



# Coulee Region Transportation Study

## Planning and Environment Linkages (PEL)

LAPC TAC  
September 9, 2015

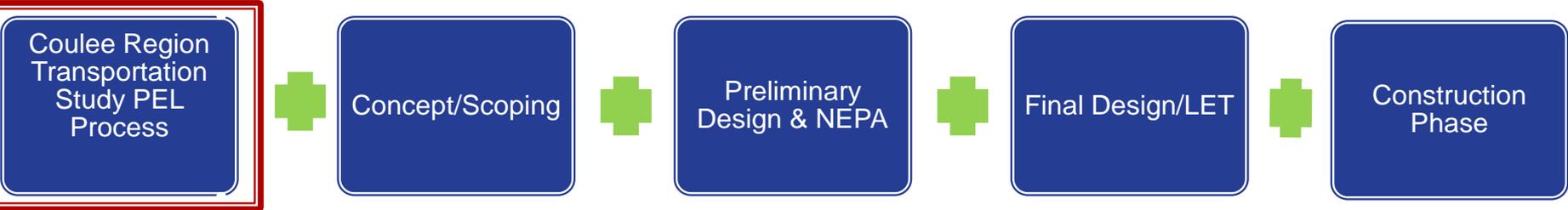




# Timeline

Planning and Environment Process  
**(We are Here)**

Project Development Process





# Public Comments

- ▶ Over 530 total comments
- ▶ Approximately 350 public comments
  - Input from:
    - CAG & TAG
    - PIM 2
    - LAPC
    - Meetings with local businesses
    - Comment forms/Online/Web
- ▶ Over 180 additional comments from Focus Groups
  - 102 transit comments
  - 81 bike & ped comments



# Goal

## ▶ Goal:

- Improve the long-term movement of people and goods, safely and efficiently, in a manner that accommodates economic development, incorporates community plans, and limits adverse environmental impacts and social effects, in ways that support the regions natural beauty and livability and contribute positively to the region's quality of life.



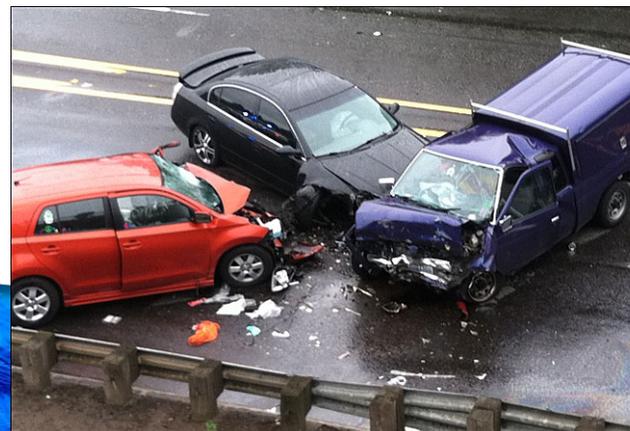
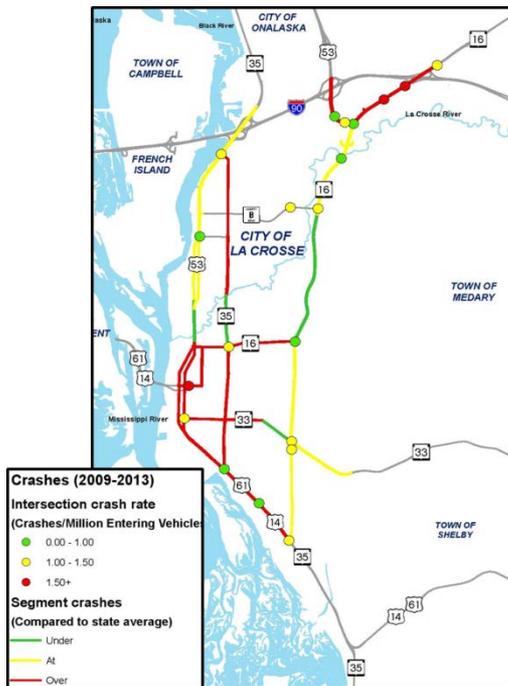
# Objectives

- ▶ 1 - Safety
- ▶ 2 - Infrastructure
- ▶ 3 – Congestion and Reliability
- ▶ 4 – Plan for Future Transportation
- ▶ 5 – Limit impacts



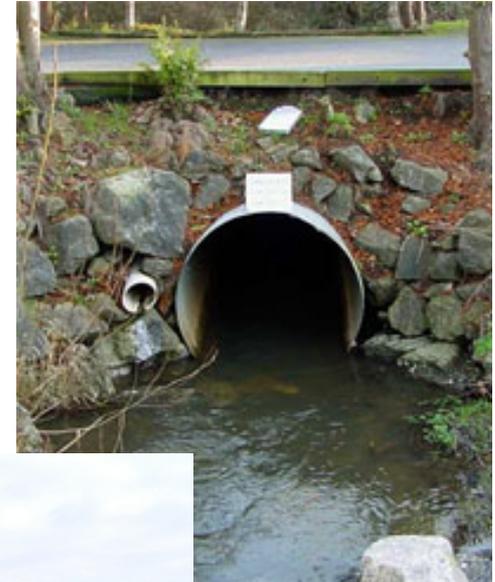
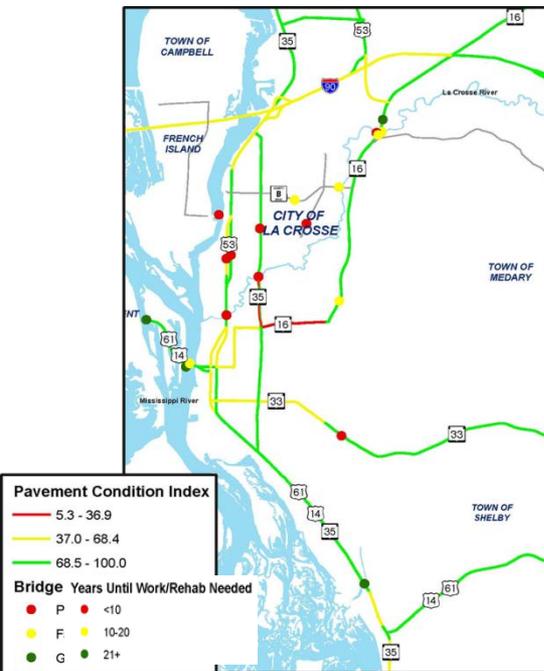
# Safety

- Reduce rate and severity of pedestrian, bicycle and vehicular crashes



# Infrastructure

- Address pavement, structural, geometric deficiencies and utilities

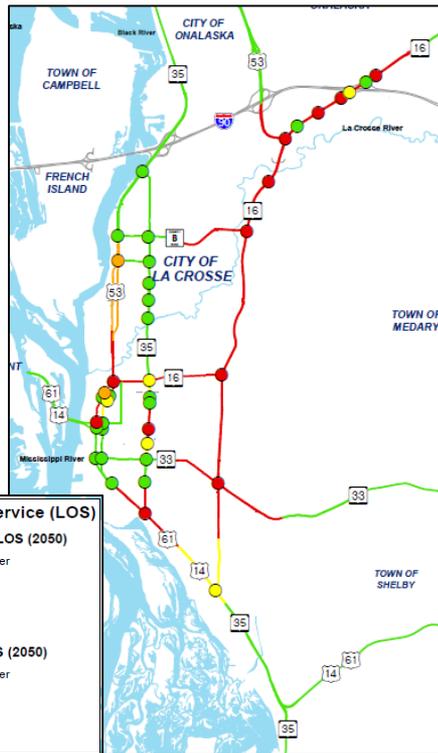


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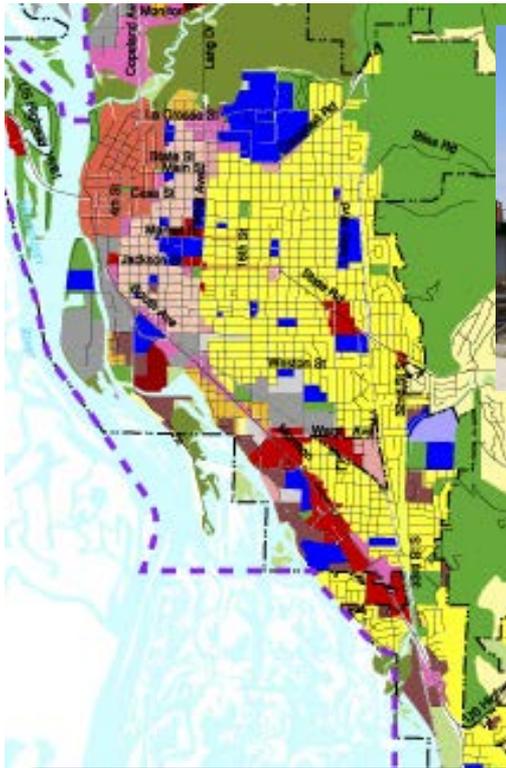
# Congestion and Reliability

- Provide comfortable, direct, reliable and convenient access for all modes of transportation.
- Promote/encourage the use of alternate modes of travel.
- Provide reliable travel times for both reoccurring and nonrecurring congestion.
- Reduce motor vehicle use during peak periods



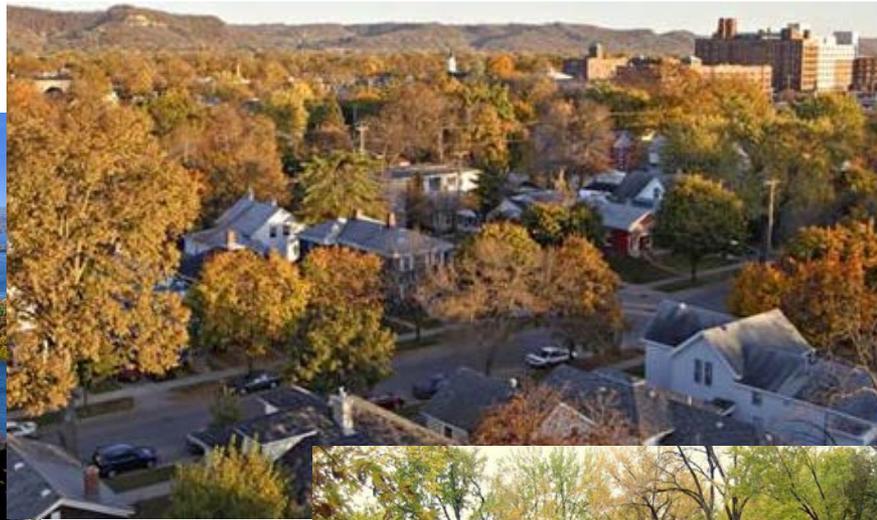
# Plan for Future Transportation

- Promote smart growth that considers all transportation modes along with changes to land use



# Limit Impacts

- Consider strategies that balance transportation needs with protection of the environment and community resources.



# Broad Strategies

- ▶ **TDM**
- ▶ Policy and Legislation
- ▶ Bike and Pedestrian
- ▶ Transit
- ▶ TSMO
- ▶ Roadways
  - Improve Existing Roads
  - Selective Expansion
  - New Roads



# Travel Demand Management (TDM)

## *Public Comments Overview*

- ▶ 25 comments
- ▶ Repeated themes:
  - Increase amount of park and rides (Onalaska)
  - Encourage car pooling
  - Flex work hours
  - Employee & employer incentives
  - Carpool/vanpool
  - Park and ride facilities
  - Parking management
  - Rideshare



# Travel Demand Management (TDM)

## Objective Screening Process

Does Not Satisfy Objective
Partially Satisfies Objective
Satisfies Objective

Root Objective	Desired Outcome	Screening Considerations
<b>1. Safety</b>	Reduce rate and severity of pedestrian, bicycle and vehicular crashes.	Will not address safety concerns related to existing roadway/design deficiencies.
<b>2. Infrastructure</b>	Address pavement, structural, geometric deficiencies and utilities	Will not address future infrastructure needs.
<b>3. Improve Congestion and Travel Reliability</b>  Multimodal (Pedestrian/Bicycle/Transit)  Motor Vehicles	Provide Comfortable, direct, reliable and convenient access for all modes of transportation Promote/encourage the use of alternate modes of travel  Provide reliable travel times for both reoccurring and nonrecurring congestion Reduce motor vehicle use during peak periods.	Will promote a variety of transportation modes and reduce congestion for motor vehicles, especially during peak hours. However, this strategy will not fully meet the objective as a stand alone strategy.
<b>4. Plan for future transportation needs</b>	Promote smart growth that considers all transportation modes along with changes to land use.	Will promote a variety of transportation modes in areas of heavy traffic as an alternative to single occupant vehicle use in the future.
<b>5. Limit impacts to community's resources</b>	Consider strategies that balance transportation needs with protection of the environmental and communities resources	Will require little or no land acquisition, resulting in few physical impacts, and has the potential to reduce impacts to the environment by promoting alternative modes of transportation.



# Broad Strategies

- ▶ TDM
- ▶ **Policy and Legislation**
- ▶ Bike and Pedestrian
- ▶ Transit
- ▶ TSMO
- ▶ Roadways
  - Improve Existing Roads
  - Selective Expansion
  - New Roads



# Policy & Legislation

## *Public Comments Overview*

- ▶ 25 comments
- ▶ Repeated themes:
  - Continue implementation of Complete Streets
  - Increase intergovernmental cooperation
  - Develop new user fee/tax
  - Implement pay for parking in select areas
  - Development review criteria
  - Overlay zoning
  - Design standards
  - Parking management



# Policy and Legislation

## *Objective Screening Process*

Does Not Satisfy Objective
Partially Satisfies Objective
Satisfies Objective

Root Objective	Desired Outcome	Screening Considerations
<b>1. Safety</b>	Reduce rate and severity of pedestrian, bicycle and vehicular crashes.	Will not address safety concerns related to existing roadway/design deficiencies.
<b>2. Infrastructure</b>	Address pavement, structural, geometric deficiencies and utilities	Will not address future infrastructure needs.
<b>3. Improve Congestion and Travel Reliability</b>		
Multimodal (Pedestrian/Bicycle/Transit)	Provide Comfortable, direct, reliable and convenient access for all modes of transportation Promote/encourage the use of alternate modes of travel	Will encourage the use of alternative transportation modes and reduce congestion for motor vehicles. However, this strategy will not fully meet the objective as a stand alone strategy.
Motor Vehicles	Provide reliable travel times for both reoccurring and nonrecurring congestion Reduce motor vehicle use during peak periods.	
<b>4. Plan for future transportation needs</b>	Promote smart growth that considers all transportation modes along with changes to land use.	Includes policies that support future transportation needs and smart growth.
<b>5. Limit impacts to community's resources</b>	Consider strategies that balance transportation needs with protection of the environmental and communities resources	Will require little or no direct land acquisition, resulting in few physical impacts. Has the potential to protect community resources and support healthy development.



# Broad Strategies

- ▶ TDM
- ▶ Policy and Legislation
- ▶ **Bike and Pedestrian**
- ▶ Transit
- ▶ TSMO
- ▶ Roadways
  - Improve Existing Roads
  - Selective Expansion
  - New Roads



# Bike and Pedestrian *Public Comments Overview*

- ▶ Total: 140 comments
  - 59 from public
  - 81 from focus group
- ▶ Repeated themes:
  - Increase amount of bike lanes and shared use paths throughout the Coulee Region
  - Improve crossings to increase safety
  - Improve existing routes
  - There were also several general comments not assigned to a location
  - Separate bike lanes
  - Safer crossings



# Bike and Pedestrian

## *Objective Screening Process*

Does Not Satisfy Objective
Partially Satisfies Objective
Satisfies Objective

Root Objective	Desired Outcome	Screening Considerations
<b>1. Safety</b>	Reduce rate and severity of pedestrian, bicycle and vehicular crashes.	Will not address motor vehicle safety concerns related to existing roadway/design deficiencies.
<b>2. Infrastructure</b>	Address pavement, structural, geometric deficiencies and utilities	Will address infrastructure needs for bicycle and pedestrian transportation. However, this strategy will not fully meet the objective as a stand alone strategy.
<b>3. Improve Congestion and Travel Reliability</b>	<p>Multimodal (Pedestrian/Bicycle/Transit)</p> <p>Provide Comfortable, direct, reliable and convenient access for all modes of transportation Promote/encourage the use of alternate modes of travel</p> <p>Motor Vehicles</p> <p>Provide reliable travel times for both reoccurring and nonrecurring congestion Reduce motor vehicle use during peak periods.</p>	Will Improve congestion and reliability by encouraging bicycle and pedestrian use. However, this strategy will not fully meet the objective as a stand alone strategy.
<b>4. Plan for future transportation needs</b>	Promote smart growth that considers all transportation modes along with changes to land use.	Supports future bicycle and pedestrian use.
<b>5. Limit impacts to community's resources</b>	Consider strategies that balance transportation needs with protection of the environmental and communities resources	Has limited environmental impacts and may reduce impacts related to the needs of other modes of transportation.



# Broad Strategies

- ▶ TDM
- ▶ Policy and Legislation
- ▶ Bike and Pedestrian
- ▶ **Transit**
- ▶ TSMO
- ▶ Roadways
  - Improve Existing Roads
  - Selective Expansion
  - New Roads



# Transit

## *Public Comments Overview*

- ▶ Total: 151 comments
  - 49 from public
  - 102 from focus group
- ▶ Repeated themes:
  - Increased service hours, frequency, and routes
  - Develop park and ride express bus service
  - Increase regional routes
  - Develop Bus Rapid Transit
  - Create a Regional Transit Authority



# Transit

## Objective Screening Process

Does Not Satisfy Objective
Partially Satisfies Objective
Satisfies Objective

Root Objective	Desired Outcome	Screening Considerations
<b>1. Safety</b>	Reduce rate and severity of pedestrian, bicycle and vehicular crashes.	Will not address safety concerns related to existing roadway/design deficiencies.
<b>2. Infrastructure</b>	Address pavement, structural, geometric deficiencies and utilities	Will address infrastructure needs for transit. However, this strategy will not fully meet the objective as a stand alone strategy.
<b>3. Improve Congestion and Travel Reliability</b>  Multimodal (Pedestrian/Bicycle/Transit)  Motor Vehicles	Provide Comfortable, direct, reliable and convenient access for all modes of transportation Promote/encourage the use of alternate modes of travel  Provide reliable travel times for both reoccurring and nonrecurring congestion Reduce motor vehicle use during peak periods.	Will Improve congestion and reliability by encouraging transit use. However, this strategy will not fully meet the objective as a stand alone strategy.
<b>4. Plan for future transportation needs</b>	Promote smart growth that considers all transportation modes along with changes to land use.	Supports future transit use.
<b>5. Limit impacts to community's resources</b>	Consider strategies that balance transportation needs with protection of the environmental and communities resources	Has limited environmental impacts and may reduce impacts related to the needs of other modes of transportation.



# Broad Strategies

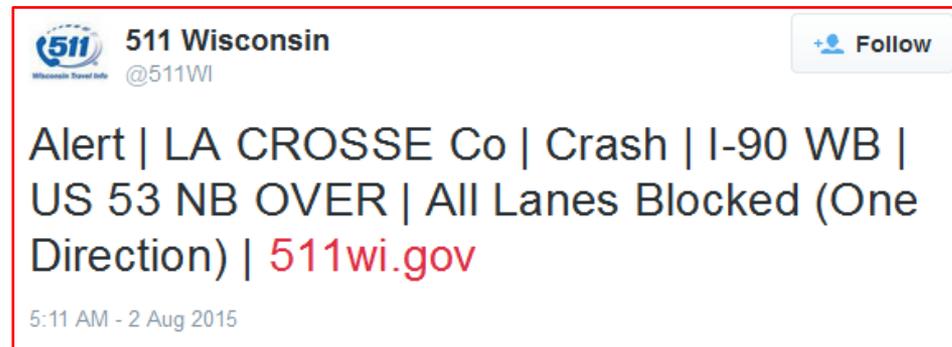
- ▶ TDM
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- ▶ **TSMO**
- ▶ Roadways
  - Improve Existing Roads
  - Selective Expansion
  - New Roads



# Transportation System Management, Operations (TSMO)

## *Public Comments Overview*

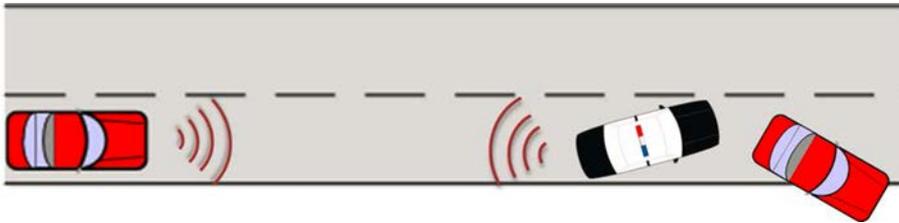
- ▶ 29 comments
- ▶ Repeated themes:
  - Improve signal timing on WIS 35, WIS 16, WIS 157, and US 53
  - Signal phasing changes – left turn arrows
  - Dynamic messaging signs
- ▶ Repeated focus on WIS 35 & 16 and US 53



# Transportation System Management, Operations(TSMO)

## Strategies

- ▶ Real-time traveler information
  - Dynamic message signs
  - Hybrid static-dynamic travel time signs
  - In-vehicle/mobile phone
  - Social media
- ▶ Connected vehicle technology
- ▶ Adaptive traffic signal control



# Transportation System Management, Operations(TSMO)

- ▶ Short Term Solutions
  - Workshop
  
- ▶ Mid Term Solutions
  - Traffic Signal upgrades(technology that exists)
  - Driver information
  
- ▶ Long Term
  - Technology that doesn't exist today (will address and incorporate in future)



# Transportation System Management, Operations (TSMO)

## Objective Screening Process

Does Not Satisfy Objective
Partially Satisfies Objective
Satisfies Objective

Root Objective	Desired Outcome	Screening Considerations
<b>1. Safety</b>	Reduce rate and severity of pedestrian, bicycle and vehicular crashes.	Will improve safety with better traffic controls. However, this strategy will not fully meet the objective as a stand alone strategy.
<b>2. Infrastructure</b>	Address pavement, structural, geometric deficiencies and utilities	Will reduce the need for some infrastructure needs by improving travel efficiency. However, this strategy will not fully meet the objective as a stand alone strategy.
<b>3. Improve Congestion and Travel Reliability</b>	<p>Multimodal (Pedestrian/Bicycle/Transit)</p> <p>Provide Comfortable, direct, reliable and convenient access for all modes of transportation Promote/encourage the use of alternate modes of travel</p> <p>Motor Vehicles</p> <p>Provide reliable travel times for both reoccurring and nonrecurring congestion Reduce motor vehicle use during peak periods.</p>	Will Improve congestion and reliability by improving efficiency, but will not be enough to improve LOS beyond failing levels in many locations as a stand alone strategy.
<b>4. Plan for future transportation needs</b>	Promote smart growth that considers all transportation modes along with changes to land use.	Will consider the future needs of all transportation modes.
<b>5. Limit impacts to community's resources</b>	Consider strategies that balance transportation needs with protection of the environmental and communities resources	Will improve efficiency with limited to no environmental impacts.

# Broad Strategies

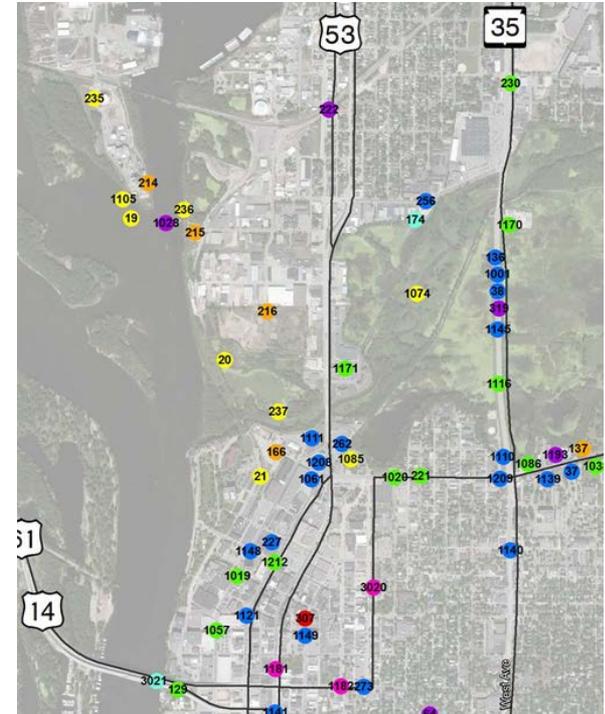
- ▶ TDM
- ▶ Policy and Legislation
- ▶ Bike and Pedestrian
- ▶ Transit
- ▶ TSMO
- ▶ **Roadways**
  - **Improve Existing Roads**
  - Selective Expansion
  - New Roads



# Improve Existing Roads

## *Public Comments Overview*

- ▶ Improve Existing Roads
  - 111 comments
  - Repeated themes:
    - Improve intersection/construct roundabout at La Crosse St (WIS 16) and Losey Blvd
    - Construct grade-separated or roundabout intersection at WIS 16 & County Road B East and County Road B West
    - Replace pavement on Lang Drive (WIS 35)
    - Replace pavement on La Crosse St (WIS 16)

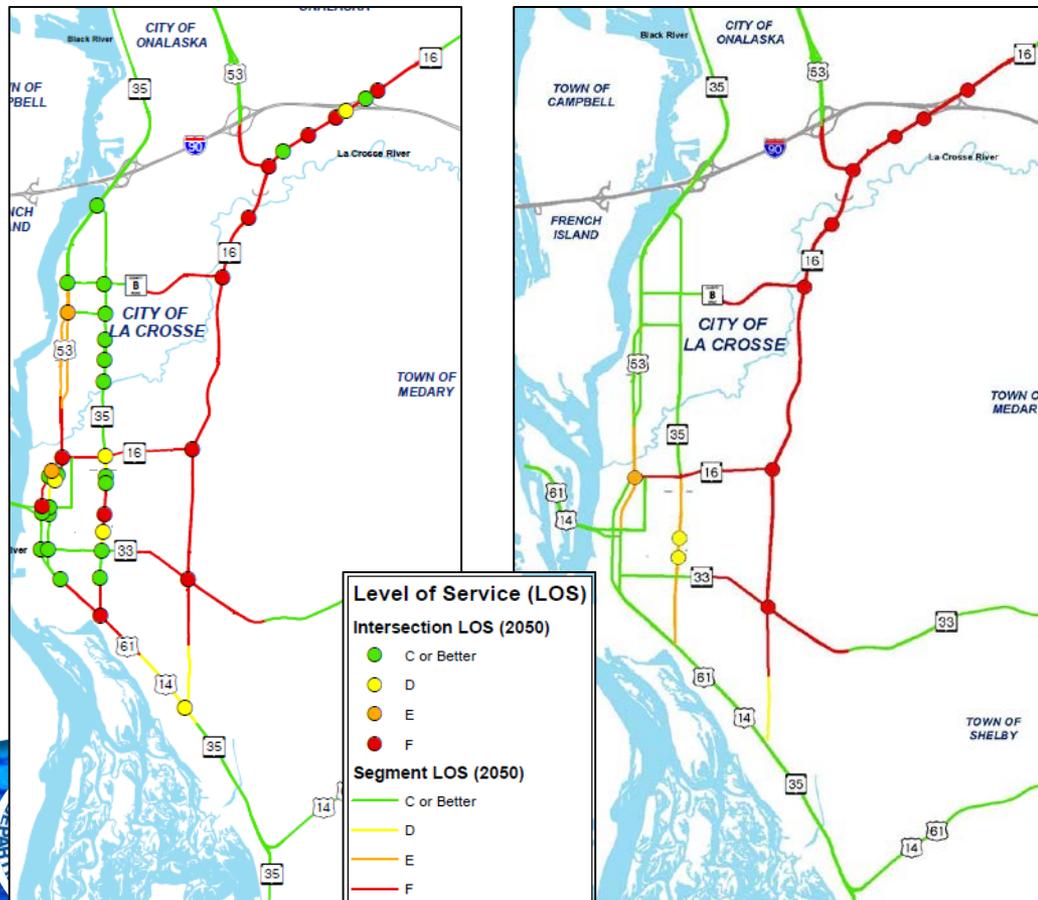


# Improve Existing Roads

## *Modeling at grade Intersection Improvements*

2050 LOS No build

2050 LOS Improved  
Intersections



Intersections that can be improved:

- ▶ US 53 & Clinton Street
- ▶ 3rd Street & State Street
- ▶ 3rd Street & Cass Street
- ▶ US 14/61 & WIS 35 (South Ave & West Ave)



# Intersection Improvements

## *Objective Screening Process*

Does Not Satisfy Objective
Partially Satisfies Objective
Satisfies Objective

Root Objective	Desired Outcome	Screening Considerations
<b>1. Safety</b>	Reduce rate and severity of pedestrian, bicycle and vehicular crashes.	Will improve safety related to intersection deficiencies. However, this strategy will not fully meet the objective as a stand alone strategy.
<b>2. Infrastructure</b>	Address pavement, structural, geometric deficiencies and utilities	Will address infrastructure needs for intersections that will need future improvements. However, this strategy will not fully meet the objective as a stand alone strategy.
<b>3. Improve Congestion and Travel Reliability</b>	<p>Multimodal (Pedestrian/Bicycle/Transit)</p> <p>Provide Comfortable, direct, reliable and convenient access for all modes of transportation Promote/encourage the use of alternate modes of travel</p> <p>Motor Vehicles</p> <p>Provide reliable travel times for both reoccurring and nonrecurring congestion Reduce motor vehicle use during peak periods.</p>	Will have the potential to significantly improve congestion and reliability in cases where intersections are causing such issues. However, this strategy will not fully meet the objective as a stand alone strategy.
<b>4. Plan for future transportation needs</b>	Promote smart growth that considers all transportation modes along with changes to land use.	Will meet future transportation needs for some modes of transportation in certain locations. However, this strategy will not fully meet the objective as a stand alone strategy.
<b>5. Limit impacts to community's resources</b>	Consider strategies that balance transportation needs with protection of the environmental and communities resources	Will have some direct impacts to property. Impacts will be minor compared to corridor improvements. However, this strategy will not fully meet the objective as a stand alone strategy.



# Broad Strategies

- ▶ TDM
- ▶ Policy and Legislation
- ▶ Bike and Pedestrian
- ▶ Transit
- ▶ TSMO
- ▶ **Roadways**
  - Improve Existing Roads
  - **Selective Expansion**
  - New Roads



# Selective Expansion of Existing Roads

## *Public Comments Overview*

- ▶ Selective Expansion of Existing Roads
  - 23 comments
  - Repeated themes:
    - Expand WIS 16
    - Add and/or lengthen turn lanes
    - Most comments centered on WIS 16 & WIS 157 intersection and WIS 16 corridor



# Selective Expansion of Existing Roads

## Strategy G

One-way pair conversion

- Option 1 (US 53)
  - 4<sup>th</sup> Street 4 Lanes
- Option 2 (US 53)
  - 3<sup>rd</sup> Street 4 Lanes

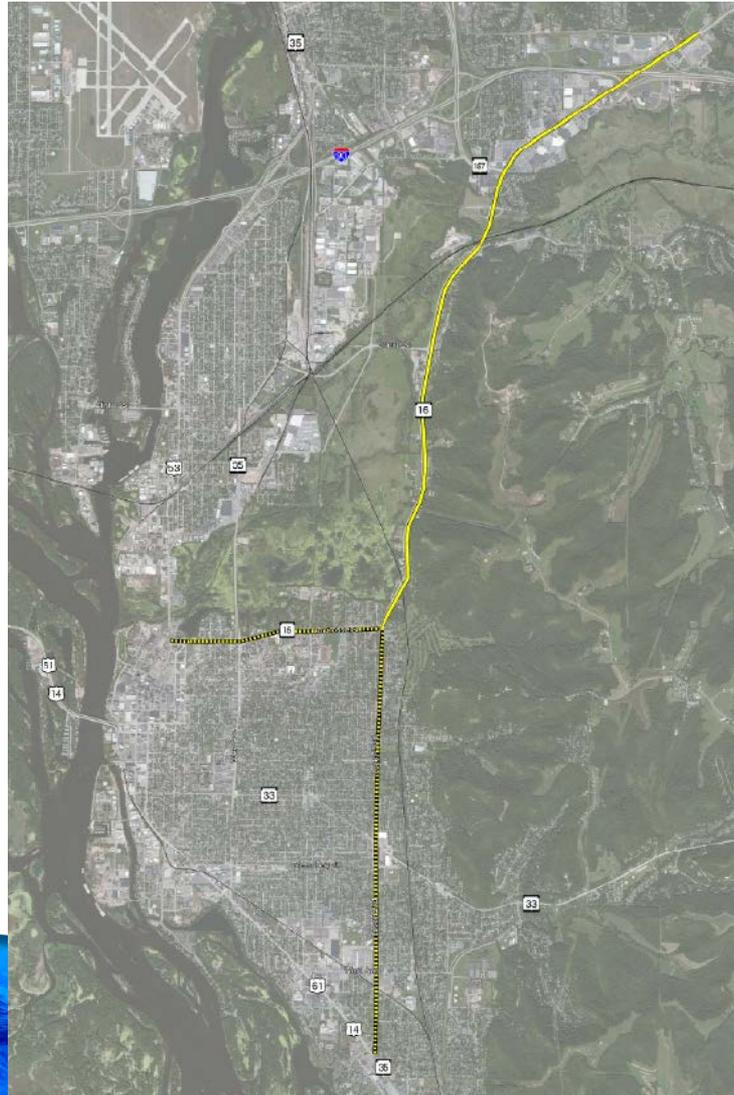


# Selective Expansion of Existing Roads

## *Strategy A*

### Expansion to 6-lane

- Option 1
  - 4 lane La Crosse St.
- Option 2
  - 6 Lane Losey Blvd

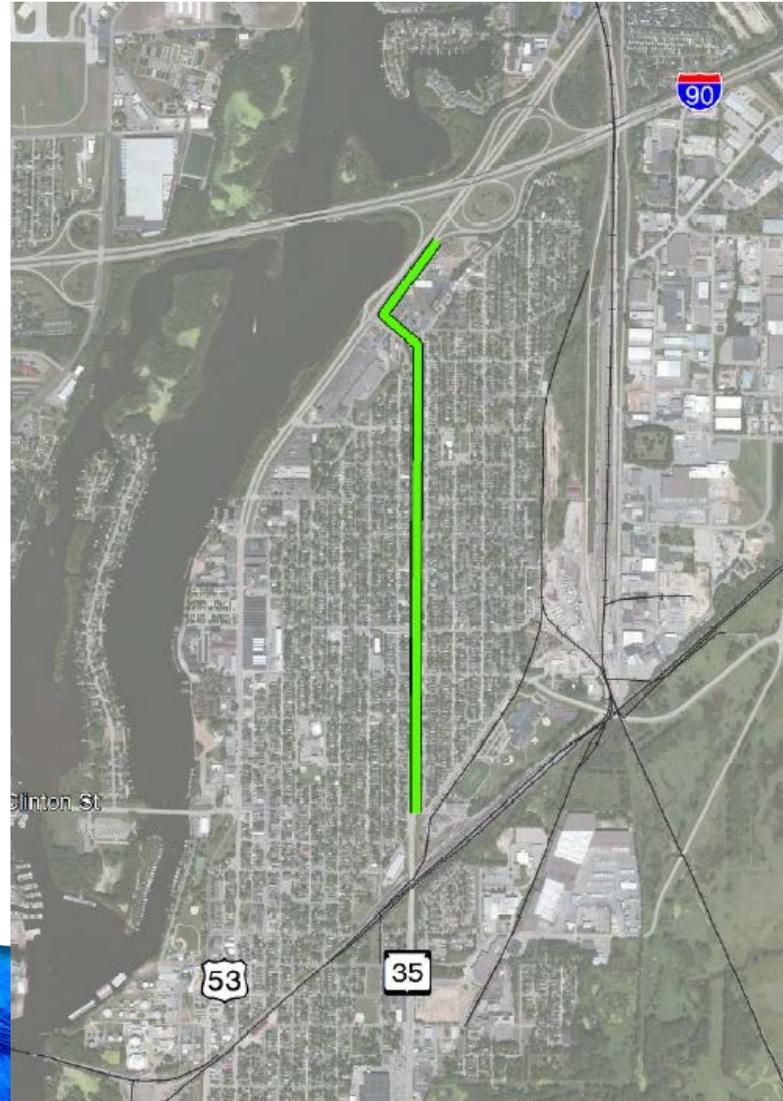




# Selective Expansion of Existing Roads

## *Strategy C*

STH 35/George St  
Expansion to 4-lane



# Broad Strategies

- ▶ TDM
- ▶ Policy and Legislation
- ▶ Bike and Pedestrian
- ▶ Transit
- ▶ TSMO
- ▶ **Roadways**
  - Improve Existing Roads
  - Selective Expansion
  - **New Roads**



# Construct New Roads

## *Public Comments Overview*

- ▶ Construct New Roads
  - 27 comments
  - Repeated themes:
    - WIS 157 to River Valley Drive – “North Build”
    - French Island route from I-90 to 2<sup>nd</sup> Street in La Crosse



# Construct New Roads

## *Strategy D*

East Corridor

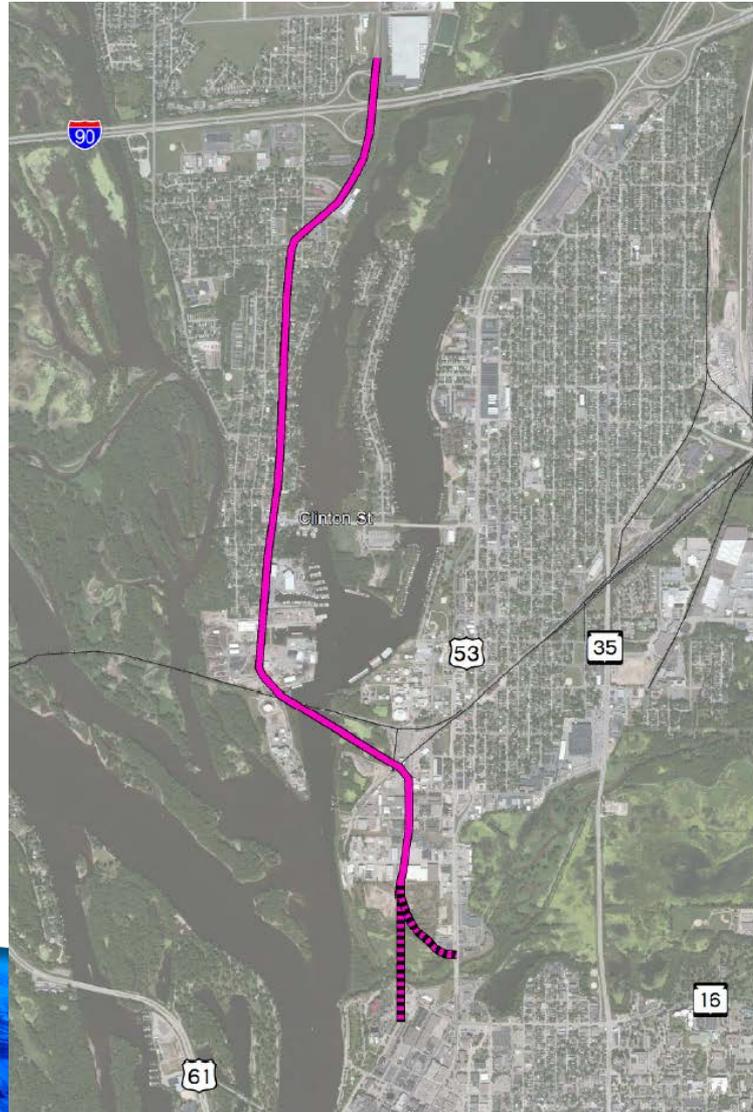


# Construct New Roads

## *Strategy E*

### West Corridor

- Option 1
  - Connect to Copeland
- Option 2
  - Connect to 2<sup>nd</sup> St Downtown

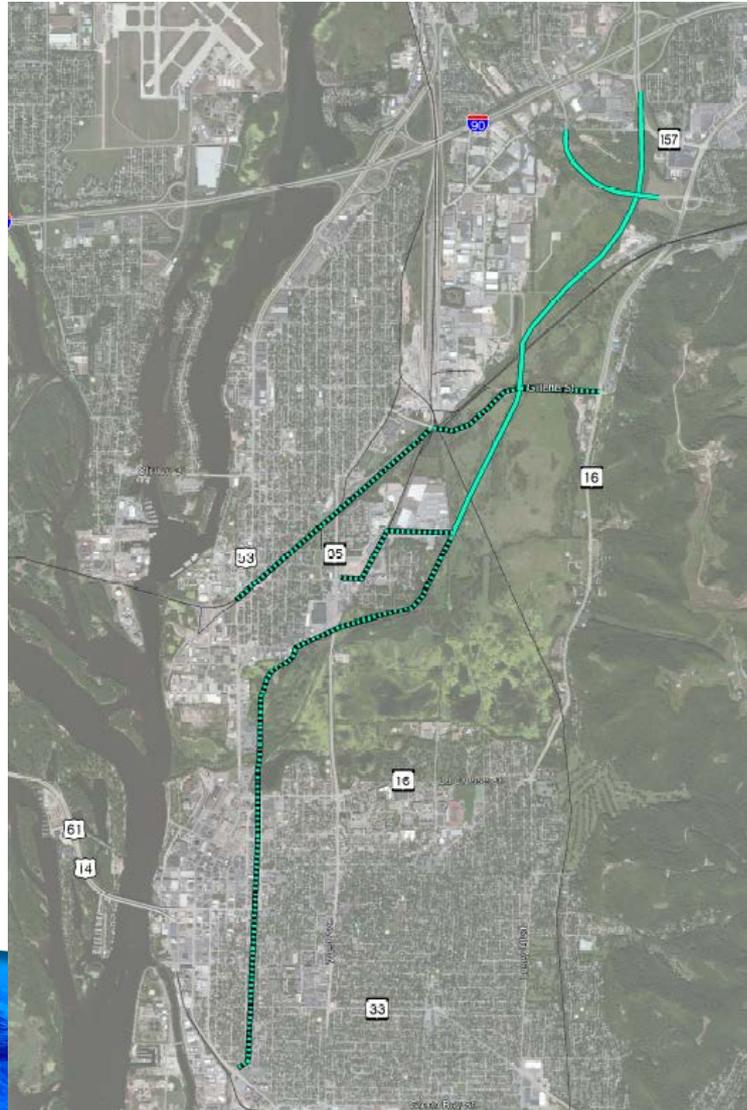


# Construct New Roads

## *Strategy F*

### Central Corridor

- Option 1
  - Connect to 35 Lang Dr
- Option 2
  - Connect to 16
- Option 3
  - Connect to 35 & 53  
Along railroad
- Option 4
  - Connect to 6/7<sup>th</sup> Street  
Downtown



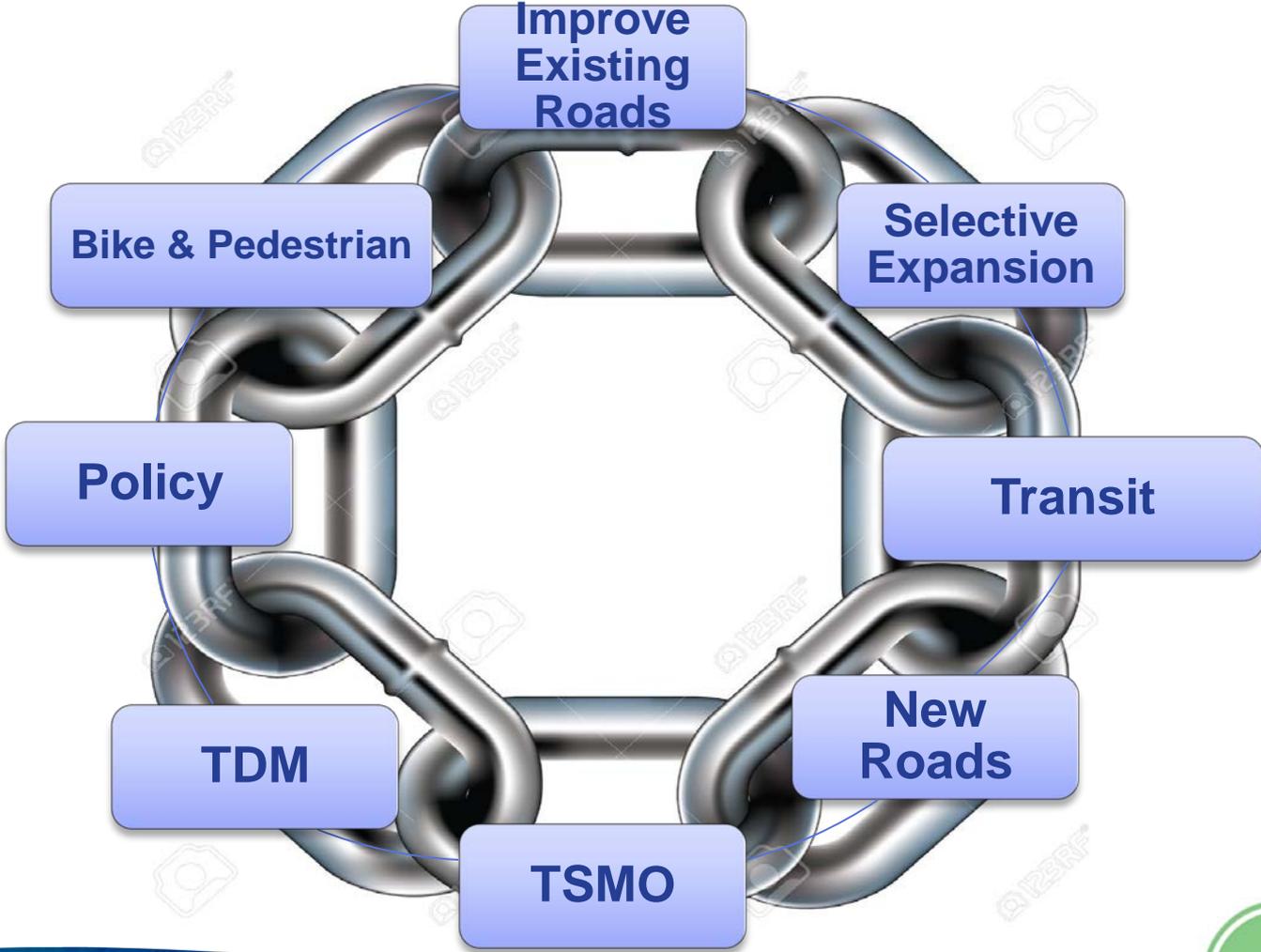
# Strategy Development Criteria

Summary of Strategies

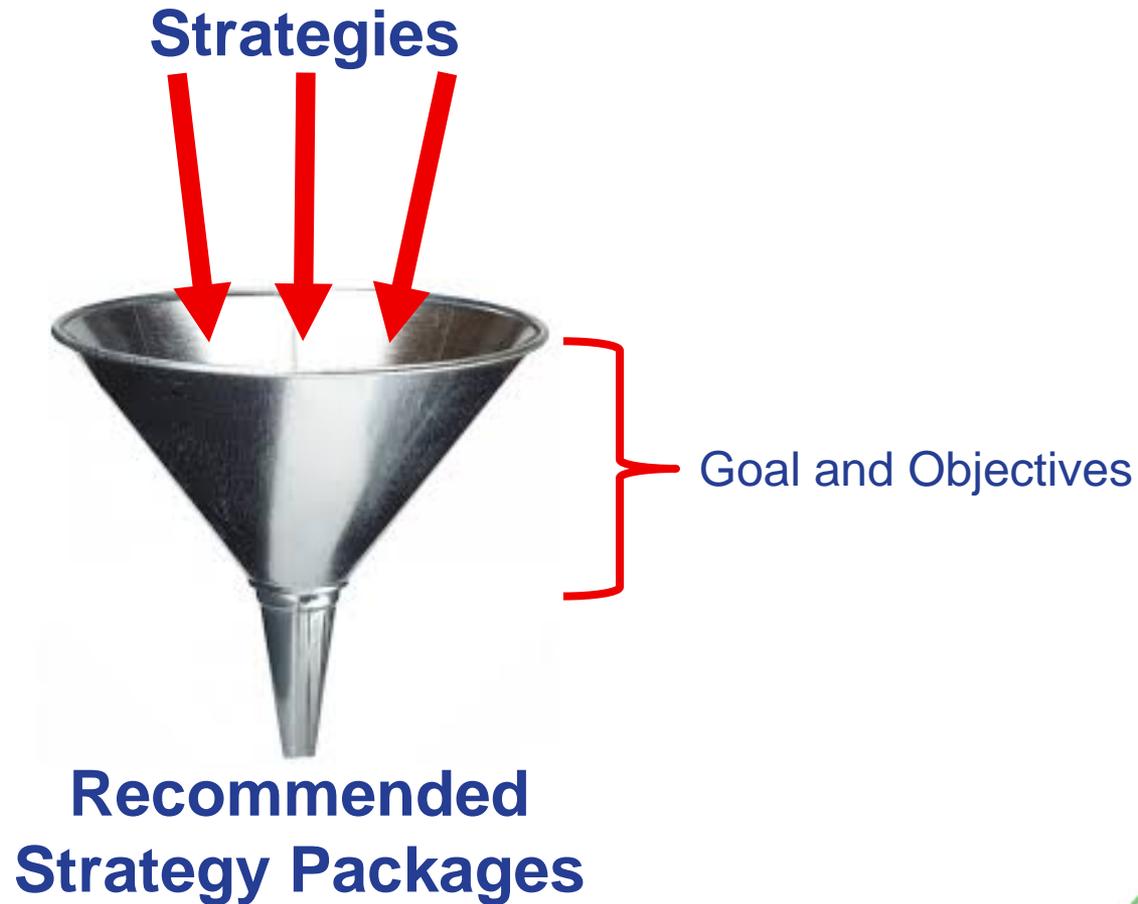
Strategies	Objectives				
	1	2	3	4	5
Travel Demand Management (TDM) Only	No	No	Partial	Yes	Yes
Policy and Legislation Only	No	No	Partial	Yes	Yes
Transit Only	No	No	Partial	Yes	Yes
Bike and Pedestrian Only	No	Partial	Partial	Yes	Yes
TSMO	Partial	Partial	Partial	Yes	Yes
TDM/Policy/Transit/Bike/Ped/TSMO	Partial	Partial	Partial	Yes	Yes
Evaluate intersections without adding any through capacity with TPTBPT	Partial	Partial	Partial	Partial	Partial
	-	-	-	-	-
	-	-	-	-	-
Selective Expansion: Alternative A with TPTBPT	-	-	-	-	-
Selective Expansion: Alternative B with TPTBPT	-	-	-	-	-
Selective Expansion: Alternative C with TPTBPT	-	-	-	-	-
Construct New Roads: Alternative D with TPTBPT	-	-	-	-	-
Construct New Roads: Alternative E with TPTBPT	-	-	-	-	-
Construct New Roads: Alternative F with TPTBPT	-	-	-	-	-



# Broad Strategy Packages are Linked



# Strategy Funneling Process





# Questions

