

Public Improvements Plan

Waterstone
City of Aurora, Colorado

Prepared for:

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Prepared by:



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February 13, 2017
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Appendix C – Land Use and Density Map

Introduction

This report presents the results of a study to determine the improvements required by the proposed Waterstone development site to the public systems servicing the site. The report establishes timing of improvements to water, sanitary sewer, street, traffic control, and drainage systems within the City of Aurora as well as public art within the project. This report will be used for master planning purposes and should be updated as necessary during the CSP review process. The Waterstone project is subject to and will be served by Waterstone Metropolitan District No. 1 and Waterstone Metropolitan District No. 2.

The Waterstone development will be constructed in four filings. Filing 1 includes an area of single-family detached homes located on the southern portion of the site adjacent to Mississippi Avenue. Filing 3 consists of single-family detached homes and is located north of Filing 1 and south of Coal Creek. Filing 2 is the single-family attached area of the site and is located to the east of Filing 1 and west of Coal Creek. Filing 4 is made up of single-family detached homes located north of Coal Creek.

This report is an update to the previously Public Improvement Phasing Plan, dated June 28, 2005 and approved with the Waterstone Framework Development Plan.

Site Location and Description

The Waterstone project is located within the east half of Section 18, Township 4 South, Range 65 West of the Sixth Principal Meridian, City of Aurora, County of Arapahoe, State of Colorado. The site covers approximately 240 acres. Properties located south (Murphy Creek Subdivision) and west (Gun Club Estates) of the site consist of single-family residential land uses. Coal Creek is adjacent to the site on the north and east of the site, along with unplatted land. The Waterstone development consists of 605 single-family detached homes and 125 single-family attached homes.

Please refer to the Vicinity Map and Phasing Map in Appendix A for more information.

Water Distribution System

The City of Aurora water distribution system in the area includes a 16" main within Mississippi Avenue and a 24" main within Harvest Road. The 16" main will be extended from Mississippi Avenue and Buchanan Street approximately 1,165 feet to the west boundary of the project and approximately 2,730 feet along front of the site to the existing 24" water main at Harvest Road. This improvement will be constructed during the first phase of Filing 1 of the Waterstone project. The City of Aurora will prepare a



reimbursement agreement for the upsizing of the water line from the required 12" water line size to the 16" water line size. No additional offsite water improvements are needed for Filing 2, 3, or 4.

A future water line extension will be required across Coal Creek north of Filing 3 to provide service to future Filing 4. As required by Aurora Water, there will be one 12" water line extension crossing Coal Creek. Please see the updated Master Utility Study prepared by Kiowa Engineering Corporation and dated April 18, 2017 for additional information.

Sanitary Sewer System

The Waterstone site is tributary to the City of Aurora Coal Creek 36-inch interceptor sewer main located near the north bank of Coal Creek. During the first phase of Filing 1 of the Waterstone project the sanitary sewer will be extended to the north to connect to the Coal Creek 36-inch interceptor main. There are no offsite sanitary sewer improvements needed for the development of Waterstone.

Street System

To support access to Filing 1, interim improvements to Mississippi Avenue will be constructed prior to the issuance of the first certificate of occupancy in Filing 1. These interim improvements will include interim intersection improvements and left turn lanes at South Grand Baker Street and South Eaton Park Court. The ultimate improvements to Mississippi Avenue will be triggered by Filing 3. Specifically, the construction of the ultimate improvements to Mississippi Avenue will be completed prior to the issuance of the first certificate of occupancy within Filing 3.

Ultimate improvements to Mississippi Avenue will include the north half of the street to provide a full 4-lane section along the project frontage. The taper back to the existing two-lane section of Mississippi Avenue to the west will occur west of the project, with the taper beginning at the western boundary of the project. The eastern taper back to the existing two-lane Mississippi Avenue will occur between Harvest Road and South Grand Baker Street. This will require a license agreement or right-of-way dedication from Public Service Company of Colorado to construct full section Mississippi Avenue improvements along the frontage of their property. Costs associated with this license agreement will be the responsibility of the developer.

Filing 4 will require the construction of the west half of Harvest Road between Alameda and the south boundary of Waterstone Filing 4. The Developer is responsible for the construction of Harvest Road from Alameda Avenue to the south boundary of Filing 4 prior to the first certificate of occupancy within Filing 4.



Waterstone is also responsible for the cost of the southbound Harvest Road to westbound Mississippi ramp of the proposed Harvest Road - Mississippi Avenue intersection. This improvement is contingent on the Eastern Hills development and will not be constructed until the bridge over Coal Creek is constructed by Eastern Hills. This portion of the Harvest - Mississippi intersection is not required for the development of Waterstone.

Traffic Control System

According to Section 2.4 of the Annexation Agreement for the project, the Developer will be responsible for advancing funds for a pro rata share of signalization of perimeter streets attributable to the project. Traffic signals will include the intersection of Mississippi Avenue and Harvest Road and the entrance at Mississippi Avenue and Grand Baker Street. It is anticipated that the Developer will be responsible for 50% of the cost of each traffic signal. Fees will be due when the required warrants are met for each intersection as reasonably determined by the City.

Please see the updated Traffic Impact Study prepared by Felsburg, Holt and Ullevig and dated April 21, 2017 for additional information.

The public landscape improvements adjacent to each roadway and within the right-of-way is to be installed following the completion of street infrastructure construction. Landscape within tracts located directly adjacent to roadway improvements will be installed following the completion of the roadway construction.

Landscape improvements located within right-of-ways adjacent to private lots are to be installed upon final lot build-out once driveways and utilities are in place.

Refer to the approved FDP for additional information on the timing of the installation of park improvements and improvements within the CIG gas easement.

Drainage Improvements

The Waterstone project will be required to provide detention and water quality for stormwater runoff generated from the site prior to discharging into Coal Creek. It is anticipated that there will be one detention and water quality facility at the southeast corner of the site, one facility at the northeast end of Filing 3, one facility at the north end of Filing 2 and one facility at the west end of Filing 4. The final location and design of each detention and water quality facility will be determined with preparation of construction drawings.

It is anticipated that improvements within Coal Creek will be required as a part of the development of the project. However, the type and extent of the improvements has yet



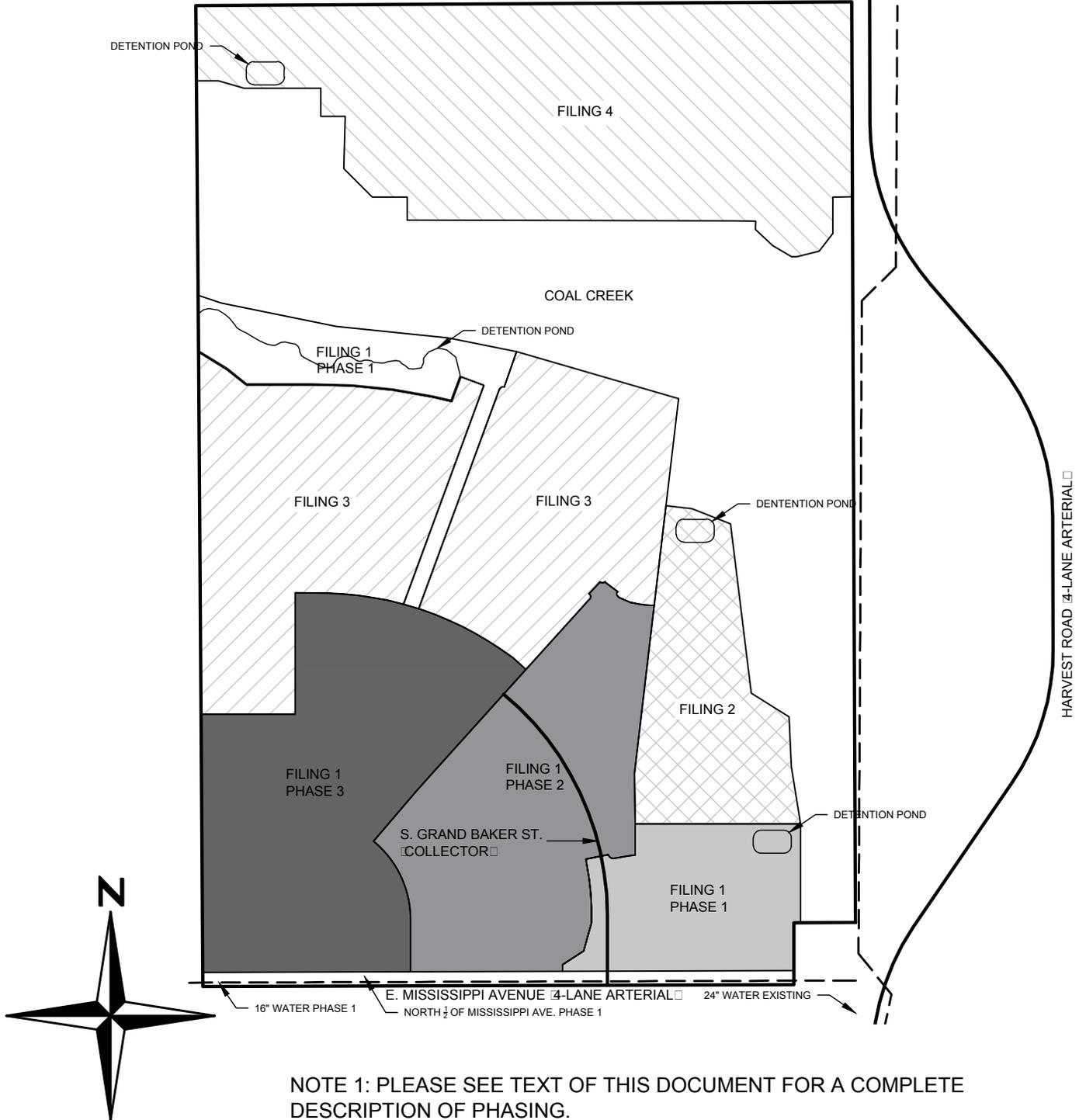
to be determined. The developer is currently coordinating with the City of Aurora Public Works staff and the Urban Drainage and Flood Control District as to the improvements that will be required. Once the type and extent of improvements agreed upon, the developer will provide construction plans for the improvements. The developer proposes to construct the improvements concurrent with the construction of Filing 3. The developer intends to request reimbursement for costs associated with the Coal Creek improvements and understands City of Aurora staff will prepare a reimbursement agreement for the eligible improvements.

Landscape improvements within drainage tracts are to be installed following the completion of associated infrastructure construction.

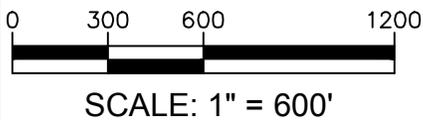
Public Art Plan

The developer will be required to prepare and submit a Public Art Plan for the project in accordance with City of Aurora requirements. The Public Art Plan will be prepared by the developer and submitted to the City of Aurora prior to the issuance of the first building permit in Filing 1.

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NOTE 1: PLEASE SEE TEXT OF THIS DOCUMENT FOR A COMPLETE DESCRIPTION OF PHASING.



PUBLIC IMPROVMENT PLAN

PHASING PLAN

AURORA

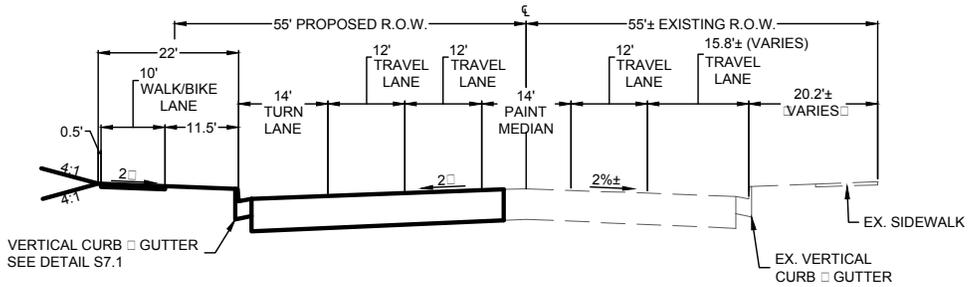
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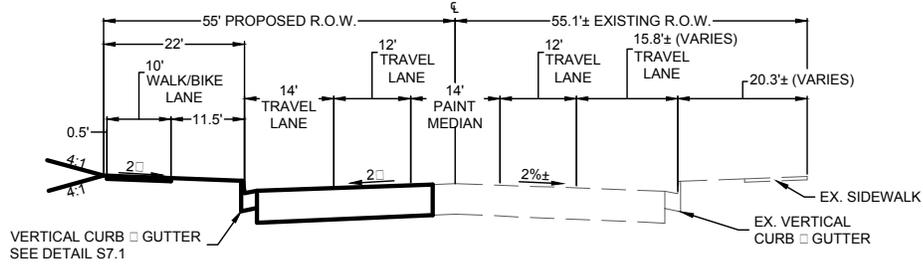
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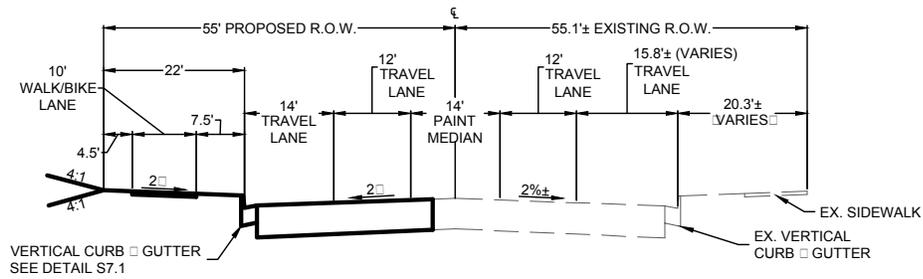
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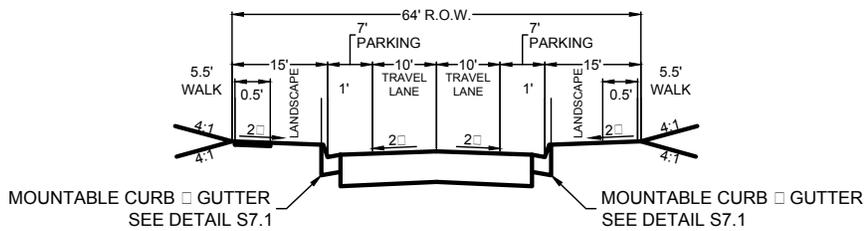
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W/ WESTBOUND TURN LANE
E. MISSISSIPPI AVENUE, EASTBOUND



FOUR LANE ARTERIAL : PAINTED MEDIAN - FUTURE CONNECTION
E. MISSISSIPPI AVENUE, EASTBOUND FROM
START OF PROJECT TO S. GRAND BAKER ST.



FOUR LANE ARTERIAL : PAINTED MEDIAN - FUTURE CONNECTION
E. MISSISSIPPI AVENUE, EASTBOUND FROM
S. GRAND BAKER ST. TO HARVEST RD.



PUBLIC LOCAL STREET - TYPE 1
TYPICAL



PUBLIC IMPROVEMENT PLAN
PHASING PLAN

AURORA

CO

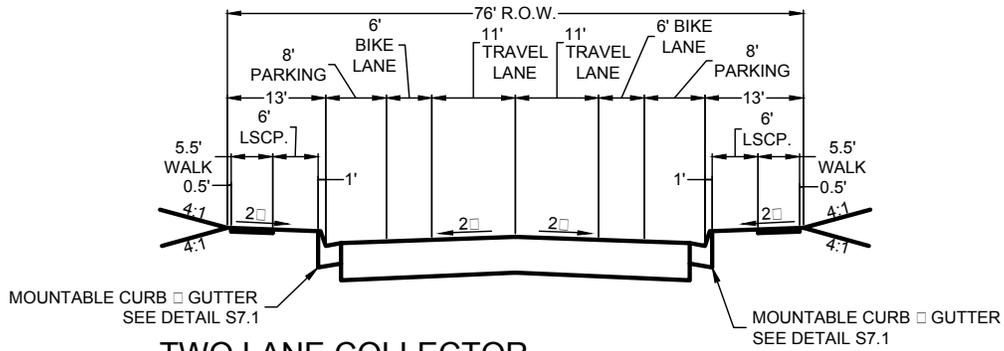
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PROJ. NO. 10014.01

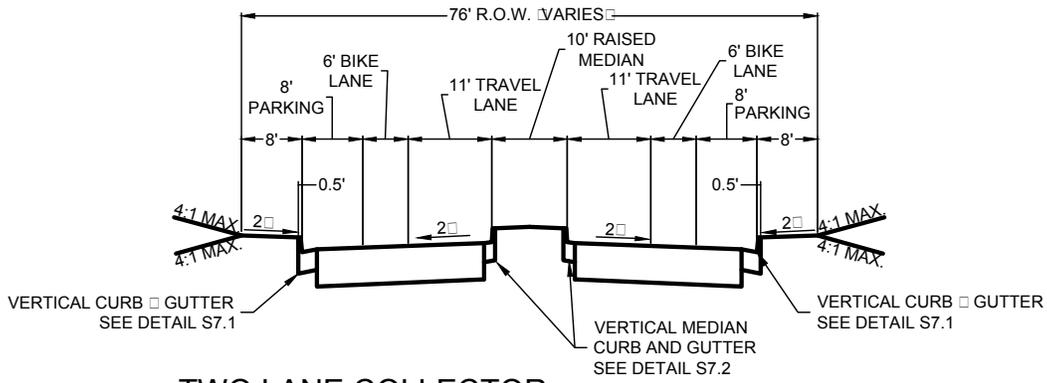
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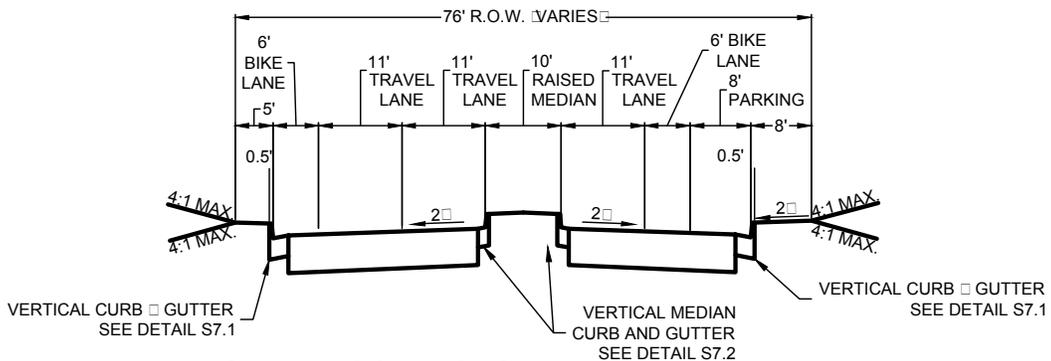
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TWO LANE COLLECTOR
S. GRAND BAKER ST. FROM S. FLAT ROCK WAY TO EAST FORD DRIVE



TWO LANE COLLECTOR
S. GRAND BAKER ST. FROM EAST FORD DRIVE TO MISSISSIPPI ENTRANCE



TWO LANE COLLECTOR
S. GRAND BAKER ST. ENTRANCE



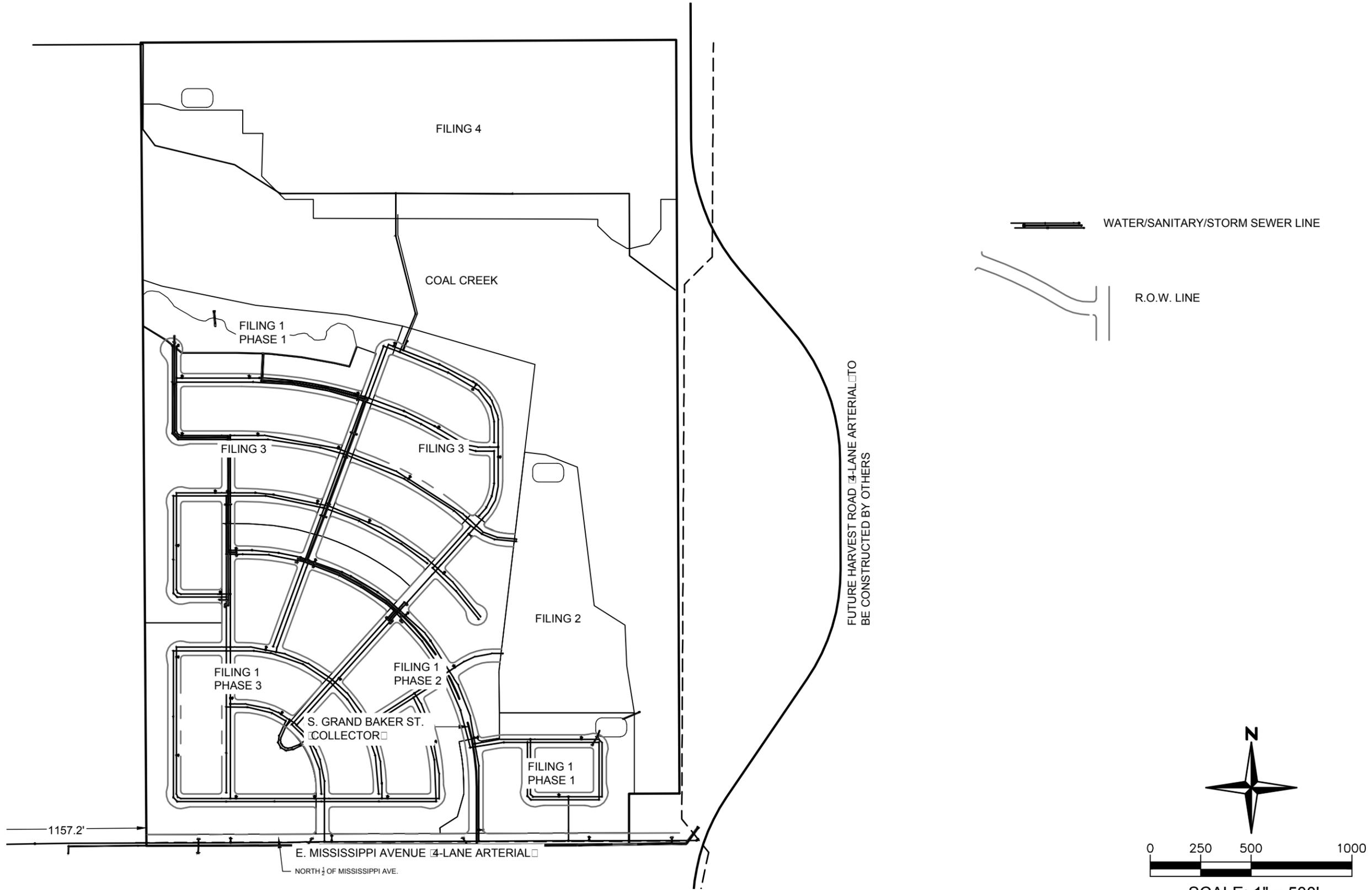
PUBLIC IMPROVEMENT PLAN
PHASING PLAN

AURORA

CO

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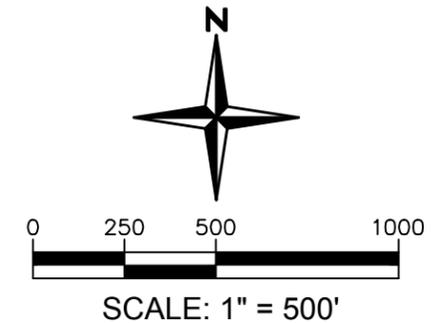
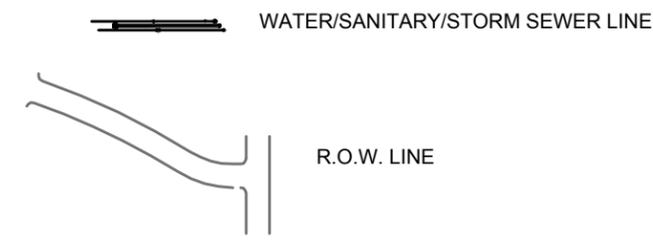
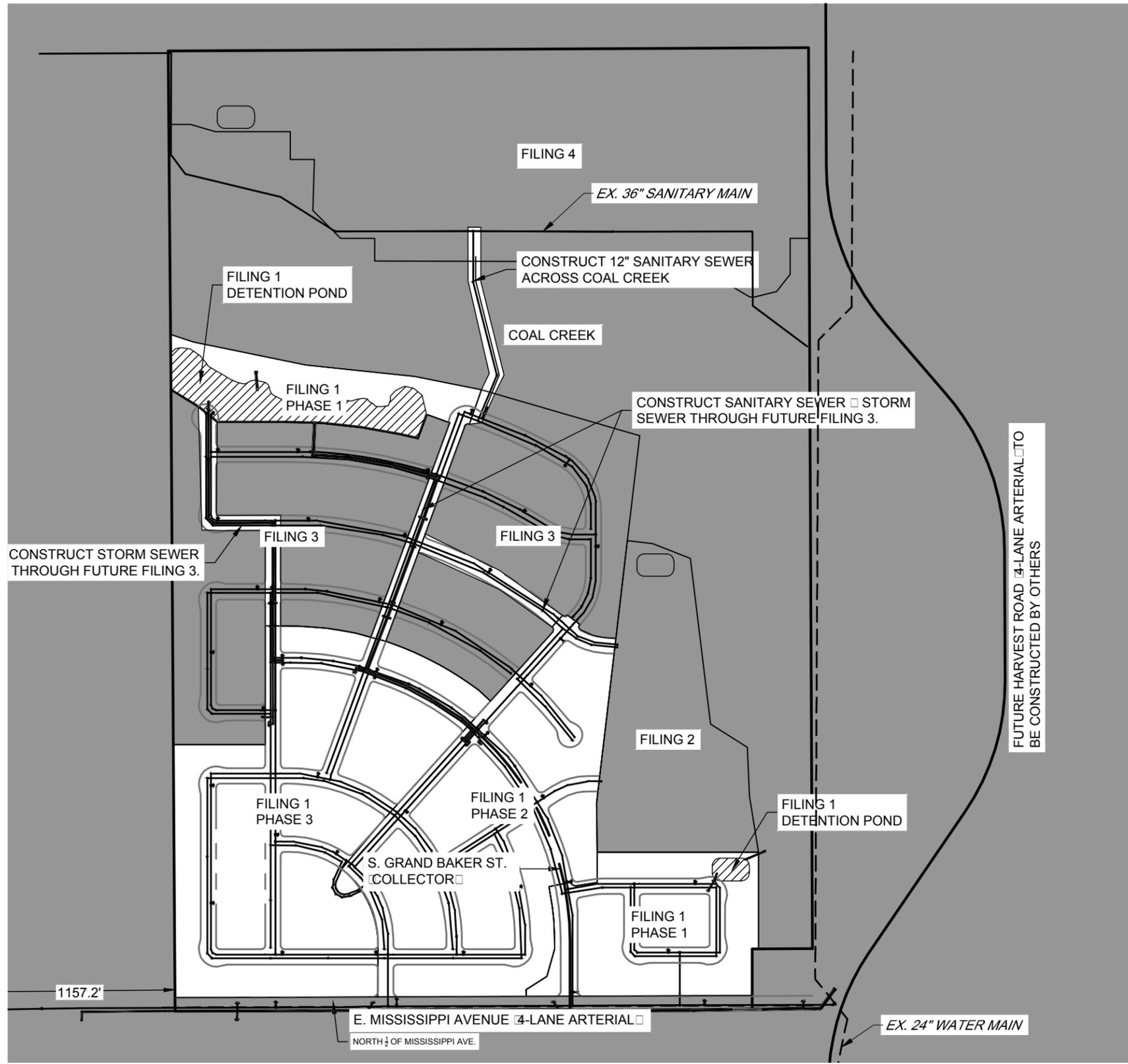
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PROJECT NO.	10014.01

PHASING PLAN - OVERALL
PUBLIC IMPROVEMENT PLAN

AURORA CO

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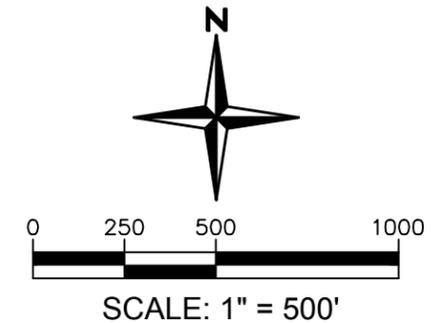
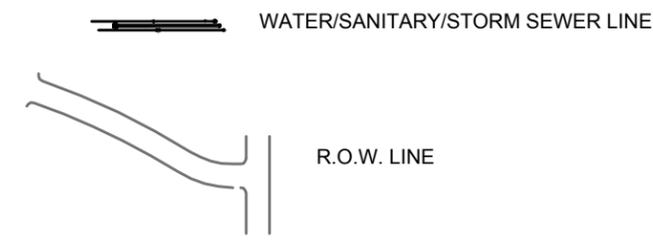
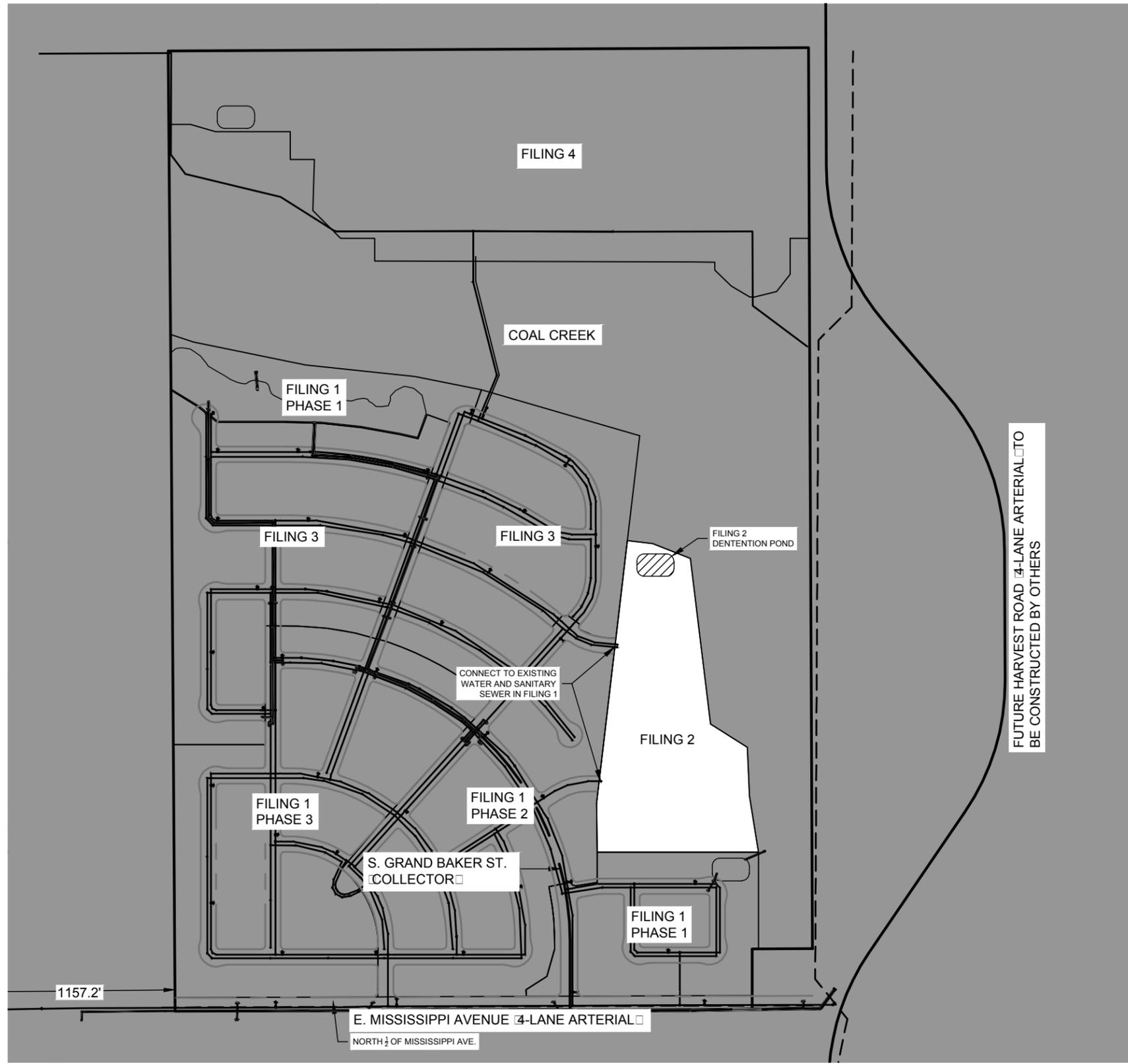


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PHASING PLAN - FILING 1
PUBLIC IMPROVEMENT PLAN

AURORA CO

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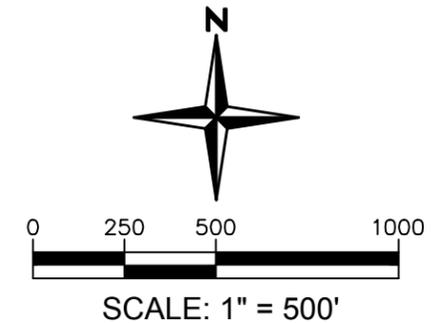
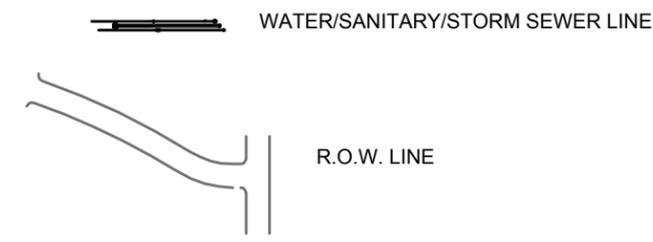
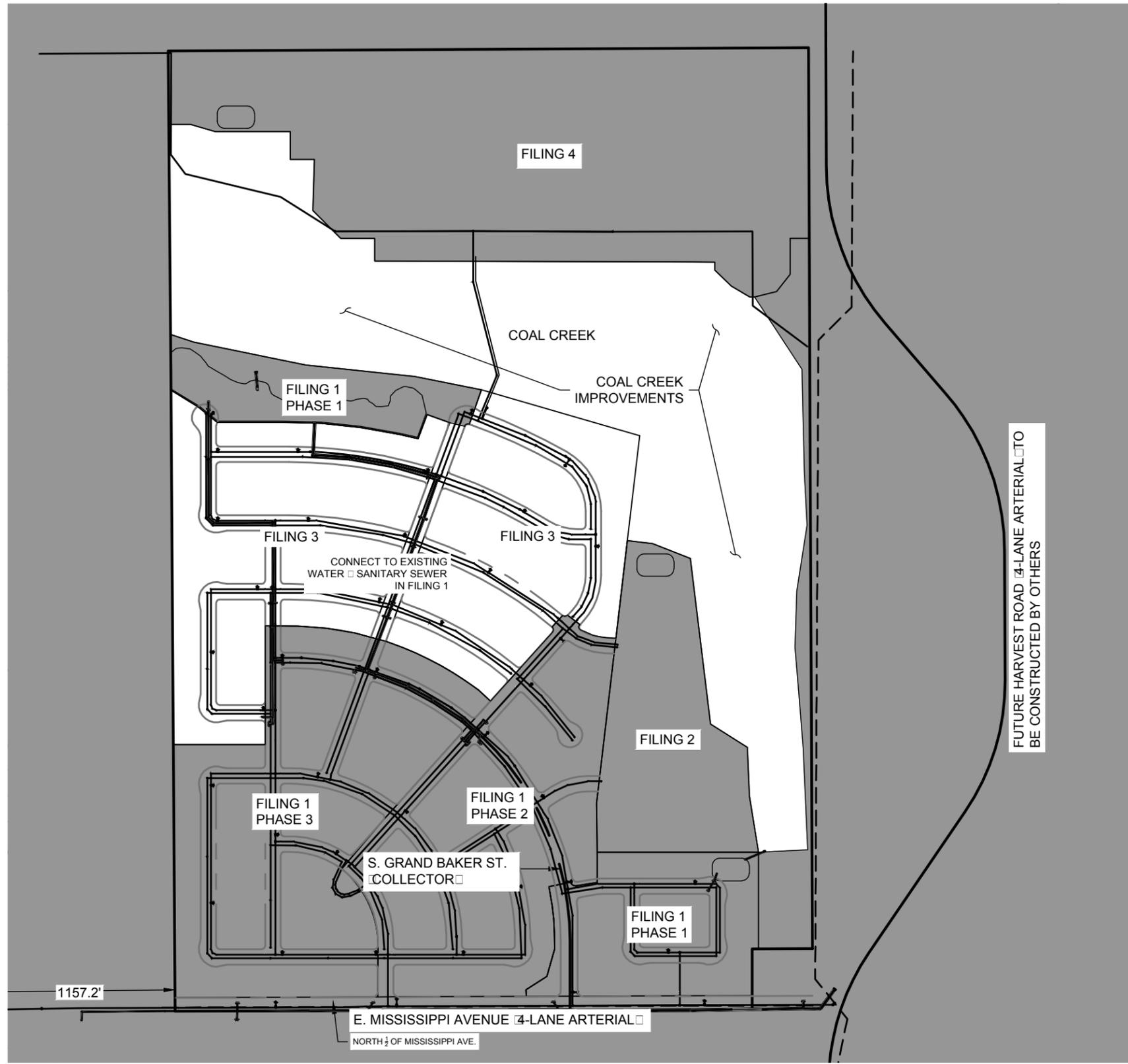
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PHASING PLAN - FILING 2
PUBLIC IMPROVEMENT PLAN
 AURORA CO

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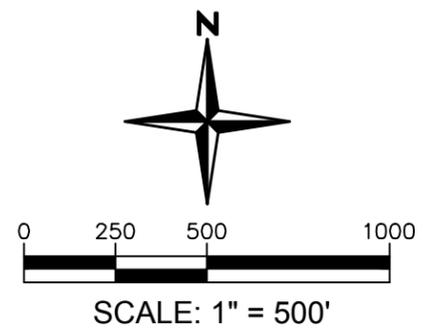
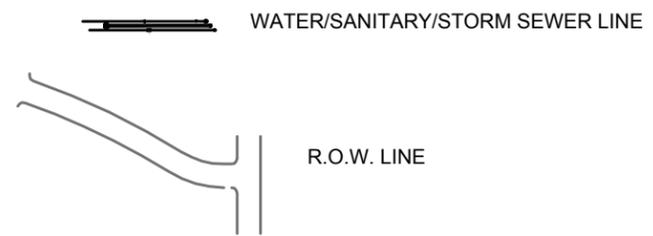
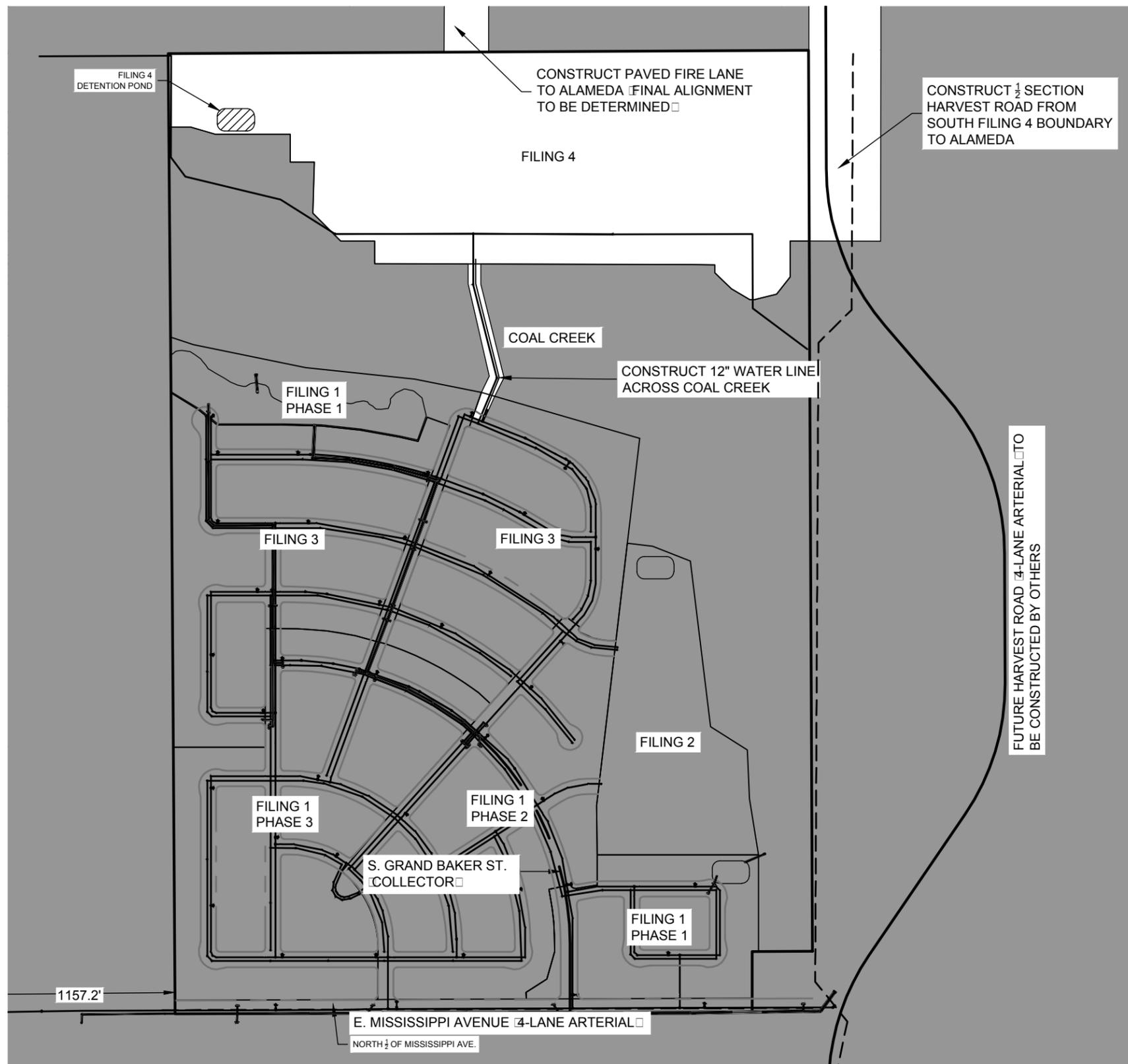


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PHASING PLAN - FILING 3
PUBLIC IMPROVEMENT PLAN

AURORA CO

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PHASING PLAN - FILING 4

PUBLIC IMPROVEMENT PLAN

AURORA CO

Open Space, Circulation, and Neighborhood Map

WATERSTONE

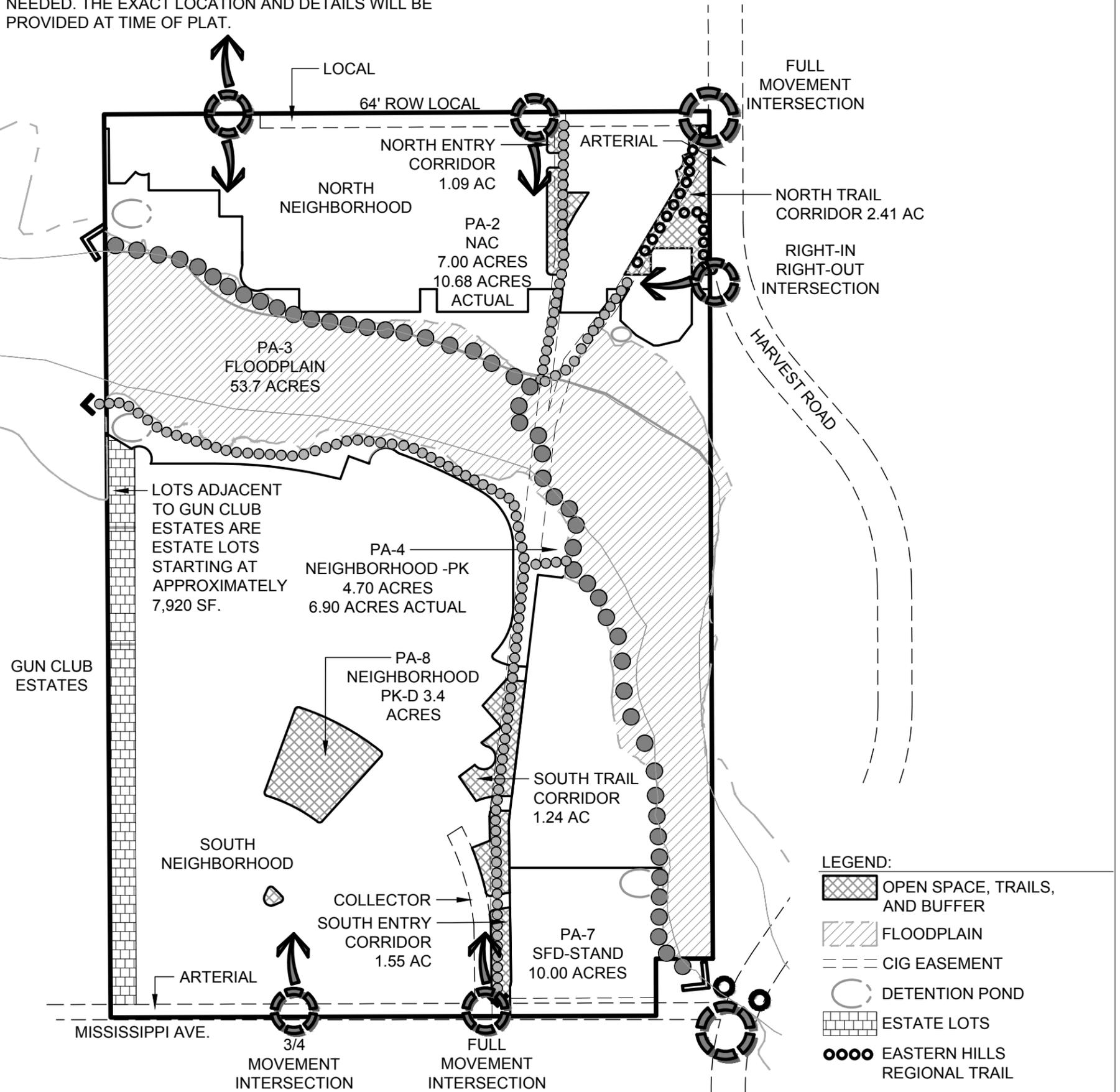
AURORA, COLORADO

PREPARED BY:
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LITTLETON, CO 80120
CONTACT: BRIAN HART

SUBMITTED BY:
MURPHY CREEK ESTATES, LLC
8834 FIESTA TERRACE
LONE TREE, CO 80124
CONTACT: DAN McCRACKEN

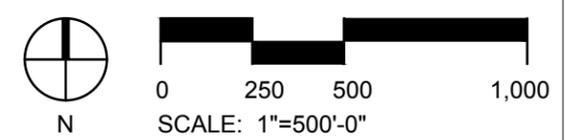
1	2/13/2017	PREAPPLICATION SUBMITTAL

TO CONFORM TO LIFE SAFETY REQUIREMENTS, EITHER A 23' WIDE EMERGENCY ACCESS EASEMENT TO THE NORTH OR TO PHASE THE NORTH NEIGHBORHOOD CONSTRUCTION UNTIL BUILD-OUT OF THE MISSISSIPPI / HARVEST BRIDGE IS PROPOSED. THIS WILL PROVIDE THE TWO POINTS OF ACCESS NEEDED. THE EXACT LOCATION AND DETAILS WILL BE PROVIDED AT TIME OF PLAT.



NOTE:

1. THERE ARE NO TRANSIT STOPS CURRENTLY LOCATED ON THE SITE.
2. MURPHY CREEK ESTATES, LLC, 8834 FIESTA TERRACE, LONE TREE, CO 80124 AS THE OWNER, ITS SUCCESSORS AND/OR ASSIGNS SHALL BE RESPONSIBLE FOR THE FUNDING OF 50% OF THE SIGNAL INSTALLATION COSTS AT THE INTERSECTIONS OF GRAND BAKER ST AND MISSISSIPPI AVE, DAKOTA AVE AND HARVEST RD, AND THE SOUTHERN INTERSECTION OF MISSISSIPPI AVE/ HARVEST RD IF AND WHEN SIGNAL WARRANTS ARE SATISFIED. TRAFFIC SIGNAL WARRANTS TO CONSIDER SHALL BE AS DESCRIBED IN THE 2003 MANUAL ON UNIFORM TRAFFIC CONTROL DEVICES. FOR WARRANT PURPOSES, MINOR STREET APPROACH TRAFFIC SHALL BE COMPRISED OF ALL THE THRU AND LEFT-TURN LANE MOVEMENTS AND 50% OF THE RIGHT TURN MOVEMENTS. A SIGNAL PHASING AGREEMENT INITIATED BY CITY SHALL BE SIGNED BY MURPHY CREEK ESTATES, LLC FOR THE SIGNALS NOTED ABOVE PRIOR TO THE ISSUANCE OF THE FIRST BUILDING PERMIT.



Landuse and Density Map

WATERSTONE

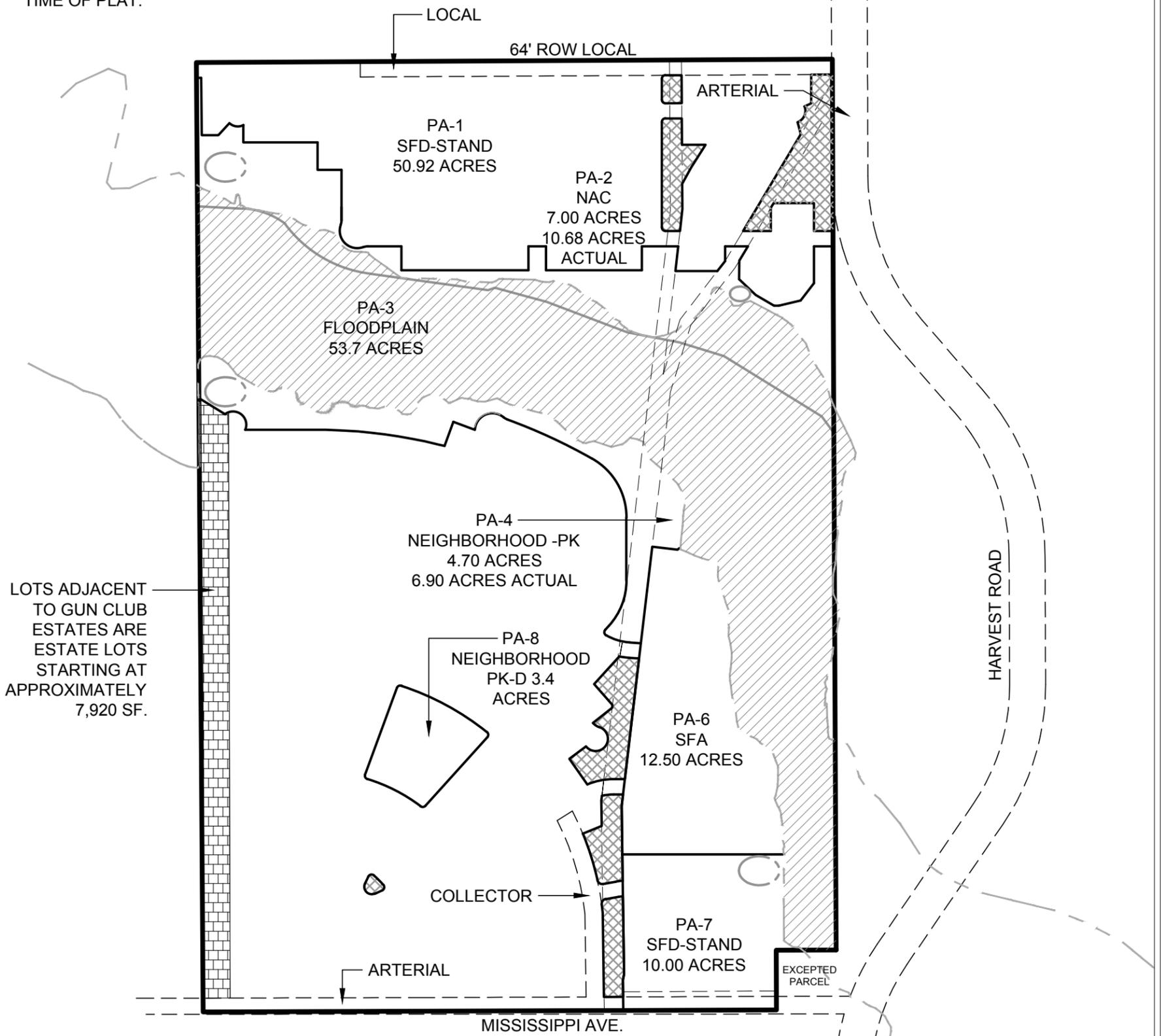
AURORA, COLORADO

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1500 WEST CANAL COURT
LITTLETON, CO 80120
CONTACT: BRIAN HART

SUBMITTED BY:
MURPHY CREEK ESTATES, LLC
8834 FIESTA TERRACE
LONE TREE, CO 80124
CONTACT: DAN McCRACKEN

1	2/13/2017	PREAPPLICATION SUBMITTAL

TO CONFORM TO LIFE SAFETY REQUIREMENTS, EITHER A 23' WIDE EMERGENCY ACCESS EASEMENT TO THE NORTH OR TO PHASE THE NORTH NEIGHBORHOOD CONSTRUCTION UNTIL BUILDOUT OF THE MISSISSIPPI / HARVEST BRIDGE IS PROPOSED. THIS WILL PROVIDE THE TWO POINTS OF ACCESS NEEDED. THE EXACT LOCATION AND DETAILS WILL BE PROVIDED AT TIME OF PLAT.



LEGEND:

- OPEN SPACE, TRAILS, AND BUFFER
- FLOODPLAIN
- CIG EASEMENT
- DETENTION POND
- ESTATE LOTS

SEE LAND USE / DENSITY MAP MATRIX

NOTE:

1. EXACT ALIGNMENT AND LOCATION OF MISSISSIPPI AVENUE SHALL BE DETERMINED AT TIME OF PLAT BASED ON FINAL DESIGN COORDINATION WITH EASTERN HILLS AND THE CITY OF AURORA.
2. A WHELEN WARNING SYSTEM SHALL BE PROVIDED ON THE WATERSTONE SITE. THE LOCATION TO BE DETERMINED AT CSP.

