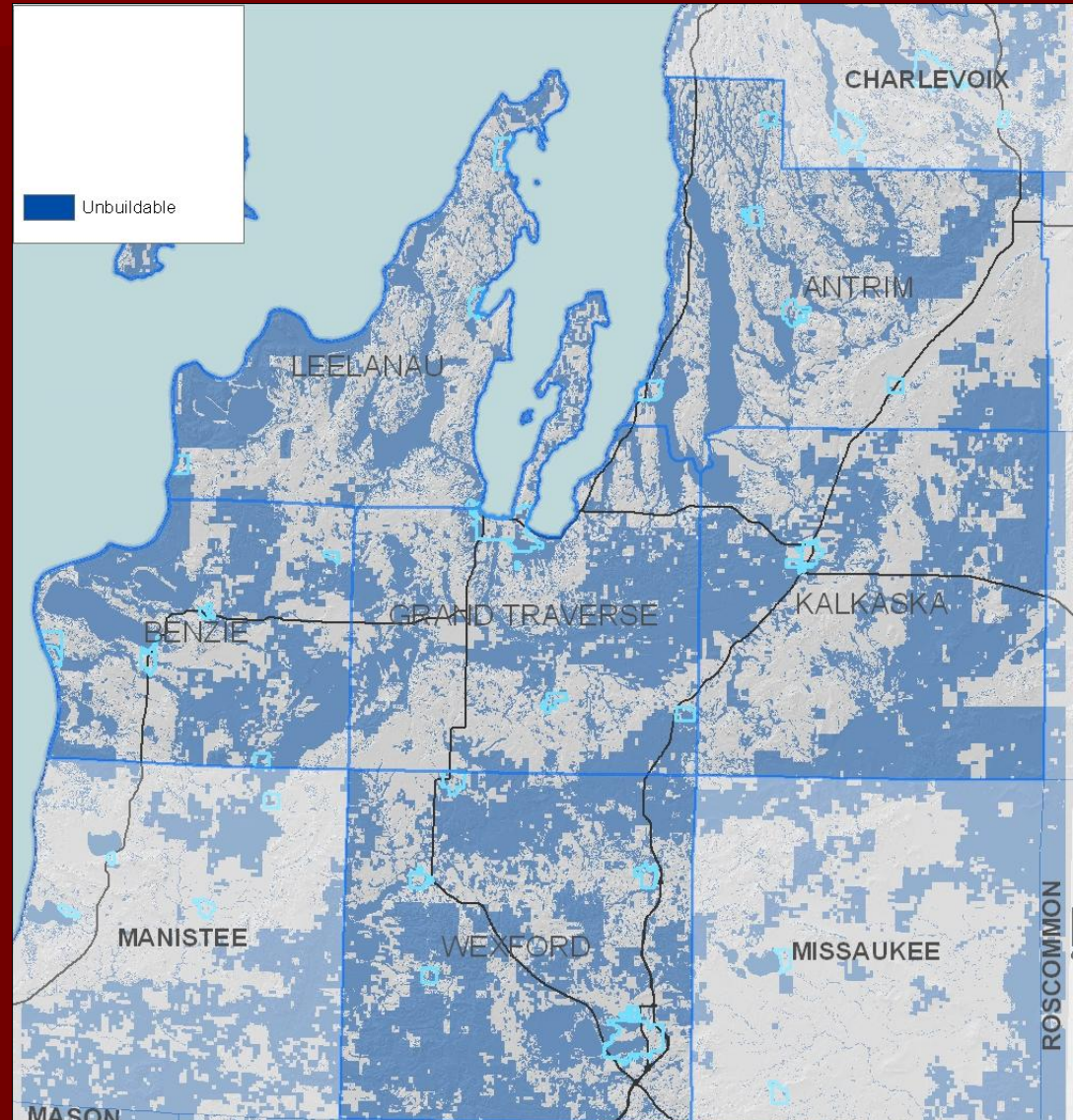


Constraints, Vacant Land and Redevelopment Potential

Constrained Land

- All constrained Lands

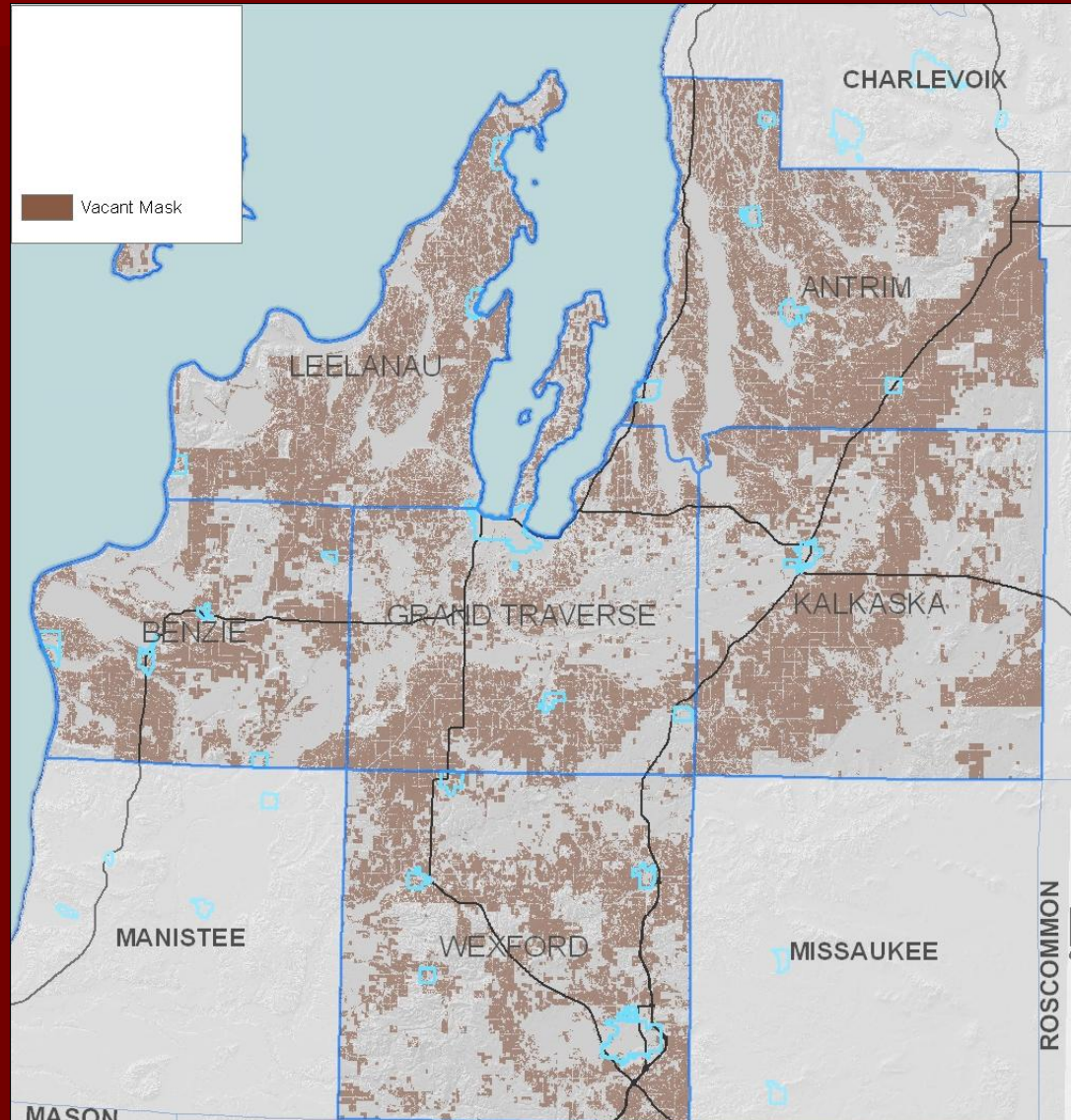


Constrained Lands

- Environmental Constraints
 - Over 500,000 Acres
 - Used in vacant land analysis
- Protected Land
 - Over 600,000 Acres
 - Used in vacant land analysis and land with redevelopment potential
- **Over 50% of the region is made of constrained land**

Vacant Land Analysis

■ Vacant Mask

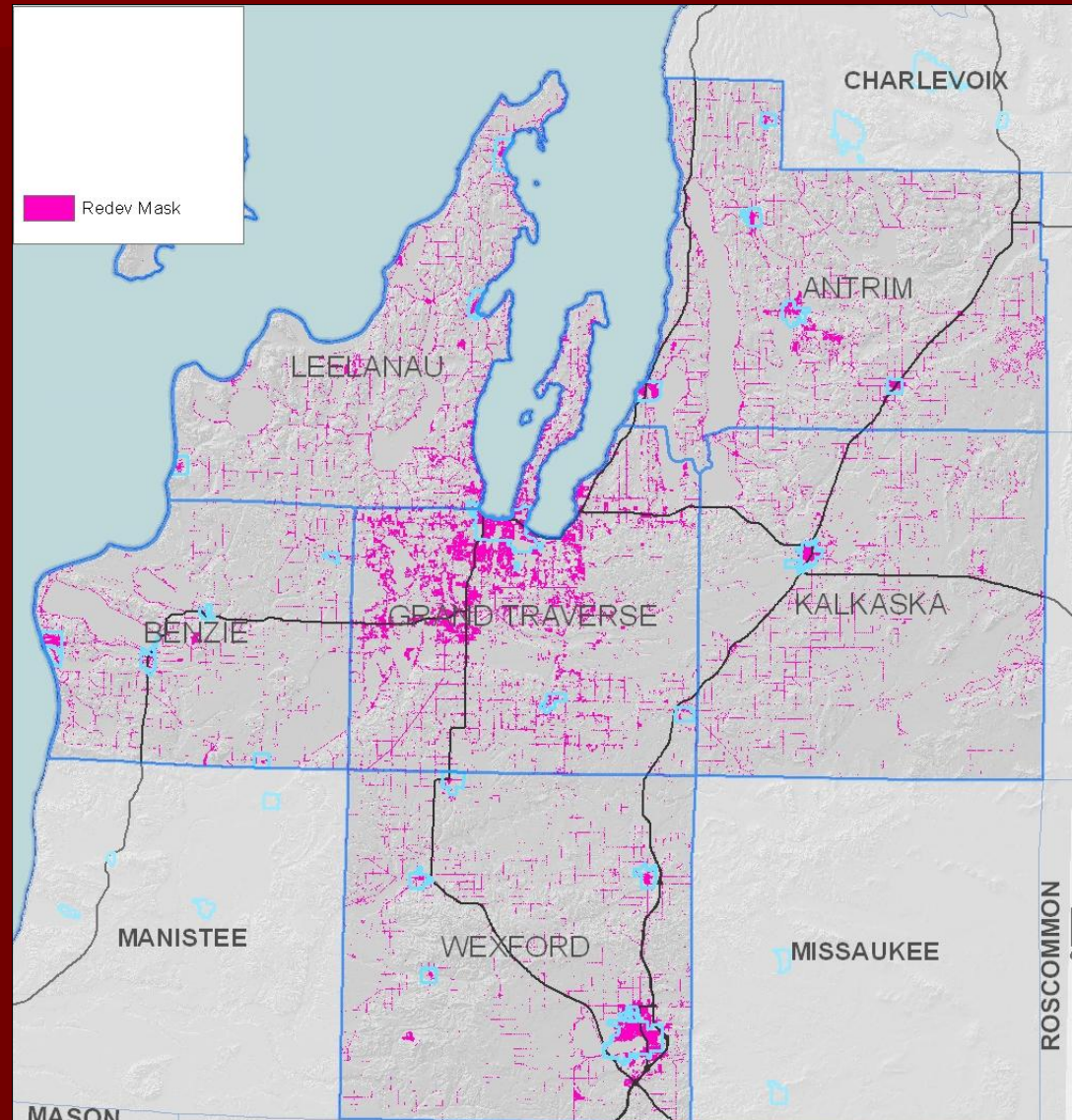


Vacant Land Analysis

- Land Use and Land Cover
 - Partially ground proofed for Grand Traverse County
 - 2001 land cover for other counties
- Excludes Protected Land
- Excludes Environmental Constrains
- Over 750,000 acres, 40% of region

Redevelopment Potential

■ Redev Mask



Redevelopment Potential

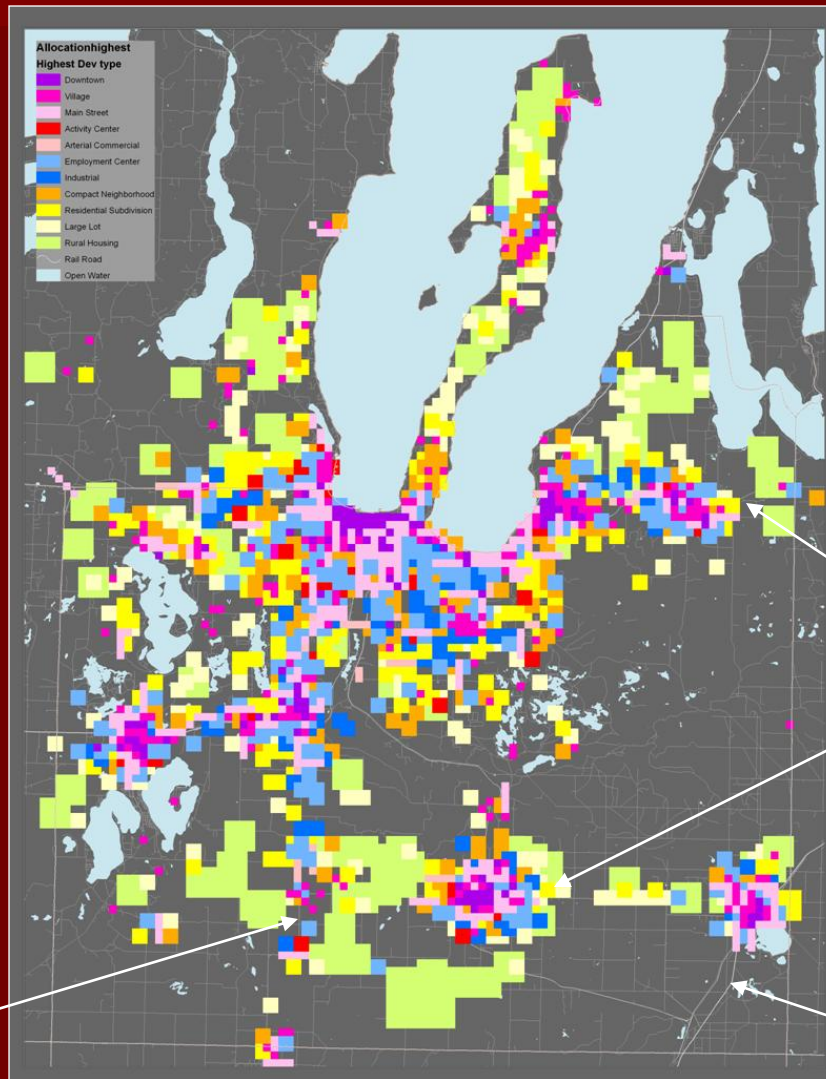
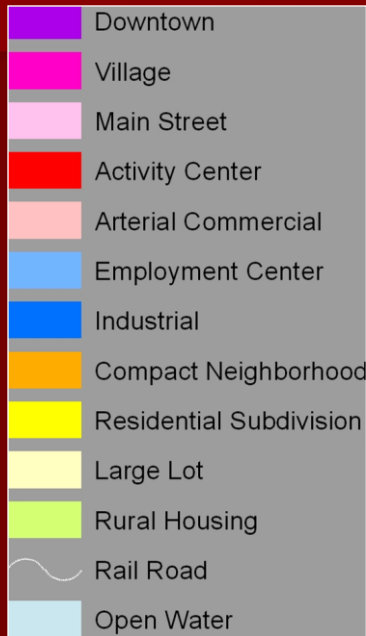
- Land Use and Land Cover
 - Partially ground proofed for Grand Traverse County
 - 2001 land cover for other counties
- Excludes Protected Land
- Over 130,000 acres, 7% of region

Grand Traverse Workshop

The Workshop Results

All Chips

Development Types



State Highway 72

State Highway 113

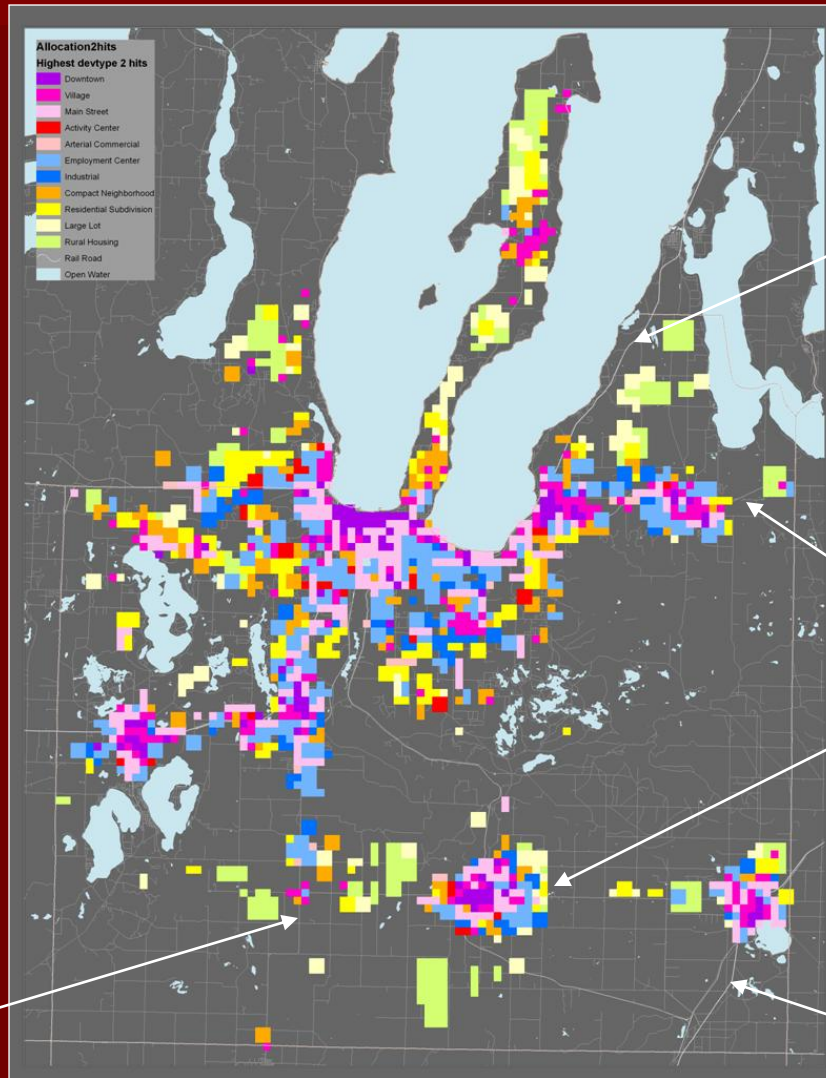
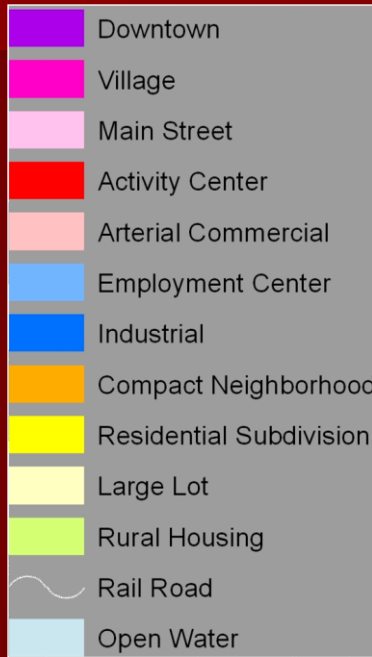
State Highway 37

US Highway 131

The Workshop Results

All Chips at least 2 Hits

Development Types



US Highway 31

State Highway 72

State Highway 113

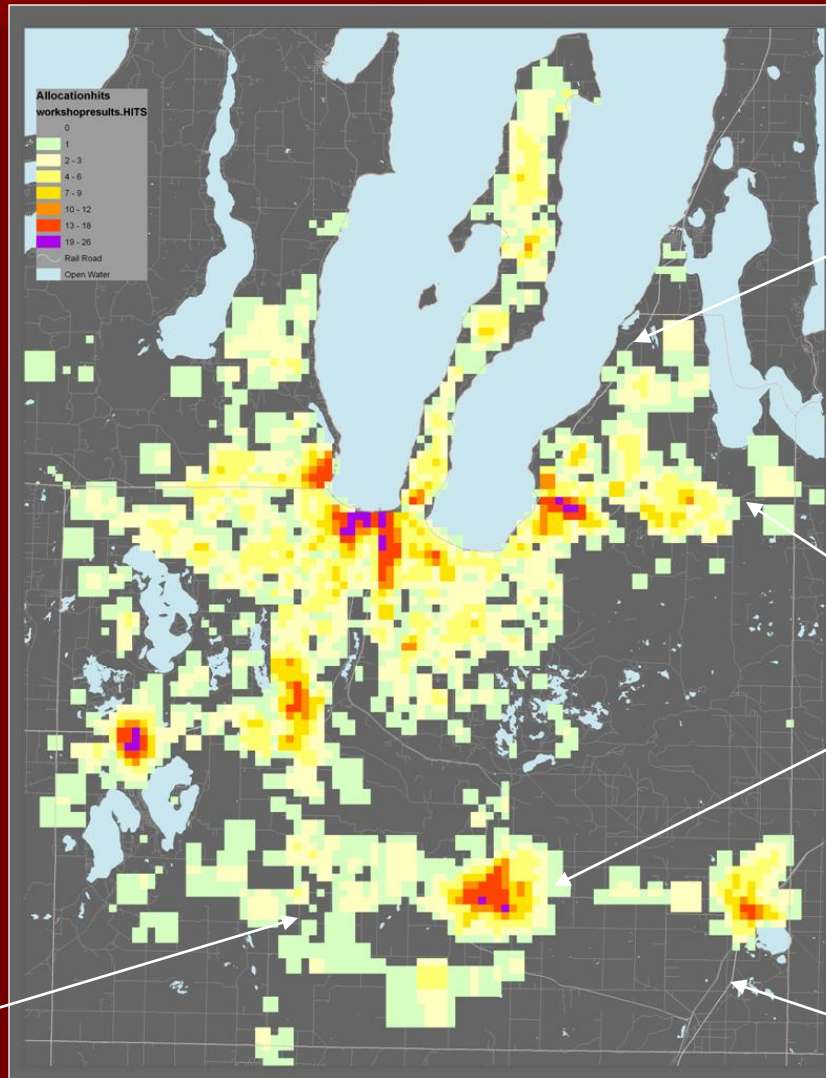
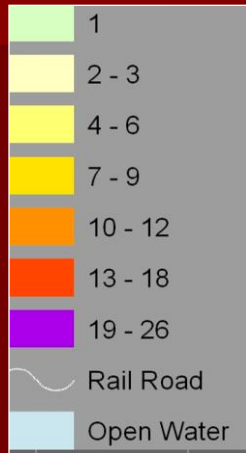
State Highway 37

US Highway 131

The Workshop Results

Chip Placement (Any Chip)

Occurrence



US Highway 31

State Highway 72

State Highway 113

State Highway 37

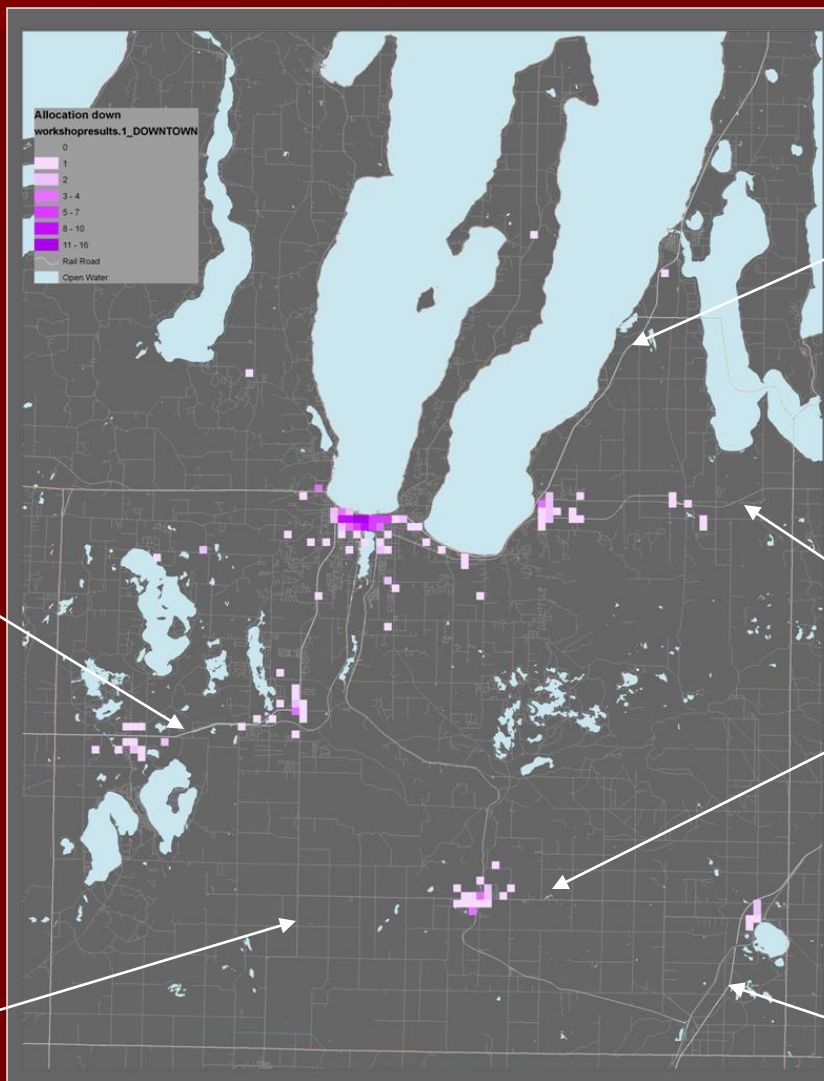
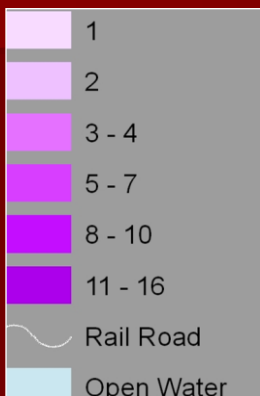
US Highway 131



The Workshop Results

Downtown

Occurrence



US Highway 31

US Highway 31

State Highway 72

State Highway 113

State Highway 37

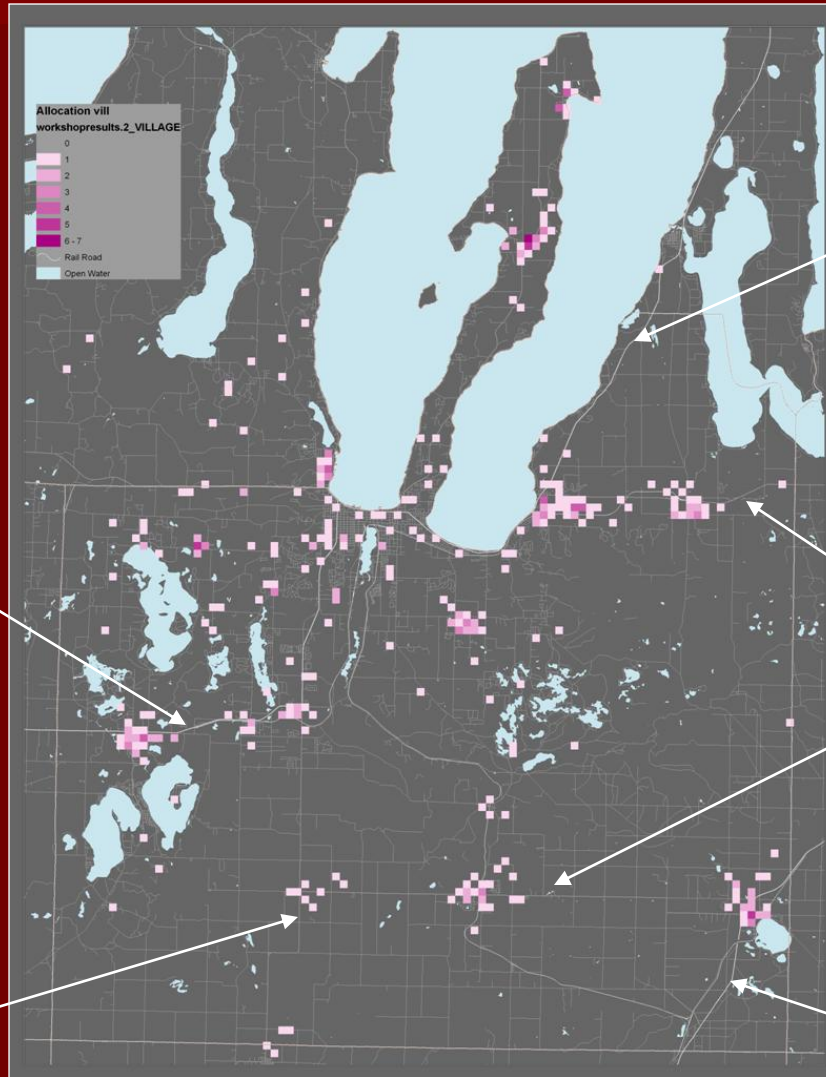
US Highway 131



The Workshop Results

Village

Occurrence



US Highway 31

US Highway 31

State Highway 72

State Highway 113

State Highway 37

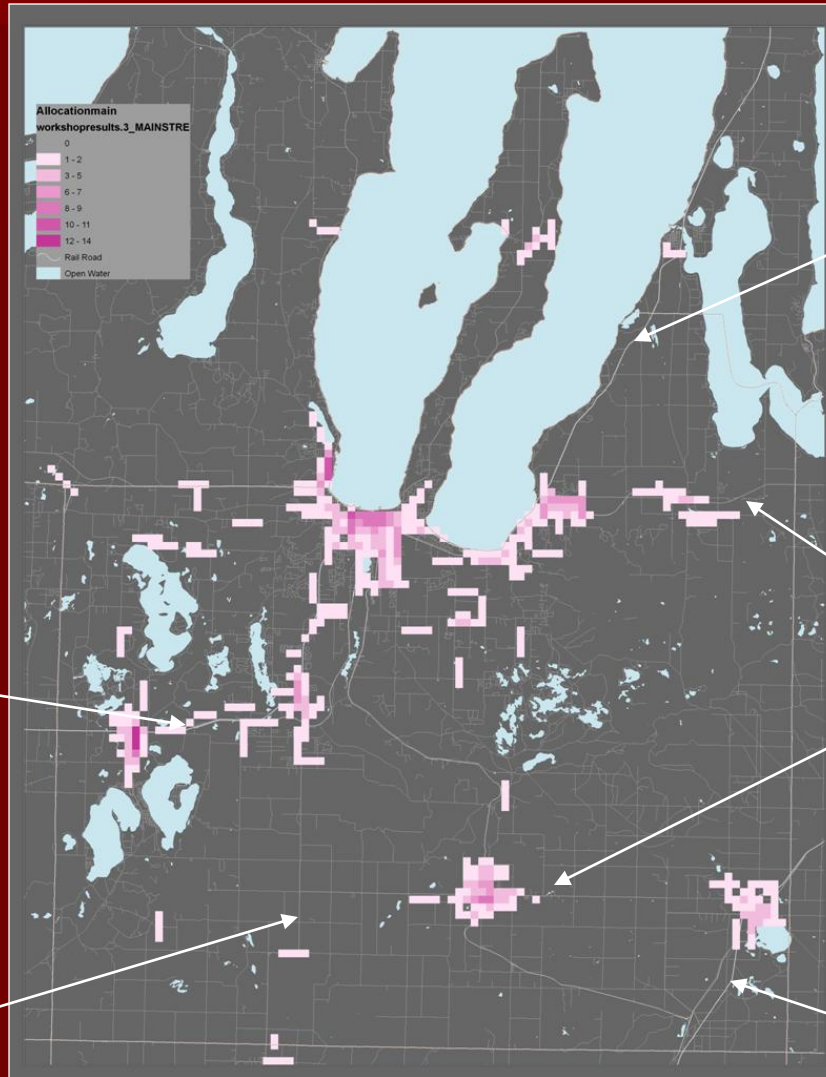
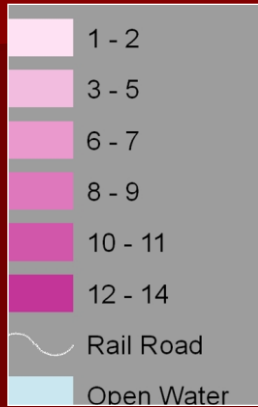
US Highway 131



The Workshop Results

Main Street

Occurrence



US Highway 31

State Highway 72

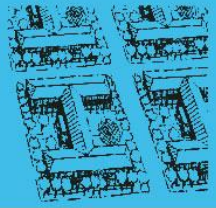
State Highway 113

US Highway 31

State Highway 37

US Highway 131

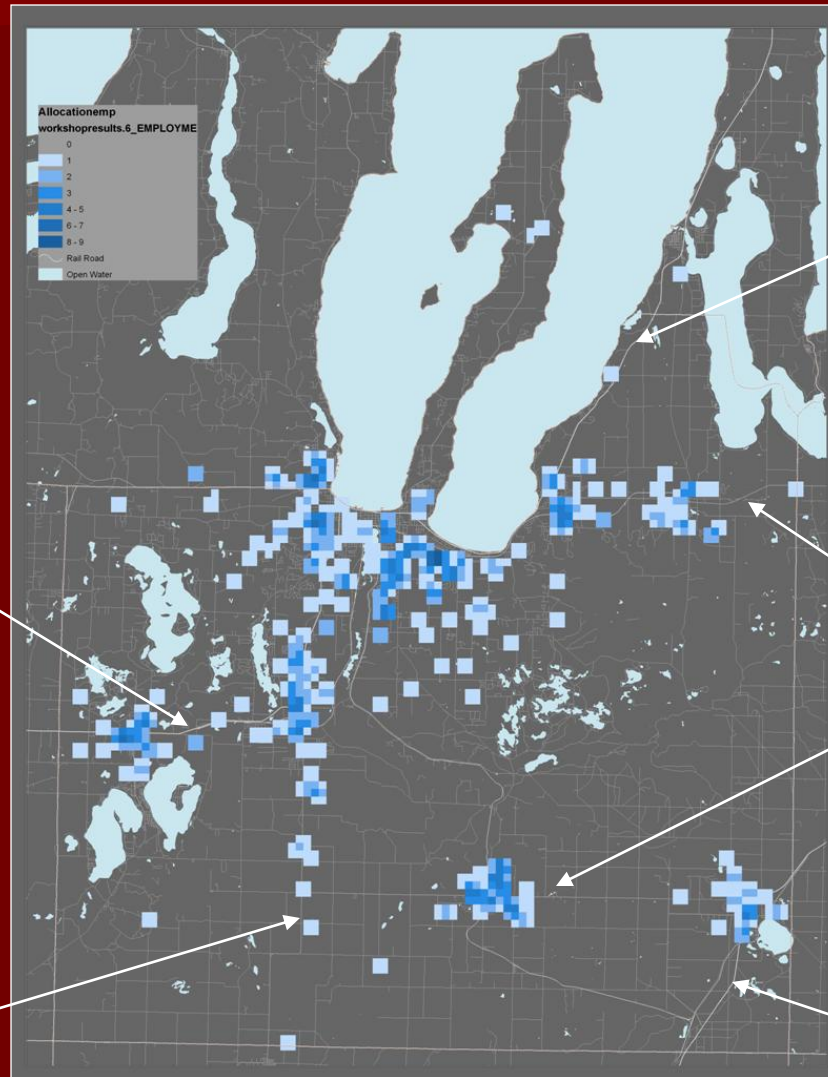
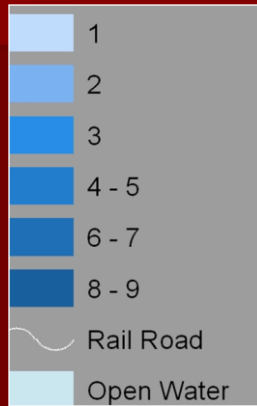
Employment District



The Workshop Results

Employment District

Occurrence



US Highway 31

US Highway 31

State Highway 72

State Highway 113

State Highway 37

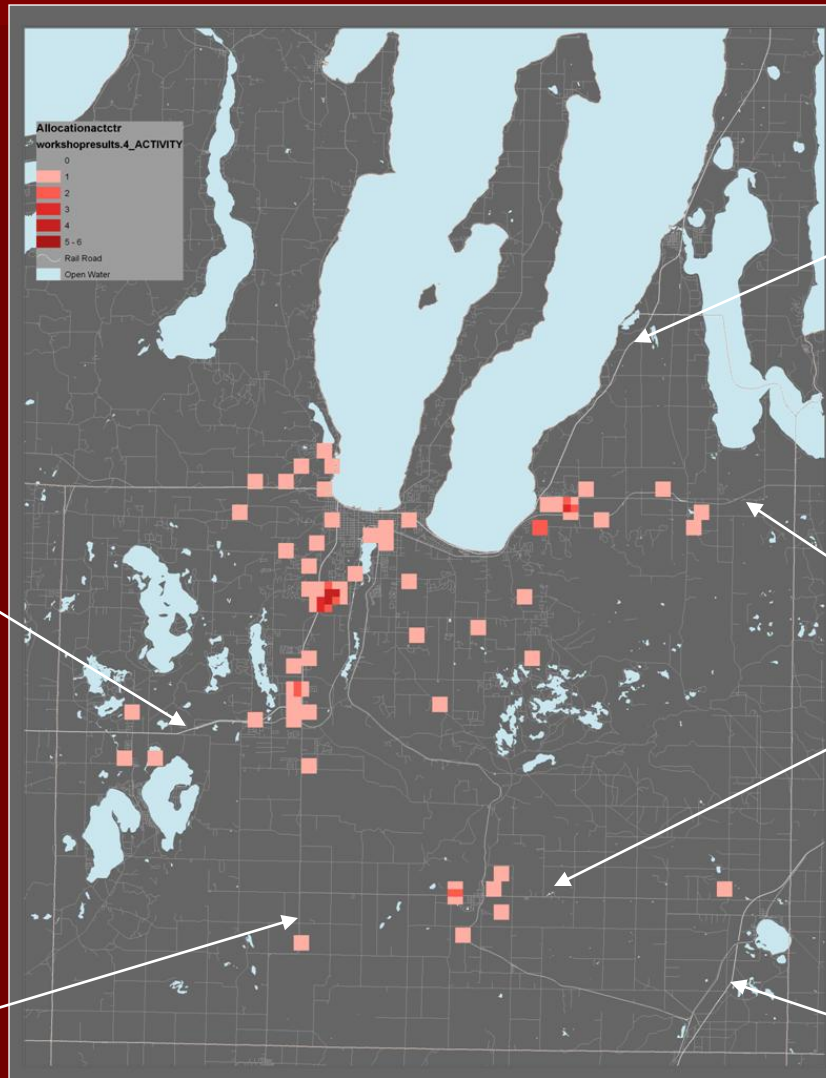
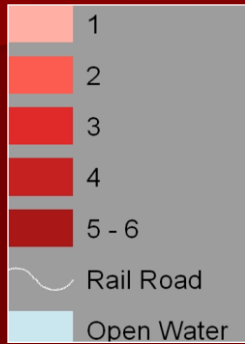
US Highway 131

The Workshop Results

Activity Center



Occurrence



US Highway 31

US Highway 31

State Highway 72

State Highway 113

State Highway 37

US Highway 131

Arterial
Commercial

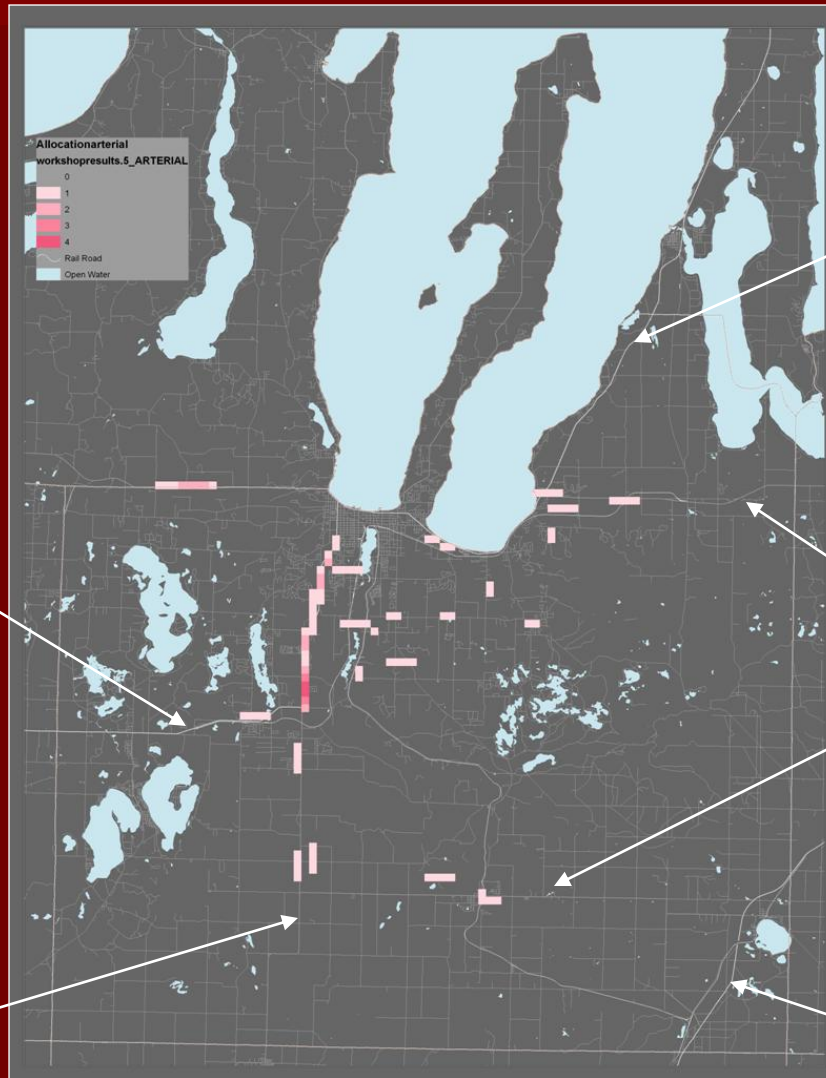
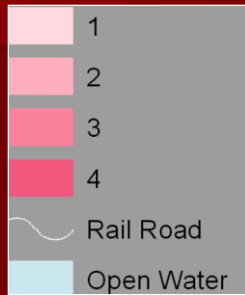


Arterial
Commercial

The Workshop Results

Arterial Commercial

Occurrence



US Highway 31

State Highway 72

State Highway 113

US Highway 31

State Highway 37

US Highway 131

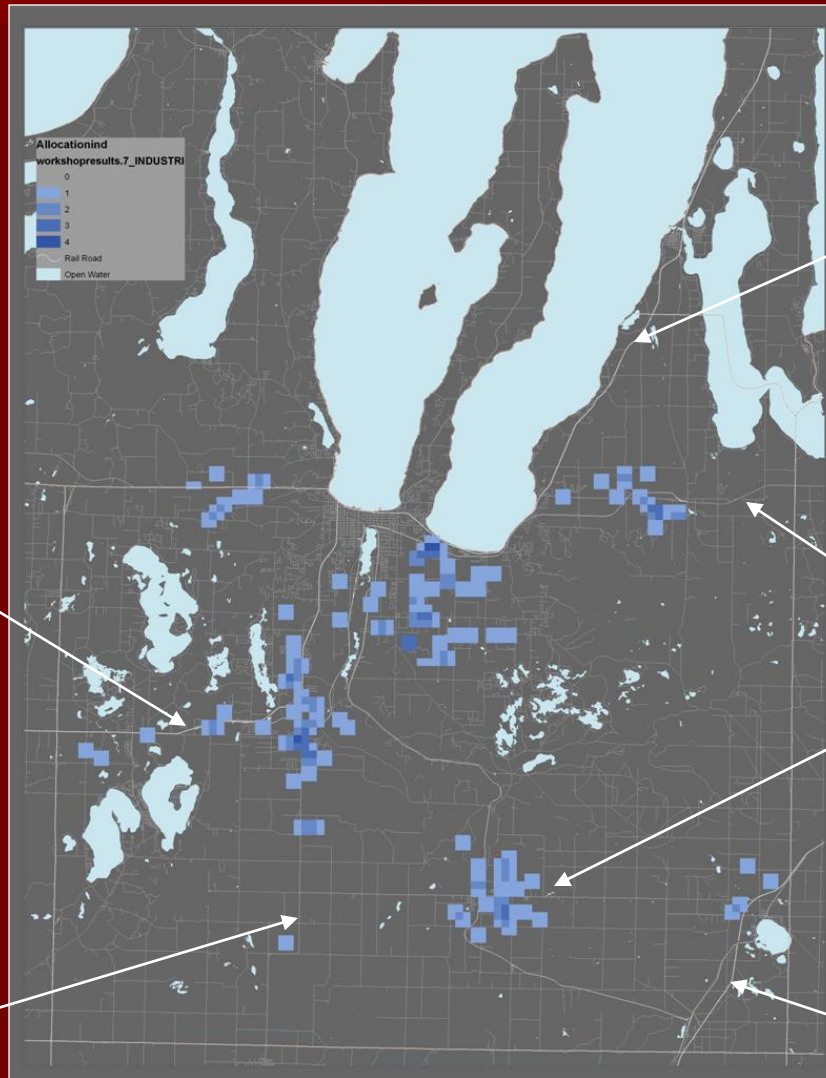
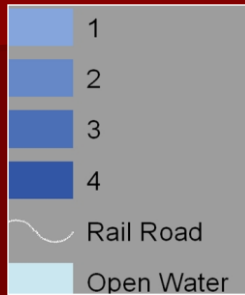
Industrial



The Workshop Results

Industrial

Occurrence



US Highway 31

US Highway 31

State Highway 72

State Highway 113

State Highway 37

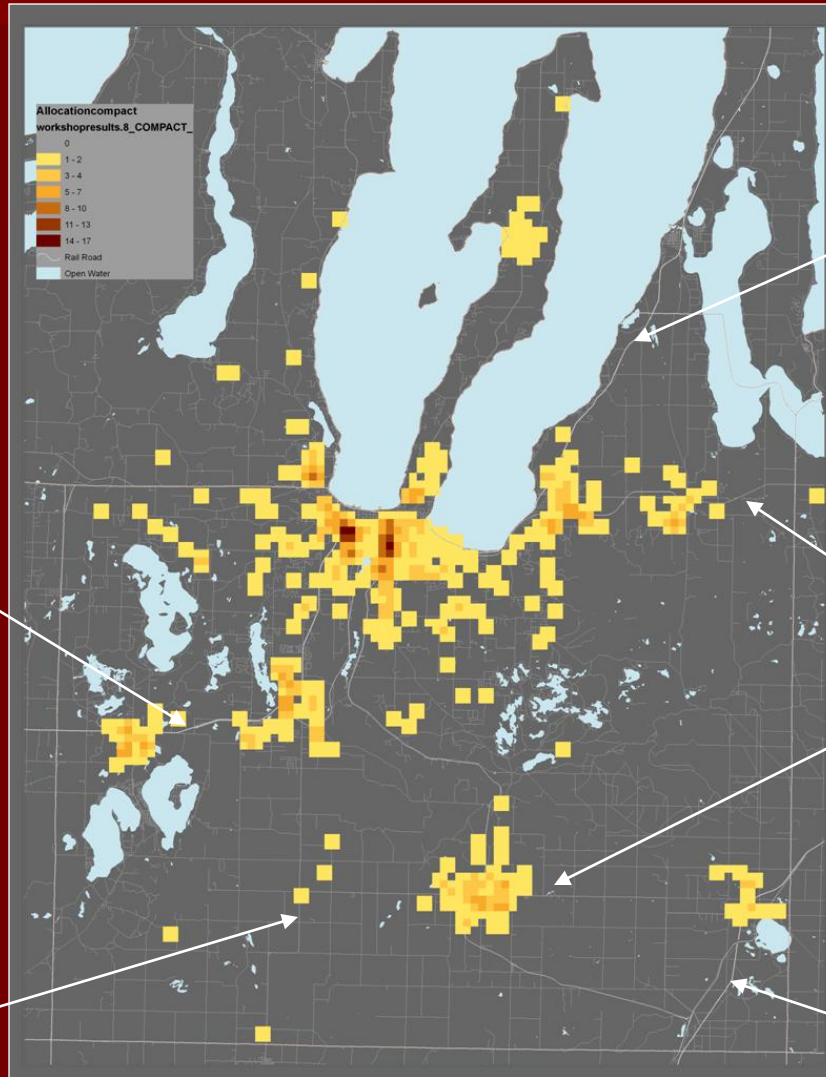
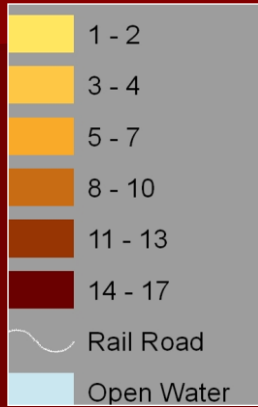
US Highway 131



The Workshop Results

Compact Neighborhood

Occurrence



US Highway 31

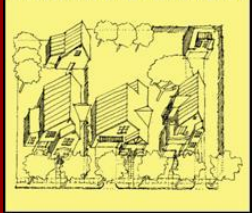
US Highway 31

State Highway 72

State Highway 113

State Highway 37

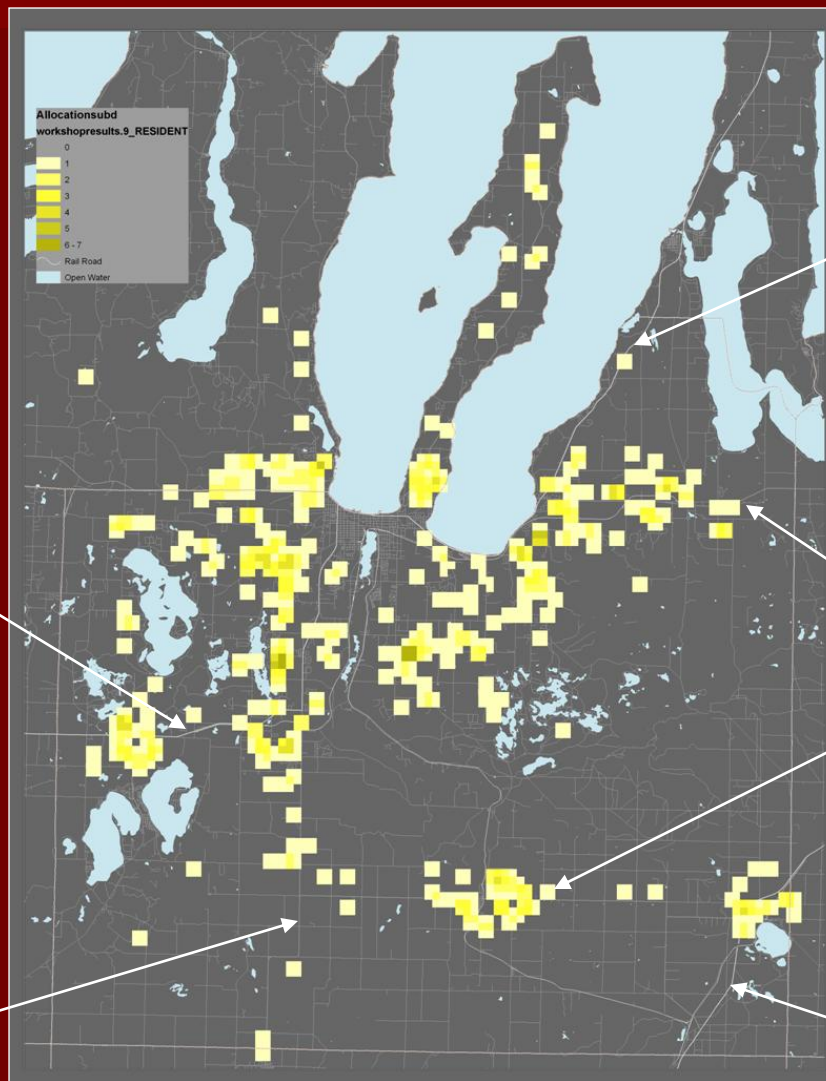
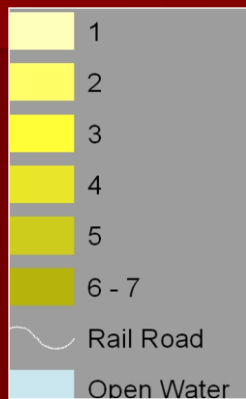
US Highway 131



The Workshop Results

Subdivision Residential

Occurrence



US Highway 31

State Highway 72

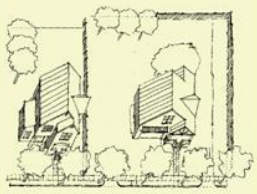
State Highway 113

US Highway 131

US Highway 31

State Highway 37

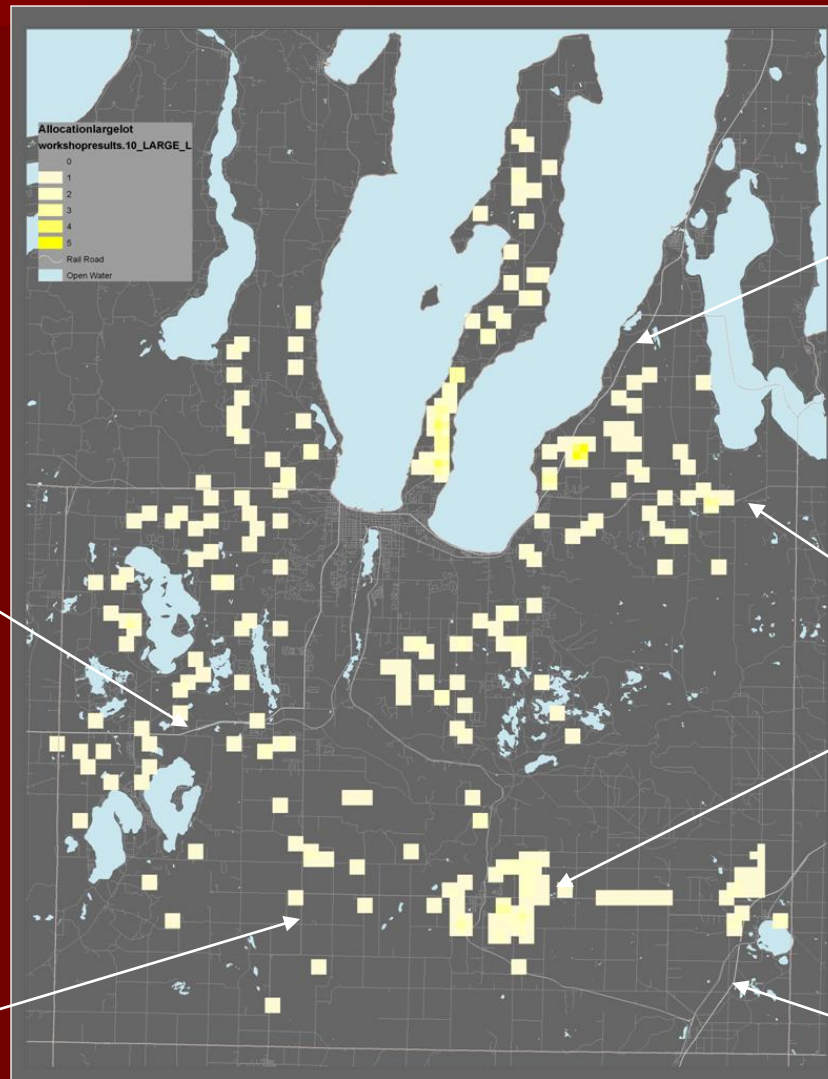
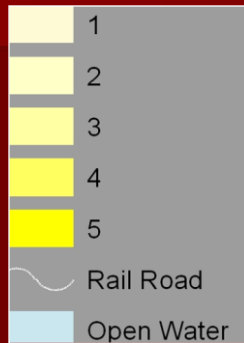
Large-Lot Subdivision



The Workshop Results

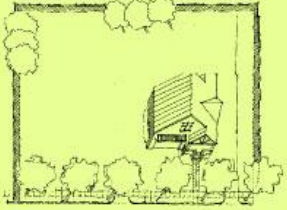
Large Lot Subdivision

Occurrence



State Highway 37

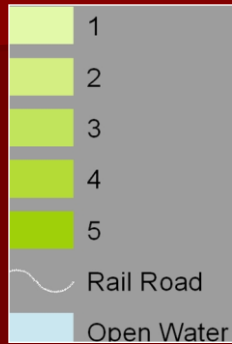
Rural Housing



The Workshop Results

Rural Housing

Occurrence



US Highway 31

US Highway 31

State Highway 72

State Highway 113

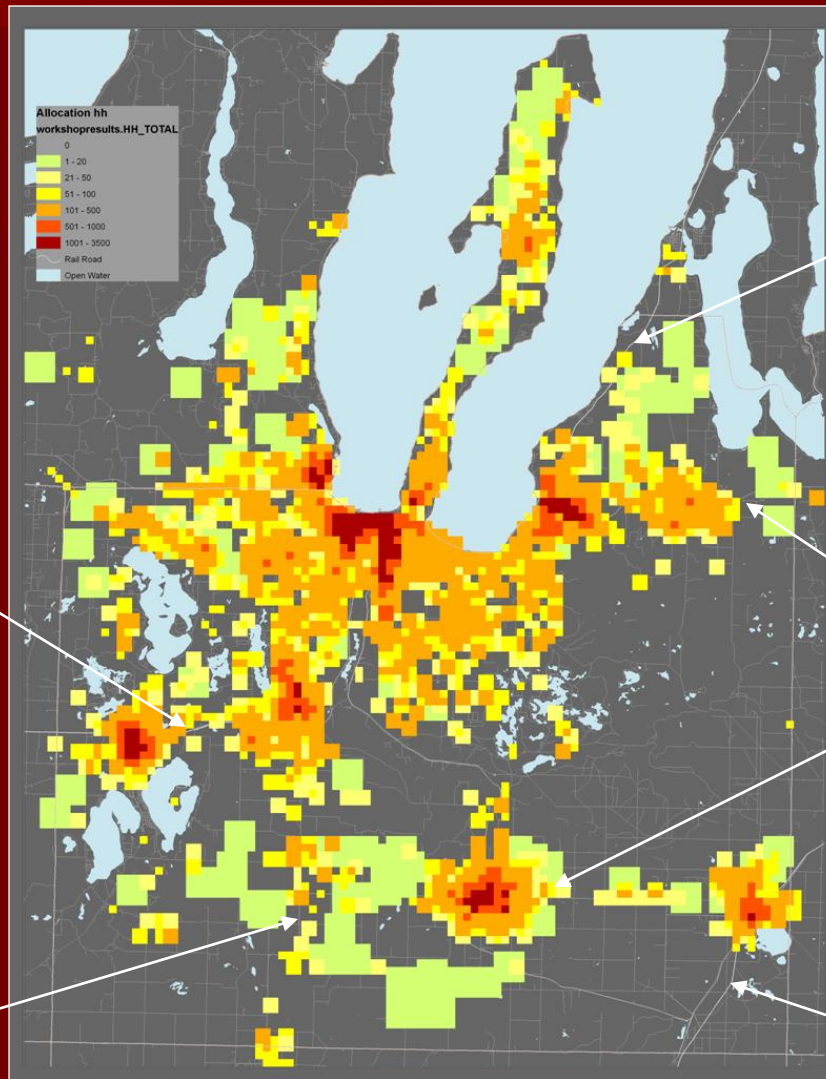
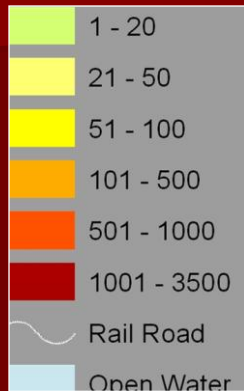
State Highway 37

US Highway 131

The Workshop Results

Total Housing Units

Number



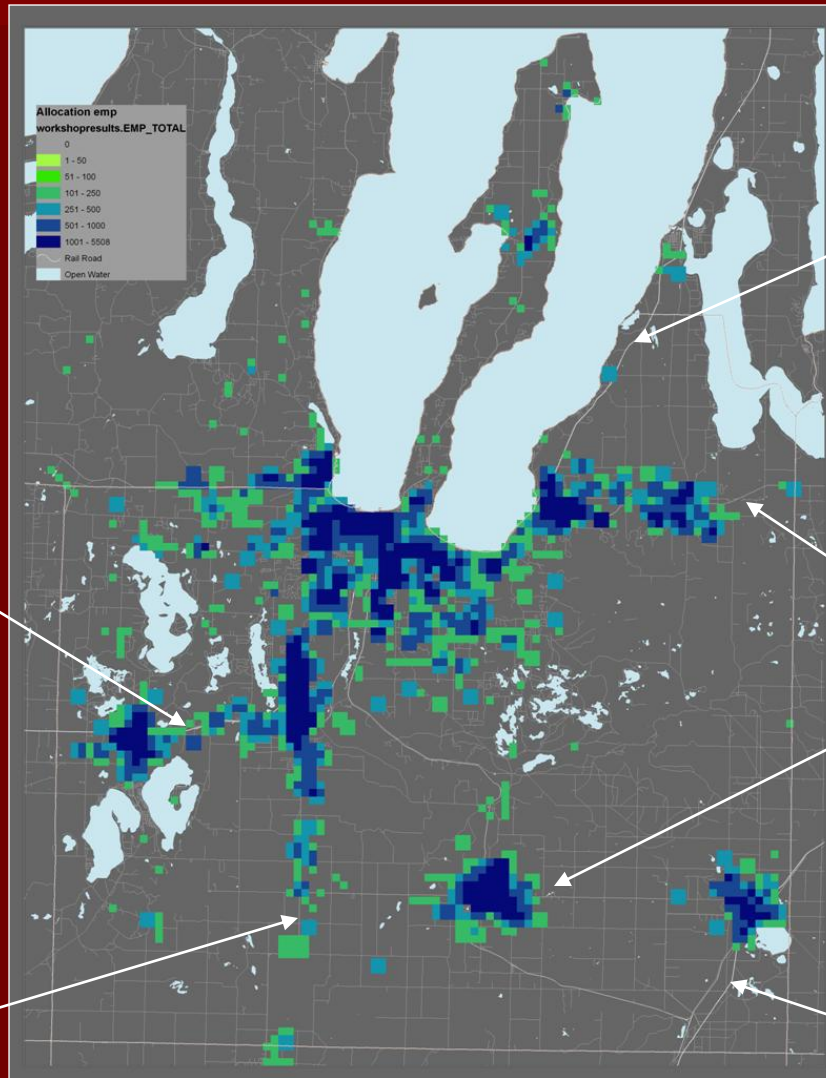
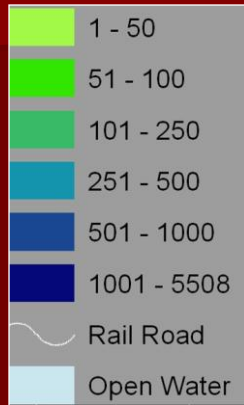
State Highway 37

US Highway 131

The Workshop Results

Total Jobs

Number



US Highway 31

State Highway 72

State Highway 113

US Highway 131

US Highway 31

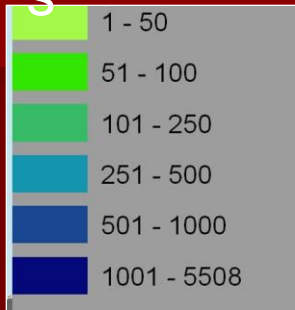
State Highway 37

The Workshop Results

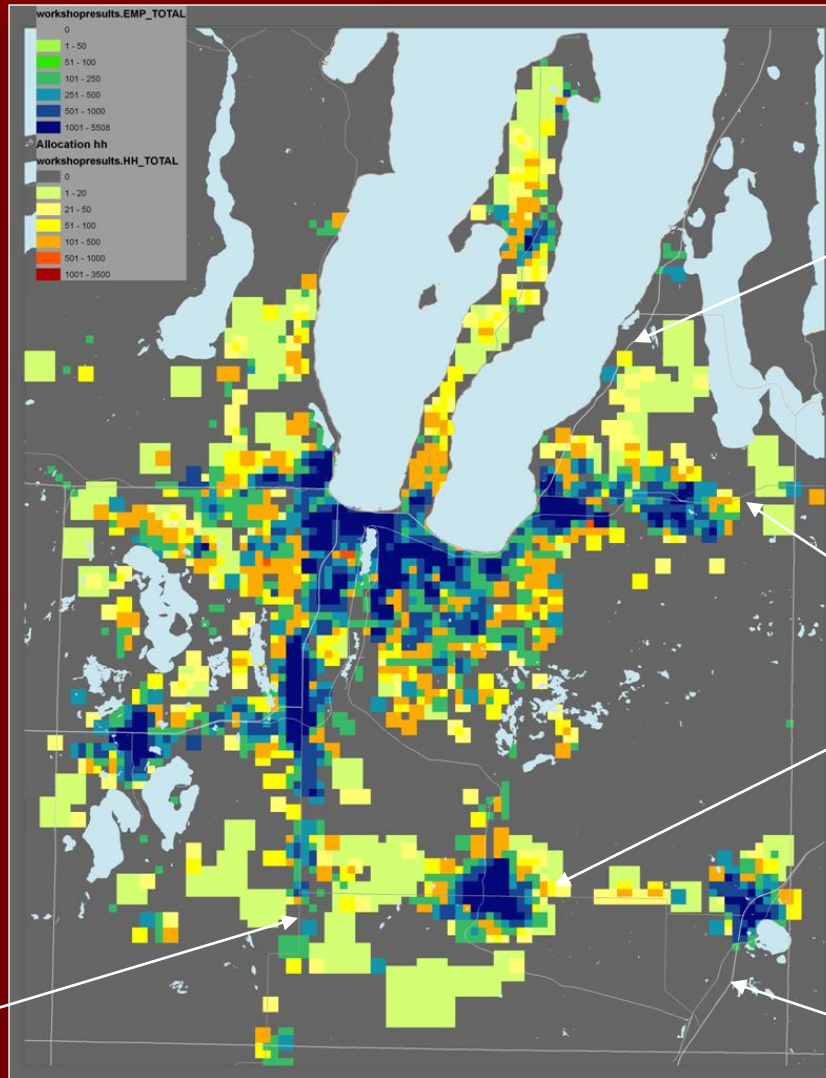
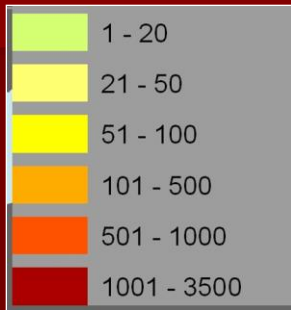
Housing Units and Jobs Combined

Job

S



Housing
Units



US Highway 31

State Highway 72

State Highway 113

State Highway 37

US Highway 131

The Workshop Results

Roads by Occurrence

“Beautify roadways”

“Beltway – no consensus on exact route but consensus on concept”

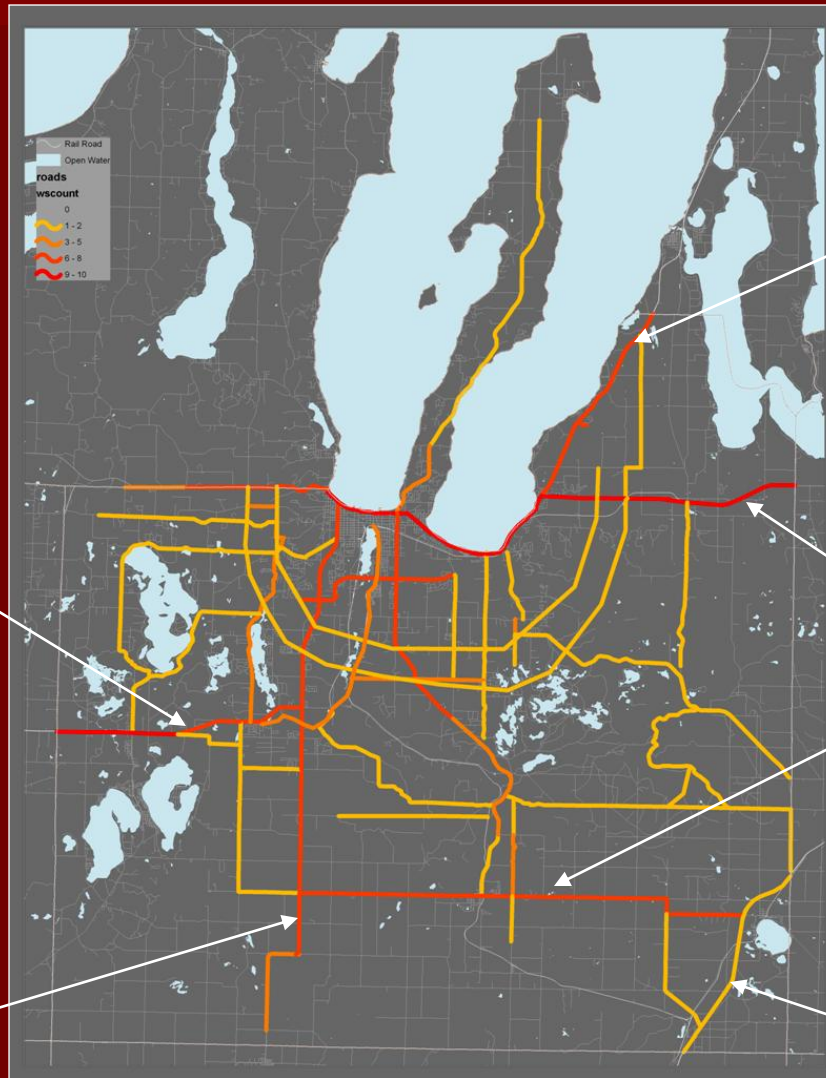
“Reduce downtown congestion through traffic”

“Needs to move traffic south of TC to N of TC without going through town along Bay”

“Better alternative for drivers from Leelzawau County to the back side of TC”

“Bridge very controversial but starts a good dialogue”

Occurrence



US Highway 31

State Highway 72

State Highway 113

US Highway 31

State Highway 37

US Highway 131

The Workshop Results

Public Transportation by Occurrence

*“More mass transit
Improve existing rail lines
for transit”*

“More BATA routes”

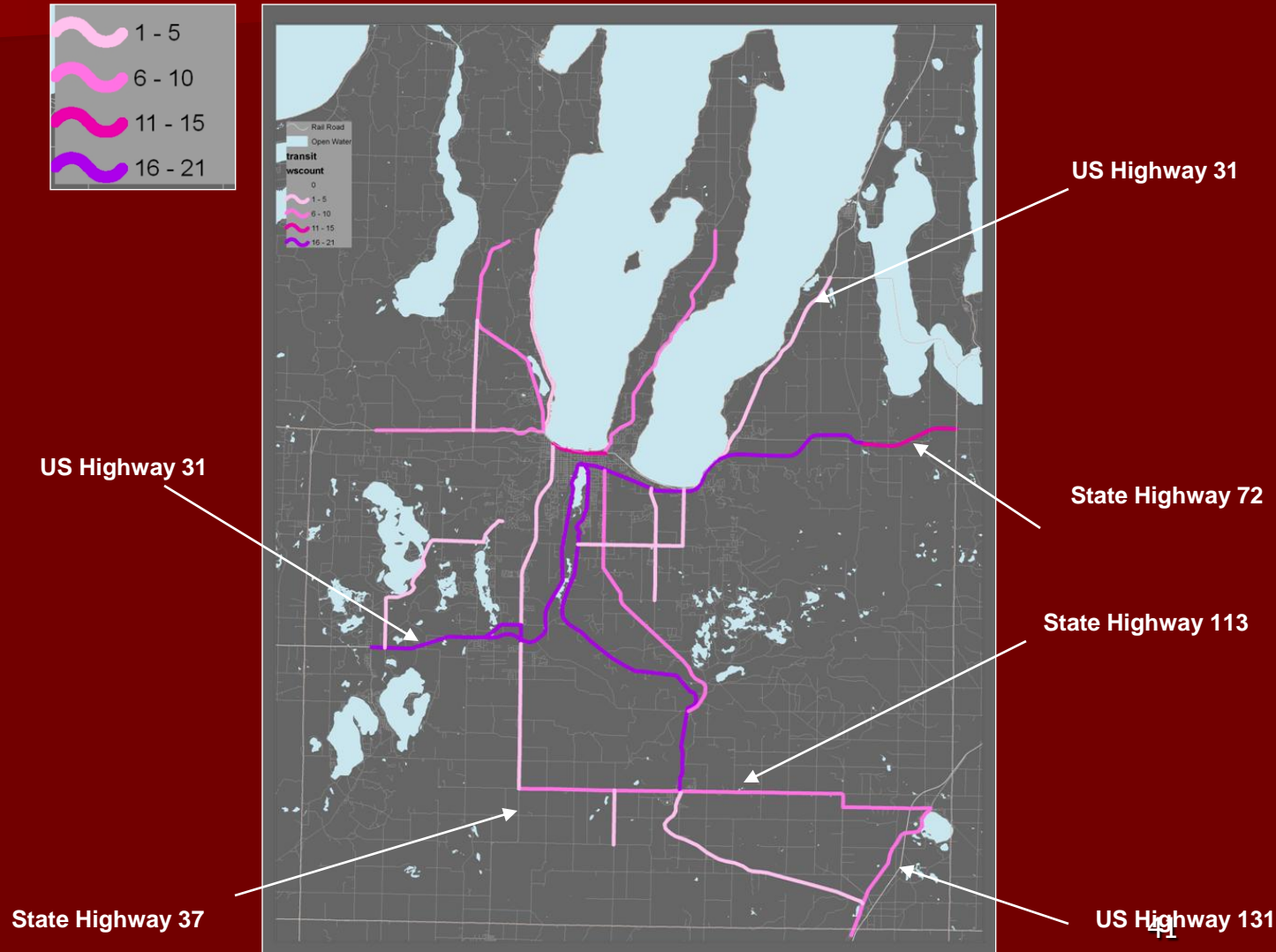
*“Light rail system feeding
from Lee, Benzia,
Interlochen, Kingsley,
and east from Antrim
County”*

Regional Transit:

*“Rail service for southern
Michigan”*

*“High speed rail to Grand
Rapids”*

Occurrence



The Workshop Results

Trail Network by Occurrence

“Develop TC commuter, bike paths, plan for bikes in town”

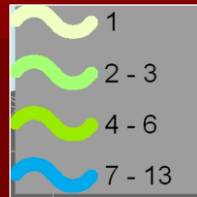
“Public safety—pedestrian bridges over parkway”

“More bike trails”

“Build \$50 million Santiago Calotrova design pedestrian bridge linking the bay to downtown TC”

“Interlochen – TC Bike Route”

Occurrence



US Highway 31

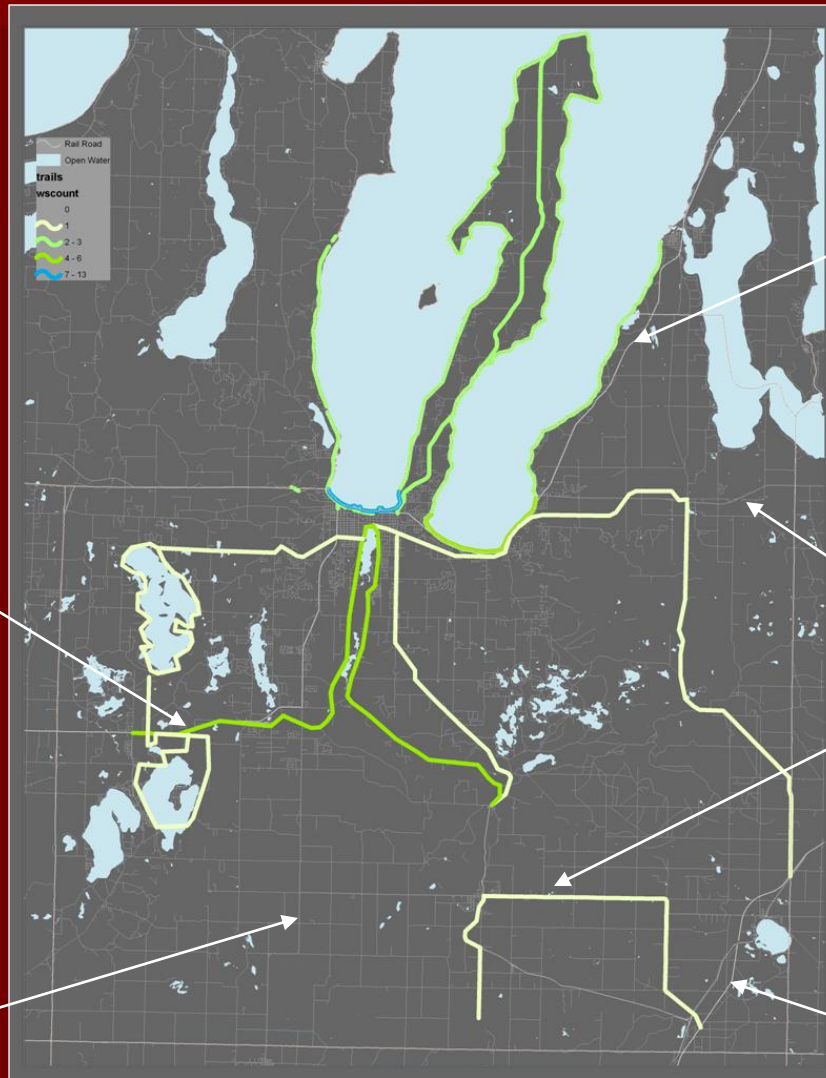
State Highway 37

US Highway 31

State Highway 72

State Highway 113

US Highway 131



The Workshop Results

Open Space by Occurrence

“Preservation of agriculture, public lands, and urban park space”

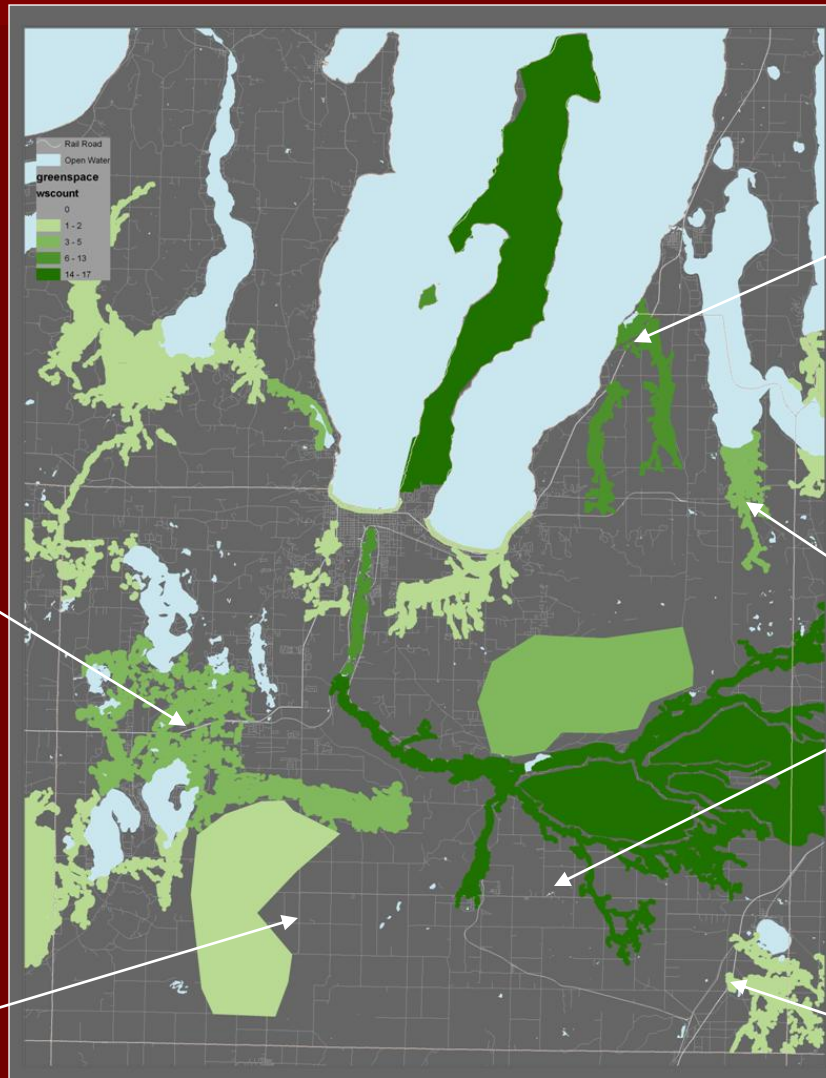
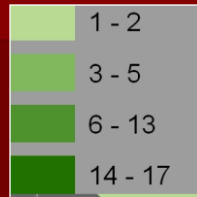
“Protect natural resources, water quality, natural features and open space”

“Emphasize purchase of development rights in key approach areas to preserve open space and the rural look”

“Protect our watershed for clean water”

“High density for the sake of preserving open space”

Occurrence



US Highway 31

State Highway 72

State Highway 113

US Highway 131

US Highway 31

State Highway 37

Grand Traverse Initial Draft Scenarios

Scenarios

The following slides show four possible *scenarios* for Grand Traverse County we've identified using all of the maps:

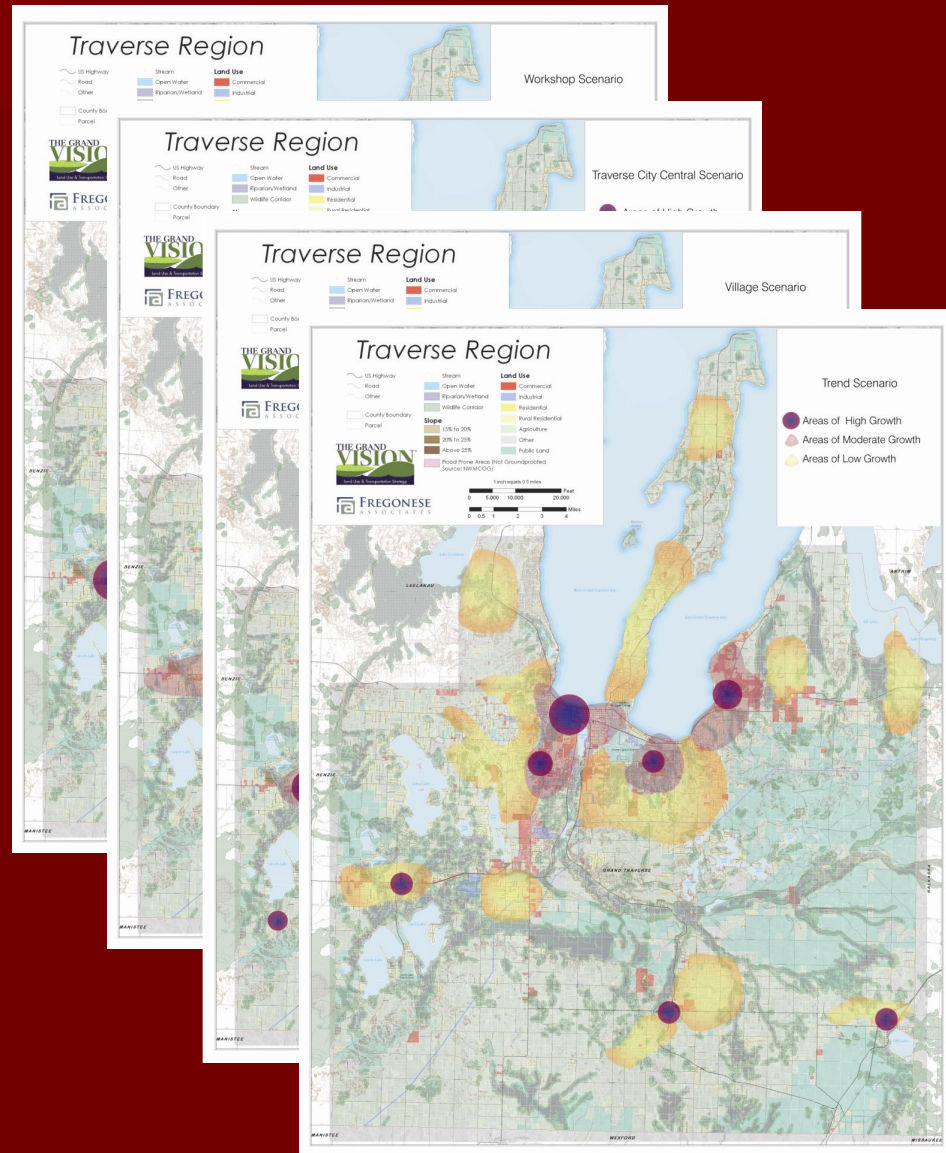
Trend

Central City

Villages

Workshop

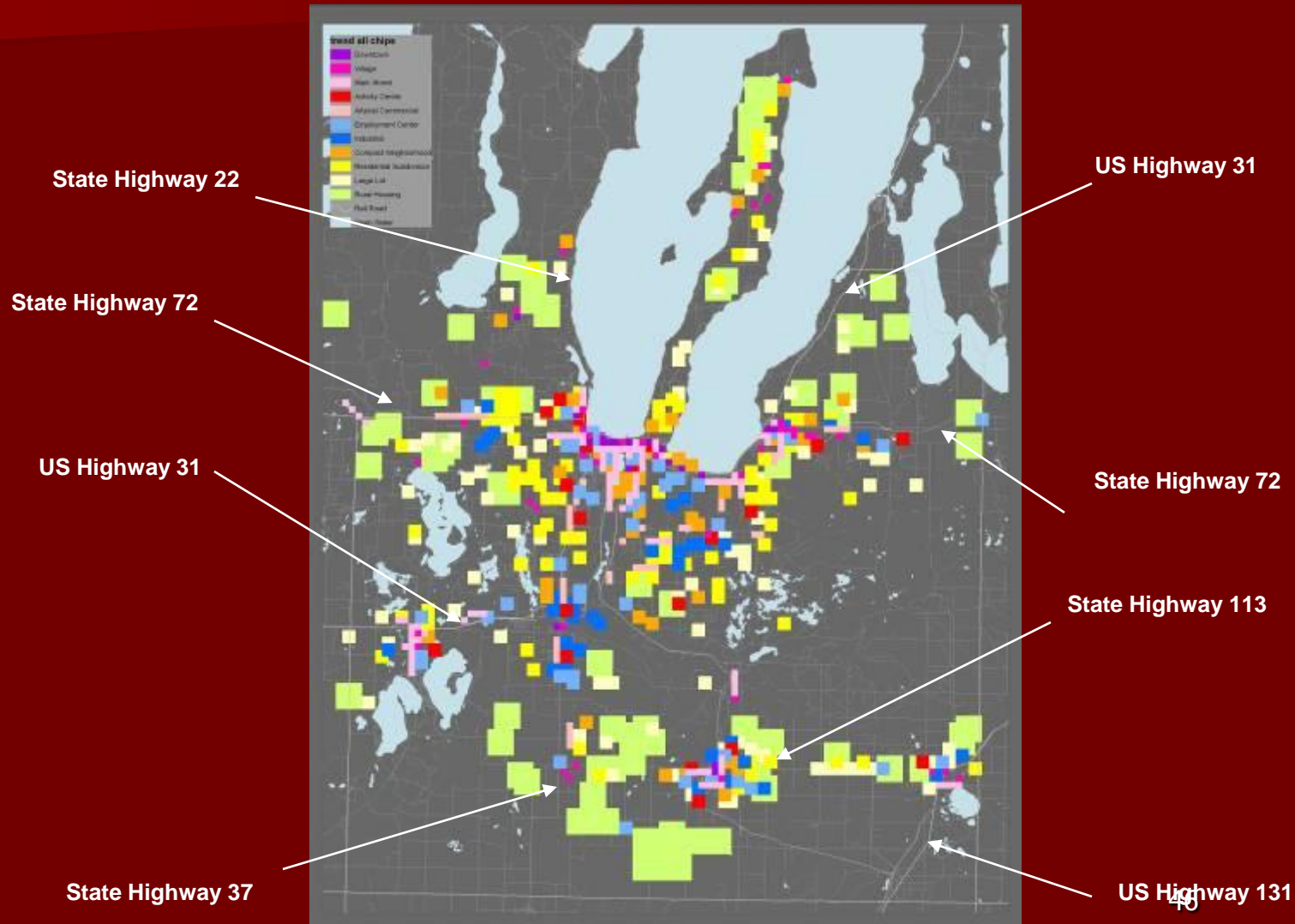
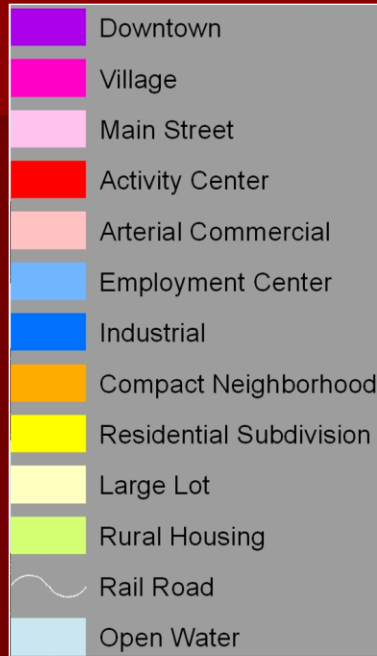
Consensus



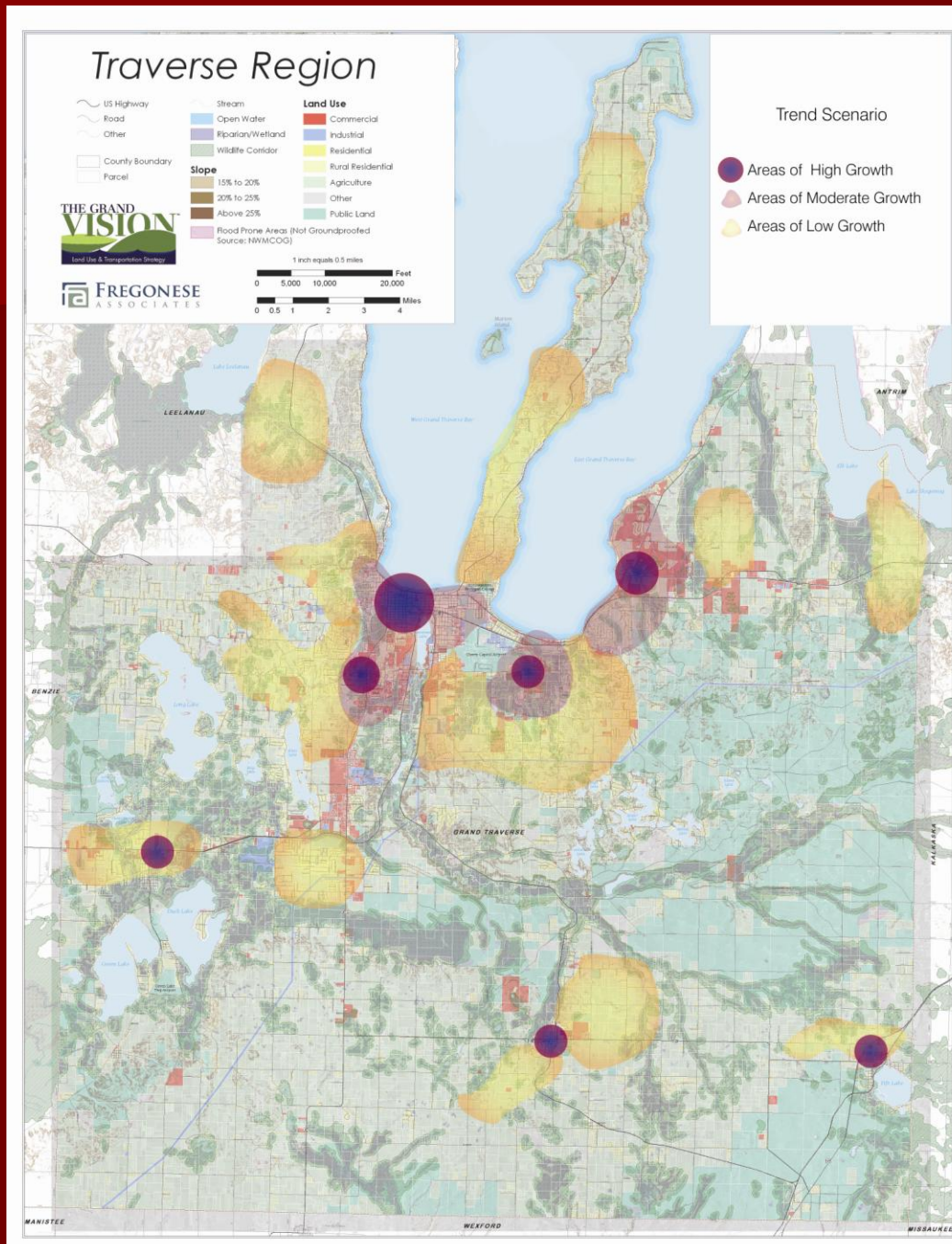
Trend (Note some areas shown developed are in conservation protection)

The Workshop

Map Composite



Trend

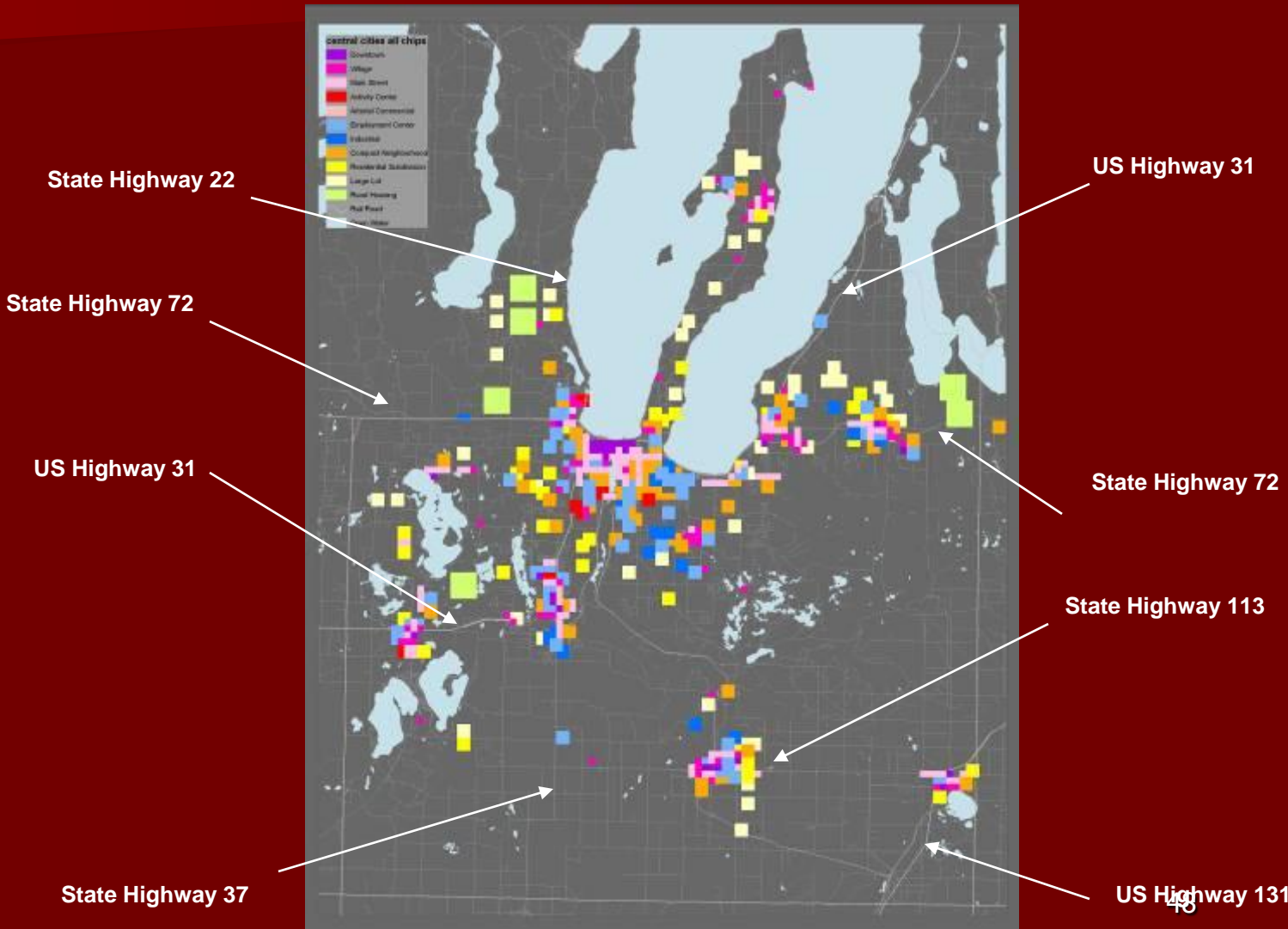


Central City

The Workshop

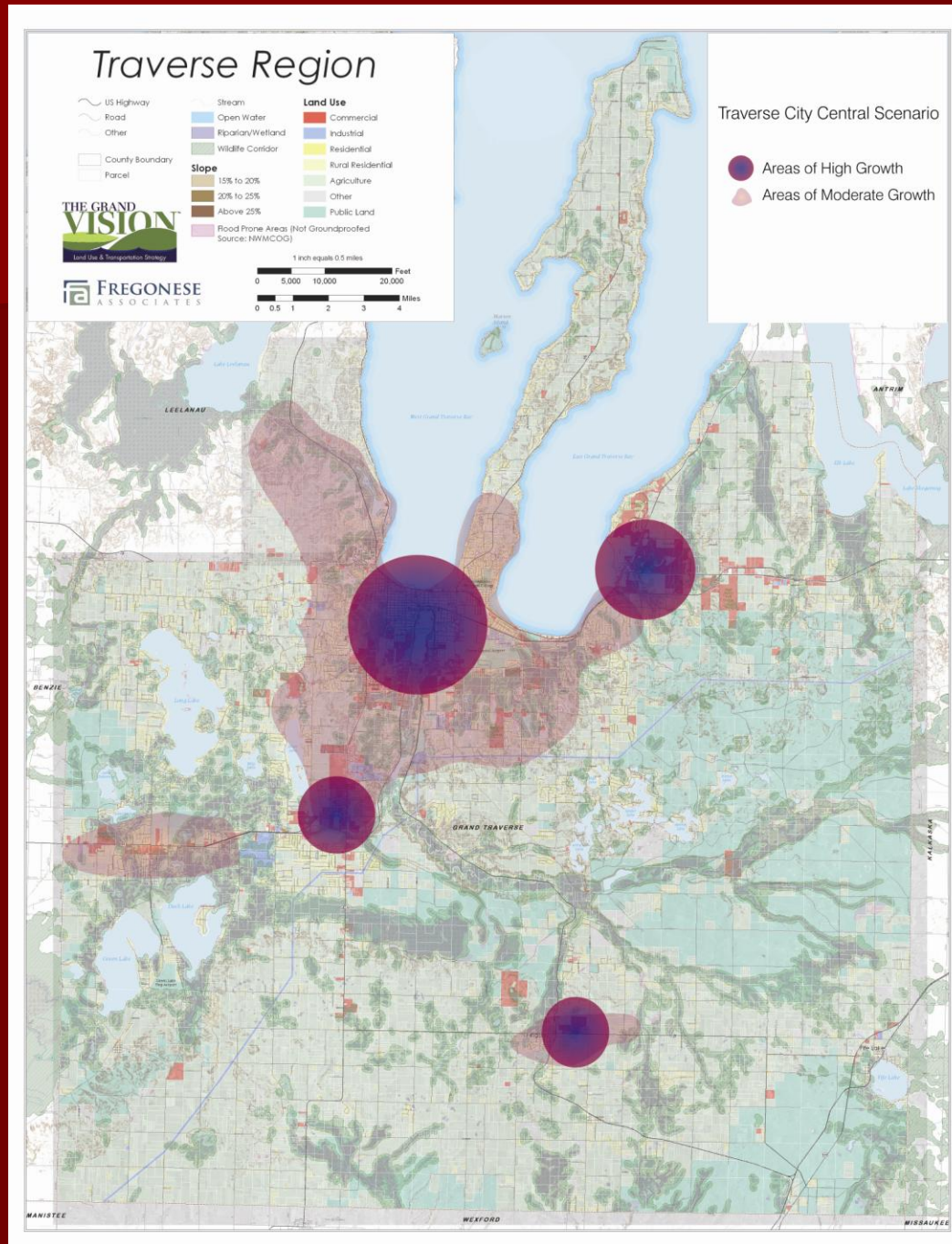
Map Composite

- Downtown
- Village
- Main Street
- Activity Center
- Arterial Commercial
- Employment Center
- Industrial
- Compact Neighborhood
- Residential Subdivision
- Large Lot
- Rural Housing
- Rail Road
- Open Water



Scenarios

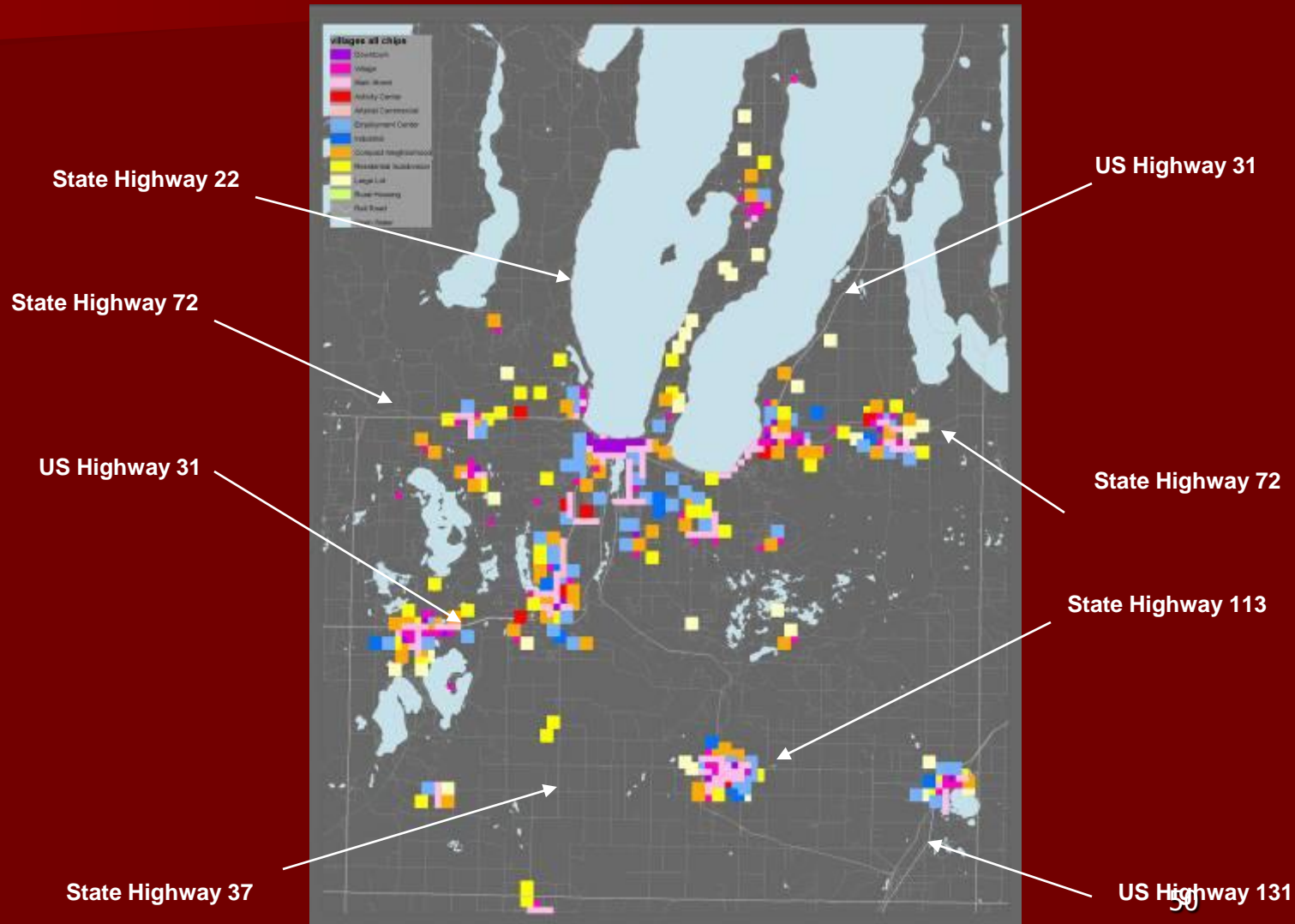
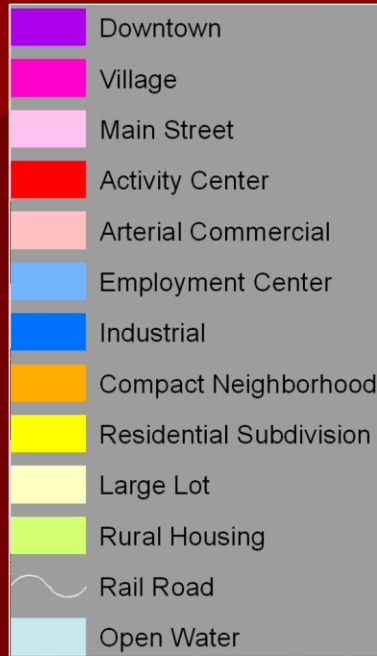
Central City



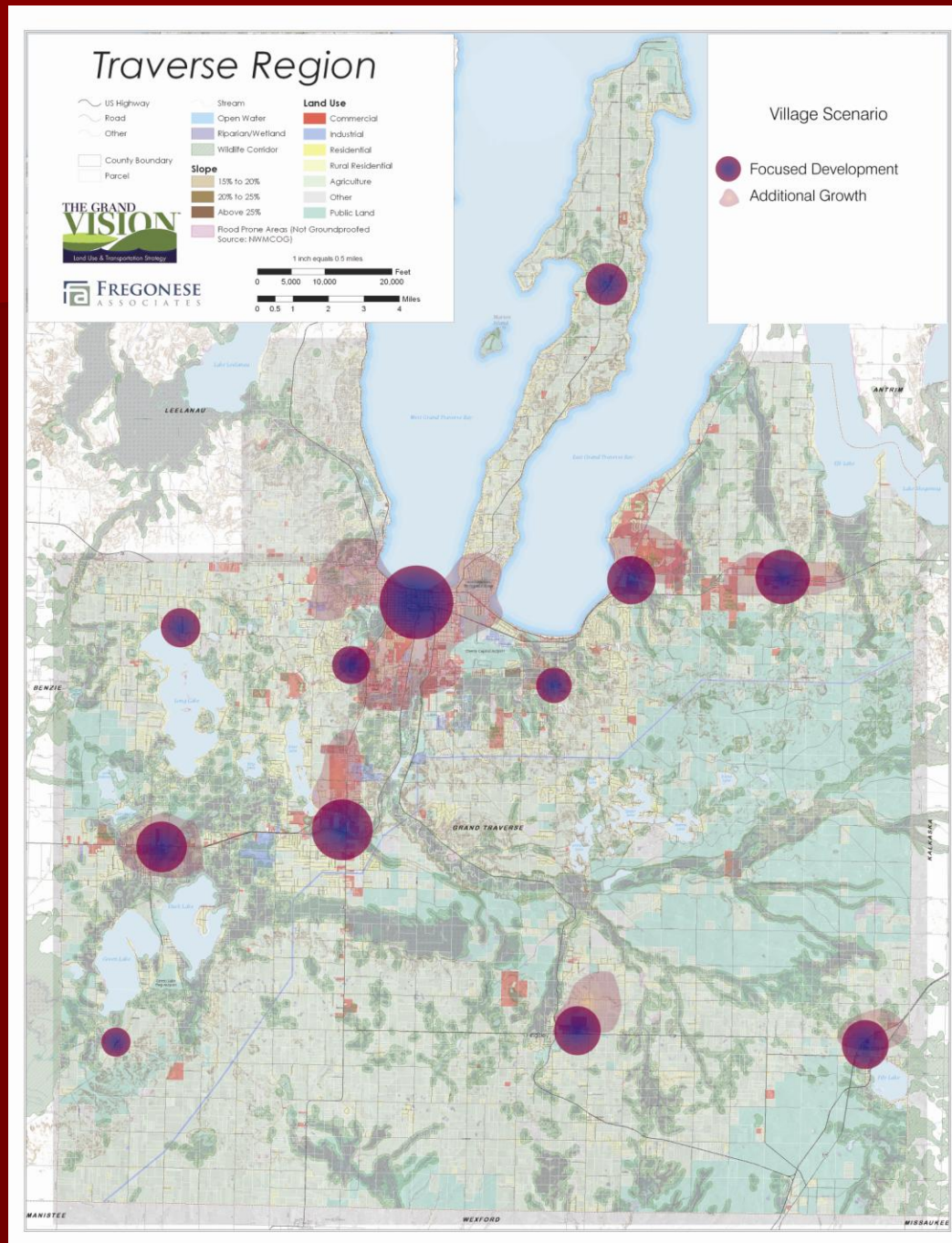
Villages

The Workshop

Map Composite



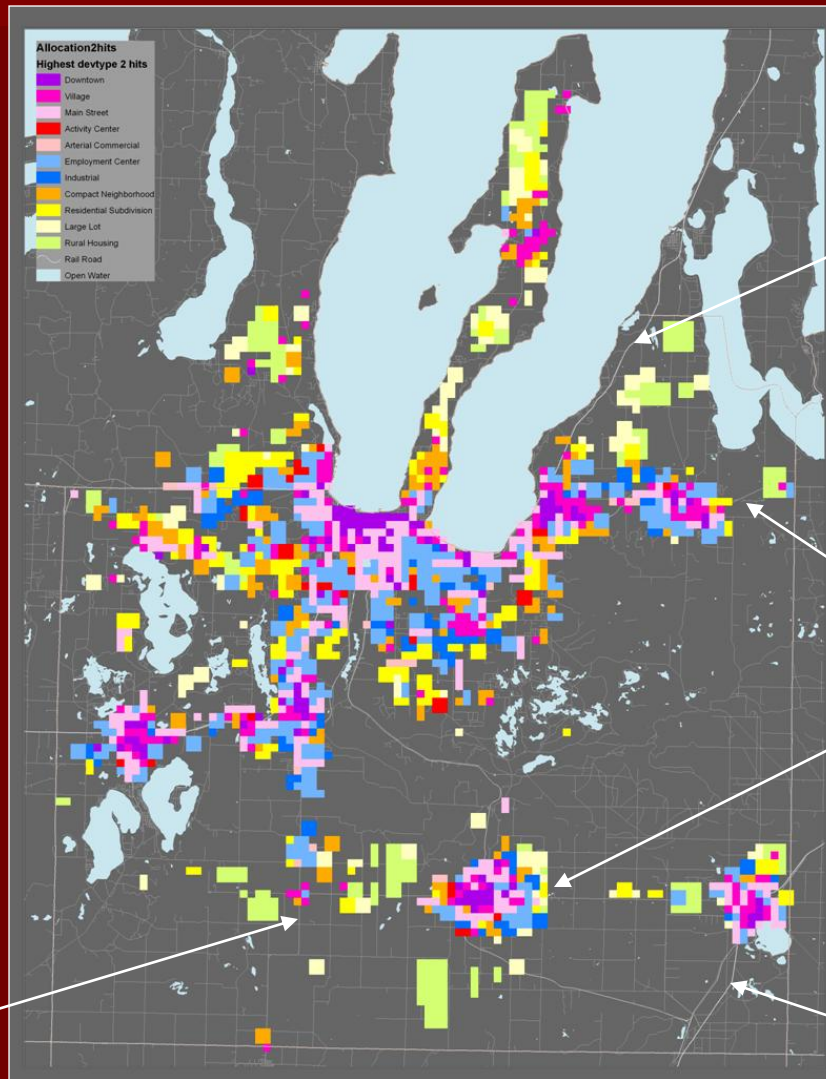
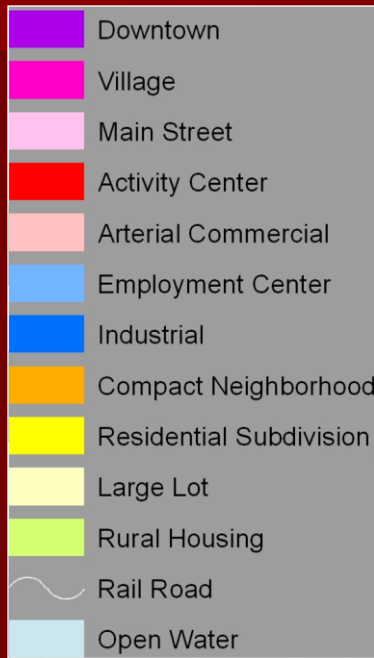
Villages



The Workshop Results

All Chips at least 2 Hits

Development Types



US Highway 31

State Highway 72

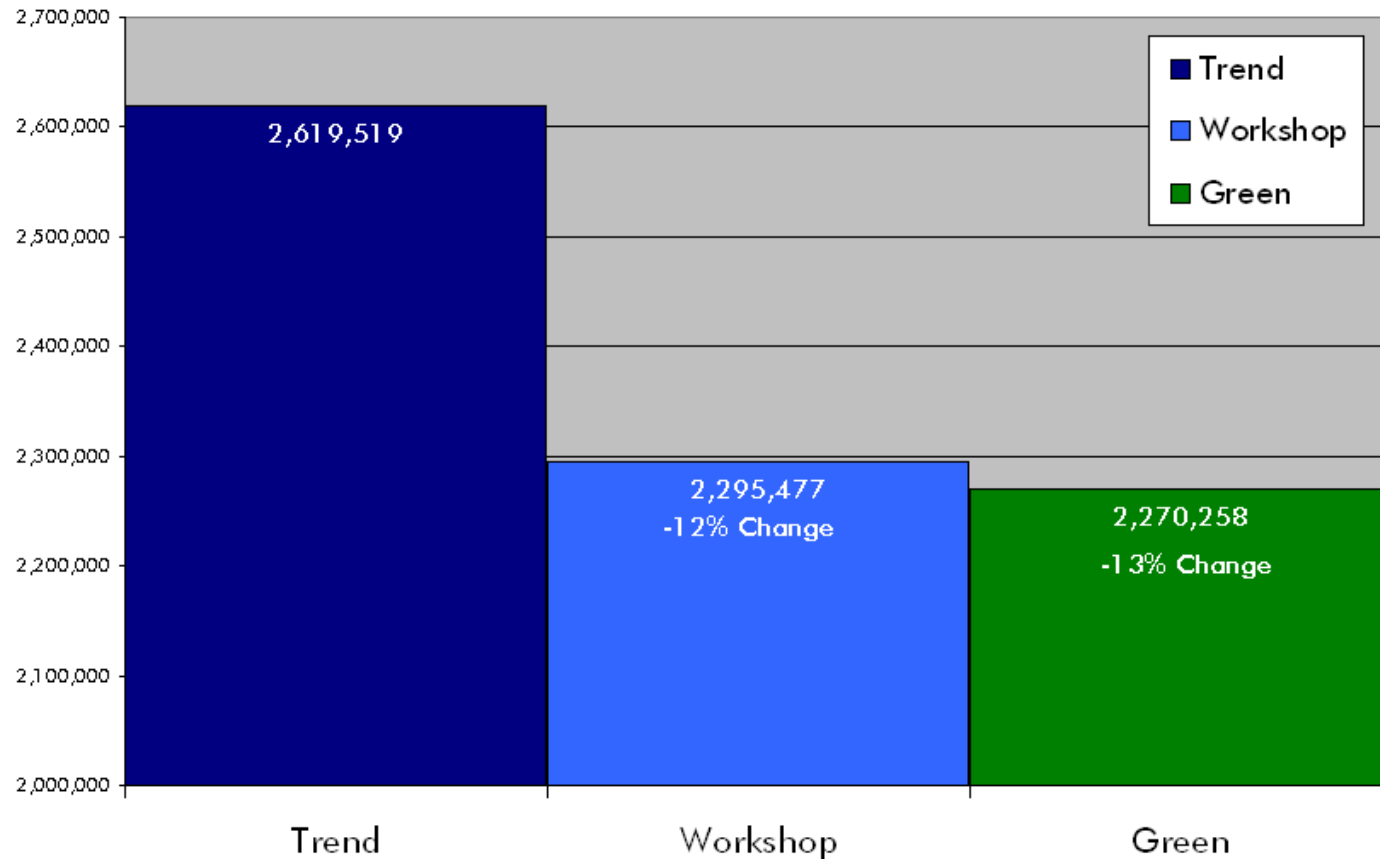
State Highway 113

State Highway 37

US Highway 131

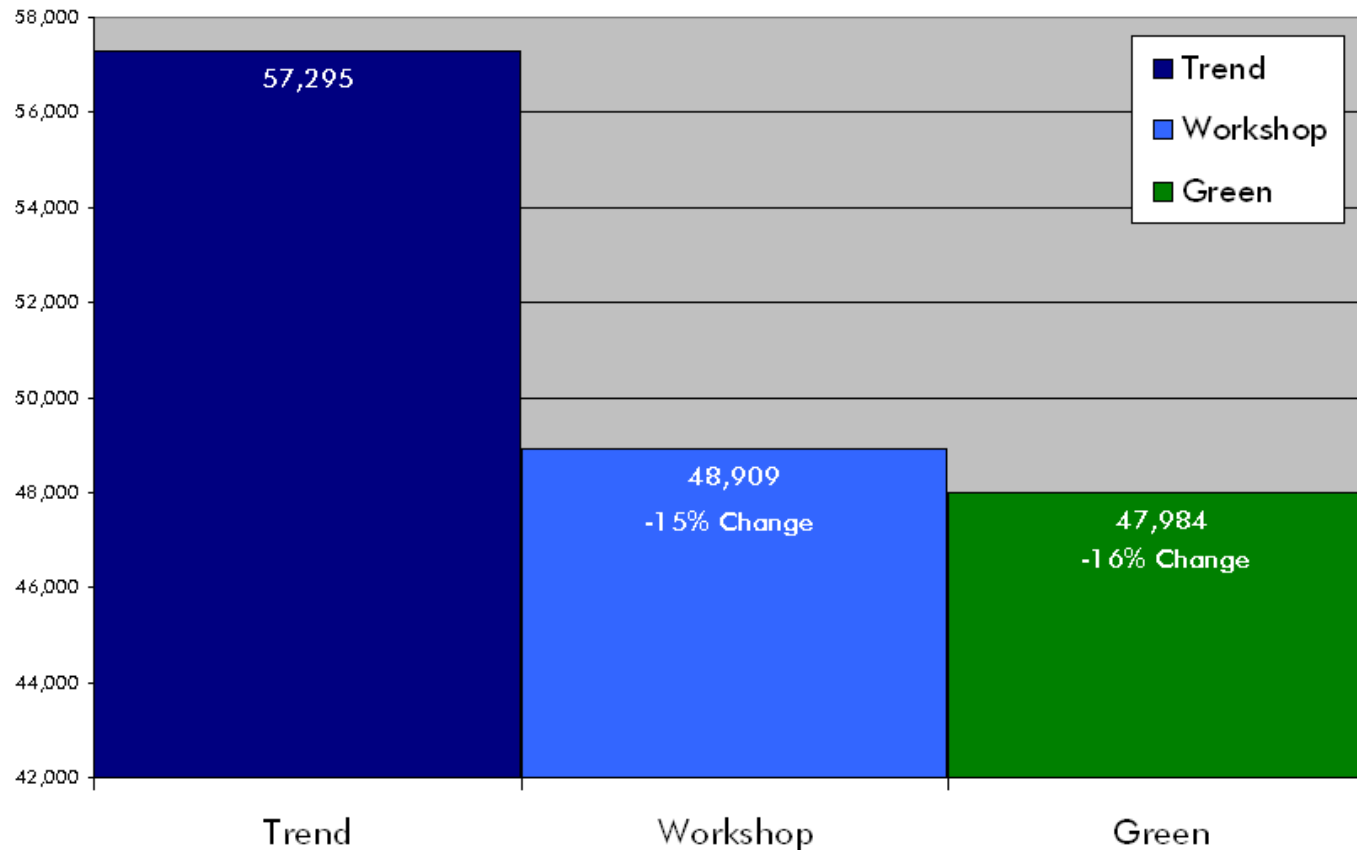
Modeling the Scenarios

Vehicle Miles Traveled

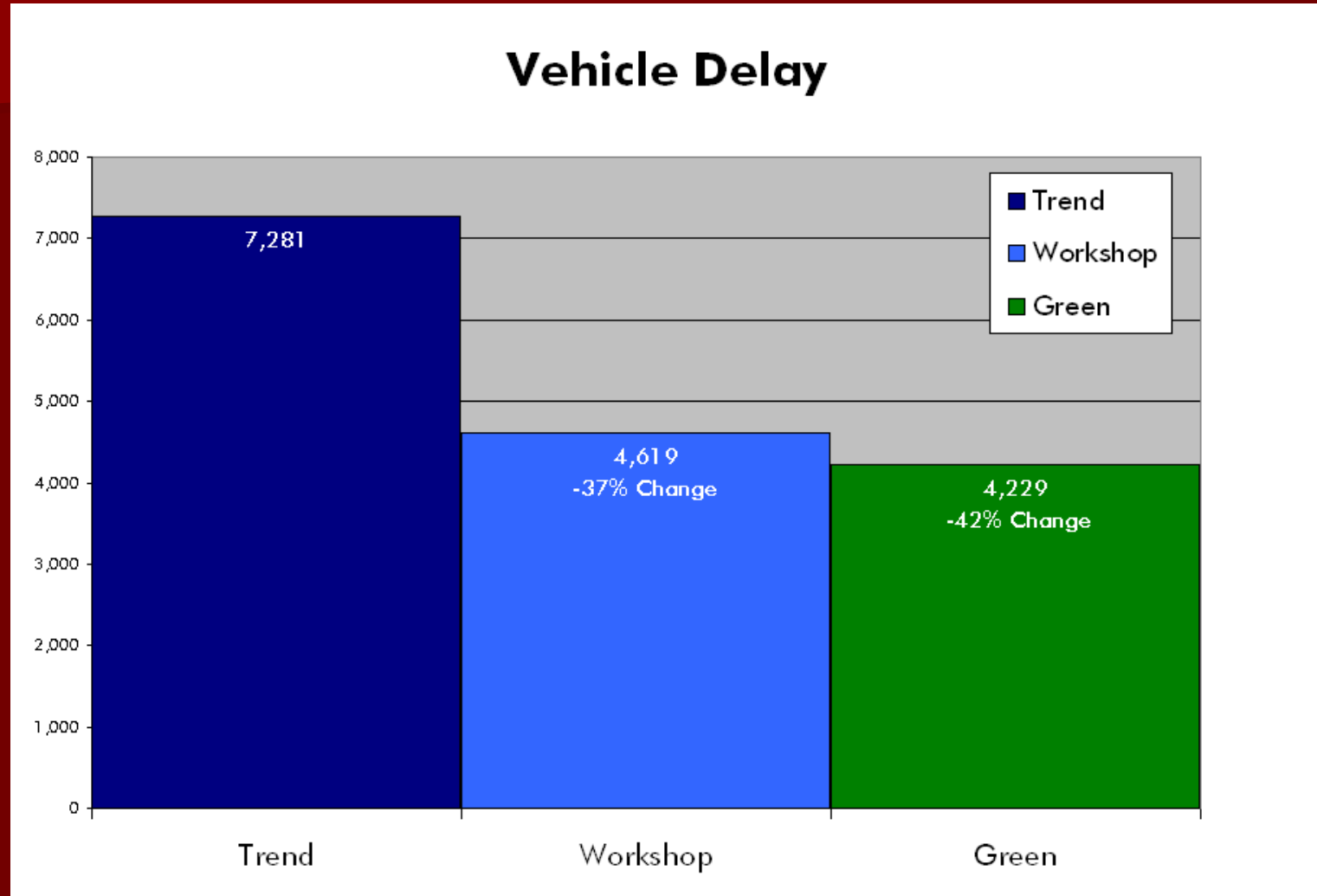


Modeling the Scenarios

Vehicle Hours Traveled



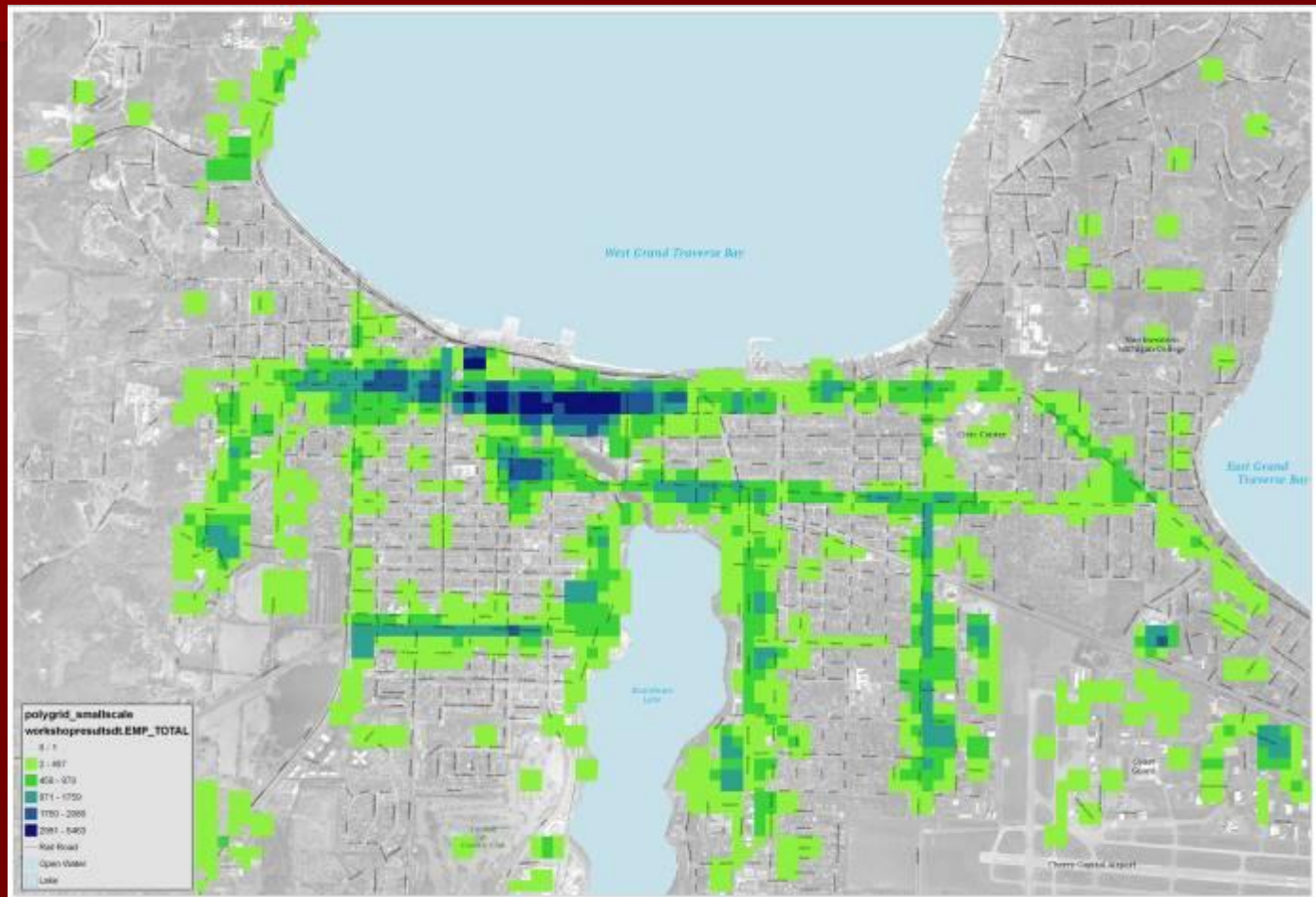
Modeling the Scenarios



Small Area Workshops

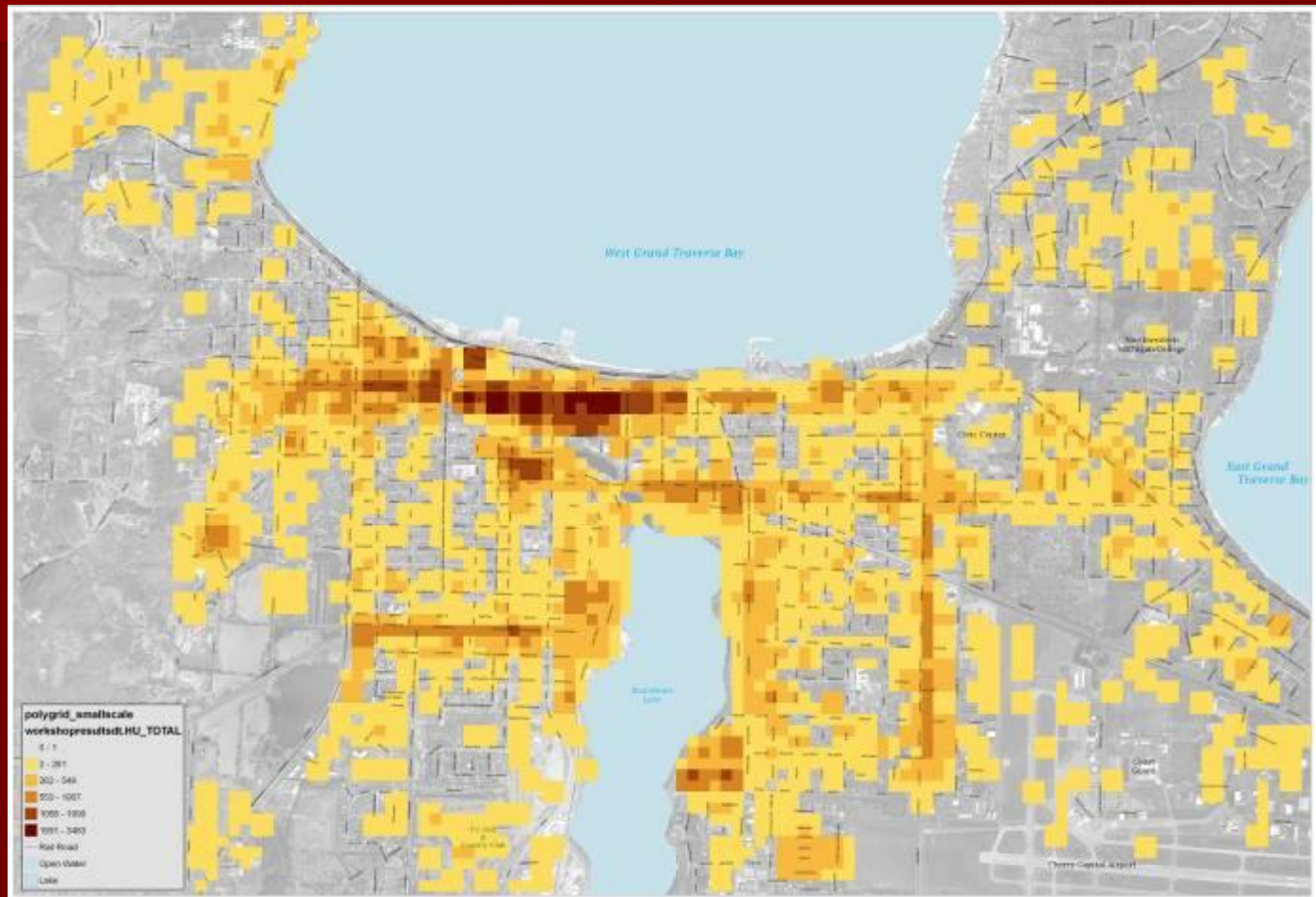
The Small Workshop Results

Downtown Total Jobs



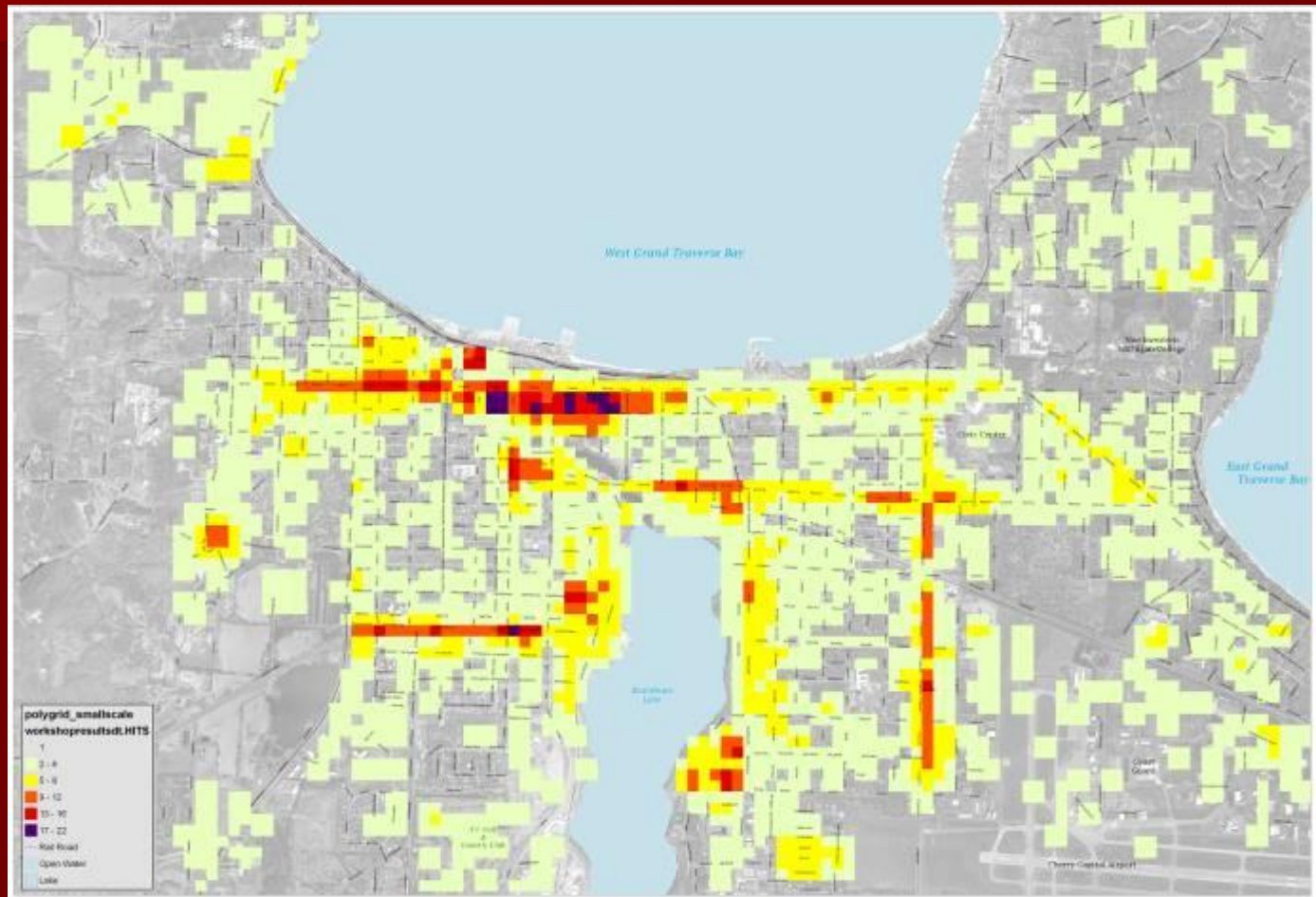
The Small Workshop Results

Downtown Total Housing Units



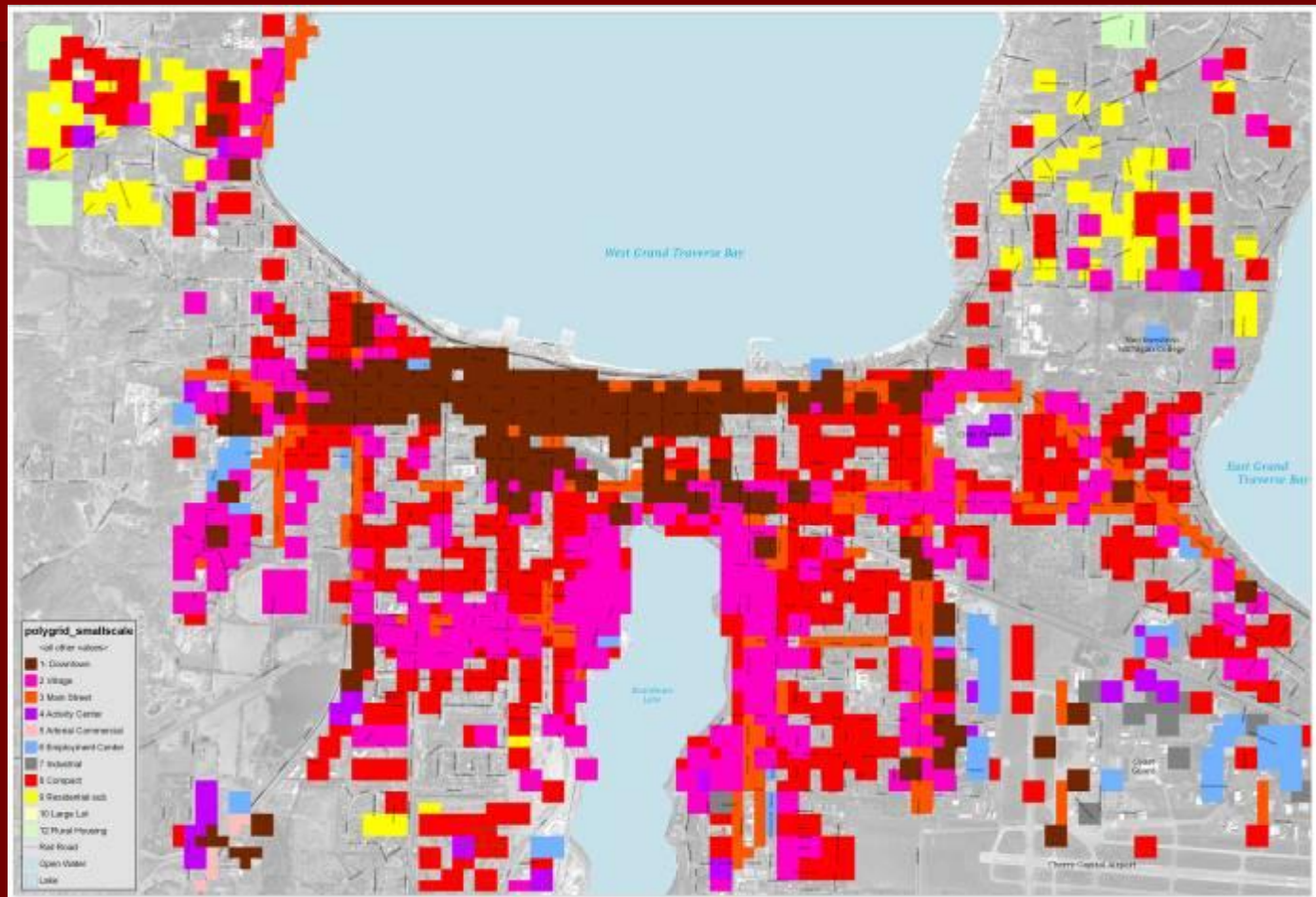
The Small Workshop Results

Downtown Chip Placement (Any Chip)



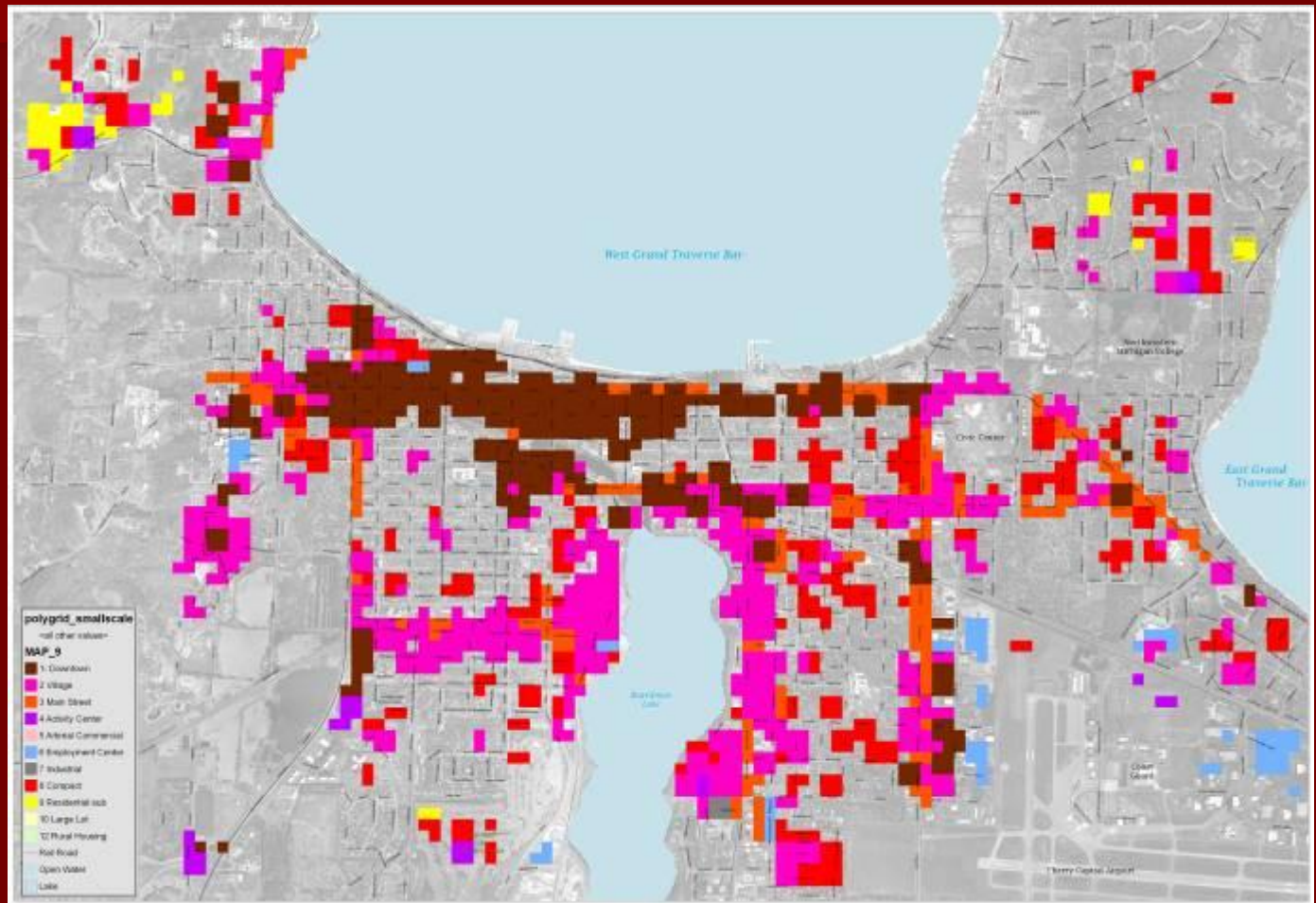
The Small Workshop Results

Downtown All Chips



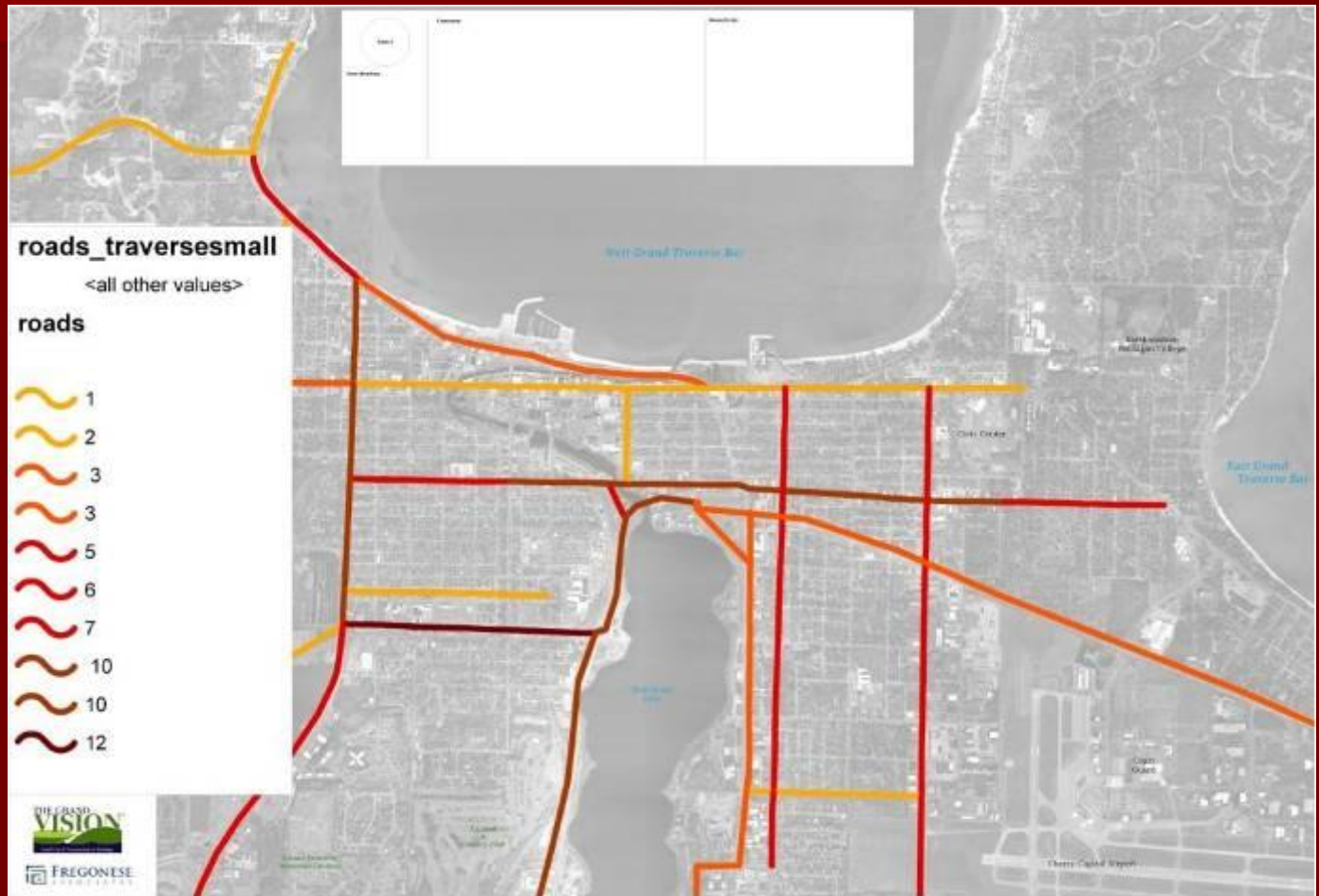
The Small Workshop Results

Downtown All Chips At Least 2 Hits



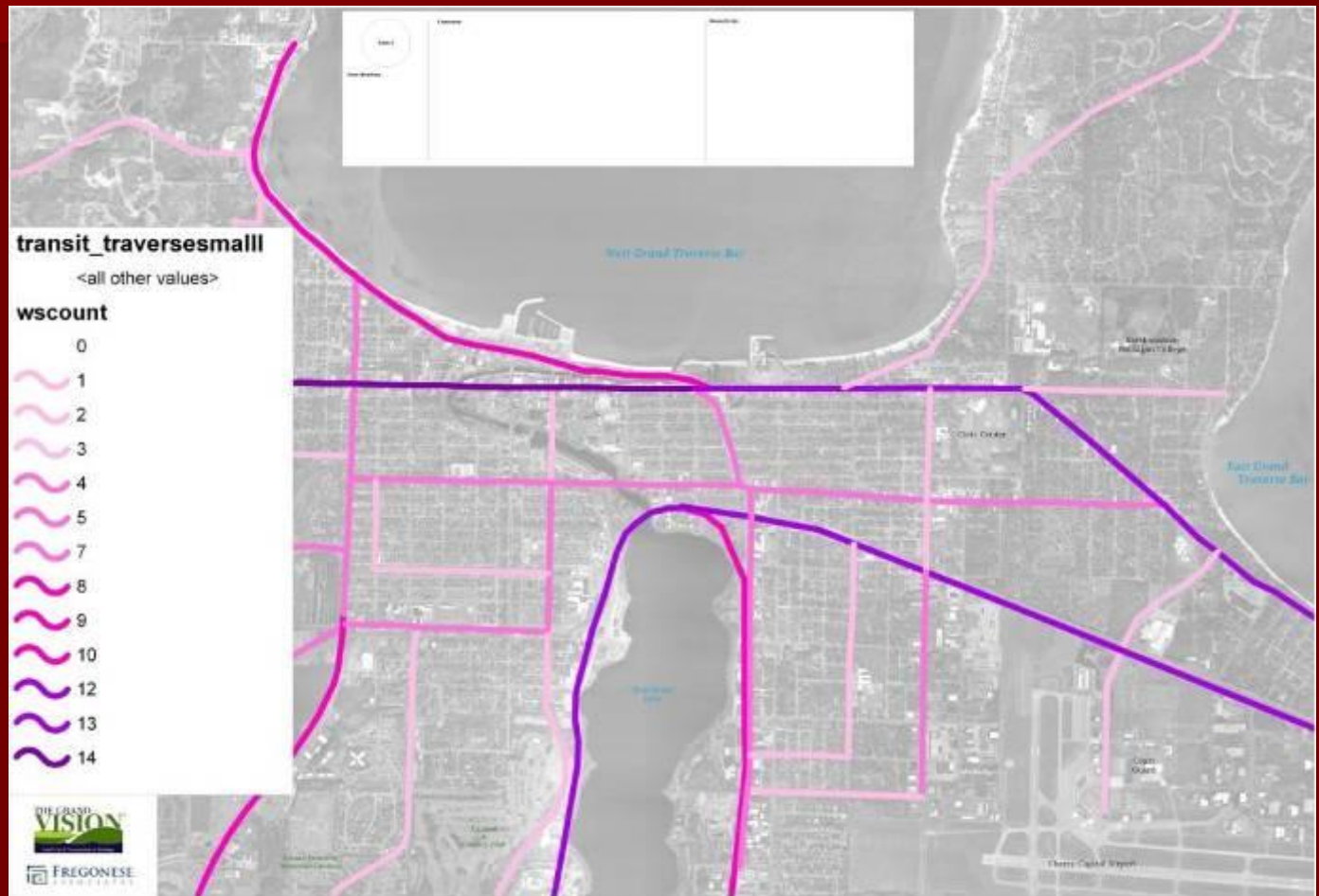
The Small Workshop Results

Downtown Roads By Occurrence



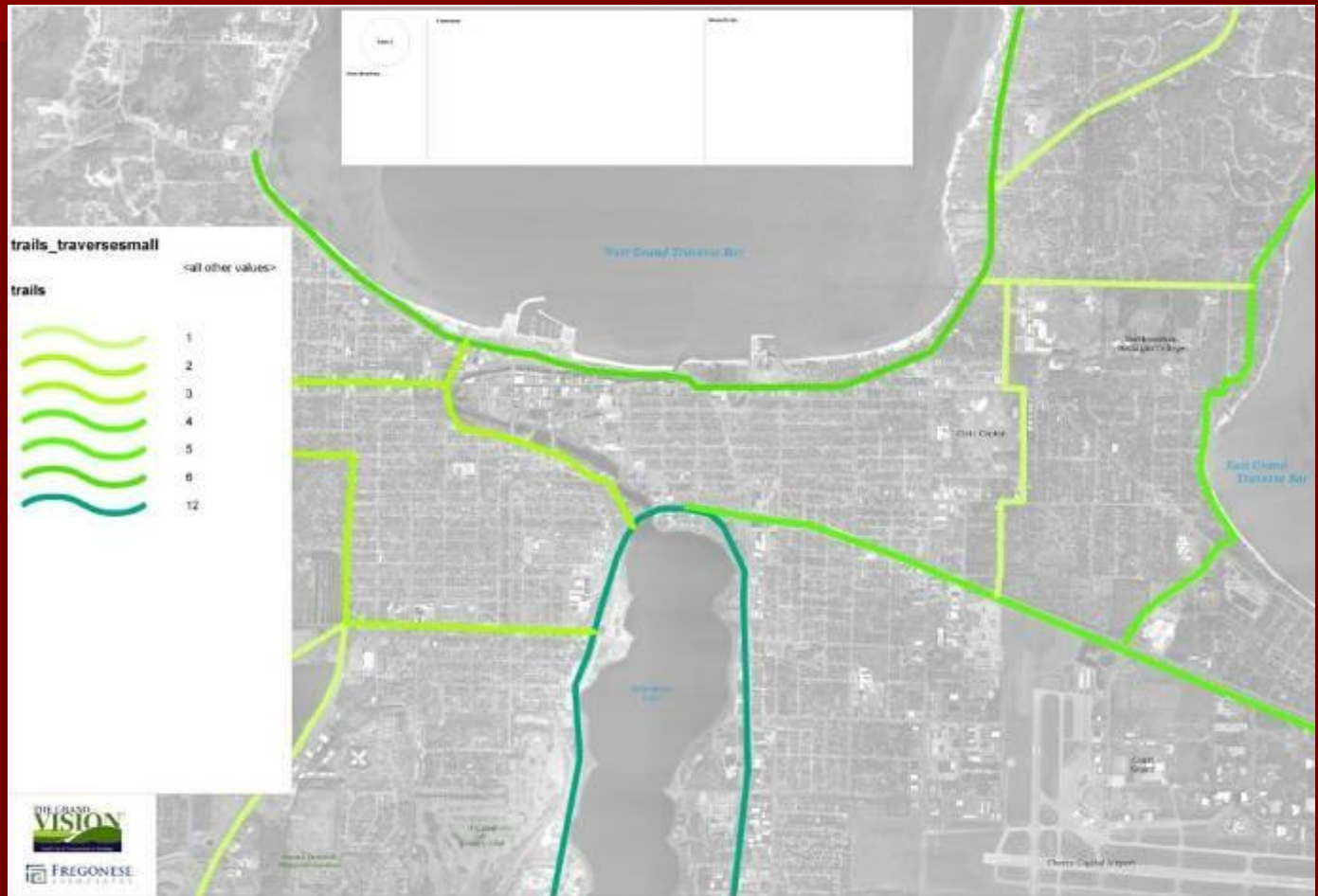
The Small Workshop Results

Downtown Public Transportation By Occurrence



The Small Workshop Results

Downtown Trails by Occurrence



The Small Workshop Results

Downtown Open Space by Occurrence



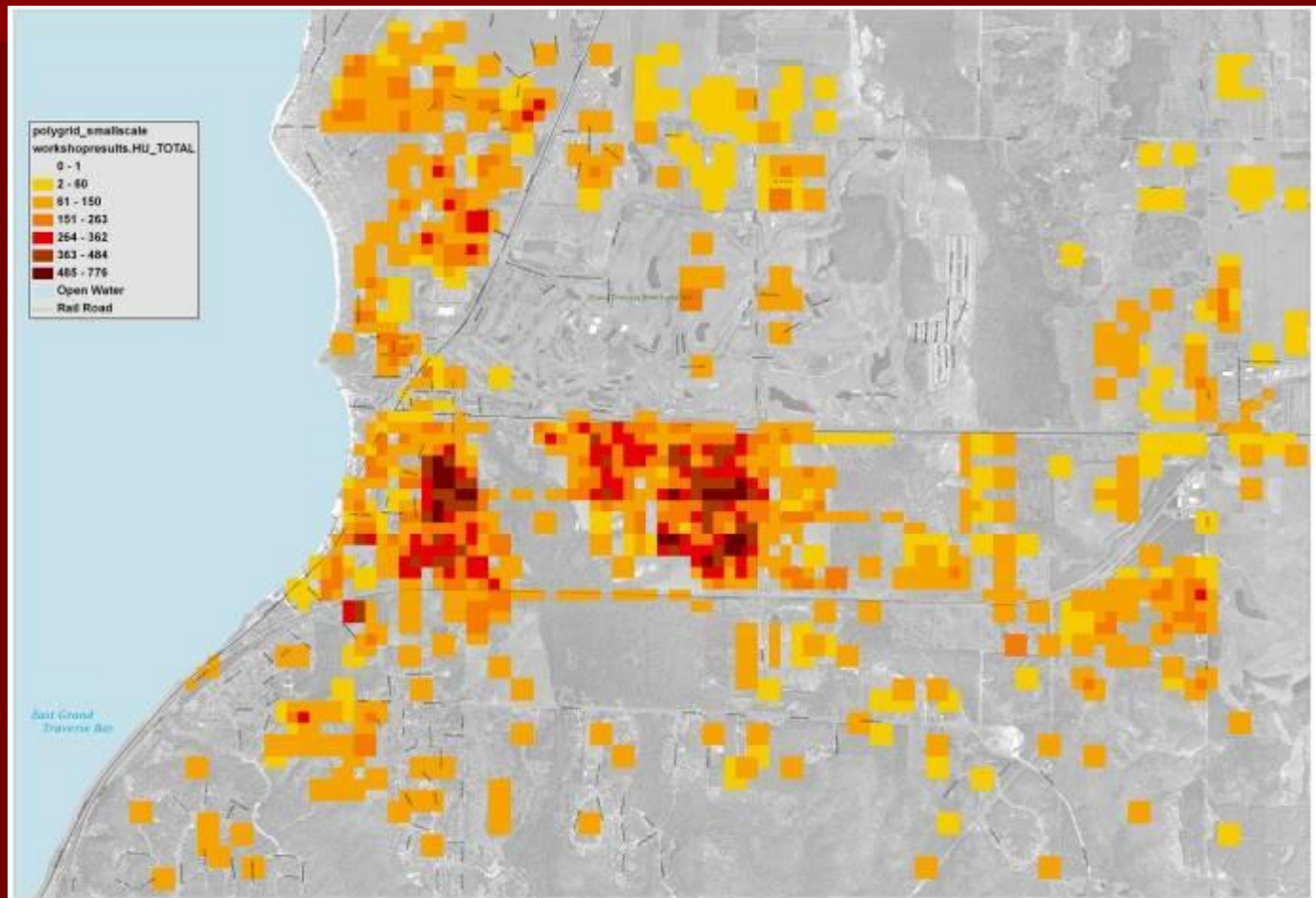
The Small Workshop Results

Acme Total Jobs



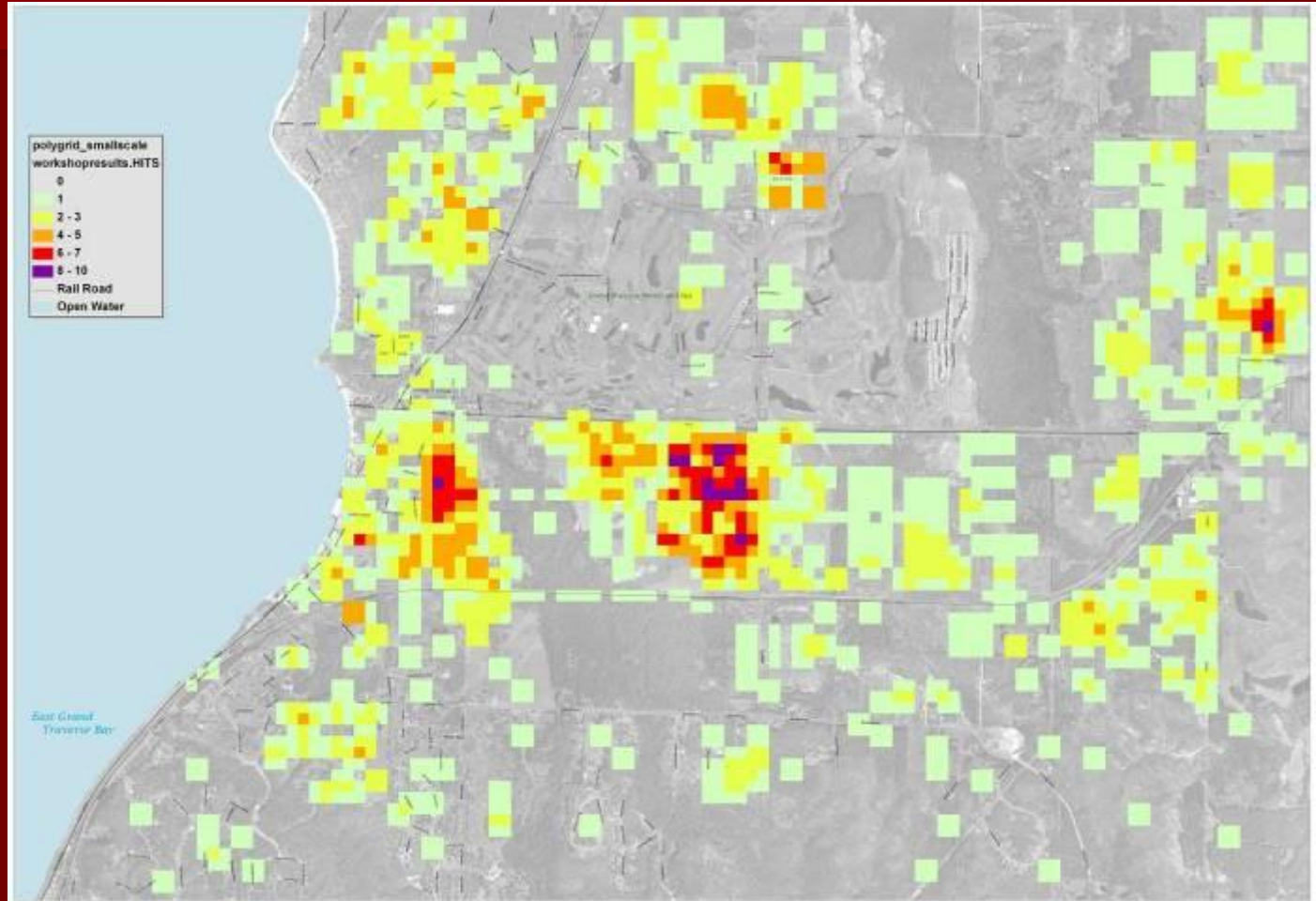
The Small Workshop Results

Acme Total Housing Units



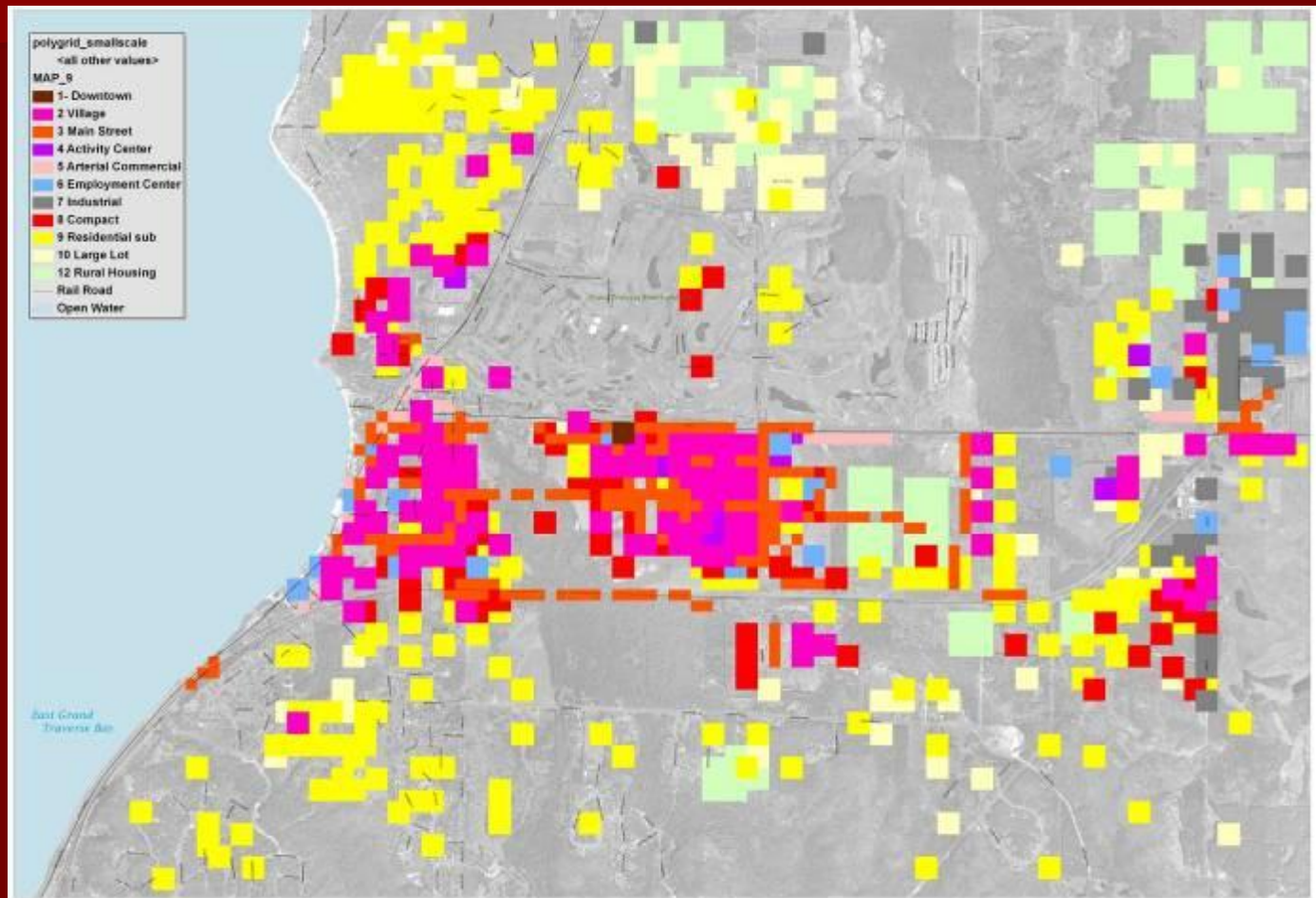
The Small Workshop Results

Acme Chip Placement (Any Chip)



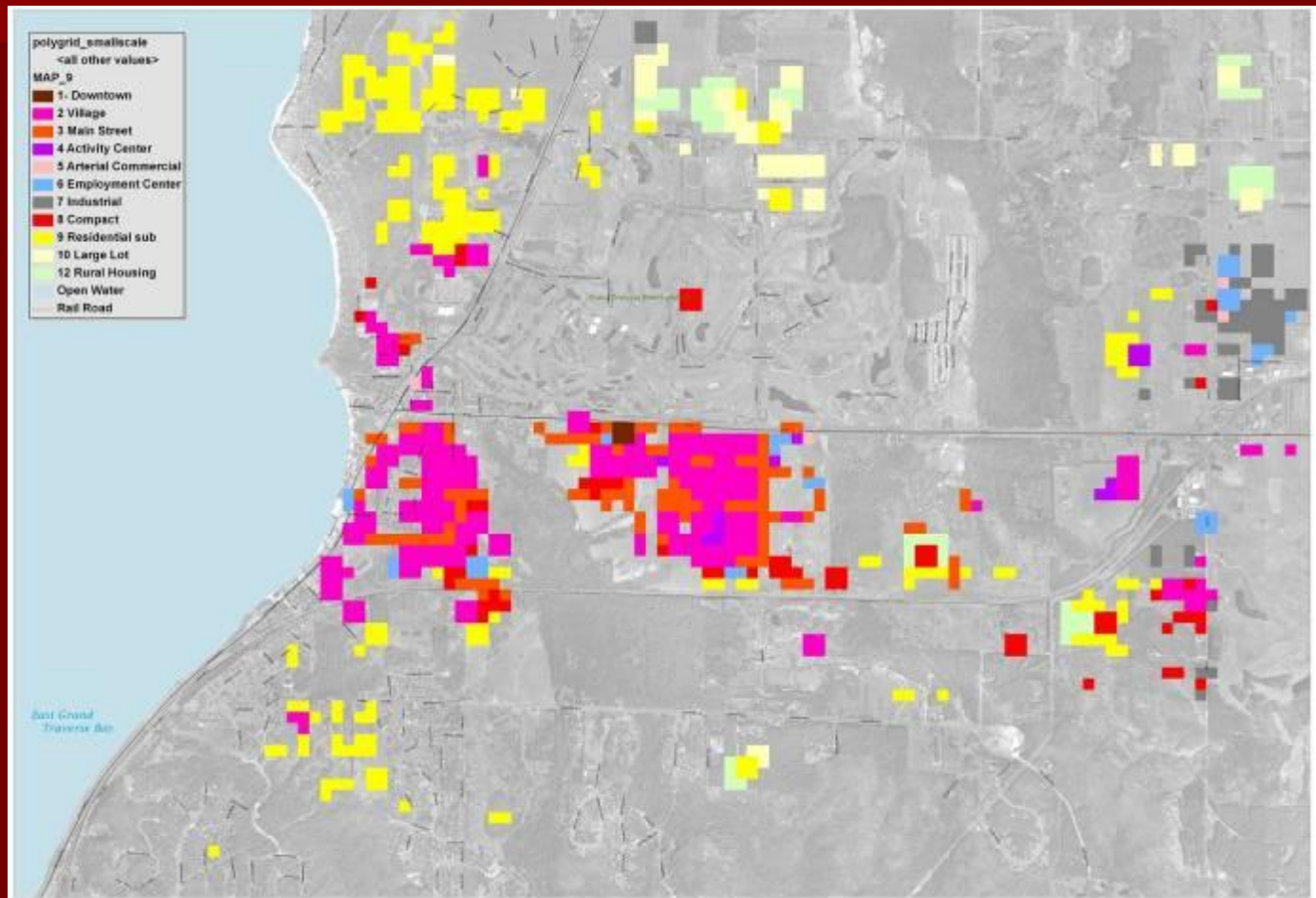
The Small Workshop Results

Acme All Chips



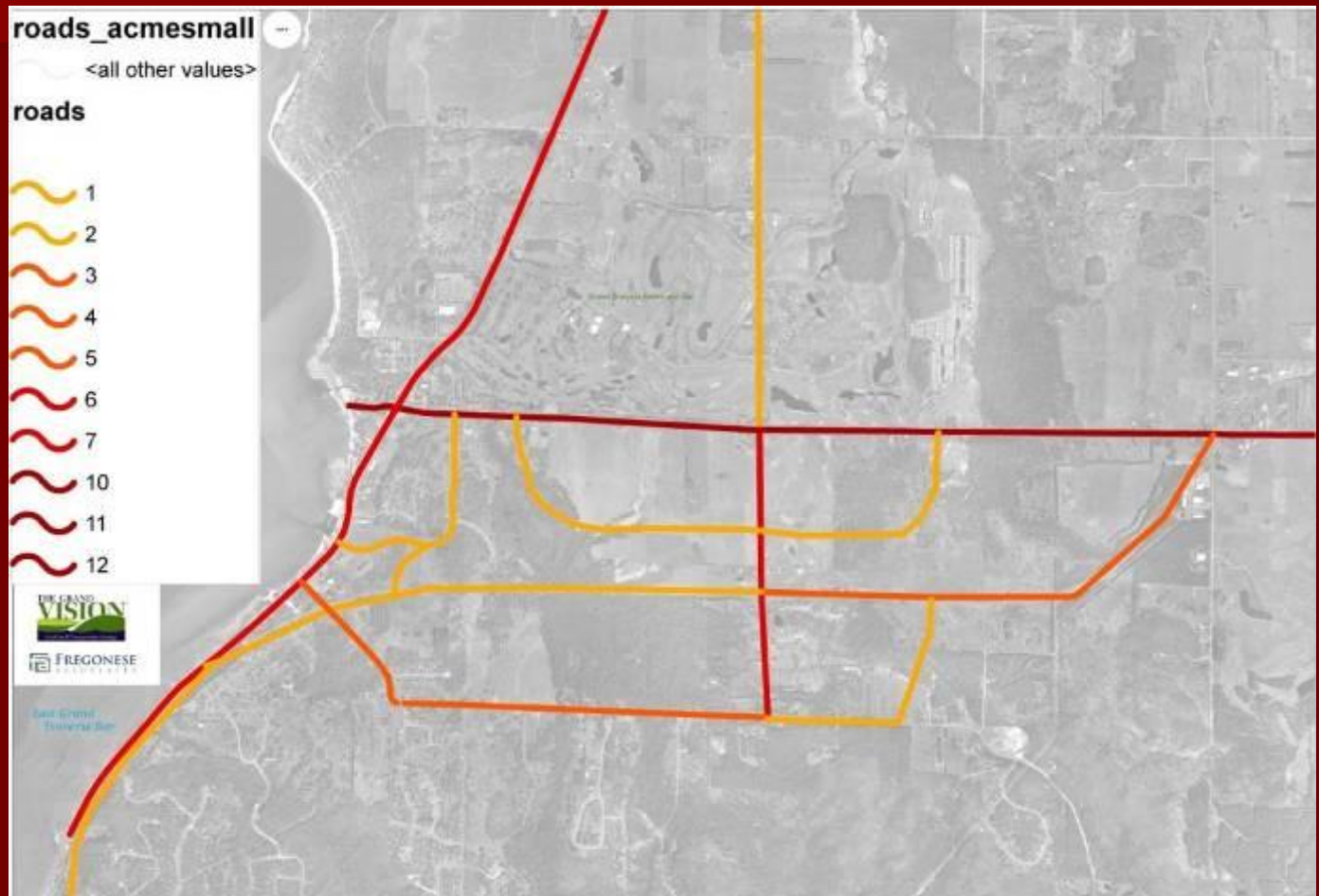
The Small Workshop Results

Acme All Chips At Least 2 Hits



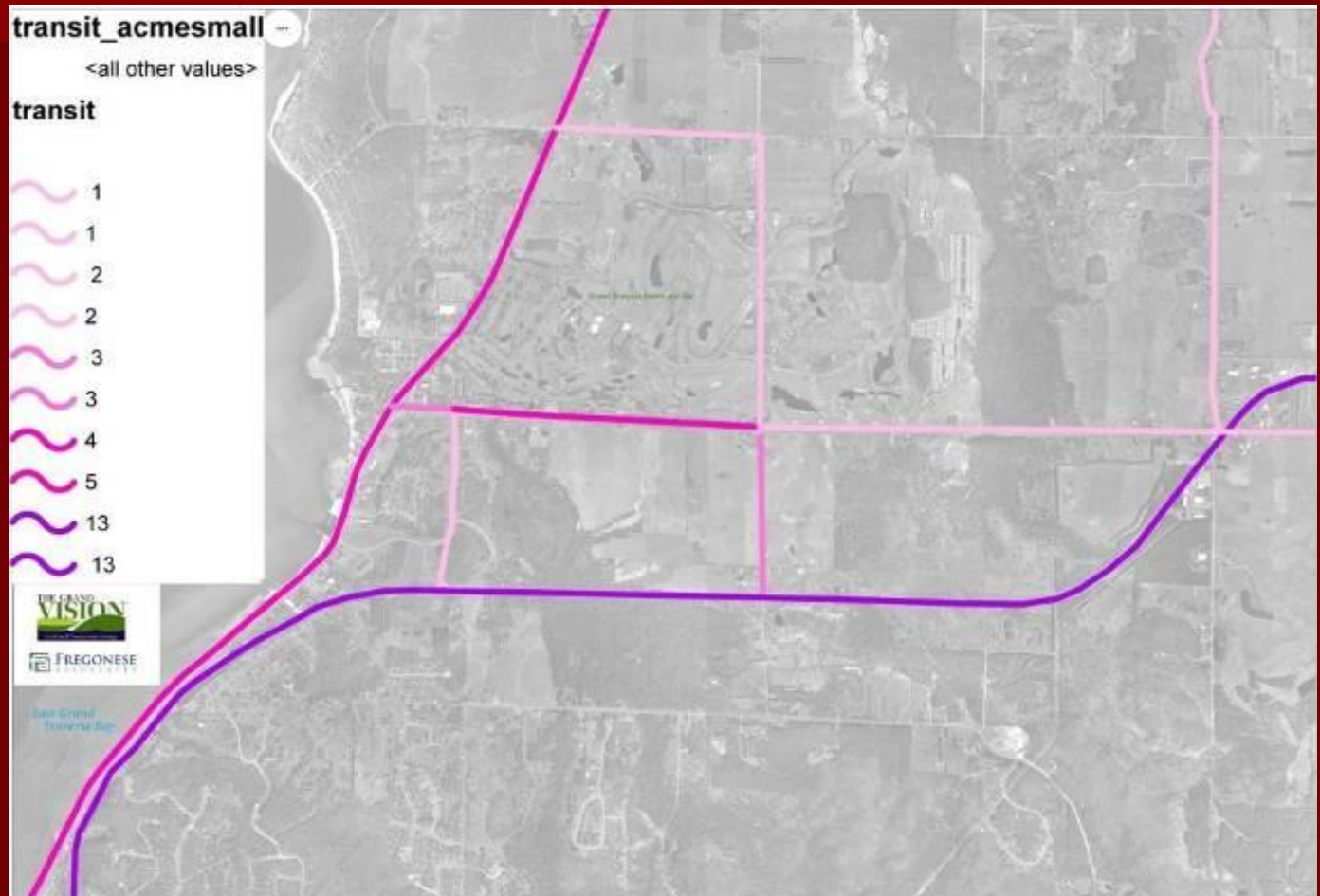
The Small Workshop Results

Acme Roads by Occurrence



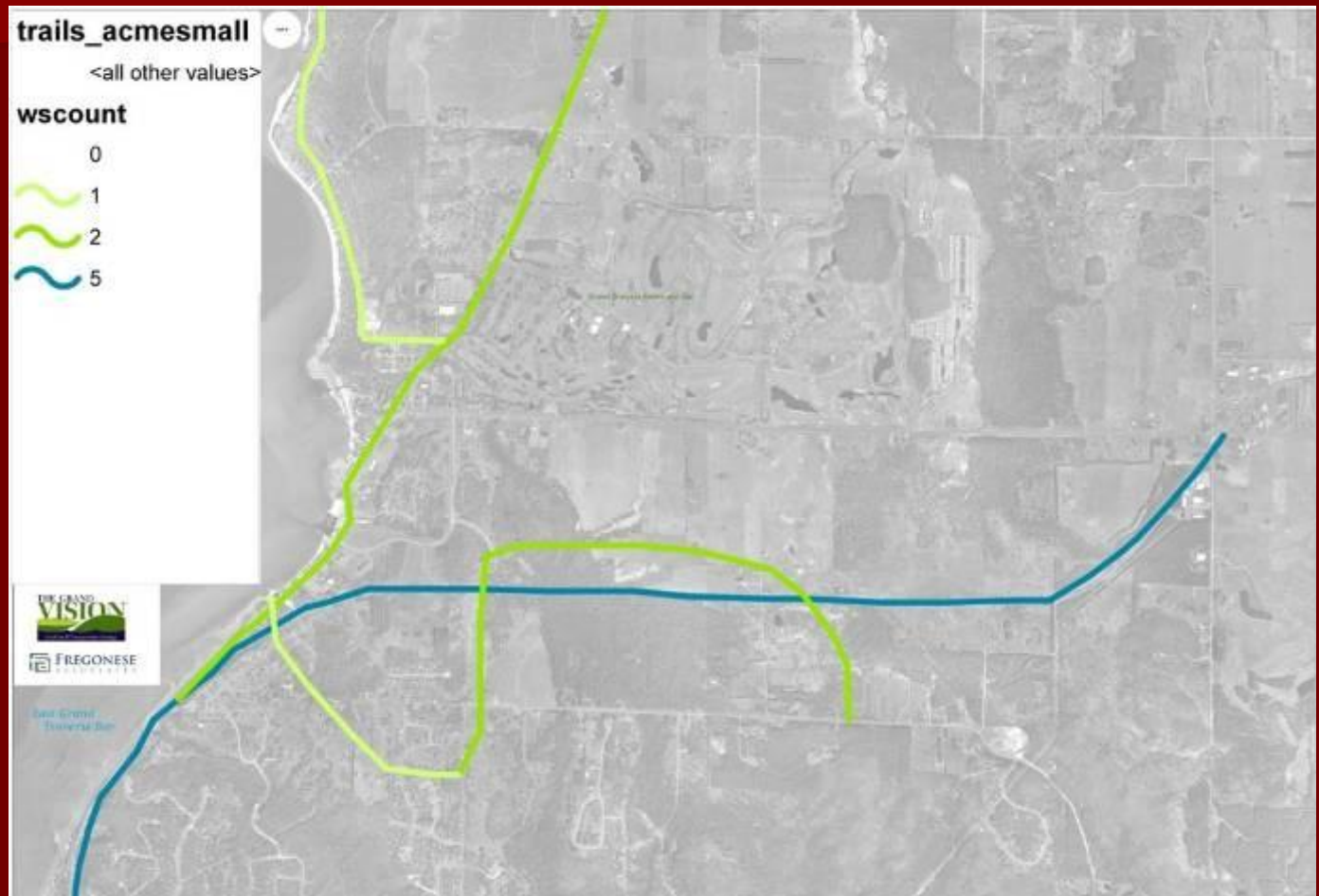
The Small Workshop Results

Acme Public Transportation by Occurrence



The Small Workshop Results

Acme Trails by Occurrence



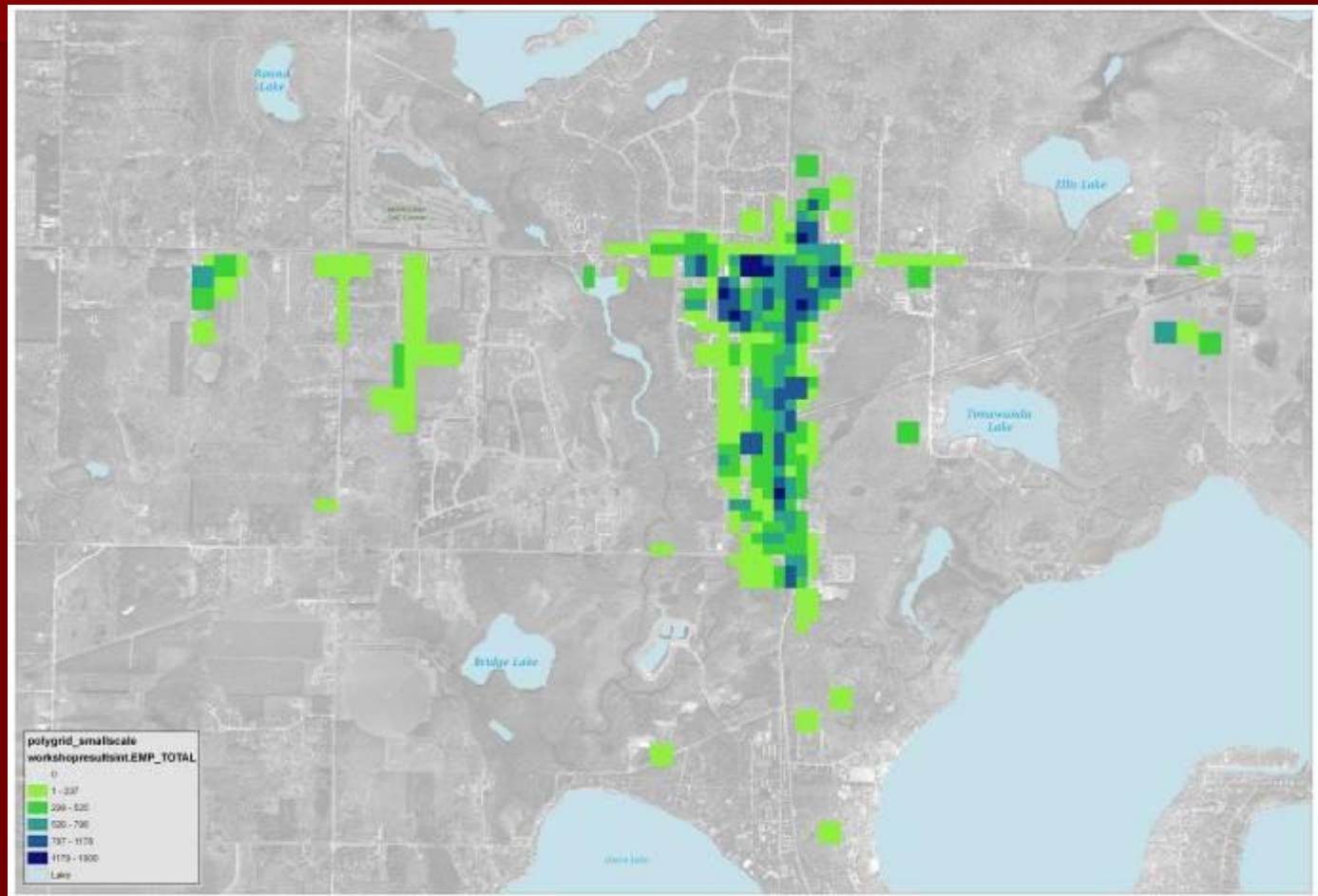
The Small Workshop Results

Acme Open Space by Occurrence



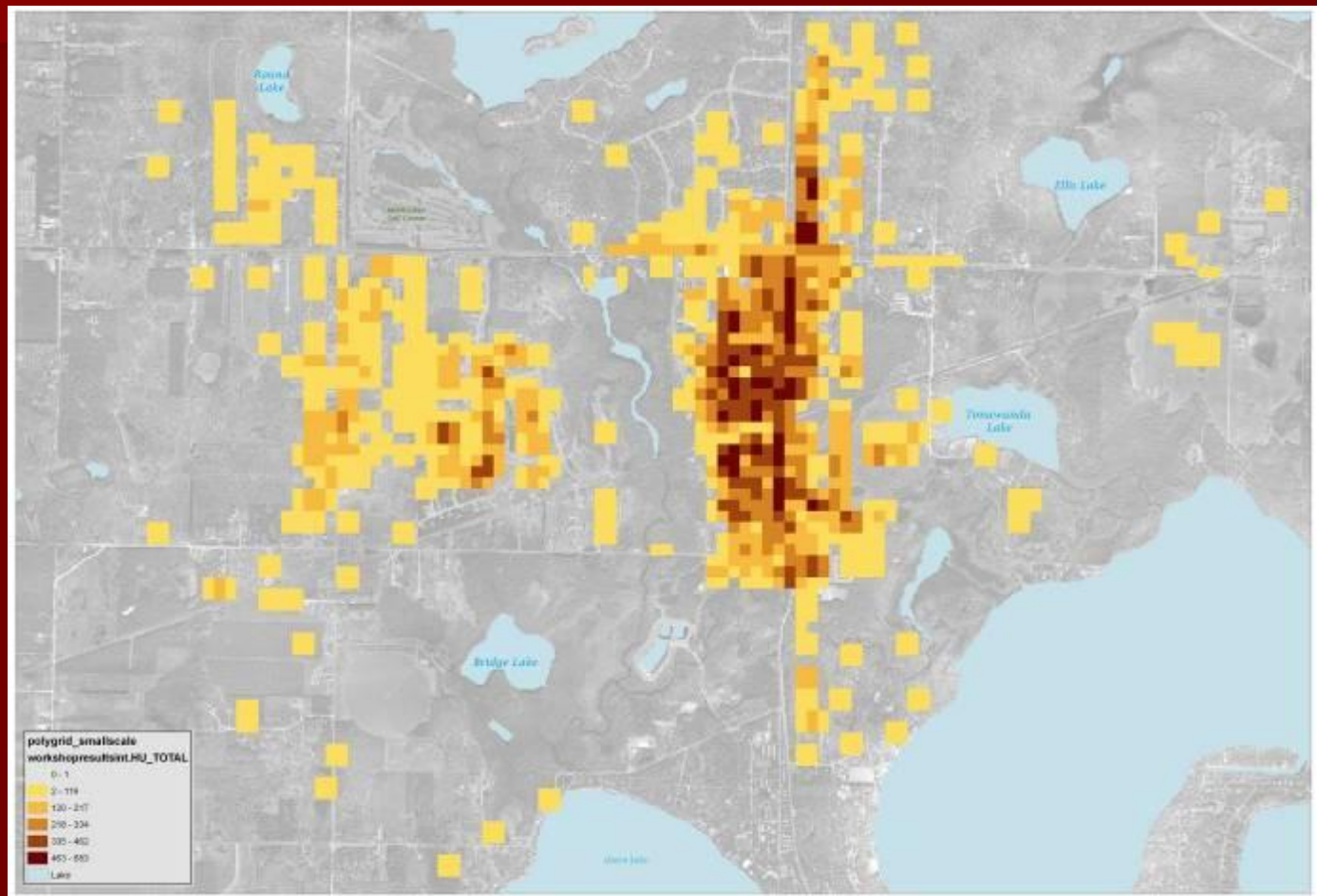
The Small Workshop Results

Interlochen Total Jobs



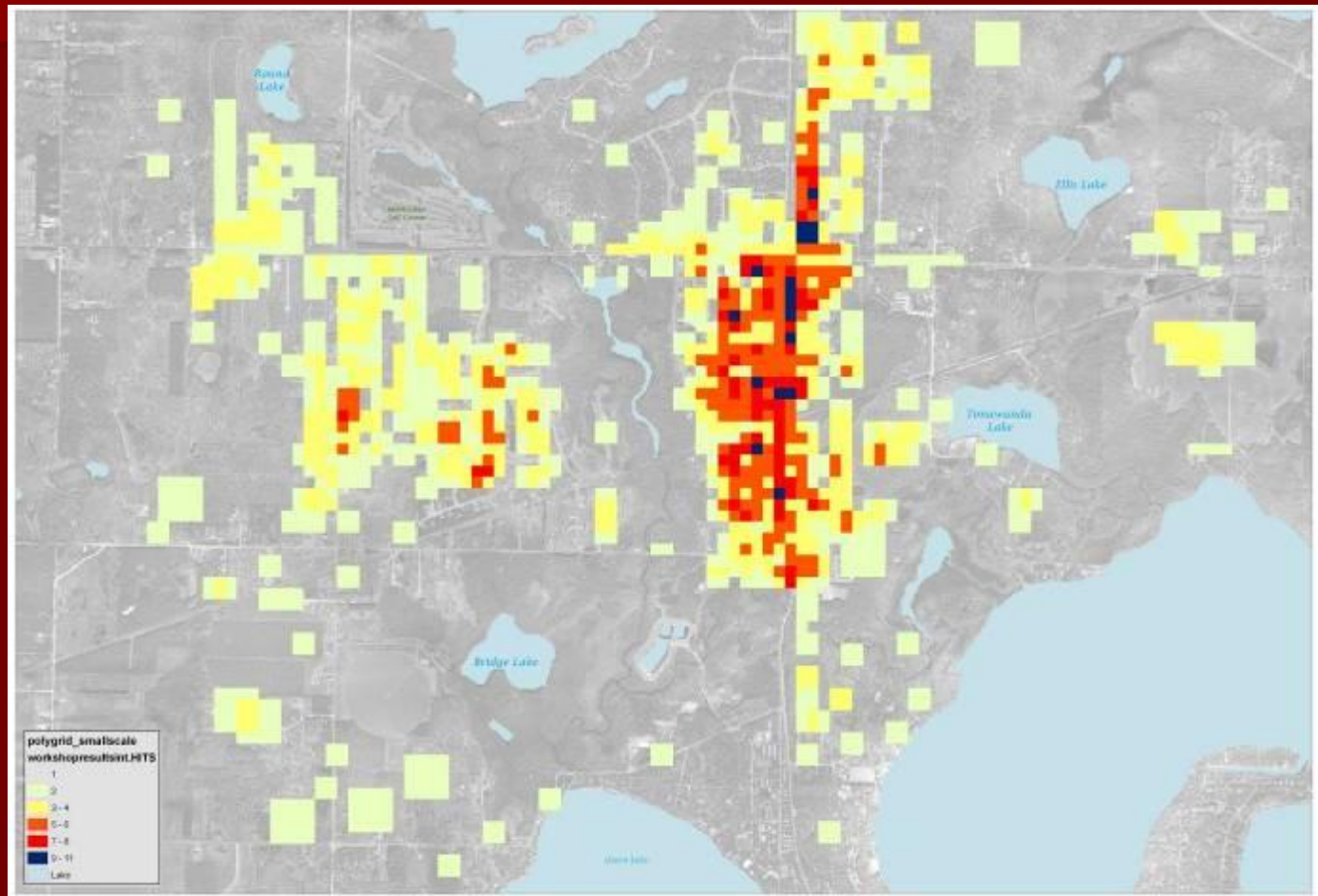
The Small Workshop Results

Interlochen Total Housing Units



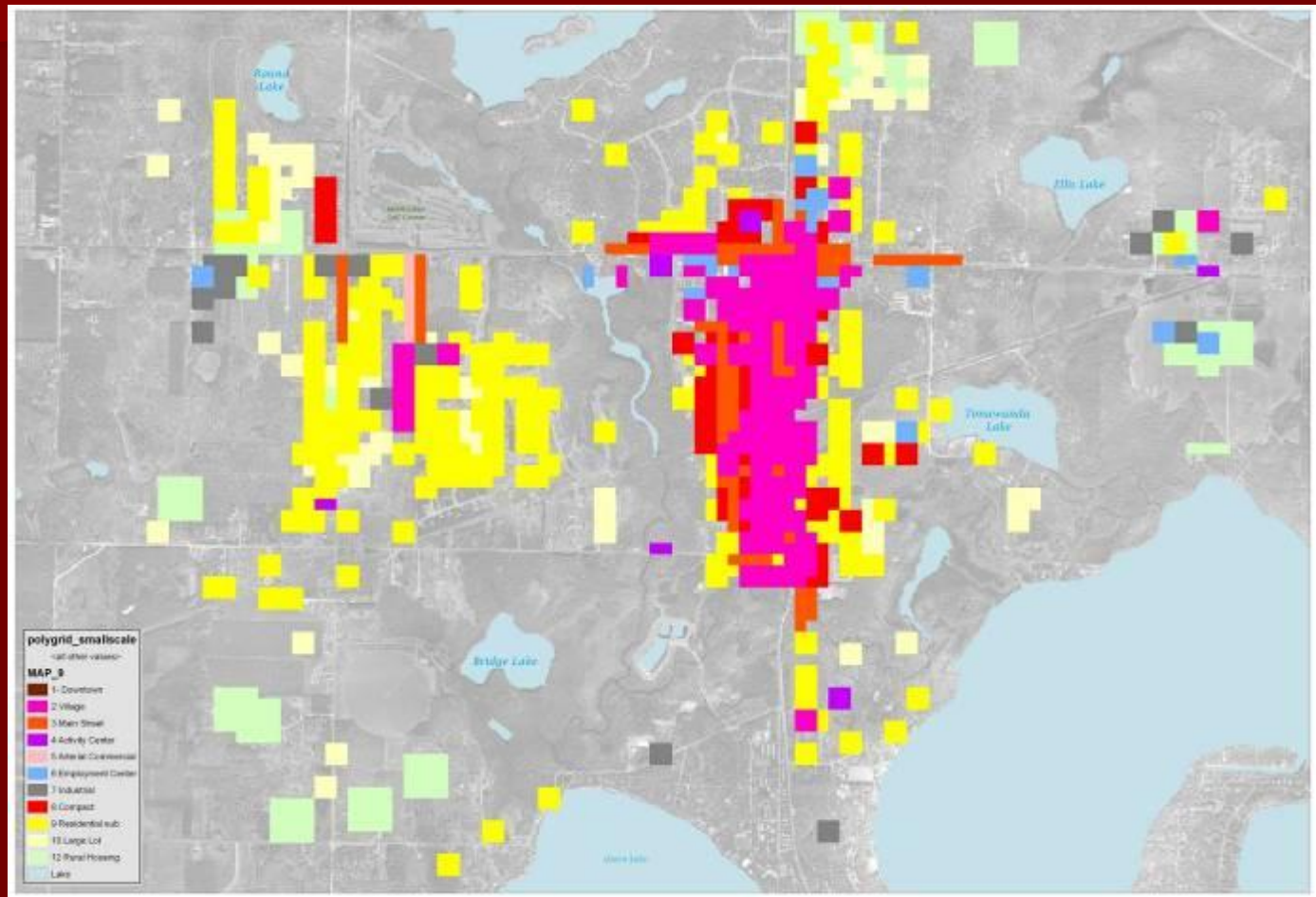
The Small Workshop Results

Interlochen Chip Placement (Any Chip)



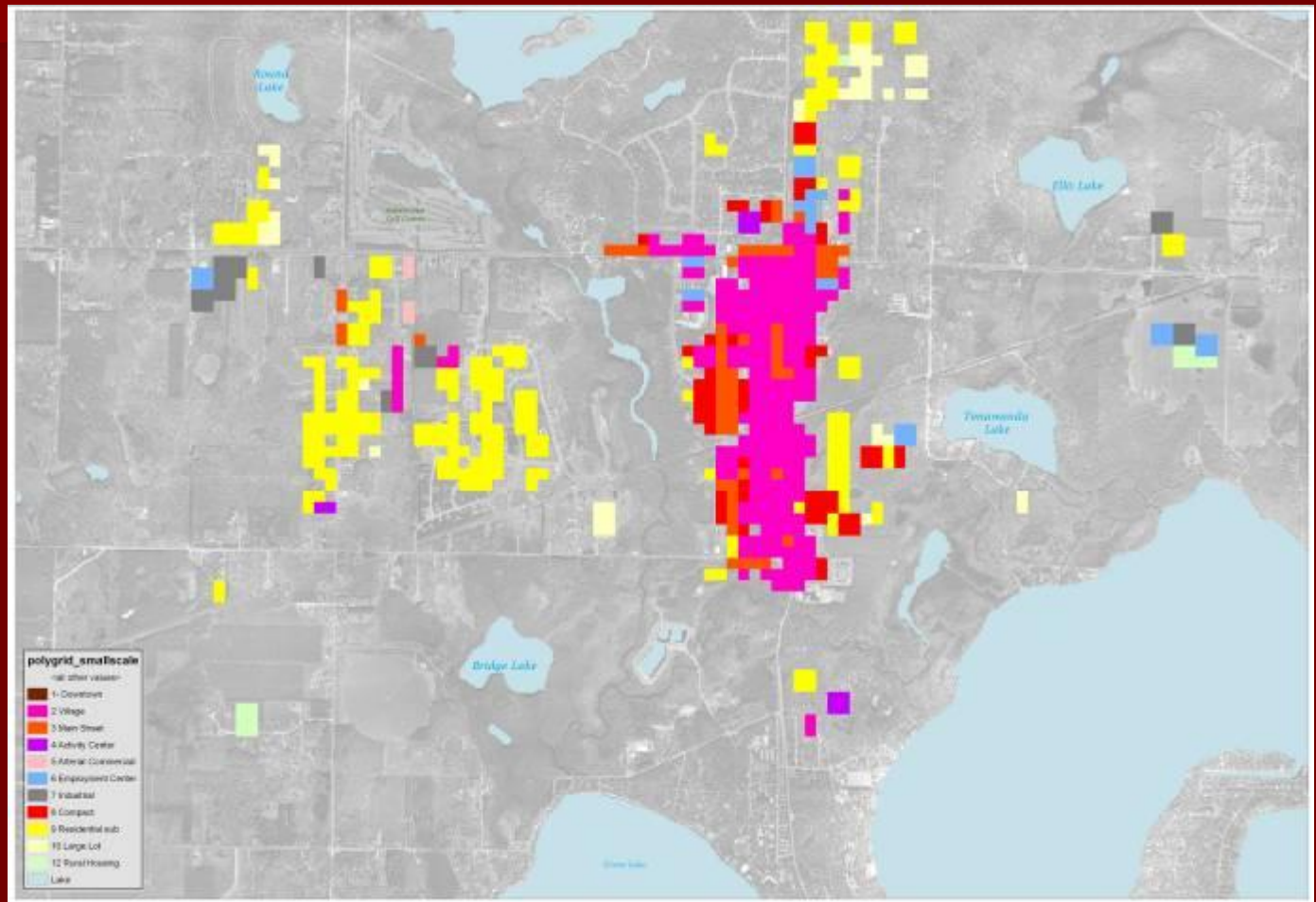
The Small Workshop Results

Interlochen All Chips



The Small Workshop Results

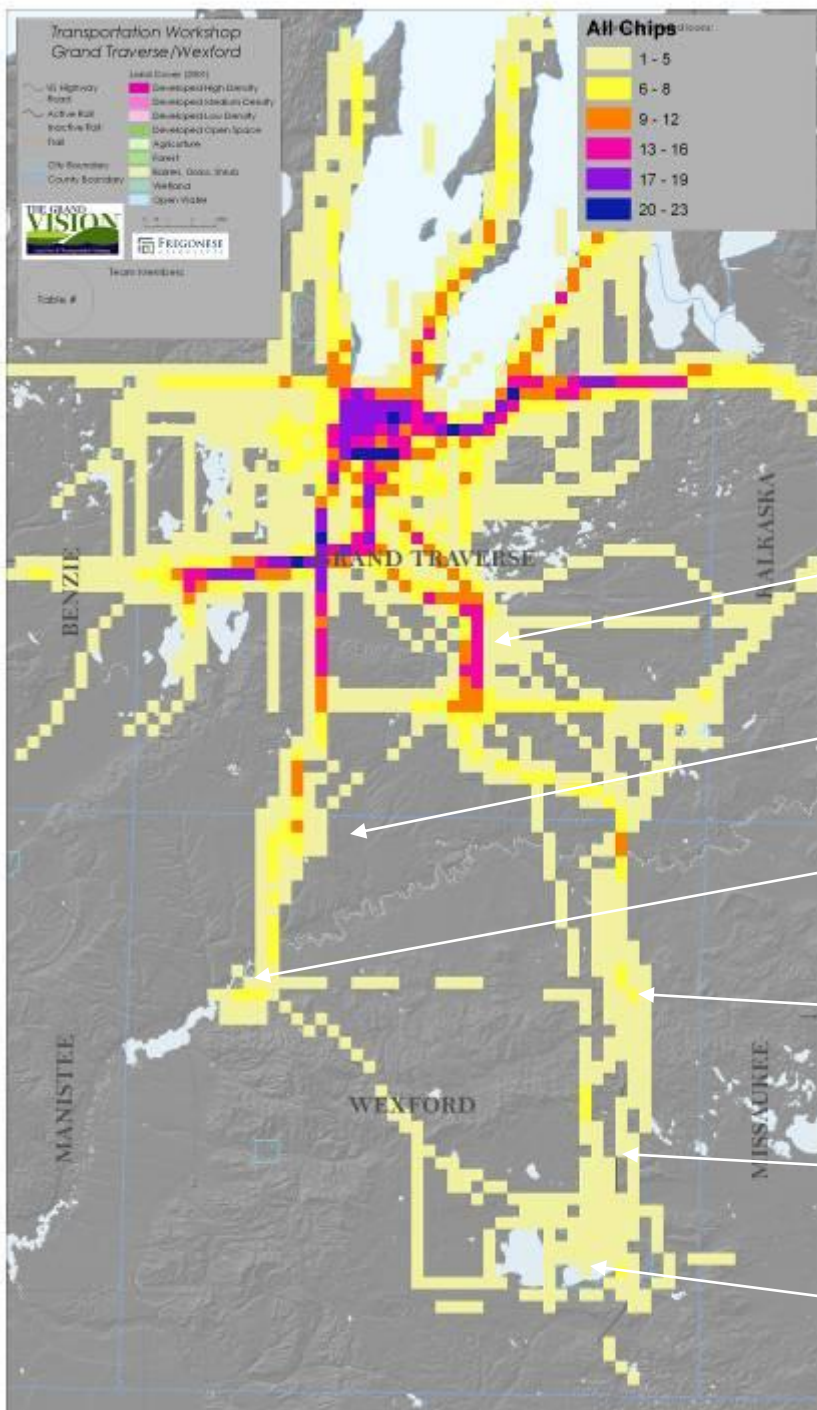
Interlochen All Chips At Least 2 Hits



Transportation Workshops

Grand Traverse/Wexford

Transportation Workshop Results -All Chips



Existing Rail

Buckley

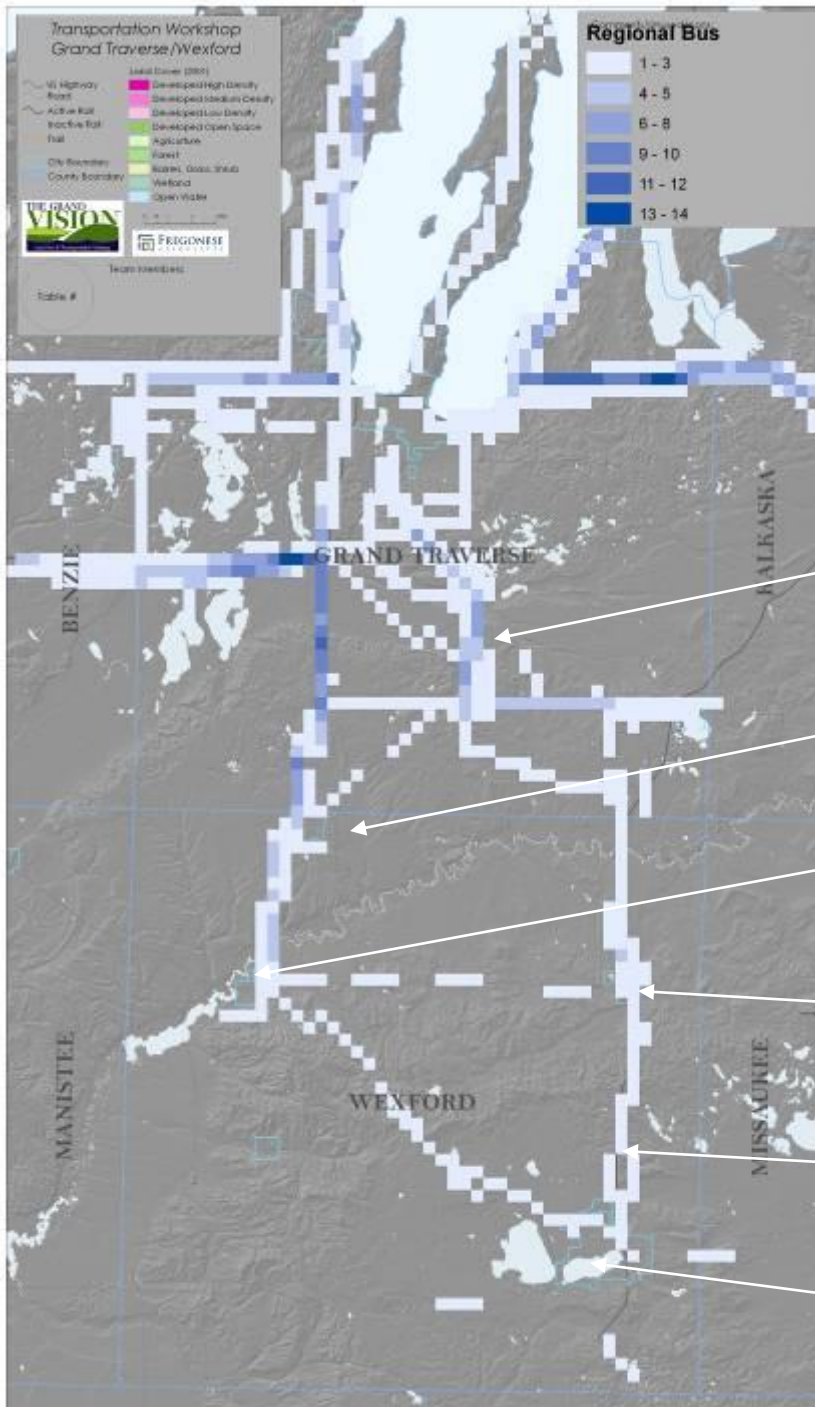
Mesick

Manton

US 131

Cadillac

Transportation Workshop Results -Regional Bus



Existing Rail

Buckley

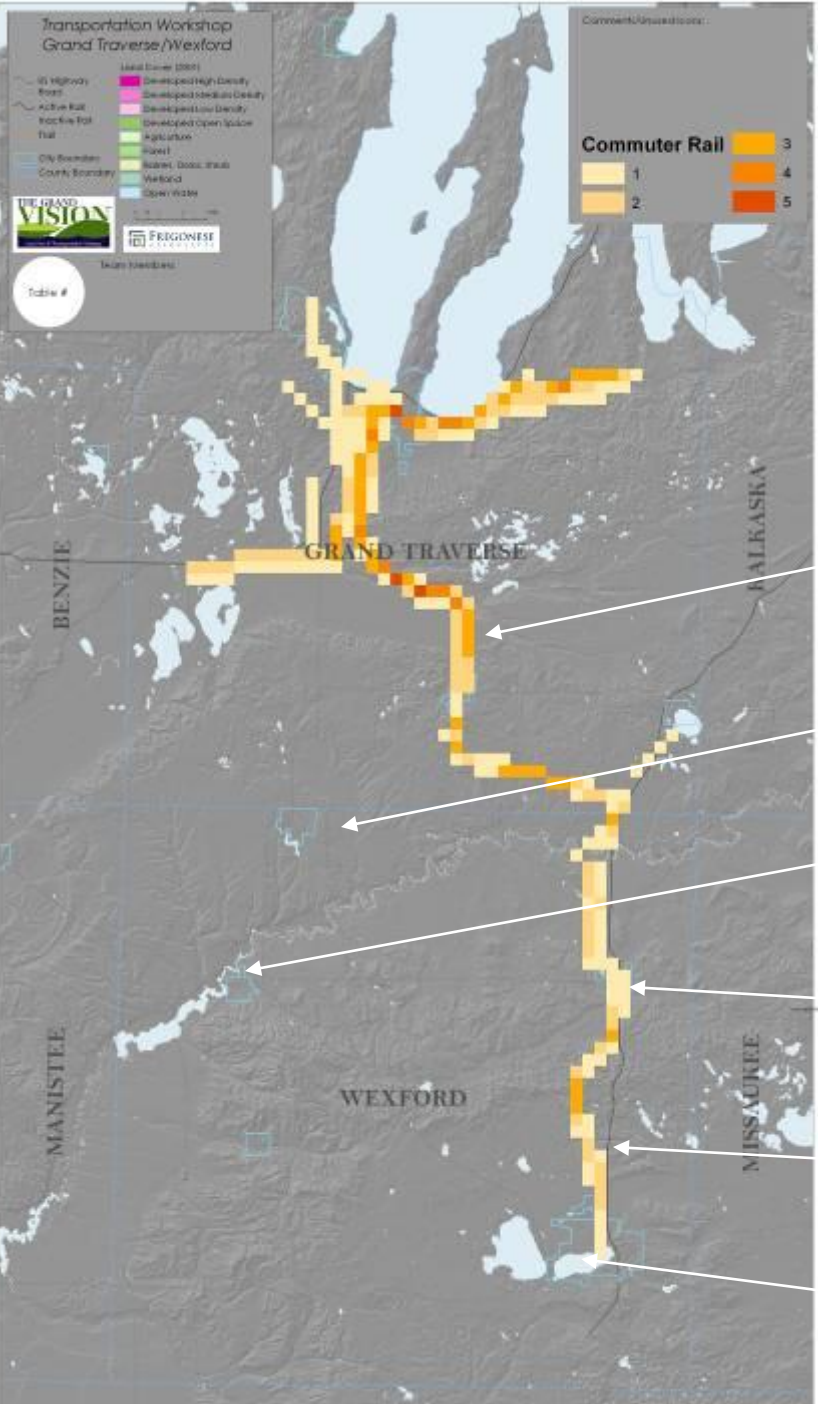
Mesick

Manton

US 131

Cadillac

Transportation Workshop Results -Commuter Rail



Existing Rail

Buckley

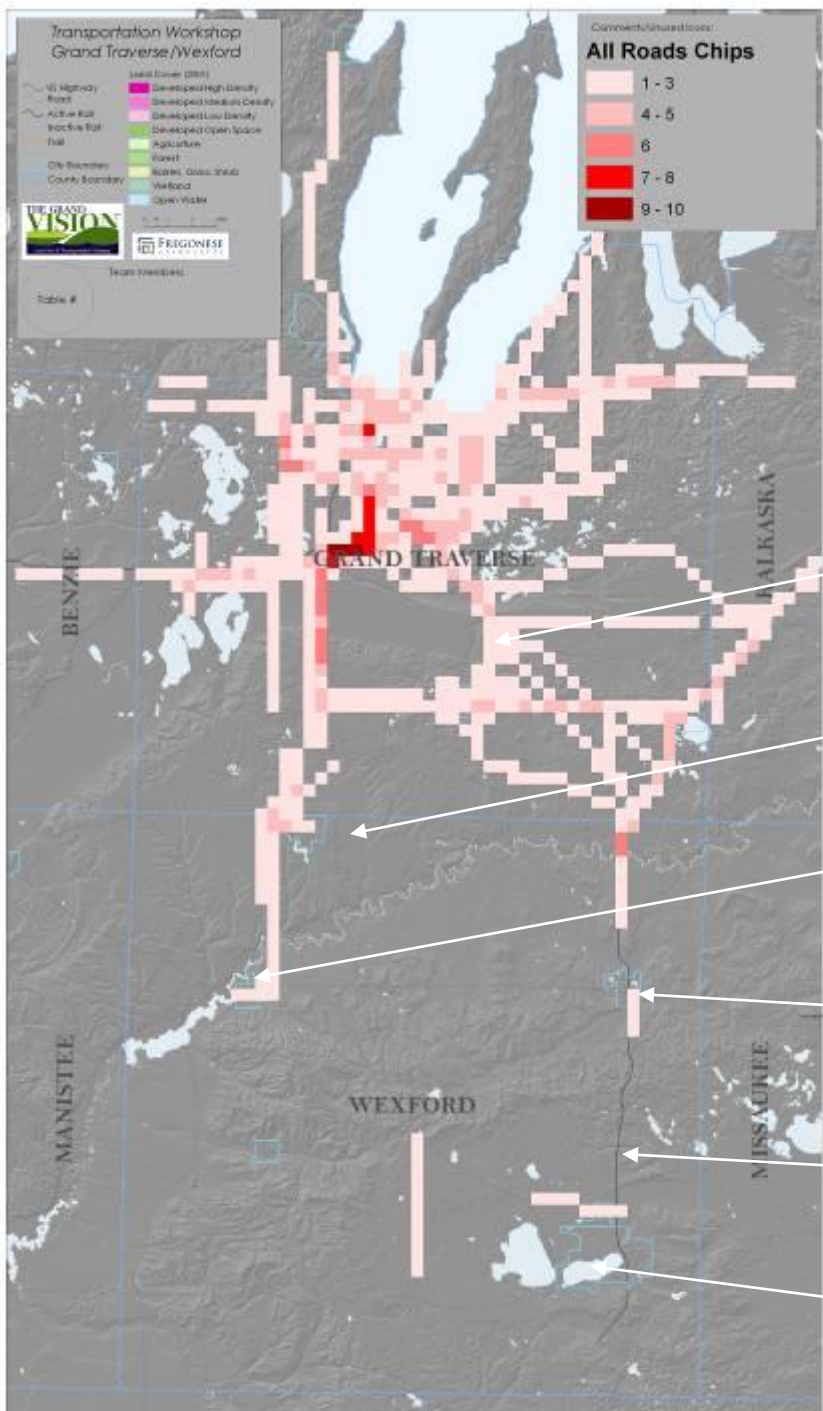
Mesick

Manton

US 131

Cadillac

Transportation Workshop Results -Road Widening and New Roadways



Existing Rail

Buckley

Mesick

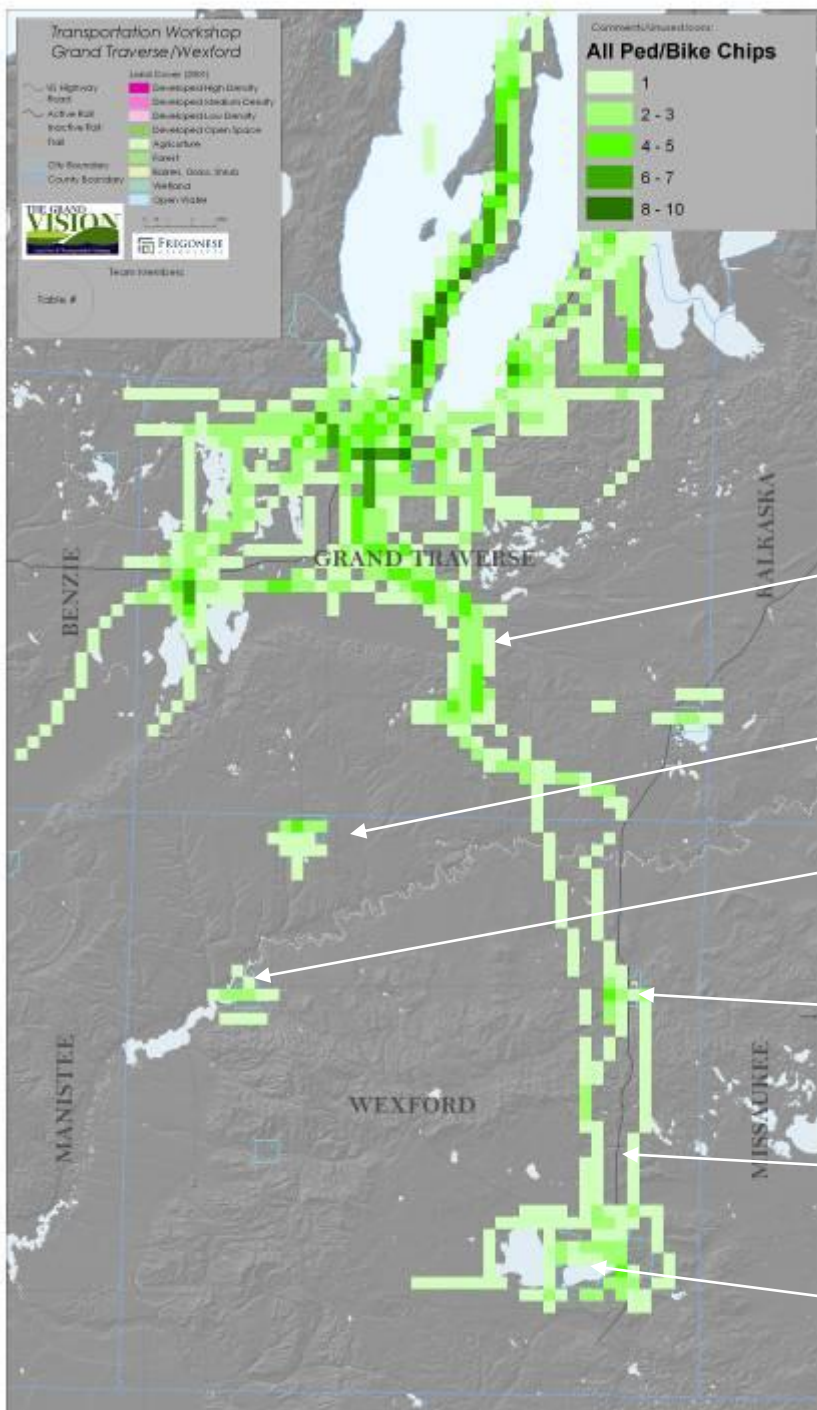
Manton

US 131

Cadillac

Transportation Workshop Results

-All Pedestrian/Bicycle Chips



Existing Rail

Buckley

Mesick

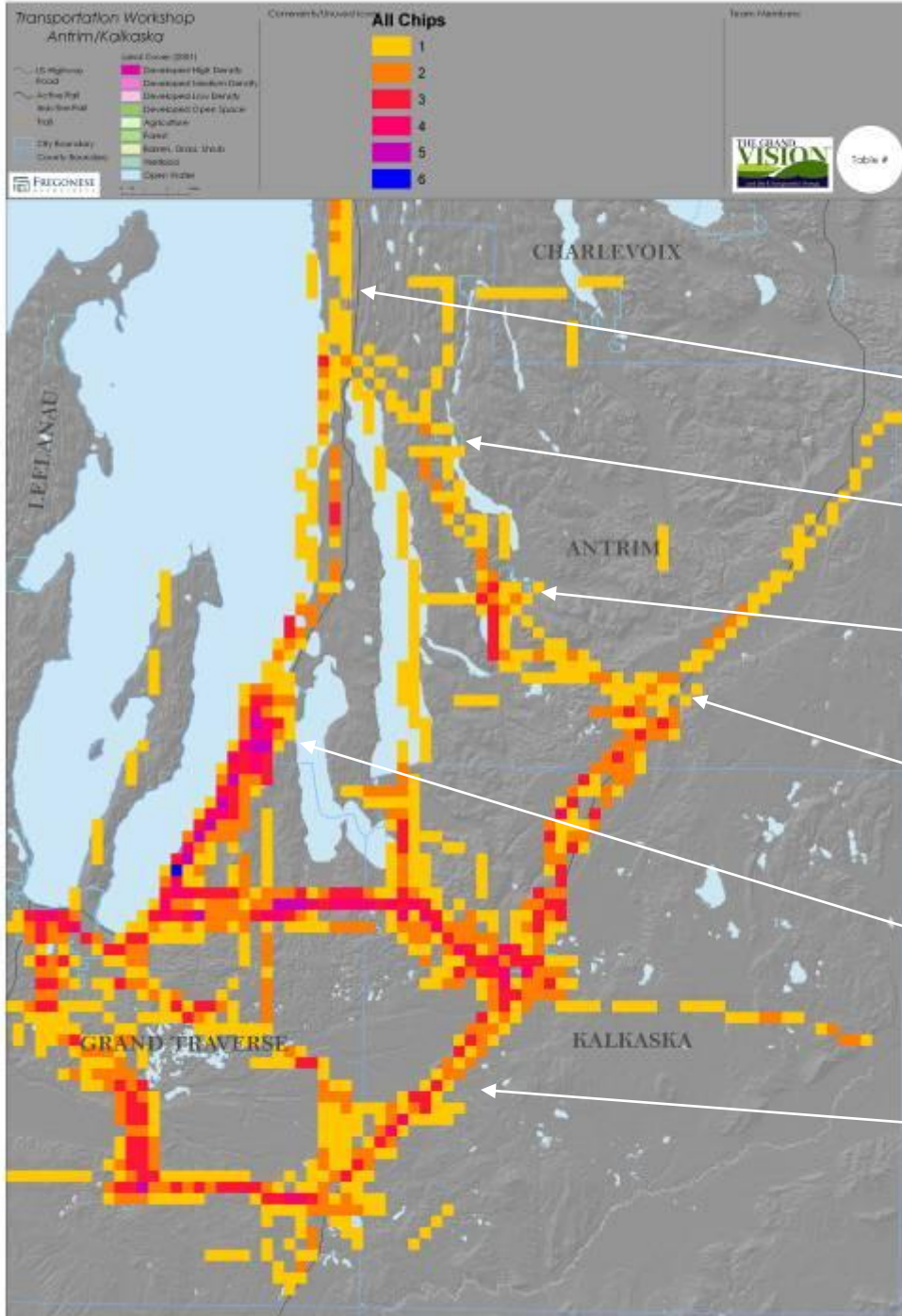
Manton

US 131

Cadillac

Antrim/Kalkaska

Transportation Workshop Results -All Chips



US 31

Central Lake

Bellaire

Mancelona

Elk Rapids

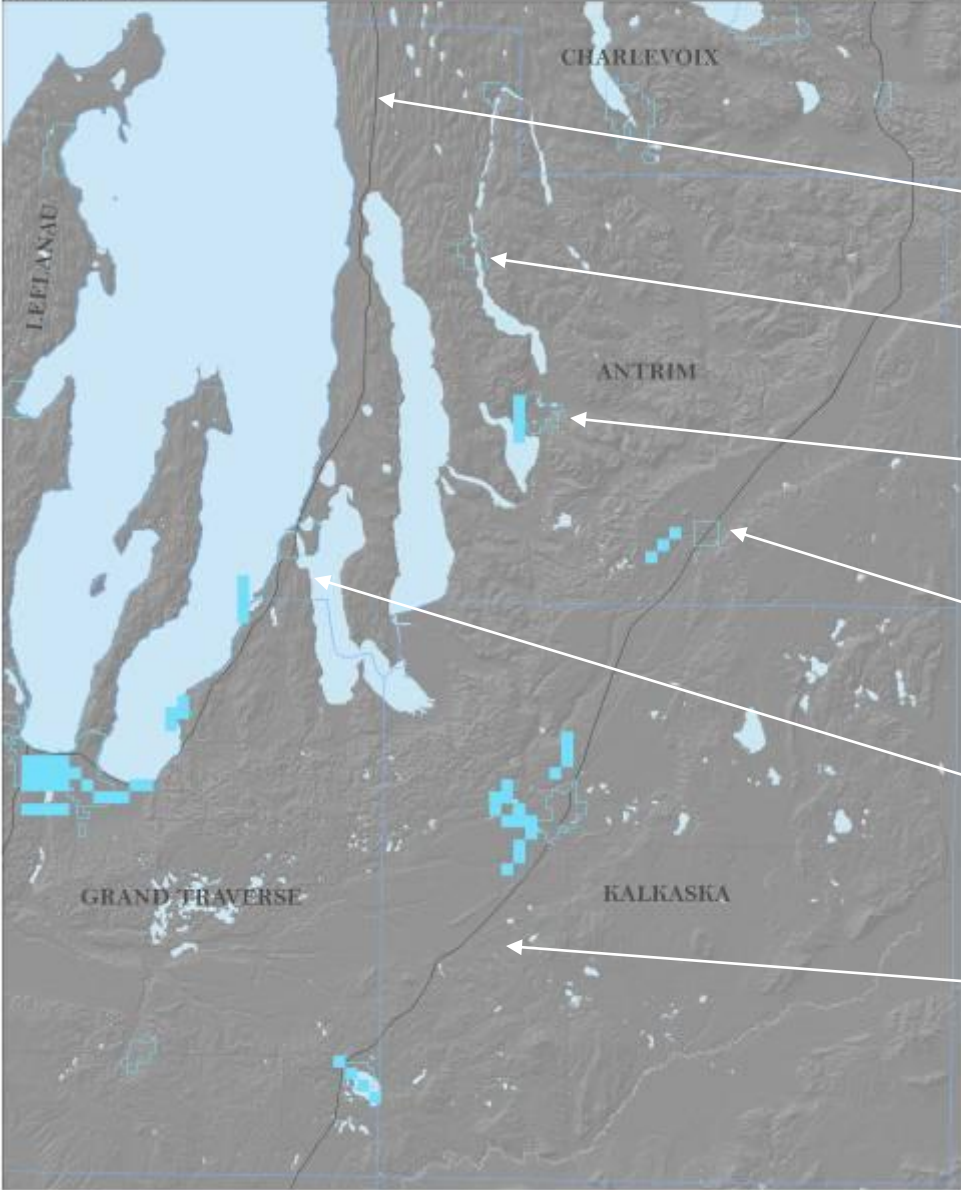
US 131

Legend

- Developed High Density
- Developed Medium Density
- Developed Low Density
- Developed Open Space
- Agriculture
- Forest
- Water, Great Lakes
- Wetland
- Open Water

LEGONISE

Urban Bus Circulator



Transportation Workshop Results

-Urban Bus Circulator

US 31

Central Lake

Bellaire

Mancelona

Elk Rapids

US 131

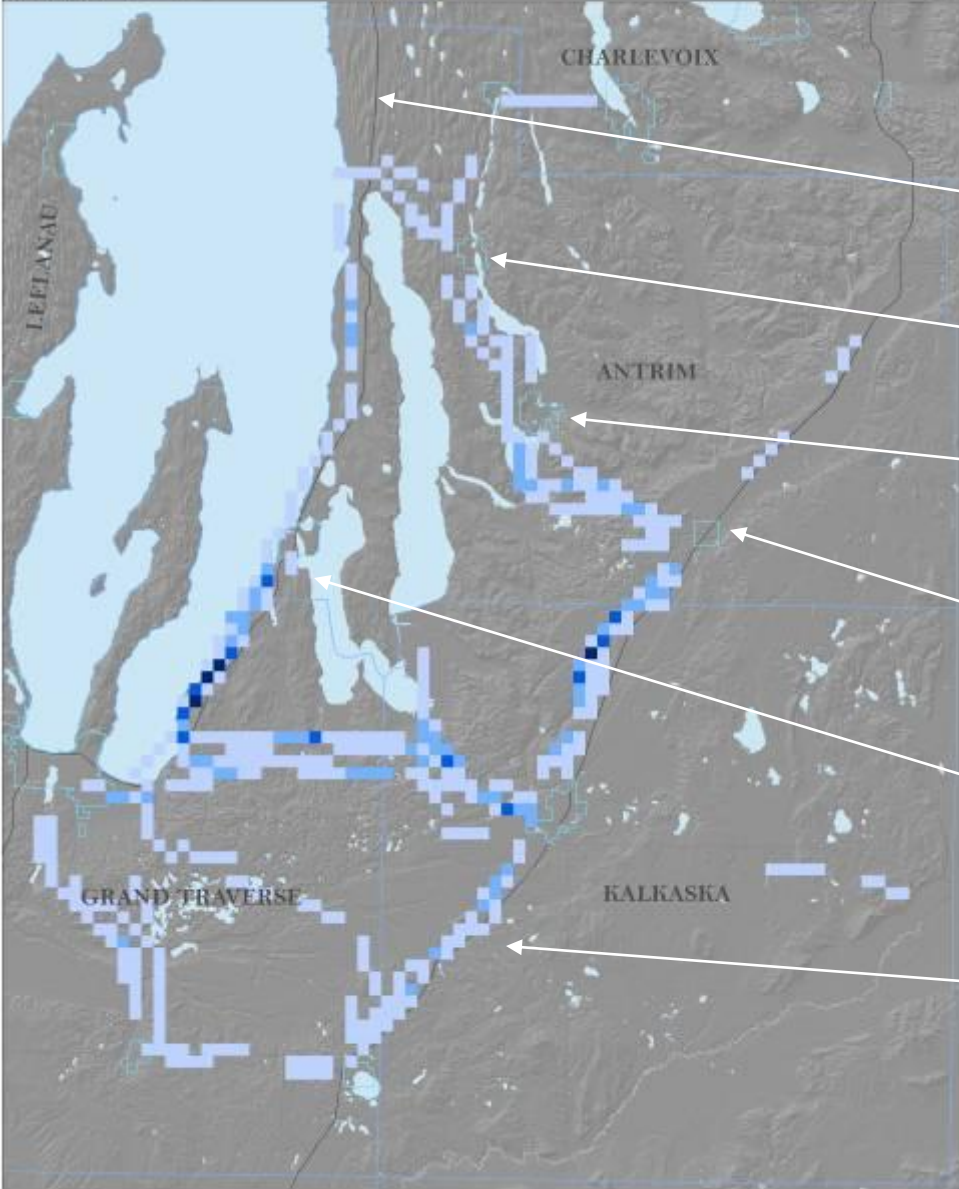
Legend

- US Highway
- State Road
- County Road
- City Boundary
- County Boundary
- Water
- Forest
- Open Space
- Developed High Density
- Developed Medium Density
- Developed Low Density
- Agriculture
- Barren
- Water, Great Lakes
- Wetland
- Open Water

Regional Bus

Legend

- 1
- 2
- 3
- 4



Transportation Workshop Results -Regional Bus

US 31

Central Lake

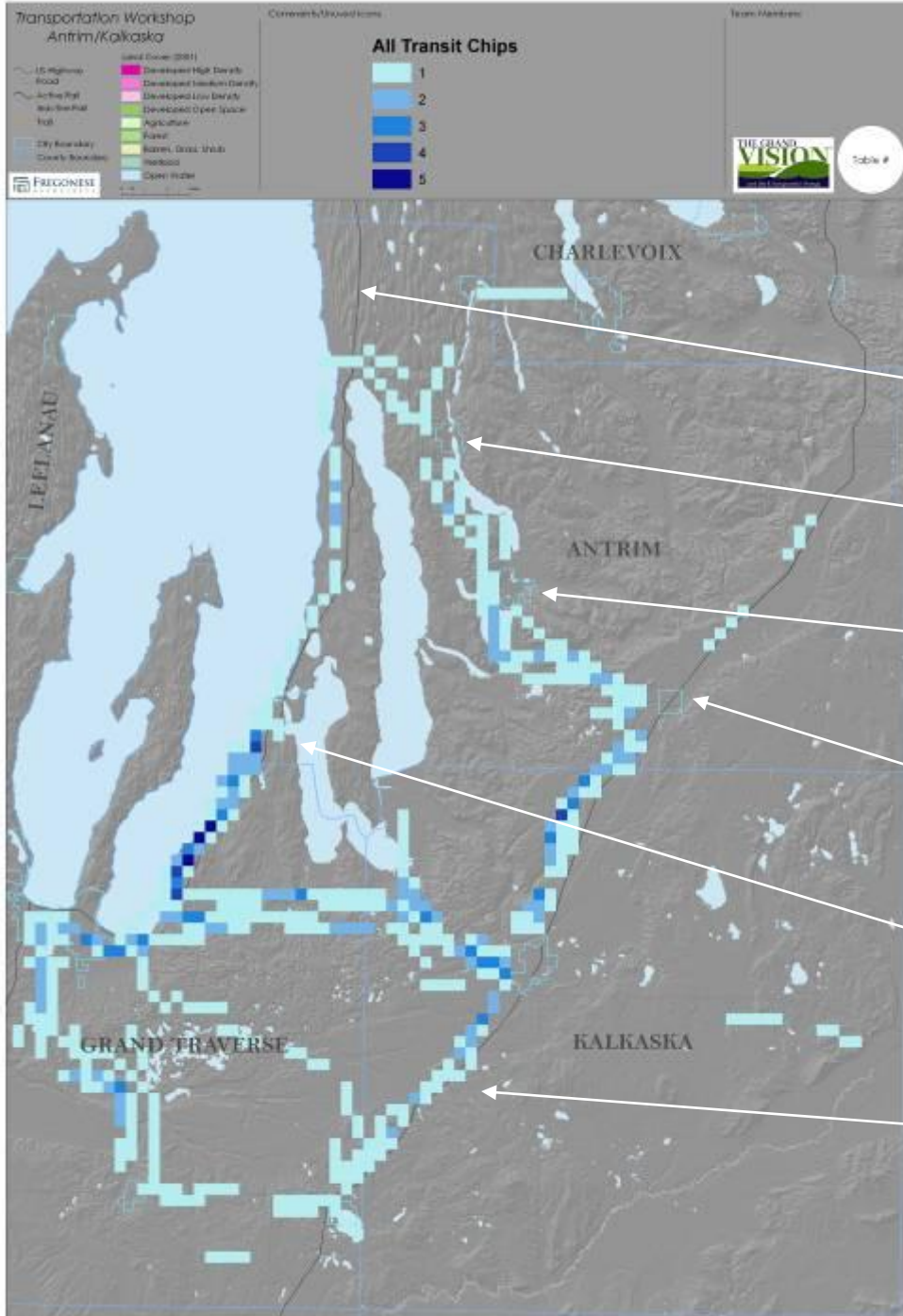
Bellaire

Mancelona

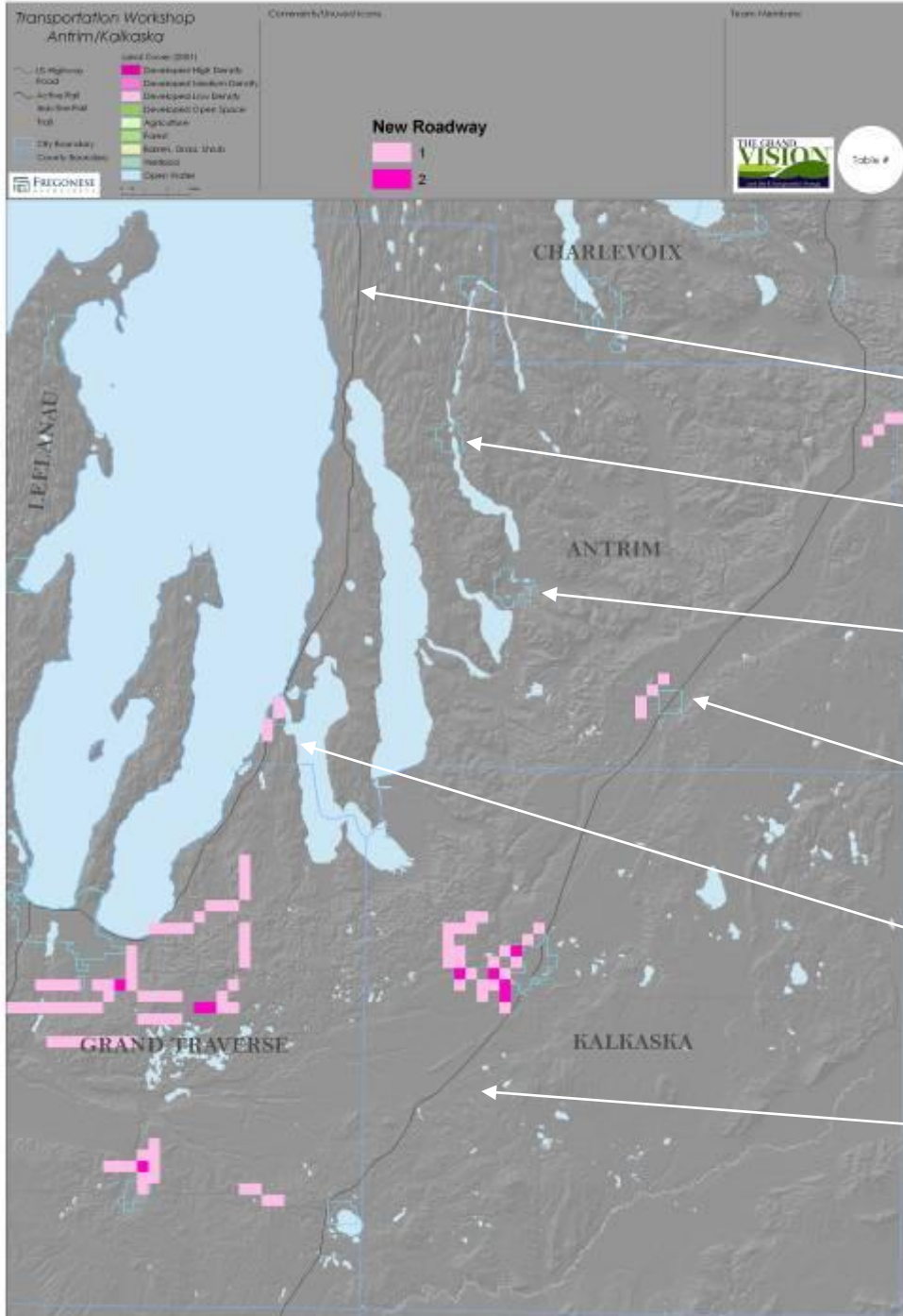
Elk Rapids

US 131

Transportation Workshop Results -All Transit Chips



Transportation Workshop Results -New Roadway



US 31

Central Lake

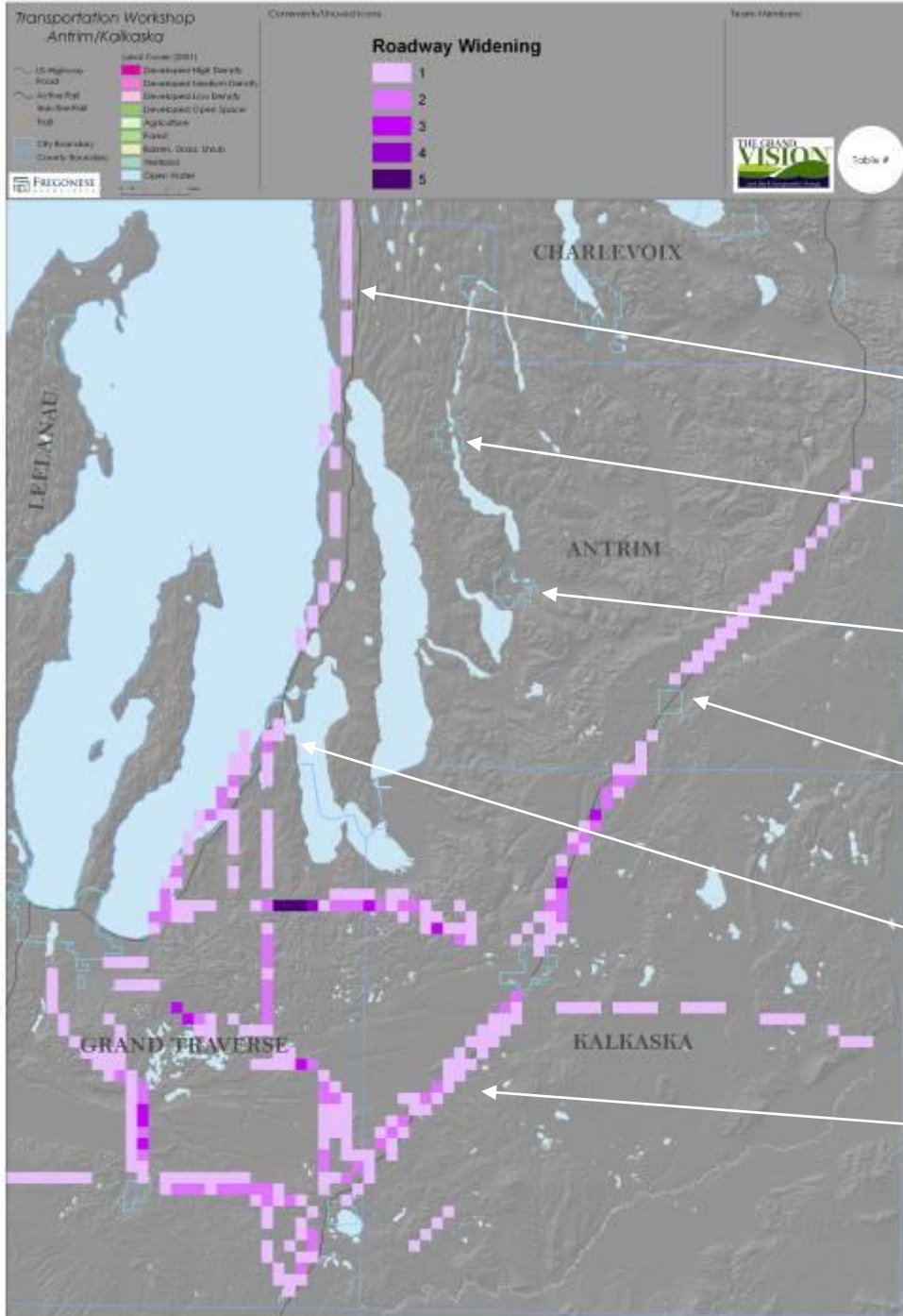
Bellaire

Mancelona

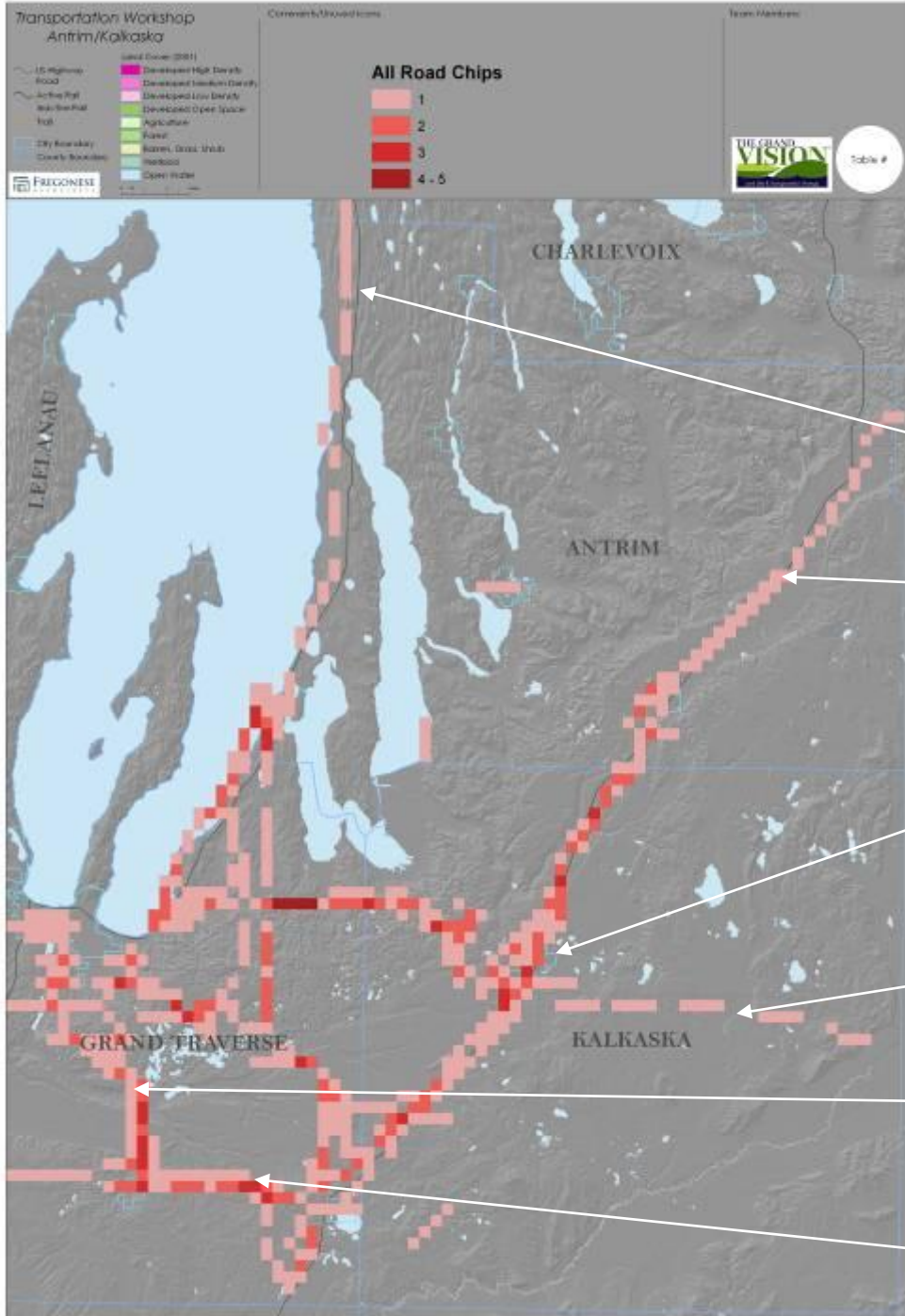
Elk Rapids

US 131

Transportation Workshop Results - Roadway Widening



Transportation Workshop Results -All Road Chips

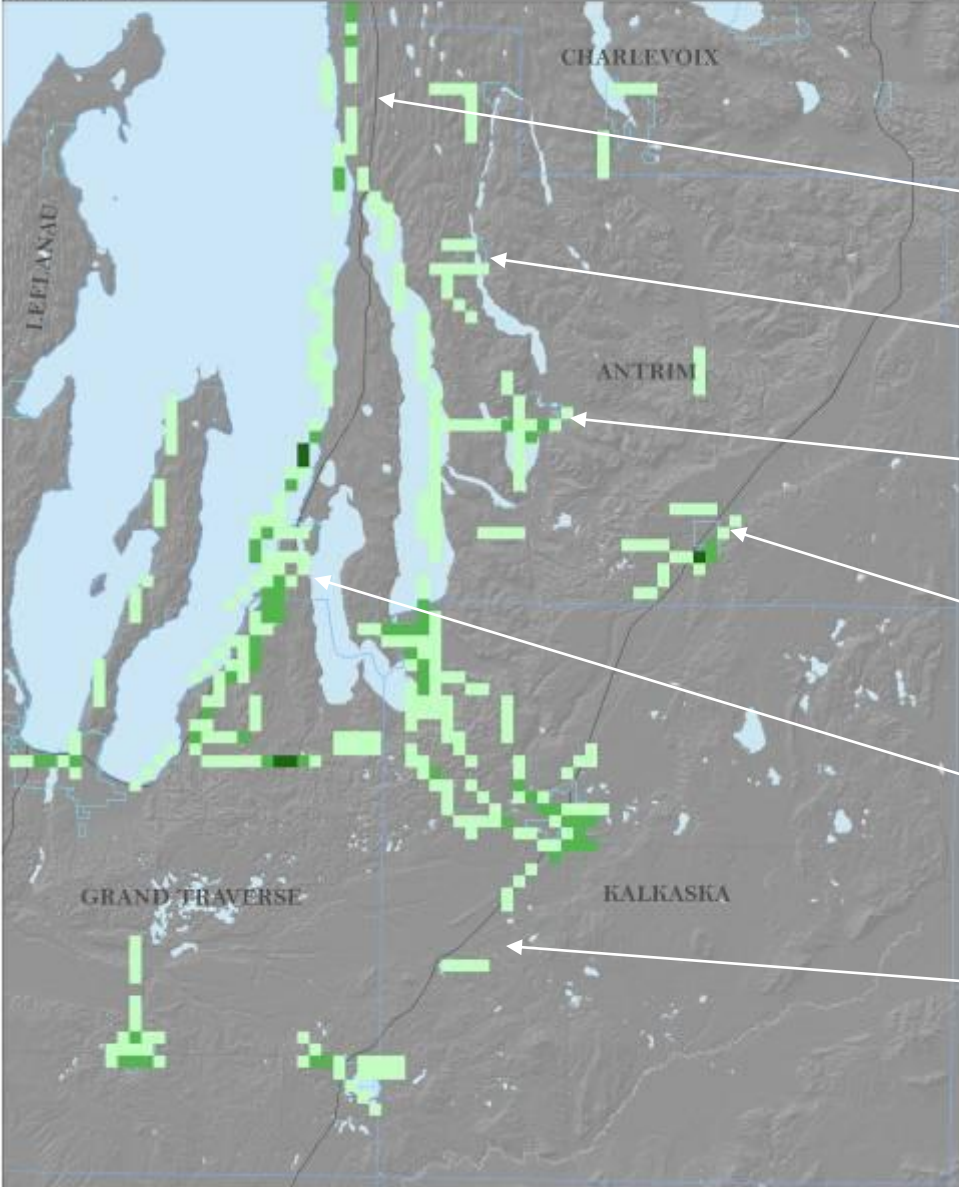


- US 31
- US 131
- City of Kalkaska
- Hwy 72
- Existing Rail
- Hwy 113

Legend

- US Highway
- State Road
- County Road
- City Boundary
- County Boundary
- Water
- Forest
- Open Space
- Developed High Density
- Developed Medium Density
- Developed Low Density
- Agriculture
- Barren
- Water, Great Lakes
- Wetland
- Open Water

All Ped/Bike Chips



Transportation Workshop Results

-All Pedestrian/Bicycle Chips

US 31

Central Lake

Bellaire

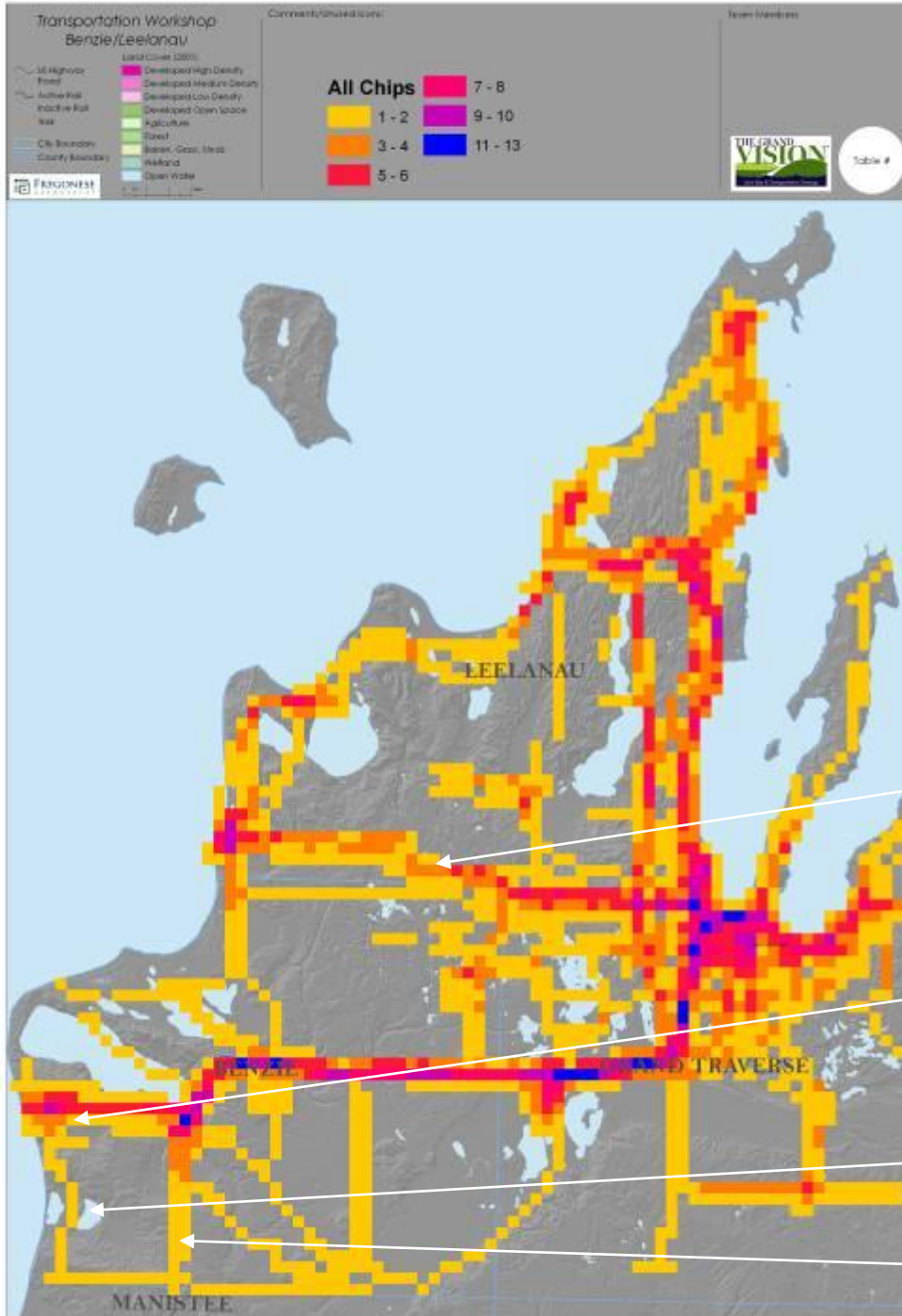
Mancelona

Elk Rapids

US 131

Benzie/Leelanau

Transportation Workshop Results -All Chips



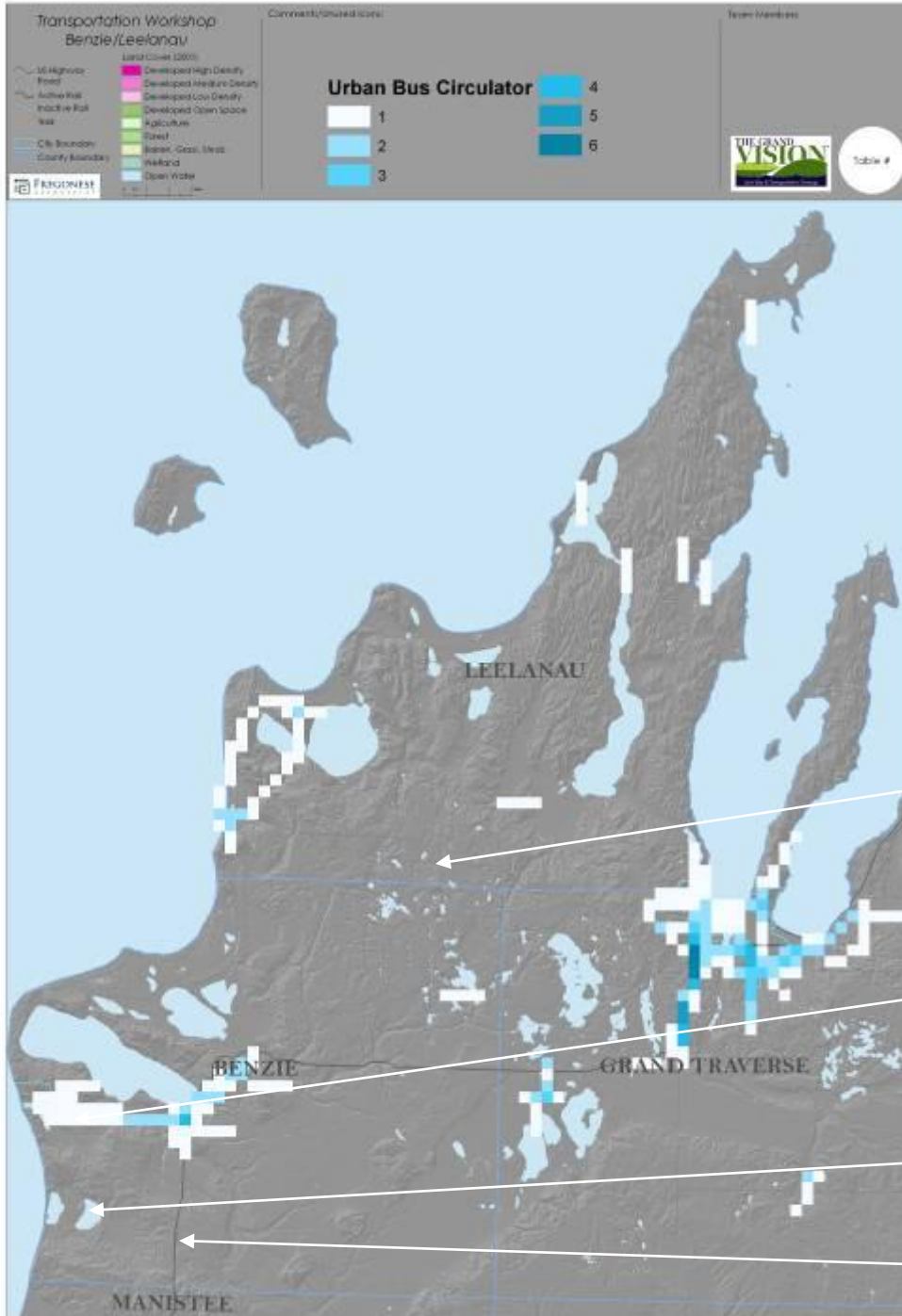
Hwy 72

Frankfort

Hwy 22

US 31

Transportation Workshop Results -Urban Bus Circulator



Transportation Workshop Results -Regional Bus



- US Highway
 - Road
 - Active Rail
 - Inactive Rail
 - Sea
 - Old Boundary
 - County Boundary
- Land Cover (2001)
- Developed High Density
 - Developed Medium Density
 - Developed Low Density
 - Developed Open Space
 - Agriculture
 - Forest
 - Barren, Grass, Shrub
 - Wetland
 - Open Water

All Transit Chips

- 1
- 2 - 3
- 4 - 5
- 6 - 7
- 8 - 9
- 10 - 12



Table #



Transportation Workshop Results -All Transit Chips

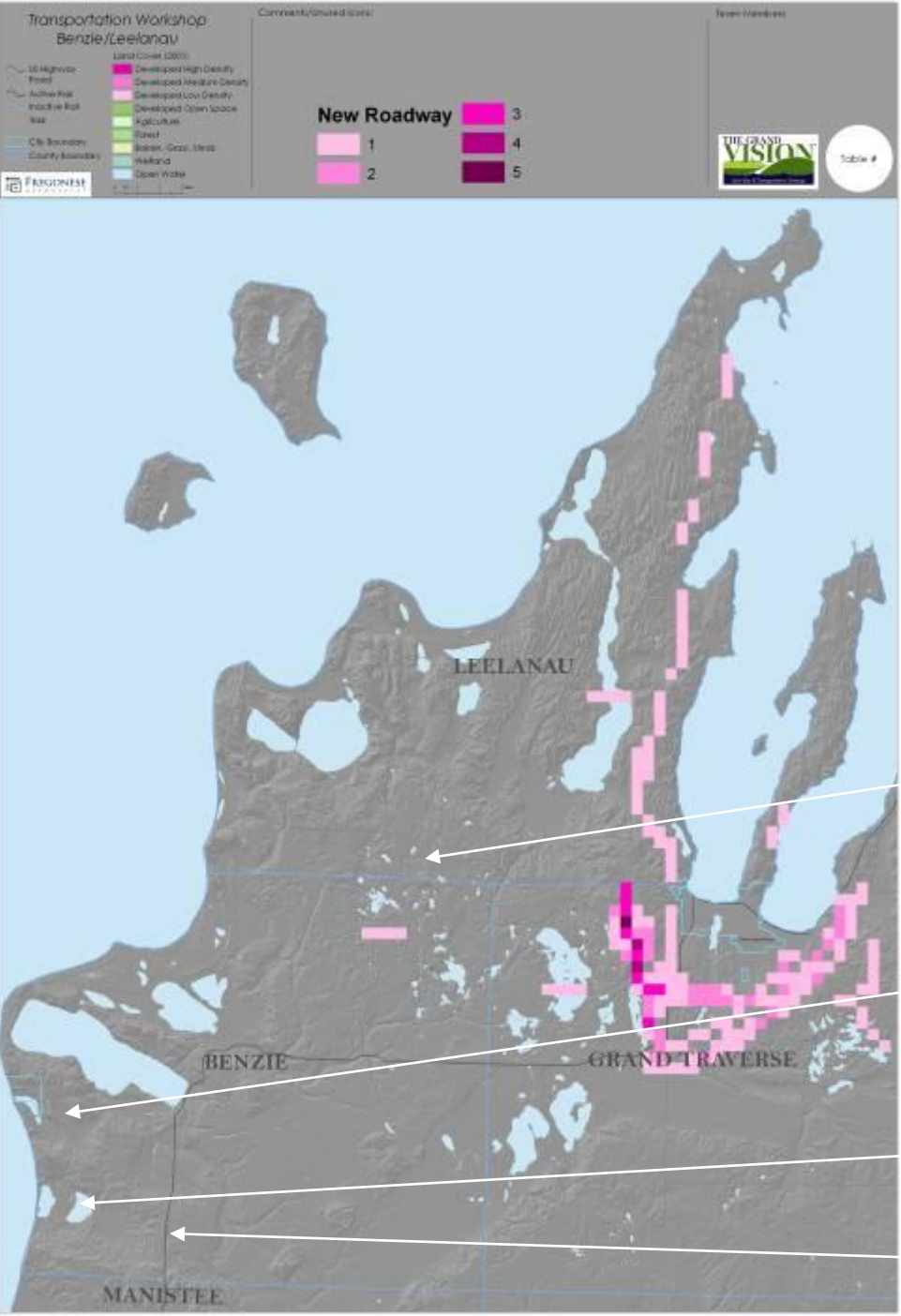
Hwy 72

Frankfort

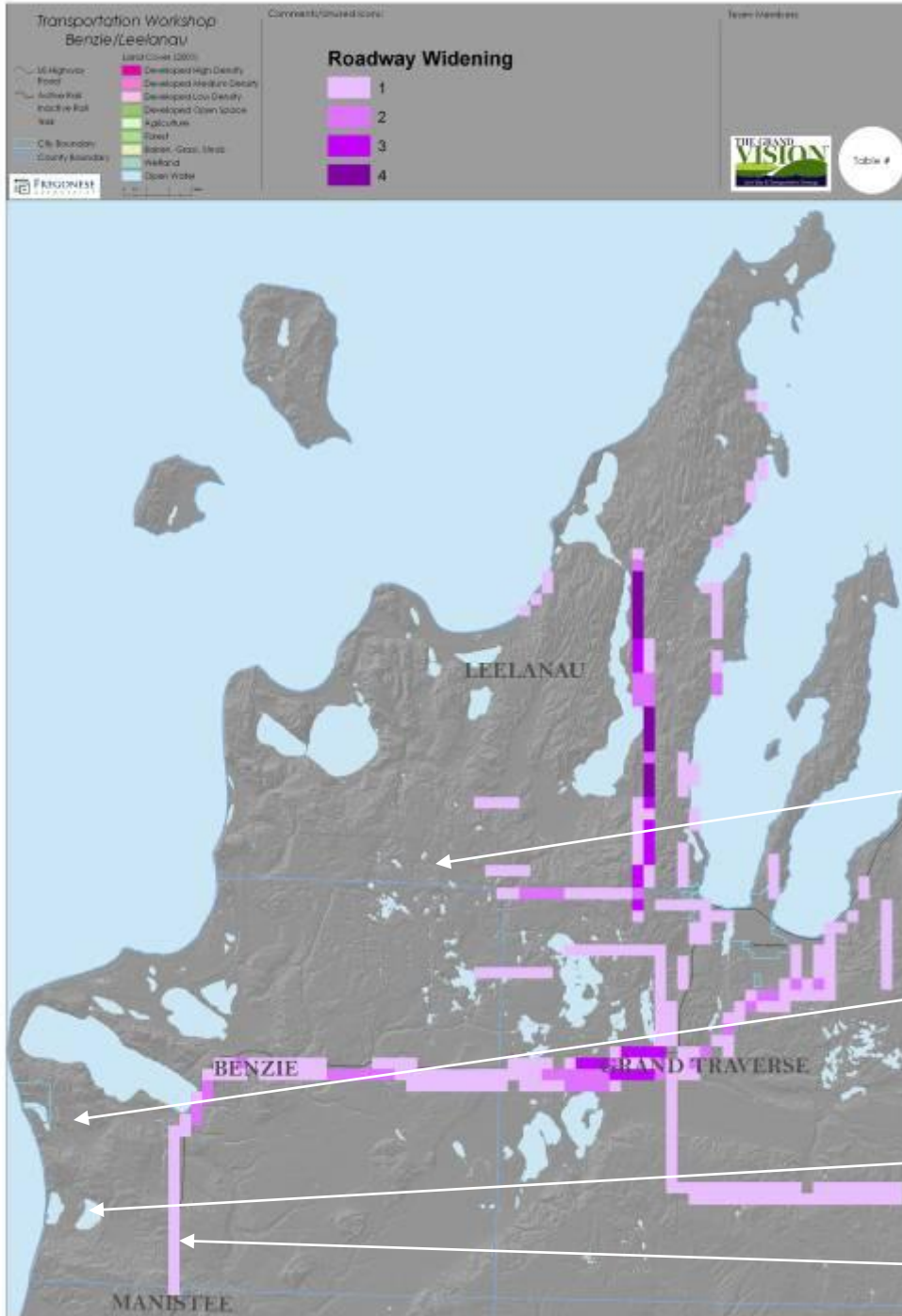
Hwy 22

US 31

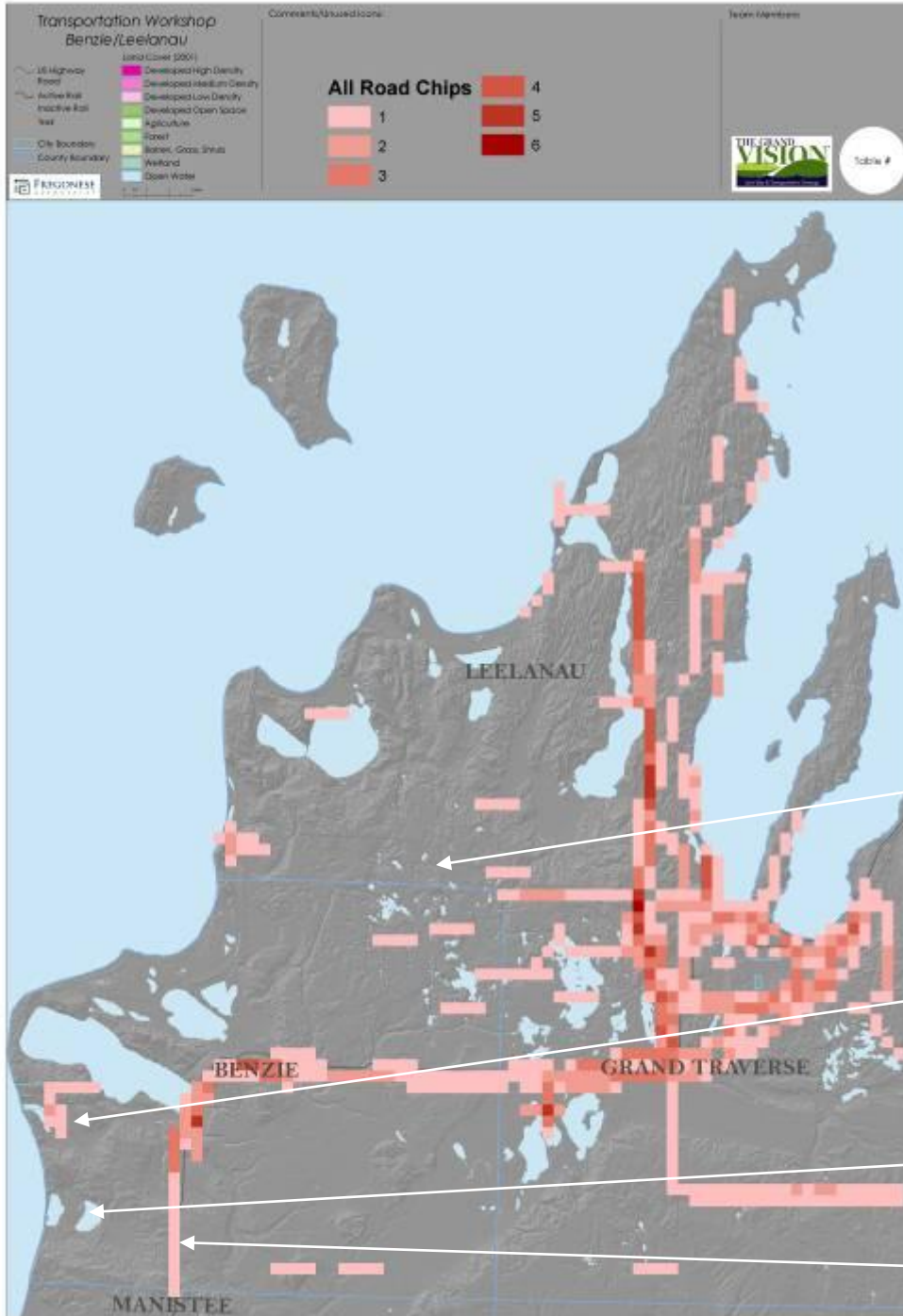
Transportation Workshop Results - New Roadway



Transportation Workshop Results - Roadway Widening



Transportation Workshop Results -All Road Chips



Hwy 72

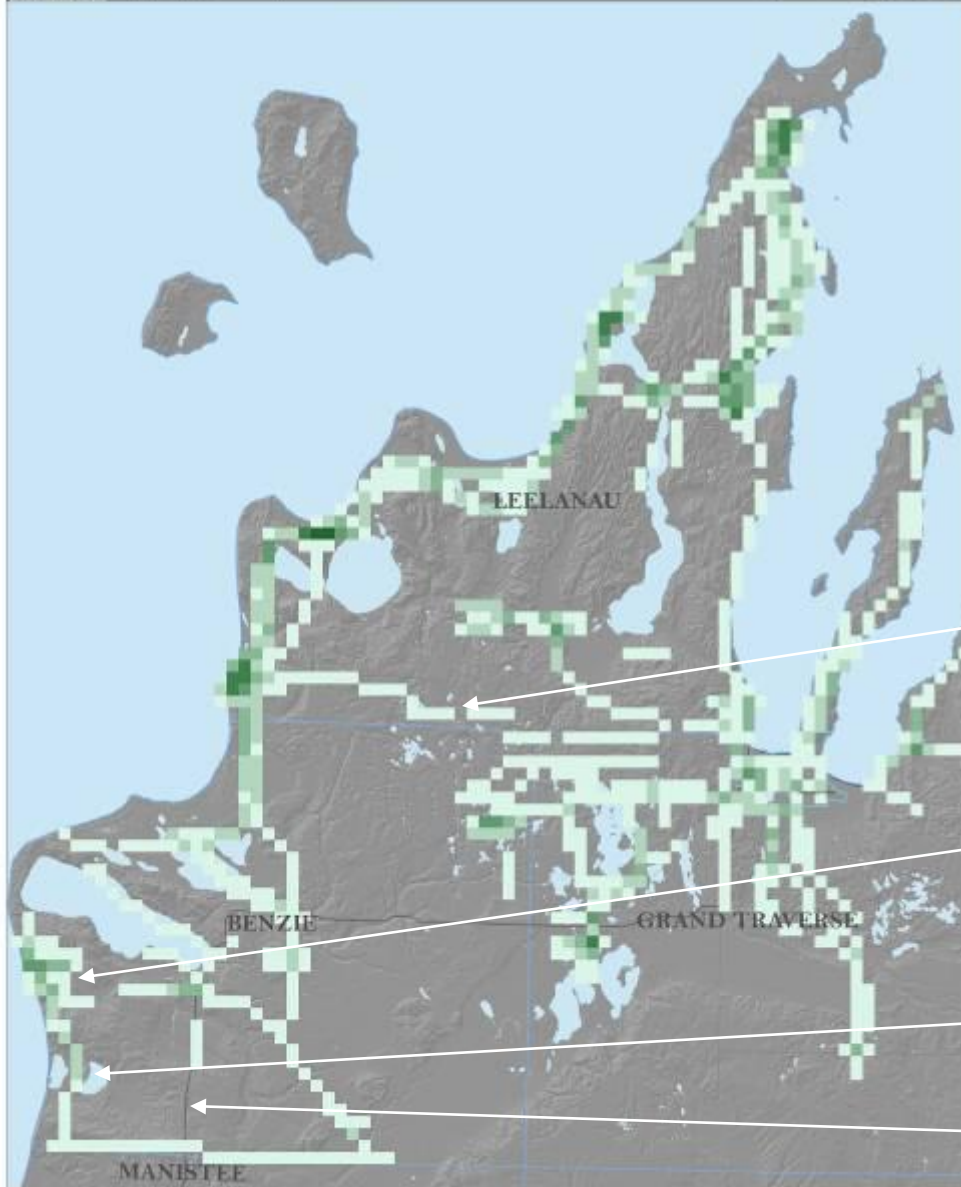
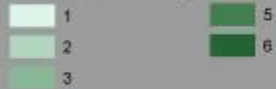
Frankfort

Hwy 22

US 31

- US Highway
 - Road
 - Active Rail
 - Inactive Rail
 - Sea
 - City Boundary
 - County Boundary
- LAND COVER (2001)
- Developed High Density
 - Developed Medium Density
 - Developed Low Density
 - Developed Open Space
 - Agriculture
 - Forest
 - Barren, Grass, Shrub
 - Wetland
 - Open Water
- FARGUES**

All Ped/Bike Chips



Transportation Workshop Results

-All Pedestrian/Bicycle Chips

Hwy 72

Frankfort

Hwy 22

US 31

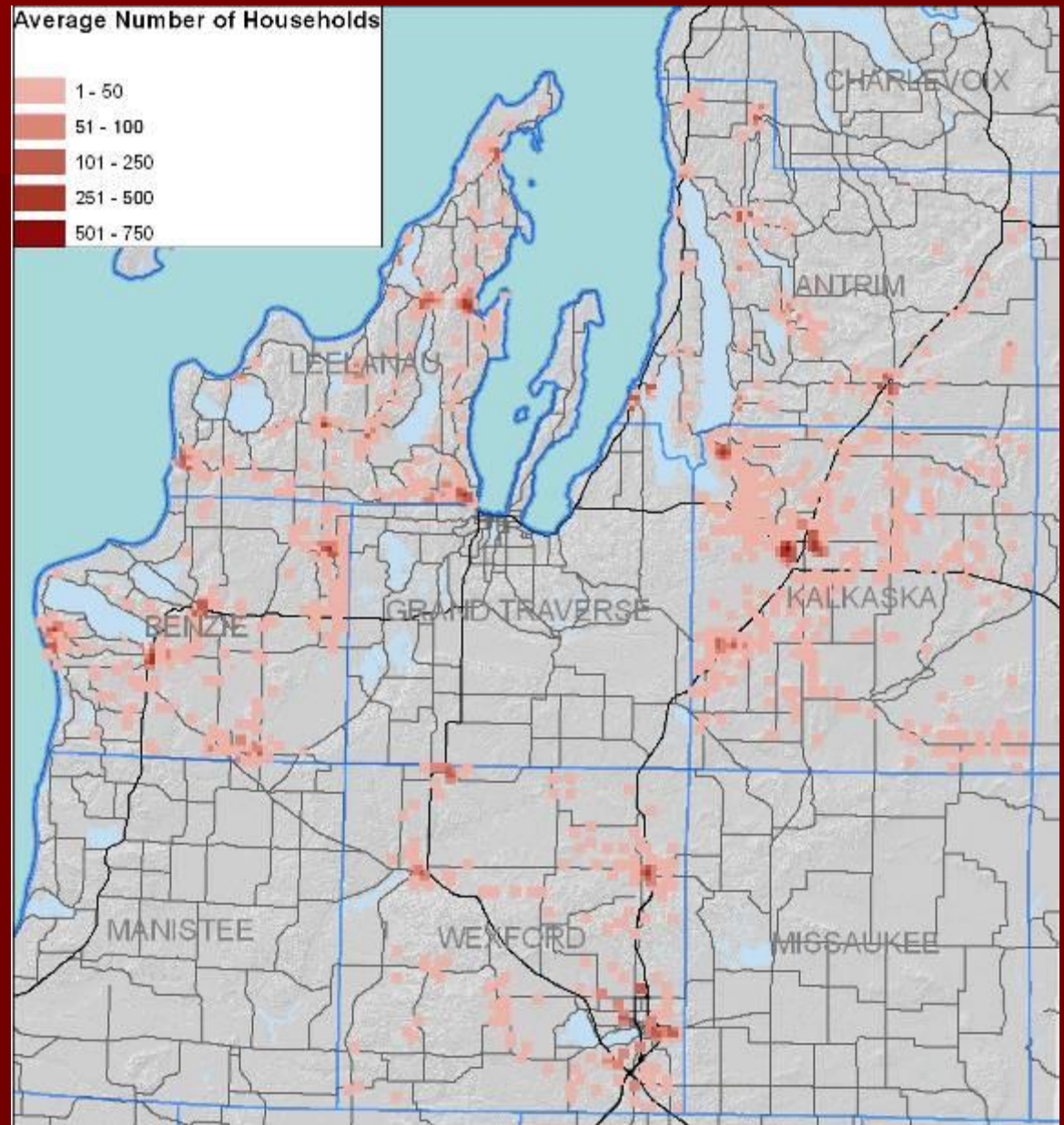
County Workshops

Workshop Results

Region-wide

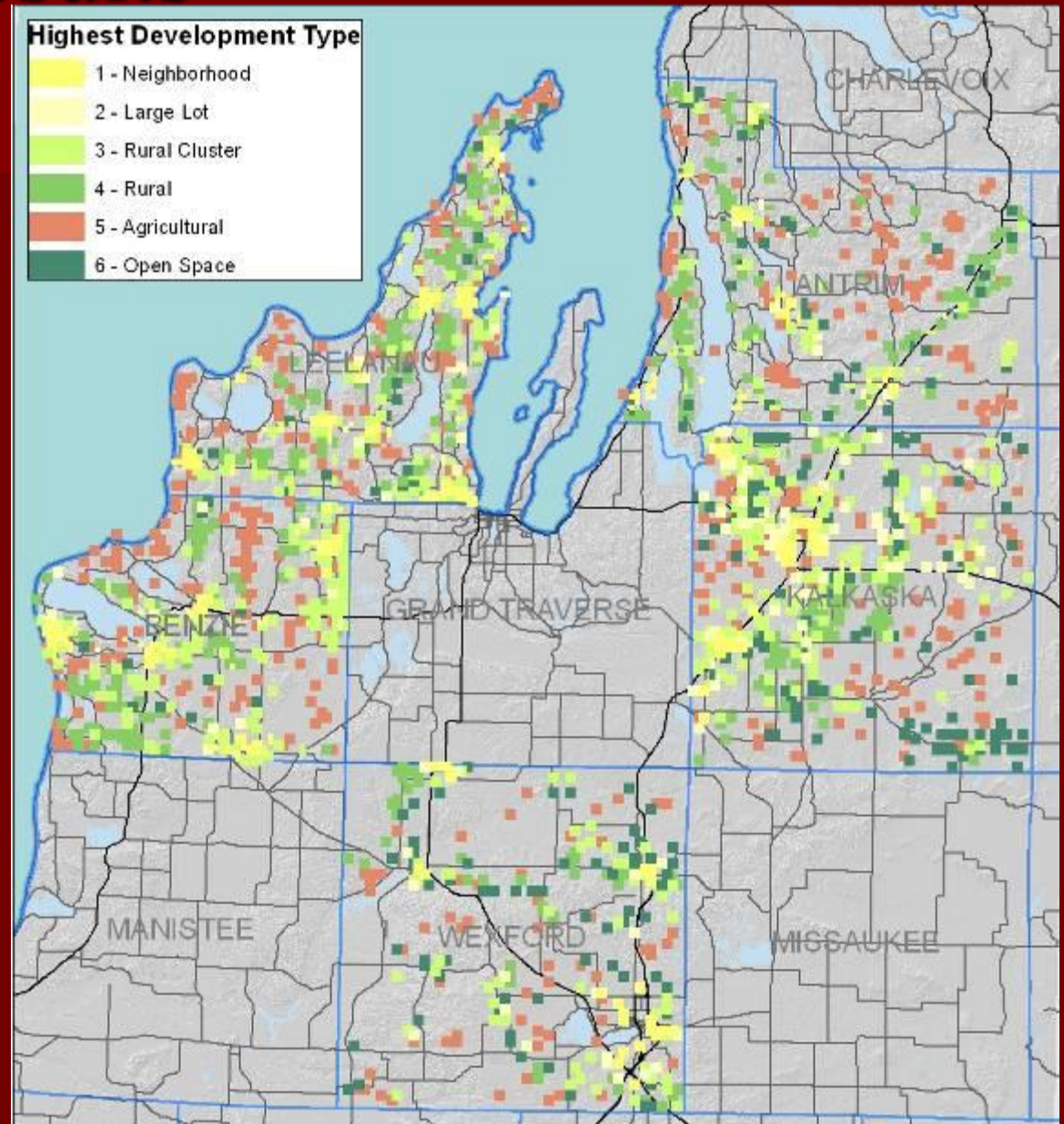
Workshop Results

Average Number of Households



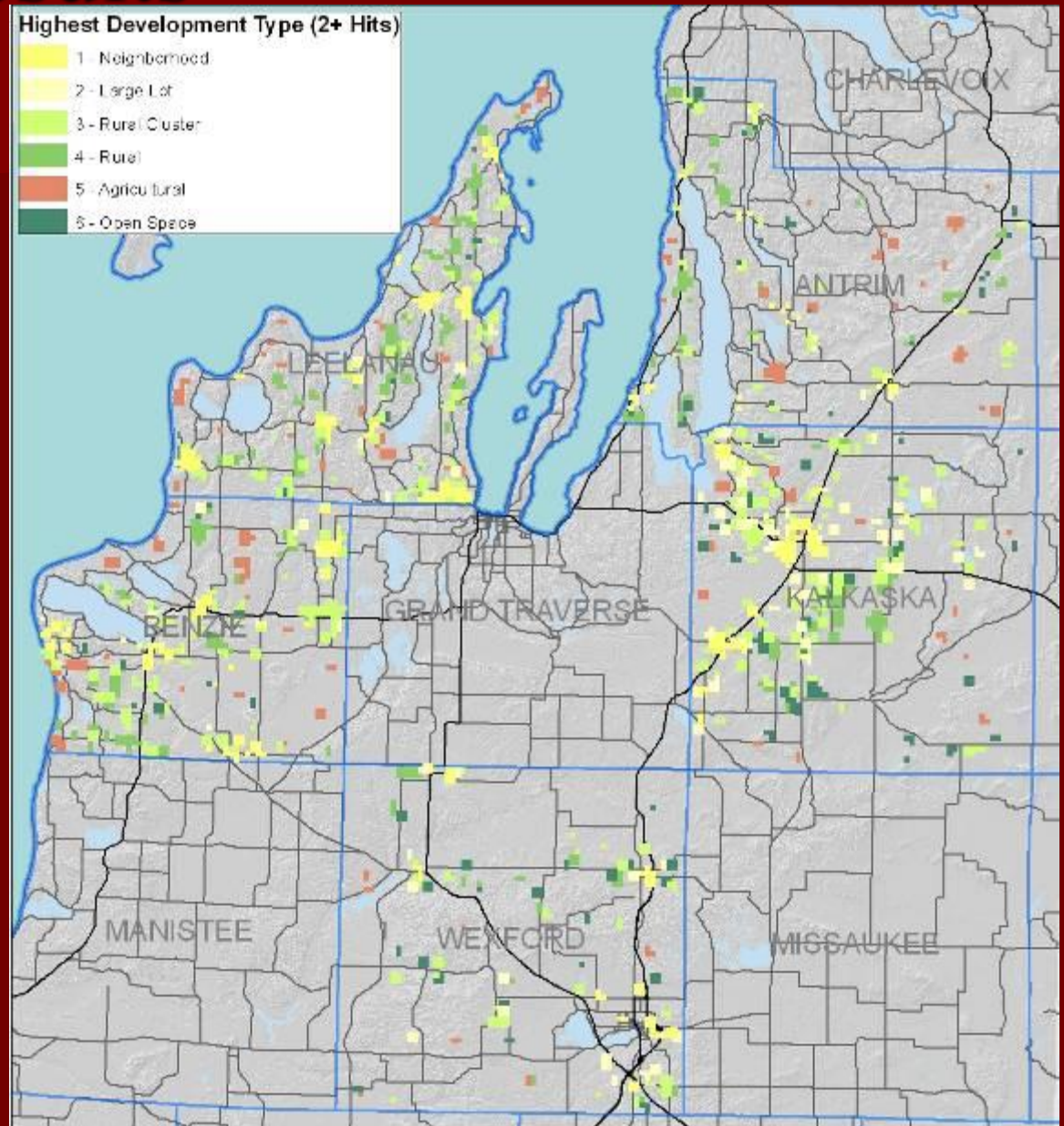
Workshop Results

Highest
Development Type



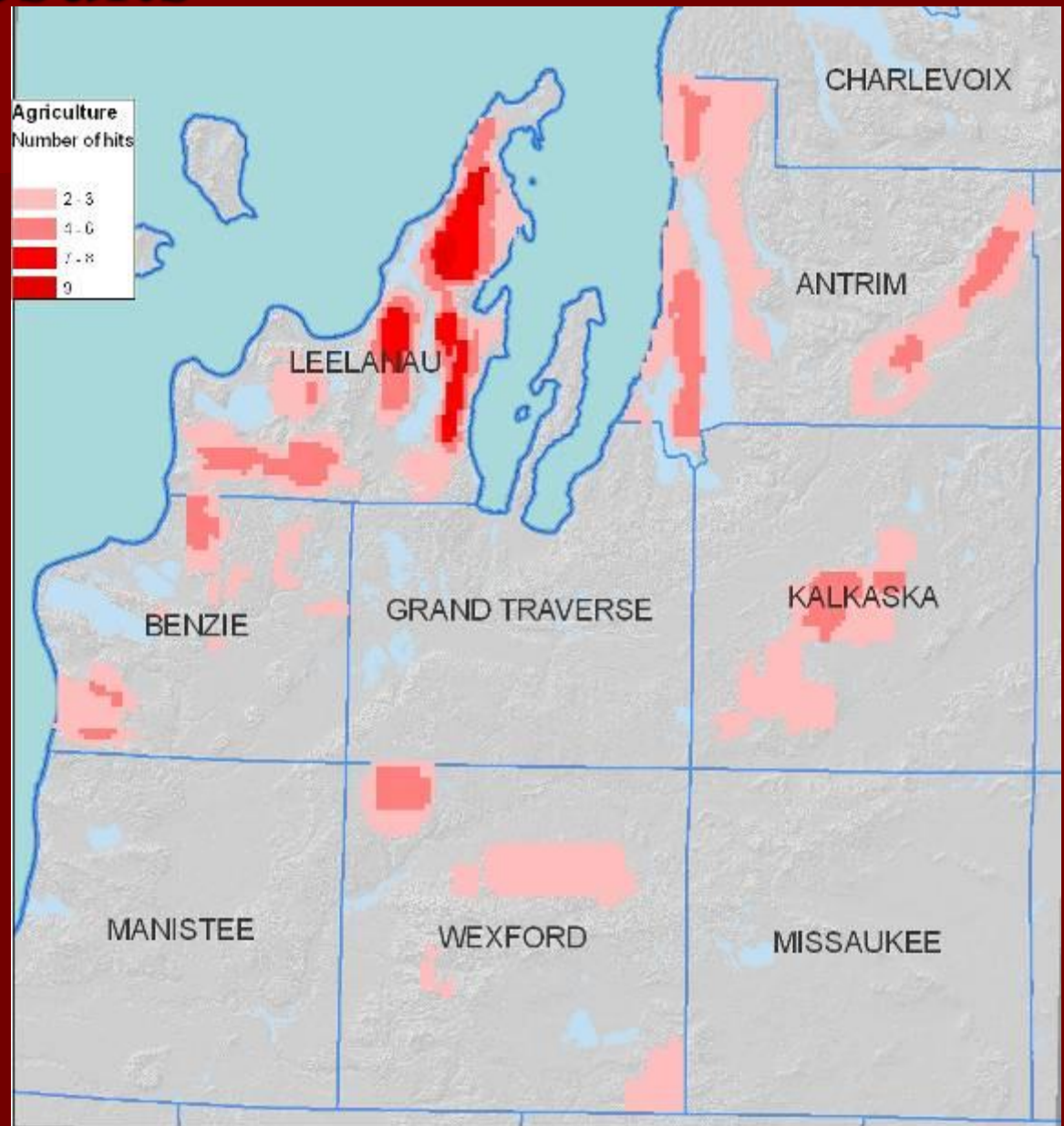
Workshop Results

Highest
Development Type:
at least 2 Hits



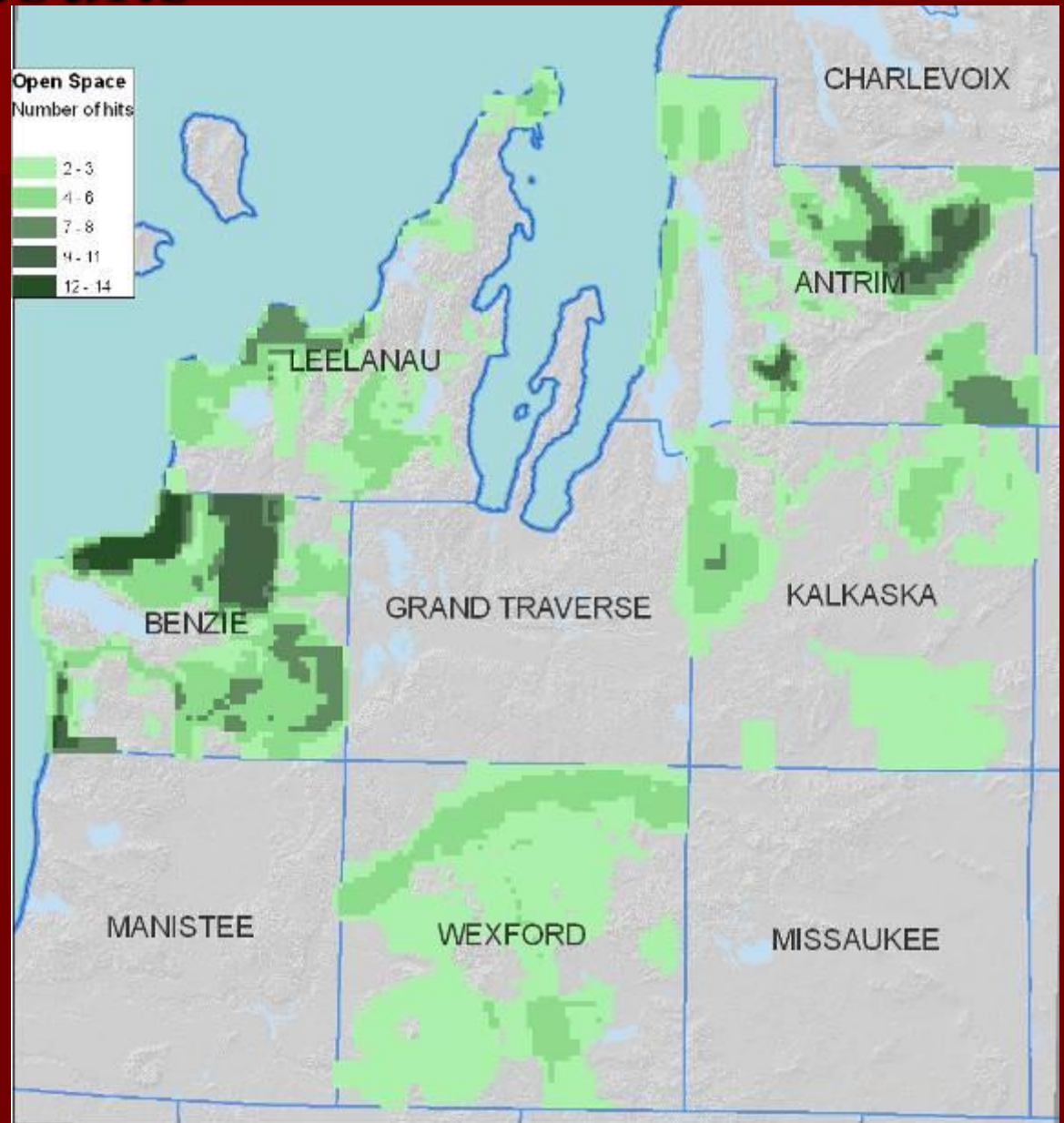
Workshop Results

Agricultural Conservation Areas



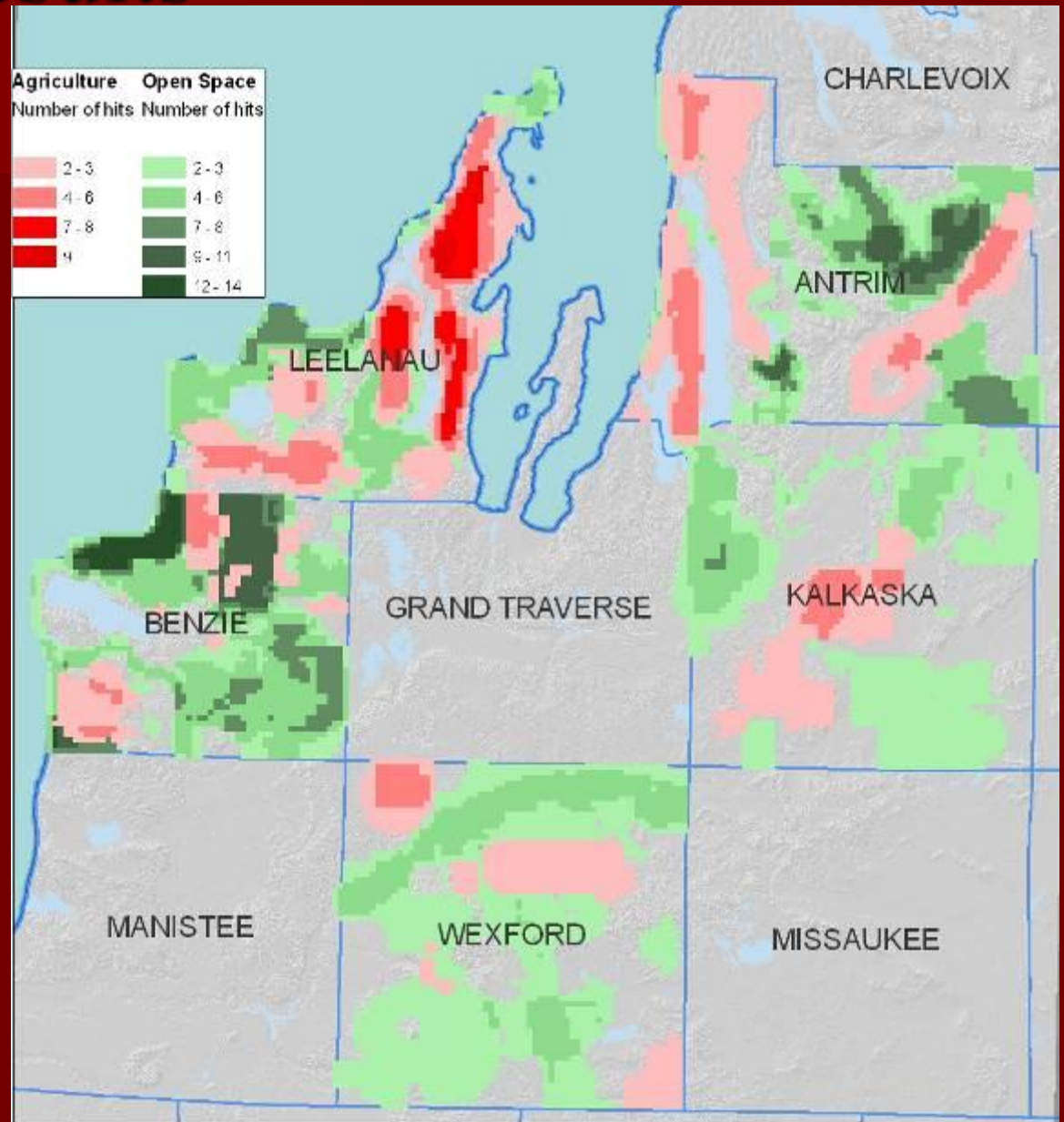
Workshop Results

Open Space Conservation Areas



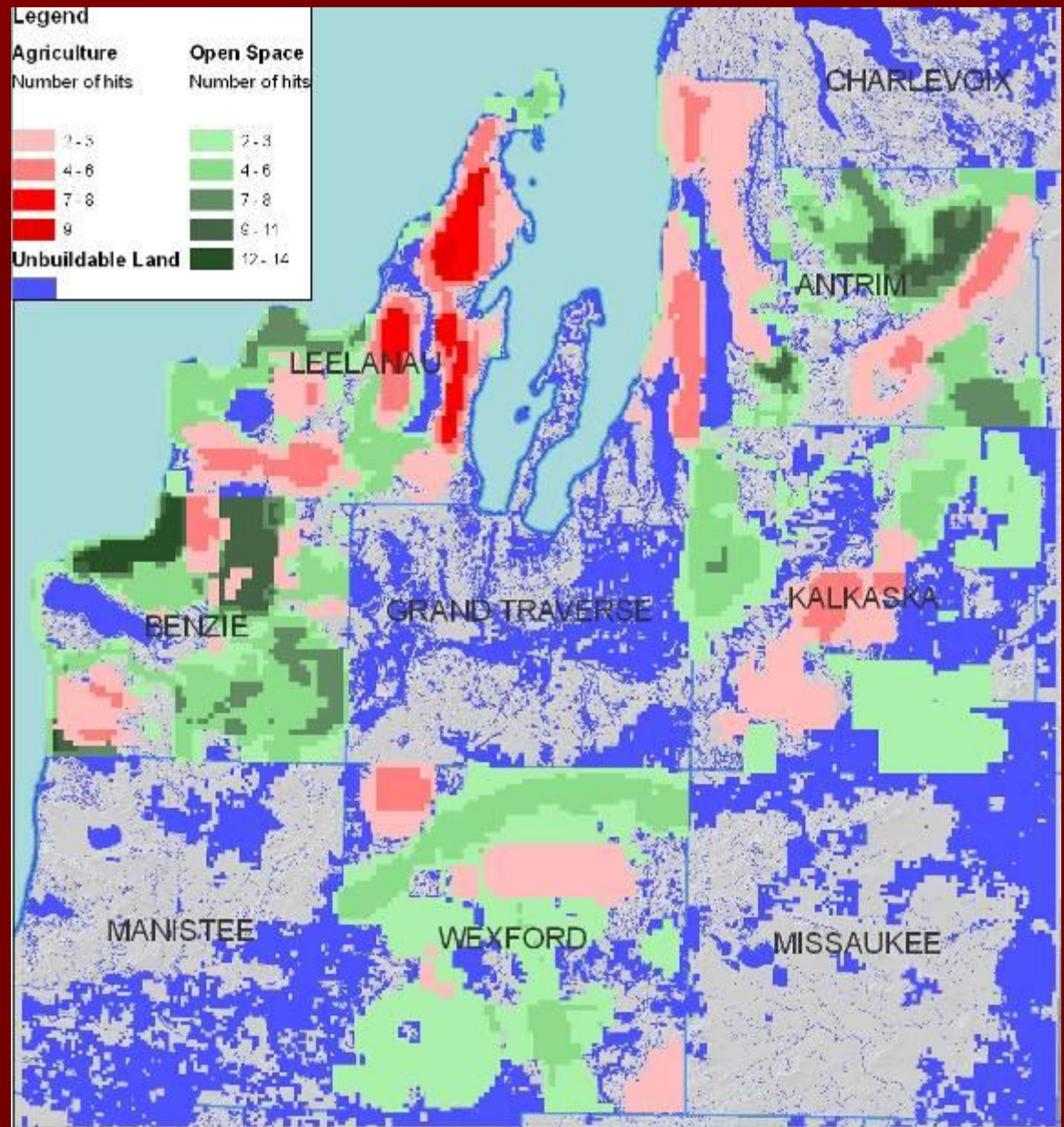
Workshop Results

Agriculture +
Open Space
Areas



Workshop Results

Agricultural+
Open Space
Areas &
Constrained
Land



Workshop Results

Antrim County

Workshop Results

Highest Development Type

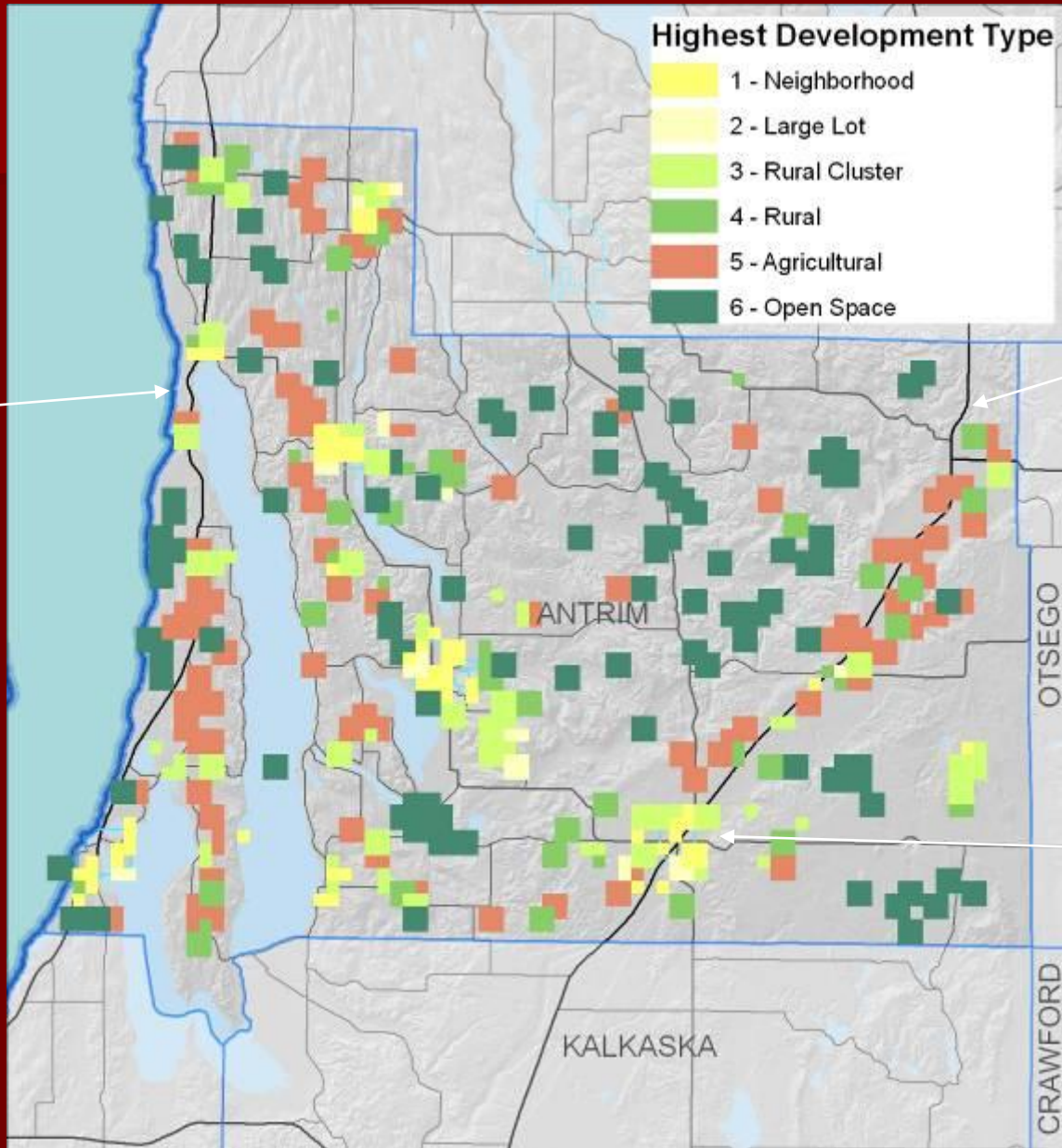
Highest Development Type

- 1 - Neighborhood
- 2 - Large Lot
- 3 - Rural Cluster
- 4 - Rural
- 5 - Agricultural
- 6 - Open Space

US Highway 31

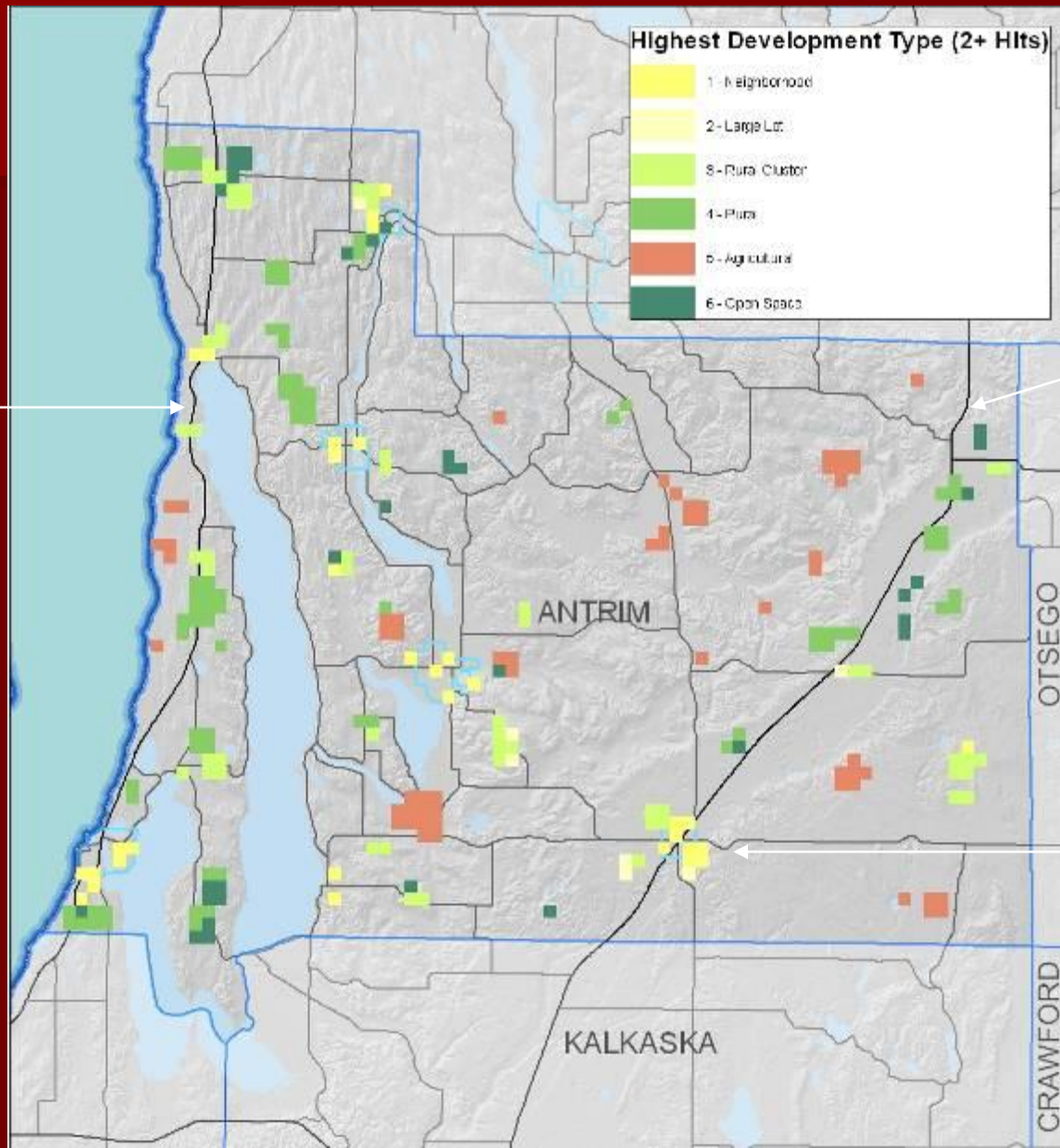
US Highway 131

Mancelona



Workshop Results

Highest
Development
at least
2 Hits



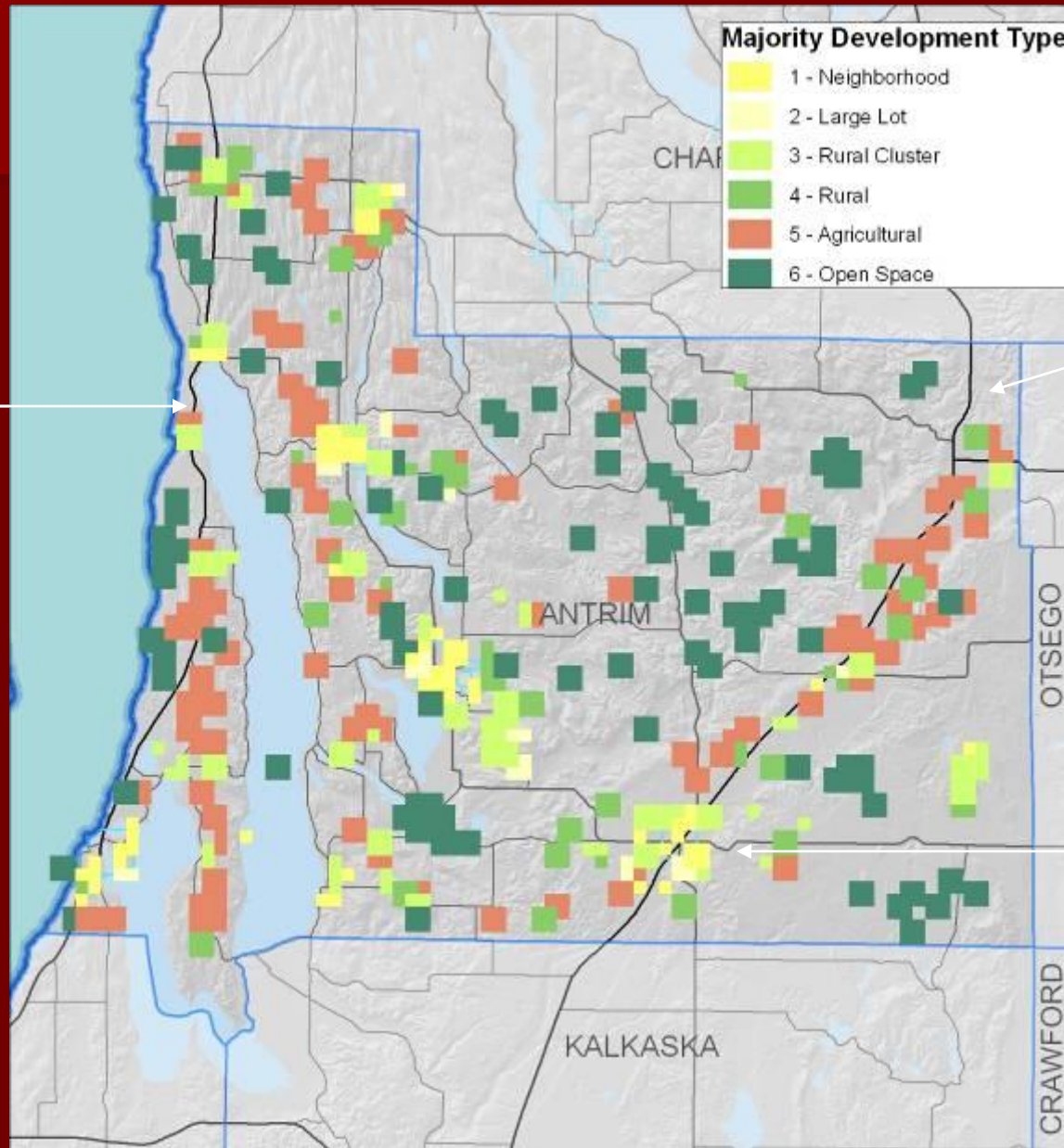
US Highway 131

US
Highway
31

Mancelona

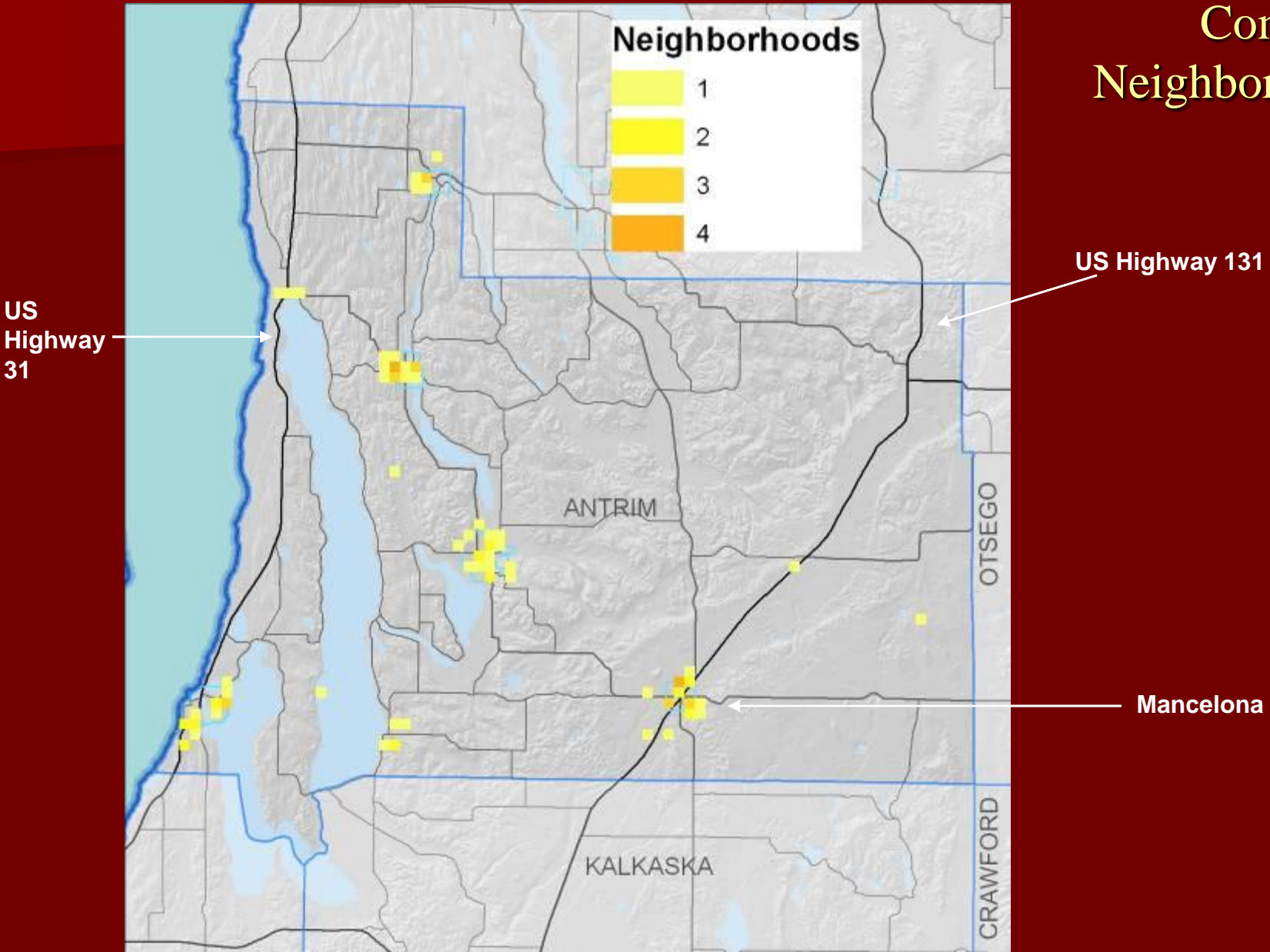
Workshop Results

Majority
of Development
Type



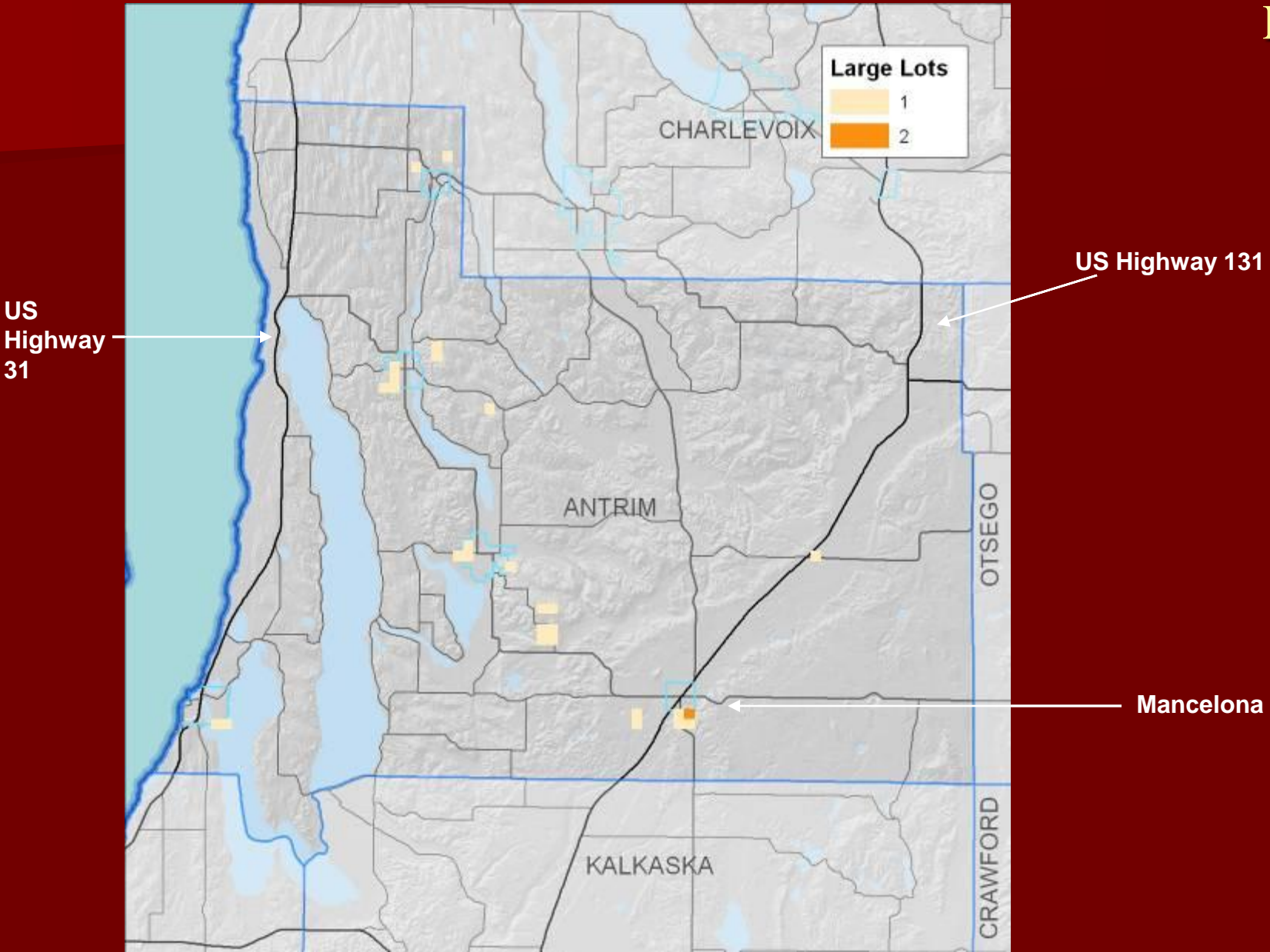
Workshop Results

Compact Neighborhood



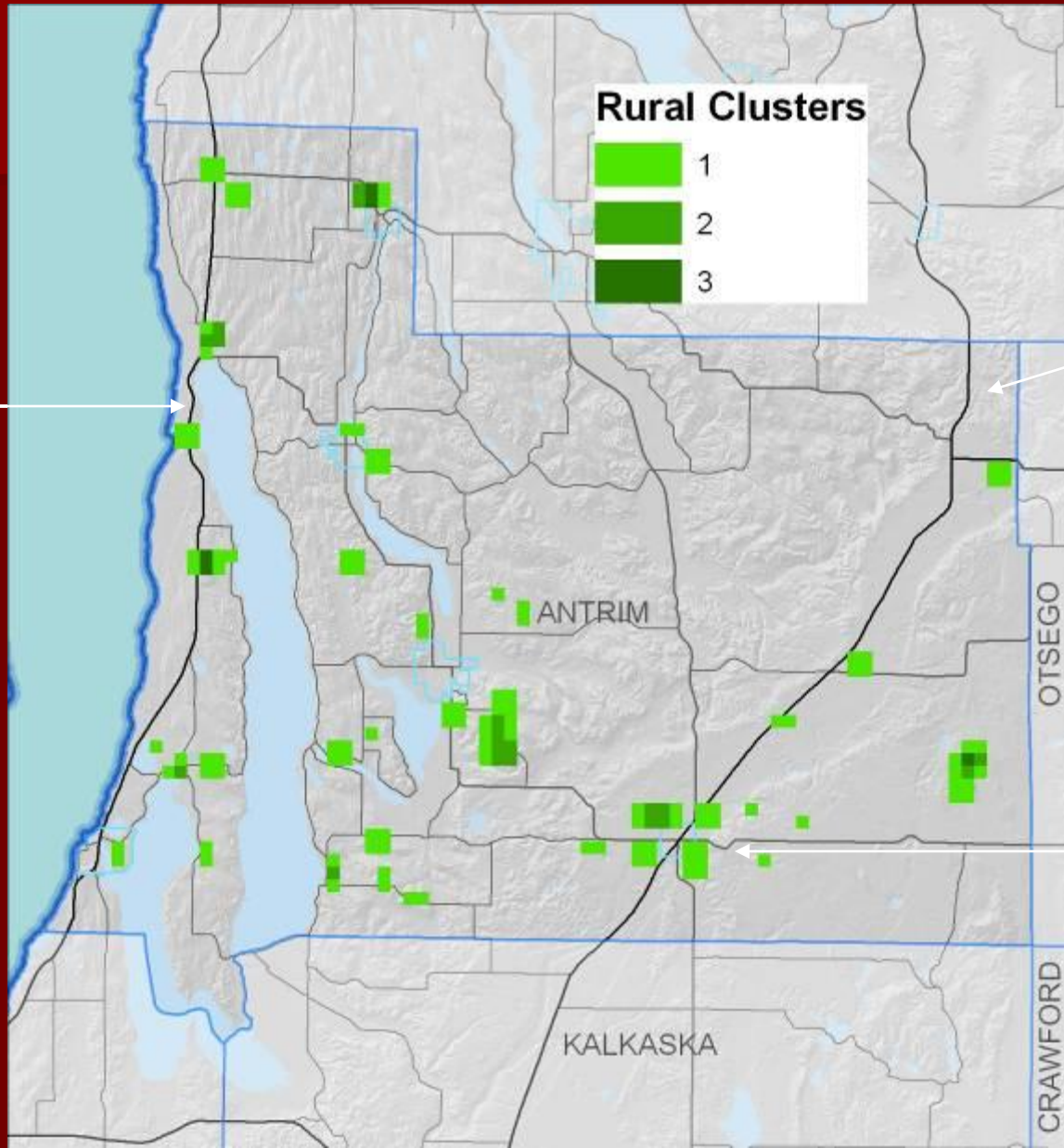
Workshop Results

Large Lot



Workshop Results

Rural Cluster



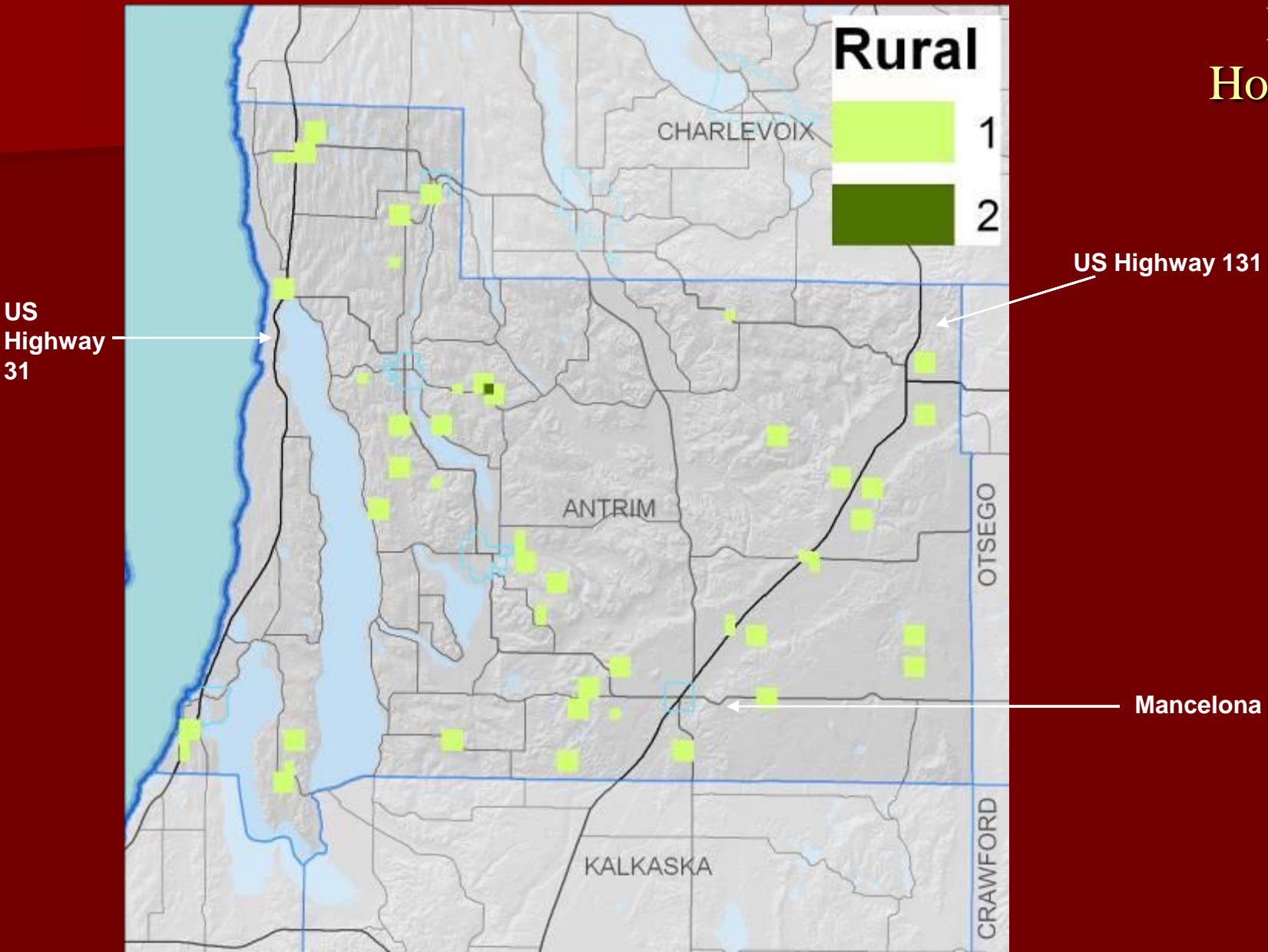
US Highway 131

US Highway 31

Mancelona

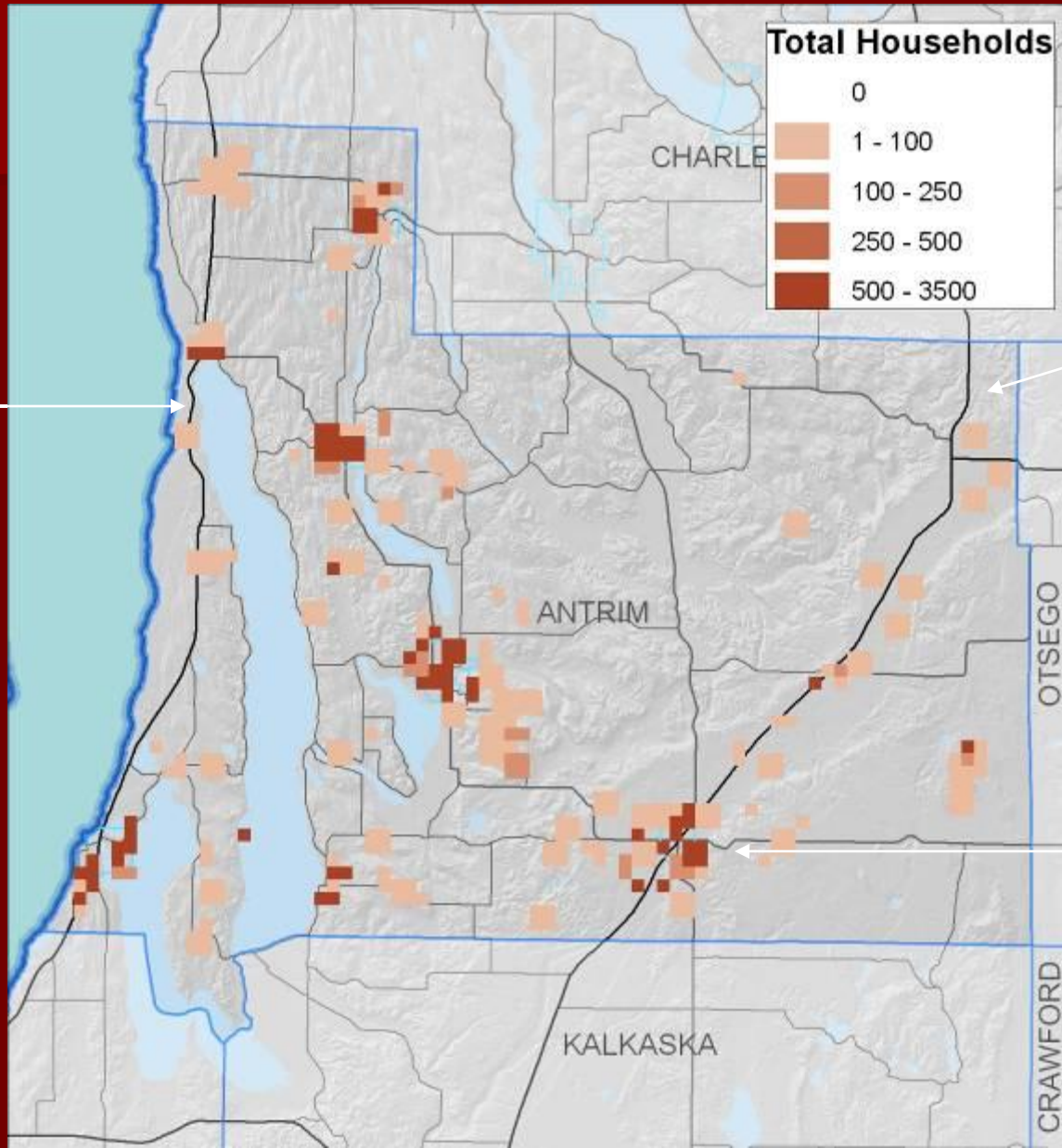
Workshop Results

Rural Housing



Workshop Results

Total Households



US Highway 131

Mancelona

US Highway 31