City Birmingham Comprehensive Multi-Modal Transportation Plan

Visioning Workshop

Thursday, January 17, 2013
7:00 PM to 9:00 PM, Library

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Toole Design Group

Today's Agenda

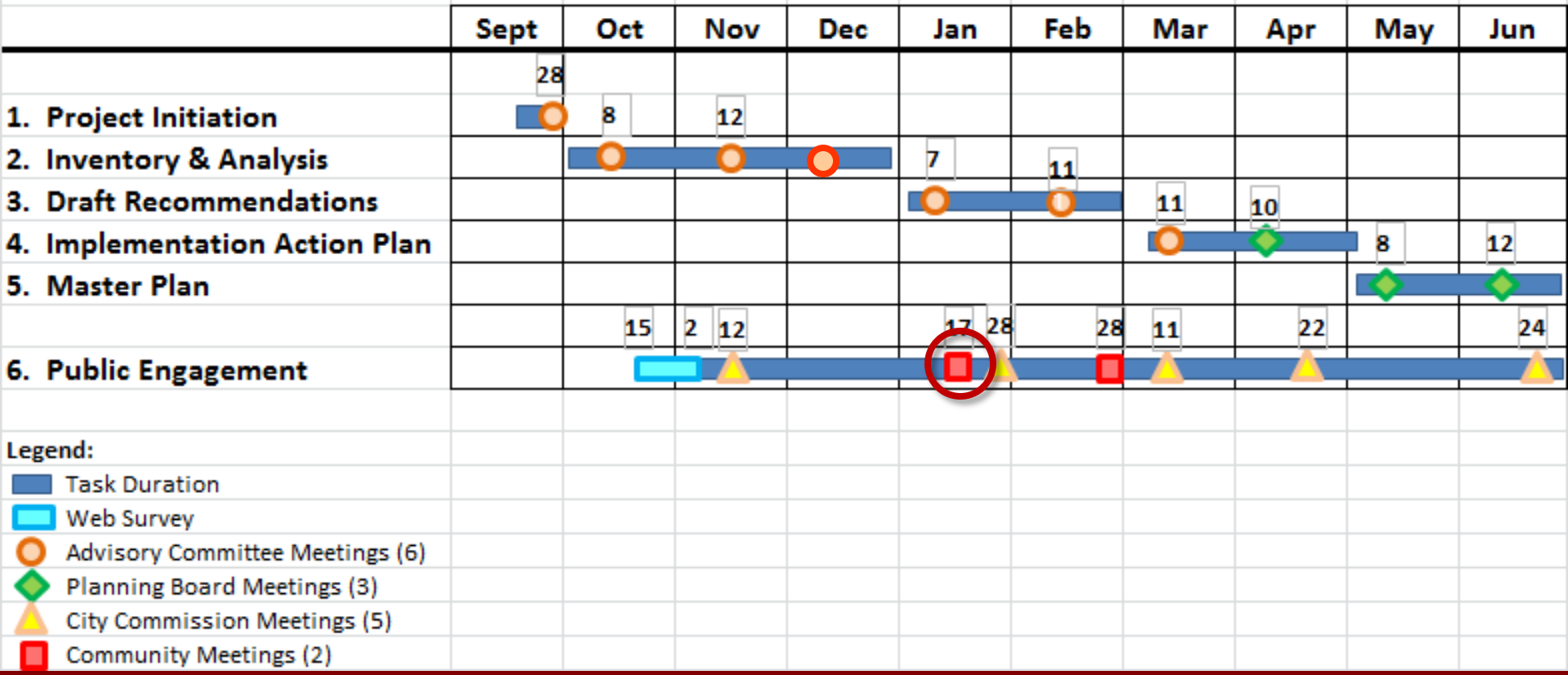
- Overview of Best Practices & Inventory and Analysis Findings
- Individual and Group Exercises:
  - Role Playing
  - Corridor Evaluations
  - Neighborhood Connectors and Trails
  - Downtown Birmingham
  - Woodward Avenue
- Wrap Up and Next Steps

The purpose of today's meeting is to set the course for the preliminary plan

Project Schedule

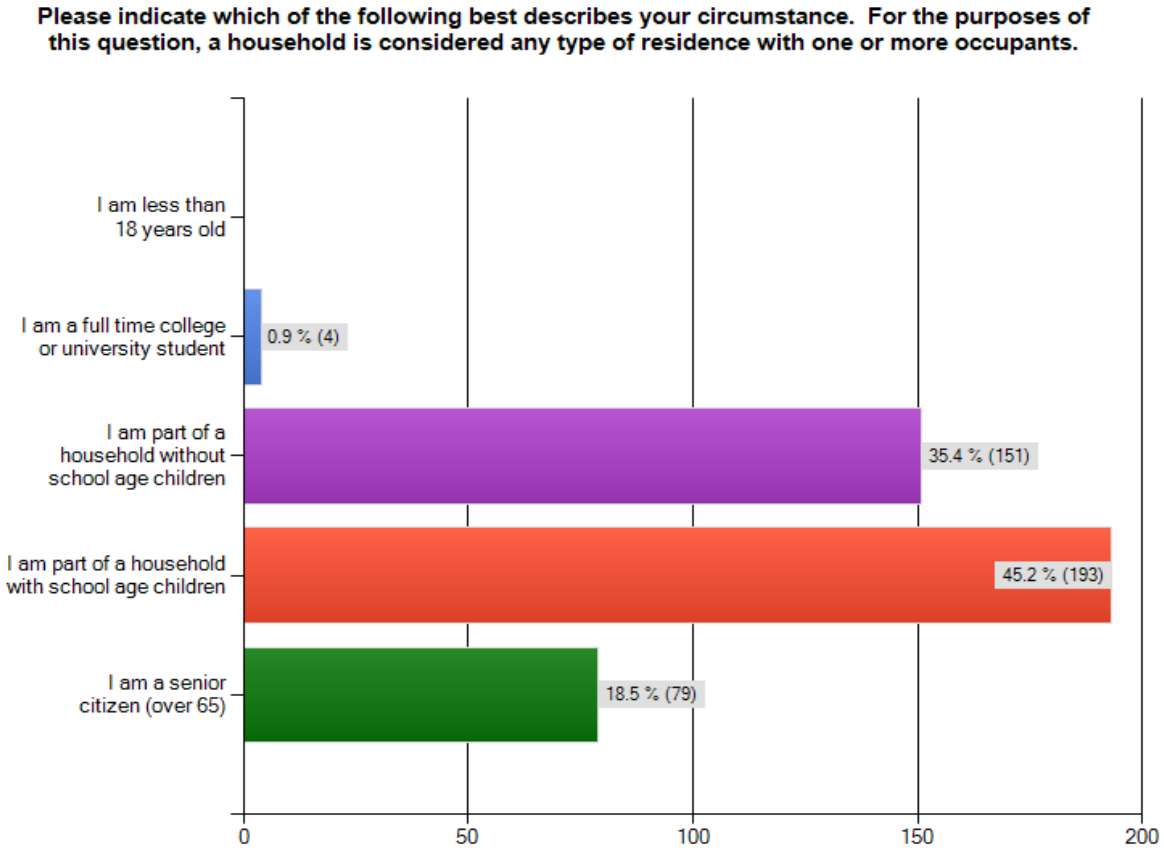
City of Birminham Comprehensive Multi-modal Transportation Plan

Revised, September 22, 2012



Web Survey

- Available from October 18, 2012 to November 4, 2012
- 550 started survey
- 429 (78%) completed survey
- 264 (61.5%) residents of the City of Birmingham completed the survey

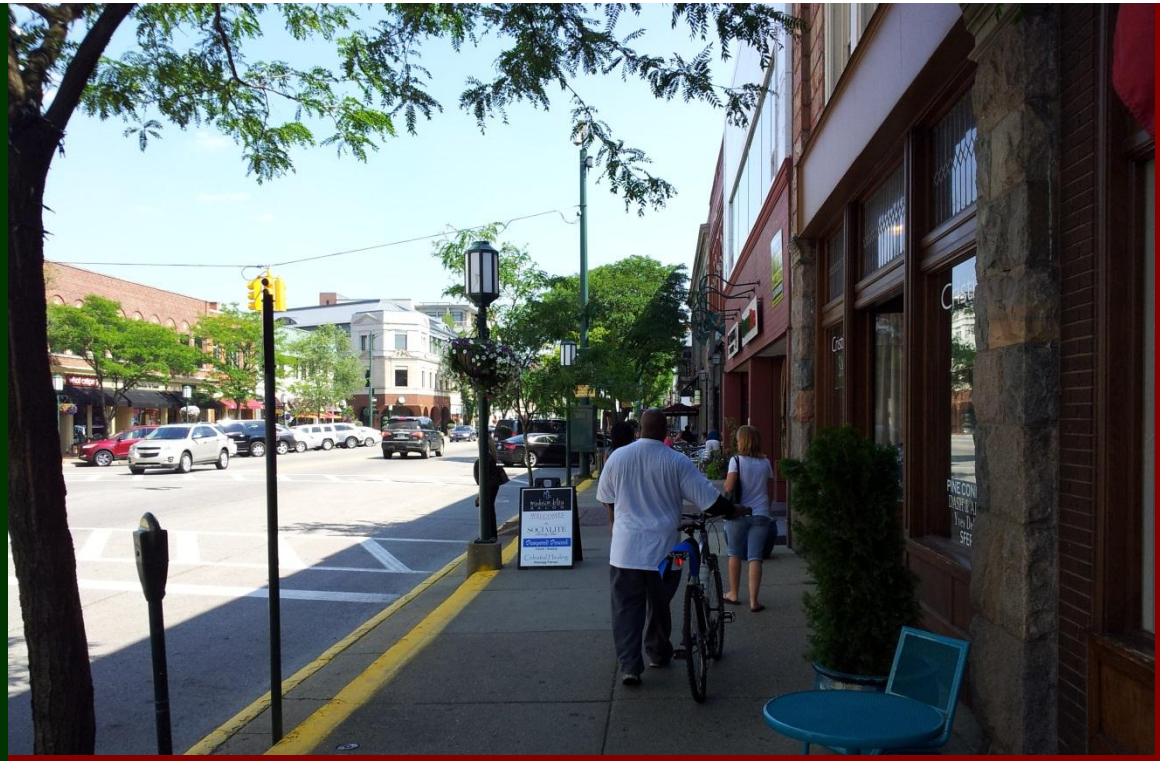


Due to time constraints, we are not going to go over the survey results tonight, they can be downloaded from our project website at www.greenwaycollab.com

We will reference key finding from the survey through out the presentation.

Why Undertake a Multi-modal Plan?

- A means to build consensus on how best to accommodate all uses within the road ROW
- Improve safety for all users especially vulnerable users
- Establish a logical framework for implementation
- Address related goals such as promoting physical fitness through active transportation
- Improve quality of life for residents

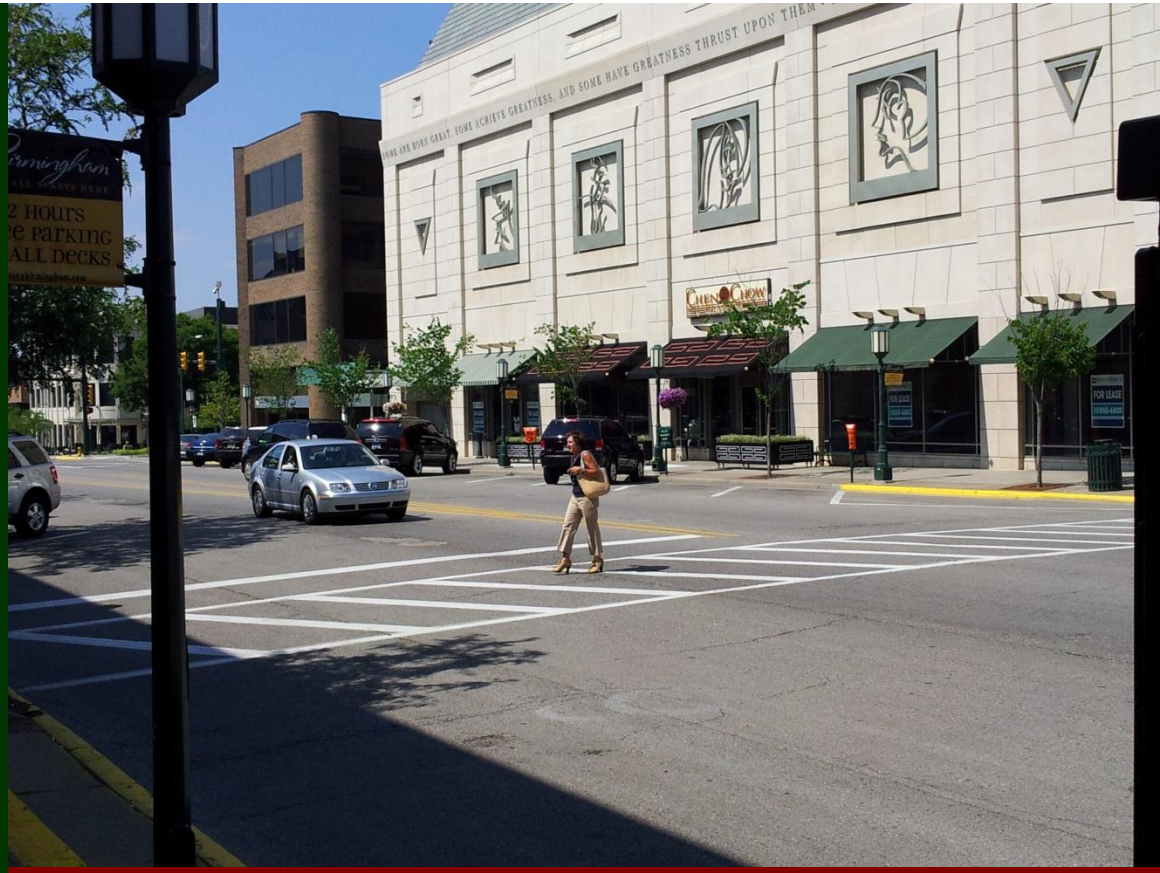


Healthy, Livable Communities
Complete Streets
Cool Cities
Smart Growth
Safe Routes to School

All have common ground in providing multi-modal transportation options

What do we mean by Multi-Modal?

- City has already focused on vehicles and is considered a walkable city
- This plan looks at how to further integrate pedestrian, bicycle, and transit users into the transportation system
- Considers the impact that new bicycle, pedestrian and transit facilities will likely have on motorized traffic



Fixing the pot hole in front of your house or reducing traffic congestion is not in the scope of this project

Project Approach

Public Policies

- Planning & Zoning
- Design Standards
- Performance Measures
- Decision Making Process
- Universal Design
- Public Transit
- School Transportation
- Maintenance
- Enforcement

Environment & Operations

- Urban Form
- Public R.O.W.
- Public and Private Spaces
- Off-Road Trails
- Wayfinding
- Bicycle, Pedestrian and Transit Support Facilities
- Transit Operations
- Environmental and Art Enhancements

Community Programs

- Ongoing Assessment
- Resources
- Campaigns
- Marketing/ Outreach
- Special Events
- Targeted Encouragement
- School Programs
- Safety Education

Quality of Life Objectives

- Increased Activity Levels
- Crash Reduction
- Improved Personal Safety + Experience
- Enhanced Health and Wellbeing
- Energy Savings
- Pollution Reduction
- Sense of Place
- Robust Economy
- Increase Ridership

Understanding the Users

Key issues for pedestrians, bicyclists transit users and motorists

No Such Thing as a Typical User

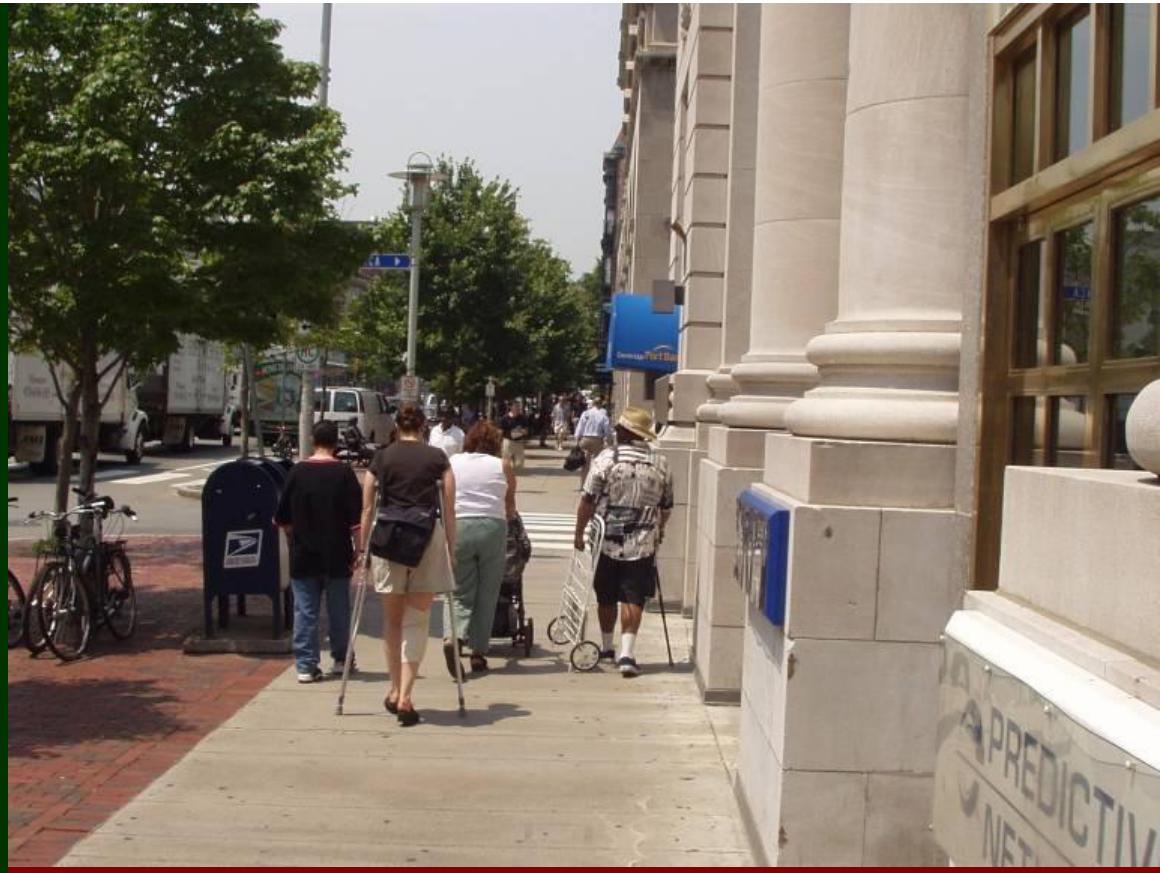
Wide Range of:

- Ages
- Understanding of traffic laws
- Temporary and long-term physical and cognitive abilities
- Personal preferences
- Travel speeds
- Skills and knowledge
- Vehicle characteristics (for bicyclists and mobility assistance devices)

Need to address a spectrum of users rather than a particular target

Types of Pedestrians

- Wide range of temporary and long-term physical abilities
- Various Cognitive abilities
- Different degrees of “traffic tolerance”
- Some may be carrying or pushing cargo / kids

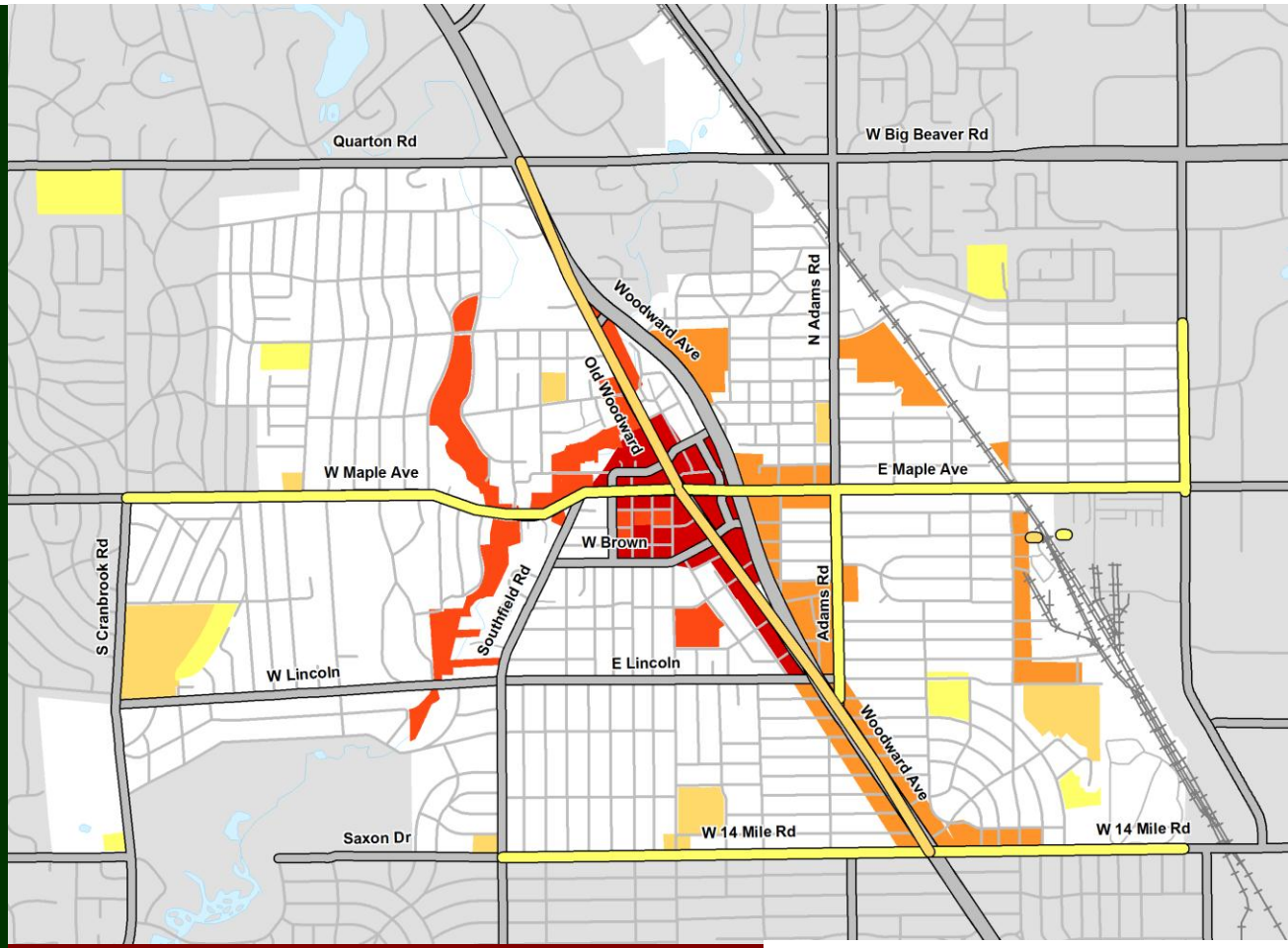


There is no required education program or licensing for pedestrians

Web Survey – Current Walking Destinations

Participants were asked to identify where they currently walk to:

- Downtown
- Rouge Trails
- Barnum Park
- Booth Park
- Shain Park
- Baldwin Public Library
- City Hall
- Community House
- North Old Woodward District



- Colored roadways indicate bus routes
- Dots indicate transit stations (current and proposed)

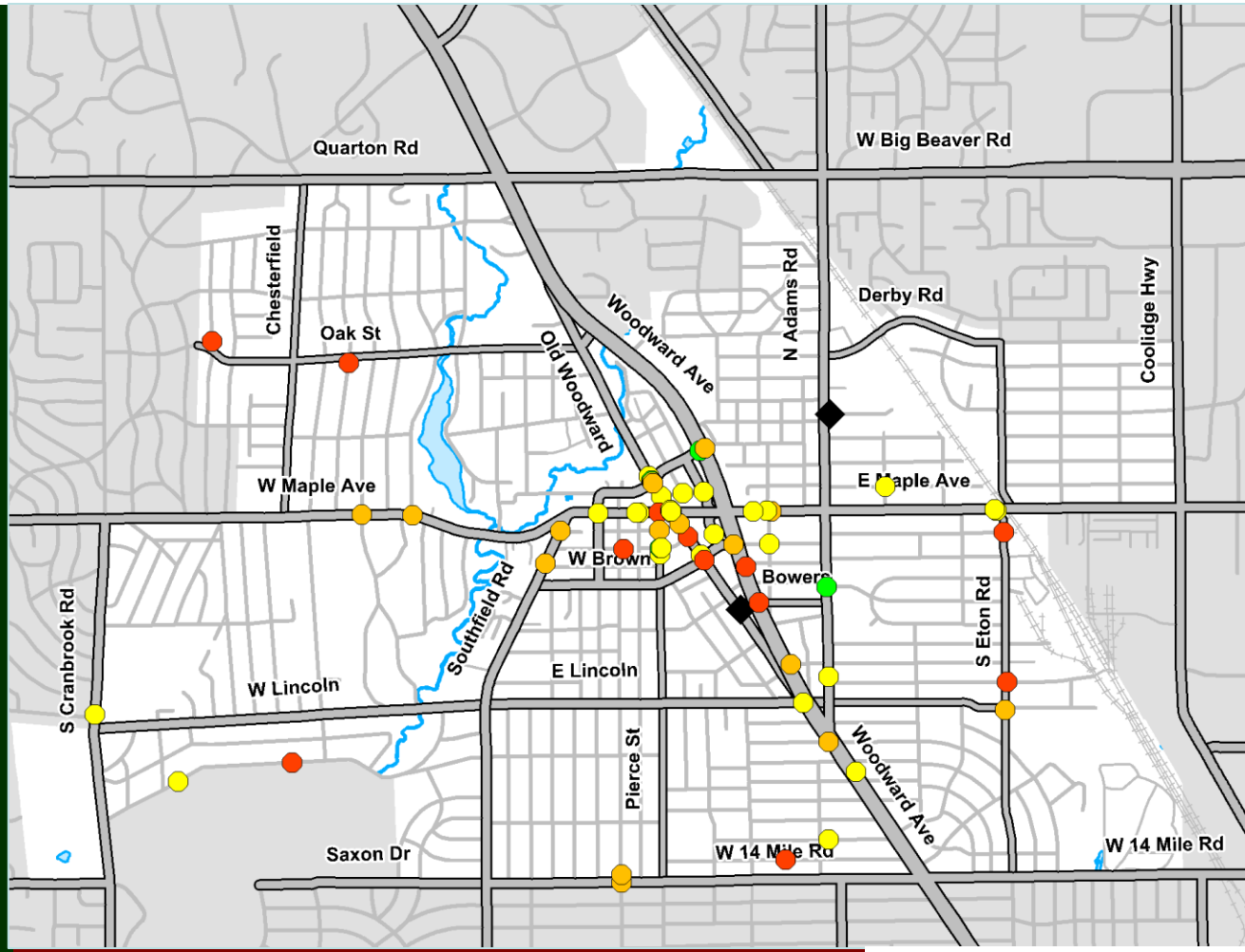
Survey Results

(# of survey participants who currently walk)

- Over 200
- 100 to 200
- 50 to 100
- 25 to 50
- Less than 25

Pedestrian Crashes

- 67 pedestrian crashes in 8 year period
- Both fatalities occurred under very unusual circumstances for which there are no countermeasures
- Winter months had highest number of crashes
- 66% of crashes took place in daylight, 4% at dust and 29% in the dark
- Wet, snowy or icy roads were a factor in 10% of the crashes
- 46% of crashes occurred where traffic control was not present



- 2 fatalities
- 13 crashes resulted in serious injuries

Pedestrian Crashes
(worst injury in accident)

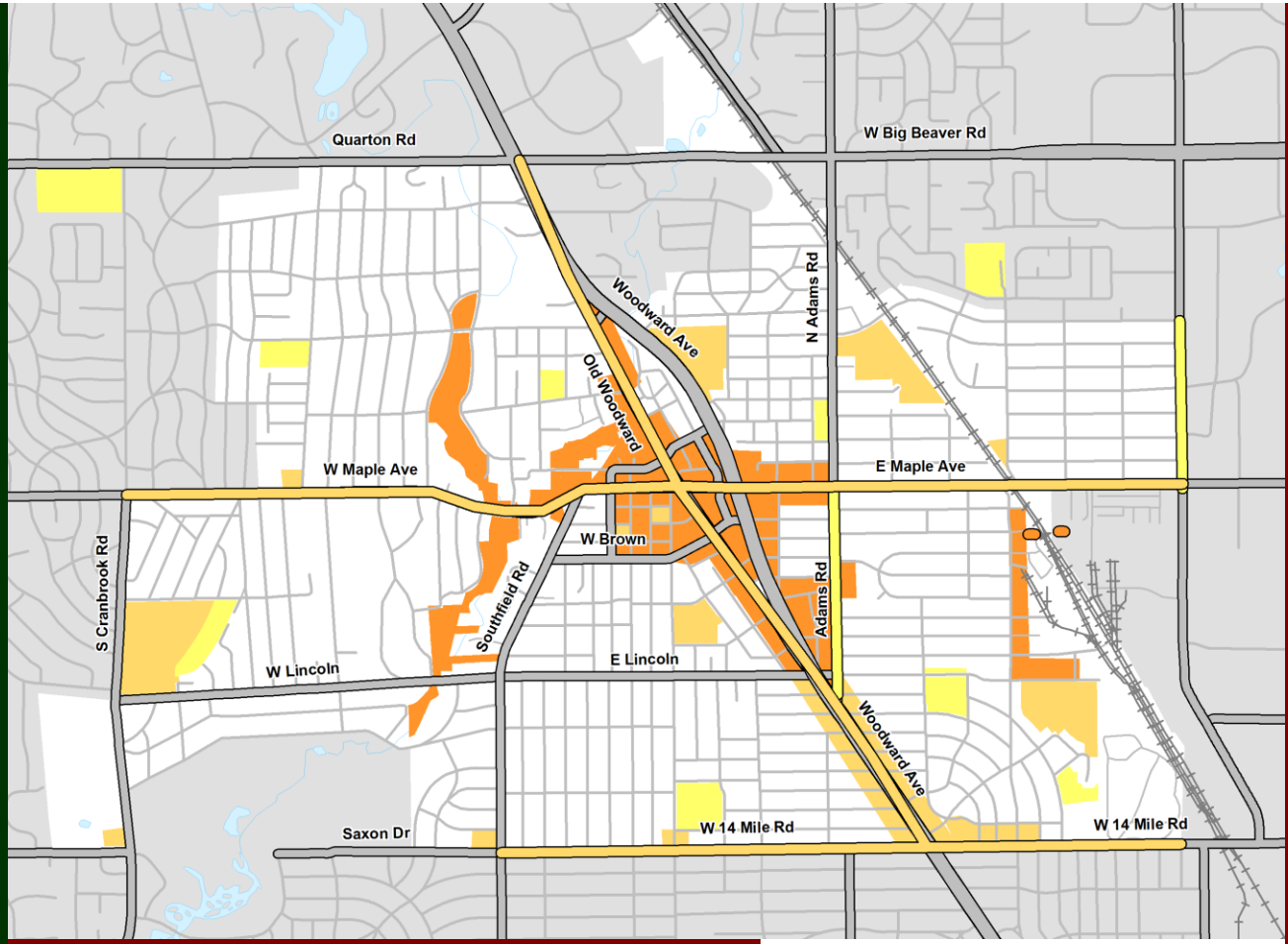
- Fatal
- A - Incapacitating Injury
- B - Nonincapacitating Injury
- C - Possible Injury
- No Injury

Web Survey – Potential Walking Destinations

Participants were asked to identify where they would like to walk to if safe and comfortable facilities were available

The following destinations have potential for the most growth:

- Downtown Birmingham
- Future Amtrak Station
- Rouge Park Trails
- Baldwin Public Library
- Rail District
- Triangle District
- North Old Woodward Commercial Areas
- Booth Park



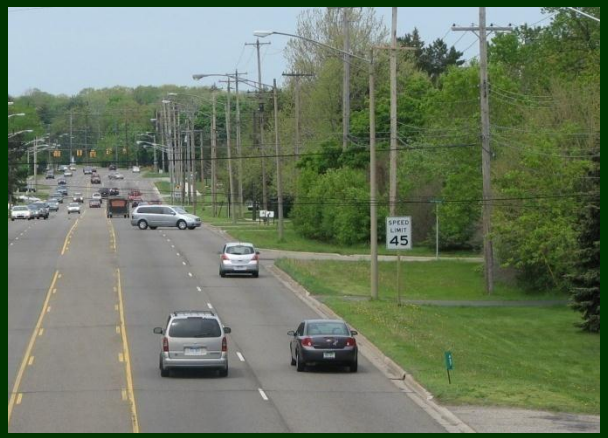
- Similar pattern to existing walking destinations
- Relative low demand may reflect the high number of people already walking

Sidewalk Quality of Service

A – Facility with Vertical Buffer

B – Facility with Buffer

C – Facility along Curb



D – No Facility, but Passable

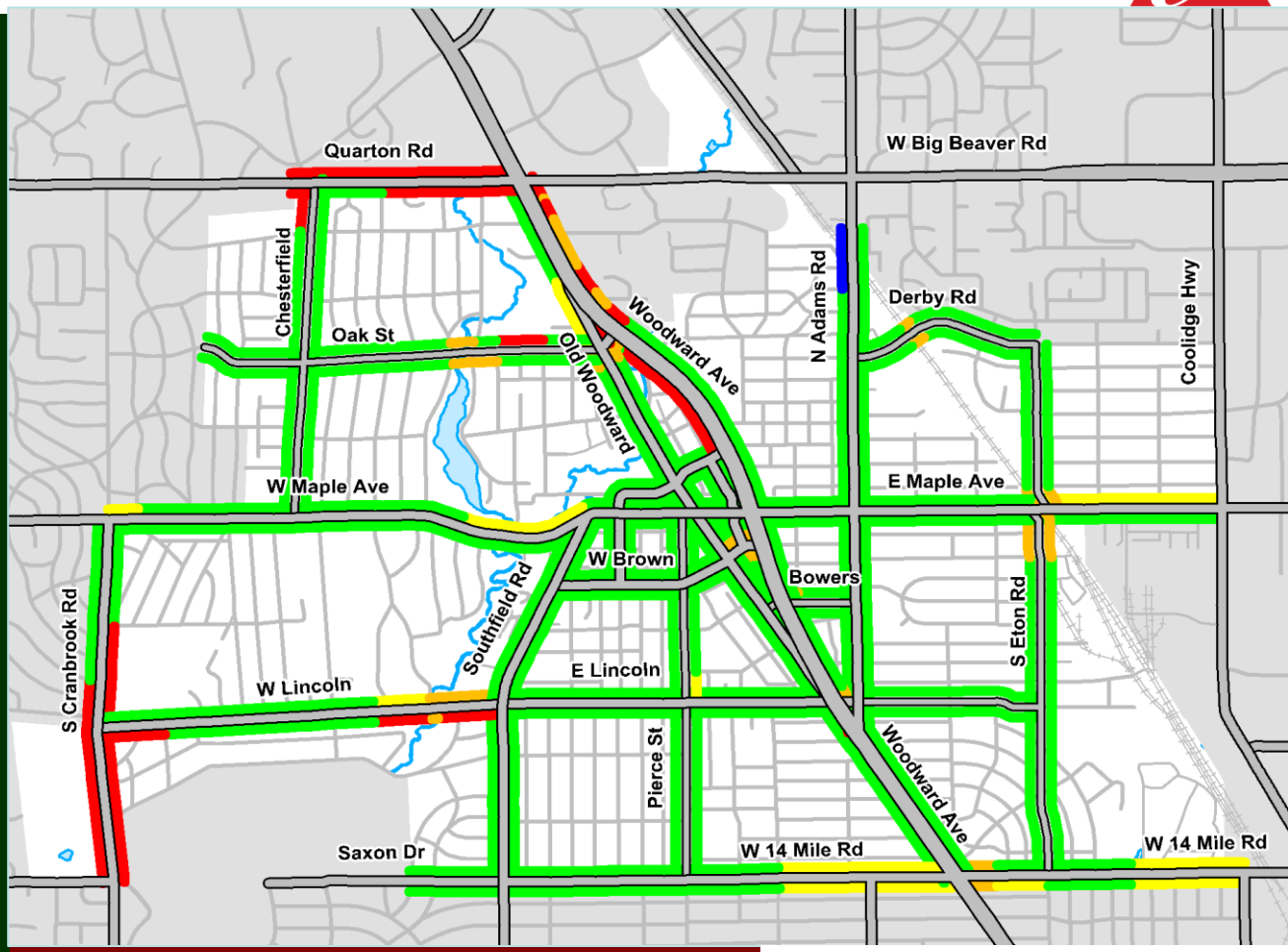
E – No Facility, Not Passable

Sidewalk Widths

- 5’ minimum
- 6’ along collectors
- 8’ along arterials
- Even wider downtown

Existing Sidewalk Level of Service

- Majority of sidewalk system is complete
- Gaps along Quarton, Woodward Ave, Cranbrook, Oak and Lincoln



Sidewalk Rating

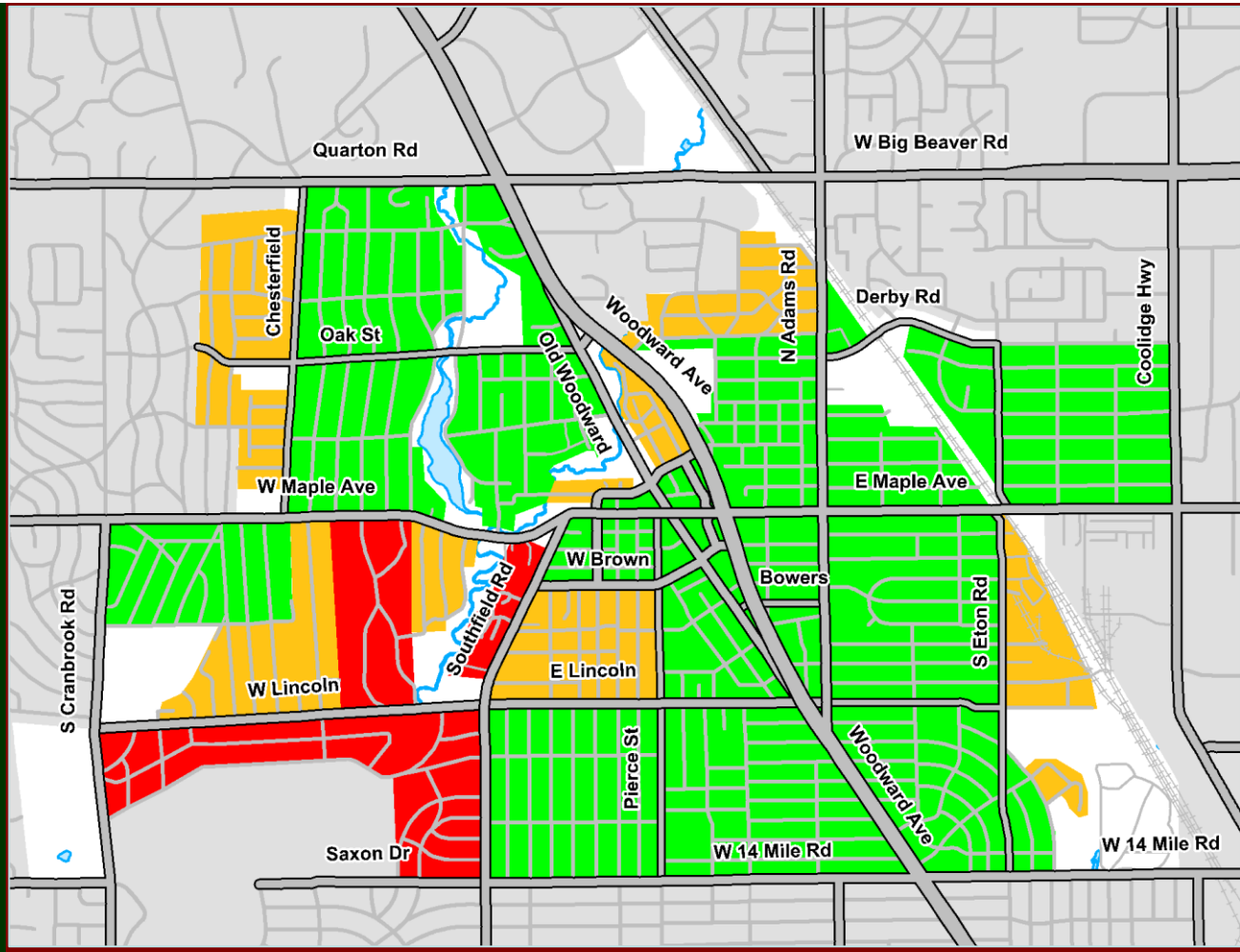
- A - Facility with Vertical Buffer
- B - Facility with Buffer
- C - Facility along Curb
- D - No Facility/Passable
- E - No Facility/Not Passable

Web Survey Results:
Walking is the primary mode of transportation to work or shopping for 14% of survey respondents

- Approximately 40 miles of existing sidewalks along primary roads

Existing Neighborhood Sidewalk Coverage

- Majority of the neighborhood sidewalk system is complete
- Incomplete systems in the southwest area of the city



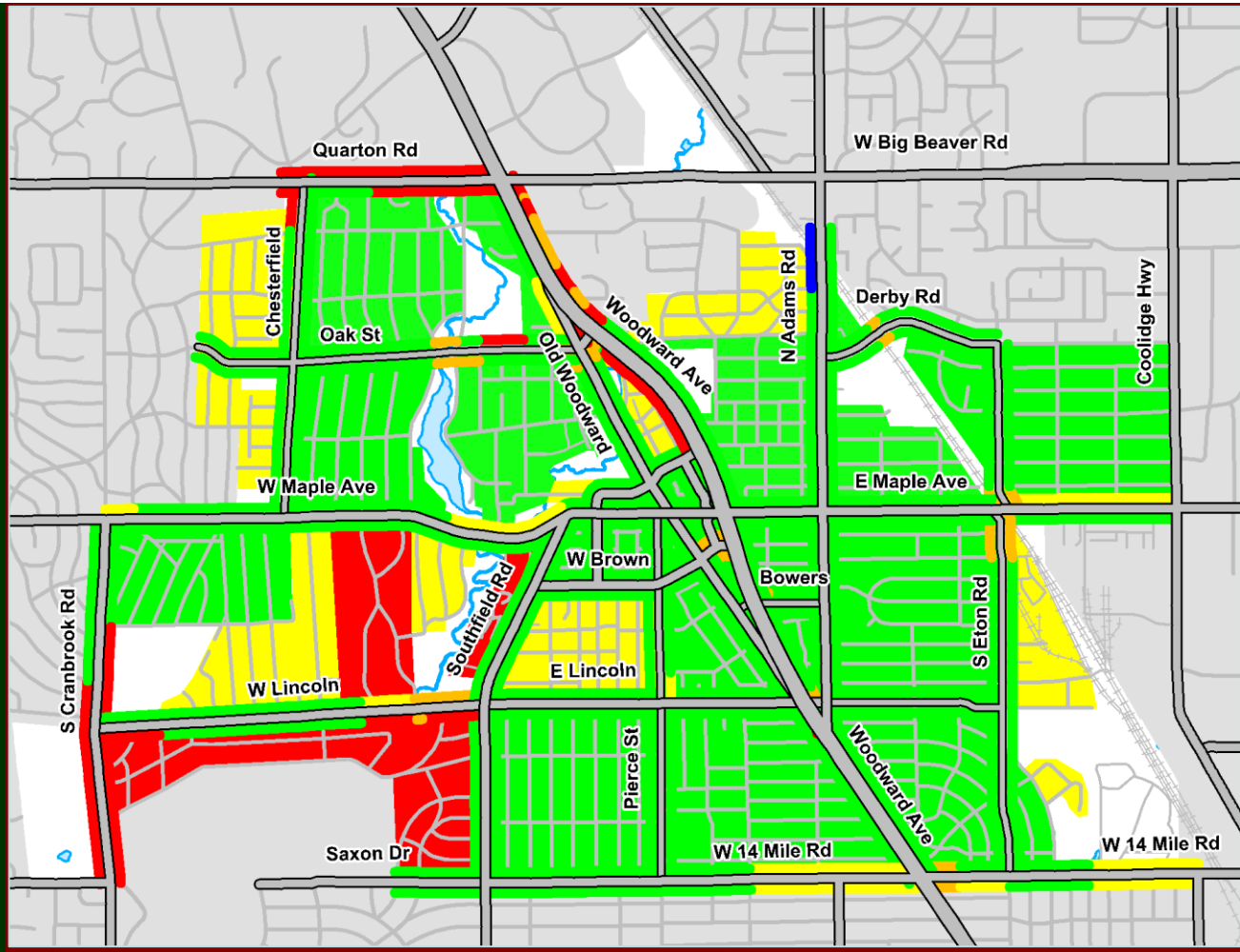
Web Survey Results:

17% of survey respondent with school age children already walk to school

55% are interested in their children walk or bicycling to school

Existing Sidewalk Connectivity

- Most of the City has sidewalk coverage
- Incomplete systems in the southwest area of the city



Sidewalk Rating

- A - Facility with Vertical Buffer
- B - Facility with Buffer
- C - Facility along Curb
- D - No Facility/Passable
- E - No Facility/Not Passable

Neighborhood Sidewalks

- Complete
- Partially Complete
- Incomplete

Web Survey Results:

69.5% of respondents indicated that a complete sidewalk system was very important to them to being able to walk or bike to a desired destination in the future

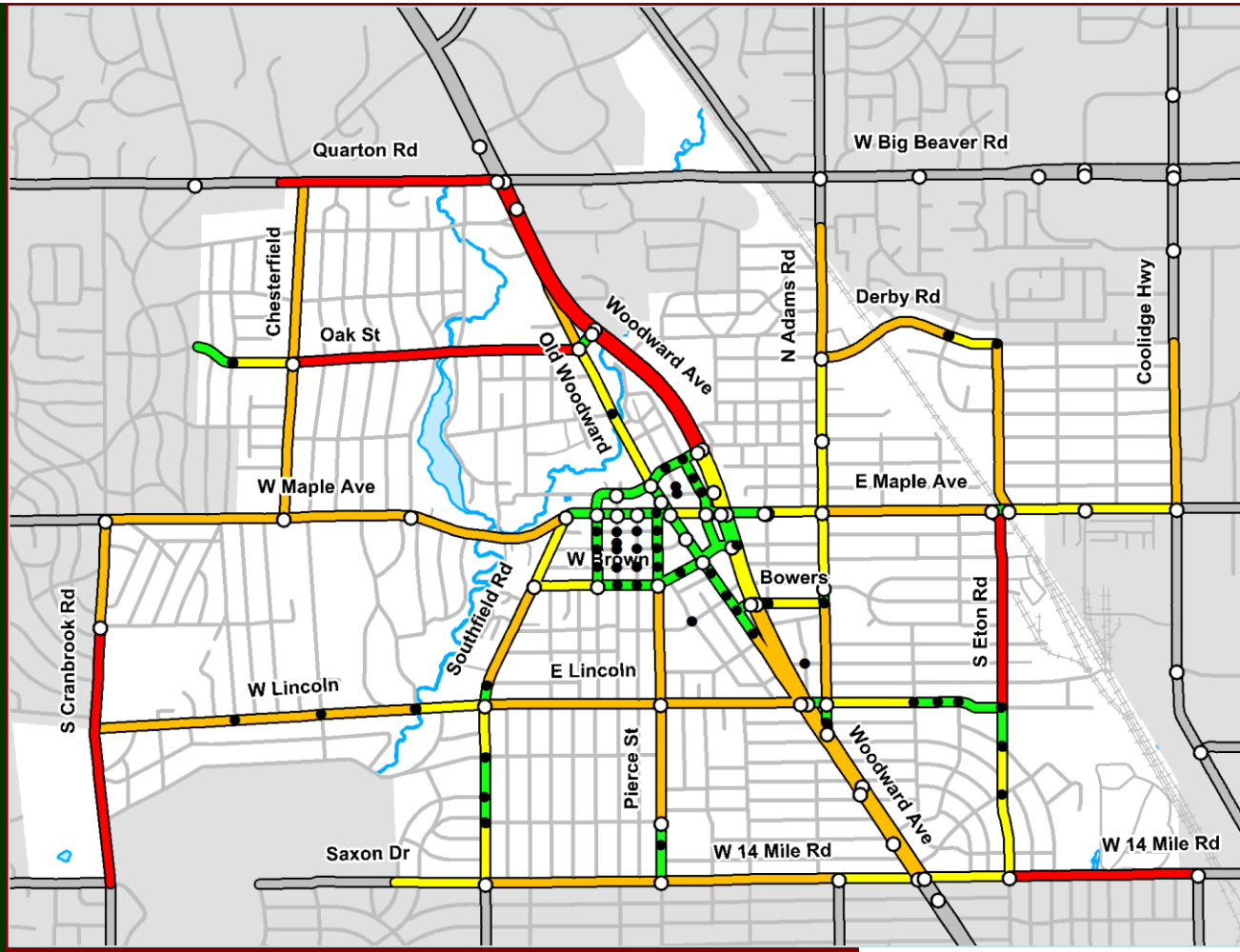
Importance of Direct Travel for Pedestrians

- Most walking trips for personal business are about ¼ to ½ mile
  - 5 to10 minute walk
- Most people will not go out of there way more than 10% total trip distance
- A 10% detour for a ½ mile walking trip is 264’
  - less than a city block

Signs and barriers have little impact on changing people’s behaviors

Crosswalk Spacing

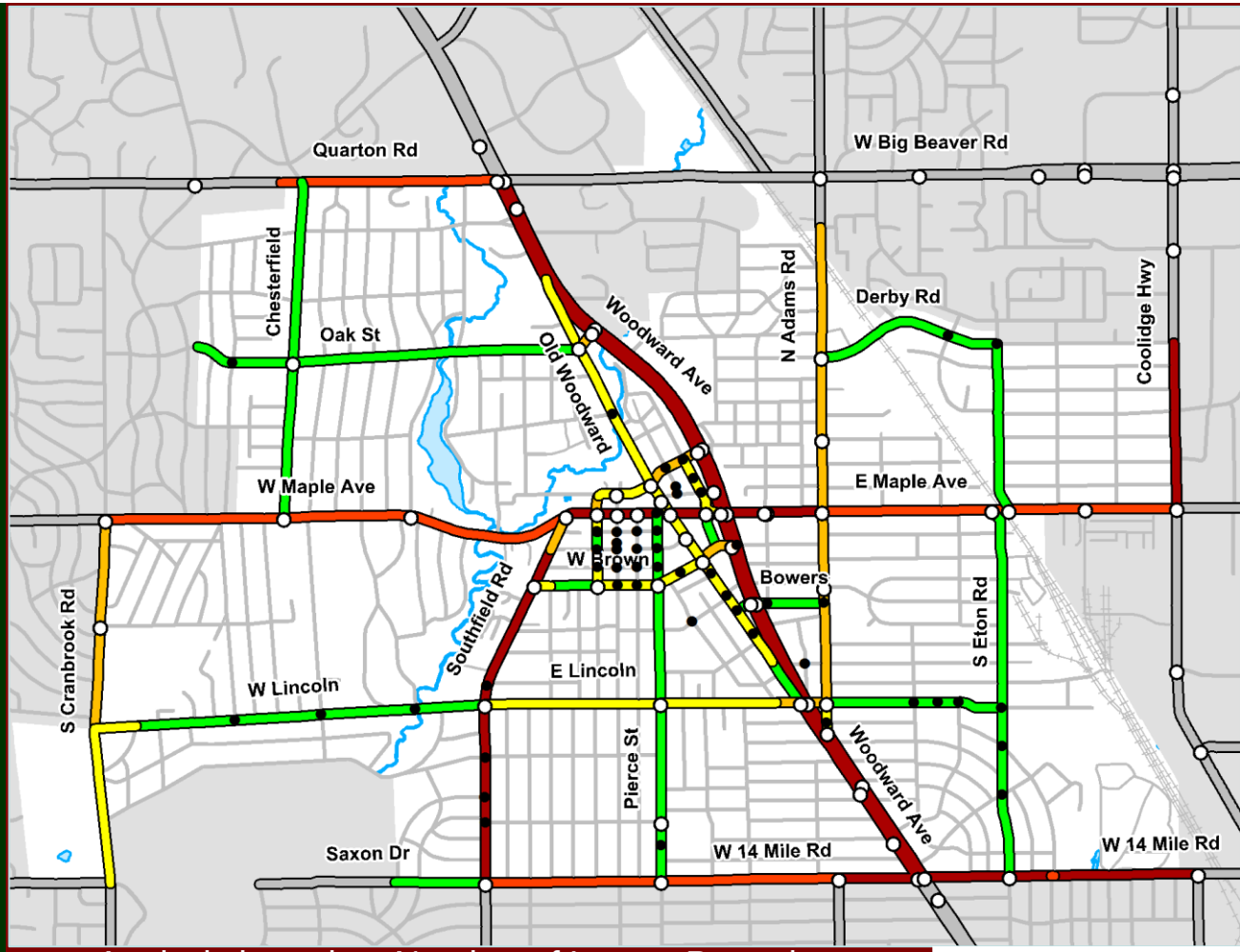
- Great spacing in the downtown
- Need to contrast roads with poor spacing with demand



Road Crossing Difficulty

- Woodward Ave, Southfield Rd, W 14 Mile Road, Coolidge Hwy, Quarton Road and Maple Road are Difficult to Cross
- Please note that this analysis is based on the posted speed limit which may vary from the actually running speeds

Web Survey Results:
Crossing Woodward Avenue was identified as a major place of concern



- Analysis based on Number of Lanes, Posted Speed Limit & Traffic Volumes (ADT)

Rating	Lanes	Posted Speed	ADT
A	2	25	0 - 5,000
B	3	30	5,000 – 10,000
C	4	35	10,000 – 15,000
D	5	40	15,000 – 20,000
E	6+	45+	20,000+

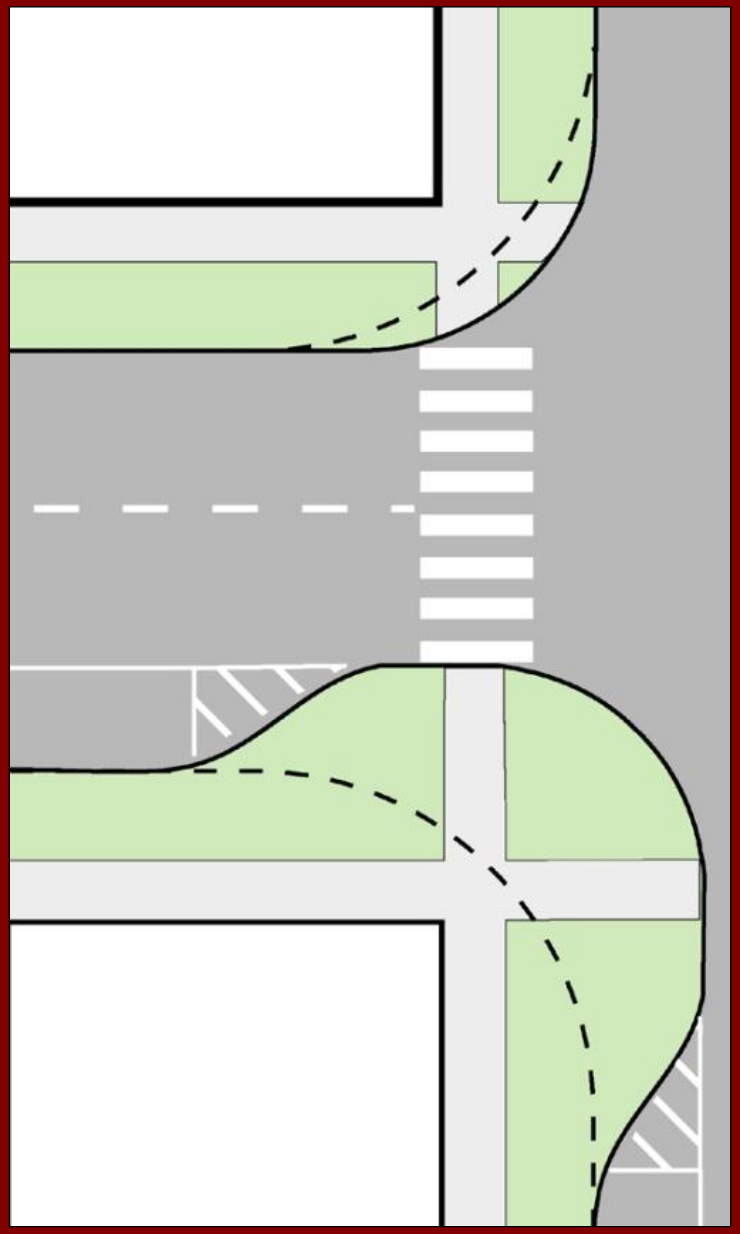
Road Crossing Difficulty
(Posted Speed, No. Lanes & ADT)

A — Better
B
C
D
C — Worse

○ Signalized Intersection
● Unsignalized Road Crossing

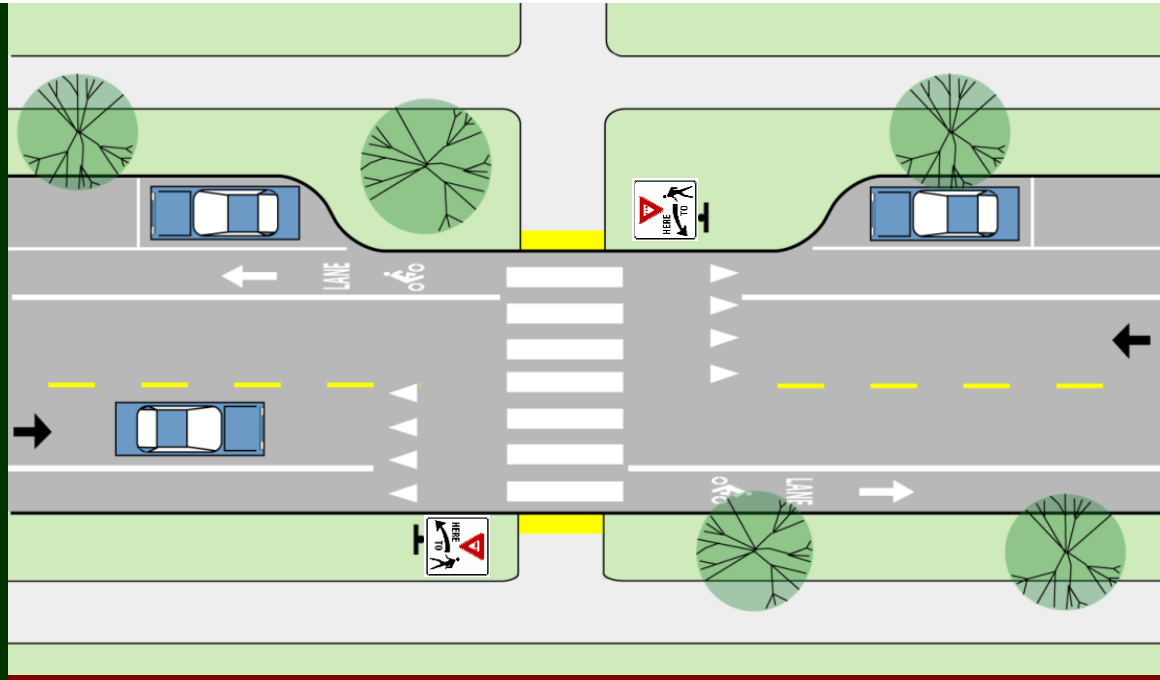
Curb Extensions

- Minimizes crossing distance
- Better for seniors
- Better visibility at corners
- Reduces illegal parking
- Shorter crosswalk equals longer “walk” signal time and reduces the clearance interval (flashing “don’t walk” time)
  - Walking “pace” used to calculate signal timing being slowed from 4 feet per second to 3.5 feet per second



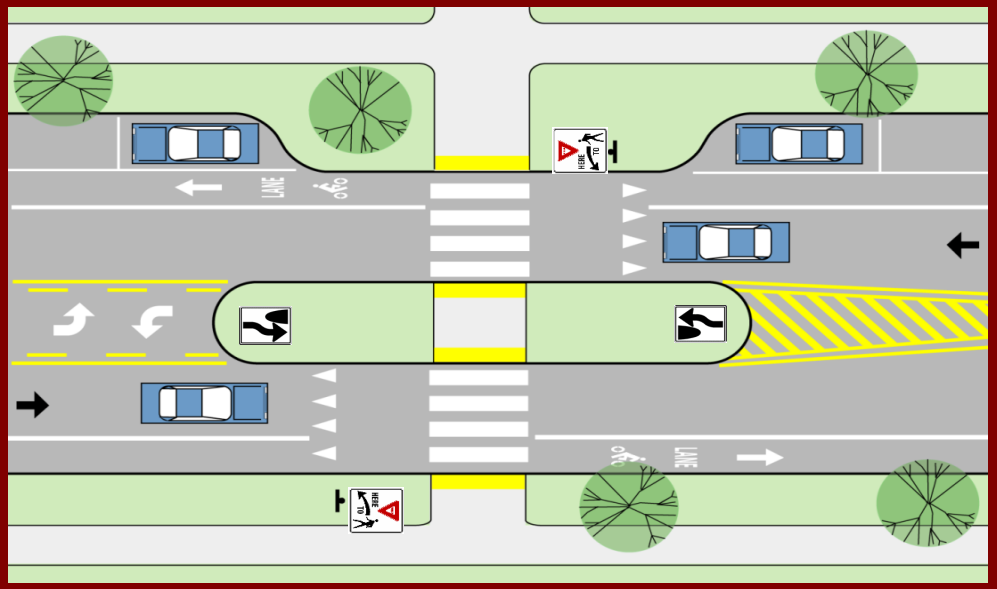
Mid-block Crossing with On-Street Parking

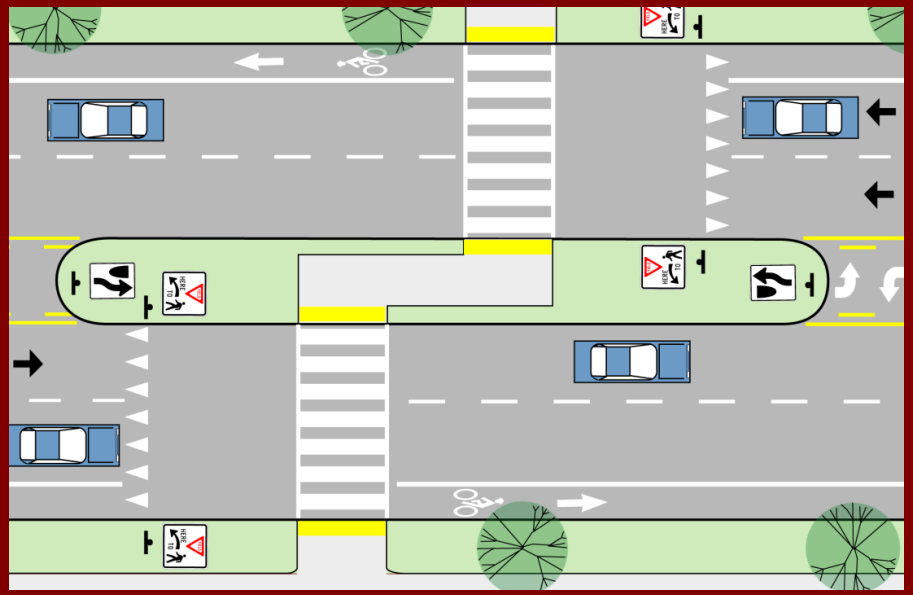
- Curb extension places pedestrian into the sightlines on oncoming vehicles
- Reduces the potential of “dart-out” type crashes
- Areas simply marked off for no-parking often become default loading zones



Crossing Islands

- Ability to cross the street in two stages
- Only requires a gap in traffic from one direction at a time
- Zig-Zag Crossing Provide Room for Multiple Bicycles, Trailers and Tandems
- Lighting is key





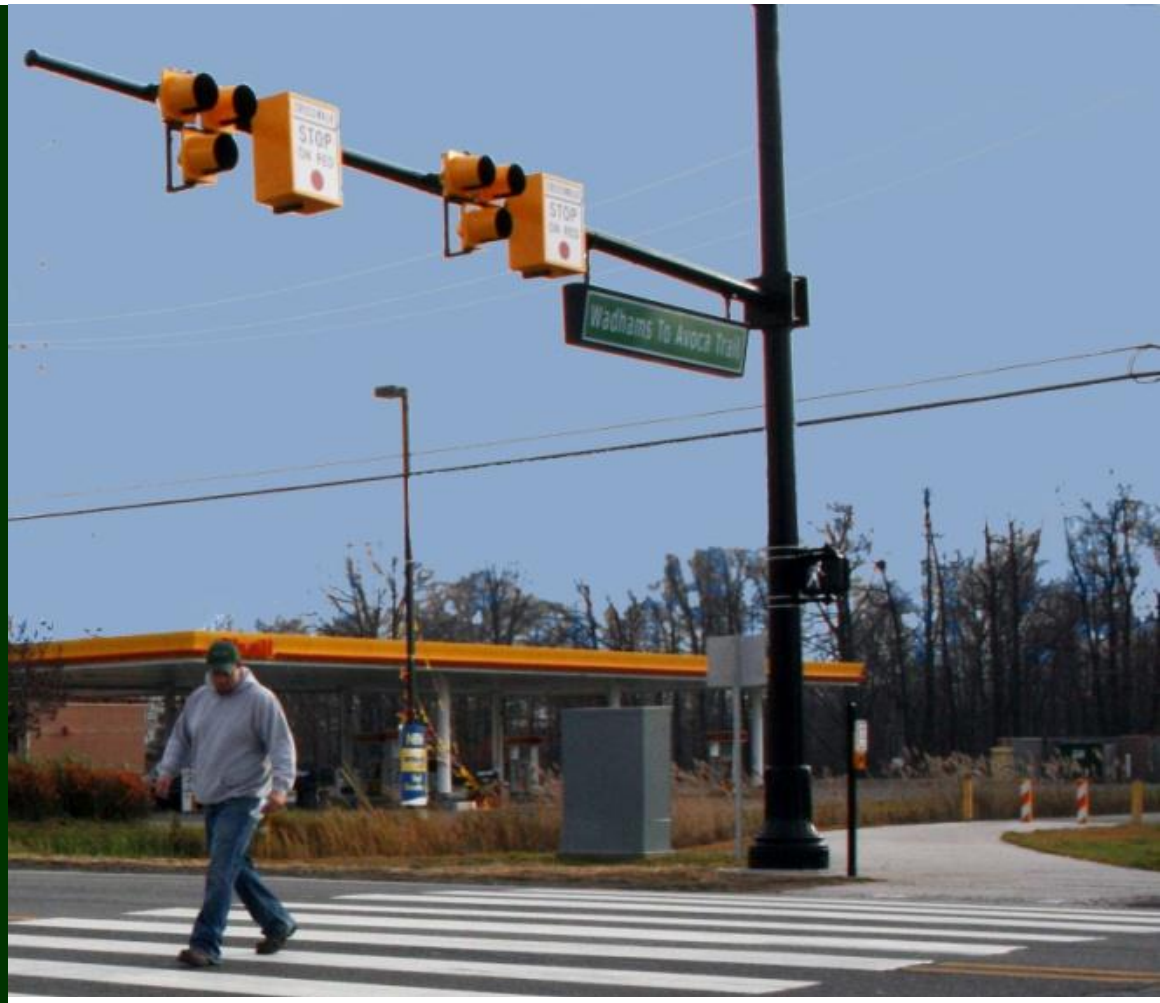
Rectangular Rapid Flash Beacon

- High intensity LED flashers that are paired with crosswalk signs to get motorists attention when the crosswalk is in use
- Push-button or passively activated (automatic detection)
- Can be linked to advanced warning signs with LED flashers
- Can be used in conjunction with crossing islands

Most important aspect is that the flashers are only on when someone is about to or is crossing the road

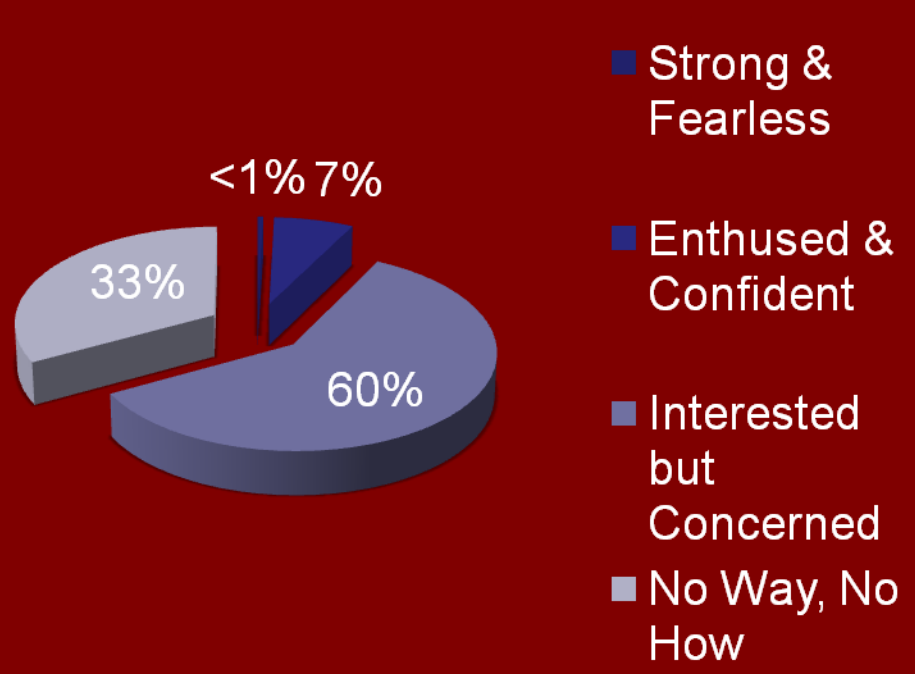
Pedestrian Hybrid Beacon

- Good for locations where crossing islands are not practical or feasible
- Evaluation of 21 locations found a 69% reduction in pedestrian crashes after installation
- Minimal delay to motorized vehicles



Different Types of Bicyclists

- Strong & Fearless
  - <1%
  - Always Biking
  - Any Road Regardless of Condition
- Enthused & Confident
  - 7%
  - Frequently Bike
  - Like Designated Facilities Such As Bike Lanes
- Interested but Concerned
  - 60%
  - Occasional Rider
  - Local Roads and Trails
- No Way, No How
  - 33%

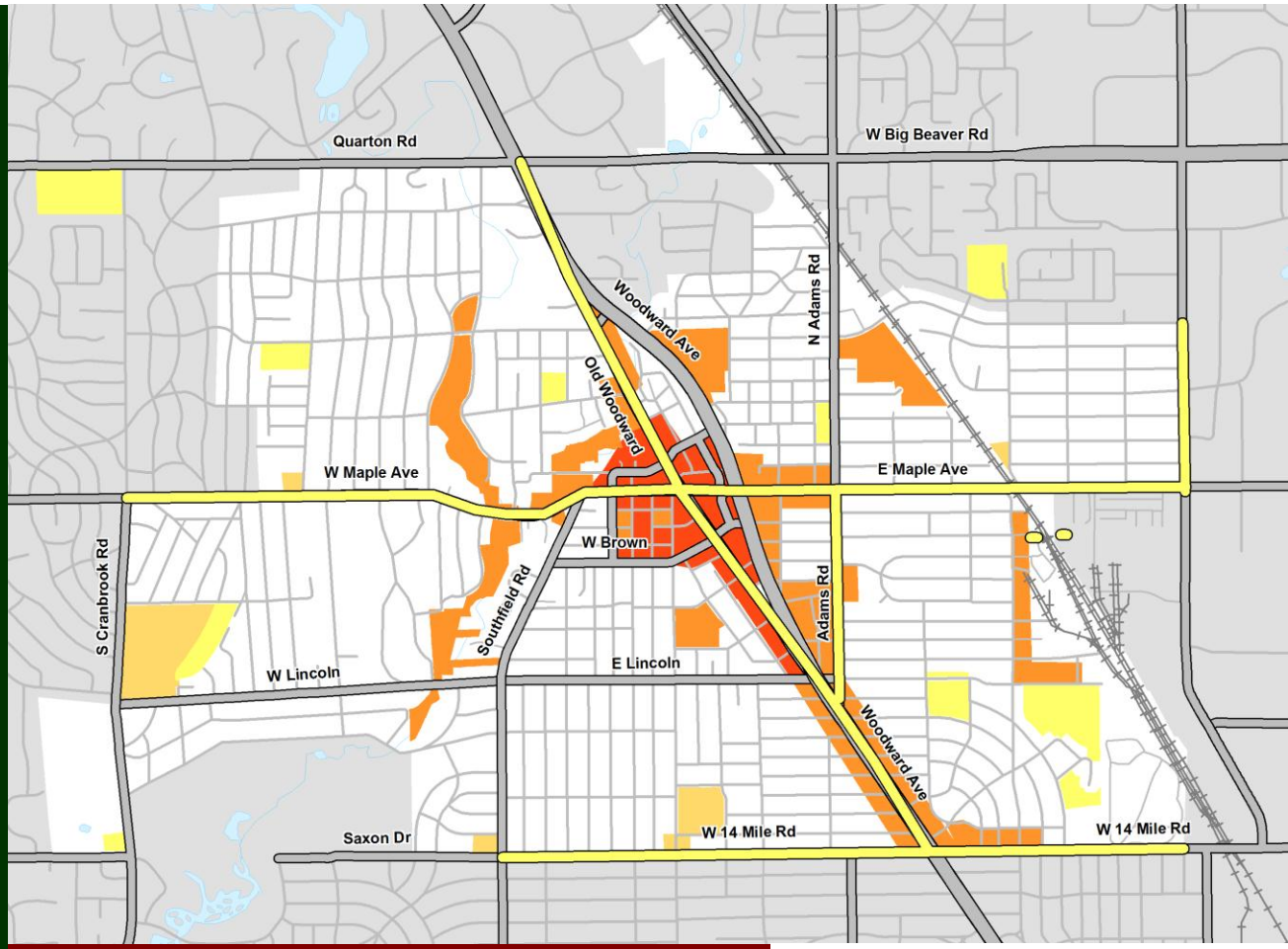


Not Really This Clear Cut. There Is Movement Between the Groups.

Web Survey – Current Biking Destinations

Participants were asked to identify where they currently bike to:

- Downtown
- Shain Park



- Not as many existing bicycling trips as walking trips
- Similar pattern as existing walking trips

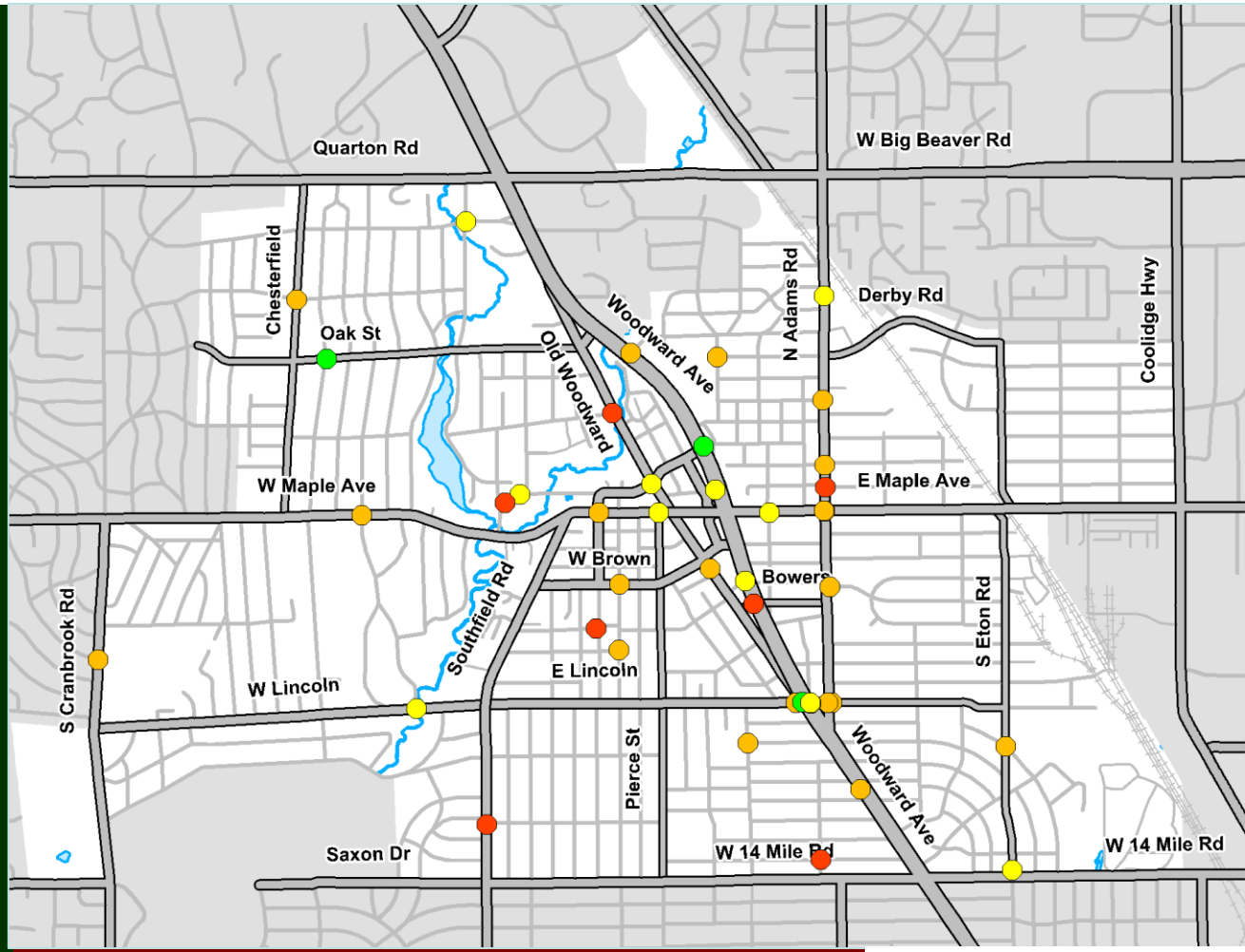
Survey Results

(# of survey participants who currently bike)

- Over 200
- 100 to 200
- 50 to 100
- 25 to 50
- Less than 25

Bicycle Crashes

- 44 pedestrian crashes in 8 year period
- Summer months had highest number of crashes
- 93% of crashes took place in daylight, 2% at dust and 4% in the dark
- Wet, snowy or icy roads were a factor in 7% of the crashes
- 34% of crashes occurred where traffic control was not present



- 0 fatalities
- 7 crashes resulted in serious injuries

Bicycle Crashes
(worst injury in accident)

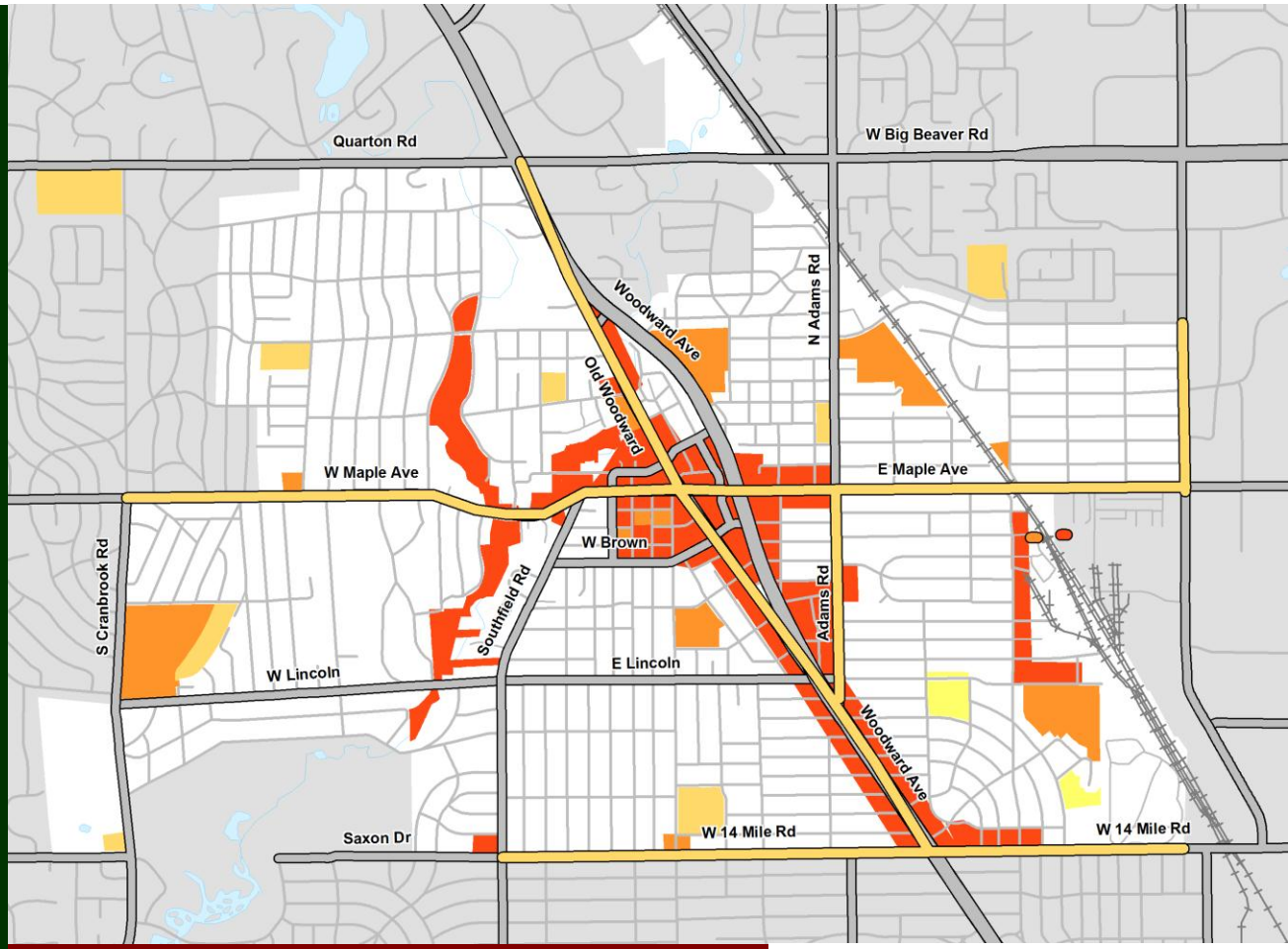
- Fatal
- A - Incapacitating Injury
- B - Nonincapacitating Injury
- C - Possible Injury
- No Injury

Web Survey – Potential Biking Destinations

Participants were asked to identify where they would like to bike to if safe and comfortable facilities were available

The following destinations have potential for the most growth:

- Rail District
- Downtown Birmingham
- North Old Woodward Commercial Areas
- Rouge Park Trails
- Triangle District
- Baldwin Public Library
- Woodward Commercial South of Lincoln
- Future Amtrak Station



- Generally a higher number of potential bicycling trips than potential walking trips

Survey Results

(# of survey participants who would like to bike

- Over 200
- 100 to 200
- 50 to 100
- 25 to 50
- Less than 25

Bike Lanes

- Motorists and bicyclists have designated lanes
  - Better traffic flow than same road without bike lanes
- Delineated by solid white stripe, bike icon pavement markings and signs
- 5’ minimum width, increase width as speeds and traffic volumes increase

Web Survey Results:

57.2% of respondents would be comfortable riding a bike lanes on a Minor Road

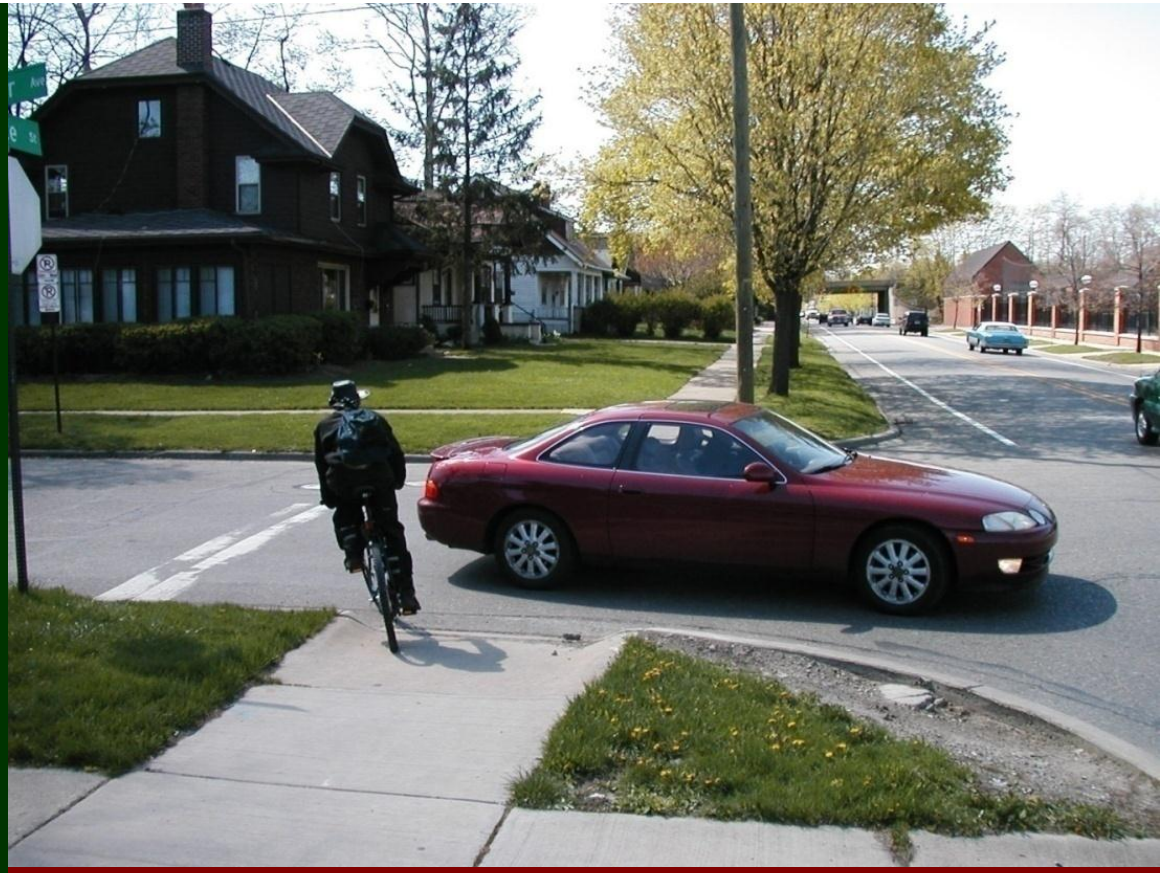
29.2% would be comfortable riding a bike in a bike lane on a Major Road

Target Audience: “Enthused and Confident” Bicyclists

Context: Used on Primary Roads in urban and suburban areas

Sidewalk/Roadside Pathways vs. Bike Lanes

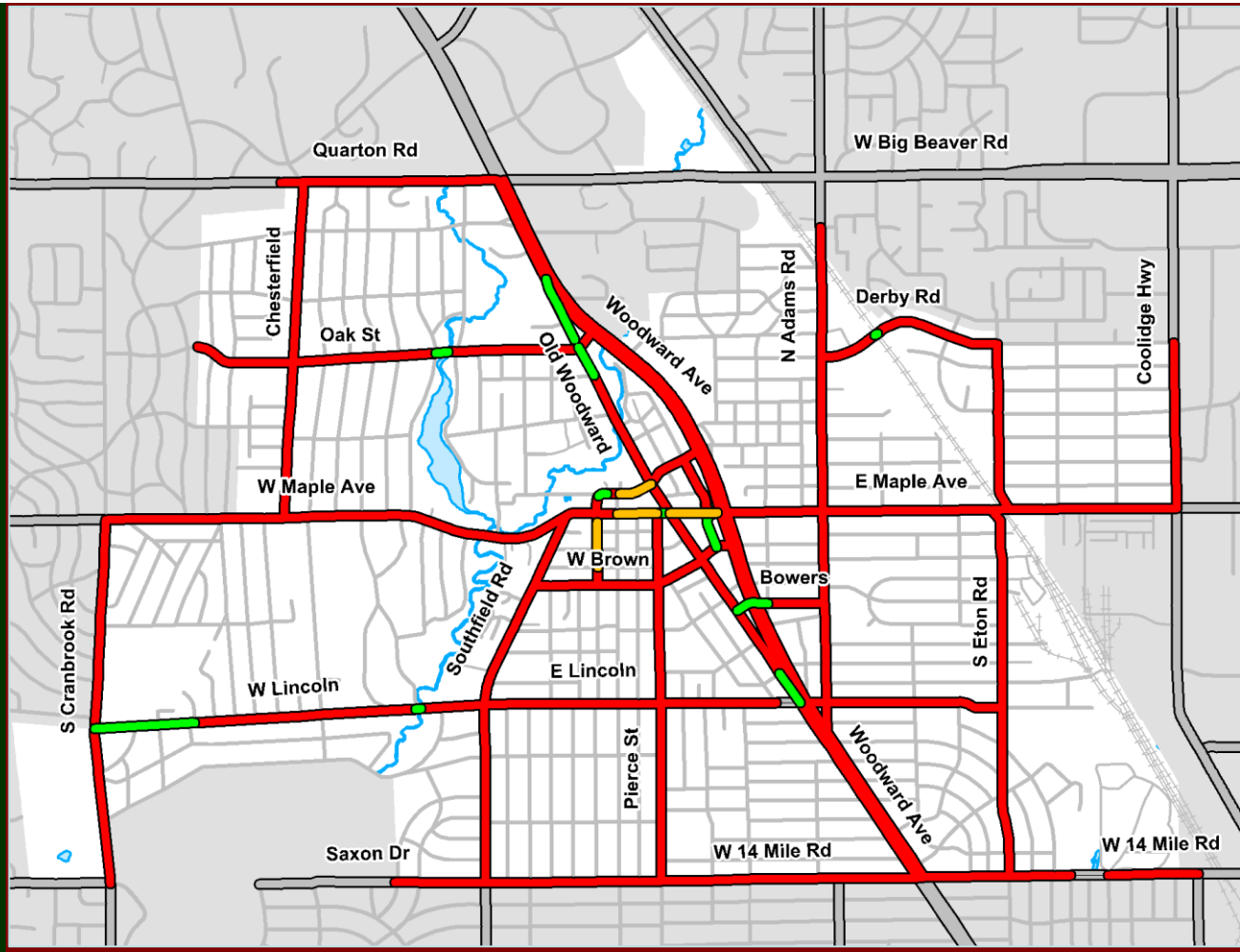
- Motorists are not looking for bicyclists on sidewalks or roadside paths especially when they are bicycling opposite the flow of traffic
- Bicycling on the sidewalk is generally slower and more inconvenient than bicycling on the roadway.
  - the presence of pedestrians
  - motorists that block the sidewalk or crosswalk.



Bike lanes are the current best practice for primary roads to reduce the number of crashes involving motorists and bicyclists

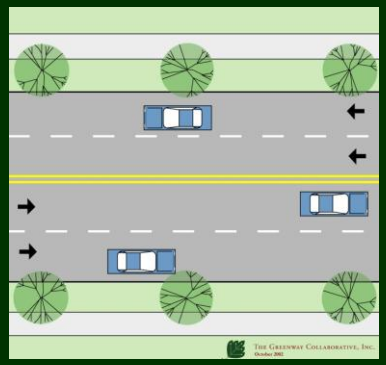
Potential Bike Lanes through Lane Narrowing

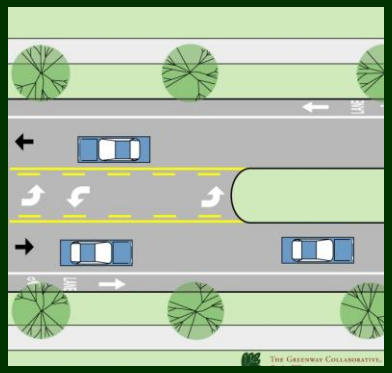
- Very Limited Potential

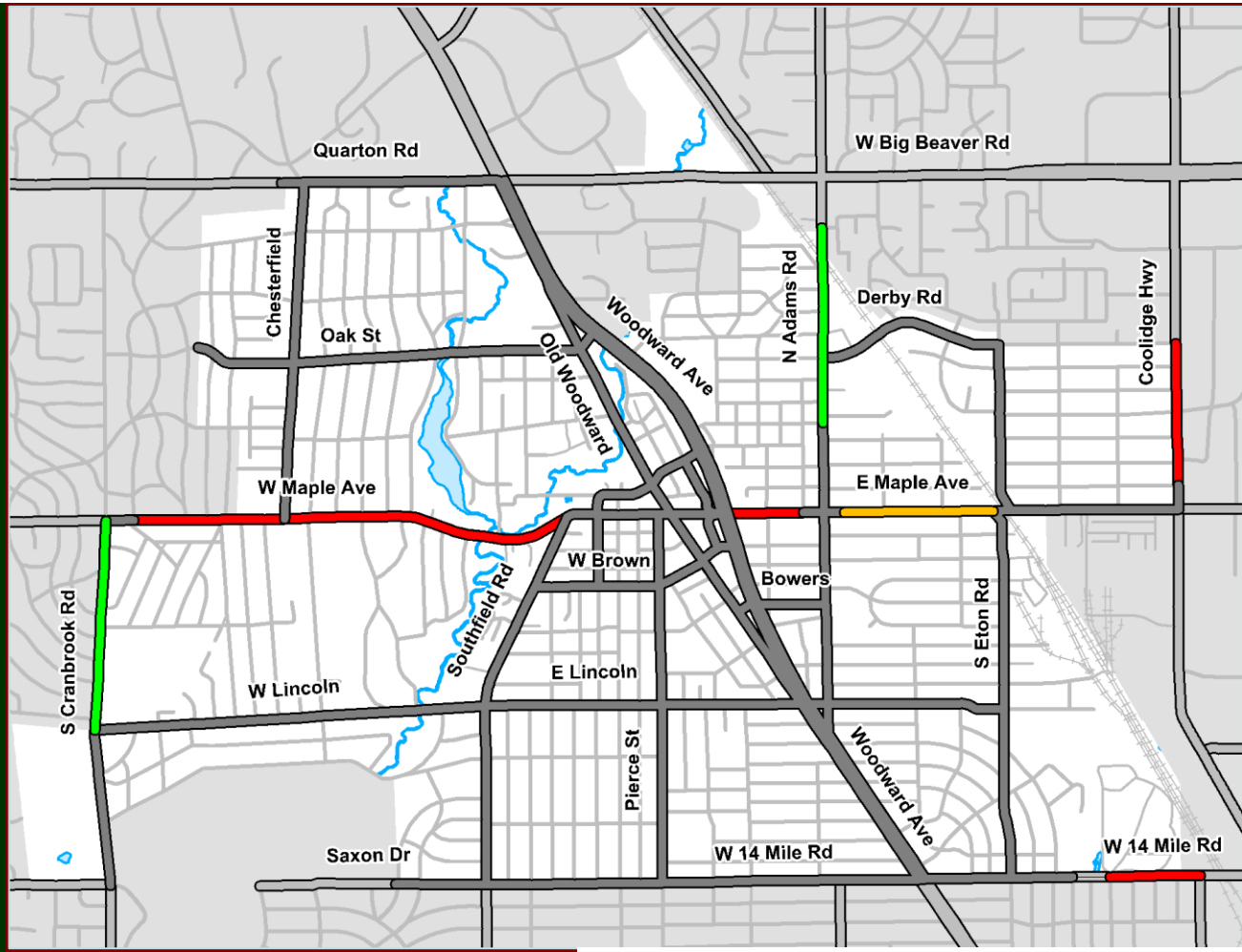


Potential Bike Lanes through 4 to 3 Lane Conversion

- High Potential on Adams Road & Cranbrook Road
- Marginal Potential on E Maple Ave between Adams and Eton





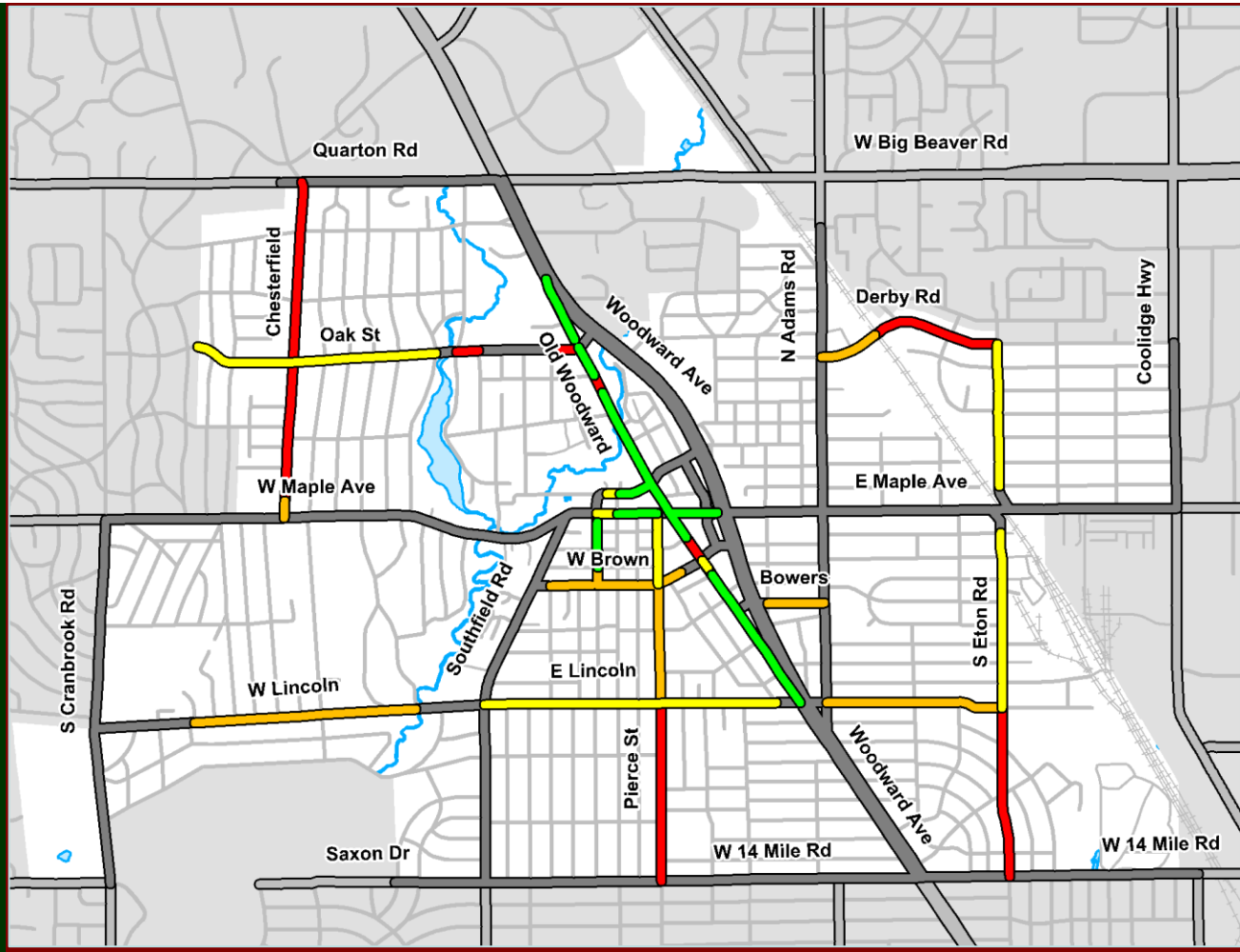


Bike Lane Potential through 4 to 3 Lane Conversion

- High Potential (Less than 15,000 ADT)
- Moderate Potential (15,000 to 17,500 ADT)
- Marginal Potential (17,500 to 20,000 ADT)
- Low Potential (Greater than 20,000 ADT)
- Not Applicable

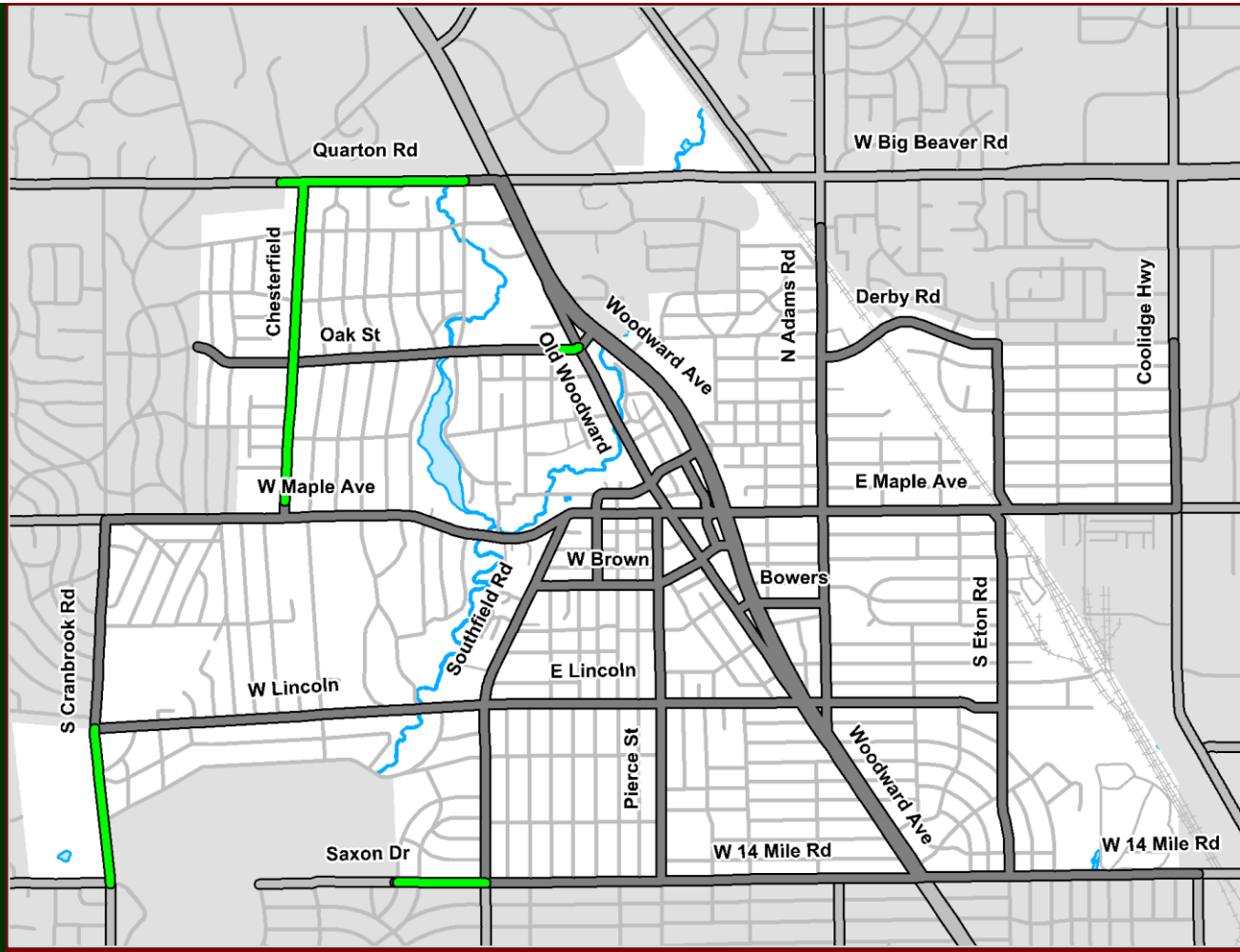
Potential Bike Lanes by Rearranging Parking

- High Potential on Old Woodward, however parking would have to be changed to Back-in Angled Parking
- 50% loss of parking on parts of Lincoln, Eton and Oak
  - Will look at this issue as part of workshop



Potential Bike Lanes by Paving the Shoulder

- Potential along Cranbrook Road, Chesterfield Road, Quarton Road, Saxon Drive and part of Oak Street



Shared Lane Marking

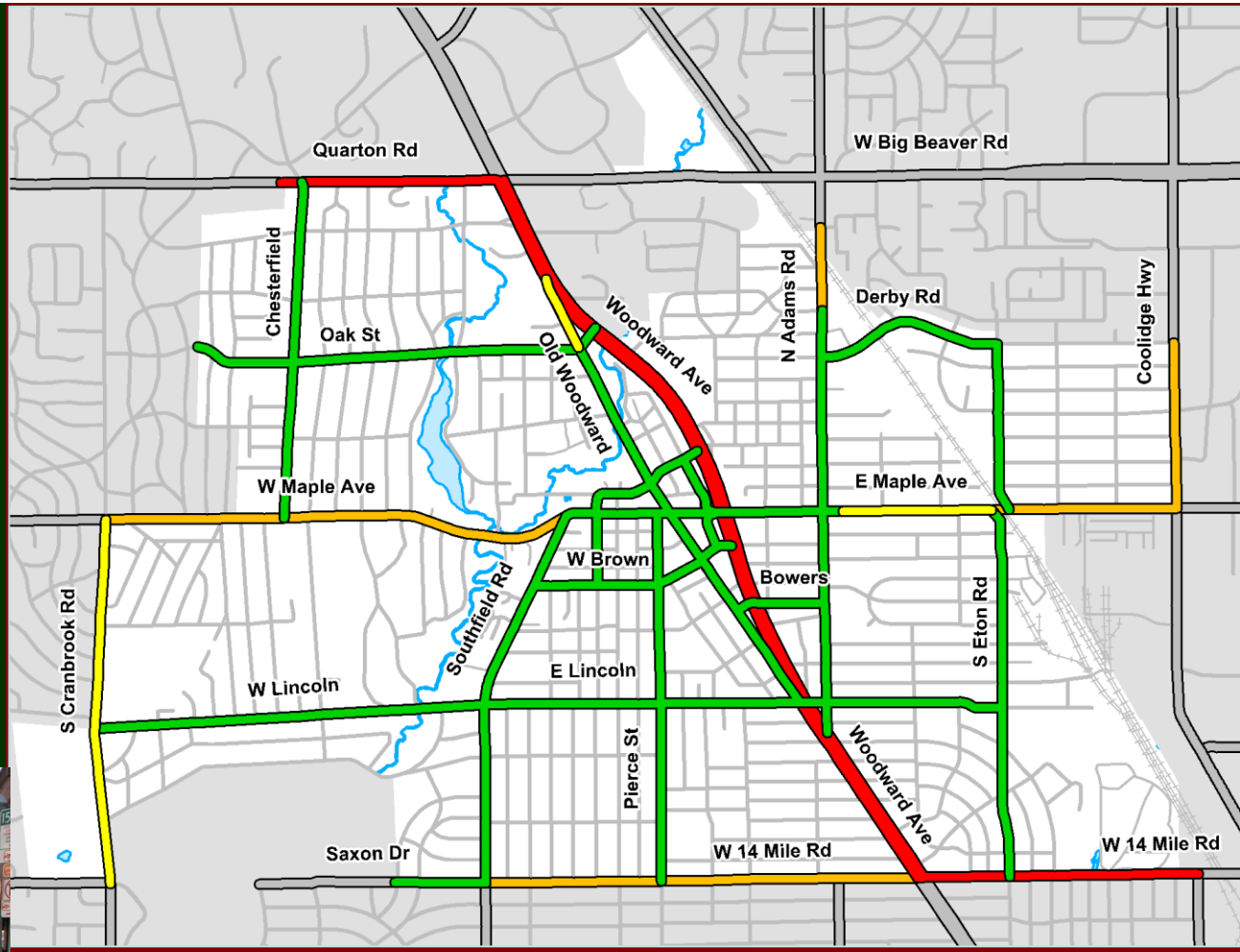
- Used where a bike lane is not feasible and/or desirable
- Indicated to motorists to expect bicycles
- Indicates to bicyclists to:
  - Ride with traffic
  - Ride a safe distance away from car doors

Target Audience: "Enthused and Confident" Bicyclists

Context: lower speed roads typically in downtown areas with on-street parking

Potential for Shared Lane Markings

- Majority of the roads have potential for Shared Lane markings



- Shared Lane Markings are generally used where a bike lane is not feasible and/or desirable
- They work especially well in downtown areas where on-street parking is present

Shared Lane Markings

- 25 mph
- 30 mph
- 35 mph
- Greater than 35 mph

Roadside Pathways

- A shared-use path separate from the road but still within a road ROW
- Issues include:
  - Conflicts with motorists at intersecting driveways and roadways
  - Pedestrian / bike conflicts
  - Getting to destinations on other side of the road
  - Transitions to on-road facilities

Target bicyclists: “Interested but concerned”

Context: used along primary roads in areas with limited vehicular conflict points

Cycle Tracks

- Bicycles are physically separated from motorists and pedestrians mid-block
- Can be one-way or two-way
- Various approaches to addressing intersections

Used extensively in Europe and growing number of examples in the US

Generally safer mid-block, more dangerous at intersections

Web Survey Results:
73.8% would be comfortable riding a bike on a Cycle Track

Bike Routes

- Signs provide wayfinding to key destinations using routes appropriate for most bicyclists
- Often provide a low traffic alternate route to a major road
- Help to identify routes that may not be obvious

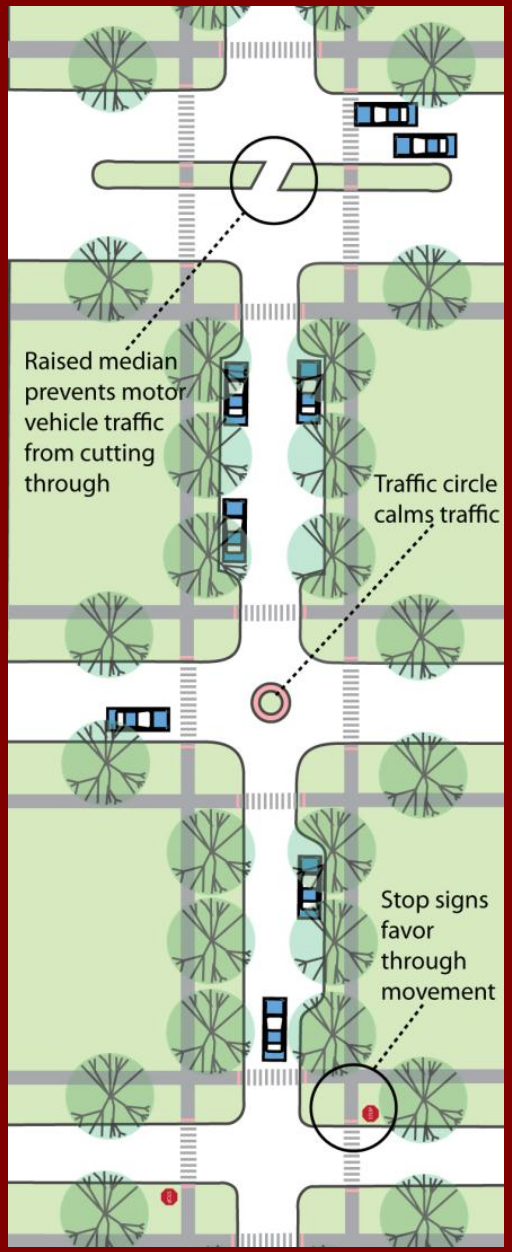
Target bicyclist: "Interested but concerned"

Context: generally used on local residential roads and rural routes with moderate speed and traffic volumes.

Web Survey Results:
73.9% would be comfortable riding a bike on a Local Bike Route on a residential road

Neighborhood Connectors

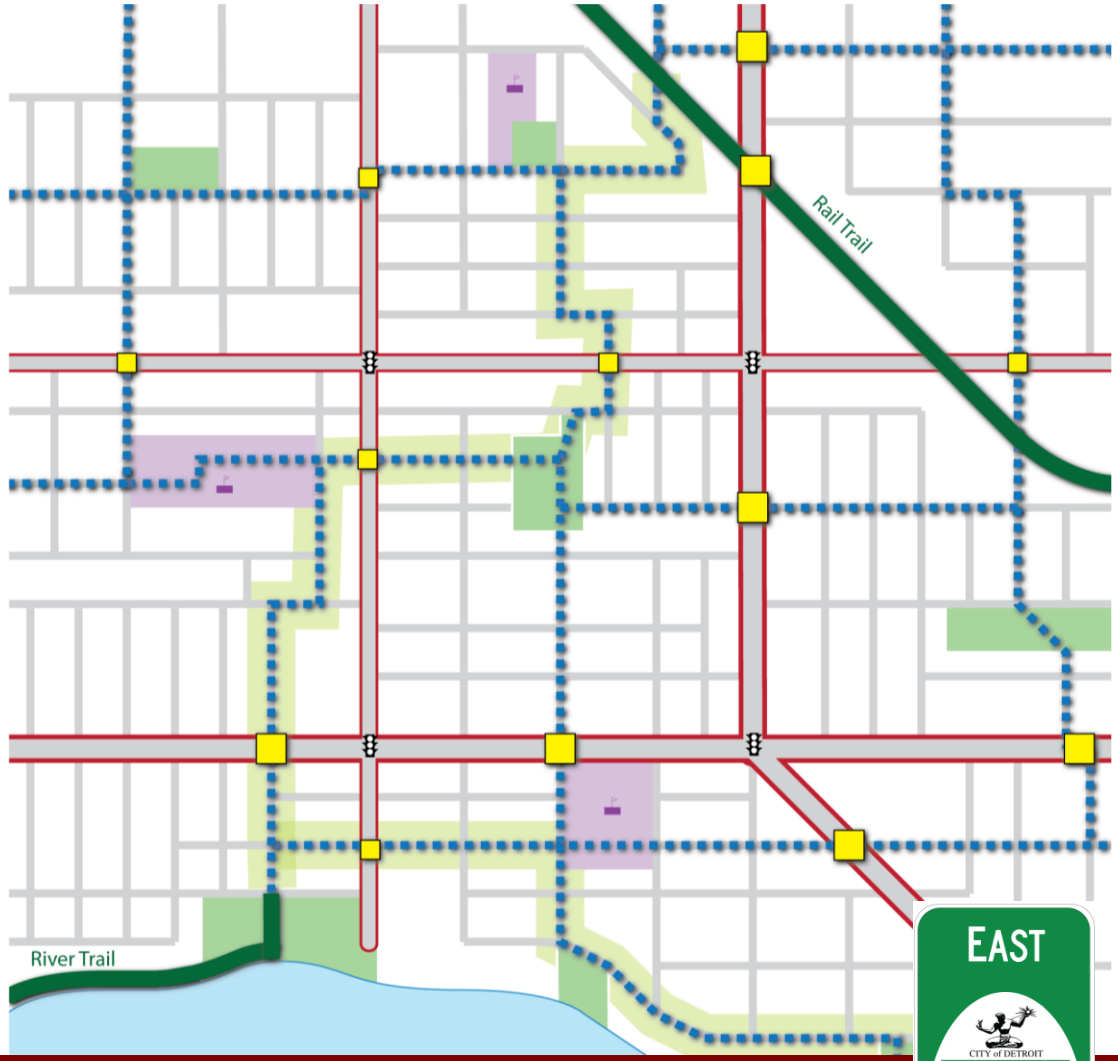
- Signed as bike routes
- AKA Bicycle & Pedestrian Boulevards
- Primarily on low speed, low traffic volume local roads with connecting pathways
- Traffic calming as necessary
- Often provide alternate route to a major road



Target audience: "Interested but Concerned" bicyclists

Neighborhood Connector System

- Provide good crosswalks at major roadway intersections
- Great for Safe Routes to Schools
- Some routes may be enhanced to become urban greenways
- Coordinate with transit stops

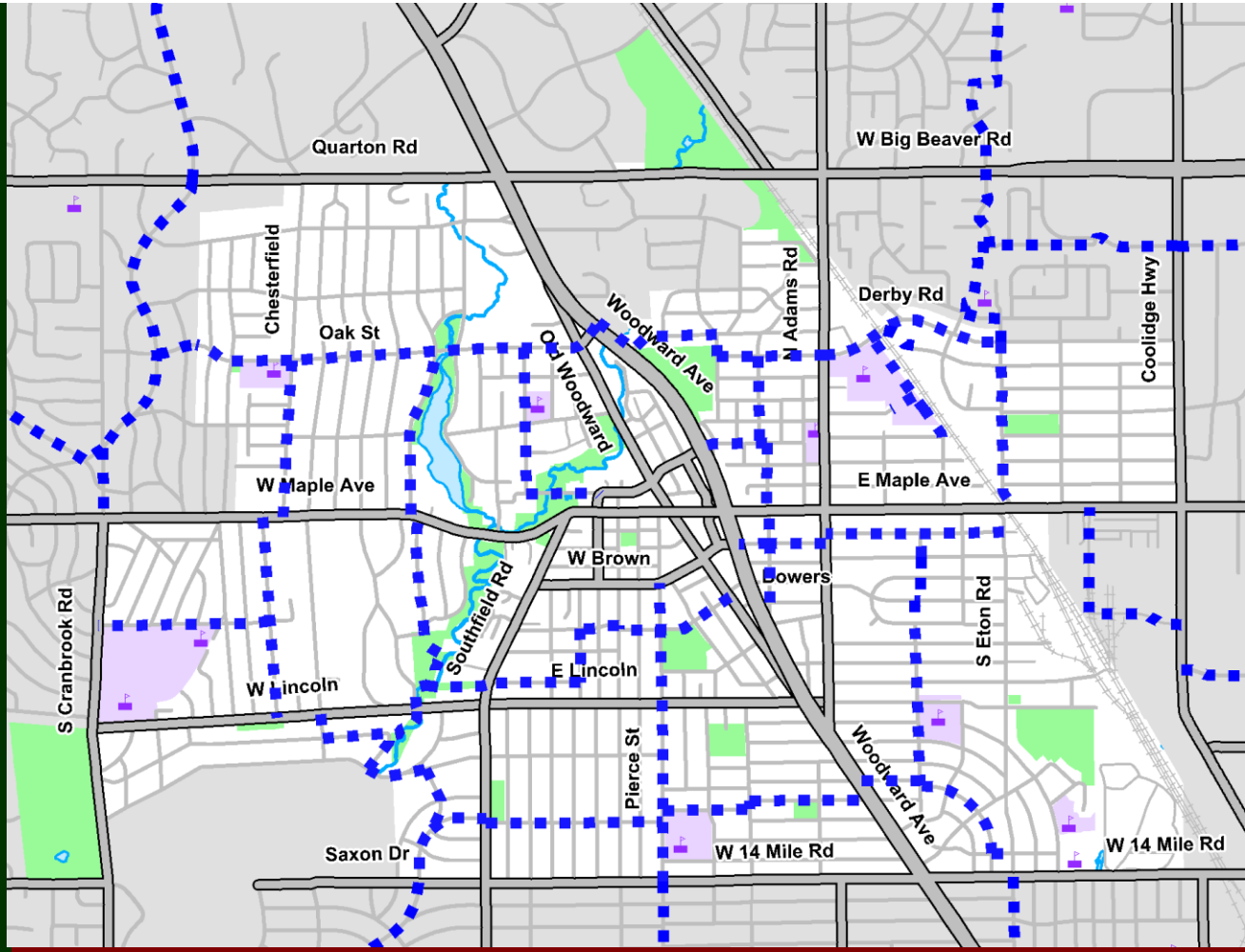


Legend:

Signalized Intesection	Local Road
School	Primary Road
Crossing Improvement	Complete Street
Park & Recreation Areas	Off-Road Trail
School Property	Neighborhood Connector
Water	Neighborhood Greenway

Neighborhood Connector Map

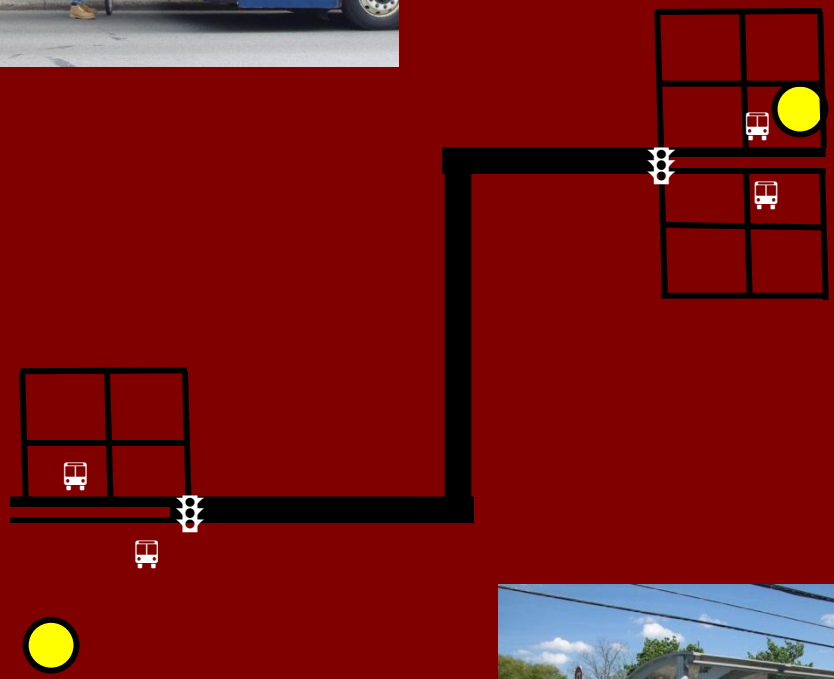
- Potential Routes through Birmingham
- Alternatives to the major roadways
- Need to provide safe road crossings



Transit Users – The First and Last Mile

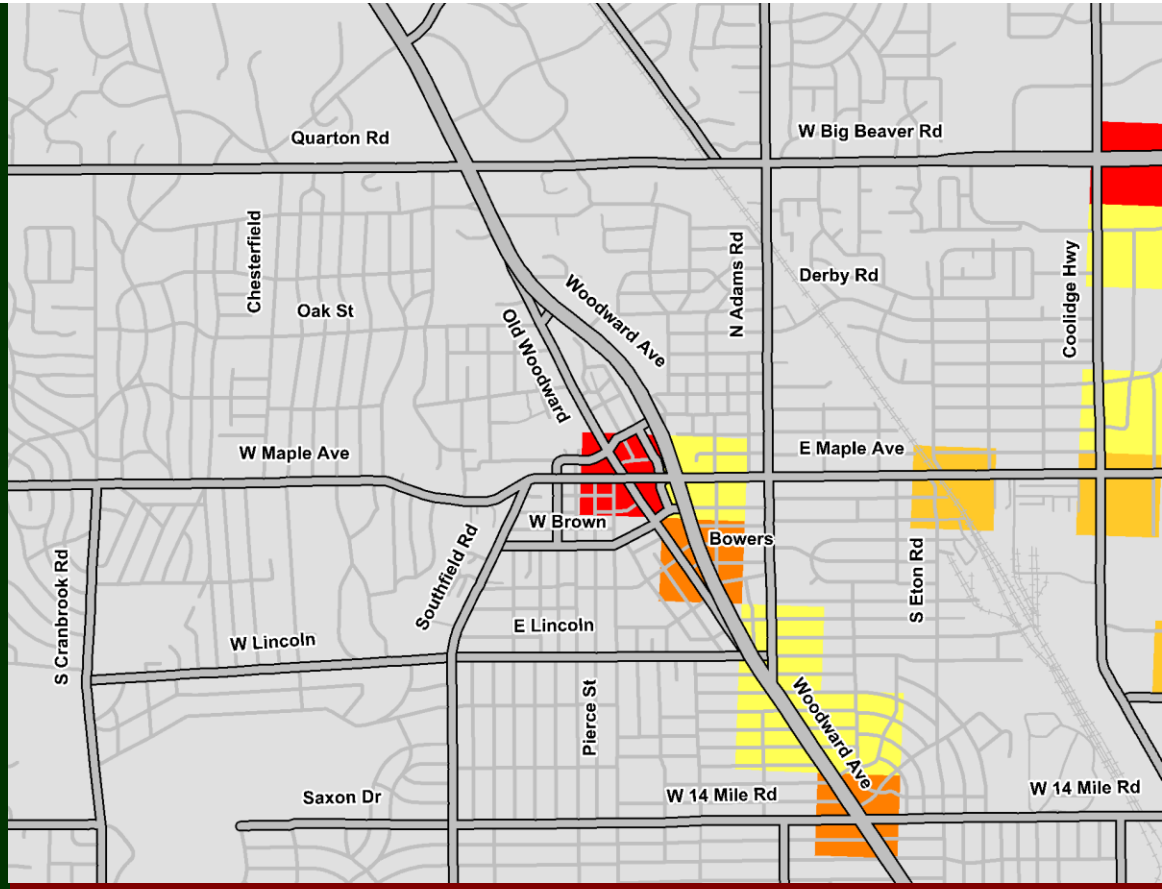
Effective draw area of a transit stop is determined by a number of factors:

- Mode, walking vs. bike
- Quality of the transit stop (especially with long headways)
  - Shelter
  - Benches
- Facilities leading to the stop
- Adjacent amenities
  - Trip chaining
- Ability to cross the road



Existing Public Transit Use

- SMART Bus
- Amtrak
- Downtown & Woodward south of Maple produce the most transit activity



Web Survey Results:
Walking is the primary mode of transportation for traveling to and from the bus stop for the majority (80%) of respondents who currently ride the bus

The city was divided into a grid and ¼ Mile Cell is used

Transit Activity
(total daily on and off per cell)

- 200 and over
- 100 to 200
- 50 to 100
- 20 to 50
- 0 to 20

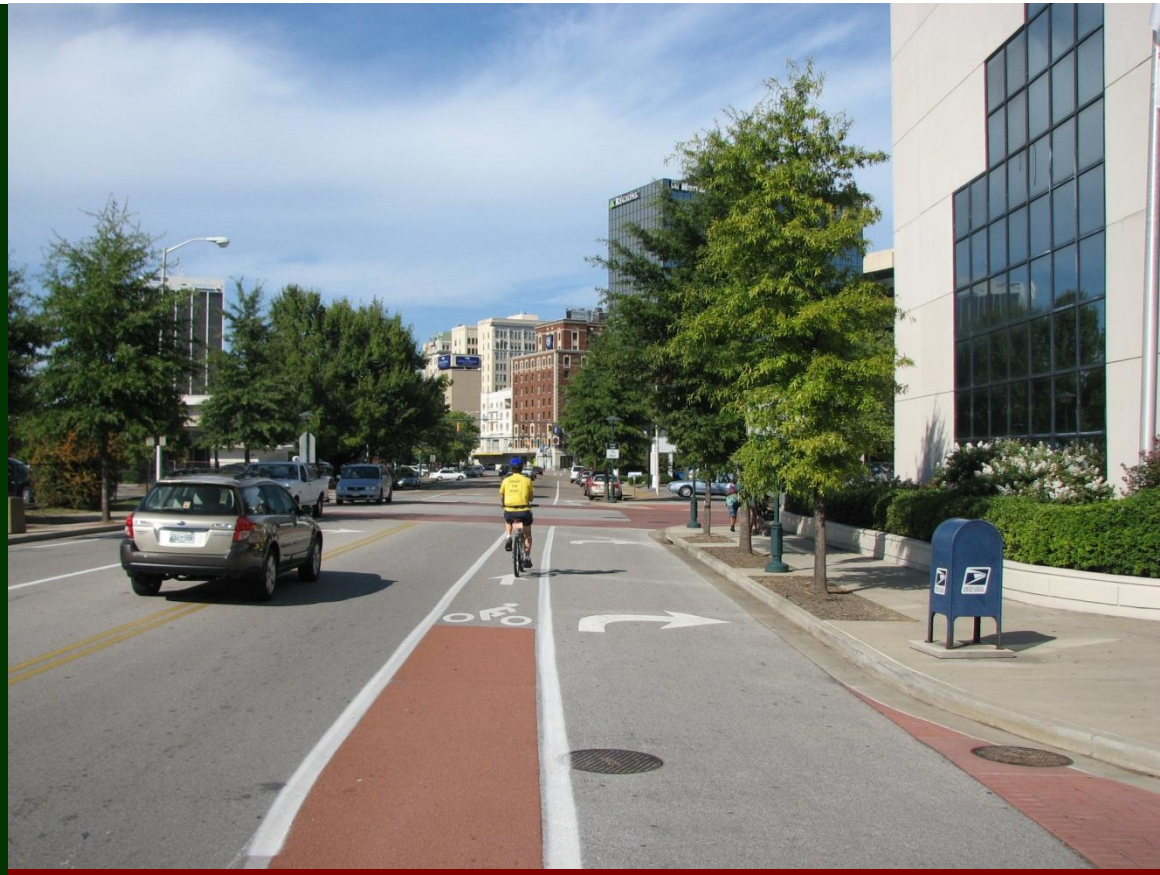
Motorists

- Level of service is determined by freedom of movement
  - Pedestrians, bicyclists and buses tend to get in motorist's way
- A lot of information needs to be processed very quickly – focus is on the immediate threats and opportunities
  - Signs have limited effectiveness
- Travel speed is determined by roadway characteristics

Motorists are much further removed from the environment and have a greater degree of anonymity than pedestrians and bicyclists

Balancing Conflicting Needs

- Solved at the system level – individual streets may favor one mode over another
- There are many networks within a network depending on one's perspective
- Need to recognize that there are inherent conflicts
  - e.g. buses like wide turning radii – their customers do not

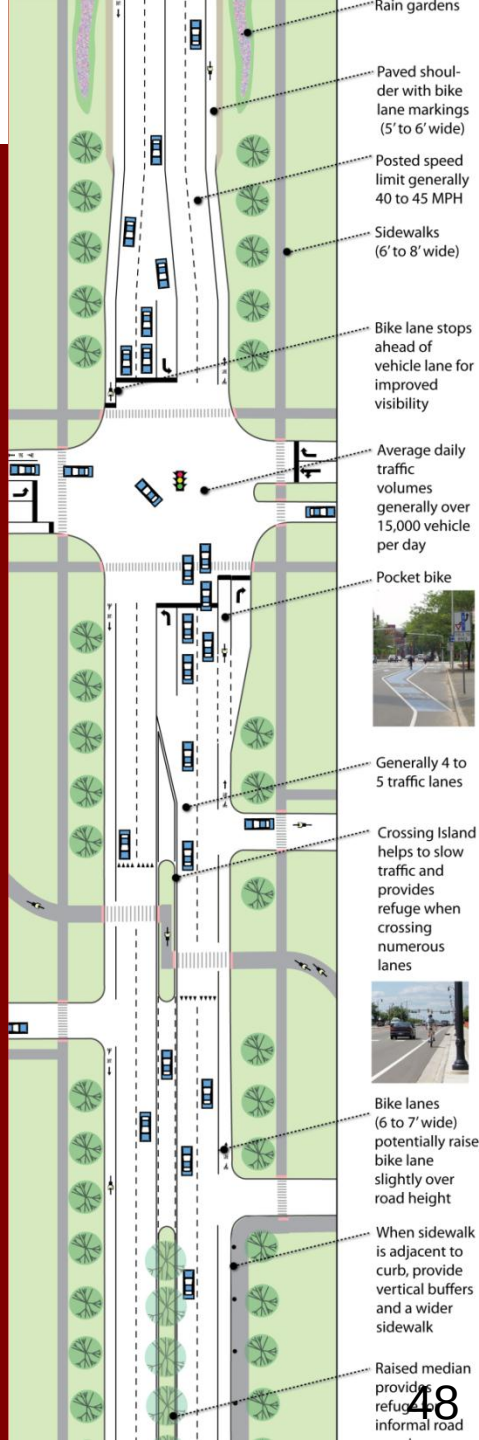


Key to balancing corridors is increasing the understanding of the issues from all users perspective

Need to see people, not modes

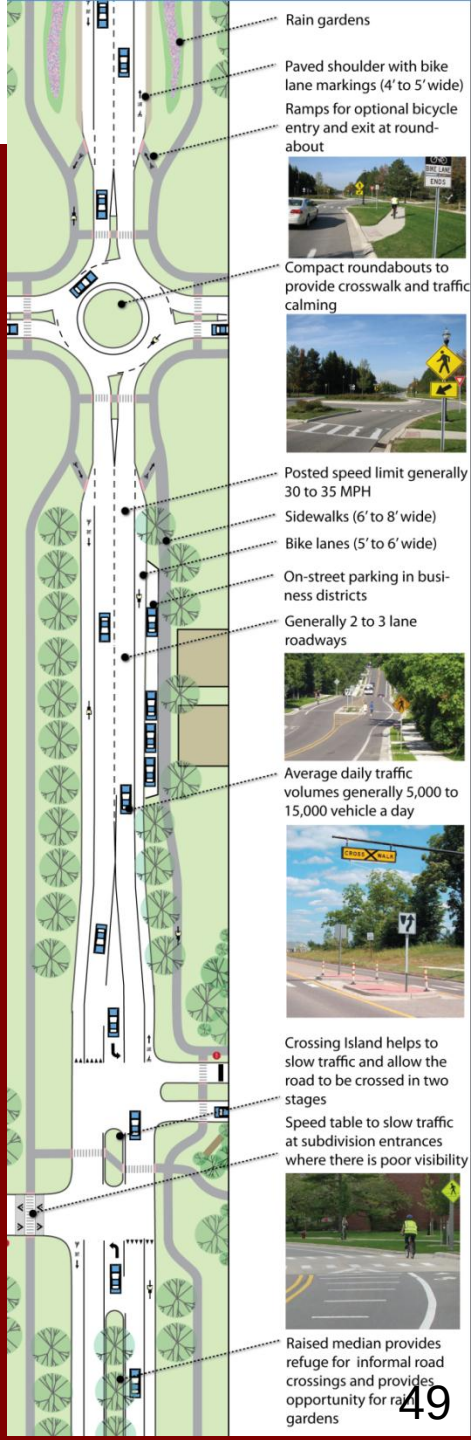
Humanize Busy Streets

- Recognize that some roads in the City need to carry large volumes of motor vehicle traffic
- Even for these roads provide non-motorized users commuting to work or shopping the ability to safety move along or across the roadway



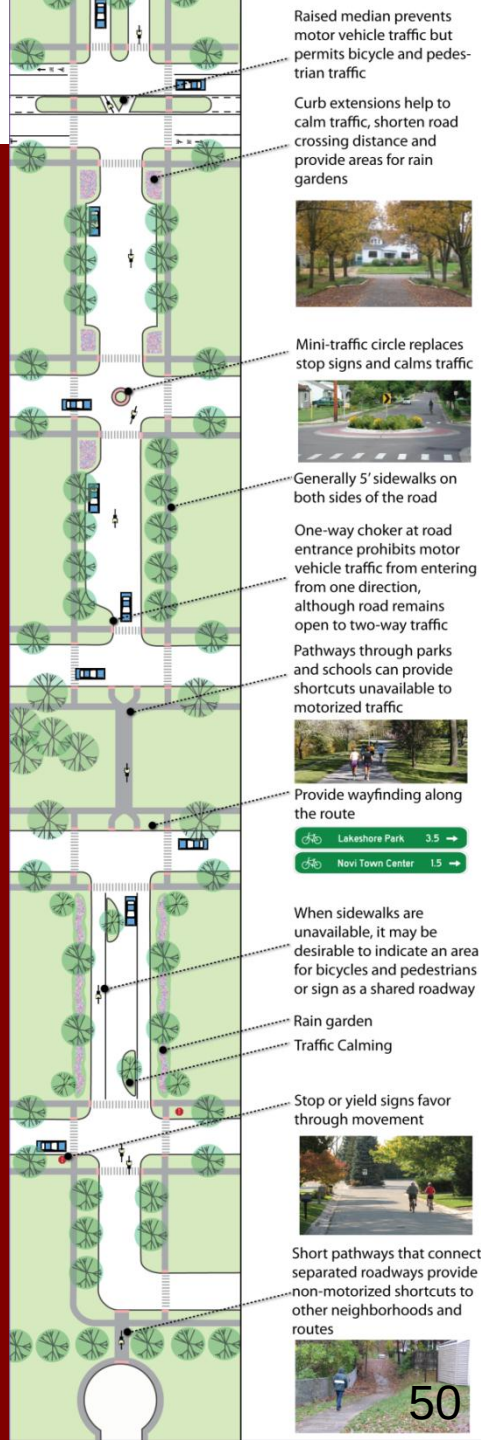
Balance Less Busy Roadways

- Sometimes the emphasis should be placed on the needs of the non-motorized users
  - Numerous mid-block crossings
  - Mini-roundabouts
  - Bike lanes
- Designed such that motorists will naturally driving 30 to 35 MPH
- Establish comfortable roads to walk or bike along



Provide Bike & Ped. Priority Routes

- Provide connections to key destinations using local roads and connecting pathways
- Provide wayfinding improvements to help people navigate what can be confusing routes
- Make improvements to the routes to make them more bicycle and pedestrian friendly

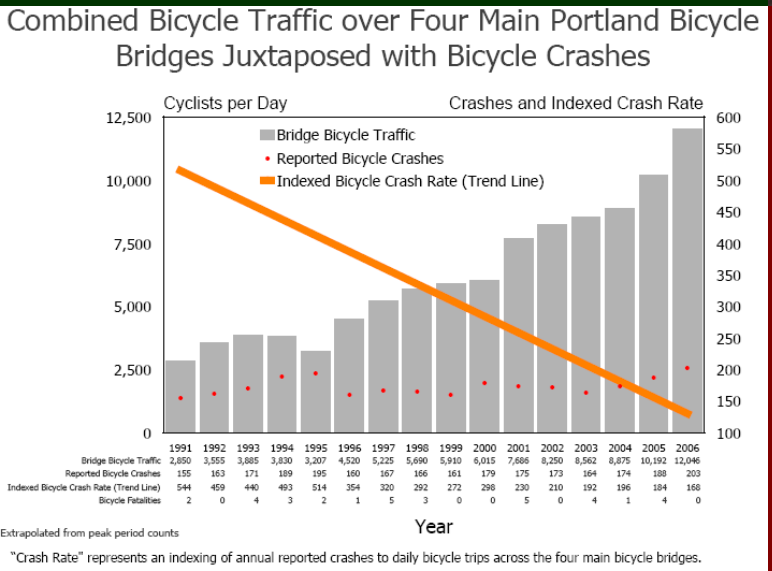


Other Factors

Key issues that influence pedestrians, bicyclist and transit use

Safety in Numbers

- The most effective way to increase the safety of pedestrians and bicyclists is to increase the number of pedestrians and bicyclists



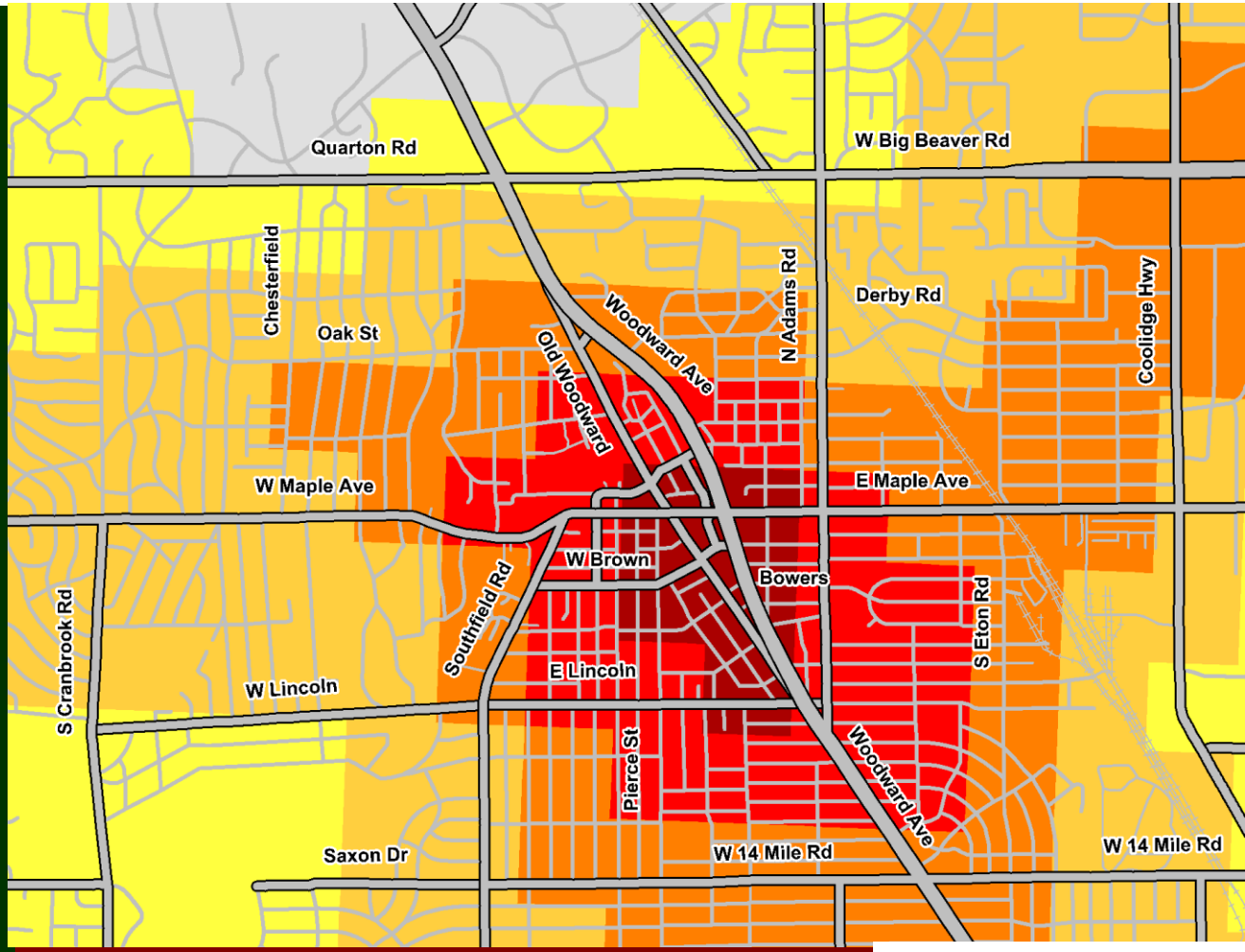
Dangerous designs and situations may be off-set by expectations of encountering bicyclists and pedestrians

Less frequent use needs more visible facilities to increase motorist's awareness

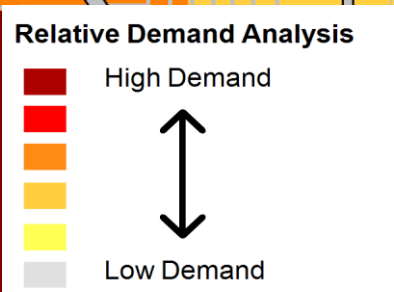
Relative Demand

Looking beyond facilities, the following factors have been shown to correlate with pedestrian and bicycle use

- Population density
- Land use diversity
- Activity generators
- Transit activity
- Connectivity
- Employment centers



- Demand is determined by adding up the six demand model components and then an inverse distance weighting calculation is performed where the value of all cells within 1.5 miles is used



City Birmingham Comprehensive Multi-Modal Transportation Plan

Vision, Goals & Objectives

The Greenway Collaborative, Inc.

Toole Design Group

Draft Goals and Objectives

- The purpose is to guide the development of the plan
- Drawn from Web Survey responses
  - 429 responses
- Revised by the Project Steering Committee

VISION:

A broad statement of what the plan is to accomplish

- Picture of the preferred future
- Economically phrased

GOALS:

Broad, long-term aims that define accomplishments of the vision

- Define ideal states to be achieved at some unidentified future time
- Guide everyday decisions and actions
- Do not necessarily deal with measureable results
- Target: 3 Goals

OBJECTIVES:

Specific, quantifiable, realistic targets that measure the accomplishment of a goal

- Be specific, what is to be achieved?
- Focuses on milestones and targets
- Make sure the objectives are relevant to the goal and vision
- May be changed when necessary for progress towards goals
- Target: 2 to 5 Objectives per Goal

Draft Vision and Goals and Objectives

Vision

The City of Birmingham seeks to build upon its brand as a walkable community. The purpose of this plan is to provide a document that the community may reference when contemplating future actions regarding infrastructure, policies and programs.

It is envisioned that this plan will guide improvements designed to give people additional transportation choices, thereby enhancing the quality of life in the City of Birmingham

Goals

1. **Complete the Infrastructure**

   Provide an appropriate balance between motorized and non-motorized methods of transportation.

2. **A Connected Community**

   Create a greater sense of community by improving and increasing the opportunities for social interactions between those walking, bicycling and taking transit.

3. **Inclusive Transportation System**

   Develop a multi-modal system that respects the unique needs of all different users.

Goal 1 – Complete the Infrastructure

Goal

Provide an appropriate balance between motorized and non-motorized methods of transportation.

Objectives:

a) Expand the infrastructure as necessary to create a more pedestrian, bicycle and transit friendly community

b) Provide convenient and appropriate road crossing opportunities for pedestrians and bicyclists

c) Provide additional and enhanced bicycle parking options

d) Enhance transit amenities (e.g. shelters, benches, information resources, etc.) including appropriate pedestrian and bicycle connections to the transit facilities

Goal 2 – A Connected Community

Goal

Create a greater sense of community by improving and increasing the opportunities for social interactions between those walking, bicycling and taking transit.

Objectives:

a) Increase the number people walking, bicycling and taking transit, especially for daily transportation trips such as commuting to work and running errands

b) Increase the number of children walking and bicycling to school

Goal 3 – Inclusive Transportation System

Goal

Develop a multi-modal system that respects the unique needs of all different users

Objectives:

a) Reduce negative and dangerous interactions between motorists, transit users, bicyclists and pedestrians

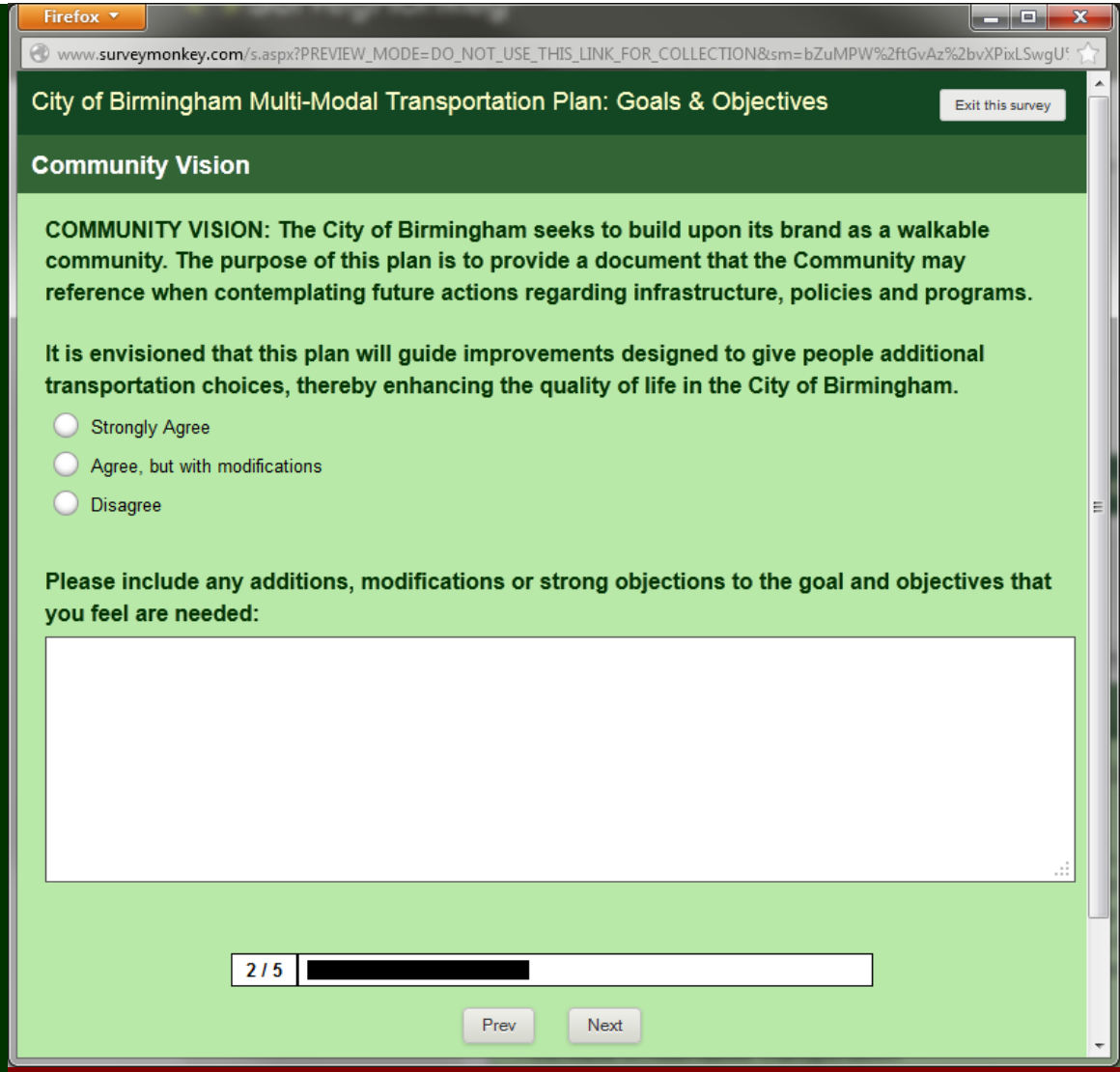
b) Enhance the ability for youth, seniors and persons with physical and/or cognitive challenges to travel throughout the community independently

c) Develop strategies to educate all transportation system users to create an atmosphere of respect among all travelers

Together, the three goals will combine to enhance the safety of the citizens and visitors of Birmingham through appropriate infrastructure, safety in numbers and a greater understanding among all users of the City's transportation system.

Draft Goals and Objectives Input

- A Web Survey will be posted to the project Web Site to collect any remaining comments
- There are paper handouts of the survey available tonight if anyone is interested in filling them out here
- Survey available for one week until next Thursday, January 24



LINK PROVIDED ON PROJECT WEBPAGE AT: WWW.GREENWAYCOLLAB.COM

City Birmingham Comprehensive Multi-Modal Transportation Plan

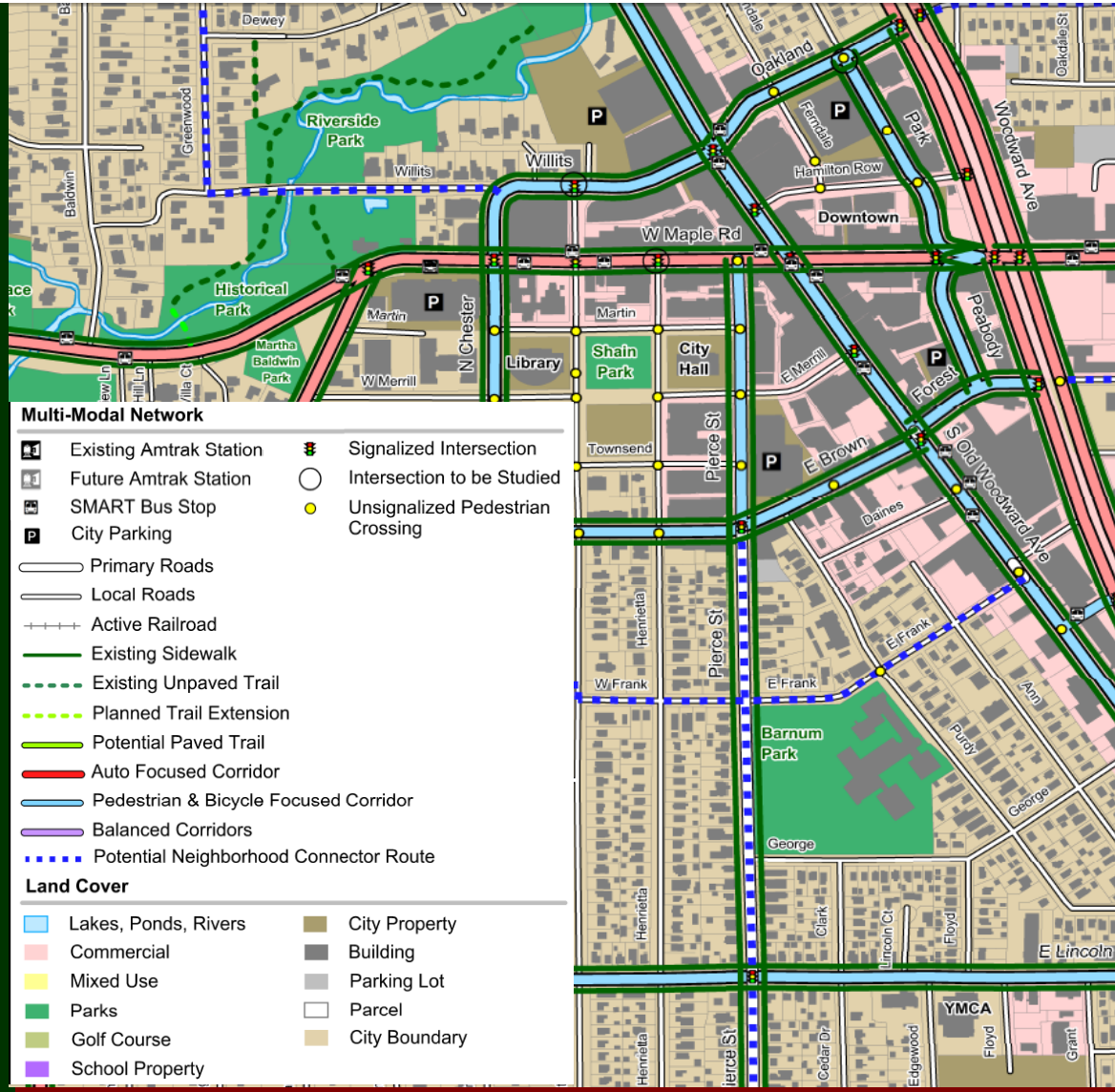
Group Exercises

The Greenway Collaborative, Inc.

Toole Design Group

Group Exercise: Role Playing

- Each group has been given a different character that needs help navigating the multi-modal system in Birmingham
- Determine the route you would take and describe the issues and potential solutions
- At the end of the exercise each group is going to present
- You have 10 minutes for this exercise



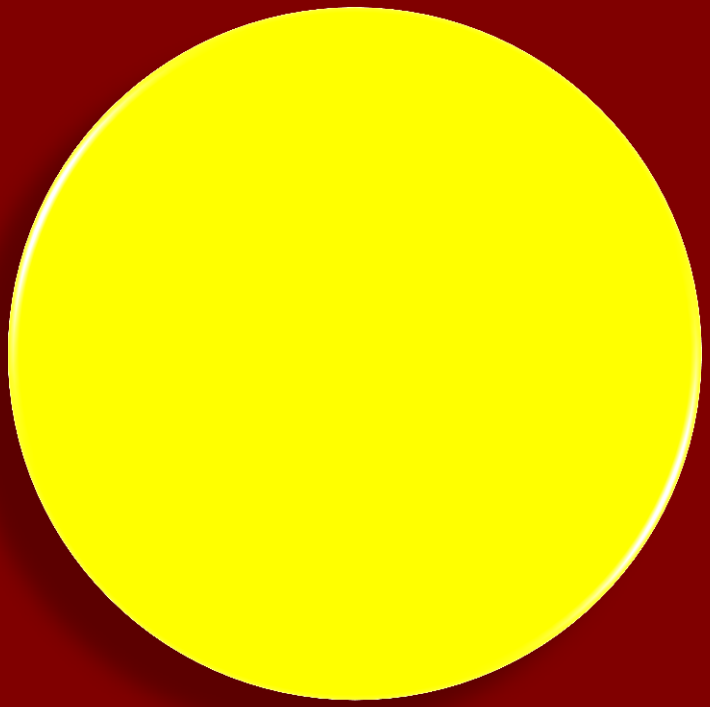
Using the Yellow Marker, Highlight Route on Map.

Group Exercise: Role Playing Report Out

- Choose a spokesperson
- Only one minute
- Read your groups role
- Concisely describe your character's biggest issues

YOU WILL BE CUT OFF AFTER ONE MINUTE

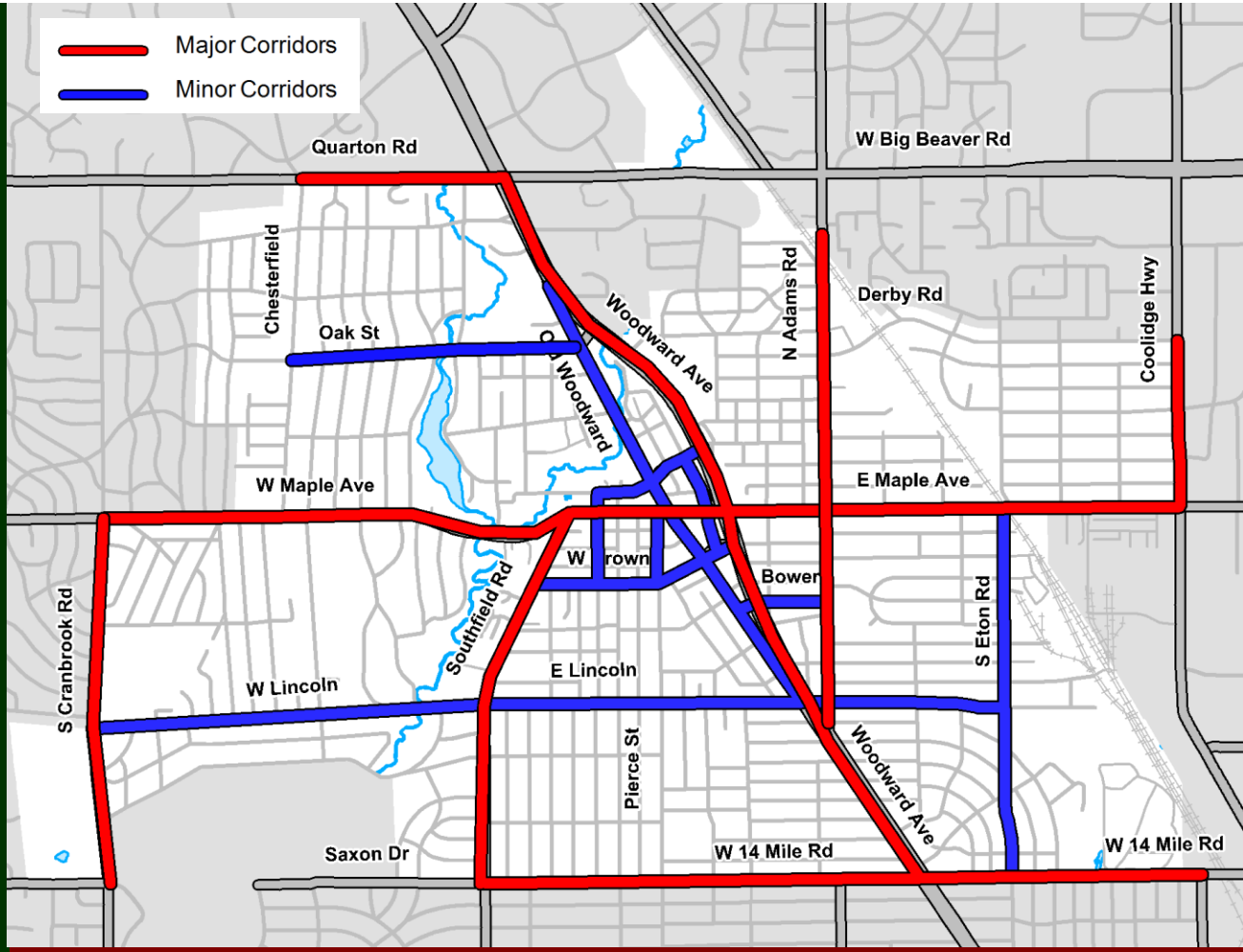
(SORRY)



Circle complete after one minute is up

Corridor Evaluations

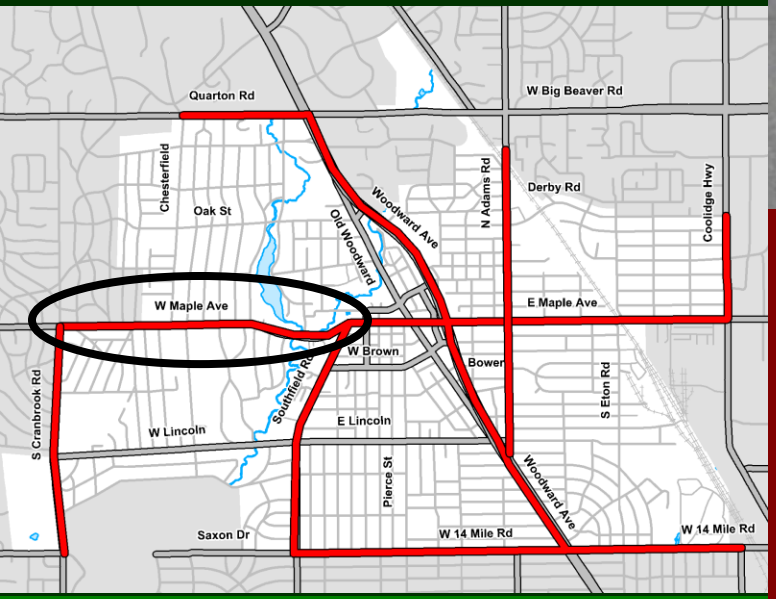
- Divided the roads we would like to look at tonight into two groups
  - Major Corridors
  - Minor Corridors
- We will introduce all of the roads in each category and then ask your opinions on what is most important for each of those roads



Major Corridor: W Maple Ave (West of Southfield Rd)

Issues:

- 4 to 3 lane conversion to add bike lane difficult due to traffic volume
- Distance between crosswalks



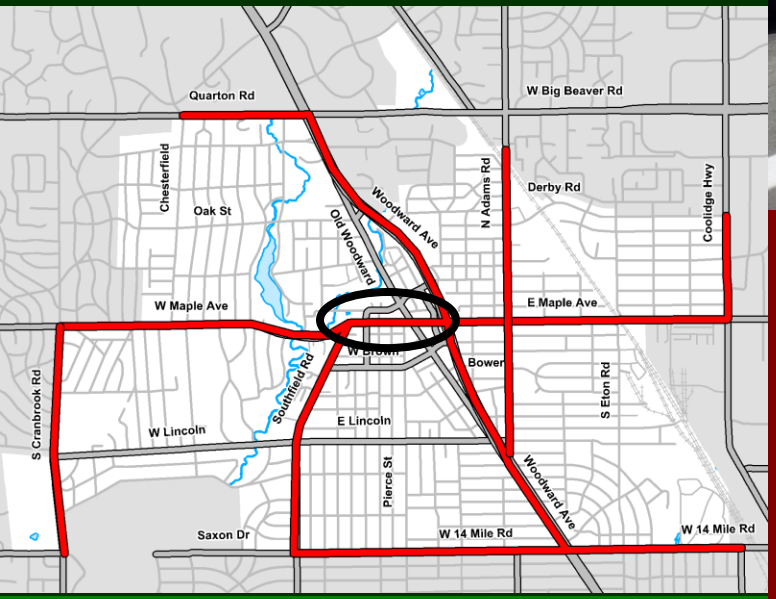
Pedestrian road crossings ⟷ Better Motor Vehicle Flow

Designated Bike Facilities ⟷ No Bike Facilities

Major Corridor: Maple Ave (Between Southfield & Woodward)

Issues:

- Add bike lane through lane narrowing would be very tight



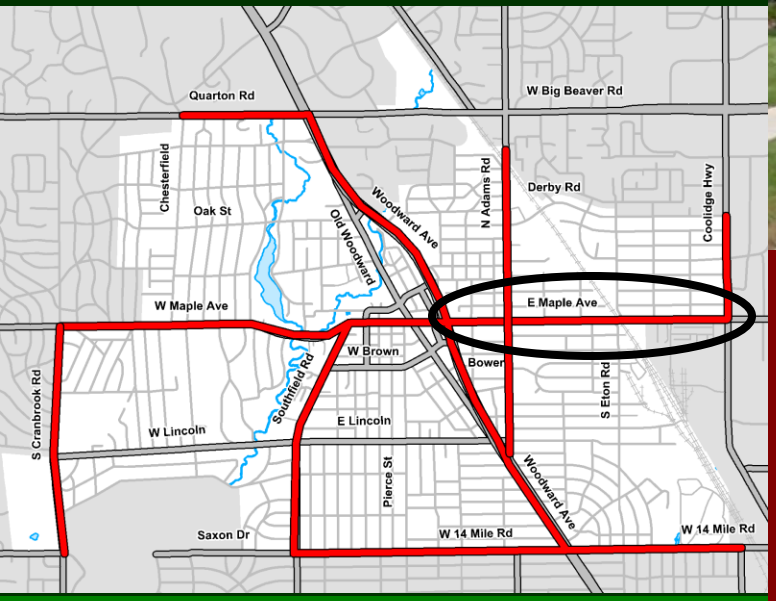
Pedestrian road crossings ⟷ Better Motor Vehicle Flow

Designated Bike Facilities ⟷ No Bike Facilities

Major Corridor: E Maple Ave (East of Woodward Ave)

Issues:

- 4 to 3 lane conversion to add bike lane difficult due to traffic volume
- Distance between crosswalks



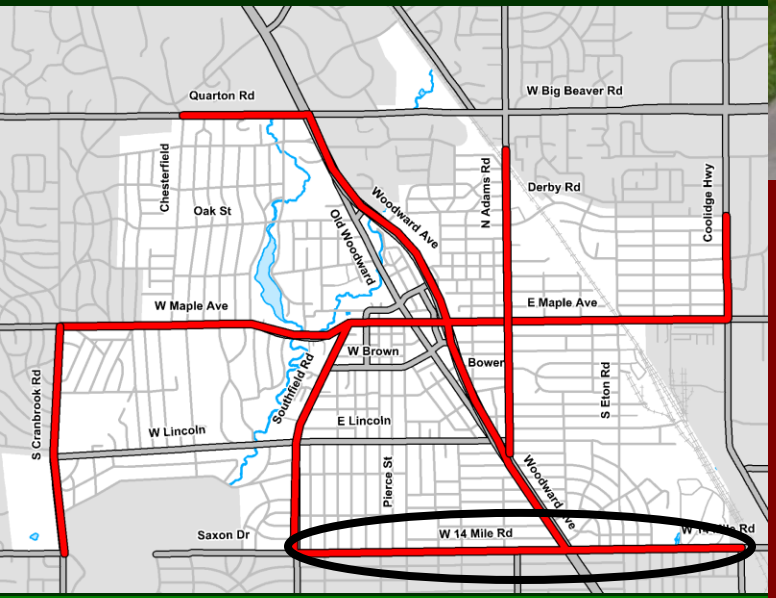
Pedestrian road crossings ⟷ Better Motor Vehicle Flow

Designated Bike Facilities ⟷ No Bike Facilities

Major Corridor: 14 Mile Road

Issues:

- Not enough room for bike lanes
- Distance between crosswalks



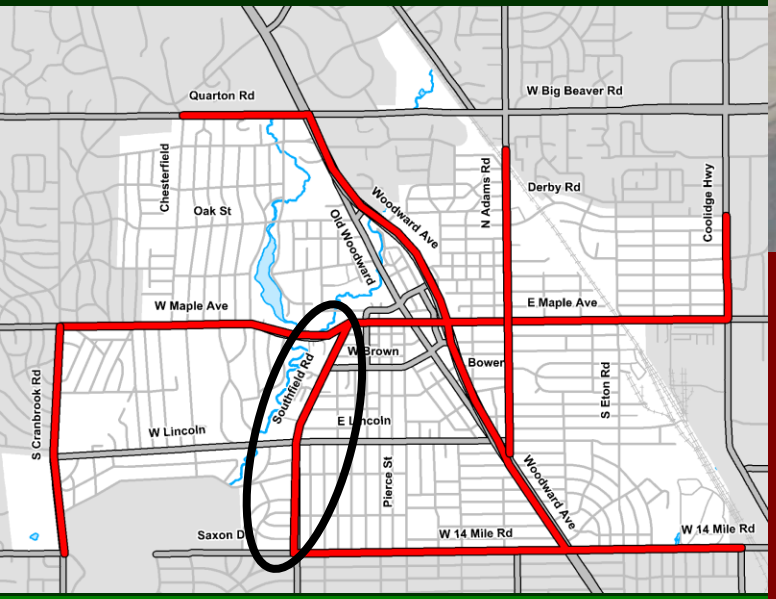
Pedestrian road crossings ⟷ Better Motor Vehicle Flow

Designated Bike Facilities ⟷ No Bike Facilities

Major Corridor: Southfield Road

Issues:

- Not enough room for bike lanes
- Distance between crosswalks

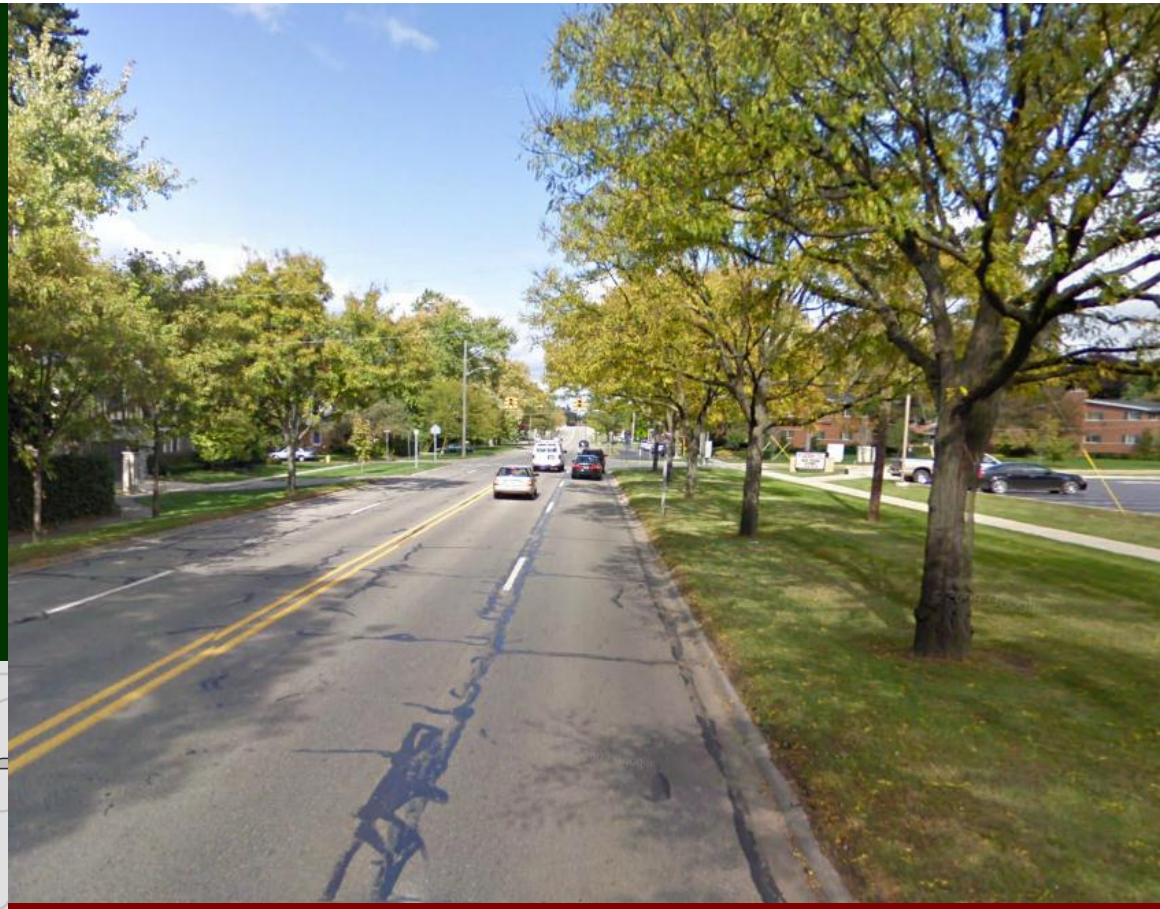


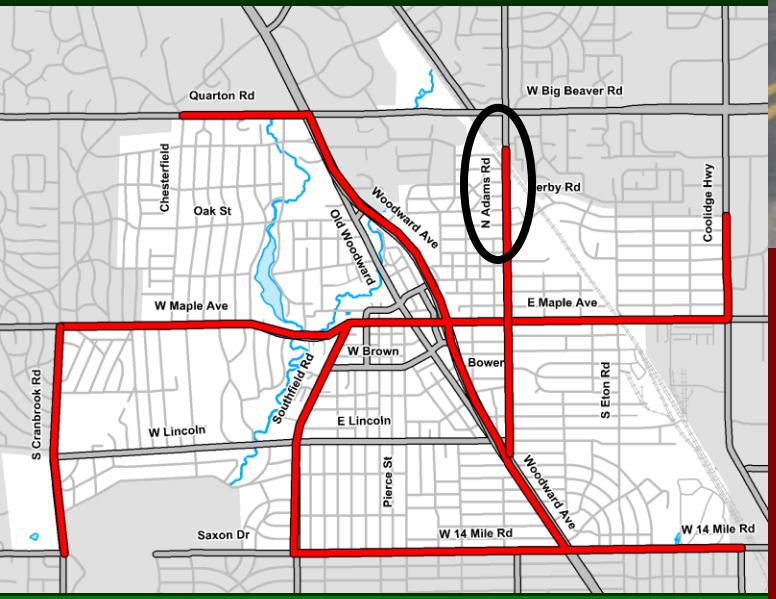
Pedestrian road crossings ⟷ Better Motor Vehicle Flow

Designated Bike Facilities ⟷ No Bike Facilities

Major Corridor: Adams Road (North of Madison St)

- Idea candidate for 4 to 3 lane conversion to add bike lanes



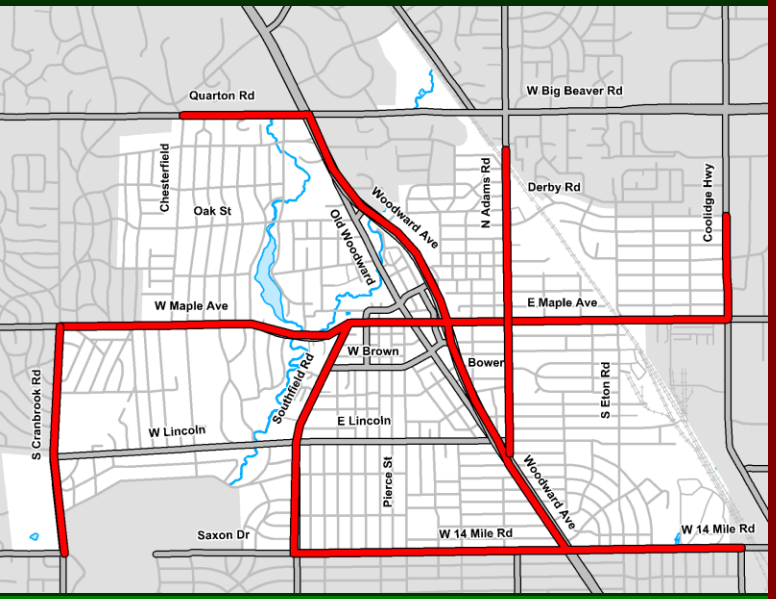


Pedestrian road crossings ⟷ Better Motor Vehicle Flow

Designated Bike Facilities ⟷ No Bike Facilities

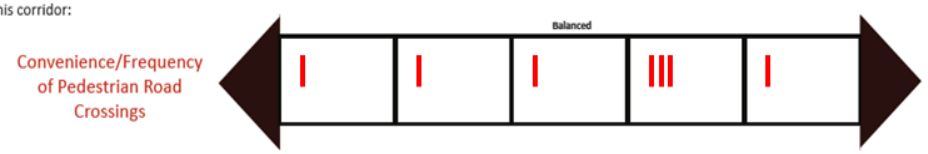
Group Exercise 2: Major Corridors Worksheet

- 10 Minutes for Exercise
- As a group talk about alternatives and provide comments on the corridor
- Individually everyone at the table puts a check in the box that they agree most with

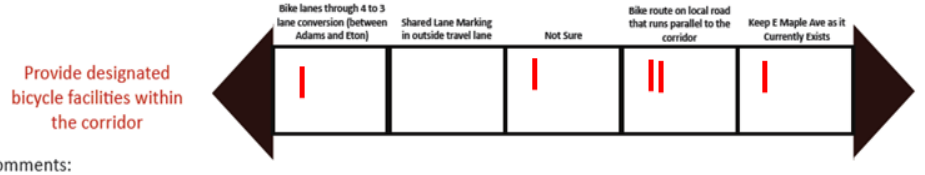


E MAPLE AVENUE (East of Woodward Avenue)

Increasing the frequency of pedestrian road crossings will effect the flow of motor vehicle traffic. Which of the following is more important when considering design options for this corridor:



There are opportunities to provide bicycle facilities along E Maple Avenue. Which of the following is most important when considering design options for this corridor:



Comments:

Road crossing needed between Adams and Eton

Rules:

- Every opinion is welcome
- Do not criticize or comment on another's opinion
- Let everyone have an opportunity to speak
- One check per person, per question

Group Exercise: Major Corridors

Rules:

- Every opinion is welcome
- Do not criticize or comment on another's opinion
- Let everyone have an opportunity to speak
- One check per person, per question

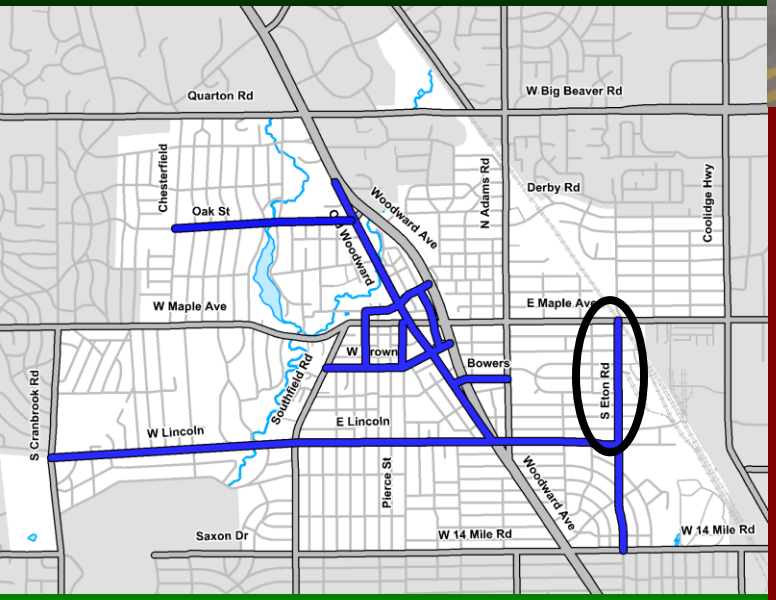
Times Up!

Minor Corridor: S. Eton Road (Between Maple & Lincoln)

Issues

- Remove On-street Parking on one side to Add bike lanes
- Remove On-street Parking on both side to add buffered bike lanes

Road crossings planned in 2013 at Villa, Bowers, Holland, and Cole



Safe Pedestrian road crossings ⟷ Higher Motor Vehicle Speeds

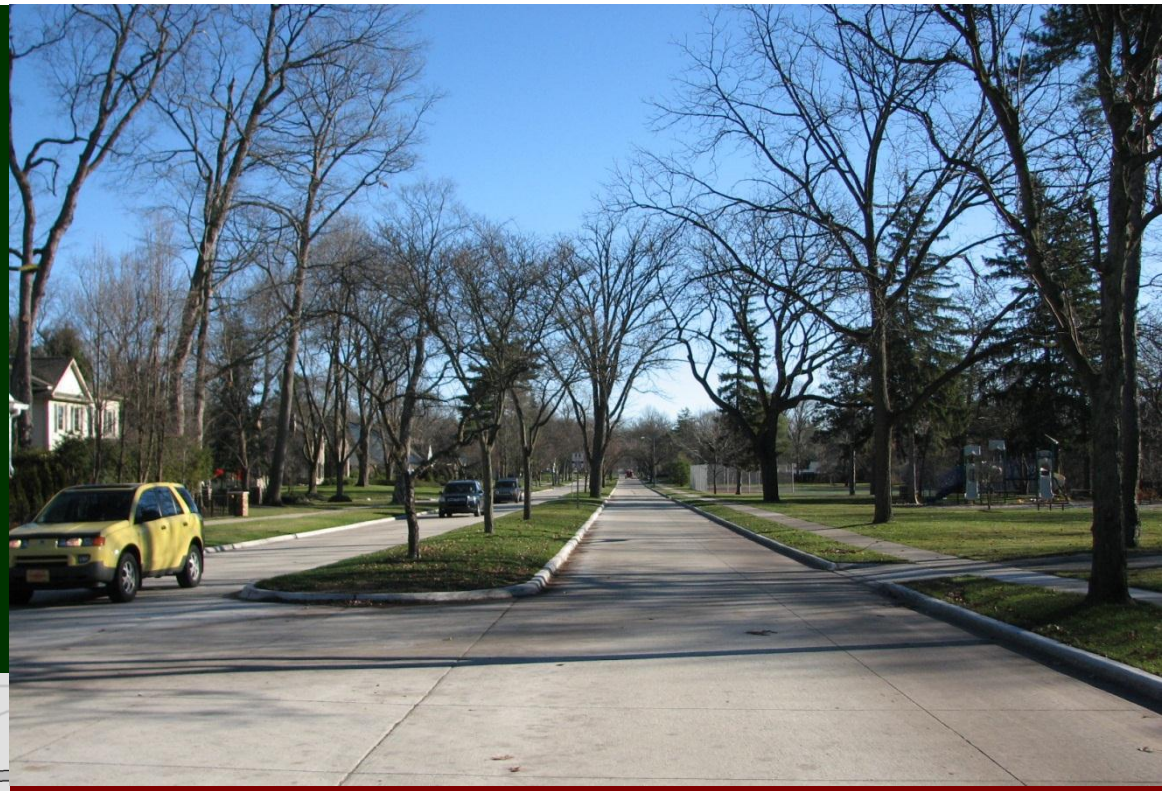
Frequency of Pedestrian road crossings ⟷ Better Motor Vehicle Flow

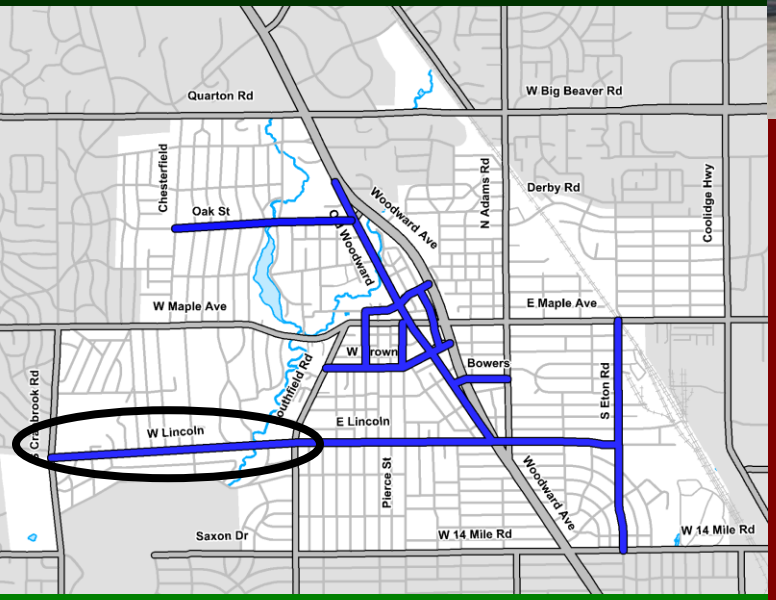
Designated Bike Facilities ⟷ No Bike Facilities

Minor Corridor: Lincoln (Between Cranbrook and Southfield)

Issues

- Remove On-street Parking on both sides of road to Add bike lanes



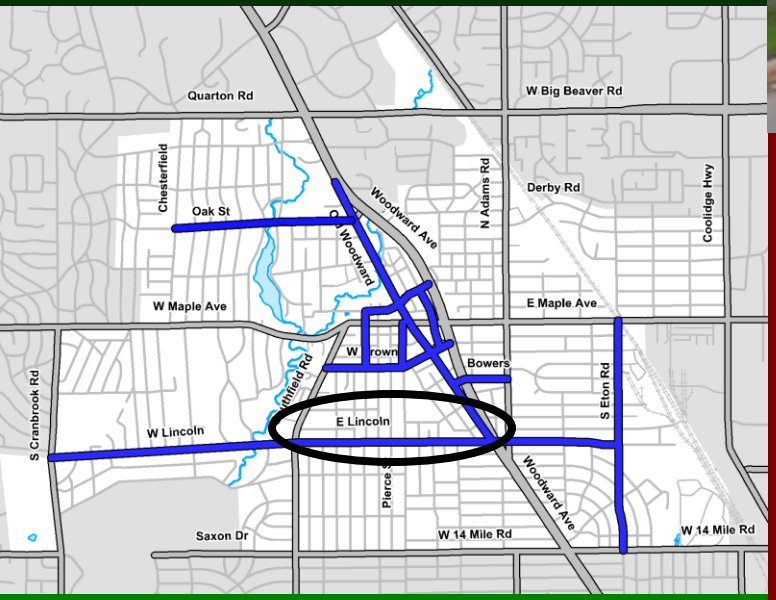


Safe Pedestrian road crossings	⟷	Higher Motor Vehicle Speeds
Frequency of Pedestrian road crossings	⟷	Better Motor Vehicle Flow
Designated Bike Facilities	⟷	No Bike Facilities

Minor Corridor: Lincoln (Between Southfield and Woodward)

Issues

- Remove On-street Parking on one side to Add bike lanes
- Remove On-street Parking on both sides to add buffered bike lanes

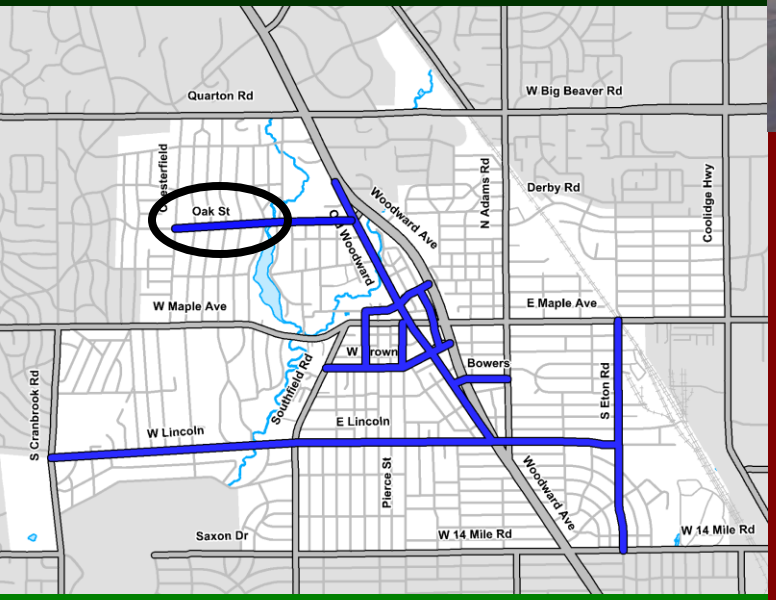


Safe Pedestrian road crossings	⟷	Higher Motor Vehicle Speeds
Frequency of Pedestrian road crossings	⟷	Better Motor Vehicle Flow
Designated Bike Facilities	⟷	No Bike Facilities

Minor Corridor: Oak (Between Chesterfield and Quarton Lake)

Issues

- Remove On-street Parking to Add bike lanes



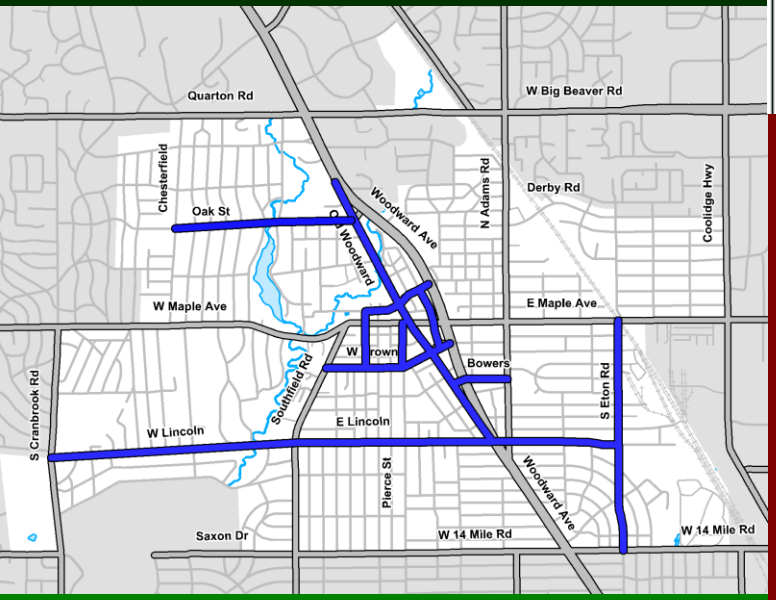
Safe Pedestrian road crossings ⟷ Higher Motor Vehicle Speeds

Frequency of Pedestrian road crossings ⟷ Better Motor Vehicle Flow

Designated Bike Facilities ⟷ No Bike Facilities

Group Exercise 3: Minor Corridors

- 10 Minutes for Exercise
- As a group talk about alternatives and provide comments on the corridor
- Individually everyone at the table puts a check in the box that they agree most with



S. ETON ROAD (E. Maple Road to E. Lincoln Street)

When improving the safety of road crossings for pedestrians, elements such as bump-outs, medians and other traffic calming measures are used to slow traffic and increase visibility between motorists and pedestrians. Which of the following is more important when considering design options for this corridor:

Safer Pedestrian Road Crossings — Balanced — Higher Motor Vehicle Speeds

Increasing the frequency of pedestrian road crossings will effect the flow of motor vehicle traffic. Which of the following is more important when considering design options for this corridor:

Convenience/Frequency of Pedestrian Road Crossings — Balanced — Better Motor Vehicle Flow

In order to add designated bicycle facilities to Eton, on-street parking would need to be reduced or removed. Which of the following is most important when considering design options for this corridor:

Provide designated bicycle facilities — Buffered Bike Lanes & No On-street Parking / Bike Lane with On-street Parking on One Side of Street / Not Sure / Share Lane Marking with On-Street Parking on Both Sides of Street / Keep Eton Road as it Currently Exists — Preserve on-street parking

Comments:

Keep on-street parking on east side of street

Rules:

- Every opinion is welcome
- Do not criticize or comment on another's opinion
- Let everyone have an opportunity to speak
- One check per person, per question

Group Exercise: Minor Corridors

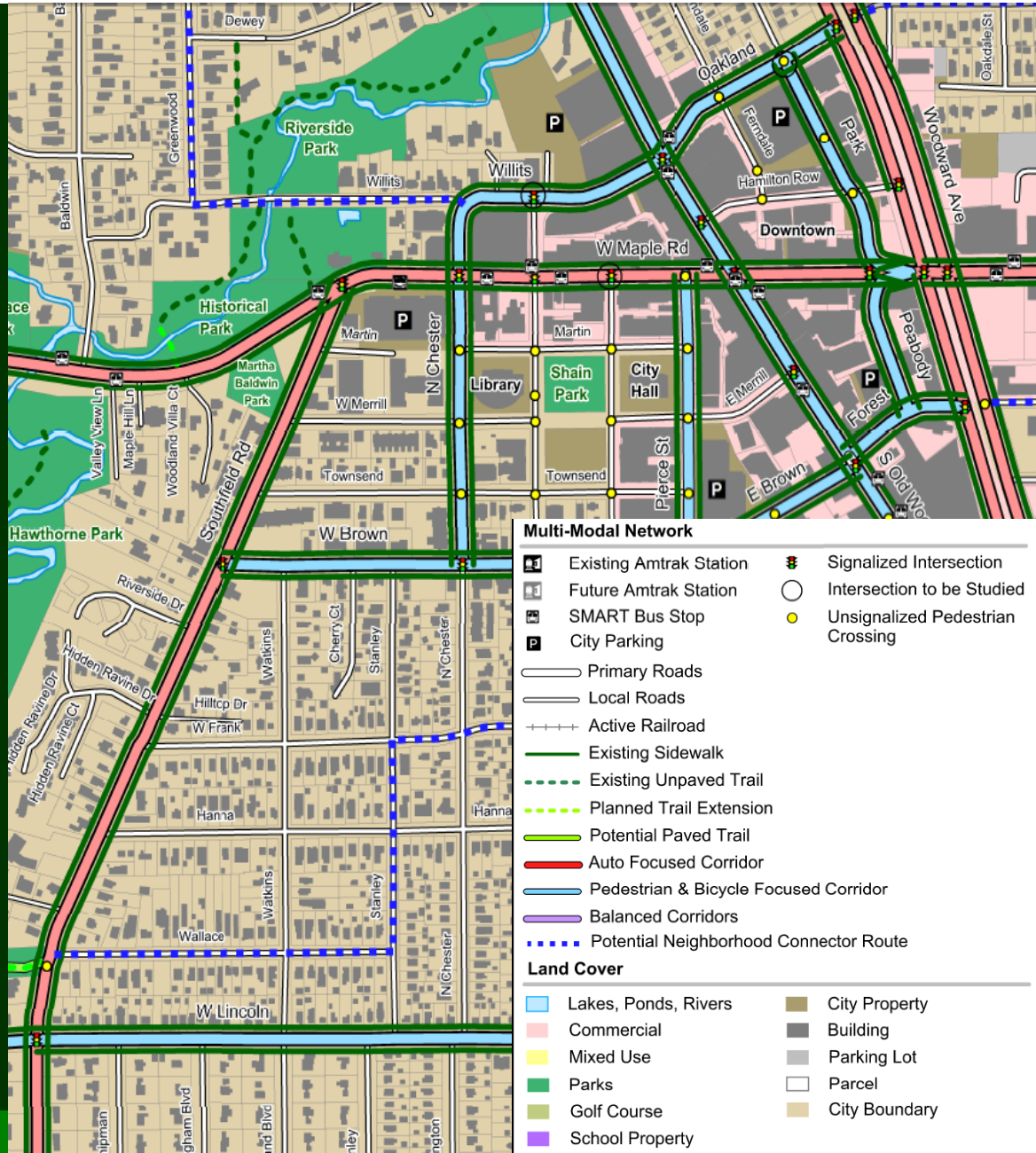
Rules:

- Every opinion is welcome
- Do not criticize or comment on another's opinion
- Let everyone have an opportunity to speak
- One check per person, per question

Times Up!

Group Exercise: Neighborhood Connector and Trails

- Please Review:
  - Neighborhood Connector Routes
  - Proposed Pathways
- Use markers on map to indicate
  - Alternative routes
  - Alternative facilities
  - Concerns with proposals
- 10 Minutes



Group Exercise: Neighborhood Connector and Trails

Rules:

- Every opinion is welcome
- Do not criticize or comment on another's opinion
- Let everyone have an opportunity to speak
- One check per person, per question

Times Up!

Group Exercise: Downtown Birmingham

- Areas Currently Under Study
  - Old Woodward Avenue
  - Woodward Avenue
  - Pierce Street
- Alley & Passages Plan shown on map
- Well known issues are already noted on the map
- 10 Minutes

Add any additional comments by placing a number on the map that corresponds with your comment

Group Exercise: Downtown Birmingham

Rules:

- Every opinion is welcome
- Do not criticize or comment on another's opinion
- Let everyone have an opportunity to speak
- One check per person, per question

Times Up!

Woodward Avenue

- Description
  - Bypass
  - Main Street

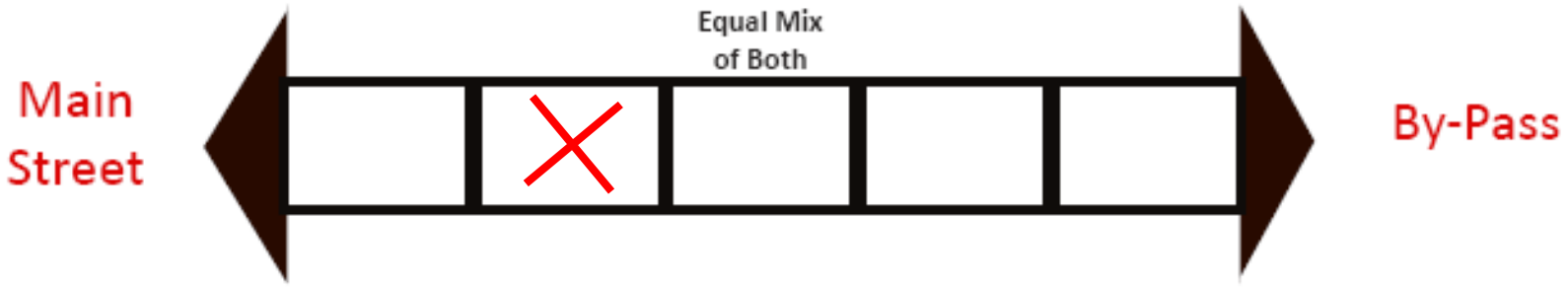
Individual Exercise: Woodward Avenue

- 10 Minutes for Exercise
- Each person get there own worksheet to fill out front and back
- Back side is optional

WOODWARD CORRIDOR EXERCISE

With the current transit and complete streets studies for the Woodward Corridor underway it is uncertain what the corridor may become. Currently the corridor acts as a by-pass through town, however with the new studies occurring there may be opportunities to change that. For this exercise we want you to describe your vision for the Woodward Corridor.

How do you envision the Woodward corridor developing? Would you like it to have more of a "Main Street" feel or would you like it to continue as a by-pass around the downtown? Please put a check in box below.

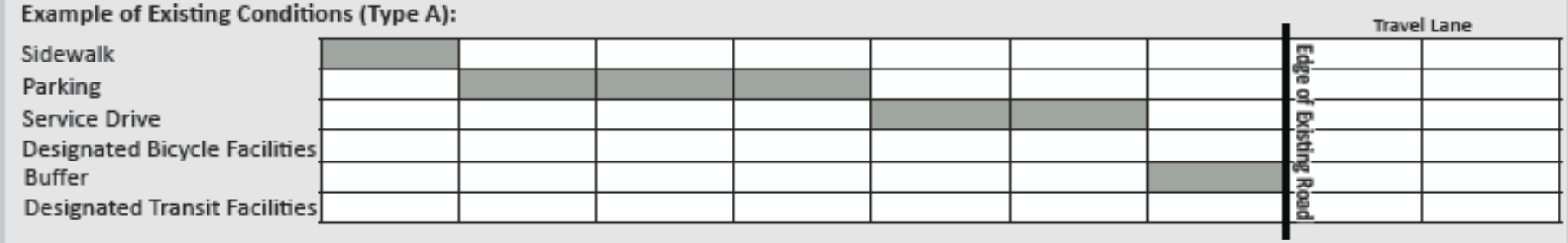


Additional Comments:

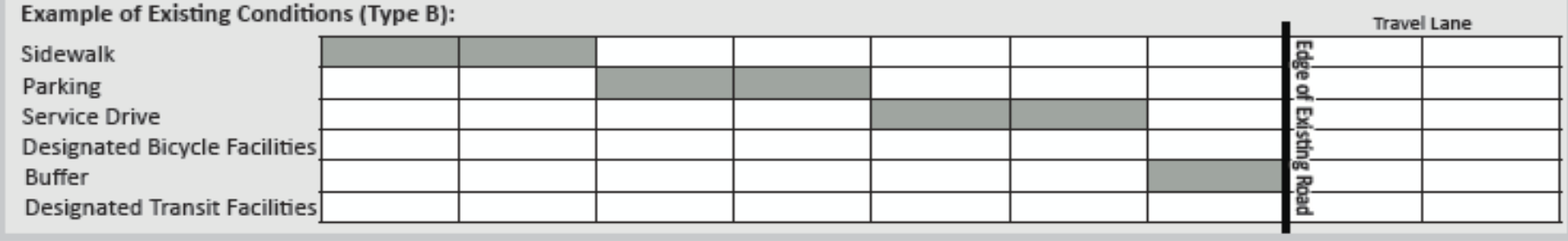
Individual Exercise 6: Woodward Corridor

The following examples show how space is currently allocated in two different location along Woodward Avenue.

Example of Existing Conditions (Type A):



Example of Existing Conditions (Type B):



Use the following guidelines to assit in filling in the matrix below.

Sidewalk
1 block = narrow
2 blocks= wide
3 blocks= sidewalk plus cafe space or trees

Parking
2 blocks = Parallel Parking
3 blocks= Angled Parking

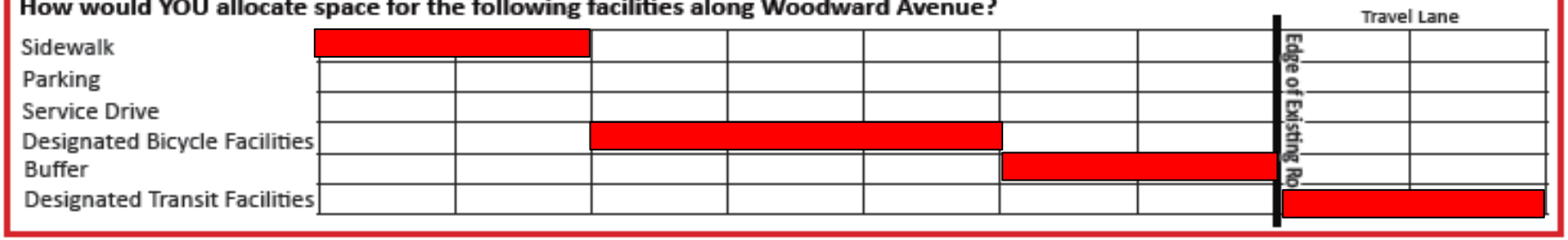
Buffer
1 block = concrete
2 blocks = landscaped
3 blocks = landscaped with trees

Service Drive
2 blocks = One Traffic Lane

Designated Bicycle Facilities
1 block = Bike Lane
2 blocks= One-way Cycle Track (with Buffers)
3 blocks= Two-way Cycle Track (with Buffers)

Designated Transit Facilities
2 blocks= Designated Transit Lane

How would YOU allocate space for the following facilities along Woodward Avenue?



Group Exercise: Woodward Corridor

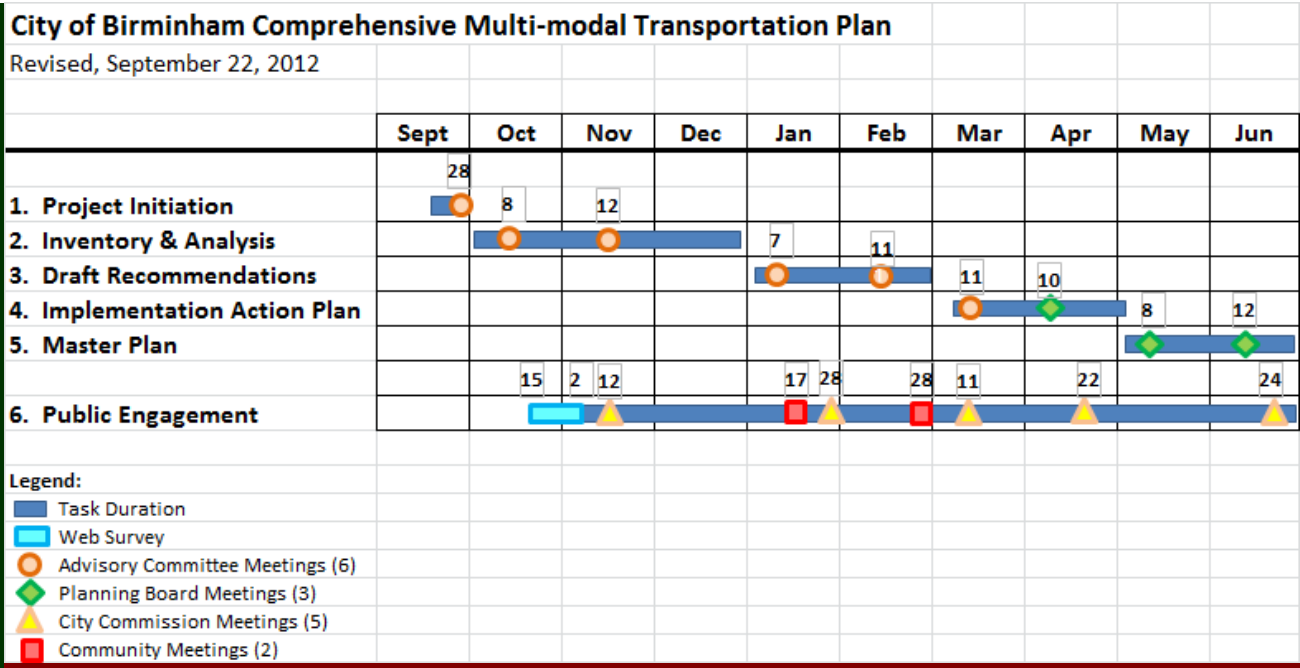
Rules:

- Every opinion is welcome
- Do not criticize or comment on another's opinion
- Let everyone have an opportunity to speak
- One check per person, per question

Times Up!

Next Steps

- Vision, Goals and Objectives Survey available until Thursday, January 24
  - Available on project website
- Preliminary Plan Workshop Feb 28
  - Baldwin Public Library
- Comment Cards are available if you would like to share any other thoughts with the design team



Please visit the project website at: www.greenwaycollab.com

- Vision, Goals & Objectives Survey
- Web Survey Results
- Draft Inventory and Analysis Maps
- Project Materials and Updates

Questions or Comments

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