

# North College Improvements Project: Phase II

## Vine Drive to the Hickory /Conifer Intersection

### Conceptual Design Report

September 1, 2009



Prepared By:



# NORTH COLLEGE IMPROVEMENTS PROJECT: PHASE II


## Vine Drive to the Hickory/Conifer Intersection

### Conceptual Design Report

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## Executive Summary

North College Avenue, also US Highway 287 and Colorado State Highway 14 (north of Jefferson Street), is a major north-south route through the City of Fort Collins which provides the northern entryway into the City. The arterial provides both local and regional connectivity and carries a large volume of interstate truck traffic. Over time, citizens have expressed concern about the corridor's physical condition, as well as, associated challenges to economic prosperity. Through previous planning efforts, the City identified needs to create a gateway into the City, to improve mobility for the traveling public, including bicyclists and pedestrians, and to establish a strong connection to downtown along the Poudre River.

In 2005, Fort Collins voters approved the Building on Basics (BOB) 1/4 cent sales tax to fund capital projects, including improvements on the North College Avenue between Vine Drive and Conifer Street. In addition, the City has secured State and Federal funding for construction of improvements between Vine Drive and the Conifer/ Hickory intersections. Project costs are anticipated to exceed appropriated funds. The purpose of this Conceptual Design effort was to establish a roadmap for constructing improvements to North College Avenue between Vine Drive and the Conifer/Hickory intersections. As part of this effort, the project team developed a strategy for funding the proposed improvements, identified potential funding sources for project elements, and developed a plan for executing a 2011 construction project, using appropriated funds.

## Project Goals

Previous planning efforts combined with input from project stakeholders including the Technical Advisory Committee (TAC), City Staff, Colorado Department of Transportation, North Fort Collins Business Association (NFCBA) and the general public were used to establish the following project goals:

- Begin construction of proposed improvements between Vine Drive and Conifer Street in 2011
- Create a safe and effective travel corridor for all users including large trucks, passenger vehicles, bicycles, pedestrians, and transit users
- Support the economic viability of the project area
- Upgrade the image of the North College Corridor
- Maintain compatibility with existing and proposed utilities, including stormwater, water, sewer, electric
- Provide a phased implementation plan
- Maintain compatibility with the intent of previous local planning efforts

In addition, several required project elements were identified. These elements, listed below, are necessary for permitting, preserving funding eligibility, receiving construction clearances, and ultimately for constructing the proposed improvements.

- Meet BOB ballot language
- Meet Floodplain Administration's requirements within Poudre River Floodway
- Meet State Water Quality requirements
- Follow Federal, State, and Local right-of-way acquisition process

Criteria for measuring the effectiveness of solutions were established prior to concept development. The measures of effectiveness were used subsequently to evaluate and compare potential solutions.

## Project Coordination and Public Involvement

The City of Fort Collins initiated the North College project with strong support from the NFCBA and the community at large. Based on the State Highway designation and the Federal-Aid status of the project, CDOT provided project oversight. A Technical Advisory Committee (TAC) was established to engage agencies, city departments, and stakeholders in developing the Conceptual Design and prioritizing project elements for implementation. The TAC consisted of representatives from City Departments, CDOT, the NFCBA, and the consultant team.

The public, including corridor property owners, tenants, potential developers, advocacy groups, City Council, City boards and commissions, business associations and the general public, were engaged in the project using multiple techniques. The following groups actively participated:

- City Council
- Transportation Board
- Planning and Zoning Board
- Bicycle Advisory Committee
- Commission on Disabilities
- North Fort Collins Business Association (NFCBA)
- Urban Renewal Authority Citizen Advisory Group (URA CAG)



The following events and techniques engaged the public in the project:

- 3 Public Open Houses held on April 8, 2009, May 21, 2009 and July 8, 2009. Community Workshop held on May 6, 2009.
- ROW meeting held on June 23, 2009.
- Property Owner One-on-One Meetings held on July 16, 17, and 21, 2009.
- Transportation Board Meetings – May 20, 2009 and July 15, 2009
- City Council Work Sessions – June 9, 2009, and July 28, 2009

- Planning & Zoning Board – June 12, 2009 and July 16, 2009
- Bicycle Advisory Committee – June 8, 2009 and July 13, 2009
- Commission on Disabilities – June 11, 2009 and July 9, 2009
- NFCBA – regular monthly meetings
- Project website, [www.fcgov.com/northcollege](http://www.fcgov.com/northcollege).

On average, 70 people attended the Public Open Houses. Attendees provided valuable input and helped shape the overall Conceptual Design. The public responded positively to the Conceptual Design and phasing approach. City Staff will seek City Council approval of the Conceptual Design and phased implementation plan at the regularly scheduled City Council meeting on September 1, 2009.

### Existing Conditions

The project area encompasses approximately 1/2 mile of North College Avenue between Vine Drive and Hickory Street. The roadway is a four-lane, urban highway with a two-way left turn lane throughout most of the corridor. The highway is generally shouldered with open, uncontrolled access, and limited storm drainage facilities. Corridor users include automobiles, heavy truck traffic, bicyclists, and pedestrians. Designated facilities for bicyclists and pedestrians are not continuously available. In general, land use along the project corridor is commercial and light industrial. Partial right-of-way acquisition of multiple properties is anticipated as part of the project due to additional width need for proposed improvements. A portion of the project lies within the Poudre River floodway. Construction of improvements in the floodway is limited for public safety reasons.

### Conceptual Design Development

The Conceptual Design for the project was developed using data, technical analyses, industry design standards, and input from the City, CDOT, TAC, NFCBA, and the general public. The project team developed three primary concepts: Standard Arterial Option, Intermediate Option, and the Minimum TAC Option. The options varied in median width, types and widths of bicycle/pedestrian facilities, landscaping areas, and ROW impacts. The Intermediate Option, with minor modifications, is recommended as the Conceptual Design alternative. Refer to Section 3 for details on the design options considered and evaluation process.

The Conceptual Design is illustrated in cross-section in Figure ES-1 and includes the following:

- 12' through lane width (exclusive of the curb and gutter)
- 11' auxiliary lane width (exclusive of the curb and gutter)
- 15' raised, landscaped median – 4' median with 11' left turn lane
- 8' detached shared use path
- 7.5' irrigated landscape buffer (inclusive of 0.5' curb head)
- 8' on-street bike lane (inclusive of 2' gutter)
- 110' ROW width
- Potential 15' utility easement
- A combination of Outdoors/Natural theme with addition of Artistic elements
- Native, drought resistant plantings including street trees, shrubs, and ground coverings
- Pedestrian lighting, enhanced intersection crossings, transit stop amenities, street furnishings
- Gateway Entry between Poudre River and Lake Canal compatible with floodway requirements
- Traditional storm sewer system with water quality ponds
- Pedestrian bridge crossings at Lake Canal
- Utility accommodation within the proposed ROW, wherever possible
- Side-by-Side Left-Turn Option at Conifer/Hickory intersection
- Long-term realignment option Conifer/Hickory intersection

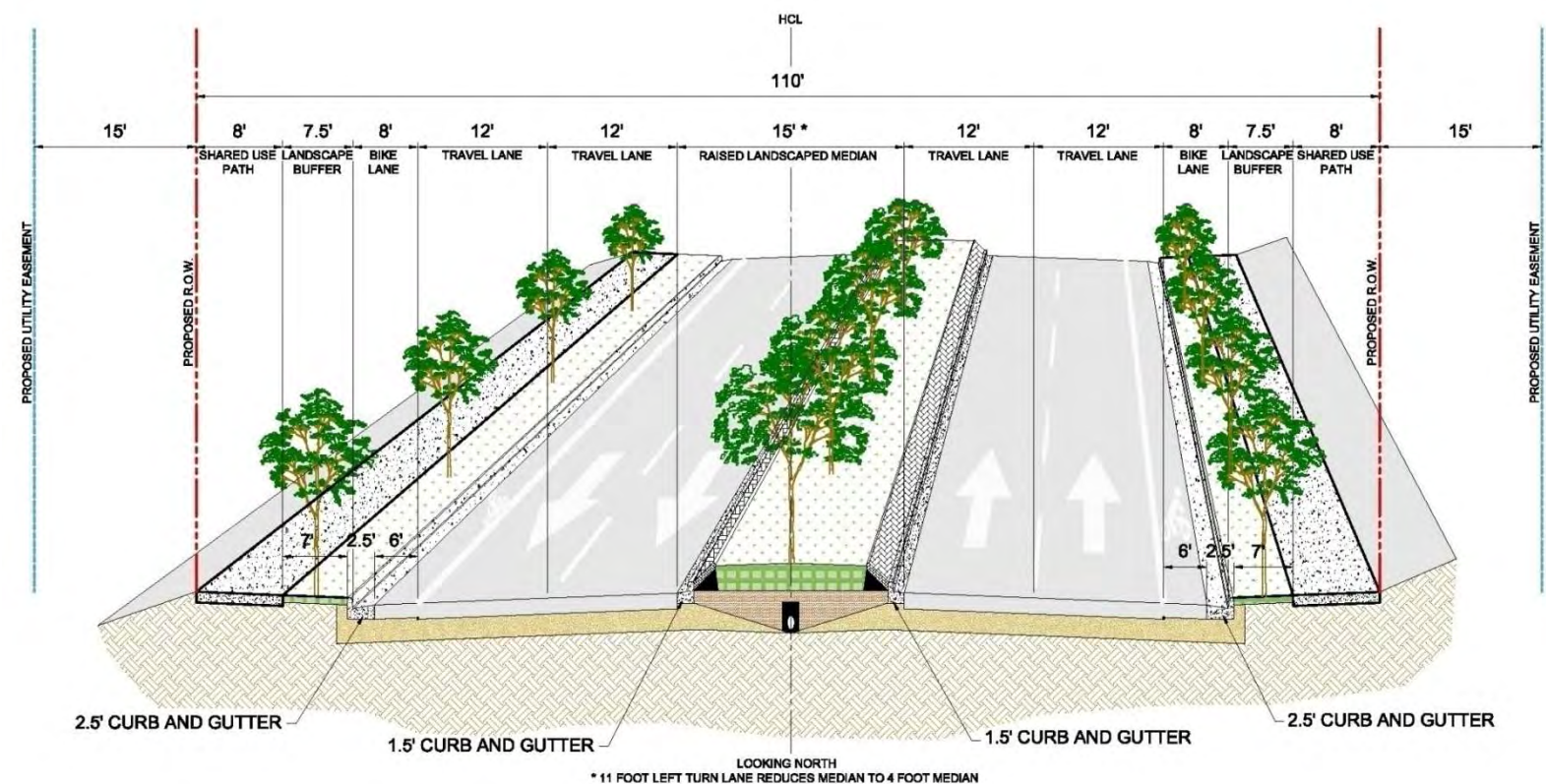


Figure ES-1: Conceptual Design Section



The Conceptual Design defines baseline conditions and establishes a foundation for project improvements. Continuing design efforts will consider unique circumstances and will adapt the project elements to fit specific conditions by selecting distinct urban design treatments customized for each location circumstance or condition. Interim conditions will be required based on existing property and business uses, timing of off-highway improvements, and funding limitations; however, the Conceptual Design provides a comprehensive plan to implement as conditions allow and funding becomes available over time.

### Phasing and Implementation

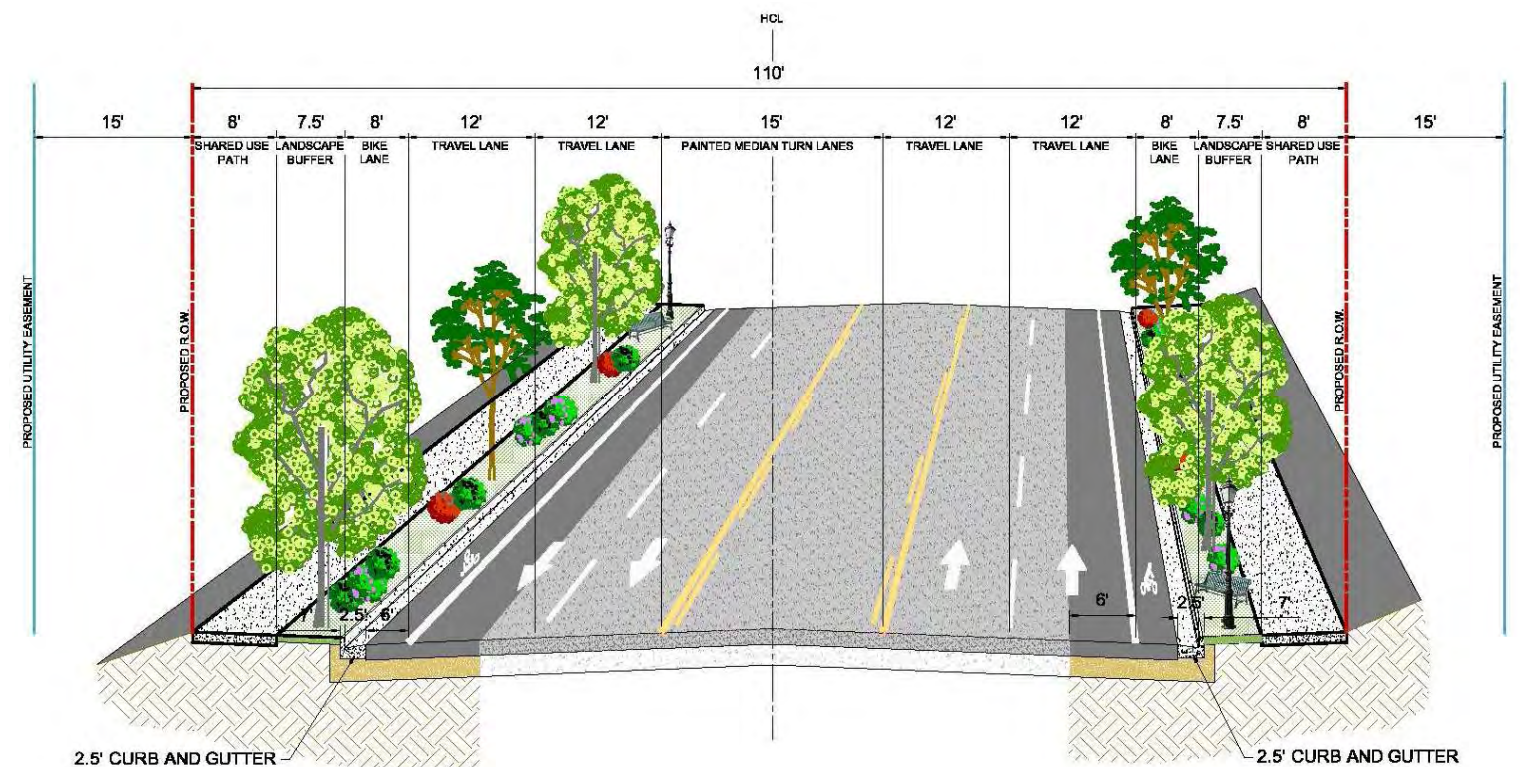
The total anticipated Conceptual Design cost of \$13.25 Million exceeds available funding of \$6.2 Million. Three phasing concepts were developed to provide some level of improvement within the corridor in the short-term, using funds currently available, while planning for implementation of the full improvements as additional funds are obtained:

- Option 1 – Improvements from South to North
- Option 2 – Reduced Improvements on Outside Edges
- Option 3 – Improvements by Side (west side only)

Phasing concept development considered funding source requirements, logical construction elements, project element priorities, and input from City Staff, City Council, City Boards and Commissions, CDOT, NFCBA, property owners, and the public. Refer to Section 6 for descriptions of each phasing option. The TAC eliminated Option 3 due to limited visible improvements and multiple disruptions to area businesses. After weighing advantages and disadvantages of Option 1 and Option 2, along with public comment, the TAC recommends Phasing Option 1 for the following reasons:

- Minimizes number of disruptions to businesses
- Establishes a gateway to the North College area
- Includes all elements of the BOB ballot language
- Provides complete, visible improvements, demonstrating benefit of extending construction north to the project limit and potentially beyond
- May help stimulate redevelopment interest in the area, which could help pay for future improvements
- Identifying funding sources for landscape/streetscape amenities separately may be challenging
- Supported by the public, City Council, Transportation Board, Planning & Zoning Board, NFCBA, and property owners in the North College area.

Figure ES-2 illustrates Phasing Option 1 improvements in cross-section. Figure ES-3 on the following page depicts Phasing Option 1 for the entire project graphically and provides associated costs.



**Figure ES-2: Phasing Option 1 Section – Improvements from South to North**

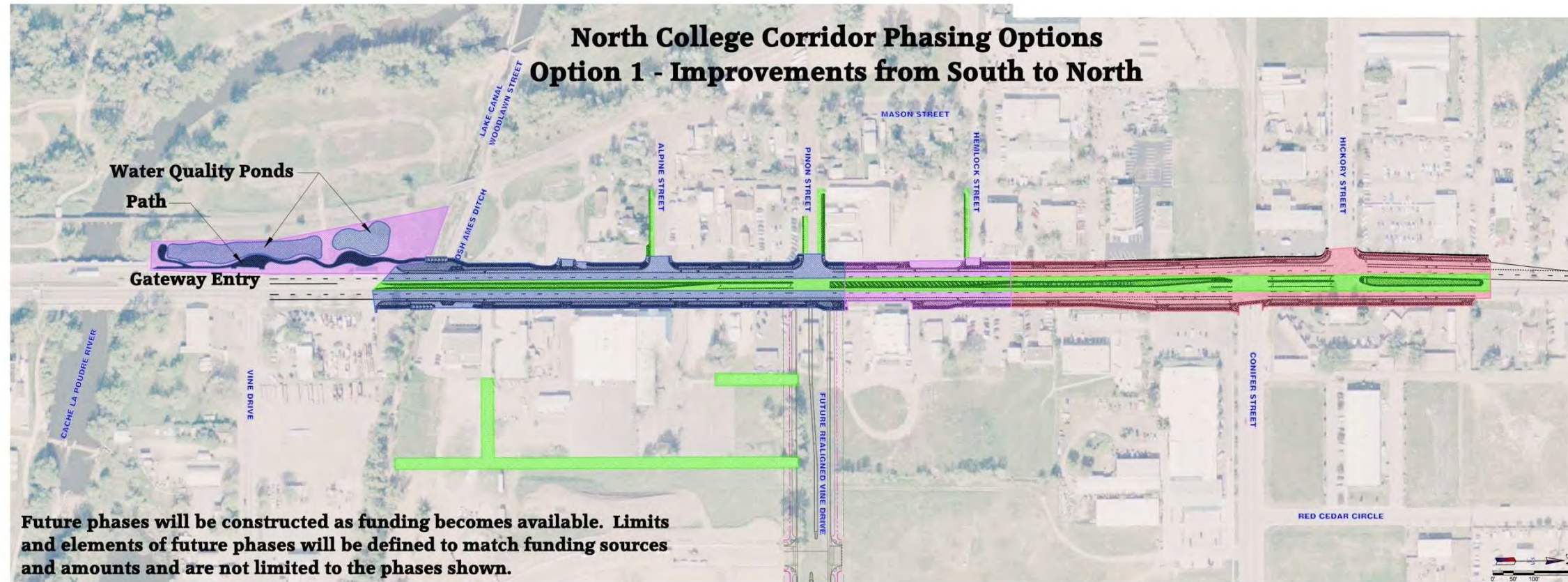
Potential project elements, consistent with Phasing Option 1, have been separated into logical segments or logical construction components and are summarized in Table 6-1 in Section 6. When additional funding is obtained, outstanding project elements, consistent with funding sources, can be constructed to complete the planned improvements. A summary of potential funding sources linked with project construction elements can be found in Section 7.5. Project limits and elements of future phases will be defined to match funding sources and amounts, when available.

### Next Steps

The following steps and timelines for achieving construction in the 2011 construction season and for ultimate completion of the entire project are recommended:

- Initiate preliminary engineering for the entire project immediately following acceptance of the Conceptual Design Report.
- Complete preliminary engineering with a Field Inspection Review (FIR) in December 2009.
- Complete the Right-of-way Plans Review (ROWPR) for the entire project early in 2010.
- Complete CDOT Form 128 and supporting documentation for a Categorical Exclusion early in 2010.
- Continue pursuing additional funds through formal project funding requests for Department of Local Affairs (DOLA), HES, and URA CAG funding sources.
- Use the Funding Matrix in Table 7-2 for future funding pursuits.
- Continue coordination with the public including NFCBA, individual property owners, and the general public.
- Develop a Maintenance Plan that establishes specific responsibilities, protocols, routine maintenance schedules, and budgets for long-term maintenance of the project.





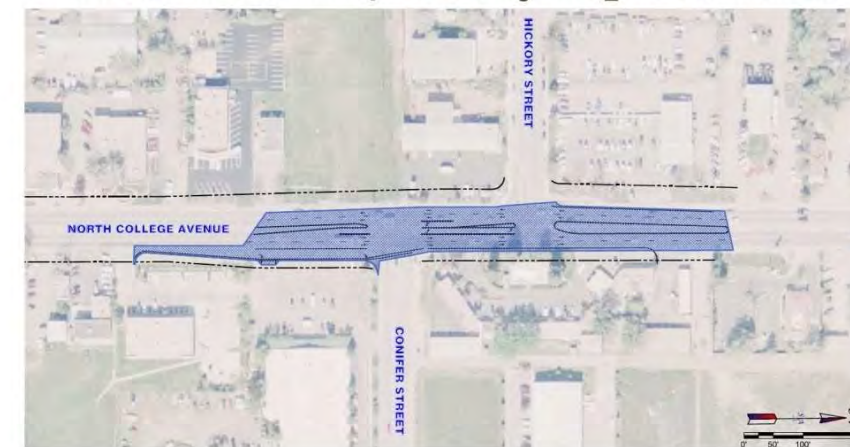
Future phases will be constructed as funding becomes available. Limits and elements of future phases will be defined to match funding sources and amounts and are not limited to the phases shown.

- Phase 1 - \$6.2M**  
 Improvements from Vine Drive to Pinon Street excluding median and overlay - \$5.4M  
 Water quality pond - \$0.15M  
 Interim Conifer/Hickory Improvements (Striping, Signal Modifications, Curb & Gutter at southeast corner (jax)) - \$0.5M  
 Interim Gateway Improvements (Path, Irrigation, Revegetation) - \$0.15M
- Phase 2 - \$1.8M**  
 Complete Gateway Entry - \$0.3M  
 Improvements from Pinon Street to Hemlock Street excluding median & overlay - \$1.5M
- Phase 3 - \$4.25M**  
 Improvements from Hemlock Street to Conifer Street excluding median & overlay - \$2.7M  
 Complete Conifer/Hickory Improvements - \$1.55M
- Phase 4 - \$1.1M**  
 Overlay - \$0.5M  
 Median, off-street alley connections, and side street parking - \$0.6M

**Advantages:**

- Complete all improvements in one area (Bicycle, Pedestrian, Access Consolidation, Landscaping)
- Visual impact of streetscape/landscape
- Minimizes disruption to individual properties
- Provides gateway to North College District

**Interim Conifer/Hickory Improvements**



**Disadvantages:**

- Length of improvements limited

Figure ES-3: North College Corridor Phasing Option 1



## 1.0 Introduction

### 1.1 Project Background

North College Avenue, a major north-south route through the City of Fort Collins, provides the northern entryway into the City. Also, functioning as US Highway 287 and Colorado State Highway 14 (north of Jefferson Street), the arterial provides both local and regional connectivity and carries a large volume of interstate truck traffic. North College Avenue is regulated by the Colorado Department of Transportation (CDOT). A Colorado Scenic Byways route, North College Avenue is a gateway to the mountains and to recreational lands in northwestern Colorado and Wyoming. The project corridor is largely commercial in character and has an active business community. Over time, citizens have expressed concern about the corridor's physical condition, as well as, associated challenges to economic prosperity. The Fort Collins community is anxious to upgrade the image and infrastructure of North College Avenue.

Civic discussion has been ongoing in the North College Corridor since the mid-1980s. In 1994, the North College Corridor Plan was adopted (updated in 2007) to establish a vision for the future of the corridor. In 2000, the US 287/SH 14 Access Management Report was adopted to promote safe and efficient access to/from North College Avenue and adjacent properties. Other guiding documents referenced to develop the Conceptual Design for the project corridor include:

- City's Transportation Master Plan
- City's Master Street Plan
- Transfort Strategic Plan Update (Draft, 2009)
- SH 287C Traffic Safety Corridor Review (MP 347.25 to MP 348.54).

Through these planning efforts, the City identified a need to create a gateway into the City, improve mobility for the traveling public, including bicyclists and pedestrians, and establish a strong connection to downtown along the Poudre River. The Conceptual Design builds upon these previous efforts. Collaboration with the public, especially corridor property owners, continues to be essential to successful implementation of the corridor vision.

The purpose of this Conceptual Design effort was to establish a roadmap for constructing improvements to North College Avenue between Vine Drive and the Conifer/Hickory intersections. The project area is illustrated in Figure 1-1. An initial construction project is planned for 2011. This Conceptual Design identifies multiple approaches that fit the proposed construction schedule and responds to potential funding scenarios.

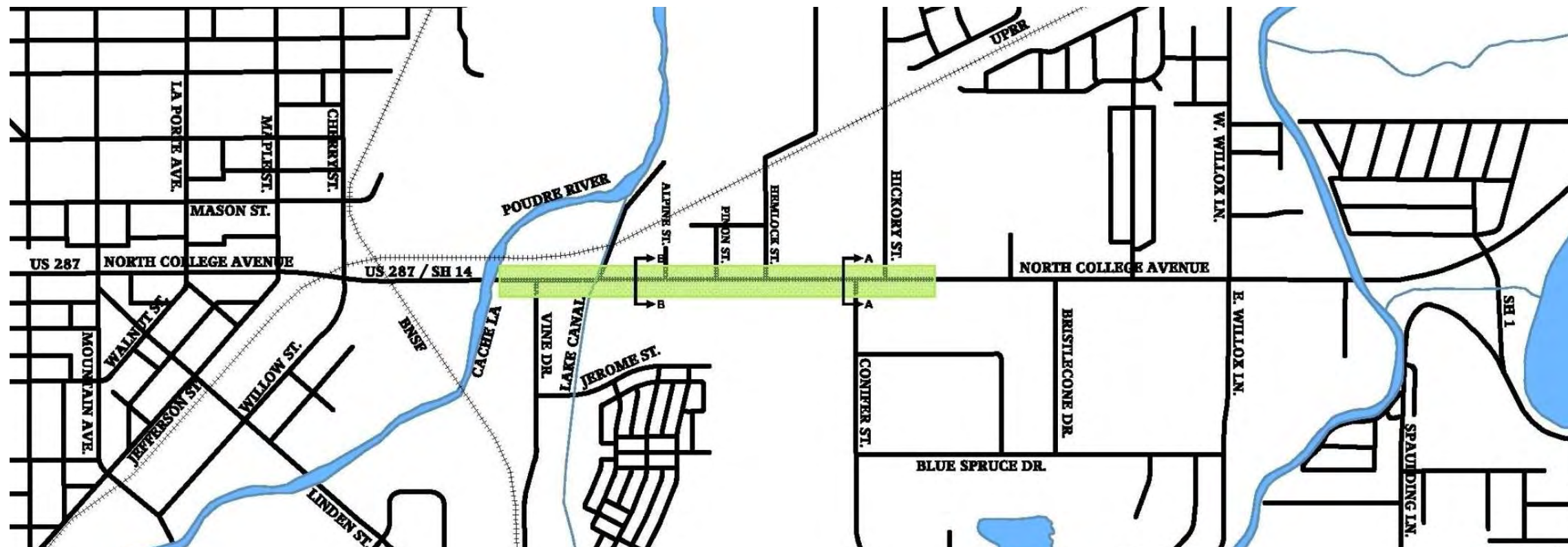


Figure 1-1: Project Area Map

### 1.2 Project Funding

In 2005, Fort Collins voters approved the Building on Basics (BOB) 1/4 cent sales tax to fund capital projects. Construction of multi-modal, streetscape, and access management improvements on North College between Vine and Conifer Street is included among the BOB projects. The specific BOB ballot language identifies goals for construction of improvements on North College as follows:

“The project will provide for the re-design of North College Avenue to bring the road to current arterial standards from Vine Drive to Conifer Street and for the acquisition of right-of-way needed for construction along North College Avenue. Construction will include curb, gutter and minor street patching; redefinition and consolidation of driveway; bike lanes and sidewalks, new streetscape and other necessary improvements.”

In addition to the BOB funding, the City has secured additional funding for construction of the improvements from State and Federal sources. These sources include Congestion Mitigation and Air Quality (CMAQ) funds, Transportation Enhancement funds and Hazard Elimination and Safety (HES) funds. The CMAQ and Enhancement funds were obtained through a call for projects from the North Front Range Metropolitan Organization (NFRMPO). The HES funds were obtained from the State to address safety issues related to offset intersection conditions at Conifer Street and Hickory Street, specifically the overlapping left turn lane between the intersections. The City recently applied for additional funds from the NFRMPO for the North College project and is currently awaiting final approval in August, 2009 of additional funds from STP Metro and Transportation Enhancement funding sources. Federal guidelines for administering the project must be followed to preserve the project’s eligibility to use these funds.

A summary of the funding currently secured and a conceptual estimate of funding required to complete the project is shown in Table 1-1. As indicated by the table, project costs are anticipated to exceed appropriated funds. As part of this Conceptual Design effort, the project team developed a strategy for funding all proposed improvements, identified potential funding sources for project elements, and developed a plan for an initial construction project in 2011 using secured funding. The City is actively seeking additional Local, State, and Federal funding, as well as other partnership opportunities, to address the funding shortage and to maximize the construction of improvements. The City established the Urban Renewal Authority Citizen Advisory Group (URA CAG) with the intent to provide more community input into the potential URA projects funded in the North College area. This group serves as an advisory committee to the decision-making URA Board.

<b>Funding Secured:</b>	
<i>City Funds</i>	
<i>Building on Basics (BOB) - Voter approved ¼ cent sales tax</i>	<i>\$4,700,000</i>
<i>Pedestrian Plan (BOB)</i>	<i>\$80,000</i>
<i>State / Federal Funds</i>	
<i>Hazard Elimination &amp; Safety (HES)</i>	<i>\$385,000</i>
<i>Congestion Mitigation &amp; Air Quality (CMAQ)</i>	<i>\$250,000</i>
<i>Enhancement</i>	<i>\$250,000</i>
<i>Other</i>	
<i>North Front Range Metropolitan Planning Organization (NFRMPO)</i>	<i>\$600,000</i>
<b>TOTAL</b>	<b>\$6.2M</b>
<b>Initial Estimate of Funding Required</b>	
<i>(Includes construction of Conceptual Design, ROW acquisition, and design.)</i>	<i>\$12 - \$15M</i>

**Table 1-1: Funding Summary**

### 1.3 Project Goals

Understanding stakeholder expectations from the beginning of a project helps produce solutions with lasting value. In order to define needs and expectations for the project and to establish a method for measuring how solutions meet these needs and expectations, a set of project goals was established at the onset of the project. Information from previous planning efforts, as well as input from project stakeholders including the Technical Advisory Committee (TAC), City Staff, CDOT, North Fort Collins Business Association (NFCBA), and the general public was used to establish the project goals. TAC members completed a questionnaire following the project kick-off meeting to help establish project goals, as well as to identify project opportunities and constraints.

The goals established for the project are as follows:

- Begin construction of proposed improvements between Vine Drive and Conifer Street in 2011
- Create a safe and effective travel corridor for all users including large trucks, passenger vehicles, bicycles, pedestrians, and transit users
- Support the economic viability of the project area
- Upgrade the image of the North College Corridor
- Maintain compatibility with existing and proposed utilities, including stormwater, water, sewer, electric, cable, phone, fiber, and gas
- Provide a phased implementation plan
- Maintain compatibility with the intent of previous local planning efforts

The following project elements were identified as necessary to obtain permitting, maintain eligibility for funding, receive construction clearances, and ultimately construct the proposed improvements:

- Meet BOB ballot language
- Meet Floodplain Administration's requirements within Poudre River Floodway
- Meet State Water Quality requirements
- Follow Federal, State, and Local right-of-way acquisition process

The TAC defined criteria for measuring the effectiveness of solutions to advance the project goals. The specific criteria for each goal can be found in the compatibility index in Technical Appendix E. Follow-up at critical decision points during development of the Conceptual Design was completed to confirm that the project goals were consistent with the overall project need and that the solutions under consideration advanced the project goals.

#### 1.4 Project Coordination

The North College project was initiated by the City of Fort Collins with strong support from the NFCBA and the community at large. Also designated as US 287 and SH 14, North College Avenue is part of the State Highway system and is ultimately under CDOT's jurisdiction. In addition, with federal money secured for construction, CDOT provides oversight to ensure adherence to Federal Aid processes.

A TAC was established to engage agencies, City Departments, and stakeholders throughout the entire process of developing a comprehensive and implementable plan. The role of the TAC was to help develop the corridor concept and to prioritize project elements for implementation. TAC members provided advice, expertise, and corridor knowledge throughout the project. The TAC consisted of representatives from city departments, CDOT, the NFCBA, and the consultant team. City departments included Transportation Planning, Engineering, Advanced Planning, Traffic Operations, Stormwater and Utilities, Floodplain Administration, Real Estate Services, Parks, Historic Preservation, Transport, and the Urban Renewal Authority (URA). TAC meetings were held once per month on the following dates:

- March 5, 2009 – Kick-off Meeting
- April 2, 2009 - Establish Project Goals and Begin Developing Initial Corridor Alternatives
- May 7, 2009 – Confirm Corridor Alternatives
- June 4, 2009 – Identify Preferred Corridor Alternative
- July 9, 2009 – Confirm Conceptual Design Elements for Preferred Alternative and Develop Phasing Implementation Plan

Due to the number of members and amount of information to discuss, TAC packets were distributed in advance of the meetings to prepare members for the upcoming discussions. Information from the TAC meetings and TAC endorsement letters are summarized in Technical Appendix A.

In order to investigate project issues in more detail and to maintain the project schedule, a smaller project Core Team was established. The Core Team consisted of Jennifer Petrik, City project manager; Kyle Lambrecht, City project engineer; Tim Tuttle, CDOT Local Agency engineer; and Michelle Hansen, consultant project manager. Specific discipline representatives from the TAC were included in the meetings, as needed. Meetings were held once per month and focused on specific project issues, project schedule, and project development. The following meetings were held:

- March 31, 2009 – Initial Brainstorming Session
- April 23, 2009 – Right-of-way (ROW), Access, and Public Feedback
- May 14, 2009 – Traffic Operations and Alternatives
- June 23 2009 – Floodplain Issues, Public Involvement, Funding, and Preliminary and Final Design
- July 17, 2009 – Project Costs and Phasing and Implementation Plan

Discipline-specific meetings were held to initiate processes for three of the main clearances required on the project: Environmental, Utilities, and Storm Drainage/Water Quality. An environmental scoping meeting was held on April 23, 2009 with the City and CDOT. The meeting identified environmental resources that must be addressed, roles of each agency, and processes. In addition, a field walk was completed to identify any potential environmental considerations. A utility meeting was held on July 17, 2009 with public and private utility owners. The purpose of the meeting was to introduce the project, confirm utility facilities within the project area, and begin discussing potential conflicts. A storm drainage and water quality meeting was held with City and CDOT staff on June 4, 2009. The purpose of the meeting was to confirm project requirements and discuss potential solutions.



## 1.5 Public Involvement

An important element of the conceptual design process was public involvement. The public, including corridor property owners, tenants, potential developers, advocacy groups, City Boards and Commissions, business associations and the general public, were engaged in the project using multiple techniques. The following groups actively participated in the project:

- City Council
- North Fort Collins Business Association (NFCBA)
- Transportation Board
- Planning and Zoning Board
- Bicycle Advisory Committee
- Commission on Disabilities
- Urban Renewal Authority Citizen Advisory Group (URA CAG)

In particular, the NFCBA has been a strong advocate for improvements in the North College area for years and has also been an active partner in project development. A representative from the NFCBA participated on the TAC. NFCBA members supported the project through strong attendance at organized project events/meetings. Continued communication between the City and the NFCBA regarding the project was completed throughout the duration of the project at regular NFCBA meetings, by e-mail, by phone, and at formal public meetings. In particular, the NFCBA initiated two project events to provide members, corridor property owners, and the general public with opportunities to participate in the development of the project. The first event was a Community Workshop held on May 6, 2009. This event was set-up as a design charrette where the general public could express ideas, draw concepts, and explore alternatives with project staff. The group discussed project constraints, as well as identified a list of priorities and desires for the project improvements. The second event was a ROW meeting held on June 23, 2009. This meeting provided corridor property owners with the opportunity to ask questions about the ROW acquisition process.



In addition to the Community Workshop and ROW meeting described above, three Public Open Houses were held at the City's Streets Department:

- Open House 1 was held on April 8, 2009. Approximately 90 people attended. The purposes of the meeting were to introduce the project to the public and to gather input about community priorities, concerns, and expectations. The community confirmed the importance of the specific BOB project elements by identifying safety, bicycle/pedestrian accessibility, streetscape/landscape, and access as the top community priorities.
- Open House 2 was held on May 21, 2009. Approximately 60 people attended. The purposes of the meeting were to present corridor alternatives and to gather public feedback on alternatives. Community priorities identified at the first Open House and Community Workshop were confirmed. Preferences regarding cross-sectional elements, bicycle/pedestrian options, corridor theme and the Hickory/Conifer intersection were gathered. These preferences helped to frame the Conceptual Design for the project corridor.
- Open House 3 was held on July 8, 2009. Approximately 60 people attended. The purposes of the meeting were to present the draft Conceptual Design and potential phasing options and to gather public feedback. Overall both the project and the Conceptual Design received positive support from the public.

Corridor property owners, nearby residents, local government representatives, City and CDOT staff members, City Boards and Commissions, business associations, advocacy groups and other interested individuals and groups were invited to the Open House by mail and e-mail. In addition, information was posted on the project website and press releases were used to inform the general public of the meeting. Project exhibits were available for review, project staff from the City, CDOT and the consultant team were available to discuss the project and answer questions, and written comments were solicited at all of the Open Houses. Open House materials and comment sheets were posted on the project website for review after the Open Houses and public comments were accepted for a minimum of two weeks following each Open House. Open House summaries and comment sheets can be found in Technical Appendix B.

Prior to the third Public Open House, on July 2, 2009, the City's project manager and a representative from City Real Estate Services conducted site visits throughout the project corridor to personally invite property owners, business owners, and tenants to attend the final Open House, inform them of the project, and answer questions. Following the third Public Open House, a series of one-on-one meetings with interested corridor property owners were held. Face-to-face meetings were held on July 16, July 17, and July 21, 2009. Approximately 12 property owners participated. Some combination of City Staff and consultant team representatives participated in these meetings. In addition, the project was discussed with several property owners via telephone and e-mail at various times during the project development. These meetings and telephone calls gathered data, discussed project issues for both individual properties and the entire corridor, and provided opportunities for participants to ask questions and to share input for plan development. A list of meeting participants can be found in Technical Appendix B.

In addition to all of the meetings and events that the public could participate in, a project webpage was established on the City's website, [www.fcgov.com/northcollege](http://www.fcgov.com/northcollege). The website was continually updated with notice of upcoming events, project updates and information, Open House materials, and contact information.

Formal presentations were also given to the following boards and commissions:

- Planning & Zoning Board – June 12, 2009 and July 16, 2009
- Bicycle Advisory Committee – June 8, 2009 and July 13, 2009
- Commission on Disabilities – June 11, 2009 and July 9, 2009

City Staff updated and engaged the City Council and Transportation Board on project progress and development on multiple occasions. Presentations were made at the following meetings:

Transportation Board Meeting – May 20, 2009 and July 15, 2009

City Council Work Sessions – June 9, 2009, and July 28, 2009

City Staff will seek City Council approval of the conceptual design and phased implementation plan at the regularly scheduled City Council meeting on September 1, 2009.



## 2.0 Existing Conditions

North College Avenue is a major north-south arterial route through the City of Fort Collins. It provides the northern entryway into the City and is a primary route to access downtown. Currently, one transit route utilizes North College Avenue in the southbound direction. The City plans to expand transit service in the area, utilizing North College Avenue south of Conifer Street as an enhanced travel corridor for the area north of downtown. Also, functioning as US Highway 287 (US 287) and Colorado State Highway 14 (SH 14) (north of Jefferson Street), North College Avenue provides both local and regional connectivity linking Colorado and Wyoming, as well as providing a link to Interstate 25 via SH 14. Designated as the Cache La Poudre - North Park Scenic Byways route, North College Avenue is a gateway to the mountains and to recreational lands in northwestern Colorado and Wyoming.

### 2.1 Land Use

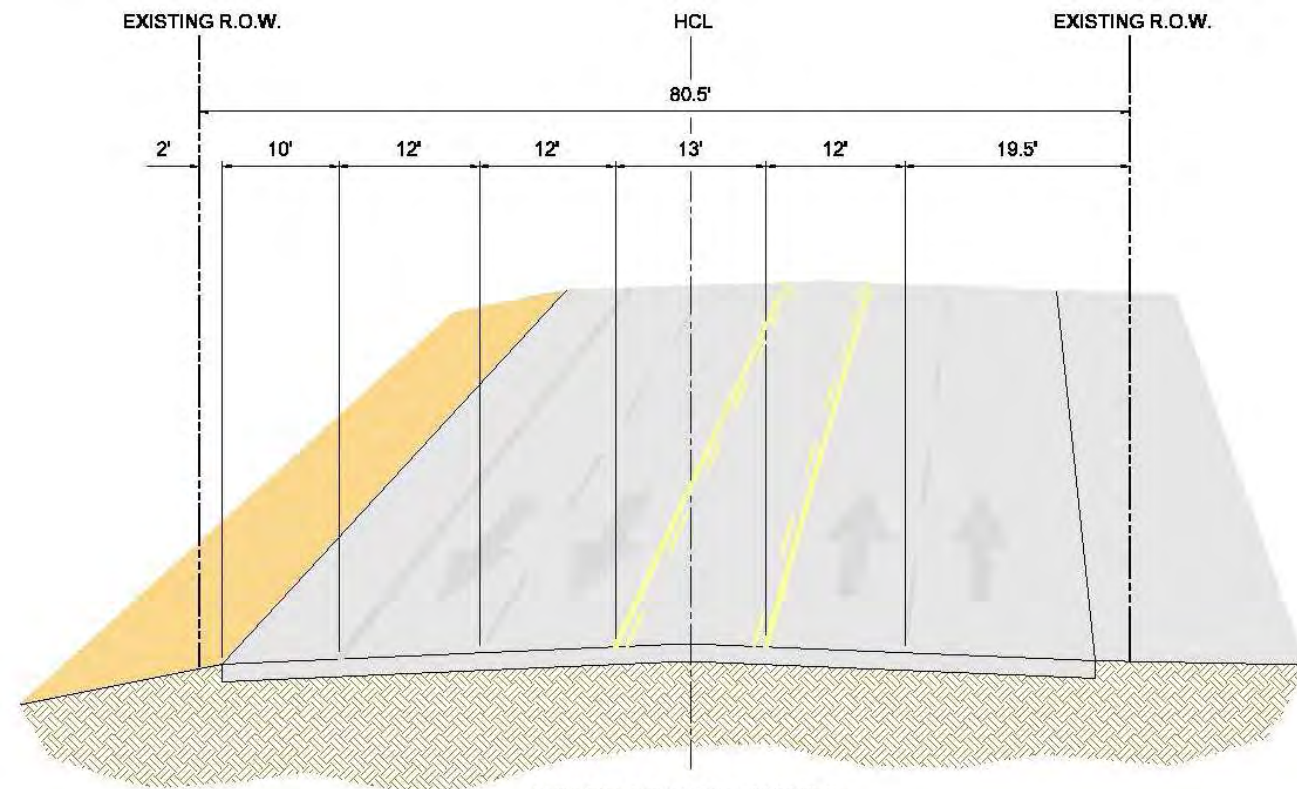
The project area includes approximately 1/2 mile of State Highway at the north end of the City of Fort Collins. In general, land use along the project corridor is commercial and light industrial with several auto-related businesses. The adjacent properties are predominantly small and individually owned. Several properties are currently vacant and several recently assembled. Both of these situations create potential opportunity for redevelopment to occur in the short-term. A majority of the area is zoned Service Commercial District with a small segment near the south end of the corridor zoned Community Commercial – Poudre River District. Redevelopment in the area is anticipated as largely commercial and mixed-use.

Physical characteristics of the area include the Poudre River, Lake Canal, and the Union Pacific Railroad (UPRR). North College Avenue crosses over the Poudre River and Lake Canal, just south and north of Vine Drive, respectively. The 500-year Poudre River floodplain extends to a location between Lake Canal and Alpine Street along North College and as far north as Pinon Street for adjacent properties. The 1/2-foot Poudre River floodway ends approximately 100-150' south of Lake Canal, influencing the types of project improvements that can be implemented south of the canal. With proximity to the river, there are several recreational amenities near the North College Corridor including the Poudre River Trail, Lee Martinez Park, and Legacy Park. The UPRR is located west of North College Avenue with a wye located directly across from Conifer Street.

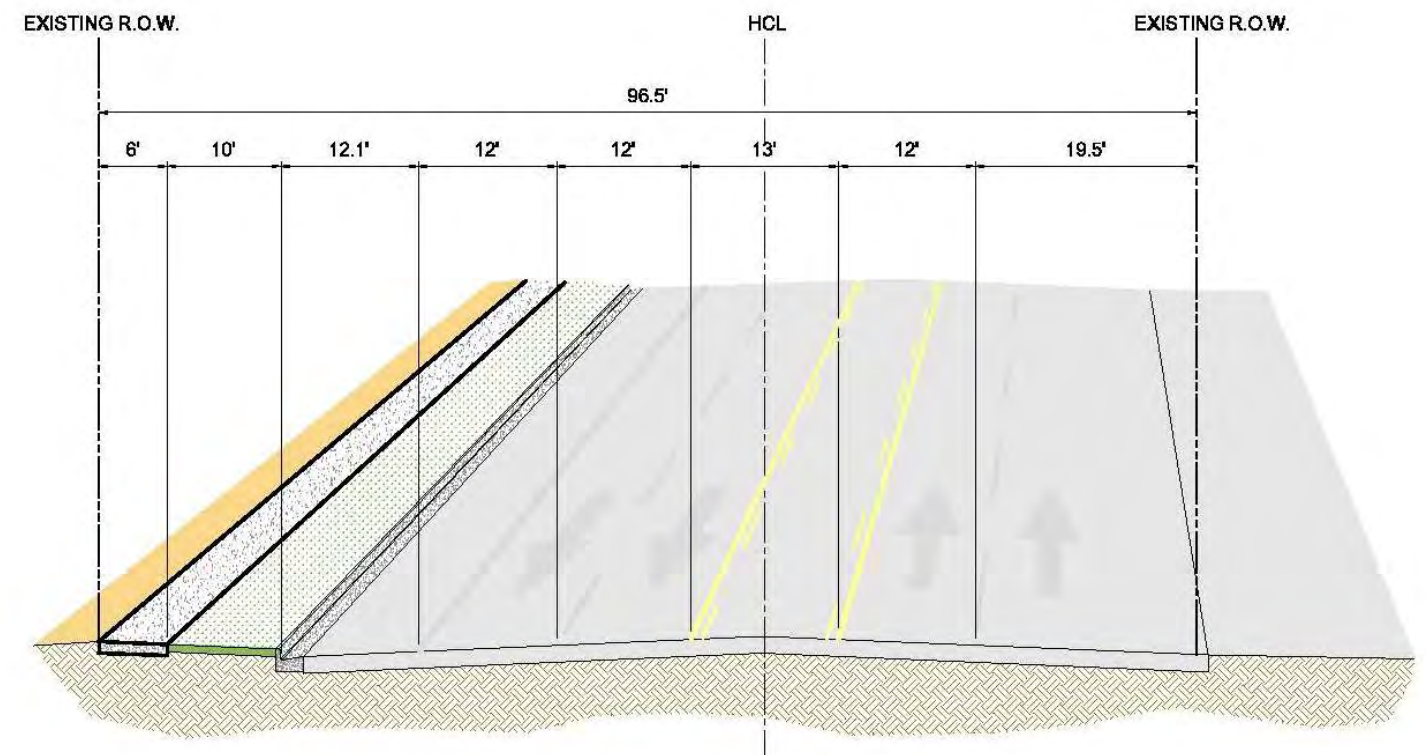
### 2.2 Roadway Elements

North College Avenue is a four-lane, urban highway with a two-way left turn lane throughout most of the project corridor. The posted speed limit is 40 mph. A raised median exists at Vine Drive with a northbound right turn lane and northbound and southbound left turn lanes at the intersection. No other auxiliary lanes exist within the project corridor. Generally, the highway is shouldered with open, uncontrolled access. Limited storm sewer exists near the Conifer and Hickory intersections; however, a majority of stormwater sheet flows across North College and adjacent properties. Although there have been few spot improvements at recently developed properties, bicyclists and pedestrians are not accommodated continuously through the corridor. The project corridor predominantly serves automobile and truck traffic without defined urban edges. Cyclists and pedestrians have reported difficulty in traveling through the corridor.

The horizontal alignment of North College Avenue is straight, generally following the Section Line from Vine Drive to Conifer Street. The profile of the roadway is nearly flat and slopes south toward the Poudre River. A normal (2%) cross-slope generally exists. Figure 2-1 on the following page illustrates Section A-A, an example of a basic cross-section for the corridor where recent development has not occurred. It includes three 12' lanes, a 13' two-way left turn lane, a 10' shoulder on the west side, and a 19.5' lane on the east (a shoulder is not striped on the east side). Figure 2-2 on the following page illustrates Section B-B, an example of the basic cross-section where development has occurred recently and the improvements are consistent with the City's Standard Arterial section have been constructed. Section B-B matches Section A-A on the east side. On the west side, space to accommodate a future raised median and bike lane has been provided within the travel way. In addition, curb and gutter, a 10' landscape buffer and a 6' sidewalk exist on the west side.



NORTH COLLEGE AVENUE  
EXISTING SECTION AA  
LOOKING NORTH NEAR JAX OUTDOOR STORE  
**Figure 2-1: Existing Section A-A**



NORTH COLLEGE AVENUE  
EXISTING SECTION BB  
LOOKING NORTH NEAR THE HUMAN BEAN  
**Figure 2-2: Existing Section B-B**

The ROW on North College Avenue varies from 80-ft to 165-ft in width between the Poudre River and Hickory Street. In areas with 80' of ROW, the ROW is generally centered on the section line, which is also the highway centerline. As shown in Table 2-1 on the following page, there are a several locations where recent developments have dedicated additional ROW consistent with the City's Standard Arterial cross-section. Obtaining additional ROW from these properties is not anticipated for the project; however, right-of-way acquisition is expected for a majority of the 39 properties within the project corridor. Thirty-one of these properties are estimated to have potential impacts. With the proposed improvements located on a State facility and a portion of the project funding from federal sources, ROW required to construct the project will be acquired in conformance with the Relocation Assistance and Real Property Acquisition Policies Act of 1970 as amended (Uniform Act). Access points throughout the corridor are currently full movement and generally uncontrolled. There are three signalized intersections: Vine Drive, Conifer Street, and Hickory Street. A new east-west arterial street known as Realigned Vine Drive is planned to intersect North College Avenue across from Pinon Street. This future intersection has the potential for signalization, if warranted. Other City street intersections include: Woodlawn Drive, Alpine Street, Pinon Street, and Hemlock Street. These streets are stop-controlled, unpaved, gravel roadways located only on the west side of North College. The length of these streets is limited by the UPRR with the exception of Woodlawn Drive, which crosses the railroad at-grade and provides access to Legacy Park.

As a State Highway, access to North College Avenue is regulated by CDOT. This section of US 287/SH 14 is categorized as a Non-Rural Arterial (NR-B). The highway category allows direct access to occur while still providing service to through traffic movements. The highway is expected to provide capacity for moderate speeds and moderate to high traffic volumes. In 2000, the City and CDOT adopted the US 287/SH 14 Access Management Report for the corridor. The report defines short-term access conditions for individual properties. Numerous driveway consolidations and definition of access points are included in the short-term access plan. The access management report also defines long-term access conditions for the corridor. These conditions include implementation of a raised median along North College Avenue in conjunction with several future alternative local routes that will provide alternate access for properties that are limited to right-in/right-out or ¾-turn movements on North College in the long-term access plan. The Future Context Plan in Figure 2-3 illustrates the future transportation network for the area based on the US 287/SH 14 Access Management Report and the City Transportation Master Plan. Two of the more significant alignments serving areas east of North College Avenue are the Realigned Vine Drive alignment and the realignment of Conifer Street with Hickory Street.



Milepost Reference	Reference Location	Existing ROW Width	Notable Features
347.21 – 347.32	Cache La Poudre River Bridge north abutment to Lake Canal	Varies (100 Feet to 165 Feet)	
347.32 – 347.36	Lake Canal to north property line of Mister Money USA (742 – 748 N College)	97.50 Feet	
347.36 – 347.39	North property line of Mister Money USA (742 – 748 N College) to south property line of The Human Bean (821 N College)	80 Feet	
347.39 – 347.41	North and south property limits of The Human Bean (821 N College)	97.50 Feet	Existing ROW is consistent with “Standard Arterial” west of section line
347.41 – 347.45	North property line of The Human Bean (821 N College) to North property line of Bingo Planet (830 N College) (Alpine Street)	80 Feet	
347.45 – 347.47	North and south property limits of Flack and Jensen (910 N College)	100 Feet	Existing ROW is consistent with “Standard Arterial” east of section line
347.47 – 347.51	North property line of Flack and Jensen (910 N College) to Pinon Street	80 Feet	
347.51 – 347.52	Pinon Street	84 Feet	
347.52 – 347.60	Pinon Street to north property line of Hemlock Street	Varies (100 Feet to 101.50 Feet)	Existing ROW is consistent with “Standard Arterial” east of section line at Checker Auto Parts (1006 N College) and west of section line at Advance Auto Parts (1023 N College)
347.60 – 347.71	North ROW line of Hemlock Street to Conifer Street	84 Feet	
347.71 – 347.82	Conifer Street to north property line of El Palamino (1220 N College)	80 Feet	
347.82 – 347.89	North property line of El Palamino (1220 N College) to north property line of Rulon’s Service (1304 N College)	Varies (80 Feet to 110 Feet)	

**Table 2-1: ROW Summary**

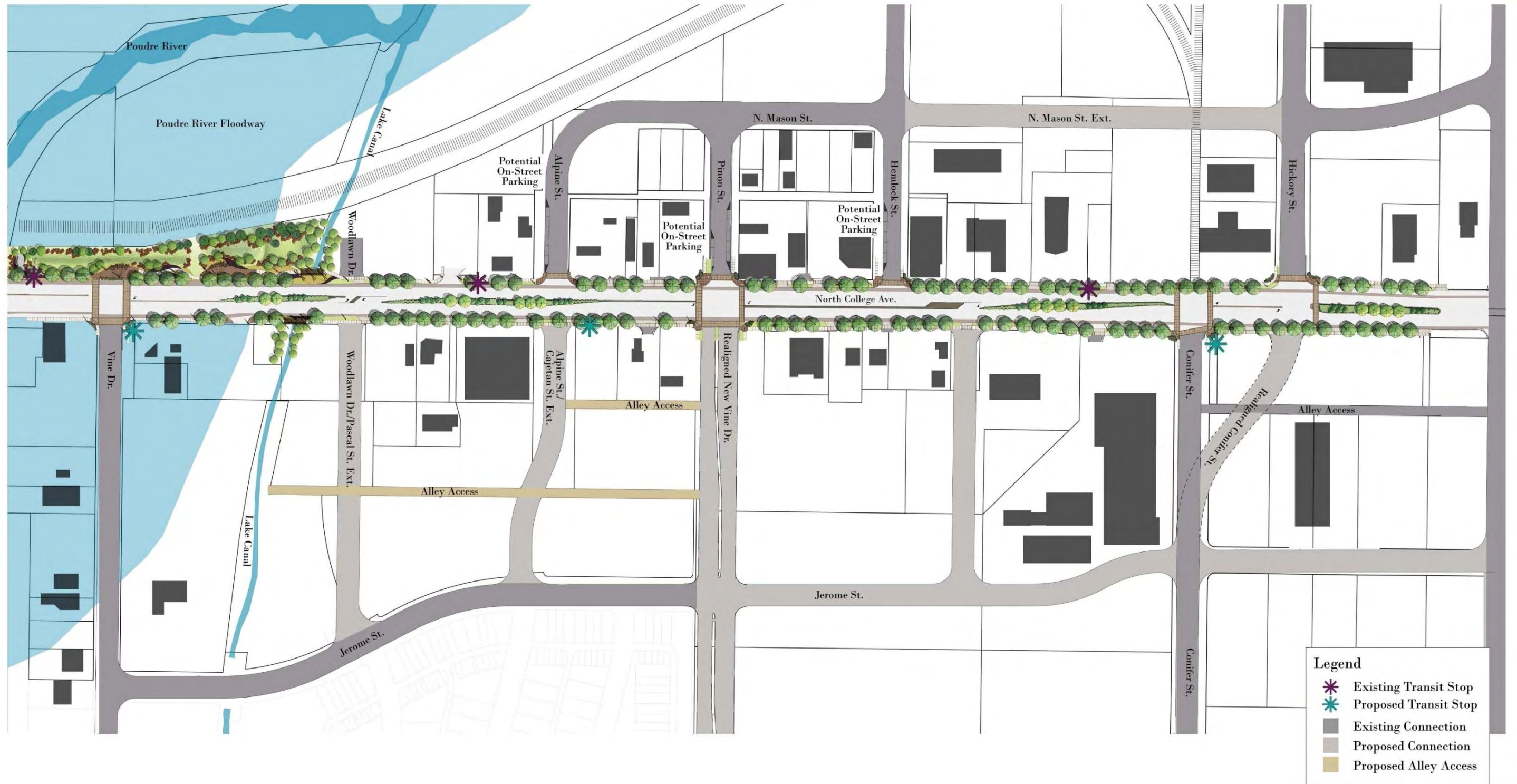


Figure 2-3: Future Context Plan



**2.3 Traffic & Accident Data**

The City collected traffic volume data along North College Avenue and the local street system within the project area. Data collected included daily traffic volume counts, vehicle classification counts, and peak hour turning movement volumes at key intersections. The combined northbound and southbound daily traffic volumes are approximately 26,100 vehicles per day south of Vine Drive and 22,500 vehicles per day north of Hickory Street. During the morning peak, traffic on North College is higher in the southbound direction than the northbound direction. The reverse is true during the evening peak. The combined northbound and southbound volumes on the project corridor are higher during the evening peak than during the morning peak. Heavy vehicle percentages on North College average 11 percent of the total daily traffic.

Projected 2035 traffic volumes were developed for future conditions by factoring up the North Front Range Metropolitan Planning Organization (NFRMPO) 2030 model volumes using the projected growth rate for the corridor. Average daily traffic volumes are expected to approximately double between 2009 and 2035 with approximately 46,000 vehicles per day south of Vine Drive and 50,500 vehicles per day north of Hickory Street.

An operational analysis was completed for existing and projected 2035 conditions. AM and PM peak hour turning movements were used to evaluate intersection Level of Service (LOS) at major intersections along North College Avenue. Additionally, traffic conditions along North College Avenue as a whole (i.e., Arterial LOS) were evaluated based upon average travel speed. Results of the operational analyses were used to develop auxiliary lane lengths for intersections throughout the corridor. In addition, pedestrian and bicycle LOS were evaluated for proposed conditions. Refer to the Traffic Study in Appendix C for additional details.

Accident data between January 1, 2000 and December 31, 2004 for North College Avenue between MP 347 (south of Vine Drive) and MP 348 (north of Hickory Street) was compiled from the CDOT data base. In addition, crash data between January 1, 2005 and December 31, 2007 between Vine Drive and Hickory Street was compiled from the City database. A total of 246 crashes were reported along North College Avenue within the project area during this period. Of these reported crashes, 68 (27.6%) had at least one injury, none were fatal, and the remaining 178 crashes (72.4%) resulted in property damage only. Seventy-five percent (75%) of all crashes were access-related.

Table 2-2 presents a summary of crash types along the North College Avenue project corridor between 2000 and 2007. As shown in the table, a majority of crashes fell into four categories: rear end crashes (40.65%), broadside crashes (17.07%), sideswipe same direction (11.79%) and bicycle crashes (7.32%). The first three categories are common intersection crash types. A majority of bicycle/auto crashes occurred between right-turning vehicles and cyclists riding against traffic. Providing bicycle facilities along the entire corridor promotes increased driver awareness of cyclists and encourages cyclist use of the designated bicycle facilities.

Accident Type	Number of Accidents	Percent Per Type
REAR-END	100	40.65%
BROADSIDE	42	17.07%
SIDESWIPE SAME DIRECTION	29	11.79%
BICYCLE	18	7.32%
APPROACH TURN	10	4.07%
CURB	8	3.25%
WILD ANIMAL	5	2.03%
OTHER FIXED OBJECT	5	2.03%
HEAD-ON	4	1.63%
SIDESWIPE OPPOSITE DIRECTION	4	1.63%
BARRICADE	3	1.22%
WALL/BUILDING	3	1.22%
LIGHT/UTILITY POLE	2	0.81%
MAILBOX	2	0.81%
PARKED MOTOR VEHICLE	2	0.81%
PEDESTRIAN (ALL OTHER)	2	0.81%
FENCE	1	0.41%
INVOLVING OTHER OBJECT	1	0.41%
MEDIAN BARRIER	1	0.41%
OVERTURNING	1	0.41%
ROCKS IN ROADWAY	1	0.41%
SIGN	1	0.41%
TRAFFIC SIGNAL POLE	1	0.41%
<b>Total</b>	<b>246</b>	<b>100%</b>

Table 2-2 Accident Data (2000-2007)

In reviewing the crash data in more detail, several access points along North College Avenue experienced some crash recurrence during this period including:

- Vine Drive
- Conifer Street
- Hickory Street
- Alpine Street
- Jax Outdoor Store access
- AutoZone access
- Fort Collins Truck Sales access

At the minor intersections and private driveways with crash recurrence, application of access management techniques such as consolidating access, defining access points, and limiting access may reduce crash rates.

In addition, Hazard Elimination and Safety (HES) funding has been awarded to the City of Fort Collins to address the crash recurrence at the Conifer Street and Hickory Street intersections. The proximity of these two offset intersections and the shared left-turn lane between the intersection results in an increased number of accidents at this location. Safety improvements that separate the left-turn movements for each intersection and long-term improvements to align the two intersections are proposed and discussed in more detail in Section 4. In addition, CDOT completed a Safety Assessment for US 287 between Vine Drive and SH 1, with the following traffic signal recommendations:

- Center the signal heads over the lanes at the Hickory intersection.
- It is also recommended that “Back plate” the signal heads at Hickory and Conifer for greater visibility
- Use LED lights, where not already installed, in an effort to reduce rear end and broadside crashes.



### 3.0. Conceptual Design Process & Evaluation

Using data, technical analyses, industry design standards, as well as input from the City, CDOT, TAC, NFCBA, and the general public, a conceptual design for the project corridor was developed.

#### 3.1. Process

The conceptual design was developed using the four-step process described below.

##### Step One – Goals and Compatibility Index

Based on previous planning efforts, the BOB Ballot Language, and input from the TAC gathered through an initial project questionnaire, a set of project goals and requirements were established, as described in Section 1.3. With TAC participation, a compatibility index was developed to provide a logical means for weighing the benefits of each conceptual design alternative considered. The index identified measures of effectiveness and criteria that correspond with each project goal. A simple rating system that identifies the concept as favorable, neutral or unfavorable with respect to each criterion was defined. In general, the neutral rating meets the standard; the favorable rating expands upon the standard; and the unfavorable rating falls short of the standard. Each of the three ratings was given a specific definition applicable to each criterion to assist in the evaluation. The compatibility index can be found in Technical Appendix E.

##### Step Two - Identify Alternatives

This plan considered options for several design elements. Initial options for each element were developed through a brainstorming session. The initial options were refined and detailed with input from the TAC and the public.

Three main concepts were developed from the design elements. The concepts considered median width, types and widths of bicycle/pedestrian facilities, landscaping areas, and right-of-way impacts. A summary of the three main concepts follows below and a summary of other design elements evaluated can be found in Section 3.3.

##### Standard Arterial Option

The Standard Arterial Option is based on the Larimer County Urban Area Street Standards for a 4-Lane Arterial Street in the City of Fort Collins. One minor change has been incorporated into the section based on State Highway design criteria. An additional 2' has been added to the travel way and overall right-of-way width to provide 12' travel lanes exclusive of the curb and gutter. The Standard Arterial Section is illustrated in Figure 3-1. This cross-section is consistent with City Standards previously developed through an extensive planning process. It also offers consistency with other roadways within the City. Of the three options evaluated, the Standard Arterial has the greatest ROW requirement. Refer to Appendix E to view the Standard Arterial Option in plan view.

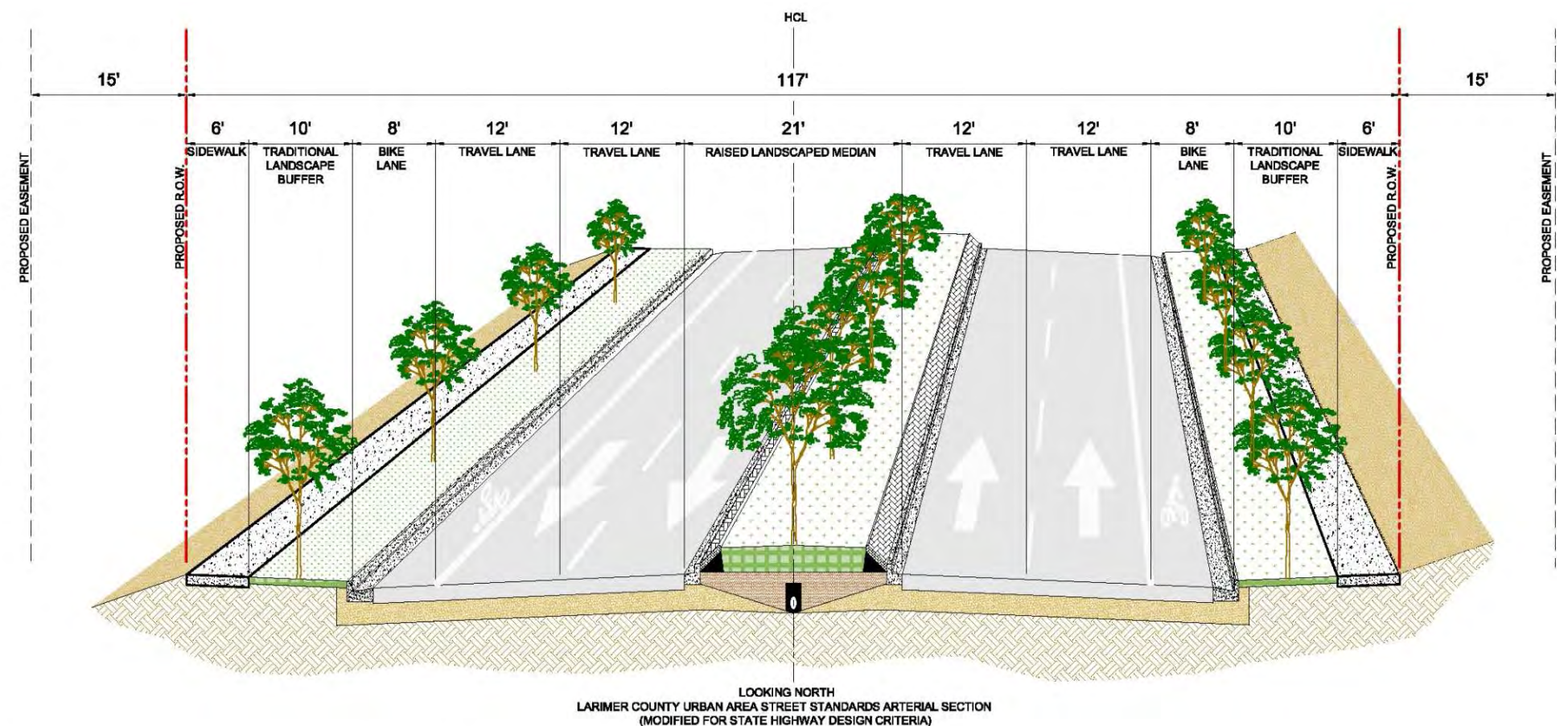
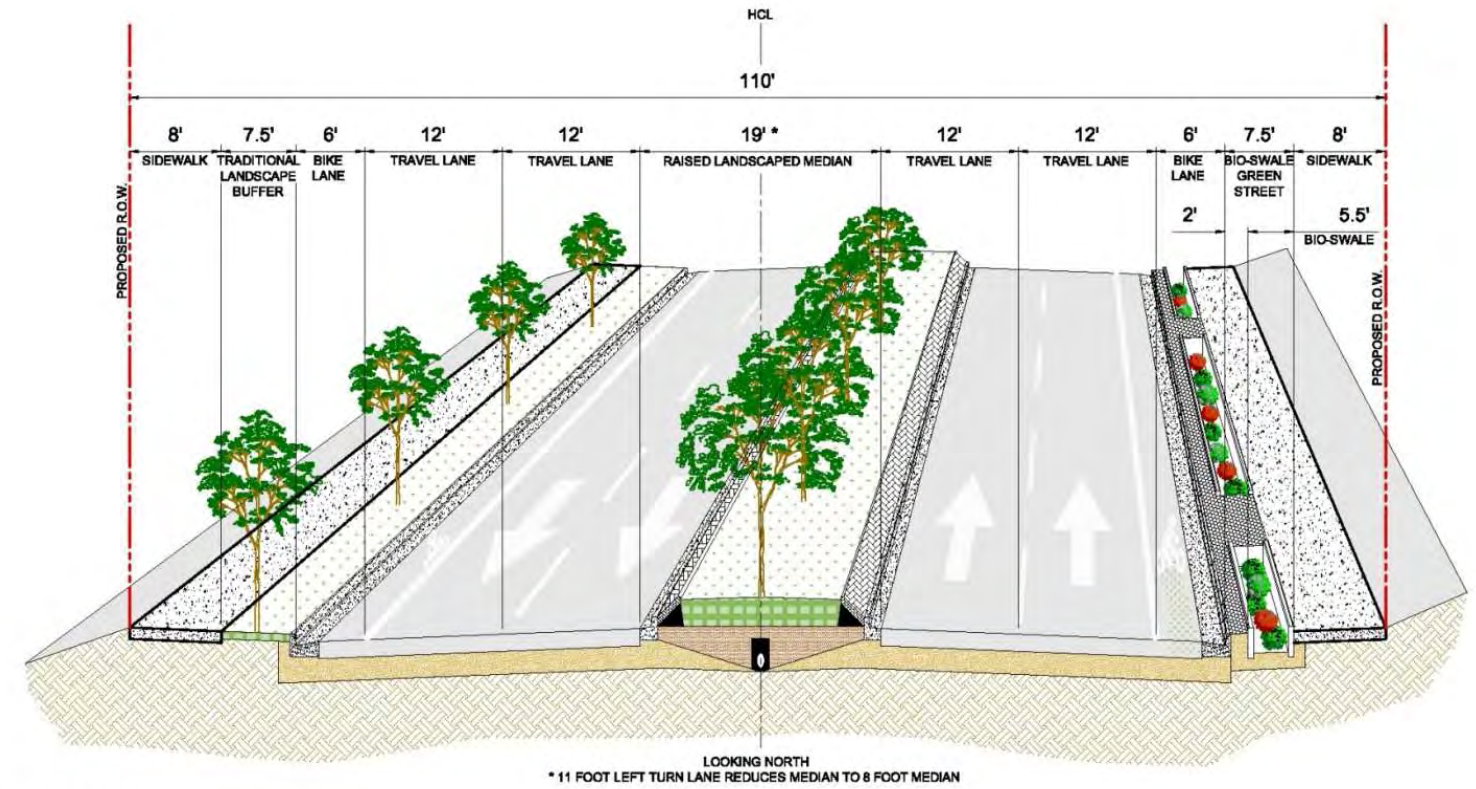


Figure 3-1: Standard Arterial Section



*Intermediate Option*

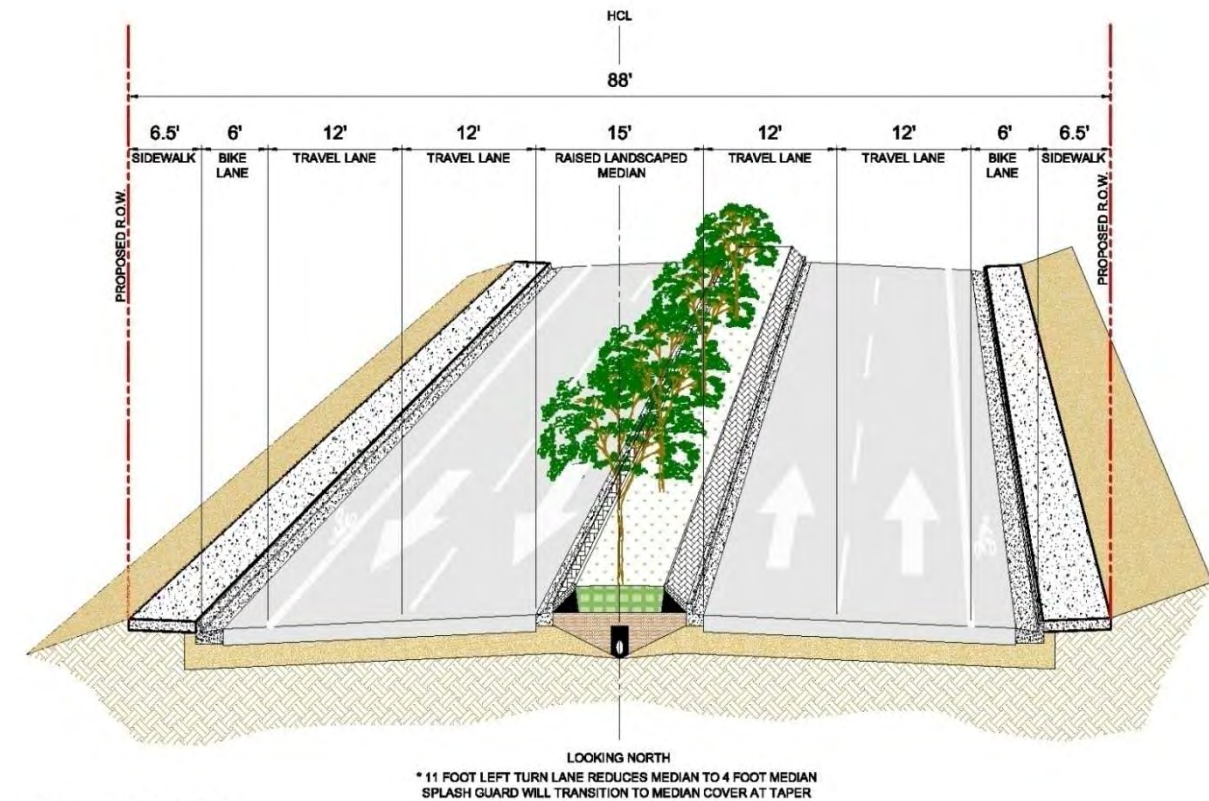
The Intermediate Option is a hybrid cross-section developed by the TAC. Using the Standard Arterial Option as a starting point, the width of certain cross-sectional elements was reduced to reduce ROW impacts and preserve existing buildings. Considerations included minimum design criteria, potential accommodation of recreational cyclists, potential implementation of bio-swales, accommodation of large trucks, and length of pedestrian crossings. The Intermediate Section is illustrated in Figure 3-2. This cross-section accommodates all modes of transportation, offers opportunities for landscape/streetscape enhancement, and reduces property impacts. Refer to Appendix E to view the Intermediate Option in plan view.



**Figure 3-2: Intermediate Section**

*Minimum TAC Option*

The Minimum TAC Option was developed by the TAC to minimize property impacts while still accommodating all modes of travel and some level of landscaping. Minimum design criteria were applied to cross-sectional elements based on corridor specific conditions and industry standards. The classification of the roadway, level of traffic, vehicle mix, and desirable cross-sectional elements were considered. The Minimum TAC Section is illustrated in Figure 3-3. This cross-section accommodates all modes of transportation and minimizes property impacts. Elimination of the landscape buffer significantly reduces opportunity for landscape/streetscape enhancement, eliminates separation between pedestrians and vehicles, and reduces available space within the ROW for storm drainage/water quality facilities and other utilities. Of the three options evaluated, the Minimum TAC Option requires least additional ROW. Refer to Appendix E to view the Minimum TAC Option in plan view.



**Figure 3-3: Minimum TAC Section**



### Step Three - Refine Alternatives

Based on comments received from the TAC and the public, and information discovered through follow-up investigations, the options considered were refined and modified, as necessary. Options were revised or eliminated if they were:

- cost prohibitive
- contained unmanageable physical constraints
- had significant traffic operational deficiencies
- did not meet with overall community expectations
- did not meet design standards

### Step Four – Evaluation

Following Open House Number Two, the refined options were evaluated using the compatibility index described in Step One. The evaluation results were reviewed with the TAC for concurrence and a preferred alternative was identified.

### 3.2 Evaluation Results

The results of the evaluation are shown in Table 3-1. The Intermediate Option rated more favorably than either the Standard Arterial Option or the Minimum TAC Option. This outcome is attributed to bicycle and pedestrian accessibility, streetscape and image opportunities, and property impacts. The Intermediate Option is recommended as the preferred alternative for the North College Avenue corridor. Based on public comment, the Intermediate Option was modified slightly. To mitigate bicycle accessibility concerns, an 8' on-street bike lane with an 8' shared use path is included in the Conceptual Design. The median width was also reduced to reduce right-of-way impacts and pedestrian crossing lengths. A consequence of reducing the median width is that a standard pedestrian refuge cannot be provided at intersections. In addition geometric modifications to the cross-section will be used at "pinch points" to preserve existing buildings and businesses. Geometric modifications may include meandering or narrowing of shared use paths, alignment tapers, reduction in landscape buffer width, etc. Lane width will not be reduced. The Conceptual Design rates slightly higher than the Intermediate Option due to expanded bicycle accessibility. Details on the rating of each option can be found in Technical Appendix E.

Criteria highlighted show a differentiation between the alternatives. Un-highlighted criteria ranked the same for all alternatives.

Project Goal	Evaluation Criteria	Standard Arterial Rating	Intermediate Rating	Minimum TAC Rating	Conceptual Design Rating
Achieve construction of proposed improvements between Vine Dr. and Conifer St. by 2011.	Compatibility with Funding Sources	●	●	●	●
	Construction Costs	○	○	○	○
	Physical Constraints	○	●	●	●
	ROW Acquisition	○	●	●	●
Create a safe and effective travel corridor for all users including large trucks, passenger vehicles, bicycles, pedestrians, and transit users.	Pedestrian Accessibility	●	●	●	●
	Bicycle Accessibility	●	●	●	●
	Transit Accessibility	●	●	●	●
	Access Control Implementation	●	●	●	●
	Auxiliary Lanes	●	●	●	●
	Hickory/Conifer Improvements	●	●	●	●
	Corridor Travel Time	○	○	○	○
	Side Street Delay	●	●	●	●
	Corridor infrastructure improvements*	●	●	●	●
	Support the economic viability of the project area	Corridor Aesthetics/Streetscape	●	●	○
Business Access/Circulation*		●	●	●	●
Community Support		○	●	○	●
Property Impacts		○	●	●	●
Redevelopment Opportunities		●	●	●	●
Upgrade the image of the North College Corridor	Connection to Downtown/other City Centers	●	●	●	●
	Corridor Identity	●	●	○	●
	Gateway Features*	●	●	●	●
Maintain compatibility with existing and proposed utilities, including stormwater, water, sewer, and electric	Protection of existing utilities	○	○	●	○
	Compatibility with previous planning efforts	●	●	●	●
	Compatibility with NECCO	●	●	●	●
	Stormwater Infrastructure	●	●	●	●
	ROW/Easement Availability	●	●	○	●
Provide a phased implementation plan	Long-Term Phasing Opportunities	●	●	●	●
	Short -Term Phasing Opportunities	●	●	●	●
	Long-Term Funding Opportunities	●	●	●	●
	Short-Term Funding Opportunities	●	●	●	●
Maintain compatibility with the intent of previous local planning efforts	Compatibility with Local Planning	●	●	●	●

\*Ratings assume that additional infrastructure improvements including alleys, local street on-street parking, and entrance park can be implemented with all alternatives.

- Favorable (expands upon the standard)
- Neutral (meets the standard)
- Unfavorable (falls short of the standard)

Table 3-1 Evaluation Results Summary



### 3.3 Other Design Elements Considered

In addition to the three main cross-sectional concepts described above, this plan considered options for multi-modal accommodation, landscape/streetscape character, storm drainage/water quality elements, improvements within the floodway, and safety improvements at the Conifer/Hickory intersection. The preferred option selected from each of these elements was incorporated into the Conceptual Design for further development. A summary of the options follows.

#### *Bicycle/Pedestrian Options Considered*

Concern about the location and scale of bicycle and pedestrian facilities was identified by commuter and recreational cyclists, pedestrians, and the disabled community. Concerns generally revolved around two main topics: ease of traveling through the corridor and level of comfort traveling adjacent to vehicles, particularly large truck traffic. Three bicycle/pedestrian options were considered: Option 1 – On-Street Bike Lane with Sidewalk, Option 2 – On-Street Bike Lane with Shared Use Path, and Option 3 – Off-Street Bike Path Adjacent to Sidewalk. Figure 3-4 illustrates the three options in cross-sectional view.

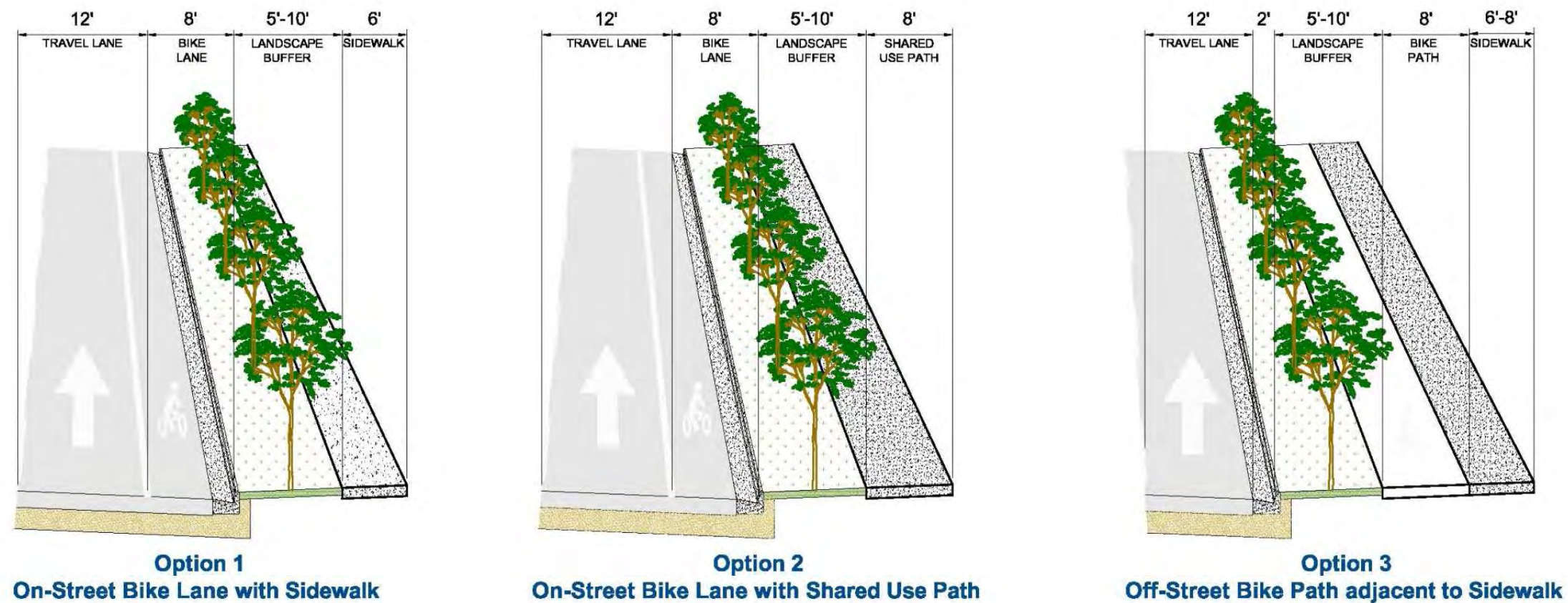


Figure 3-4: Bicycle / Pedestrian Section Options

Based on public feedback, Option 2 and 3 received balanced support. Option 1 received the least support. Upon further research, analysis, and guidance from American Association of State Highway Transportation Officials (AASHTO), CDOT, the Idaho Department of Transportation and New York City Department of Transportation, **the TAC identified Option 2 as the preferred option.** Limiting bicycle accessibility to an off-street path, as shown in Option 3, was not recommended by the TAC for the following reasons:

- Wrong-way travel
- Intersection/driveway conflicts
- Visibility/sight distance
- Pedestrian conflicts
- Commuter cyclists must yield to turning traffic at driveways



*Landscape/Streetscape Character Options Considered*

Three landscape/streetscape character themes for the corridor were explored through the public process: Outdoors/Natural, Cultural and Artistic, and Industrial Simplicity.

Figures 3-5, 3-6 and 3-7 provide an example illustration of each theme through an existing image. Additional images for each theme can be found in Appendix E. **The public responded most positively to a combination of an Outdoors/Natural theme with the addition of Artistic elements.** This response reiterates the *North College Corridor Plan's* goals of creating physical public improvements that reflect the corridor's unique characteristics and history. The Industrial Simplicity theme, due to lack of public interest, was discarded.

The Outdoor/Natural theme will be reflected through the following:

- earth tone colors
- natural materials such as wood and stones that are reflected in the surrounding environment of the Poudre River and Fort Collins
- native, drought tolerant vegetation

The Artistic theme will be depicted through:

- a lively color palette
- unique detailing to signage and street furnishings



**Figure 3-5: Outdoor/Natural Theme**



**Figure 3-6: Cultural and Artistic Theme**



**Figure 3-7: Industrial Simplicity Theme**

*Storm Drainage/Water Quality Options Considered*

With the addition of curb & gutter, storm water flows are concentrated and redirected. This change in flow patterns triggers the need for storm drainage improvements which provide for the safe passage of vehicles during significant storms. Also, water quality treatment is required by Federal Law for projects larger than one-acre to protect surface waters from pollution. North College Avenue drain to the Poudre River and must be treated prior to outletting into the River.

The following two storm drainage/water quality options were considered :

- Traditional storm sewer system – An underground storm sewer system consisting of pipes and inlets collects storm water flows and directs them to a water quality pond for treatment.
- Bioswales –Landscaped elements designed to remove silt and pollution from surface runoff. For the North College Improvements Project, bioswales would be constructed within the landscape buffer along both sides of the highway. Chases would allow storm water flows to enter the bioswales for water quality treatment.

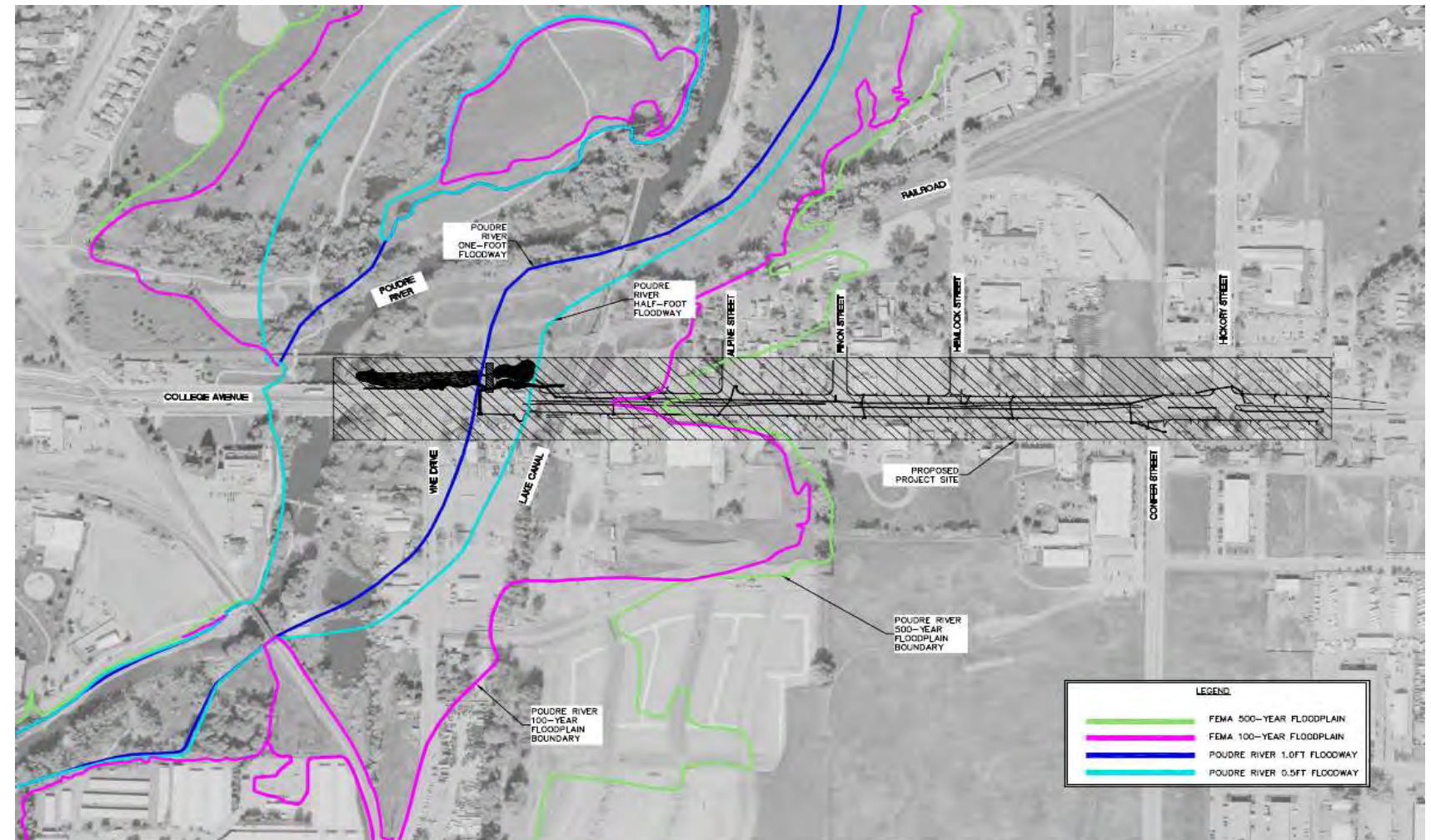


Strong public support was received for the bio-swale option based on the dual purposes of achieving water quality and creating a unique visual landscape treatment for the corridor; however, upon further evaluation, the project team determined that storm water flows cannot be fully controlled within the street and bioswales. Therefore, an underground system is also required to collect flows. **Due to significant maintenance requirements, relatively inefficient storm water conveyance for bio-swales, and the additional cost of implementing bioswales with water quality ponds, the TAC selected the traditional storm sewer system and water quality pond option as the preferred storm drainage option.**

*Floodway Options Considered*

As depicted in Figure 3-8, the southern end of the project lies within the Poudre River 500-year and 100-year floodplain and 1-foot and ½-foot floodway. While construction can occur within the floodplains as long as floodplain development criteria are met, construction within the floodways is much more complex. The floodway refers to the channel of a river or other watercourse and the adjacent land areas that must be reserved in order to discharge the base flood without cumulatively increasing the water surface elevation more than a designated height. The Poudre River 1-foot and ½-foot floodway are “no-rise” areas regulated by the City of Fort Collins Floodplain Administrator. If construction within the designated floodway causes a rise in elevation, a Conditional Letter of Map Revision/Letter of Map Revision (CLOMR/LOMR) process is required to evaluate the effect of the construction on flood hazards and to create a design that protects public health, safety, and welfare. This project will design proposed improvements to avoid causing a rise in elevation within the floodway.

The portion of the project within the floodway generally extends from the Poudre River to approximately 100'-150' south of the Lake Canal crossing. Within this area, North College Avenue already includes enough pavement width for two through lanes in each direction, a center left-turn lane, and bike lanes. In addition, a raised median, curb and gutter, and sidewalk exist along the east of edge of North College. The planned cross-sectional elements that are missing within the floodway include approximately 200' of curb and gutter and sidewalk on the west edge of North College Avenue. Of these elements, providing some type of pedestrian connection through the area is most important.



**Figure 3-8 Floodplain and Floodway Limits**

Three options were considered for improvements within the floodway area:

- No-build Option – Leave the section between Vine Drive and Lake Canal as-is. Missing functional elements include curb and gutter and pedestrian facilities on the west side.
- Off-street Pedestrian Path – Construct an off-street pedestrian path (paved or unpaved) that is at or below existing grade. Missing functional elements include curb and gutter on the west side. Challenges include vertical transitions to match existing pedestrian facilities, especially to the south. Opportunities include developing a gateway to the North College Corridor and a connection to the Poudre River.
- Cross-slope Adjustment – Adjust the cross-slope of the southbound lanes from the median to the edge of pavement to allow for the addition of curb and gutter at or below existing grade. A transition from approximately 2.5% cross-slope at the Lake Canal crossing to 3%± is required to meet grade requirements. An attached or detached walk could be implemented at or below existing grades (likely detached). Challenges include transitions for roadway and pedestrian facilities and costs for reconstruction of the roadway template caused by changing the cross-slope. Advantages include a unified look for the corridor cross-section. A gateway could be created with this option as well.

**Based on cost, pedestrian connectivity, and character/gateway opportunities, the off-street pedestrian path with a gateway entrance was preferred by the TAC.**



#### *Hickory/Conifer Options Considered*

The City has obtained Hazard Elimination and Safety (HES) funding to mitigate accidents occurring between the intersections, especially in the shared left-turn lane between the intersections. Initially, traffic operations for a baseline condition and eight options that address the safety concerns to varying degrees were evaluated in the Traffic Study. The following options were considered:

- Baseline: Utilize protective/permissive signal timing for left-turns from North College Avenue onto Conifer Street and Hickory Street
- Option 1: Leave left turns from North College Avenue onto Conifer Street and Hickory Street as is with permitted only phasing
- Option 2: Realign Conifer Street to align with Hickory Street. Add a northbound right-turn deceleration lane and an eastbound right-turn acceleration lane to optimize intersection performance. (Note: realigning Hickory Street to align with Conifer Street was investigated and eliminated based on railroad impacts, property impacts, and associated cost.)
- Option 3: Develop side-by-side left turns on North College Avenue to allow for adequate left-turn auxiliary lane and taper lengths.
- Option 4: Restrict left turns from North College Avenue onto Conifer Street but allow turns from Conifer Street onto North College Avenue.
- Option 5: Restrict left turns from North College Avenue onto Conifer Street and maintain a continuous green for southbound through movements, but allow left turns out from Conifer Street.
- Option 6: Create a roundabout with North College Avenue, Conifer Street, and Hickory Street.
- Option 7: Convert Hickory Street to a  $\frac{3}{4}$  movement restricting left turns onto North College Avenue and removing the signal.
- Option 8: Remove the signal at Hickory Street but retain all movements. Install a northbound acceleration lane on North College Avenue.

Option 1, Option 5, and Option 8 were eliminated based on traffic operations and potential safety effects after TAC review and discussion. Details of the operational analyses can be found in the Traffic Study in Technical Appendix C. The remaining five options were carried forward to the public for feedback at Open House Number Two and are illustrated in Figure 3-11 on the following page. Three options were presented to the public as short-term options and two options were presented as long-term options, based on cost.

Public feedback indicated a strong preference for the Side by Side NB/SB Left Turns and the Realignment Option. The main concerns voiced by the public about the other options were reduced access in the  $\frac{3}{4}$  movement alternatives and accommodation of truck traffic for the roundabout option. Many people supported pursuing the side by side left turn option over realignment based on cost. Following the Open House, the TAC reviewed traffic operations, potential safety effects, public feedback, property impacts, and costs for each of the five options. **The TAC identified the Side by Side Left Turn Option as the preferred short-term option and the Realignment Option as the preferred long-term option.**



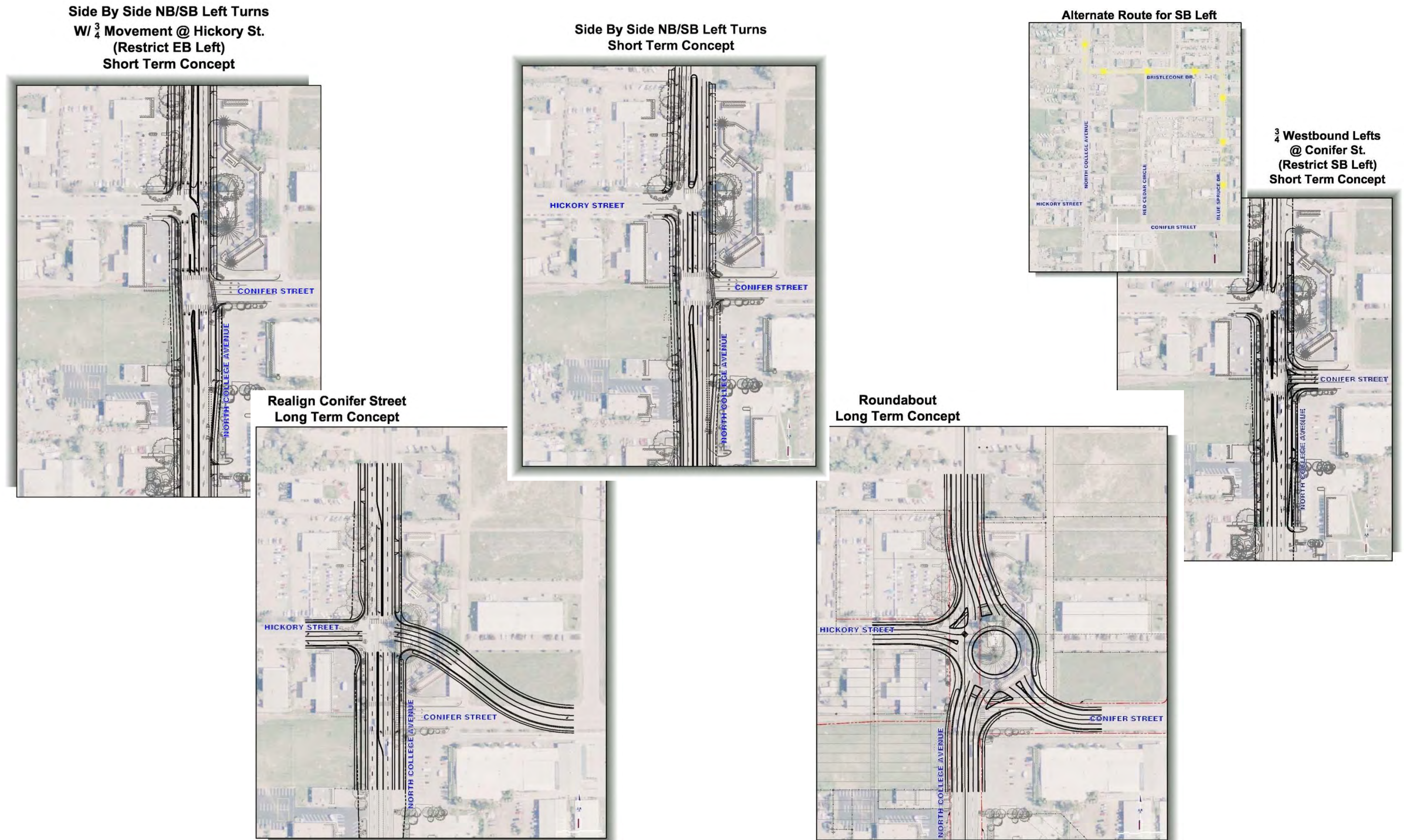


Figure 3-9: Hickory Conifer Concepts



#### 4.0 Design Elements for Conceptual Design

This section presents details of the Conceptual Design for the North College Improvements Project: Phase II. The Conceptual Design has been developed with considerable participation from the TAC, the City of Fort Collins Staff, local government representatives, CDOT, the NFCBA, and the public. After evaluating alternatives, the Conceptual Design defines preferred cross-sectional elements, bicycle/pedestrian accessibility, vehicular access conditions, transit accommodation, corridor character and theme, streetscape elements, gateway opportunities, improvements consistent with floodway requirements, storm drainage and water quality improvements, Lake Canal crossings, utility considerations, Conifer/Hickory intersection improvements, and compatibility with other area improvements.

The Conceptual Design defines baseline conditions and establishes a foundation for project improvements. Continuing design efforts will consider unique circumstances and will adapt the project elements to fit specific conditions by selecting distinct urban design treatments customized for each location circumstance or condition. The next phase of design will provide specific details for the streetscape design elements, tie-ins with existing conditions, and will establish the character of the corridor. Interim conditions will be necessary based on existing property and business uses, timing of off-highway improvements, and funding limitations. The Conceptual Design described below provides a comprehensive plan to implement over time as conditions allow and funding becomes available. Refer to the Conceptual Design Plans in Section 10 for more details.

#### 4.1 Roadway Cross-section

##### Roadway

Based on public comment and TAC input, the Intermediate Option was modified to create the Conceptual Design cross-section. Median width was reduced to create shorter pedestrian crossing distances, to improve sight lines for left-turning vehicles, and to accommodate additional space for bicycle accessibility without expanding the proposed ROW. The cross-section is illustrated in Figure 4-1.

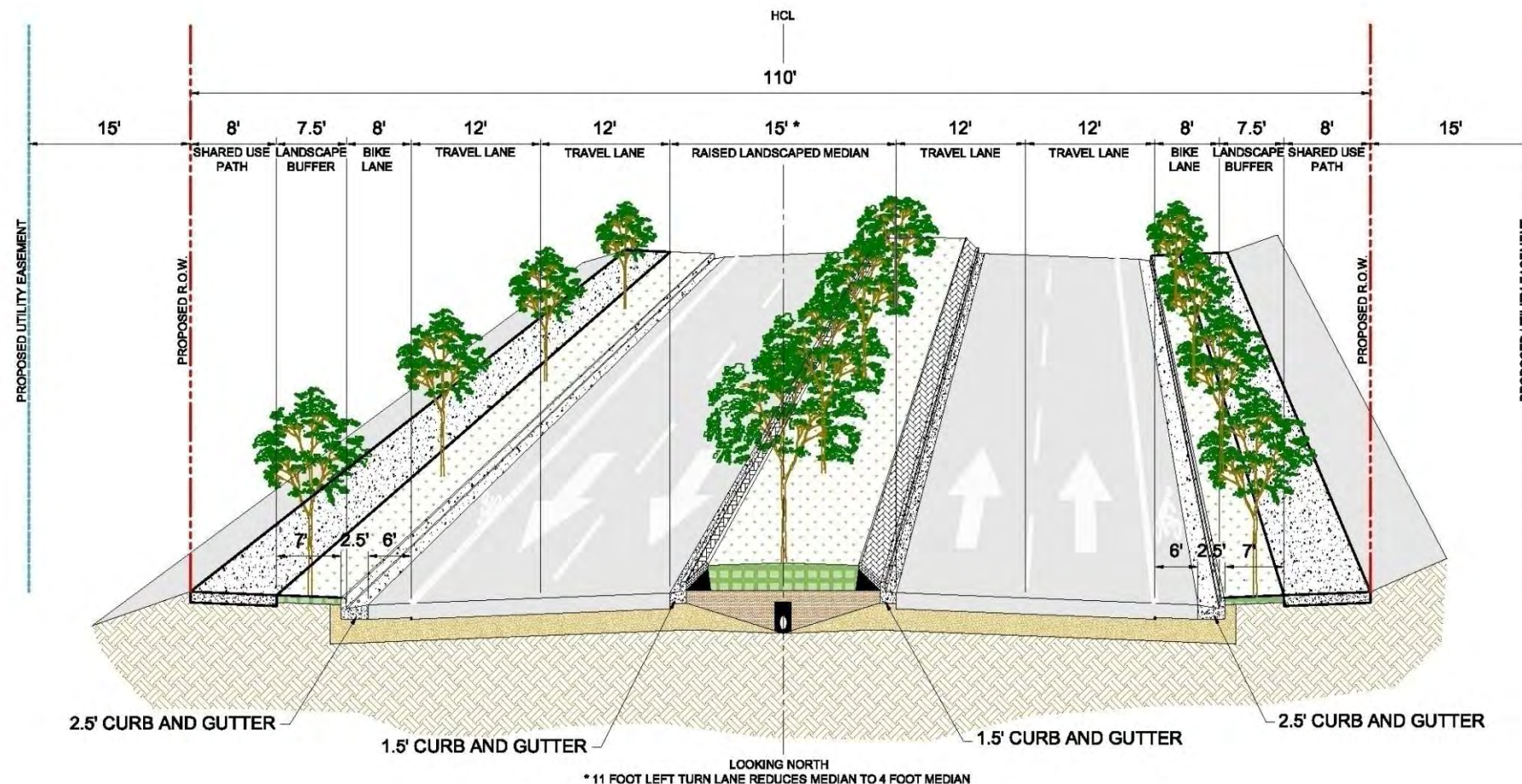


Figure 4-1: Conceptual Design Section

### *Pedestrian/Bicycle*

The bicycle/pedestrian option evaluation identified the desire for an on-street bike lane and a shared use path to provide options for both commuter and recreational cyclists. Based on the City's standards and in consideration of the number of large trucks that travel the North College Corridor, an 8' wide on-street bike lane is included in the Conceptual Design Section. In addition, an 8' wide shared use path comfortably accommodates a wheelchair and pedestrian side by side or a cyclist and pedestrian side by side. The shared use path provides an alternative for those cyclists that may be uncomfortable riding directly adjacent to traffic.

### *ROW*

The Conceptual Design cross-section requires 110' of ROW to the back of the shared use path. The ROW will be centered on the North College centerline. Additional ROW will be required to accommodate auxiliary lanes at intersections, including the side-by-side left turns between the Conifer and Hickory intersections. Minor modifications to the section at pinch points have been identified in the conceptual design to preserve existing buildings. Other modifications may be identified during preliminary and final design to address small areas between the proposed shared use path and building faces, potential environmental mitigation, business circulation issues, or other unknown circumstances. For properties where the cross-section is reduced for existing conditions, property owners will be required to construct the Conceptual Design cross-section upon redevelopment.

A 15' utility easement is shown in the cross-section on both sides of the proposed ROW. The North College Phase 2 project will not acquire a 15' utility easement for the length of the project; however, property owners may be required to provide this easement upon redevelopment, as determined through the City's development process. The project expects to acquire some permanent easements for utilities at specific locations to be determined during preliminary and final design. Obtaining construction easements from most properties is also anticipated.

Figure 4-2 on the following page depicts the Conceptual Design in plan view for the North College Phase 2 corridor. For more detail, refer to the Conceptual Design Plans at the end of the report.

## **4.2 Access**

The Conceptual Design implements the Short-Term Access Plan from the US 287/SH 14 Access Management Report, which generally includes consolidation of access points to one access per ownership with shared access at property lines, wherever feasible. With the addition of curb and gutter throughout the project, business access points will be defined as concrete driveways to provide a more continuous pedestrian route behind the driveways. City Street access will be constructed as curb cuts. Interim conditions for a few driveways are necessary based on existing business operations. Where this is the case, property owners will be required to construct access improvements consistent with either the short-term or long-term access plan upon redevelopment, as determined through the City's Development Review process.

The conceptual design also plans for eventual implementation of the Long-Term Access Plan from the US 287/SH 13 Access Management Report with the inclusion of a raised, landscaped median on North College Avenue. The Long-Term Access Plan also identifies several alternate routes to address access restrictions for businesses created by the new medians. The Conceptual Design expanded upon these City street routes by identifying several "alley" type access routes directly behind North College properties south of proposed Realigned Vine Drive based on feedback from adjacent property owners. While not required, the "alley" type routes are intended to facilitate construction of the landscaped median by mitigating access restrictions on local facilities; however existing funding sources do not apply to improvements off of the mainline. "Alley" routes can be implemented with redevelopment or local funding sources. The City is currently investigating options for funding the "alley" type routes.

During the public involvement process, a strong desire for additional parking in the area was expressed by local businesses. Although conditions on North College Avenue cannot accommodate on-street parking, the Conceptual Design identifies several locations where on-street parking could be provided, in the future, on adjacent local streets with minimal impact and cost. Similar to the alternate routes discussed above, existing funding sources do not apply to local street on-street parking improvements. These improvements will be deferred until funding becomes available or redevelopment occurs.

## **4.3 Transit**

The North College Corridor is designated as an Enhanced Travel Corridor between Cherry Street and Realigned Vine Drive. Enhanced Travel Corridors are planned to provide primary, multi-modal transportation facilities including high frequency transit. In the future, Transfort expects to modify the transit route, in the area, to provide northbound and southbound transit service along North College Avenue south of Conifer Street. The locations of the existing southbound stops are expected to be maintained. Corresponding northbound stops are planned at Vine Drive, Alpine Street, and Conifer Street. Refer to Figure 2-3 for existing and potential future transit stop locations.

Existing transit stops will be included in the design and future transit stops will be planned for in the North College Improvements Project: Phase II. Due to right-of-way constraints and Transfort preferences, bus pull-outs are not planned. Similar to other areas in the City, buses will use portions of the bike lane and through lane at transit stops. Design elements at transit stops are described in Section 4.4.





Figure 4-2: North College Improvements Conceptual Design



#### 4.4 Corridor Character, Theme & Streetscape Enhancements

A combination of an Outdoors/Natural theme with the addition of Artistic elements will be developed to establish the identity of the North College Corridor. Streetscape elements will define the edge of the roadway and establish the urban design framework. The scale of the elements, such as lighting, planting, and pedestrian spaces and the continuation of these elements throughout the entire project length are important in emphasizing the design intent. The Conceptual Design, illustrated in the renderings in Figure 4-3, provides a foundation for developing the details that will create the North College area identity. Design elements, which will be customized to suit the area, will be detailed during the next phase of design. These elements are described below.

##### **Streetscape Enhancements**

*Changes in hardscape materials* are envisioned to indicate changes in use, such as highlighting curb lines, calling out crossing areas, and emphasizing pedestrian areas. The changes in materials accent the urban design improvements and create patterns and definition to break up the experience of the corridor. Hardscape materials for sidewalks, seating areas, raised medians and crosswalks will consist of any combination of the following materials: brick, concrete unit pavers, stone pavers, and/or concrete with additives such as sandblasted texture, unique scoring patterns, and color. There is also the opportunity to put a color additive into the asphalt or use concrete for the bike lane to further differentiate between the automobile and cyclists.

*Street furnishings* provide detail, interest, and site comfort in human-scaled public spaces. Specific to the North College corridor might be benches, trash receptacles, bike racks, and planter pots in order to create quiet, comfortable seating zones. Signage and banners also add to the general character of the streetscape and received positive feedback from the NFCBA.

*Transit stops* that are conveniently located and comfortable invite people to utilize public transportation as an alternative to the automobile. At a minimum, transit stops will be designed to accommodate all user groups with safe access for bus loading and unloading, well-marked and visible stops, and pedestrian amenities such as benches, shelters, and clearly defined signage.

*Street lighting* is another key element to the urban design of the streetscape. Both street level lighting and pedestrian-scaled lighting are important to the establishment of the streetscape character, but mainly as a means to provide safety and security to the various user groups.

##### **Plant Materials**

Vegetation used in the streetscape provides form, creates a sense of scale to the street, defines a meaningful pattern, creates borders and defines space, and communicates to the drivers and pedestrians on how they should behave. Vegetation is used in a hierarchal way so that some areas of the streetscape rank in more importance over other, such as the gateway and major intersections. Continued coordination during design with the NFCBA to define the scale and type of proposed vegetation is necessary.

A palette of native, drought-tolerant, and seasonally interesting plants is envisioned for the North College Corridor. Low maintenance and ease in plant establishment are also important selection criteria. Plants provide texture, visual interest, and appeal to the senses.

*Street trees* not only provide shade to pedestrian spaces but also visually draw the eye down to a human-scaled perspective. Also important on North College is the ability for street trees to add vertical definition to the corridor. A street tree palette that achieves the above mentioned goals and compliments the commercial uses of the corridor is of great importance. Trees and landscape strips create a buffer between the pedestrian and automobile traffic and establish a sense of security and separation.







Figure 4-3: Project Corridor Enhancements



*Ornamental tree varieties* can provide seasonal interest through flowering, vibrant leaf colors, and interesting bark patterns in smaller spaces, such as median plantings, accented corner treatments, and as a gateway statement

*Shrub plantings* are the next layer of plant interest providing depth to the planting scheme. Shrubs can be used to add color, texture and seasonal interest, disguise negative views in the foreground, and purposefully impede movement in certain areas.

A layer of *groundcovers* completes the composition of the planting scheme by providing texture and visual interest to the ground plane. Hardy plants with low maintenance requirements are well-suited for this application.

### **Gateway**

A gateway entry to the corridor is proposed within the overlapping portion of North College and the Poudre River floodway on the west side of North College Avenue between the Poudre River and Lake Canal causing the need for special landscape treatments. The gateway will act as a pedestrian connection between the new North College improvements and Downtown Fort Collins. The streetscape element will include pedestrian amenities such as furnishings, lighting, and street trees. An existing bus stop will be maintained and incorporated into the design of the gateway. Water quality ponds will be located on the more expansive tract of City-owned land behind the pedestrian path. Planting design will be incorporated to hide negative views, frame positive views, and soften the visual engineered quality of the ponds.

Due to the location within the floodway and the associated requirements to avoid a rise in the elevation of this area, special requirements for the site design will need to include elements that do not impede the flow of water. All plant masses must be transparent enough in nature to allow water to continue to flow without adverse effect to the water surface elevation within the floodway. In addition, the quantity and quality of the plants must be designed such that the Manning's "n" roughness coefficient is not changed in this area.

In addition, all items that may be susceptible to being carried away during a storm event, such as street furnishings, must be anchored. All items and plant materials will be reviewed with the Floodplain Administrator during the next phase of design to ensure compatibility with floodway requirements. Refer to Section 4.4 for additional details about the Floodway.

### **Art in Public Places**

The Art in Public Places program set in place through the City of Fort Collins ensures that money specifically dedicated to the artistic enhancement of this project is set aside. Public art has the ability to augment the visual qualities of the project. The gateway area provides a fitting space for an artist to collaborate with the design team with the addition of a public art installation. Similar to other elements in the gateway, floodway requirements will need to be considered in developing any public art piece for this location.

### **4.5 Floodway**

The area within the floodway will include a water quality pond, pedestrian improvements, and associated gateway features. The pedestrian trail and water quality pond were designed to a preliminary level to confirm that grading these elements at or below existing ground, in accordance with requirements identified by the City of Fort Collins Floodplain Administrator, resulted in a reasonable design that is feasible to implement. In addition, the associated gateway structures or other floatable items will be anchored down to prevent floatation during a large storm event. Improvements are not proposed along current effective Federal Emergency Management Agency (FEMA) cross-sections for the Poudre River and a hydraulic model update will not be required from FEMA. Figure 4-4 on the following page illustrates the proposed improvements within the floodway.





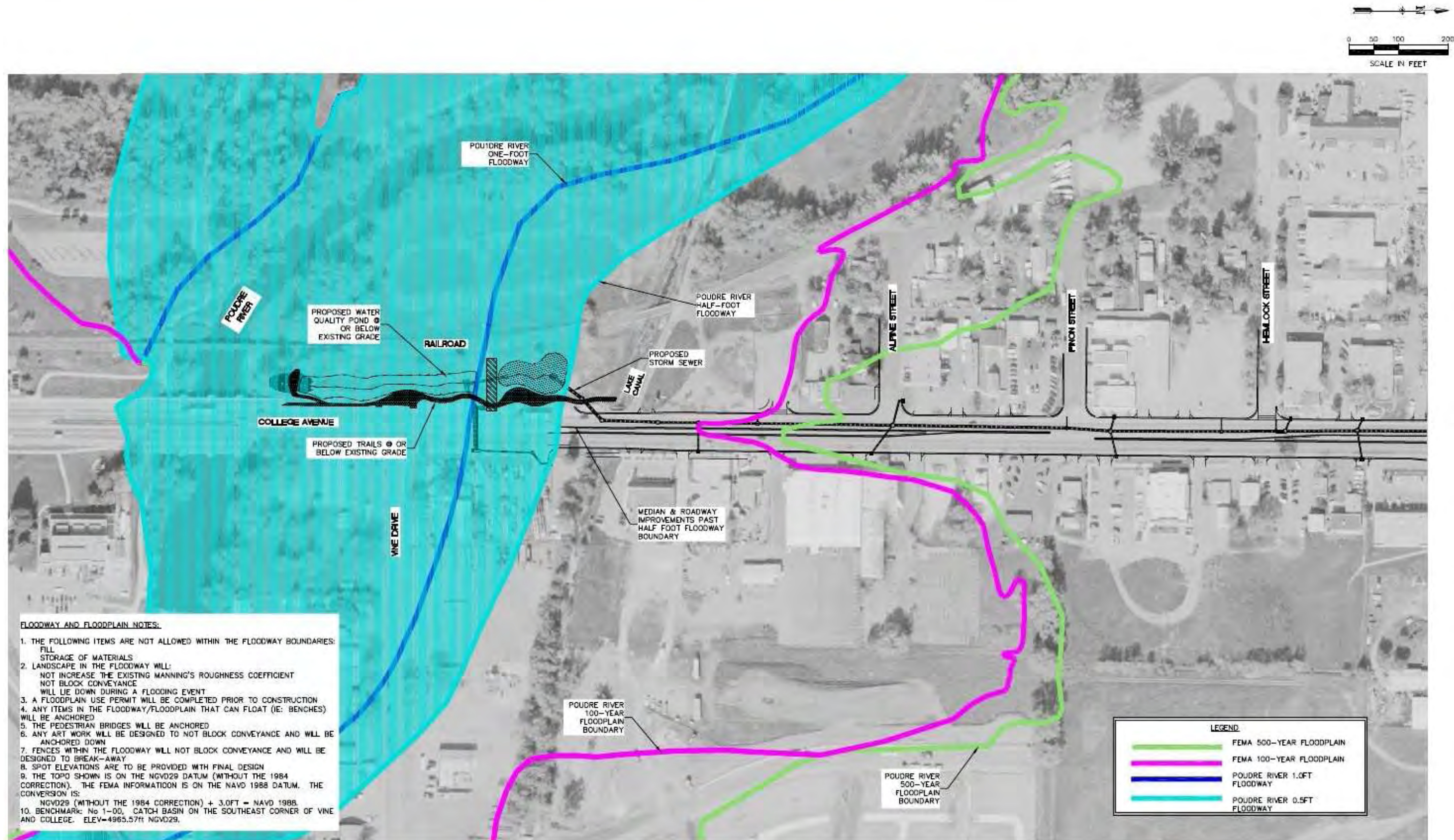


Figure 4-4: Improvements within the Floodway



The water quality pond will be separated into two ponds to develop the required volume and to maintain the existing access that crosses the UPRR. The ponds will be located completely within the boundaries of the Poudre River 0.5 foot floodway and 1.0 foot floodway, respectively, to avoid changing the floodway boundaries. The water surface elevation of the water quality pond will be below the existing ground surface. The outlet to the water quality pond will outlet into the Poudre River. Buried riprap is proposed at the end of the outlet in the Poudre River. The riprap will be buried and the fill above the riprap will not extend above existing ground.

During final design, effects of installing the water quality pond, pedestrian improvements, and vegetation planned in the floodway will be analyzed in detail for “no-rise” certification. Vegetation and plantings will be added to the area in such a way as to not impede Poudre River flows, increase the base flood elevation, or increase the existing conditions Manning’s “n” roughness coefficient.

Two pedestrian bridges are proposed over the Lake Canal. These bridges will be anchored. In addition, any benches, street furnishings, or other floatable items added to the area will be anchored down for security during a storm event. If art is to be placed within the floodway, it will be designed in such a way as to not obstruct flows and will also be anchored. If fences are added to prevent people from entering the water quality pond, they will be designed as break-away fences and will not block conveyance of flood water.

A floodplain use permit and a “no-rise” certification must be completed prior to construction of any kind in the floodway and floodplain. Refer to Technical Appendix I for additional details regarding the design within the floodplain and floodway.

#### 4.6 Drainage & Water Quality

A traditional storm sewer system is proposed to collect project stormwater flows. The design includes a main trunk line on the west side of North College Avenue with laterals connecting inlets from the east and west side of North College Avenue. In addition, the existing storm sewer to the north of Hickory will be tied into the new trunk line and inlets will be upgraded and added where needed. The inlets and storm sewer are sized to convey the 10-year event. Once constructed, the system will meet City of Fort Collins and CDOT storm drainage criteria for encroachment and depth of flow for both the 10-year and 100-year events.

Storm flows will be treated in a water quality pond before discharge into the Poudre River. Water quality ponds will be located between the Lake Canal and the Poudre River on parcels currently owned by the City of Fort Collins Storm Water Department. The Storm Water Department has approved use of this property for the purposes of water quality treatment. In addition, the ponds will be incorporated into the proposed gateway as described in Section 4.3. The water quality ponds will be designed to have a 40-hr drain time in order to meet CDOT’s MS4 permit requirements of 80% Total Suspended Solids (TSS) removal. Refer to Technical Appendix I and the Conceptual Design Plans at the end of this report for additional details regarding the stormwater and water quality design.

#### 4.7 Lake Canal

A single span concrete slab bridge structure currently crosses Lake Canal (CDOT Structure B-16-AD). The roadway is 74’ wide across the bridge and currently accommodates two through lanes in each direction, 6.5’ shoulders and a 13’ two way left-turn lane. A 2’ raised concrete maintenance strip with bridge rail exists on each side. Pedestrian and bicycle traffic is not accommodated over the bridge currently. Slight modifications to the conceptual design cross-section over the bridge are proposed to accommodate two through lanes in each direction, a 6’ bicycle lane in each direction, and a 13’ raised median, without modifying the bridge structure. Transitions to the Conceptual Design cross-section will occur just north of the bridge. Pedestrian bridges on both sides of the Lake Canal bridge are proposed to provide safe pedestrian crossings, as well as to enhance the gateway to the North College District. These bridges are compatible with the vision originally identified in the North College Corridor Plan and will offer opportunities to highlight the Outdoors/Natural character of the corridor. Continued coordination will be required with the Lake Canal Reservoir Company through preliminary and final design. Critical coordination items specifically include pedestrian bridges and the siphon required for the storm drainage system.





#### 4.8 Utilities

The intent of the Conceptual Design is to accommodate utilities within the proposed ROW, wherever possible. The proposed storm sewer system is located within the street to allow utilities to utilize the area behind the curb for necessary facilities. Below grade vaults will be located within the landscape buffer wherever possible. During preliminary design, opportunities to place above ground vaults within the landscape buffer will be explored. If this option is not feasible, utility easements directly behind the shared use path will be required at some locations.

A number of existing utilities are located within the project corridor. The project team worked with existing utility owners to begin identifying existing facilities and potential conflicts with the proposed storm sewer design. Table 4-1 provides a preliminary list of utilities within the project corridor. A summary of project issues and an approach for each utility follows. During preliminary design it will be necessary to pothole the existing utilities to verify location and depth.

##### *Lighting*

Existing street lights will be impacted by the proposed roadway improvements. Removal and replacement of street lights throughout the project corridor will be necessary. Street lights will be located along the edges of the roadway on both sides and at intersections. City Light and Power will be responsible for design and maintenance of the street lights. Continued coordination through preliminary and final design with the City's Light and Power Department is necessary for street light design.

In addition, the Conceptual Design includes pedestrian lighting for the project corridor. Types of pedestrian lights compatible with City maintenance practices will be determined during preliminary and final design.

##### *Water & Wastewater*

The Greeley Waterline Enhancement Transmission (GWET) project and East Larimer County (ELCO's) Northeast Water Transmission (NEWT) project include the addition of large water mains at the intersection of Pinon and College. The City is also currently developing a project that will result in abandonment of the sanitary sewer that crosses North College near the Lake Canal. In addition, ELCO has an existing 24-inch water line on the south side of Conifer that would be difficult to lower. The project will work to coordinate with these projects and avoid conflicts with existing and proposed water and sanitary sewer lines, wherever possible. Some waterline lowerings are anticipated for implementation of the storm sewer system. Service lines will be replaced, as needed.

##### *Electric & Gas*

The project will work to avoid conflicts with electric and gas lines within the project corridor, wherever possible. Some minor lowerings may be required. Service connections will be replaced, as needed. City Light and Power has previously undergrounded their facilities along North College on the east side. A portion of their facilities on the west side, between Hemlock and Hickory, are overhead. Light and Power is considering undergrounding these facilities in conjunction with the project. Continued coordination with the project and other utilities potentially interested in sharing facilities, including Comcast, will occur during preliminary and final design.

##### *Telephone & Cable*

A large Qwest duct bank that would be difficult to relocate runs north-south along the west side of North College Avenue. The project will avoid conflicts with the duct bank and will try to avoid conflicts with other cable and fiber optic lines, wherever possible. Service connections will be replaced, as needed.

Utility	Owner
Light & Power	City of Fort Collins
Storm Water	City of Fort Collins
Water/Wastewater	City of Fort Collins
Water	ELCO Water District
Fiber optic and Cable	Comcast
Gas	Xcel
Communication	Qwest
Water	Greeley
Lake Canal	Lake Canal Co.

**Table 4-1. Existing Utility Owners**

#### 4.9 Hickory/Conifer Intersection

The TAC identified the side-by-side left-turn option as the preferred option for the Hickory/Conifer intersection to address safety concerns created by the existing overlapping left-turn lanes. To control access between Conifer Street and Hickory Street, installation of a 4' raised median between the two intersections is recommended. The existing traffic signals will be impacted to accommodate the ultimate cross-section at the two intersections and, based on their condition, will need to be replaced.

The cost of implementing this intersection improvement, including all the desirable cross-sectional elements and the necessary ROW, is estimated at \$2.0 Million (2009 Dollars). The City has obtained approximately \$385,000 from HES funds for the intersection. The BOB funds cannot be utilized for improvements north of Conifer Street. Based on these funding restrictions, an interim improvement project consistent with the side-by-side left-turn option has been developed. The interim improvement includes minor widening and restriping of the existing pavement to accommodate all proposed vehicle lanes. Installation of the raised median will be deferred until a later phase to provide placement of the median that is compatible with the ultimate roadway section. Signal modifications, as recommended by the CDOT Safety Assessment Report, as well as relocation of the signal pole at the southwest corner of Hickory Street and the pedestal pole at the southeast corner of Conifer Street is included. In addition, improvements at the southeast corner of Conifer Street are recommended. These include the right-turn lane, curb and gutter, and driveway definition for Jax Outdoor Store. With this interim condition, minimal addition ROW is required. We recommend acquiring ROW necessary for the planned interim improvements from affected properties to avoid creating multiple impacts to these properties. The interim improvement is estimated to cost \$500,000 (2009 Dollars) excluding an overlay and approximately \$760,000 (2009 Dollars) with an overlay. Funding from sources other than the HES funds is required to complete the interim improvement.

Ultimately, the TAC recommends realigning Conifer Street with Hickory Street as the preferred long-term condition. While the side-by-side left-turn option improves safety by separating the left turn movements between intersections and operates at an acceptable LOS in 2035, eliminating the offset intersections to create a single intersection offers additional safety improvements that will benefit the system as traffic volumes continue to increase. With limited funding available, the realignment option is not feasible, at this time; however, the side-by-side left-turn option is an effective interim condition that will be viable for many years. The side-by-side left-turn option also offers improvements that are compatible with the future realignment.

#### 4.10 Compatibility with Other Proposed Area Improvements

The City has plans for other improvements in the area including transportation, storm drainage, and utility improvements. Some of the more significant improvements on record are Realigned Vine Drive, the North College Drainage Improvement Design (NCDID) and the Northeast College Corridor Outfall (NECCO) project. These projects were considered as part of the development of the Conceptual Design.

##### *Realigned Vine Drive*

Realigned Vine Drive is a planned east-west arterial connection between I-25 and North College Avenue in the City's Master Street Plan. It is planned to intersect North College Avenue across from Pinon Street and has potential for signalization, if warranted. Utility and drainage plans compatible with the roadway alignment have been completed, including NECCO, GWET, and NEWT. In addition, there is active interest in potential development opportunities adjacent to the proposed Realigned Vine Drive alignment between North College Avenue and Jerome Street. The construction of the roadway is expected to be development driven. Funding limitations and restrictions do not allow this project to construct portions of Realigned Vine Drive. However, the Conceptual Design has planned for the intersection. Access constraints on North College Avenue prior to the construction of Realigned Vine Drive likely preclude construction of curb returns for the ultimate intersection; however, in the interim, improvements that indicate the future condition are desirable. Improvements that are compatible with the future intersection, provide for safe pedestrian travel, and do not encourage motorists to make wrong-way turns at the future intersection will be considered during preliminary and final design.

##### *Major Drainage*

The NCDID is the master plan for handling drainage in the North College area. It identifies storm drainage solutions for each side of North College Avenue maintaining the natural drainage division created by the high center line of North College Avenue. The NECCO project is the final design for the NCDID solution for the east side of North College Avenue and utilizes the Realigned Vine Drive alignment. The outfall for the west side is proposed along the Mason Street Corridor and discharges into the Poudre River. Initially, the North College Corridor Improvements Phase II project investigated the feasibility of implementing recommendations from NCDID and placing the outfall along the North College Corridor rather than the Mason Street Corridor; however, due to funding limitations, it was quickly determined that these improvements could not be incorporated into the project without additional sources of funding. As such, the storm drainage improvements have been designed to accommodate project flows while maintaining compatibility with the NCDID and NECCO projects. The Conceptual Design does not preclude any of the NCDID or NECCO improvements, but reduces the flows that will need to be accommodated by these future outfall systems.



**5.0 Opinion of Probable Cost – Conceptual Design**

A conceptual opinion of probable cost (2009 Dollars) was prepared for the Conceptual Design using unit cost data from the CDOT 2008 Cost Data Manual, recent project bids from similar projects, and input from City of Fort Collins staff. Due to the conceptual nature of the project, several items were quantified as percentage items of the construction bid items. In addition, a 20% contingency was included to plan for miscellaneous items either not specifically quantified or unknown at this time. A breakdown of the conceptual opinion of probable cost for the Conceptual Design is presented in Table 5-1. Due to funding limitations and funding source requirements, this estimate assumes that the roadway pavement will not be reconstructed for the full roadway width. Asphalt paving is assumed for widening outside of the existing composite section and in locations where the storm sewer system is proposed. A full-width asphalt overlay of the entire project length is also included. A more detailed opinion of probable cost for the Conceptual Design, as well as other alternatives and phasing options considered is presented in Technical Appendix F. The total anticipated cost is \$13.25 Million, which is approximately \$7 Million greater than the available funding for the project, at this time. Due to the shortage in funding, several phasing options were considered with an initial phase that meets the current available budget. These options are described in Section 6.1. Also, potential additional funding sources are identified in Section 7.5 to complete the improvements.

<b>Project Element</b>	<b>Cost (2009 Dollars)</b>
Roadway/Bike Lanes/Sidewalk	\$3.3 M
Streetscape/Landscape	\$1.8 M
Gateway	\$0.45 M
Drainage	\$1.85 M
Miscellaneous Construction	\$1.85 M
Right-of-way	\$1.5 M
Design and Administration	\$2.5 M
<b>Total</b>	<b>\$13.25 M</b>

**Table 5-1: Conceptual Opinion of Probable Cost Summary**

## 6.0 Phasing & Prioritization

The total anticipated Conceptual Design cost of \$13.25 Million exceeds available funding of \$6.2 Million by approximately \$7 Million. In order to maximize the benefit of currently available funds by providing some level of improvements to the corridor in the short-term, while striving to implement the full improvements over time, three phasing concepts were developed. These concepts were developed with consideration of funding source requirements, logical construction elements, project element priorities, and input from City Staff, City Council, City Boards and Commissions, CDOT, NFCBA, property owners, and the public. The phasing options considered are described below with an explanation of the preferred phasing conditions identified by the TAC. In addition, a summary of potential future phase elements to implement as funding is obtained is provided.

### 6.1 Phasing Options Considered

Three phasing options were developed and evaluated for the Conceptual Design:

- Option 1 – Improvements from South to North
- Option 2 – Reduced Improvements on Outside Edges
- Option 3 – Improvements by Side

Phase 1 in each option matches the funding currently available based on conceptual opinions of probable cost. Additional phases have been identified based on logical construction limits and manageable costs; however, exact limits and elements of future phases are not limited to the phases shown and will be defined to match actual funding levels and sources as they become available. Detailed conceptual opinions of probable cost for the phasing options can be found in Technical Appendix F. The following pages provide a description of the three phasing options considered.

#### *Option 1 – Improvements from South to North*

Phase 1 includes full improvements starting at Vine Drive and continuing north until funding is exhausted. Conceptual Design efforts indicate that Phase 1 could extend to Pinon Street with this option. The following elements are excluded from Phase 1 based on funding source requirements: raised median, alley connections, local street parking, full pavement reconstruction, and pavement overlay. Pedestrian bridges across Lake Canal, an interim gateway improvement, water quality ponds, streetscape/landscape amenities, and an interim Conifer/Hickory safety improvement, compatible with available HES funds, are included. The interim gateway includes a pedestrian path, irrigation lines, and revegetation. The interim Conifer/Hickory improvements include striping, signal modification, and curb and gutter at the southeast corner. Figure 6-1 illustrates the improvements in cross-section. Figure 6-2 depicts Phasing Option 1 for the entire project graphically and provides associated costs.

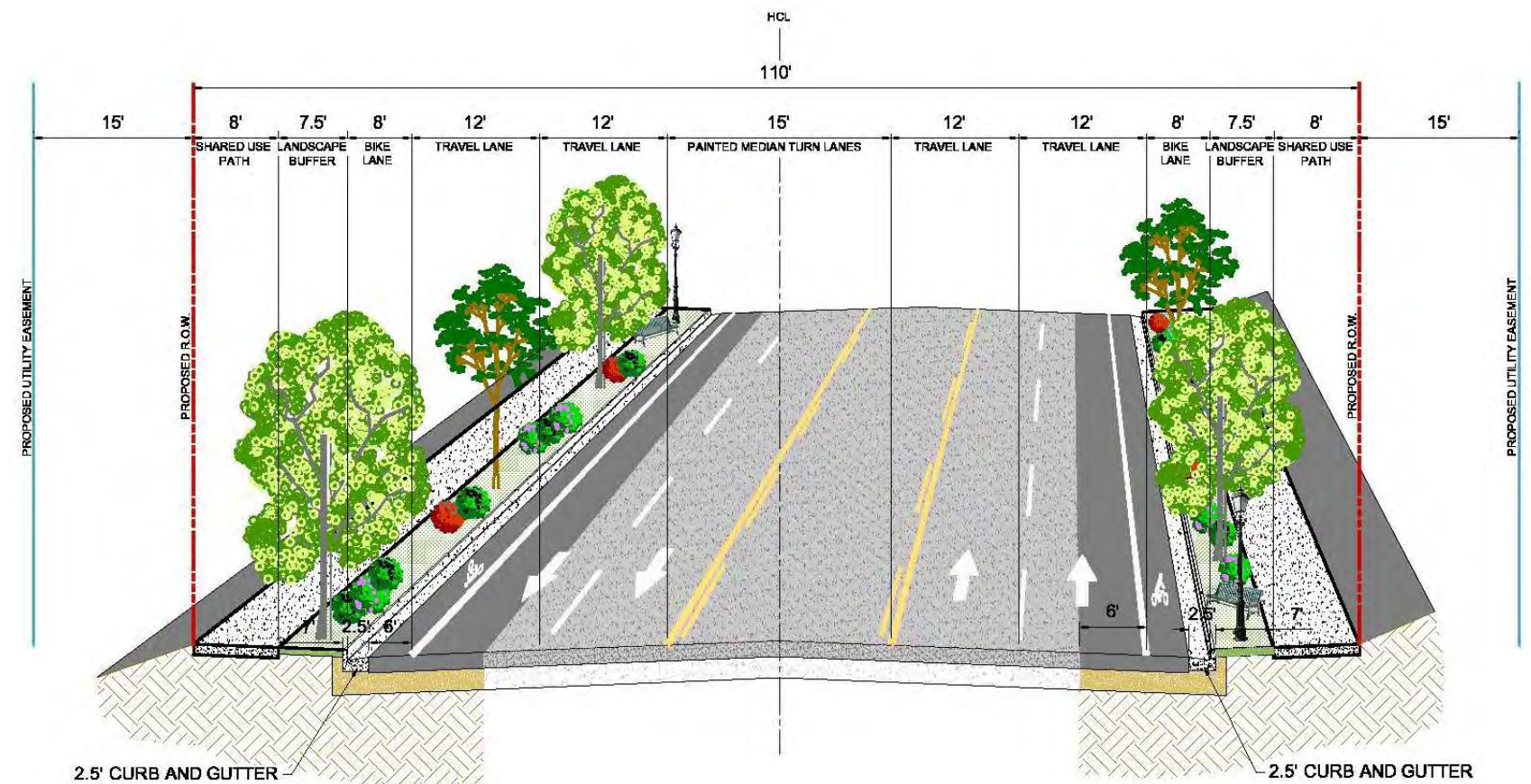
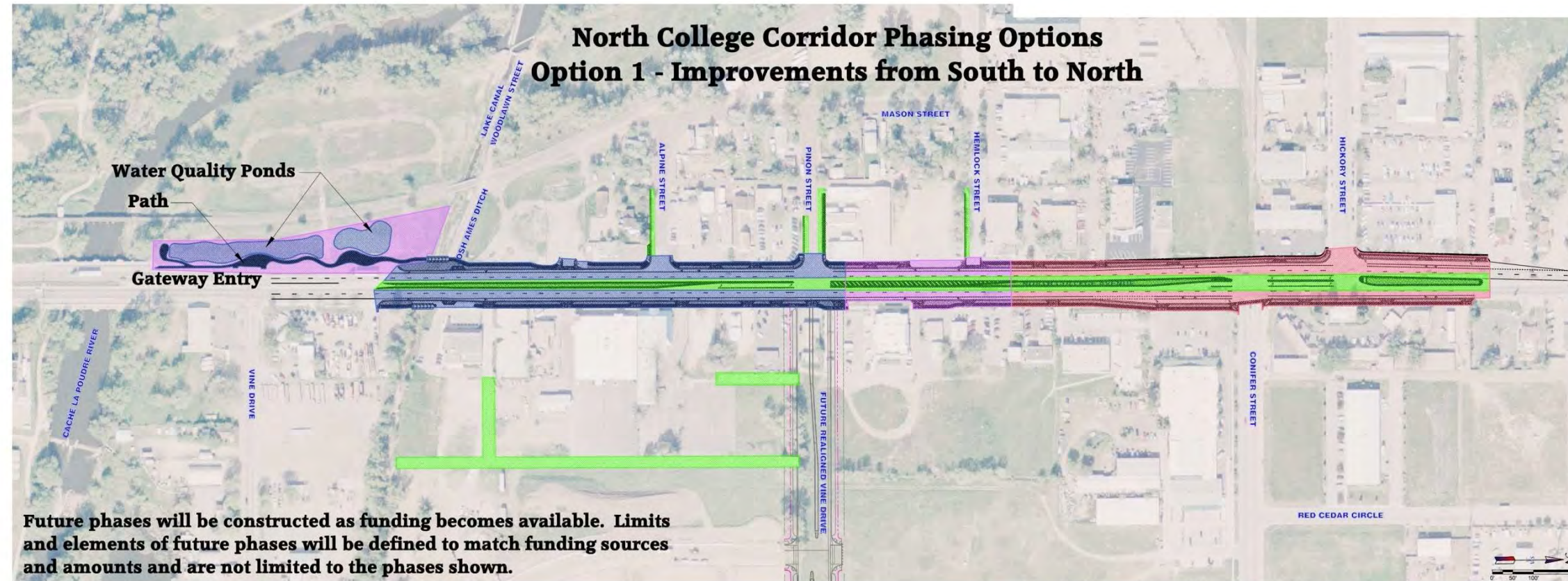


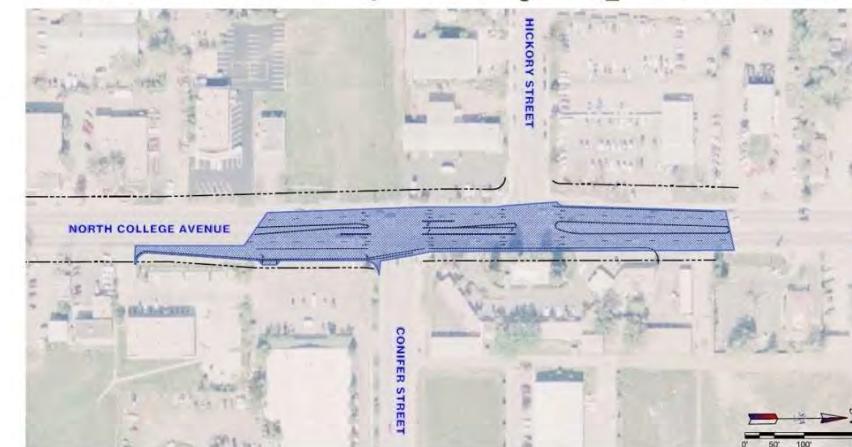
Figure 6-1: Phasing Option 1 Section – Improvements from South to North





- Phase 1 - \$6.2M**  
Improvements from Vine Drive to Pinon Street excluding median and overlay - \$5.4M  
Water quality pond - \$0.15M  
Interim Conifer/Hickory Improvements (Striping, Signal Modifications, Curb & Gutter at southeast corner (Jax)) - \$0.5M  
Interim Gateway Improvements (Path, Irrigation, Revegetation) - \$0.15M
- Phase 2 - \$1.8M**  
Complete Gateway Entry - \$0.3M  
Improvements from Pinon Street to Hemlock Street excluding median & overlay - \$1.5M
- Phase 3 - \$4.25M**  
Improvements from Hemlock Street to Conifer Street excluding median & overlay - \$2.7M  
Complete Conifer/Hickory Improvements - \$1.55M
- Phase 4 - \$1.1M**  
Overlay - \$0.5M  
Median, off-street alley connections, and side street parking - \$0.6M

**Interim Conifer/Hickory Improvements**



**Advantages:**

- Complete all improvements in one area (Bicycle, Pedestrian, Access Consolidation, Landscaping)
- Visual impact of streetscape/landscape
- Minimizes disruption to individual properties
- Provides gateway to North College District

**Disadvantages:**

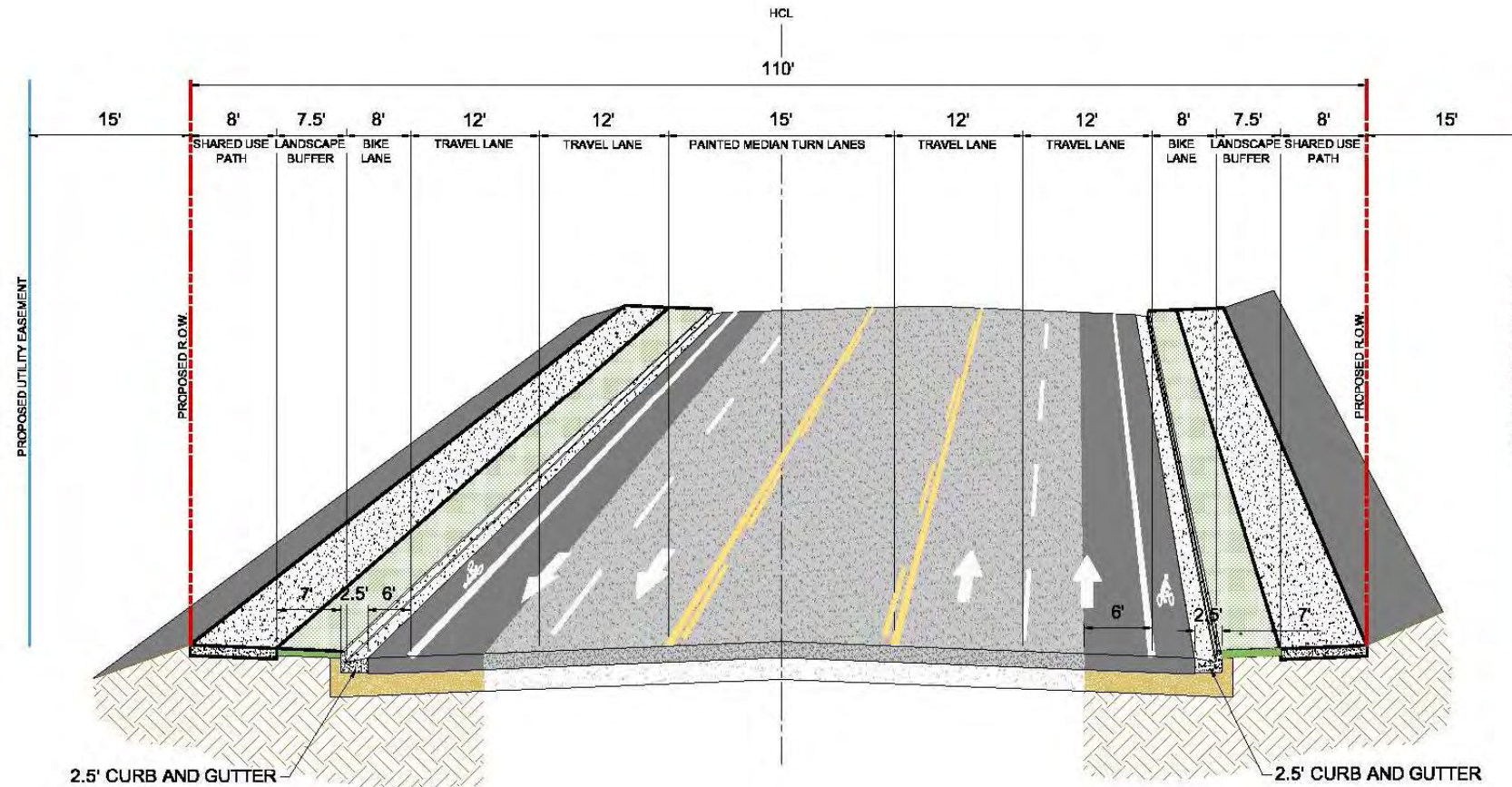
- Length of improvements limited

Figure 6-2: North College Corridor Phasing Option 1



*Option 2 – Reduced Improvements on Outside Edges*

Phase 1 includes reduced improvements along both sides of North College Avenue starting at Vine Drive and continuing north until funding is exhausted. Conceptual Design efforts indicate that Phase 1 could extend to just south of Hemlock Street with this option. In general, reduced improvements refer to safety improvements and associated elements, such as curb and gutter, bike lanes, and shared use paths. Aesthetic elements such as landscape and streetscape amenities are deferred. Storm drainage improvements are necessary in Phase 1 with the addition of curb and gutter. The following elements are excluded from Phase 1: raised median, alley connections, local street parking, full pavement reconstruction, pavement overlay, and landscape/streetscape amenities. Some underground landscape/streetscape elements are included in Phase 1 to minimize reconstruction in later phases and to provide erosion control in the interim. These items include irrigation lines, electrical conduit for pedestrian lights, topsoil, and revegetation (native seeding). Pedestrian bridges across Lake Canal, an interim gateway improvement, water quality ponds, and an interim Conifer/Hickory safety improvement, as described in Option 1, are included. Figure 6-3 illustrates the improvements in cross-section. Figure 6-4 depicts Phasing Option 2 for the entire project graphically and provides associated costs.



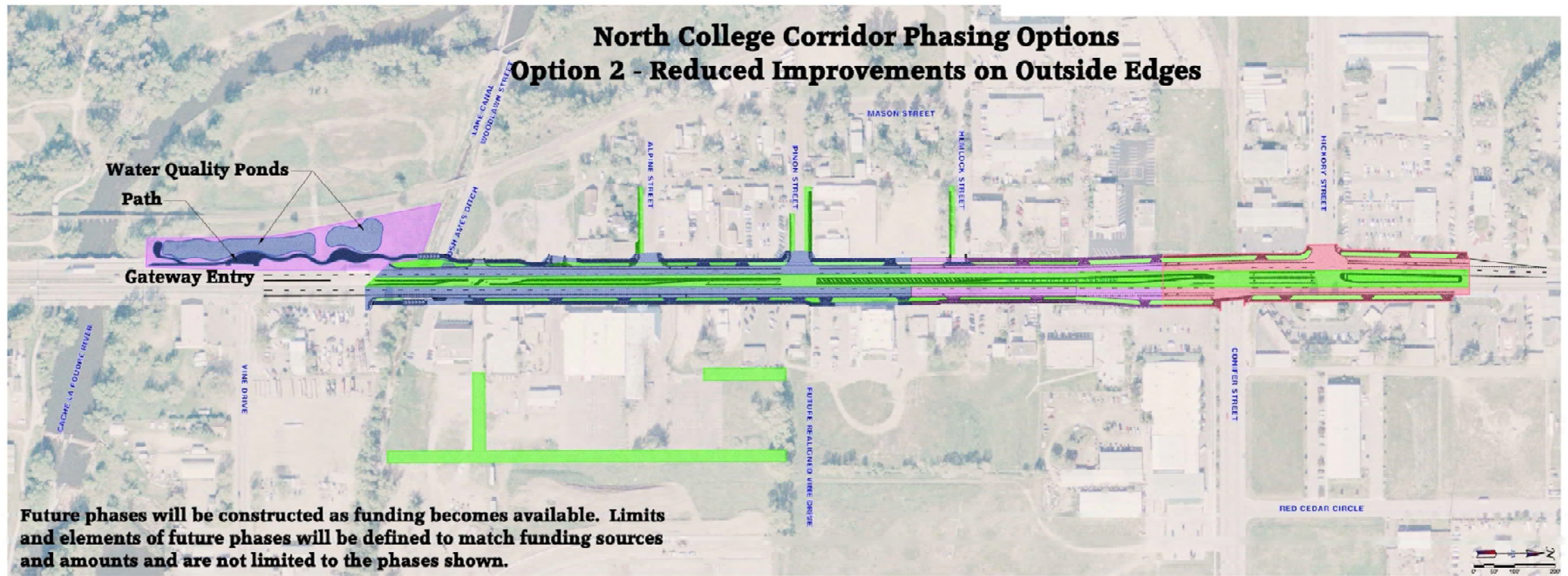
**Figure 6-3: Phasing Option 2 Section – Reduced Improvements on Outside Edges**

*Option 3 – Improvements by Side*

Phase 1 includes full improvements similar to Option 1, but on the west side only, starting at Vine Drive and continuing north until funding is exhausted. Conceptual Design efforts indicate that Phase 1 could extend to just south of Conifer Street with this option. The west side was selected for Phase 1 based on storm drainage construction impacts. Refer to the Option 1 description of Phase 1 elements.

Upon evaluation by the TAC, Option 3 was eliminated. Due to the need for underground improvements, the ability to provide surface improvements is limited. The length of improvements constructed with Option 3 is not significantly longer than Option 2 and only improves one side of North College Avenue, while disrupting both sides during construction. Therefore, Option 3 was not carried forward.



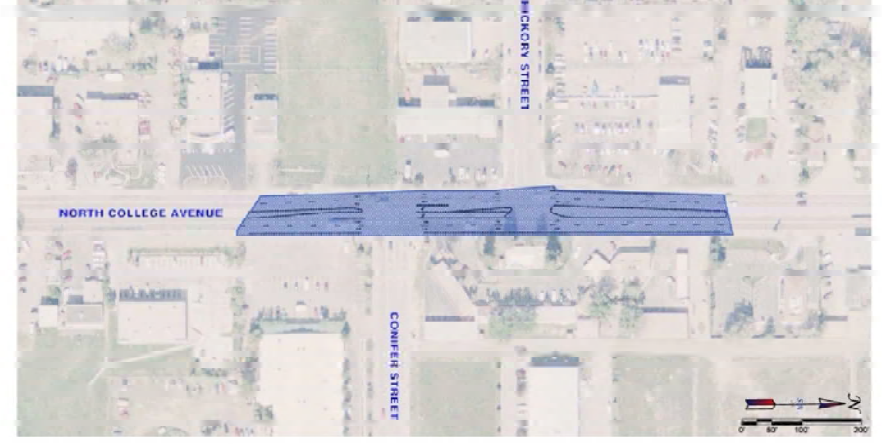


Future phases will be constructed as funding becomes available. Limits and elements of future phases will be defined to match funding sources and amounts and are not limited to the phases shown.

- Phase 1 - \$6.2M**  
Improvements from Vine Drive to south of Hemlock Street excluding median, overlay, and landscaping - \$5.4M  
Water quality pond - \$0.15M  
Interim Conifer/Hickory Improvements (Striping, Signal Modifications) - \$0.5M  
Interim Gateway Improvements (Path, Irrigation, Revegetation) - \$0.15M
- Phase 2 - \$1.8M**  
Complete Gateway Entry - \$0.3M  
Improvements from Phase 1 to Jax driveway excluding median & overlay - \$1.5M
- Phase 3 - \$2.5M**  
Complete Conifer/Hickory Improvements
- Phase 4 - \$2.85M**  
Complete landscaping on edges - \$1.75M  
Overlay - \$0.5M  
Median, off-street alley connections, and side street parking - \$0.6M

- Advantages:**
- Bicycle and pedestrian improvements provided for more length in each direction
  - Largest number of properties experiencing some level of visible improvement

**Interim Conifer/Hickory Improvements**



- Disadvantages:**
- Reduced gateway to North College District
  - No landscaping
  - Completion of vision plan construction requires work in front of many properties more than once



Figure 6-4: North College Corridor Phasing Option 2





### 6.2 Preferred Phasing Approach

Option 1 and Option 2 meet the intent of the project and provide visible improvements to the corridor. After weighing advantages and disadvantages along with public comment, the TAC recommends Phasing Option 1 for the following reasons:

- Minimizes number of disruptions to businesses
- Establishes a gateway to the North College area
- Includes all elements of the BOB ballot language
- Provides complete, visible improvements, demonstrating benefit of extending construction north to the project limit and potentially beyond
- May help stimulate redevelopment interest in the area, which could help pay for future improvements
- Identifying funding sources for landscape/streetscape amenities separately may be challenging
- Supported by the public, Transportation Board, Planning & Zoning Board, NFCBA, and property owners in the North College area.

### 6.3 Detailed Phase 1 Summary and Future Phased Implementation

With Phasing Option 1, full improvements, excluding raised median, pavement rehabilitation, alley access, and parking, are provided on North College Avenue between Vine Drive and Pinon Street using current funding. The following elements are included:

- Curb and gutter
- Minor street patching (widening outside composite section)
- Definition and consolidation of driveways
- Bike lanes
- Shared use path
- Landscape buffer – includes street trees, plantings, irrigation, pedestrian lighting
- Streetscape enhancements – includes street furnishings, corner treatments, transit stop enhancements, signage
- Storm drainage improvements
- Water quality ponds
- Pedestrian bridges across Lake Canal
- Street lighting
- Interim Conifer Hickory improvements – striping, signal modifications, and curb and gutter at southeast corner
- Interim gateway improvements – pedestrian path, irrigation, minimal street trees and revegetation.
- Miscellaneous construction elements – mobilization, construction traffic control, surveying, etc.
- Right-of-Way – for project limits only
- Art in Public Places
- Design & Administration

Project Element	Approximate Cost (M)	Phase 1 Improvements
Vine Drive to Lake Canal	\$1.00	X
Interim Gateway - Phase 1 (path, street trees, irrigation, reveg)	\$0.15	X
Interim Gateway - Phase 2 (completes improvements)	\$0.30	
Lake Canal to Josh Ames Ditch (includes ped bridges)	\$0.95	X
Josh Ames Ditch to Alpine Street	\$1.55	X
Alpine Street to Pinon Street	\$1.50	X
Pinon Street to Hemlock Street	\$1.35	
Hemlock Street to Conifer Street	\$2.70	
Interim Hickory/Conifer Intersection – Phase 1 (widening, striping, signal upgrades, southeast corner)	\$0.50	X
Interim Hickory/Conifer Intersection – Phase 2 (completes improvements)	\$1.55	
Overlay (no median)	\$0.50	
Median and Alleys	\$0.60	
Design and Administration Costs	\$0.55	X
1. Section improvements exclude medians and overlay. 2. 2009 Dollars		

**Table 6-1: Phasing Option 1 Cost Breakdown - Improvements from South to North**

Potential project elements consistent with Phasing Option 1 have been broken into logical segments or logical construction components in Table 6-1. If additional funding is obtained for Phase 1 or for future phases, project elements consistent with funding sources can be constructed to complete the full improvements for the entire corridor. A summary of potential funding sources linked with construction elements necessary to complete the remaining project elements can be found in Section 7.5. Limits and elements of future phases are not limited to the elements shown in the table and will be defined to match funding sources and amounts as they become available. Table elements are representative only.



## 7.0 Next Steps

A primary goal of the North College Improvements Project: Phase II is to initiate construction for the 2011 construction season. The following sections describe recommended steps and timelines for achieving this goal and for ultimate completion of the entire project.

### 7.1 Design

The North College Improvements Project: Phase II Conceptual Design quantifies key elements of the proposed improvements and potential project costs with increased confidence over initial planning estimates; however, the Conceptual Design does not achieve the level of detail necessary to complete permitting and project clearance from oversight agencies. We recommend initiating preliminary engineering, for the entire project, immediately following acceptance of the Conceptual Design Report. Potential for multiple construction bid packages remains high due to funding limitations; however, completing preliminary engineering for the entire project will:

- facilitate pursuit of additional funds by moving the project in the direction of “ready to go”,
- preserve flexibility for construction bid packages tailored to meet available funding at the time of construction,
- advance project clearances from CDOT and others,
- refine opinions of probable construction cost, and
- demonstrate the community’s commitment to the project.

Preliminary engineering is also an excellent opportunity to continue coordination with the TAC, City departments, CDOT, and private utilities on technical issues including: Poudre River floodplain, storm drainage, water quality, lighting, vegetation, adjacent projects, and future planned improvements.

To preserve adequate time to complete clearances and permitting for a 2011 construction project, of any size requiring right-of-way, we recommend completing preliminary engineering with a Field Inspection Review (FIR) in December 2009. At that time, we recommend that the project team continues to pursue completion and approval of Right-of-Way Plans for the entire project and re-evaluates whether completing Final Office Review Plans (FOR) for the entire project is appropriate and beneficial when compared with project funding, clearances, and permitting needs.

### 7.2 ROW Process

Transportation projects receiving federal funds are subject to the Uniform Relocation Assistance and Real Property Acquisition Policies Act of 1970 as amended (Uniform Act). The Uniform Act provides for fair and equitable treatment of property owners and people or businesses that will be displaced by the project. The acquisition itself does not need to be federally funded for the Uniform Act to apply. Current funding for North College Phase 2 improvements includes federal funding. CDOT is responsible for monitoring the project for compliance with the Uniform Act. Based on the Conceptual Design and the ownership maps prepared as part of the effort, partial acquisition of multiple properties is anticipated as part of the project; however, total takes and relocations are not. Refer to Conceptual Design Plans in Section 10 for the ownership maps.

As the design develops, the project team will need to define construction limits and evaluate the project’s effects on individual properties. Defined construction limits will be incorporated into the Right-of-Way Plans and will be used to determine limits of permanent and temporary effects. The same information will be used to evaluate changes in: on-site parking, circulation, building ingress and egress, etc. Understanding site use and property owner plans is essential to effective mitigation of property modifications. Direct coordination between property owners and project designers accompanied by a City real estate specialist is recommended to facilitate amicable transactions; however, the Right-of-Way Plans must be approved prior to initiating Acquisition procedures including appraisals and determinations of “fair market value”.

Right-of-Way Plans cannot be approved prior to conducting a Right-of-Way Plans Review (ROWPR) with CDOT. This review occurs between the FIR and FOR stage of plan development, after final areas of disturbance are determined. Once the Right-of-Way Plans are approved and the appropriate environmental clearance (described in detail in Section 7.3) is obtained, property acquisition may proceed. A typical acquisition process generally takes a minimum of nine months to complete. Since construction of a project in 2011 is critical to success, we recommend completing the ROWPR for the entire project early in 2010 to create flexibility for construction packaging and acquisition that can respond to confirmed funding available and re-evaluation of market conditions as of a date later in 2010.

Before the project can be advertised for construction, the Federal Highway Administration requires a letter certifying that all right-of-way has been acquired and relocation carried out. In this case, the City will provide CDOT with a certification letter and CDOT will issue a clearance letter once all necessary documentation has been received. Approval of the Right-of-Way Plans does not authorize construction. Construction authorization from CDOT requires acquisition of all property required by the project (included in a construction bid package) to be complete through “possession” of the property. In most cases possession will occur by agreement; however, it can also occur by: dedication; donation; settlement; or through an immediate possession hearing, stipulation, or possession and use agreement (through condemnation).

### 7.3 Environmental Considerations and Documentation

Transportation projects must comply with a wide range of federal and state environmental laws, regulations, permits, reviews, notifications, consultations, and other approvals. Under federal law, the National Environmental Policy Act (NEPA) applies to any proposed action or transportation project involving federal funds. Given that North College Avenue, also US 287 and SH 14, is a federal and state facility, both federal and local funding sources will be used to fund improvements (as previously discussed in Section 1.2). One of the key next steps to move the improvements ahead will be the completion of a NEPA decision document. Based on the Environmental Scoping Meeting held with CDOT in April 2009, it was determined that the appropriate class of action for this project would be a Categorical Exclusion (CatEx) since significant environmental impacts are not anticipated.

CDOT Form 128 is required for all CatEx projects and requires two sets of approvals. The first approval requires investigating whether there are environmental areas of concern with regard to the project, and is needed before funds for right-of-way acquisition can be obligated and negotiations for right-of-way acquisition can proceed. Environmental clearances to be completed as part of the CatEx process include:

- **Air quality.** Since this project adds turn lanes at an intersection with a Level of Service (LOS) of D or worse, an air quality hot spot analysis is required.
- **Noise.** Noise impacts are not anticipated, and a memorandum will be prepared documenting the reasons why a noise analysis is not necessary.
- **Hazardous waste (materials).** Every project requires an Initial Site Assessment (ISA), a Modified Phase I Environmental Site Assessment (MESA), or a Phase I Environmental Site Assessment. CDOT is in the process of filling out Form 881 (the ISA) and will determine whether a Phase I Environmental Site Assessment is necessary.
- **Threatened and endangered species.** A memorandum will be prepared to give an overview of the biological resources that are present in the project area including threatened and endangered species, wetlands, migratory birds, prairie dogs, and noxious weeds. Impacts to threatened and endangered species are not anticipated.
- **Wetlands.** A wetland identification will be conducted as part of the overview of biological resources described above. Impacts to wetlands are not anticipated.
- **Archaeology and history/historic bridges.** An Archaeological Survey and Historic Resource Inventory will be conducted including coordination with the State Historic Preservation Office (SHPO) in accordance with Section 106 of the National Historic Preservation Act. These are currently underway by the City.
- **Paleontology.** If the project requires any type of excavation (six inches or greater in ground that is not on fill or will affect substrate that is not fill), a Paleontological Survey is required and will be conducted by CDOT.
- **Section 4(f)/6(f).** Once any Section 4(f)/6(f) properties (historic, parks, or trails) are defined, the potential impacts and “uses” of those properties in relation to the project need to be determined. Impacts to parks and trails are not anticipated, historic impacts will be determined following the completion of the Historic Resource Inventory.

The remaining portions of the CDOT Form 128 provide a list of permits and additional requirements that need to be completed as part of the environmental project certification for the CatEx. The permits and additional requirements needed before project advertisement and obligation of funds include:

- **Clean Water Action Section 404 Permit.** Impacts to streams and related jurisdictional wetlands will require a USACE 404 nationwide permit. An Individual permit is required for projects with larger impacts to wetlands (typically greater than 0.5 acres in size), but is not anticipated on this project.
- **Clean Water Act Section 402 Stormwater Permit.** For ground disturbances greater than one acre in size, a Colorado Department of Public Health and Environment (CDPHE) permit is required. Every construction project within CDOT right of way requires a Storm Water Management Plan (SWMP) in CDOT format. Projects that disturb one acre or greater require a Storm Water Management Plan (SWMP) in CDOT format and a Colorado Discharge Permit System (CDPS) construction storm-water permit from the Water Quality Control Division (WQCD). The project is anticipated to disturb an area greater than one acre in size.
- **Municipal Permit.** For discharge of wastewater generated during construction activities to the local municipal wastewater treatment works, a permit from the local municipality is required.
- **Clean Water Act Section 402 Dewatering Permit.** If groundwater is encountered, a CDPHE dewatering permit may be required.
- **Colorado Division of Wildlife (CDOW) Senate Bill 40 (SB 40).** For impacts to stream banks, stream channels, and riparian areas, SB 40 certification from the CDOW is required. SB 40 certification is anticipated for this project as related to the pedestrian bridges at the Lake Canal.
- **Wetland Finding.** For impacts to jurisdictional and nonjurisdictional wetlands and Waters of the US, a Wetland Finding is required for approval by CDOT and FHWA. Impacts to wetlands are not anticipated.
- **Hazardous Waste (Preliminary Site Investigation [PSI]/Site Investigation [SI]).** If recommended by the ISA or MESA, a PSI or SI subsurface soil and groundwater investigation for potential hazardous materials that present a liability issue during right-of-way acquisition, or require management during construction to protect worker health and safety and the environment, is required. Based on historic land uses in the project area, one or more properties may require a PSI or SI.



**7.4 Pursuit of Additional Funds**

As expected, a gap in funding between committed funds and anticipated project funding requirements is apparent. Project team members met with several agencies and groups with potential to contribute additional funds to the project. These meetings were very promising but did not result in firm commitments. Instead, the meetings resulted in the recommendation that the City submit formal project funding requests described in Table 7-1 below and in development of the Funding Matrix shown in Table 7-2 on the next page. Additional opportunities are expected to develop into logical funding application requests during preliminary design as additional specifics regarding project scope, opinions of probable cost, and project schedule become better defined. To the extent that a funding gap remains following final resolution of funding requests described below, the Funding Matrix provides a reference for future funding pursuits and applicability of funding sources.

Recommended Funding Application	General Information Required	Recommended Submittal Cycle
Tier II DOLA Energy and Mineral Impact Assistance Program	"Ready to Go" Project with start date within 12 months, Energy/Mineral relationship, local commitment, demonstration of need and relationship to community goals, ability to pay, readiness to go/management capacity, measureable outcomes, sustainability and viability of project	Meet with DOLA September 2009 to review project compatibility with program  Submit application December 1, 2009 for April 15, 2010 fund availability
Hazard Elimination & Safety (HES)	Project description with specific scope of work, opinion of probable cost, schedule for advertisement of project, benefit/cost analysis	Application submitted August, 2009
Urban Renewal Authority – Citizen Advisory Group (URA-CAG)	Project description with specific scope of work, opinion of probable cost, schedule for advertisement of project	Request 4 <sup>th</sup> Quarter 2009

**Table 7-1: Recommended Funding Applications**

**7.5 Public Involvement**

The NFCBA, several corridor property owners, and the general public have expressed continued interest in the project's progress. All of these groups have influenced the Conceptual Design in a positive way. In addition, this project provides an excellent opportunity for local government to demonstrate its ability to provide transparency, accountability, and responsiveness to community initiatives like BOB. As the project continues to develop, we recommend: coordinating with NFCBA representatives through continued representation in project team activities, working with individual property owners one-on-one, and informing the general public of progress by holding one public open house during preliminary engineering and a second one prior to beginning construction. We also recommend defining the project's approach to public outreach and information sharing for the construction phase prior to the second public open house.

The City's Council, Boards, Commissions, and specialty staff have supported the project during development of the Conceptual Design. Successful preparation of the project for construction will require the project team to continue to report to these groups, solicit their input, collaborate with staff, and request direction at appropriate points of decision-making.

Vision Plan Elements	Funding Source														
	City of Fort Collins						CDOT		NFRMPO			Other			
	BOB	Capital Projects Fund	Neighborhood Parkland Fund *	Conservation Trust Fund	Utility Funds	Truck Route Funds	Safety	Surface Treatment	Enhancement	STP Metro	CMAQ	DOLA	Urban Renewal Authority	GOCO *	Brownsfield*
Right-of-way Acquisition	O	X		O	O	X			?	X	?		X		
Curb and gutter	X	X				X	X			X			X		
Bicycle Facilities	X	X		O		X			X	X	X	X	X		
Pedestrian Facilities	X	X		O		X			X	X	X	X	X		
Streetscape	X	X							X	X		X	X		
Lighting	O	X				X	X		X	X		X	X		
Access Management										X			X		
Driveway Definition/Consolidation	X	X				X	X			X			X		
Raised Medians		X				X	X			X			X		
Intersection Improvements		X				X	X			X	X		X		
Paving		X				X				X			X		
Minor Patching	X	X				X		X		X			X		
Overlay		X				X		X		X			X		
Reconstruction		X				X		X		X			X		
Storm Drainage	O	X			X	X				X		X	X		
Utilities	O	X			X	X				X		X	X		
Gateway		X		X									X		
Pedestrian Bridges	X	X		X		X						X	X		
Alleys		X										X	X		
Parking		X										X	X		

**Legend**

Short Term Funding Source - By 2010

Long Term Funding Source - After 2010

Short or Long Term Funding Source

X - Project element meets funding source requirements individually.

O - Need for the project element is dependent on other project elements that meet funding source requirements i.e., implementation of curb and gutter triggers need for storm drainage improvements.

\* - Project does not meet funding source requirements.

? - Defined by funding request application documents

**Table 7-2: Funding Eligibility by Source**



### 7.6 Maintenance of Improvements

A critical aspect of long-term success for public improvements, like those proposed for North College, is long-term maintenance. Planning for long-term maintenance includes consideration of:

- physical ease of routine maintenance,
- frequency of routine maintenance,
- availability of supplies for maintenance,
- availability of equipment / special equipment needs
- availability of staff resources,
- fiscal commitment, and
- routine replacement costs for project elements with expected life-cycles that are less than the overall project life-cycle.

The project team initiated discussions about long-term maintenance of the project during concept development. These discussions will need to continue through project development with a continued focus on how long-term maintenance will be accomplished by the City’s departments. Project elements initially identified for further discussion include street lighting, pedestrian lighting, landscaping and plantings, drainage facilities, street sweeping, snow removal and streetscape elements such as street furnishings, public art, banners, etc. Potential changes in snow removal needs also warrant additional consideration. Prior to issuing plans for construction, we recommend developing a Maintenance Plan that establishes specific responsibilities, protocols, routine maintenance schedules, and budgets for maintenance of the project.

### 7.7 Clearances, Permits, & Schedules

The previous sections of this chapter described next steps for the project. Table 7-3 summarizes anticipated clearances and permits for the project along with recommended schedules for completion. Additional clearances and approvals may be necessary. The project team will monitor for additional requirements as the project develops.

Clearance/Permit Anticipated	Approving Agency	Recommended Completion	Notes
Hot Spot Analysis	CDOT	December 2009	Required for Cat-Ex Concurrence
Noise Memorandum	CDOT	December 2009	Required for Cat-Ex Concurrence
Phase I Environmental Site Assessments, if needed	CDOT	December 2009	Required for Cat-Ex Concurrence
Threatened & Endangered Species Memorandum	CDOT	December 2009	Required for Cat-Ex Concurrence
Wetland Identification	CDOT	December 2009	Required for Cat-Ex Concurrence
Archaeological Survey & Historic Resource Inventory	Ft. Collins/CDOT	December 2009 – February 2010	Required for Cat-Ex Concurrence
Paleontological Survey	CDOT	December 2009	Required for Cat-Ex Concurrence
Cat-Ex Concurrence (Form 128)	CDOT	January – March 2010	Required for initiation of Acquisition
ROWPR Plan Approval	CDOT	March 2010	Required for initiation of Acquisition
Section 402 Stormwater Permit	CDOT	October - December 2010	Required for Environmental Certification
SB 40 Certification	CDOT	October - December 2010	Required for Environmental Certification
CDOT Form 463 Approval	CDOT	December 2010	Required for construction
No-Rise Certification	Ft. Collins	October-December 2010	Required for construction
Floodplain Use Permit	Ft. Collins	October – December 2010	Required for construction
Right-of-way Certification/Clearance	Ft. Collins/CDOT	December 2010	Required for construction
Environmental Certification	CDOT	December 2010	Required for construction
Utility Clearance/Utility Agreements	CDOT	December 2010	Required for construction
CDPS Construction Stormwater Permit	WQCD	February 2011	Required for construction
Excavation Permit	Ft. Collins	February 2011	Required for construction

Table 7-3: Clearance & Permit Summary

## 8.0 References

- City of Fort Collins, Larimer County, Colorado Department of Transportation, Felsburg Holt & Ullevig, Balloffet & Associates Inc., Albertson Clark Associates, *US 287/SH 14 Access Management Report*. April 04, 2000.
- Adopted by Larimer County, City of Loveland, City of Fort Collins, *Larimer County Urban Area Street Standards*, Repealed and Reenacted April 01, 2007.
- As adopted by The Transportation Commission of Colorado, *State Highway Access Code*, Volume 2, Code of Colorado Regulations 601-1, August 31, 1998.
- Colorado Department of Transportation, *CDOT Design Guide*, 2005 (Updated April, 2006)
- American Association of State Highway and Transportation Officials, *Geometric Design of Highways and Streets 2004*, Fifth Edition, 2004
- American Association of State Highway and Transportation Officials, *Guide for the Development of Bicycle Facilities*, 1999
- City of Fort Collins Advance Planning, *North College Corridor Plan*, March 14, 2007
- The Colorado Department of Transportation Safety and Traffic Engineering Branch Safety Engineering and Analysis Group, *Safety Assessment (SH 287C Traffic Safety Corridor Review Region 4 SH 287C (MP 347.25 to MP 348.54)*, June 4<sup>th</sup>, 2009
- PBS&J, LSA Associates, Coley/Forrest, Intermountain Corporate Affairs, *Fort Collins Transportation Master Plan 2004*, February 2004.
- Ayres Associates, *Northeast College Corridor Outfall (NECCO) Final Design Report*, February 2009.
- Ayres Associates, *New Vine Drive Realignment Conceptual Plan*, 2008.
- City of Fort Collins Utilities Department Stormwater Division, *Storm Drainage Design Criteria and Construction Standards*, 1997.
- Colorado Department of Transportation, *Drainage Design Manual*, 2004
- Urban Drainage and Flood Control District, *Drainage Design Manual*, 2004
- Ayres Associates, *North College Drainage Improvements Design (NCDID) Alternative Analysis Report*, 2005
- Institute of Transportation Engineers, *Context Sensitive Solutions in Designing Major Urban Thoroughfares for Walkable Communities*, 2005
- Idaho Transportation Department, *Idaho Bicycle and Pedestrian Transportation Plan*, January 1995



## 9.0 List of Acronyms

AASHTO = American Association of State Highway and Transportation Officials  
ADT = Average Daily Traffic  
BOB = Building on Basics  
CatEX = Categorical Exclusion  
CDOT = Colorado Department of Transportation  
CDOW = Colorado Division of Wildlife  
CDPHE = Colorado Department of Public Health and Environment  
CDPS = Colorado Discharge Permit System  
CLOMR = Conditional Letter of Map Revision  
CMAQ = Congestion Mitigation and Air Quality  
CWA = Clean Water Act  
DOLA = Department of Local Affairs  
ELCO = East Larimer County  
FIR = Field Inspection Review  
FOR = Final Office Review  
GWET = Greeley Waterline Enhancement Transmission  
HES = Hazard Elimination and Safety  
ISA = Initial Site Assessment  
LOMR = Letter of Map Revision  
LOS = Level of Service  
MESA = Modified Phase I Environmental Site Assessment  
MS4 = Municipal Separate Storm Sewer Systems  
NCDID = North College Drainage Improvement Design  
NECCO = Northeast College Corridor Outfall  
NEPA = National Environmental Policy Act  
NEWT = Northeast Water Transmission  
NFCBA = North Fort Collins Business Association  
NFRMPO = North Front Range Metropolitan Planning Organization  
PSI = Preliminary Site Investigation  
ROW = Right-Of-Way  
ROWPR = Right-Of-Way Plans Review  
SB 40 = Senate Bill 40  
SH = State Highway  
SHPO = State Historic Preservation Office  
SI = Site Investigation  
STP = Surface Transportation Program  
SWMP = Storm Water Management Plan  
TAC = Technical Advisory Committee  
TSS = Total Suspended Solids  
URA = Urban Renewal Authority  
URA CAG = Urban Renewal Authority Citizen Advisory Group  
UPRR = Union Pacific Railroad  
WQCD = Water Quality Control Division

## 10.0 Conceptual Design Plans



Oversight / NHS

FHWA REGION VIII OVERSIGHT?  NO  YES

NATIONAL HIGHWAY SYSTEM?  NO  YES

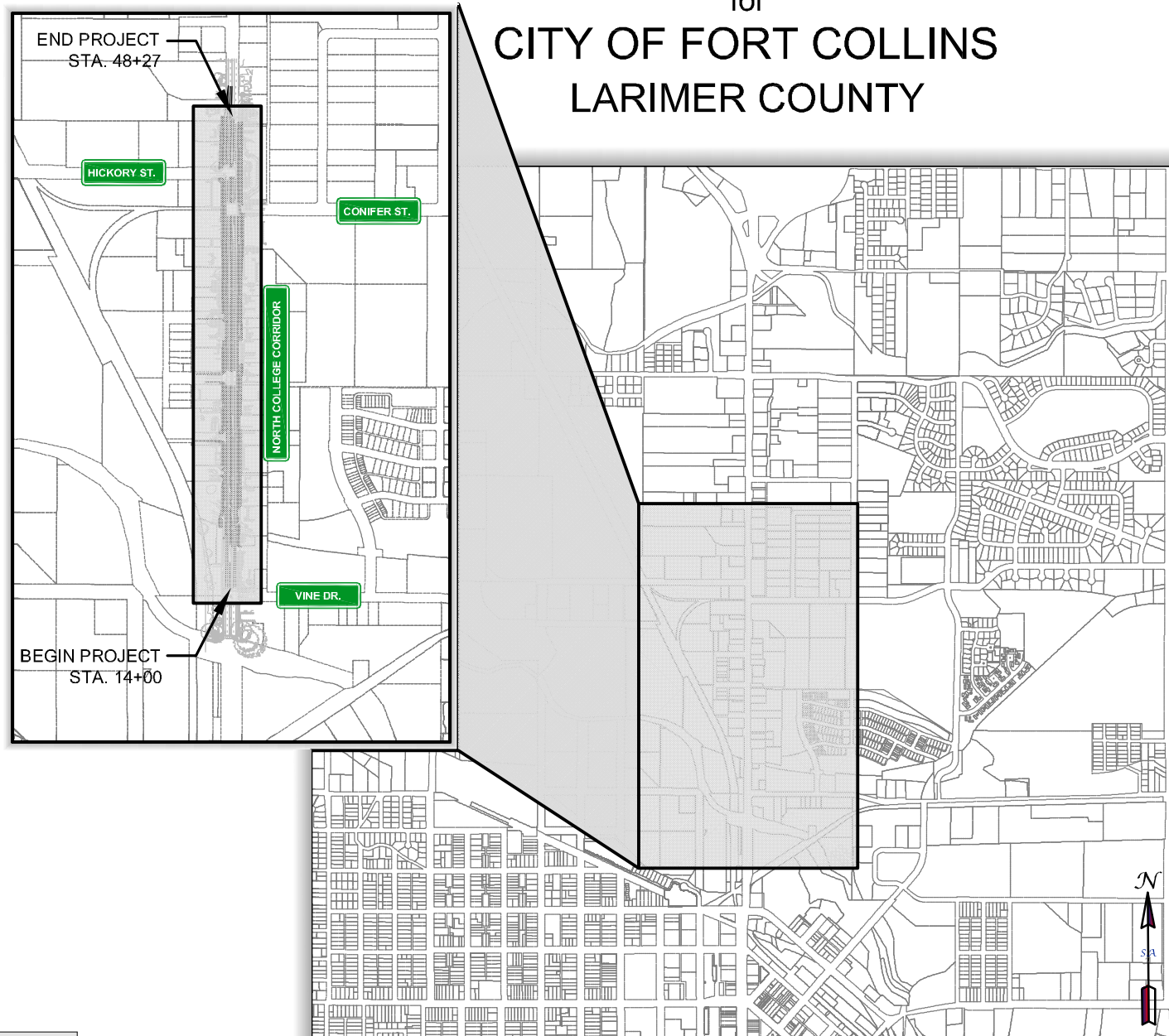
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Related Projects:  
P. E. UNDER PROJECT:  
Project Number: XXXXXXXX  
Project Code: XXXXX

R.O.W. Projects:  
R.O.W. Project Description  
XXXXXXXXXXXXXXXXXX

PUBLIC IMPROVEMENT CONCEPTUAL PLANS  
for

CITY OF FORT COLLINS  
LARIMER COUNTY



INDEX OF SHEETS		
SHEET	SUBSET	TITLE
1	01	TITLE SHEET
2 to 3	TS-01 to 07	TYPICAL SECTIONS
4 to 10	RP-01 to 07	ROADWAY PLAN
11 to 24	ST-01 to 14	STORM SEWER PLAN
25 to 29	01 to 05	OWNERSHIP PLAN

**CONCEPTUAL PLANS  
NOT FOR CONSTRUCTION  
AUGUST 14, 2009**



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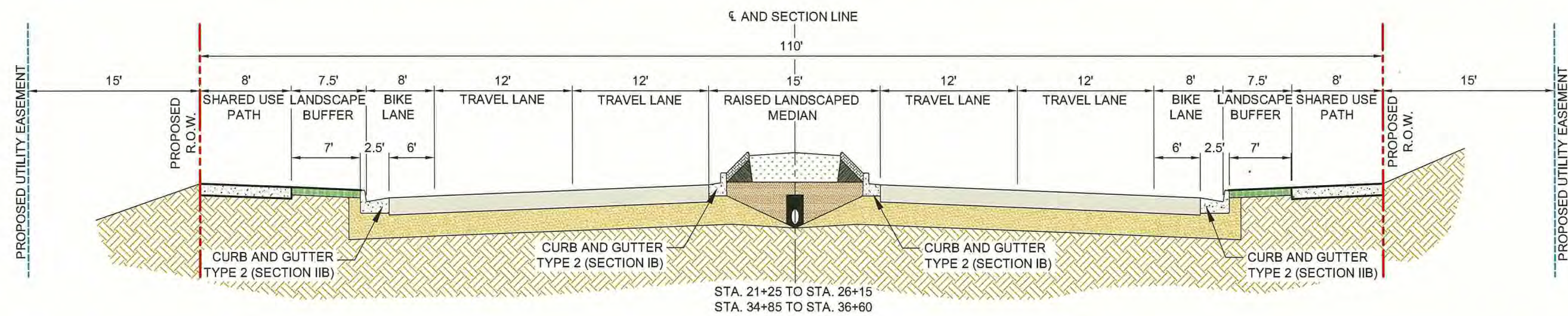
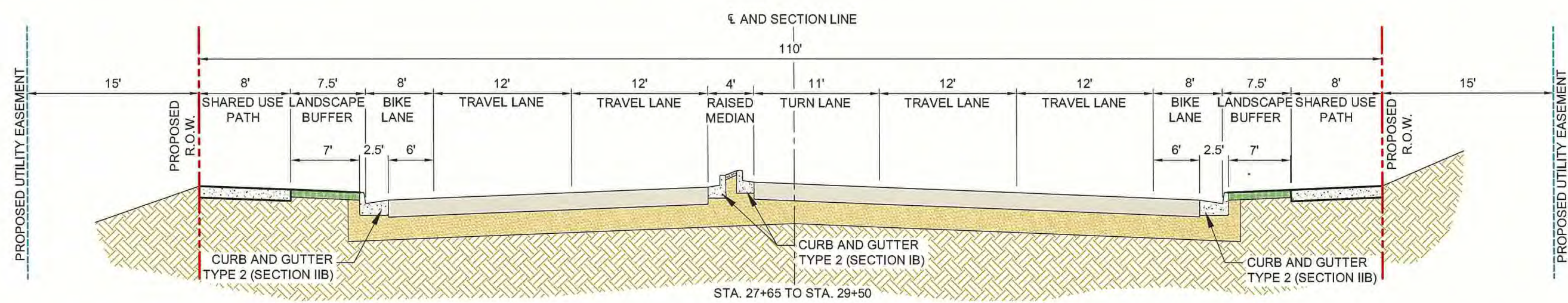
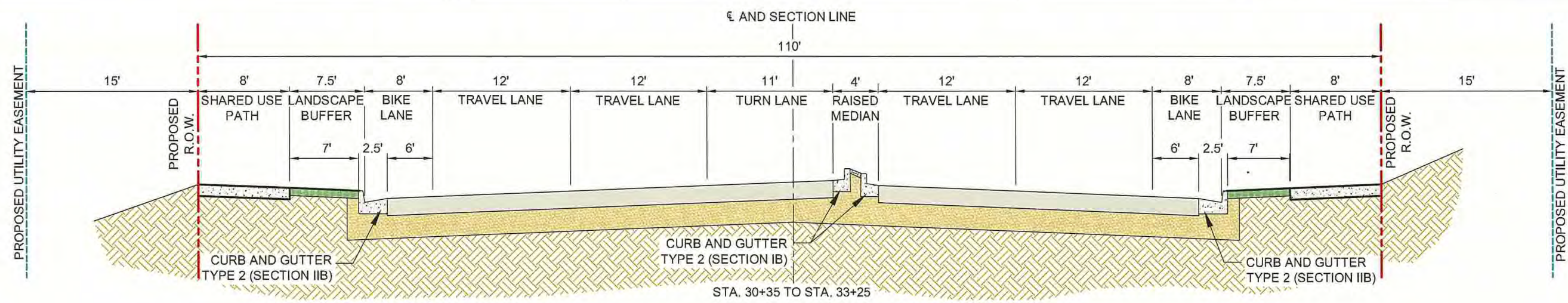
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Fort Collins, CO 80521  
Phone: (970) 221-6605  
Fax: (970) 221-6378

As Constructed
No Revisions:
Revised:
Void:

Contract Information	
City Project Engineer:	Jennifer Petrik
Project Engineer:	Michelle Hansen
Design Engineer:	Jeremy Colip
PROJECT STARTED:	03/05/09 ACCEPTED:
Comments:	

Project No./Code	
Project Number	
Code	
Sheet Number	1





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**City of Fort Collins**

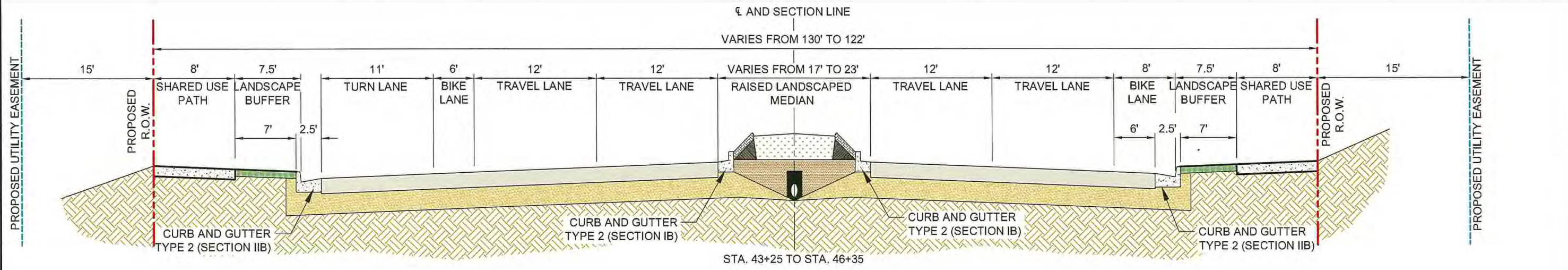
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Revised:	Designer: J. COLIP		
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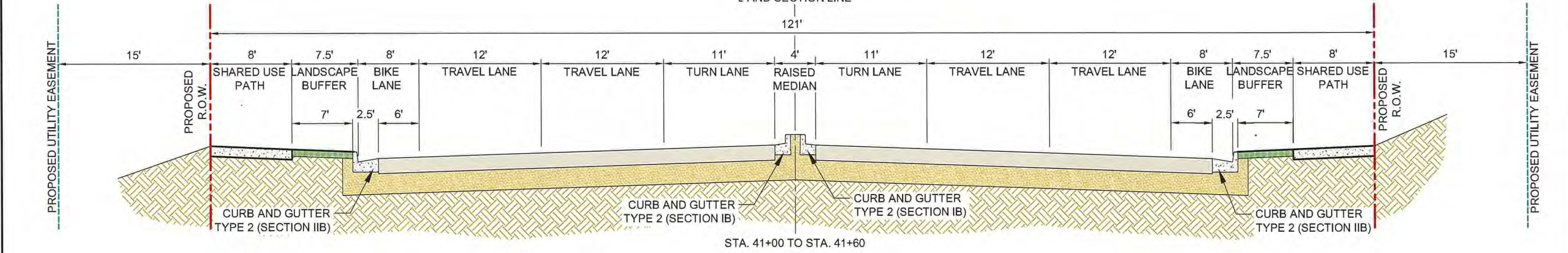


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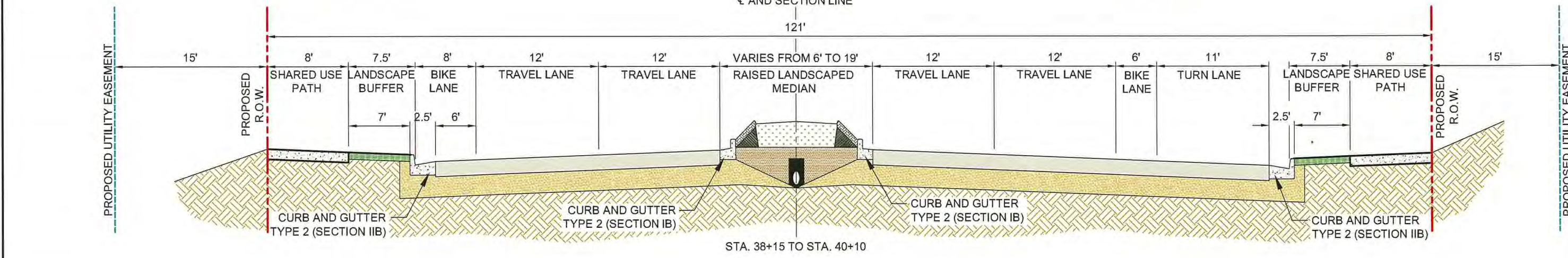
STA. 43+25 TO STA. 46+35

€ AND SECTION LINE



STA. 41+00 TO STA. 41+60

€ AND SECTION LINE



STA. 38+15 TO STA. 40+10

ROADWAY SECTION IS IN TRANSITION FROM STA. 36+60 TO STA. 38+15 (REFER TO ROADWAY PLAN FOR DIMENSIONING)

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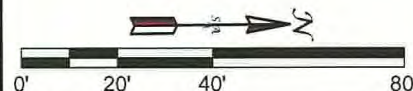
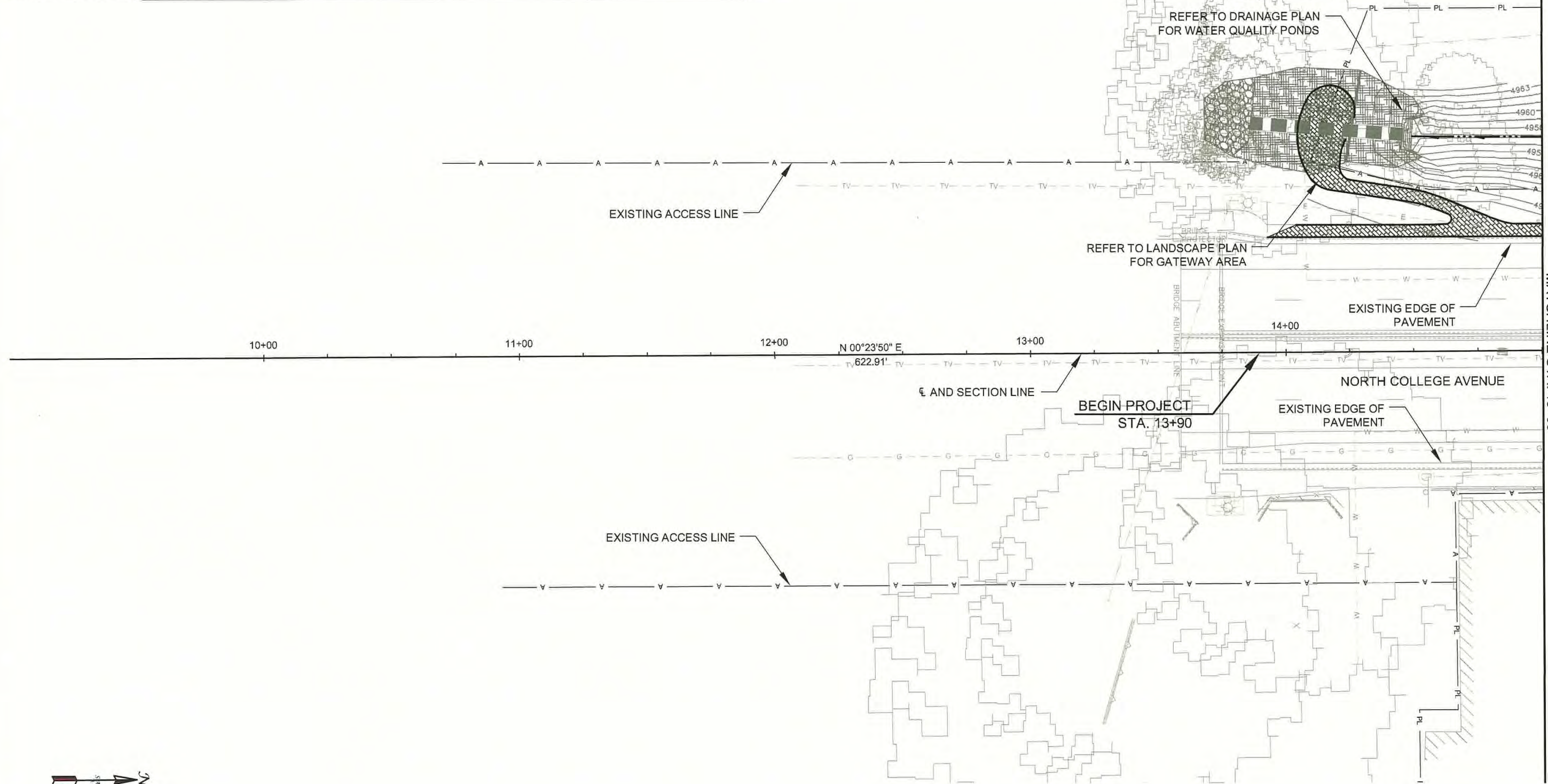
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- LANDSCAPE BUFFER
- LANDSCAPE PAVERS
- CONCRETE DRIVEWAY
- SHARED USE PATH
- CONSTRUCTION LIMITS OF PAVEMENT
- PROPOSED STORM SEWER
- PROPOSED R.O.W.
- EXISTING R.O.W.
- PL - EXISTING PROPERTY LINE



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Designer: J. COLIP	
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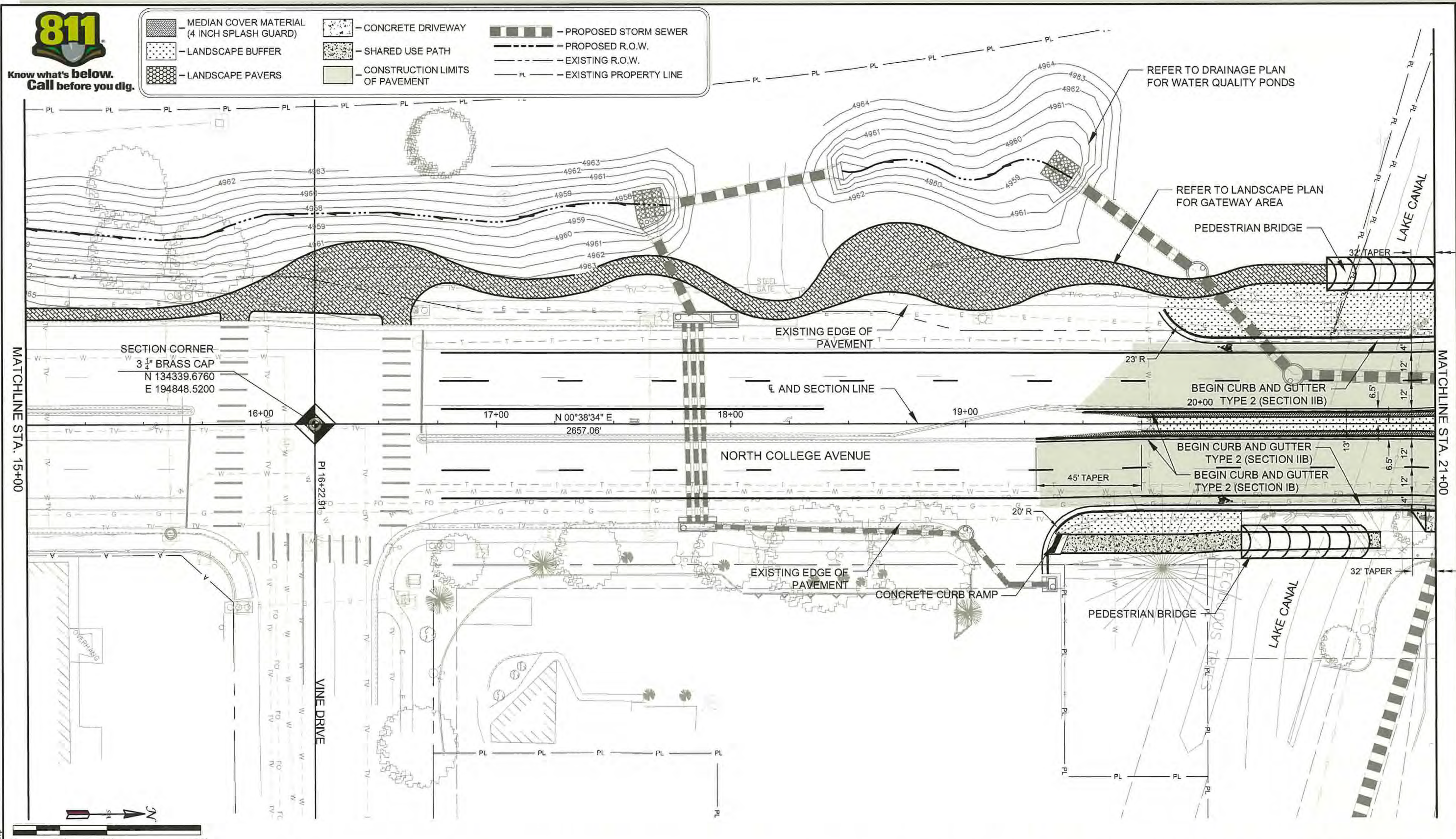
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- LANDSCAPE BUFFER
- LANDSCAPE PAVERS
- CONCRETE DRIVEWAY
- SHARED USE PATH
- CONSTRUCTION LIMITS OF PAVEMENT
- PROPOSED STORM SEWER
- PROPOSED R.O.W.
- EXISTING R.O.W.
- EXISTING PROPERTY LINE



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 STA. 15+00 TO STA. 21+00  
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 Designer: J. COLIP  
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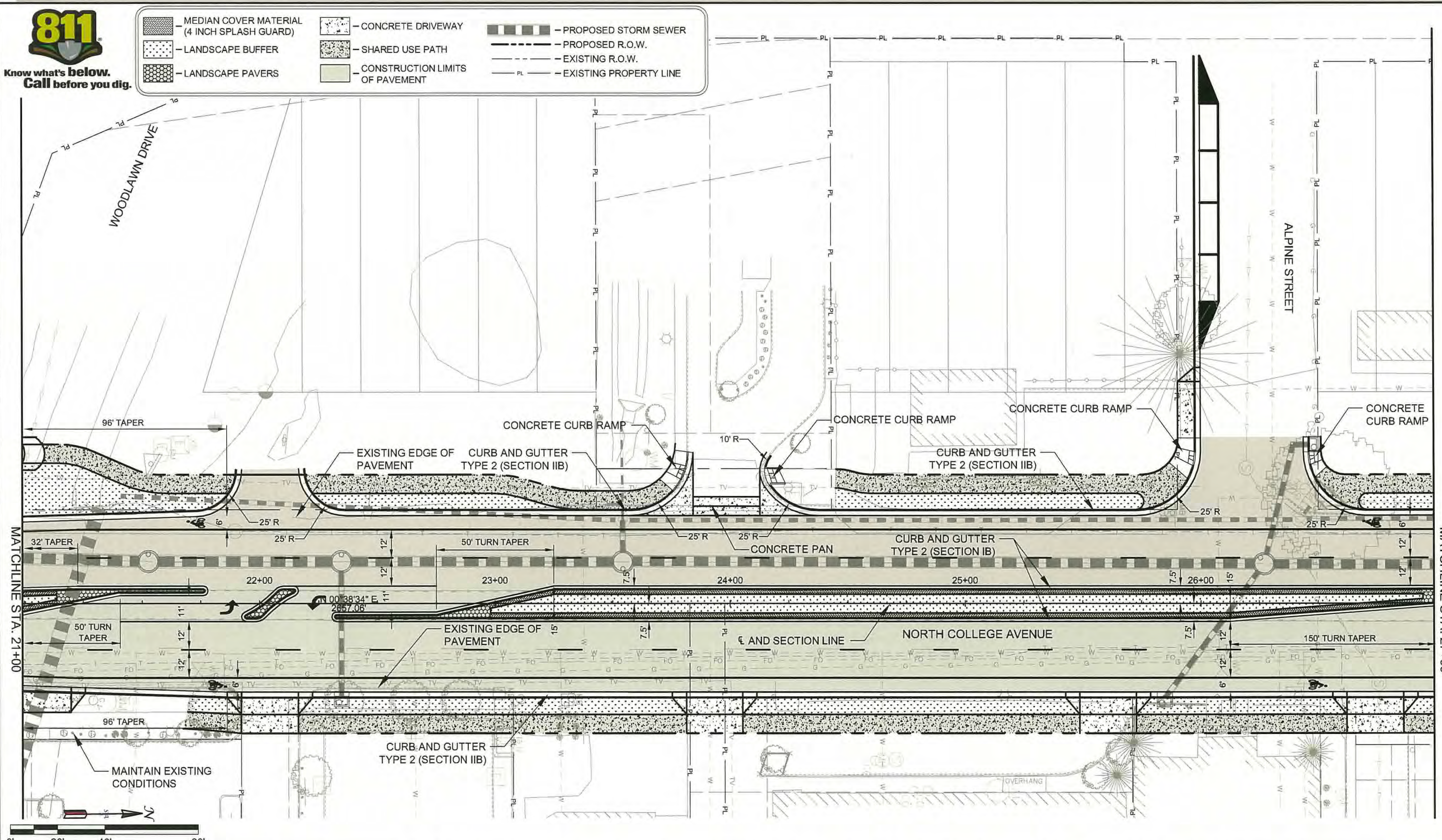
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NORTH COLLEGE CORRIDOR - PHASE II  
 ROADWAY PLAN  
 STA. 21+00 TO STA. 27+00

Engineer: M. HANSEN	Structure Numbers
Designer: J. COLIP	
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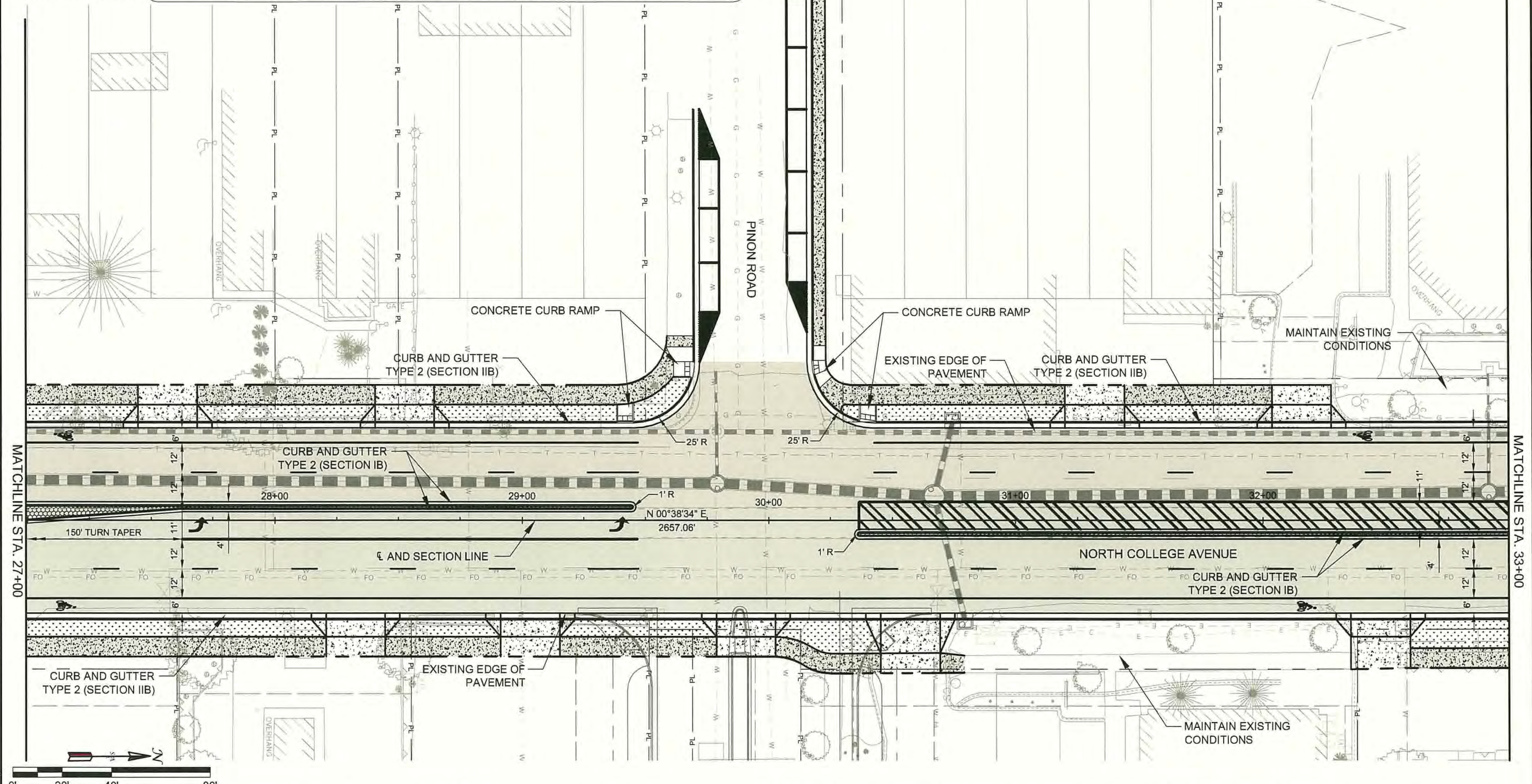
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Engineer: M. HANSEN	Structure Numbers
Designer: J. COLIP	
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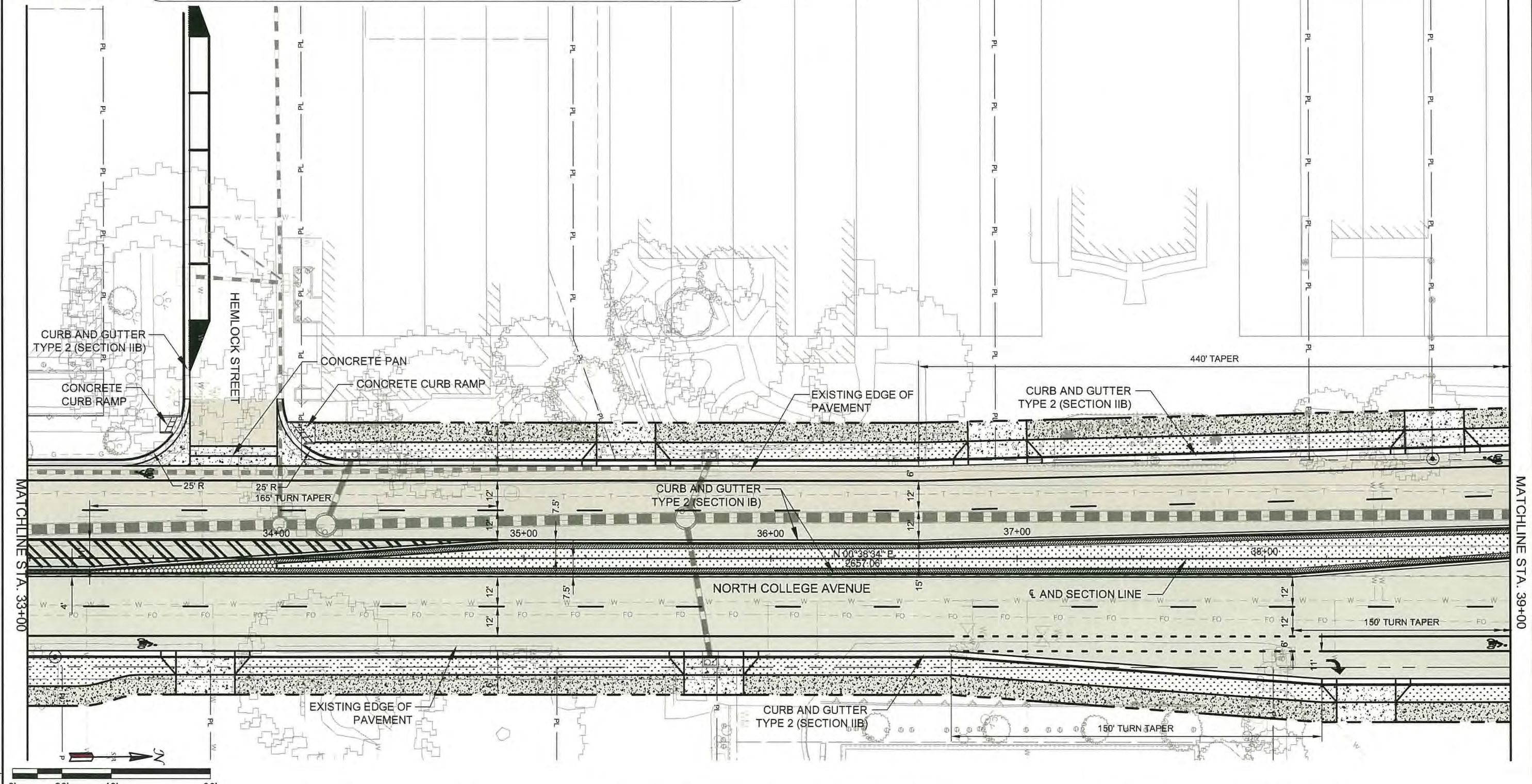
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**NORTH COLLEGE CORRIDOR - PHASE II**  
**ROADWAY PLAN**  
 STA. 33+00 TO STA. 39+00  
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 Designer: J. COLIP  
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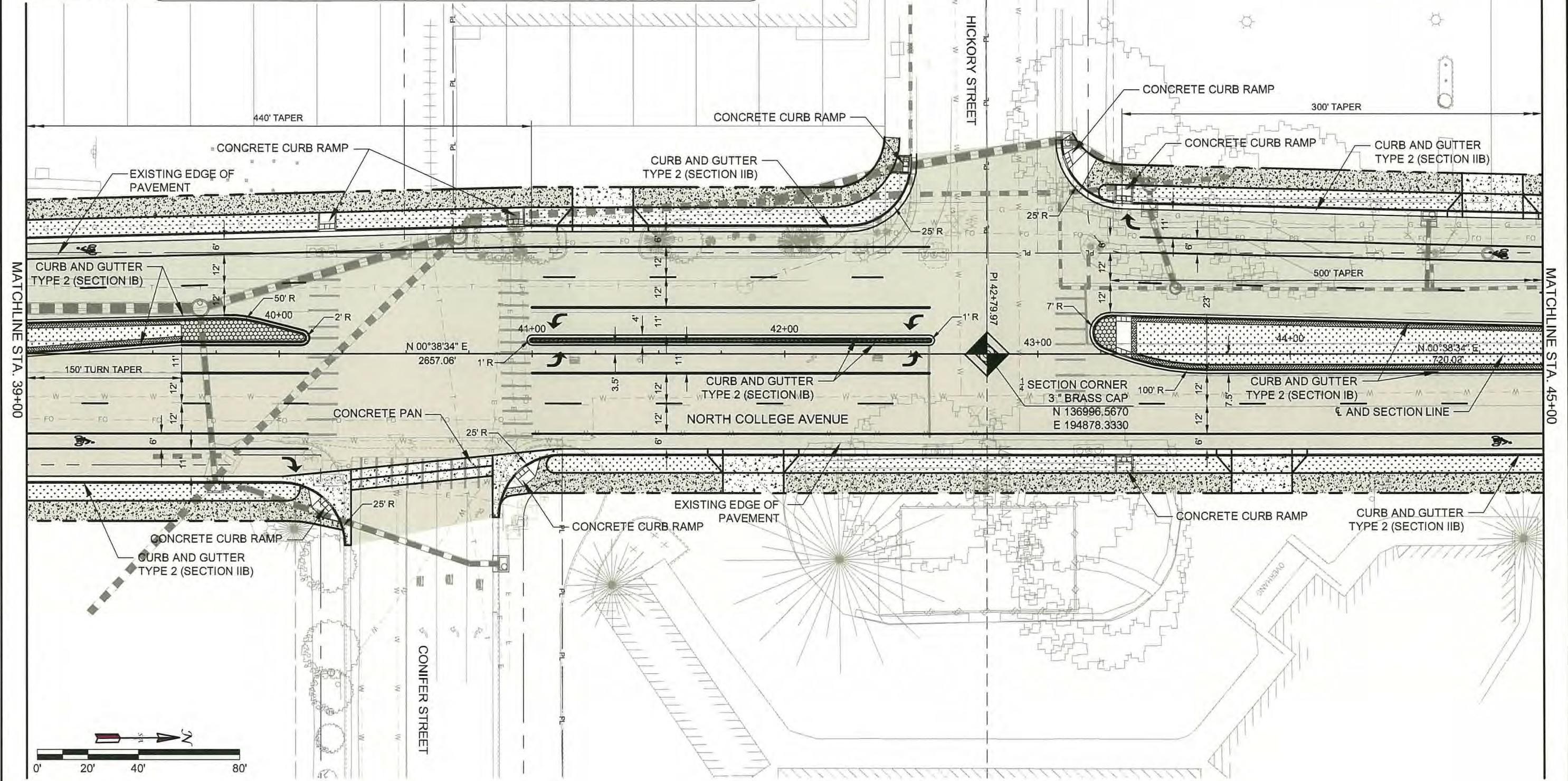
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Engineer: M. HANSEN	Structure Numbers
Designer: J. COLIP	
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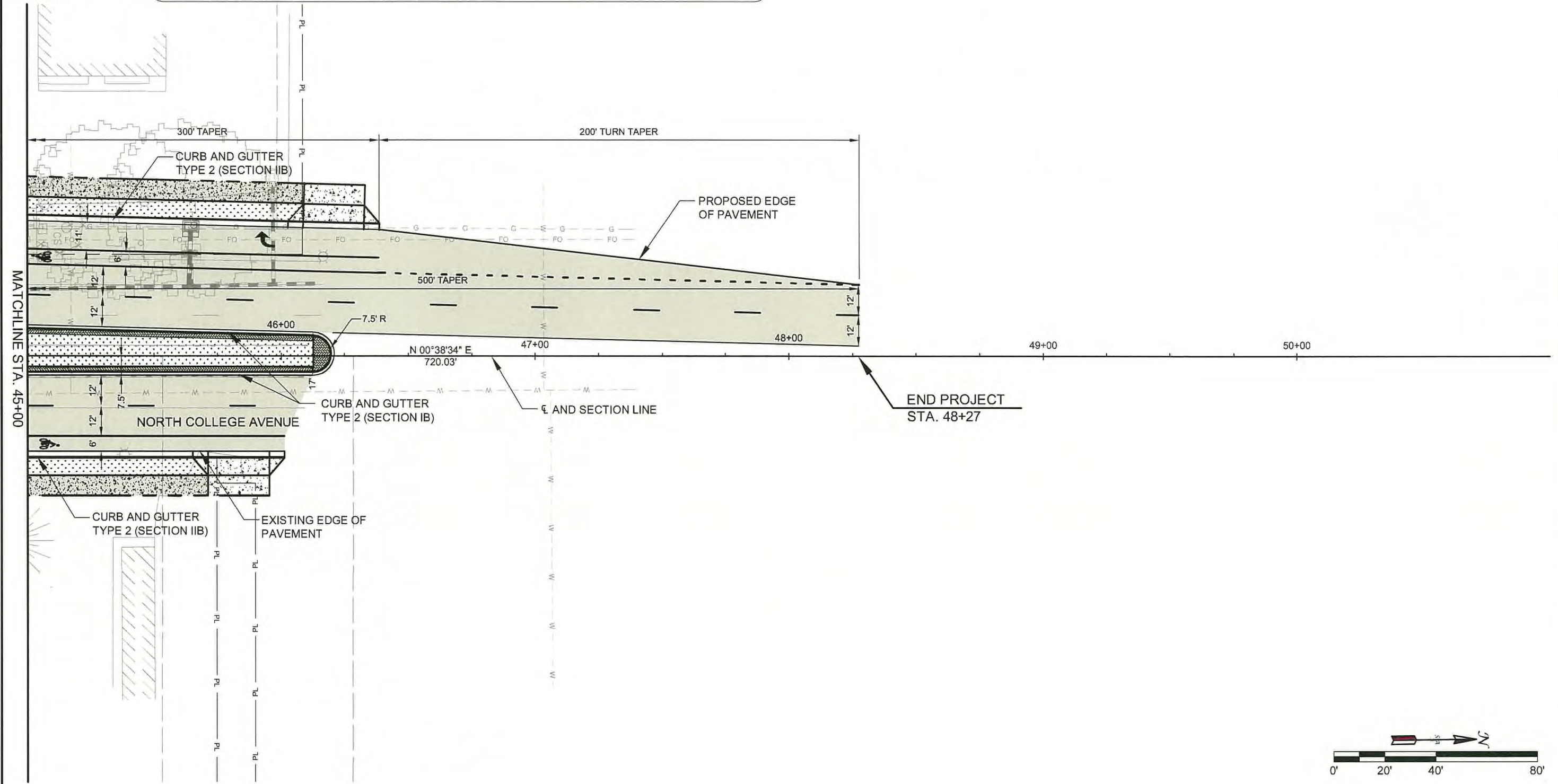
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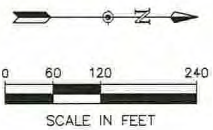
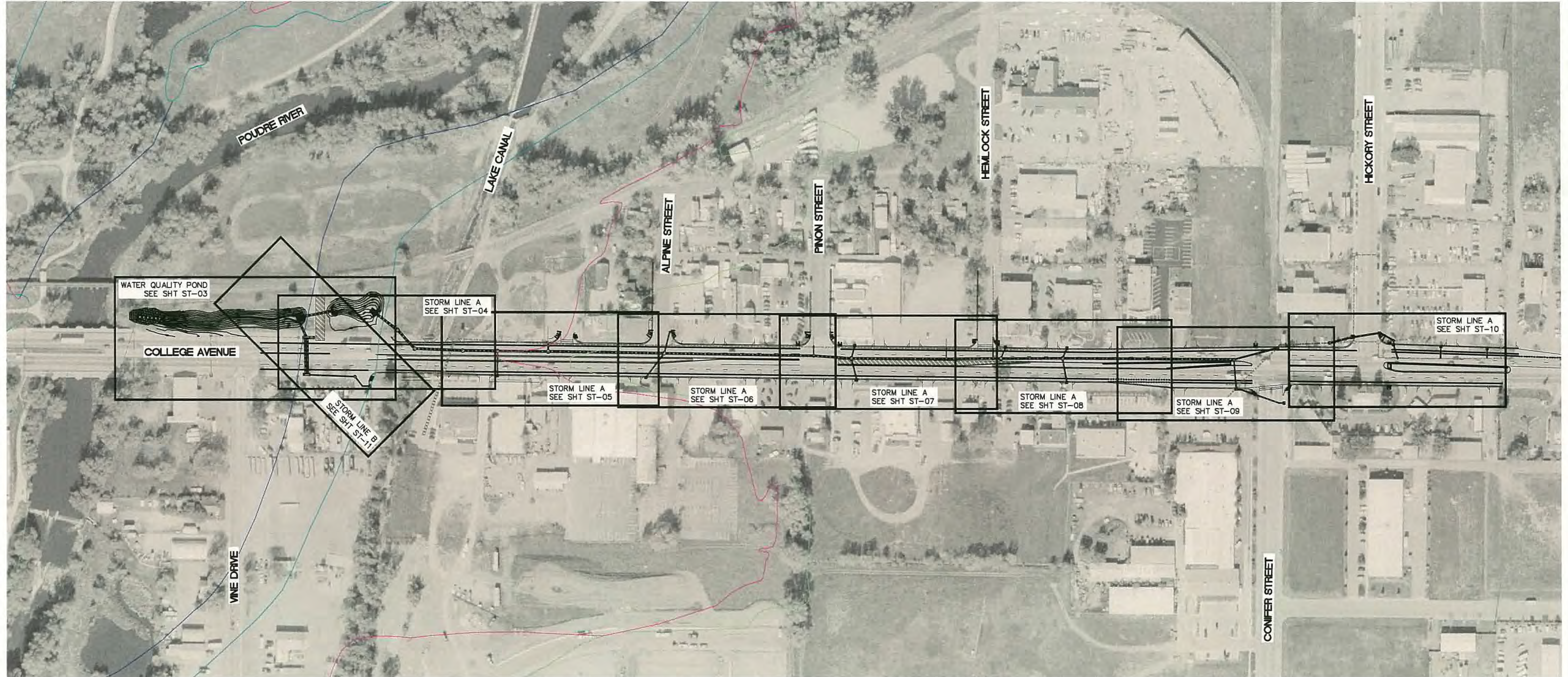
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Revised:	Designer: J. COLIP		
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**AYRES ASSOCIATES** Engineers/Scientists/Surveyors  
 3865 JFK Parkway, Building 2, Suite 200  
 P.O. Box 270480  
 Fort Collins, CO 80527  
 (970) 223-5556

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Proposed	NORTH COLLEGE AVENUE IMPROVEMENTS SHEET INDEX		Project No./Code
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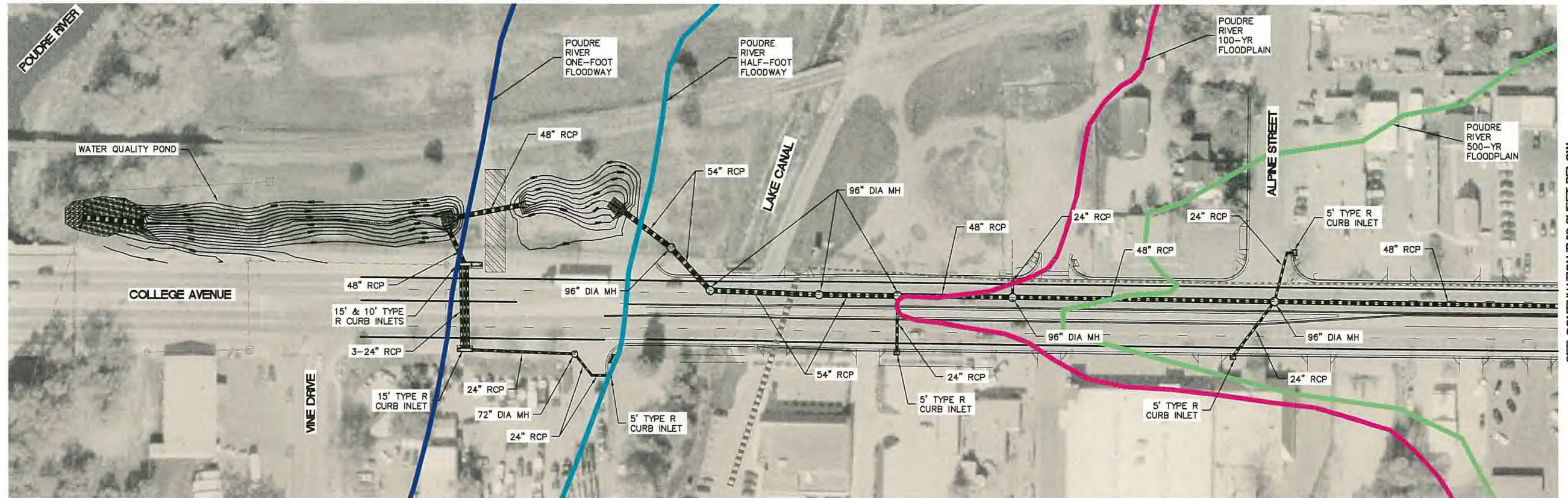
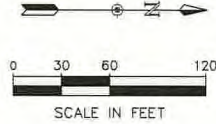




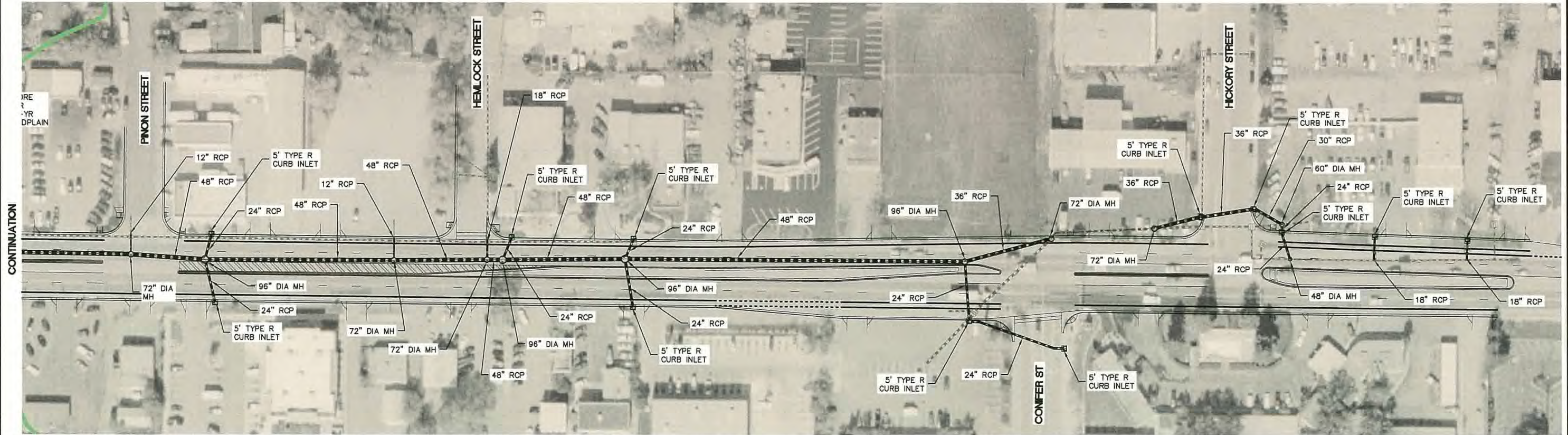
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**FLOODPLAIN LEGEND**

- FEMA 500-YEAR FLOODPLAIN
- FEMA 100-YEAR FLOODPLAIN
- POUFRE RIVER 1.0FT FLOODWAY
- POUFRE RIVER 0.5FT FLOODWAY



SEE CONTINUATION THIS SHEET BELOW



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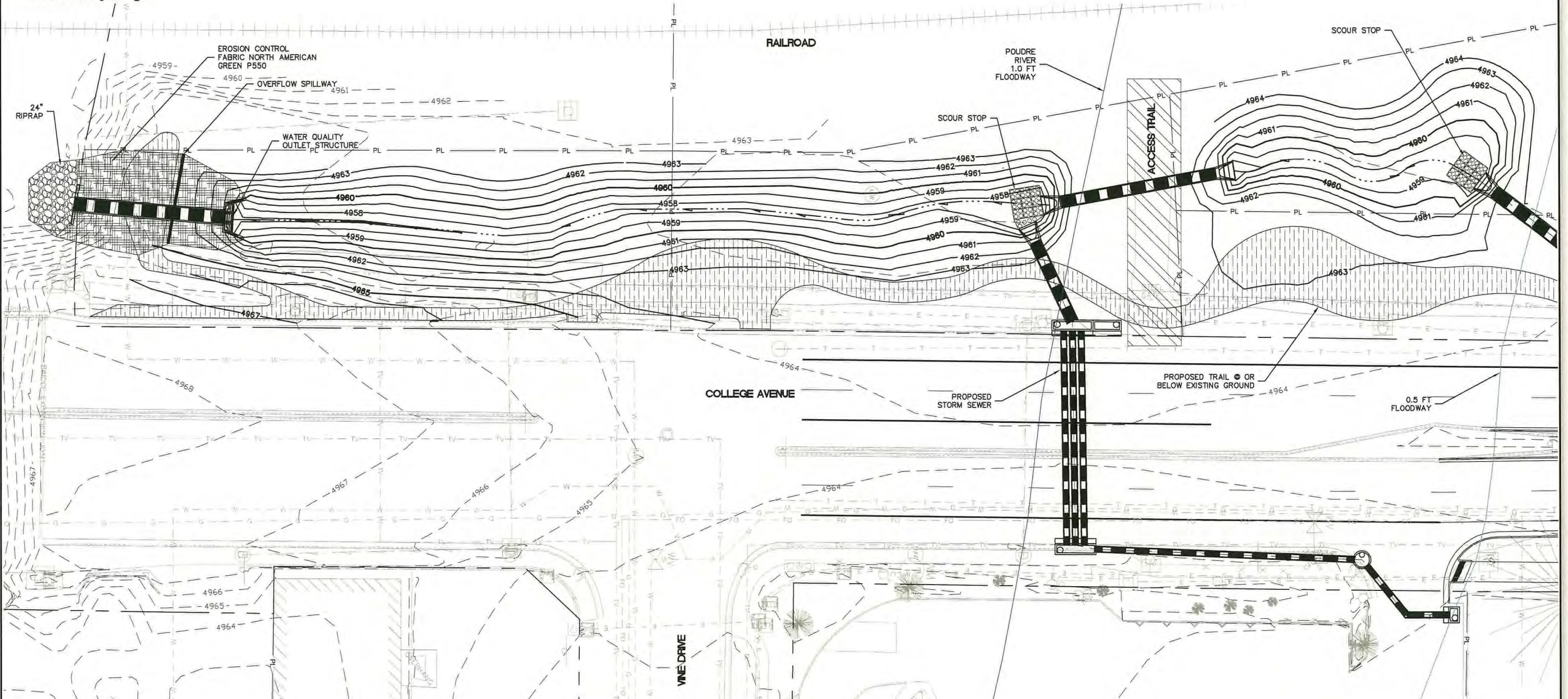
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	No Revisions:	Engineer: J. MICHAELSEN		Structure Numbers
	Revised:	Designer: J. MICHAELSEN		
Void:	Sheet Subset: STORM	Subset Sheets: ST-02 of 14	Sheet Number 12	

8/13/2009 6:51:48 AM\michaelsej



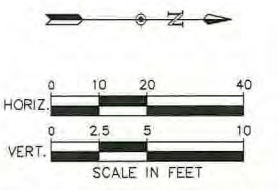


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FLOODWAY AND FLOODPLAIN NOTES:

1. THE FOLLOWING ITEMS ARE NOT ALLOWED WITHIN THE FLOODWAY BOUNDARIES:  
 a. FILL STORAGE OF MATERIALS  
 b. LANDSCAPE IN THE FLOODWAY WILL NOT INCREASE THE EXISTING MANNING'S ROUGHNESS COEFFICIENT  
 c. NOT BLOCK CONVEYANCE WILL LIE DOWN DURING A FLOODING EVENT  
 d. ANY ITEMS IN THE FLOODWAY/FLOODPLAIN THAT CAN FLOAT (E: BENCHES) WILL BE ANCHORED  
 e. THE PEDESTRIAN BRIDGES WILL BE ANCHORED
2. LANDSCAPE IN THE FLOODWAY WILL NOT INCREASE THE EXISTING MANNING'S ROUGHNESS COEFFICIENT
3. A FLOODPLAIN USE PERMIT WILL BE COMPLETED PRIOR TO CONSTRUCTION
4. ANY ITEMS IN THE FLOODWAY/FLOODPLAIN THAT CAN FLOAT (E: BENCHES) WILL BE ANCHORED
5. THE PEDESTRIAN BRIDGES WILL BE ANCHORED
6. ANY ART WORK WILL BE DESIGNED TO NOT BLOCK CONVEYANCE AND WILL BE ANCHORED DOWN
7. FENCES WITHIN THE FLOODWAY WILL NOT BLOCK CONVEYANCE AND WILL BE DESIGNED TO BREAK-AWAY
8. SPOT ELEVATIONS ARE TO BE PROVIDED WITH FINAL DESIGN
9. THE TOPO SHOWN IS ON THE NGVD29 DATUM (WITHOUT THE 1984 CORRECTION). THE FEMA INFORMATION IS ON THE NAVD 1988 DATUM. THE CONVERSION IS:  
 NGVD29 (WITHOUT THE 1984 CORRECTION) + 3.0FT = NAVD 1988.
10. BENCHMARK: No 1-00. CATCH BASIN ON THE SOUTHEAST CORNER OF VINE AND COLLEGE. ELEV=4965.57ft NGVD29.



8/13/2009 6:50:41 AM Michael Jensen

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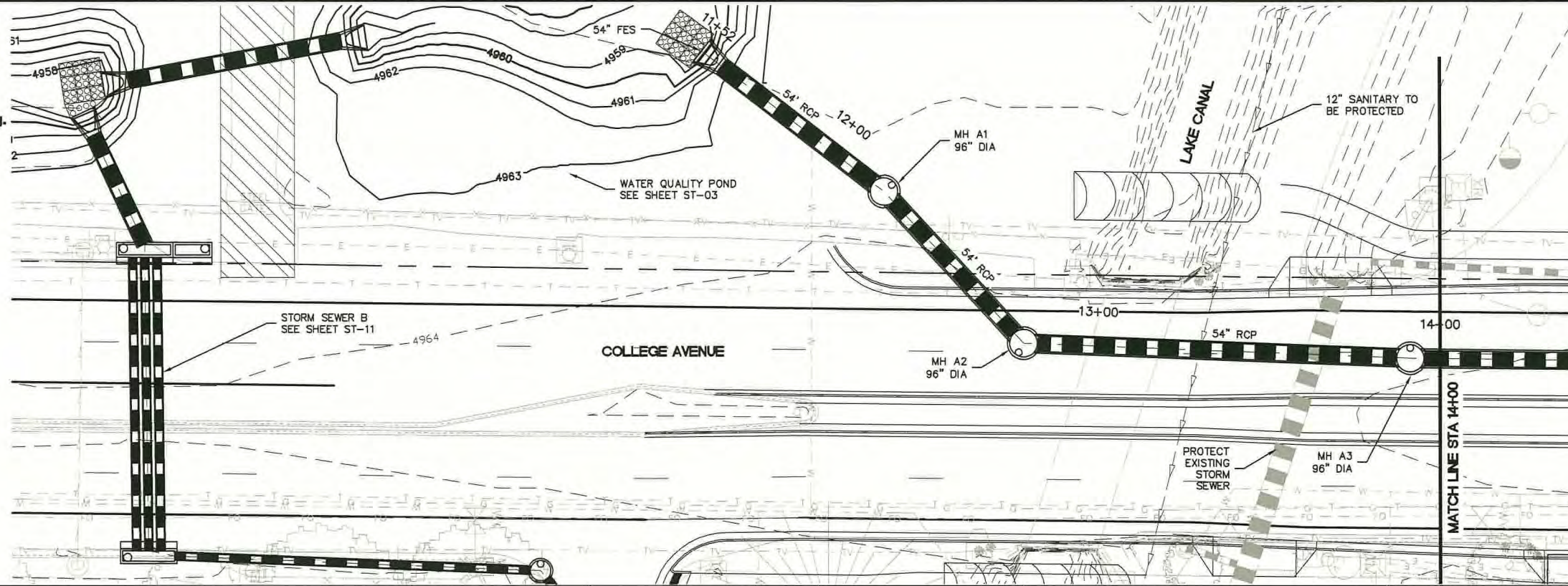
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Proposed	NORTH COLLEGE AVENUE IMPROVEMENTS		Project No./Code
No Revisions:	WATER QUALITY PONDS		
Revised:	Engineer: J. MICHAELSEN	Structure Numbers	Sheet Number <b>13</b>
Void:	Designer: J. MICHAELSEN	Subset Sheets: ST-03 of 14	





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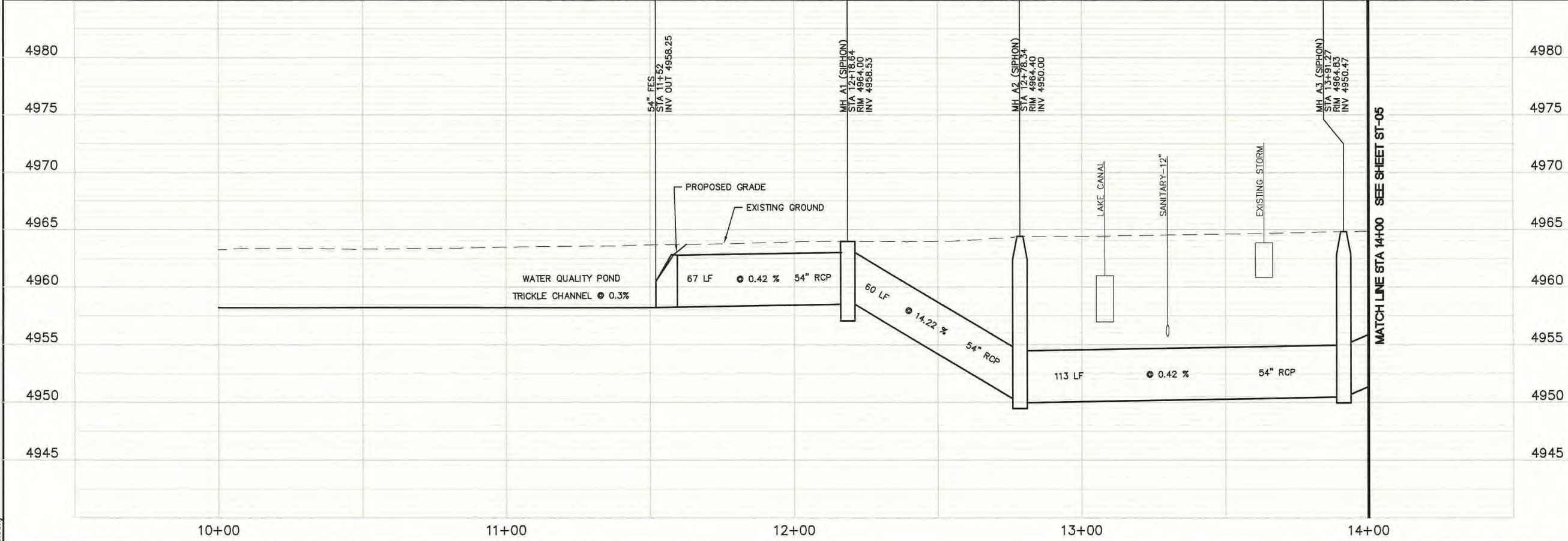
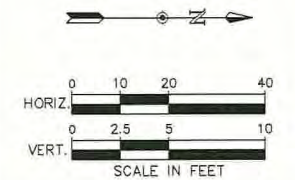
VICINITY MAP

LEGEND

- PROPOSED STORM SEWER
- PROPOSED INLET
- PROPOSED MANHOLE
- PROPOSED CONTOURS
- EXISTING WATER
- EXISTING SANITARY
- EXISTING GAS
- EXISTING FIBER OPTICS
- EXISTING ELECTRIC
- EXISTING TELEPHONE
- EXISTING CABLE TV
- EXISTING CONTOURS
- EXISTING STORM
- EXISTING ROW

NOTES

1. LOCATION AND DEPTH OF EXISTING UTILITIES ARE ESTIMATES.
2. EXISTING STORM SEWER TO BE REMOVED AS NECESSARY UNLESS NOTED OTHERWISE.
3. ABANDONED STORM SEWER TO BE PLUGGED.



7/17/2009 10:12:13 AM Michaelsen

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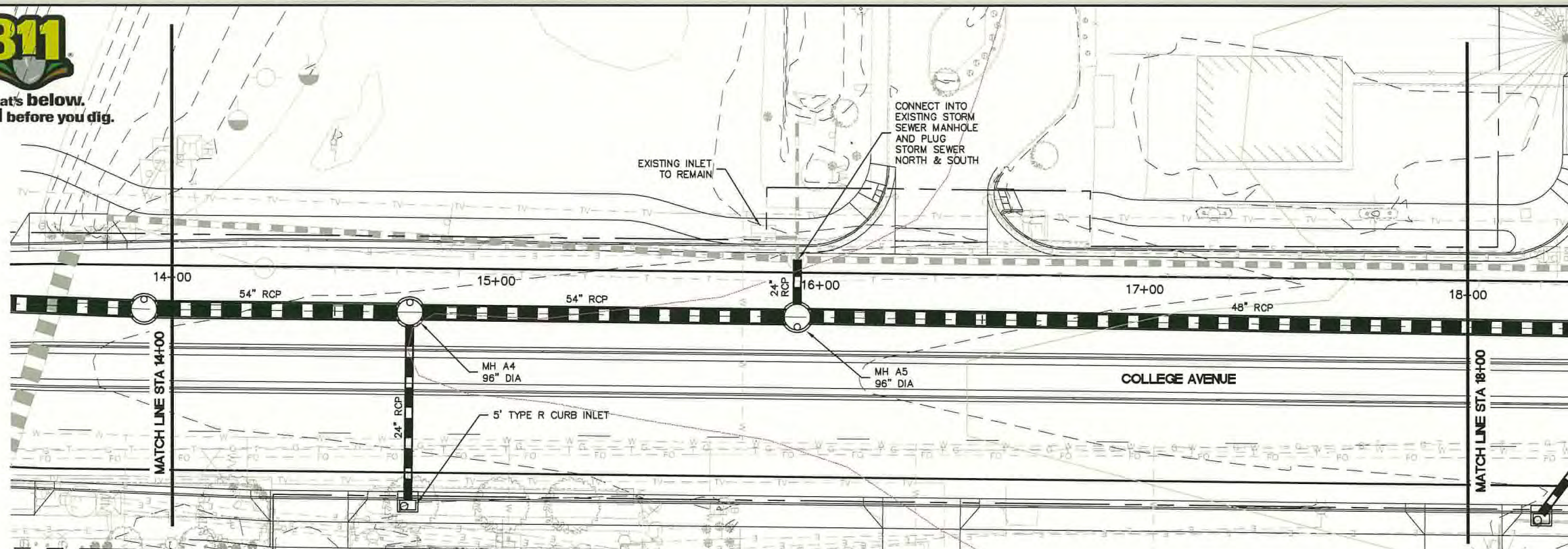
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No Revisions:	Engineer: J. MICHAELSEN	Structure Numbers
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Void:	Sheet Subset: STORM	Subset Sheets: ST-04 of 14

Project No./Code	
Sheet Number	14





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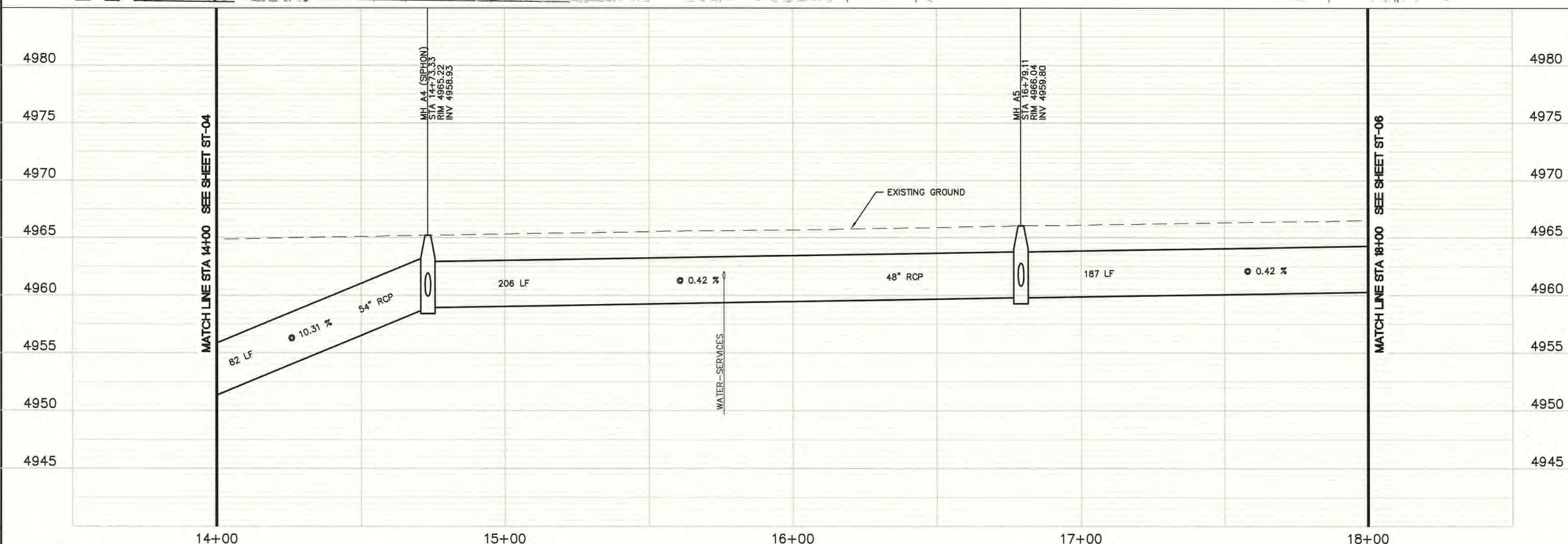
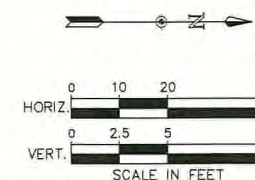
VICINITY MAP

LEGEND

- PROPOSED STORM SEWER
- PROPOSED INLET
- PROPOSED MANHOLE
- PROPOSED 5040 CONTOURS
- EXISTING WATER
- EXISTING SANITARY
- EXISTING GAS
- EXISTING FIBER OPTICS
- EXISTING ELECTRIC
- EXISTING TELEPHONE
- EXISTING CABLE TV
- EXISTING 4956 CONTOURS
- EXISTING STORM SEWER
- EXISTING ROW

NOTES

1. LOCATION AND DEPTH OF EXISTING UTILITIES ARE ESTIMATES.
2. EXISTING STORM SEWER TO BE REMOVED AS NECESSARY UNLESS NOTED OTHERWISE.
3. ABANDONED STORM SEWER TO BE PLUGGED.



7/17/2009 10:13:01 AM Michaelson

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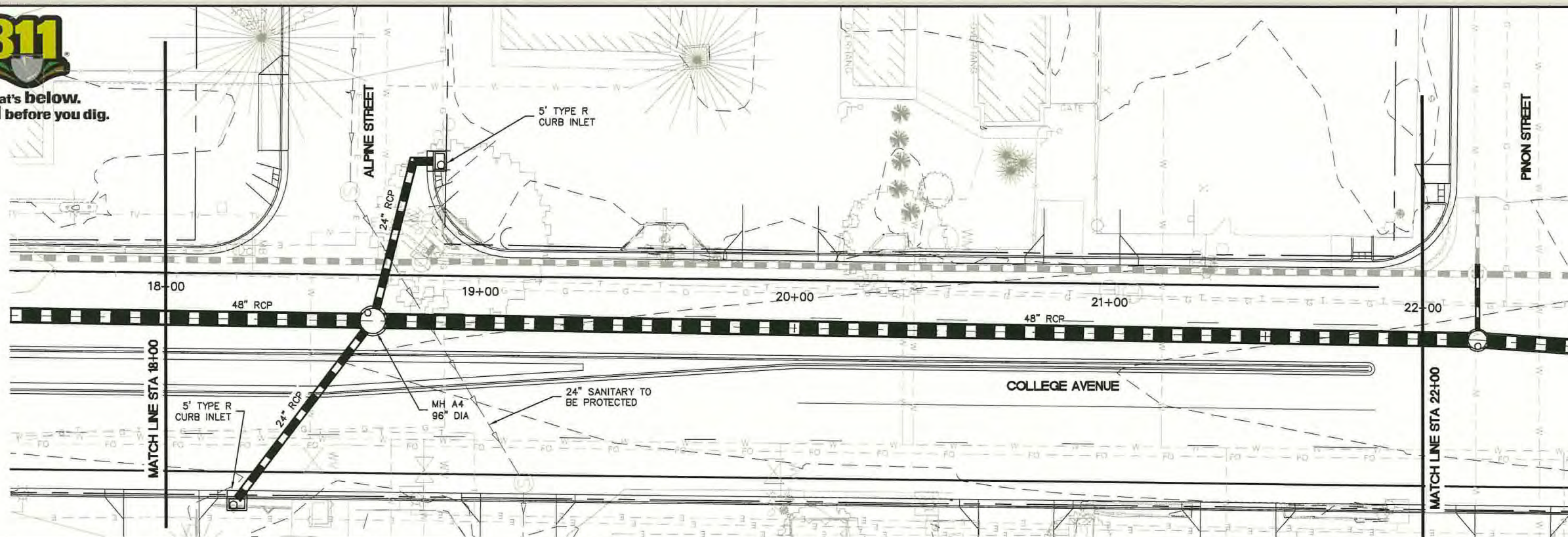
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No Revisions:	STORM SEWER A PLAN & PROFILE	
Revised:	STA 14+00 TO STA 18+00	
Void:	Engineer: J. MICHAELSEN	Structure Numbers
	Designer: J. MICHAELSEN	
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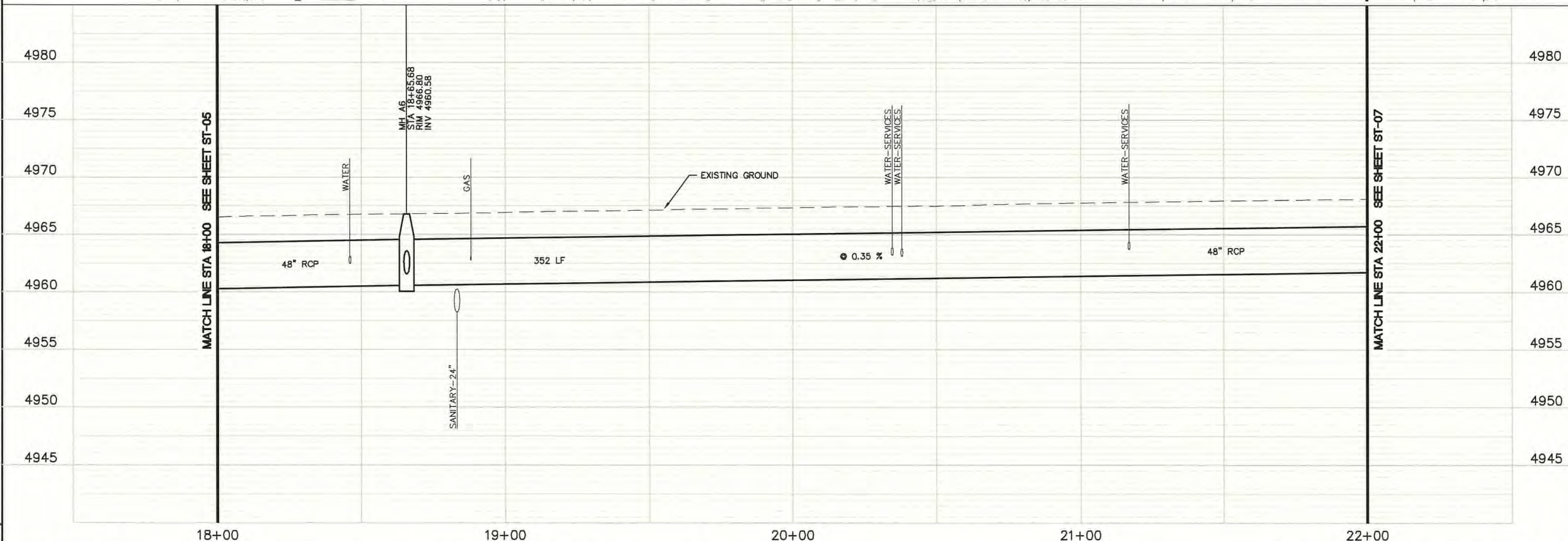
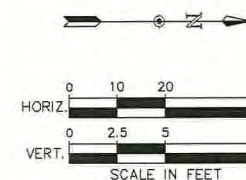
VICINITY MAP

LEGEND

- PROPOSED STORM SEWER
- PROPOSED INLET
- PROPOSED MANHOLE
- PROPOSED CONTOURS
- EXISTING WATER
- EXISTING SANITARY
- EXISTING GAS
- EXISTING FIBER OPTICS
- EXISTING ELECTRIC
- EXISTING TELEPHONE
- EXISTING CABLE TV
- EXISTING CONTOURS
- EXISTING STORM
- EXISTING ROW

NOTES

1. LOCATION AND DEPTH OF EXISTING UTILITIES ARE ESTIMATES.
2. EXISTING STORM SEWER TO BE REMOVED AS NECESSARY UNLESS NOTED OTHERWISE.
3. ABANDONED STORM SEWER TO BE PLUGGED.



7/17/2009 10:15:16 AM\michaelsej

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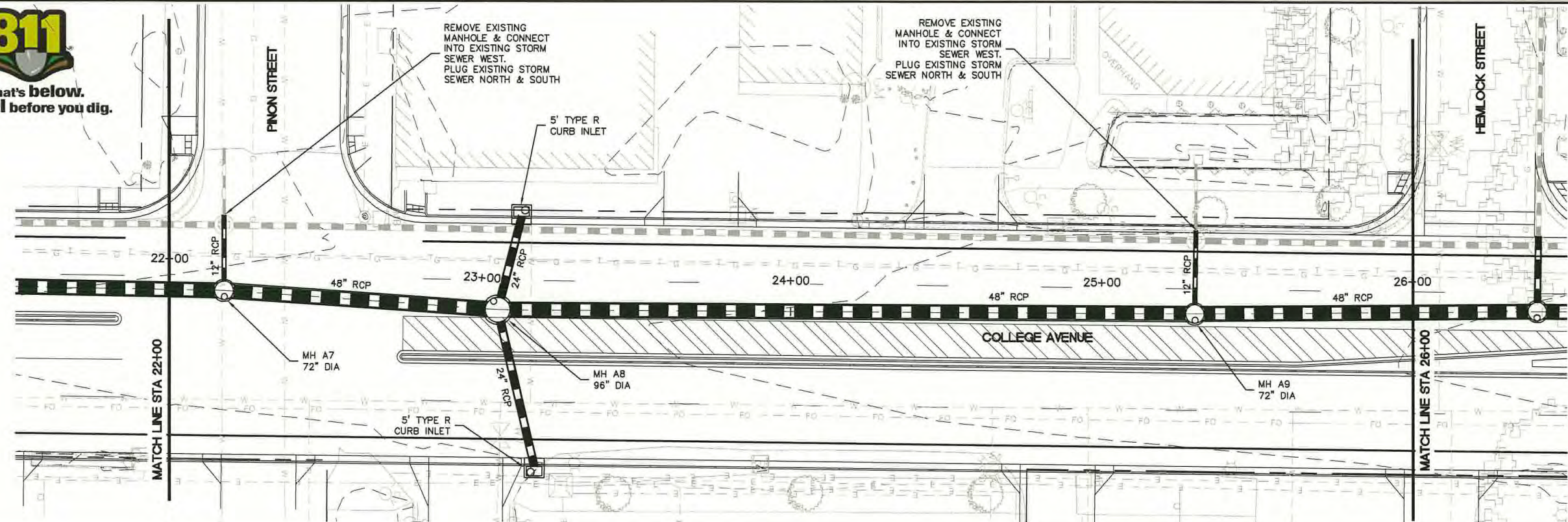
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Revised:	STA 18+00 TO STA 22+00	
Void:	Engineer: J. MICHAELSEN	Structure Numbers
	Designer: J. MICHAELSEN	
	Sheet Subset: STORM	Subset Sheets: ST-06 of 14

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Sheet Number	16





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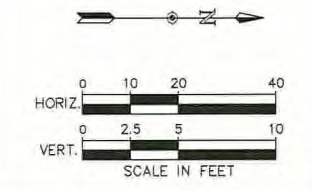
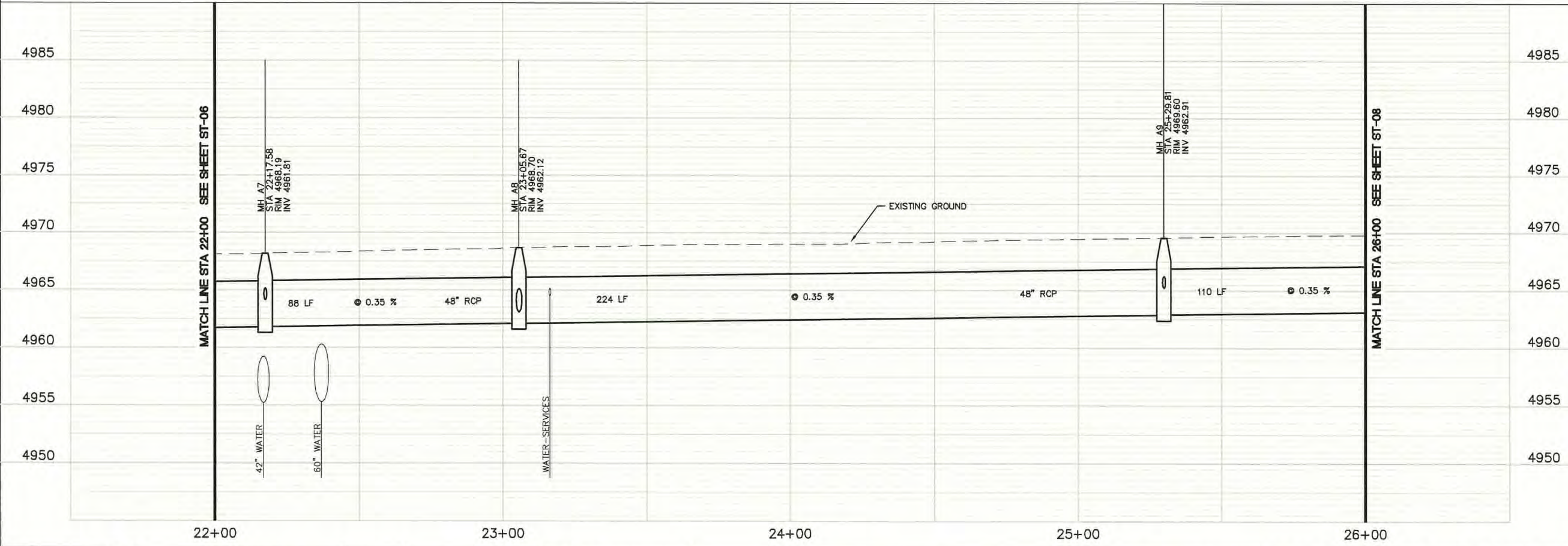
VICINITY MAP

LEGEND

- PROPOSED STORM SEWER
- PROPOSED INLET
- PROPOSED MANHOLE
- PROPOSED CONTOURS
- EXISTING WATER
- EXISTING SANITARY
- EXISTING GAS
- EXISTING FIBER OPTICS
- EXISTING ELECTRIC
- EXISTING TELEPHONE
- EXISTING CABLE TV
- EXISTING CONTOURS
- EXISTING STORM SEWER
- EXISTING ROW

NOTES

1. LOCATION AND DEPTH OF EXISTING UTILITIES ARE ESTIMATES.
2. EXISTING STORM SEWER TO BE REMOVED AS NECESSARY UNLESS NOTED OTHERWISE.
3. ABANDONED STORM SEWER TO BE PLUGGED.



7/17/2009 10:15:55 AM Michaelse

Print Date: August 13, 2009  
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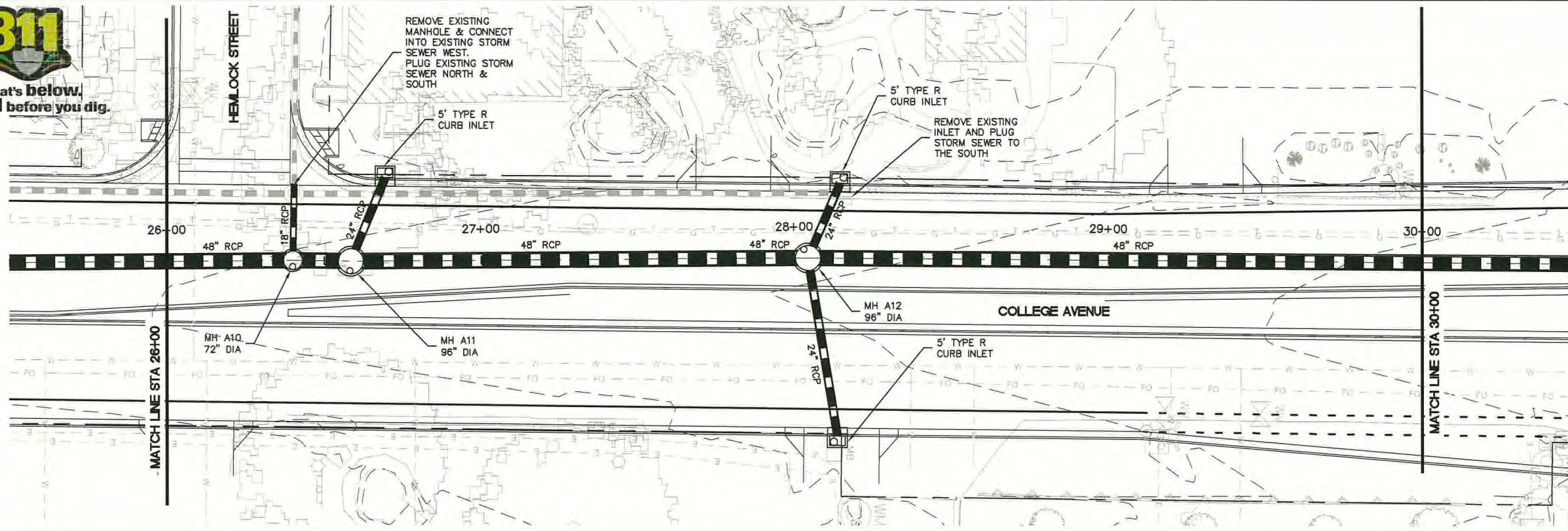
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Engineer: J. MICHAELSEN	Structure Numbers	
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Sheet Number	17





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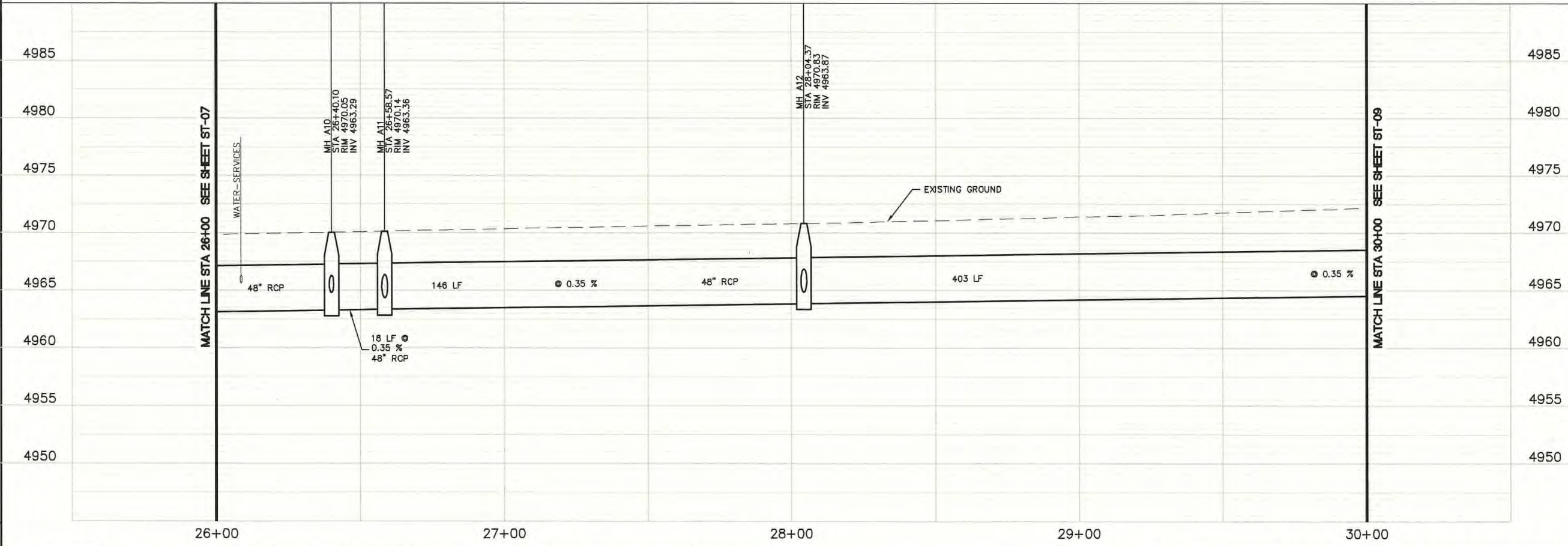
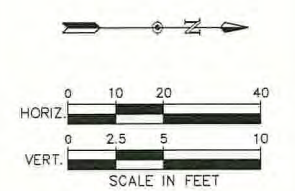


VICINITY MAP

LEGEND

- PROPOSED STORM SEWER
- PROPOSED INLET
- PROPOSED MANHOLE
- PROPOSED CONTOURS
- EXISTING WATER
- EXISTING SANITARY
- EXISTING GAS
- EXISTING FIBER OPTICS
- EXISTING ELECTRIC
- EXISTING CABLE TV
- EXISTING CONTOURS
- EXISTING STORM
- EXISTING ROW

NOTES



7/17/2009 10:16:44 AM Michaelsej

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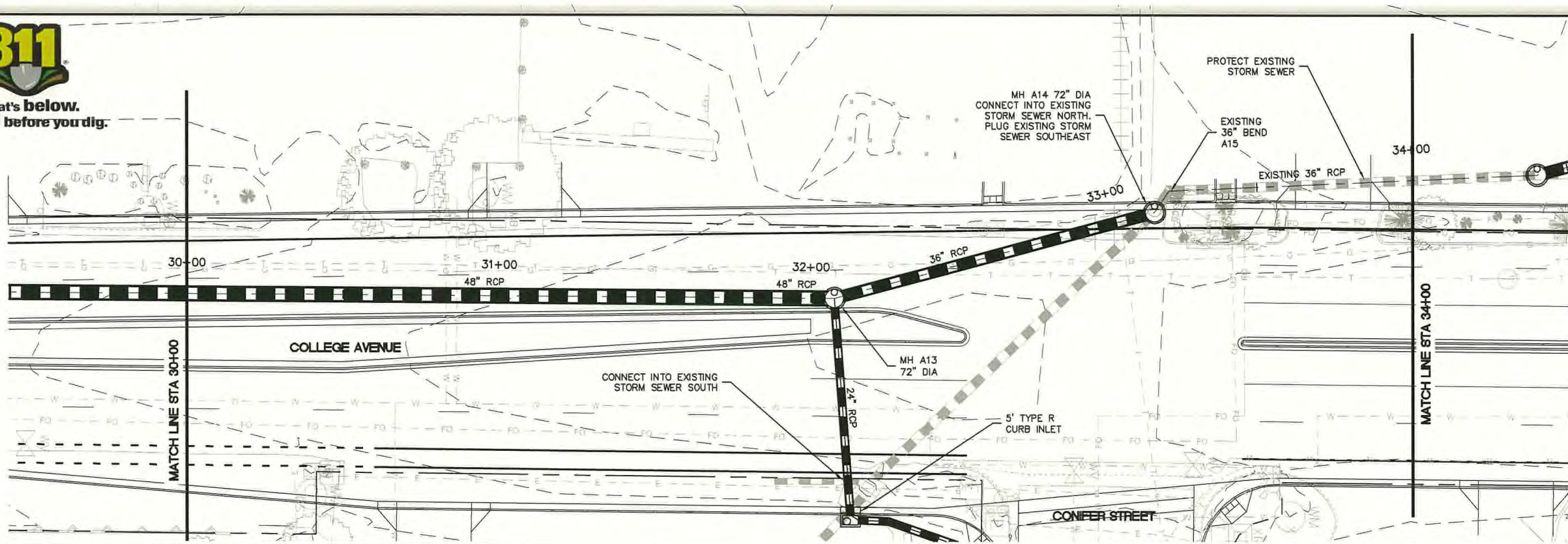
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No Revisions:	Engineer: J. MICHAELSEN	Structure Numbers
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 Sheet Number **18**





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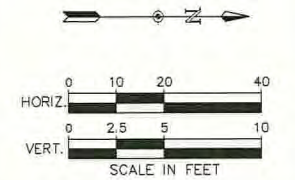
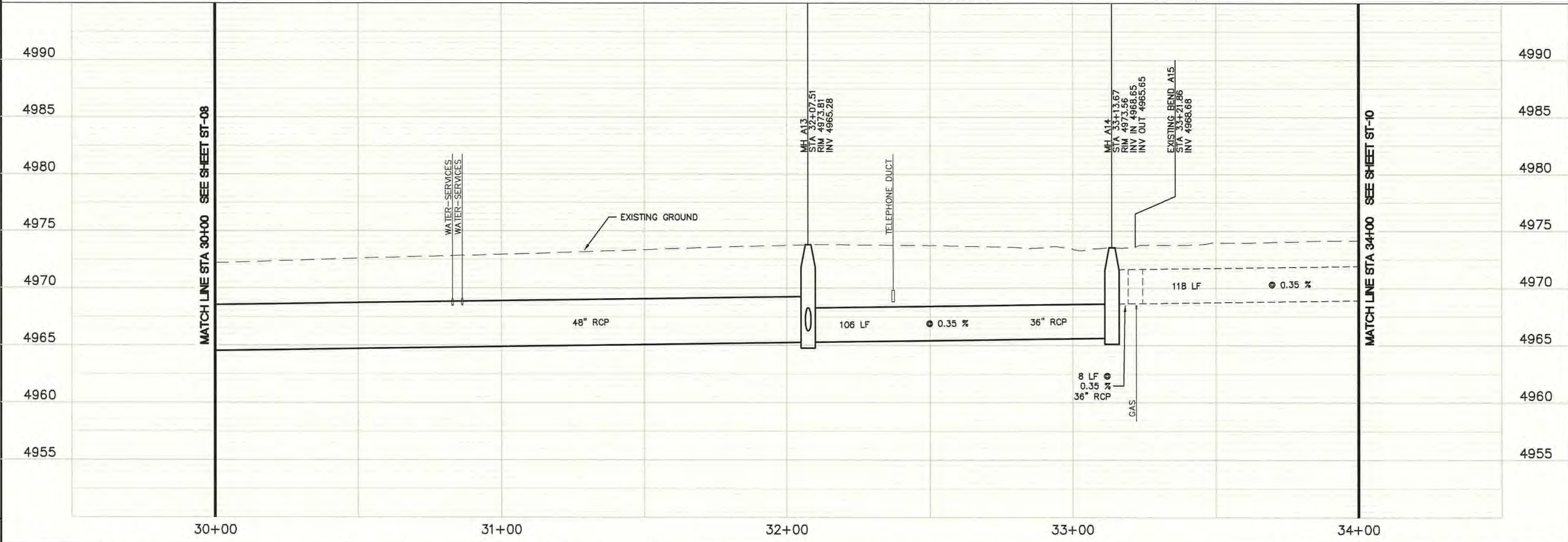
VICINITY MAP

LEGEND

- PROPOSED STORM SEWER
- PROPOSED INLET
- PROPOSED MANHOLE
- PROPOSED CONTOURS
- EXISTING WATER
- EXISTING SANITARY
- EXISTING GAS
- EXISTING FIBER OPTICS
- EXISTING ELECTRIC
- EXISTING TELEPHONE
- EXISTING CABLE TV
- EXISTING CONTOURS
- EXISTING STORM
- EXISTING ROW

NOTES

1. LOCATION AND DEPTH OF EXISTING UTILITIES ARE ESTIMATES.
2. EXISTING STORM SEWER TO BE REMOVED AS NECESSARY UNLESS NOTED OTHERWISE.
3. ABANDONED STORM SEWER TO BE PLUGGED.



7/17/2009 10:17:23 AM Michaelsej

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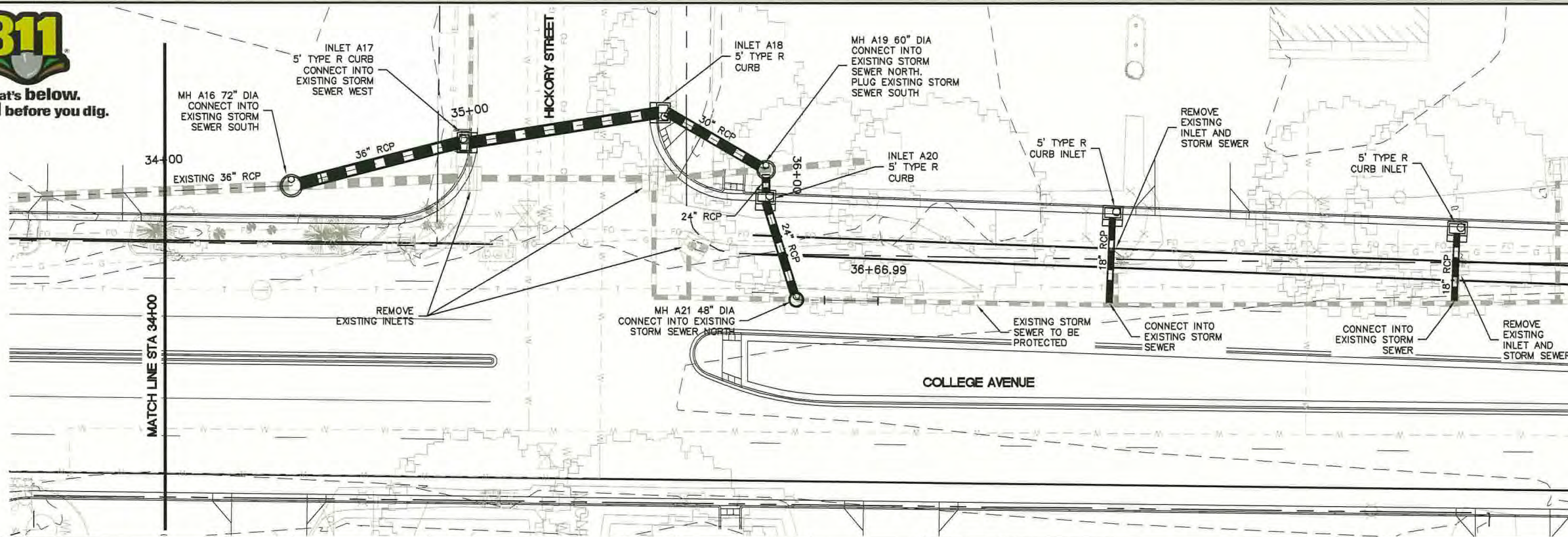
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No Revisions:	Engineer: J. MICHAELSEN	Structure Numbers
Revised:	Designer: J. MICHAELSEN	
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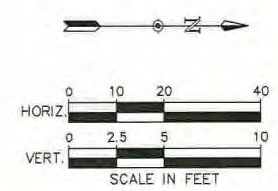
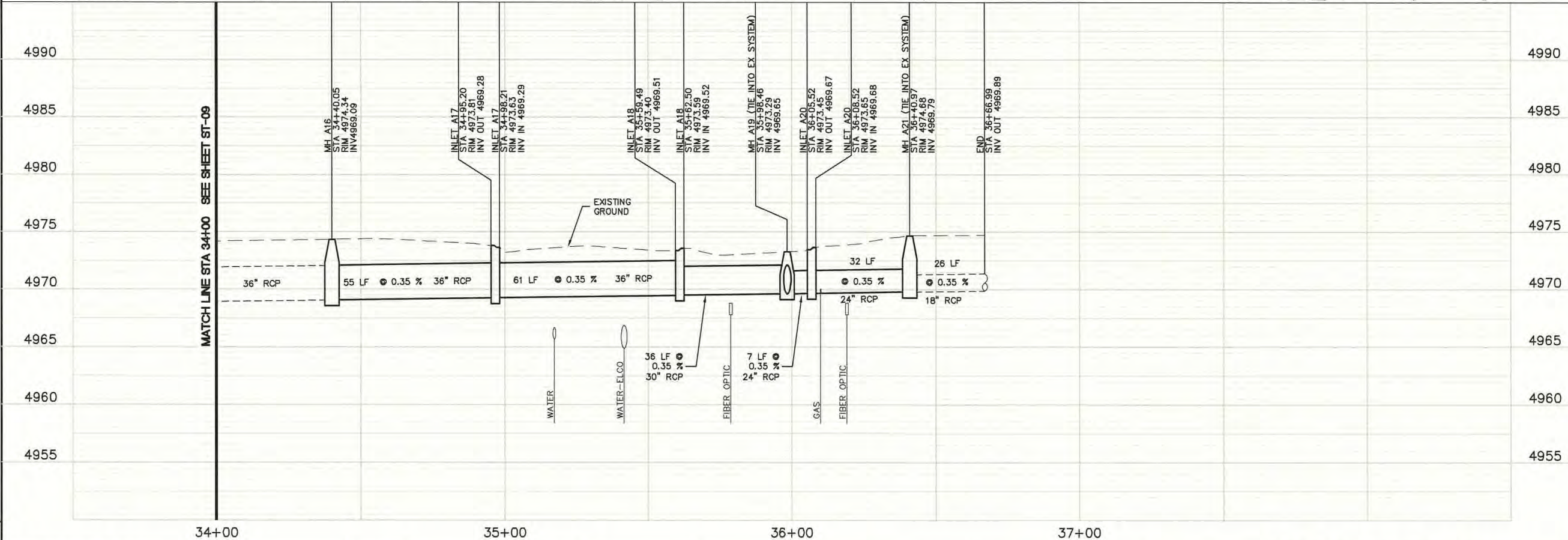
VICINITY MAP

LEGEND

- PROPOSED STORM SEWER
- PROPOSED INLET
- PROPOSED MANHOLE
- PROPOSED CONTOURS
- EXISTING WATER
- EXISTING SANITARY
- EXISTING GAS
- EXISTING FIBER OPTICS
- EXISTING ELECTRIC
- EXISTING TELEPHONE
- EXISTING CABLE TV
- EXISTING CONTOURS
- EXISTING STORM SEWER
- EXISTING ROW

NOTES

1. LOCATION AND DEPTH OF EXISTING UTILITIES ARE ESTIMATES.
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3. ABANDONED STORM SEWER TO BE PLUGGED.



7/17/2009 10:18:05 AM Michael Benji

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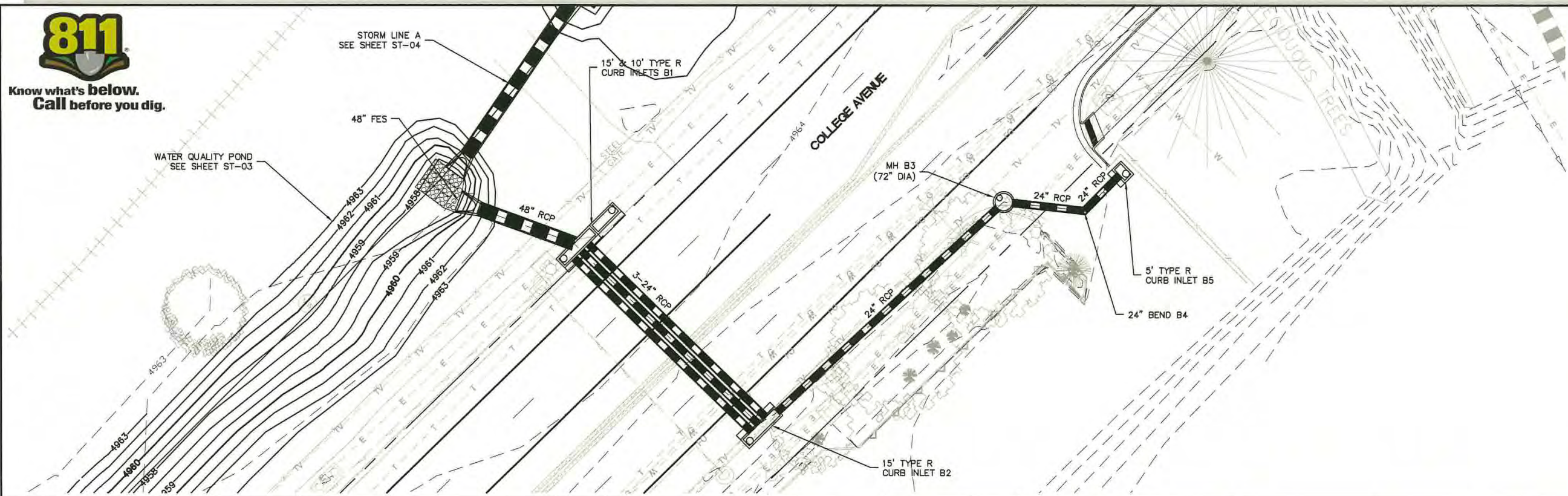
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Engineer: J. MICHAELSEN	Structure Numbers
Designer: J. MICHAELSEN	
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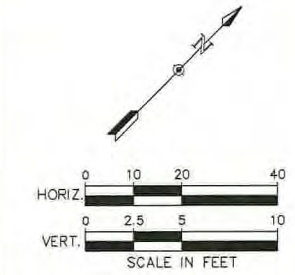
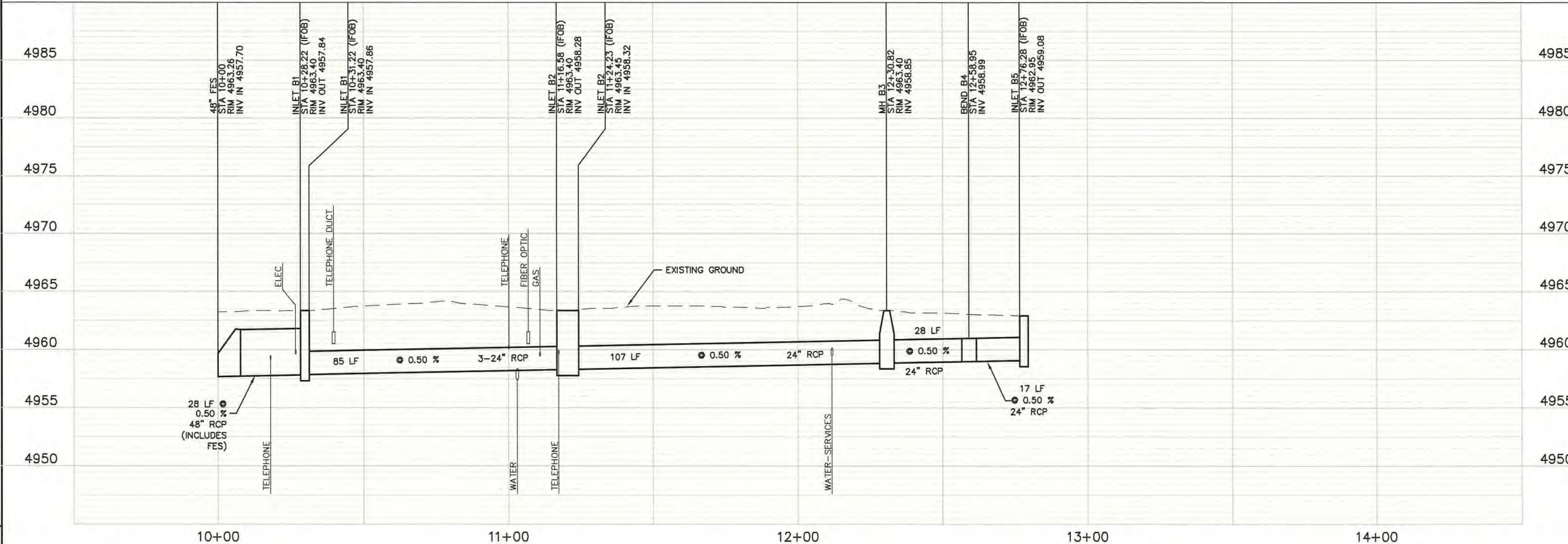
VICINITY MAP

LEGEND

- PROPOSED STORM SEWER
- PROPOSED INLET
- PROPOSED MANHOLE
- PROPOSED CONTOURS
- EXISTING WATER
- EXISTING SANITARY
- EXISTING GAS
- EXISTING FIBER OPTICS
- EXISTING ELECTRIC
- EXISTING TELEPHONE
- EXISTING CABLE TV
- EXISTING CONTOURS
- EXISTING STORM
- EXISTING ROW

NOTES

1. LOCATION AND DEPTH OF EXISTING UTILITIES ARE ESTIMATES.
2. EXISTING STORM SEWER TO BE REMOVED AS NECESSARY UNLESS NOTED OTHERWISE.
3. ABANDONED STORM SEWER TO BE PLUGGED.



7/17/2009 10:16:42 AM Michaelson

Print Date: August 13, 2009  
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**NORTH COLLEGE AVENUE IMPROVEMENTS**  
**STORM SEWER B PLAN & PROFILE**  
 STA 10+00 TO STA 12+76.28

Engineer: J. MICHAELSEN  
 Designer: J. MICHAELSEN

Structure Numbers:      

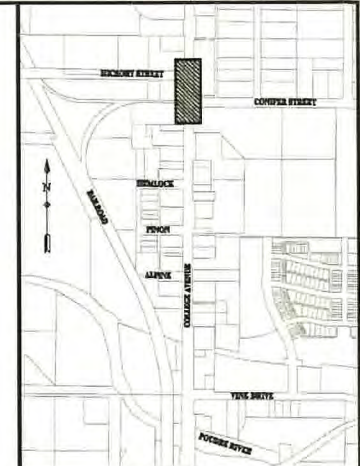
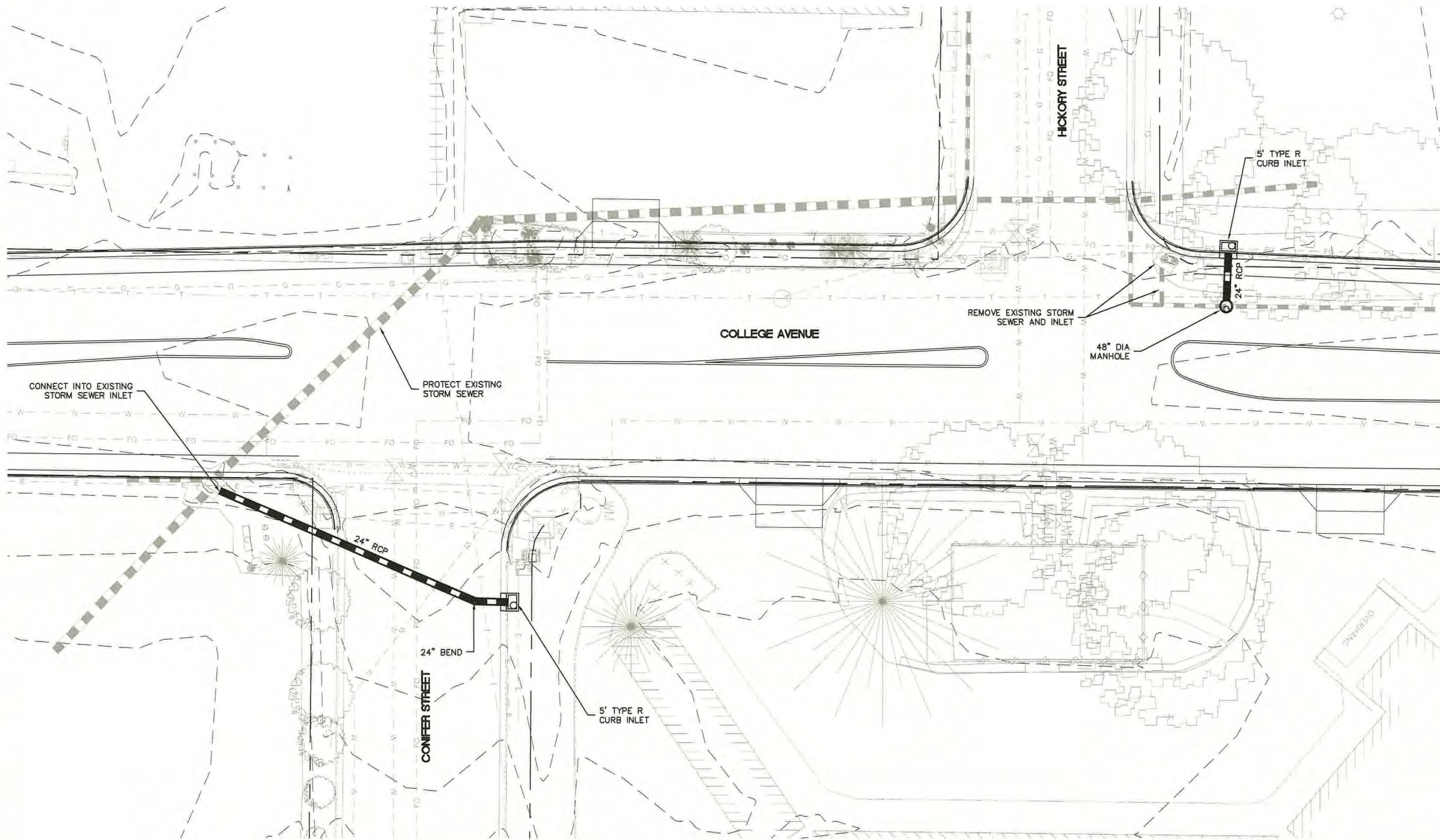
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Sheet Number	21





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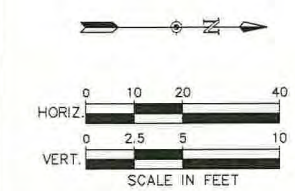
VICINITY MAP

LEGEND

- PROPOSED STORM SEWER
- PROPOSED INLET
- PROPOSED MANHOLE
- 5040 PROPOSED CONTOURS
- EXISTING WATER
- EXISTING SANITARY
- EXISTING GAS
- EXISTING FIBER OPTICS
- EXISTING ELECTRIC
- EXISTING TELEPHONE
- EXISTING CABLE TV
- 4956 EXISTING CONTOURS
- EXISTING STORM
- EXISTING ROW

NOTES

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3. ABANDONED STORM SEWER TO BE PLUGGED.



7/17/2009 10:19:08 AMichaelsej

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Proposed	NORTH COLLEGE AVENUE IMPROVEMENTS HICKORY & CONIFER INTERSECTION STORM SEWER ALTERNATE
No Revisions:	
Revised:	
Void:	

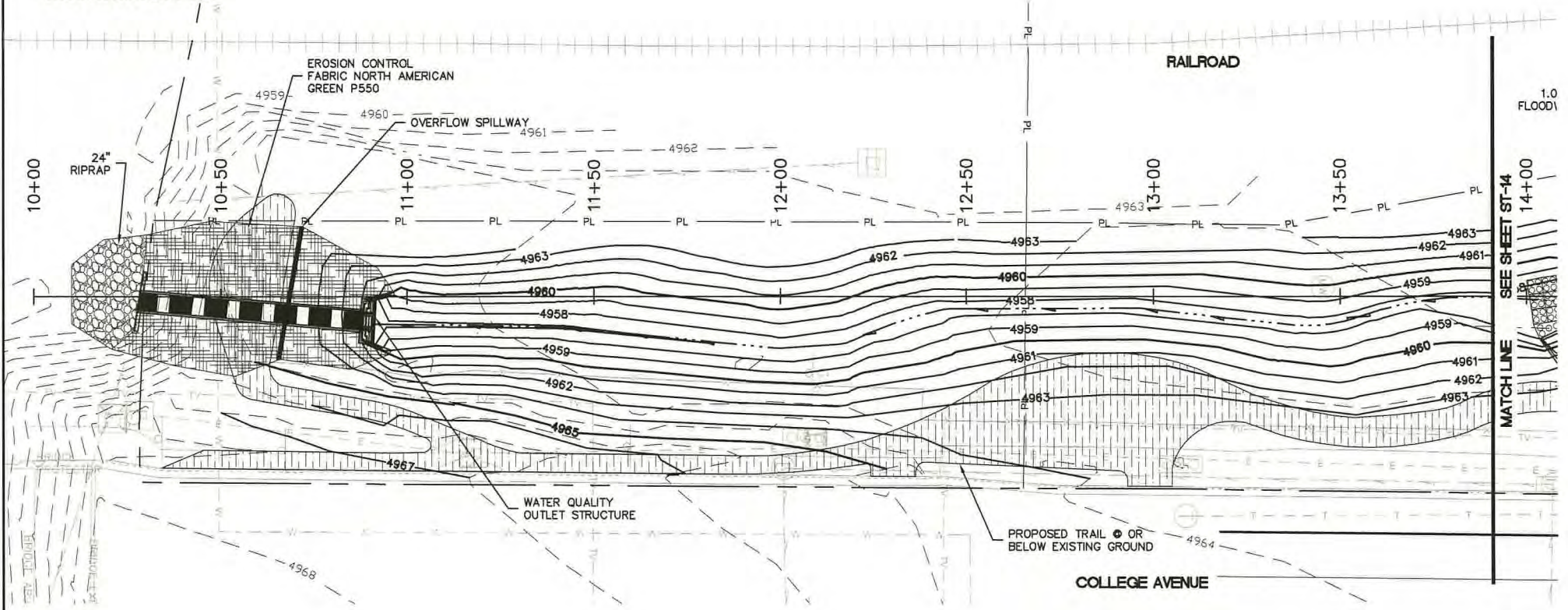
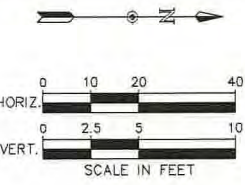
Engineer: J. MICHAELSEN	Structure Numbers
Designer: J. MICHAELSEN	
Sheet Subset: STORM	Subset Sheets: ST-12 of 14

Project No./Code	
Sheet Number	

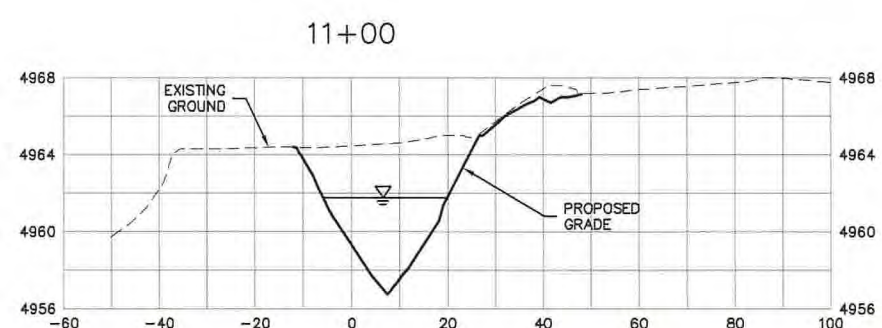
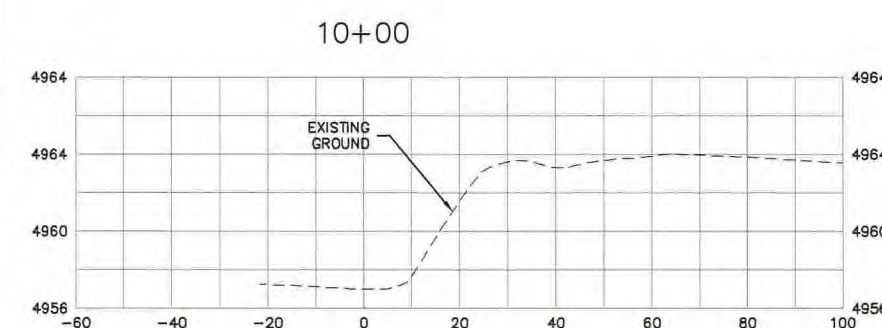
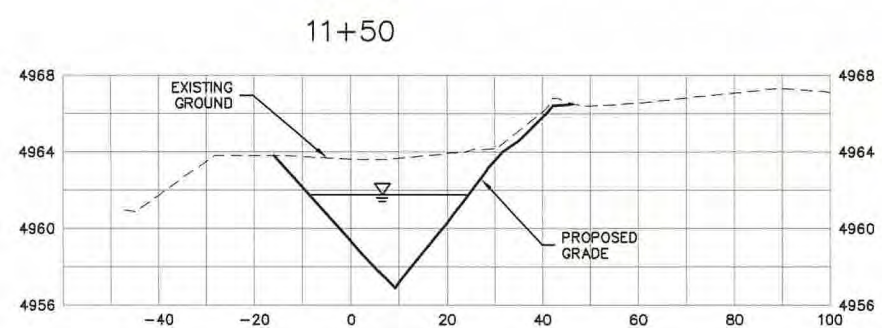
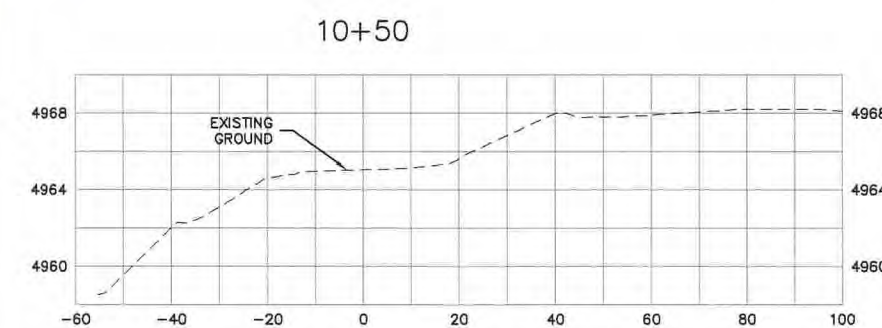
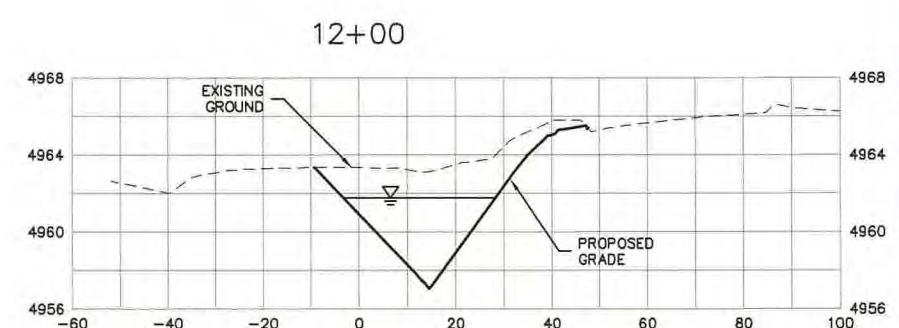
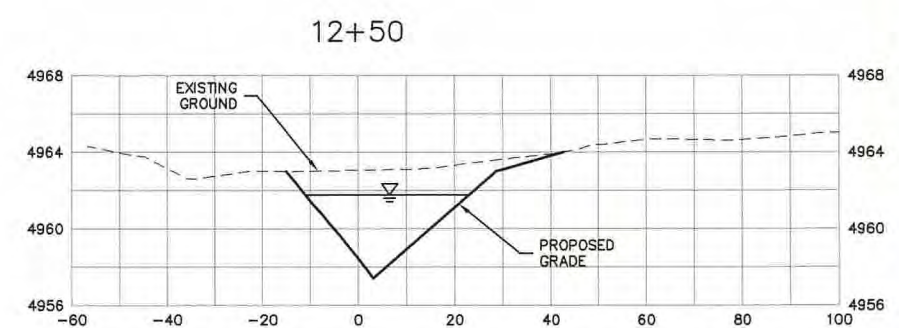
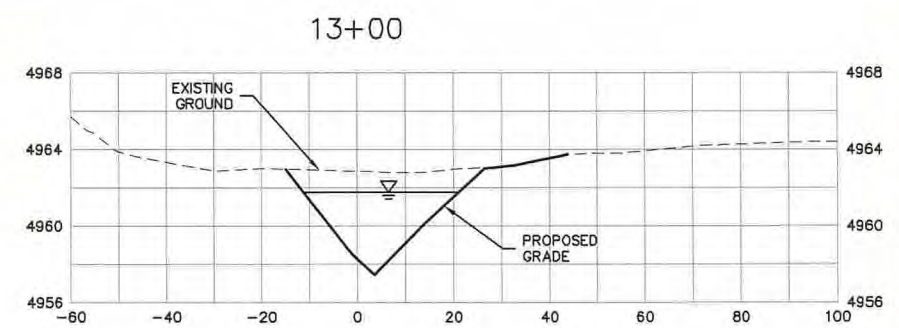
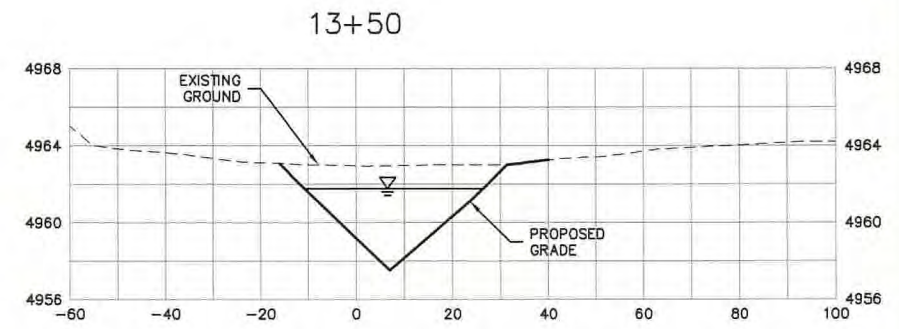




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PROPOSED WSEL = 4961.77



7/17/2009 10:20:06 AM Michaelsonj

Print Date: August 13, 2009  
 Drawing File Name: F:\32-1415.00 North College\MainDwgs\09001Storm13-14.dwg  
 Horiz. Scale: Vert. Scale:  
**AYRES ASSOCIATES** Engineers/Scientists/Surveyors  
 3665 JFK Parkway, Building 2, Suite 200  
 P.O. Box 270460  
 Fort Collins, CO 80527  
 (970) 223-5556

Sheet Revisions		
Date:	Comments	Init.

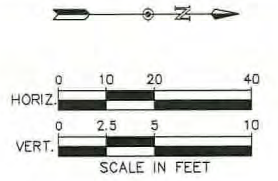
**City of Fort Collins**  
 281 North College Avenue  
 Fort Collins, CO 80521  
 Phone: (970) 221-6605  
 Fax: (970) 221-6378

Proposed	NORTH COLLEGE AVENUE IMPROVEMENTS		Project No./Code
No Revisions:	CROSS SECTION MAP		
Revised:	Engineer: J. MICHAELSEN	Structure Numbers	Sheet Number
Void:	Designer: J. MICHAELSEN	Subset Sheets: ST-13 of 14	
Sheet Subset: STORM		23	

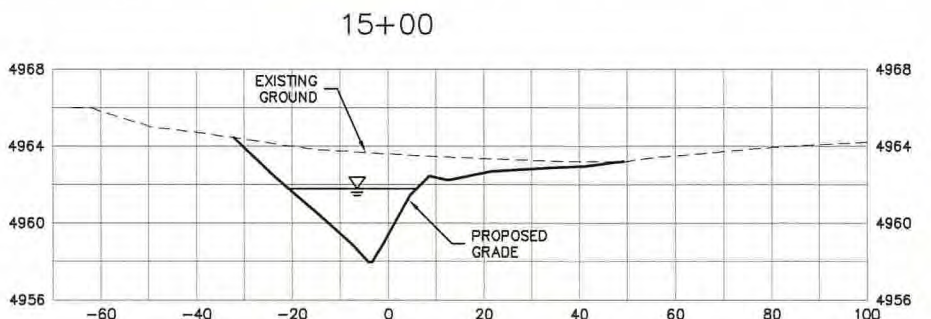
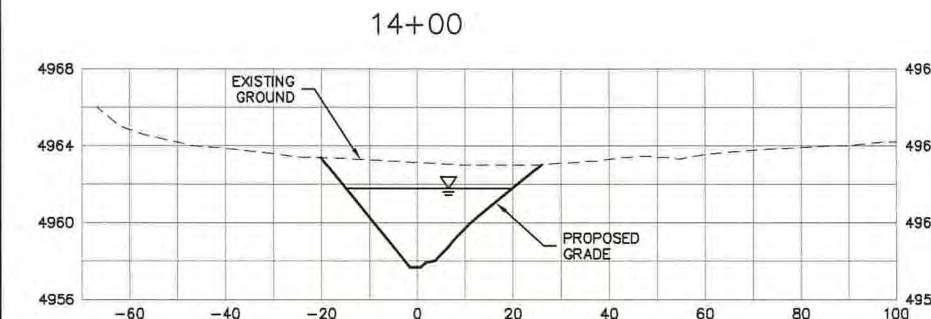
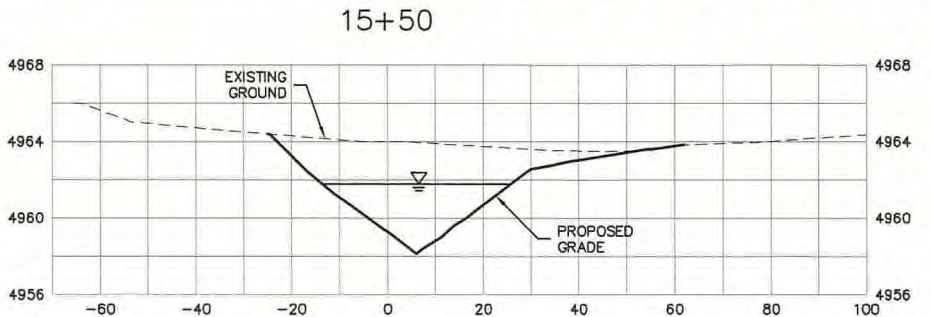
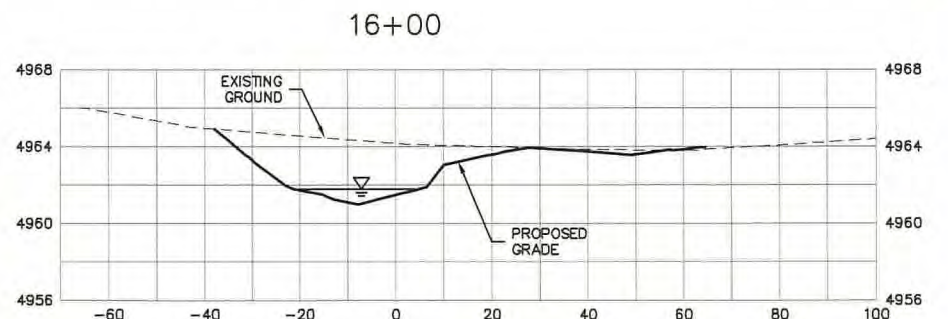
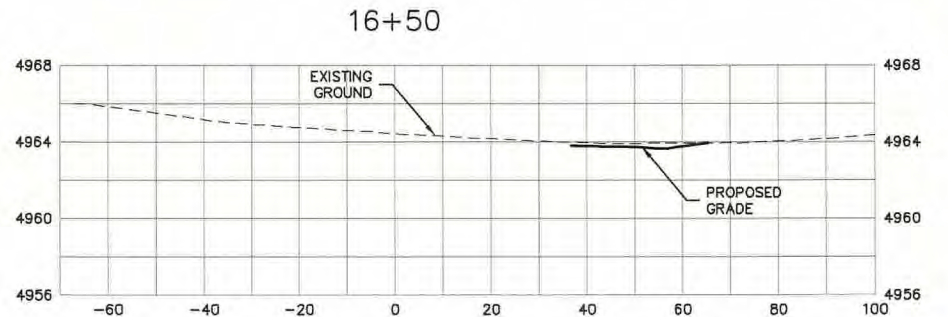
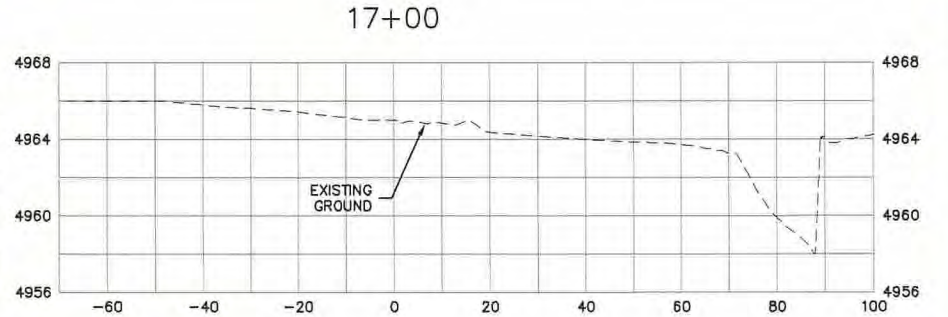
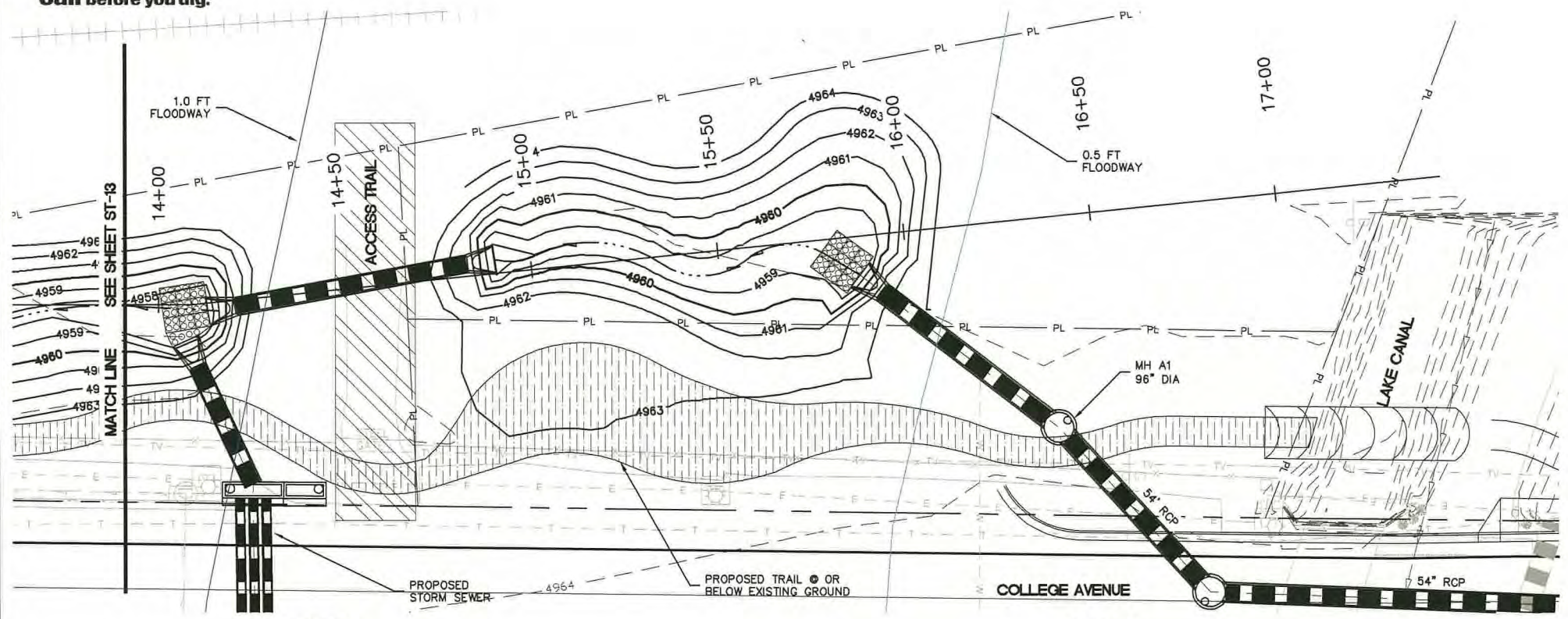




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PROPOSED WSEL = 4961.77



7/17/2009 10:20:06 AM Michael Jensen

Print Date: August 13, 2009	
Drawing File Name: F:\32-1415.00 North College\MainDwgs\09001Storm13-14.dwg	
Horiz. Scale:	Vert. Scale:
Engineers/Scientists/Surveyors 3665 JFK Parkway, Building 2, Suite 200 P.O. Box 270480 Fort Collins, CO 80527 (970) 223-5556	

Sheet Revisions		
Date:	Comments	Init.

281 North College Avenue  
 Fort Collins, CO 80521  
 Phone: (970) 221-6605  
 Fax: (970) 221-6378

Proposed No Revisions: Revised: Void:	NORTH COLLEGE AVENUE IMPROVEMENTS CROSS SECTION MAP		Project No./Code
	Engineer: J. MICHAELSEN Designer: J. MICHAELSEN	Structure Numbers	Sheet Number
	Sheet Subset: STORM	Subset Sheets: ST-14 of 14	24





1420 2nd Street  
Greeley, CO 80631  
Phone: 970-350-2153 FAX: 970-350-2178

Sheet Revisions

Date mm/dd/yy	Description XXXXXXXX	Initials XXX

Sheet Revisions

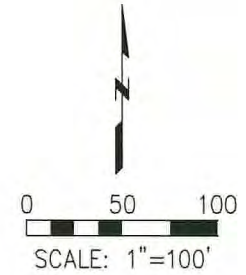
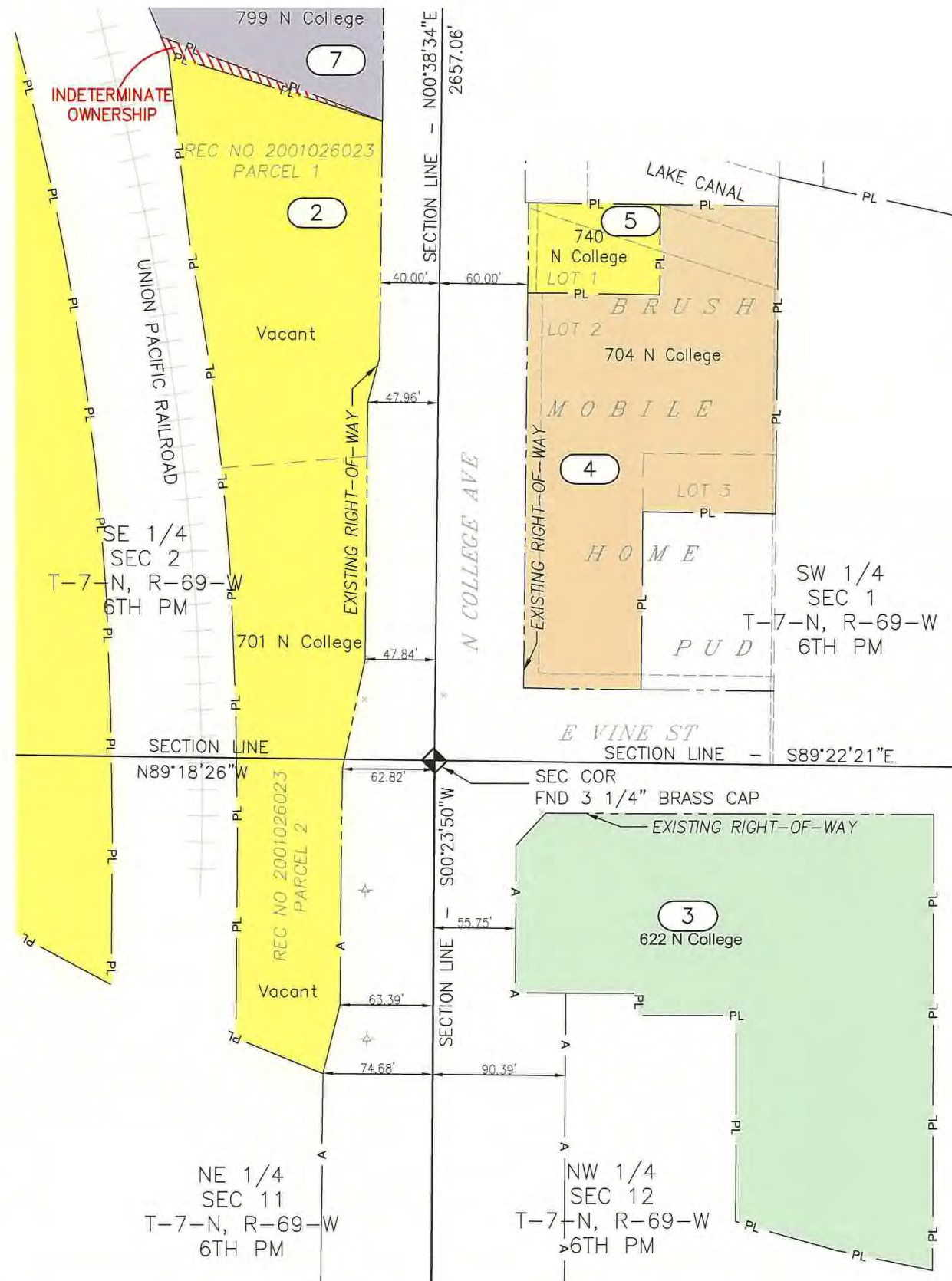
Date mm/dd/yy	Description XXXXXXXX	Initials XXX

**Farnsworth GROUP**  
4755 FORGE ROAD, SUITE 150  
COLORADO SPRINGS, CO. 80907  
(719) 590-9194 / (719) 590-9111 Fax

Right of Way Plans  
Ownership Sheet

Project Number: AQC M455-079  
Project Location: NORTH COLLEGE/US 287 IMPROVEMENTS

Project Code: 16489	Last Mod. Date: 07-01--09	Subset: 1 of 5	Sheet No.: 8.01	25
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- 2 The City of Fort Collins, Colorado  
A Municipal Corporation  
PO Box 580  
Fort Collins, CO 80521  
Commitment No - 25087941  
Assessor No 97024-006-905, 97111-32-902 & 97024-36-901
- 3 Karen Morak, LLC  
622 N College Ave  
Fort Collins, CO 80524  
Commitment No - 25085685  
Assessor No 97122-00-012
- 4 Charles L Meserlian  
1612 Hastings Dr  
Fort Collins, CO 80526  
Commitment No - 25085658  
Assessor No 97013-07-002
- 5 The City of Fort Collins, Colorado  
A Municipal Corporation  
300 LaPorte Ave  
Fort Collins, CO 80521  
Commitment No - 25087967  
Assessor No 97013-07-901
- 7 Robert W Walters and  
Bernadine E Walter, husband and wife  
2148 Sheffield Dr  
Fort Collins, CO 80521  
Commitment No - 25085802  
Assessor No 97024-24-016





Sheet Revisions

Date mm/dd/yy	Description XXXXXXXX	Initials XXX

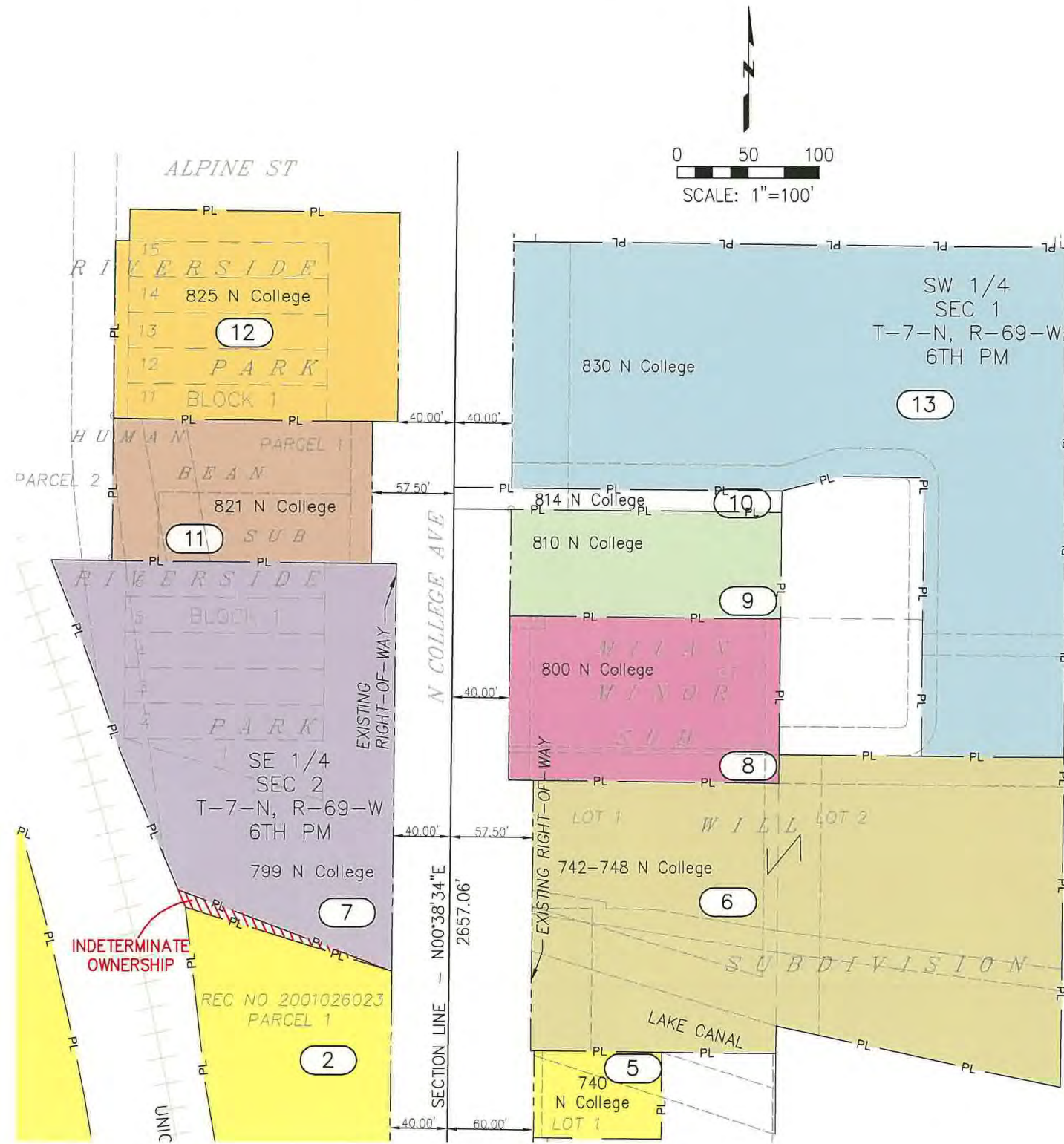
Sheet Revisions

Date mm/dd/yy	Description XXXXXXXX	Initials XXX

**Farnsworth GROUP**  
4755 FORGE ROAD, SUITE 150  
COLORADO SPRINGS, CO. 80907  
(719) 590-9194 / (719) 590-9111 Fax

Right of Way Plans  
Ownership Sheet

Project Number: AQC M455-079			
Project Location: NORTH COLLEGE/US 287 IMPROVEMENTS			
Project Code: 16489	Last Mod. Date: 07-01-09	Subset: 2 of 5	Sheet No.: 8.02 <b>26</b>



- 2 The City of Fort Collins, Colorado  
A Municipal Corporation  
PO Box 580  
Fort Collins, CO 80521  
Commitment No - 25087941  
Assessor No 97024-36-901
- 6 L & W Properties,  
a Limited Liability Company  
232 Walnut St  
Fort Collins, CO 80524  
Commitment No - 25085682  
Assessor No 97013-19-001
- 8 Randy Milan  
1402 Catalpa Ct  
Fort Collins, CO 80521  
Commitment No - 25085681  
Assessor No 97013-60-001
- 10 Owner unclear  
Assessor No 97013-00-042
- 12 GARA, LLC, A Limited Liability Company  
2120 S College Ave  
Fort Collins, CO 80525  
Commitment No - 25085804  
Assessor No 97024-24-011

- 5 The City of Fort Collins, Colorado  
A Municipal Corporation  
300 LaPorte Ave  
Fort Collins, CO 80521  
Commitment No - 25087967  
Assessor No 97013-07-901
- 7 Robert W Walters and  
Bernadine E Walter, husband and wife  
2148 Sheffield Dr  
Fort Collins, CO 80521  
Commitment No - 25085802  
Assessor No 97024-24-016
- 9 800 Block, LLC, a Colorado  
Limited Liability Company  
1220 S College Ave  
Fort Collins, CO 80524  
Commitment No - 25085680  
Assessor No 97013-00-035
- 11 HSH, LLC, A Colorado Limited  
Liability Company  
PO Box 270114  
Fort Collins, CO 80527  
Commitment No - 25085803-2  
Assessor No 97024-49-001
- 13 Bowl Fort Collins, LLC, a Colorado  
Limited Liability Company  
830 N College Ave  
Fort Collins, CO 80524  
Commitment No - 25085679  
Assessor No 97013-00-018





1420 2nd Street  
Greeley, CO 80631  
Phone: 970-350-2153 FAX: 970-350-2178

Sheet Revisions

Date mm/dd/yy	Description XXXXXXXX	Initials XXX

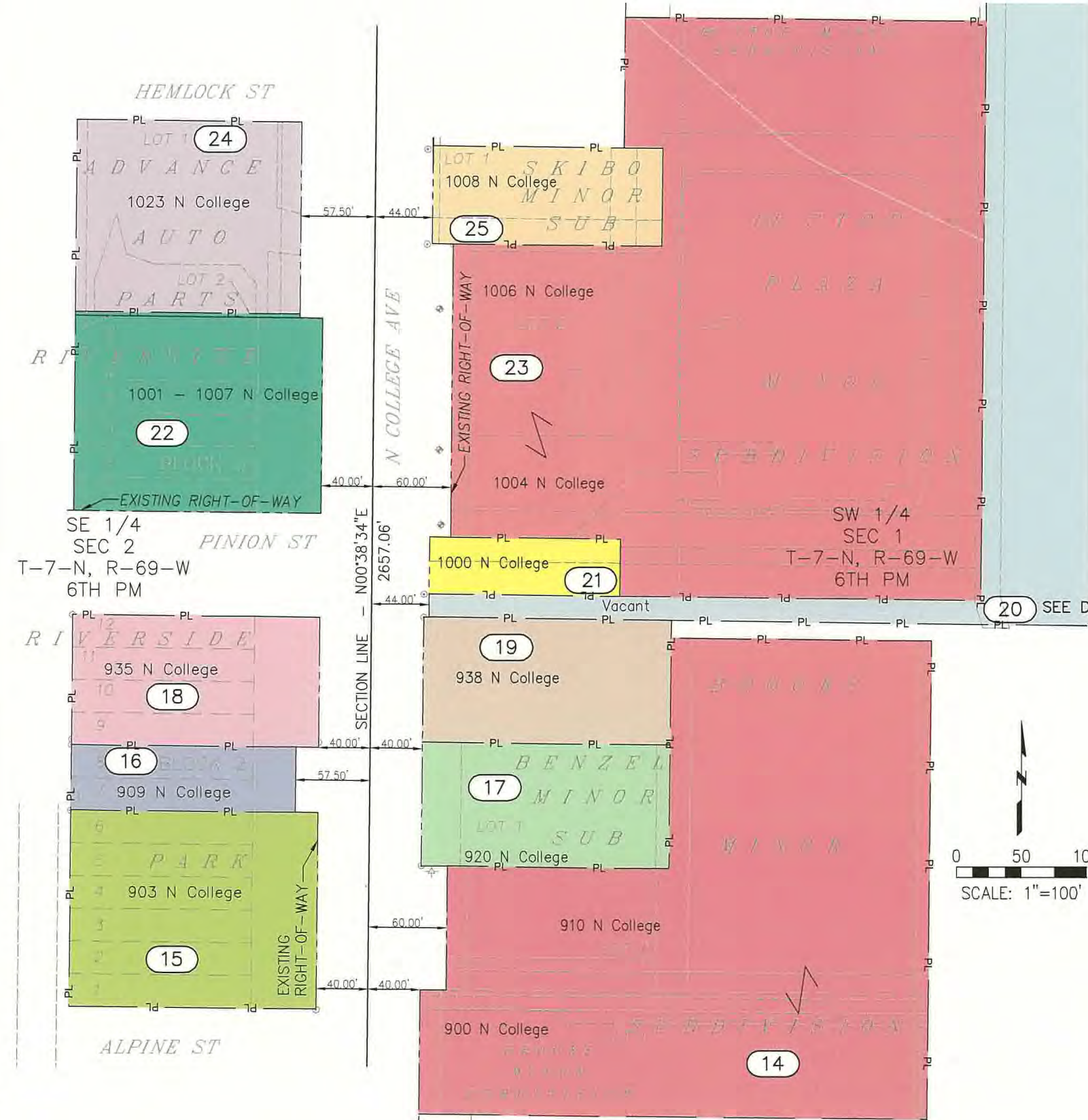
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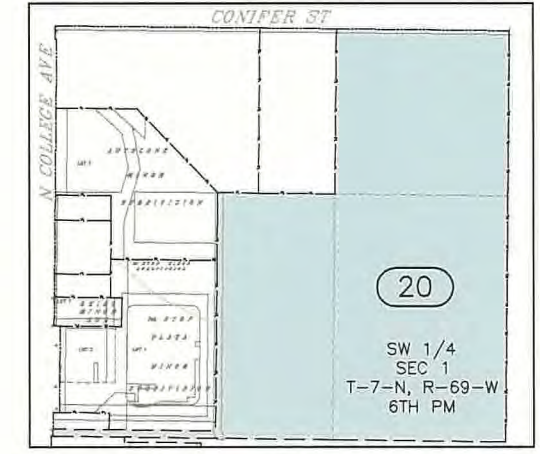
**Farnsworth GROUP**  
4755 FORGE ROAD, SUITE 150  
COLORADO SPRINGS, CO. 80907  
(719) 590-9194 / (719) 590-9111 Fax

Right of Way Plans  
Ownership Sheet

Project Number: AQC M455-079		
Project Location: NORTH COLLEGE/US 287 IMPROVEMENTS		
Project Code: 16489	Last Mod. Date: 07-01-09	Sheet No. 27
	Subset: 3 of 5	8.03



- 14 Flack and Jensen, LLC, A Colorado Limited Liability Company  
900-910 N College Ave  
Fort Collins, CO 80524  
Commitment No - 25085638  
Assessor No 97013-16-001 & 97013-16-002
- 15 North College Associates, Ltd  
903 N College Ave  
Fort Collins, CO 80524  
Commitment No - 25085831  
Assessor No 97024-23-001 & 97024-23-006
- 16 Warren K Kraxberger and Verlene R Kraxberger, an undivided 50% interest  
3784 Carrington Circle  
Fort Collins, CO 80525  
Commitment No - 25085805  
Assessor No 97024-23-007
- 17 Harry J Elder and Mary Lou Elder  
5300 N CR 11  
Fort Collins, CO 80524  
Commitment No - 25085656  
Assessor No 97013-14-001
- 18 North College Lofts, LLC, a Colorado Limited Liability Company  
1220 S College Ave  
Fort Collins, CO 80524  
and Clark Dewitt Investment Group, LLC, a Colorado Limited Liability Company as to an undivided 25% interest  
325 Cherry Street - #210  
Fort Collins, CO 80521  
Commitment No - 25085832  
Assessor No 97024-23-009
- 19 K R Pastor Company, a Colorado limited partnership  
2849 S College Ave  
Fort Collins, CO 80525  
Commitment No - 25085688  
Assessor No 97013-00-014
- 20 Ali Akbary as to an undivided 1/3 interest, Khalil Kamandy as to an undivided 1/3 interest and Moe Kamandy as to an undivided 1/3 interest  
1710 Linden Way  
Fort Collins, CO 80524  
Commitment No - 25076172  
Assessor No 97013-00-054
- 21 City of Fort Collins, Colorado a municipal corporation  
PO Box 580  
Fort Collins, CO 80522  
Commitment No - 25087947  
Assessor No 97013-00-907
- 22 Trinity Investments Limited, LLC, a Colorado Limited Liability Company as to an undivided 1/3 interest and North College Lofts, LLC, a Colorado Limited Liability Company as to an undivided 1/3 interest and E Leroy Black and E Linda Black as joint tenants as to an undivided 1/3 interest  
1220 S College Ave  
Fort Collins, CO 80524  
Commitment No - 25085833  
Assessor No 97024-14-001 & 97024-50-002
- 23 Flack and Jensen, LLC, A Colorado Limited Liability Company  
1220 S College Ave  
Fort Collins, CO 80524  
Commitment No - 25085643 & 25085657  
Assessor No 97013-69-002 & 97013-69-001
- 24 No Title Commitment  
Assessor No 97024-50-001
- 25 SKIBO INVESTMENTS, a Limited Liability Company  
1008 N College Ave  
Fort Collins, CO 80524  
Commitment No - 25085678  
Assessor No 97013-13-001



DETAIL - (NO SCALE)

\$DATES\$ \$PLOT\_INFO\$





Sheet Revisions

Date mm/dd/yy	Description XXXXXXXX	Initials XXX

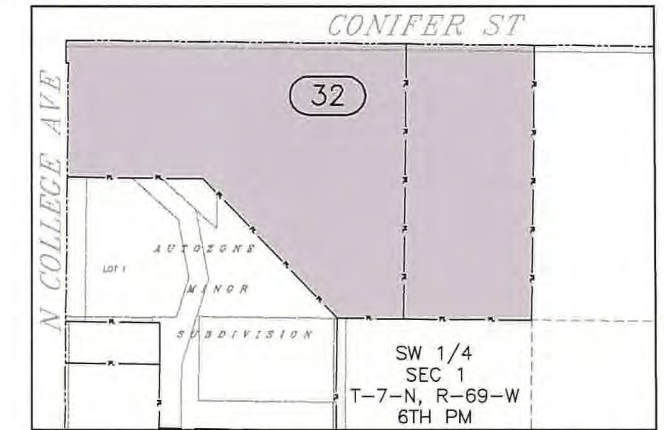
Sheet Revisions

Date mm/dd/yy	Description XXXXXXXX	Initials XXX

Right of Way Plans

Ownership Sheet

Project Number: AQC M455-079			
Project Location: NORTH COLLEGE/US 287 IMPROVEMENTS			
Project Code: 16489	Last Mod. Date: 07-01-09	Subset: 4 of 5	Sheet No. 28



DETAIL - (NO SCALE)

- 26** Screaming Eagle Properties  
2436 Cochetopa CT  
Fort Collins, CO 80525  
Commitment No - 25085677-2  
Assessor No 97013-00-015 & 97013-00-019
- 27** Rush Family LLC,  
a Colorado Limited Liability Company  
983 Northern Way  
Superior, CO 80027  
Commitment No - 25085806  
Assessor No 97024-13-001
- 28** Stanley James Friesen and  
Gale Marie Friesen, as joint tenants  
1700 Silvergate Road,  
Fort Collins, CO 80526  
Commitment No - 25085675  
Assessor No 97013-00-016
- 29** DEF Enterprises, LLC,  
a Colorado limited liability company  
309 N 42nd Ave  
Greeley, CO 80634  
Commitment No - 25085834  
Assessor No 97024-13-005 &  
97024-13-007
- 30** AutoZone, Inc  
PO Box 2198 - Dept.4040  
Memphis, TN 38101-9842  
Commitment No - 25085673  
Assessor No 97013-17-001
- 31** International Church of the  
Foursquare Gospel  
1201 N College Ave  
Fort Collins, CO 80521  
Commitment No - 25085808  
Assessor No 97024-34-907
- 32** James E Quinlan  
1016 Sycamore  
Fort Collins, CO  
Commitment No - 25085672  
Assessor No 97013-00-039
- 33** Miriam T Moreng  
6221 N County Road 15  
Fort Collins, CO 80524  
Commitment No - 25085809  
Assessor No 97024-34-003
- 34** Richard M Neistat  
10993 E Crestline Ave  
Englewood, CO 80111-3802  
Commitment No - 25085810  
Assessor No 97024-34-002
- 35** Union Pacific Railroad  
No Title Commitment

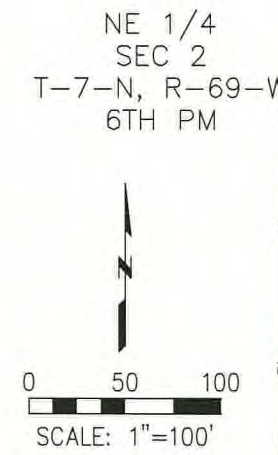
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Date	Description	Initials
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Sheet Revisions		
Date	Description	Initials
mm/dd/yy	XXXXXXXX	XXX

Right of Way Plans			
Ownership Sheet			
Project Number: AQC M455-079			
Project Location: NORTH COLLEGE/US 287 IMPROVEMENTS			
Project Code: 16489	Last Mod. Date: 07-01-09	Subset: 5 of 5	Sheet No.: 29 of 8.05



- 34** Richard M Neistat  
10993 E Crestline Ave  
Englewood, CO 80111-3802  
Commitment No - 25085810  
Assessor No 97024-34-002
- 35** Union Pacific Railroad  
No Title Commitment
- 36** Kenneth L Reynolds, as to an undivided one-half (1/2) interest, and Sue C Reynolds, as to an undivided one-half (1/2) interest as tenants in common  
2250 Terry Lake Road  
Fort Collins, CO 80524  
Commitment No - 25085811  
Assessor No 97024-15-005
- 37** Lyle Carpenter  
PO Box 22293  
Denver, CO 80222-0293  
Commitment No - 25085955  
Assessor No 97013-12-004
- 38** YoonLee Inc, a Colorado Corporation  
1220 N College Ave  
Fort Collins, CO 80524  
Commitment No - 25085954  
Assessor No 97012-00-002
- 39** PBR-FT Land Enterprises, LLC, a Colorado limited liability company  
5801 W 11th Street, Suite 201  
Greeley, CO 80634  
Commitment No - 25085953  
Assessor No 97021-09-002
- 40** Stephen P Mecham, Carolyn L Mecham, Stephen G Mecham and Ramona C Mecham  
813 Oxford Lane  
Fort Collins, CO 80525  
Commitment No - 25085957  
Assessor No 97013-09-020
- 41** The Gillett Revocable Living Trust  
1136 Wabash Street, No 25  
Fort Collins, CO 80526  
Commitment No - 25085956  
Assessor No 97012-13-019