

Harrisburg Station Location Study



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NCDOT Rail Division

Who We Are

- Six state-supported passenger trains
 - Carolinian: Charlotte - Raleigh - New York City
 - Daily service, one NB and one SB
 - Amtrak-owned equipment; Amtrak crews
 - Piedmont: Raleigh – Charlotte
 - Daily service, two NB and two SB
 - NCDOT-owned equipment; Amtrak crews
 - Third roundtrip planned for May 2017



NCDOT Rail Division

Who We Are





NCDOT Rail Division

Who We Are

- 16 passenger train stations serving 8 Amtrak/NCDOT daily trains
- 12 stations associated with NCDOT-funded trains
- 7 stations staffed with Amtrak personnel; 5 stations staff with NCDOT personnel
- 9 historic stations; 3 new construction stations
- 3 owned by RRs; 7 municipally owned; 2 privately owned



NCDOT Rail Division

Who We Are

- Station development/ownership models
 - Local government acquires existing station from RR
 - Local government acquires property for new station
 - Local government and NCDOT design and construct
 - Funding sources: Federal/State/Local
 - 80/10/10 or 80/20 cost sharing
 - ARRA, TIGER, CMAQ, PRIIA, Enhancement

New Construction Station Examples

Cary Depot

Kannapolis Station



Cary Depot

- Town of Cary purchased property in 1995 for a downtown station
- Phase I building completed in 1996 for \$830,000 as a shared use facility (DMV office, local transit, rail)
- 2006, second boarding platform added for \$300,000
- DMV relocates in 2008
- February 2010, received \$2.2 million in American Recovery and Reinvestment Act funding
- September 2011, ARRA expansion project completed (parking, waiting room, ticketing, and baggage)

Cary Depot

- By 2013, two years after reopening, ridership increases from 45,000 to 89,000
- Revenue jumps 136% to \$4.2 million
- By 2014, fourth highest station ridership in state (out of 16)
- December 2014, OneRail Coalition selects Cary Depot as one of six stations in the country as having demonstrated a high Return on Investment

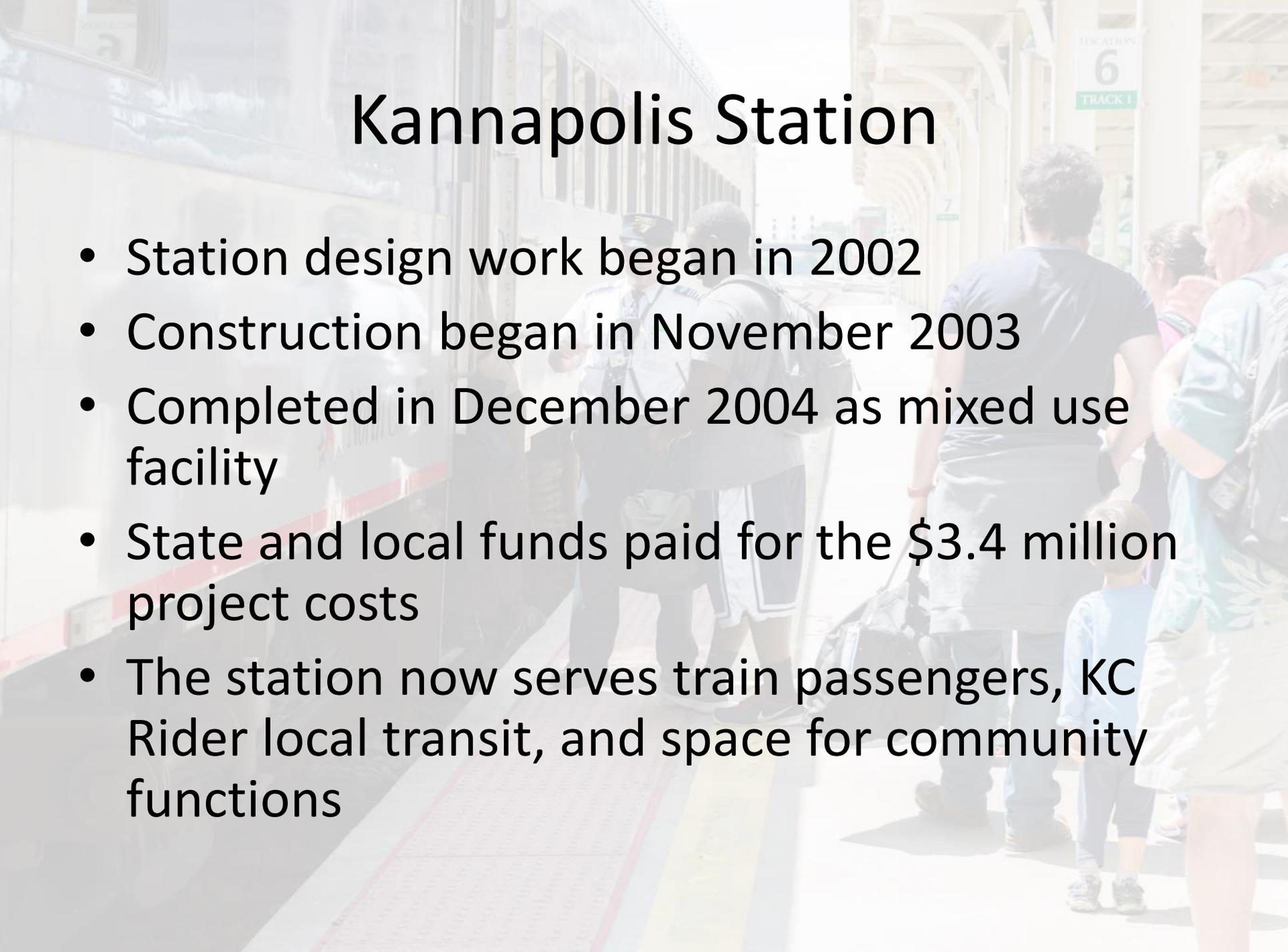
Cary Depot



Cary Depot



Kannapolis Station

The background image shows a train platform at Kannapolis Station. A train is stopped at the platform, and several passengers are waiting. A sign in the background indicates "LOCATION 6 TRACK 1". The scene is brightly lit, suggesting a sunny day.

- Station design work began in 2002
- Construction began in November 2003
- Completed in December 2004 as mixed use facility
- State and local funds paid for the \$3.4 million project costs
- The station now serves train passengers, KC Rider local transit, and space for community functions

Kannapolis Station



Harrisburg Station Location Study

Harrisburg, NC Rail Station Site Feasibility Assessment: Preliminary Analysis and Recommendations

November 14, 2014



FINAL

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Study Purpose & Goal

- 1) Assess the demand for an intercity passenger rail station in Harrisburg
- 2) Identify and evaluate feasible locations for a station
- 3) Share findings with the Town of Harrisburg



Study Description

Contracted with Parsons Brinckerhoff to...

- Interview and coordinate with stakeholders
- Model ridership
- Estimate costs and revenues
- Consider and evaluate potential sites



Project Timeline

- 1) Conducted research in spring and early summer 2014
- 2) Received input from the Town and stakeholders through summer
- 3) Finalized and submitted the report to Harrisburg on November 14th, 2014



Stakeholders

- Town of Harrisburg
- NCDOT Rail Division
- North Carolina Railroad Company
- Norfolk Southern
- Charlotte Area Transit System
- University of North Carolina - Charlotte



Site Considerations

- Rail infrastructure and operations
- Roadway access
- Environmental issues
- Land ownership and use
- Visibility
- Multimodal connectivity

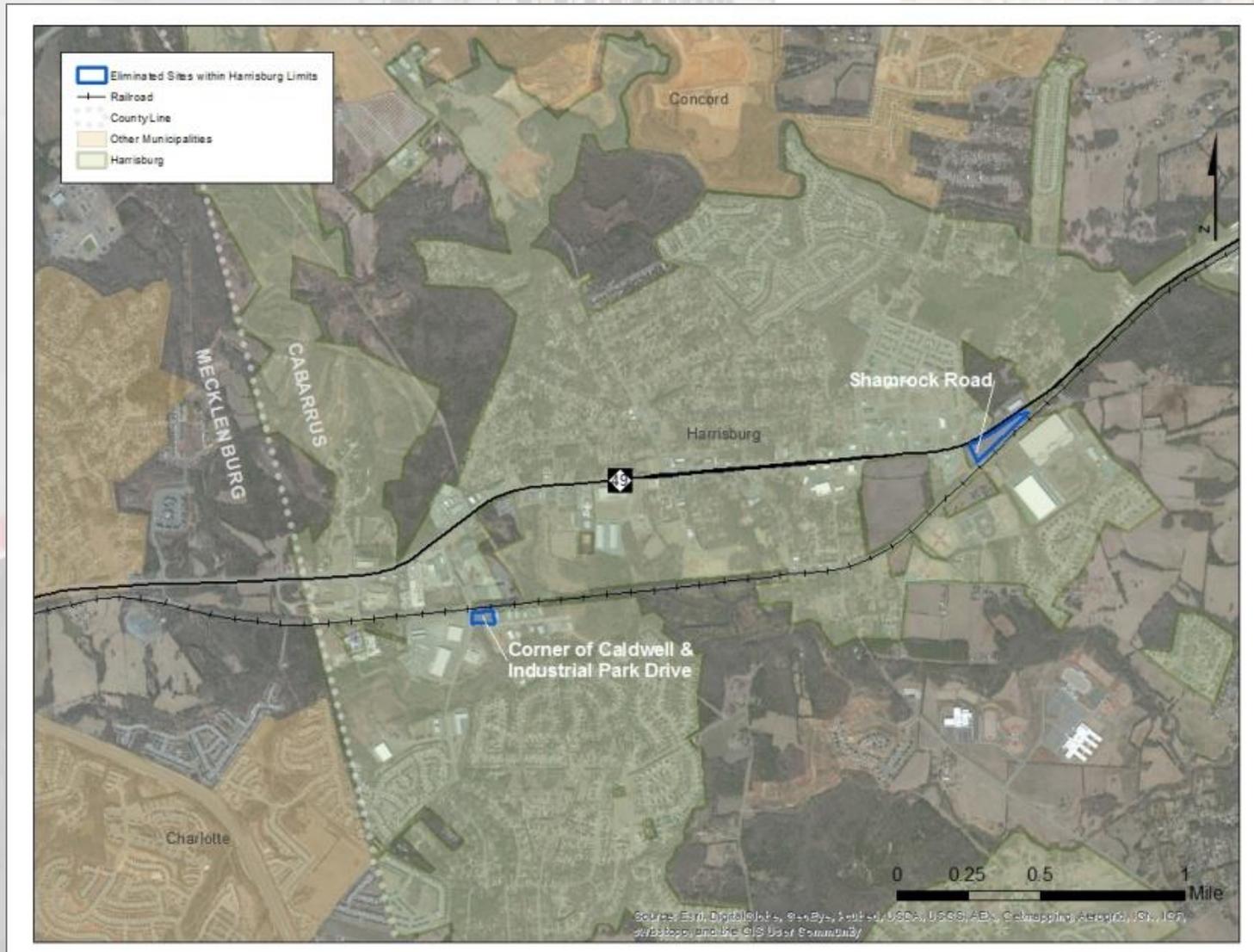


Site Evaluations

- Eight station sites considered
 - Two locations eliminated early on
 - Three locations within town limits shortlisted
 - Three locations outside of town limits shortlisted



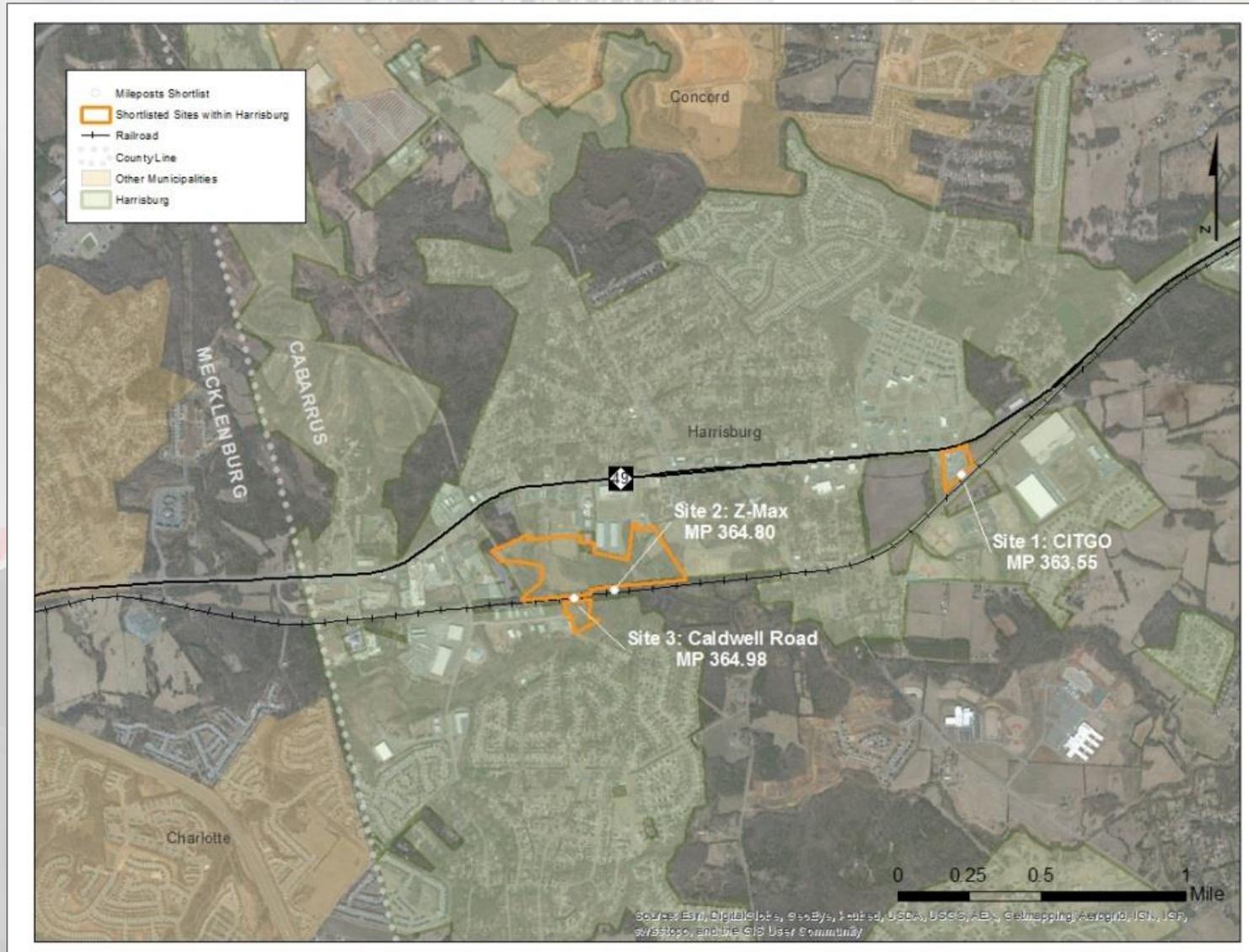
Eliminated Sites



Eliminated Sites

SITE CONSIDERED	REASON(S) FOR CONSIDERATION	REASON(S) FOR ELIMINATION
Shamrock Road Parcel (immediately east of CITGO parcel)	<ul style="list-style-type: none">• Good accessibility to NC 49• High visibility• Close to Town Center	An upcoming project will put a new roadway through this site, making it impossible to accommodate the required facilities.
Corner of Caldwell and Harrisburg Industrial Park Drive	<ul style="list-style-type: none">• NCRR-owned• Ease of access from Caldwell Road	Upcoming grade-separation of Caldwell Rd. crossing will make it difficult for the site to accommodate the required facilities.

Shortlisted Sites within Town Limits



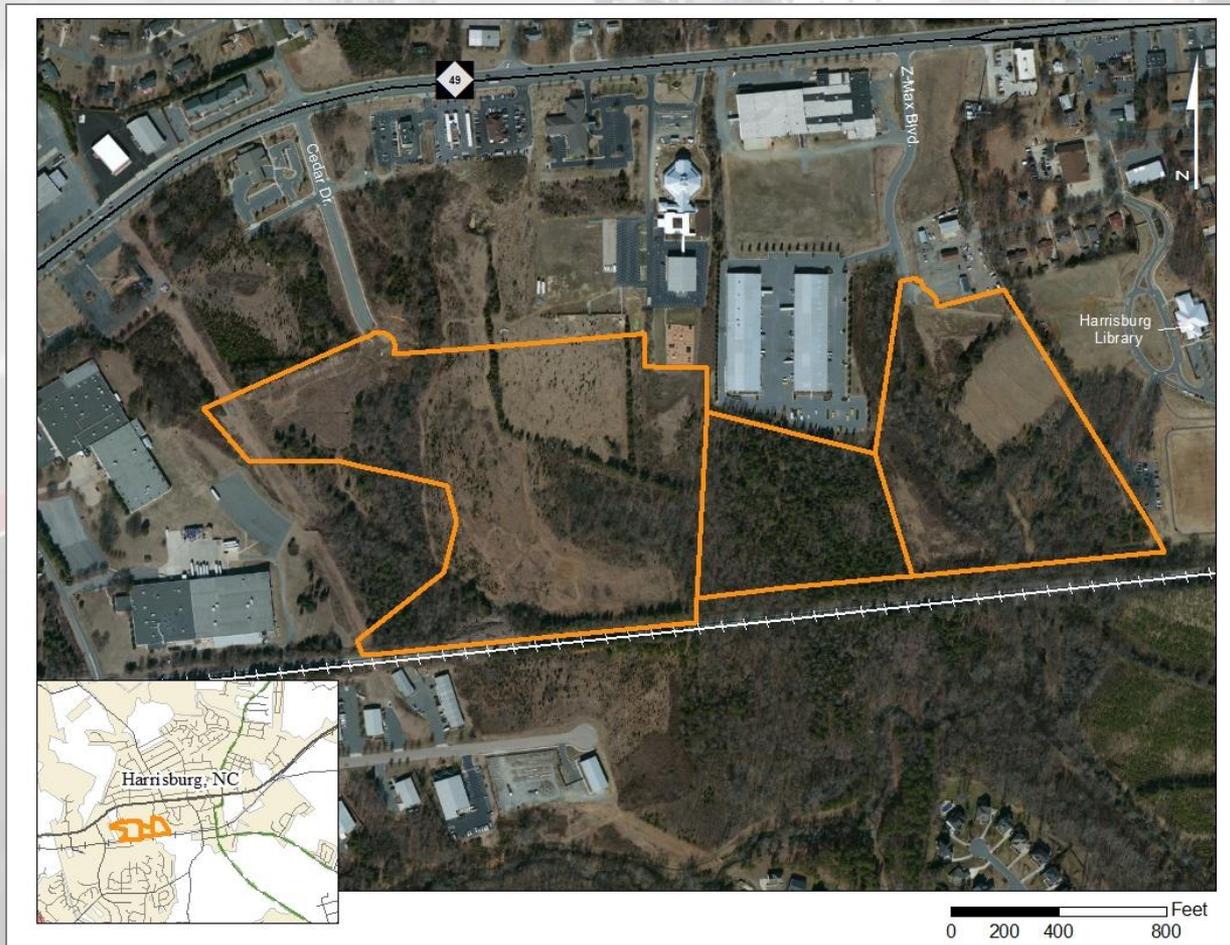
Site 1: Citgo



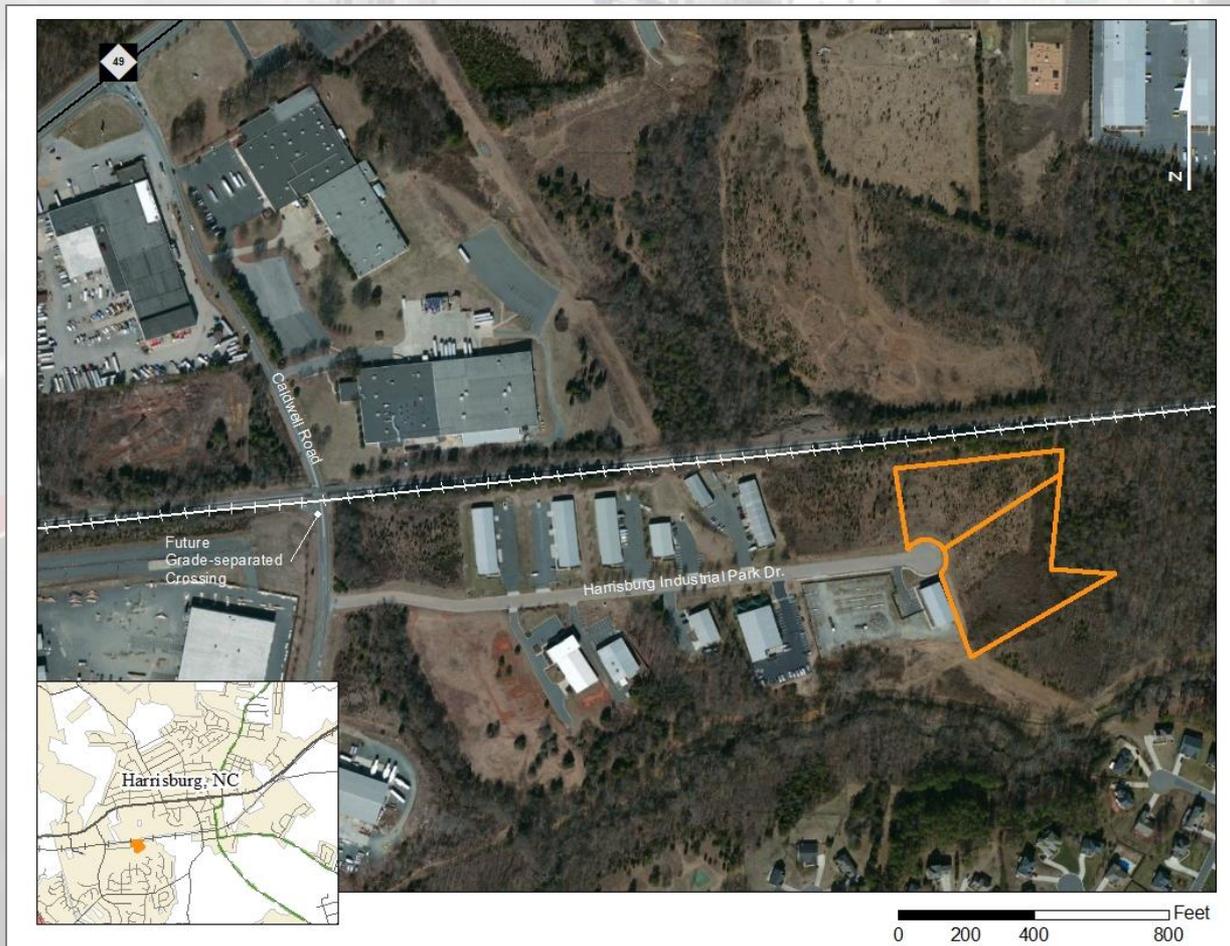
LOCATION
6
TRACK 1



Site 2: Z-Max



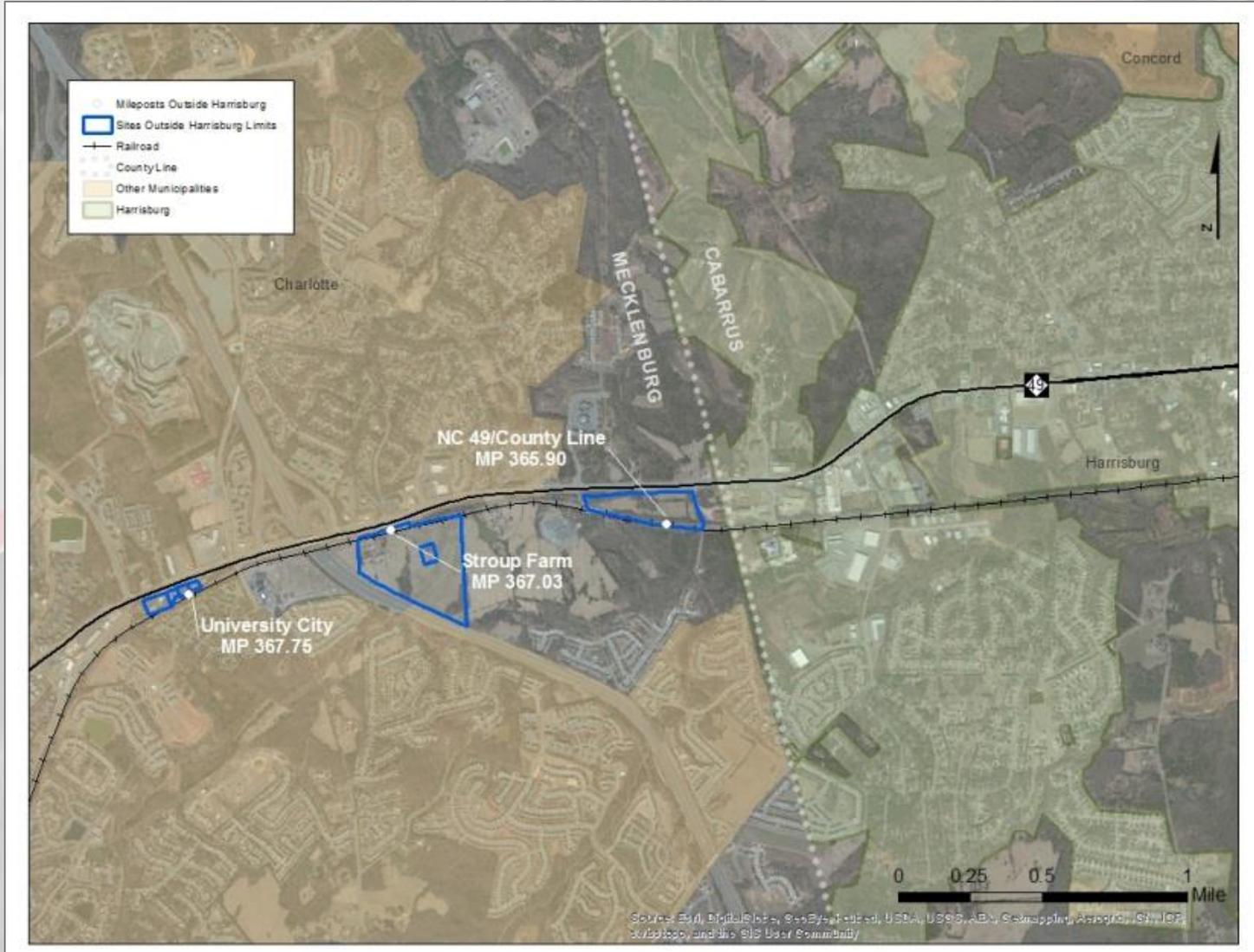
Site 3: Caldwell Road



Shortlist Evaluation within Town Limits

CRITERIA	SITE 1: CITGO	SITE 2: Z-MAX	SITE 3: CALDWELL
RAILROAD ENGINEERING AND OPERATIONS			
Sufficient tangent track with space for platforms	4	4	4
Allows for additional tracks	4	4	2
Free of shipper conflicts	2	4	3
Compatible with improvement plans	3	4	2
Sufficient size for buildings and parking and/or expansion	3	4	2
ENVIRONMENT			
Topography	4	4	3
Known/potential environmental issues	1	4	3
SURROUNDING LAND USE			
Visibility	4	2	1
Accessibility	4	3	2
Connectivity (transit, bike, pedestrian)	3	2	1
Complimentary uses	4	2	1
Proximity to CBD	4	2	1
Potential for TOD	1	4	2
TOTAL	41	43	27

Shortlisted Sites outside Town Limits



University City/UNC-Charlotte Site



Stroup Farm Site



NC 49/County Line Site



Shortlisted Evaluation outside of Town Limits

CRITERIA	UNIVERSITY CITY/UNC-CHARLOTTE	STROUP FARM	NC 49/ COUNTY LINE
RAILROAD ENGINEERING AND OPERATIONS			
Sufficient tangent track with space for platforms	2	4	2
Allows for additional tracks	2	4	3
Free of shipper conflicts	4	4	3
Compatible with improvement plans	2	4	2
Sufficient size for buildings and parking and/or expansion	2	4	4
ENVIRONMENT			
Topography	4	4	4
Known/potential environmental issues	4	4	4
SURROUNDING LAND USE			
Visibility	4	4	4
Accessibility	4	1	4
Connectivity (transit, bike, pedestrian)	4	2	2
Complimentary uses	4	2	2
Proximity to CBD	1	2	2
Potential for TOD	1	4	2
TOTAL	38	43	38

Site Recommendations

- Within town limits
 - Site 2: Z-Max scores the highest
- Outside of town limits
 - Stroup Farm Site scores the highest



Ridership Estimate

- Ridership modeling analysis
 - Method 1: Statewide Transportation Model
 - Method 2: Prediction based on travel market information
- 20 to 30 riders per day



Revenue and Operations Cost Estimate

	Piedmont	Piedmont & Carolinian
Annual Riders	7,300	10,950
Total Revenue	\$124,100	295,650
Total Expense	\$101,459	133,196
Net Revenue	<u>\$22,641</u>	<u>\$163,453</u>



Report Conclusions



- Station Site Recommendations
 - Site 2: Z-Max scored the highest within town limits
 - Stroup Farm site scored the highest outside of town limits
- Ridership Forecast
 - 20 to 30 riders per day
- Net Revenue Increase
 - Piedmont: \$22,600
 - Piedmont & Carolinian: \$163,500

Next Steps

- 1) Town selects station location
- 2) NCDOT models station location with Norfolk Southern and NCRR (6-8 months)
- 3) Railroads approve site selection (4-6 months)
- 4) Approved site entered into STI process (1 year)
- 5) Town secures station property as local match
- 6) Town and NCDOT secure funding (\$6M+/-)
- 7) Design station (1 year)
- 8) Construction (1 year)

Questions & Comments

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