



CART Route Optimization Study

Coolidge City Council Study Session – September 26, 2022



Agenda

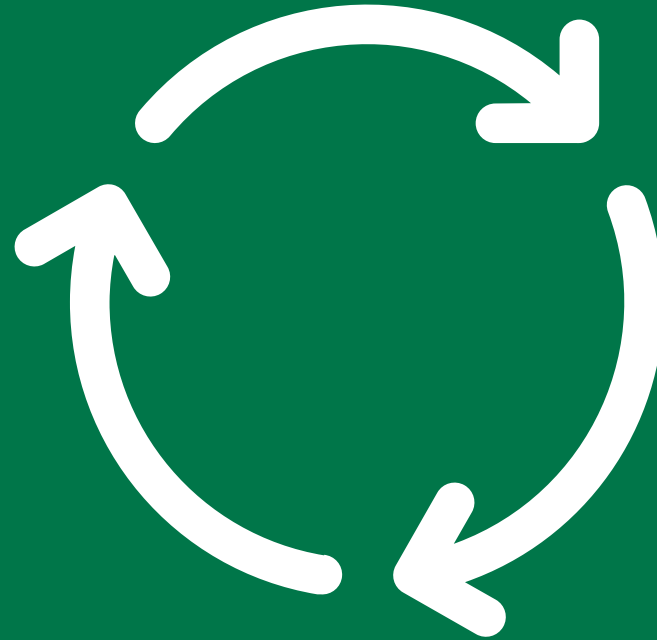
- Welcome
- Project introduction
- Project goals and objectives
- Existing conditions key takeaways
- Administrative review key takeaways
- Overview of alternatives
- Near-term service recommendations
- Long-term vision



Welcome!



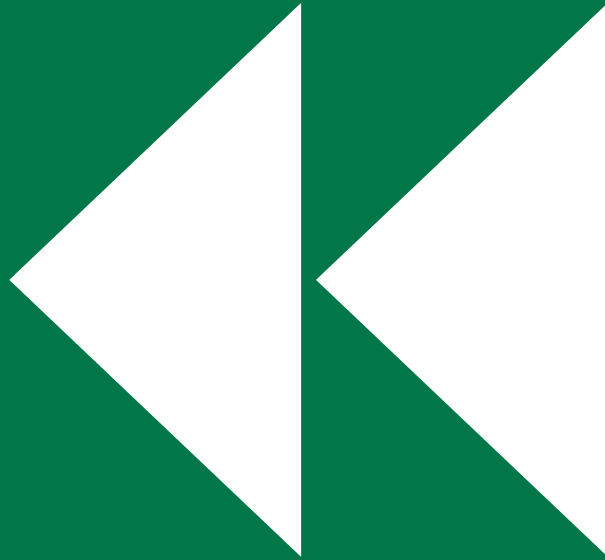
Study Process



Study Process



Project Background

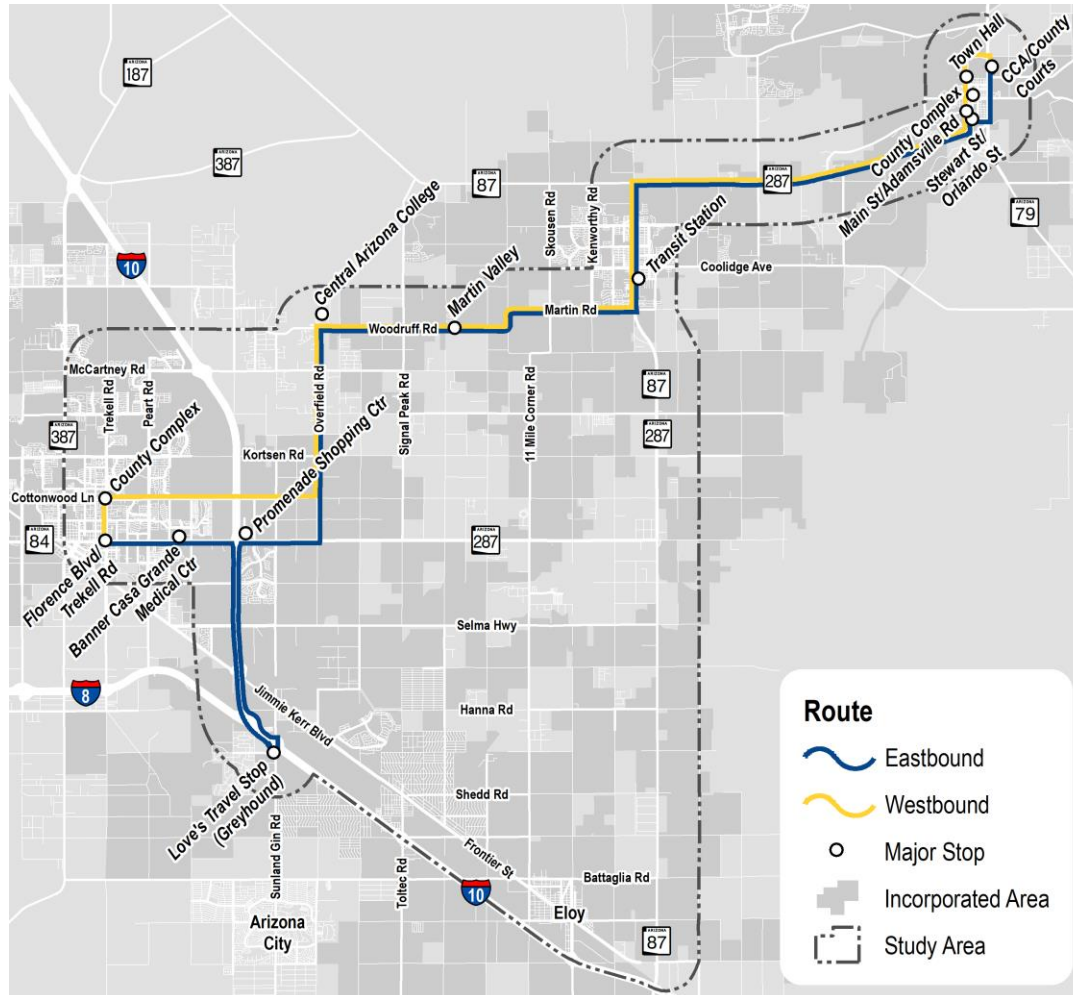


Project Background



- CART provides intercity transit between Casa Grande, Coolidge, northwest Eloy, and Florence
- Ridership has been declining in recent years
 - Made worse by the COVID-19 pandemic
- FTA 5311 funding from ADOT is increasingly competitive
- The Sun Corridor region is growing and changing rapidly

Existing CART Route



Review of Existing
Conditions

Alternatives
Analysis

Recommendations
Development

Implementation
Plan

- Five fixed route runs per day
- Two commuter runs daily
 - Commuter route does not serve the Love's Travel Stop/Greyhound
- 2.5 hour runs

Existing CART Schedule

Review of Existing
Conditions

Alternatives
Analysis

Recommendations
Development

Implementation
Plan

Westbound Route

Town Hall - Florence	-	7:04 AM	9:50 AM	12:36 PM	3:22 PM	6:10 PM
County Complex - Florence	-	7:07 AM	9:53 AM	12:39 PM	3:25 PM	6:13 PM
Main Street/Adamsville Road	-	7:10 AM	9:56 AM	12:42 PM	3:28 PM	6:16 PM
Transit Station - Coolidge	-	7:30 AM	10:16 AM	1:02 PM	3:50 PM	6:36 PM
Martin Valley	-	7:40 AM	10:26 AM	1:12 PM	4:00 PM	6:46 PM
Central Arizona College	-	7:50 AM	10:36 AM	1:22 PM	4:10 PM	6:56 PM
County Complex - Casa Grande	-	8:07 AM	10:53 AM	1:39 PM	4:27 PM	7:13 PM
Florence Boulevard/Trekell Road	-	8:12 AM	10:58 AM	1:44 PM	4:32 PM	7:18 PM

Eastbound Route

Banner Casa Grande Medical Center	-	8:21 AM	11:07 AM	1:53 PM	4:41 PM	7:27 PM
Love's Travel Stop (Greyhound)	-	8:36 AM	11:22 AM	2:08 PM	4:57 PM	7:42 PM
Promenade Shopping Center	-	8:47 AM	11:33 AM	2:19 PM	5:07 PM	7:53 PM
Central Arizona College	-	9:00 AM	11:46 AM	2:32 PM	5:20 PM	8:06 PM
Martin Valley	-	9:06 AM	11:52 AM	2:38 PM	5:26 PM	8:12 PM
Transit Station - Coolidge	6:35 AM	9:21 AM	12:07 PM	2:53 PM	5:41 PM	8:22 PM
Stewart Street/Orlando Street	6:53 AM	9:39 AM	12:25 PM	3:11 PM	5:59 PM	-
CCA/County Courts	7:00 AM	9:46 AM	12:32 PM	3:18 PM	6:06 PM	-



Existing CART Schedule

Review of Existing
Conditions

Alternatives
Analysis

Recommendations
Development

Implementation
Plan

AM Commuter Route		PM Commuter Route	
Transit Station - Coolidge	5:05 AM	Transit Station - Coolidge	4:40 PM
County Complex - Casa Grande	5:37 AM	Stewart Street/Orlando Street	4:58 PM
Banner Casa Grande Medical Center	5:49 AM	CCA/County Courts	5:04 PM
Promenade Shopping Center	5:54 AM	Town Hall - Florence	5:04 PM
Transit Station - Coolidge	6:19 AM	County Complex - Florence	5:11 PM
Stewart Street/Orlando Street	6:37 AM	Main Street/Adamsville Road	5:13 PM
CCA/County Courts	6:41 AM	Transit Station - Coolidge	5:32 PM
Town Hall - Florence	6:45 PM	Promenade Shopping Center	6:01 PM
County Complex - Florence	6:47 AM	Banner Casa Grande Medical Center	6:08 PM
Main Street/Adamsville Road	6:49 AM	County Complex - Casa Grande	6:23 PM
Transit Station - Coolidge	7:07 AM	Transit Station - Coolidge	6:59 PM



Goals and Objectives



Goals and Objectives

Review of Existing
Conditions

Alternatives
Analysis

Recommendations
Development

Implementation
Plan



Evaluate the current system, including current routing, ridership, transit need, and how CART compares to similar systems.



Identify constraints of CART's staff, vehicle inventory, and funding to recommend improvements to the efficiency of the CART route.



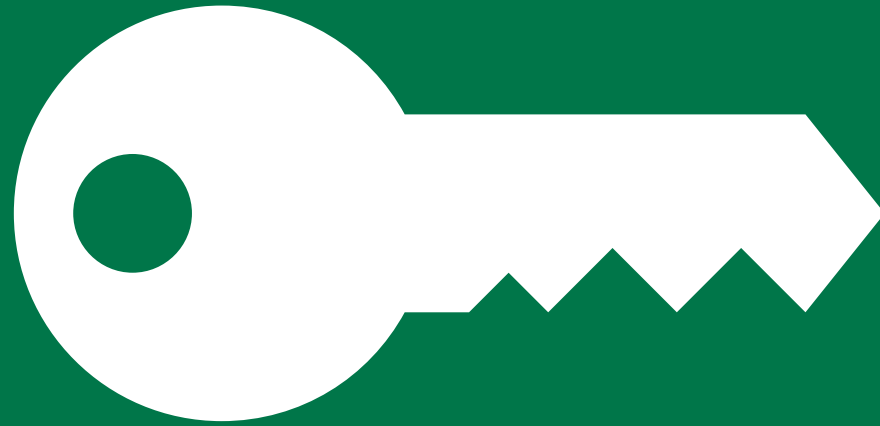
Evaluate the existing organizational structure of the City of Coolidge Transit staff and associated administrative activities to potentially reduce time or cost of administration of the CART system.



Design marketing materials meant to aid the City of Coolidge in increasing awareness and ultimately ridership of the CART system.



Existing Conditions Key Takeaways



Performance

Review of Existing
Conditions

Alternatives
Analysis

Recommendations
Development

Implementation
Plan

CART's existing performance was compared with peer systems. The services performance was evaluated through the following metrics:

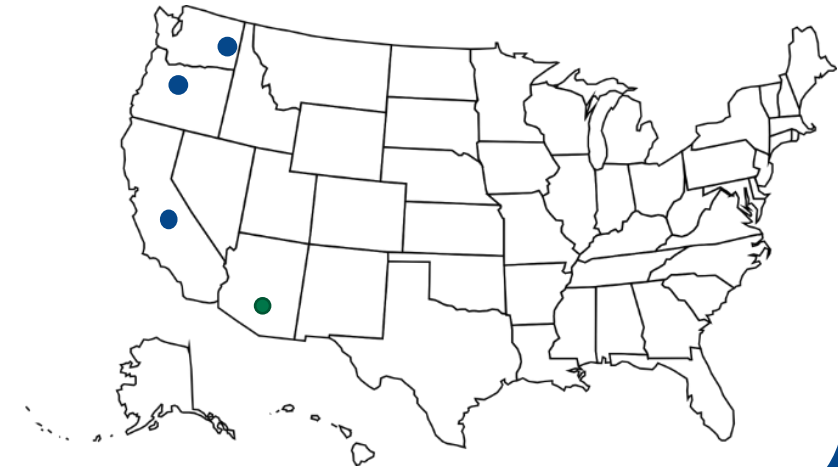
- Fleet management
- Ridership by stop
- Revenue miles per capita
- Passengers per revenue mile
- Cost per revenue mile
- Cost per trip
- Fares

Peer System Identification

Madera County Connection
Transit (MCCT), *Madera, CA*

Rural Resources Community
Action (RRCA), *Colville, WA*

Columbia Area Transit (CAT),
Hood River, OR



Performance

Review of Existing
Conditions

Alternatives
Analysis

Recommendations
Development

Implementation
Plan

Service Indicators	CART Performance (2019)	Peer System Average (2019)	CART vs Peer Systems Performance
Annual Ridership	6,491	13,723	X
Revenue Miles	96,085	146,073	X
Revenue Miles per Capita	1.03	8.82	X
Passengers per Revenue Mile	0.067	0.068	X
Cost per Revenue Mile	\$2.21	\$1.87	X
Cost per Trip	\$32.74	\$20.95	X
Farebox Recovery Ratio	3.83%	7.2%	X



Public Survey

Review of Existing
Conditions

Alternatives
Analysis

Recommendations
Development

Implementation
Plan

Changes most likely to
increase ridership on CART

Earlier Service
Hours
12%

Different
Destination
17%

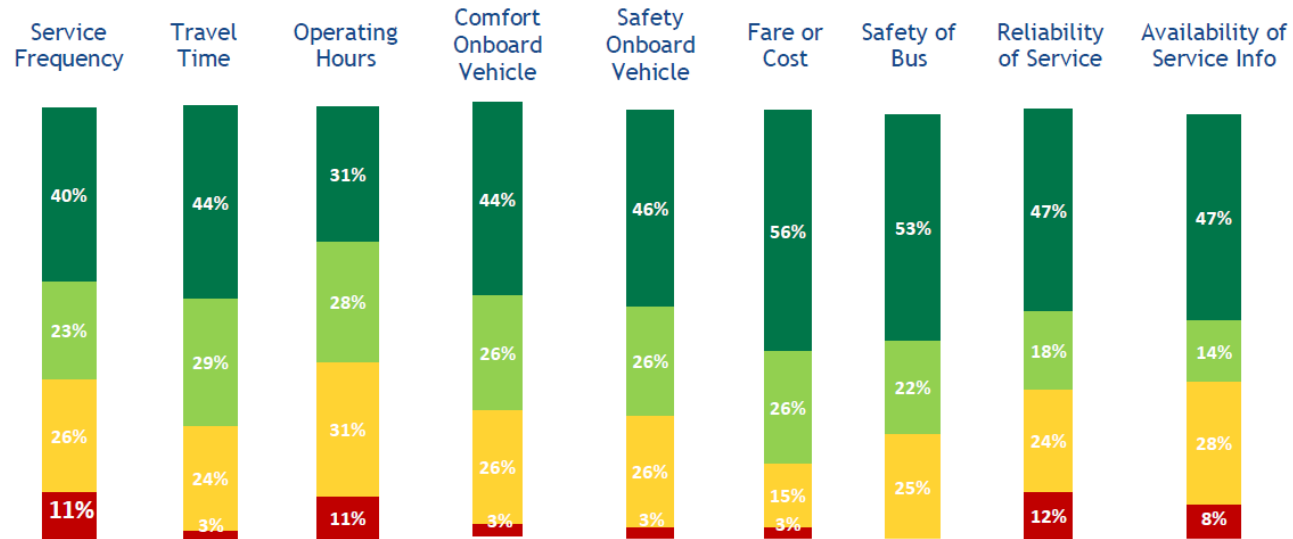
Later Service
Hours
20%

More Frequent
Service
22%

Weekend
Service
29%

Less Likely

More Likely

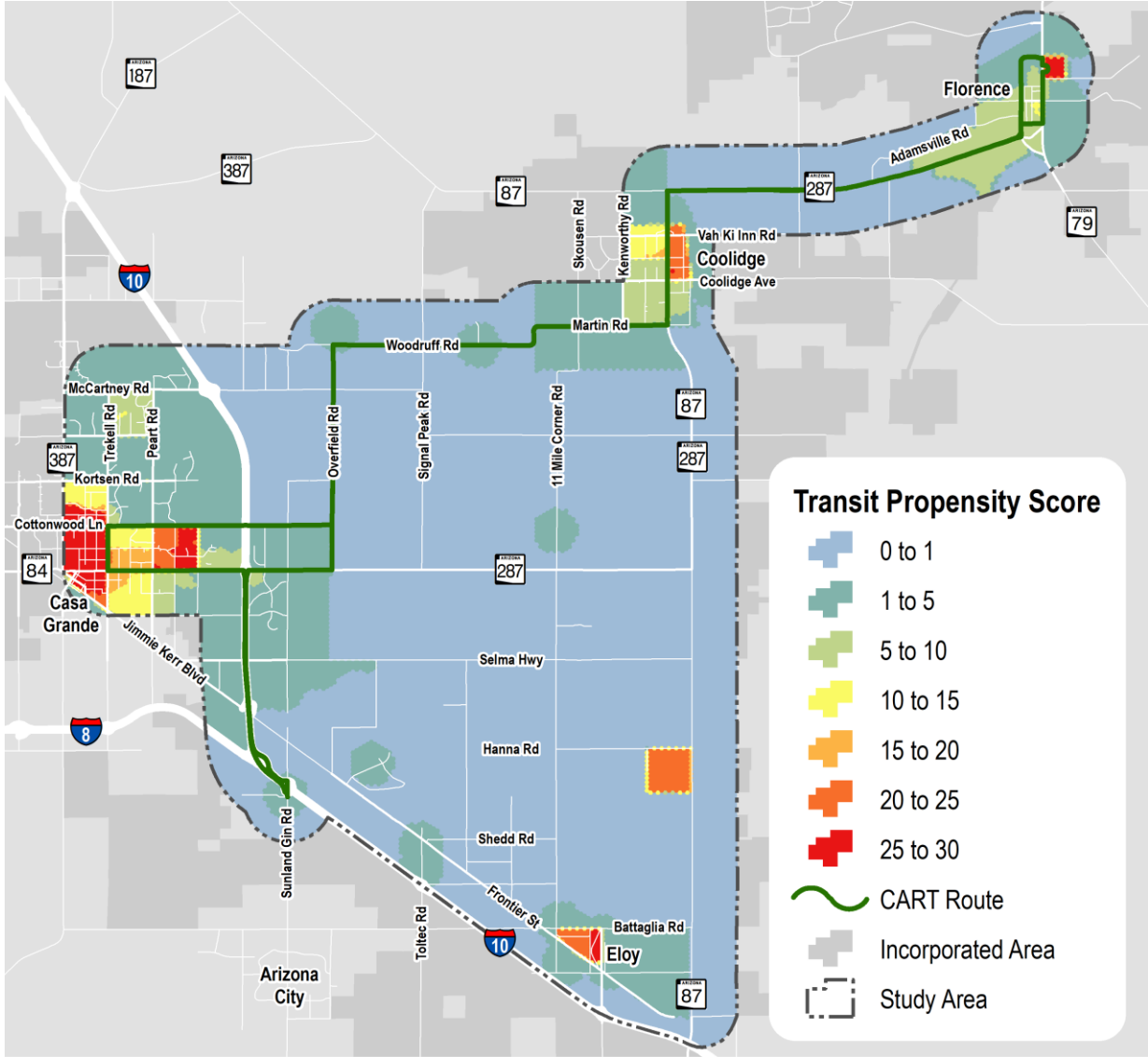


Satisfaction with CART service
(Poor, Fair, Good, Excellent)

Overall Satisfaction



Transit Propensity



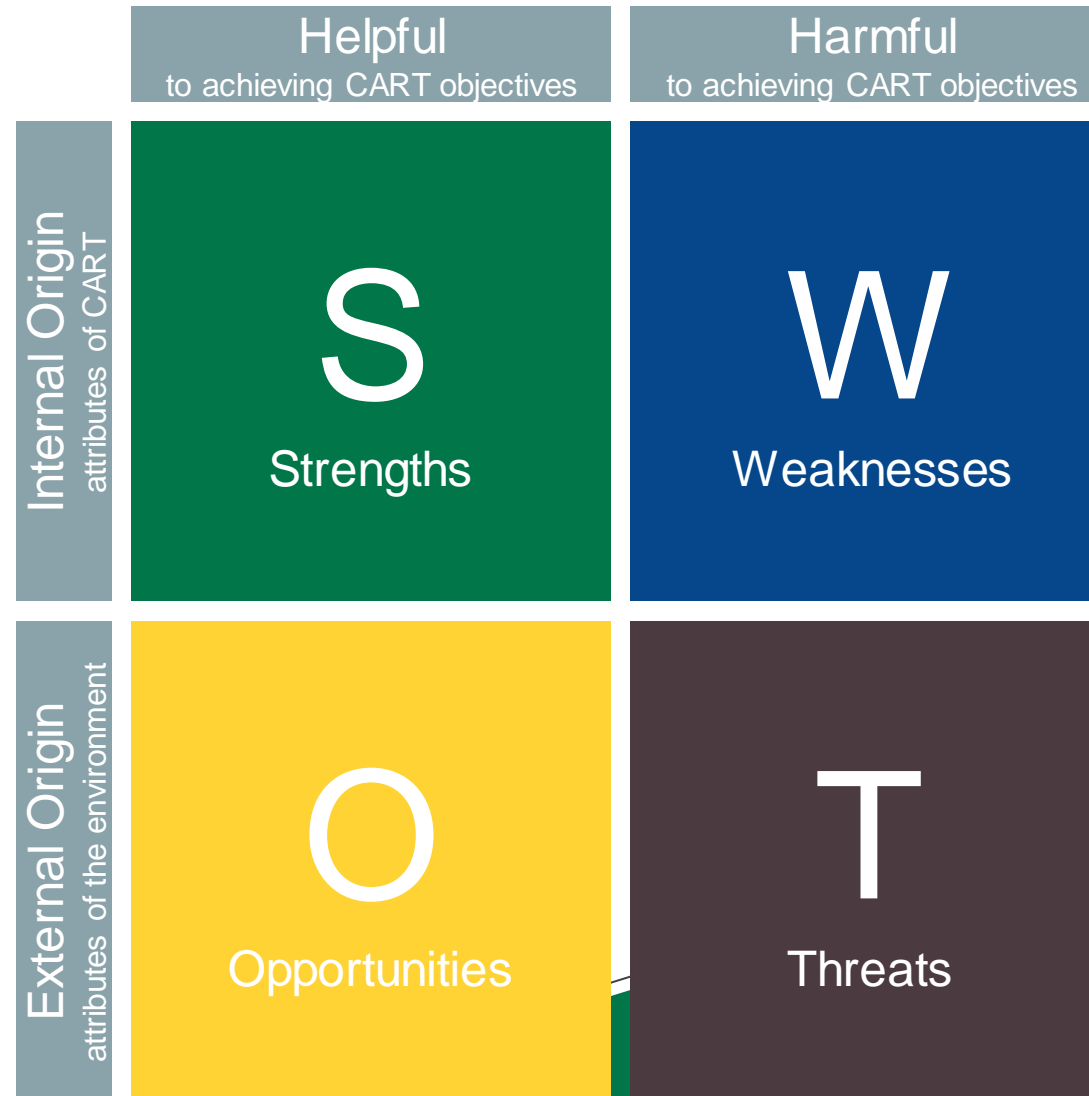
Key Takeaways

Review of Existing
Conditions

Alternatives
Analysis

Recommendations
Development

Implementation
Plan



Key Takeaways

Review of Existing
Conditions

Alternatives
Analysis

Recommendations
Development

Implementation
Plan

Strengths

- CART already serves many of the areas with high transit propensity.
- 70% of riders rate service frequency as good or excellent and 84% of riders rate reliability as good or excellent.

Weaknesses

- Two vehicles that are beyond their FTA-designated useful life.
- CART is underperforming the peer system average in the performance metrics.
- Eloy has a relatively high propensity for transit but is not served by CART.
- Biggest complaints about CART surrounded the limited hours of operation, long travel times, and limitation of destinations served.

Opportunities

- Additional service hours and weekend service would increase their likelihood of riding CART.
- 93% of survey respondents were aware of transit services.
- Over 50% of respondents had seen CART marketing materials in the past 90 days.

Threats

- CART's service area covers a large area with isolated population centers – large amount of revenue miles that have limited potential for transit ridership.
- Non-riders indicated that their primary reason for not riding CART was that they had a preference to drive their own personal vehicles.



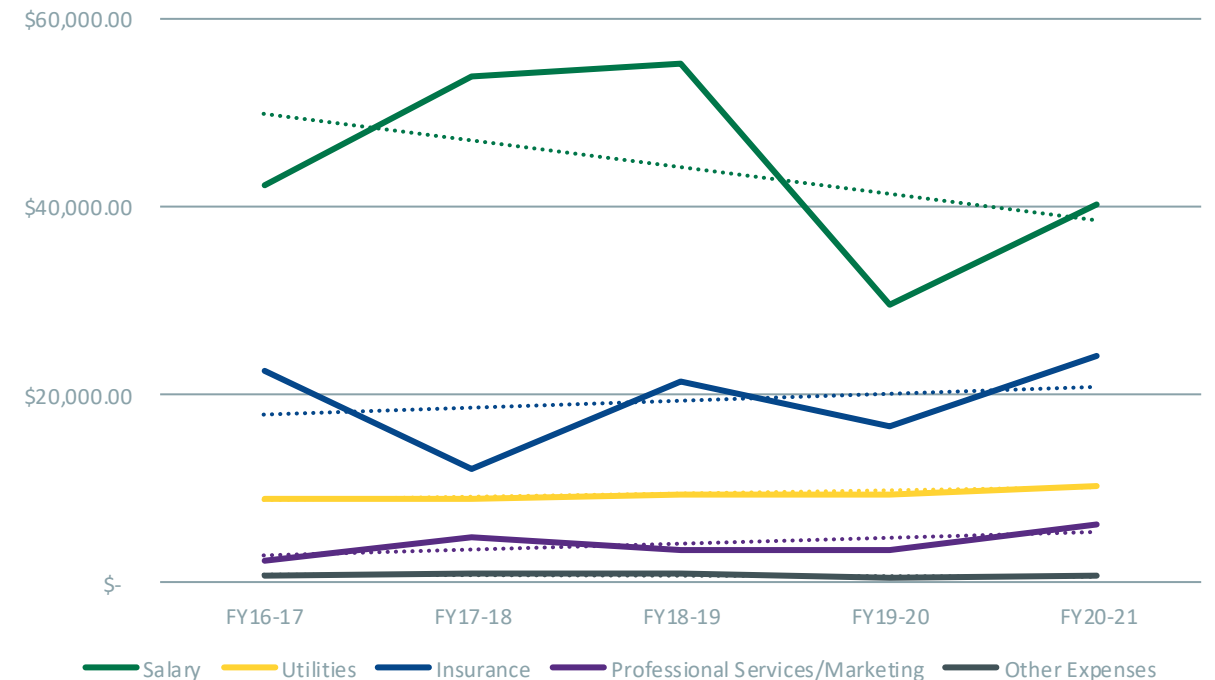
Administrative Review



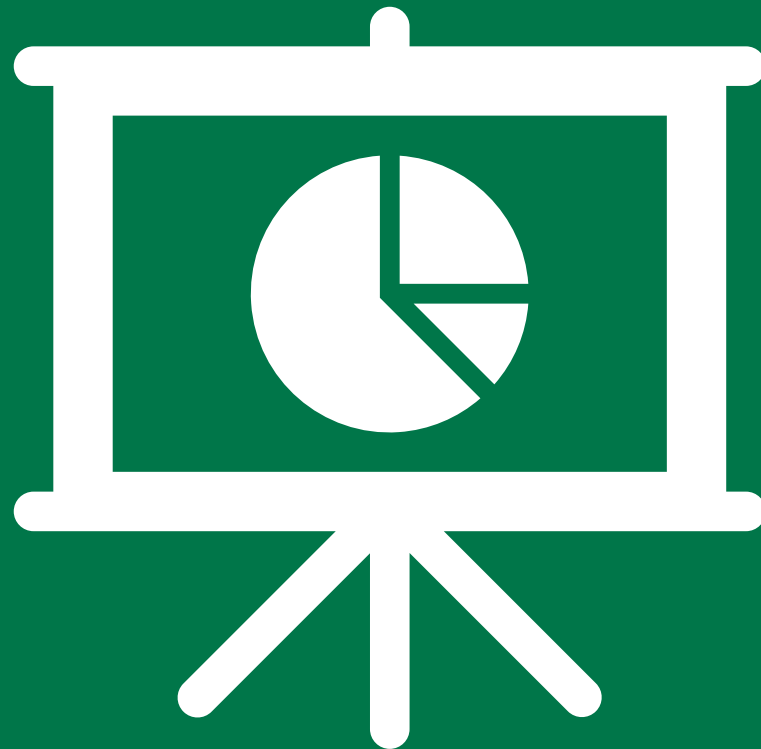
Administrative Review



- CART's administrative costs have only increased 5% from 2017 to 2021, only 58% of which are within the agency's control.
- CART has reduced costs in the highest expense category, reducing salary by 5%.



Alternatives Analysis



Alternatives Analysis

Review of Existing
Conditions

Alternatives
Analysis

Recommendations
Development

Implementation
Plan

Changing CART Route service times

Review existing run-by-run ridership to see which are underperforming.

Evaluation of Greyhound service

Cost-benefit of the Greyhound deviation and the impact of in-kind funds on service funding.

Addition of service to Walmart in Coolidge

Analysis of impacts of adding a stop at Walmart in Coolidge.

Explore opportunities for rerouting service in Casa Grande

Assessment of alternatives to the route in Casa Grande considering their future microtransit service:

- Reversal of the Cottonwood Ln/Florence Blvd
- Add a Downtown Casa Grande stop and realignment of eastbound route to Jimmie Kerr Blvd
- Reallocation of stops along Florence Blvd
- Elimination of service to Casa Grande – force transfers to microtransit service.



Alternatives Analysis



Alternative	Pros	Cons	Overall Impact
Change Service Times	<ul style="list-style-type: none"> Reduction in cost per rider Provides opportunity to improve service frequency at the most desirable times 	<ul style="list-style-type: none"> Overall usability may decrease Some riders may be negatively impacted if runs are removed 	Positive
Greyhound Accessibility	<ul style="list-style-type: none"> Reduces travel time for most riders May increase ridership 	<ul style="list-style-type: none"> Reduces funding, though operating service to Greyhound exceeds funding received 	Positive
Coolidge Walmart	<ul style="list-style-type: none"> Attracts ~2,600 annual trips Provides a second connection to Cotton Express 	<ul style="list-style-type: none"> Costs an additional \$3,100 annually Adds 11 minutes to CART's run time 	Positive
Casa Grande Option A: Reverse the Florence Blvd/Cottonwood Ln Loop	<ul style="list-style-type: none"> Small travel distance savings Safety benefits with reduction of left-turns 	<ul style="list-style-type: none"> None 	Neutral
Casa Grande Option B: Serve Downtown Casa Grande	<ul style="list-style-type: none"> Serves high transit propensity areas Reduces route by 1.2 miles 	<ul style="list-style-type: none"> Eliminates the County Complex stop, inconveniencing 1,000 riders annually 	Neutral
Casa Grande Option C: Modify Stops Along Florence Boulevard	<ul style="list-style-type: none"> Adds ridership opportunities Increases access to basic needs 	<ul style="list-style-type: none"> Adding stops in Casa Grande requires stops to be eliminated May duplicate Casa Grande's service in the future 	Neutral
Casa Grande Option D: Elimination of Casa Grande Service	<ul style="list-style-type: none"> Reduces operating costs Maintains flexible access to destinations in Casa Grande via the City's microtransit service 	<ul style="list-style-type: none"> Forces transfer between buses at the Promenade stop, inconveniencing a larger number of riders May reduce ridership 	Neutral

Near-Term Service Recommendations



Recommendations

Review of Existing
Conditions

Alternatives
Analysis

Recommendations
Development

Implementation
Plan

Route Times. The AM Commuter and Run 5 will be removed. The new Run 1 will begin at 5:30 AM at the County Complex in Casa Grande.

Elimination of Connection to Greyhound. Remove service to the Love's Travel Stop in Eloy (no longer a need for AM and PM Commuter designation).

Addition of Walmart stop in Coolidge. A stop at Walmart in Coolidge will be added to the eastbound and westbound routes.

Casa Grande Alterations. Rebalance stops in Casa Grande to serve activity centers.

- Removal of Promenade Mall and Trekell Rd/Florence Blvd stops
- Addition of Fry's Plaza
- Addition of Downtown Casa Grande stop near Peart Park



Implementation



12 minutes per run



7 miles per run



Over \$71,000 saved annually

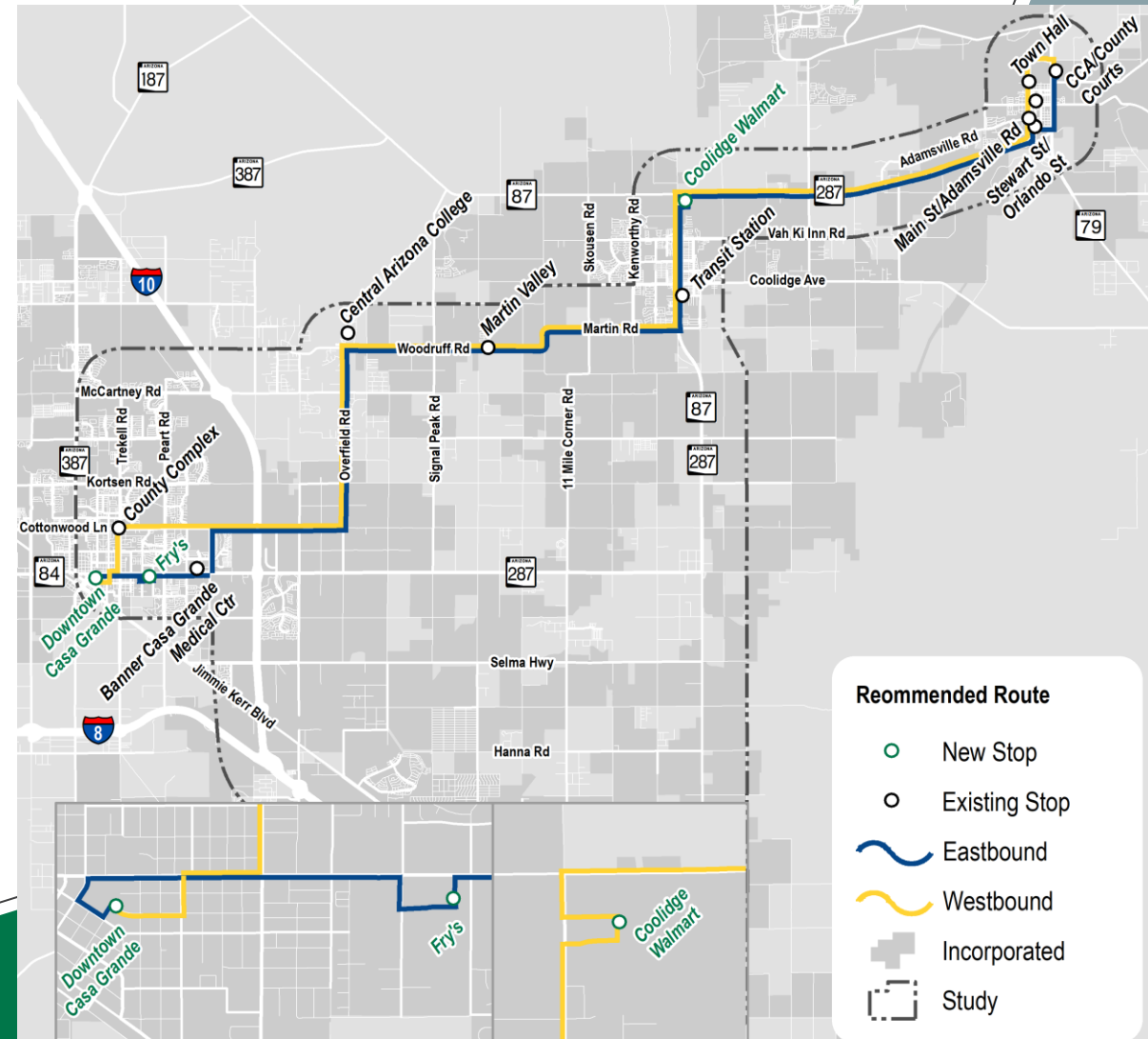


Review of Existing
Conditions

Alternatives
Analysis

Recommendations
Development

Implementation
Plan



Implementation

Review of Existing
Conditions

Alternatives
Analysis

Recommendations
Development

Implementation
Plan

Westbound Route

Town Hall - Florence	-	6:57 AM	9:31 AM	12:05 PM	2:39 PM	5:13 PM
County Complex - Florence	-	7:00 AM	9:34 AM	12:08 PM	2:42 PM	5:16 PM
Main Street/Adamsville Road	-	7:02 AM	9:36 AM	12:10 PM	2:44 PM	5:18 PM
Coolidge Walmart	-	7:16 AM	9:50 AM	12:24 PM	2:58 PM	5:32 PM
Transit Station - Coolidge	5:00 AM	7:29 AM	10:03 AM	12:37 PM	3:11 PM	5:45 PM
Martin Valley	-	7:37 AM	10:11 AM	12:45 PM	3:19 PM	5:53 PM
Central Arizona College	-	7:46 AM	10:20 AM	12:54 PM	3:28 PM	6:02 PM
County Complex - Casa Grande	5:30 AM	8:04 AM	10:38 AM	1:12 PM	3:46 PM	6:20 PM

Eastbound Route

Fry's Plaza	5:43 AM	8:17 AM	10:51 AM	1:25 PM	3:59 PM	6:33 PM
Banner Casa Grande Medical Center	5:47 AM	8:21 AM	10:55 AM	1:29 PM	4:03 PM	6:37 PM
Central Arizona College	6:02 AM	8:36 AM	11:10 AM	1:44 PM	4:18 PM	6:52 PM
Martin Valley	6:08 AM	8:42 AM	11:16 AM	1:50 PM	4:24 PM	6:58 PM
Transit Station - Coolidge	6:27 AM	9:01 AM	11:35 AM	2:09 PM	4:43 PM	7:08 PM
Coolidge Walmart	6:36 AM	9:10 AM	11:44 AM	2:18 PM	4:52 PM	-
Stewart Street/Orlando Street	6:48 AM	9:22 AM	11:56 AM	2:30 PM	5:04 PM	-
Pinal County Courts - Florence	6:54 AM	9:28 AM	12:02 PM	2:36 PM	5:10 PM	-

Note: The CART bus will leave the Coolidge Transit Station at 5:00 AM for service to begin at the Pinal County Complex - Casa Grande at 5:30 AM



Implementation

Review of Existing
Conditions

Alternatives
Analysis

Recommendations
Development

Implementation
Plan

- Materials to facilitate the change in service:



Updated Rider Guide with new route map and schedule



On-board notice of service changes



Service change social media content



Pinal County and CAC-specific service change fact sheets



Bus stop signage design



Long-Term Vision



Long-Term Vision

Long-term recommendations for the service include:

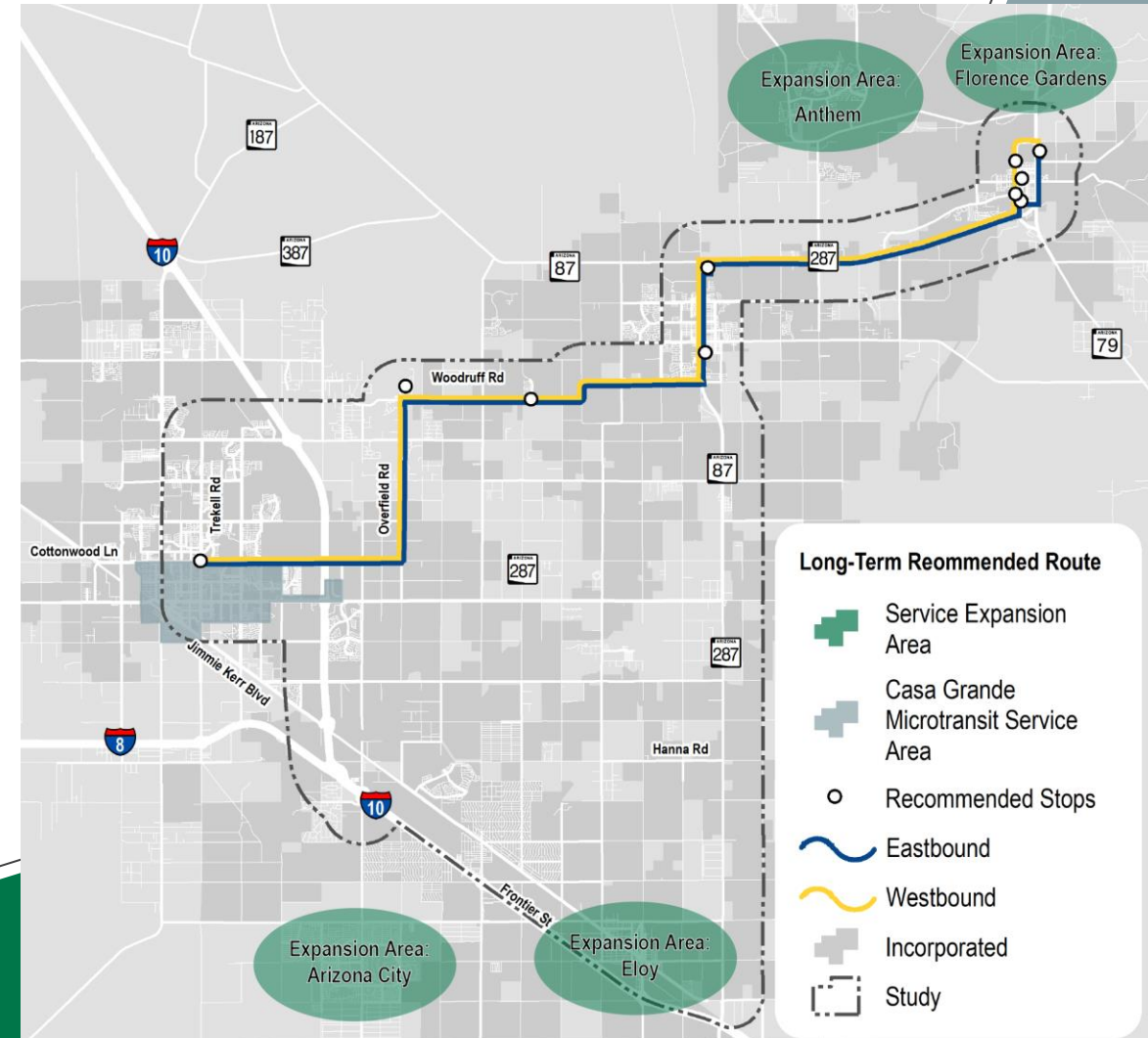
- Elimination of service to Casa Grande
- Additional expansion areas
 - Florence Gardens
 - Eloy
 - Arizona City
 - Anthem at Merrill Ranch

Review of Existing
Conditions

Alternatives
Analysis

Recommendations
Development

Implementation
Plan



Questions



Thank you!

