

Cedar Avenue Transitway Implementation Plan Update

MVTA Board Presentation

April 29, 2015



Agenda

1. Technical Analysis Results:
 - a. Ridership Forecast
 - b. Station Concepts
2. Investment Measures

Assumptions For Developing Ridership

– Service Plan:

- METRO Red Line frequency and span the same as existing service
- New routes: two east/west routes*
- Increased frequency on some express routes

– Land use according to City development plans

- 2040 population and employment

*Service improvements made for modelling purposes; route details to be determined by transit agencies by funding and demand at time of implementation.

Assumptions Used for Developing 2040 Ridership

- **No-Build**

- Cedar Grove Online Station
- New Route on Lindau Lane (Removal of 28th Ave. Station)
- Mall of America redesigned Transit Center
- Apple Valley Transit Station expansion of 2 parking levels

- **Build**

- Infill Stations at Palomino and Cliff Road
- Extension and Stations at 161st Street, Glacier Way, Lakeville-Cedar, 195th Street and 215th Street

2040 Ridership- Average Weekday Boardings

Route Type	Existing	2040 No Build	2040 Build
Corridor Local (not guideway)	600	2,300	3,100
Express/Local (guideway) <i>[Guideway Boardings]</i>	4,600 <i>[3,300]</i>	9,200 <i>[6,600]</i>	10,100 <i>[7,400]</i>
Red Line Station-to-Station	800	2,800	4,700
Total Guideway Boardings	5,400	12,000	14,800

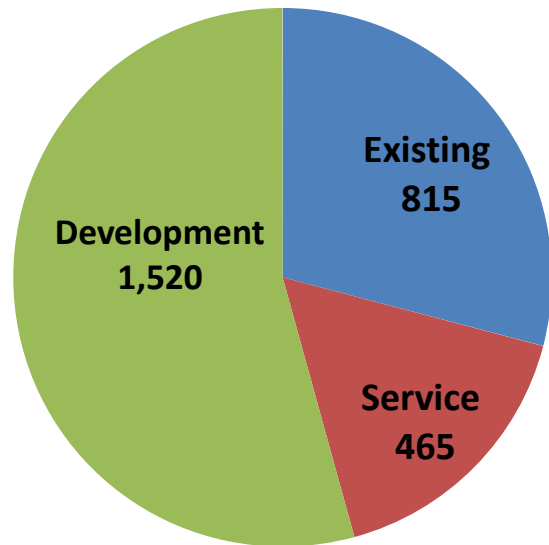
Previous 2030 Ridership from 2010 IPU

Route Type	Existing	2040 No Build	2040 Build	Previous 2030*
Corridor Local (not guideway)	600	2,300	3,100	9,850
Express/Local (guideway) <i>[Guideway Boardings]</i>	4,600 <i>[3,300]</i>	9,200 <i>[6,600]</i>	10,100 <i>[7,400]</i>	n/a <i>[5,350]</i>
Red Line Station-to- Station	800	2,800	4,700	3,650
Total Guideway Boardings	5,400	12,000	14,800	9,000

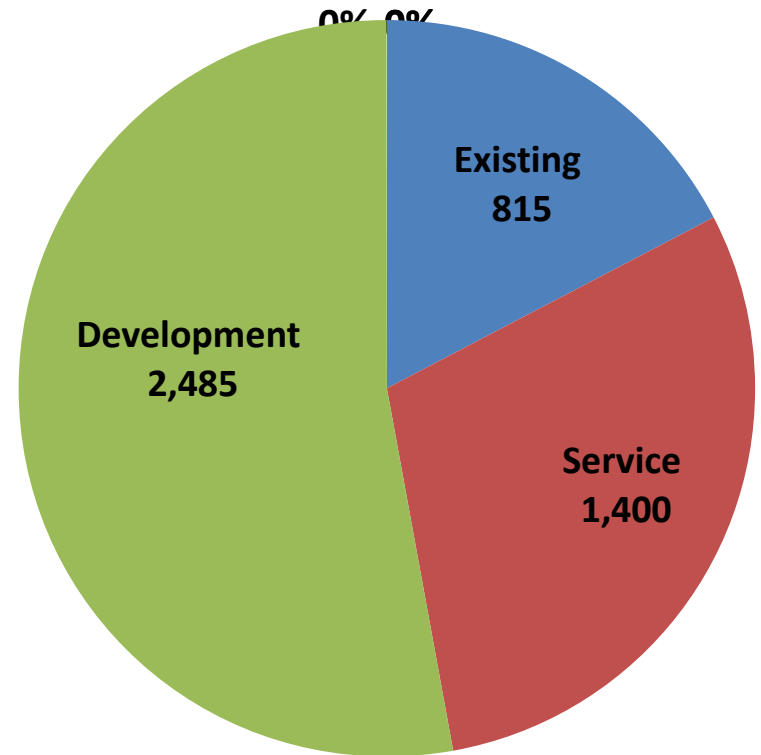
*Estimated comparison

Red Line Station-to-Station

No Build (2,800 daily rides)

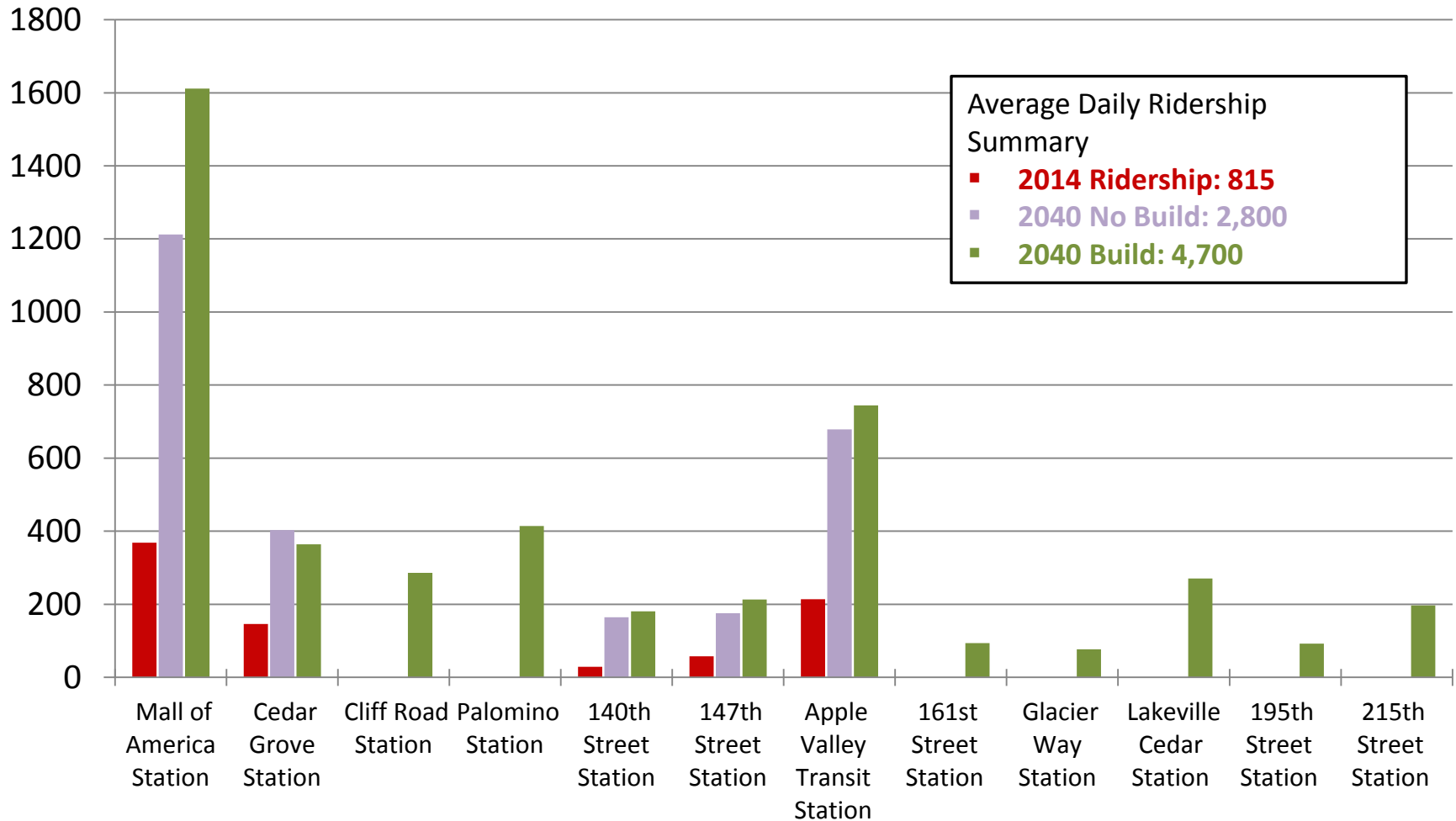


Build (4,700 daily rides)



Ridership Summarized in Production/Attraction Format

Red Line Station-to-Station Daily Boardings



Boardings and Alightings are depicted in Production/Attraction format






Park and Ride Space Demand

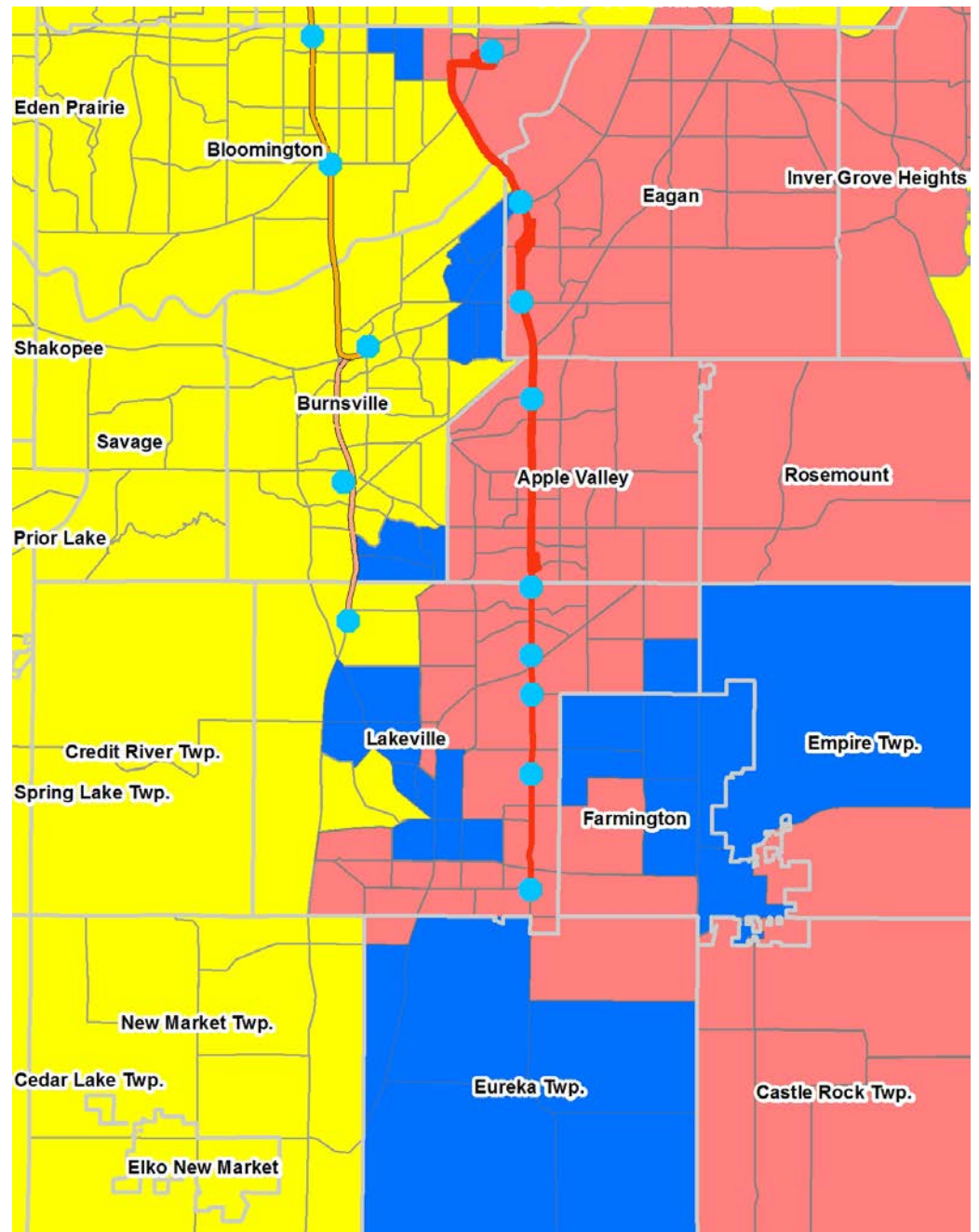
Station	2014 Usage	Current Capacity	2040 Express and Local Demand	2040 Station to station Demand	2040 Total Need
Cedar Grove	66	166	50-100	0-50	50-150
Palomino	250	318	800-900	200	1000-1100
Apple Valley Transit Station	818	768	1000-1100	100	1100-1200
Lakeville Cedar	10	190	25-50	25-50	50-100
215 th Street	new	new	25-50	25-50	50-100
Total	1144	1442	1900-2200	350-450	2250-2650

Red Line and Orange Line Extension Station-to-Station Travel shed

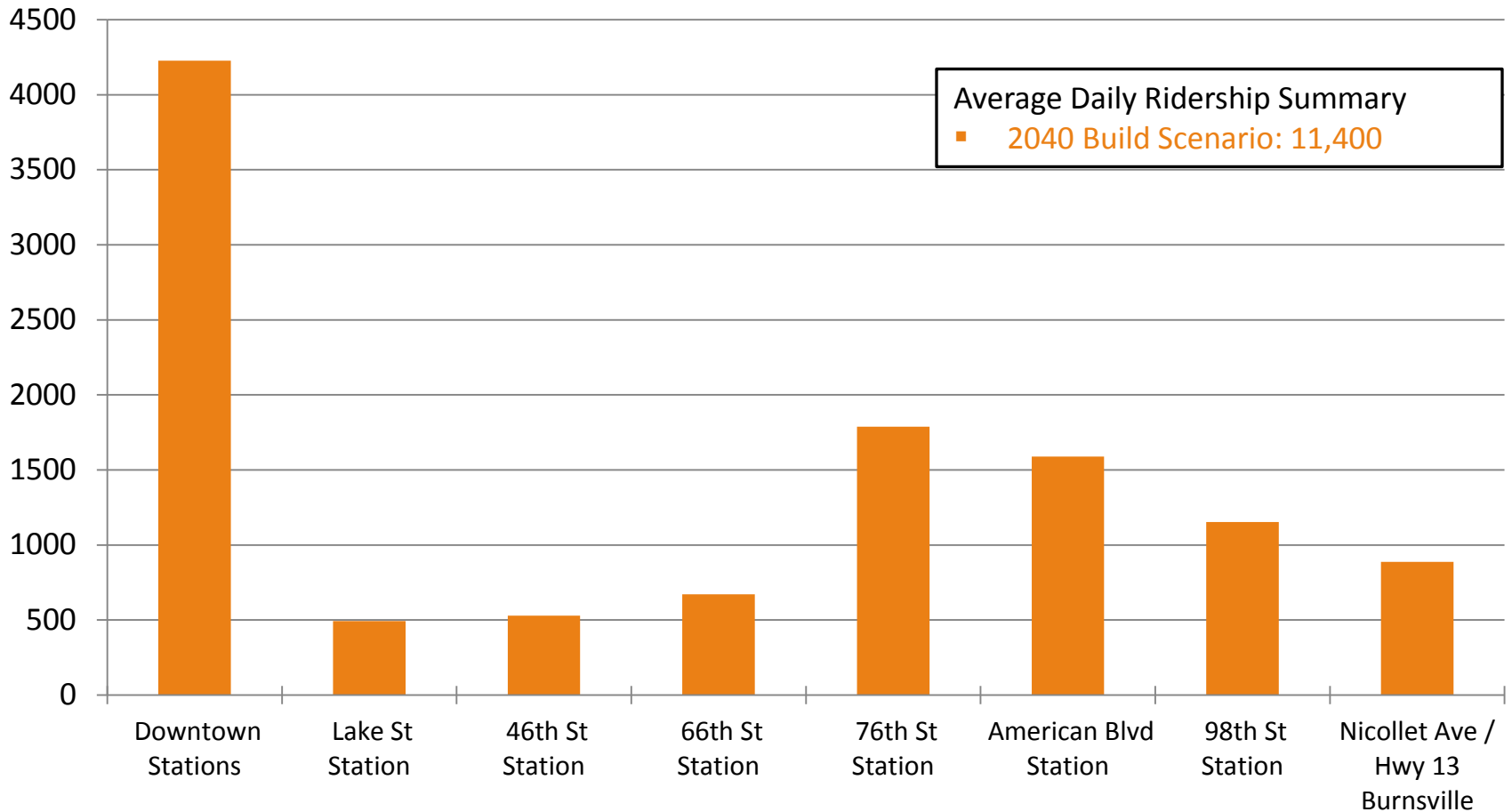
* 200 rider decrease
in station-to-station
Red Line ridership for
2040

Legend

-  Majority Orange Line
-  Balanced Market
-  Majority Red Line



Orange Line Station-to-Station Daily Boardings



Boardings and Alightings are depicted in Production/Attraction format

2040 Ridership- Average Weekday Rides

Route Type	Existing	2040 Build
Local (Not guideway)	300	4200
Express/Local (guideway) <i>[Rides using guideway]</i>	13,800 <i>n/a</i>	16,600 <i>[15,000]</i>
Orange Line Station-to-Station	n/a	11,400
Total Guideway Boardings	17,300	26,500

Ridership Sensitivity Tests

- Increase in ridership
 - Increased development/land use density near 147th Street and Glacier Way stations
- Slight decrease in ridership
 - Removal of Cliff Road Station
 - Move Palomino Park and Ride near 140th Street
- Same ridership
 - Adding a station in Bloomington near Old Cedar Avenue

Increased Density Sensitivity Test



3 units/acre



Increased Density Sensitivity Test

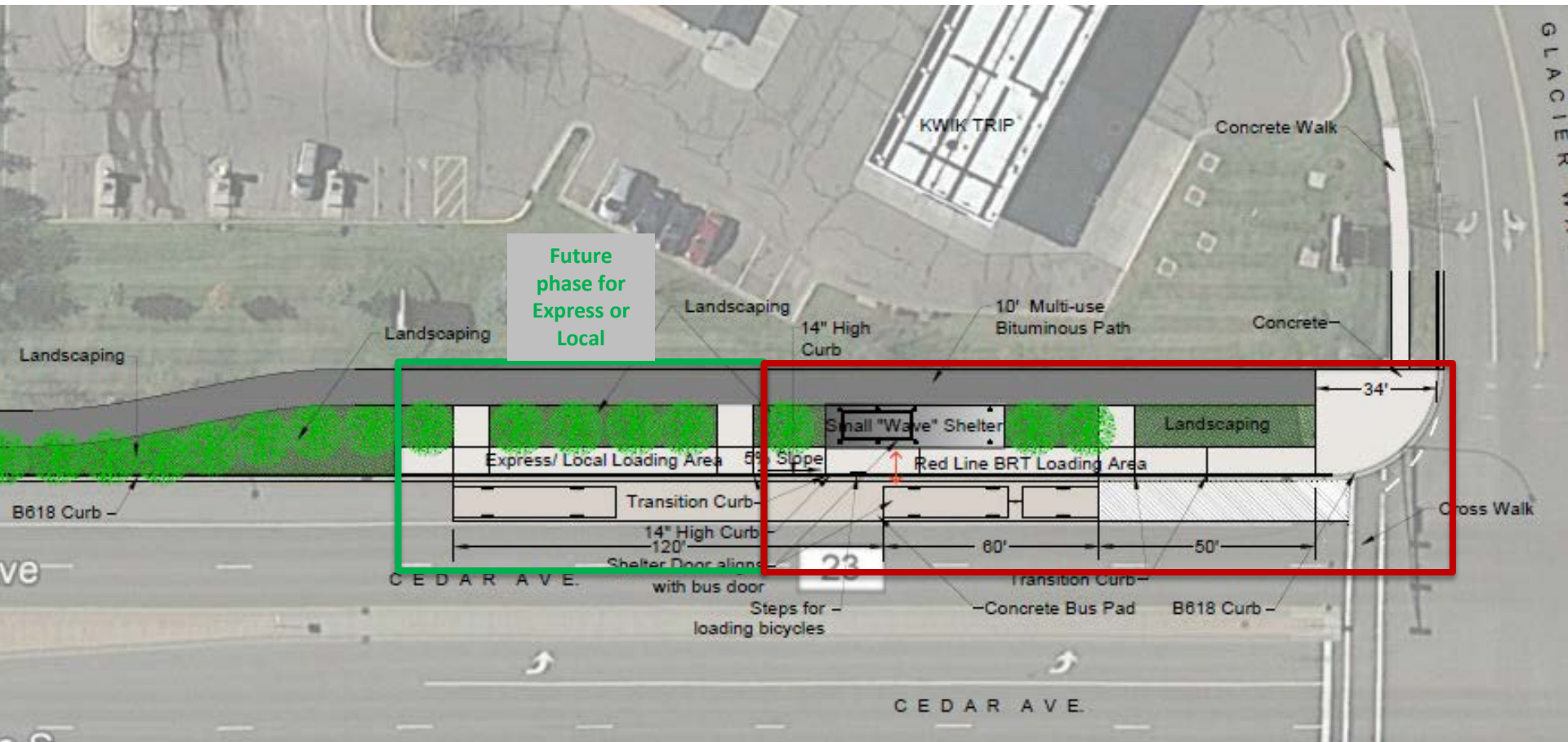


25 units/acre



32 units/acre

Station Concept



Estimated Capital Cost

- Station range: \$1.4 Million-\$2.8 Million
- Palomino station costs still in development

Draft Transit Development Measures

- Park-and-ride development should not exceed the capacity for the forecast year
- Minimum daily station boardings
- Total transitway ridership
- Number of zero car households within ½ mile of a transitway station
- Minority populations within ½ mile of a transitway station

Draft Transit Development Measures

- Passengers per in service hour
- Cost effectiveness
- Identified funding
- Number of total residents, jobs or students within a ½ mile of a station
- Appropriate density and land use need to be in local planning documents
- Others?

Questions?