be reduced by going from 4 to 3 lanes: 2 – side swipes



# 3 crash types can be reduced by going from 4 to 3 lanes: 3 – left turn/broadside



# Case study: Edgewater Drive Resurfacing Project (Orlando FL)

- \$589,000 project scheduled in FDOT 5-year work plan
- FDOT open to 3-lane option if City takes over jurisdiction
- Changes must be accepted by neighborhood and business associations; before/after studies



**Before**



**Concept**



## Reality: Before

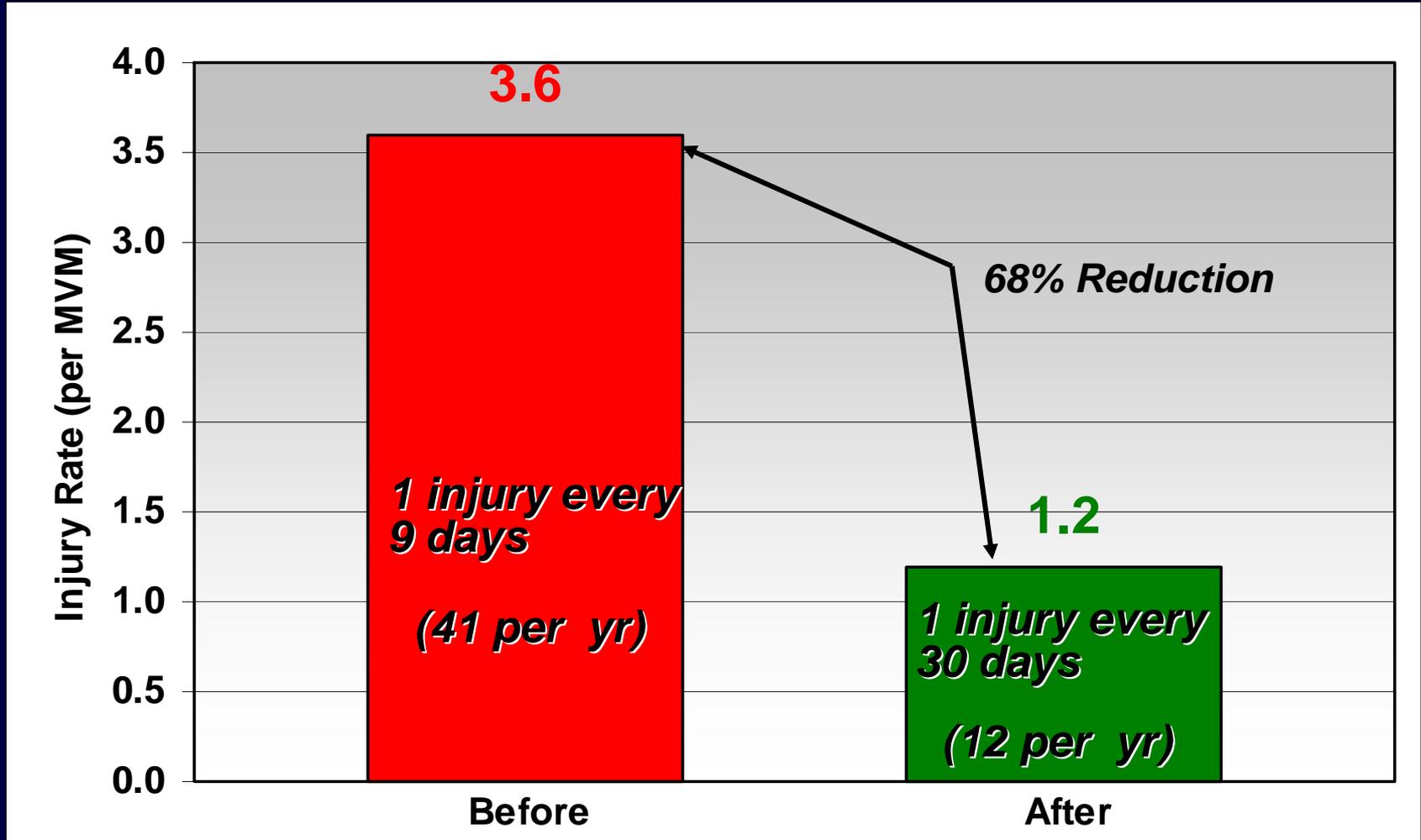


## Reality: After

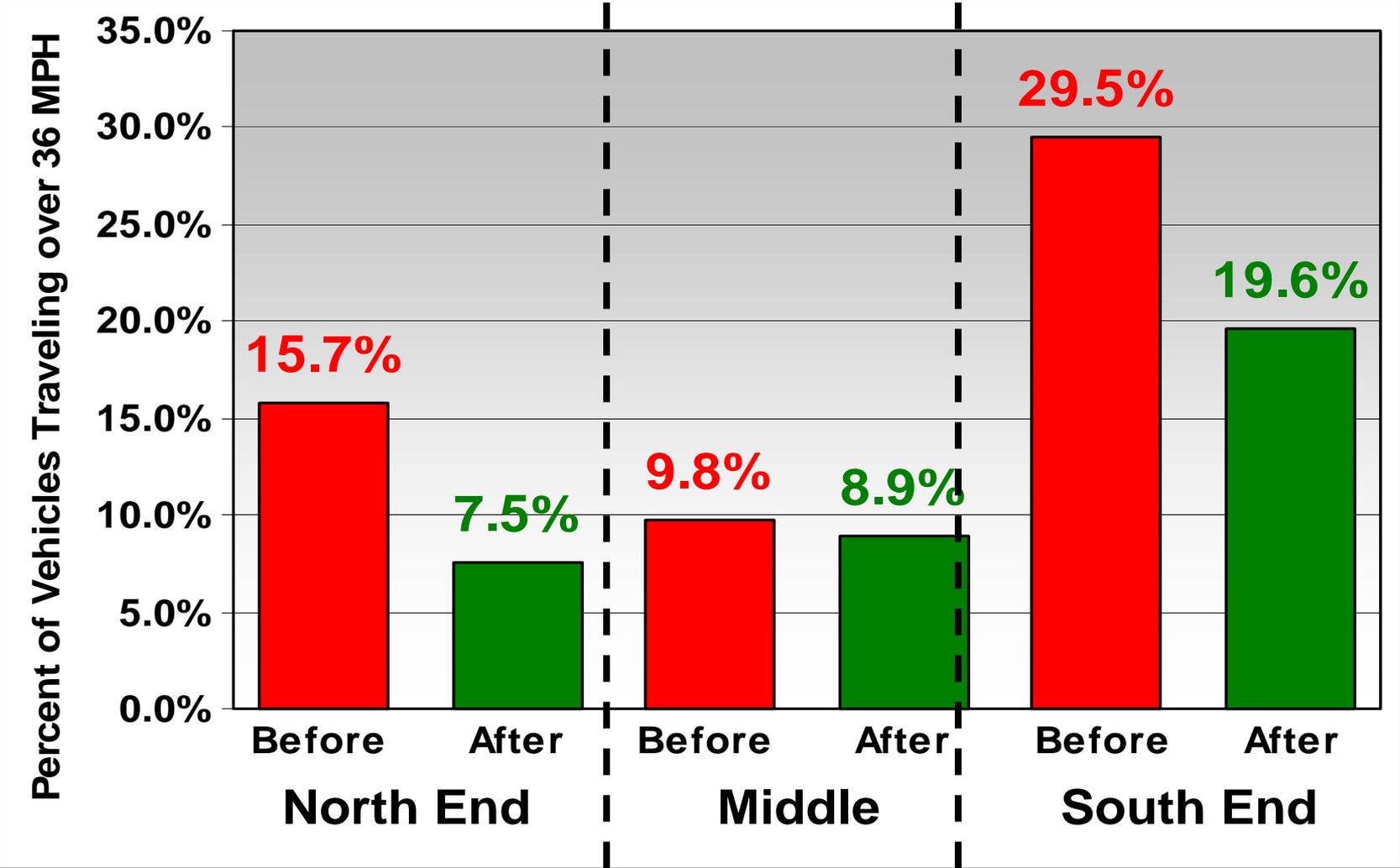
# Before/after studies: 1. Crash rate



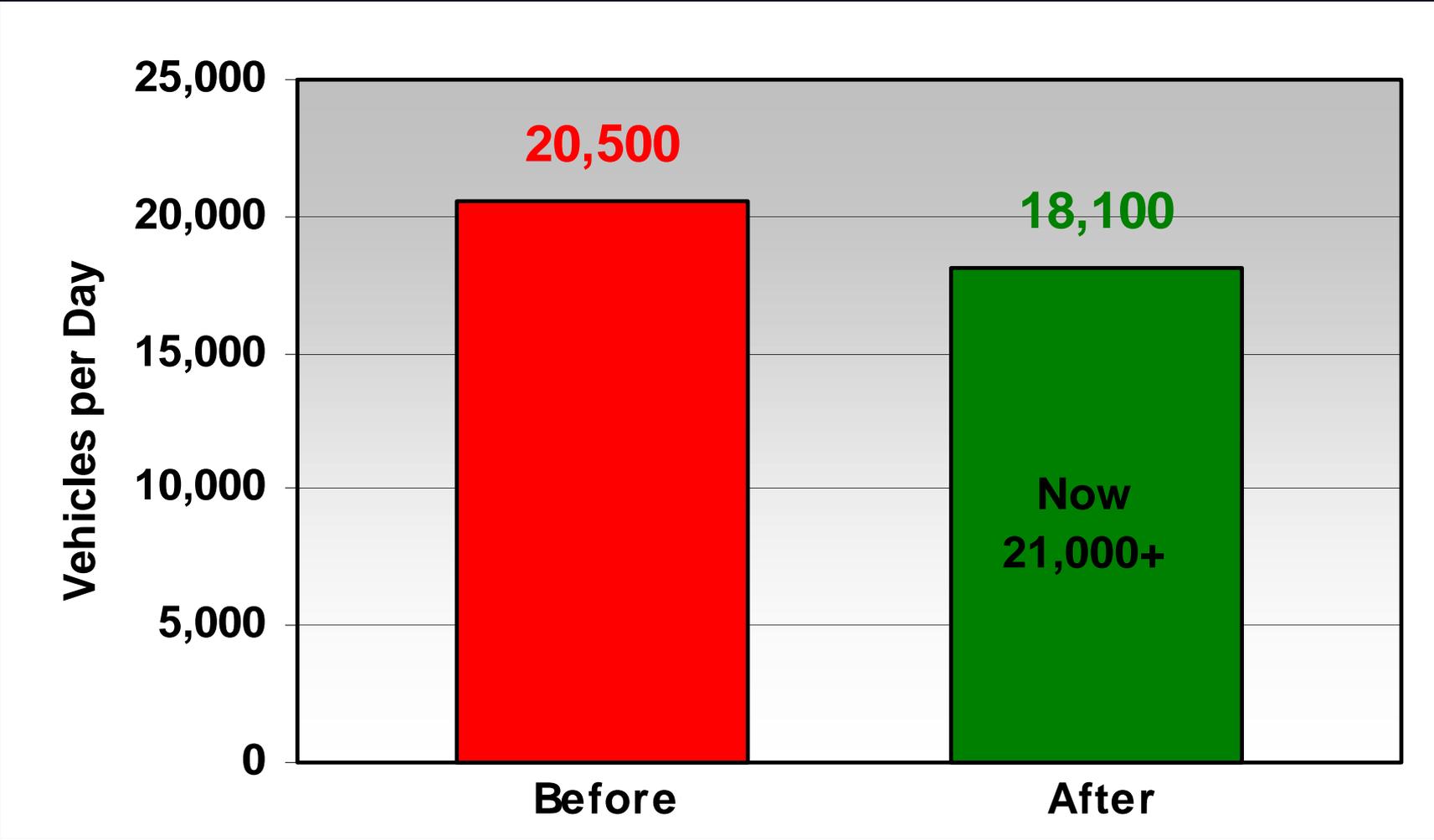
# Before/after studies: 2. Injury rate



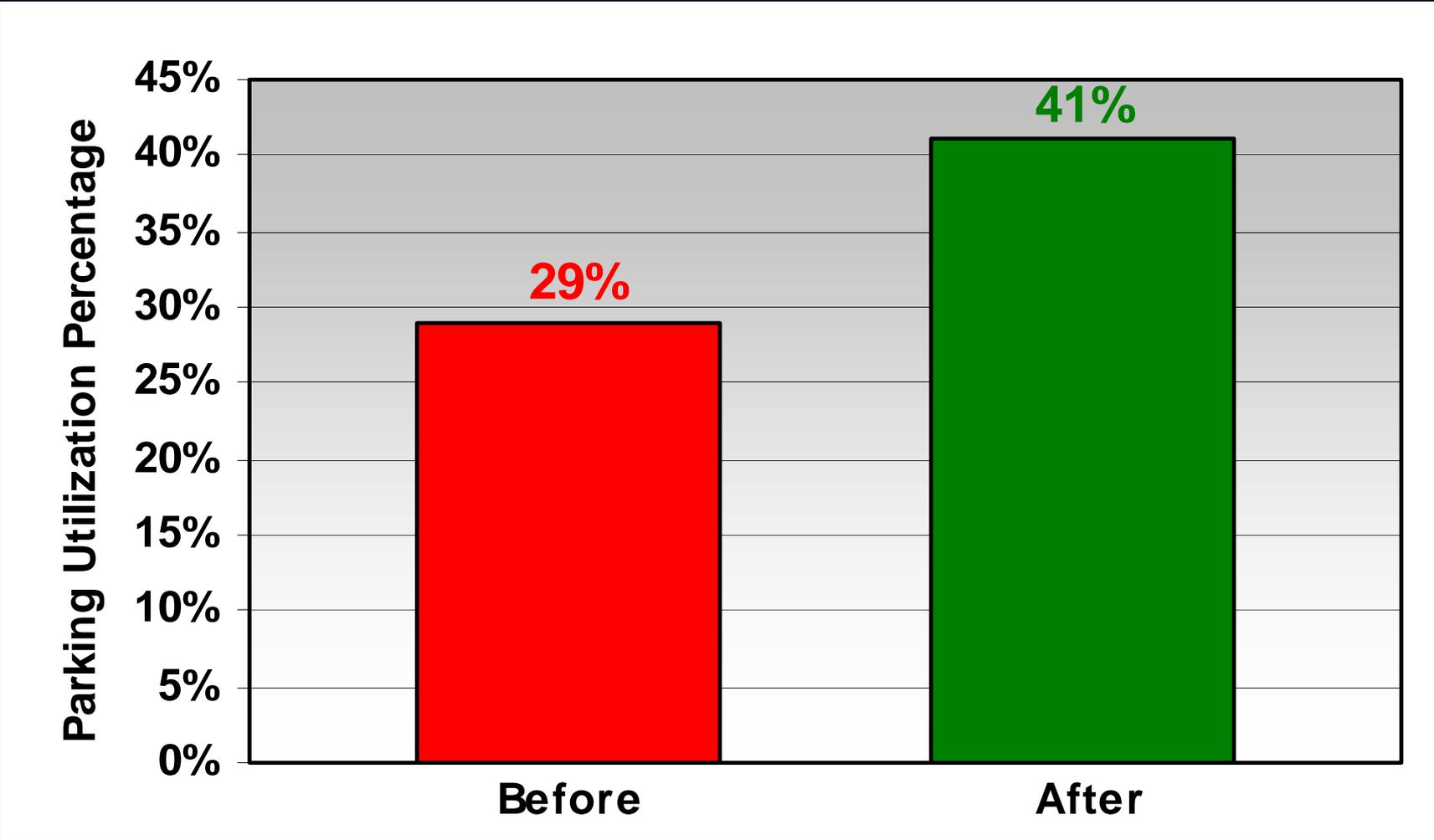
# Before/after studies: 3. Speeding analysis



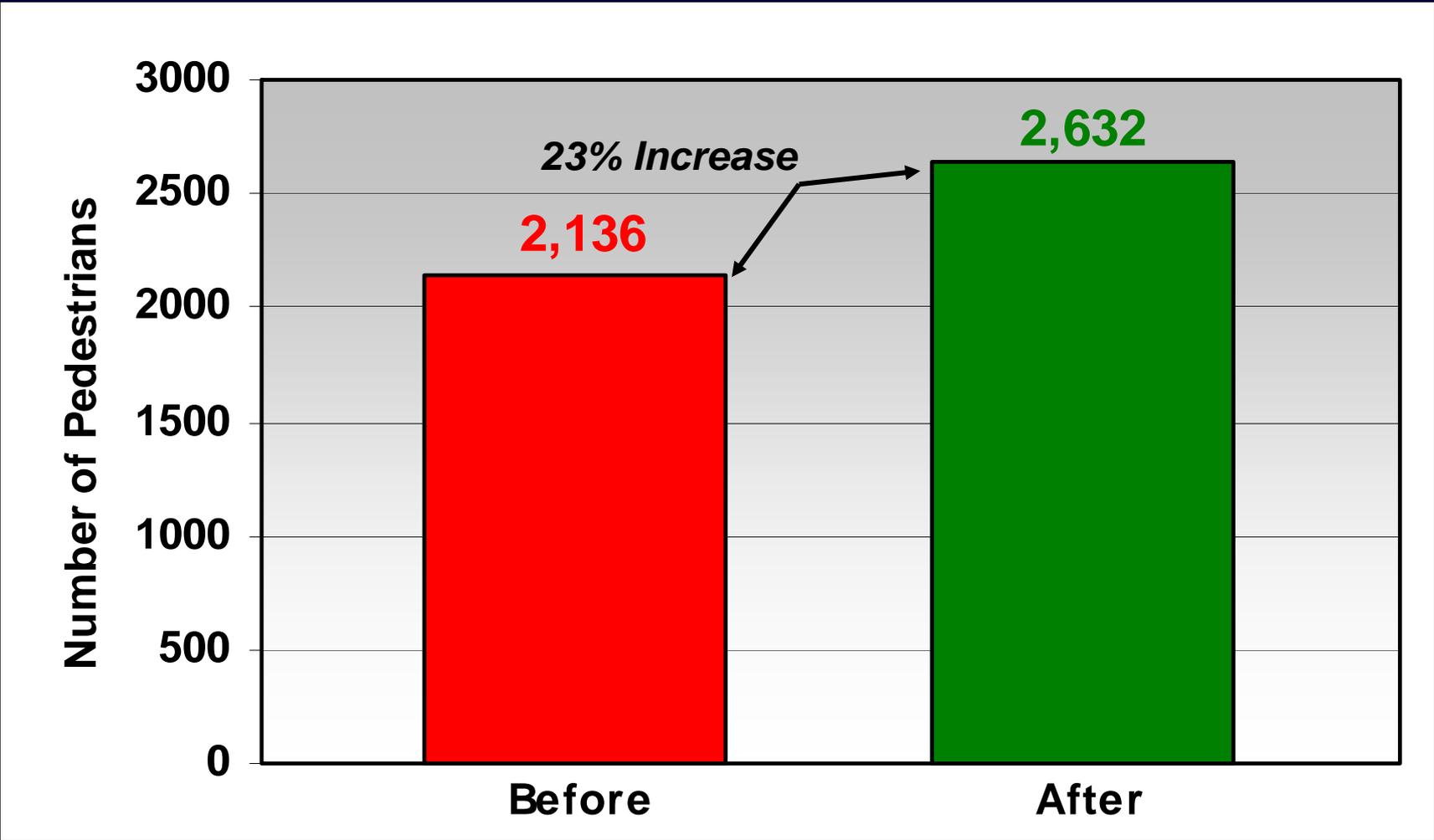
# Before/after studies: 4. Traffic volumes



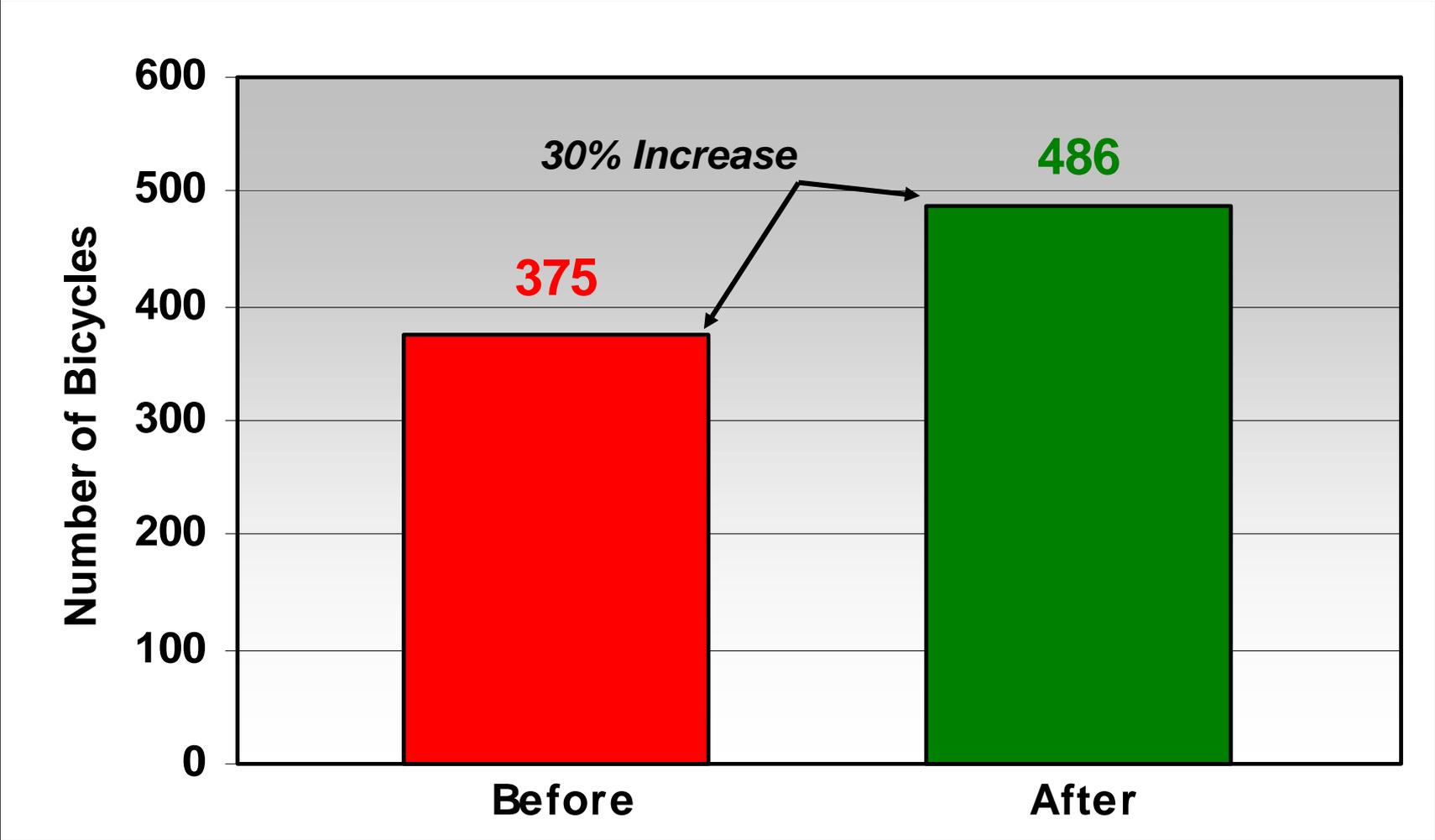
# Before/after studies: 5. On-street parking utilization



# Before/after studies: 6. Pedestrian volumes



# Before/after studies: 7. Bicyclist volumes





1. Which road carries more traffic?
2. Which road produces the higher speed?
  - With a 4-lane road a fast driver can pass others
  - With a 2-lane road the slower driver sets the speed
3. Which road produces the higher crash rate?
4. Which is better for bicyclists, pedestrians, businesses?

# Road Diet CRF: 29% overall



Iowa – 15 sites → 47% crash reduction  
CA, WA – 30 sites → 19% crash reduction



## What are some benefits of road diets for pedestrians?

- Reduce crossing distance
- Eliminate or reduce “multiple threat” crash types
- Install crossing island to cross in 2 simple steps
- Reduce top end travel speeds
- Buffer sidewalk from travel lanes (parking or bike lane)
- Reclaim street space for “higher and better use” than moving peak hour traffic

**Before**



**Reclaiming road space creates room for ped islands**

# Concept



**Reclaiming road space creates room for ped islands**

**After**

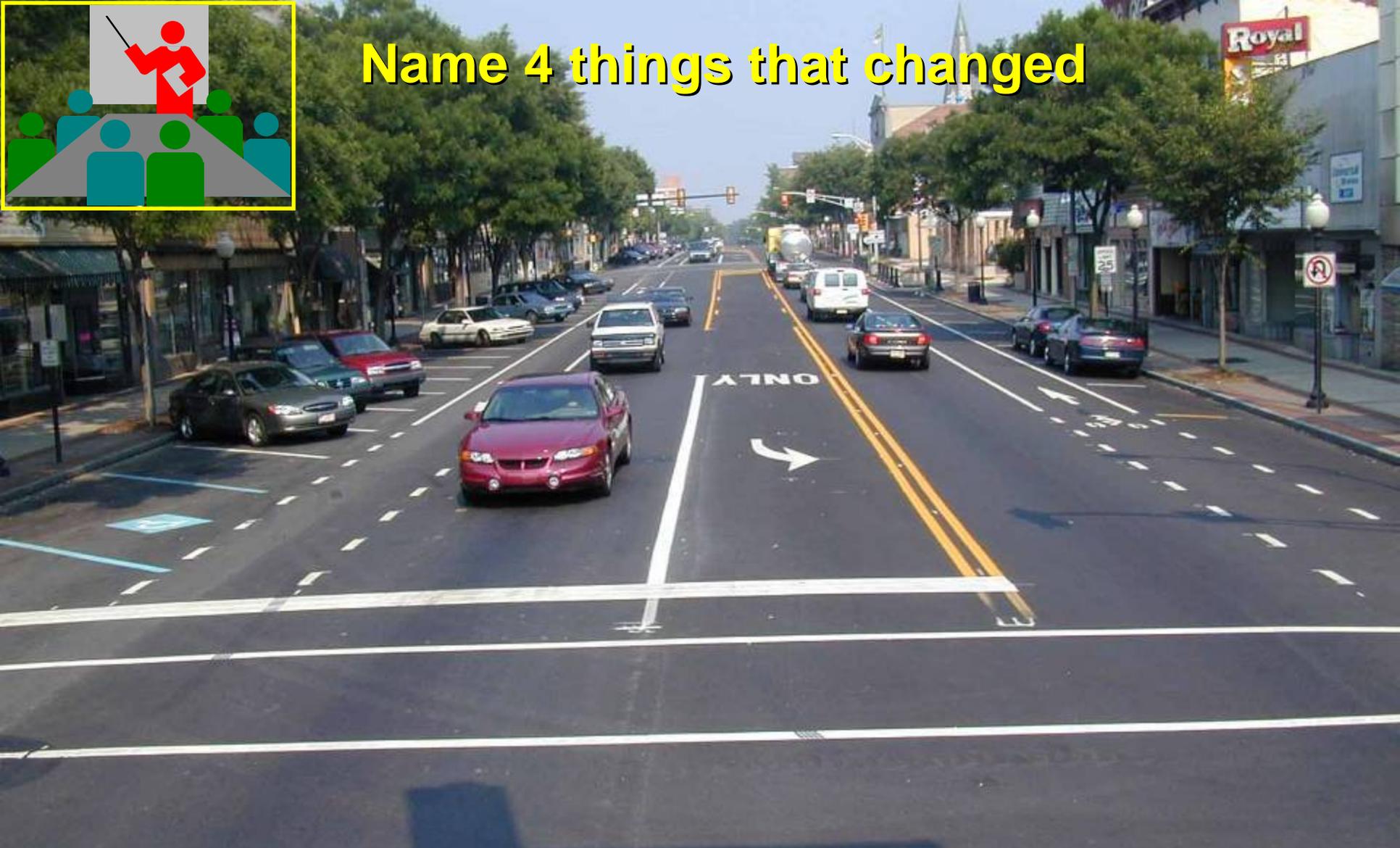


**Reclaiming road space creates room for ped islands**



**This 5-lane Main Street was converted to...**

# Name 4 things that changed



**Fewer travel lanes; added bike lanes; parallel to back-in diagonal parking on one side; new pavement**



**This area was recaptured from a 4<sup>th</sup> travel lane;  
the street took on a whole new life**

# Questions ?