

WORKSHOP AGENDA

Planning Commission

May 16, 2023 @ 5:30 PM

For the May 30, 2023 Regular Meeting @ 6:00 PM

- Call meeting to order.
- Determine quorum.

ORDER OF BUSINESS

1. Approve Minutes: April 25, 2023 Regular Meeting.

OLD BUSINESS

2. Site Plan - Seventh Day Adventist Church. Requested by Azimtech, Inc. Property located at 271 Jefferson Pike (Tax Map 18N, Parcel 18.01). R-2 (Medium Density Residential) Zoning District. Property owned by Kentucky/Tennessee Conference of Seventh Day Adventists, Inc.
3. Recommendation to the Board of Mayor and Aldermen for Subdivision Acceptance - Lt. Frank Walkup Phases 1 and 2. Property located off Jones Mill Road. Requested by Wamble & Associates. R-1 (Low Density Residential) Zoning District.
4. Site Plan - 5450 Murfreesboro Road - New Retail Building Totaling 11,550 Square Feet on 1.53 Acres. Requested by Huddleston - Steele, Inc. Property located at 5450 Murfreesboro Rd. (Tax Map 18B, Group E, Parcel 3). C-2 (Highway Service Commercial) Zoning District. Property owned by FHMY Realty Investors, LLC.
5. Site Plan - Avenue Grading - Addition of 8,188 Square Feet on 4.73 Acres. Requested by Ragan-Smith. Property located at 121 Jones Boulevard (Tax Map 17, Parcel 6). I-2 (Heavy Industrial) Zoning District. Property owned by Barlow Builders.

NEW BUSINESS

6. Site Plan – 142 Stones River Road – Two Buildings Totaling 8,000 Square Feet Containing Showroom with Office and Indoor Storage on 8.61 Acres. Requested by James Nyquist. Property located at 142 Stones River Road (Tax Map 15M, Group C, Parcel 1). C-2 (Highway Service) Zoning District. Property owned by Titan Home Builders, LLC.
7. Site Plan – Marlowe La Vergne – 376 Apartments on 27.49 Acres. Requested by Kimley Horn. Property located at 243 Blair Road (Tax Map 32, Parcel 6). R-3 (High Density Residential) Zoning District. Property owned by Martin Shofner.
8. Final Plat – Music City Campground – Two Commercial Lots on 6.88 Acres.

Requested by Wamble & Associates. Property has frontage on Murfreesboro Road, Nir Shreibman Blvd. and 73rd Ave. (Tax Map 15, Parcels 16.02 and 15). C-2 (Highway Service) Zoning District. Property owned by Amnon Shreibman.

9. Final Plat – Portico Place, Section 2, Phase 2 & Resubdivision of Common Areas A & B of Section 2, Phase 1 – 52 Lots on 15.69 Acres. Requested by SEC, Inc. Property located on Blair Road (Tax Map 29, Parcel 20.04). PDR (Planned Density Residential) Zoning District. Property owned by Blair Road, LLC.
10. Final Plat – Tidal Wave Addition to La Vergne Plat No. 2 – Two Commercial Lots on 3.86 Acres. Requested by Gonzalez-Strength & Associates. Property located at Murfreesboro Road and Fergus Road (Tax Map 18, Parcel 1.04). C-2 (Highway Service) Zoning District. Property owned by TWAS Properties, LLC.
11. Preliminary Plat – Arbor Ridge, Sections 4, 5, 9A & 10 – 227 Lots on Approximately 86 Acres. Requested by SEC, Inc. Property located on Waldron Road and Blair Road (Tax Map 32, Parcel 4). PDR (Planned Density Residential) Zoning District. Property owned by Starlight Homes Tennessee, LLC.
12. Concept Plan – Chaney Place – 50 Townhomes on 4.30 Acres. Requested by SEC, Inc. Property located at 237 Chaney Blvd. (Tax Map 28, Parcels 10 & 11). R-3 (High Density Residential) Zoning District. Property owned by Ole South Properties, Inc.
13. Set Bond Amount for Holmes Place (Tax Map 14, Parcel 24). Requested by Wamble & Associates. R-2 (Medium Density Residential) Zoning District.
14. Bonds/Letters of Credit Update.

ADJOURN



Item #: 2.

Item Title: Site Plan - Seventh Day Adventist Church. Requested by Azimtech, Inc. Property located at 271 Jefferson Pike (Tax Map 18N, Parcel 18.01). R-2 (Medium Density Residential) Zoning District. Property owned by Kentucky/Tennessee Conference of Seventh Day Adventists, Inc.

Reviewed By:

Location:

(Insert map here)

Summary:

Staff Comments / Technical Items:

Planning

Bo Logan - 615-287-8702

blogan@laveragnetn.gov

(Technical items go here)

Engineering

1. (Sheet C2) Please add a note next to the outfall from Detention Pond #1 stating the following:
"Some grading will be required in the public right-of-way to avoid the valve box, communications manhole, power pole and other obstructions. Please provide a small swale which directs the water into the culvert under the next downstream driveway so that water does not travel along the edge of pave of Jefferson Pike."
2. (Sheet C2) Please add a note next to the outfall from Detention Pond #2 stating the following:
"Shape the rock riprap basin as a 'bowl' in order to

act as a stilling basin for the outfall of this basin prior to release.”

Utilities

Scott Tatalovich - 615-287-8739 (Technical items go here)
statalovich@lavergneth.gov

Codes

Randolph Salyers - 615-287-8605 (Technical items go here)
rsalyers@lavergneth.gov

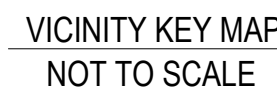
Fire

Curtis Brinkley - 615-405-5931 No Comments.
cbrinkley@lavergneth.gov

Police

Police Department No comments from police.

***Note:** The above technical items may not be the only corrections and/or issues needing to be resolved to get approval from the planning commission. New items can be brought up at the workshop and staff can add items at any time that might have been overlooked. It is the applicant's responsibility to make sure that all technical items are addressed and that no new issues exist before the planning commission meeting. Addressing all technical items does not constitute approval. It is the planning commission's decision whether an item passes or fails. Revised plans are due to staff by the following Monday at close of business unless other arrangements are made and documented.



An architectural elevation drawing of a two-story barn. The left portion of the building features a gambrel roof and vertical siding. It has two arched windows on the lower level and a large double door with a diagonal brace. The right portion has a lower, gabled roof with horizontal siding. It includes a central double door with a diagonal brace, several multi-paned windows, and a small square window. The roof of the right section is shaded with a brick pattern. The entire drawing is rendered in black lines on a white background.

THE SUBJECT PROPERTY IS EXISTING & ZONED "R-2" WHERE THE INTENDED USE IS PERMITTED.

1)	THE PURPOSE OF THIS SITE PLAN IS TO ADD TO THE EXISTING BUILDING FOR GROWTH.		
2)	SUBJECT PROPERTY IS PARCEL #: 018 01801 & PRESENTLY ZONED R-2. THE INTENDED USE OF A RELIGIOUS INSTITUTION IS PERMITTED.		
3)	THE SUBJECT PROPERTY IS NOT AFFECTED BY THE 100 YEAR FLOOD PLAIN BASED ON INFORMATION TAKEN FROM F.E.M.A FLOOD ZONE MAP #	47149C0020J	EFFECTIVE DATE: 10/16/2008
4)	MINIMUM REQUIRED SETBACKS :		

PROPOSED SITE COVERAGE:		TOTAL	EXISTING	ADDED
a.	BUILDING AREA	4,940 SQ. FT.	2900	2040
b.	ASPHALT PARKING & SIDEWALKS	24,143 SQ. FT.	785	23358
c.	LANDSCAPE	36,349 SQ. FT.		
d.	IMPERVIOUS AREA	29,083 SQ. FT.		

7) PARKING TABULATION:

13) PLEASE SEND ALL CORRESPONDENCE TO ENGINEER:
S. ALI KOLEINI, P.E. & /OR ROLANDO S. AQUINO P.E.
3360 SAWTELLE BLVD. # 101
LOS ANGELES, CA 90066
OFFICE PHONE: (615) 299-7388

PROJECT DESCRIPTION:

SEVENTH DAY ADVENTISTS

ADDITION TO EXISTING CHURCH

271 JEFFERSON PK., LAVERGNE, TN 37086 - PARCEL ID: 018 01801



REV.	DESCRIPTION	DATE
1	REVISIONS PER PLANNING COMMISSION WORKSHOP COMMENTS	1/19/2023

DESIGNED BY : A.K.

DRAWN BY : R.L.

SCALE : NO SCALE

PROJECT NO.

DATE : 1/19/2023

ISSUED FOR :

FOR APPROVAL

DRAWING TITLE :

1. *Journal of the American Medical Association*, 2000; 284: 2689-2694.

COVER SHEET

COVER STILL

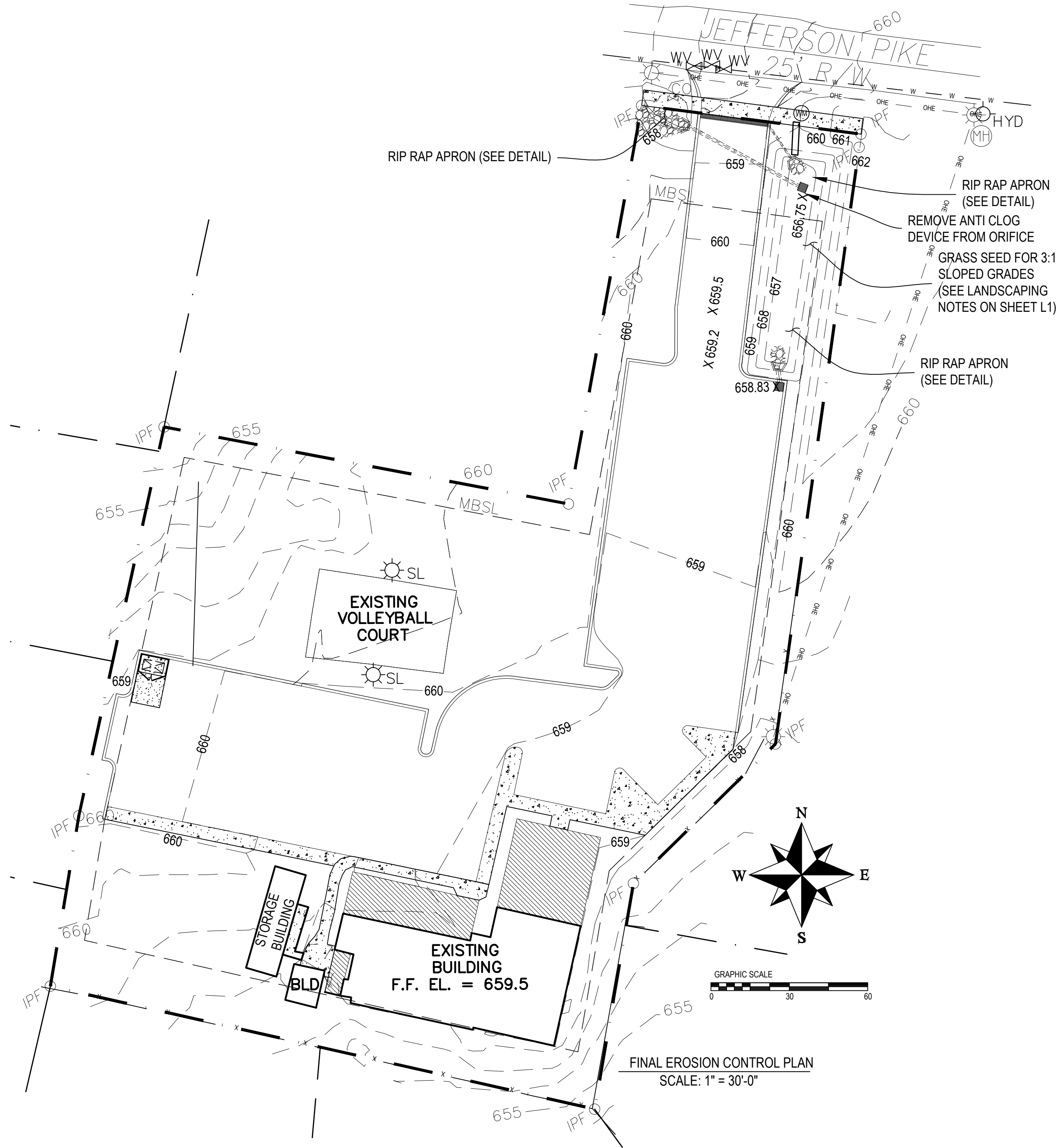
1. *Journal of the American Medical Association*, 1997; 277: 1039-1043.

DRAWING NO.

CV

GRADING / EROSION CONTROL NOTES

1. CONTRACTOR IS RESPONSIBLE FOR KEEPING DUST WITHIN TOLERABLE LIMITS BY SPRINKLING OR OTHER METHODS.
2. ALL CUT AND FILL AREAS SHALL HAVE A MINIMUM OF 6" TOP SOIL. SHALL RECEIVE 12 POUNDS PER 1000 S.F. OF 6-12-12 FERTILIZER (UNLESS OTHERWISE SPECIFIED IN WRITTEN SPECIFICATIONS).
3. DISTURBED AREAS ARE TO BE GRADED TO DRAIN AS INDICATED IN THE PLAN TO SEDIMENT BARRIERS DURING CONSTRUCTION.
4. THE CONTRACTOR SHALL BE RESPONSIBLE FOR THE VERIFICATION AND LOCATION OF EXISTING UTILITIES.
5. CONTRACTOR IS RESPONSIBLE FOR DAMAGE TO EXISTING UTILITIES DURING CONSTRUCTION.
6. ANY ACCESS ROAD TO THE SITE SHALL BE BASED ON CRUSHED ASTM #1 STONE, 100' LONG BY 20' WIDE AND 6" DEEP.
7. THE PLACING AND SPREADING IF ANY FILL MATERIAL IS TO BE STARTED AT THE LOWEST POINT AND BROUGHT TO HORIZONTAL LAYERS OF 8" LIFTS.
8. THE FILL MATERIALS TO BE FREE OF ROOTS, SOD, FROZEN SOIL OR DECOMPOSABLE MATERIALS.
9. FILL TO BE COMPACTED TO A MINIMUM IF 95% STANDARD PROCTOR.
10. ALL WORK TO BE PERFORMED AND COMPLETED IN ABSOLUTE COMPLIANCE WITH THE RULES AND REGULATIONS AS SET FORTH IN THE RUTHERFORD COUNTY / CITY OF LAVERGNE SPECIFICATIONS.
11. CONTRACTOR SHALL GIVE ALL NECESSARY NOTICE, OBTAIN ALL PERMITS AND PAY ANY FEES REQUIRED FOR THE COMPLETION OF HIS PORTION OF THE WORK. CONTRACTOR SHALL ALSO COMPLY WITH ALL CITY, COUNTY, AND STATE LAWS AND ORDINANCES OR REGULATIONS RELATING TO HIS PORTION OF THE WORK.
12. ANY RETAINING WALL GREATER THAN 4' IN HEIGHT WILL REQUIRE A PEDESTRIAN BARRIER FOR SAFETY. SEE DETAIL SHEET FOR GUARDRAIL DETAIL.
13. ALL EROSION CONTROL MEASURES ARE TO BE REMOVED PRIOR TO AS-BUILT APPROVALS.
14. USE S150 STRAW BLANKETS FOR 3:1 GRADE SLOPES. GRADING PERMITTEE TO INCLUDE BMP'S DESIGNED TO CONTROL SITE WASTES SUCH AS DISCARDED BUILDING MATERIALS, CHEMICALS, LITTER AND SANITARY WASTES THAT MAY CAUSE ADVERSE IMPACTS TO WATER QUALITY. THE LOCATION OF AND / OR NOTES REFERRING TO SAID BMP'S SHALL BE SHOWN ON THE EPSC PLAN.
15. STEEP SLOPES ARE TO BE STABILIZED WITHIN 7 DAYS OF FINAL GRADING.



STORM WATER POLLUTION PREVENTION NOTES (TENNESSEE)

1. THE OWNER AND THE CONTRACTOR ARE REQUIRED TO SUBMIT A NOTICE OF INTENT (NOI) TO DISCHARGE CONSTRUCTION ACTIVITY STORM WATER APPLICATION TO THE LOCAL TENNESSEE ENVIRONMENTAL ASSISTANCE CENTER AT LEAST 30 DAYS PRIOR TO BEGINNING CONSTRUCTION.
2. THE CONSTRUCTION ACTIVITY ANTICIPATED ON THIS PROJECT INCLUDES CLEARING, GRUBBING, GRADING, TOP SOILING AND SEEDING.
3. THE APPROXIMATE TOTAL AREA OF THE SITE IS 1.50 ACRES. THE APPROXIMATE TOTAL AREA OF GRADING PROPOSED IS 0.68 ACRES DISTURBED.
4. THE INCREASE IN POST-CONSTRUCTION IMPERVIOUS AREA IS 0.56ACRES. THE ESTIMATED VOLUME OF RUNOFF FROM THE SITE DUE TO A ONE INCH RAINFALL IS 0.04 ACRE- FEET.
5. THE ANTICIPATED FILL MATERIAL WILL CONSIST OF ON-SITE SOIL AND/OR SHOT ROCK MATERIALS.
6. THE RECEIVING WATER/STORM SEWER OPERATOR IS CITY OF LAVERGNE WATER SERVICES.
7. CONSTRUCTION SHALL BE SEQUENCED TO MINIMIZE EXPOSURE TIME OF CLEARED SURFACE AREA. EROSION AND SEDIMENT CONTROL MEASURES SHALL BE IN PLACE AND FUNCTIONAL PRIOR TO EARTH MOVING OPERATIONS. ALL CONTROL MEASURES SHALL BE CHECKED AND REPAIRED AS NECESSARY, AND AT MAXIMUM 14 DAY CALENDAR DAYS IN DRY PERIODS AND WITHIN 24 HOURS AFTER ANY RAINFALL EXCEEDING 0.5 INCH WITHIN A 24 HOUR PERIOD.
8. THE CONTRACTOR SHALL DESIGNATE IN WRITING THE NAME AND PHONE NUMBER OF THE INDIVIDUAL RESPONSIBLE FOR EROSION AND SEDIMENT CONTROLS.
9. PRE-CONSTRUCTION VEGETATIVE GROUND COVER SHALL NOT BE REMOVED MORE THAN 20 CALENDAR DAYS PRIOR TO GRADING. ALL GRADED AREAS EXPECTED TO REMAIN UNFINISHED FOR MORE THAN 15 CALENDAR DAYS SHALL BE COVERED WITH TEMPORARY GRASS, SOD, STRAW, MULCH OR FABRIC MATS. PERMANENT SOIL STABILIZATION SHALL BE INSTALLED WITHIN 15 CALENDAR DAYS OF FINAL GRADING.
10. THE CONTRACTOR SHALL MAINTAIN RECORDS OF EROSION CONTROL INSPECTIONS AND REPAIRS FOR A MINIMUM OF 3 YEARS AFTER CONSTRUCTION COMPLETION.
11. TEMPORARY SEEDING FOR TENNESSEE PROJECTS INCLUDE THE FOLLOWING OPTIONS:

JAN 1 - MAY 1

ITALIAN RYE/KOREAN LESPEDeza/SUMMER OATS

MAY 1 - JULY 15

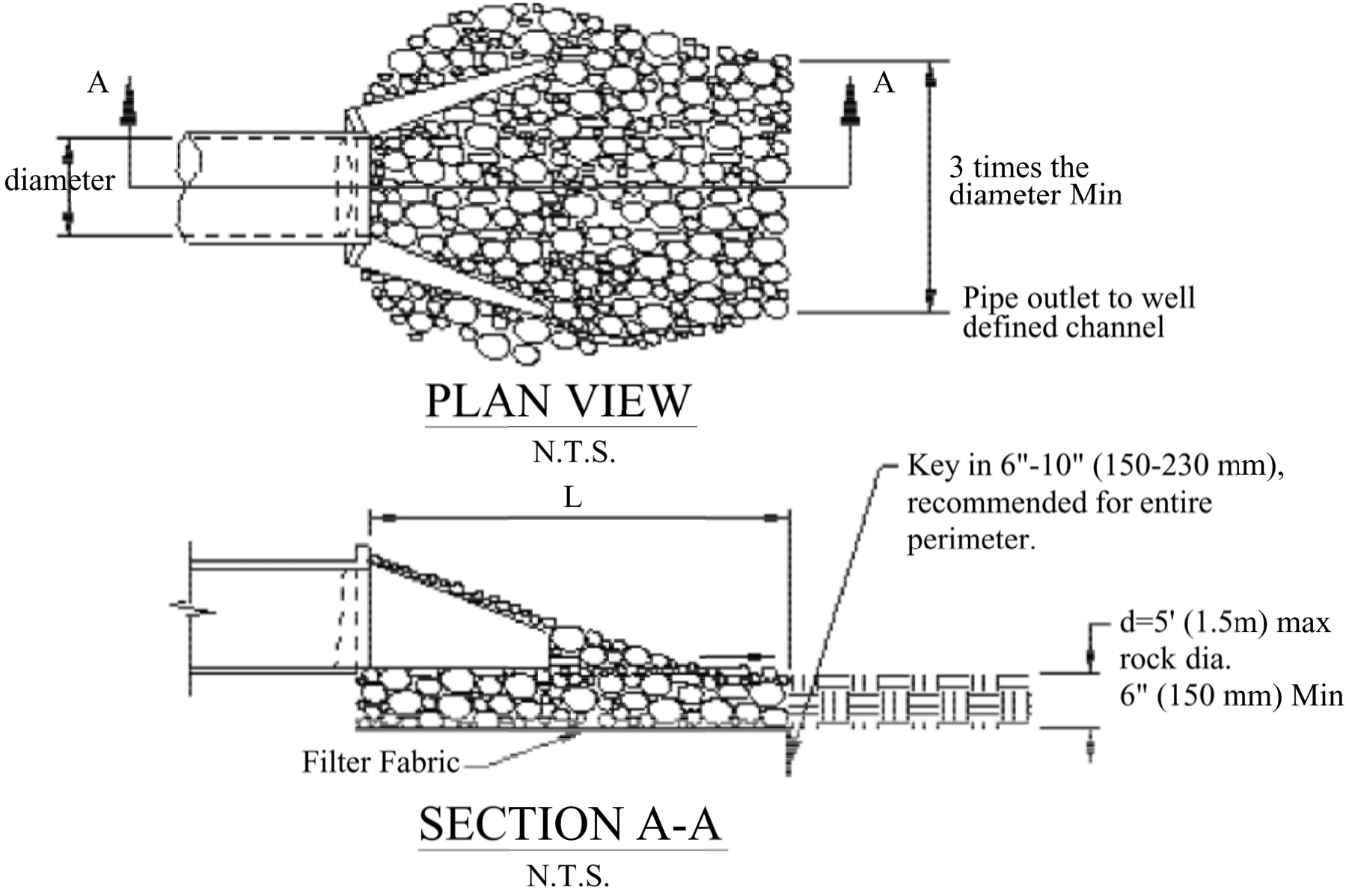
SUDAN OR STARR MILLET

JULY 15 - JAN 1

BALBOA RYE/ITALIAN RYE
12. MULCHING SHALL CONSIST OF LOOSE HAY OR STRAW APPLIED AT THE RATE OF 2 TONS/ACRE.
13. THE CONTRACTOR SHALL REMOVE SEDIMENT FROM TRAPS, SILT FENCES, SEDIMENT SWALES AND ETC. AS NECESSARY AND WHEN CAPACITY HAS BEEN REDUCED BY 50%.
14. STOCKPILES SHALL BE STABILIZED AND PROTECTED FROM EROSION.
15. THE CONTRACTOR IS TO PROVIDE AN AREA FOR CONCRETE WASH DOWN AND EQUIPMENT FUELING IN ACCORDANCE WITH CITY OF LAVERGNE CP-10 AND CP-13 RESPECTIVELY. THE CONTRACTOR IS TO COORDINATE EXACT LOCATION WITH NPDES DEPARTMENT DURING PRE-CONSTRUCTION MEETING.
16. I CERTIFY UNDER PENALTY OF THE LAW THAT THESE STORM WATER POLLUTION PREVENTION PLANS WERE PREPARED UNDER MY DIRECTION OR SUPERVISION, AND BY QUALIFIED PERSONNEL WHO PROPERLY GATHERED AND EVALUATED THE INFORMATION SUBMITTED. THE INFORMATION SUBMITTED IS, TO THE BEST OF MY KNOWLEDGE AND BELIEF, TRUE, ACCURATE AND COMPLETE. I AM AWARE THAT THERE ARE SIGNIFICANT PENALTIES FOR SUBMITTED FALSE INFORMATION, INCLUDING THE POSSIBILITY OF A FINE AND IMPRISONMENT.

Ali Kolb
SIGNATURE

3/31/23
DATE



APRON OUTLET PROTECTION DETAILS

Pipe Diameter in (mm)	Discharge ft ³ /s (m ³ /s)	Apron Length, L ft (m)	Rip-Rap D ₅₀ Diameter Min in (mm)
12 (300)	4.9 (0.14)	10 (3)	4 (100)
	9.89 (0.28)	13 (4)	6 (150)
	20.13 (0.57)	16 (5)	8 (200)
	30.01 (0.85)	23 (7)	12 (300)
18 (450)	9.89 (0.28)	10 (3)	6 (150)
	20.13 (0.57)	16 (5)	8 (200)
	30.01 (0.85)	23 (7)	12 (300)
	39.90 (1.13)	26 (8)	16 (400)
24 (600)	30.01 (0.85)	16 (5)	8 (200)
	39.90 (1.13)	26 (8)	8 (200)
	50.14 (1.42)	26 (8)	12 (300)
	60.03 (1.70)	30 (9)	16 (400)

APRON OUTLET PROTECTION SIZING CHART

LEGEND	
○	Existing Iron Rod I.R.(O)
□	Existing Conc. Mon. C.M.(O)
■	Iron Rod (Set) I.R.(N)
⊙	Water Valve
⊗	Water Meter
⊕	Fire Hydrant
⊘	Utility Pole
— W —	Anchor / guy wire
- GAS -	Gas Line
- OHL -	Overhead Utility Line
- CMP	Corrugated Metal Pipe
- RCP	Reinforced Concrete Pipe
- SS	Sanitary Sewer
- R.O.W.	Right Of Way
↑	Hose Bibb (H.B.)
○ _{co}	Clean-Out

LINETYPE LEGEND	
PROPERTY LINE	— . . . —
1" WATER	— 1 W —
WATER	— W —
FENCING	— X —
OVERHEAD ELECTRIC	— OHE —
SANITARY SEWER	— SS —
6" SANITARY SEWER	— SS 6 —
STORM DRAIN PIPE	— SD —
SEDIMENT TUBES	— ST —
BUILDING OUTLINE	— —
SILT FENCING	— SF —
RIGHT OF WAY	— . . . —
EXISTING MINOR CONTOURS	— - - - -
EXIST. MAJOR CONTOURS	— - - - -
PROPOSED CONTOURS	— - - - -
CENTER OF ROAD	— — — —

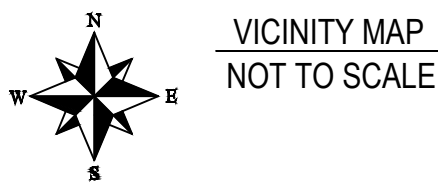
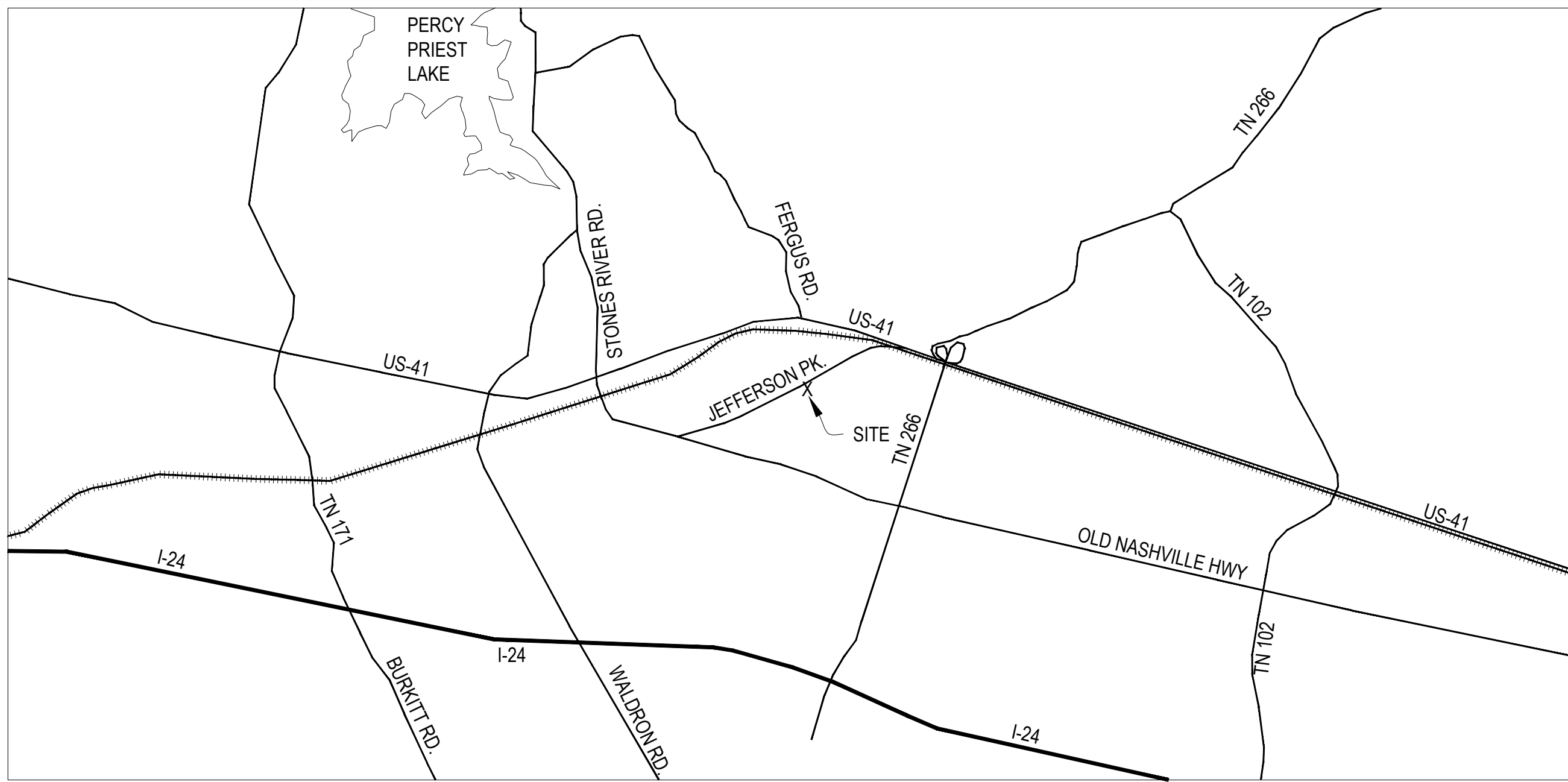
REV.	DATE	DESCRIPTION

DESIGNED BY:	A.K.
DRAWN BY:	R.L.
SCALE:	1" = 30'
PROJECT NO.	
DATE:	3/31/2023
ISSUED FOR:	FOR APPROVAL
DRAWING TITLE:	

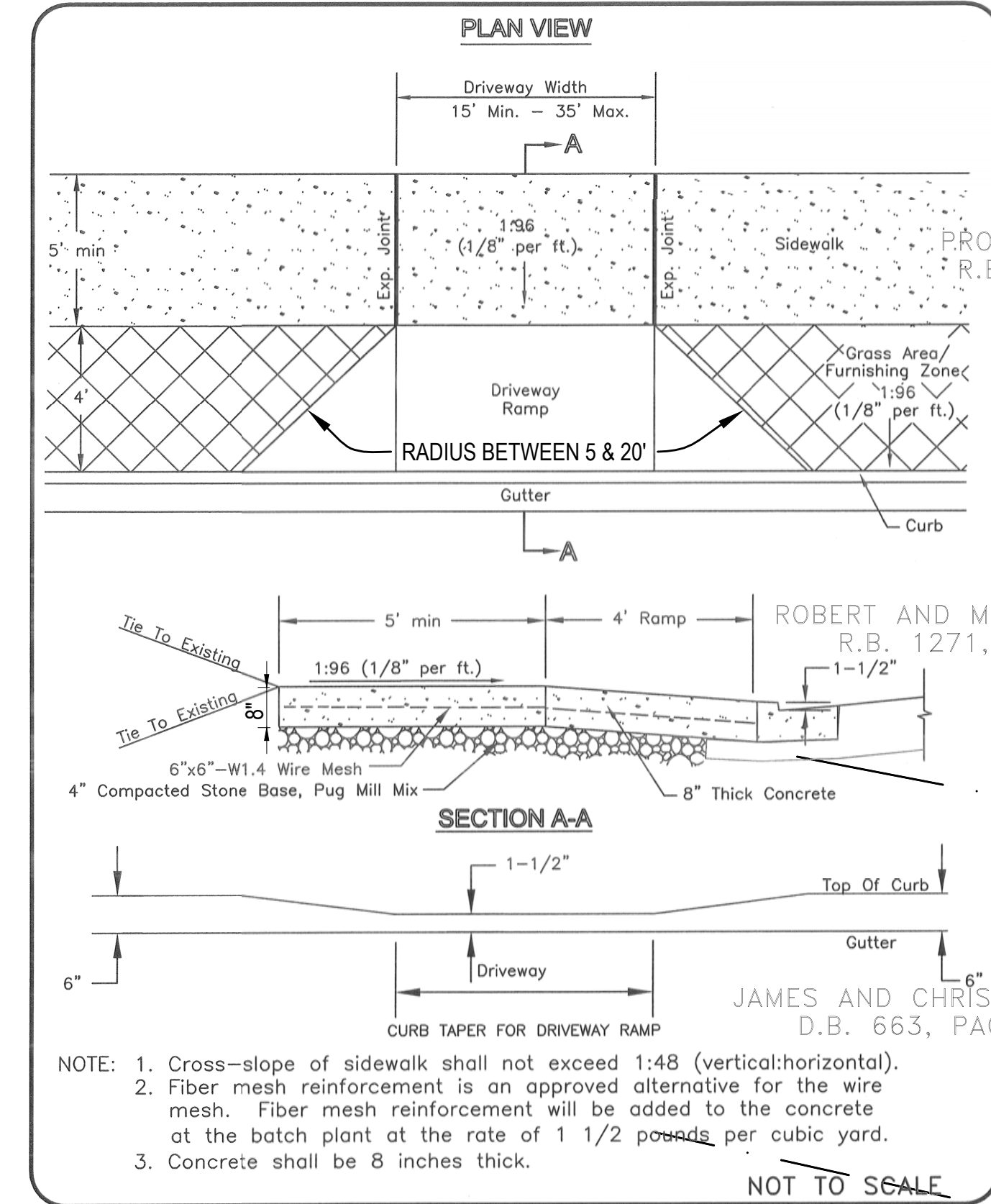
FINAL EROSION
CONTROL PLAN

DRAWING NO.

C1.1

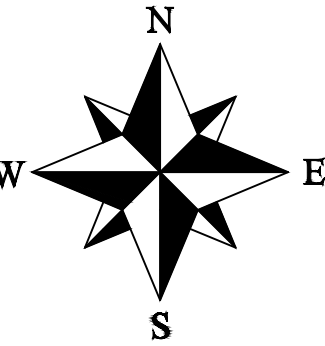


VICINITY MAP
NOT TO SCALE

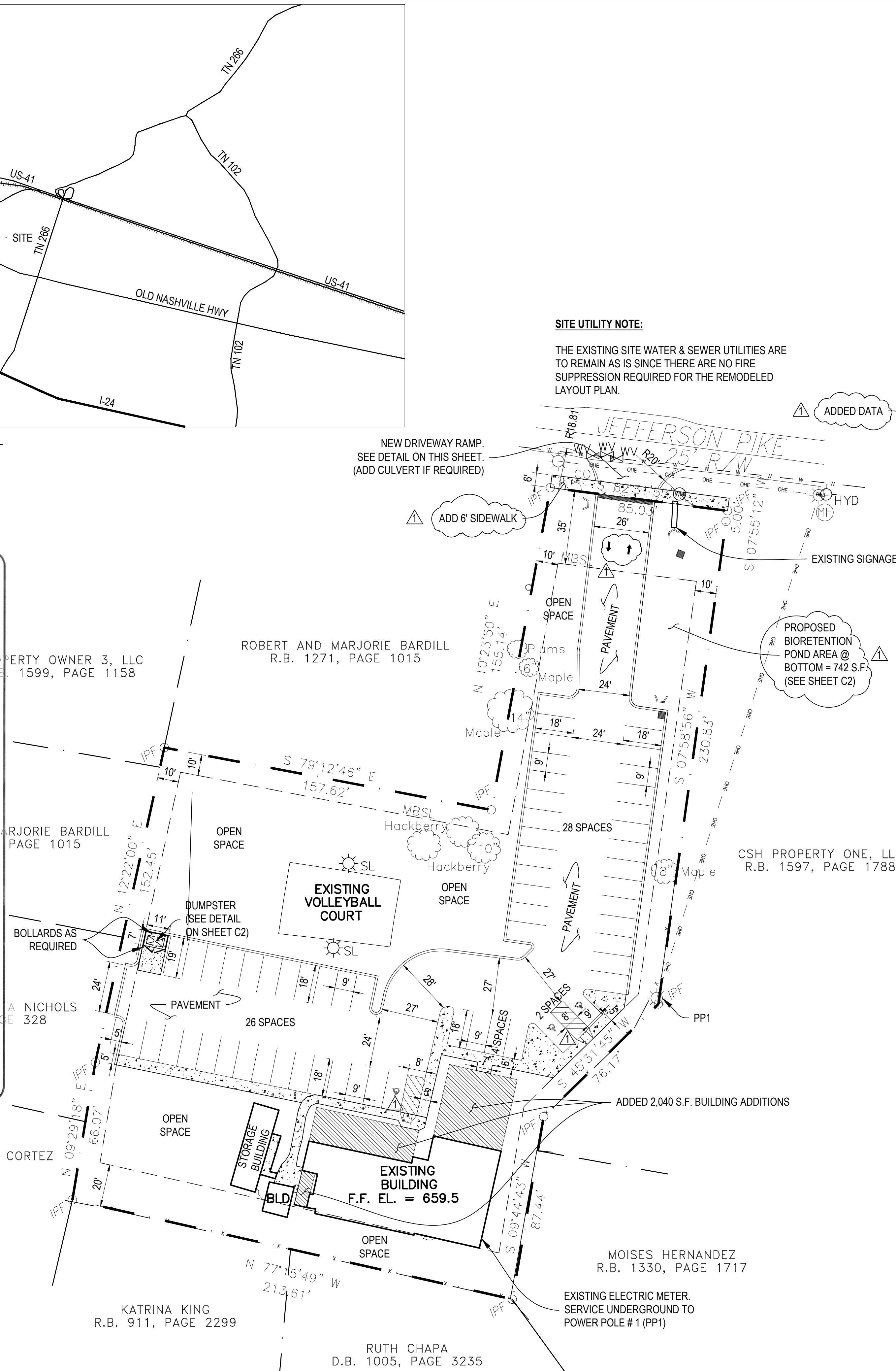


NOT TO SCALE

2 DRIVEWAY ENTRANCE DETAIL
NOT TO SCALE



1 PROPOSED SITE PLAN
Scale: 1:30



SITE UTILITY NOTE:

THE EXISTING SITE WATER & SEWER UTILITIES ARE TO REMAIN AS IS SINCE THERE ARE NO FIRE SUPPRESSION REQUIRED FOR THE REMODELED LAYOUT PLAN.

NEW DRIVEWAY RAMP.
SEE DETAIL ON THIS SHEET.
(ADD CULVERT IF REQUIRED)

ADD 6' SIDEWALK

ADDED DATA

PROPOSED BIORETENTION
POND AREA @
BOTTOM = 742 S.F.
(SEE SHEET C2)

DEVELOPMENT / SITE DATA			
1)	THE PURPOSE OF THIS SITE PLAN IS TO ADD TO THE EXISTING BUILDING FOR GROWTH.		
2)	SUBJECT PROPERTY IS PARCEL # 018 01801 & PRESENTLY ZONED R-2. THE INTENDED USE OF A RELIGIOUS INSTITUTION IS PERMITTED.		
3)	THE SUBJECT PROPERTY IS NOT AFFECTED BY THE 100 YEAR FLOOD PLAIN BASED ON INFORMATION TAKEN FROM F.E.M.A FLOOD ZONE MAP # 47149C0020J EFFECTIVE DATE: 10/16/2008 ZONE "X"		
4)	MINIMUM REQUIRED SETBACKS :		
	a. FRONT	35'	JEFFERSON PIKE
	b. RIGHT SIDE	10'	
	c. LEFT SIDE	10'	
	d. REAR	20'	
5)	LOT AREA:	65,432 SQ. FT.	1.50 ± ACRE
6)	PROPOSED SITE COVERAGE:		
	a. BUILDING AREA	4,940 SQ. FT.	TOTAL
	b. ASPHALT PARKING & SIDEWALKS	24,143 SQ. FT.	EXISTING
	c. LANDSCAPE	36,349 SQ. FT.	ADDED
	d. IMPERVIOUS AREA	29,083 SQ. FT.	
7)	PARKING TABULATION:		
	a. CHURCHES OR RELIGIOUS USES W/ NO PERMANENT SEATS		
	b. 1 PER 50 S.F. OF ASSEMBLY AREA	2,666 S.F. + 50	= 53.3 OR 54 SPACES REQUIRED
	c. TOTAL PARKING SPACES REQUIRED =		54 SPACES REQUIRED
8)	PROPOSED BUILDING EAVE HEIGHT	25 FT. ABOVE ADJACENT GRADE <	35'
10)	MAX FLOOR AREA RATIO (FAR)	0.075	= 7.5 % < 60.0 %
11)	MAX IMPERVIOUS AREA RATIO (ISR)	0.444	= 44.4 % < 90.0 %
12)	LANDSCAPE AREA RATIO (LAR)	0.556	= 55.6 % > 10.0 %
13)	PLEASE SEND ALL CORRESPONDENCE TO ENGINEER: S. ALI KOLEINI, P.E. & / OR ROLANDO S. AQUINO P.E. 3360 SAWTELLE BLVD. #101 LOS ANGELES, CA 90066 OFFICE PHONE: (615) 299-7388		

GENERAL NOTES

- THE CONTRACTOR IS TO CHECK AND VERIFY ALL BOUNDARY SURVEY, CORNERS, SETBACKS MEASUREMENTS, LEVELS, ETC. BEFORE ORDERING MATERIALS AND PROCEEDING WITH THE WORK, AND IS TO BE RESPONSIBLE FOR SAME.
- ALL TREES, STUMPS, OBSTRUCTIONS, ETC. REMOVE FROM THE RIGHT-OF-WAY AND BORROW AREAS ARE TO BE DISPOSED OF BY CONTRACTOR AS APPROVED BY THE OWNER, SO AS TO CAUSE NO POLLUTION TO THE ENVIRONMENT.
- THE CONTRACTOR WILL BE HELD RESPONSIBLE FOR THE DAMAGE OR LOSS OF ANY REFERENCE POINTS, MONUMENTS, HUBS, AND STAKED LOT CORNERS DURING THE CONSTRUCTION OF HIS WORK AND SHALL BEAR THE COST OF REPLACING SAME.
- CARE SHALL BE TAKEN TO PROTECT ANY UTILITIES, TREES, BUILDINGS, ETC. WHICH ARE TO REMAIN AND NOT BE DISTURBED BY THE CONSTRUCTION. THE CONTRACTOR SHALL BE RESPONSIBLE FOR ANY DAMAGES TO SUCH PROPERTY.
- THE CONTRACTOR SHALL GIVE ALL NECESSARY NOTICES AND OBTAIN ALL PERMITS, AND PAY LEGAL FEES. HE SHALL ALSO COMPLY WITH ALL CITY, COUNTY, AND STATE BUILDING LAWS, ORDINANCES, OR REGULATIONS.
- THE CONTRACTOR MUST UNDERSTAND THAT THE WORK IS ENTIRELY AT HIS RISK UNTIL SAME IS ACCEPTED AND HE WILL BE HELD RESPONSIBLE FOR ITS SAFETY BY THE OWNER.
- THE CONTRACTOR SHALL BE RESPONSIBLE FOR ANY DAMAGE DONE TO THE PREMISES OR ADJACENT PREMISES, OR INJURIES TO THE PUBLIC DURING THE CONSTRUCTION OF THE WORK, CAUSED BY HIMSELF, HIS SUBCONTRACTORS, OR THE CARELESSNESS OF ANY OF HIS EMPLOYEES.
- THE CONTRACTOR SHALL PROVIDE SUCH BRACING, SHEETING AND SHORING, BLASTING PROTECTION WARNING LIGHTS AND BARRICADES, ETC. AS MANY AS MAY BE NECESSARY FOR THE PROTECTION SHALL COMPLY WITH ALL APPLICABLE SAFETY STATUTES AND RULES REQUIRING CERTAIN OF LIFE AND PROPERTY FOR HIS OWN EMPLOYEES AND THE GENERAL PUBLIC. THE CONTRACTOR SHALL PROVIDE PROTECTIVE PERSONAL APPAREL SUCH AS HARD HATS, EAR PLUGS, EYE SHIELDS, PROTECTIVE SHOES, ETC. THE OWNER AND ENGINEER ASSUME NO RESPONSIBILITY OR LIABILITY FOR ACTIONS TAKEN BY THE CONTRACTOR ENDANGERING LIFE AND PROPERTY.
- THE CONTRACTOR WILL EXERCISE EXTREME CAUTION IN THE USE OF EQUIPMENT IN AND AROUND OVERHEAD AND UNDERGROUND UTILITY WIRES AND SERVICES. IF AT ANY TIME IN THE PURSUIT OF THIS WORK THE CONTRACTOR MUST WORK IN CLOSE PROXIMITY OF THE ABOVE NOTED WIRES THE UTILITY COMPANY SHALL BE CONTACTED PRIOR TO SUCH WORK AND THE PROPER SAFETY MEASURES TAKEN. A THOROUGH EXAMINATION OF THE OVERHEAD WIRES IN THE PROJECT AREA SHOULD BE MADE BY THE CONTRACTOR PRIOR TO THE INITIATION OF CONSTRUCTION. THE CONTRACTOR SHALL CONTACT EACH OF THE UTILITY COMPANIES AND TENNESSEE "ONE CALL" (800) 351-1111 PRIOR TO BEGINNING CONSTRUCTION AND HAVE THEM DETERMINE THE EXACT LOCATION AND TYPE OF APPROACH TO SUCH LINES.
- THE OWNER AND ENGINEER DO NOT ASSUME RESPONSIBILITY FOR THE POSSIBILITY THAT DURING CONSTRUCTION UTILITIES OTHER THAN THOSE SHOWN MAY BE ENCOUNTERED OR THAT ACTUAL LOCATION OF THOSE SHOWN MAY BE DIFFERENT FROM LOCATIONS DESIGNATED ON THE CONTRACT DRAWINGS. IN AREAS WHERE IT IS NECESSARY THAT EXACT LOCATIONS BE KNOWN OF UNDERGROUND UTILITIES, THE CONTRACTOR SHALL, AT HIS OWN EXPENSE, FURNISH ALL LABOR AND TOOLS TO EITHER VERIFY AND SUBSTANTIATE OR DEFINITELY ESTABLISH THE POSITION OF UNDERGROUND UTILITIES.
- THE CONTRACTOR'S AUTHORIZED FIELD REPRESENTATIVE SHALL CONTACT TENNESSEE ONE CALL 800-351-1111 FOR MARKING ALL UTILITY LINES LOCATIONS BEFORE PERFORMING ANY DIGGING.
- ALL EROSION CONTROL MEASURES ARE TO BE REMOVED PRIOR TO AS-BUILT APPROVALS.

LEGEND

○	Existing Iron Rod I.R.(O)
□	Existing Conc. Mon. C.M.(O)
●	Iron Rod (Set) I.R.(N)
⊗	Water Valve
⊞	Water Meter
⊕	Fire Hydrant
⊙	Utility Pole
—	Anchor / guy wire
—W—	Water Line
—GAS—	Gas Line
—OHL—	Overhead Utility Line
—CMP—	Corrugated Metal Pipe
—RCP—	Reinforced Concrete Pipe
—SS—	Sanitary Sewer
—R.O.W.—	Right Of Way
↑	Hose Bibb (H.B.)
○ _{clean}	Clean-Out

LINETYPE LEGEND

PROPERTY LINE	
1" WATER	1 W
WATER	W
FENCING	X
OVERHEAD ELECTRIC	OHE
SANITARY SEWER	SS
6" SANITARY SEWER	SS 6
STORM DRAIN PIPE	SD
SEDIMENT TUBES	ST
BUILDING OUTLINE	
SILT FENCING	SF
RIGHT OF WAY	
EXISTING MINOR CONTOURS	
EXIST. MAJOR CONTOURS	
PROPOSED CONTOURS	
CENTER OF ROAD	

AZIM TECH
ENGINEERING, INC.
CONSULTING ENGINEERS
3360 Sawtelle Blvd #101
Los Angeles, CA 90066
Phone: (615) 347 7903
www.azimtech.com
azimtech.engage@gmail.com

PROJECT DESCRIPTION:
SEVENTH DAY ADVENTISTS
ADDITION TO EXISTING CHURCH
271 JEFFERSON PK., LAVERGNE, TN 37086 - PARCEL ID: 018 01801



REV.	DATE	DESCRIPTION
1	1/18/2023	REVISED PER WORKSHOP COMMENTS 1-11/23

DESIGNED BY:	A.K.
DRAWN BY:	R.L.
SCALE:	1" = 30'
PROJECT NO.	
DATE:	3/31/2023
ISSUED FOR:	FOR APPROVAL
DRAWING TITLE:	

PROPOSED SITE PLAN
DRAWING NO.
C1.2

1. CONTRACTOR IS RESPONSIBLE FOR KEEPING DUST WITHIN TOLERABLE LIMITS BY SPRINKLING OR OTHER METHODS.
2. ALL CUT AND FILL AREAS SHALL HAVE A MINIMUM OF 6" TOP SOIL, SHALL RECEIVE 12 POUNDS PER 1000 S.F. OF 6-12-12 FERTILIZER (UNLESS OTHERWISE SPECIFIED IN WRITTEN SPECIFICATIONS).
3. DISTURBED AREAS ARE TO BE GRADED TO DRAIN AS INDICATED IN THE PLAN TO SEDIMENT BARRIERS DURING CONSTRUCTION.
4. THE CONTRACTOR SHALL BE RESPONSIBLE FOR THE VERIFICATION AND LOCATION OF EXISTING UTILITIES.
5. CONTRACTOR IS RESPONSIBLE FOR DAMAGE TO EXISTING UTILITIES DURING CONSTRUCTION.
6. ANY ACCESS ROAD TO THE SITE SHALL BE BASED ON CRUSHED ASTM #1 STONE, 100' LONG BY 20' WIDE AND 6" DEEP.
7. THE PLACING AND SPREADING IF ANY FILL MATERIAL IS TO BE STARTED AT THE LOWEST POINT AND BROUGHT TO HORIZONTAL LAYERS OF 8" LIFTS.
8. THE FILL MATERIALS TO BE FREE OF ROOTS, SOD, FROZEN SOIL OR DECOMPOSABLE MATERIALS.
9. FILL TO BE COMPACTED TO A MINIMUM IF 95% STANDARD PROCTOR.
10. ALL WORK TO BE PERFORMED AND COMPLETED IN ABSOLUTE COMPLIANCE WITH THE RULES AND REGULATIONS AS SET FORTH IN THE RUTHERFORD COUNTY / CITY OF LAVERGNE SPECIFICATIONS.
11. CONTRACTOR SHALL GIVE ALL NECESSARY NOTICE, OBTAIN ALL PERMITS AND PAY ANY FEES REQUIRED FOR THE COMPLETION OF HIS PORTION OF THE WORK. CONTRACTOR SHALL ALSO COMPLY WITH ALL CITY, COUNTY, AND STATE LAWS AND ORDINANCES OR REGULATIONS RELATING TO HIS PORTION OF THE WORK.
12. ANY RETAINING WALL GREATER THAN 4' IN HEIGHT WILL REQUIRE A PEDESTRIAN BARRIER FOR SAFETY. SEE DETAIL SHEET FOR GUARDRAIL DETAIL.
13. ALL EROSION CONTROL MEASURES ARE TO BE REMOVED PRIOR TO AS-BUILT APPROVALS.
15. USE S150 STRAW BLANKETS FOR 3:1 GRADE SLOPES. GRADING PERMITTEE TO INCLUDE BMP'S DESIGNED TO CONTROL SITE WASTES SUCH AS DISCARDED BUILDING MATERIALS, CHEMICALS, LITTER AND SANITARY WASTES THAT MAY CAUSE ADVERSE IMPACTS TO WATER QUALITY. THE LOCATION OF AND / OR NOTES REFERRING TO SAID BMP'S SHALL BE SHOWN ON THE EPSC PLAN.
16. STEEP SLOPES ARE TO BE STABILIZED WITHIN 7 DAYS OF FINAL GRADING.



Figure 3-29. Half-Round CMP Orifice Hood



TYPICAL TRENCH DRAIN DETAIL
NOT TO SCALE



SFF PLAN



LEGEND

- | | |
|----------------|-----------------------------|
| ○ | Existing Iron Rod I.R.(O) |
| □ | Existing Conc. Mon. C.M.(O) |
| ● | Iron Rod (Set) I.R.(N) |
| ⊗ | Water Valve |
| ⊗ | Water Meter |
| ⊗ | Fire Hydrant |
| ⊘ | Utility Pole |
| ← | Anchor / guy wire |
| -W- | Water Line |
| -GAS- | Gas Line |
| -OHL- | Overhead Utility Line |
| CMP | Corrugated Metal Pipe |
| RCP | Reinforced Concrete Pipe |
| SS | Sanitary Sewer |
| R.O.W. | Right Of Way |
| ↑ | Hose Bibb (H.B.) |
| ○ _o | Clean-Out |

THE OWNER AND THE CONTRACTOR ARE REQUESTED TO SUBMIT A NOTICE OF INTENT (NOI) TO DISCHARGE CONSTRUCTION ACTIVITY STORM WATER POLLUTION TO THE LOCAL TENNESSEE ENVIRONMENTAL ASSISTANCE CENTER AT LEAST 30 DAYS PRIOR TO BEGINNING CONSTRUCTION.

THE CONSTRUCTION ACTIVITY ANTICIPATED ON THIS PROJECT INCLUDES CLEARING, GRUBBING, GRADING, TOP SOILING AND SEEDING.

3. THE APPROXIMATE TOTAL AREA OF THE SITE IS 1.50 ACRES. THE APPROXIMATE TOTAL AREA OF GRADING PROPOSED IS 0.68 ACRES DISTURBED.
4. THE INCREASE IN POST-CONSTRUCTION IMPERVIOUS AREA IS 0.56ACRES. THE ESTIMATED VOLUME OF RUNOFF FROM THE SITE DUE TO A ONE INCH RAINFALL IS 0.04 ACRE-FEET.
5. THE ANTICIPATED FILL MATERIAL WILL CONSIST OF ON-SITE SOIL AND/OR SHOT ROCK MATERIALS.
6. THE RECEIVING WATER/STORM SEWER OPERATOR IS CITY OF LAVERGNE WATER SERVICES.
7. CONSTRUCTION SHALL BE SEQUENCED TO MINIMIZE EXPOSURE TIME OF CLEARED SURFACE AREA, EROSION AND SEDIMENT CONTROL MEASURES SHALL BE IN PLACE AND FUNCTIONAL PRIOR TO EARTH MOVING OPERATIONS. ALL CONTROL MEASURES SHALL BE CHECKED AND REPAIRED AS NECESSARY, AND AT MAXIMUM 14 DAY CALENDAR DAYS IN DRY PERIODS AND WITHIN 24 HOURS AFTER ANY RAINFALL EXCEEDING 0.5 INCH WITHIN A 24 HOUR PERIOD.
8. THE CONTRACTOR SHALL DESIGNATE IN WRITING THE NAME AND PHONE NUMBER OF THE INDIVIDUAL RESPONSIBLE FOR EROSION AND SEDIMENT CONTROLS.
9. PRE-CONSTRUCTION VEGETATIVE GROUND COVER SHALL NOT BE REMOVED MORE THAN 20 CALENDAR DAYS PRIOR TO GRADING. ALL GRADED AREAS EXPECTED TO REMAIN UNFINISHED FOR MORE THAN 15 CALENDAR DAYS SHALL BE COVERED WITH TEMPORARY GRASS, SOD, STRAW, MULCH OR FABRIC MATS. PERMANENT SOIL STABILIZATION SHALL BE INSTALLED WITHIN 15 CALENDAR DAYS OF FINAL GRADING.
10. THE CONTRACTOR SHALL MAINTAIN RECORDS OF EROSION CONTROL INSPECTIONS AND REPAIRS FOR A MINIMUM OF 3 YEARS AFTER CONSTRUCTION COMPLETION.
11. TEMPORARY SEEDING FOR TENNESSEE PROJECTS INCLUDE THE FOLLOWING OPTIONS:

JAN 1 - MAY 1	ITALIAN RYE/KOREAN LESPEDEZA/SUMMER OATS
MAY 1 - JULY 15	SUDAN OR STARR MILLET
JULY 15 - JAN 1	BALBOA RYE/ITALIAN RYE
12. MULCHING SHALL CONSIST OF LOOSE HAY OR STRAW APPLIED AT THE RATE OF 2 TONS/ACRE.
13. THE CONTRACTOR SHALL REMOVE SEDIMENT FROM TRAPS, SILT FENCES, SEDIMENT SWALES AND ETC. AS NECESSARY AND WHEN CAPACITY HAS BEEN REDUCED BY 50%.
14. STOCKPILES SHALL BE STABILIZED AND PROTECTED FROM EROSION.
15. THE CONTRACTOR IS TO PROVIDE AN AREA FOR CONCRETE WASH DOWN AND EQUIPMENT FUELING IN ACCORDANCE WITH CITY OF LAVERGNE CP-10 AND CP-13 RESPECTIVELY. THE CONTRACTOR IS TO COORDINATE EXACT LOCATION WITH NPDES DEPARTMENT DURING PRE-CONSTRUCTION MEETING.

SIGNATURE

3/31/23

Tennessee Construction Permit Notice of Coverage (NOC) Certification:

I hereby certify that this project does not require coverage under Tennessee Construction General Permit. The Total Disturbed Area is: 0.68 acres.

Check all that apply: This site discharges into waters identified by TDEC as:
☒ Impaired for siltation ☐ Impaired for habitat alterations ☐ Exceptional

Signature: Ali Koh Date: 3/31/2023

Circle one: Developer Project Engineer Other _____

Note: Projects of one (1) or more acres require State permit coverage, while projects of less than one (1) acres do not require State permit coverage. Also, projects of less than one (1) acre that are part of a total development project of one (1) acres require State permit coverage.

PROPERTY LINE	_____	.	_____	.	_____
1" WATER	_____		1 W		_____
WATER	_____	W		W	_____
FENCING	_____		X		_____
OVERHEAD ELECTRIC	_____		OHE		_____
SANITARY SEWER	_____	SS		SS	_____
6" SANITARY SEWER	_____	SS 6		SS 6	_____
STORM DRAIN PIPE	_____	SD		SD	_____
SEDIMENT TUBES	_____	ST		ST	_____
BUILDING OUTLINE	_____				
SILT FENCING	_____	SF		SF	_____
RIGHT OF WAY	_____				
EXISTING MINOR CONTOURS	-----				
EXIST. MAJOR CONTOURS	-----				
PROPOSED CONTOURS	_____				
CENTER OF ROAD	_____				

PROJECT DESCRIPTION:

SEVENTH DAY ADVENTISTS
ADDITION TO EXISTING CHURCH

271 JEFFERSON PK., LAVERGNE, TN 37086 - PARCEL ID: 018 01



REV.	DESCRIPTION	DATE
1	REVISED PER PLANNING WORKSHOP COMMENTS 1.17.23	1/19/2023

DESIGNED BY : A.K.

DRAWN BY: R.L.

SCALE : 1" = 30'

PROJECT NO. _____

DATE: 3/31/2023

ISSUED FOR:

FOR APPROVAL

DRAWING TITLE :

SAVING TIME:

PROPOSED

GRADING SITE

PLAN

SAUNDERS, J. G.

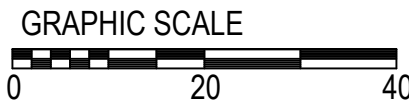
DRAWING NO.

00

2

02





STORMWATER CALCULATIONS FOR

SEVENTH DAY ADVENTISTS

ADDITION TO EXISTING CHURCH

271 JEFFERSON PK.
LAVERGNE, TN 37086
PARCEL ID: 01801801



MARCH 31, 2023

PREPARED BY: S. ALI KOLEINI, P.E.
AZIMTECH ENGINEERING, INC.
3360 SAWTELLE BLVD. #101
LOS ANGELES, CA. 90066
PH: (615) 347-7903
Email: azimtech.eng@gmail.com
Alt. Email: rocklewhite@aol.com

1) Pre-Development Area:

Area A:

Total area: 39,762 sq.ft.

Building & Sidewalk: 3,685 sq.ft.

Gravel area: 11,983 sq.ft.

Grass area: 24,094 sq.ft.

Area B:

Total area: 15,467 sq.ft.

Gravel area: 1,815 sq.ft.

Grass area: 13,652 sq.ft.

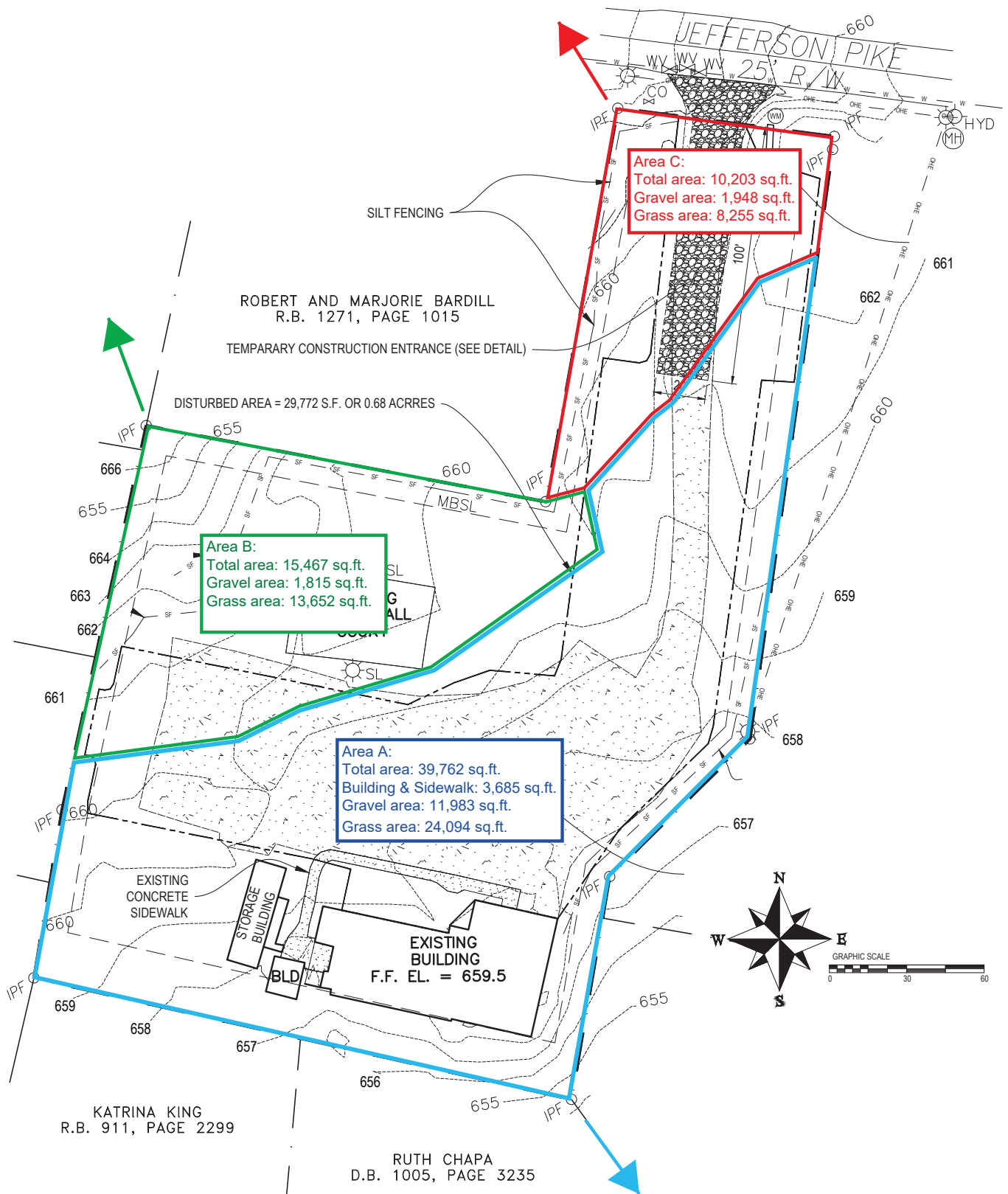
Area C:

Total area: 10,203 sq.ft.

Gravel area: 1,948 sq.ft.

Grass area: 8,255 sq.ft.

Pre-Development Areas



2) Post-Development Area:

Area A:

Total area: 21,490 sq.ft.

Building & Sidewalk: 5,698 sq.ft.

Grass area: 15,792 sq.ft.

Area B:

Total area: 14,611 sq.ft.

Grass area: 14,611 sq.ft.

Area C1:

Total area: 3,169 sq.ft.

Grass area: 3,169 sq.ft.

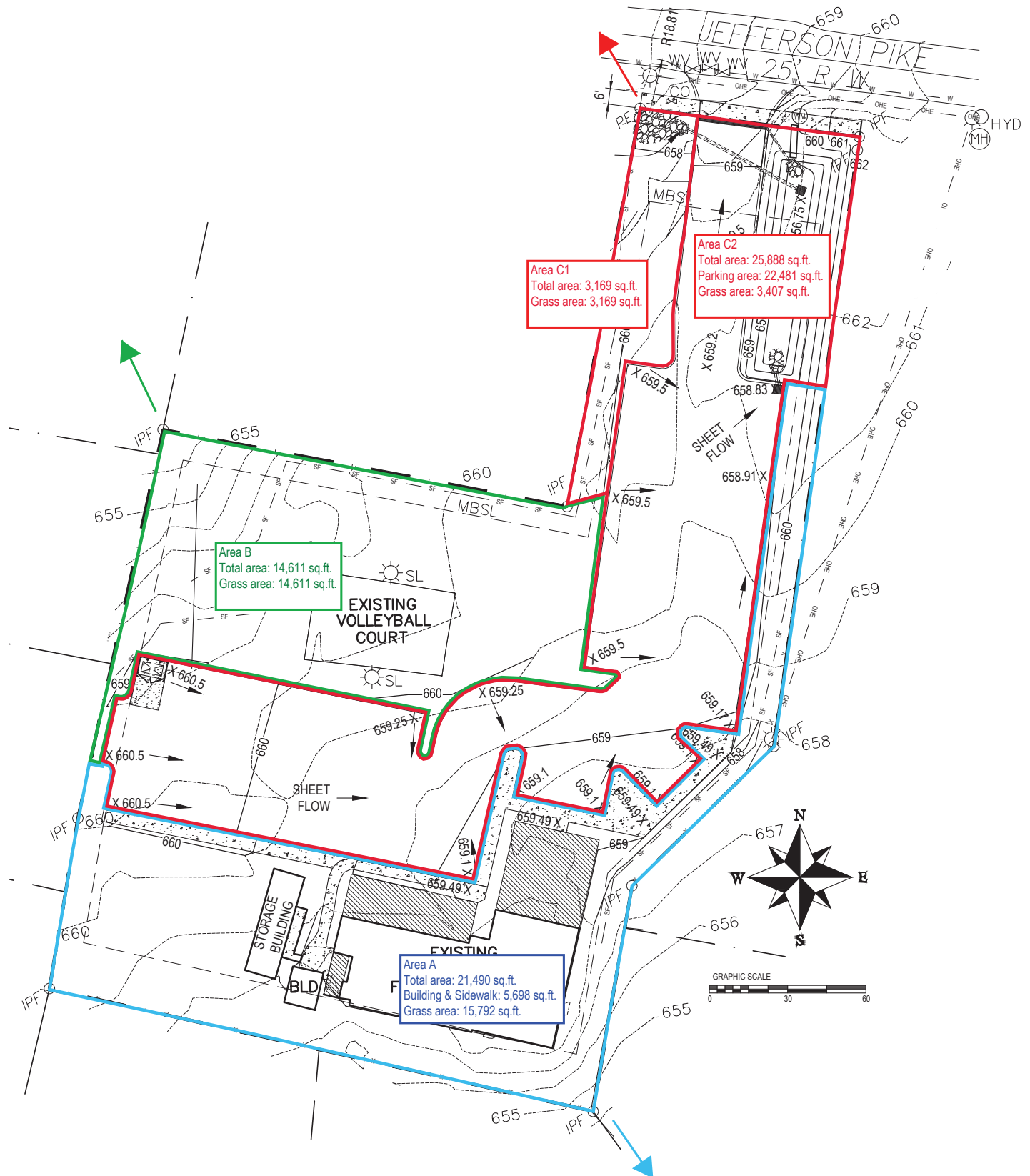
Area C2:

Total area: 25,888 sq.ft.

Parking area: 22,481 sq.ft.

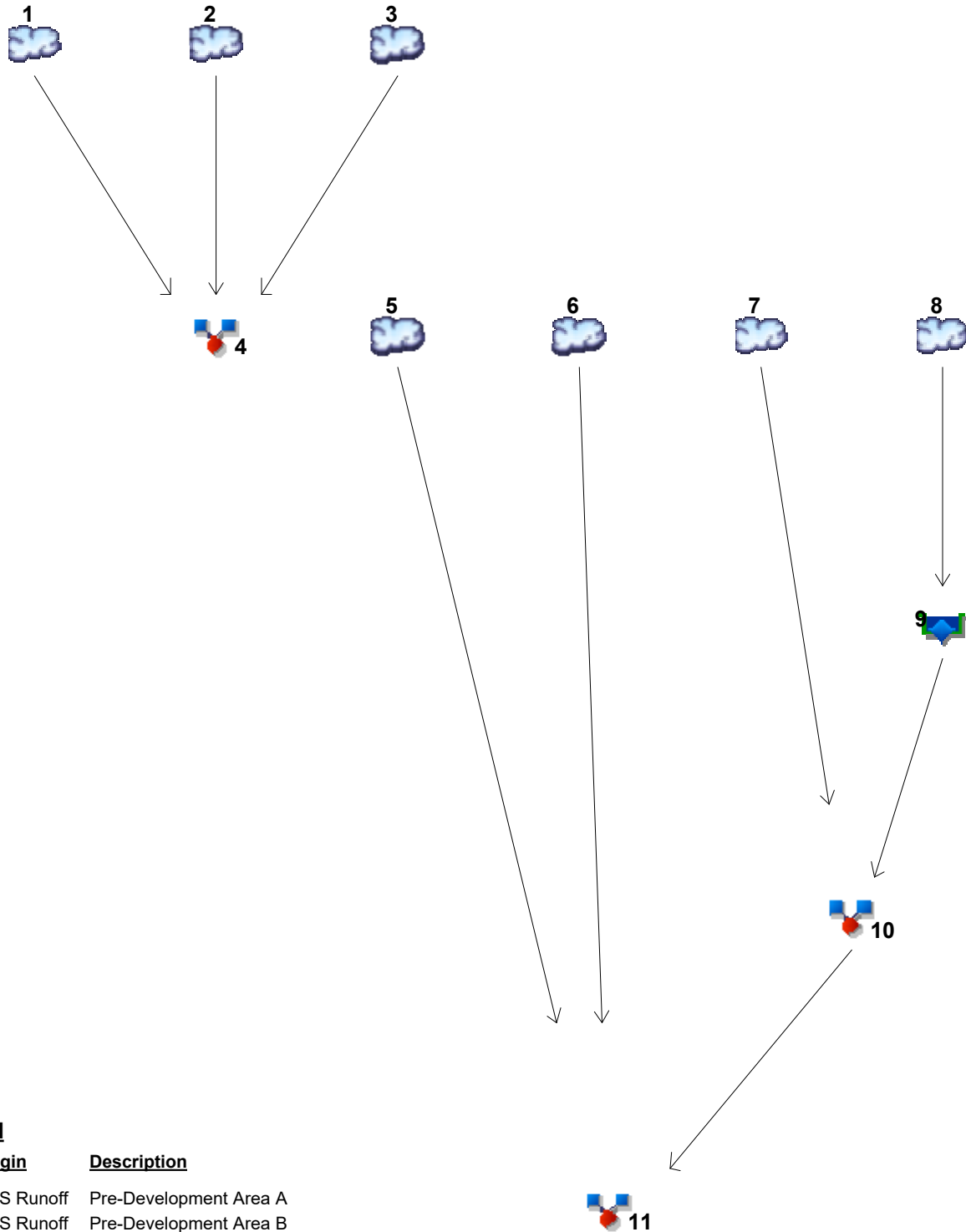
Grass area: 3,407 sq.ft.

Post-Development Areas



Watershed Model Schematic

Hydraflow Hydrographs Extension for Autodesk® Civil 3D® by Autodesk, Inc. v2023



Legend

Hyd.	Origin	Description
1	SCS Runoff	Pre-Development Area A
2	SCS Runoff	Pre-Development Area B
3	SCS Runoff	Pre-Development Area C
4	Combine	Pre-Developments
5	SCS Runoff	Post-Development Area A
6	SCS Runoff	Post-Development Area B
7	SCS Runoff	Post-Development Area C1
8	SCS Runoff	Post-Development Area C2
9	Reservoir	Rout A
10	Combine	Post-Development Area C
11	Combine	Post-Developments

Hydrograph Return Period Recap

Hydraflow Hydrographs Extension for Autodesk® Civil 3D® by Autodesk, Inc. v2023

Hyd. No.	Hydrograph type (origin)	Inflow hyd(s)	Peak Outflow (cfs)								Hydrograph Description
			1-yr	2-yr	3-yr	5-yr	10-yr	25-yr	50-yr	100-yr	
1	SCS Runoff	-----	-----	2.822	-----	3.786	4.565	5.666	6.556	7.473	Pre-Development Area A
2	SCS Runoff	-----	-----	0.908	-----	1.257	1.545	1.958	2.295	2.643	Pre-Development Area B
3	SCS Runoff	-----	-----	0.622	-----	0.856	1.047	1.320	1.542	1.771	Pre-Development Area C
4	Combine	1, 2, 3	-----	4.349	-----	5.899	7.157	8.944	10.39	11.89	Pre-Developments
5	SCS Runoff	-----	-----	1.503	-----	2.017	2.431	3.018	3.492	3.980	Post-Development Area A
6	SCS Runoff	-----	-----	0.845	-----	1.176	1.454	1.853	2.179	2.516	Post-Development Area B
7	SCS Runoff	-----	-----	0.174	-----	0.242	0.299	0.381	0.449	0.518	Post-Development Area C1
8	SCS Runoff	-----	-----	2.603	-----	3.229	3.725	4.420	4.978	5.552	Post-Development Area C2
9	Reservoir	8	-----	0.236	-----	0.488	0.674	0.929	1.144	1.366	Rout A
10	Combine	7, 9	-----	0.276	-----	0.575	0.829	1.134	1.388	1.650	Post-Development Area C
11	Combine	5, 6, 10	-----	2.585	-----	3.678	4.606	5.863	6.885	7.945	Post-Developments
Proj. file: 271 Jefferson Pk.gpw										Friday, 03 / 31 / 2023	

Hydrograph Summary Report

Hydraflow Hydrographs Extension for Autodesk® Civil 3D® by Autodesk, Inc. v2023

Hyd. No.	Hydrograph type (origin)	Peak flow (cfs)	Time interval (min)	Time to Peak (min)	Hyd. volume (cuft)	Inflow hyd(s)	Maximum elevation (ft)	Total strge used (cuft)	Hydrograph Description
1	SCS Runoff	2.822	2	716	5,716	-----	-----	-----	Pre-Development Area A
2	SCS Runoff	0.908	2	718	1,827	-----	-----	-----	Pre-Development Area B
3	SCS Runoff	0.622	2	716	1,255	-----	-----	-----	Pre-Development Area C
4	Combine	4.349	2	716	8,798	1, 2, 3	-----	-----	Pre-Developments
5	SCS Runoff	1.503	2	716	3,044	-----	-----	-----	Post-Development Area A
6	SCS Runoff	0.845	2	718	1,696	-----	-----	-----	Post-Development Area B
7	SCS Runoff	0.174	2	718	349	-----	-----	-----	Post-Development Area C1
8	SCS Runoff	2.603	2	716	5,741	-----	-----	-----	Post-Development Area C2
9	Reservoir	0.236	2	742	3,523	8	658.68	3,512	Rout A
10	Combine	0.276	2	720	3,872	7, 9	-----	-----	Post-Development Area C
11	Combine	2.585	2	718	8,612	5, 6, 10	-----	-----	Post-Developments
271 Jefferson Pk.gpw					Return Period: 2 Year			Friday, 03 / 31 / 2023	

Hydrograph Report

Hydraflow Hydrographs Extension for Autodesk® Civil 3D® by Autodesk, Inc. v2023

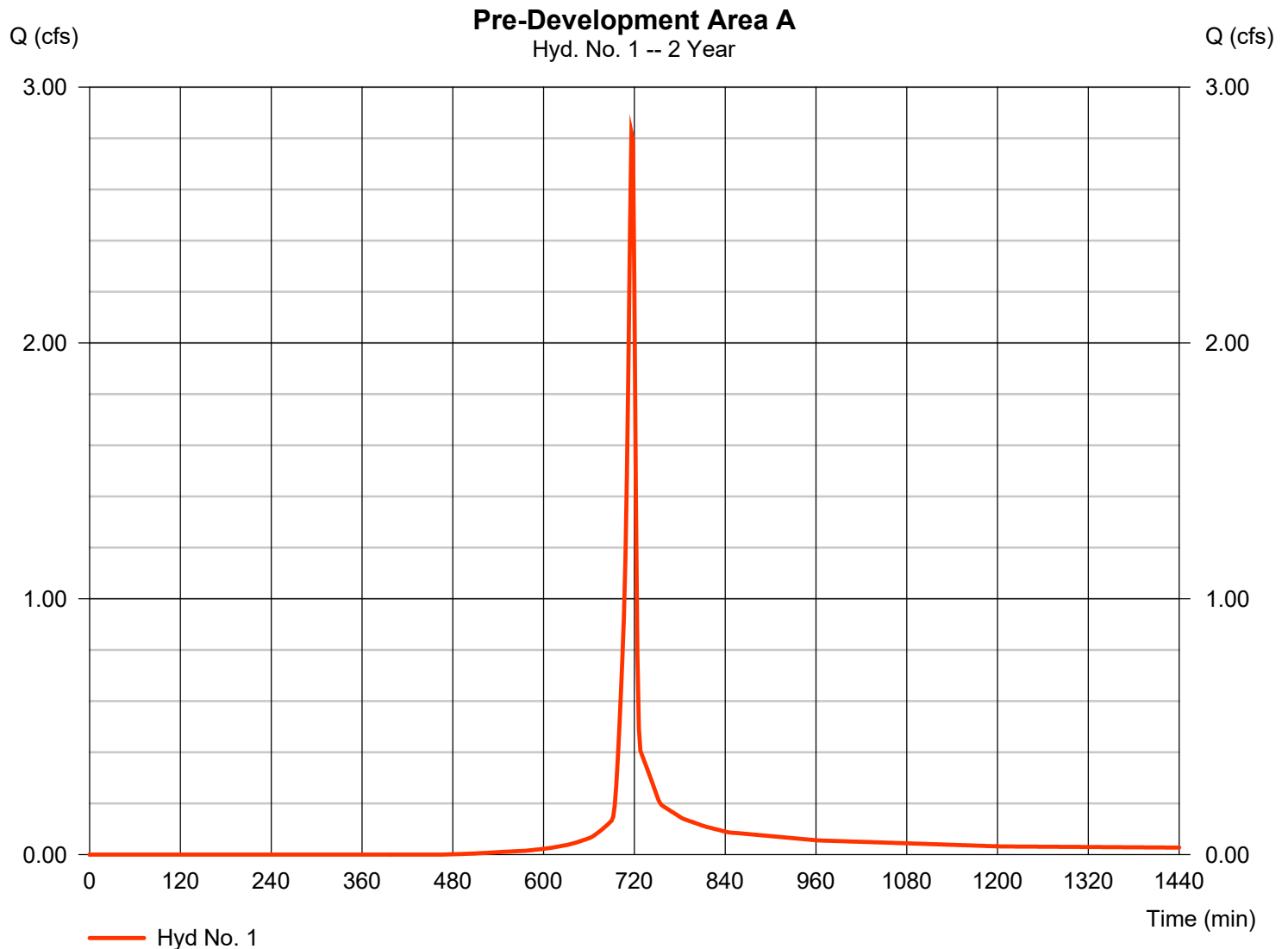
Friday, 03 / 31 / 2023

Hyd. No. 1

Pre-Development Area A

Hydrograph type	= SCS Runoff	Peak discharge	= 2.822 cfs
Storm frequency	= 2 yrs	Time to peak	= 716 min
Time interval	= 2 min	Hyd. volume	= 5,716 cuft
Drainage area	= 0.920 ac	Curve number	= 84*
Basin Slope	= 3.0 %	Hydraulic length	= 178 ft
Tc method	= User	Time of conc. (Tc)	= 5.00 min
Total precip.	= 3.37 in	Distribution	= Type II
Storm duration	= 24 hrs	Shape factor	= 484

* Composite (Area/CN) = $[(0.090 \times 98) + (0.280 \times 89) + (0.550 \times 79)] / 0.920$



Hydrograph Report

Hydraflow Hydrographs Extension for Autodesk® Civil 3D® by Autodesk, Inc. v2023

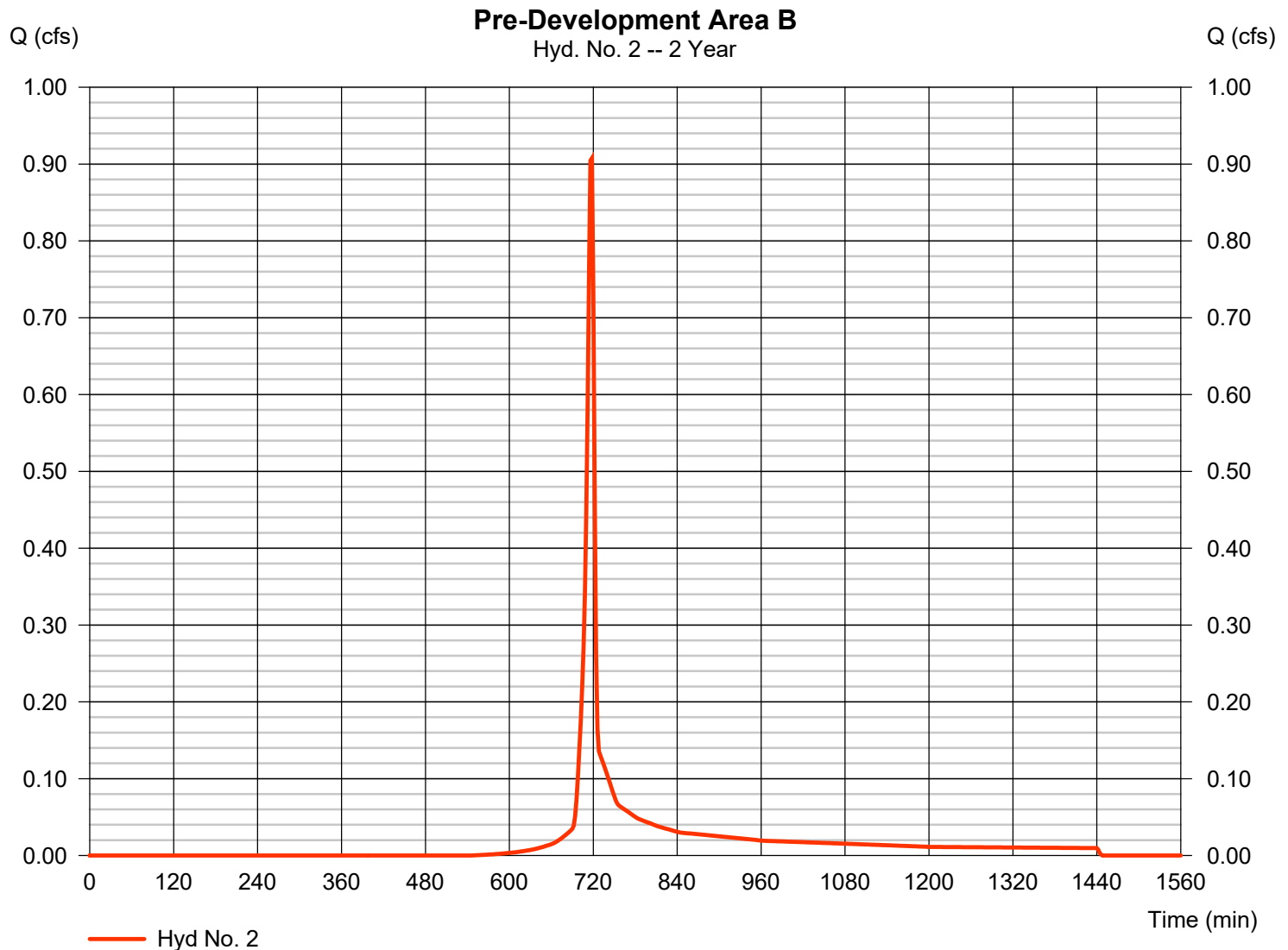
Friday, 03 / 31 / 2023

Hyd. No. 2

Pre-Development Area B

Hydrograph type	= SCS Runoff	Peak discharge	= 0.908 cfs
Storm frequency	= 2 yrs	Time to peak	= 718 min
Time interval	= 2 min	Hyd. volume	= 1,827 cuft
Drainage area	= 0.350 ac	Curve number	= 80*
Basin Slope	= 4.0 %	Hydraulic length	= 133 ft
Tc method	= User	Time of conc. (Tc)	= 5.00 min
Total precip.	= 3.37 in	Distribution	= Type II
Storm duration	= 24 hrs	Shape factor	= 484

* Composite (Area/CN) = + (0.040 x 89) + (0.310 x 79)] / 0.350



Hydrograph Report

Hydraflow Hydrographs Extension for Autodesk® Civil 3D® by Autodesk, Inc. v2023

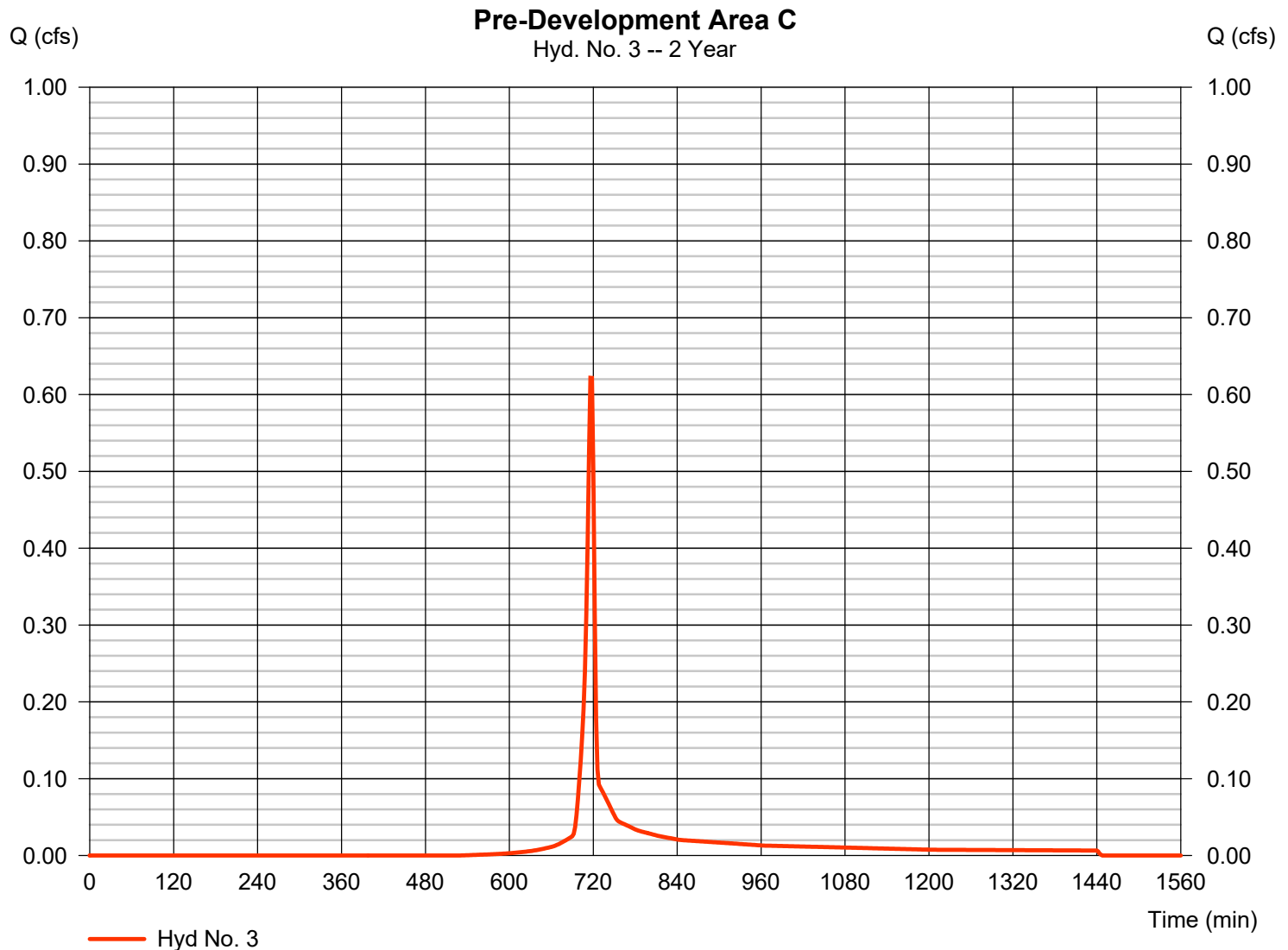
Friday, 03 / 31 / 2023

Hyd. No. 3

Pre-Development Area C

Hydrograph type	= SCS Runoff	Peak discharge	= 0.622 cfs
Storm frequency	= 2 yrs	Time to peak	= 716 min
Time interval	= 2 min	Hyd. volume	= 1,255 cuft
Drainage area	= 0.230 ac	Curve number	= 81*
Basin Slope	= 3.0 %	Hydraulic length	= 115 ft
Tc method	= User	Time of conc. (Tc)	= 5.00 min
Total precip.	= 3.37 in	Distribution	= Type II
Storm duration	= 24 hrs	Shape factor	= 484

* Composite (Area/CN) = + (0.040 x 89) + (0.190 x 79)] / 0.230



Hydrograph Report

Hydraflow Hydrographs Extension for Autodesk® Civil 3D® by Autodesk, Inc. v2023

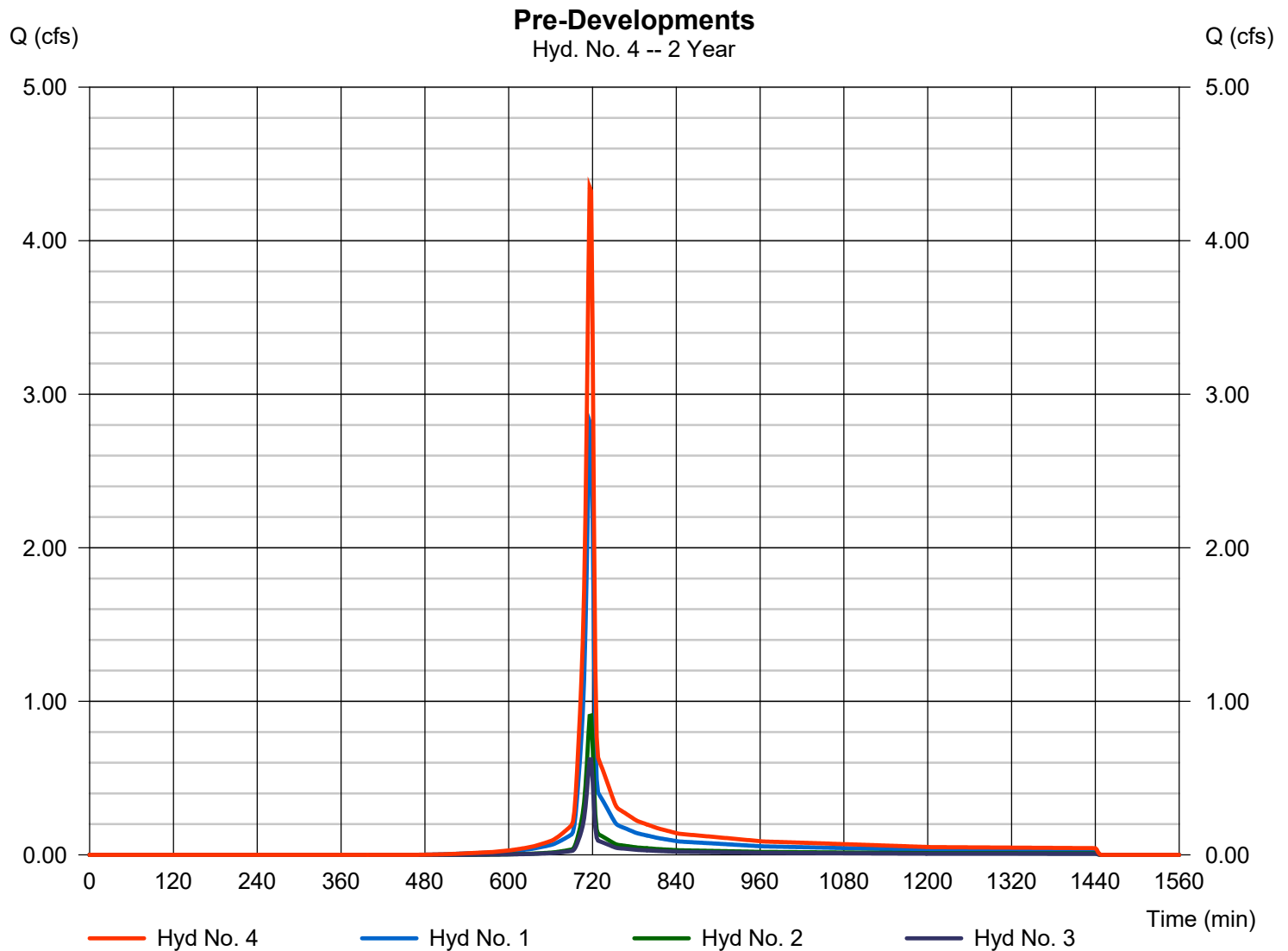
Friday, 03 / 31 / 2023

Hyd. No. 4

Pre-Developments

Hydrograph type = Combine
 Storm frequency = 2 yrs
 Time interval = 2 min
 Inflow hyds. = 1, 2, 3

Peak discharge = 4.349 cfs
 Time to peak = 716 min
 Hyd. volume = 8,798 cuft
 Contrib. drain. area = 1.500 ac



Hydrograph Report

Hydraflow Hydrographs Extension for Autodesk® Civil 3D® by Autodesk, Inc. v2023

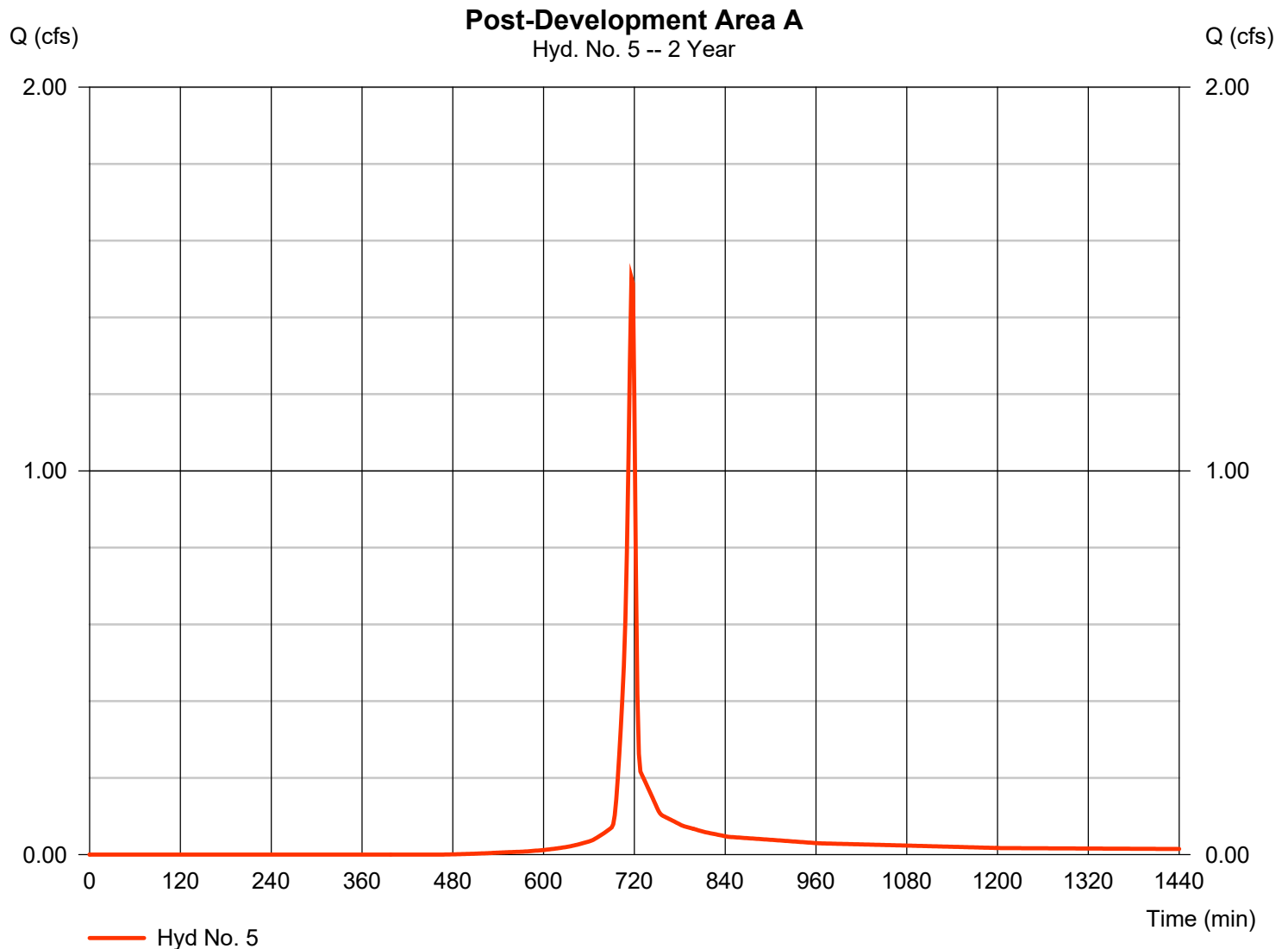
Friday, 03 / 31 / 2023

Hyd. No. 5

Post-Development Area A

Hydrograph type	= SCS Runoff	Peak discharge	= 1.503 cfs
Storm frequency	= 2 yrs	Time to peak	= 716 min
Time interval	= 2 min	Hyd. volume	= 3,044 cuft
Drainage area	= 0.490 ac	Curve number	= 84*
Basin Slope	= 3.0 %	Hydraulic length	= 178 ft
Tc method	= User	Time of conc. (Tc)	= 5.00 min
Total precip.	= 3.37 in	Distribution	= Type II
Storm duration	= 24 hrs	Shape factor	= 484

* Composite (Area/CN) = $[(0.130 \times 98) + (0.360 \times 79)] / 0.490$



Hydrograph Report

Hydraflow Hydrographs Extension for Autodesk® Civil 3D® by Autodesk, Inc. v2023

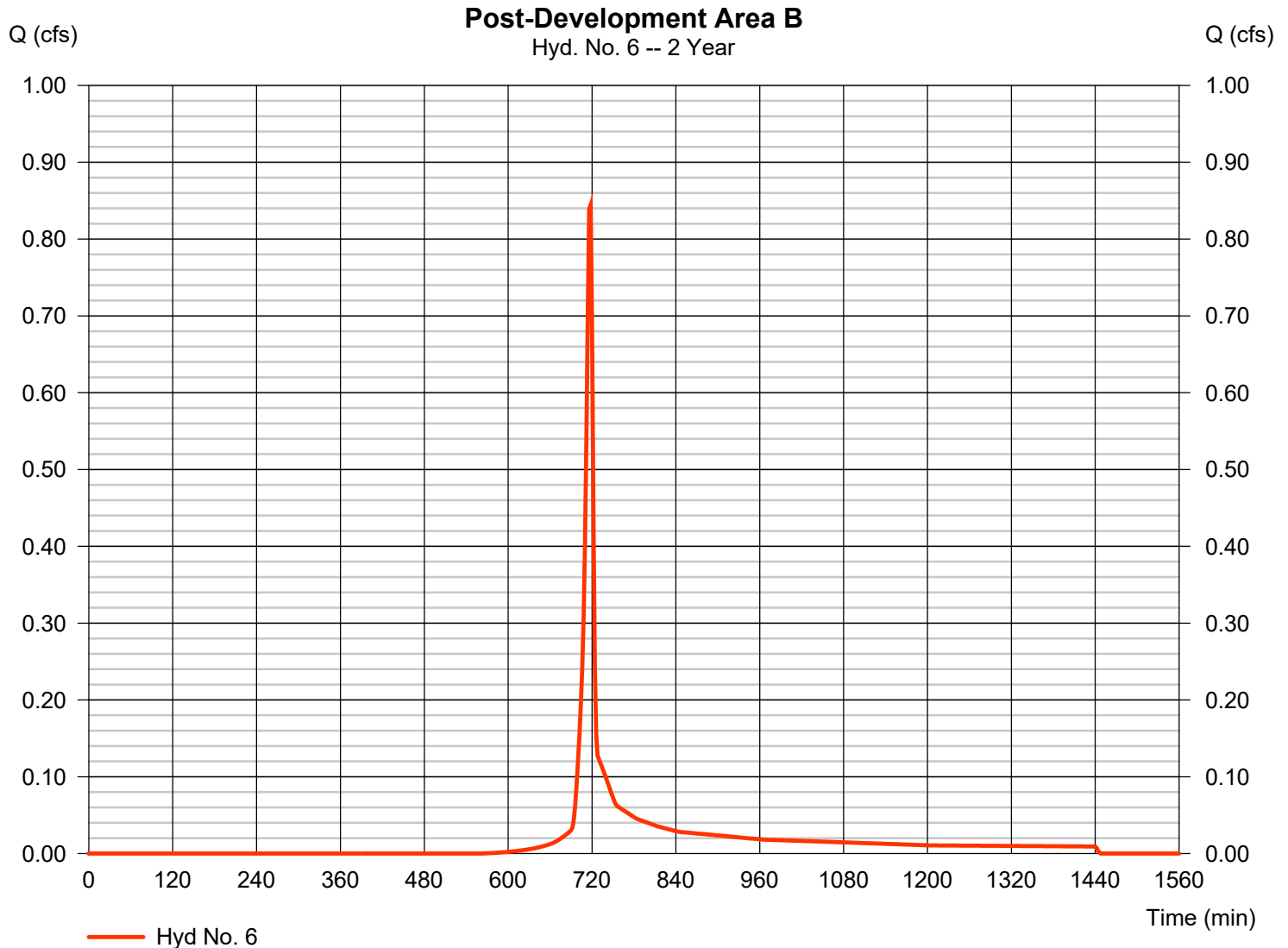
Friday, 03 / 31 / 2023

Hyd. No. 6

Post-Development Area B

Hydrograph type	= SCS Runoff	Peak discharge	= 0.845 cfs
Storm frequency	= 2 yrs	Time to peak	= 718 min
Time interval	= 2 min	Hyd. volume	= 1,696 cuft
Drainage area	= 0.340 ac	Curve number	= 79*
Basin Slope	= 4.0 %	Hydraulic length	= 133 ft
Tc method	= User	Time of conc. (Tc)	= 5.00 min
Total precip.	= 3.37 in	Distribution	= Type II
Storm duration	= 24 hrs	Shape factor	= 484

* Composite (Area/CN) = $[(0.340 \times 79)] / 0.340$



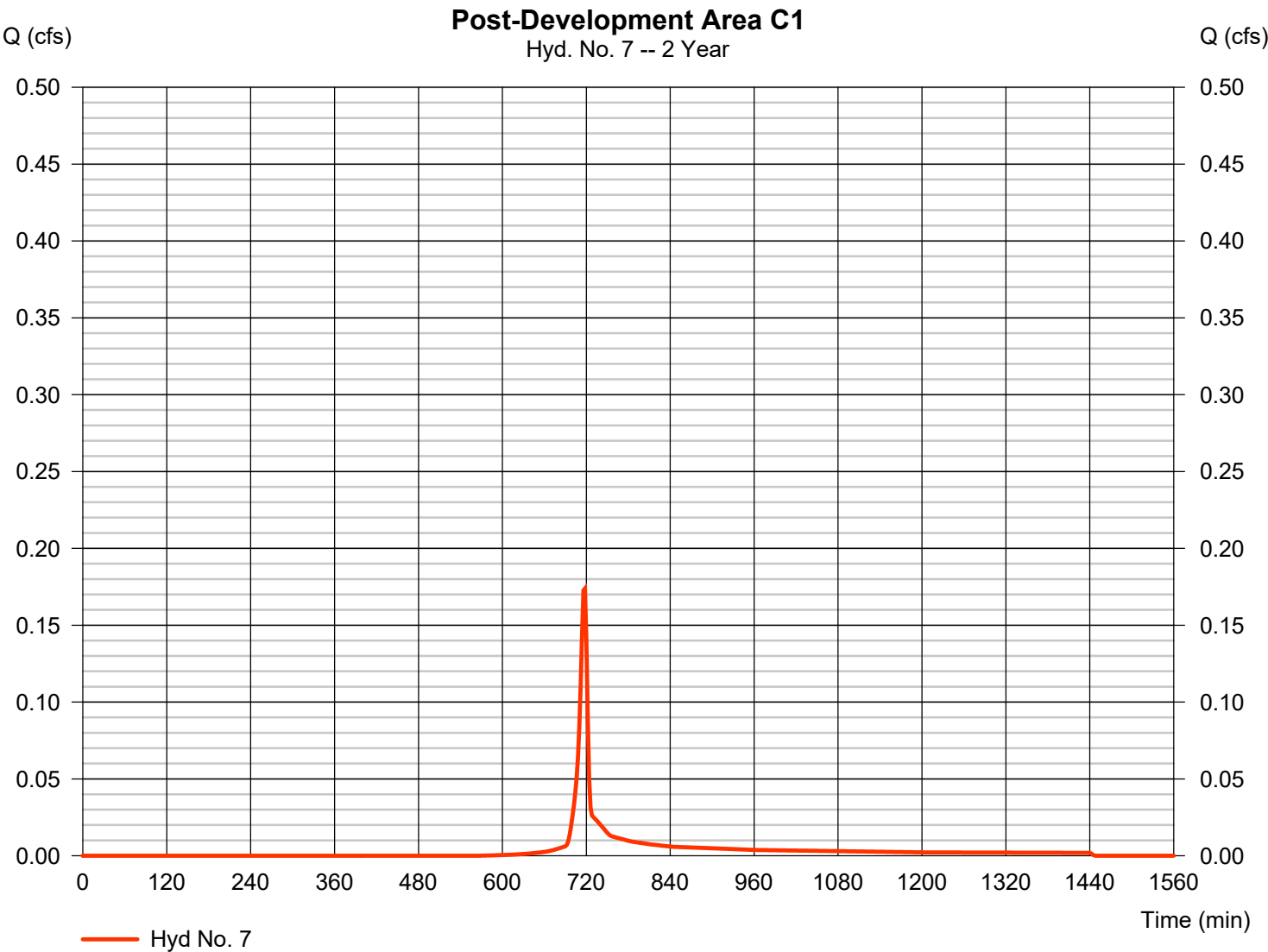
Hydrograph Report

Hyd. No. 7

Post-Development Area C1

Hydrograph type	= SCS Runoff	Peak discharge	= 0.174 cfs
Storm frequency	= 2 yrs	Time to peak	= 718 min
Time interval	= 2 min	Hyd. volume	= 349 cuft
Drainage area	= 0.070 ac	Curve number	= 79*
Basin Slope	= 3.0 %	Hydraulic length	= 115 ft
Tc method	= User	Time of conc. (Tc)	= 5.00 min
Total precip.	= 3.37 in	Distribution	= Type II
Storm duration	= 24 hrs	Shape factor	= 484

* Composite (Area/CN) = [(0.070 x 79)] / 0.070



Hydrograph Report

Hydraflow Hydrographs Extension for Autodesk® Civil 3D® by Autodesk, Inc. v2023

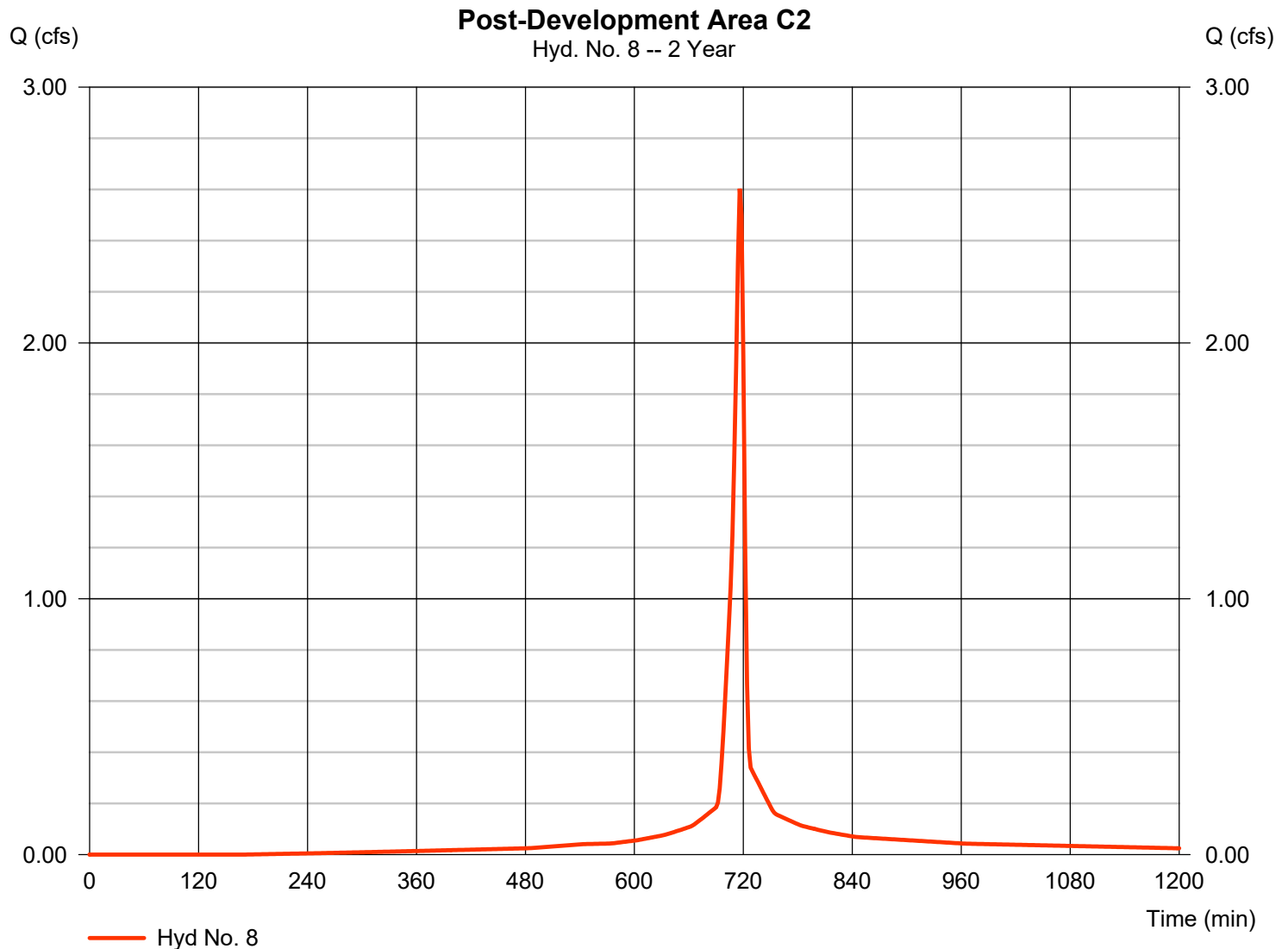
Friday, 03 / 31 / 2023

Hyd. No. 8

Post-Development Area C2

Hydrograph type	= SCS Runoff	Peak discharge	= 2.603 cfs
Storm frequency	= 2 yrs	Time to peak	= 716 min
Time interval	= 2 min	Hyd. volume	= 5,741 cuft
Drainage area	= 0.600 ac	Curve number	= 95*
Basin Slope	= 1.0 %	Hydraulic length	= 450 ft
Tc method	= User	Time of conc. (Tc)	= 5.00 min
Total precip.	= 3.37 in	Distribution	= Type II
Storm duration	= 24 hrs	Shape factor	= 484

* Composite (Area/CN) = $[(0.520 \times 98) + (0.080 \times 79)] / 0.600$



Hydrograph Report

Hydraflow Hydrographs Extension for Autodesk® Civil 3D® by Autodesk, Inc. v2023

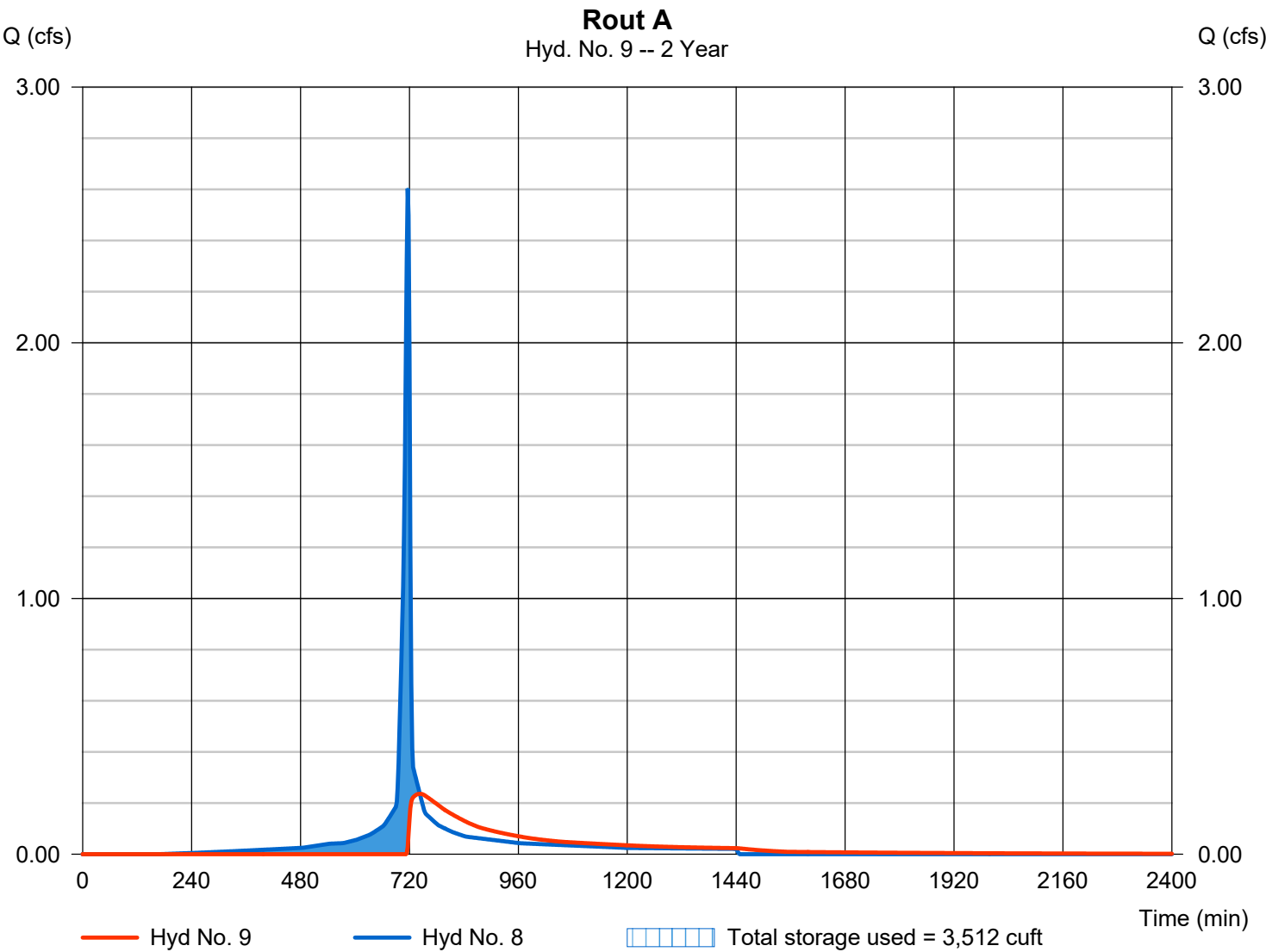
Friday, 03 / 31 / 2023

Hyd. No. 9

Rout A

Hydrograph type	= Reservoir	Peak discharge	= 0.236 cfs
Storm frequency	= 2 yrs	Time to peak	= 742 min
Time interval	= 2 min	Hyd. volume	= 3,523 cuft
Inflow hyd. No.	= 8 - Post-Development Area C2	Max. Elevation	= 658.68 ft
Reservoir name	= Pond A	Max. Storage	= 3,512 cuft

Storage Indication method used.



Pond Report

13

Hydraflow Hydrographs Extension for Autodesk® Civil 3D® by Autodesk, Inc. v2023

Friday, 03 / 31 / 2023

Pond No. 1 - Pond A

Pond Data

Contours -User-defined contour areas. Conic method used for volume calculation. Begining Elevation = 657.00 ft

Stage / Storage Table

Stage (ft)	Elevation (ft)	Contour area (sqft)	Incr. Storage (cuft)	Total storage (cuft)
0.00	657.00	1,200	0	0
1.00	658.00	2,120	1,638	1,638
2.00	659.00	3,435	2,751	4,389
3.00	660.00	4,748	4,073	8,462

Culvert / Orifice Structures

	[A]	[B]	[C]	[PrfRsr]
Rise (in)	= 18.00	9.00	Inactive	Inactive
Span (in)	= 18.00	9.00	0.00	0.00
No. Barrels	= 1	1	0	0
Invert El. (ft)	= 657.25	675.50	0.00	0.00
Length (ft)	= 20.00	0.50	0.00	0.00
Slope (%)	= 2.00	1.00	0.00	n/a
N-Value	= .013	.013	.013	n/a
Orifice Coeff.	= 0.60	0.60	0.60	0.60
Multi-Stage	= n/a	Yes	No	No

Weir Structures

	[A]	[B]	[C]	[D]
Crest Len (ft)	= 0.25	0.00	0.00	0.00
Crest El. (ft)	= 658.25	658.00	658.00	658.00
Weir Coeff.	= 3.33	3.33	3.33	3.33
Weir Type	= Rect	Rect	Rect	Rect
Multi-Stage	= Yes	Yes	Yes	Yes
Exfil.(in/hr)	= 0.000 (by Contour)			
TW Elev. (ft)	= 0.00			

Note: Culvert/Orifice outflows are analyzed under inlet (ic) and outlet (oc) control. Weir risers checked for orifice conditions (ic) and submergence (s).

Stage / Storage / Discharge Table

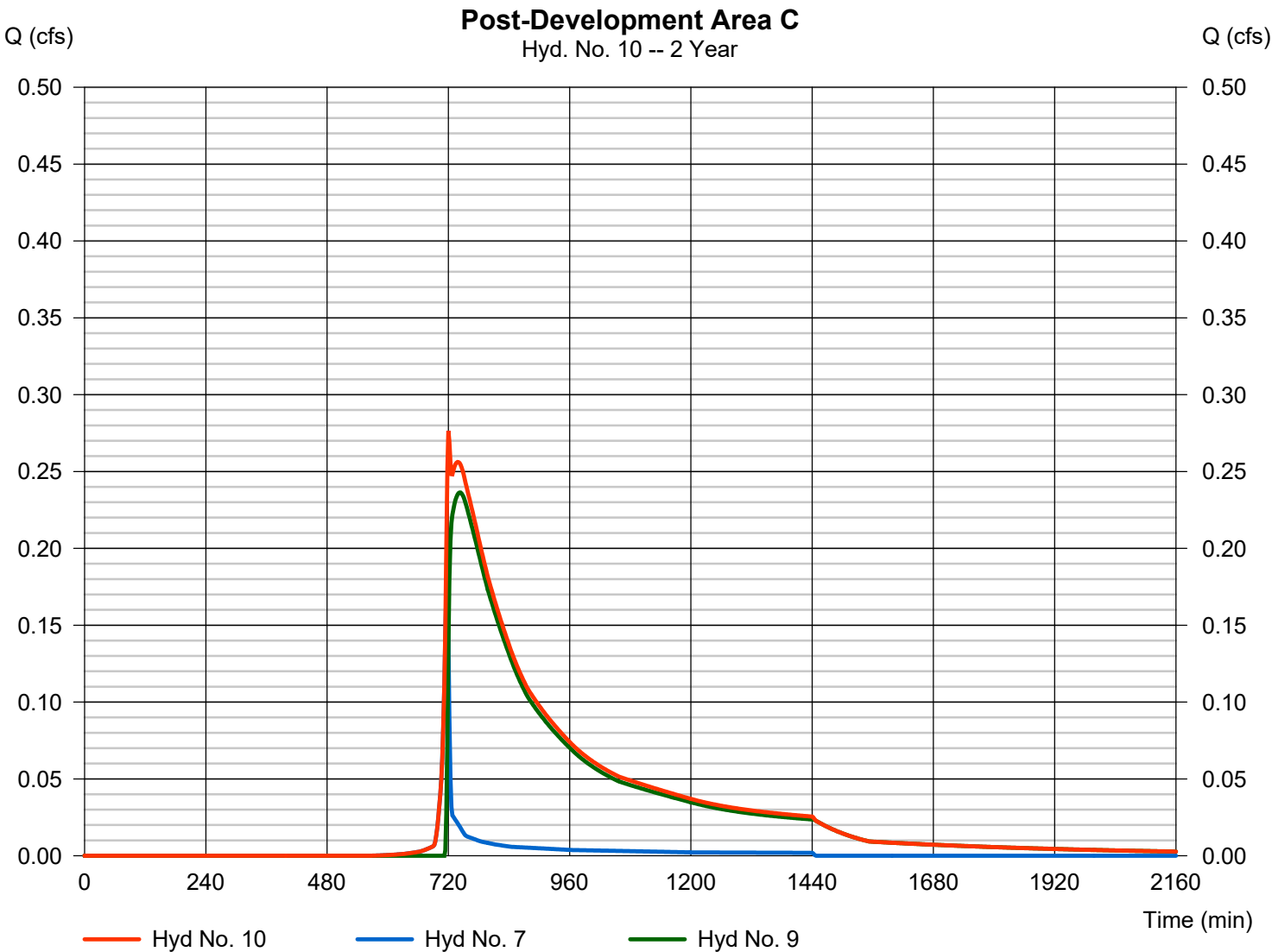
Stage ft	Storage cuft	Elevation ft	Clv A cfs	Clv B cfs	Clv C cfs	PrfRsr cfs	Wr A cfs	Wr B cfs	Wr C cfs	Wr D cfs	Exfil cfs	User cfs	Total cfs
0.00	0	657.00	0.00	0.00	---	---	0.00	---	---	---	---	---	0.000
0.10	164	657.10	0.00	0.00	---	---	0.00	---	---	---	---	---	0.000
0.20	328	657.20	0.00	0.00	---	---	0.00	---	---	---	---	---	0.000
0.30	491	657.30	0.00	0.00	---	---	0.00	---	---	---	---	---	0.000
0.40	655	657.40	0.00	0.00	---	---	0.00	---	---	---	---	---	0.000
0.50	819	657.50	0.00	0.00	---	---	0.00	---	---	---	---	---	0.000
0.60	983	657.60	0.00	0.00	---	---	0.00	---	---	---	---	---	0.000
0.70	1,147	657.70	0.00	0.00	---	---	0.00	---	---	---	---	---	0.000
0.80	1,311	657.80	0.00	0.00	---	---	0.00	---	---	---	---	---	0.000
0.90	1,474	657.90	0.00	0.00	---	---	0.00	---	---	---	---	---	0.000
1.00	1,638	658.00	0.00	0.00	---	---	0.00	---	---	---	---	---	0.000
1.10	1,913	658.10	0.00	0.00	---	---	0.00	---	---	---	---	---	0.000
1.20	2,188	658.20	0.00	0.00	---	---	0.00	---	---	---	---	---	0.000
1.30	2,463	658.30	0.01 ic	0.00	---	---	0.01	---	---	---	---	---	0.009
1.40	2,739	658.40	0.05 ic	0.00	---	---	0.05	---	---	---	---	---	0.048
1.50	3,014	658.50	0.11 ic	0.00	---	---	0.10	---	---	---	---	---	0.104
1.60	3,289	658.60	0.17 ic	0.00	---	---	0.17	---	---	---	---	---	0.172
1.70	3,564	658.70	0.25 ic	0.00	---	---	0.25	---	---	---	---	---	0.251
1.80	3,839	658.80	0.34 ic	0.00	---	---	0.34	---	---	---	---	---	0.339
1.90	4,114	658.90	0.44 ic	0.00	---	---	0.44	---	---	---	---	---	0.436
2.00	4,389	659.00	0.55 ic	0.00	---	---	0.54	---	---	---	---	---	0.541
2.10	4,796	659.10	0.65 ic	0.00	---	---	0.65	---	---	---	---	---	0.652
2.20	5,204	659.20	0.77 ic	0.00	---	---	0.77	---	---	---	---	---	0.771
2.30	5,611	659.30	0.93 ic	0.00	---	---	0.90	---	---	---	---	---	0.896
2.40	6,018	659.40	1.03 ic	0.00	---	---	1.03	---	---	---	---	---	1.027
2.50	6,426	659.50	1.16 ic	0.00	---	---	1.16	---	---	---	---	---	1.163
2.60	6,833	659.60	1.31 ic	0.00	---	---	1.31	---	---	---	---	---	1.306
2.70	7,240	659.70	1.48 ic	0.00	---	---	1.45	---	---	---	---	---	1.453
2.80	7,648	659.80	1.61 ic	0.00	---	---	1.61	---	---	---	---	---	1.606
2.90	8,055	659.90	1.77 ic	0.00	---	---	1.76	---	---	---	---	---	1.764
3.00	8,462	660.00	1.97 ic	0.00	---	---	1.93	---	---	---	---	---	1.927

Hydrograph Report

Hyd. No. 10

Post-Development Area C

Hydrograph type	= Combine	Peak discharge	= 0.276 cfs
Storm frequency	= 2 yrs	Time to peak	= 720 min
Time interval	= 2 min	Hyd. volume	= 3,872 cuft
Inflow hyds.	= 7, 9	Contrib. drain. area	= 0.070 ac

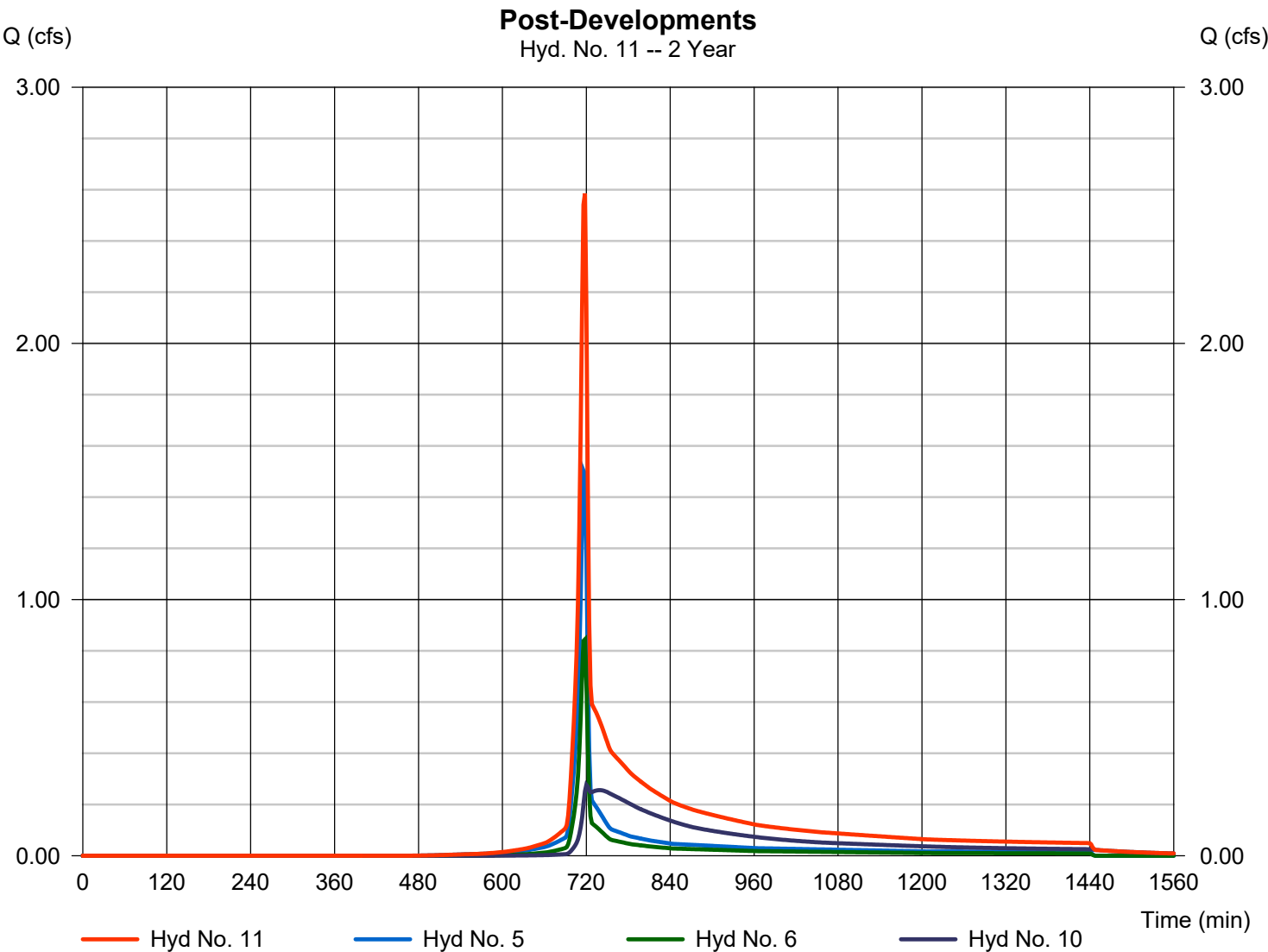


Hydrograph Report

Hyd. No. 11

Post-Developments

Hydrograph type	= Combine	Peak discharge	= 2.585 cfs
Storm frequency	= 2 yrs	Time to peak	= 718 min
Time interval	= 2 min	Hyd. volume	= 8,612 cuft
Inflow hyds.	= 5, 6, 10	Contrib. drain. area	= 0.830 ac



Hydrograph Summary Report

Hydraflow Hydrographs Extension for Autodesk® Civil 3D® by Autodesk, Inc. v2023

Hyd. No.	Hydrograph type (origin)	Peak flow (cfs)	Time interval (min)	Time to Peak (min)	Hyd. volume (cuft)	Inflow hyd(s)	Maximum elevation (ft)	Total strge used (cuft)	Hydrograph Description
1	SCS Runoff	3.786	2	716	7,728	-----	-----	-----	Pre-Development Area A
2	SCS Runoff	1.257	2	716	2,540	-----	-----	-----	Pre-Development Area B
3	SCS Runoff	0.856	2	716	1,733	-----	-----	-----	Pre-Development Area C
4	Combine	5.899	2	716	12,002	1, 2, 3	-----	-----	Pre-Developments
5	SCS Runoff	2.017	2	716	4,116	-----	-----	-----	Post-Development Area A
6	SCS Runoff	1.176	2	716	2,376	-----	-----	-----	Post-Development Area B
7	SCS Runoff	0.242	2	716	489	-----	-----	-----	Post-Development Area C1
8	SCS Runoff	3.229	2	716	7,227	-----	-----	-----	Post-Development Area C2
9	Reservoir	0.488	2	726	5,009	8	658.95	4,252	Rout A
10	Combine	0.575	2	720	5,498	7, 9	-----	-----	Post-Development Area C
11	Combine	3.678	2	718	11,990	5, 6, 10	-----	-----	Post-Developments
271 Jefferson Pk.gpw					Return Period: 5 Year			Friday, 03 / 31 / 2023	

Hydrograph Report

Hydraflow Hydrographs Extension for Autodesk® Civil 3D® by Autodesk, Inc. v2023

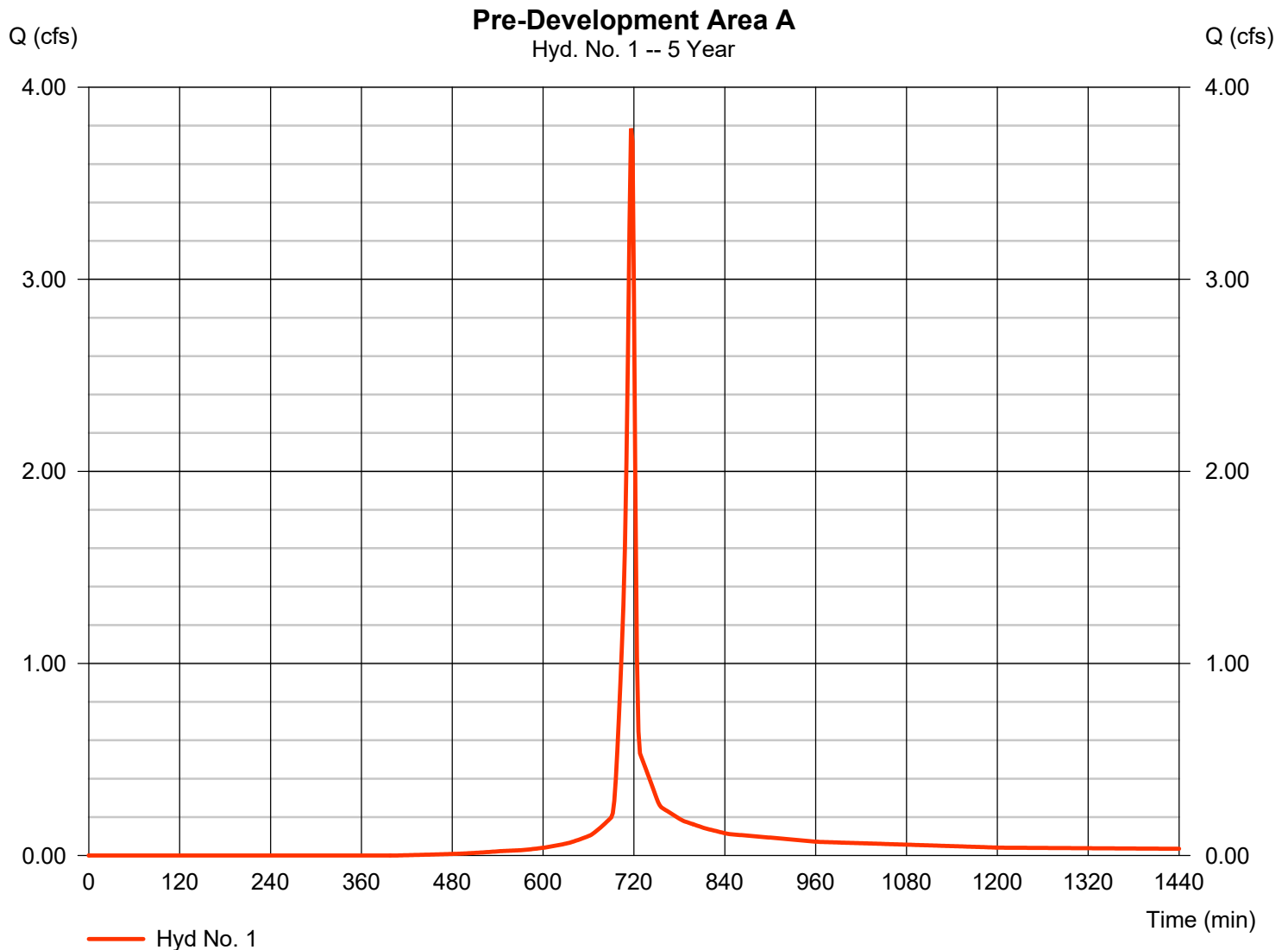
Friday, 03 / 31 / 2023

Hyd. No. 1

Pre-Development Area A

Hydrograph type	= SCS Runoff	Peak discharge	= 3.786 cfs
Storm frequency	= 5 yrs	Time to peak	= 716 min
Time interval	= 2 min	Hyd. volume	= 7,728 cuft
Drainage area	= 0.920 ac	Curve number	= 84*
Basin Slope	= 3.0 %	Hydraulic length	= 178 ft
Tc method	= User	Time of conc. (Tc)	= 5.00 min
Total precip.	= 4.11 in	Distribution	= Type II
Storm duration	= 24 hrs	Shape factor	= 484

* Composite (Area/CN) = $[(0.090 \times 98) + (0.280 \times 89) + (0.550 \times 79)] / 0.920$



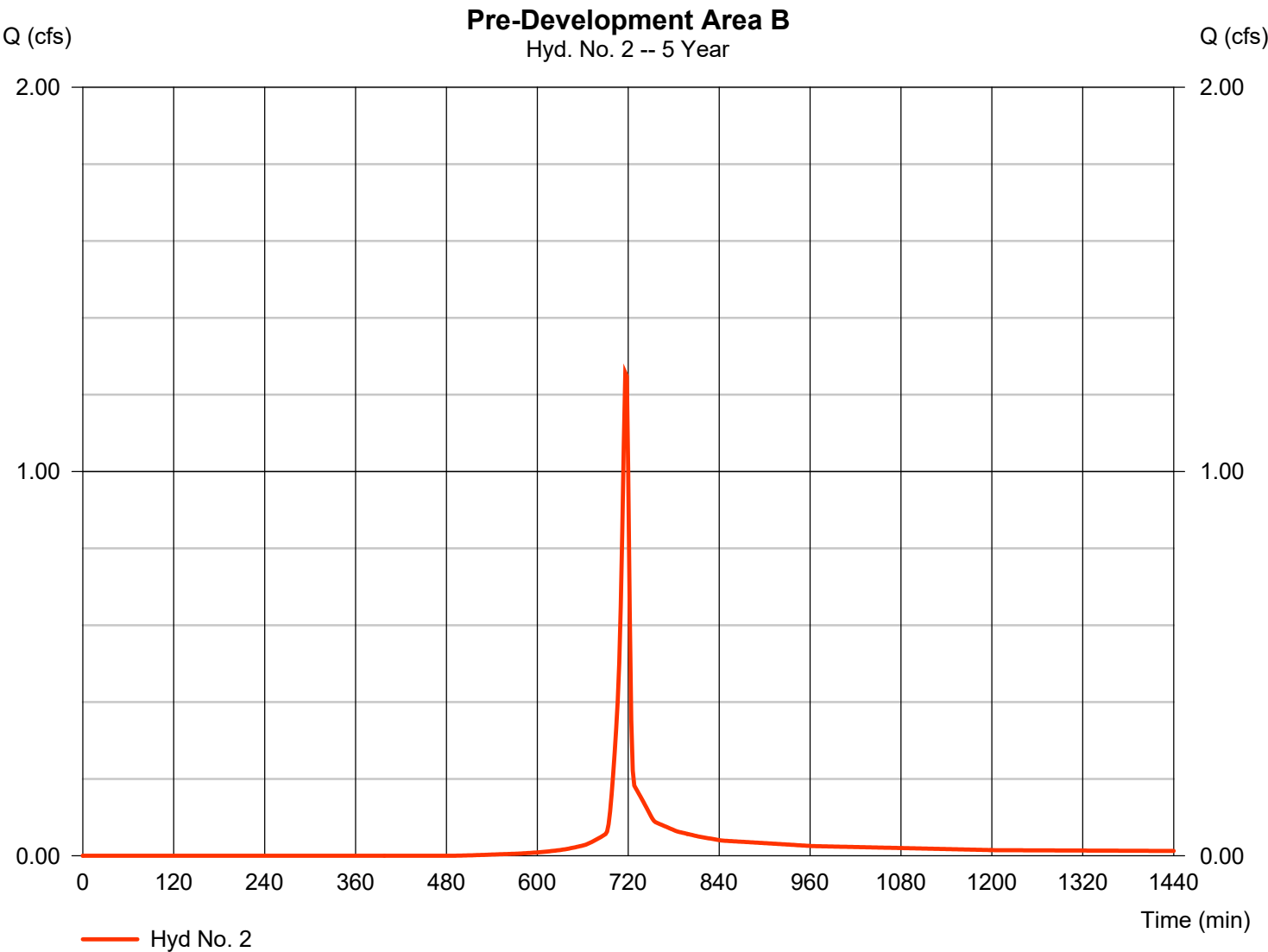
Hydrograph Report

Hyd. No. 2

Pre-Development Area B

Hydrograph type	=	SCS Runoff	Peak discharge	=	1.257 cfs
Storm frequency	=	5 yrs	Time to peak	=	716 min
Time interval	=	2 min	Hyd. volume	=	2,540 cuft
Drainage area	=	0.350 ac	Curve number	=	80*
Basin Slope	=	4.0 %	Hydraulic length	=	133 ft
Tc method	=	User	Time of conc. (Tc)	=	5.00 min
Total precip.	=	4.11 in	Distribution	=	Type II
Storm duration	=	24 hrs	Shape factor	=	484

* Composite (Area/CN) = + (0.040 x 89) + (0.310 x 79)] / 0.350



Hydrograph Report

Hydraflow Hydrographs Extension for Autodesk® Civil 3D® by Autodesk, Inc. v2023

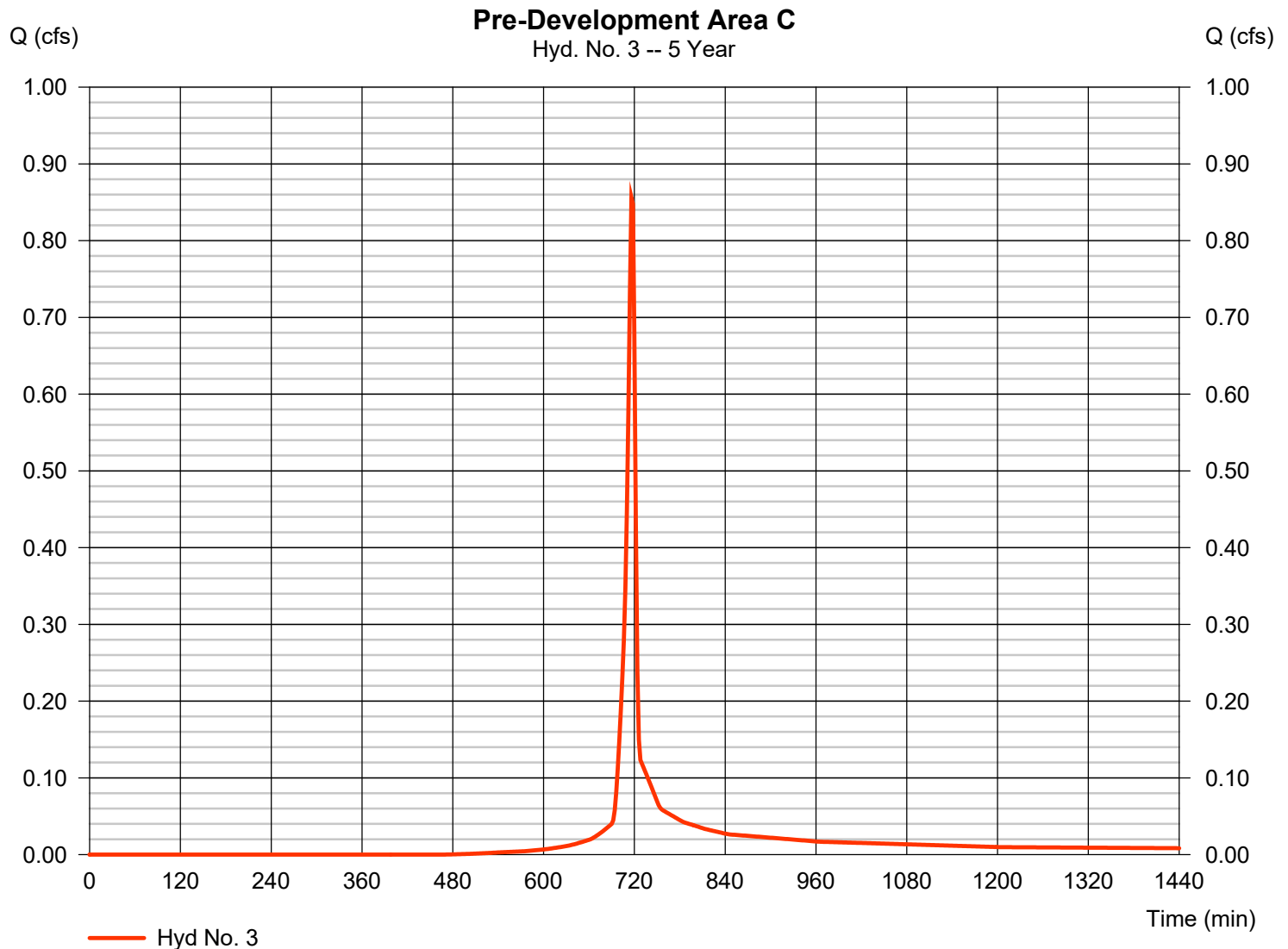
Friday, 03 / 31 / 2023

Hyd. No. 3

Pre-Development Area C

Hydrograph type	= SCS Runoff	Peak discharge	= 0.856 cfs
Storm frequency	= 5 yrs	Time to peak	= 716 min
Time interval	= 2 min	Hyd. volume	= 1,733 cuft
Drainage area	= 0.230 ac	Curve number	= 81*
Basin Slope	= 3.0 %	Hydraulic length	= 115 ft
Tc method	= User	Time of conc. (Tc)	= 5.00 min
Total precip.	= 4.11 in	Distribution	= Type II
Storm duration	= 24 hrs	Shape factor	= 484

* Composite (Area/CN) = $+(0.040 \times 89) + (0.190 \times 79) / 0.230$

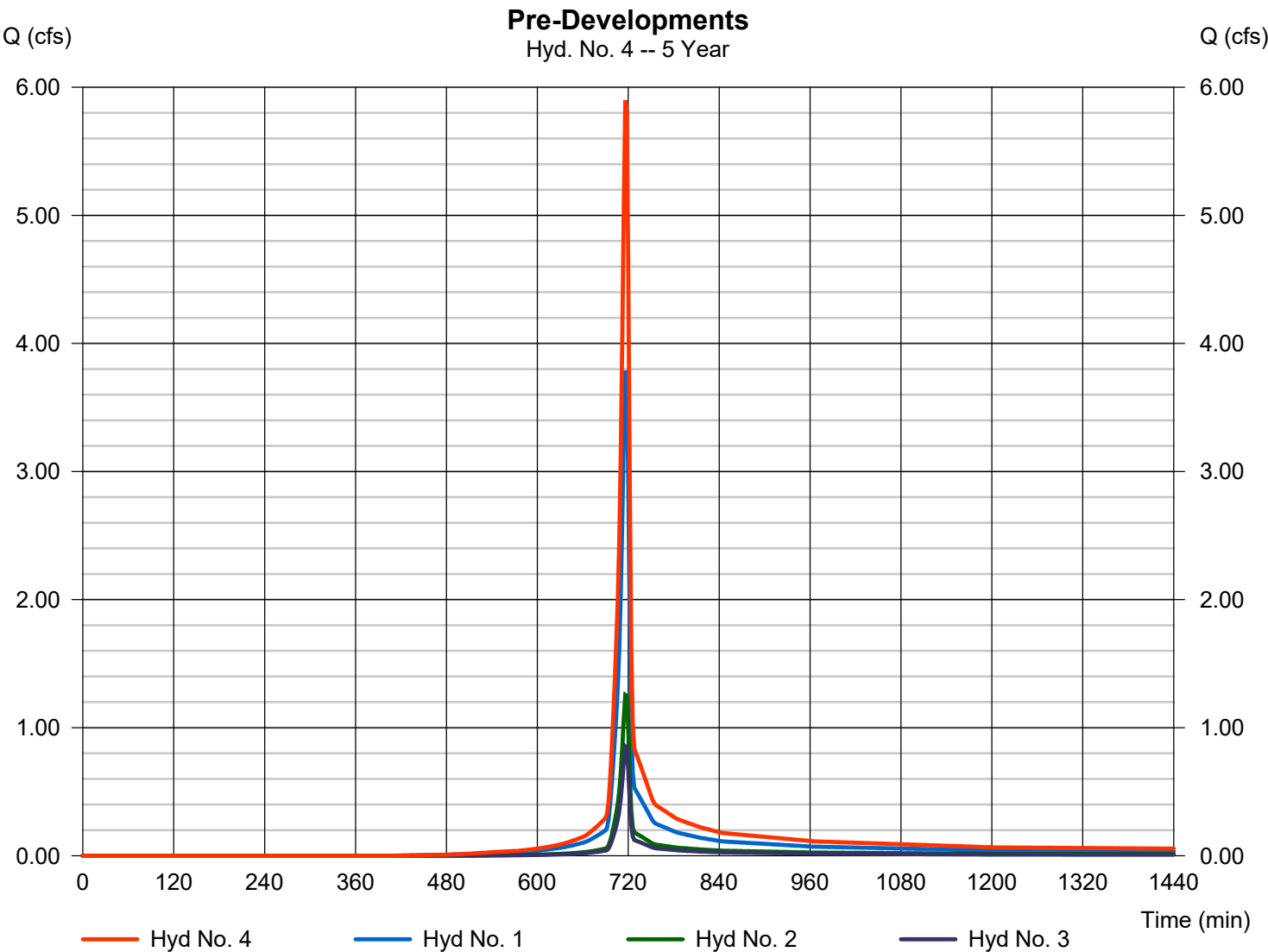


Hydrograph Report

Hyd. No. 4

Pre-Developments

Hydrograph type	= Combine	Peak discharge	= 5.899 cfs
Storm frequency	= 5 yrs	Time to peak	= 716 min
Time interval	= 2 min	Hyd. volume	= 12,002 cuft
Inflow hyds.	= 1, 2, 3	Contrib. drain. area	= 1.500 ac



Hydrograph Report

Hydraflow Hydrographs Extension for Autodesk® Civil 3D® by Autodesk, Inc. v2023

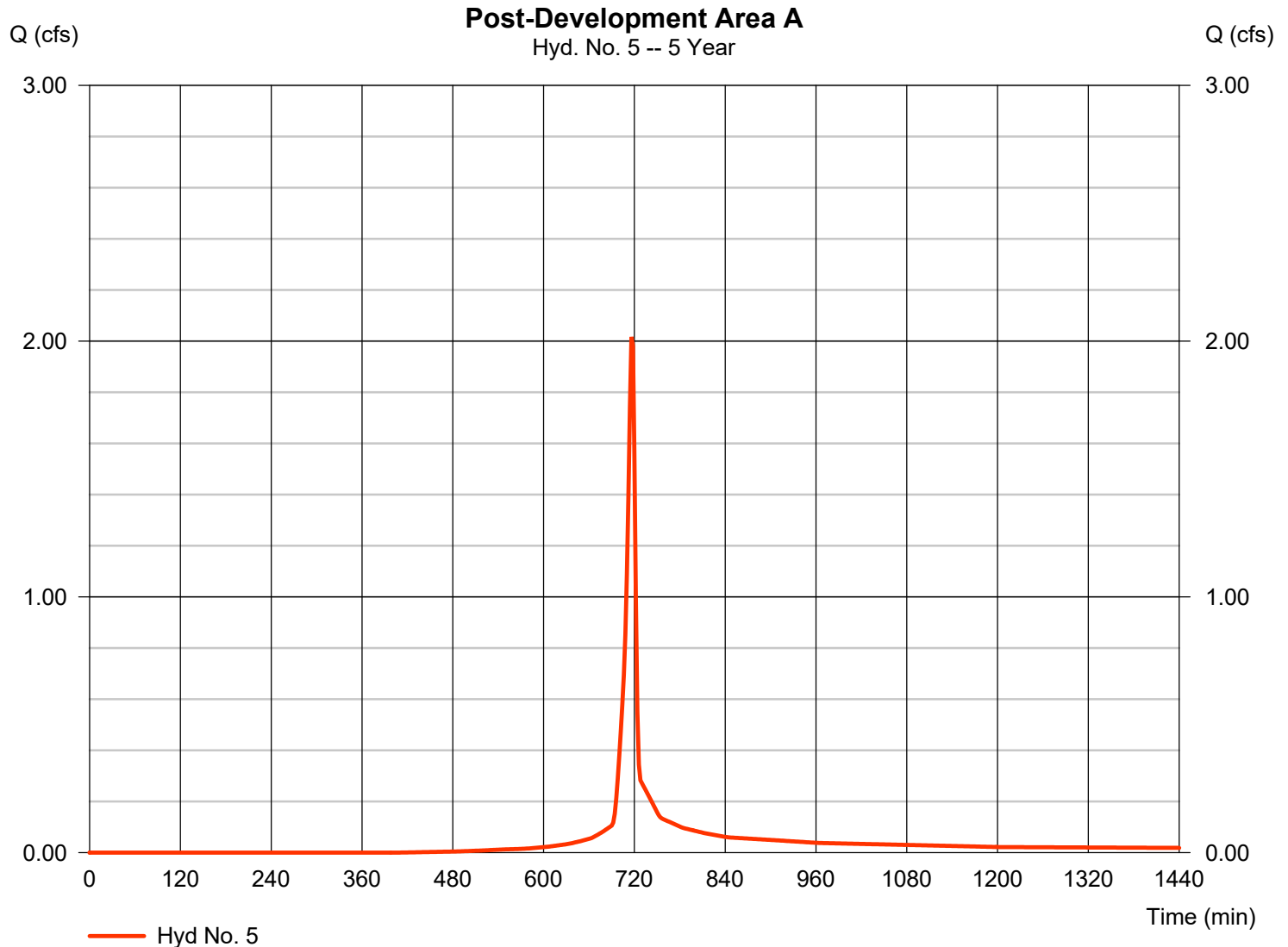
Friday, 03 / 31 / 2023

Hyd. No. 5

Post-Development Area A

Hydrograph type	= SCS Runoff	Peak discharge	= 2.017 cfs
Storm frequency	= 5 yrs	Time to peak	= 716 min
Time interval	= 2 min	Hyd. volume	= 4,116 cuft
Drainage area	= 0.490 ac	Curve number	= 84*
Basin Slope	= 3.0 %	Hydraulic length	= 178 ft
Tc method	= User	Time of conc. (Tc)	= 5.00 min
Total precip.	= 4.11 in	Distribution	= Type II
Storm duration	= 24 hrs	Shape factor	= 484

* Composite (Area/CN) = $[(0.130 \times 98) + (0.360 \times 79)] / 0.490$



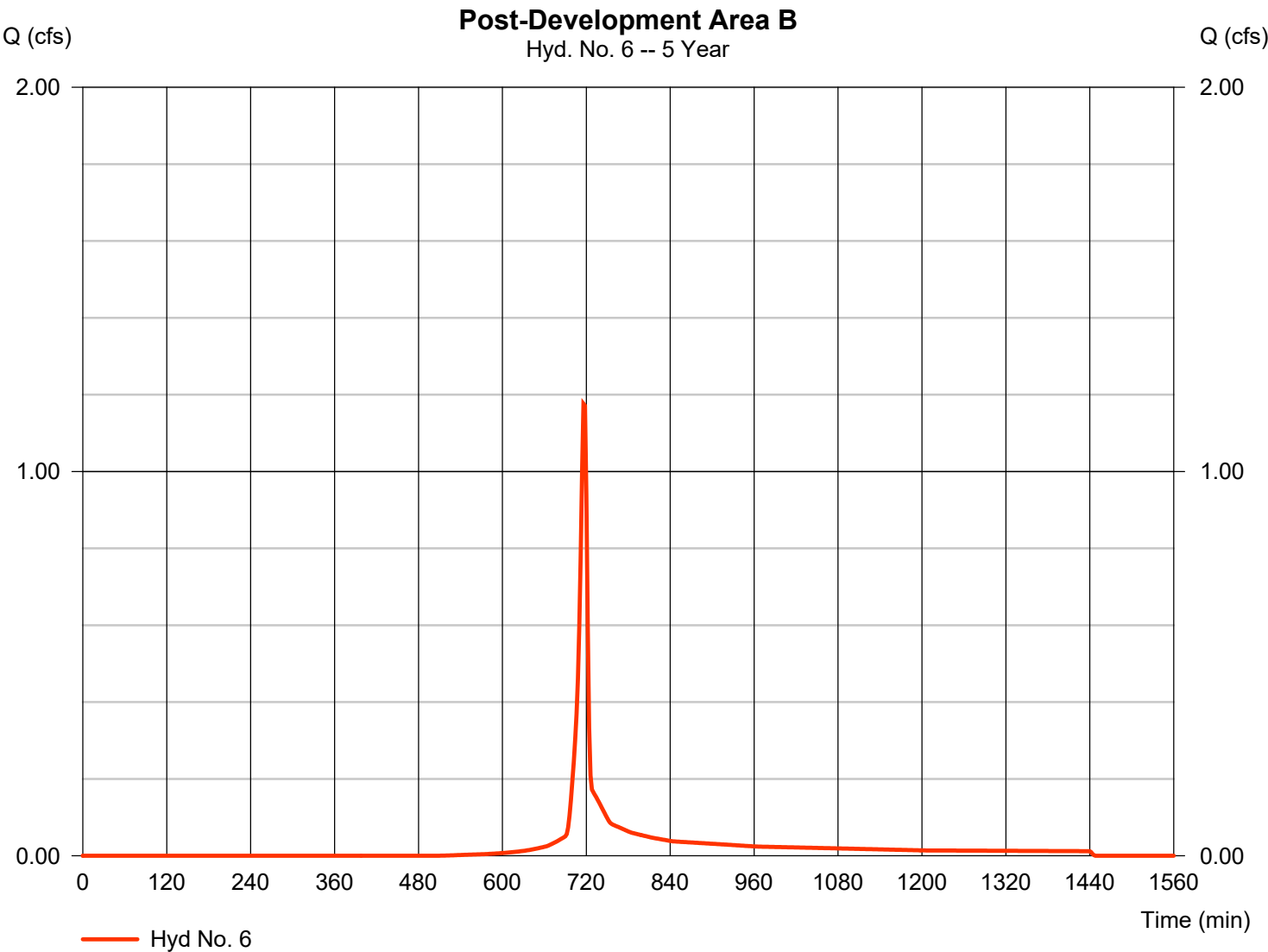
Hydrograph Report

Hyd. No. 6

Post-Development Area B

Hydrograph type	=	SCS Runoff	Peak discharge	=	1.176 cfs
Storm frequency	=	5 yrs	Time to peak	=	716 min
Time interval	=	2 min	Hyd. volume	=	2,376 cuft
Drainage area	=	0.340 ac	Curve number	=	79*
Basin Slope	=	4.0 %	Hydraulic length	=	133 ft
Tc method	=	User	Time of conc. (Tc)	=	5.00 min
Total precip.	=	4.11 in	Distribution	=	Type II
Storm duration	=	24 hrs	Shape factor	=	484

* Composite (Area/CN) = [(0.340 x 79)] / 0.340



Hydrograph Report

Hydraflow Hydrographs Extension for Autodesk® Civil 3D® by Autodesk, Inc. v2023

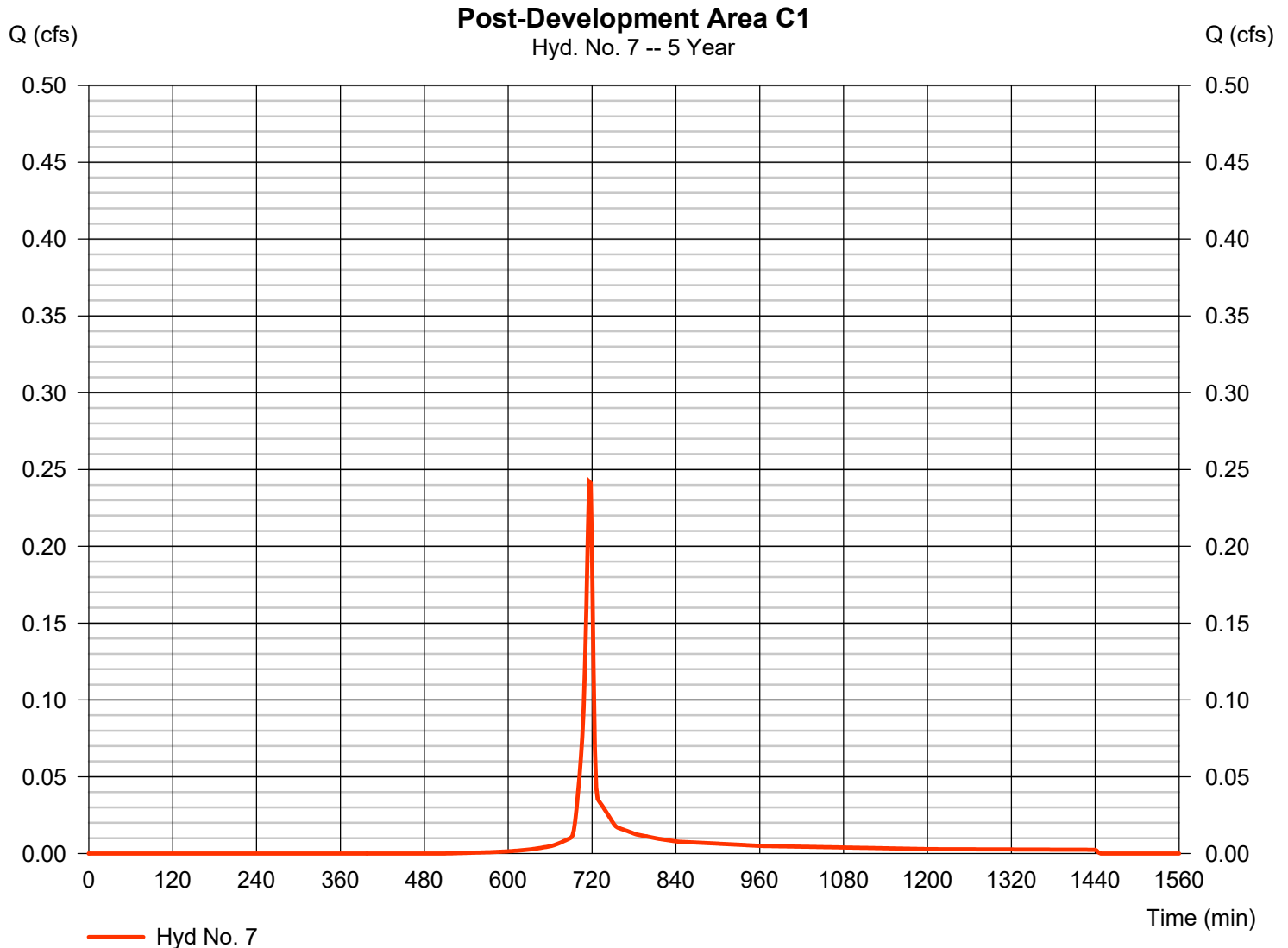
Friday, 03 / 31 / 2023

Hyd. No. 7

Post-Development Area C1

Hydrograph type	= SCS Runoff	Peak discharge	= 0.242 cfs
Storm frequency	= 5 yrs	Time to peak	= 716 min
Time interval	= 2 min	Hyd. volume	= 489 cuft
Drainage area	= 0.070 ac	Curve number	= 79*
Basin Slope	= 3.0 %	Hydraulic length	= 115 ft
Tc method	= User	Time of conc. (Tc)	= 5.00 min
Total precip.	= 4.11 in	Distribution	= Type II
Storm duration	= 24 hrs	Shape factor	= 484

* Composite (Area/CN) = $[(0.070 \times 79)] / 0.070$



Hydrograph Report

Hydraflow Hydrographs Extension for Autodesk® Civil 3D® by Autodesk, Inc. v2023

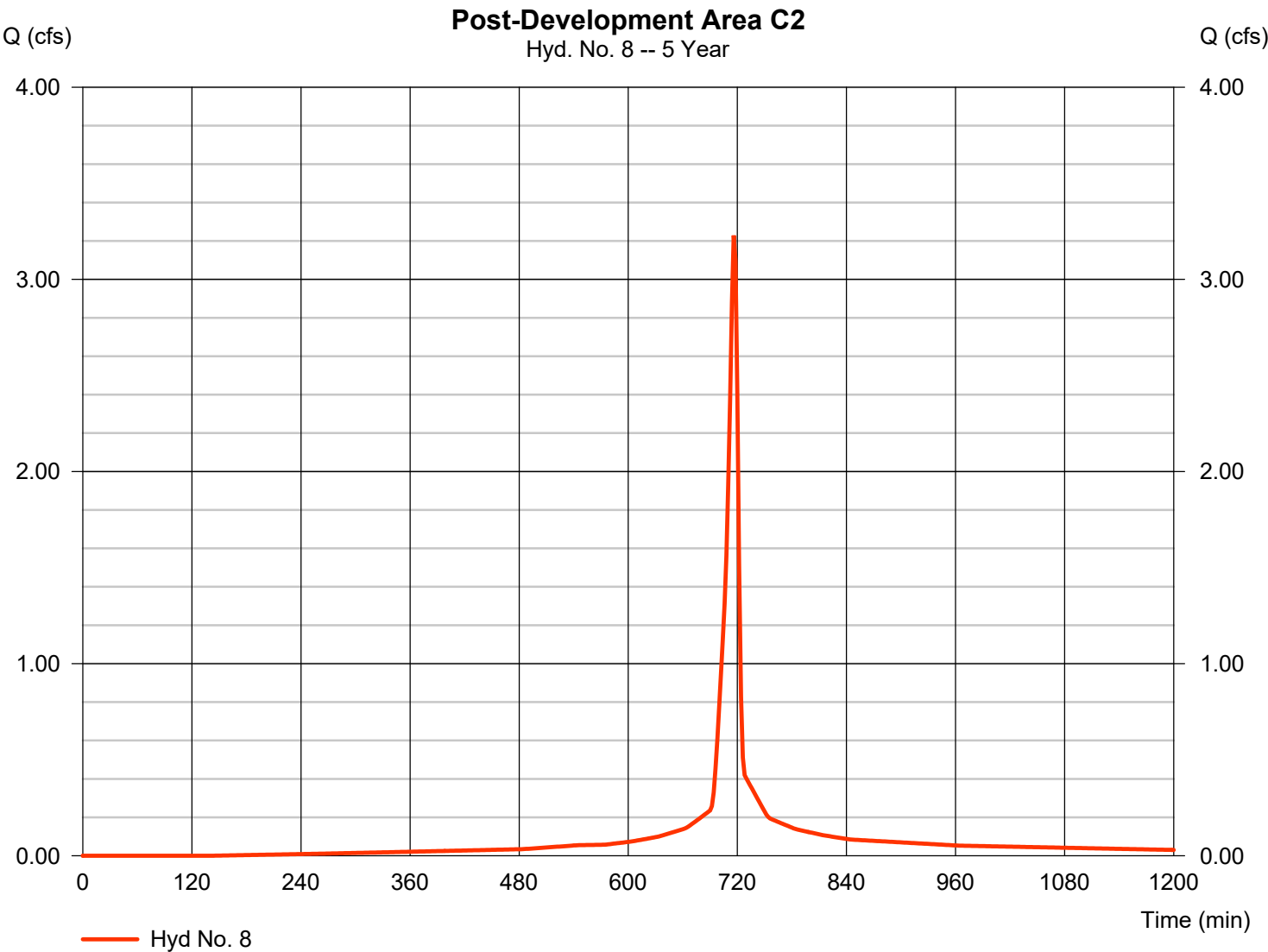
Friday, 03 / 31 / 2023

Hyd. No. 8

Post-Development Area C2

Hydrograph type	=	SCS Runoff	Peak discharge	=	3.229 cfs
Storm frequency	=	5 yrs	Time to peak	=	716 min
Time interval	=	2 min	Hyd. volume	=	7,227 cuft
Drainage area	=	0.600 ac	Curve number	=	95*
Basin Slope	=	1.0 %	Hydraulic length	=	450 ft
Tc method	=	User	Time of conc. (Tc)	=	5.00 min
Total precip.	=	4.11 in	Distribution	=	Type II
Storm duration	=	24 hrs	Shape factor	=	484

* Composite (Area/CN) = [(0.520 x 98) + (0.080 x 79)] / 0.600



Hydrograph Report

Hydraflow Hydrographs Extension for Autodesk® Civil 3D® by Autodesk, Inc. v2023

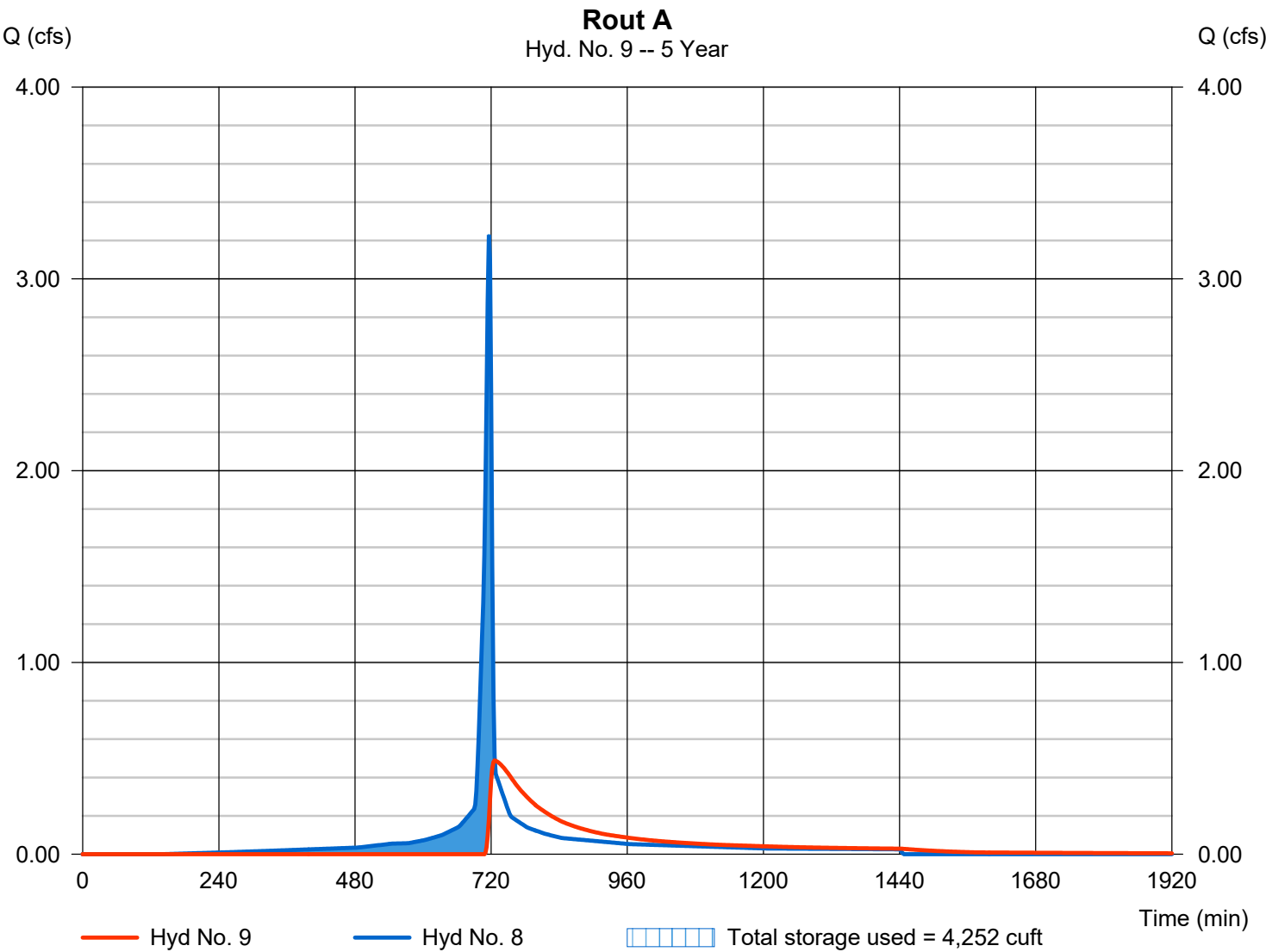
Friday, 03 / 31 / 2023

Hyd. No. 9

Rout A

Hydrograph type	= Reservoir	Peak discharge	= 0.488 cfs
Storm frequency	= 5 yrs	Time to peak	= 726 min
Time interval	= 2 min	Hyd. volume	= 5,009 cuft
Inflow hyd. No.	= 8 - Post-Development Area C2	Max. Elevation	= 658.95 ft
Reservoir name	= Pond A	Max. Storage	= 4,252 cuft

Storage Indication method used.



Hydrograph Report

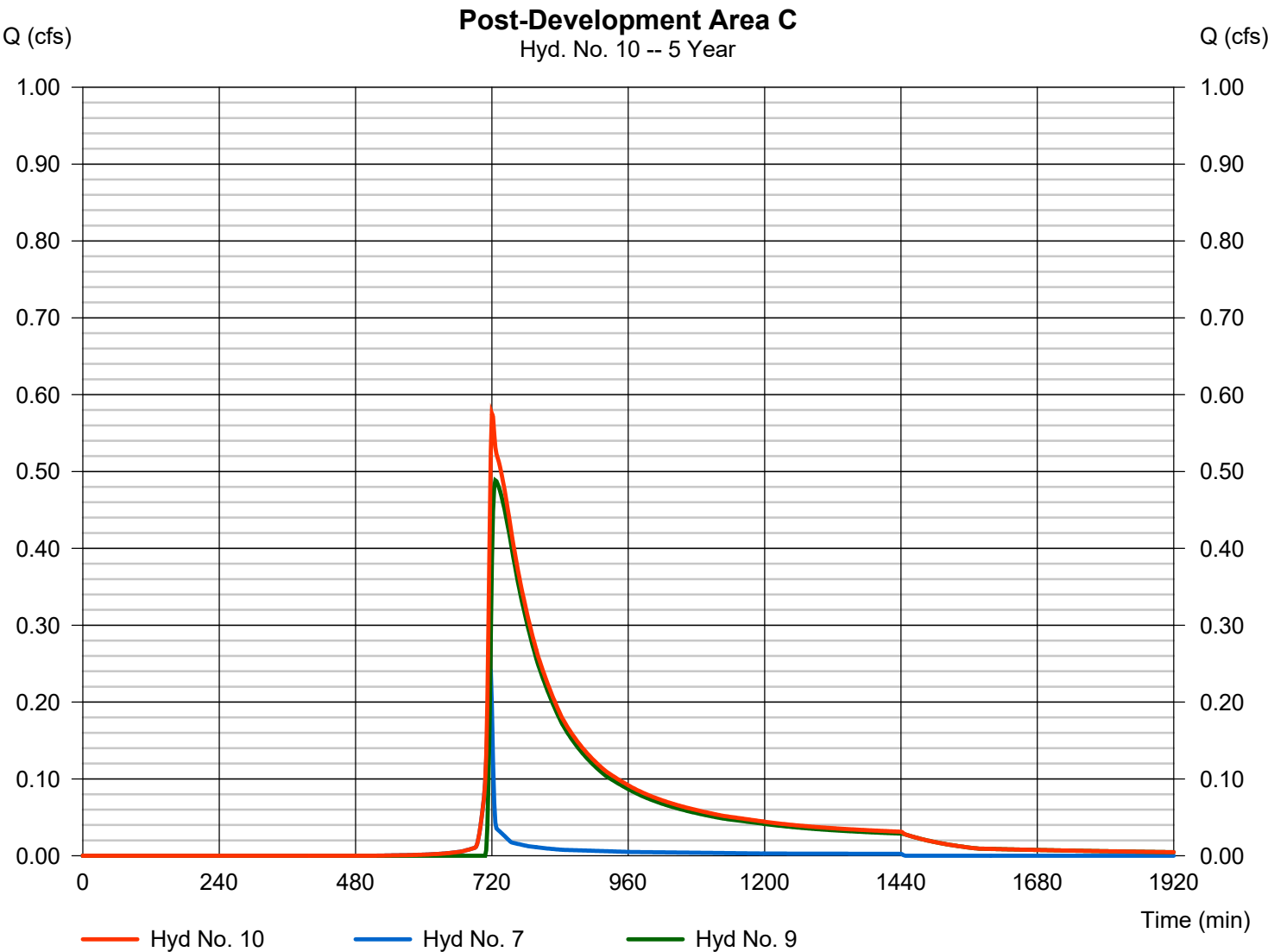
Hydraflow Hydrographs Extension for Autodesk® Civil 3D® by Autodesk, Inc. v2023

Friday, 03 / 31 / 2023

Hyd. No. 10

Post-Development Area C

Hydrograph type	= Combine	Peak discharge	= 0.575 cfs
Storm frequency	= 5 yrs	Time to peak	= 720 min
Time interval	= 2 min	Hyd. volume	= 5,498 cuft
Inflow hyds.	= 7, 9	Contrib. drain. area	= 0.070 ac

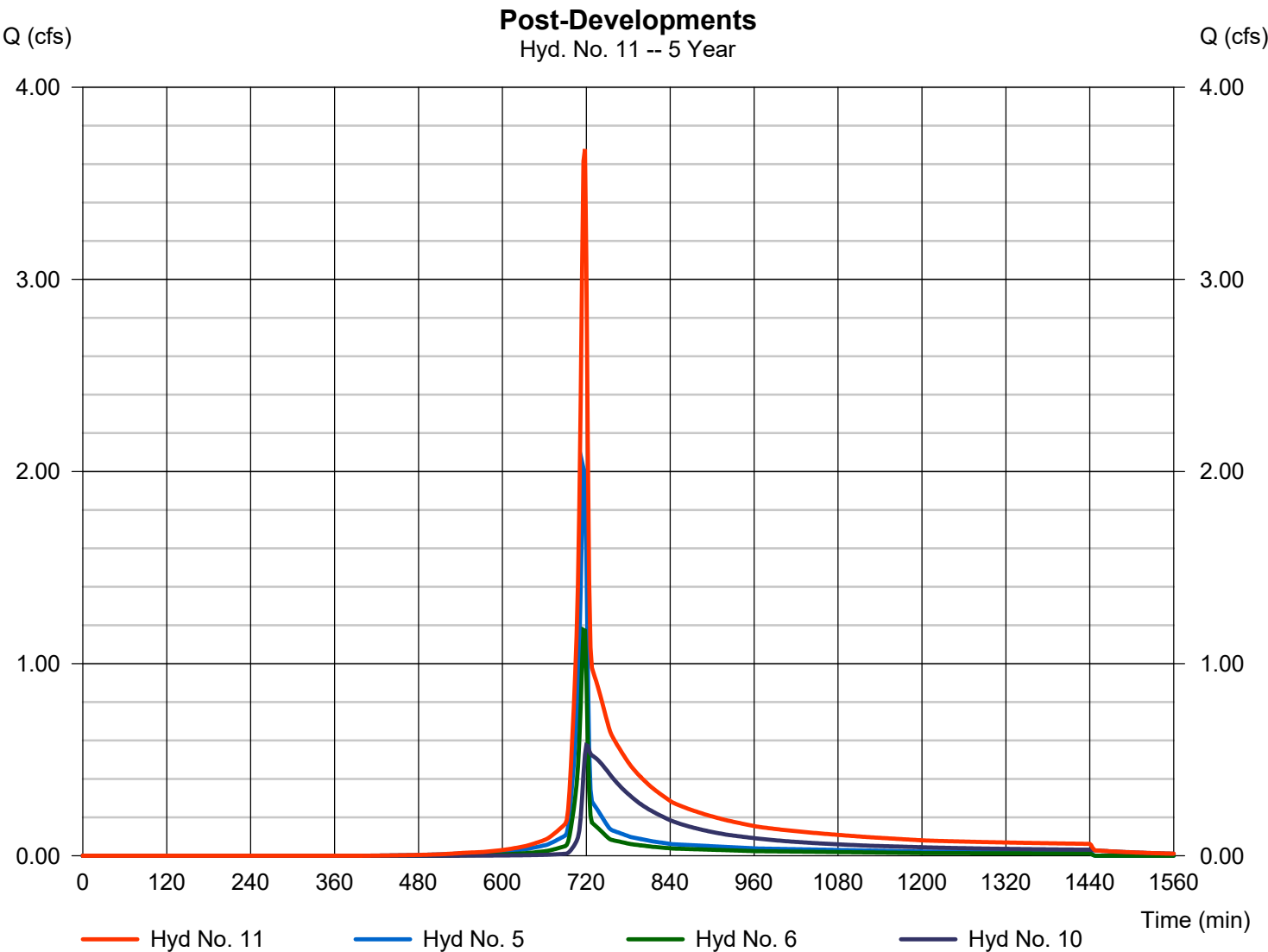


Hydrograph Report

Hyd. No. 11

Post-Developments

Hydrograph type	= Combine	Peak discharge	= 3.678 cfs
Storm frequency	= 5 yrs	Time to peak	= 718 min
Time interval	= 2 min	Hyd. volume	= 11,990 cuft
Inflow hyds.	= 5, 6, 10	Contrib. drain. area	= 0.830 ac



Hydrograph Summary Report

Hydraflow Hydrographs Extension for Autodesk® Civil 3D® by Autodesk, Inc. v2023

Hyd. No.	Hydrograph type (origin)	Peak flow (cfs)	Time interval (min)	Time to Peak (min)	Hyd. volume (cuft)	Inflow hyd(s)	Maximum elevation (ft)	Total strge used (cuft)	Hydrograph Description
1	SCS Runoff	4.565	2	716	9,384	-----	-----	-----	Pre-Development Area A
2	SCS Runoff	1.545	2	716	3,136	-----	-----	-----	Pre-Development Area B
3	SCS Runoff	1.047	2	716	2,130	-----	-----	-----	Pre-Development Area C
4	Combine	7.157	2	716	14,650	1, 2, 3	-----	-----	Pre-Developments
5	SCS Runoff	2.431	2	716	4,998	-----	-----	-----	Post-Development Area A
6	SCS Runoff	1.454	2	716	2,945	-----	-----	-----	Post-Development Area B
7	SCS Runoff	0.299	2	716	606	-----	-----	-----	Post-Development Area C1
8	SCS Runoff	3.725	2	716	8,418	-----	-----	-----	Post-Development Area C2
9	Reservoir	0.674	2	726	6,200	8	659.12	4,869	Rout A
10	Combine	0.829	2	720	6,806	7, 9	-----	-----	Post-Development Area C
11	Combine	4.606	2	718	14,749	5, 6, 10	-----	-----	Post-Developments
271 Jefferson Pk.gpw					Return Period: 10 Year			Friday, 03 / 31 / 2023	

Hydrograph Report

Hydraflow Hydrographs Extension for Autodesk® Civil 3D® by Autodesk, Inc. v2023

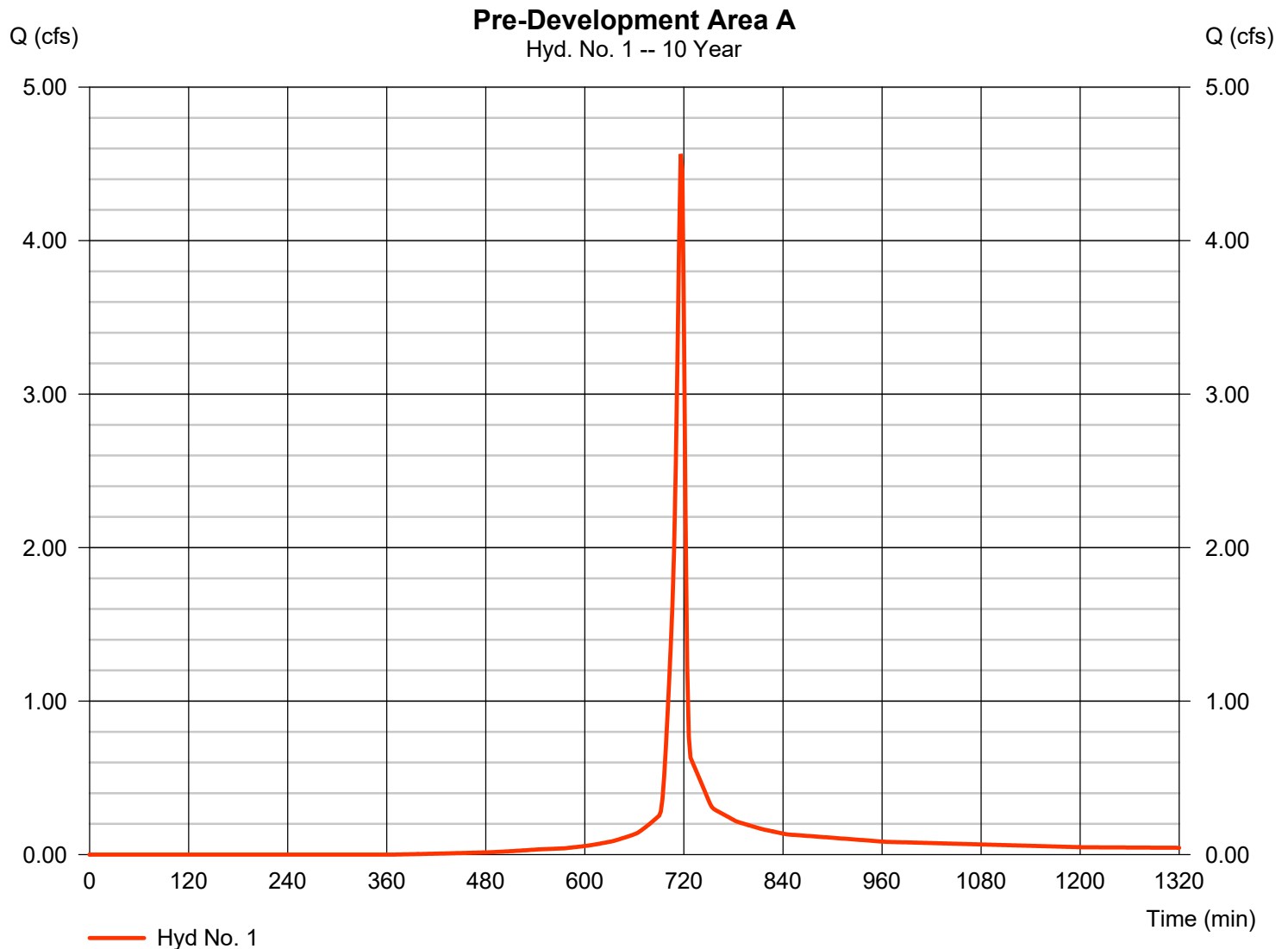
Friday, 03 / 31 / 2023

Hyd. No. 1

Pre-Development Area A

Hydrograph type	= SCS Runoff	Peak discharge	= 4.565 cfs
Storm frequency	= 10 yrs	Time to peak	= 716 min
Time interval	= 2 min	Hyd. volume	= 9,384 cuft
Drainage area	= 0.920 ac	Curve number	= 84*
Basin Slope	= 3.0 %	Hydraulic length	= 178 ft
Tc method	= User	Time of conc. (Tc)	= 5.00 min
Total precip.	= 4.70 in	Distribution	= Type II
Storm duration	= 24 hrs	Shape factor	= 484

* Composite (Area/CN) = $[(0.090 \times 98) + (0.280 \times 89) + (0.550 \times 79)] / 0.920$



Hydrograph Report

Hydraflow Hydrographs Extension for Autodesk® Civil 3D® by Autodesk, Inc. v2023

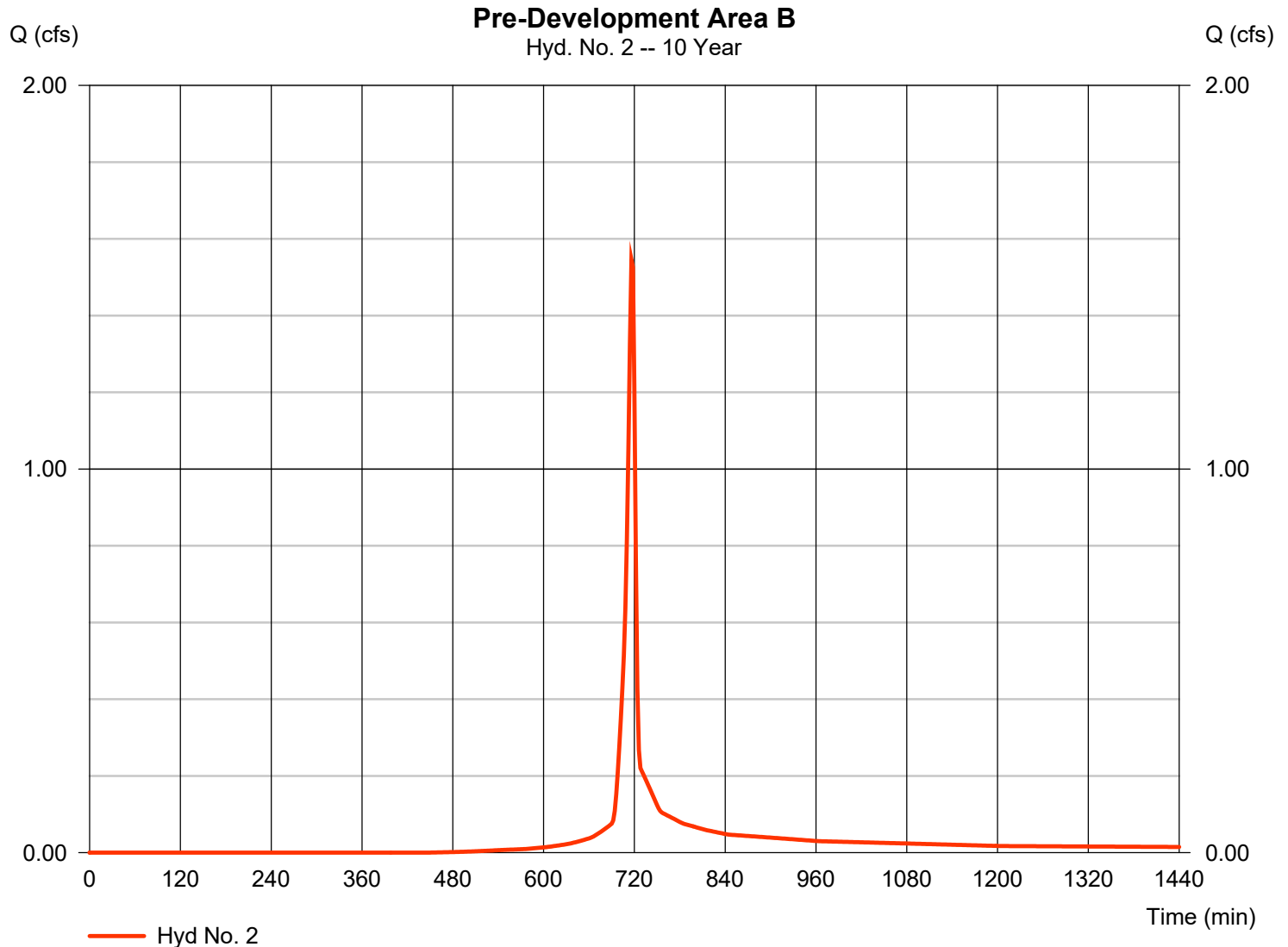
Friday, 03 / 31 / 2023

Hyd. No. 2

Pre-Development Area B

Hydrograph type	= SCS Runoff	Peak discharge	= 1.545 cfs
Storm frequency	= 10 yrs	Time to peak	= 716 min
Time interval	= 2 min	Hyd. volume	= 3,136 cuft
Drainage area	= 0.350 ac	Curve number	= 80*
Basin Slope	= 4.0 %	Hydraulic length	= 133 ft
Tc method	= User	Time of conc. (Tc)	= 5.00 min
Total precip.	= 4.70 in	Distribution	= Type II
Storm duration	= 24 hrs	Shape factor	= 484

* Composite (Area/CN) = + (0.040 x 89) + (0.310 x 79)] / 0.350



Hydrograph Report

Hydraflow Hydrographs Extension for Autodesk® Civil 3D® by Autodesk, Inc. v2023

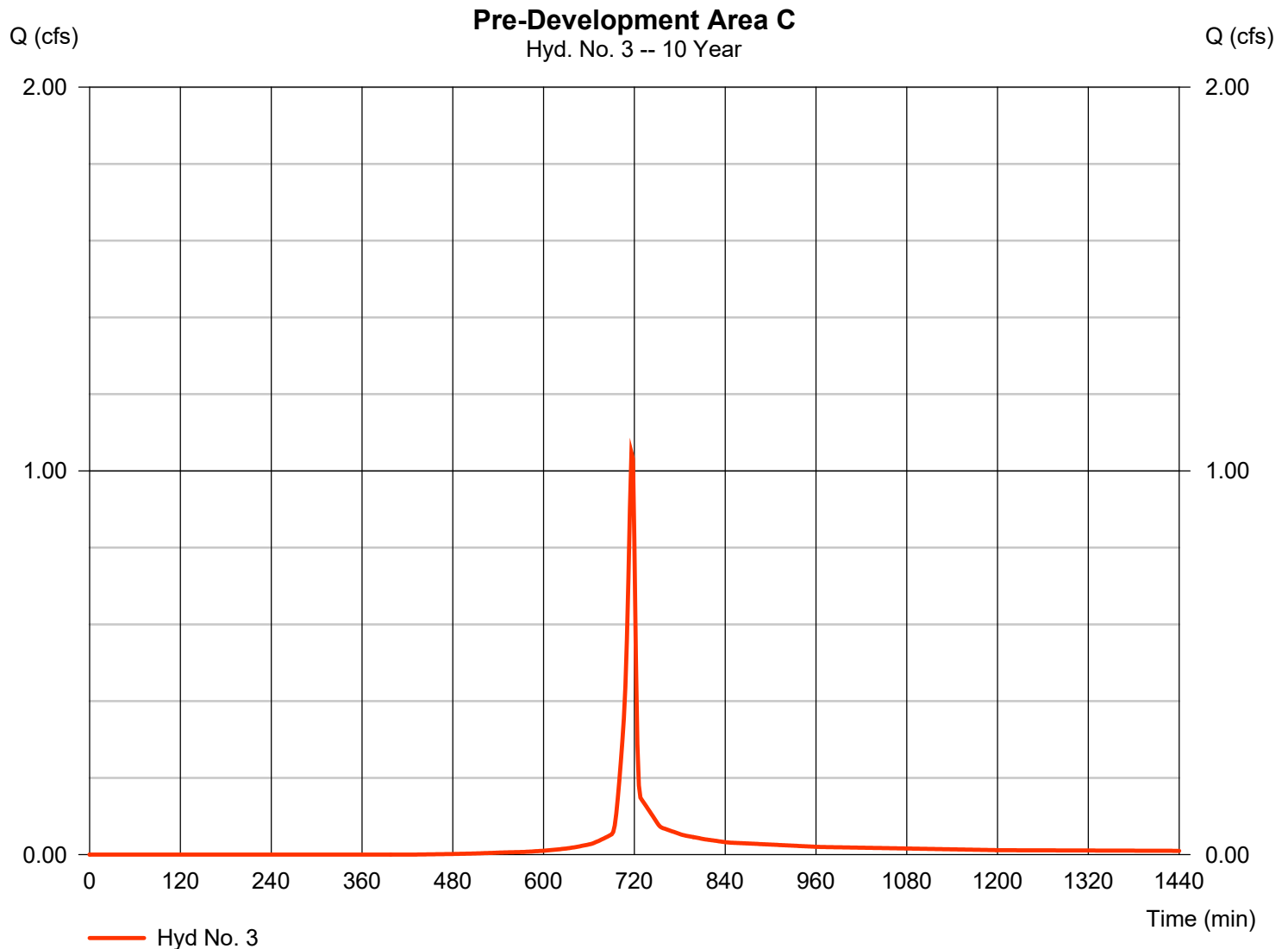
Friday, 03 / 31 / 2023

Hyd. No. 3

Pre-Development Area C

Hydrograph type	= SCS Runoff	Peak discharge	= 1.047 cfs
Storm frequency	= 10 yrs	Time to peak	= 716 min
Time interval	= 2 min	Hyd. volume	= 2,130 cuft
Drainage area	= 0.230 ac	Curve number	= 81*
Basin Slope	= 3.0 %	Hydraulic length	= 115 ft
Tc method	= User	Time of conc. (Tc)	= 5.00 min
Total precip.	= 4.70 in	Distribution	= Type II
Storm duration	= 24 hrs	Shape factor	= 484

* Composite (Area/CN) = + (0.040 x 89) + (0.190 x 79)] / 0.230



Hydrograph Report

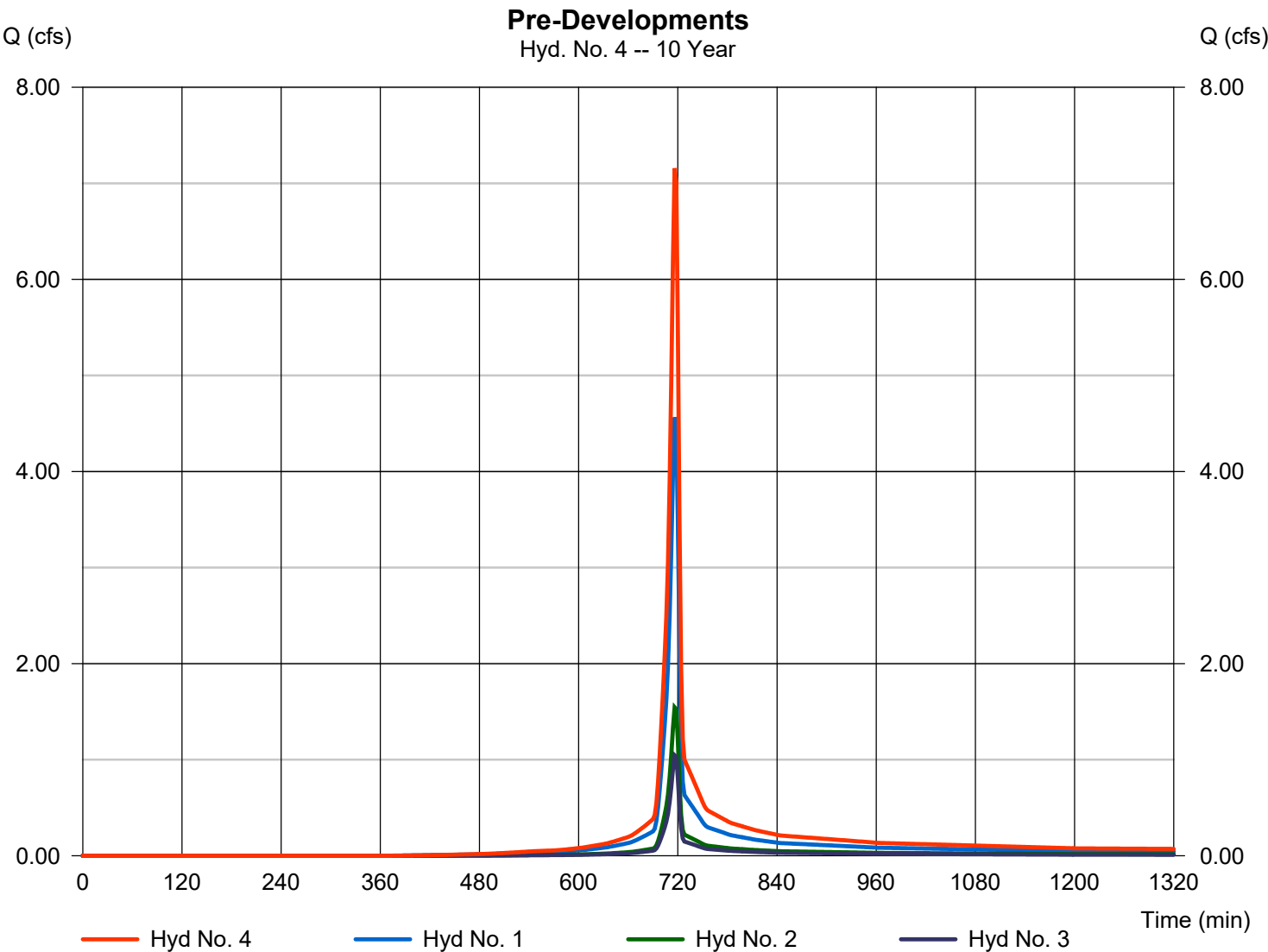
Hydraflow Hydrographs Extension for Autodesk® Civil 3D® by Autodesk, Inc. v2023

Friday, 03 / 31 / 2023

Hyd. No. 4

Pre-Developments

Hydrograph type	= Combine	Peak discharge	= 7.157 cfs
Storm frequency	= 10 yrs	Time to peak	= 716 min
Time interval	= 2 min	Hyd. volume	= 14,650 cuft
Inflow hyds.	= 1, 2, 3	Contrib. drain. area	= 1.500 ac



Hydrograph Report

Hydraflow Hydrographs Extension for Autodesk® Civil 3D® by Autodesk, Inc. v2023

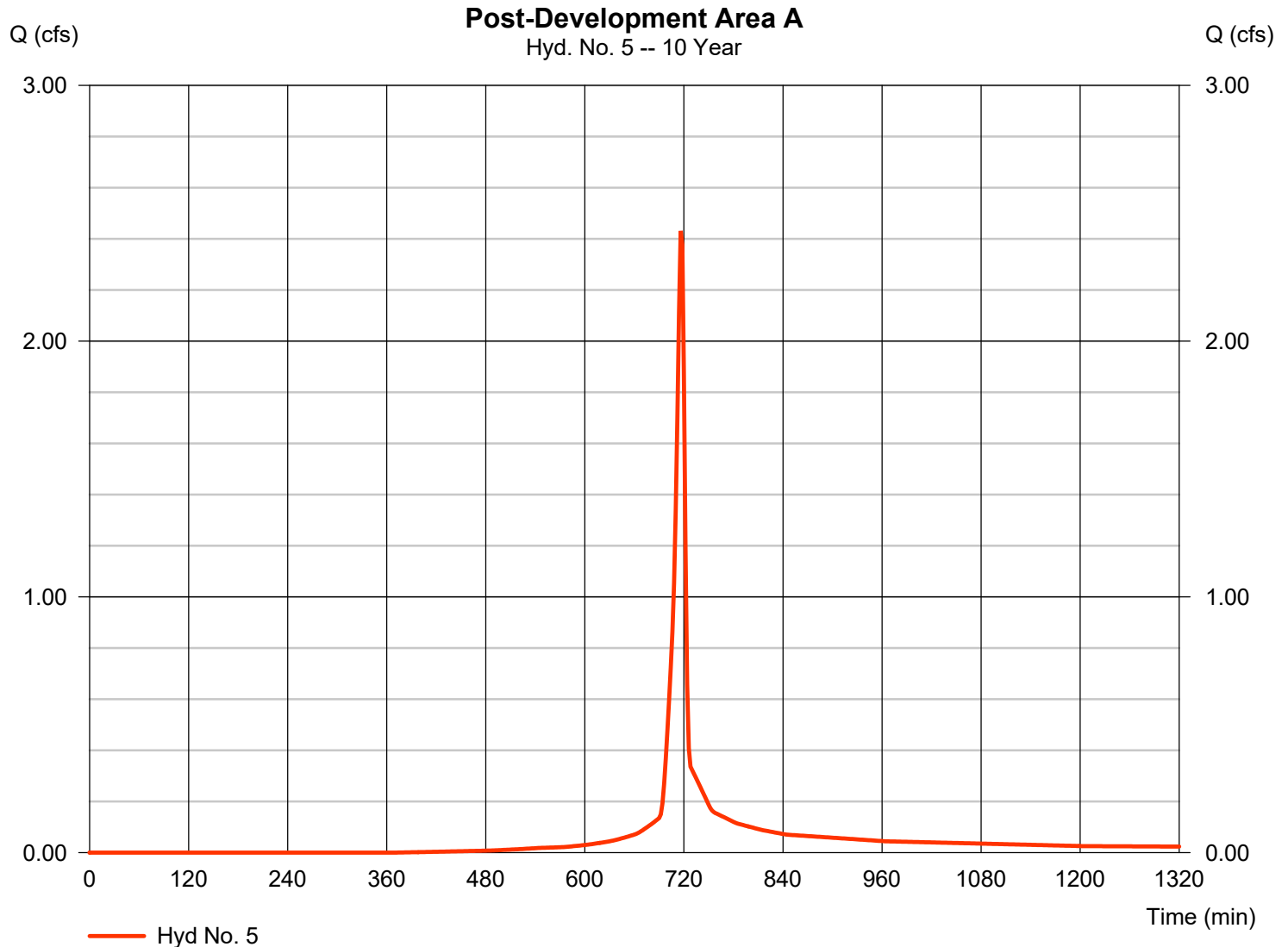
Friday, 03 / 31 / 2023

Hyd. No. 5

Post-Development Area A

Hydrograph type	= SCS Runoff	Peak discharge	= 2.431 cfs
Storm frequency	= 10 yrs	Time to peak	= 716 min
Time interval	= 2 min	Hyd. volume	= 4,998 cuft
Drainage area	= 0.490 ac	Curve number	= 84*
Basin Slope	= 3.0 %	Hydraulic length	= 178 ft
Tc method	= User	Time of conc. (Tc)	= 5.00 min
Total precip.	= 4.70 in	Distribution	= Type II
Storm duration	= 24 hrs	Shape factor	= 484

* Composite (Area/CN) = $[(0.130 \times 98) + (0.360 \times 79)] / 0.490$



Hydrograph Report

Hydraflow Hydrographs Extension for Autodesk® Civil 3D® by Autodesk, Inc. v2023

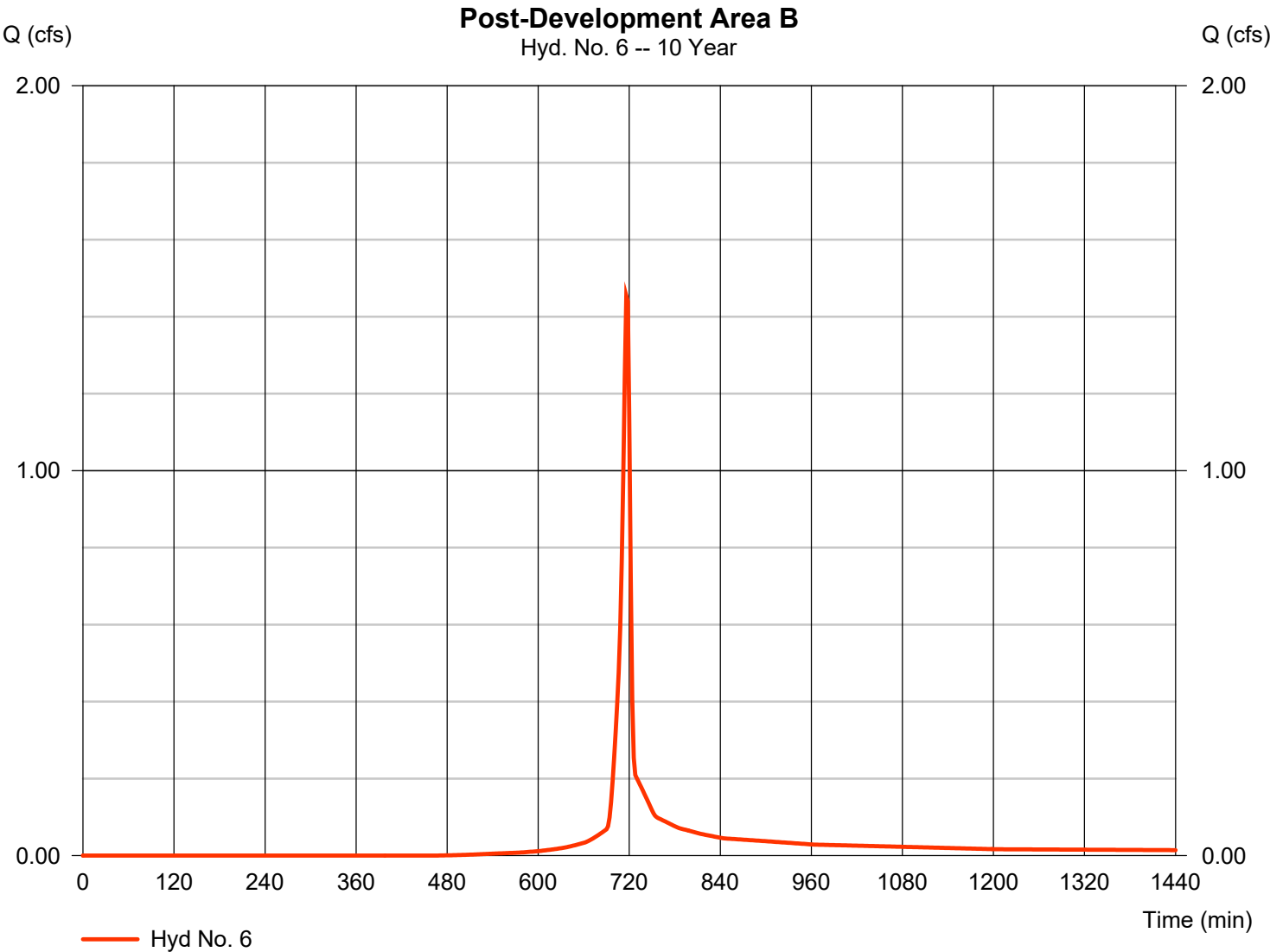
Friday, 03 / 31 / 2023

Hyd. No. 6

Post-Development Area B

Hydrograph type	=	SCS Runoff	Peak discharge	=	1.454 cfs
Storm frequency	=	10 yrs	Time to peak	=	716 min
Time interval	=	2 min	Hyd. volume	=	2,945 cuft
Drainage area	=	0.340 ac	Curve number	=	79*
Basin Slope	=	4.0 %	Hydraulic length	=	133 ft
Tc method	=	User	Time of conc. (Tc)	=	5.00 min
Total precip.	=	4.70 in	Distribution	=	Type II
Storm duration	=	24 hrs	Shape factor	=	484

* Composite (Area/CN) = [(0.340 x 79)] / 0.340



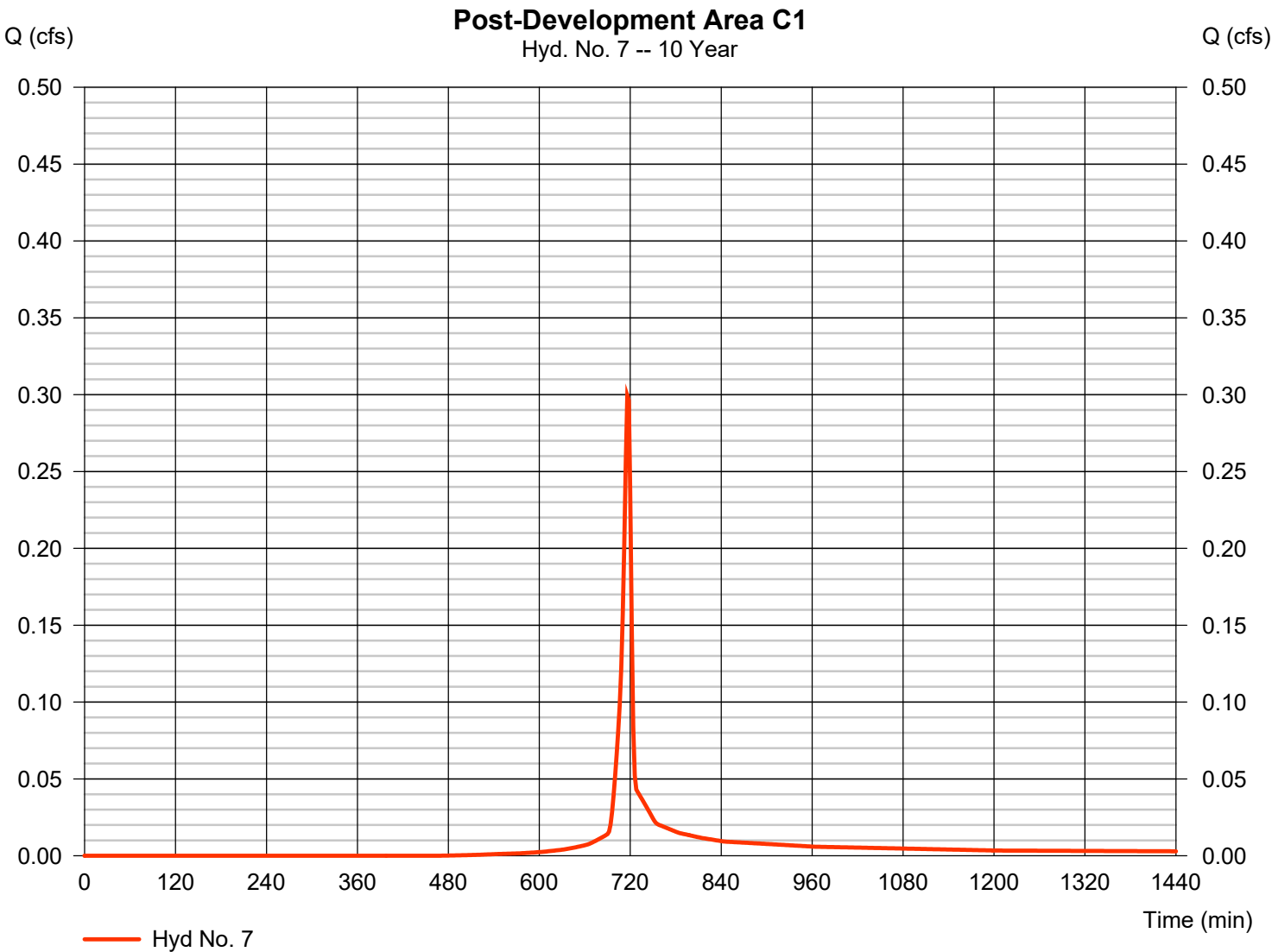
Hydrograph Report

Hyd. No. 7

Post-Development Area C1

Hydrograph type	=	SCS Runoff	Peak discharge	=	0.299 cfs
Storm frequency	=	10 yrs	Time to peak	=	716 min
Time interval	=	2 min	Hyd. volume	=	606 cuft
Drainage area	=	0.070 ac	Curve number	=	79*
Basin Slope	=	3.0 %	Hydraulic length	=	115 ft
Tc method	=	User	Time of conc. (Tc)	=	5.00 min
Total precip.	=	4.70 in	Distribution	=	Type II
Storm duration	=	24 hrs	Shape factor	=	484

* Composite (Area/CN) = [(0.070 x 79)] / 0.070



Hydrograph Report

Hydraflow Hydrographs Extension for Autodesk® Civil 3D® by Autodesk, Inc. v2023

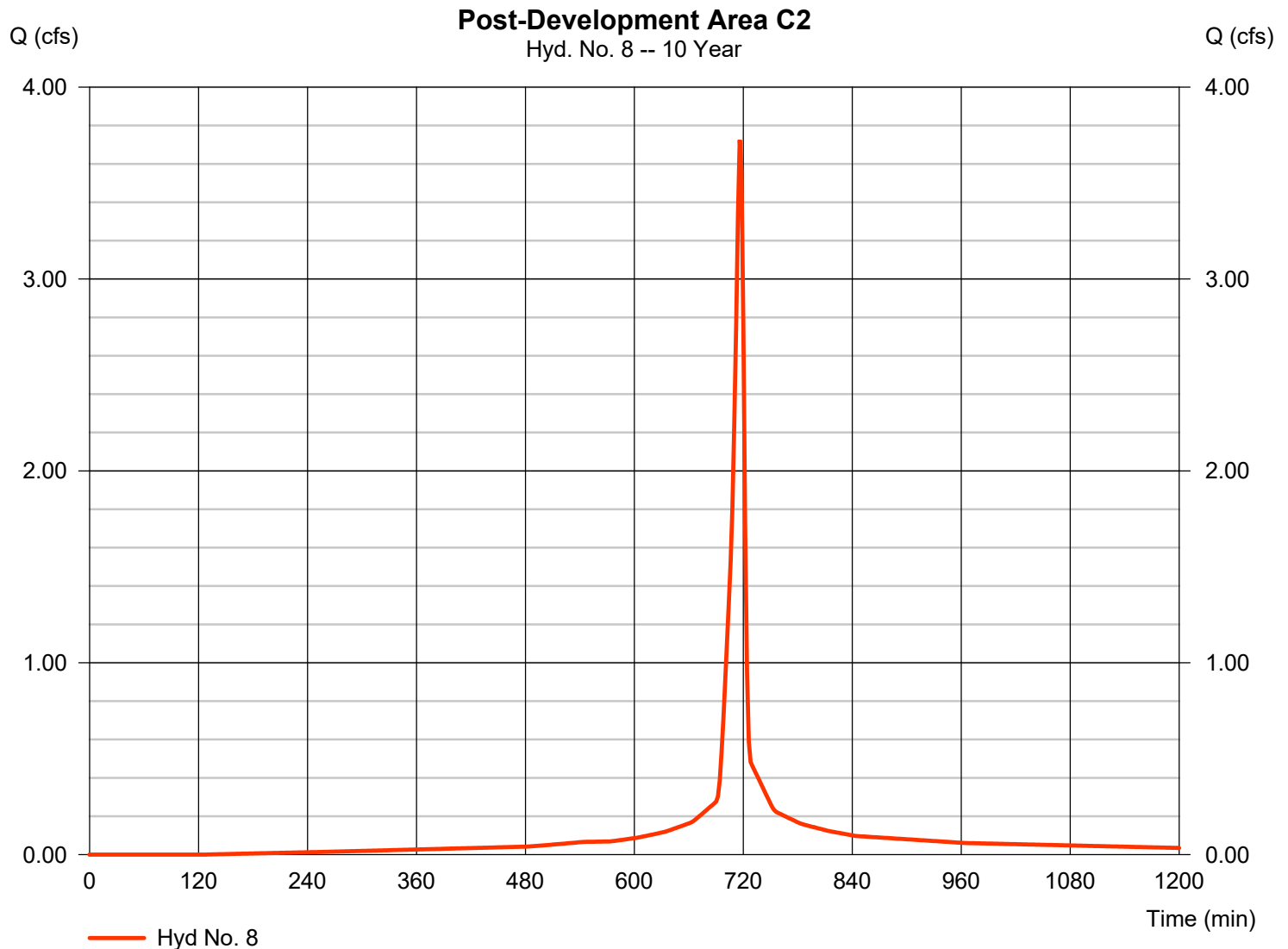
Friday, 03 / 31 / 2023

Hyd. No. 8

Post-Development Area C2

Hydrograph type	= SCS Runoff	Peak discharge	= 3.725 cfs
Storm frequency	= 10 yrs	Time to peak	= 716 min
Time interval	= 2 min	Hyd. volume	= 8,418 cuft
Drainage area	= 0.600 ac	Curve number	= 95*
Basin Slope	= 1.0 %	Hydraulic length	= 450 ft
Tc method	= User	Time of conc. (Tc)	= 5.00 min
Total precip.	= 4.70 in	Distribution	= Type II
Storm duration	= 24 hrs	Shape factor	= 484

* Composite (Area/CN) = $[(0.520 \times 98) + (0.080 \times 79)] / 0.600$



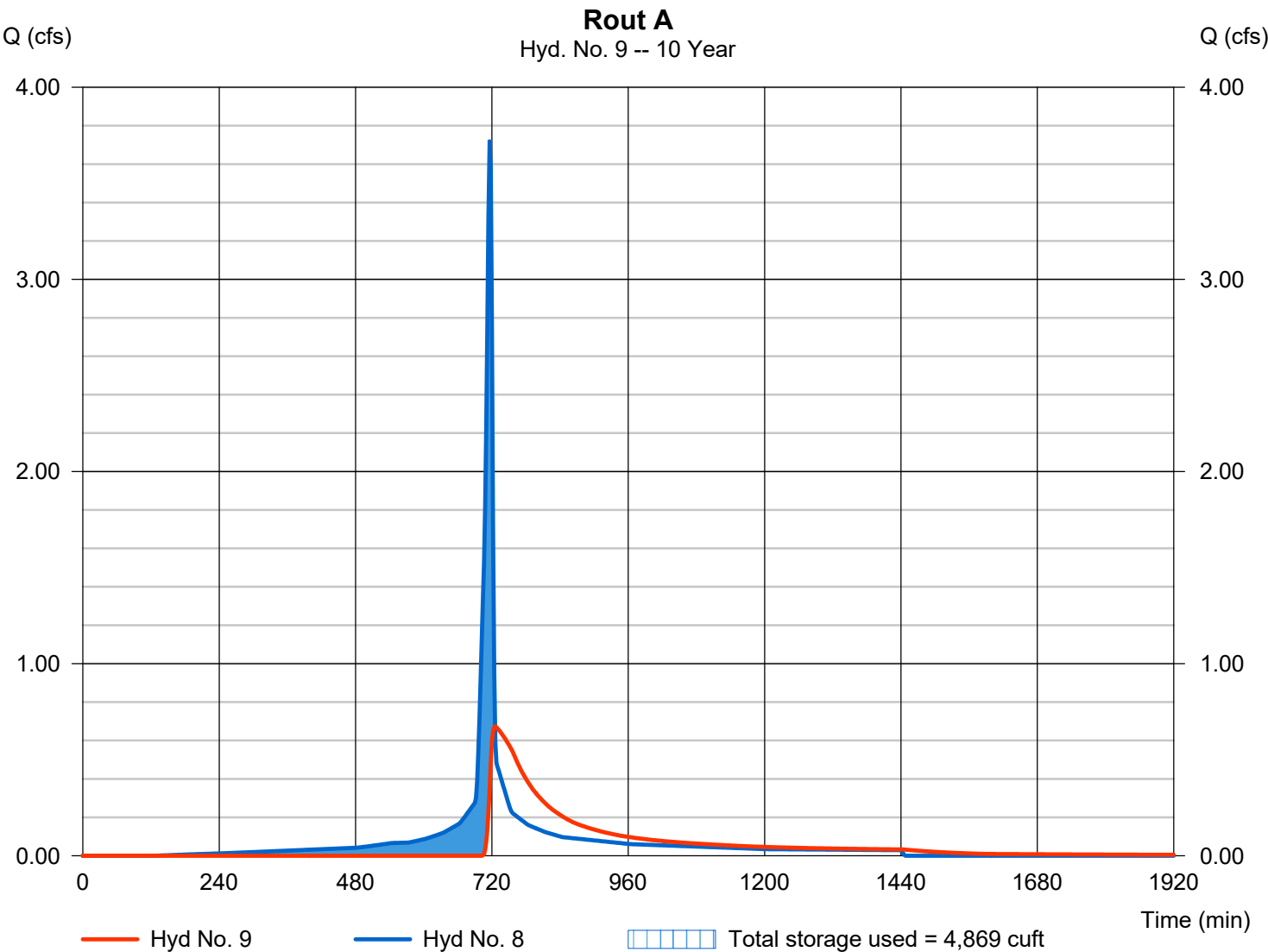
Hydrograph Report

Hyd. No. 9

Rout A

Hydrograph type	= Reservoir	Peak discharge	= 0.674 cfs
Storm frequency	= 10 yrs	Time to peak	= 726 min
Time interval	= 2 min	Hyd. volume	= 6,200 cuft
Inflow hyd. No.	= 8 - Post-Development Area C2	Max. Elevation	= 659.12 ft
Reservoir name	= Pond A	Max. Storage	= 4,869 cuft

Storage Indication method used.



Hydrograph Report

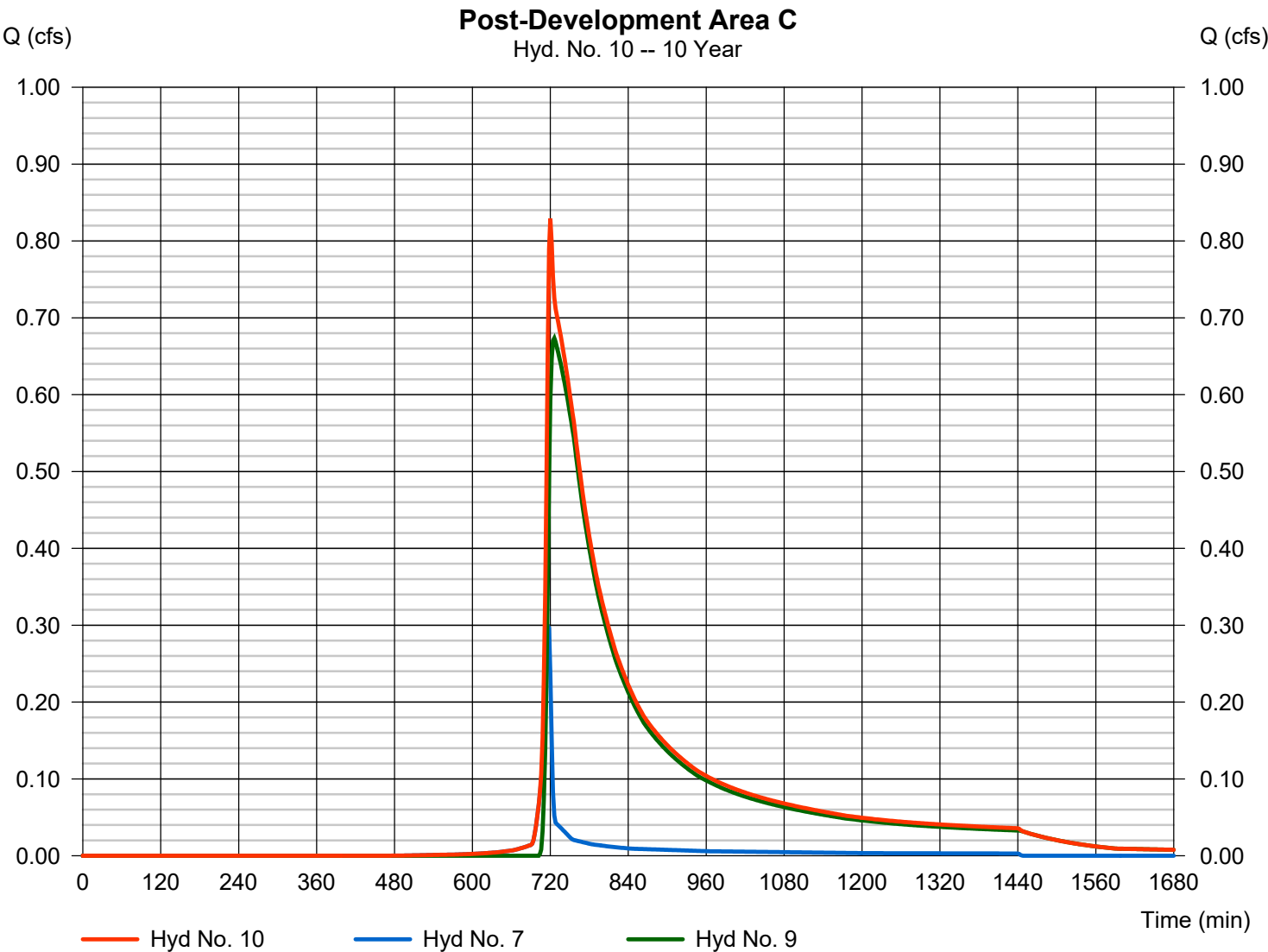
Hydraflow Hydrographs Extension for Autodesk® Civil 3D® by Autodesk, Inc. v2023

Friday, 03 / 31 / 2023

Hyd. No. 10

Post-Development Area C

Hydrograph type	= Combine	Peak discharge	= 0.829 cfs
Storm frequency	= 10 yrs	Time to peak	= 720 min
Time interval	= 2 min	Hyd. volume	= 6,806 cuft
Inflow hyds.	= 7, 9	Contrib. drain. area	= 0.070 ac

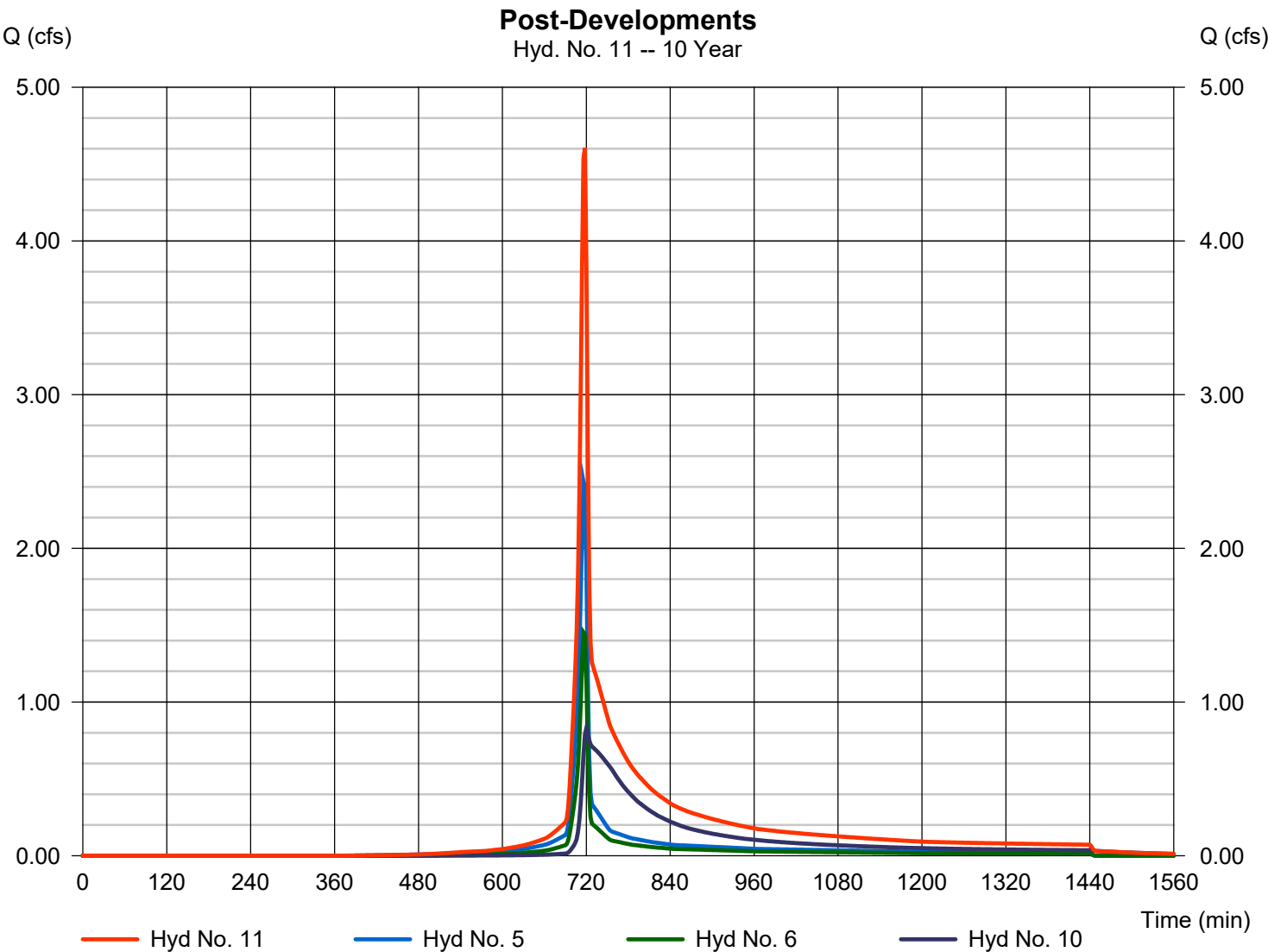


Hydrograph Report

Hyd. No. 11

Post-Developments

Hydrograph type	= Combine	Peak discharge	= 4.606 cfs
Storm frequency	= 10 yrs	Time to peak	= 718 min
Time interval	= 2 min	Hyd. volume	= 14,749 cuft
Inflow hyds.	= 5, 6, 10	Contrib. drain. area	= 0.830 ac



Hydrograph Summary Report

Hydraflow Hydrographs Extension for Autodesk® Civil 3D® by Autodesk, Inc. v2023

Hyd. No.	Hydrograph type (origin)	Peak flow (cfs)	Time interval (min)	Time to Peak (min)	Hyd. volume (cuft)	Inflow hyd(s)	Maximum elevation (ft)	Total strge used (cuft)	Hydrograph Description
1	SCS Runoff	5.666	2	716	11,768	-----	-----	-----	Pre-Development Area A
2	SCS Runoff	1.958	2	716	4,002	-----	-----	-----	Pre-Development Area B
3	SCS Runoff	1.320	2	716	2,707	-----	-----	-----	Pre-Development Area C
4	Combine	8.944	2	716	18,477	1, 2, 3	-----	-----	Pre-Developments
5	SCS Runoff	3.018	2	716	6,268	-----	-----	-----	Post-Development Area A
6	SCS Runoff	1.853	2	716	3,776	-----	-----	-----	Post-Development Area B
7	SCS Runoff	0.381	2	716	777	-----	-----	-----	Post-Development Area C1
8	SCS Runoff	4.420	2	716	10,097	-----	-----	-----	Post-Development Area C2
9	Reservoir	0.929	2	724	7,879	8	659.33	5,714	Rout A
10	Combine	1.134	2	720	8,656	7, 9	-----	-----	Post-Development Area C
11	Combine	5.863	2	718	18,700	5, 6, 10	-----	-----	Post-Developments
271 Jefferson Pk.gpw					Return Period: 25 Year			Friday, 03 / 31 / 2023	

Hydrograph Report

Hydraflow Hydrographs Extension for Autodesk® Civil 3D® by Autodesk, Inc. v2023

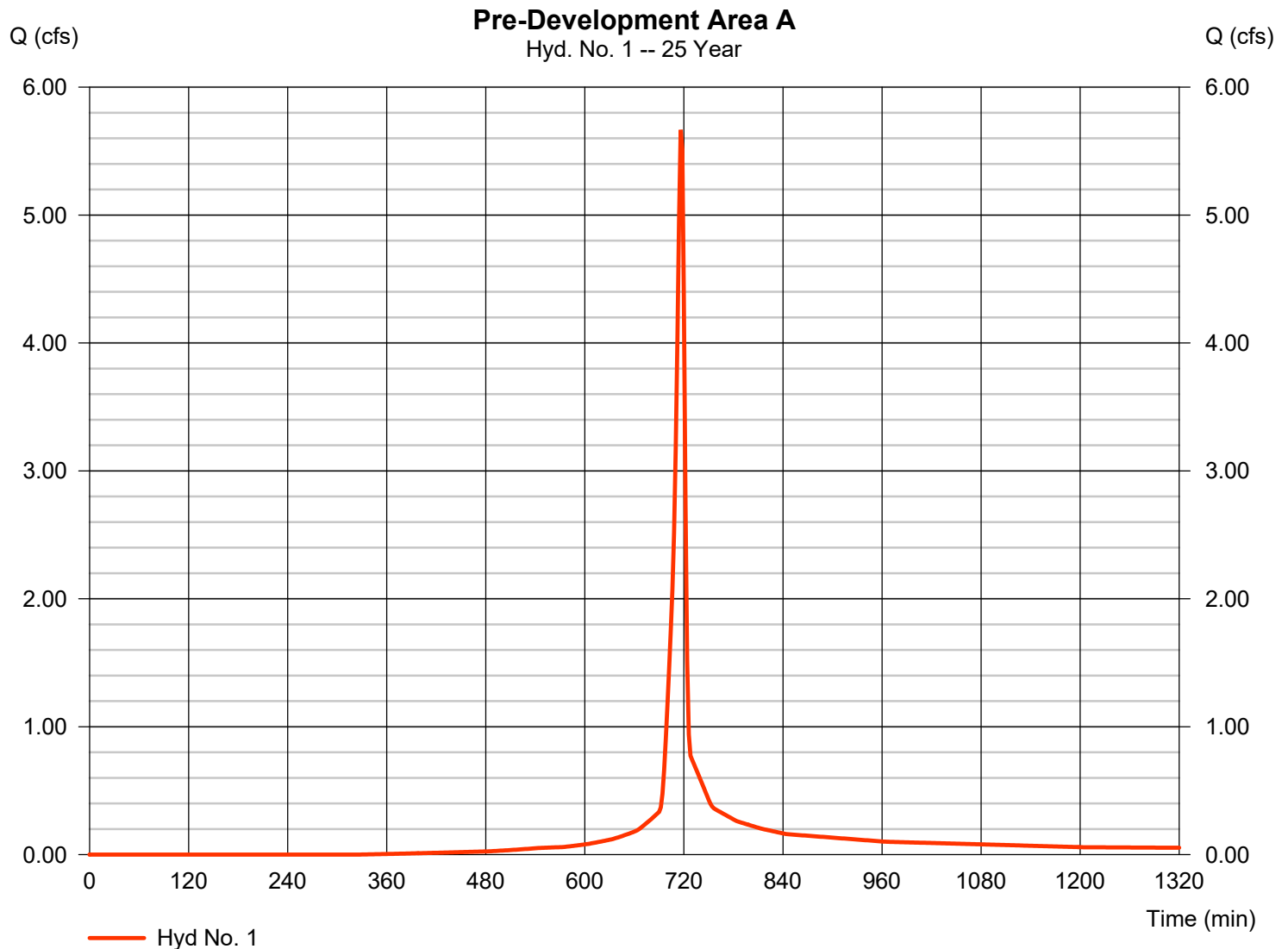
Friday, 03 / 31 / 2023

Hyd. No. 1

Pre-Development Area A

Hydrograph type	= SCS Runoff	Peak discharge	= 5.666 cfs
Storm frequency	= 25 yrs	Time to peak	= 716 min
Time interval	= 2 min	Hyd. volume	= 11,768 cuft
Drainage area	= 0.920 ac	Curve number	= 84*
Basin Slope	= 3.0 %	Hydraulic length	= 178 ft
Tc method	= User	Time of conc. (Tc)	= 5.00 min
Total precip.	= 5.53 in	Distribution	= Type II
Storm duration	= 24 hrs	Shape factor	= 484

* Composite (Area/CN) = $[(0.090 \times 98) + (0.280 \times 89) + (0.550 \times 79)] / 0.920$



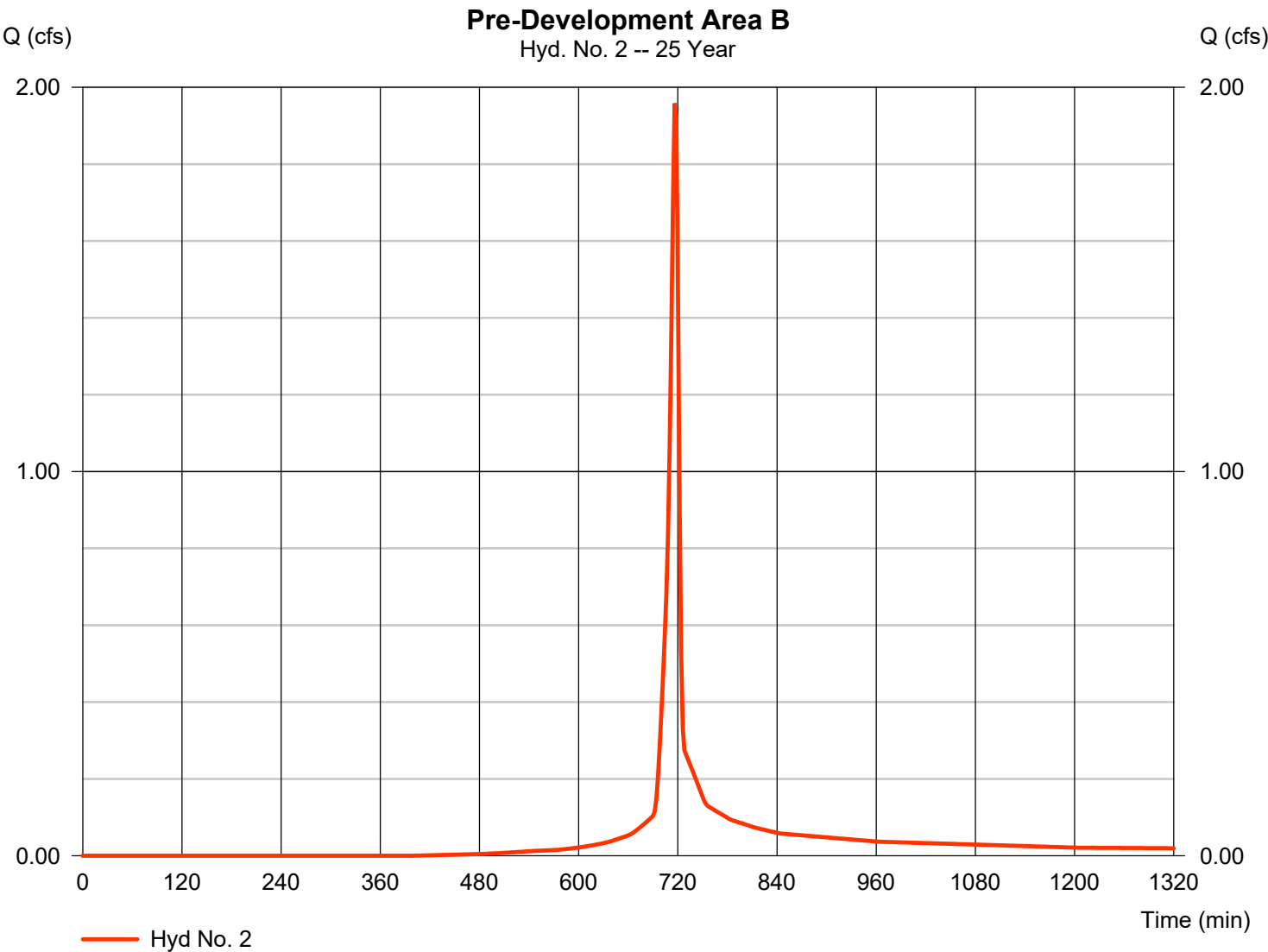
Hydrograph Report

Hyd. No. 2

Pre-Development Area B

Hydrograph type	=	SCS Runoff	Peak discharge	=	1.958 cfs
Storm frequency	=	25 yrs	Time to peak	=	716 min
Time interval	=	2 min	Hyd. volume	=	4,002 cuft
Drainage area	=	0.350 ac	Curve number	=	80*
Basin Slope	=	4.0 %	Hydraulic length	=	133 ft
Tc method	=	User	Time of conc. (Tc)	=	5.00 min
Total precip.	=	5.53 in	Distribution	=	Type II
Storm duration	=	24 hrs	Shape factor	=	484

* Composite (Area/CN) = + (0.040 x 89) + (0.310 x 79)] / 0.350



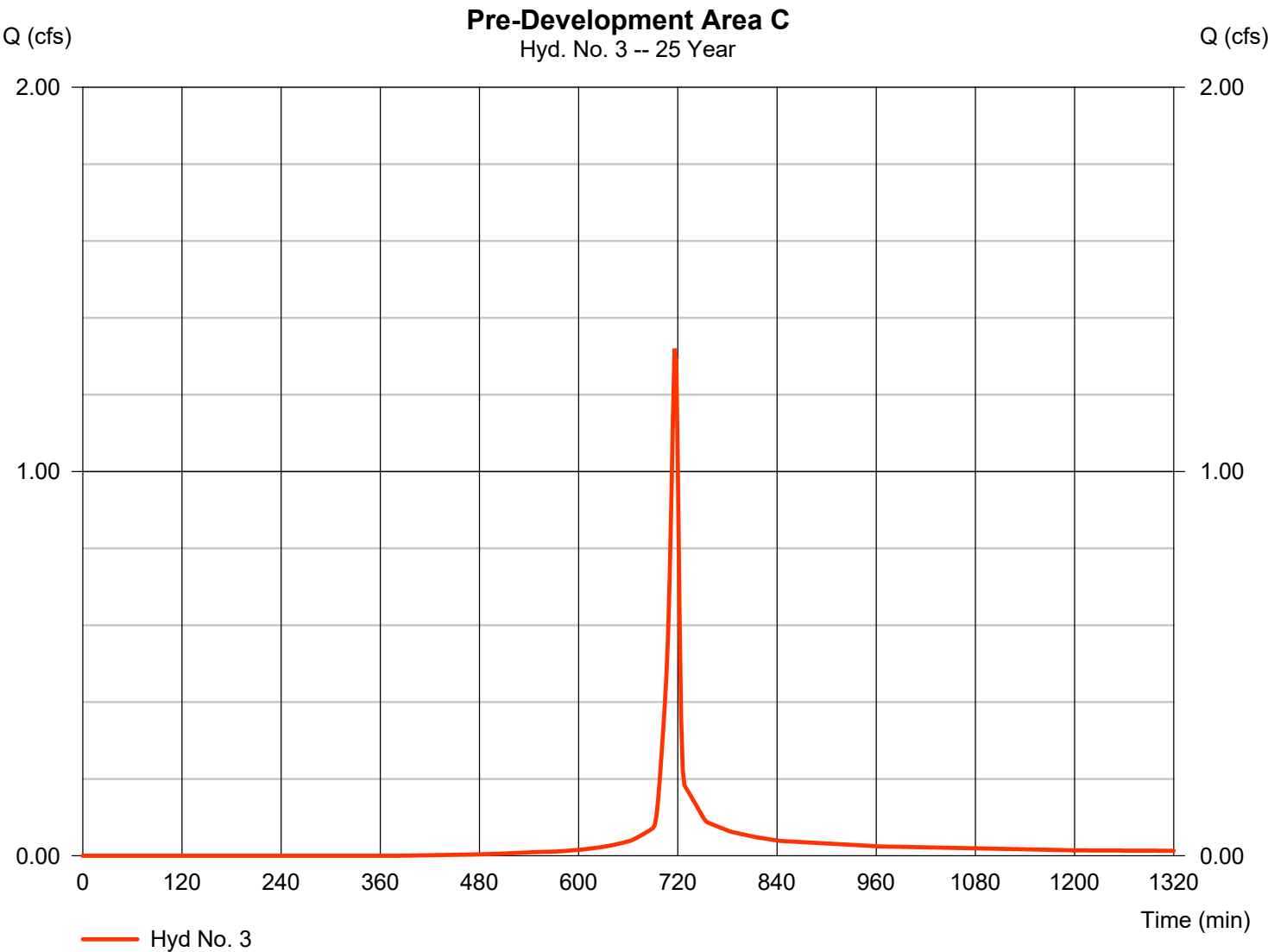
Hydrograph Report

Hyd. No. 3

Pre-Development Area C

Hydrograph type	=	SCS Runoff	Peak discharge	=	1.320 cfs
Storm frequency	=	25 yrs	Time to peak	=	716 min
Time interval	=	2 min	Hyd. volume	=	2,707 cuft
Drainage area	=	0.230 ac	Curve number	=	81*
Basin Slope	=	3.0 %	Hydraulic length	=	115 ft
Tc method	=	User	Time of conc. (Tc)	=	5.00 min
Total precip.	=	5.53 in	Distribution	=	Type II
Storm duration	=	24 hrs	Shape factor	=	484

* Composite (Area/CN) = + (0.040 x 89) + (0.190 x 79)] / 0.230

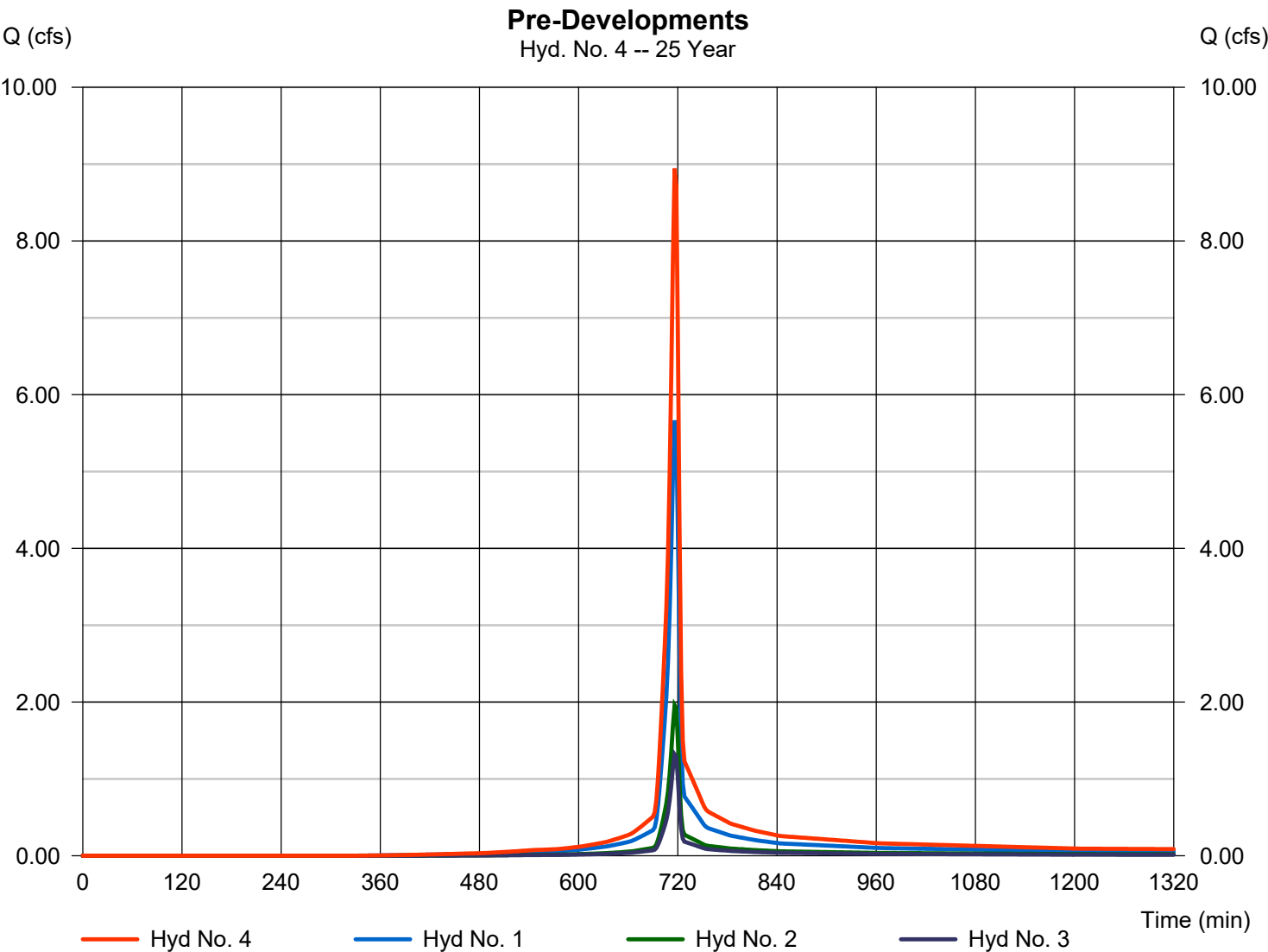


Hydrograph Report

Hyd. No. 4

Pre-Developments

Hydrograph type	= Combine	Peak discharge	= 8.944 cfs
Storm frequency	= 25 yrs	Time to peak	= 716 min
Time interval	= 2 min	Hyd. volume	= 18,477 cuft
Inflow hyds.	= 1, 2, 3	Contrib. drain. area	= 1.500 ac



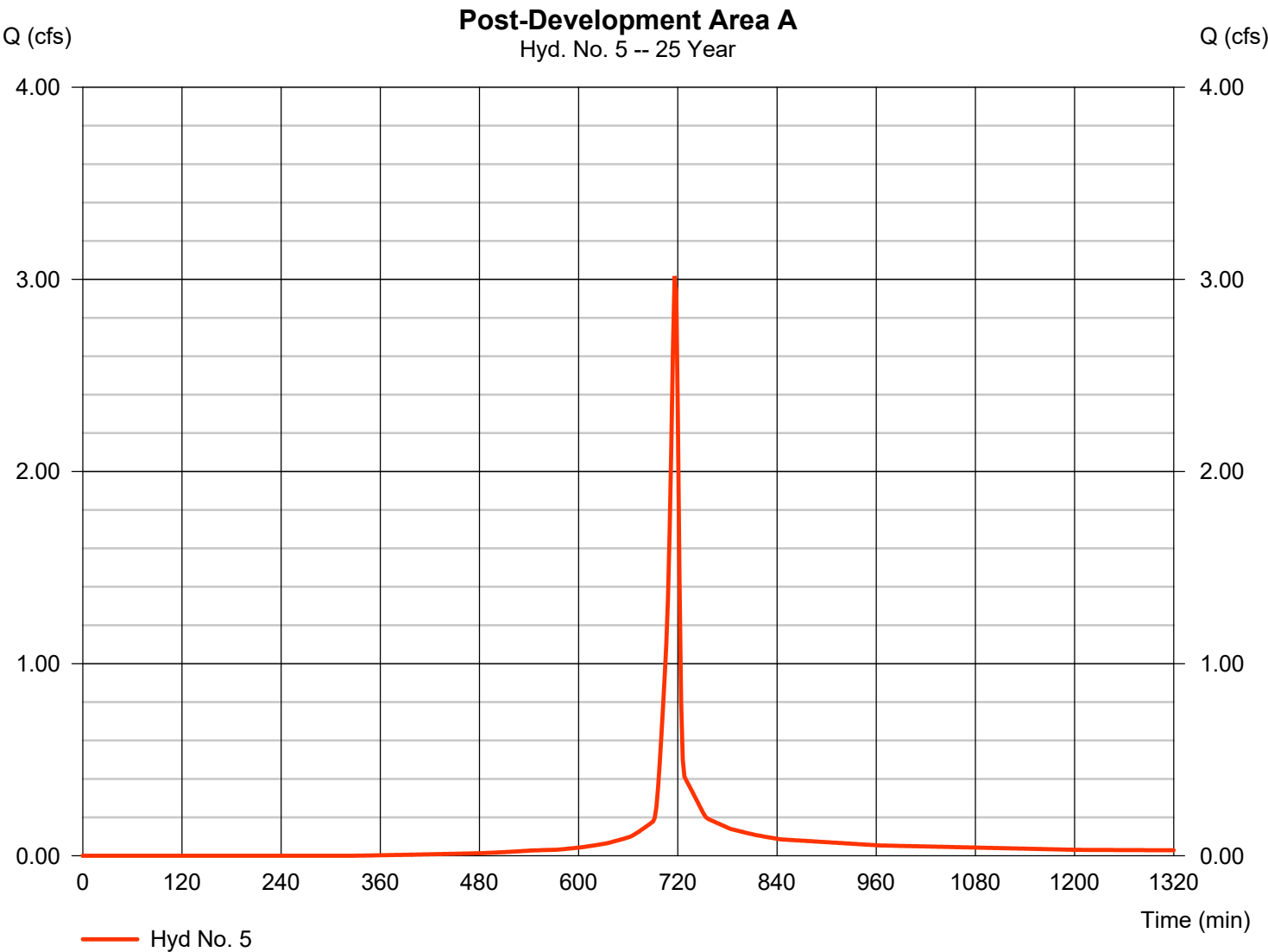
Hydrograph Report

Hyd. No. 5

Post-Development Area A

Hydrograph type	=	SCS Runoff	Peak discharge	=	3.018 cfs
Storm frequency	=	25 yrs	Time to peak	=	716 min
Time interval	=	2 min	Hyd. volume	=	6,268 cuft
Drainage area	=	0.490 ac	Curve number	=	84*
Basin Slope	=	3.0 %	Hydraulic length	=	178 ft
Tc method	=	User	Time of conc. (Tc)	=	5.00 min
Total precip.	=	5.53 in	Distribution	=	Type II
Storm duration	=	24 hrs	Shape factor	=	484

* Composite (Area/CN) = [(0.130 x 98) + (0.360 x 79)] / 0.490



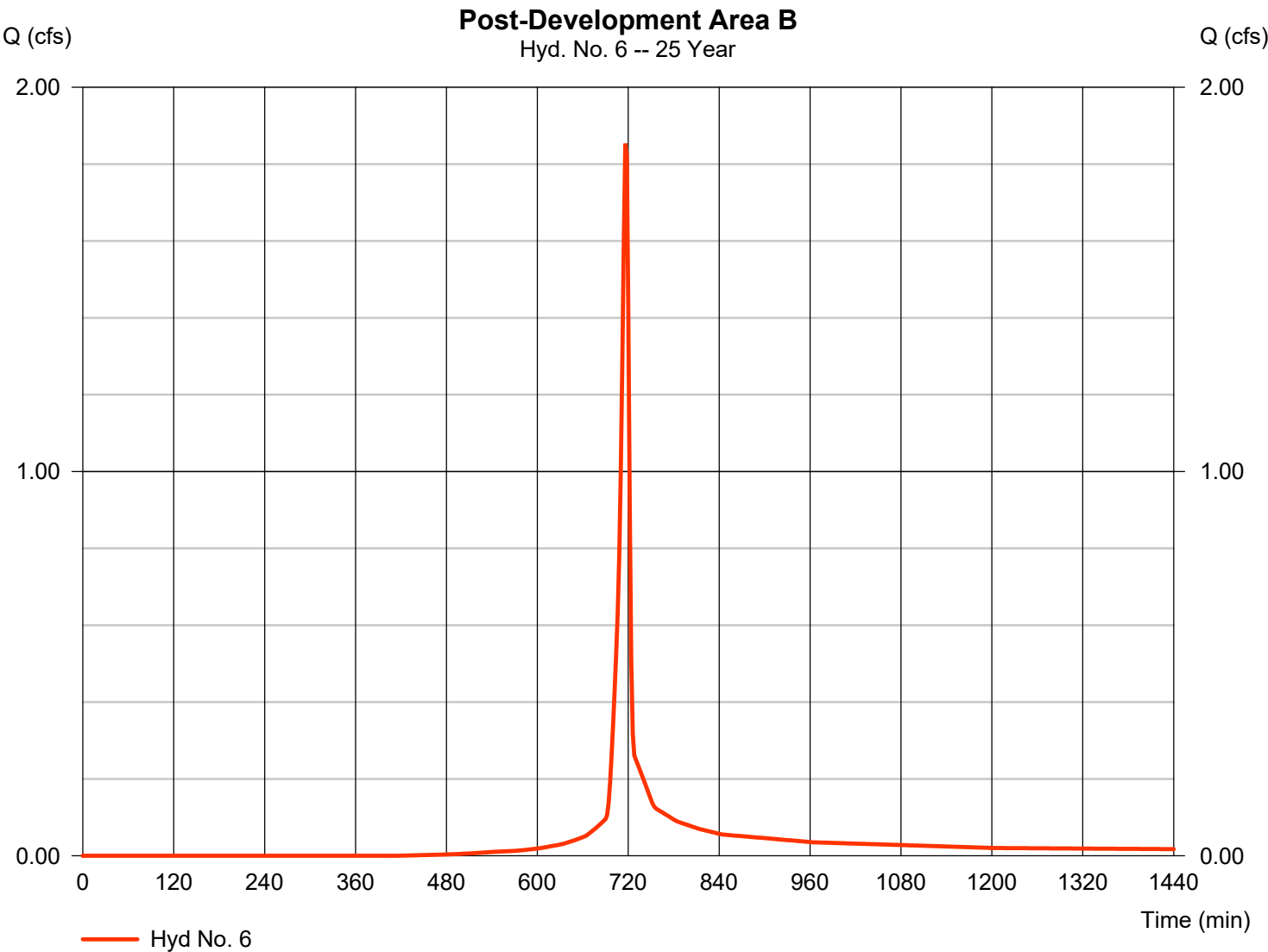
Hydrograph Report

Hyd. No. 6

Post-Development Area B

Hydrograph type	=	SCS Runoff	Peak discharge	=	1.853 cfs
Storm frequency	=	25 yrs	Time to peak	=	716 min
Time interval	=	2 min	Hyd. volume	=	3,776 cuft
Drainage area	=	0.340 ac	Curve number	=	79*
Basin Slope	=	4.0 %	Hydraulic length	=	133 ft
Tc method	=	User	Time of conc. (Tc)	=	5.00 min
Total precip.	=	5.53 in	Distribution	=	Type II
Storm duration	=	24 hrs	Shape factor	=	484

* Composite (Area/CN) = [(0.340 x 79)] / 0.340



Hydrograph Report

Hydraflow Hydrographs Extension for Autodesk® Civil 3D® by Autodesk, Inc. v2023

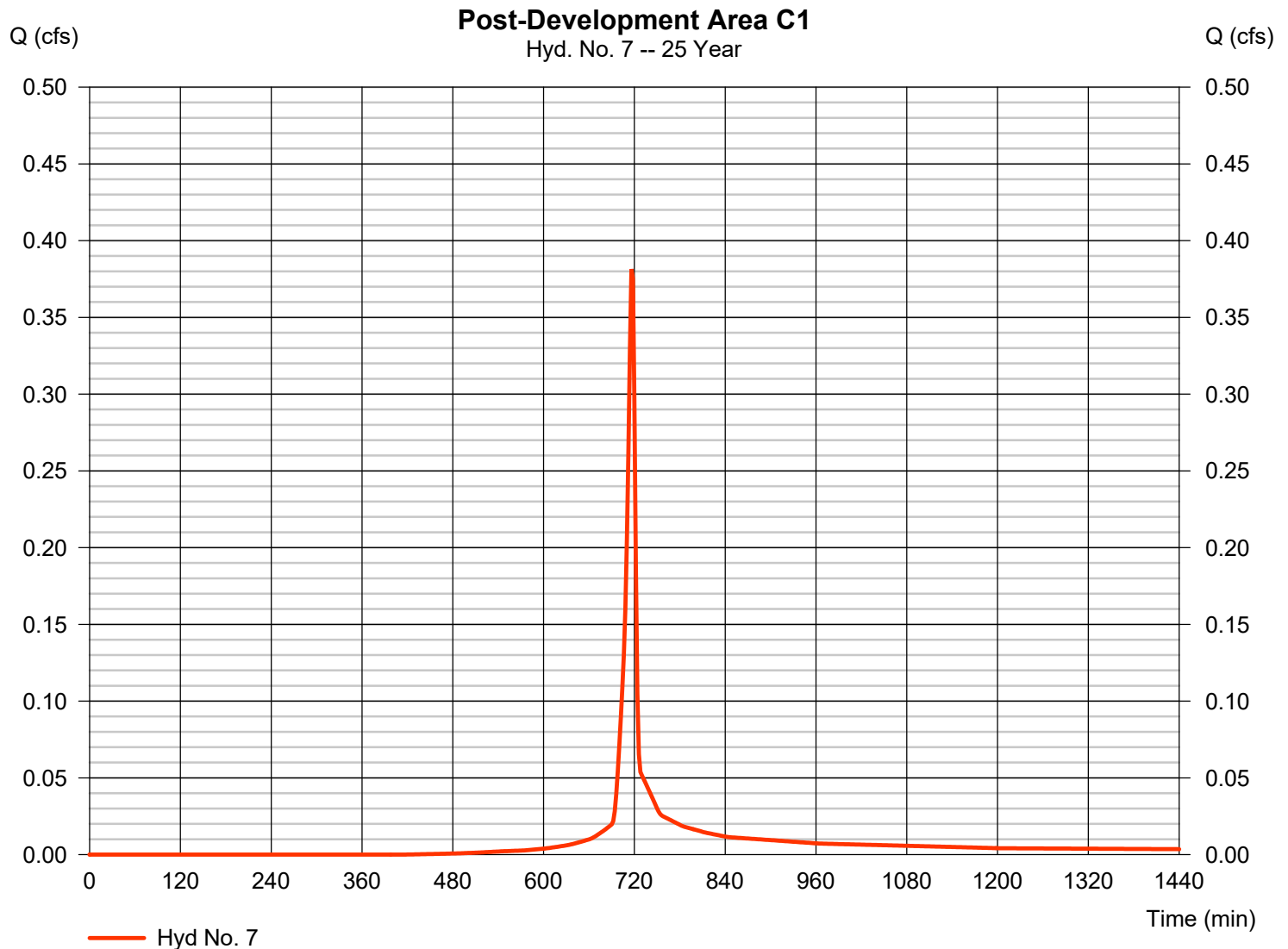
Friday, 03 / 31 / 2023

Hyd. No. 7

Post-Development Area C1

Hydrograph type	= SCS Runoff	Peak discharge	= 0.381 cfs
Storm frequency	= 25 yrs	Time to peak	= 716 min
Time interval	= 2 min	Hyd. volume	= 777 cuft
Drainage area	= 0.070 ac	Curve number	= 79*
Basin Slope	= 3.0 %	Hydraulic length	= 115 ft
Tc method	= User	Time of conc. (Tc)	= 5.00 min
Total precip.	= 5.53 in	Distribution	= Type II
Storm duration	= 24 hrs	Shape factor	= 484

* Composite (Area/CN) = $[(0.070 \times 79)] / 0.070$



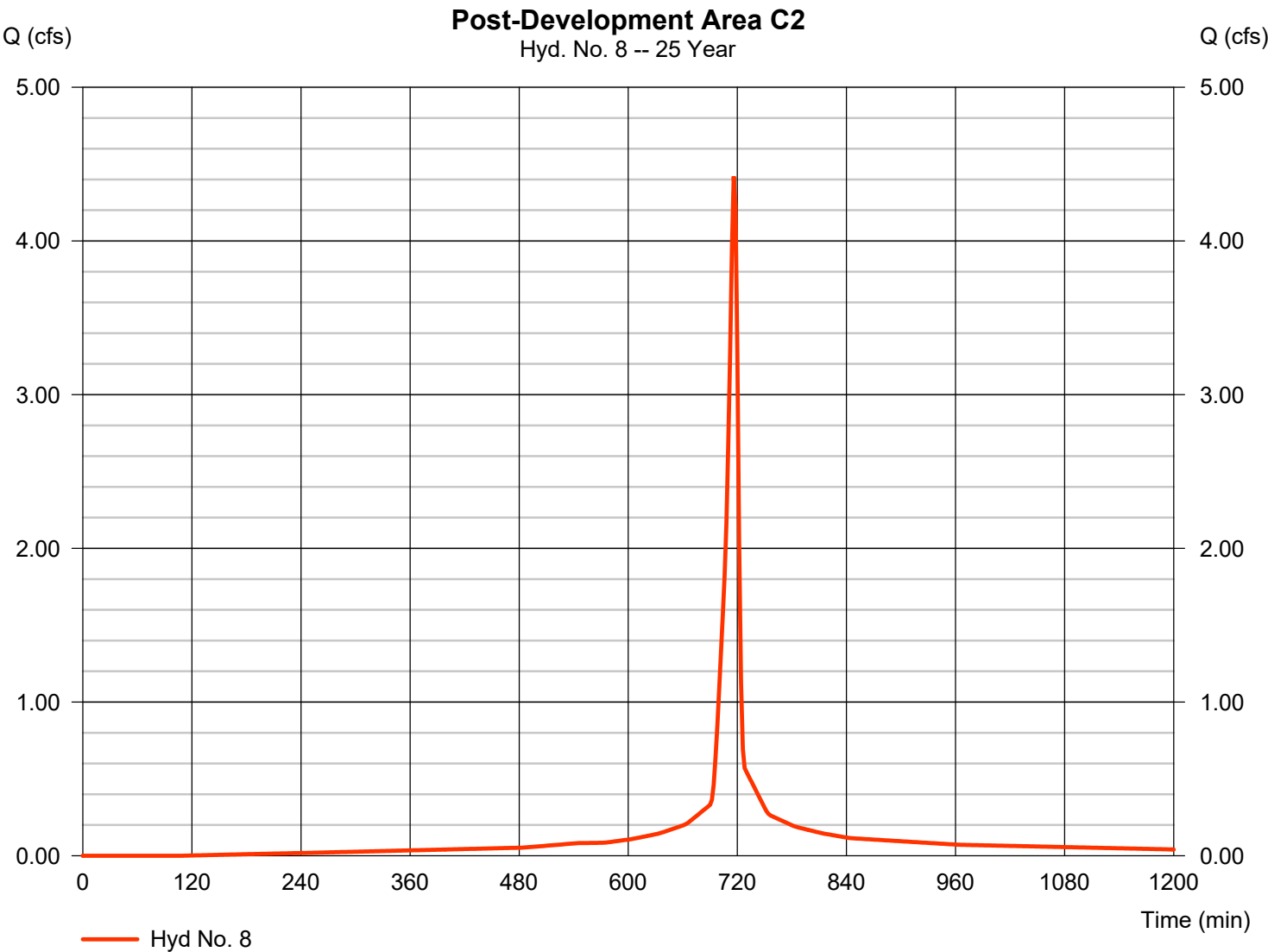
Hydrograph Report

Hyd. No. 8

Post-Development Area C2

Hydrograph type	=	SCS Runoff	Peak discharge	=	4.420 cfs
Storm frequency	=	25 yrs	Time to peak	=	716 min
Time interval	=	2 min	Hyd. volume	=	10,097 cuft
Drainage area	=	0.600 ac	Curve number	=	95*
Basin Slope	=	1.0 %	Hydraulic length	=	450 ft
Tc method	=	User	Time of conc. (Tc)	=	5.00 min
Total precip.	=	5.53 in	Distribution	=	Type II
Storm duration	=	24 hrs	Shape factor	=	484

* Composite (Area/CN) = [(0.520 x 98) + (0.080 x 79)] / 0.600



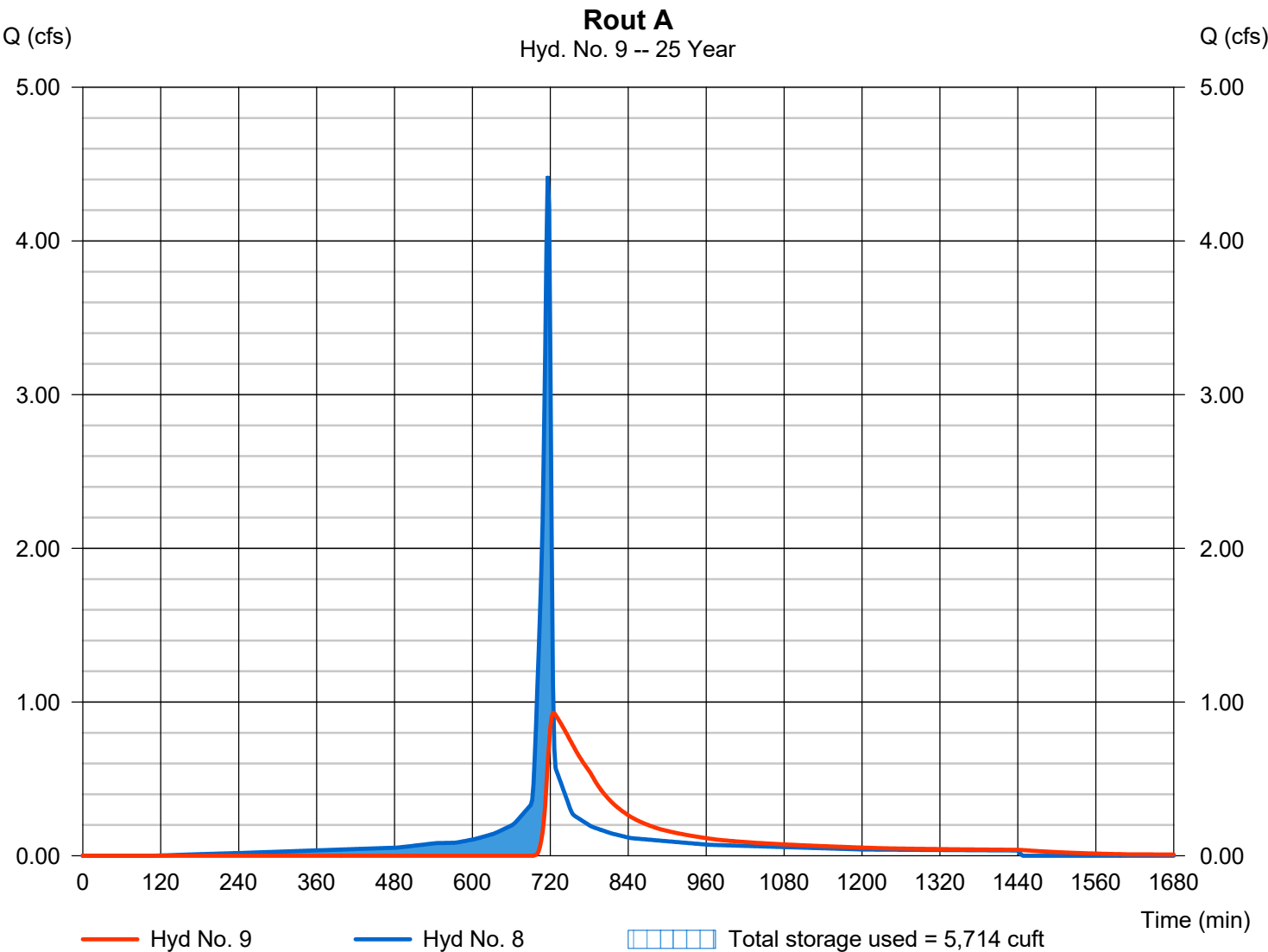
Hydrograph Report

Hyd. No. 9

Rout A

Hydrograph type	= Reservoir	Peak discharge	= 0.929 cfs
Storm frequency	= 25 yrs	Time to peak	= 724 min
Time interval	= 2 min	Hyd. volume	= 7,879 cuft
Inflow hyd. No.	= 8 - Post-Development Area C2	Max. Elevation	= 659.33 ft
Reservoir name	= Pond A	Max. Storage	= 5,714 cuft

Storage Indication method used.

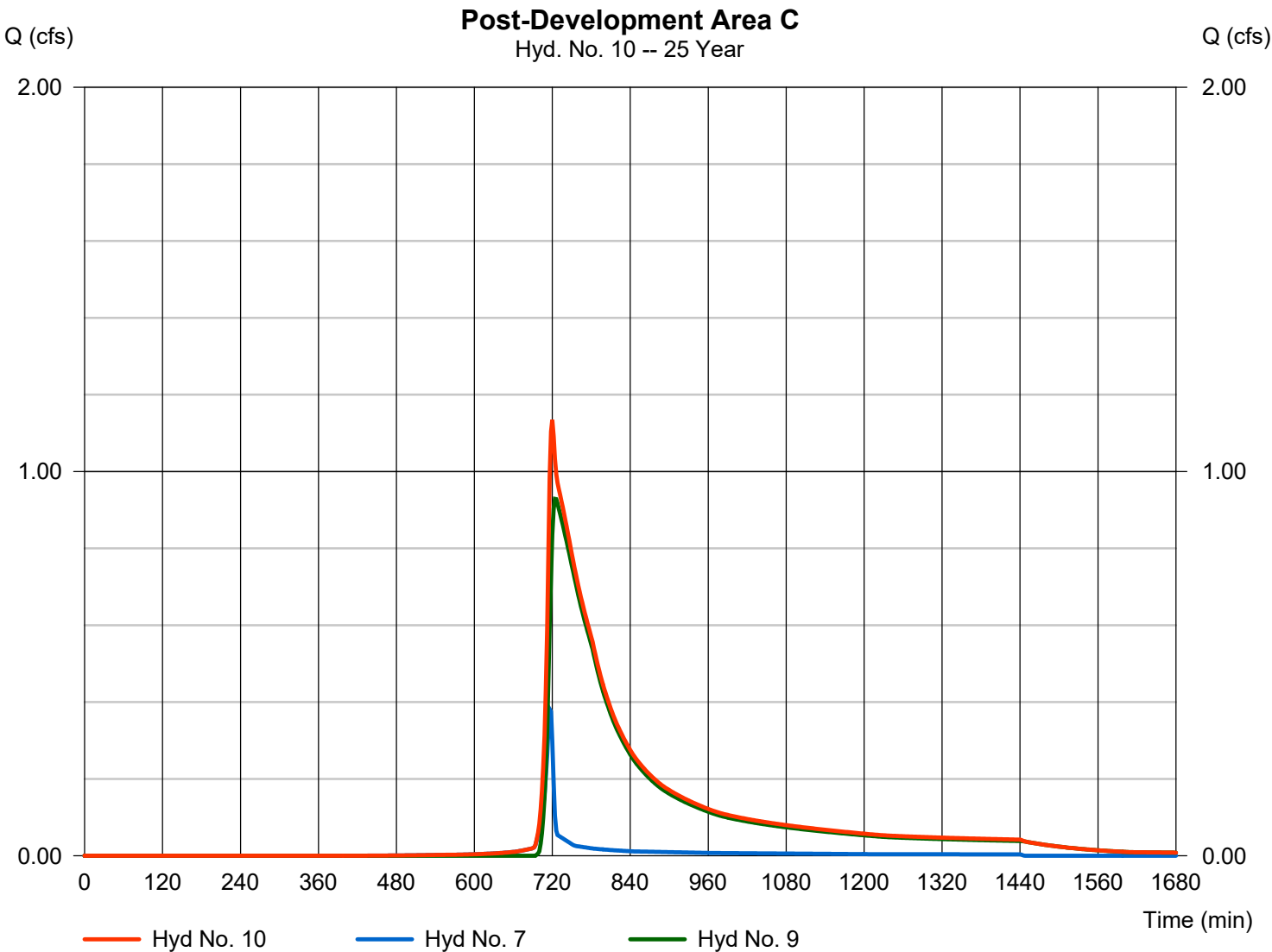


Hydrograph Report

Hyd. No. 10

Post-Development Area C

Hydrograph type	= Combine	Peak discharge	= 1.134 cfs
Storm frequency	= 25 yrs	Time to peak	= 720 min
Time interval	= 2 min	Hyd. volume	= 8,656 cuft
Inflow hyds.	= 7, 9	Contrib. drain. area	= 0.070 ac



Hydrograph Report

Hydraflow Hydrographs Extension for Autodesk® Civil 3D® by Autodesk, Inc. v2023

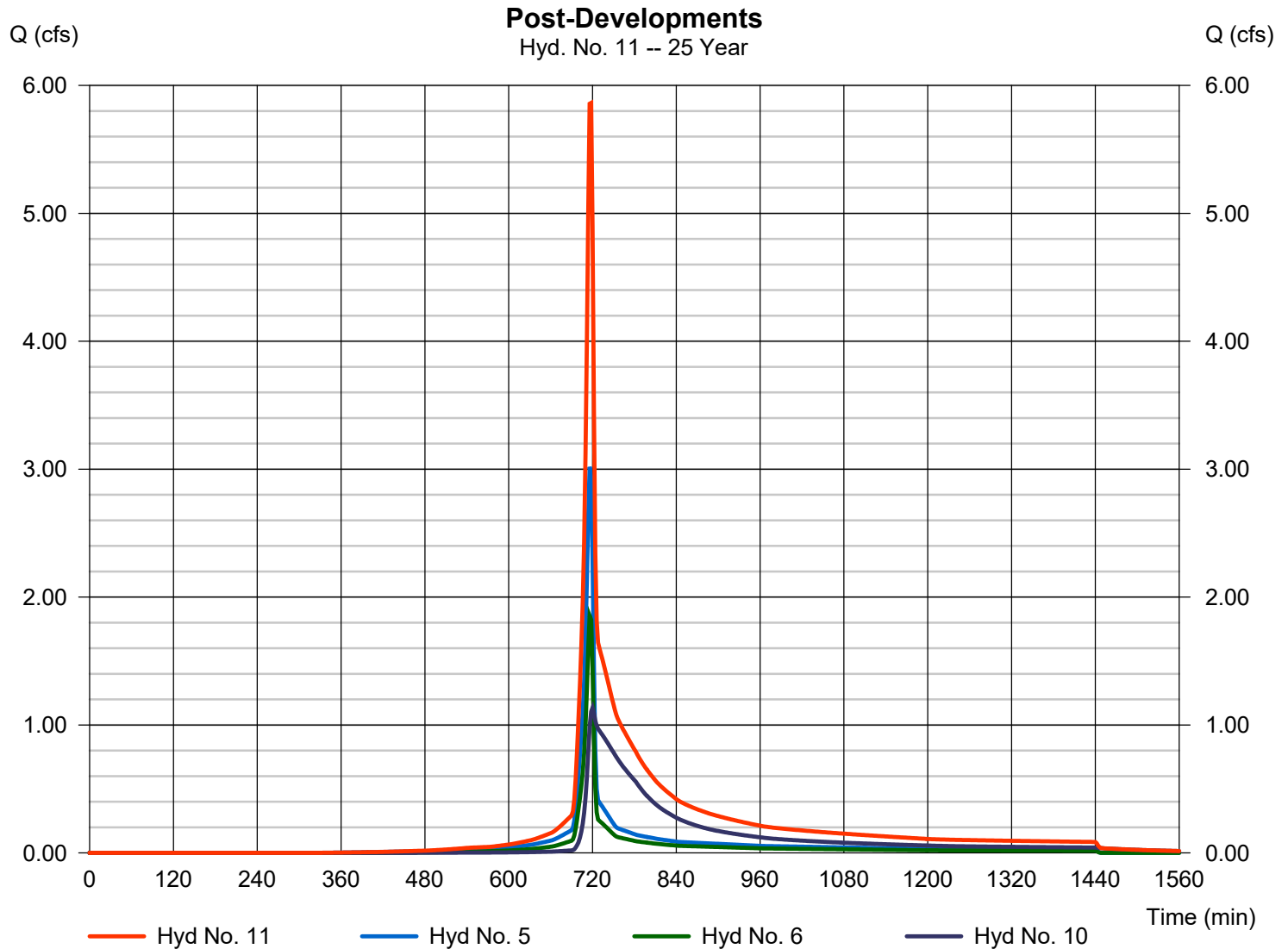
Friday, 03 / 31 / 2023

Hyd. No. 11

Post-Developments

Hydrograph type = Combine
 Storm frequency = 25 yrs
 Time interval = 2 min
 Inflow hyds. = 5, 6, 10

Peak discharge = 5.863 cfs
 Time to peak = 718 min
 Hyd. volume = 18,700 cuft
 Contrib. drain. area = 0.830 ac



Hydrograph Summary Report

Hydraflow Hydrographs Extension for Autodesk® Civil 3D® by Autodesk, Inc. v2023

Hyd. No.	Hydrograph type (origin)	Peak flow (cfs)	Time interval (min)	Time to Peak (min)	Hyd. volume (cuft)	Inflow hyd(s)	Maximum elevation (ft)	Total strge used (cuft)	Hydrograph Description
1	SCS Runoff	6.556	2	716	13,726	-----	-----	-----	Pre-Development Area A
2	SCS Runoff	2.295	2	716	4,719	-----	-----	-----	Pre-Development Area B
3	SCS Runoff	1.542	2	716	3,183	-----	-----	-----	Pre-Development Area C
4	Combine	10.39	2	716	21,628	1, 2, 3	-----	-----	Pre-Developments
5	SCS Runoff	3.492	2	716	7,310	-----	-----	-----	Post-Development Area A
6	SCS Runoff	2.179	2	716	4,465	-----	-----	-----	Post-Development Area B
7	SCS Runoff	0.449	2	716	919	-----	-----	-----	Post-Development Area C1
8	SCS Runoff	4.978	2	716	11,455	-----	-----	-----	Post-Development Area C2
9	Reservoir	1.144	2	724	9,238	8	659.49	6,368	Rout A
10	Combine	1.388	2	720	10,157	7, 9	-----	-----	Post-Development Area C
11	Combine	6.885	2	716	21,932	5, 6, 10	-----	-----	Post-Developments
271 Jefferson Pk.gpw					Return Period: 50 Year			Friday, 03 / 31 / 2023	

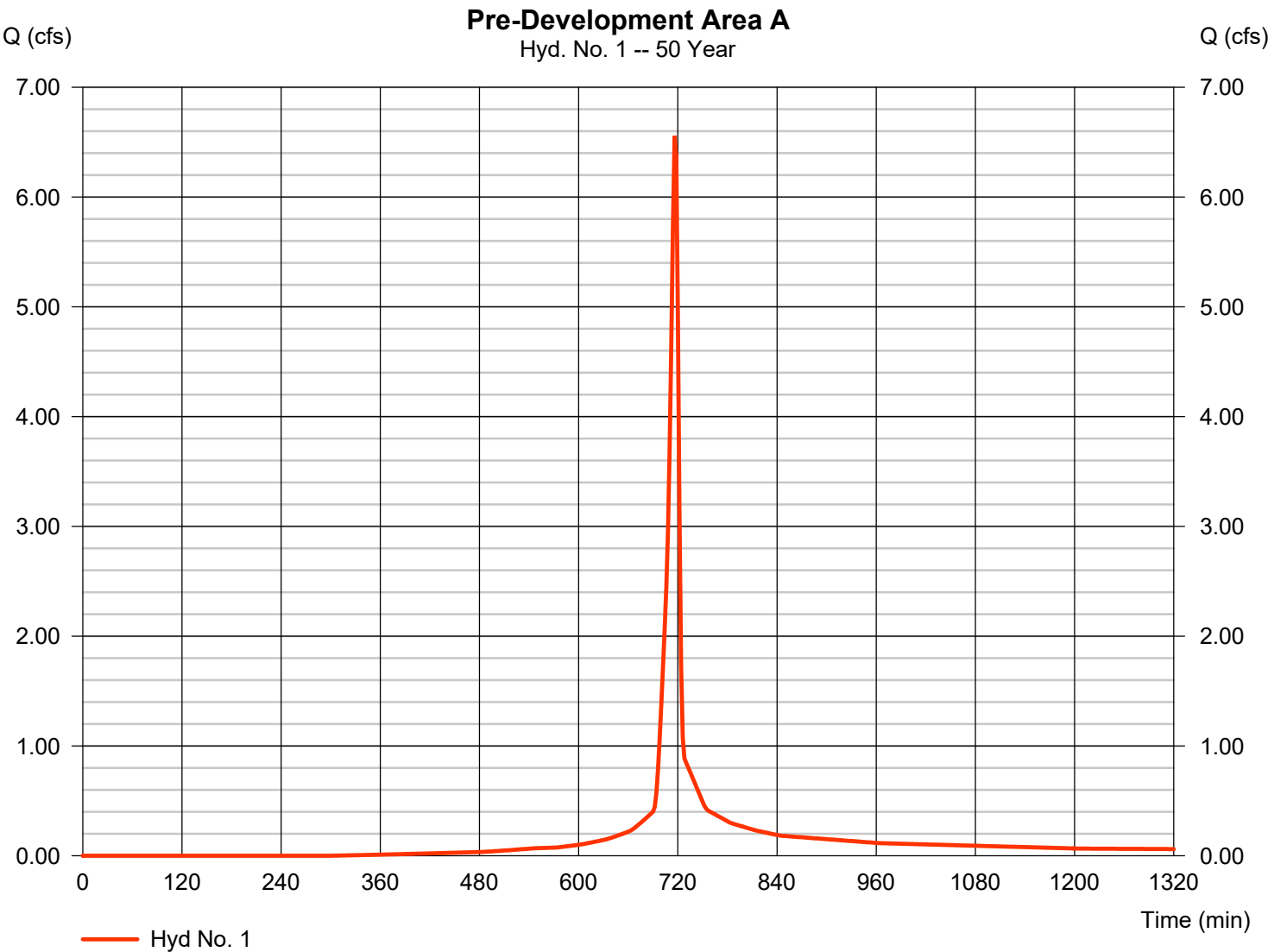
Hydrograph Report

Hyd. No. 1

Pre-Development Area A

Hydrograph type	=	SCS Runoff	Peak discharge	=	6.556 cfs
Storm frequency	=	50 yrs	Time to peak	=	716 min
Time interval	=	2 min	Hyd. volume	=	13,726 cuft
Drainage area	=	0.920 ac	Curve number	=	84*
Basin Slope	=	3.0 %	Hydraulic length	=	178 ft
Tc method	=	User	Time of conc. (Tc)	=	5.00 min
Total precip.	=	6.20 in	Distribution	=	Type II
Storm duration	=	24 hrs	Shape factor	=	484

* Composite (Area/CN) = [(0.090 x 98) + (0.280 x 89) + (0.550 x 79)] / 0.920



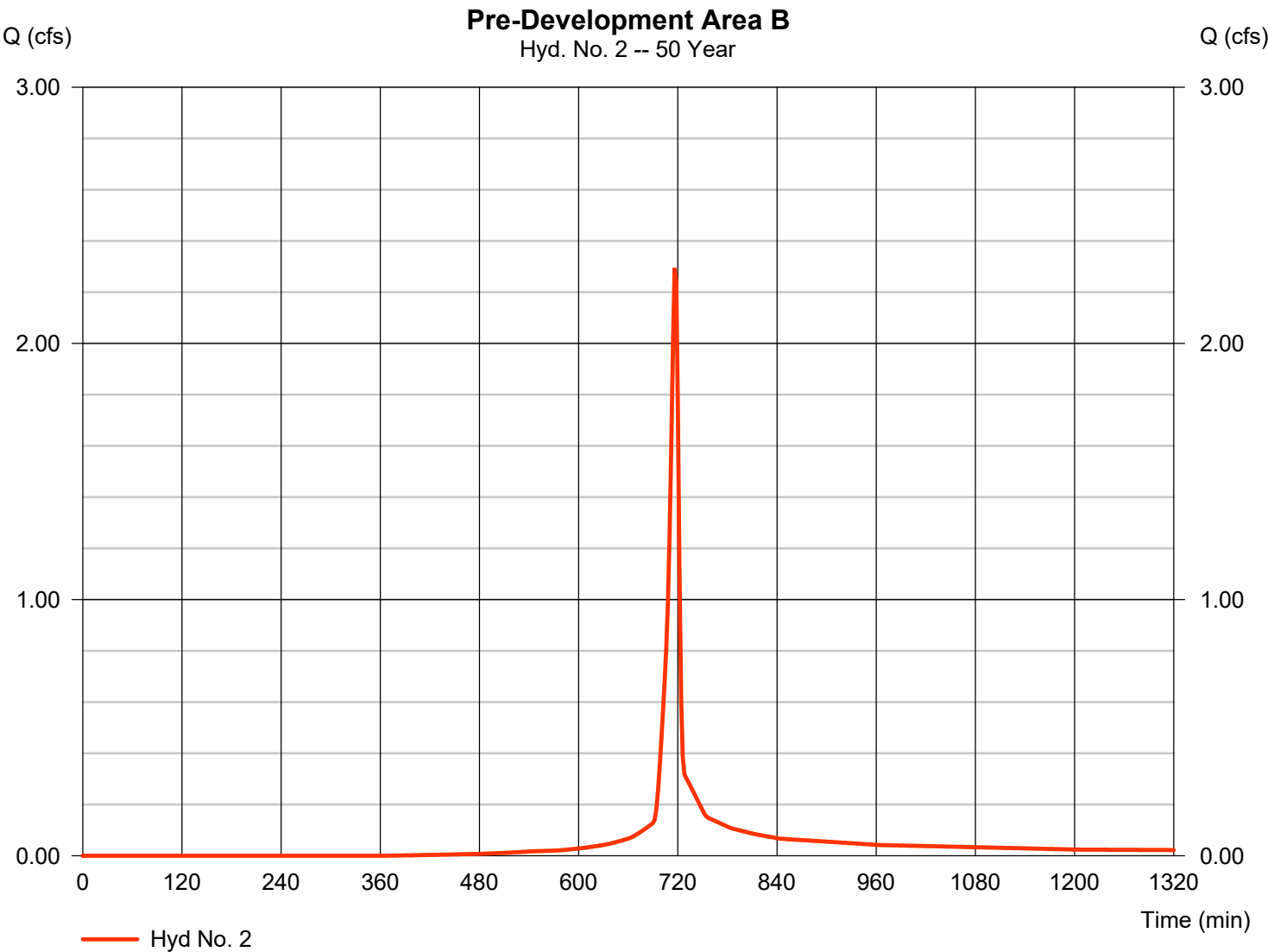
Hydrograph Report

Hyd. No. 2

Pre-Development Area B

Hydrograph type	=	SCS Runoff	Peak discharge	=	2.295 cfs
Storm frequency	=	50 yrs	Time to peak	=	716 min
Time interval	=	2 min	Hyd. volume	=	4,719 cuft
Drainage area	=	0.350 ac	Curve number	=	80*
Basin Slope	=	4.0 %	Hydraulic length	=	133 ft
Tc method	=	User	Time of conc. (Tc)	=	5.00 min
Total precip.	=	6.20 in	Distribution	=	Type II
Storm duration	=	24 hrs	Shape factor	=	484

* Composite (Area/CN) = + (0.040 x 89) + (0.310 x 79)] / 0.350



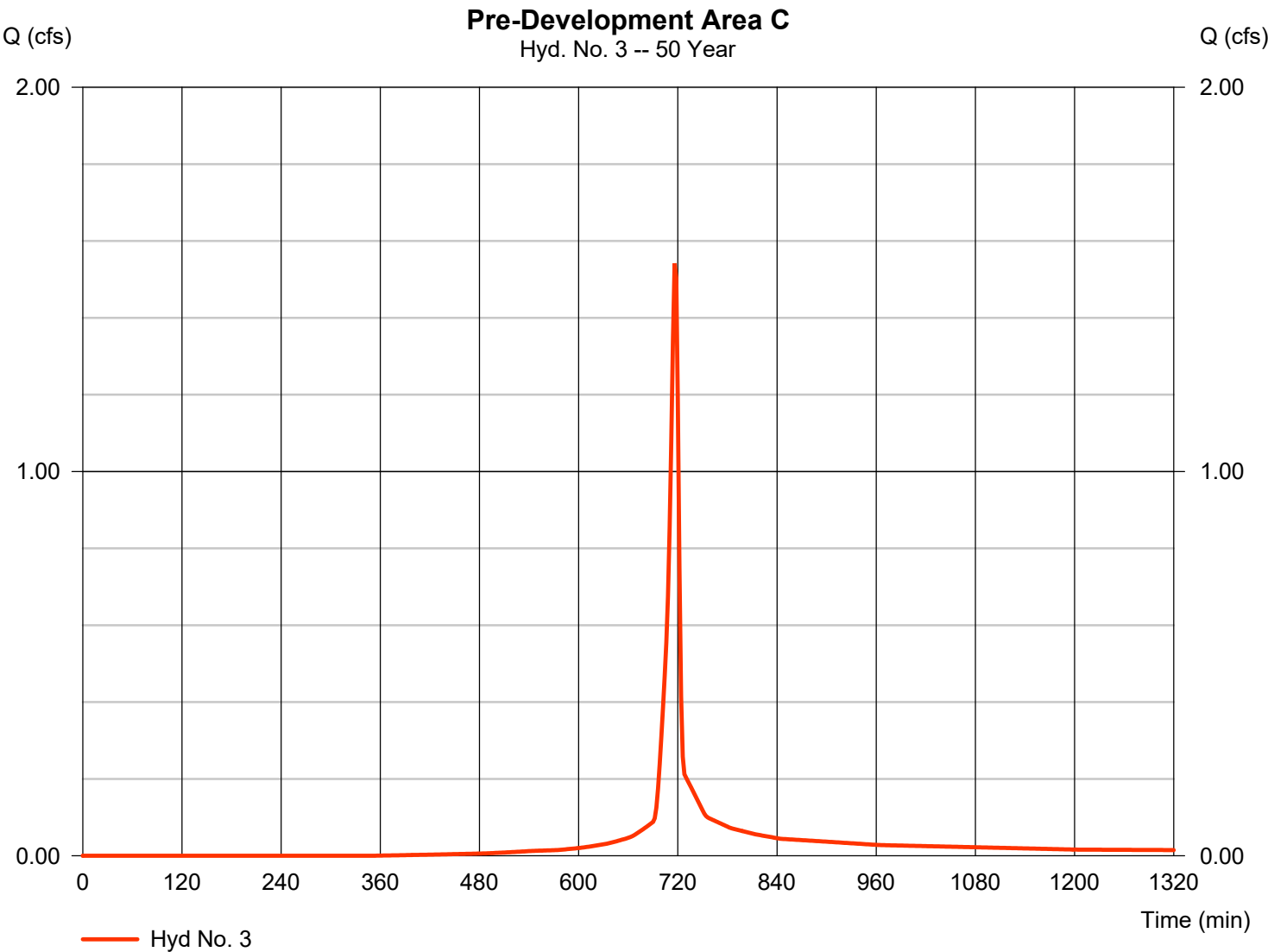
Hydrograph Report

Hyd. No. 3

Pre-Development Area C

Hydrograph type	= SCS Runoff	Peak discharge	= 1.542 cfs
Storm frequency	= 50 yrs	Time to peak	= 716 min
Time interval	= 2 min	Hyd. volume	= 3,183 cuft
Drainage area	= 0.230 ac	Curve number	= 81*
Basin Slope	= 3.0 %	Hydraulic length	= 115 ft
Tc method	= User	Time of conc. (Tc)	= 5.00 min
Total precip.	= 6.20 in	Distribution	= Type II
Storm duration	= 24 hrs	Shape factor	= 484

* Composite (Area/CN) = + (0.040 x 89) + (0.190 x 79)] / 0.230

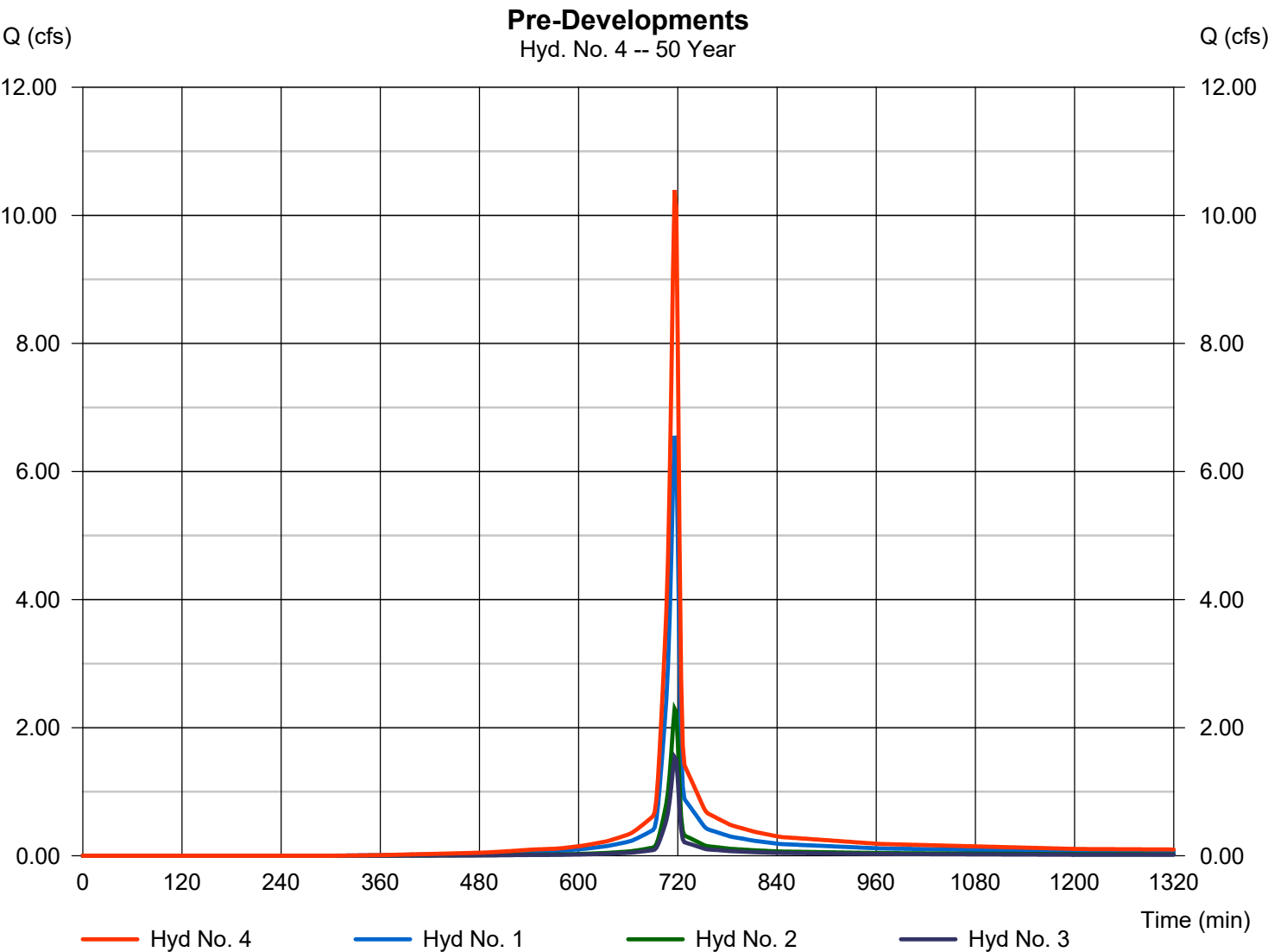


Hydrograph Report

Hyd. No. 4

Pre-Developments

Hydrograph type	= Combine	Peak discharge	= 10.39 cfs
Storm frequency	= 50 yrs	Time to peak	= 716 min
Time interval	= 2 min	Hyd. volume	= 21,628 cuft
Inflow hyds.	= 1, 2, 3	Contrib. drain. area	= 1.500 ac



Hydrograph Report

Hydraflow Hydrographs Extension for Autodesk® Civil 3D® by Autodesk, Inc. v2023

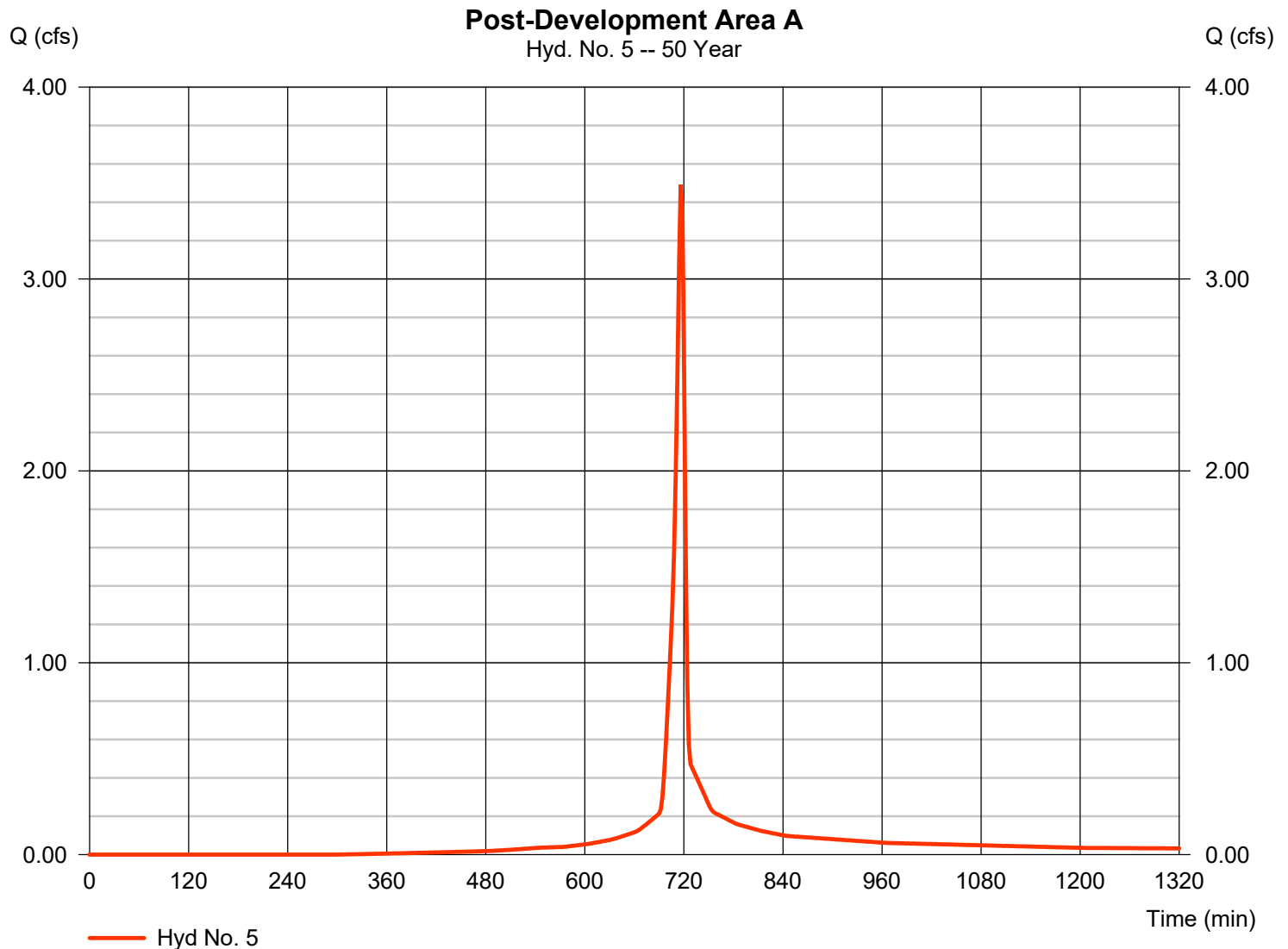
Friday, 03 / 31 / 2023

Hyd. No. 5

Post-Development Area A

Hydrograph type	= SCS Runoff	Peak discharge	= 3.492 cfs
Storm frequency	= 50 yrs	Time to peak	= 716 min
Time interval	= 2 min	Hyd. volume	= 7,310 cuft
Drainage area	= 0.490 ac	Curve number	= 84*
Basin Slope	= 3.0 %	Hydraulic length	= 178 ft
Tc method	= User	Time of conc. (Tc)	= 5.00 min
Total precip.	= 6.20 in	Distribution	= Type II
Storm duration	= 24 hrs	Shape factor	= 484

* Composite (Area/CN) = $[(0.130 \times 98) + (0.360 \times 79)] / 0.490$



Hydrograph Report

Hydraflow Hydrographs Extension for Autodesk® Civil 3D® by Autodesk, Inc. v2023

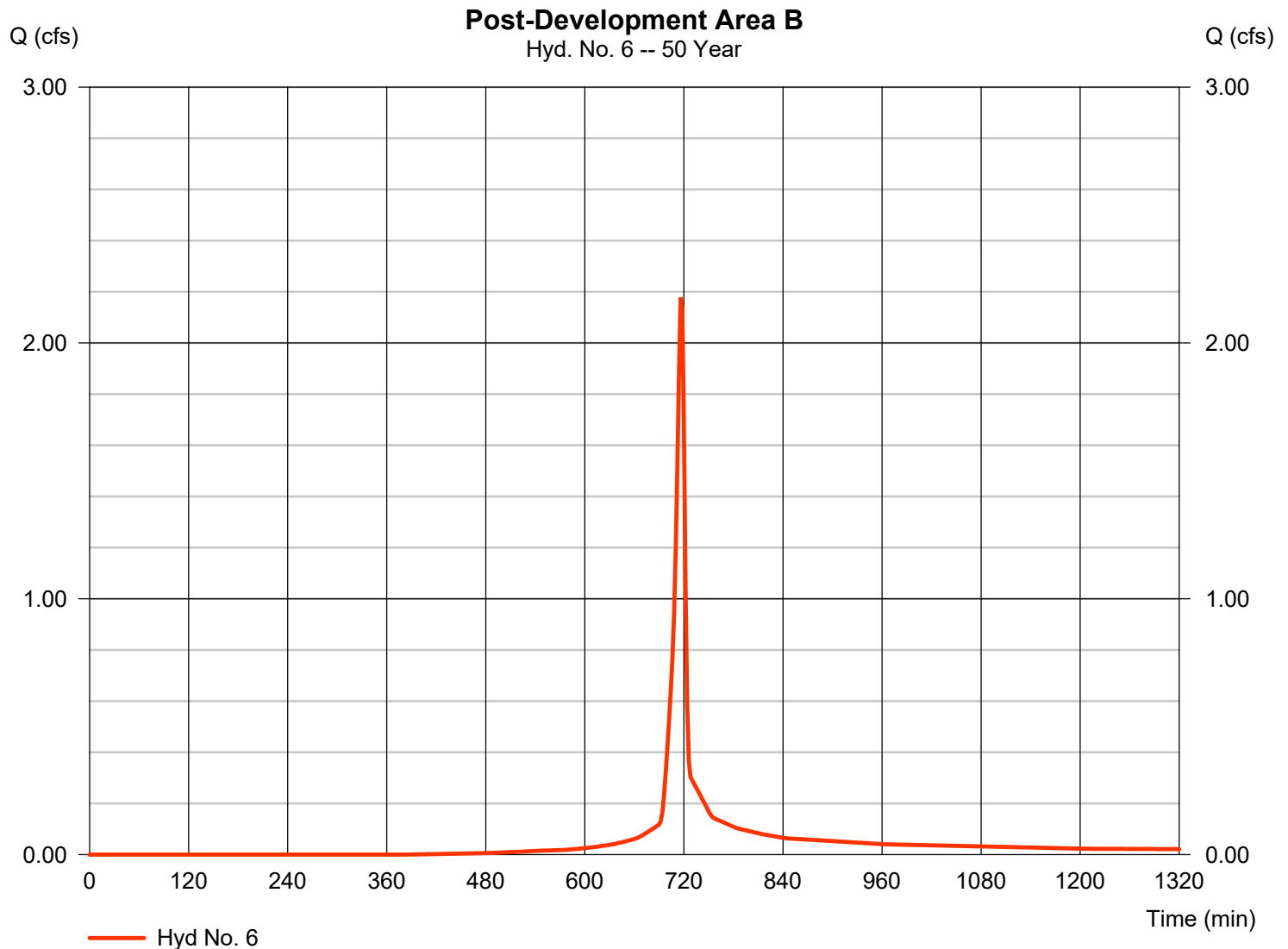
Friday, 03 / 31 / 2023

Hyd. No. 6

Post-Development Area B

Hydrograph type	= SCS Runoff	Peak discharge	= 2.179 cfs
Storm frequency	= 50 yrs	Time to peak	= 716 min
Time interval	= 2 min	Hyd. volume	= 4,465 cuft
Drainage area	= 0.340 ac	Curve number	= 79*
Basin Slope	= 4.0 %	Hydraulic length	= 133 ft
Tc method	= User	Time of conc. (Tc)	= 5.00 min
Total precip.	= 6.20 in	Distribution	= Type II
Storm duration	= 24 hrs	Shape factor	= 484

* Composite (Area/CN) = $[(0.340 \times 79)] / 0.340$



Hydrograph Report

Hydraflow Hydrographs Extension for Autodesk® Civil 3D® by Autodesk, Inc. v2023

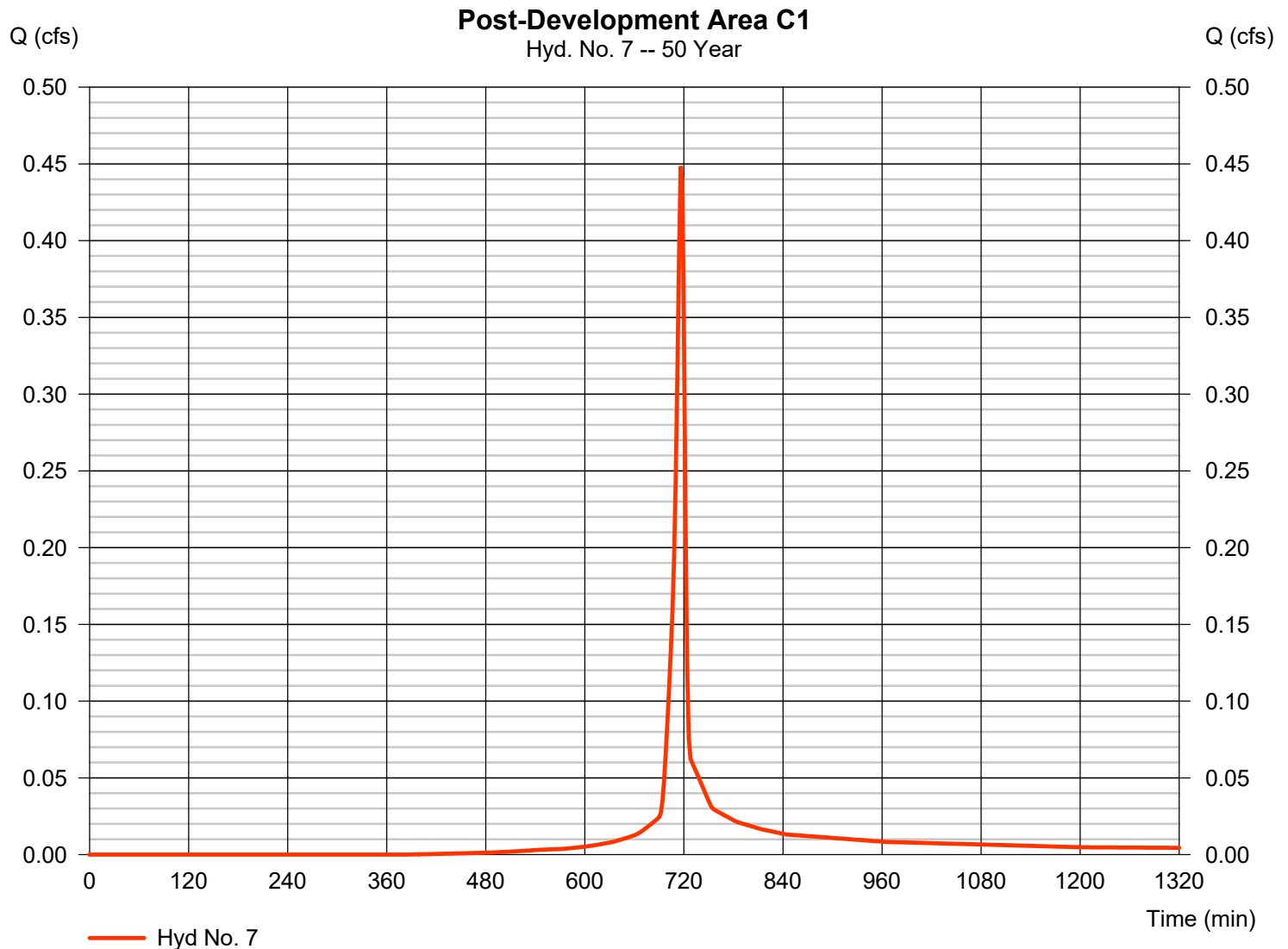
Friday, 03 / 31 / 2023

Hyd. No. 7

Post-Development Area C1

Hydrograph type	= SCS Runoff	Peak discharge	= 0.449 cfs
Storm frequency	= 50 yrs	Time to peak	= 716 min
Time interval	= 2 min	Hyd. volume	= 919 cuft
Drainage area	= 0.070 ac	Curve number	= 79*
Basin Slope	= 3.0 %	Hydraulic length	= 115 ft
Tc method	= User	Time of conc. (Tc)	= 5.00 min
Total precip.	= 6.20 in	Distribution	= Type II
Storm duration	= 24 hrs	Shape factor	= 484

* Composite (Area/CN) = $[(0.070 \times 79)] / 0.070$



Hydrograph Report

Hydraflow Hydrographs Extension for Autodesk® Civil 3D® by Autodesk, Inc. v2023

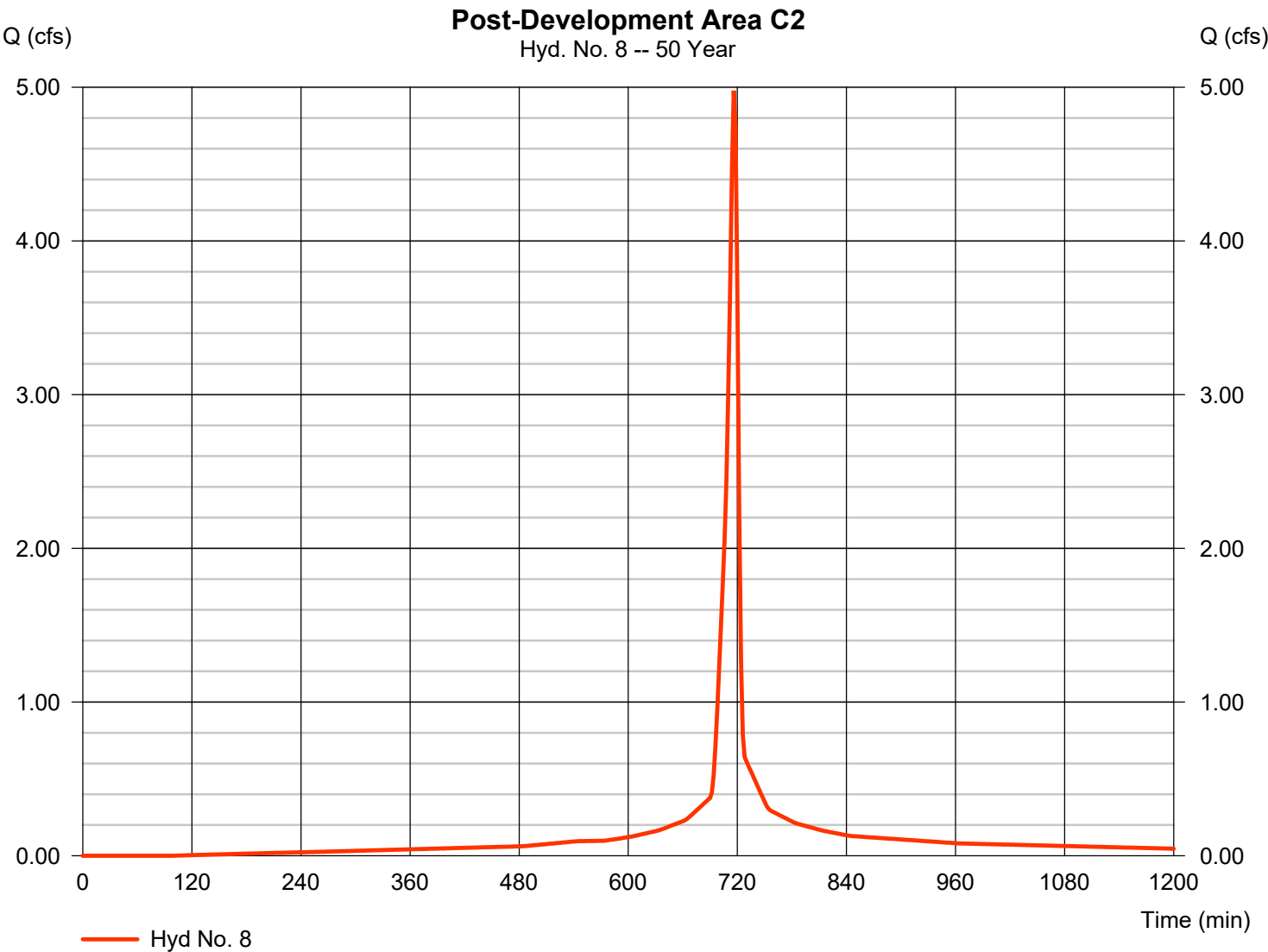
Friday, 03 / 31 / 2023

Hyd. No. 8

Post-Development Area C2

Hydrograph type	=	SCS Runoff	Peak discharge	=	4.978 cfs
Storm frequency	=	50 yrs	Time to peak	=	716 min
Time interval	=	2 min	Hyd. volume	=	11,455 cuft
Drainage area	=	0.600 ac	Curve number	=	95*
Basin Slope	=	1.0 %	Hydraulic length	=	450 ft
Tc method	=	User	Time of conc. (Tc)	=	5.00 min
Total precip.	=	6.20 in	Distribution	=	Type II
Storm duration	=	24 hrs	Shape factor	=	484

* Composite (Area/CN) = [(0.520 x 98) + (0.080 x 79)] / 0.600



Hydrograph Report

Hydraflow Hydrographs Extension for Autodesk® Civil 3D® by Autodesk, Inc. v2023

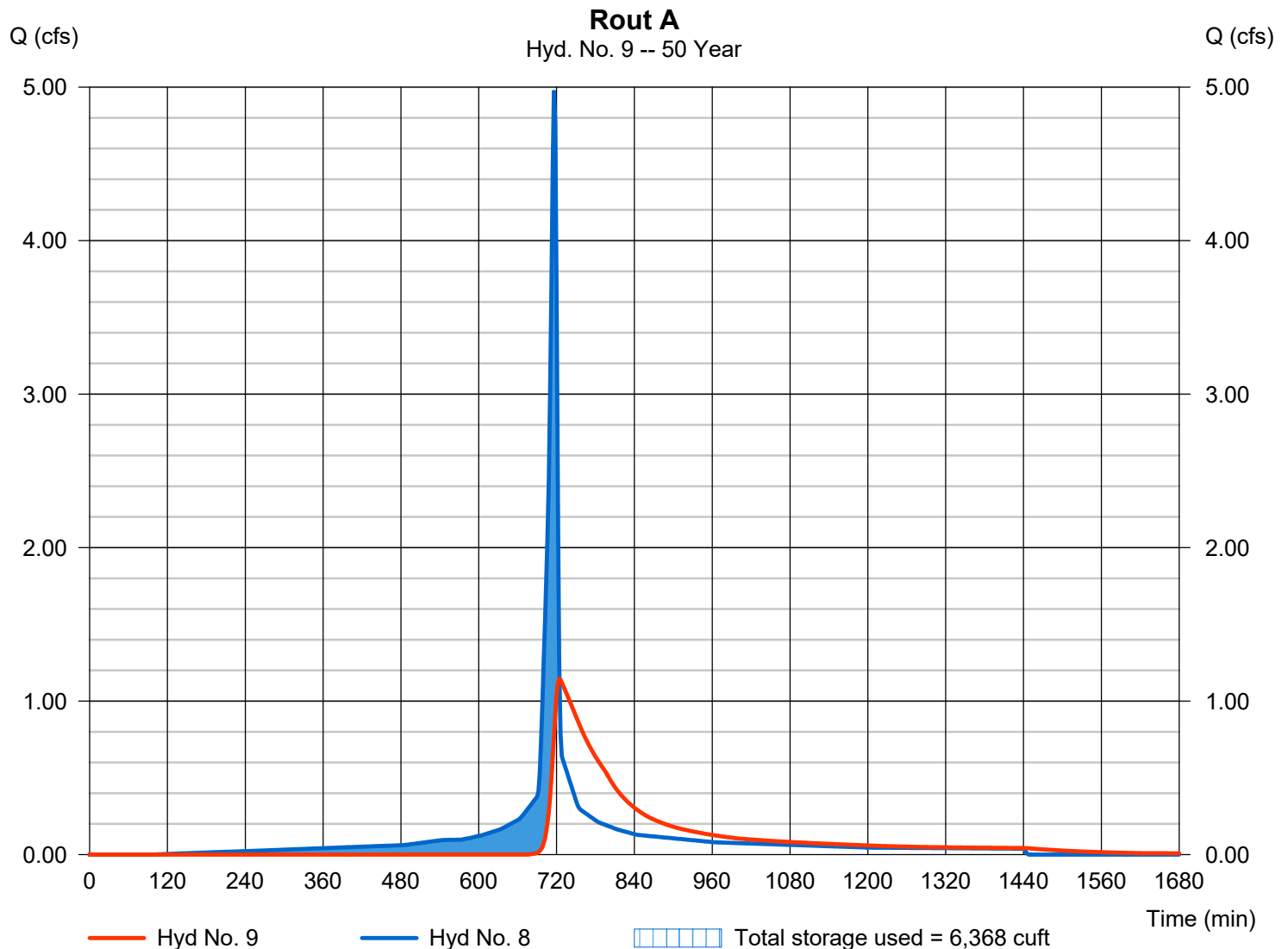
Friday, 03 / 31 / 2023

Hyd. No. 9

Rout A

Hydrograph type	= Reservoir	Peak discharge	= 1.144 cfs
Storm frequency	= 50 yrs	Time to peak	= 724 min
Time interval	= 2 min	Hyd. volume	= 9,238 cuft
Inflow hyd. No.	= 8 - Post-Development Area C2	Max. Elevation	= 659.49 ft
Reservoir name	= Pond A	Max. Storage	= 6,368 cuft

Storage Indication method used.



Hydrograph Report

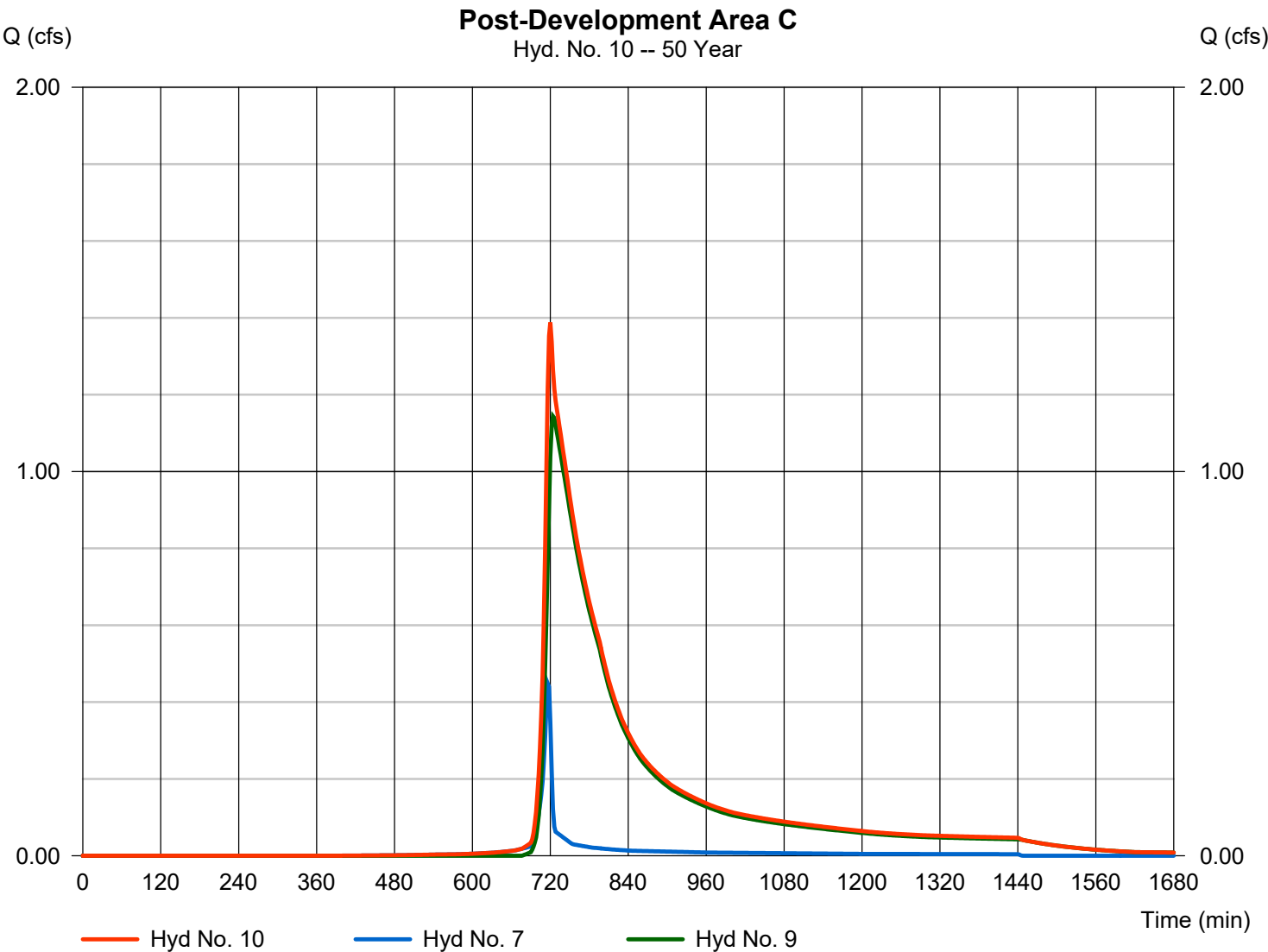
Hydraflow Hydrographs Extension for Autodesk® Civil 3D® by Autodesk, Inc. v2023

Friday, 03 / 31 / 2023

Hyd. No. 10

Post-Development Area C

Hydrograph type	= Combine	Peak discharge	= 1.388 cfs
Storm frequency	= 50 yrs	Time to peak	= 720 min
Time interval	= 2 min	Hyd. volume	= 10,157 cuft
Inflow hyds.	= 7, 9	Contrib. drain. area	= 0.070 ac

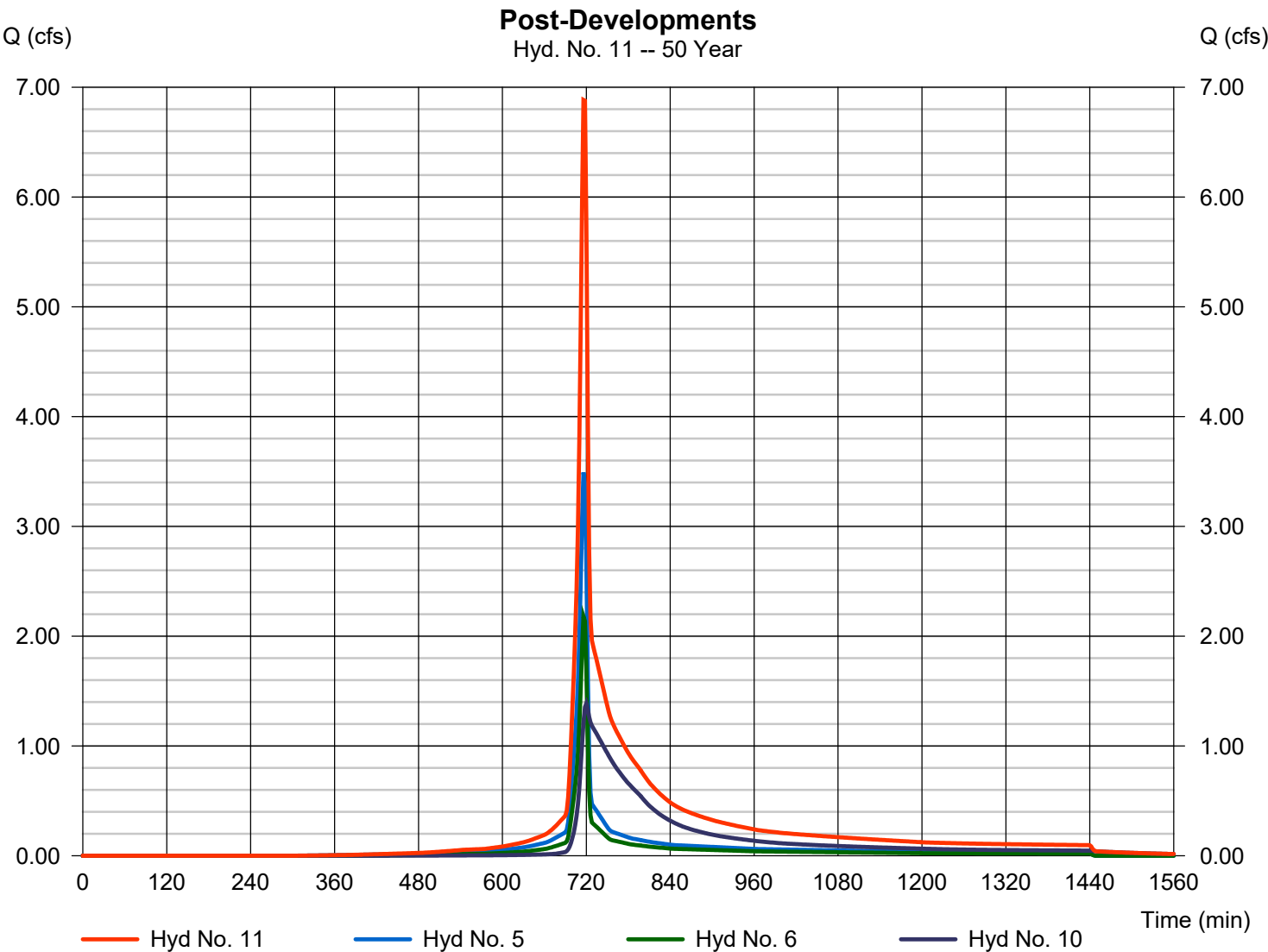


Hydrograph Report

Hyd. No. 11

Post-Developments

Hydrograph type	= Combine	Peak discharge	= 6.885 cfs
Storm frequency	= 50 yrs	Time to peak	= 716 min
Time interval	= 2 min	Hyd. volume	= 21,932 cuft
Inflow hyds.	= 5, 6, 10	Contrib. drain. area	= 0.830 ac



Hydrograph Summary Report

Hydraflow Hydrographs Extension for Autodesk® Civil 3D® by Autodesk, Inc. v2023

Hyd. No.	Hydrograph type (origin)	Peak flow (cfs)	Time interval (min)	Time to Peak (min)	Hyd. volume (cuft)	Inflow hyd(s)	Maximum elevation (ft)	Total strge used (cuft)	Hydrograph Description
1	SCS Runoff	7.473	2	716	15,766	-----	-----	-----	Pre-Development Area A
2	SCS Runoff	2.643	2	716	5,471	-----	-----	-----	Pre-Development Area B
3	SCS Runoff	1.771	2	716	3,681	-----	-----	-----	Pre-Development Area C
4	Combine	11.89	2	716	24,917	1, 2, 3	-----	-----	Pre-Developments
5	SCS Runoff	3.980	2	716	8,397	-----	-----	-----	Post-Development Area A
6	SCS Runoff	2.516	2	716	5,188	-----	-----	-----	Post-Development Area B
7	SCS Runoff	0.518	2	716	1,068	-----	-----	-----	Post-Development Area C1
8	SCS Runoff	5.552	2	716	12,856	-----	-----	-----	Post-Development Area C2
9	Reservoir	1.366	2	724	10,638	8	659.64	6,999	Rout A
10	Combine	1.650	2	720	11,706	7, 9	-----	-----	Post-Development Area C
11	Combine	7.945	2	716	25,291	5, 6, 10	-----	-----	Post-Developments
271 Jefferson Pk.gpw					Return Period: 100 Year			Friday, 03 / 31 / 2023	

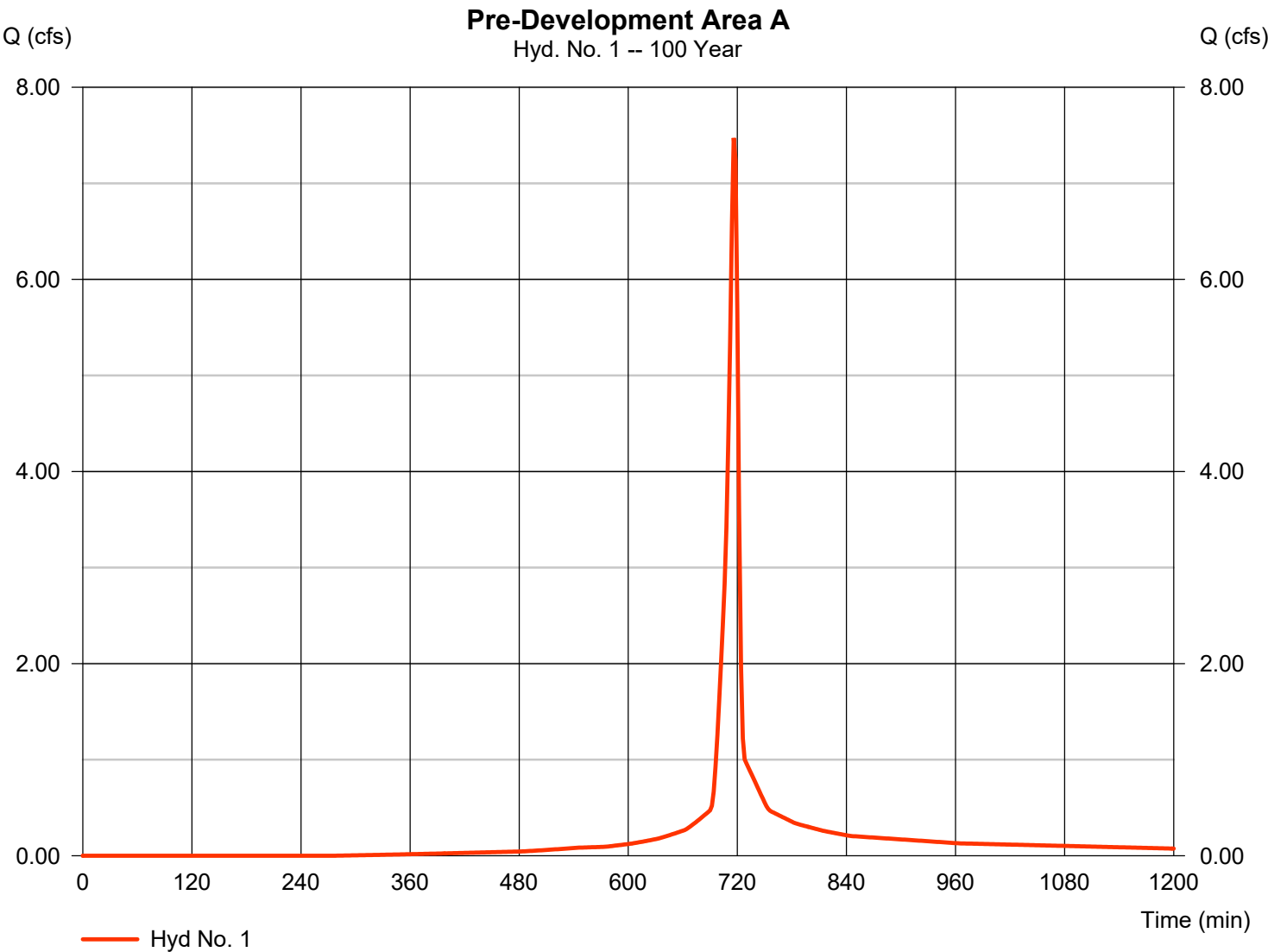
Hydrograph Report

Hyd. No. 1

Pre-Development Area A

Hydrograph type	=	SCS Runoff	Peak discharge	=	7.473 cfs
Storm frequency	=	100 yrs	Time to peak	=	716 min
Time interval	=	2 min	Hyd. volume	=	15,766 cuft
Drainage area	=	0.920 ac	Curve number	=	84*
Basin Slope	=	3.0 %	Hydraulic length	=	178 ft
Tc method	=	User	Time of conc. (Tc)	=	5.00 min
Total precip.	=	6.89 in	Distribution	=	Type II
Storm duration	=	24 hrs	Shape factor	=	484

* Composite (Area/CN) = [(0.090 x 98) + (0.280 x 89) + (0.550 x 79)] / 0.920



Hydrograph Report

Hydraflow Hydrographs Extension for Autodesk® Civil 3D® by Autodesk, Inc. v2023

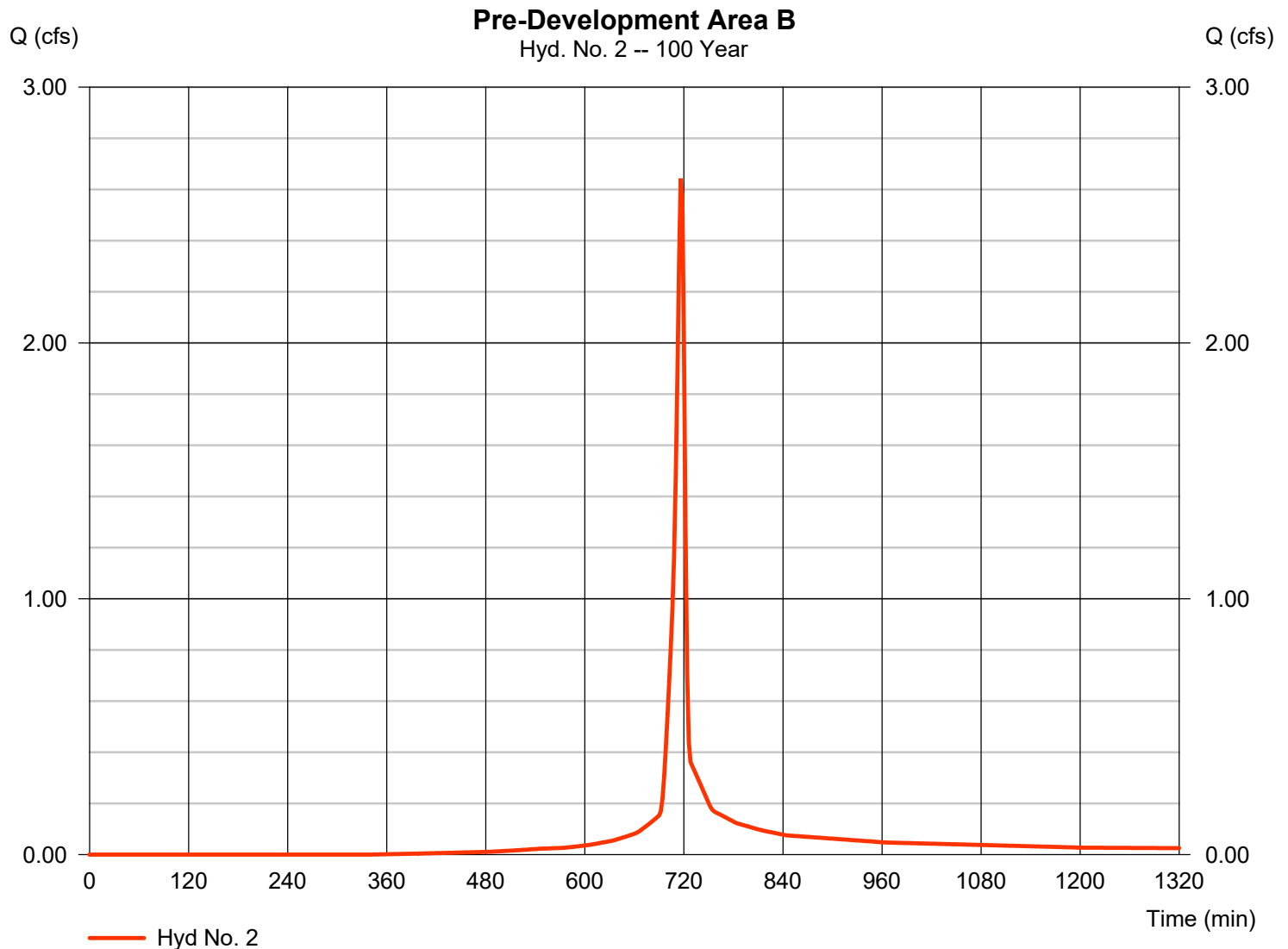
Friday, 03 / 31 / 2023

Hyd. No. 2

Pre-Development Area B

Hydrograph type	= SCS Runoff	Peak discharge	= 2.643 cfs
Storm frequency	= 100 yrs	Time to peak	= 716 min
Time interval	= 2 min	Hyd. volume	= 5,471 cuft
Drainage area	= 0.350 ac	Curve number	= 80*
Basin Slope	= 4.0 %	Hydraulic length	= 133 ft
Tc method	= User	Time of conc. (Tc)	= 5.00 min
Total precip.	= 6.89 in	Distribution	= Type II
Storm duration	= 24 hrs	Shape factor	= 484

* Composite (Area/CN) = + (0.040 x 89) + (0.310 x 79)] / 0.350



Hydrograph Report

Hydraflow Hydrographs Extension for Autodesk® Civil 3D® by Autodesk, Inc. v2023

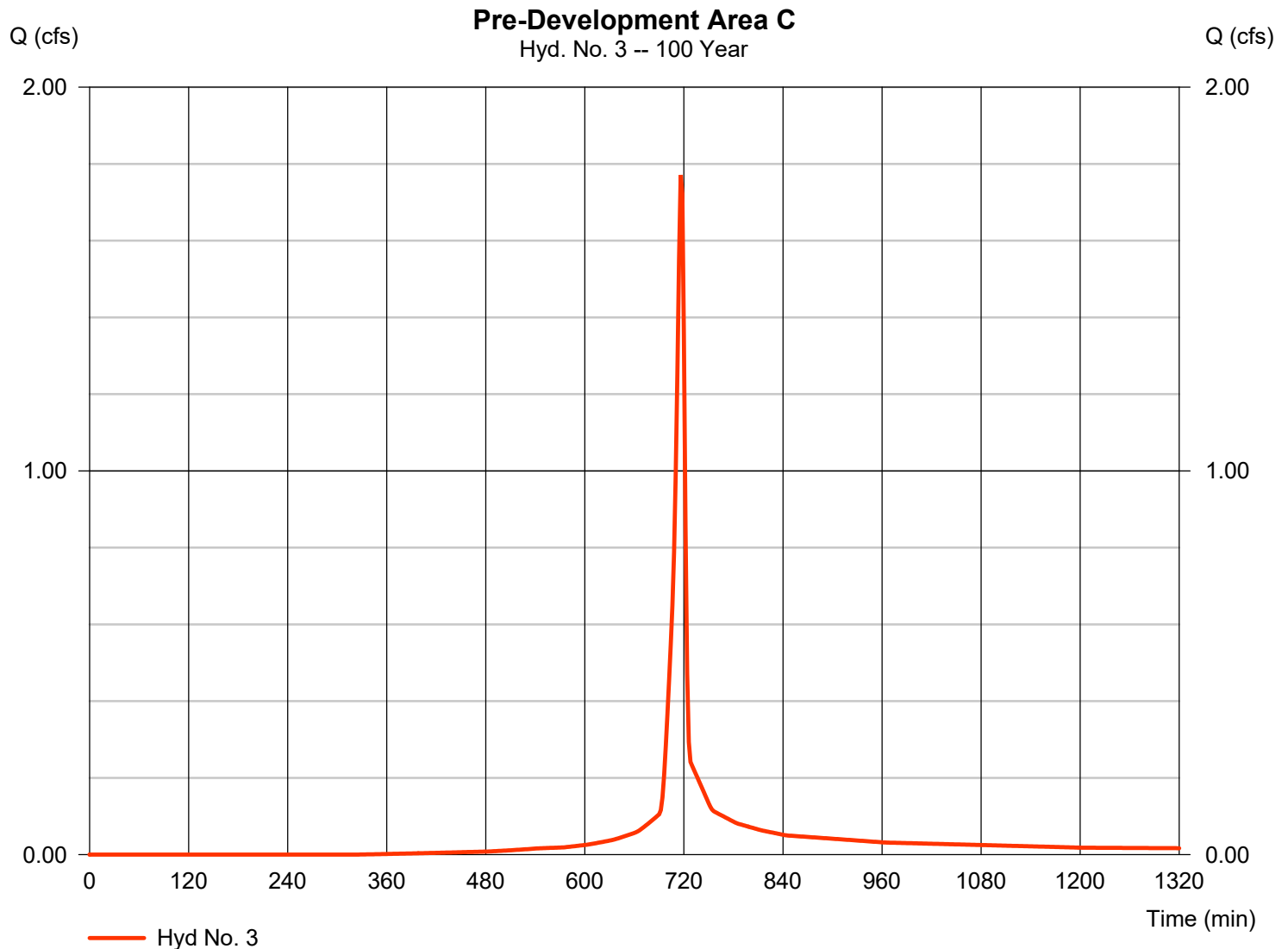
Friday, 03 / 31 / 2023

Hyd. No. 3

Pre-Development Area C

Hydrograph type	= SCS Runoff	Peak discharge	= 1.771 cfs
Storm frequency	= 100 yrs	Time to peak	= 716 min
Time interval	= 2 min	Hyd. volume	= 3,681 cuft
Drainage area	= 0.230 ac	Curve number	= 81*
Basin Slope	= 3.0 %	Hydraulic length	= 115 ft
Tc method	= User	Time of conc. (Tc)	= 5.00 min
Total precip.	= 6.89 in	Distribution	= Type II
Storm duration	= 24 hrs	Shape factor	= 484

* Composite (Area/CN) = + (0.040 x 89) + (0.190 x 79)] / 0.230

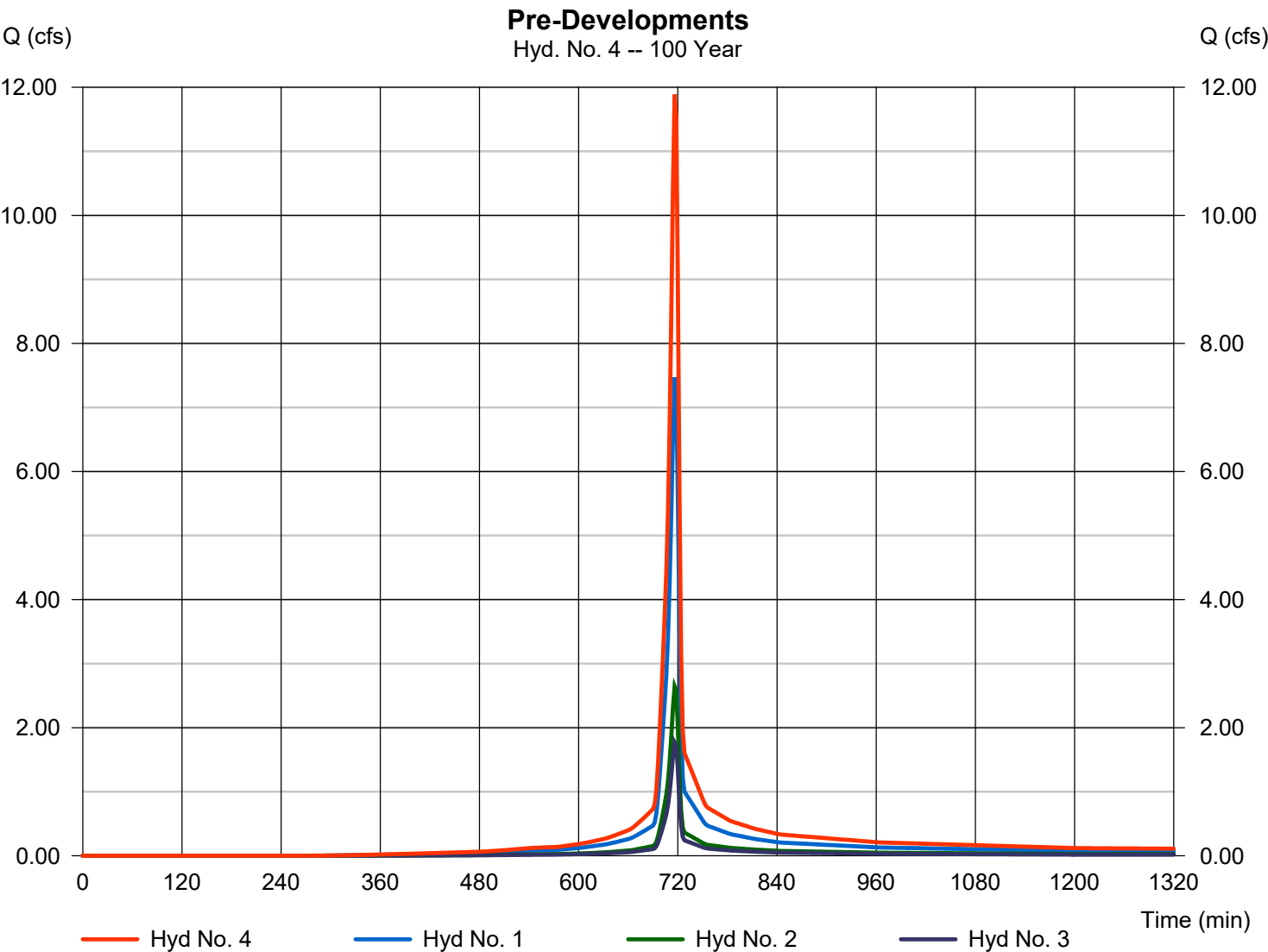


Hydrograph Report

Hyd. No. 4

Pre-Developments

Hydrograph type	= Combine	Peak discharge	= 11.89 cfs
Storm frequency	= 100 yrs	Time to peak	= 716 min
Time interval	= 2 min	Hyd. volume	= 24,917 cuft
Inflow hyds.	= 1, 2, 3	Contrib. drain. area	= 1.500 ac



Hydrograph Report

Hydraflow Hydrographs Extension for Autodesk® Civil 3D® by Autodesk, Inc. v2023

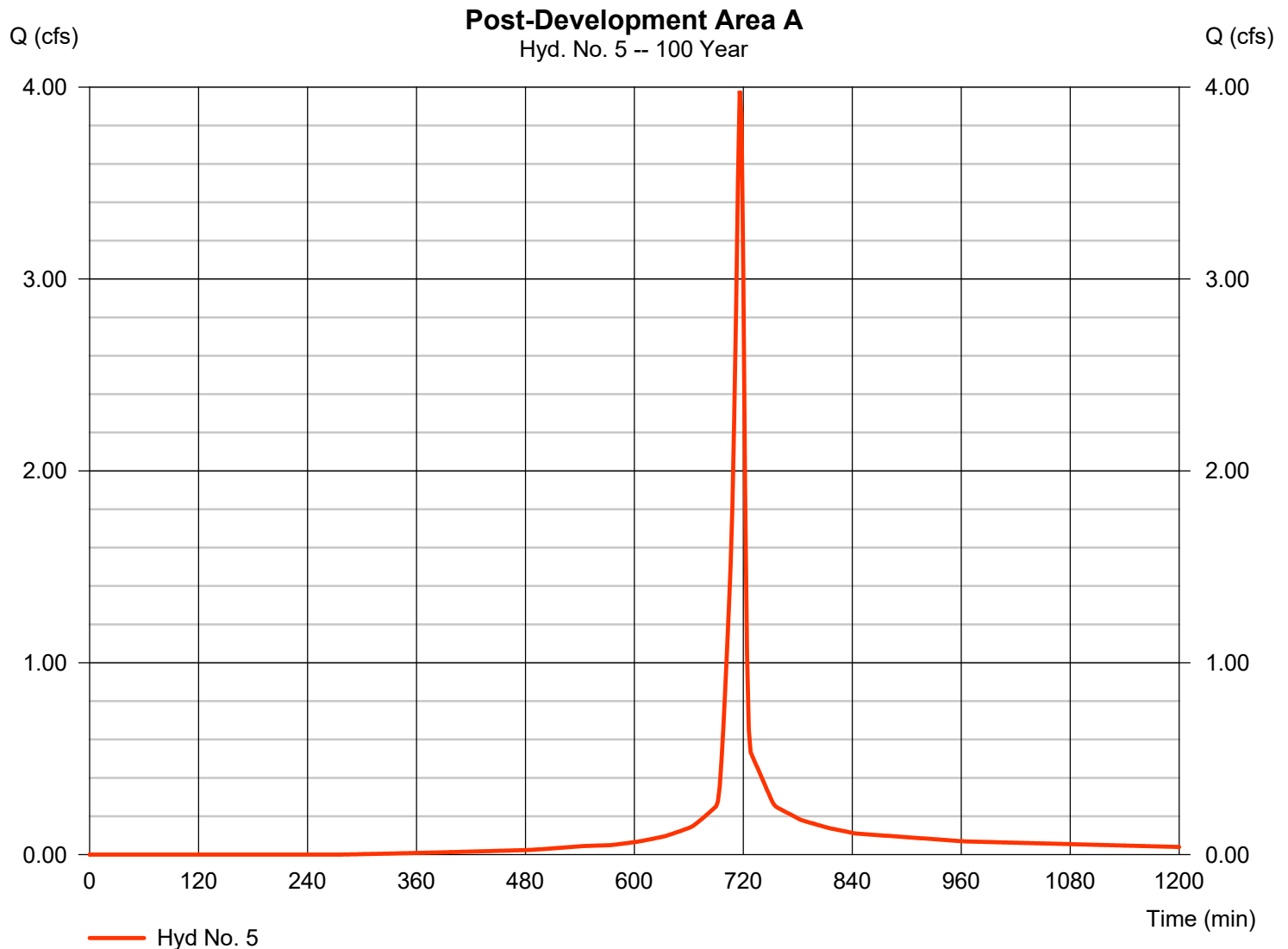
Friday, 03 / 31 / 2023

Hyd. No. 5

Post-Development Area A

Hydrograph type	= SCS Runoff	Peak discharge	= 3.980 cfs
Storm frequency	= 100 yrs	Time to peak	= 716 min
Time interval	= 2 min	Hyd. volume	= 8,397 cuft
Drainage area	= 0.490 ac	Curve number	= 84*
Basin Slope	= 3.0 %	Hydraulic length	= 178 ft
Tc method	= User	Time of conc. (Tc)	= 5.00 min
Total precip.	= 6.89 in	Distribution	= Type II
Storm duration	= 24 hrs	Shape factor	= 484

* Composite (Area/CN) = $[(0.130 \times 98) + (0.360 \times 79)] / 0.490$



Hydrograph Report

Hydraflow Hydrographs Extension for Autodesk® Civil 3D® by Autodesk, Inc. v2023

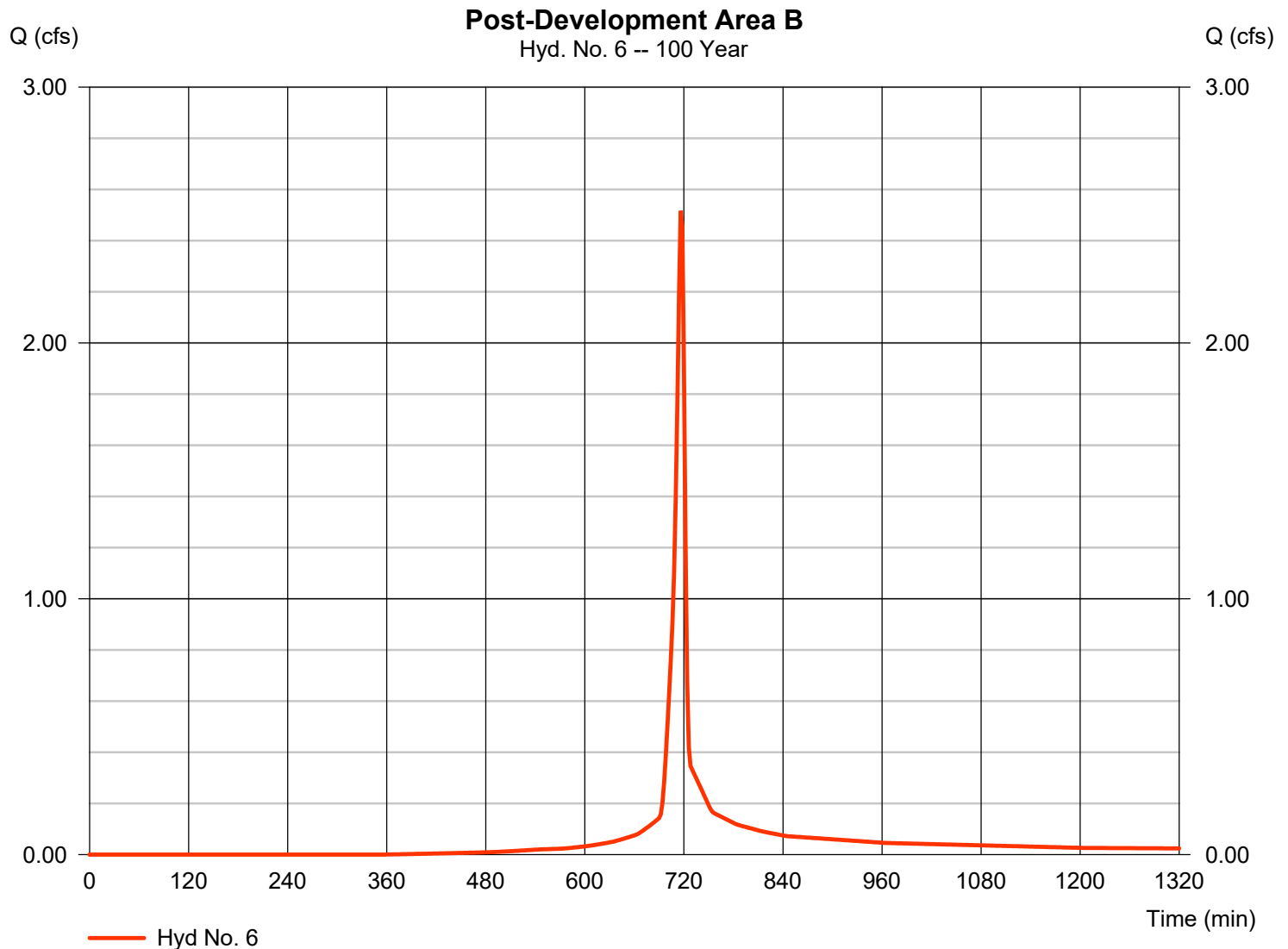
Friday, 03 / 31 / 2023

Hyd. No. 6

Post-Development Area B

Hydrograph type	= SCS Runoff	Peak discharge	= 2.516 cfs
Storm frequency	= 100 yrs	Time to peak	= 716 min
Time interval	= 2 min	Hyd. volume	= 5,188 cuft
Drainage area	= 0.340 ac	Curve number	= 79*
Basin Slope	= 4.0 %	Hydraulic length	= 133 ft
Tc method	= User	Time of conc. (Tc)	= 5.00 min
Total precip.	= 6.89 in	Distribution	= Type II
Storm duration	= 24 hrs	Shape factor	= 484

* Composite (Area/CN) = $[(0.340 \times 79)] / 0.340$



Hydrograph Report

Hydraflow Hydrographs Extension for Autodesk® Civil 3D® by Autodesk, Inc. v2023

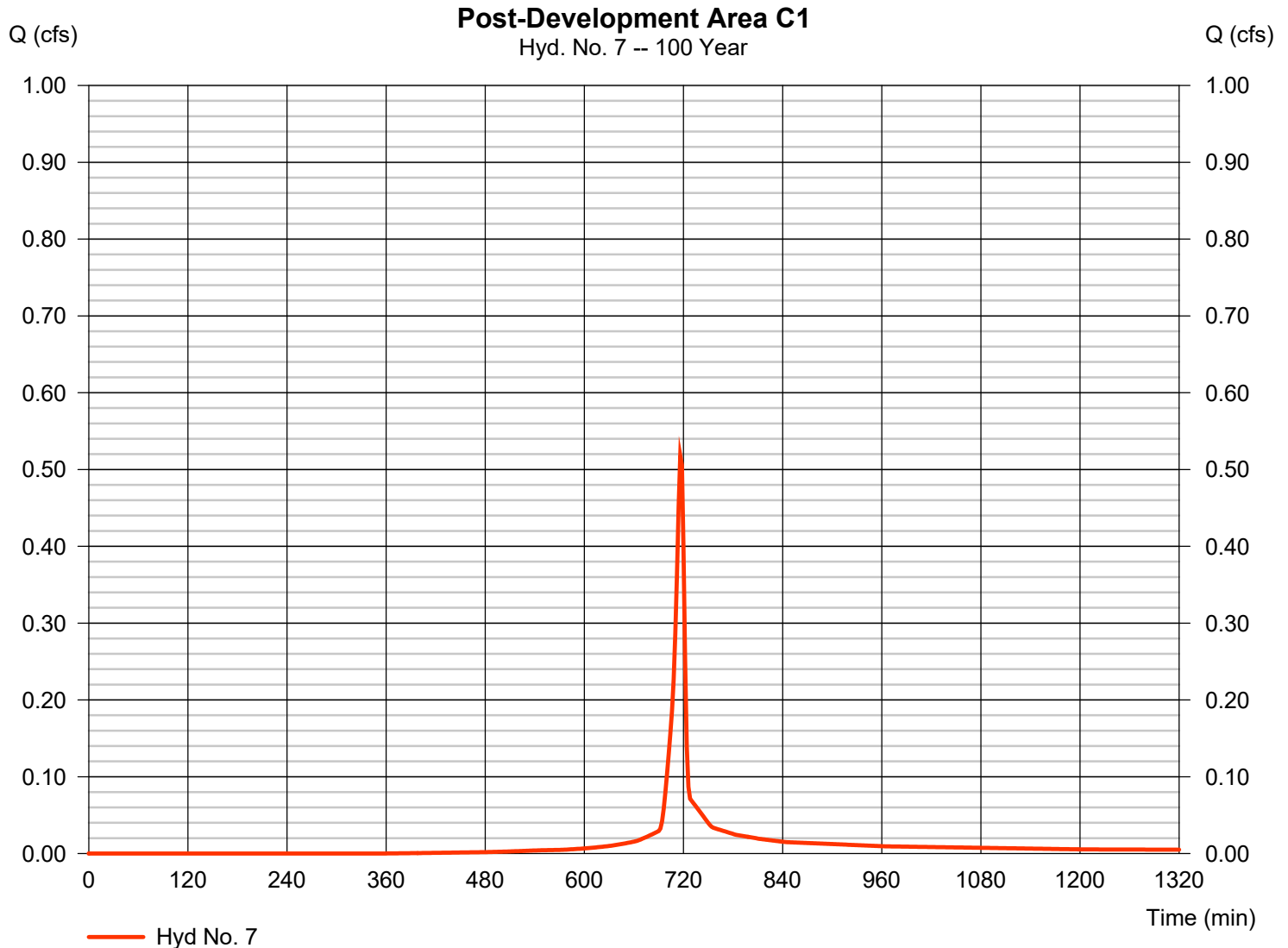
Friday, 03 / 31 / 2023

Hyd. No. 7

Post-Development Area C1

Hydrograph type	= SCS Runoff	Peak discharge	= 0.518 cfs
Storm frequency	= 100 yrs	Time to peak	= 716 min
Time interval	= 2 min	Hyd. volume	= 1,068 cuft
Drainage area	= 0.070 ac	Curve number	= 79*
Basin Slope	= 3.0 %	Hydraulic length	= 115 ft
Tc method	= User	Time of conc. (Tc)	= 5.00 min
Total precip.	= 6.89 in	Distribution	= Type II
Storm duration	= 24 hrs	Shape factor	= 484

* Composite (Area/CN) = $[(0.070 \times 79)] / 0.070$



Hydrograph Report

Hydraflow Hydrographs Extension for Autodesk® Civil 3D® by Autodesk, Inc. v2023

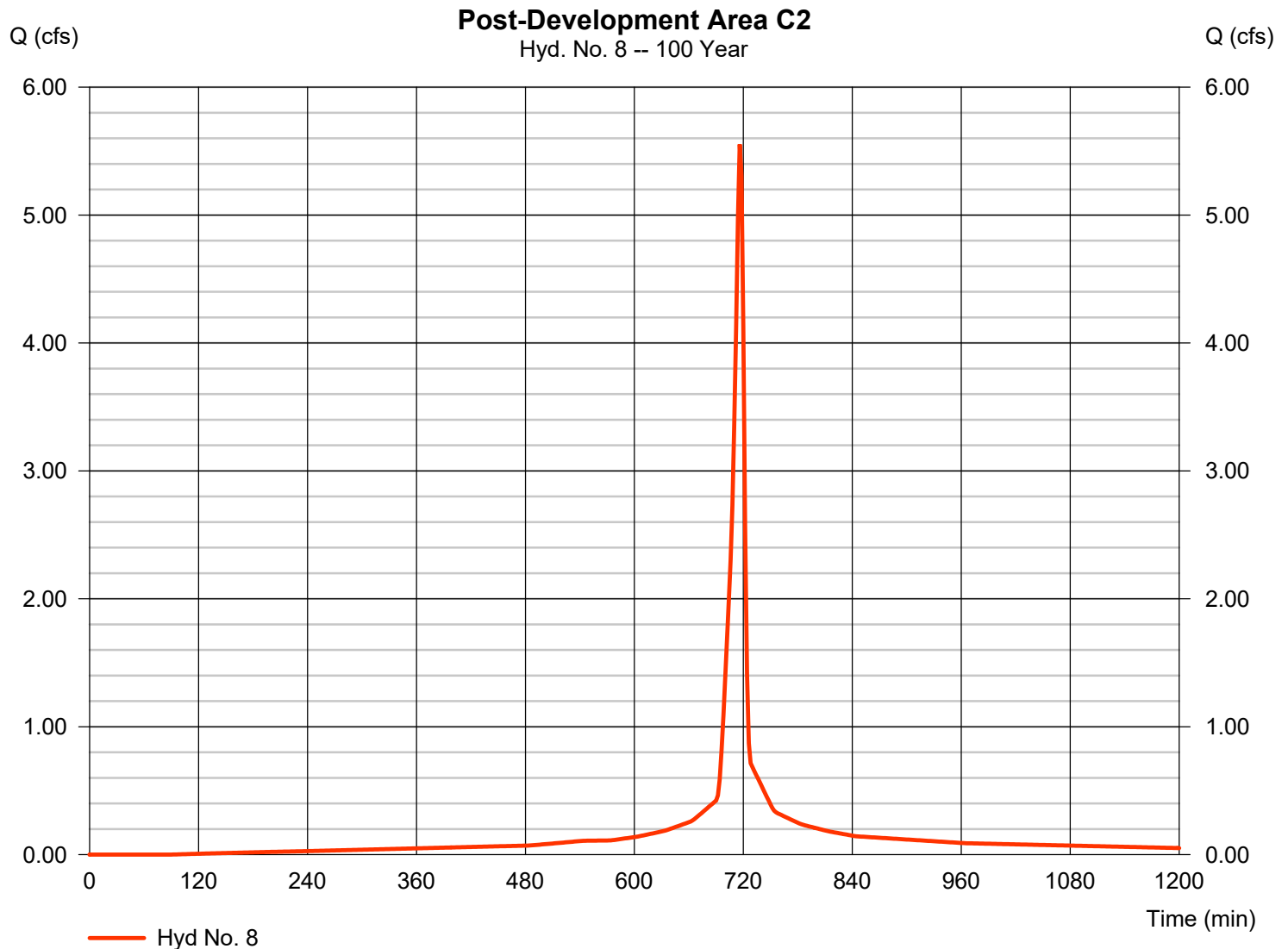
Friday, 03 / 31 / 2023

Hyd. No. 8

Post-Development Area C2

Hydrograph type	= SCS Runoff	Peak discharge	= 5.552 cfs
Storm frequency	= 100 yrs	Time to peak	= 716 min
Time interval	= 2 min	Hyd. volume	= 12,856 cuft
Drainage area	= 0.600 ac	Curve number	= 95*
Basin Slope	= 1.0 %	Hydraulic length	= 450 ft
Tc method	= User	Time of conc. (Tc)	= 5.00 min
Total precip.	= 6.89 in	Distribution	= Type II
Storm duration	= 24 hrs	Shape factor	= 484

* Composite (Area/CN) = $[(0.520 \times 98) + (0.080 \times 79)] / 0.600$



Hydrograph Report

Hydraflow Hydrographs Extension for Autodesk® Civil 3D® by Autodesk, Inc. v2023

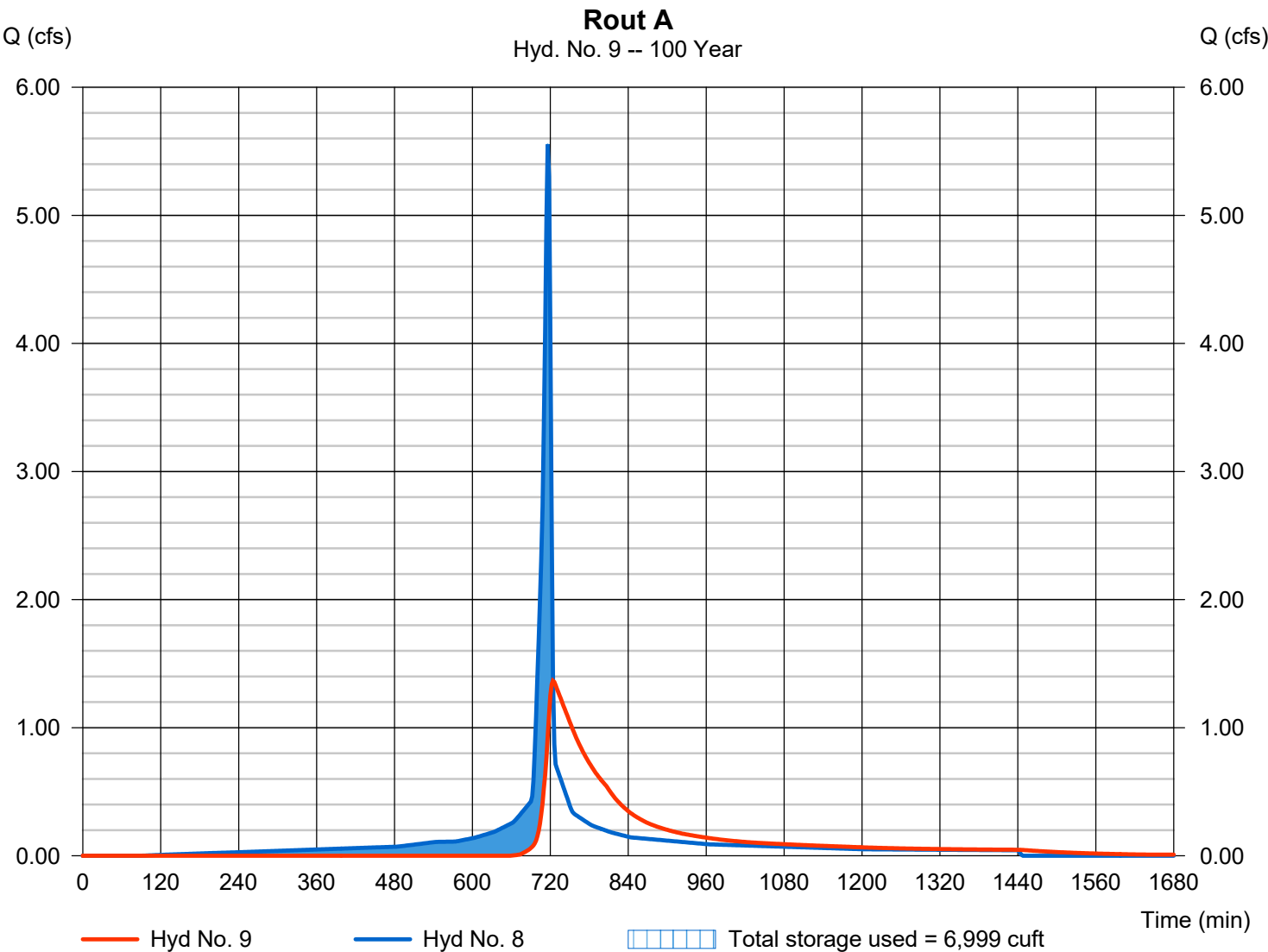
Friday, 03 / 31 / 2023

Hyd. No. 9

Rout A

Hydrograph type	= Reservoir	Peak discharge	= 1.366 cfs
Storm frequency	= 100 yrs	Time to peak	= 724 min
Time interval	= 2 min	Hyd. volume	= 10,638 cuft
Inflow hyd. No.	= 8 - Post-Development Area C2	Max. Elevation	= 659.64 ft
Reservoir name	= Pond A	Max. Storage	= 6,999 cuft

Storage Indication method used.



Hydrograph Report

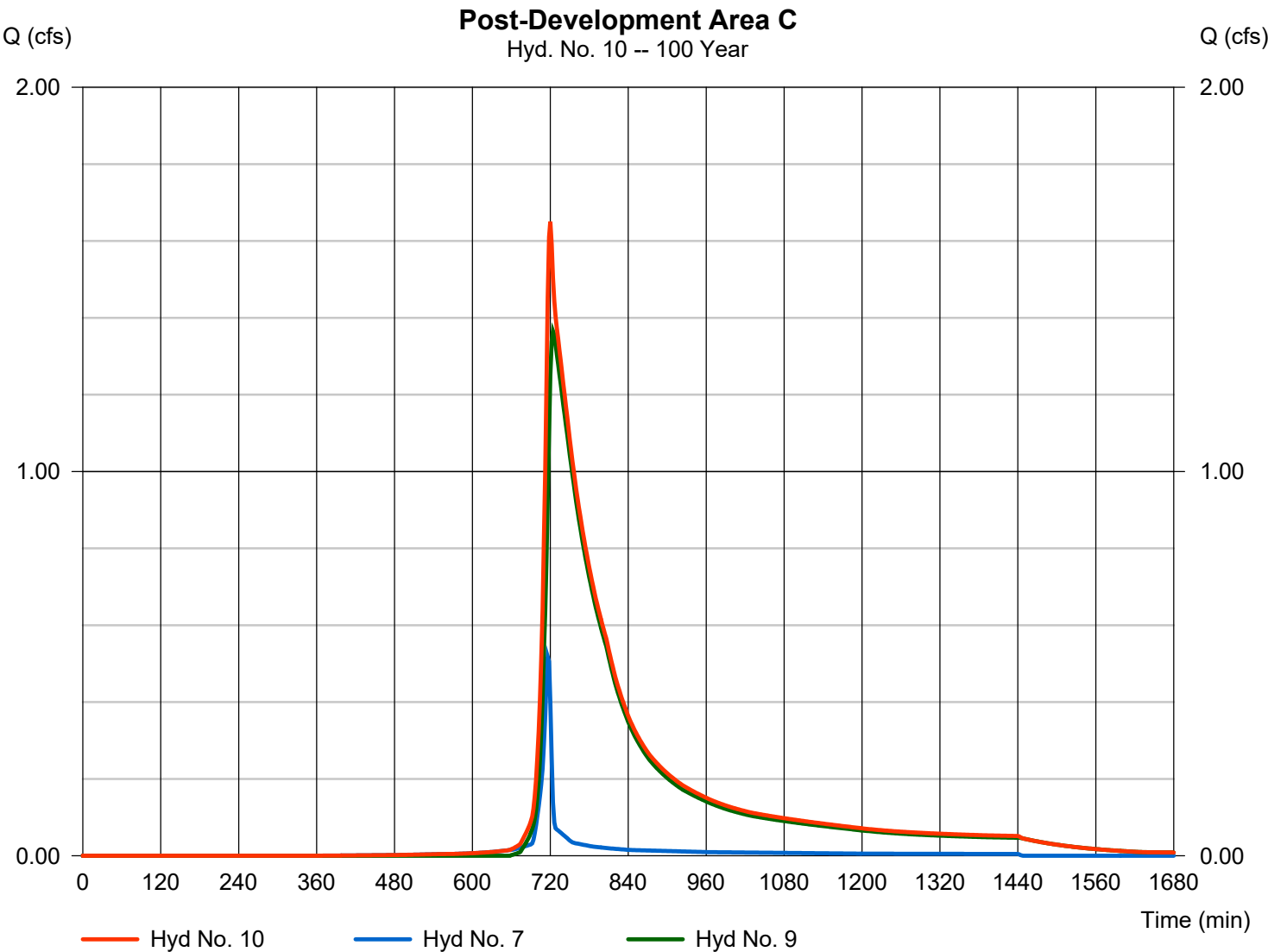
Hydraflow Hydrographs Extension for Autodesk® Civil 3D® by Autodesk, Inc. v2023

Friday, 03 / 31 / 2023

Hyd. No. 10

Post-Development Area C

Hydrograph type	= Combine	Peak discharge	= 1.650 cfs
Storm frequency	= 100 yrs	Time to peak	= 720 min
Time interval	= 2 min	Hyd. volume	= 11,706 cuft
Inflow hyds.	= 7, 9	Contrib. drain. area	= 0.070 ac



Hydrograph Report

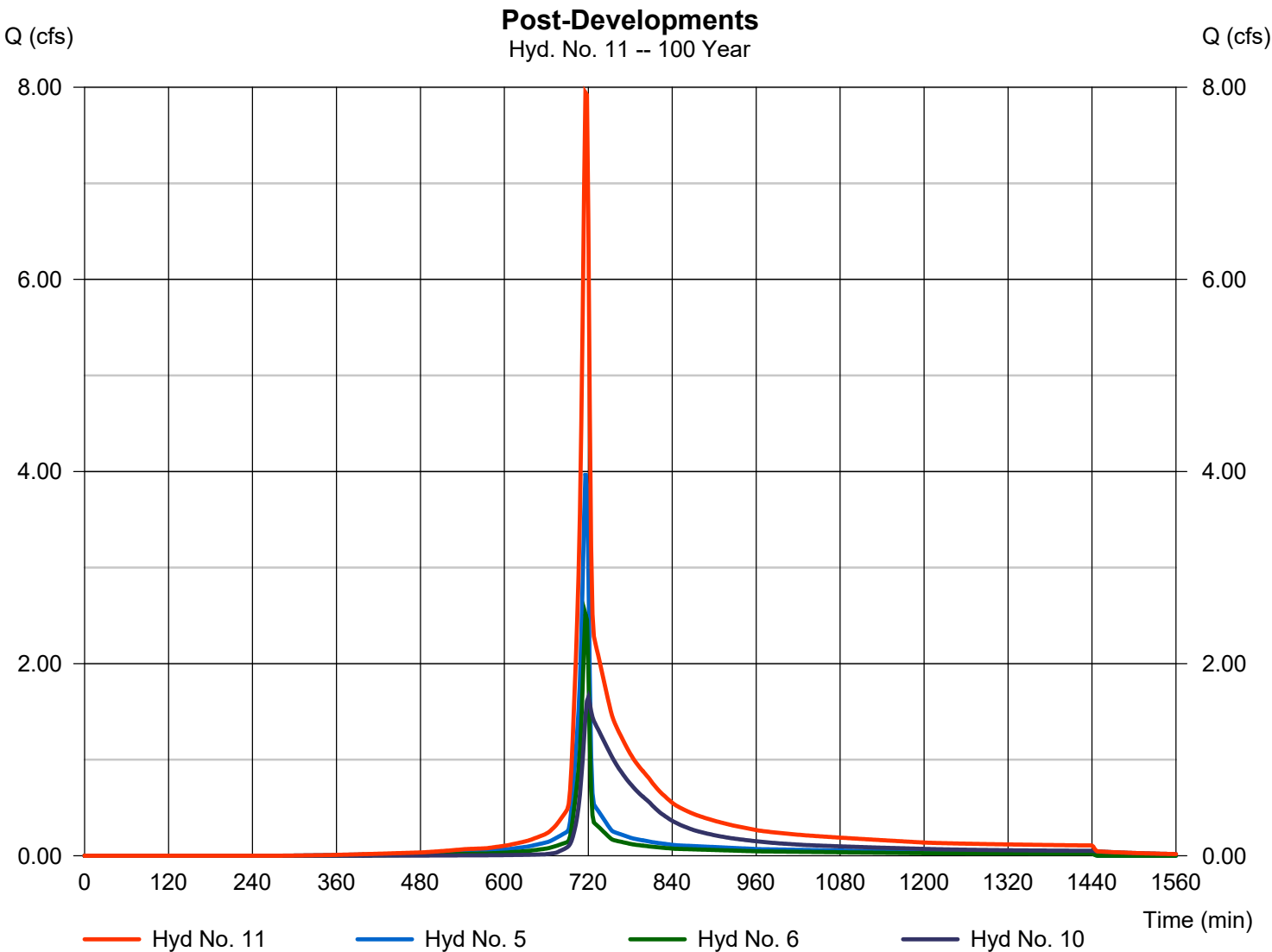
Hydraflow Hydrographs Extension for Autodesk® Civil 3D® by Autodesk, Inc. v2023

Friday, 03 / 31 / 2023

Hyd. No. 11

Post-Developments

Hydrograph type	= Combine	Peak discharge	= 7.945 cfs
Storm frequency	= 100 yrs	Time to peak	= 716 min
Time interval	= 2 min	Hyd. volume	= 25,291 cuft
Inflow hyds.	= 5, 6, 10	Contrib. drain. area	= 0.830 ac



Hydraflow Rainfall Report

Hydraflow Hydrographs Extension for Autodesk® Civil 3D® by Autodesk, Inc. v2023

Friday, 03 / 31 / 2023

Return Period (Yrs)	Intensity-Duration-Frequency Equation Coefficients (FHA)			
	B	D	E	(N/A)
1	0.0000	0.0000	0.0000	-----
2	21.3913	5.8000	0.6332	-----
3	0.0000	0.0000	0.0000	-----
5	48.6846	10.2000	0.7544	-----
10	66.7074	12.5000	0.7892	-----
25	65.3872	11.5000	0.7499	-----
50	79.9547	12.2000	0.7718	-----
100	170.7964	18.2000	0.9117	-----

File name: Nashville.pcp.IDF

$$\text{Intensity} = B / (T_c + D)^E$$

Return Period (Yrs)	Intensity Values (in/hr)											
	5 min	10	15	20	25	30	35	40	45	50	55	60
1	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
2	4.74	3.73	3.13	2.73	2.44	2.22	2.04	1.90	1.78	1.68	1.59	1.51
3	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
5	6.25	5.04	4.27	3.72	3.32	3.00	2.75	2.54	2.36	2.21	2.08	1.97
10	6.97	5.72	4.88	4.28	3.82	3.46	3.17	2.93	2.73	2.55	2.40	2.27
25	7.99	6.55	5.60	4.92	4.40	4.00	3.67	3.40	3.17	2.98	2.81	2.66
50	8.90	7.31	6.25	5.48	4.90	4.45	4.08	3.78	3.52	3.30	3.11	2.94
100	9.72	8.13	7.01	6.17	5.51	4.99	4.56	4.20	3.90	3.64	3.41	3.21

Tc = time in minutes. Values may exceed 60.

Precip. file name: Sample.pcp

Storm Distribution	Rainfall Precipitation Table (in)							
	1-yr	2-yr	3-yr	5-yr	10-yr	25-yr	50-yr	100-yr
SCS 24-hour	0.00	3.37	0.00	4.11	4.70	5.53	6.20	6.89
SCS 6-Hr	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Huff-1st	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Huff-2nd	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Huff-3rd	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Huff-4th	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Huff-Indy	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Custom	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00

Watershed Model Schematic.....	1
Hydrograph Return Period Recap.....	2
2 - Year	
Summary Report.....	3
Hydrograph Reports.....	4
Hydrograph No. 1, SCS Runoff, Pre-Development Area A.....	4
Hydrograph No. 2, SCS Runoff, Pre-Development Area B.....	5
Hydrograph No. 3, SCS Runoff, Pre-Development Area C.....	6
Hydrograph No. 4, Combine, Pre-Developments.....	7
Hydrograph No. 5, SCS Runoff, Post-Development Area A.....	8
Hydrograph No. 6, SCS Runoff, Post-Development Area B.....	9
Hydrograph No. 7, SCS Runoff, Post-Development Area C1.....	10
Hydrograph No. 8, SCS Runoff, Post-Development Area C2.....	11
Hydrograph No. 9, Reservoir, Rout A.....	12
Pond Report - Pond A.....	13
Hydrograph No. 10, Combine, Post-Development Area C.....	14
Hydrograph No. 11, Combine, Post-Developments.....	15
5 - Year	
Summary Report.....	16
Hydrograph Reports.....	17
Hydrograph No. 1, SCS Runoff, Pre-Development Area A.....	17
Hydrograph No. 2, SCS Runoff, Pre-Development Area B.....	18
Hydrograph No. 3, SCS Runoff, Pre-Development Area C.....	19
Hydrograph No. 4, Combine, Pre-Developments.....	20
Hydrograph No. 5, SCS Runoff, Post-Development Area A.....	21
Hydrograph No. 6, SCS Runoff, Post-Development Area B.....	22
Hydrograph No. 7, SCS Runoff, Post-Development Area C1.....	23
Hydrograph No. 8, SCS Runoff, Post-Development Area C2.....	24
Hydrograph No. 9, Reservoir, Rout A.....	25
Hydrograph No. 10, Combine, Post-Development Area C.....	26
Hydrograph No. 11, Combine, Post-Developments.....	27
10 - Year	
Summary Report.....	28
Hydrograph Reports.....	29
Hydrograph No. 1, SCS Runoff, Pre-Development Area A.....	29
Hydrograph No. 2, SCS Runoff, Pre-Development Area B.....	30
Hydrograph No. 3, SCS Runoff, Pre-Development Area C.....	31
Hydrograph No. 4, Combine, Pre-Developments.....	32
Hydrograph No. 5, SCS Runoff, Post-Development Area A.....	33
Hydrograph No. 6, SCS Runoff, Post-Development Area B.....	34
Hydrograph No. 7, SCS Runoff, Post-Development Area C1.....	35
Hydrograph No. 8, SCS Runoff, Post-Development Area C2.....	36
Hydrograph No. 9, Reservoir, Rout A.....	37
Hydrograph No. 10, Combine, Post-Development Area C.....	38
Hydrograph No. 11, Combine, Post-Developments.....	39

25 - Year

Summary Report.....	40
Hydrograph Reports.....	41
Hydrograph No. 1, SCS Runoff, Pre-Development Area A.....	41
Hydrograph No. 2, SCS Runoff, Pre-Development Area B.....	42
Hydrograph No. 3, SCS Runoff, Pre-Development Area C.....	43
Hydrograph No. 4, Combine, Pre-Developments.....	44
Hydrograph No. 5, SCS Runoff, Post-Development Area A.....	45
Hydrograph No. 6, SCS Runoff, Post-Development Area B.....	46
Hydrograph No. 7, SCS Runoff, Post-Development Area C1.....	47
Hydrograph No. 8, SCS Runoff, Post-Development Area C2.....	48
Hydrograph No. 9, Reservoir, Rout A.....	49
Hydrograph No. 10, Combine, Post-Development Area C.....	50
Hydrograph No. 11, Combine, Post-Developments.....	51

50 - Year

Summary Report.....	52
Hydrograph Reports.....	53
Hydrograph No. 1, SCS Runoff, Pre-Development Area A.....	53
Hydrograph No. 2, SCS Runoff, Pre-Development Area B.....	54
Hydrograph No. 3, SCS Runoff, Pre-Development Area C.....	55
Hydrograph No. 4, Combine, Pre-Developments.....	56
Hydrograph No. 5, SCS Runoff, Post-Development Area A.....	57
Hydrograph No. 6, SCS Runoff, Post-Development Area B.....	58
Hydrograph No. 7, SCS Runoff, Post-Development Area C1.....	59
Hydrograph No. 8, SCS Runoff, Post-Development Area C2.....	60
Hydrograph No. 9, Reservoir, Rout A.....	61
Hydrograph No. 10, Combine, Post-Development Area C.....	62
Hydrograph No. 11, Combine, Post-Developments.....	63

100 - Year

Summary Report.....	64
Hydrograph Reports.....	65
Hydrograph No. 1, SCS Runoff, Pre-Development Area A.....	65
Hydrograph No. 2, SCS Runoff, Pre-Development Area B.....	66
Hydrograph No. 3, SCS Runoff, Pre-Development Area C.....	67
Hydrograph No. 4, Combine, Pre-Developments.....	68
Hydrograph No. 5, SCS Runoff, Post-Development Area A.....	69
Hydrograph No. 6, SCS Runoff, Post-Development Area B.....	70
Hydrograph No. 7, SCS Runoff, Post-Development Area C1.....	71
Hydrograph No. 8, SCS Runoff, Post-Development Area C2.....	72
Hydrograph No. 9, Reservoir, Rout A.....	73
Hydrograph No. 10, Combine, Post-Development Area C.....	74
Hydrograph No. 11, Combine, Post-Developments.....	75

IDF Report.....	76
------------------------	-----------



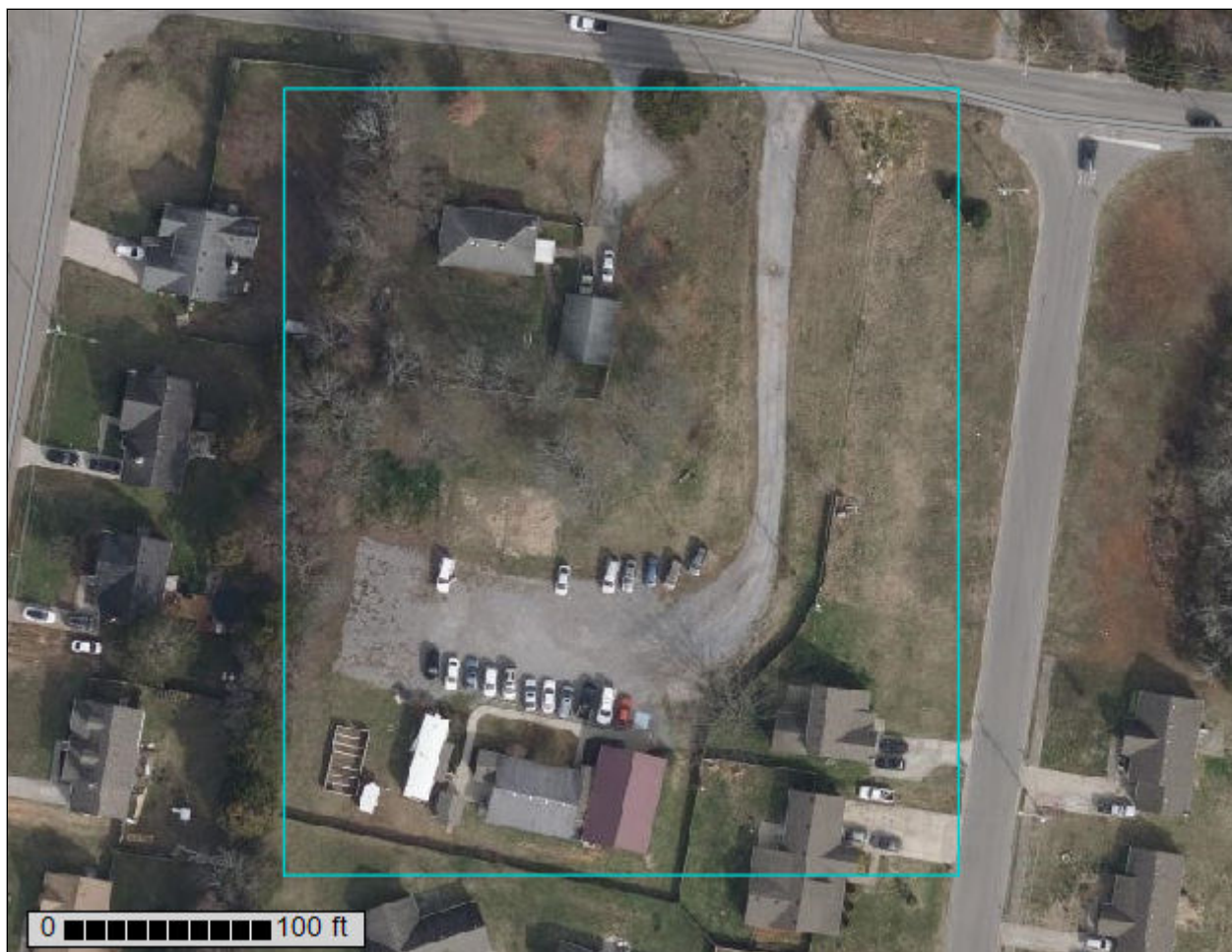
United States
Department of
Agriculture

NRCS

Natural
Resources
Conservation
Service

A product of the National
Cooperative Soil Survey,
a joint effort of the United
States Department of
Agriculture and other
Federal agencies, State
agencies including the
Agricultural Experiment
Stations, and local
participants

Custom Soil Resource Report for **Rutherford County, Tennessee**



Preface

Soil surveys contain information that affects land use planning in survey areas. They highlight soil limitations that affect various land uses and provide information about the properties of the soils in the survey areas. Soil surveys are designed for many different users, including farmers, ranchers, foresters, agronomists, urban planners, community officials, engineers, developers, builders, and home buyers. Also, conservationists, teachers, students, and specialists in recreation, waste disposal, and pollution control can use the surveys to help them understand, protect, or enhance the environment.

Various land use regulations of Federal, State, and local governments may impose special restrictions on land use or land treatment. Soil surveys identify soil properties that are used in making various land use or land treatment decisions. The information is intended to help the land users identify and reduce the effects of soil limitations on various land uses. The landowner or user is responsible for identifying and complying with existing laws and regulations.

Although soil survey information can be used for general farm, local, and wider area planning, onsite investigation is needed to supplement this information in some cases. Examples include soil quality assessments (<http://www.nrcs.usda.gov/wps/portal/nrcs/main/soils/health/>) and certain conservation and engineering applications. For more detailed information, contact your local USDA Service Center (<https://offices.sc.egov.usda.gov/locator/app?agency=nrcs>) or your NRCS State Soil Scientist (http://www.nrcs.usda.gov/wps/portal/nrcs/detail/soils/contactus/?cid=nrcs142p2_053951).

Great differences in soil properties can occur within short distances. Some soils are seasonally wet or subject to flooding. Some are too unstable to be used as a foundation for buildings or roads. Clayey or wet soils are poorly suited to use as septic tank absorption fields. A high water table makes a soil poorly suited to basements or underground installations.

The National Cooperative Soil Survey is a joint effort of the United States Department of Agriculture and other Federal agencies, State agencies including the Agricultural Experiment Stations, and local agencies. The Natural Resources Conservation Service (NRCS) has leadership for the Federal part of the National Cooperative Soil Survey.

Information about soils is updated periodically. Updated information is available through the NRCS Web Soil Survey, the site for official soil survey information.

The U.S. Department of Agriculture (USDA) prohibits discrimination in all its programs and activities on the basis of race, color, national origin, age, disability, and where applicable, sex, marital status, familial status, parental status, religion, sexual orientation, genetic information, political beliefs, reprisal, or because all or a part of an individual's income is derived from any public assistance program. (Not all prohibited bases apply to all programs.) Persons with disabilities who require

alternative means for communication of program information (Braille, large print, audiotape, etc.) should contact USDA's TARGET Center at (202) 720-2600 (voice and TDD). To file a complaint of discrimination, write to USDA, Director, Office of Civil Rights, 1400 Independence Avenue, S.W., Washington, D.C. 20250-9410 or call (800) 795-3272 (voice) or (202) 720-6382 (TDD). USDA is an equal opportunity provider and employer.

Contents

Preface	2
How Soil Surveys Are Made	5
Soil Map	8
Soil Map.....	9
Legend.....	10
Map Unit Legend.....	11
Map Unit Descriptions.....	11
Rutherford County, Tennessee.....	13
TaB2—Talbott silt loam, 2 to 5 percent slopes, eroded.....	13
TbB3—Talbott silty clay loam, 2 to 5 percent slopes, severely eroded.....	13
References	15

How Soil Surveys Are Made

Soil surveys are made to provide information about the soils and miscellaneous areas in a specific area. They include a description of the soils and miscellaneous areas and their location on the landscape and tables that show soil properties and limitations affecting various uses. Soil scientists observed the steepness, length, and shape of the slopes; the general pattern of drainage; the kinds of crops and native plants; and the kinds of bedrock. They observed and described many soil profiles. A soil profile is the sequence of natural layers, or horizons, in a soil. The profile extends from the surface down into the unconsolidated material in which the soil formed or from the surface down to bedrock. The unconsolidated material is devoid of roots and other living organisms and has not been changed by other biological activity.

Currently, soils are mapped according to the boundaries of major land resource areas (MLRAs). MLRAs are geographically associated land resource units that share common characteristics related to physiography, geology, climate, water resources, soils, biological resources, and land uses (USDA, 2006). Soil survey areas typically consist of parts of one or more MLRA.

The soils and miscellaneous areas in a survey area occur in an orderly pattern that is related to the geology, landforms, relief, climate, and natural vegetation of the area. Each kind of soil and miscellaneous area is associated with a particular kind of landform or with a segment of the landform. By observing the soils and miscellaneous areas in the survey area and relating their position to specific segments of the landform, a soil scientist develops a concept, or model, of how they were formed. Thus, during mapping, this model enables the soil scientist to predict with a considerable degree of accuracy the kind of soil or miscellaneous area at a specific location on the landscape.

Commonly, individual soils on the landscape merge into one another as their characteristics gradually change. To construct an accurate soil map, however, soil scientists must determine the boundaries between the soils. They can observe only a limited number of soil profiles. Nevertheless, these observations, supplemented by an understanding of the soil-vegetation-landscape relationship, are sufficient to verify predictions of the kinds of soil in an area and to determine the boundaries.

Soil scientists recorded the characteristics of the soil profiles that they studied. They noted soil color, texture, size and shape of soil aggregates, kind and amount of rock fragments, distribution of plant roots, reaction, and other features that enable them to identify soils. After describing the soils in the survey area and determining their properties, the soil scientists assigned the soils to taxonomic classes (units). Taxonomic classes are concepts. Each taxonomic class has a set of soil characteristics with precisely defined limits. The classes are used as a basis for comparison to classify soils systematically. Soil taxonomy, the system of taxonomic classification used in the United States, is based mainly on the kind and character of soil properties and the arrangement of horizons within the profile. After the soil

scientists classified and named the soils in the survey area, they compared the individual soils with similar soils in the same taxonomic class in other areas so that they could confirm data and assemble additional data based on experience and research.

The objective of soil mapping is not to delineate pure map unit components; the objective is to separate the landscape into landforms or landform segments that have similar use and management requirements. Each map unit is defined by a unique combination of soil components and/or miscellaneous areas in predictable proportions. Some components may be highly contrasting to the other components of the map unit. The presence of minor components in a map unit in no way diminishes the usefulness or accuracy of the data. The delineation of such landforms and landform segments on the map provides sufficient information for the development of resource plans. If intensive use of small areas is planned, onsite investigation is needed to define and locate the soils and miscellaneous areas.

Soil scientists make many field observations in the process of producing a soil map. The frequency of observation is dependent upon several factors, including scale of mapping, intensity of mapping, design of map units, complexity of the landscape, and experience of the soil scientist. Observations are made to test and refine the soil-landscape model and predictions and to verify the classification of the soils at specific locations. Once the soil-landscape model is refined, a significantly smaller number of measurements of individual soil properties are made and recorded. These measurements may include field measurements, such as those for color, depth to bedrock, and texture, and laboratory measurements, such as those for content of sand, silt, clay, salt, and other components. Properties of each soil typically vary from one point to another across the landscape.

Observations for map unit components are aggregated to develop ranges of characteristics for the components. The aggregated values are presented. Direct measurements do not exist for every property presented for every map unit component. Values for some properties are estimated from combinations of other properties.

While a soil survey is in progress, samples of some of the soils in the area generally are collected for laboratory analyses and for engineering tests. Soil scientists interpret the data from these analyses and tests as well as the field-observed characteristics and the soil properties to determine the expected behavior of the soils under different uses. Interpretations for all of the soils are field tested through observation of the soils in different uses and under different levels of management. Some interpretations are modified to fit local conditions, and some new interpretations are developed to meet local needs. Data are assembled from other sources, such as research information, production records, and field experience of specialists. For example, data on crop yields under defined levels of management are assembled from farm records and from field or plot experiments on the same kinds of soil.

Predictions about soil behavior are based not only on soil properties but also on such variables as climate and biological activity. Soil conditions are predictable over long periods of time, but they are not predictable from year to year. For example, soil scientists can predict with a fairly high degree of accuracy that a given soil will have a high water table within certain depths in most years, but they cannot predict that a high water table will always be at a specific level in the soil on a specific date.

After soil scientists located and identified the significant natural bodies of soil in the survey area, they drew the boundaries of these bodies on aerial photographs and

Custom Soil Resource Report

identified each as a specific map unit. Aerial photographs show trees, buildings, fields, roads, and rivers, all of which help in locating boundaries accurately.

Soil Map

The soil map section includes the soil map for the defined area of interest, a list of soil map units on the map and extent of each map unit, and cartographic symbols displayed on the map. Also presented are various metadata about data used to produce the map, and a description of each soil map unit.

Custom Soil Resource Report Soil Map



MAP LEGEND

Area of Interest (AOI)

 Area of Interest (AOI)

Soils

 Soil Map Unit Polygons

 Soil Map Unit Lines

 Soil Map Unit Points

Special Point Features

 Blowout

 Borrow Pit

 Clay Spot

 Closed Depression

 Gravel Pit

 Gravelly Spot

 Landfill

 Lava Flow

 Marsh or swamp

 Mine or Quarry

 Miscellaneous Water

 Perennial Water

 Rock Outcrop

 Saline Spot

 Sandy Spot

 Severely Eroded Spot

 Sinkhole

 Slide or Slip

 Sodic Spot

 Spoil Area

 Stony Spot

 Very Stony Spot

 Wet Spot

 Other

 Special Line Features

Water Features

 Streams and Canals

Transportation

 Rails

 Interstate Highways

 US Routes

 Major Roads

 Local Roads

Background

 Aerial Photography

MAP INFORMATION

The soil surveys that comprise your AOI were mapped at 1:15,800.

Warning: Soil Map may not be valid at this scale.

Enlargement of maps beyond the scale of mapping can cause misunderstanding of the detail of mapping and accuracy of soil line placement. The maps do not show the small areas of contrasting soils that could have been shown at a more detailed scale.

Please rely on the bar scale on each map sheet for map measurements.

Source of Map: Natural Resources Conservation Service
Web Soil Survey URL:
Coordinate System: Web Mercator (EPSG:3857)

Maps from the Web Soil Survey are based on the Web Mercator projection, which preserves direction and shape but distorts distance and area. A projection that preserves area, such as the Albers equal-area conic projection, should be used if more accurate calculations of distance or area are required.

This product is generated from the USDA-NRCS certified data as of the version date(s) listed below.

Soil Survey Area: Rutherford County, Tennessee
Survey Area Data: Version 16, Sep 16, 2019

Soil map units are labeled (as space allows) for map scales 1:50,000 or larger.

Date(s) aerial images were photographed: Feb 14, 2020—Mar 1, 2020

The orthophoto or other base map on which the soil lines were compiled and digitized probably differs from the background imagery displayed on these maps. As a result, some minor shifting of map unit boundaries may be evident.

Map Unit Legend

Map Unit Symbol	Map Unit Name	Acres in AOI	Percent of AOI
TaB2	Talbott silt loam, 2 to 5 percent slopes, eroded	2.6	91.7%
TbB3	Talbott silty clay loam, 2 to 5 percent slopes, severely eroded	0.2	8.3%
Totals for Area of Interest		2.8	100.0%

Map Unit Descriptions

The map units delineated on the detailed soil maps in a soil survey represent the soils or miscellaneous areas in the survey area. The map unit descriptions, along with the maps, can be used to determine the composition and properties of a unit.

A map unit delineation on a soil map represents an area dominated by one or more major kinds of soil or miscellaneous areas. A map unit is identified and named according to the taxonomic classification of the dominant soils. Within a taxonomic class there are precisely defined limits for the properties of the soils. On the landscape, however, the soils are natural phenomena, and they have the characteristic variability of all natural phenomena. Thus, the range of some observed properties may extend beyond the limits defined for a taxonomic class. Areas of soils of a single taxonomic class rarely, if ever, can be mapped without including areas of other taxonomic classes. Consequently, every map unit is made up of the soils or miscellaneous areas for which it is named and some minor components that belong to taxonomic classes other than those of the major soils.

Most minor soils have properties similar to those of the dominant soil or soils in the map unit, and thus they do not affect use and management. These are called noncontrasting, or similar, components. They may or may not be mentioned in a particular map unit description. Other minor components, however, have properties and behavioral characteristics divergent enough to affect use or to require different management. These are called contrasting, or dissimilar, components. They generally are in small areas and could not be mapped separately because of the scale used. Some small areas of strongly contrasting soils or miscellaneous areas are identified by a special symbol on the maps. If included in the database for a given area, the contrasting minor components are identified in the map unit descriptions along with some characteristics of each. A few areas of minor components may not have been observed, and consequently they are not mentioned in the descriptions, especially where the pattern was so complex that it was impractical to make enough observations to identify all the soils and miscellaneous areas on the landscape.

The presence of minor components in a map unit in no way diminishes the usefulness or accuracy of the data. The objective of mapping is not to delineate pure taxonomic classes but rather to separate the landscape into landforms or landform segments that have similar use and management requirements. The delineation of such segments on the map provides sufficient information for the

development of resource plans. If intensive use of small areas is planned, however, onsite investigation is needed to define and locate the soils and miscellaneous areas.

An identifying symbol precedes the map unit name in the map unit descriptions. Each description includes general facts about the unit and gives important soil properties and qualities.

Soils that have profiles that are almost alike make up a *soil series*. Except for differences in texture of the surface layer, all the soils of a series have major horizons that are similar in composition, thickness, and arrangement.

Soils of one series can differ in texture of the surface layer, slope, stoniness, salinity, degree of erosion, and other characteristics that affect their use. On the basis of such differences, a soil series is divided into *soil phases*. Most of the areas shown on the detailed soil maps are phases of soil series. The name of a soil phase commonly indicates a feature that affects use or management. For example, Alpha silt loam, 0 to 2 percent slopes, is a phase of the Alpha series.

Some map units are made up of two or more major soils or miscellaneous areas. These map units are complexes, associations, or undifferentiated groups.

A *complex* consists of two or more soils or miscellaneous areas in such an intricate pattern or in such small areas that they cannot be shown separately on the maps. The pattern and proportion of the soils or miscellaneous areas are somewhat similar in all areas. Alpha-Beta complex, 0 to 6 percent slopes, is an example.

An *association* is made up of two or more geographically associated soils or miscellaneous areas that are shown as one unit on the maps. Because of present or anticipated uses of the map units in the survey area, it was not considered practical or necessary to map the soils or miscellaneous areas separately. The pattern and relative proportion of the soils or miscellaneous areas are somewhat similar. Alpha-Beta association, 0 to 2 percent slopes, is an example.

An *undifferentiated group* is made up of two or more soils or miscellaneous areas that could be mapped individually but are mapped as one unit because similar interpretations can be made for use and management. The pattern and proportion of the soils or miscellaneous areas in a mapped area are not uniform. An area can be made up of only one of the major soils or miscellaneous areas, or it can be made up of all of them. Alpha and Beta soils, 0 to 2 percent slopes, is an example.

Some surveys include *miscellaneous areas*. Such areas have little or no soil material and support little or no vegetation. Rock outcrop is an example.

Rutherford County, Tennessee

TaB2—Talbot silt loam, 2 to 5 percent slopes, eroded

Map Unit Setting

National map unit symbol: kqpr
Elevation: 460 to 1,400 feet
Mean annual precipitation: 45 to 55 inches
Mean annual air temperature: 57 to 63 degrees F
Frost-free period: 190 to 205 days
Farmland classification: Not prime farmland

Map Unit Composition

Talbot and similar soils: 100 percent
Estimates are based on observations, descriptions, and transects of the mapunit.

Description of Talbot

Setting

Landform: Hillslopes
Landform position (three-dimensional): Side slope
Parent material: Clayey residuum weathered from limestone

Typical profile

H1 - 0 to 6 inches: silt loam
H2 - 6 to 37 inches: clay
R - 37 to 47 inches: bedrock

Properties and qualities

Slope: 2 to 5 percent
Depth to restrictive feature: 20 to 40 inches to lithic bedrock
Natural drainage class: Well drained
Capacity of the most limiting layer to transmit water (Ksat): Very low to moderately low (0.00 to 0.06 in/hr)
Depth to water table: More than 80 inches
Frequency of flooding: None
Frequency of ponding: None
Available water storage in profile: Low (about 4.8 inches)

Interpretive groups

Land capability classification (irrigated): None specified
Land capability classification (nonirrigated): 3e
Hydrologic Soil Group: C
Hydric soil rating: No

TbB3—Talbot silty clay loam, 2 to 5 percent slopes, severely eroded

Map Unit Setting

National map unit symbol: kqpt
Elevation: 460 to 1,400 feet
Mean annual precipitation: 45 to 55 inches

Custom Soil Resource Report

Mean annual air temperature: 57 to 63 degrees F

Frost-free period: 190 to 205 days

Farmland classification: Not prime farmland

Map Unit Composition

Talbott, severely eroded, and similar soils: 100 percent

Estimates are based on observations, descriptions, and transects of the mapunit.

Description of Talbott, Severely Eroded

Setting

Landform: Hillslopes

Landform position (three-dimensional): Side slope

Parent material: Clayey residuum weathered from limestone

Typical profile

H1 - 0 to 6 inches: silty clay loam

H2 - 6 to 32 inches: clay

R - 32 to 42 inches: bedrock

Properties and qualities

Slope: 2 to 5 percent

Depth to restrictive feature: 20 to 39 inches to lithic bedrock

Natural drainage class: Well drained

Capacity of the most limiting layer to transmit water (Ksat): Very low to moderately low (0.00 to 0.06 in/hr)

Depth to water table: More than 80 inches

Frequency of flooding: None

Frequency of ponding: None

Available water storage in profile: Low (about 3.9 inches)

Interpretive groups

Land capability classification (irrigated): None specified

Land capability classification (nonirrigated): 4e

Hydrologic Soil Group: C

Hydric soil rating: No

References

- American Association of State Highway and Transportation Officials (AASHTO). 2004. Standard specifications for transportation materials and methods of sampling and testing. 24th edition.
- American Society for Testing and Materials (ASTM). 2005. Standard classification of soils for engineering purposes. ASTM Standard D2487-00.
- Cowardin, L.M., V. Carter, F.C. Golet, and E.T. LaRoe. 1979. Classification of wetlands and deep-water habitats of the United States. U.S. Fish and Wildlife Service FWS/OBS-79/31.
- Federal Register. July 13, 1994. Changes in hydric soils of the United States.
- Federal Register. September 18, 2002. Hydric soils of the United States.
- Hurt, G.W., and L.M. Vasilas, editors. Version 6.0, 2006. Field indicators of hydric soils in the United States.
- National Research Council. 1995. Wetlands: Characteristics and boundaries.
- Soil Survey Division Staff. 1993. Soil survey manual. Soil Conservation Service. U.S. Department of Agriculture Handbook 18. http://www.nrcs.usda.gov/wps/portal/nrcs/detail/national/soils/?cid=nrcs142p2_054262
- Soil Survey Staff. 1999. Soil taxonomy: A basic system of soil classification for making and interpreting soil surveys. 2nd edition. Natural Resources Conservation Service, U.S. Department of Agriculture Handbook 436. http://www.nrcs.usda.gov/wps/portal/nrcs/detail/national/soils/?cid=nrcs142p2_053577
- Soil Survey Staff. 2010. Keys to soil taxonomy. 11th edition. U.S. Department of Agriculture, Natural Resources Conservation Service. http://www.nrcs.usda.gov/wps/portal/nrcs/detail/national/soils/?cid=nrcs142p2_053580
- Tiner, R.W., Jr. 1985. Wetlands of Delaware. U.S. Fish and Wildlife Service and Delaware Department of Natural Resources and Environmental Control, Wetlands Section.
- United States Army Corps of Engineers, Environmental Laboratory. 1987. Corps of Engineers wetlands delineation manual. Waterways Experiment Station Technical Report Y-87-1.
- United States Department of Agriculture, Natural Resources Conservation Service. National forestry manual. http://www.nrcs.usda.gov/wps/portal/nrcs/detail/soils/home/?cid=nrcs142p2_053374
- United States Department of Agriculture, Natural Resources Conservation Service. National range and pasture handbook. <http://www.nrcs.usda.gov/wps/portal/nrcs/detail/national/landuse/rangepasture/?cid=stelprdb1043084>

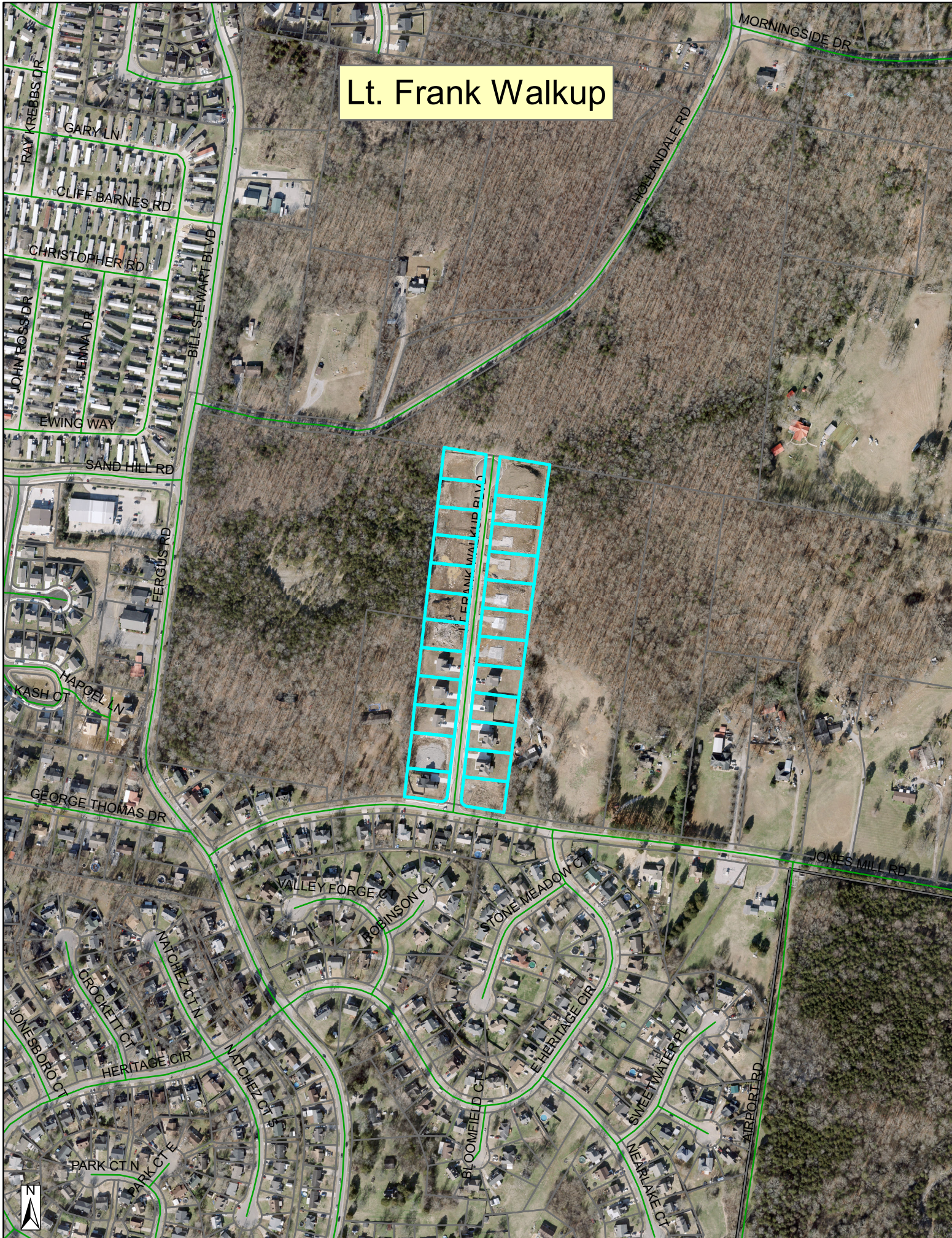
United States Department of Agriculture, Natural Resources Conservation Service. National soil survey handbook, title 430-VI. http://www.nrcs.usda.gov/wps/portal/nrcs/detail/soils/scientists/?cid=nrcs142p2_054242

United States Department of Agriculture, Natural Resources Conservation Service. 2006. Land resource regions and major land resource areas of the United States, the Caribbean, and the Pacific Basin. U.S. Department of Agriculture Handbook 296. http://www.nrcs.usda.gov/wps/portal/nrcs/detail/national/soils/?cid=nrcs142p2_053624

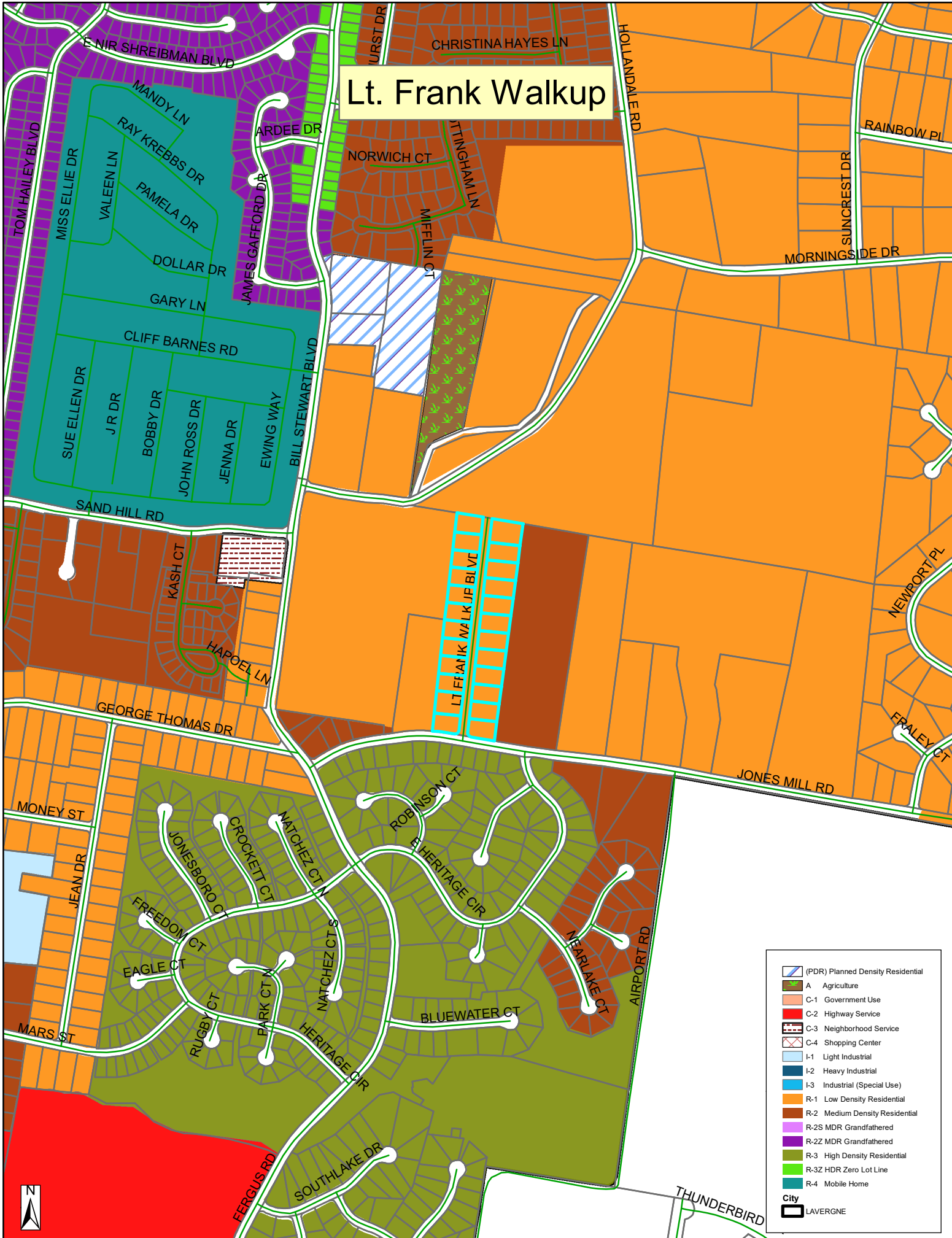
United States Department of Agriculture, Soil Conservation Service. 1961. Land capability classification. U.S. Department of Agriculture Handbook 210. http://www.nrcs.usda.gov/Internet/FSE_DOCUMENTS/nrcs142p2_052290.pdf



Lt. Frank Walkup



Lt. Frank Walkup



Lt. Frank Walkup

- (PDR) Planned Density Residential
- A Agriculture
- C-1 Government Use
- C-2 Highway Service
- C-3 Neighborhood Service
- C-4 Shopping Center
- I-1 Light Industrial
- I-2 Heavy Industrial
- I-3 Industrial (Special Use)
- R-1 Low Density Residential
- R-2 Medium Density Residential
- R-2S MDR Grandfathered
- R-2Z MDR Grandfathered
- R-3 High Density Residential
- R-3Z HDR Zero Lot Line
- R-4 Mobile Home
- City
- LAVERGNE

LT. FRANK WALKUP SUBDIVISION – PHASE 1

OFFER OF IRREVOCABLE DEDICATION

AGREEMENT made this 13th day of February 2023, by and between Nir Homes, Inc., having its office and place of business at P O Box 177, La Vergne, Tennessee, hereinafter designated as the "Developer" and the City of La Vergne, Tennessee, hereinafter designated the "City".

WHEREAS, the City Planning Commission approved on January 30, 2018, a subdivision plat entitled, Lt. Frank Walkup – Phase 1, and said plat was recorded on January 31, 2020, in Plat Cabinet 43, Page 248, Registers Office of Rutherford County, Tennessee;

WHEREAS, said plat designates certain public improvements consisting of streets, sidewalks, water, sanitary sewer, and storm drainage to be dedicated to the City, free and clear of all encumbrances and liens, pursuant to the requirements of the planning commission and local government code; and

WHEREAS, the developer, simultaneously herewith, has posted cash security with the City for the maintenance and dedication of said improvements, if required;

WHEREAS, the developer is desirous of offering for dedication the Lt. Frank Walkup – Phase 1 improvements and land to the City more particularly described on the recorded plat of Lt. Frank Walkup – Phase 1, recorded on January 31, 2020 in Plat Cabinet 43, Page 248, Registers Office Rutherford County, Tennessee, attached hereto;

NOW, THEREFORE, in consideration of the sum of one dollar (\$1.00) lawful money of the United States paid by the City to the Developer and other good and valuable consideration, it is mutually **AGREED** as follows:

A. The Developer herewith delivers to the City the Lt. Frank Walkup – Phase 1 improvements shown on the Lt. Frank Walkup – Phase 1 final plat attached hereto, said delivery being a formal offer of dedication to the City until the acceptance or rejection of such offer of dedication by the City of La Vergne Board of Mayor and Alderman.

B. The Developer agrees that said formal offer of dedication is irrevocable and can be accepted by the City at the time.

C. The Developer agrees to complete the maintenance of the land and improvements pursuant to the cash security and the requirements of the City and any ordinances, regulations, requirements, covenants, and agreements that may be imposed by the City with respect thereto and, upon acceptance by the City of the offer of dedication, furnish to the City a sworn statement certifying that the premises are free and clear of all liens and encumbrances.

D. That this irrevocable offer of dedication shall run with the land and shall be binding on all assignees, guarantees, successors, or heirs of the developer.

2-13-2023

Date

Amnon Shreibman, President By
Amnon Shreibman with permission
Amnon Shreibman dba Nir Homes, Inc

(CORPORATE SEAL)

FOR THE CITY OF LA VERGNE BY
ATTEST:

Mayor

Date

STATE OF TENNESSEE

COUNTY OF RUTHERFORD

SS.: _____

On this ____ day of _____, _____, before me personally appeared _____, to me known, who, being by me first duly sworn, did depose and said that he resides in _____; that he is the _____ of _____, the corporate seal affixed to said instrument is such corporate seal; that it was so affixed by order and authority of the Board of Directors of said corporation, and that he signed his name thereto by like order and authority.

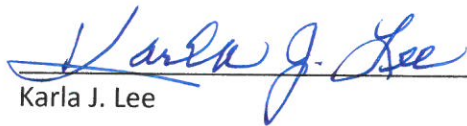
_____, My commission expires _____
Notary Public

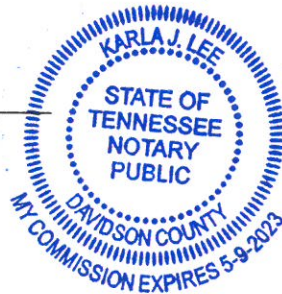
CO-PARTNERSHIP

STATE OF TENNESSEE)

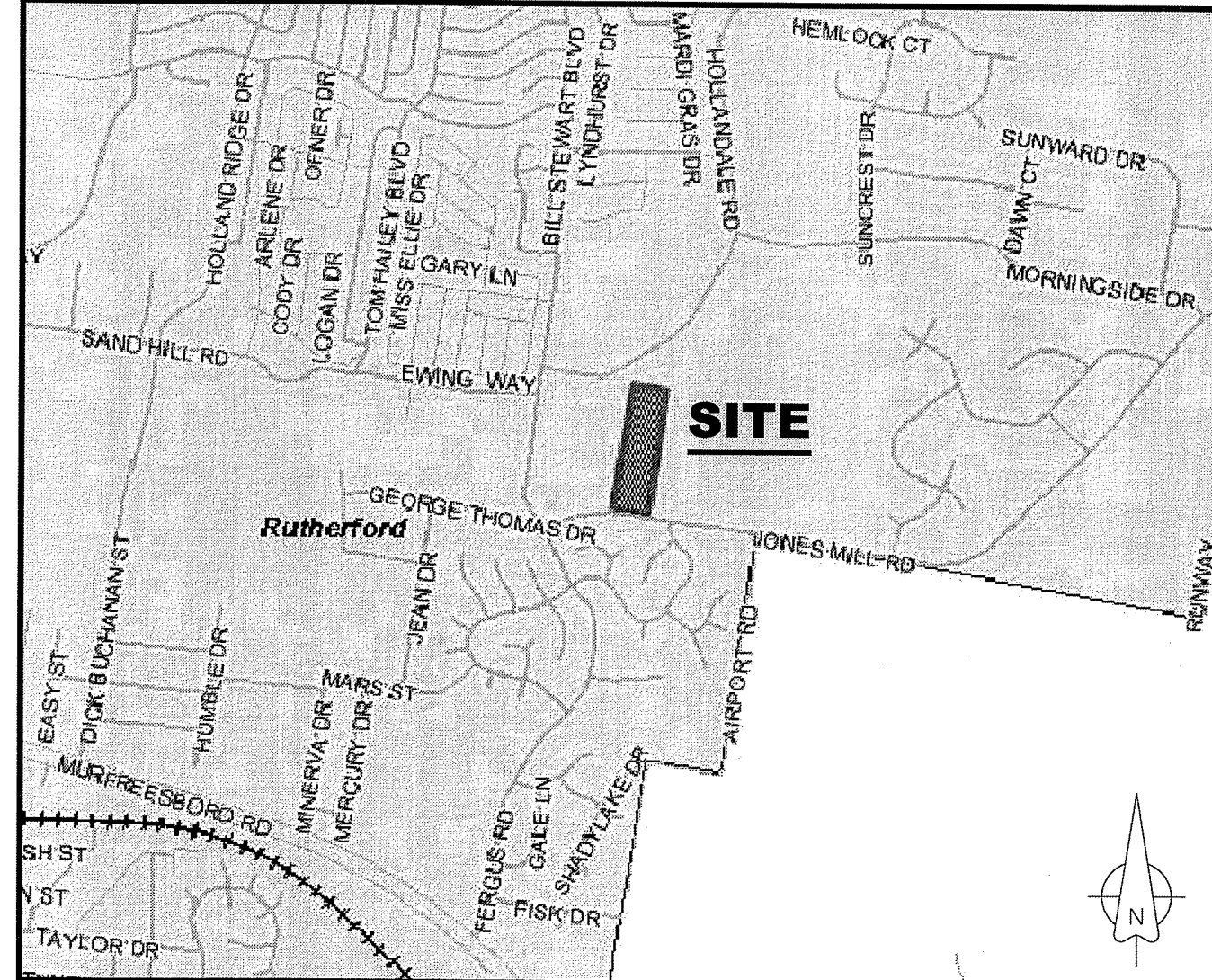
COUNTY OF WILLIAMSON)

On this 13th day of February, 2023, The foregoing instrument, *Irrevocable Dedication*, was acknowledged before me by James D. Wamble.


Karla J. Lee

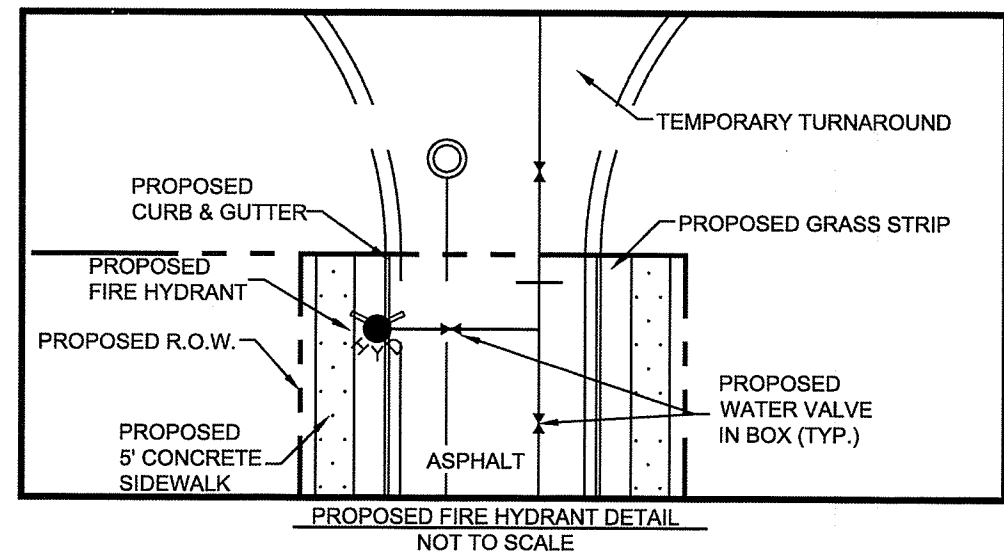


My Commission Expires: 05/09/2023



VICINITY MAP
NOT TO SCALE

	POWER POLE w/ANCHORS
	FIRE HYDRANT
	VALVES
	WATER LINE
	OVERHEAD POWER LINE
	OVERHEAD TELEPHONE LINE
	STORM DRAIN
	CONCRETE
	FENCE LINE
	POWER POLE w/LAMP
	IRON ROD (OLD)
	IRON ROD (NEW)
	MONUMENT (NEW)
	CURBS
	PROPOSED FIRE HYDRANT



LOT AREA CHART	
LOT NO	AREA (SQ. FT.)
101	15,244
102	15,000
103	15,000
104	15,000
105	16,379
106	16,192
107	16,005
108	15,818
109	16,314
Open Space	19,225

Tap Map / Parcel	075 / 02413
Zoning District	R-1
Existing Use	Vacant Undeveloped Land
Proposed Use	Single Family Residential Lots
Total no. Units	9
Density	2.09 Lots / Acre
Square footage of each building (Existing And Proposed)	Proposed Varies
Total Square Footage	No Existing
Square Footage of each use	187,302 Sq. Ft. / 4,30 Acres
Lot Coverage	Only One Use
Floor Area Ratio	35% Maximum
Height	N/A
Acreage / Square Footage of lot	35' Maximum
Sight Height and Area	0 Acres / 15,000 Sq. Ft. Minimum
	N/A

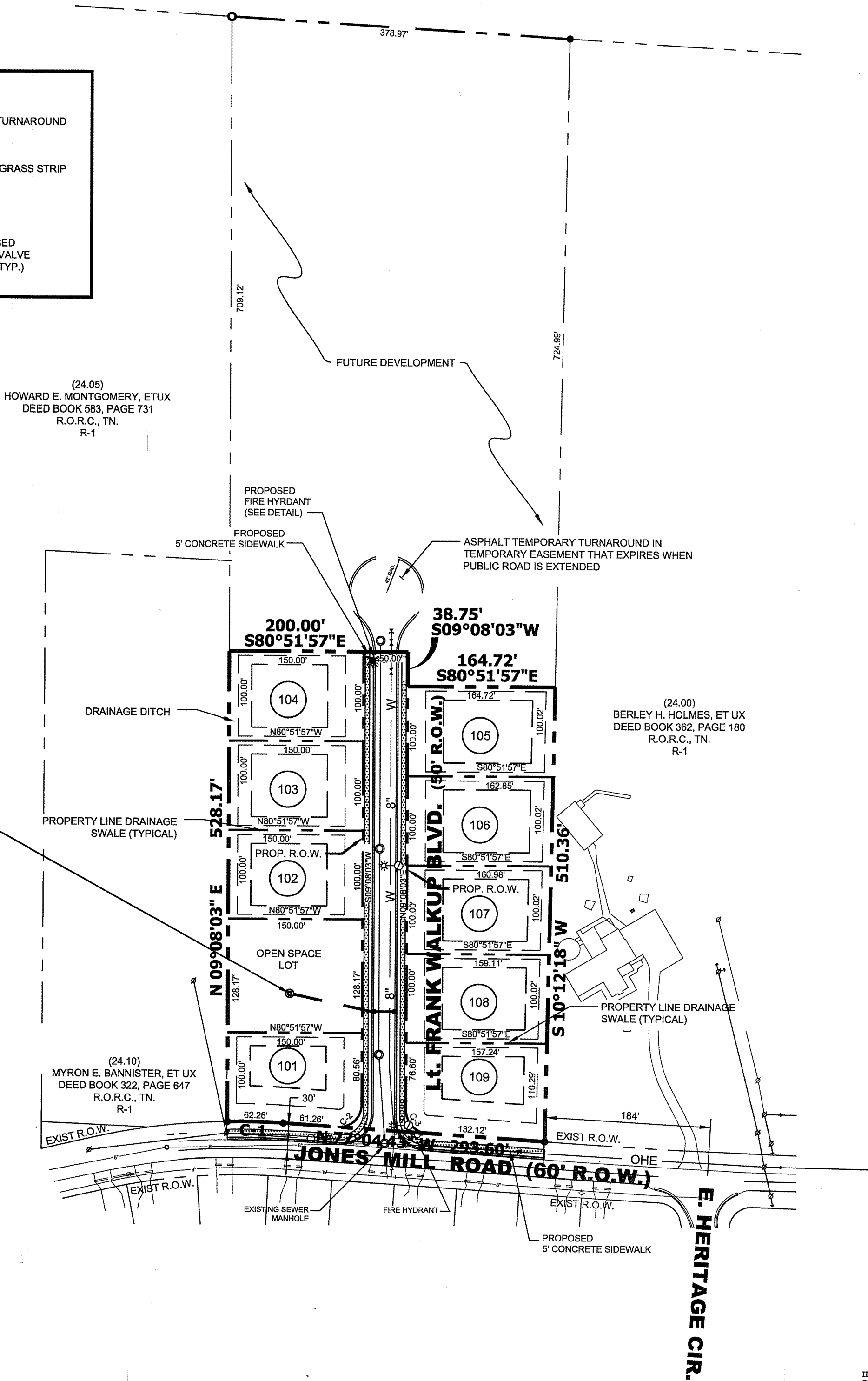
SETBACKS FOR R-1:	
<u>REQUIRED</u>	<u>PROVIDED</u>
Front Building Setback	40' / 40'
Side Building Setback	15' / 15'
Rear Building Setback	25' / 25'

Balance of Property (Future Phase)	6.10 Acre / 265,885 Sq. Ft.
------------------------------------	-----------------------------

LANDSCAPING	
Residential Per Acre	1 Canopy Tree 4.0" Caliper (Min. of 10')
Side Building Setback	1 Undersitory Tree 1.5" Caliper (Min. of 8')

5' Landscaped Buffer Area around parking lots with 3' tall screening (shrubs, etc.)

CURVE DATA CHART					
Curve #	Radius	Length	Delta	Chord Direction	Chord Length
C1	728.43'	62.26'	04°53'49"	N76°31'37"W	62.24'
C2	25.00'	40.92'	93°47'14"	S56°01'40"W	36.50'
C3	25.00'	37.62'	86°12'46"	N33°58'20"W	34.17'



1. THE PROPERTY SHOWN HEREON IS LOCATED WITHIN THE CITY LIMITS OF LAVERGNE, TENNESSEE AND IS ZONED R-1.
2. THE PROPERTY IS OWNED BY AMNON SHRIEMAN, TRUSTEE.
3. THIS ENTIRE TRACT IS LOCATED IN AN AREA DESIGNATED AS ZONE "X" (AREAS DETERMINED TO BE OUTSIDE OF THE 500-YEAR FLOOD PLAIN ON FEMA FIRM MAP NO. 47740C0201 H, EFFECTIVE DATE JANUARY 5, 2007.
4. THE PURPOSE OF THIS FINAL PLAN IS CREATE 9 LOTS.
5. NO HOME SHALL BE FURTHER THAN 500' FROM THE NEAREST FIRE HYDRANT.
6. ALL WATER AND SANITARY SEWER LINES SHOWN HEREON SHALL BE PUBLIC AND DEDICATED TO THE CITY OF LAVERGNE.
7. ALL STREETS TO HAVE CURBS AND GUTTER. STORM WATER CONVEYANCE SHALL BE BY OPEN DITCHES ALONG THE REAR LOT LINES AND BY STORM INLETS IN STREETS WITH UNDERGROUND PIPES. CALCULATIONS TO BE SUBMITTED WITH CONSTRUCTION PLANS AND FINAL PLAN.
8. NO GRADING WORK SHALL COMMENCE UNTIL A NOTICE OF COVERAGE FROM THE STATE OF TENNESSEE HAS BEEN ACQUIRED AND THE CITY OF LAVERGNE HAS ISSUED A GRADING PERMIT FOR THIS SITE.
9. THE OWNER/DEVELOPER OR CONTRACTOR SHALL EMPLOY A TESTING AGENCY TO OBSERVE FILL PLACEMENT.
10. AN ENGINEER STAMP BY THE TESTING AGENCY IS REQUIRED FOR EACH LOT CONTAINING FILL MATERIAL.
11. ALL REPORTS FROM THE TESTING AGENCY SHALL BE SUBMITTED TO THE CITY ENGINEER PRIOR TO LOT ACCEPTANCE.
12. STRUCTURAL FILL FOR RESIDENTIAL STRUCTURES SHOULD BE COMPACTED TO AT LEAST 95 PERCENT OF STANDARD PROCTOR DRY DENSITY.
13. ANY SINKHOLE AND/OR DEPRESSION REMEDIATION SHALL BE EVALUATED BY THE TESTING AGENCY.
14. FOUNDATIONS EXCAVATED ON A FILL LOT WILL BE EVALUATED BY THE TESTING AGENCY AND WILL REQUIRE AN ENGINEER STAMP. IF FOUNDATIONS ARE EXCAVATED BELOW THE FILL MATERIAL AND INTO IN-SITU MATERIAL, THE MINIMUM REQUIREMENTS WILL BE ALLOWED.
15. ALL ROADS SHALL COMPLY WITH THE PUBLIC WORKS SPECIFICATION MANUAL, PART III, BASE AND SUB-GRADE TREATMENT FOR STREET CONSTRUCTION. THESE SPECIFICATIONS SHALL BE IN THE MINIMUM STANDARDS FOR ANY SUBDIVISION WITHIN THE JURISDICTION AREA.
16. THE LOCATION AND SIZES FOR STORM DRAINAGE WITH NECESSARY EASEMENTS SHALL BE SHOWN ON THE FINAL SITE DEVELOPMENT PLANS AND ALSO ON THE FINAL SUBDIVISION PLAN.
17. THE LIMITS OF THE EXISTING VEGETATION SHALL BE LOCATED AND DELINEATED ON THE FINAL SITE DEVELOPMENT PLANS.
18. THE RESIDENTIAL REQUIREMENTS FOR LANDSCAPING ARE 1 CANOPY AND 1 UNDERSTORY TREE PER LOT.
19. SLOPES ACROSS THE SITE RANGE FROM 0% TO 14%. THE SOILS TYPES ARE MAINLY ROCK OUTCROPS WITH A COMBINATION OF SILT LOAM.
20. THE FINAL GRADES SHALL BE DELINEATED ON THE FINAL SITE DEVELOPMENT PLANS AND SHALL DEMONSTRATE THE ADAPTABILITY OF PROPOSED STRUCTURES TO THE SITE CONDITIONS.
21. THE RESTRICTIVE COVENANTS FOR THIS DEVELOPMENT SHALL BE CREATED AND RECORDED WITH THE FINAL SUBDIVISION PLAN.
22. NO FILL MATERIAL OR STRUCTURES THAT WOULD IMPEDE THE FLOW OF STORMWATER AS SHOWN SHALL BE ALLOWED IN DRAINAGE EASEMENTS.
23. PUBLIC UTILITY AND DRAINAGE EASEMENTS WHERE SHOWN HEREON ARE INTENDED TO INDICATE AN EASEMENT FOR CONDUCTION, OPERATION, AND MAINTENANCE OF PUBLIC UTILITIES AND DRAINAGE WAYS, INCLUDING BUT NOT LIMITED TO SANITARY SEWERS, FORCEMAINS, WATER LINES, AND DRAINAGE PIPES.
24. IT IS THE RESPONSIBILITY OF EACH RESIDENTIAL BUILDER TO DESIGN AND CONSTRUCT A SUITABLE GRADING AND DRAINAGE SCHEME WHICH WILL CONVEY SURFACE WATER, WITHOUT PONDING IN THE LOT OR UNDER THE HOUSE, FROM HIS STRUCTURE TO THE DRAINAGE SYSTEM CONSTRUCTED BY THE SUBDIVISION DEVELOPER.
25. THE STORMWATER DETENTION POND ON THE OPEN SPACE LOT IS TO BE OWNED AND MAINTAINED BY THE HOMEOWNERS ASSOCIATION. THE ENTIRE LOT IS DESIGNATED AS A PUBLIC UTILITY AND DRAINAGE EASEMENT.
26. LOTS 101 & 109 SHALL NOT HAVE DIRECT DRIVEWAY ACCESS TO JONES MILL ROAD.
27. PRE-APPLICATION MEETING WAS HELD WITH CITY PLANNER AND CITY ENGINEER ON MAY 15, 2015.
28. LIGHTING PLAN SHOWN HEREON TO BE APPROVED BY POWER COMPANY WHEN FINAL DESIGN IS DEVELOPED.
29. ORIGINAL CONSTRUCTION PLANS APPROVED 2/11/2016.

I (we) hereby certify that I am (we are) the owner(s) of the property shown and described hereon as evidenced in Book 1373, Page 3036, Rutherford County Registers Office, and that I (we) hereby adopt this plan of subdivision with my (our) free consent, establish the minimum building restriction lines, and that offers or irrevocable dedication for all public ways, utilities and other facilities have been filed.

By: ATM Gen. J. P. C. K. K. K. Date: 6/18/19

I hereby certify (1) that the following water and sewer system outlined or indicated on the final subdivision plat entitled Lt. Frank Walkup Subdivision, Phase One has been installed in accordance with the current local and/or state government requirements, or (2) a surety bond has been posted with the City Commission to assure completion of the following improvements in case of default.

Sewer System 6124119, 2019 [Signature]
Date City of La Vergne - Public Works Director

I hereby certify that the subdivision plat shown hereon has been found to comply with the La Vergne Subdivision Regulations, with the exception of such variances, if any, as are noted in the minutes of the Planning Commission and that it has been approved for recording in the office of the County Register.

0/25/ _____, 201
Date

I hereby certify: (1) that all designated public ways on this final subdivision plat have been installed in an acceptable manner and according to the specifications of the La Vergne Subdivision Regulations, or (2) that a performance bond or other surety has been posted with the planning commission to guarantee completion of all required improvements in case of default.

6/24/19, 2019
Date

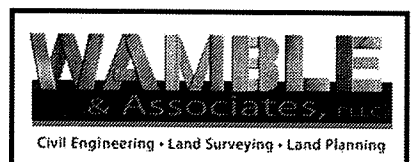
I hereby certify that the plan shown and described hereon is true and correct and that this survey exceeds the minimum requirements of an "Urban Land Survey", Category "I", as per current Standards of Practice adopted by the Board of Examiners for Land Surveyors for the State of Tennessee and that the ratio of precision is greater than 1:15,000.



FINAL PLAT
PHASE ONE
Lt. FRANK WALKUP
SUBDIVISION

SECOND CIVIL DISTRICT
La VERGNE, RUTHERFORD COUNTY, TENNESSEE

OWNER:
AMNON SHREIBMAN
P.O. BOX 1746
La VERGNE, TENNESSEE 37086
(615) 793-6663



W&A FILE NO.: 249-0306

REV: JANUARY 18, 2018
DATE: JANUARY 2, 2018

LT. FRANK WALKUP SUBDIVISION – PHASE 2

OFFER OF IRREVOCABLE DEDICATION

AGREEMENT made this 13th day of February 2023, by and between Nir Homes, Inc., having its office and place of business at P O Box 177, La Vergne, Tennessee, hereinafter designated as the "Developer" and the City of La Vergne, Tennessee, hereinafter designated the "City".

WHEREAS, the City Planning Commission approved on November 27, 2018, a subdivision plat entitled, Lt. Frank Walkup – Phase 2, and said plat was recorded on October 26, 2021, in Plat Cabinet 46, Page 204, Registers Office of Rutherford County, Tennessee;

WHEREAS, said plat designates certain public improvements consisting of streets, sidewalks, water, sanitary sewer, and storm drainage to be dedicated to the City, free and clear of all encumbrances and liens, pursuant to the requirements of the planning commission and local government code; and

WHEREAS, the developer, simultaneously herewith, has posted cash security with the City for the maintenance and dedication of said improvements, if required;

WHEREAS, the developer is desirous of offering for dedication the Lt. Frank Walkup – Phase 2 improvements and land to the City more particularly described on the recorded plat of Lt. Frank Walkup – Phase 2, recorded on October 26, 2021 in Plat Cabinet 46, Page 204, Registers Office Rutherford County, Tennessee, attached hereto;

NOW, THEREFORE, in consideration of the sum of one dollar (\$1.00) lawful money of the United States paid by the City to the Developer and other good and valuable consideration, it is mutually **AGREED** as follows:

A. The Developer herewith delivers to the City the Lt. Frank Walkup – Phase 2 improvements shown on the Lt. Frank Walkup – Phase 2 final plat attached hereto, said delivery being a formal offer of dedication to the City until the acceptance or rejection of such offer of dedication by the City of La Vergne Board of Mayor and Alderman.

B. The Developer agrees that said formal offer of dedication is irrevocable and can be accepted by the City at the time.

C. The Developer agrees to complete the maintenance of the land and improvements pursuant to the cash security and the requirements of the City and any ordinances, regulations, requirements, covenants, and agreements that may be imposed by the City with respect thereto and, upon acceptance by the City of the offer of dedication, furnish to the City a sworn statement certifying that the premises are free and clear of all liens and encumbrances.

D. That this irrevocable offer of dedication shall run with the land and shall be binding on all assignees, guarantees, successors, or heirs of the developer.

2-13-2023

Date

Amnon Shreibman, President By
Amnon Shreibman with permission
Amnon Shreibman dba Nir Homes, Inc

(CORPORATE SEAL)

FOR THE CITY OF LA VERGNE BY
ATTEST:

Mayor

Date

STATE OF TENNESSEE

COUNTY OF RUTHERFORD

SS.: _____

On this ____ day of _____, _____, before me personally appeared _____, to me known, who, being by me first duly sworn, did depose and said that he resides in _____; that he is the _____ of _____, the corporate seal affixed to said instrument is such corporate seal; that it was so affixed by order and authority of the Board of Directors of said corporation, and that he signed his name thereto by like order and authority.

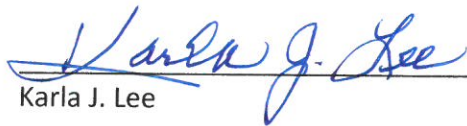
_____, My commission expires _____
Notary Public

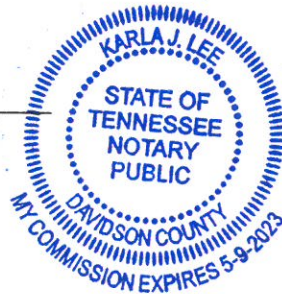
CO-PARTNERSHIP

STATE OF TENNESSEE)

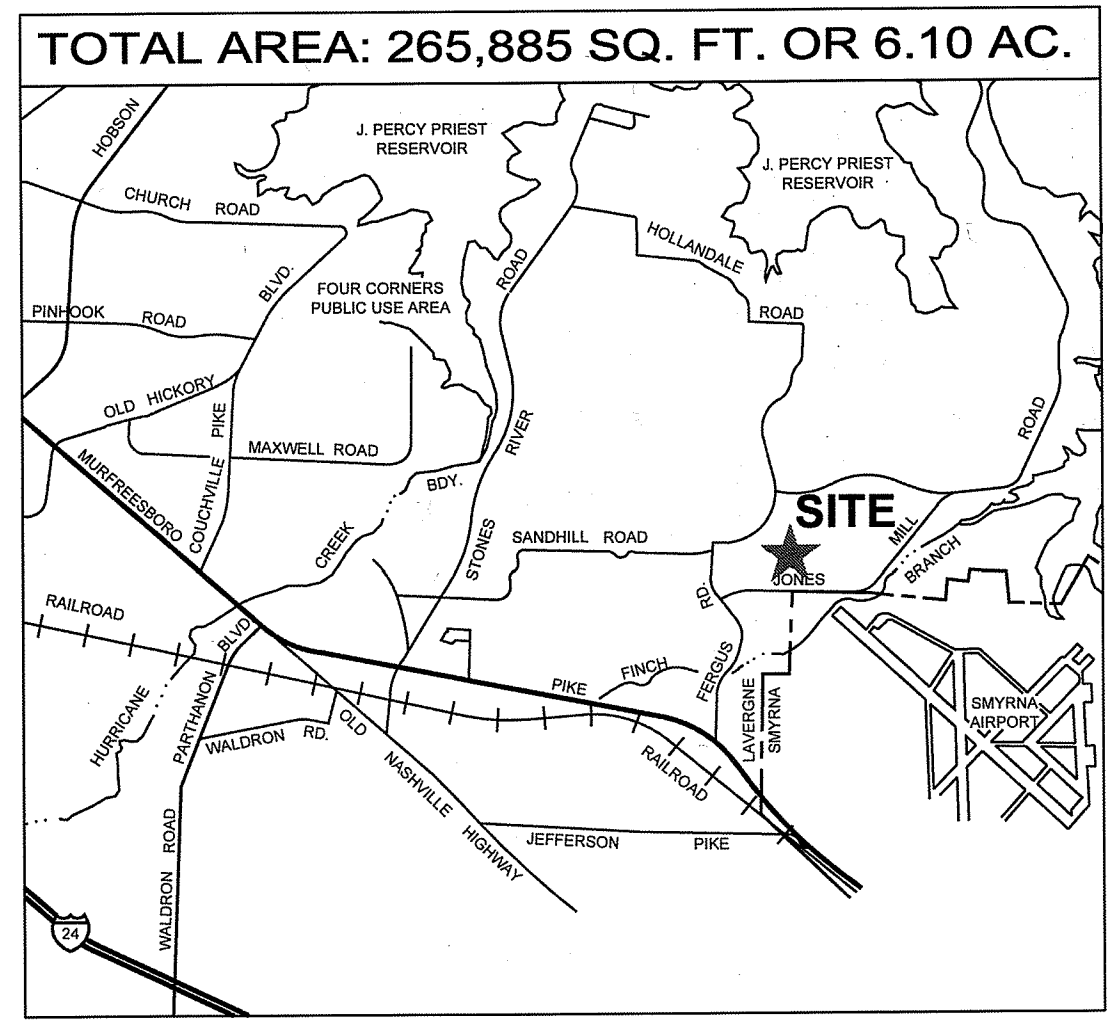
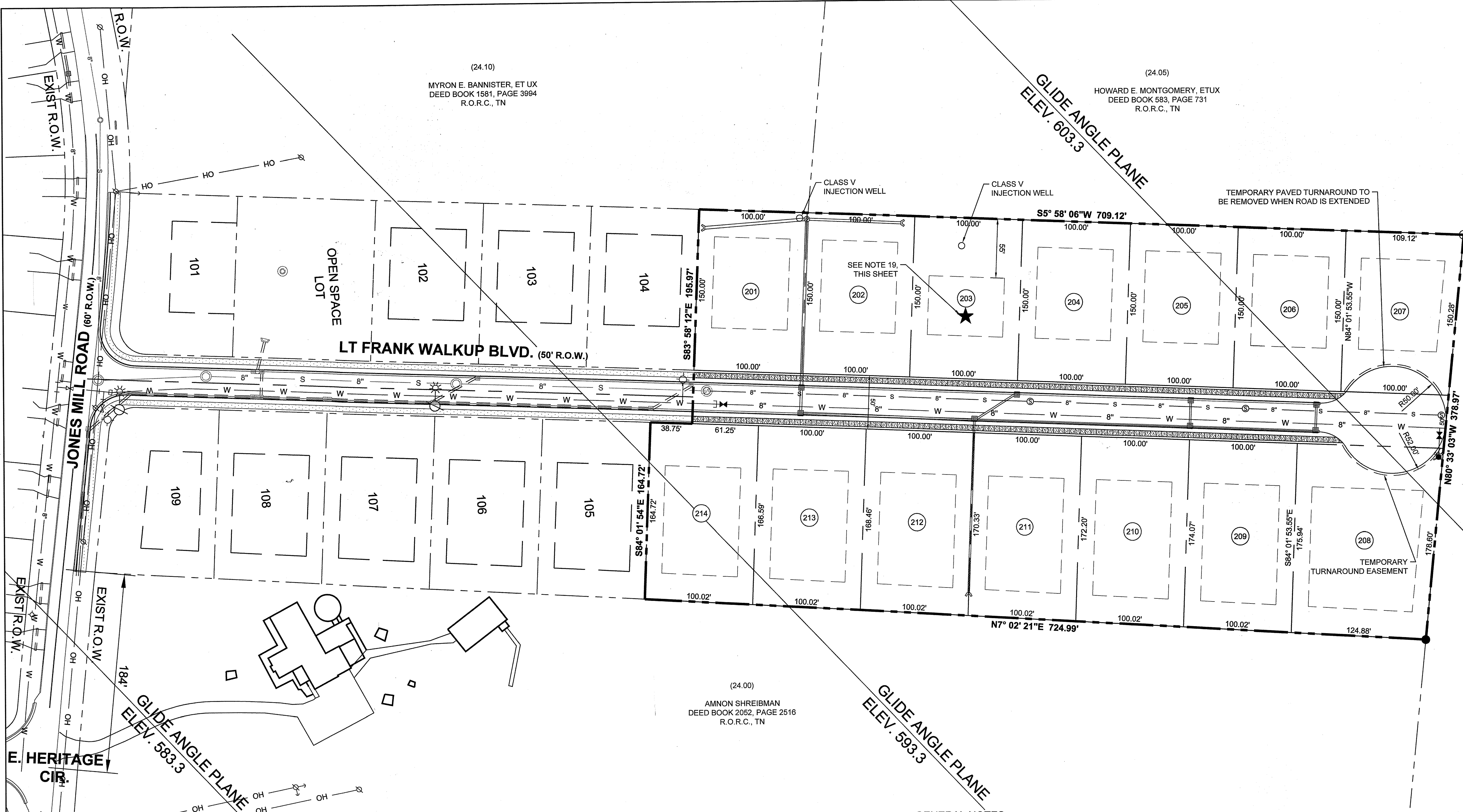
COUNTY OF WILLIAMSON)

On this 13th day of February, 2023, The foregoing instrument, *Irrevocable Dedication*, was acknowledged before me by James D. Wamble.


Karla J. Lee



My Commission Expires: 05/09/2023



CERTIFICATE OF OWNERSHIP AND DEDICATION

I (we) hereby certify that I am (we are) the owner(s) of the property shown and described hereon as evidenced in Record Book 1373 Page 3036, Rutherford County Register's Office, and that I (we) hereby adopt this plan of subdivision with my (our) free consent, establish the minimum building restriction lines, and that offers or irrevocable dedication for all public ways, utilities and other facilities have been filed.

Owner: Amnon Shreibman
Amnon Shreibman - Owner

CERTIFICATE OF APPROVAL OF SEWER SYSTEMS

I hereby certify (1) that the following sewer system outlined or indicated on the final subdivision plat entitled Lt. Frank Walkup Subdivision, Phase Two, has been installed in accordance with the current local and/or state government requirements, or (2) a surety bond has been posted with the City Commission to assure completion of the following improvements in case of default.

Sewer System 10/12, 2021
City of La Vergne - City Engineer

CERTIFICATE OF APPROVAL OF WATER SYSTEMS

I hereby certify (1) that the following water system outlined or indicated on the final subdivision plat entitled Lt. Frank Walkup Subdivision, Phase Two, has been installed in accordance with the current local and/or state government requirements, or (2) a surety bond has been posted with the City Commission to assure completion of the following improvements in case of default.

Water System 10/12, 2021
City of La Vergne - City Engineer

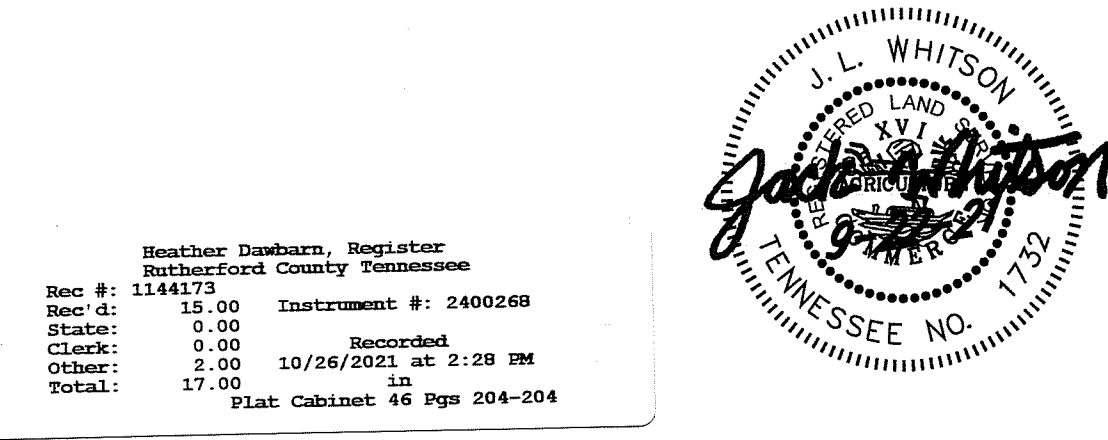
CERTIFICATE OF APPROVAL FOR RECORDING

I hereby certify that the subdivision plan shown hereon has been found to comply with the La Vergne Subdivision Regulations, with the exception of such variances, if any, as are noted in the minutes of the Planning Commission and that it has been approved for recording in the office of the County Register.

10/12, 2021
Secretary, Planning Commission

CERTIFICATE OF ACCURACY

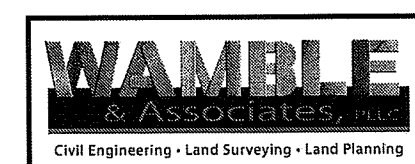
I hereby certify that the plan shown and described hereon is true and correct and that this survey exceeds the minimum requirements of an "Urban Land Survey", Category "I", as per current Standards of Practice adopted by the Board of Examiners for Land Surveyors for the State of Tennessee and that the ratio of precision is greater than 1:15,000.



FINAL PLAT
PHASE TWO
LT. FRANK WALKUP
SUBDIVISION

SECOND CIVIL DISTRICT
La VERGNE, RUTHERFORD COUNTY, TENNESSEE

Owner and Developer:
Amnon Shreibman
P.O. Box 177
La Vergne, TN 37086



W&A FILE NO.: 249-1118

GENERAL NOTES

- 1. The property shown hereon is located within the city limits of La Vergne, Tennessee and is zoned R-1.
- 2. The property is owned by Amnon Shreibman.
- 3. This entire tract is located in an area designated as Zone "X" (Areas determined to be outside of the 0.2% annual chance floodplain on FEMA FIRM Map No. 47149C0203, revised October 16, 2008).
- 4. No home shall be further than 500' from the nearest fire hydrant.
- 5. All water and sanitary sewer lines shown hereon shall be public and dedicated to the City of La Vergne.
- 6. Storm water conveyance shall be by open ditches along the side and rear lot lines and existing ditch lines along existing roads.
- 7. No grading work shall commence until a notice of coverage from the State of Tennessee has been acquired and the City of La Vergne has issued a grading permit for this site.
- 8. Sinkholes and/or depressions on lots 201, 202 and 203 shall be repaired in accordance with a Class V Injection Well permit from TDEC.
- 9. All roads proposed in this development shall comply with the public works specification manual, part iii, base and sub-grade treatment for street construction. These specifications shall be in the minimum standards for any subdivision within the jurisdiction area.
- 10. The residential requirements for landscaping are 1 canopy and 1 understory tree per lot.
- 11. No fill material or structures that would impede the flow of stormwater as shown hereon shall be allowed in drainage easements.
- 12. Public utility and drainage easements where shown hereon are intended to indicate an easement for construction, operation, and maintenance of public utilities and drainage ways, including but not limited to sanitary sewers, forcemains, water lines, and drainage pipes.
- 13. It is the responsibility of each residential builder to design and construct a suitable grading and drainage scheme which will convey surface water, without ponding in the lot or under the house, from his structure to the drainage system constructed by the subdivision developer.
- 14. Each lot must accommodate three (3) standard parking spaces.
- 15. Developer shall be responsible for installing street lights as per City of La Vergne standards. No certificates of occupancy will be issued until street lights are installed according to City standards.
- 16. A total of 14 lots are proposed in this development.
- 17. The Preliminary plan was approved on October 30, 2018 by the City of La Vergne Planning Commission for the 14 new lots in this residential development project.
- 18. All lots are within the approximate limits as shown hereon of tract numbers B-203-E, B-208-E and B-218-E described in Deed book 117, page 193 over which the United States of America acquired certain rights pertaining to air clearance for the Stewart Air Force Base (Brynnair Airport). This property is in near proximity of the runway for the departure and arrival of airplanes for Stewart Air Force Base, therefore, no portion of any houses to be constructed on these lots shall be at an elevation higher than the following Glide Angle Elevations

Lot Number	Calculated Glide Angle Elevation	Lot Number	Calculated Glide Angle Elevation
201	597.0	208	601.7
202	598.4	209	600.1
203	599.8	210	598.8
204	601.2	211	597.4
205	602.6	212	596.0
206	604.0	213	594.6
207	605.4	214	593.3

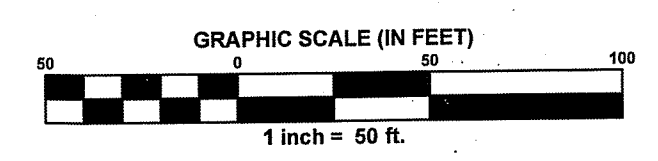
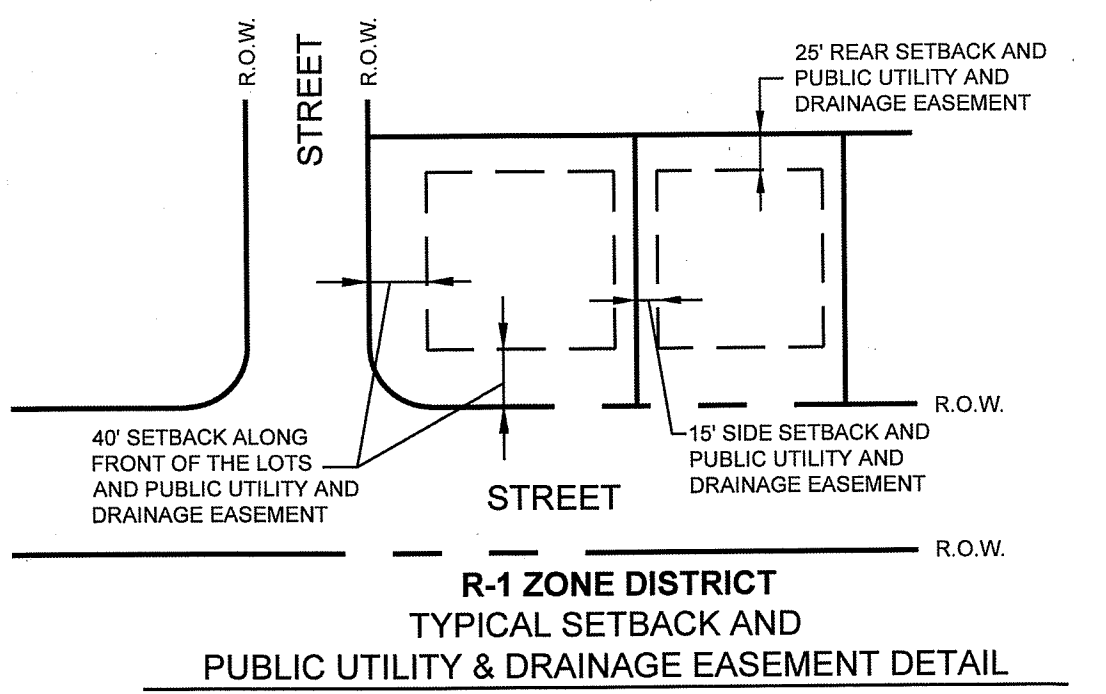
19. Lots designated thus ★ hereon are Critical Sinkhole lots. In order to construct houses on these designated lots, the builder must provide written house foundation inspection and approval of the house foundation stamped by a professional Geotechnical Engineer to the La Vergne City Engineer for approval prior to pouring the house footings on each lot.

LEGEND

- Utility Pole
- Utility Pole w/Lamp
- Fire Hydrant
- Overhead Utility Line
- Sanitary Sewer
- Water Line
- Water Meter
- Iron Rod (Old)
- Iron Rod (New)
- Concrete Monument (Old)
- Fence Line

Lot #	Square Feet	Acres
201	15000	0.34
202	15000	0.34
203	15000	0.34
204	15000	0.34
205	15000	0.34
206	15000	0.34
207	15684	0.36
208	23080	0.53
209	17500	0.40
210	17313	0.40
211	17126	0.39
212	16939	0.39
213	16752	0.38
214	16565	0.38

SITE DATA	
OWNER	AMNON SHREIBMAN
ADDRESS	LT FRANK WALKUP BLVD.
EXISTING ZONING	R-1
MAP / PARCEL	MAP 14 / PARCELS 24.13
MINIMUM LOT SIZE (ZONING)	15,000 SQ. FT.
MINIMUM LOT SIZE (DESIGNED)	15,000 SQ. FT.
TOTAL SITE AREA	6.10 ACRES
TOTAL NUMBER OF LOTS	14
DENSITY	2.30 LOTS / ACRE
MINIMUM FRONT SETBACK	40'
MINIMUM SIDE SETBACK	15'
MINIMUM REAR SETBACK	25'
OPEN SPACE	0





Item #: 4.

Item Title: Site Plan - 5450 Murfreesboro Road - New Retail Building Totaling 11,550 Square Feet on 1.53 Acres. Requested by Huddleston - Steele, Inc. Property located at 5450 Murfreesboro Rd. (Tax Map 18B, Group E, Parcel 3). C-2 (Highway Service Commercial) Zoning District. Property owned by FHY Realty Investors, LLC.

Reviewed By:

Location:

(Insert map here)

Summary: On behalf of their client, Huddleston-Steele is requesting site plan approval for a proposed retail facility on Murfreesboro Road. This lot is proposed to have a new building comprised of 11,550 square feet. This parcel is contained within the Murfreesboro Road Overlay Streetscape District and must adhere to the applicable overlay provisions. Color elevations as well as a materials board have been provided.

Staff Comments / Technical Items:

Planning

Bo Logan - 615-287-8702
blogan@laveragnetn.gov

(Technical items go here)

Engineering

Gary Lide - 615-971-4069
glide@laveragnetn.gov

No comments

Utilities

Scott Tatalovich - 615-287-8739
statalovich@laveragnetn.gov

Comments regarding the Utility Plan (Sht 3/9):

1. Remove the word "Public" from the 6 inch sanitary sewer, which is shown on the adjacent property to the west of 5450 Murfreesboro Rd (unless you have documentation otherwise).
2. Remove the word "Town of" in all notes, as it applies to the City of La Vergne.
3. Show existing PUDE on Washtopia property for existing 8" gravity sewer, which is a 15' easement.

4. Label all ROW, property, and easement lines. Property and ROW lines are customarily phantom lines, and easements are customarily dashed lines for clarity.

5. Fonts on this sheet are almost illegible at full scale plans, I can barely make out the lettering for 6-inch fire line and 2-inch domestic water services to the building (because the text is bold and thicker than the others). Suggest working on your CAD standards and plan presentation.

6. Label 6" *"fire line"* to building for clarity.

7. Label 2" *"domestic waterline"* to building for clarity.

8. See item 6 on the fire line. If you locate a check valve outside the building, it should be in a vault, which shall be shown and drawn to scale, and deep enough for frost protection.

9. Recommend 2" domestic water line isolation valve at the initial connection to the 6" fire line.

10. Show cleanout (C.O.) at every building sewer connection no more than 5 feet off the building, at every angle point greater than 45 degrees, and not more than every 100 feet on your sewer service line, so that a 50 foot snake can clean any portion of the gravity sewer.

11. Show existing PUDE on Washtopia site for existing public gravity Sewer.

12. Provide plan view boundary and clear separation between the two plan views represented on this sheet - it's confusing where the top plan ends and the bottom one starts.

13. Grinder Pump tank needs electrical service and above ground panel, please locate them on the plan. Recommendations: 1) use the 240-volt E-One pump not the 120-volt version (design your electrical service accordingly), 2) include a profile section detail of the grinder pump tank, so details of the pump station design are understood and considered, such as a) depth of wet well, b) float on and off levels, c) wet well storage volume, d) electrical panel design and size, e) how is station be monitored and how is owner notified of a problem?, f) If you have telemetry or SCADA it must have a battery backup.

14. Show pipe stationing on the 2" force main and label "matchline" with respective station number on the plans where the plan is broken and separated.

15. The design shall not trench the back side of a public FH – a new alignment is needed for the offsite public low pressure sewer extension. Suggest easement with adjacent property between 5450 Murfreesboro Rd and the discharge MH on the Washtopia property.

16. Provide offsets from ROW for 2" force main alignment within public ROW. Without an easement in adjacent property, current low pressure sewer line alignment does not appear to have sufficient offset from the existing ROW for installation and maintenance.

17. The portion of the 2" Force main within public ROW is a public low pressure sewer extension and shall be labeled accordingly.

18. You shall obtain TDEC approval for the 2" low pressure sewer, public sewer extension.

19. Customer's 2" force main shall connect to City's 2" low pressure sewer extension at the ROW per City Std Dtl 19.0 (which is a ball valve and check valve in a box). City's standards are available on the City Website.

20. Where is the survey datum statement for this plan set?

21. Add note that the 2" low pressure sewer extension shall be design and installed in accordance with City of La Vergne's latest version of *Standard Sewer Specifications and Details*.

Codes

Randolph Salyers - 615-287- (Technical items go here)

8605

rsalyers@lavergn.net

Fire

Curtis Brinkley - 615-405-5931

cbrinkley@lavergn.net

FDC should be located 50' from the building in a box. It can be located at the top of the entryway at the road. Hydrant must be within 150' of FDC.

Police

JJ Eubank - 615-892-0161

jeubank@lavergn.net

No comments.

***Note:** The above technical items may not be the only corrections and/or issues needing to be resolved to get approval from the planning commission. New items can be brought up at the workshop and staff can add items at any time that might have been overlooked. It is the applicant's responsibility to make sure that all technical items are addressed and that no new issues exist before the planning commission meeting. Addressing all technical items does not constitute approval. It is the planning commission's decision whether an item passes or fails. Revised plans are due to staff by the following Monday at close of business unless other arrangements are made and documented.

5450 Murfreesboro Rd

MURFREESBORO RD

MURFREESBORO RD

NEAL BLVD

PYBURN ST

MESSINA CT



5450 Murfreesboro Rd



5450 Murfreesboro Rd



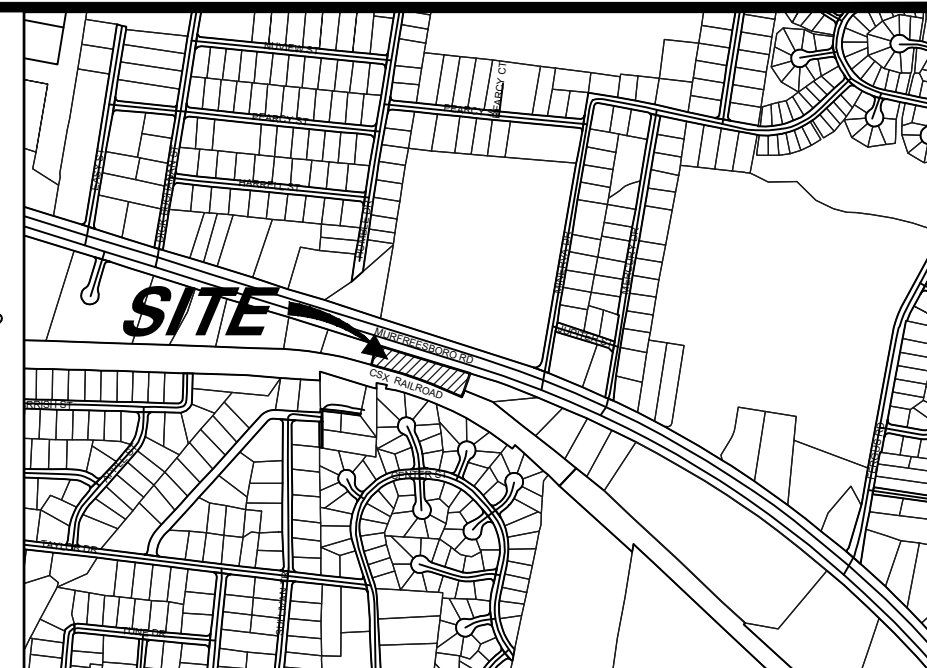


LEGEND

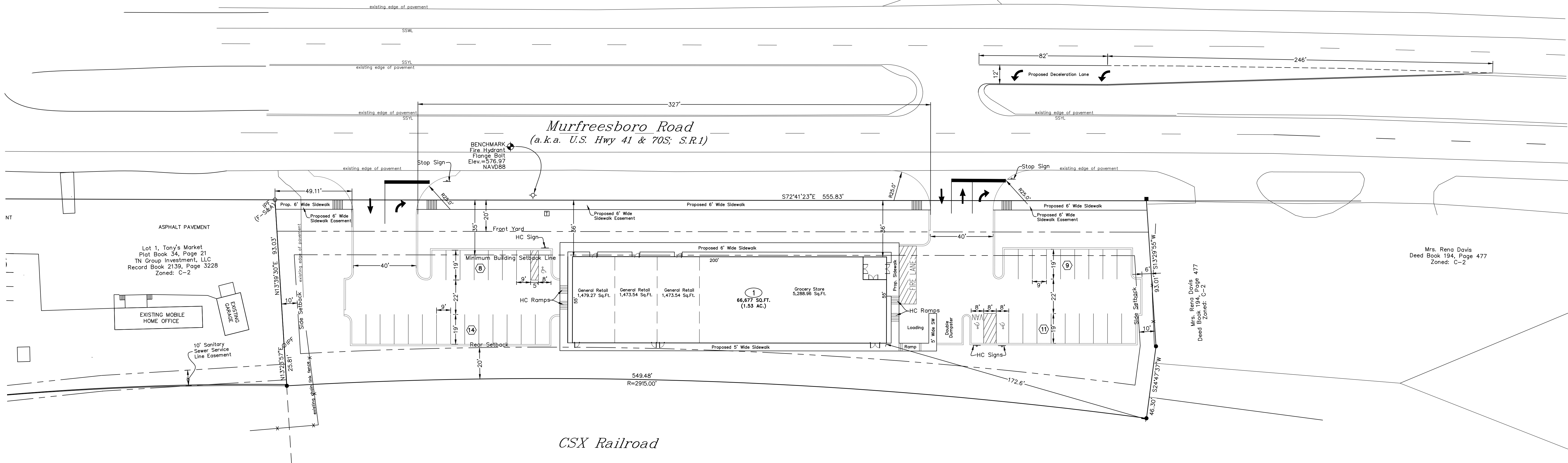
- Ø POWER POLE
-○- EXISTING FIRE HYDRANT
-●- PROPOSED FIRE HYDRANT
-△- REDUCER
WV WATER VALVE
▲ CONCRETE THRUST BLOCK
-W- EXISTING WATER LINE
-W- PROPOSED WATER LINE
-S- EXISTING SANITARY SEWER LINE
-S- PROPOSED SANITARY SEWER LINE
○ EXISTING MANHOLE
● PROPOSED MANHOLE
-00- EXISTING CONTOURS
-00- PROPOSED CONTOURS
GAS GAS METER
-G- EXISTING GAS LINE
-G- PROPOSED GAS LINE
-UE- PROPOSED UNDERGROUND ELECTRIC LINE
-D- PROPOSED UNDERGROUND DATA LINE CONDUIT
-P- PROPOSED UNDERGROUND PHONE LINE CONDUIT
✓ POWER POLE ANCHOR
+ EXISTING SPOT ELEVATION
+ PROPOSED SPOT ELEVATION
--- EXISTING STORM LINE
--- PROPOSED STORM LINE
WATER WATER METER

PLAN NOTES

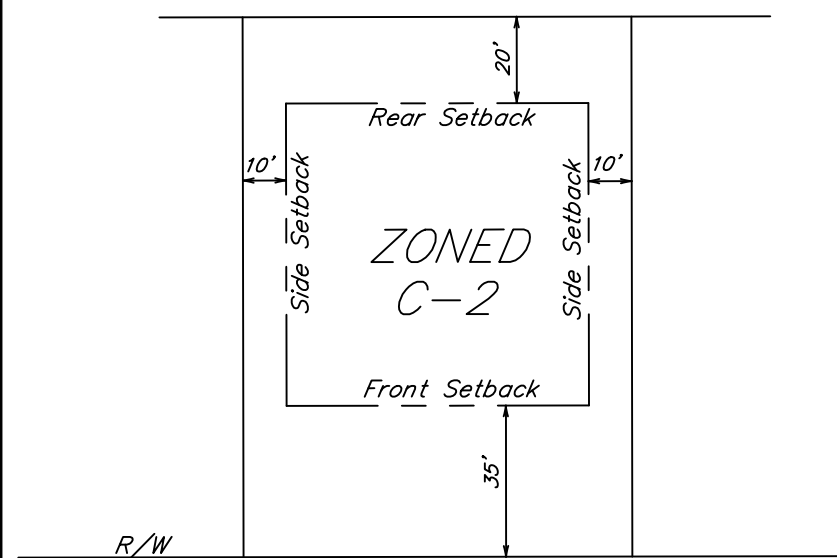
- In Tennessee, it is a requirement per "The Underground Utility Damage Prevention Act" that anyone who engages in excavation must notify all known underground utility owners, no less than three nor more than ten working days of their intent to excavate. A list of these utilities may be obtained from the County Register of Deeds. Those utilities that participate in the Tennessee One Call system can be notified by calling toll free 1-800-351-1111.
- Underground utilities shown were located using available above ground evidence, and also from information obtained from the respective utility companies. The existence or nonexistence of the utilities shown and any other utilities which may be present on this site or adjacent sites should be confirmed with the utility owner prior to commencing any work.
- Note removed.
- Parcels may be subject to additional easements, and/or restrictions, by record or prescription, that a complete title search may reveal.
- Public utility and drainage easements where shown hereon are intended to indicate an easement for construction, operation, and maintenance of public utilities and drainage ways; including, but not limited to, sanitary sewers, forcemains, water lines, telephone signal conduits, electric conductors, drainage pipes, and natural gas lines. Easements may not have infrastructure constructed within them until some future time and there may be no notice or consultation with the individual Owners/Tenants of this construction.
- For all developments of more than one acre, a State of Tennessee Construction General Permit is required.
- No work within T.D.O.T. right-of-way without prior written approval from T.D.O.T.
- Per the Town of La Vergne, development must be sprinkled per the City of La Vergne's fire sprinkler ordinance. A fire protection designer must provide a design from the backflow to the building.
- Per the Town of La Vergne, no more than 500 feet of open utility trench will be allowed at one time.
- Per the Town of La Vergne, the proposed sewer grinder pump station and onsite piping will be private and the property owner will be responsible for operation and maintenance.



LOCATION MAP
N.T.S.

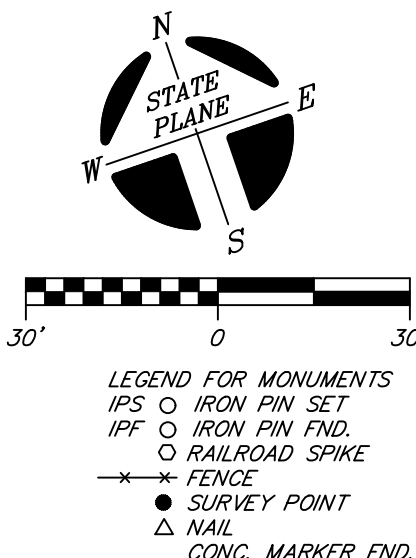


ZONING: C-2 Highway Service
FRONT SETBACK: 35'
SIDE SETBACK: 10'
REAR SETBACK: 20'
FRONT YARD: 20'



TYPICAL BUILDING SETBACK DETAIL
N.T.S.

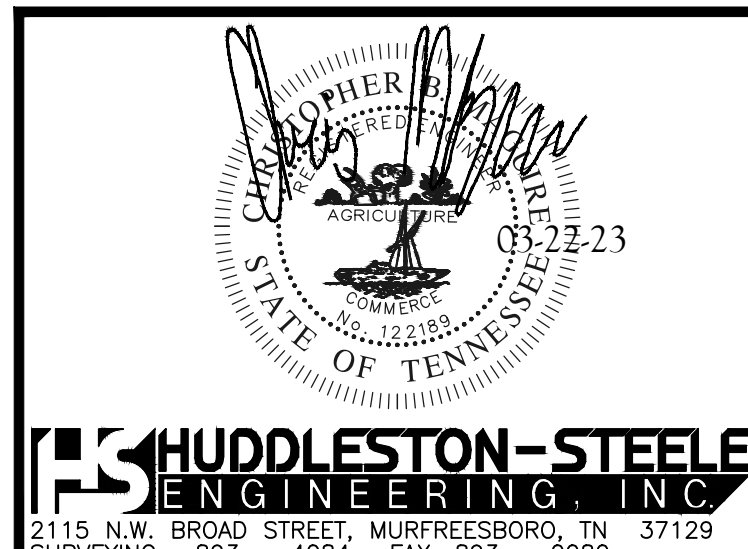
SITE DATA CHART	
LOT:	
LOT SIZE (S.F.):	66,677
FLOOR AREA RATIO:	0.17
SQUARE FOOTAGE OF PROPOSED BUILDING:	10,988
SQUARE FOOTAGE FOR USE:	
GENERAL RETAIL	4,426
GROCERY	6,562
PROPOSED USE: RETAIL/GROCERY	
PARKING REQUIRED:	
Retail: 4,426 Sq.Ft. / 300 = 14.75	41
Grocery: 6,562 Sq.Ft. / 250 = 26.25	
PARKING PROVIDED:	42
PROPOSED PARKING AREA (Sq.Ft.):	17,757
IMPERVIOUS SURFACE %:	50.01%
OPEN SPACE PROVIDED (Sq.Ft.):	33,331
CANOPY TREES REQUIRED (3 PER ACRE):	5
CANOPY TREES PROVIDED:	13
UNDERSTORY TREES REQUIRED (3 PER ACRE):	5
UNDERSTORY TREES PROVIDED:	9
SHRUBS REQUIRED (15 PER ACRE):	23
SHRUBS PROVIDED:	89
IMPERVIOUS SURFACE AREA (Sq.Ft.)	33,346



OWNER: FHMY Realty Investors, LLC
Attn: Mino Nagib
ADDRESS: 6645 Sugar Valley Drive
Nashville, TN 37211

Tax Map 18-B, Group E, Parcel 3.00
Record Book 2228, Page 3984

THIS TRACT IS NOT LOCATED IN AN AREA DESIGNATED AS "SPECIAL FLOOD HAZARD" ON THE NATIONAL FLOOD INSURANCE PROGRAM COMMUNITY MAP 470167, PANEL NO. 0020J, ZONE: X, DATED: OCTOBER 16, 2008.



DRAWING REVISIONS

NO.	DATE	DESCRIPTION
0	08-29-22	Original Issue - For Review
1	09-19-22	Revised Per La Vergne Workshop Comments
2	02-27-23	Revised For Resubmittal to Planning
3	03-20-23	Revised Per La Vergne Workshop Comments
4	03-22-23	Revised Per La Vergne Engineering Comments

SITE PLAN

5450 Murfreesboro Road
La Vergne, TN

3rd Civil District of Rutherford County, Tennessee

Date: August, 2022

Scale: 1"=30'

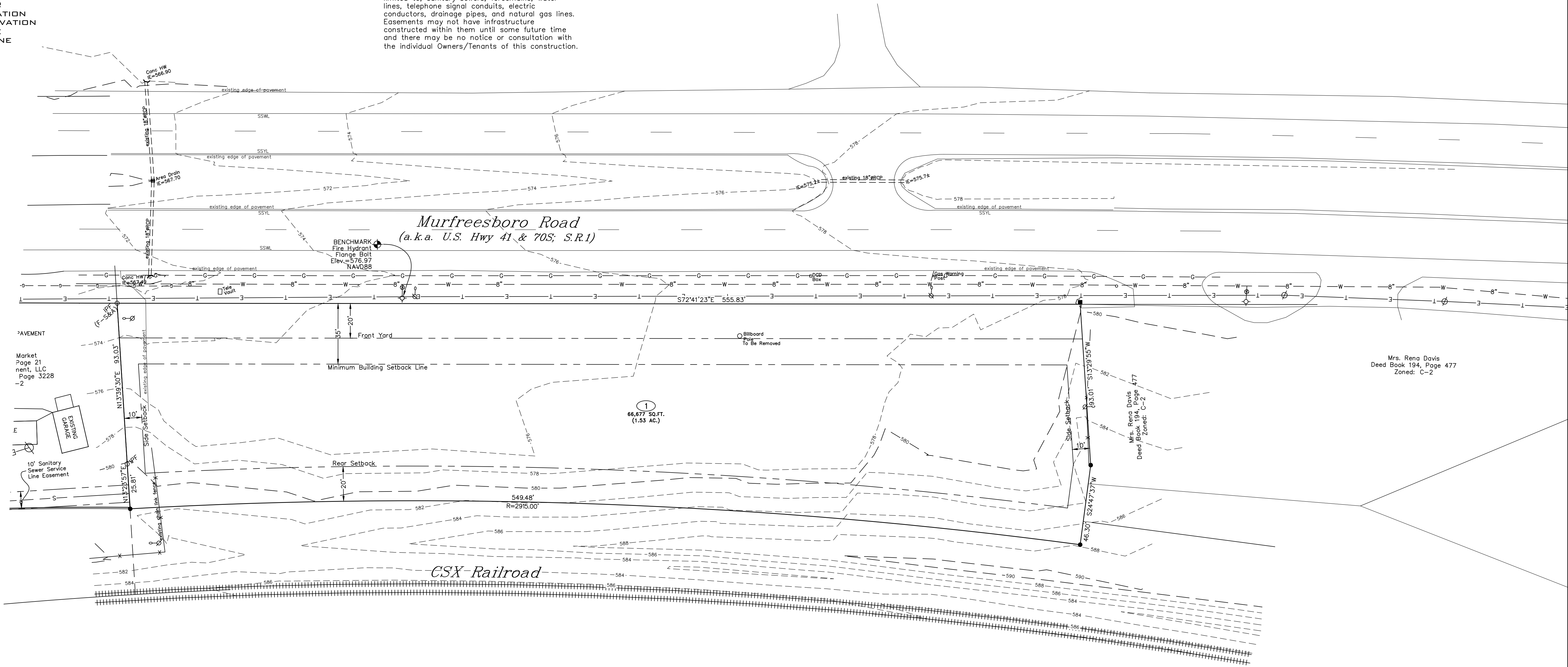
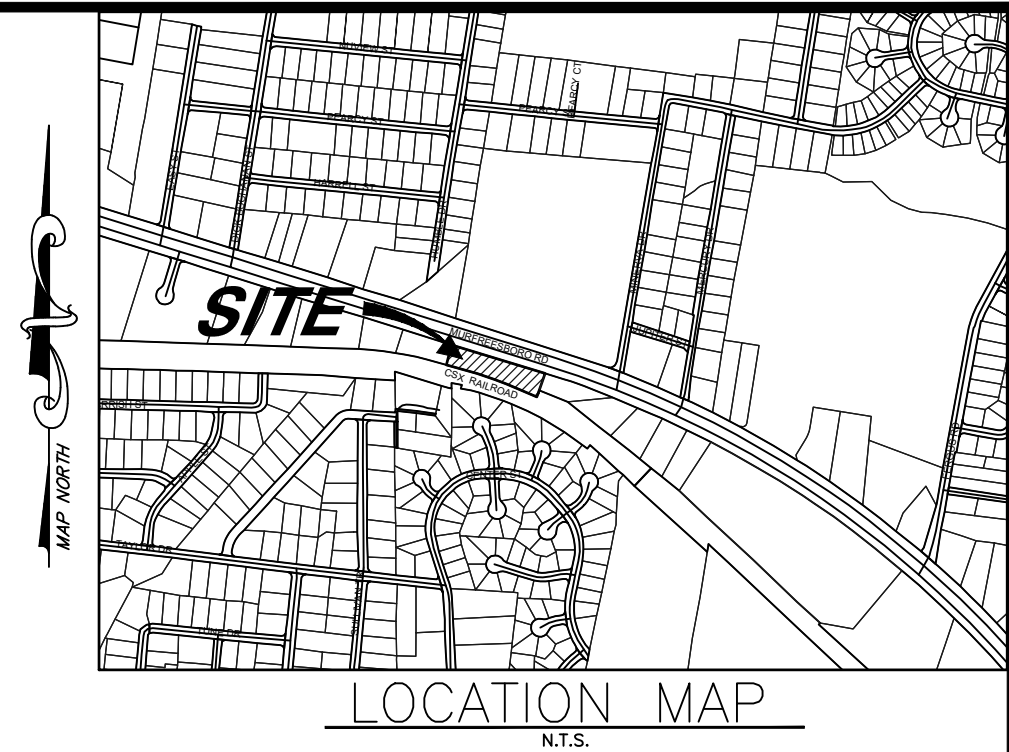
Sheet 1 of 9

LEGEND

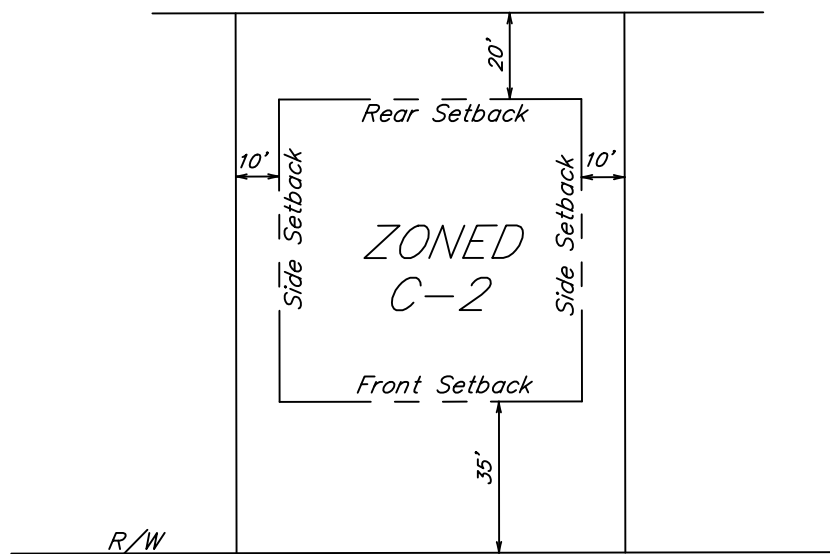
- Ø POWER POLE
-○- EXISTING FIRE HYDRANT
-●- PROPOSED FIRE HYDRANT
-△- REDUCER
WV WATER VALVE
▲ CONCRETE THRUST BLOCK
-W- EXISTING WATER LINE
-W- PROPOSED WATER LINE
-S- EXISTING SANITARY SEWER LINE
-S- PROPOSED SANITARY SEWER LINE
-○- EXISTING MANHOLE
-○- PROPOSED MANHOLE
-○○- EXISTING CONTOURS
-○○- PROPOSED CONTOURS
GAS GAS METER
-G- EXISTING GAS LINE
-G- PROPOSED GAS LINE
-UE- PROPOSED UNDERGROUND ELECTRIC LINE
-D- PROPOSED UNDERGROUND DATA LINE CONDUIT
-P- PROPOSED UNDERGROUND PHONE LINE CONDUIT
✓ POWER POLE ANCHOR
+ EXISTING SPOT ELEVATION
+ PROPOSED SPOT ELEVATION
--- EXISTING STORM LINE
--- PROPOSED STORM LINE
WATER WATER METER

PLAN NOTES

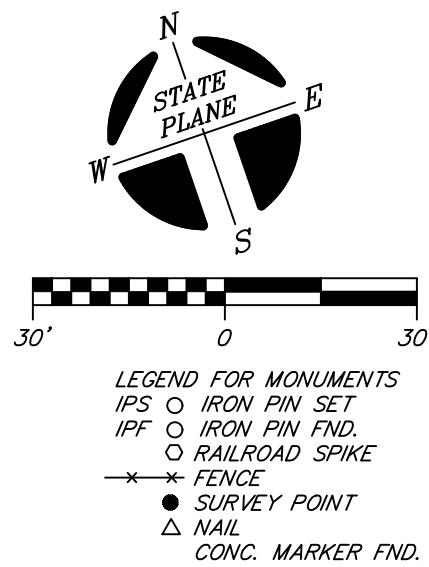
- In Tennessee, it is a requirement per "The Underground Utility Damage Prevention Act" that anyone who engages in excavation must notify all known underground utility owners, no less than three nor more than ten working days of their intent to excavate. A list of these utilities may be obtained from the County Register of Deeds. Those utilities that participate in the Tennessee One Call system can be notified by calling toll free 1-800-351-1111.
- Underground utilities shown were located using available above ground evidence, and also from information obtained from the respective utility companies. The existence or nonexistence of the utilities shown and any other utilities which may be present on this site or adjacent sites should be confirmed with the utility owner prior to commencing any work.
- Note removed.
- Parcels may be subject to additional easements, and/or restrictions, by record or prescription, that a complete title search may reveal.
- Public utility and drainage easements where shown hereon are intended to indicate an easement for construction, operation, and maintenance of public utilities and drainage ways; including, but not limited to, sanitary sewers, forcemains, water lines, telephone signal conduits, electric conductors, drainage pipes, and natural gas lines. Easements may not have infrastructure constructed within them until some future time and there may be no notice or consultation with the individual Owners/Tenants of this construction.
- For all developments of more than one acre, a State of Tennessee Construction General Permit is required.
- No work within T.D.O.T. right-of-way without prior written approval from T.D.O.T.
- Per the Town of La Vergne, development must be sprinkled per the City of La Vergne's fire sprinkler ordinance. A fire protection designer must provide a design from the backflow to the building.
- Per the Town of La Vergne, no more than 500 feet of open utility trench will be allowed at one time.
- Per the Town of La Vergne, the proposed sewer grinder pump station and onsite piping will be private and the property owner will be responsible for operation and maintenance.



ZONING: C-2 Highway Service
FRONT SETBACK: 35'
SIDE SETBACK: 10'
REAR SETBACK: 20'
FRONT YARD: 20'



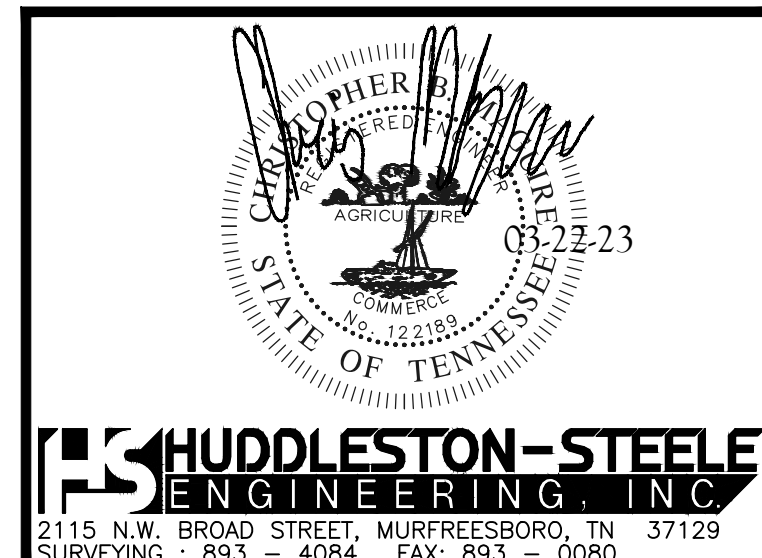
TYPICAL BUILDING SETBACK DETAIL



OWNER: FHMY Realty Investors, LLC
Attn: Mina Nagib
ADDRESS: 6645 Sugar Valley Drive
Nashville, TN 37211

Tax Map 18-B, Group E, Parcel 3.00
Record Book 2228, Page 3984

THIS TRACT IS NOT LOCATED IN AN AREA DESIGNATED AS "SPECIAL FLOOD HAZARD" ON THE NATIONAL FLOOD INSURANCE PROGRAM COMMUNITY MAP 470167, PANEL NO. 0020J, ZONE: X, DATED: OCTOBER 16, 2008.



DRAWING REVISIONS

NO.	DATE	DESCRIPTION
0	08-29-22	Original Issue - For Review
1	09-19-22	Revised Per La Vergne Workshop Comments
2	02-27-23	Revised For Resubmittal to Planning
3	03-22-23	Revised Per La Vergne Engineering Comments

EXISTING CONDITIONS

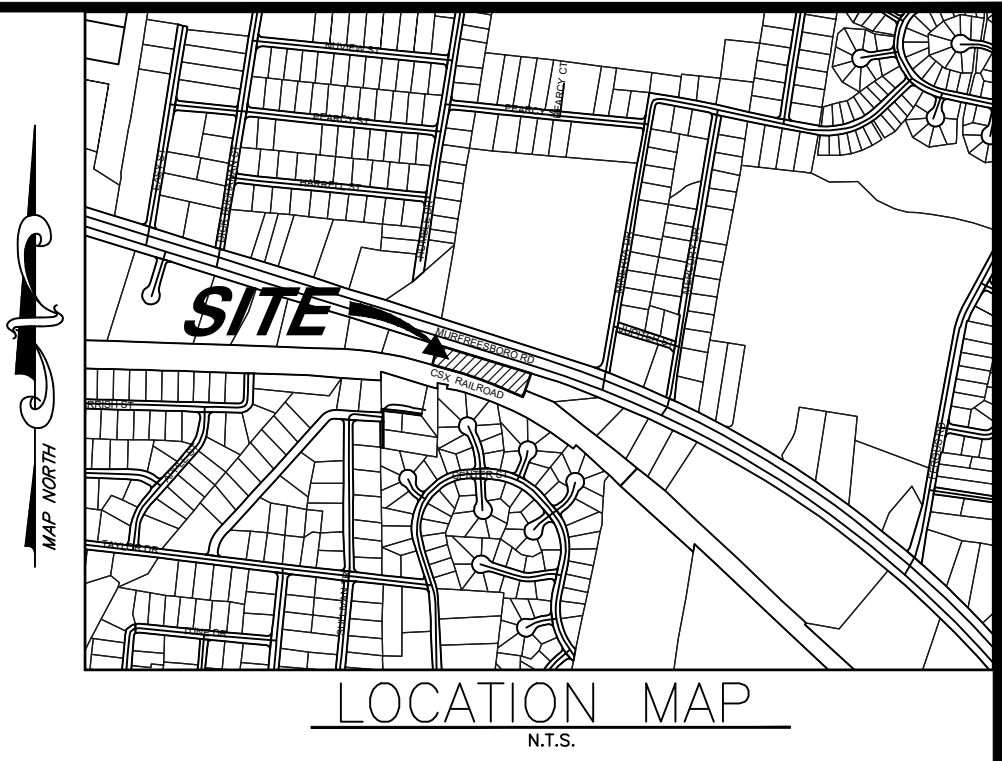
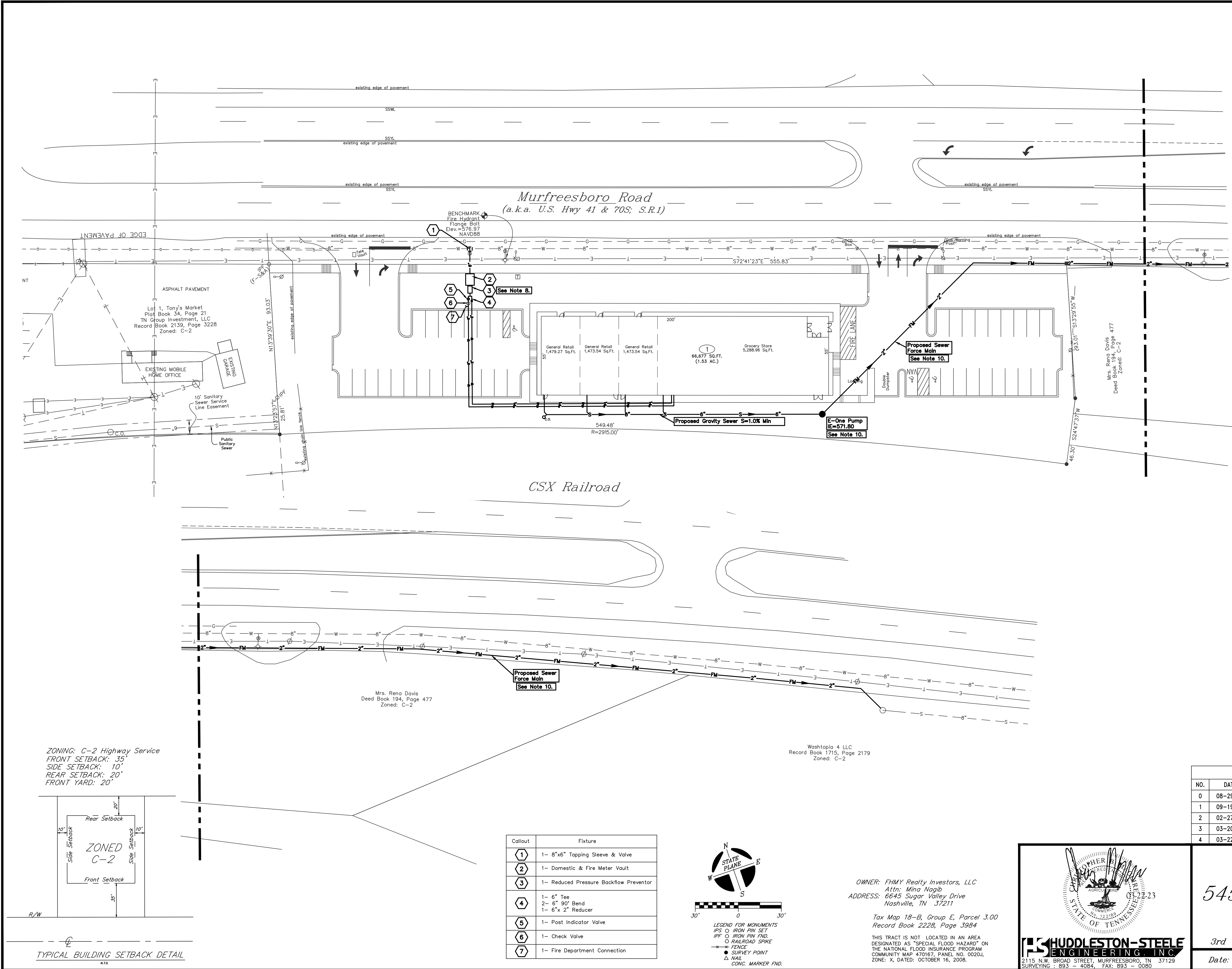
5450 Murfreesboro Road
La Vergne, TN

3rd Civil District of Rutherford County, Tennessee

Date: August, 2022

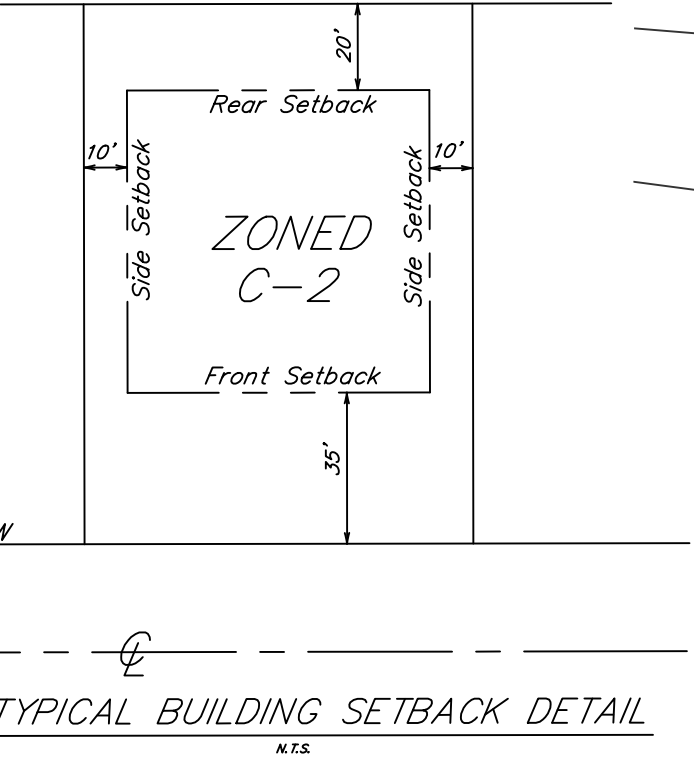
Scale: 1"=30'

Sheet 2 of 9

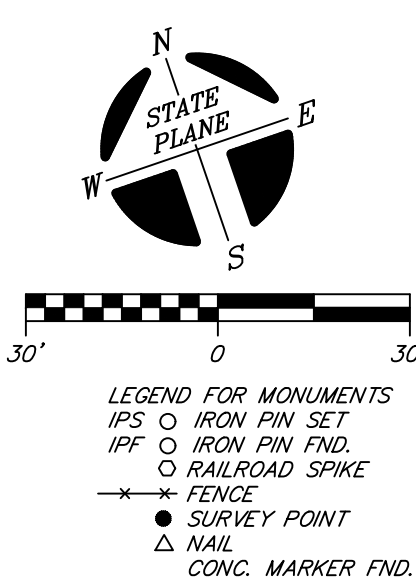


- PLAN NOTES**
- In Tennessee, it is a requirement per "The Underground Utility Damage Prevention Act" that anyone who engages in excavation must notify all known underground utility owners, no less than three nor more than ten working days of their intent to excavate. A list of these utilities may be obtained from the County Register of Deeds. Those utilities that participate in the Tennessee One Call system can be notified by calling toll free 1-800-351-1111.
 - Underground utilities shown were located using available above ground evidence, and also from information obtained from the respective utility companies. The existence or nonexistence of the utilities shown and any other utilities which may be present on this site or adjacent sites should be confirmed with the utility owner prior to commencing any work.
 - Note removed.
 - Parcels may be subject to additional easements, and/or restrictions, by record or prescription, that a complete title search may reveal.
 - Public utility and drainage easements where shown hereon are intended to indicate an easement for construction, operation, and maintenance of public utilities and drainage ways; including, but not limited to, sanitary sewers, forcemains, water lines, telephone signal conduits, electric conductors, drainage pipes, and natural gas lines. Easements may not have infrastructure constructed within them until some future time and there may be no notice or consultation with the individual Owners/Tenants of this construction.
 - For all developments of more than one acre, a State of Tennessee Construction General Permit is required.
 - No work within T.D.O.T. right-of-way without prior written approval from T.D.O.T.
 - Per the Town of La Vergne, development must be sprinkled per the City of La Vergne's fire sprinkler ordinance. A fire protection designer must provide a design from the backflow to the building.
 - Per the Town of La Vergne, no more than 500 feet of open utility trench will be allowed at one time.
 - Per the Town of La Vergne, the proposed sewer grinder pump station and onsite piping will be private and the property owner will be responsible for operation and maintenance.

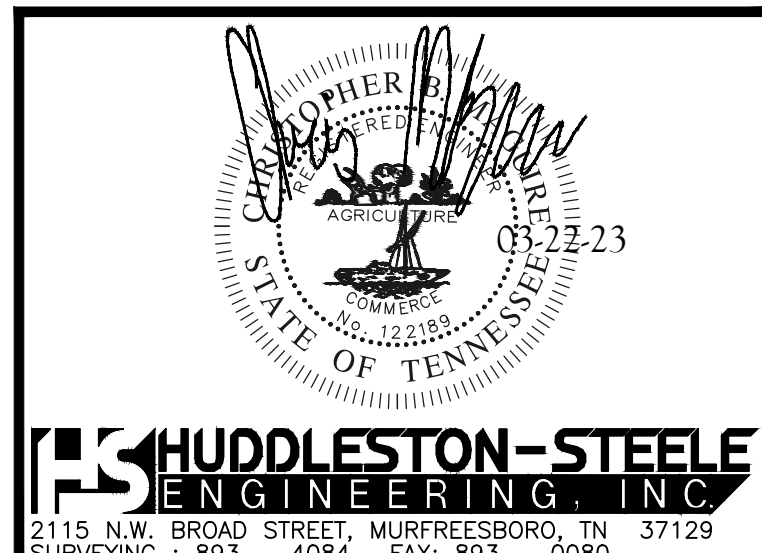
ZONING: C-2 Highway Service
FRONT SETBACK: 35'
SIDE SETBACK: 10'
REAR SETBACK: 20'
FRONT YARD: 20'



Washtopia 4 LLC
Record Book 1715, Page 2179
Zoned: C-2



OWNER: FHMY Realty Investors, LLC
Attn: Mina Nagib
ADDRESS: 6645 Sugar Valley Drive
Nashville, TN 37211
Tax Map 18-B, Group E, Parcel 3.00
Record Book 2228, Page 3984
THIS TRACT IS NOT LOCATED IN AN AREA DESIGNATED AS "SPECIAL FLOOD HAZARD" ON THE NATIONAL FLOOD INSURANCE PROGRAM COMMUNITY MAP 470167, PANEL NO. 0020J, ZONE: X, DATED: OCTOBER 16, 2008.



DRAWING REVISIONS		
NO.	DATE	DESCRIPTION
0	08-29-22	Original Issue - For Review
1	09-19-22	Revised Per La Vergne Workshop Comments
2	02-27-23	Revised For Resubmittal to Planning
3	03-20-23	Revised Per La Vergne Workshop Comments
4	03-22-23	Revised Per La Vergne Engineering Comments

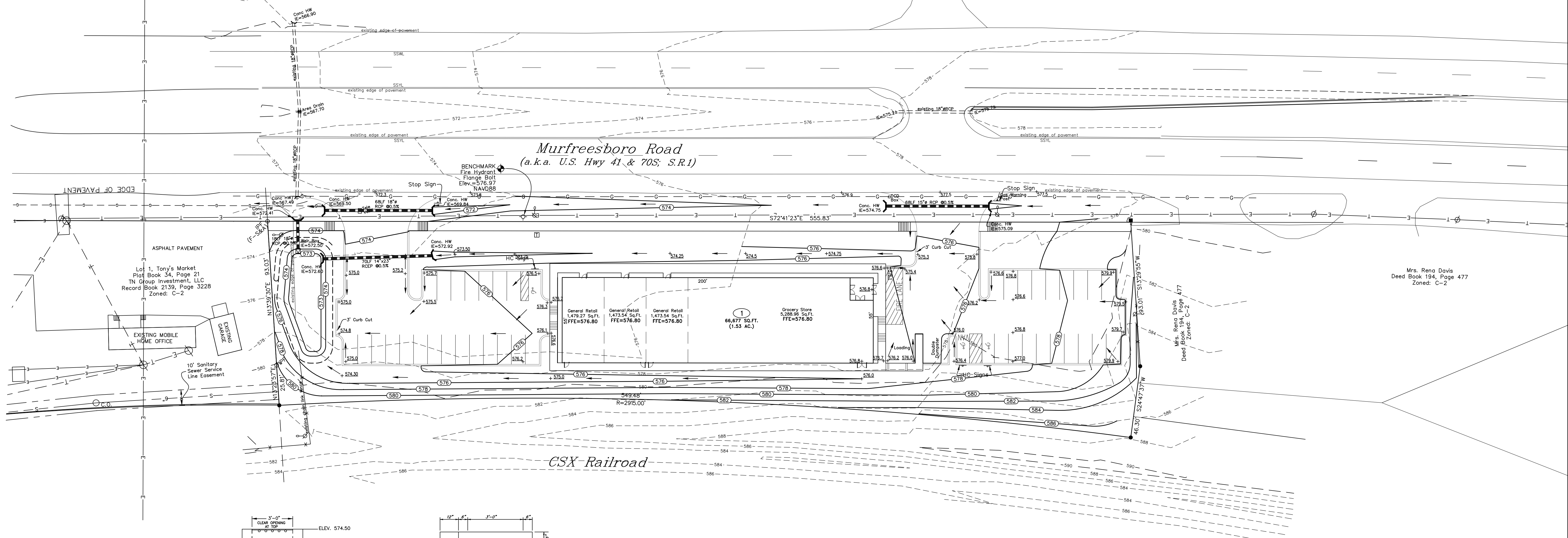
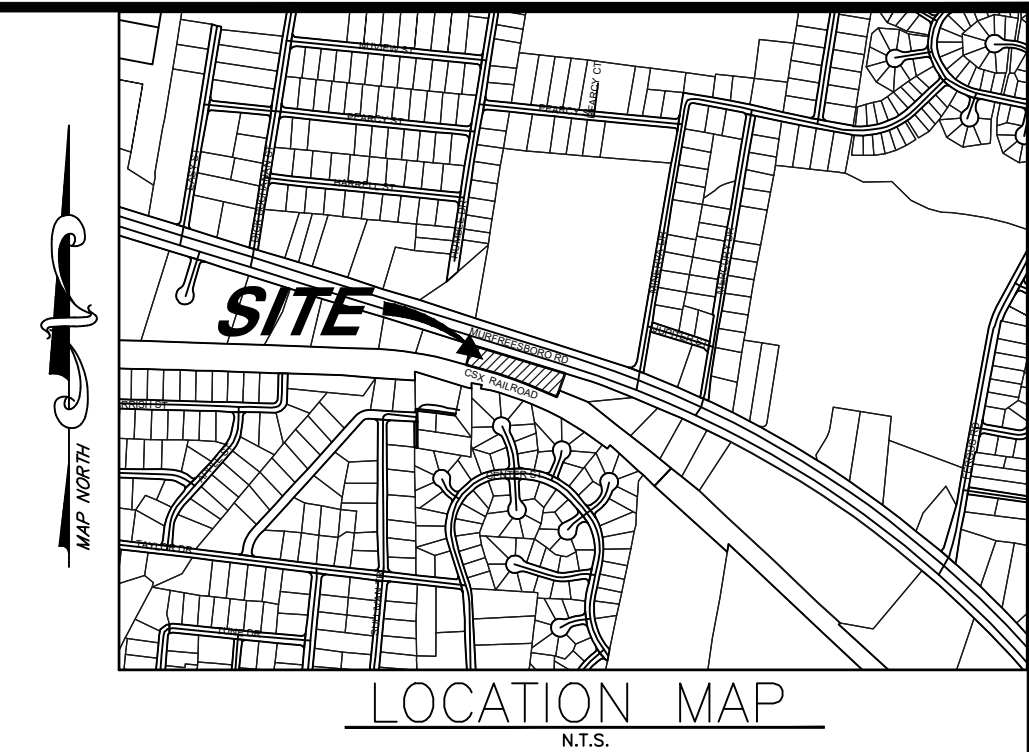
UTILITY PLAN
5450 Murfreesboro Road
La Vergne, TN
3rd Civil District of Rutherford County, Tennessee
Date: August, 2022 Scale: 1"=30' Sheet 3 of 9

LEGEND

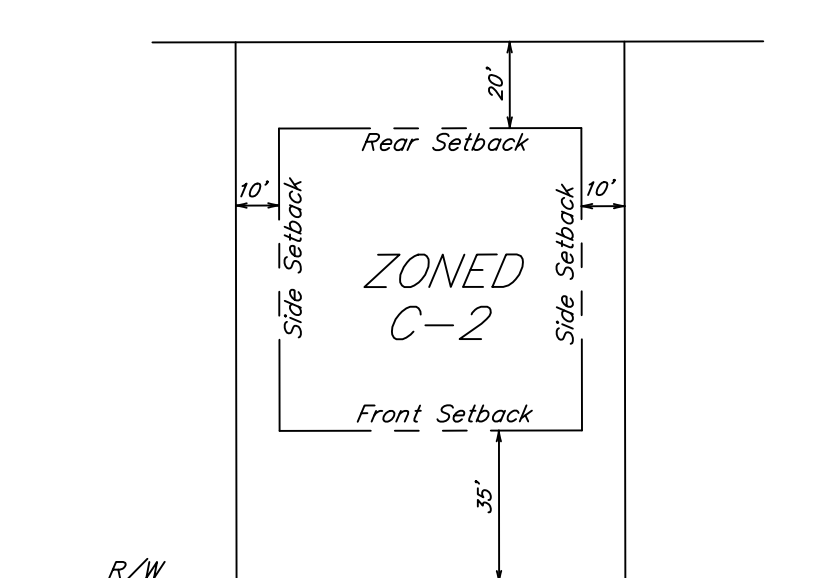
Ø	POWER POLE
○	EXISTING FIRE HYDRANT
●	PROPOSED FIRE HYDRANT
△	REDUCER
WV	WATER VALVE
▲	CONCRETE THRUST BLOCK
—W—	EXISTING WATER LINE
—W—	PROPOSED WATER LINE
—S—	EXISTING SANITARY SEWER LINE
—S—	PROPOSED SANITARY SEWER LINE
○	EXISTING MANHOLE
○	PROPOSED MANHOLE
—00—	EXISTING CONTOURS
—00—	PROPOSED CONTOURS
GM	GAS METER
—G—	EXISTING GAS LINE
—G—	PROPOSED GAS LINE
—UE—	PROPOSED UNDERGROUND ELECTRIC LINE
—D—	PROPOSED UNDERGROUND DATA LINE CONDUIT
—P—	PROPOSED UNDERGROUND PHONE LINE CONDUIT
✓	POWER POLE ANCHOR
698.7+	EXISTING SPOT ELEVATION
698.2+	PROPOSED SPOT ELEVATION
---	EXISTING STORM LINE
---	PROPOSED STORM LINE
WM	WATER METER

PLAN NOTES

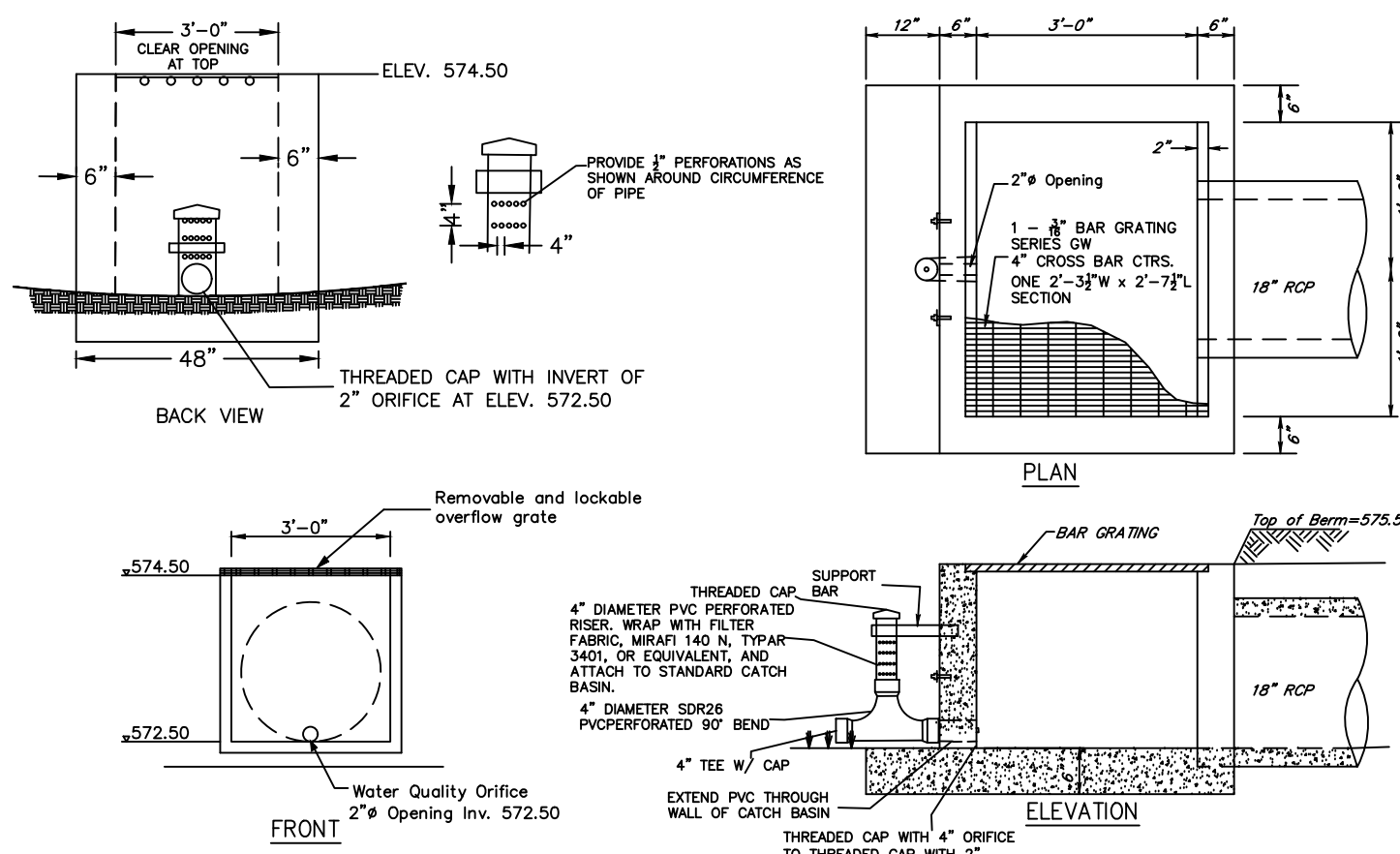
- In Tennessee, it is a requirement per "The Underground Utility Damage Prevention Act" that anyone who engages in excavation must notify all known underground utility owners, no less than three nor more than ten working days of their intent to excavate. A list of these utilities may be obtained from the County Register of Deeds. Those utilities that participate in the Tennessee One Call system can be notified by calling toll free 1-800-351-1111.
- Underground utilities shown were located using available above ground evidence, and also from information obtained from the respective utility companies. The existence or nonexistence of the utilities shown and any other utilities which may be present on this site or adjacent sites should be confirmed with the utility owner prior to commencing any work.
- Note removed.
- Parcels may be subject to additional easements, and/or restrictions, by record or prescription, that a complete title search may reveal.
- Public utility and drainage easements where shown hereon are intended to indicate an easement for construction, operation, and maintenance of public utilities and drainage ways, including, but not limited to, sanitary sewers, forcemains, water lines, telephone signal conduits, electric conductors, drainage pipes, and natural gas lines. Easements may not have infrastructure constructed within them until some future time and there may be no notice or consultation with the individual Owners/Tenants of this construction.
- For all developments of more than one acre, a State of Tennessee Construction General Permit is required.
- No work within T.D.O.T. right-of-way without prior written approval from T.D.O.T.
- Per the Town of La Vergne, development must be sprinkled per the City of La Vergne's fire sprinkler ordinance. A fire protection designer must provide a design from the backflow to the building.
- Per the Town of La Vergne, no more than 500 feet of open utility trench will be allowed at one time.
- Per the Town of La Vergne, the proposed sewer grinder pump station and onsite piping will be private and the property owner will be responsible for operation and maintenance.



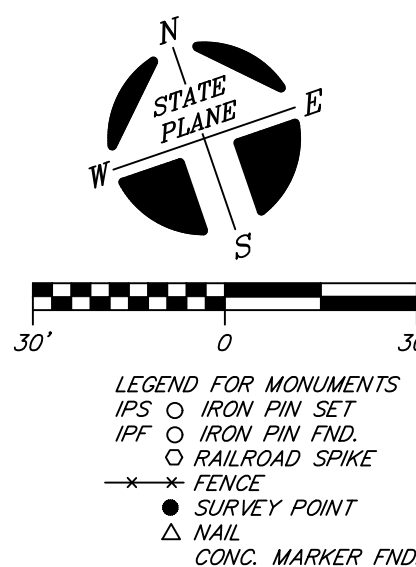
ZONING: C-2 Highway Service
FRONT SETBACK: 35'
SIDE SETBACK: 10'
REAR SETBACK: 20'
FRONT YARD: 20'



TYPICAL BUILDING SETBACK DETAIL

DETENTION OUTLET
STRUCTURE DETAIL

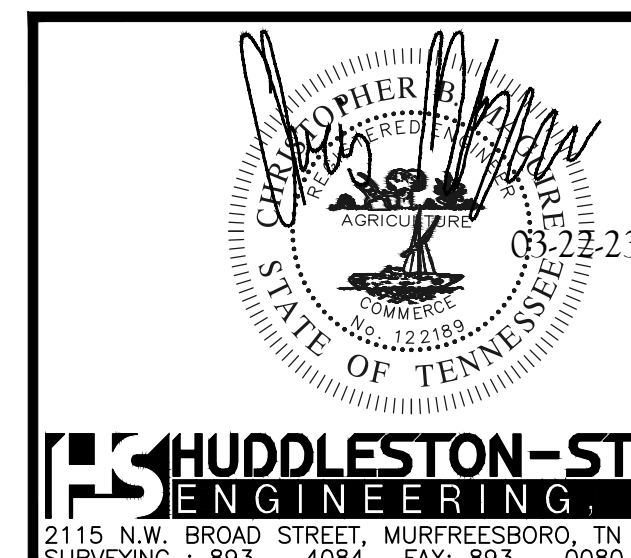
N.T.S.



OWNER: FHMY Realty Investors, LLC
Attn: Mino Nagib
ADDRESS: 6645 Sugar Valley Drive
Nashville, TN 37211

Tax Map 18-B, Group E, Parcel 3.00
Record Book 2228, Page 3984

THIS TRACT IS NOT LOCATED IN AN AREA
DESIGNATED AS "SPECIAL FLOOD HAZARD" ON
THE NATIONAL FLOOD INSURANCE PROGRAM
COMMUNITY MAP 470167, PANEL NO. 0020J,
ZONE: X, DATED: OCTOBER 16, 2008.



DRAWING REVISIONS

NO.	DATE	DESCRIPTION
0	08-29-22	Original Issue - For Review
1	09-19-22	Revised Per La Vergne Workshop Comments
2	02-27-23	Revised For Resubmittal to Planning
3	03-20-23	Revised Per La Vergne Workshop Comments
4	03-22-23	Revised Per La Vergne Engineering Comments

GRADING & DRAINAGE PLAN
5450 Murfreesboro Road
La Vergne, TN

3rd Civil District of Rutherford County, Tennessee

Date: August, 2022

Scale: 1"=30'

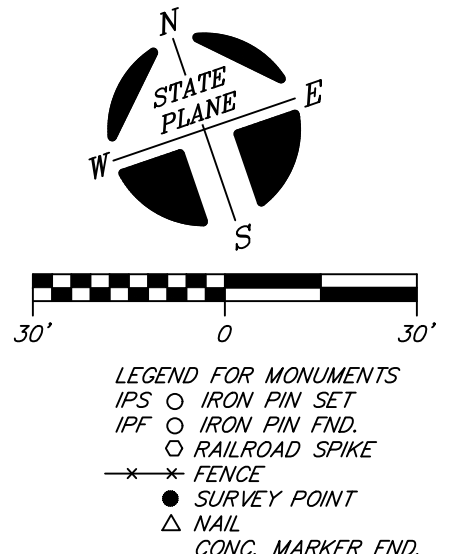
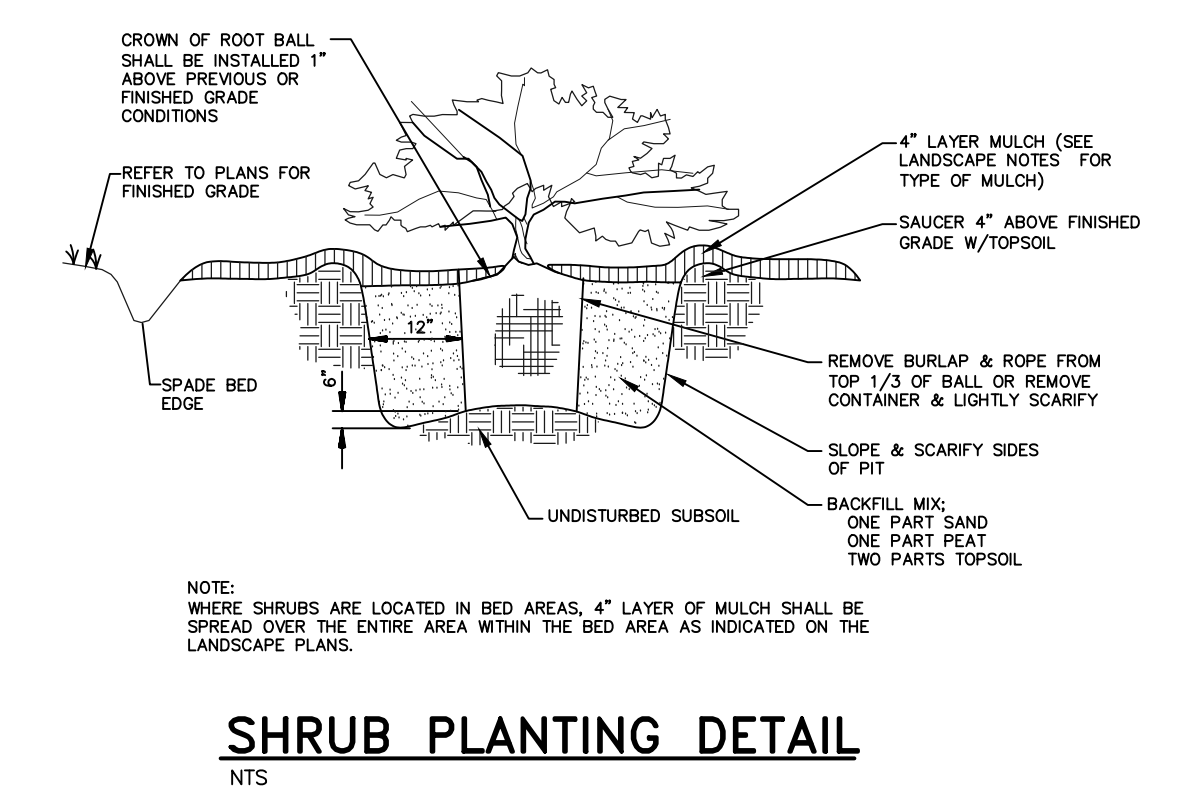
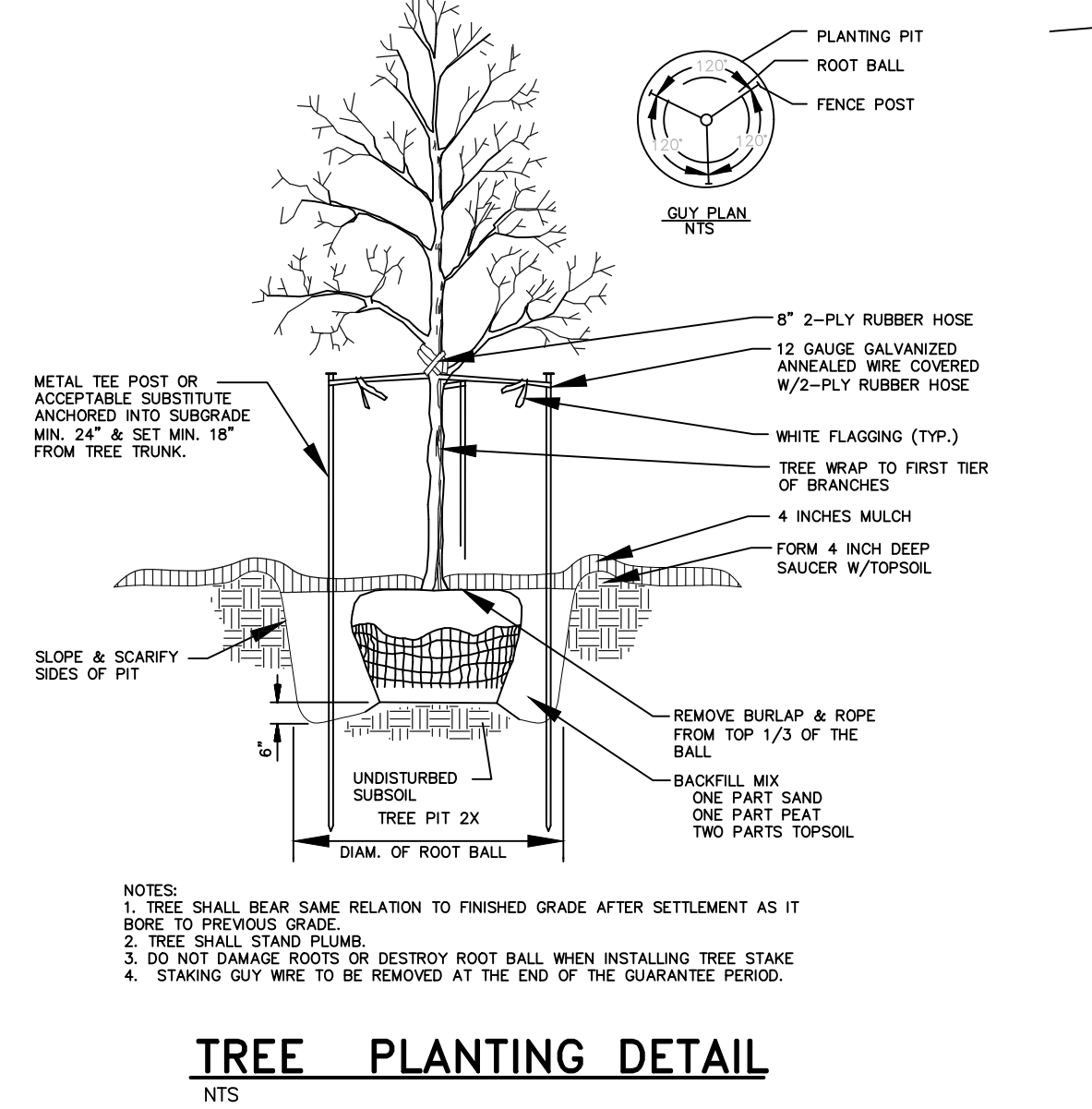
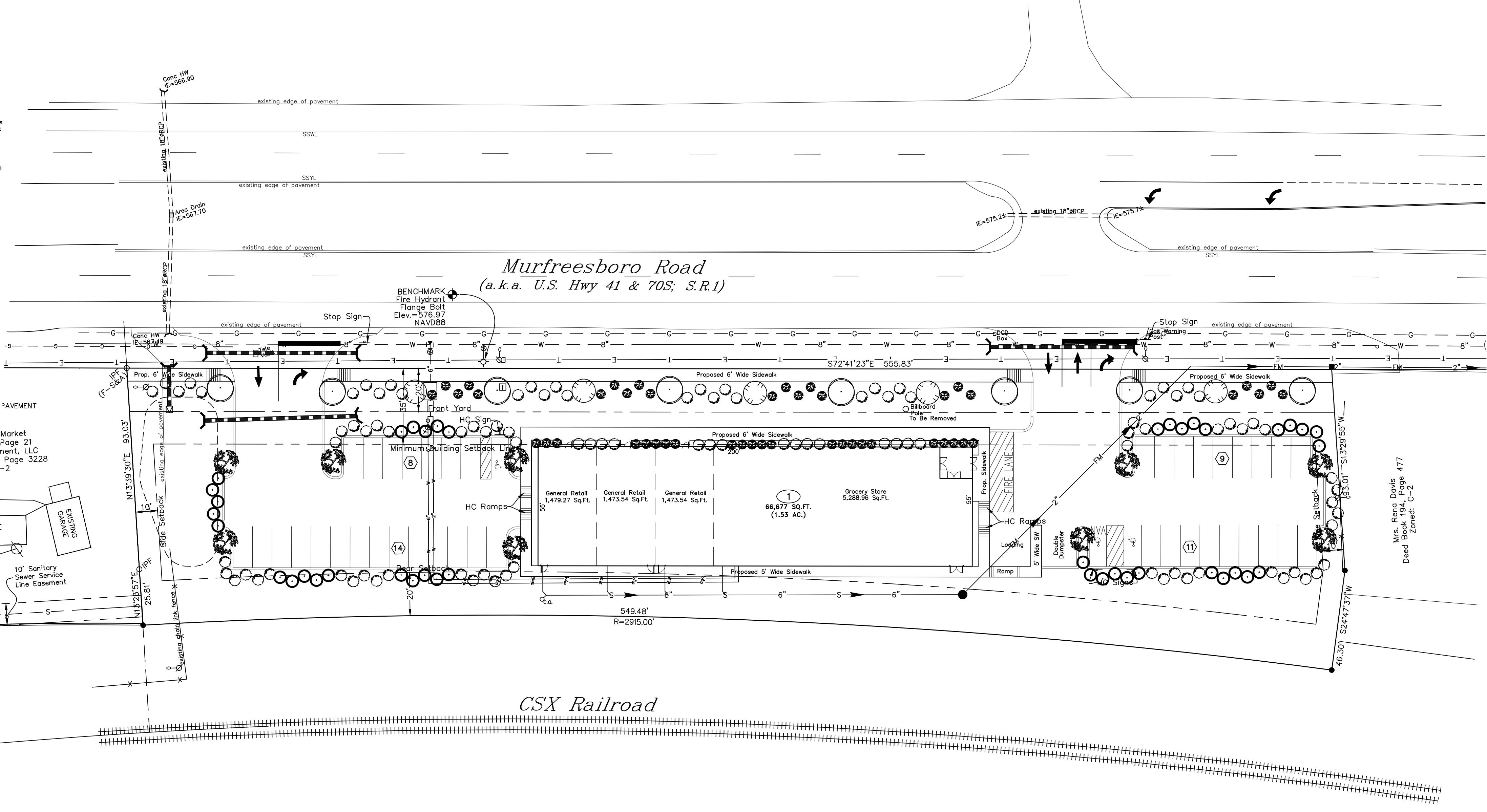
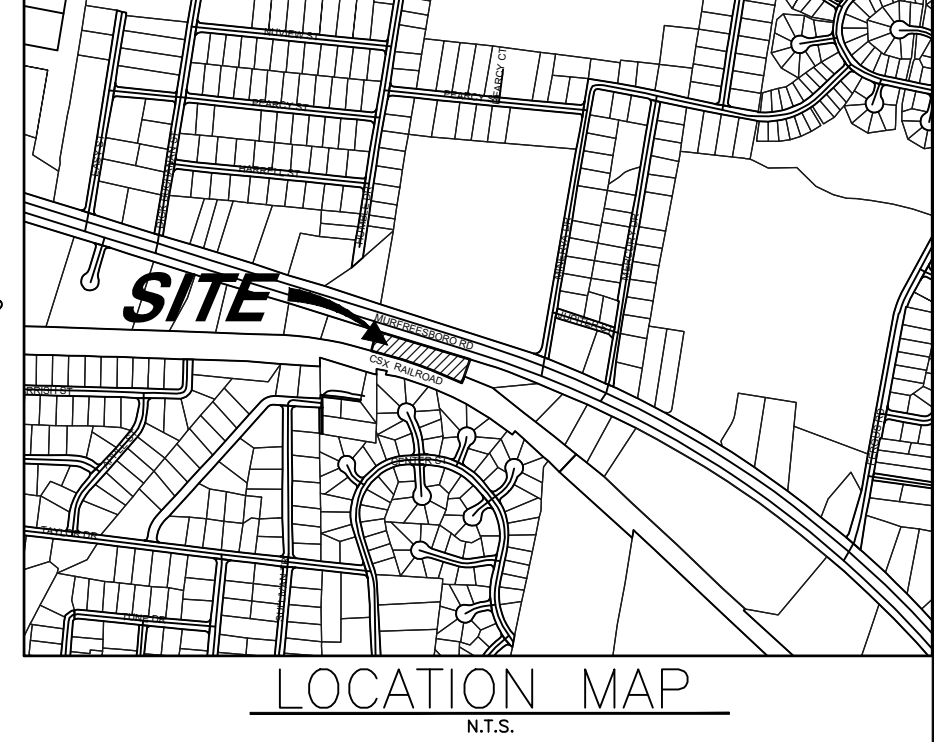
Sheet 4 of 9

- 1.0 General
- 1.1 Scope: This work includes providing labor, equipment, materials, installation and maintenance services to complete all landscape installation as indicated in construction documents.
- A. Providing and installing all plantings including trees, shrubs, ground cover, turf grass, planting soil mix and mulch.
- B. Guarantee Period: All landscape plant material shall remain alive and in healthy condition for one full year from time of final acceptance of completed work. Contractor shall replace any dead or unhealthy plant material during the one year guarantee period at no additional cost to the owner.
- C. Specified Maintenance Period: Contractor shall fully maintain all landscape material for the duration of the project until final acceptance by the owner. This includes watering, weeding, fertilizing and mowing of grass and general upkeep of all landscape beds. Should any plant material be damaged die or deteriorate during this period it shall be replaced immediately with plant material of the same size, species and quality as originally specified.
- D. It is the responsibility of the landscape contractor to confirm all material quantities. In the event of a discrepancy, the quantities shown on the plan shall take precedence over the material schedule.
- E. No substitutions as to type, size, or spacing of plant materials specified on this plan may be made without the approval of the landscape architect or owner's representative. All substitutions shall be reviewed and approved with the owner's representative and the applicable municipal or state reviewing agency.
- F. Contractor shall be required to obtain all permits relative to landscape installation. Any work in municipal or state right of way or utility easements may require a permit from the governing agency.
- 1.2 Inspection and approval:
- A. All plant material may be subject to inspection and approval by the landscape architect or the owner's representative in the field or nursery before digging, or at the site before planting or placing or at any other time. Attach secure, durable, legible waterproof labels, stating correct botanical and common names as specified, to at least one shrub or perennial in a grouping and to each tree on site. All labels to be completely removed by contractor at time of final acceptance.
- 1.3 Job Conditions
- A. Examine conditions under which work is to be performed and notify the Landscape Architect of unsatisfactory conditions or any potential field adjustments. Should the landscape contractor encounter unsatisfactory surface or other subsurface drainage conditions, inadequate soil depth, latent soils, hard pan, utility lines or other conditions that will jeopardize the health and vigor of the plants, adjustment must be made by the contractor to insure suitable conditions for proper growth and development of the plants to be installed.
- B. Determine locations of underground utilities and perform work in manner which will avoid all possible damage. It is a requirement per the Tennessee "Underground Utility Damage Prevention Act" that anyone who engages in excavation must notify all known underground utility owners, no less than three nor more than ten working days of their intent to excavate. A list of these utilities may be obtained from the county register of deeds. Those utilities that participate in the Tennessee one call system can be notified by calling 1-800-351-1111. Hand excavate to avoid damage to existing utilities if required.
- C. Contractor to remove any debris on site and clear and grub all landscape planting areas prior to grading and planting as part of contract. All planting and seeding areas shall be free from weeds prior to planting and mulching. No plant material shall be planted prior to completion of finish grade, herbicide and/or mechanical removal of weeds may be required to insure complete weed removal. Any herbicide applications must be done a minimum of 2 weeks or more prior to time of planting.
- 2.0 Materials
- 2.1 Topsoil:
- A. All topsoil shall be stripped and stored for reuse on site prior to grading and excavation work.
- B. Topsoil stripped and stored on site, or hauled in for use on site shall meet the following criteria before being spread on site or used in landscape beds or planting mix:
- 1) To be fertile, friable naturally occurring topsoil, free of stones, subsoil, clay lumps, hardpan, roots, stumps, branches sticks and other debris larger than one and one half inch in any dimension, free of noxious weeds, grasses, seeds, plants, extraneous matter and any substance harmful to plant growth:
- 2) Ph range of 5.5 to 7.0
- 3) Organic matter 2% to 10%
- 4) Topsoil shall contain a maximum of 35% clay
- 5) Topsoil shall contain a minimum of 20% sand
- 2.2 Planting Mix: Shall be thoroughly mixed in proportions specified for plant pits and planting beds
- A. 40% Approved material excavated from the pits (If rock or heavy clay is encountered provide 70% topsoil in mix)
- B. 30% Topsoil (as defined in 2.1 herein)
- C. 30% Organic compost consisting of peat moss, mushroom compost or worm castings. All organic compost must be well aged. No raw wood or other unaged material shall be permitted a part of compost blend.
- D. Add 3 lbs of 8-12-12 fertilizer to each cubic yard of topsoil mix during the mixing process, for all plants.
- E. All planting mix shall be inoculated with a mycorrhizal fungal product. Mycorrhizal inoculation may be applied with a powder or liquid application. Follow manufacturers directions for proper amount and methods of application.

3. Shall conform to state and federal requirements for disease and insect control, shall be in accordance with American Standards for Nursery Stock (ANSI Z60.1 (latest approved edition)) and shall be subject to approval of owner's representative. Dimensions listed for heights, spread and trunk specifications on the plant material schedule are a guide for the minimum required size of each plant.
- B. All plant material must be free from bark damage, well foliated and have a well established root system, without circling roots or root bound plants.
- C. First class representatives of their species or variety and true to name and size. Plants that are not of highest quality will be rejected. All plants shall have a well-formed canopy (head) with minimum caliper, height and spread as shown on the plant list. Trunks and canopy shall be shaped be typical of the species. Trees of the same species shall have the following characteristics: matched by branching height, caliper, height of tree, spread of branches and branching structure, and overall canopy shape.
- 26 Seed: Seed shall be delivered to site in original sealed packages bearing the producers guaranteed analysis for percentages of mixtures, purity, germination, weedseed content and inert material. All seed must be fresh, clean and from current seasons seed crop.
- A. Variety: Premium Tall Fescue blend (drought tolerant variety)
- B. Purity: 95% minimum
- C. Percent Germination: 90% minimum
- D. Maximum weed seed content: 0.05%
- 27 Sod: Sod shall be premium Bermuda grass. Sod shall strongly rooted and free of weeds, disease and pests. All sod shall be cut and delivered with uniform thickness with no less than 1" soil.
- 28 Mulch: 100% Shredded and Aged Hardwood Mulch or Pine Straw (owners choice as specified on plan) to cover all tree, plant and ground cover pits and landscape beds.
- 29 Fertilizer: Fertilizer shall have a ratio of 6% nitrogen, 12% phosphorus and 12% potassium. Fertilizer shall be granular and mixed into planting mix at the rates as specified in 2.2 herein and of the manufacturers rate for turf grass areas.
- 3.0 Erosion
- 3.1 Finish Grade and Landscape Bed Preparation
- A. Finish grading to be completed by General Contractor. Fine grade soil to eliminate irregularities and ponding from finish grade and to form smooth, consistent grade with positive drainage away from all buildings and structures. All landscape beds are to be filled to a minimum depth of 8" and covered with fertile topsoil to a minimum depth of 4".
- 3.2 Topsoil Placement
- A. Finish grading to be completed by General Contractor. Fine grade soil to eliminate irregularities and ponding from finish grades and to form smooth, consistent grade with positive drainage away from all buildings and structures.
- B. If planting and mulching is not commenced immediately, protect spread topsoil from erosion by force of wind, water or other force, and establish erosion, ridged or settled grade to proper finished grade.
- C. Spreading of topsoil: All landscape beds and turf grass areas shall have a minimum depth of 4" of topsoil established prior to planting seeding, sodding or mulching. All topsoil stripped from the site shall be utilized on site to establish the 4" minimum depth required for landscape areas. All excess topsoil beyond the 4" minimum depth shall be evenly spread throughout landscape and turf grass planting areas.
- 3.3 Planting of Trees, Shrubs and Perennials
- A. Do not prune plants without direction and approval of Landscape Architect.
- B. Prepare planting mix as specified in 2.2 herein. Place as specified for all trees, shrubs, and ground cover beds as shown and detailed.
- C. Plant of material as shown and detailed.
- D. Tree Pit Drains: All trees and shrubs shall be placed in well drained planting pits. If standing water occurs in planting holes the contractor shall provide proper subsurface drainage to insure the plants survival and / or plant material shall be placed in elevated bermed areas to provide proper drainage.
- E. All trees are to be equipped with 20 gallon capacity watering bags to be used during the construction period and left in place for the owners use after final acceptance of the project.
- F. If rock is encountered during planting operations, landscape berms or alternated planting locations should be evaluated by landscape architect prior to planting.
- G. It is the responsibility of the landscape contractor to verify that each excavated tree or shrub pit will percolate (drain) prior to adding topsoil and installing trees or shrubs. If the soil at a given area does not drain properly, a pvc drain or gravel sump shall be installed, or plantings shall be placed on a berm of planting mix to keep plants out of standing water.
- 3.4 Seed: Provide an acceptable stand of seed, defined as no bare areas more than 4" square. Provide seed bed preparation with fertilizer, limestone and straw mulch. Monitor seeded areas until final acceptance by Owner or owner's representative. Grass shall have at least one mowing before receiving final acceptance.
- 3.5 Sod
- A. Sod shall be installed within 24 hours of delivery to site. No sod shall remain on pallets for longer than 24 hours after delivery.
- B. All areas to receive sod to be graded to finish grade to eliminate irregularities and ponding and to form smooth, consistent grade with positive drainage. Prepare topsoil with lime and fertilizer as needed.
- C. All areas to receive sod shall be free of all rocks and debris prior to sod placement.
- D. Areas to receive sod shall be strictly monitored immediately prior to laying sod. Sod shall be watered thoroughly after laying.
- E. Lay sod tightly with no visible open joints and no overlapping between sod panels. Stagger and joints a minimum of 12". Cut sections of sod should be uniform and should not exceed 2 feet in width and 10 feet in length.
- F. Roll sod after sod has dried from watering to insure a good bond between sod and soil and to level sod areas. Roller shall not exceed 100 lbs.
- 3.6 Establishment of grass: All disturbed areas of the site are to be seeded and/or sodded to insure protection from erosion and to insure a well established stand of turf grass with no bare patches or exposed soil.

PLANT MATERIALS SCHEDULE					
KEY	QUANTITY	SCIENTIFIC NAME/ COMMON NAME	TRUNK	HEIGHT	REMARKS
	9	Cornis florida/ Flowering Dogwood	2 1/2" MIN.		
	46	Buxus Koreana Green Velvet Boxwood		24" min.	
	100	Euonymus alatus 'Compactus' Burning Bush		3' min.	Full Symmetrical shape
	8	Acer ginnala Flame amur Maple	2 1/2" MIN.		Single, Straight Central Leader, Full Canopy
	5	Carpinus betulus 'Fastigiata' Columnar Hornbeam	2 1/2" MIN.		Single, Straight Central Leader, Full Canopy
	41	Taxus x media 'Hicksii' Yew Upright Hicksii		3' min.	Full Symmetrical shape

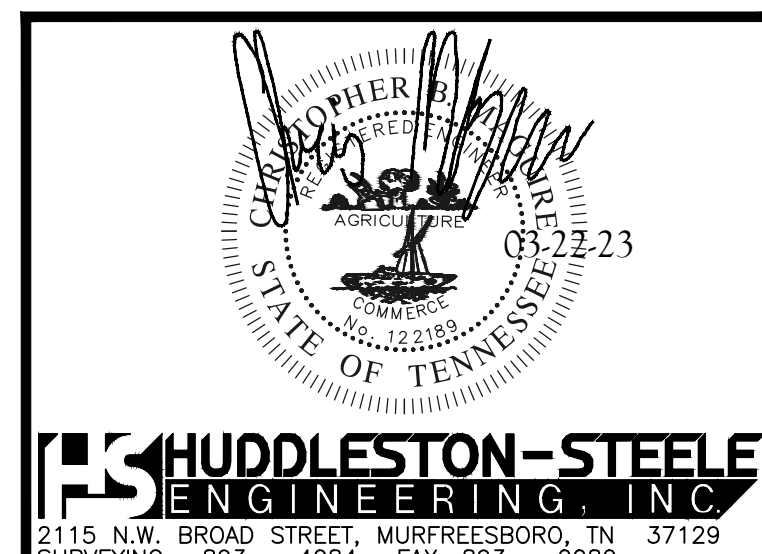
SITE DATA CHART		
LOT:		
LOT SIZE (S.F.):		66,677
FLOOR AREA RATIO:		0.17
SQUARE FOOTAGE OF PROPOSED BUILDING:		11,550
SQUARE FOOTAGE FOR USE:	GENERAL RETAIL	5,940
	GROCERY	5,610
PROPOSED USE: RETAIL/GROCERY		
PARKING REQUIRED:		
Retail: 5,940 Sq.Ft. / 300 = 19.8 = 20		43
Grocery: 5,610 Sq.Ft. / 250 = 22.44 = 23		
PARKING PROVIDED:		43
PROPOSED PARKING AREA (Sq.Ft.):		17,757
IMPERVIOUS SURFACE %:		50.01%
OPEN SPACE PROVIDED (Sq.Ft.):		33,331
CANOPY TREES REQUIRED (3 PER ACRE):		5
CANOPY TREES PROVIDED:		13
UNDERSTORY TREES REQUIRED (3 PER ACRE):		5
UNDERSTORY TREES PROVIDED:		9
SHRUBS REQUIRED (15 PER ACRE):		23
SHRUBS PROVIDED:		89
IMPERVIOUS SURFACE AREA (Sq.Ft.):		33,346



OWNER: FHMY Realty Investors, LLC
Attn: Miro Nagib
ADDRESS: 6645 Sugar Valley Drive
Nashville, TN 37211

Map 18-B, Group E, Parcel 3.00
Record Book 2228, Page 3984

THIS TRACT IS NOT LOCATED IN AN AREA DESIGNATED AS "SPECIAL FLOOD HAZARD" ON THE NATIONAL FLOOD INSURANCE PROGRAM COMMUNITY MAP 470167, PANEL NO. 0020J, ZONE: X, DATED: OCTOBER 16, 2008.



DRAWING REVISIONS		
NO.	DATE	DESCRIPTION
0	08-29-22	Original Issue - For Review
1	09-19-22	Revised Per La Vergne Workshop Comments
2	02-27-23	Revised For Resubmittal to Planning
3	03-20-23	Revised Per La Vergne Workshop Comments
4	03-22-23	Revised Per La Vergne Engineering Comments

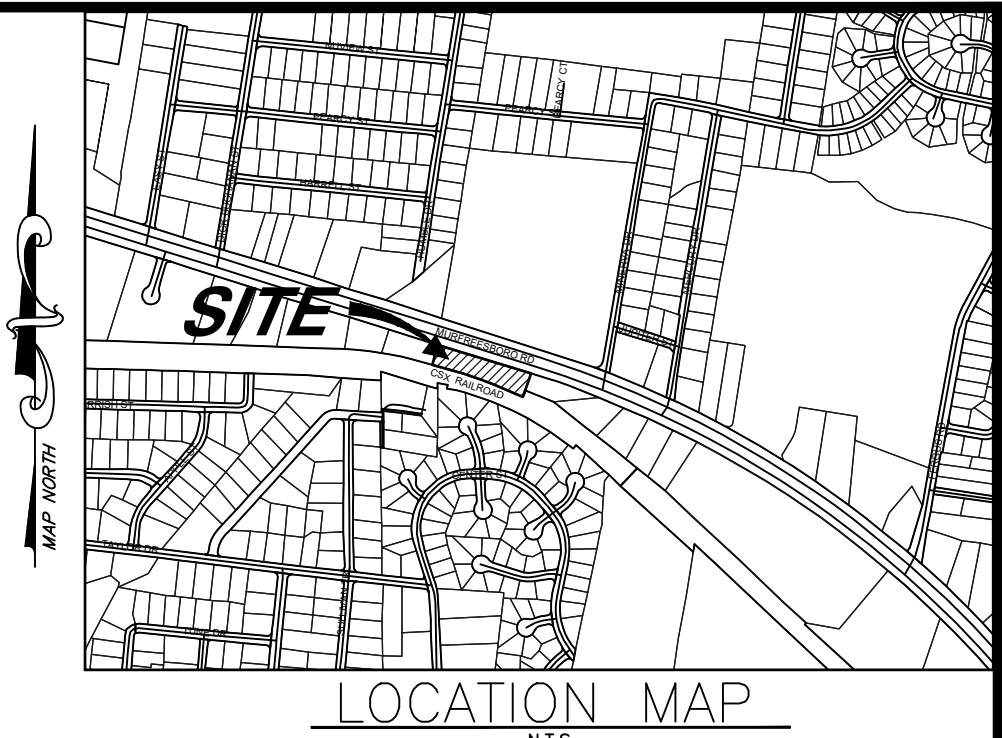
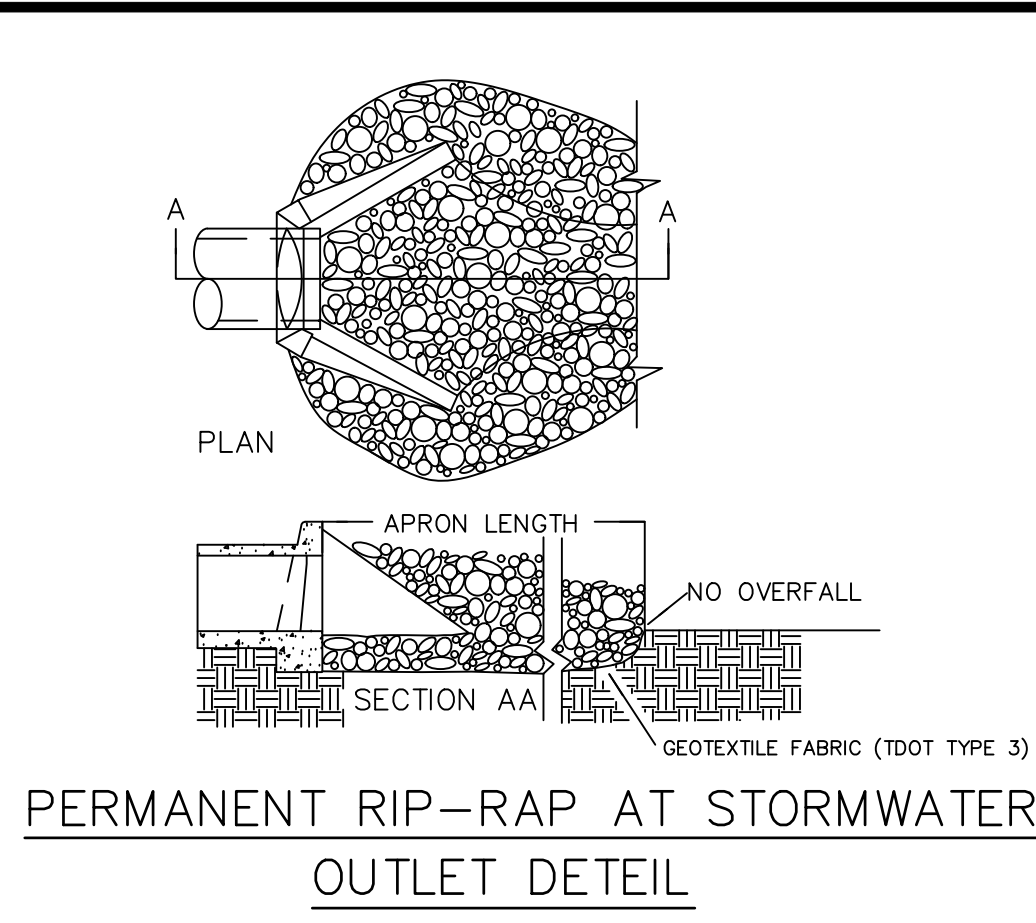
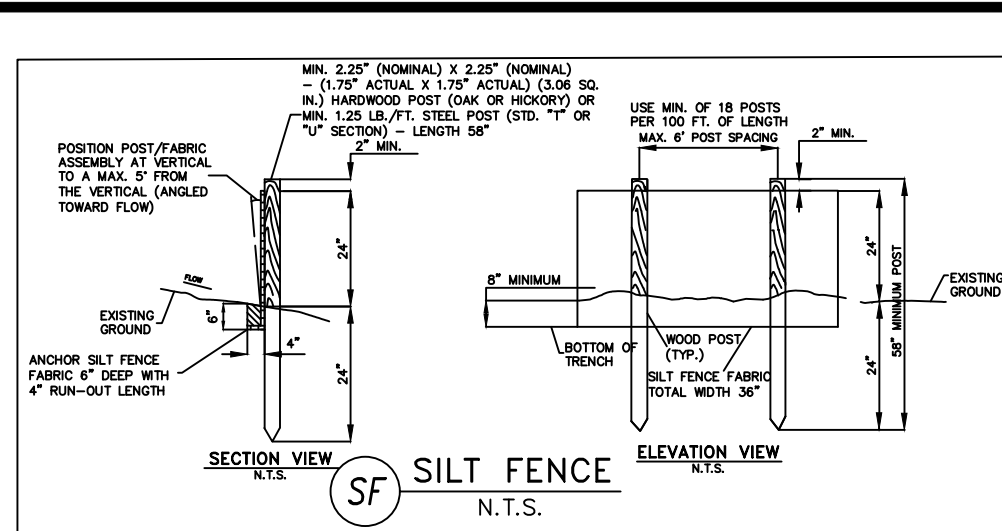
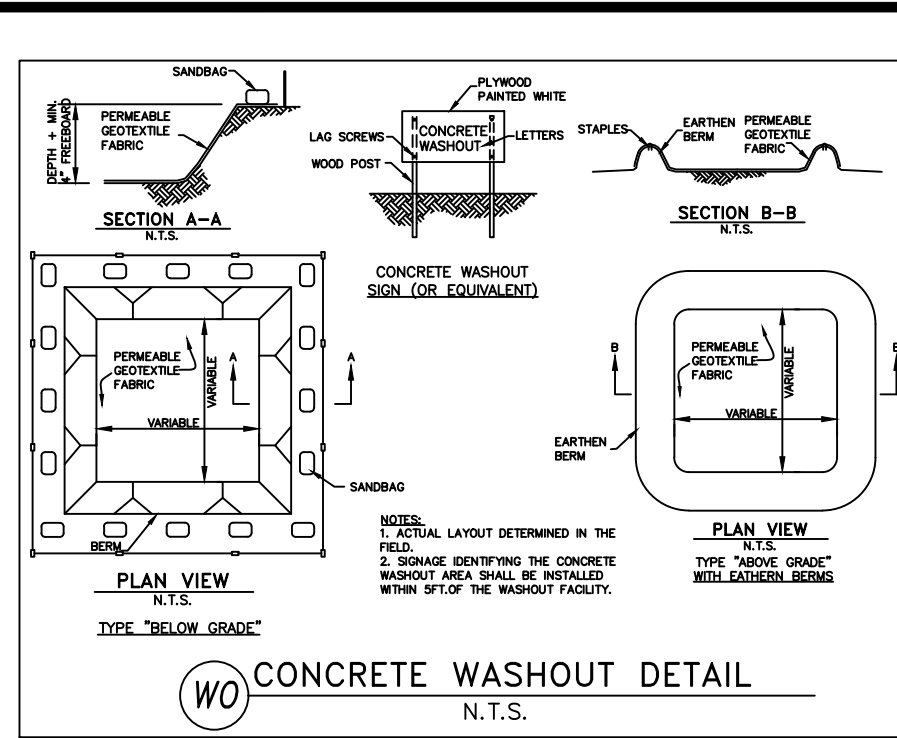
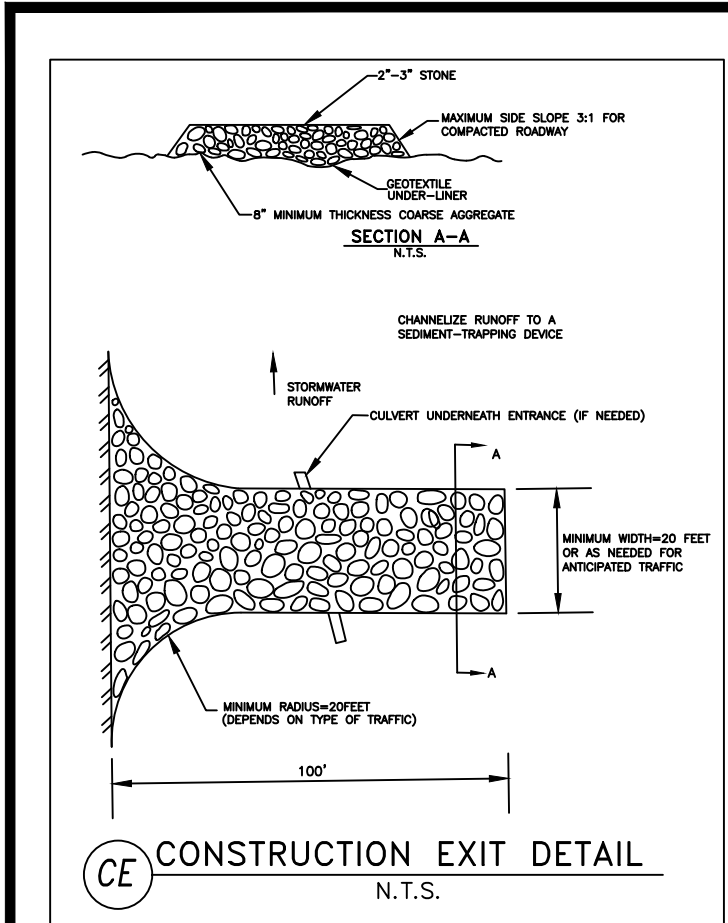
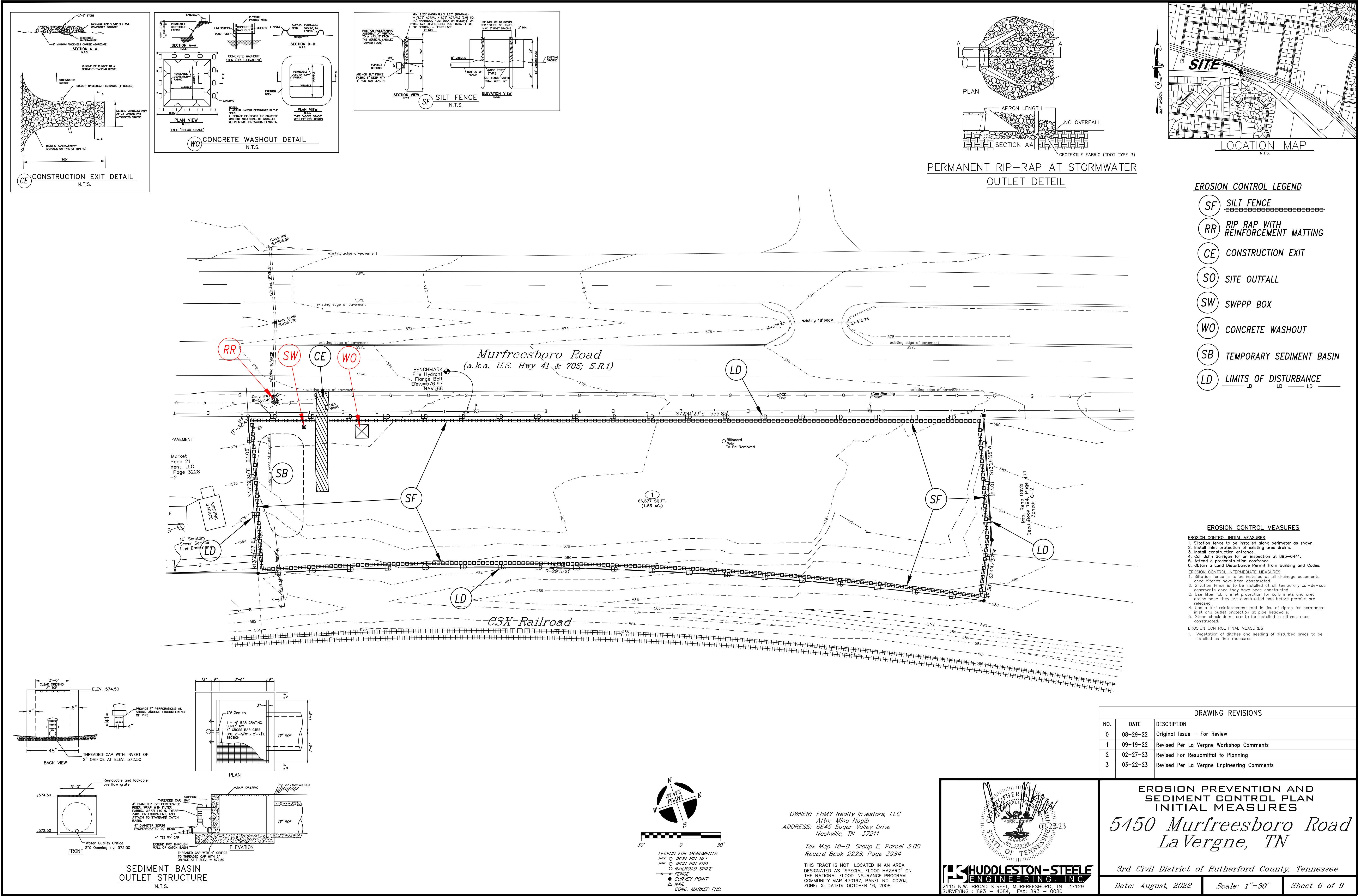
LANDSCAPE PLAN

5450 Murfreesboro Road La Vergne, TN

3rd Civil District of Rutherford County, Tennessee

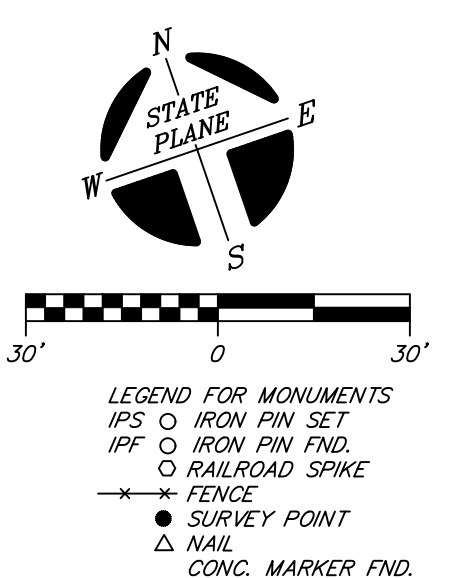
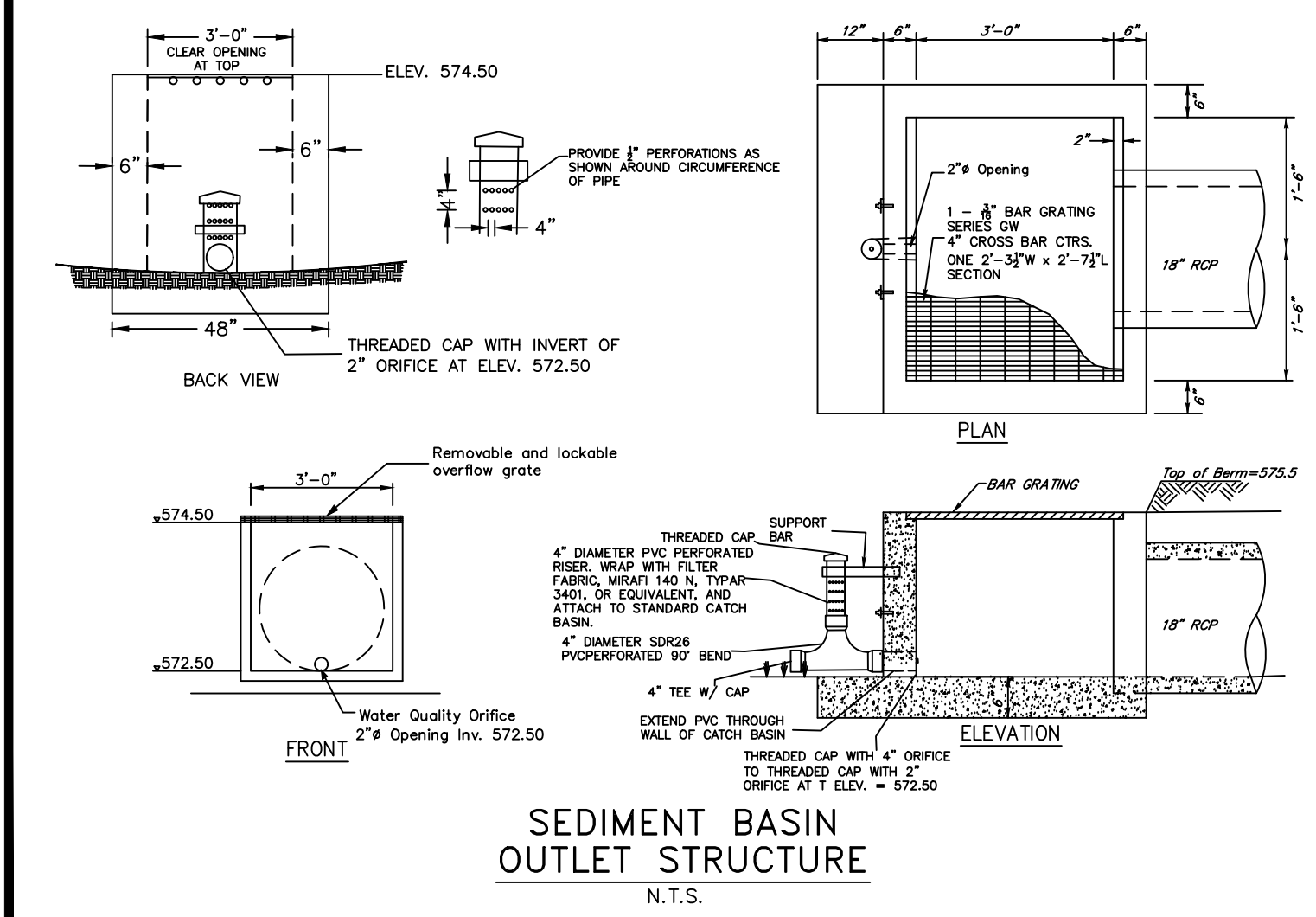
Date: August, 2022 Scale: 1"=30' Sheet 5 of 9

C:\Civil 3D Projects\Farrer - Lavergne\DWG\Nagib Site Plan March 2023.dwg, EPSC, 3/22/2023 10:29:00 AM, ACAD204



- EROSION CONTROL LEGEND**
- SF SILT FENCE
 - RR RIP RAP WITH REINFORCEMENT MATTING
 - CE CONSTRUCTION EXIT
 - SO SITE OUTFALL
 - SW SWPPP BOX
 - WO CONCRETE WASHOUT
 - SB TEMPORARY SEDIMENT BASIN
 - LD LIMITS OF DISTURBANCE

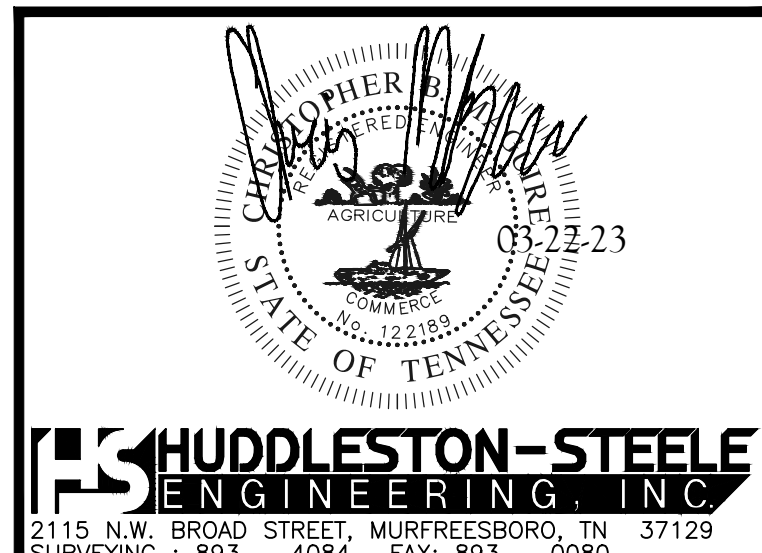
- EROSION CONTROL MEASURES**
- EROSION CONTROL INITIAL MEASURES**
1. Siltation fence to be installed along perimeter as shown.
 2. Install inlet protection of existing area drains.
 3. Install construction entrance.
 4. Call John Garrigan for an inspection at 893-6441.
 5. Attend a preconstruction conference.
 6. Obtain a Land Disturbance Permit from Building and Codes.
- EROSION CONTROL INTERMEDIATE MEASURES**
1. Siltation fence is to be installed at all drainage easements once ditches have been constructed.
 2. Siltation fence is to be installed at all temporary cul-de-sac easements once they have been constructed.
 3. Use filter fabric inlet protection for curb inlets and area drains once they are constructed and before permits are released.
 4. Use a turf reinforcement mat in lieu of riprap for permanent inlet and outlet protection at pipe headwalls.
 5. Stone check dams are to be installed in ditches once constructed.
- EROSION CONTROL FINAL MEASURES**
1. Vegetation of ditches and seeding of disturbed areas to be installed as final measures.



OWNER: FHMY Realty Investors, LLC
Attn: Miro Nagib
ADDRESS: 6645 Sugar Valley Drive
Nashville, TN 37211

Tax Map 18-B, Group E, Parcel 3.00
Record Book 2228, Page 3984

THIS TRACT IS NOT LOCATED IN AN AREA DESIGNATED AS "SPECIAL FLOOD HAZARD" ON THE NATIONAL FLOOD INSURANCE PROGRAM COMMUNITY MAP 470167, PANEL NO. 0020J, ZONE: X, DATED: OCTOBER 16, 2008.



DRAWING REVISIONS		
NO.	DATE	DESCRIPTION
0	08-29-22	Original Issue - For Review
1	09-19-22	Revised Per La Vergne Workshop Comments
2	02-27-23	Revised For Resubmittal to Planning
3	03-22-23	Revised Per La Vergne Engineering Comments

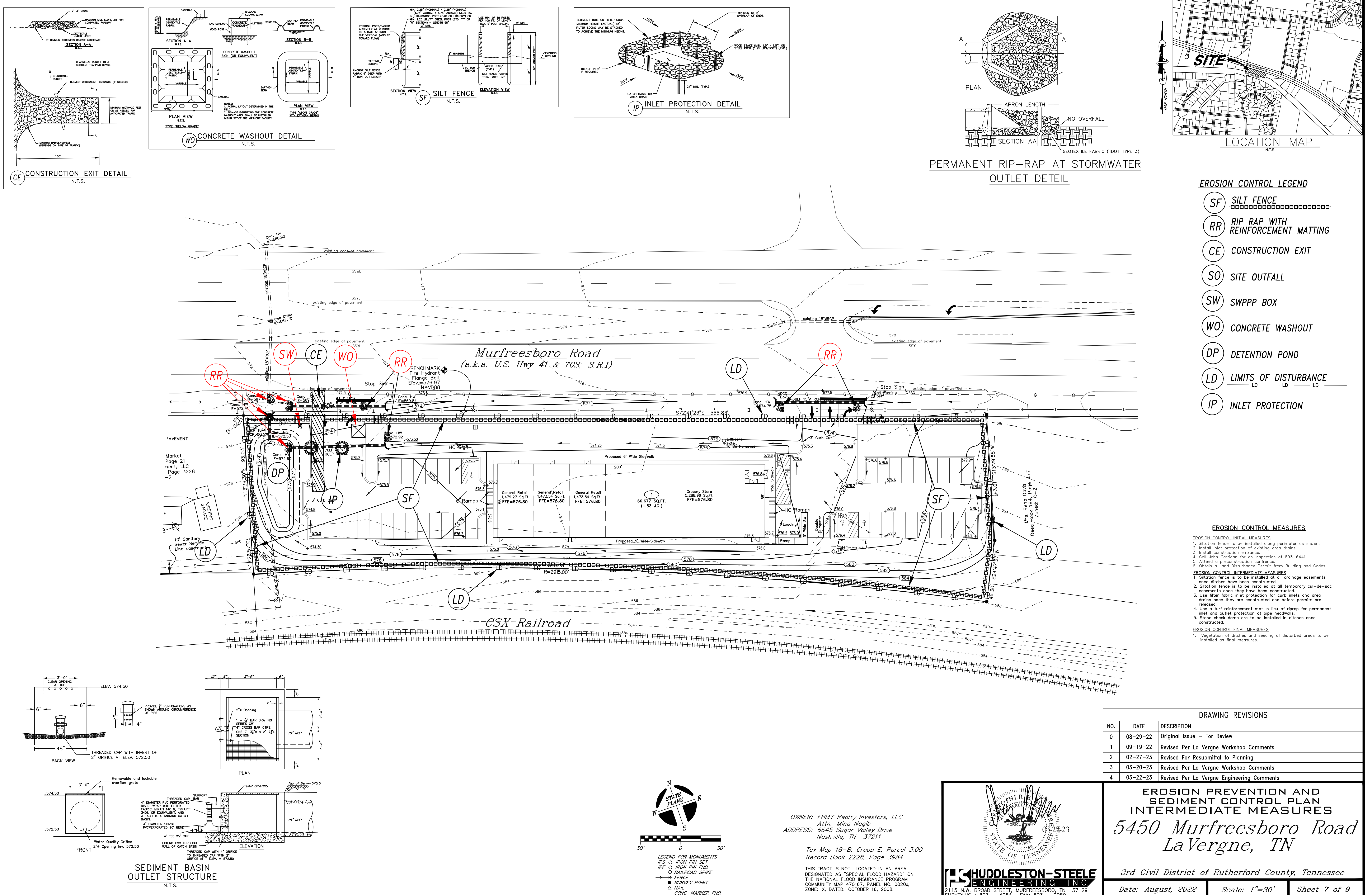
EROSION PREVENTION AND SEDIMENT CONTROL PLAN INITIAL MEASURES

5450 Murfreesboro Road
La Vergne, TN

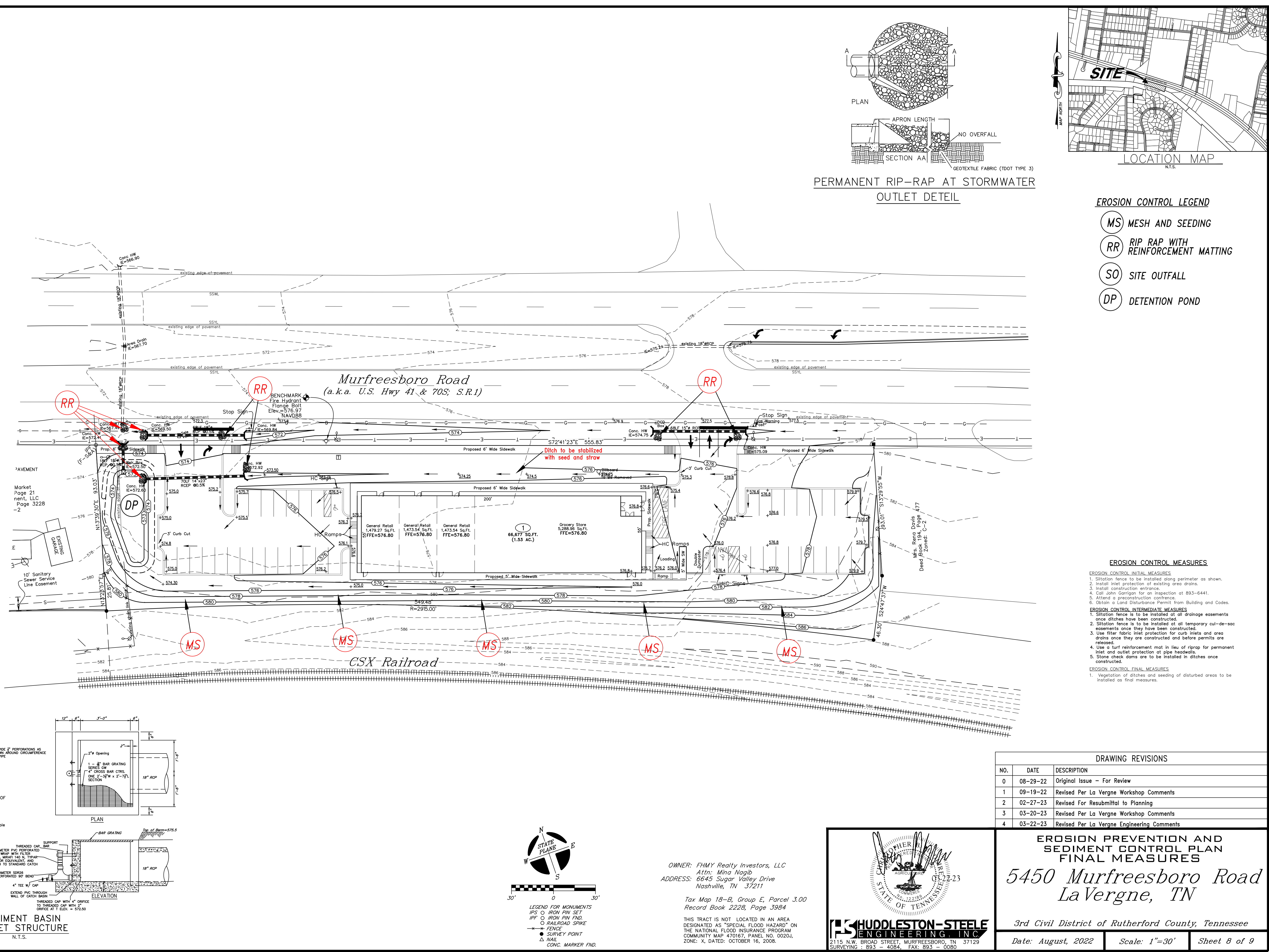
3rd Civil District of Rutherford County, Tennessee

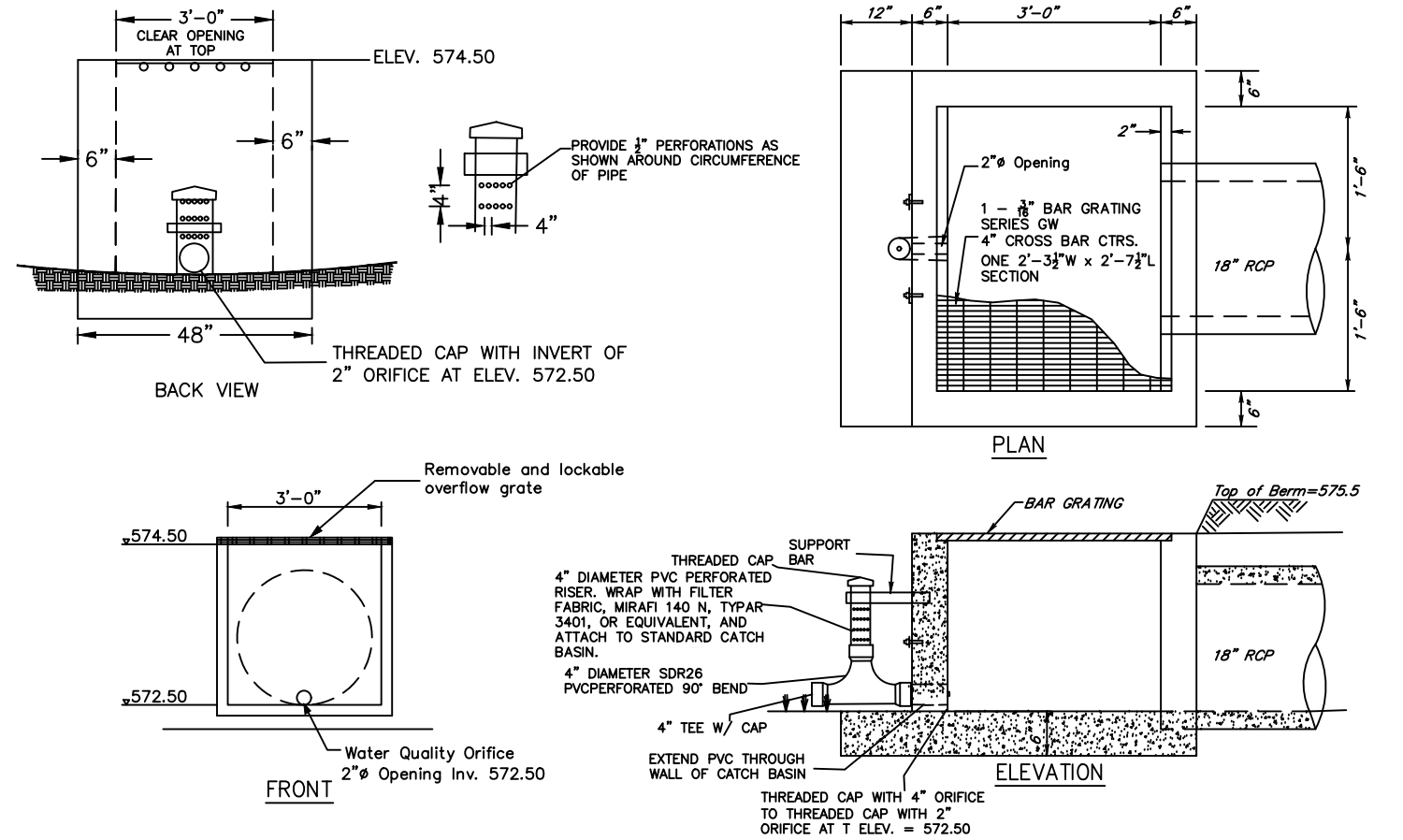
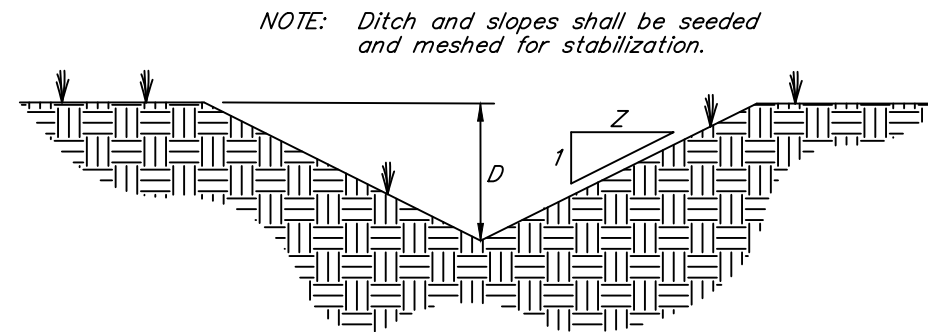
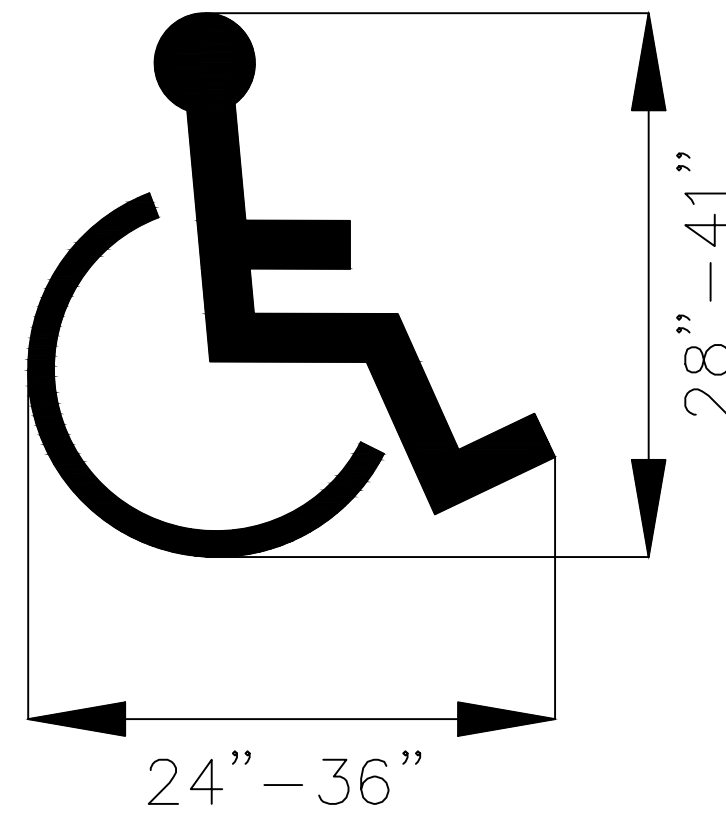
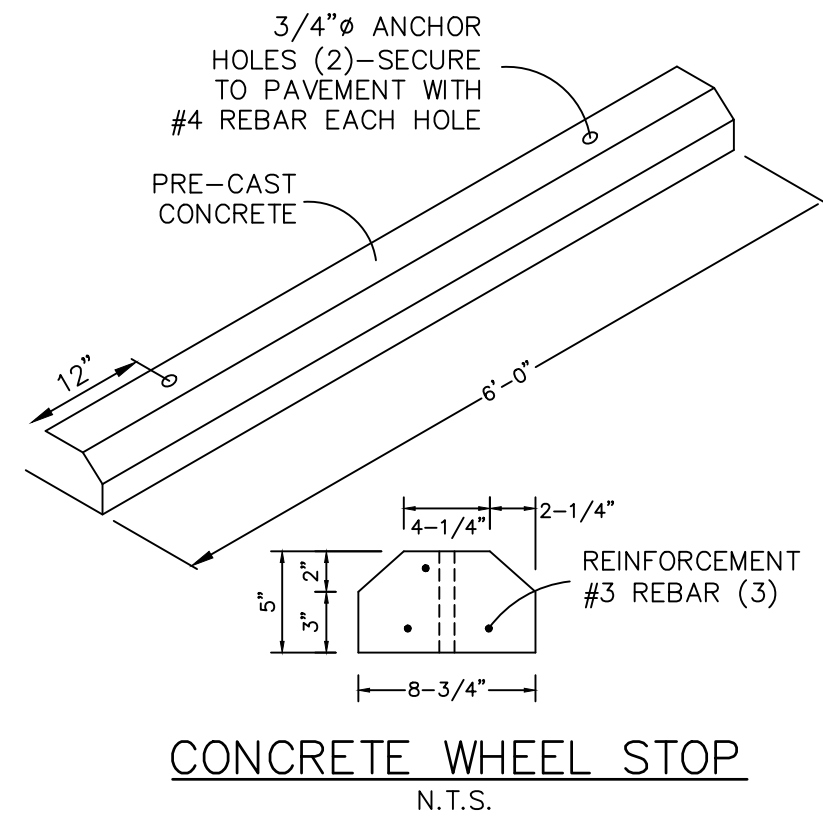
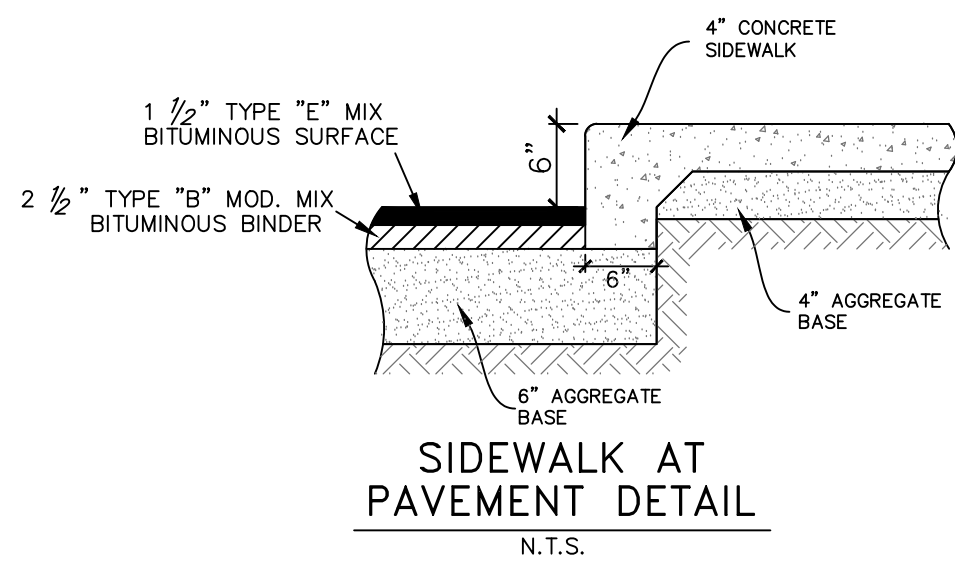
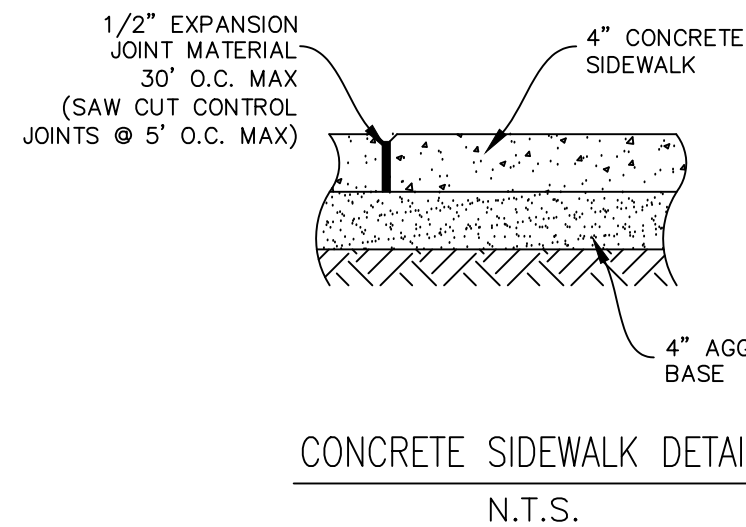
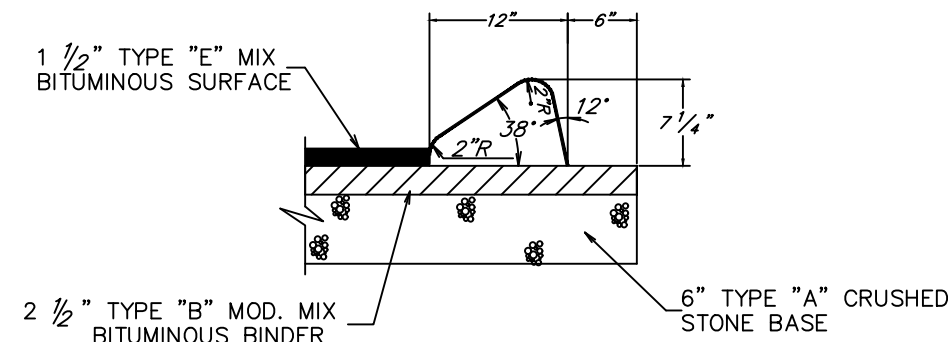
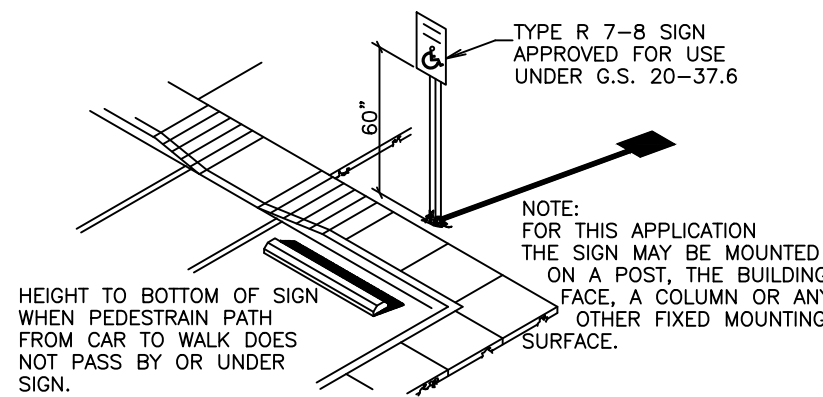
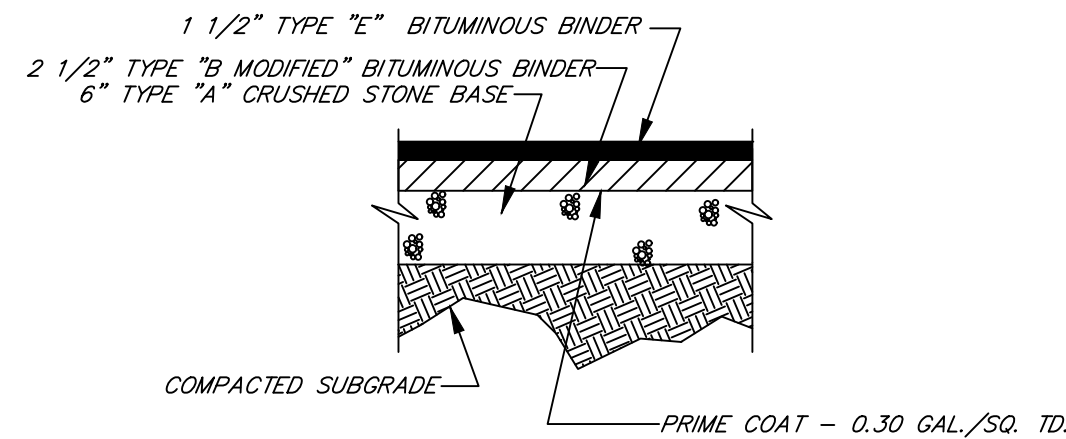
Date: August, 2022 Scale: 1"=30' Sheet 6 of 9

C:\Civil 3D Projects\Farner - Lavergne\DWG\Nagib Site Plan March 2023.dwg, EPSC, 3/22/2023 10:28:40 AM, ACAD204



C:\Civil 3D Projects\Farner - Lavergne\DWG\Nagib Site Plan March 2023.dwg, EPSC, 3/22/2023 10:28:22 AM, ACAD204

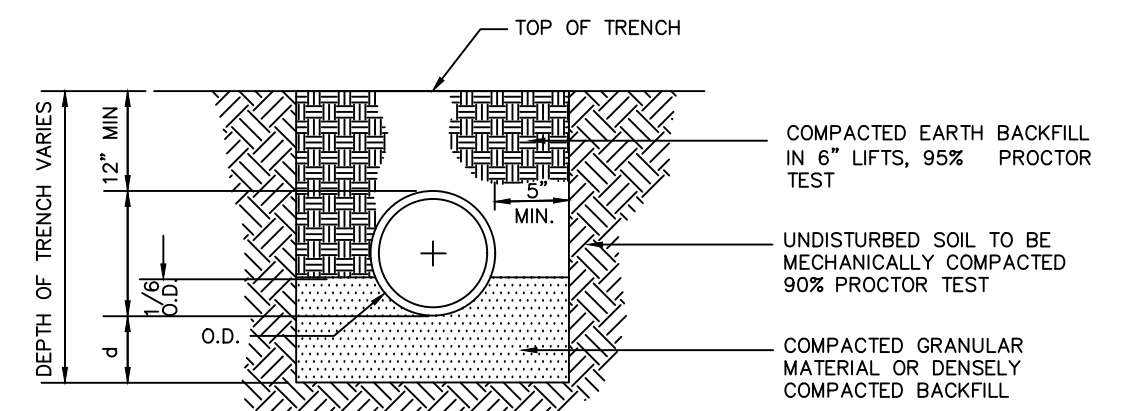




SIZE	AW	BW	CW	DW
A	32"	48"	80"	99"
B	48"	72"	102"	120"
C	30"	44"	54"	56"
D	26"	36"	60"	66"
E	24"	36"	64"	83"
F	6"	8"	8"	8"
MAX. OPENING	22"	32"	55"	75"
WT/*	1,380	3,100	8,100	11,400

General Notes:
1. Minimum Reinforcing: Wire Reinforcement 4x4 W7x7
2. F'c - 4,500 PSI.
3. F'y - 60 KSI.

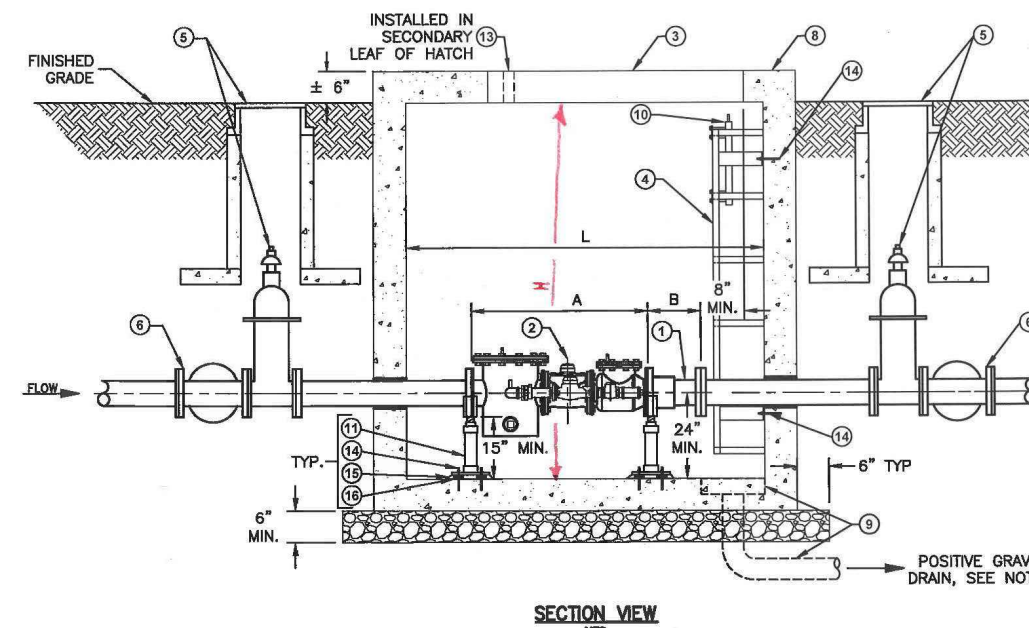
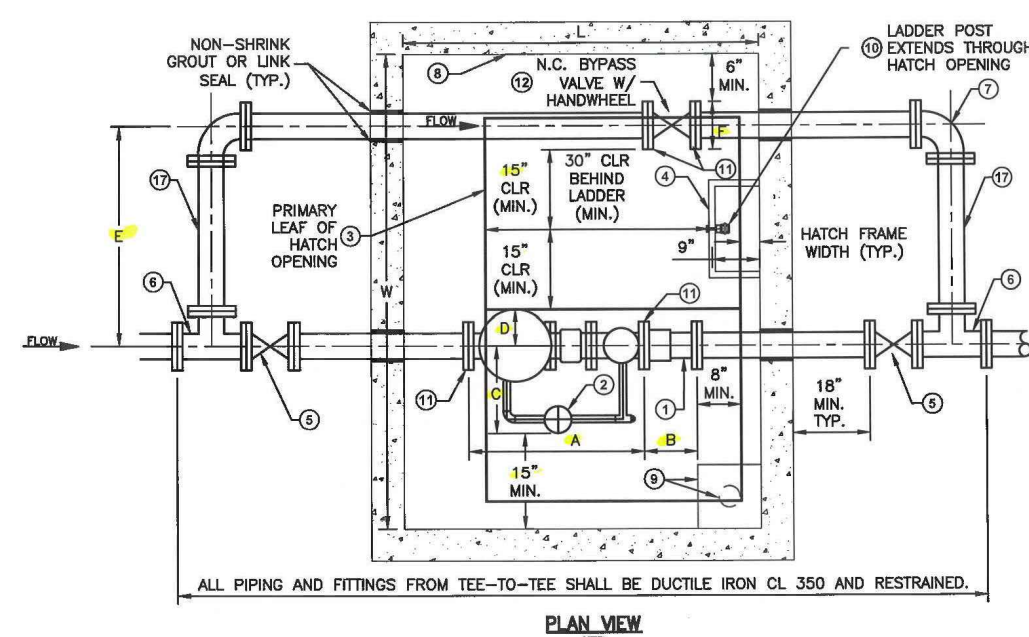
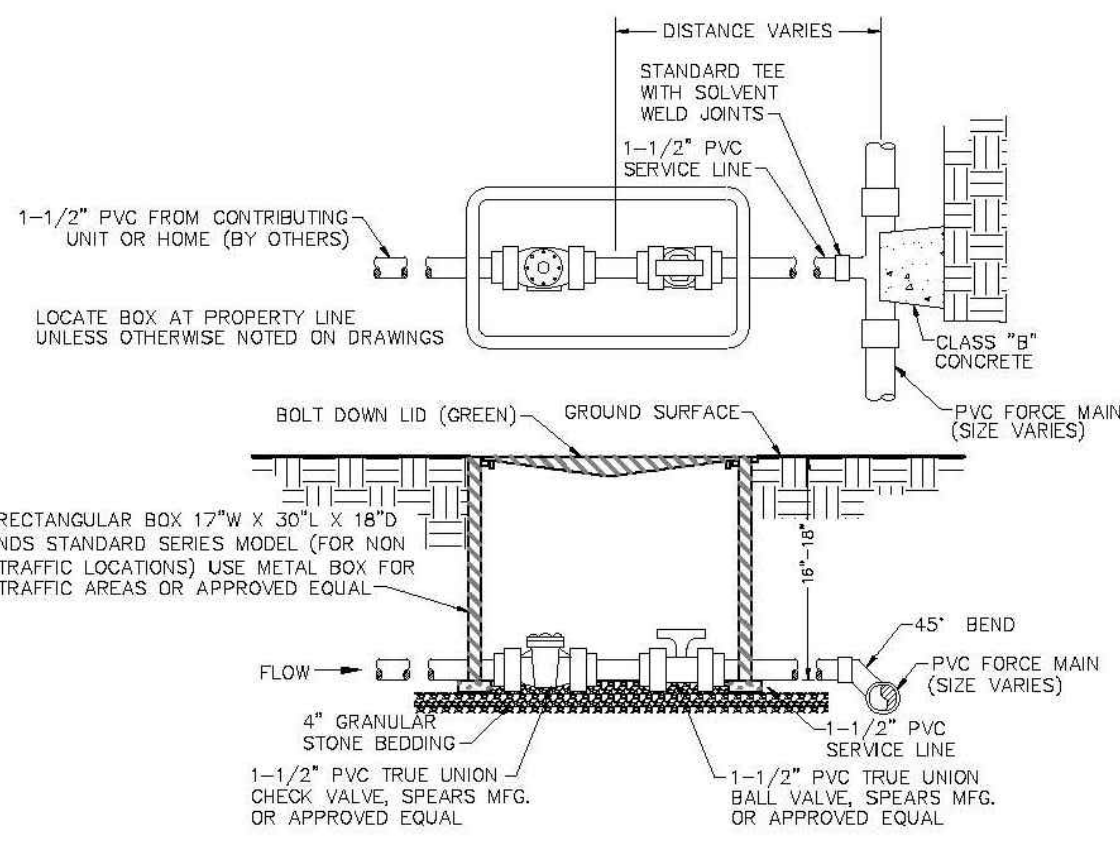
CONCRETE HEADWALL DETAIL N.T.S.



NOTES:
1. WHEN PIPE IS TO BE PLACED IN A FILL SECTION THE COMPACTED FILL SHALL BE PLACED A MIN. OF 12" ABOVE THE PIPE ELEVATION BEFORE THE TRENCH IS EXCAVATED.
2. SUBGRADES SHOULD BE EXCAVATED, IF NECESSARY, SO A UNIFORM FOUNDATION FREE OF PROTRUDING ROCKS MAY BE PROVIDED.

PIPE DIA.	D (MIN)
27" & SMALLER	3"
30" TO 60"	4"
66" & LARGER	6"

TRENCH BEDDING FOR STORM DRAIN CMP & RCP ONLY N.T.S.

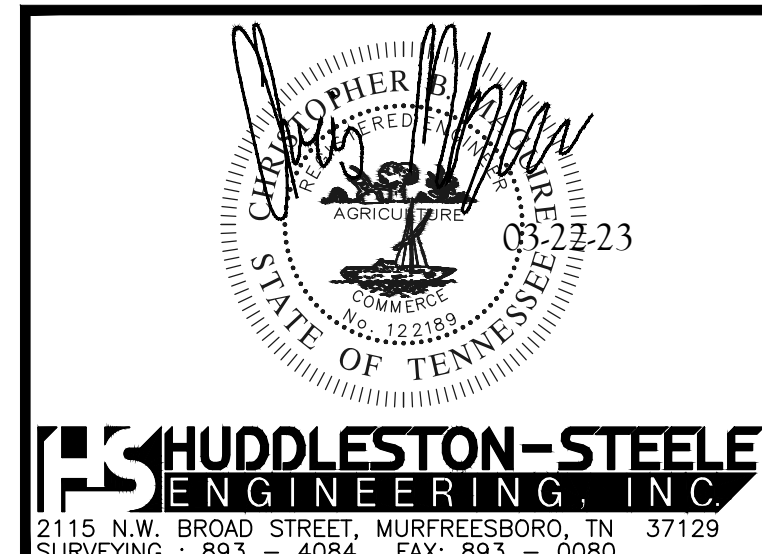


MIN. SIZE	A	B	C	D	E	F	G	H	I	J	K	L	M	N	O	P	Q	R	S	T	U	V	W	X	Y	Z
4"	33"	8"	17"	7"	42"	9"	8"	6"	6"	72"	48"															
6"	45"	10"	25"	10"	48"	11"	8"	6"	6"	72"	48"															
8"	53"	10"	23"	13"	50"	14"	8"	7"	6"	72"	48"															

NOTE: DIMENSIONS TO 1 INCH, FRACTIONS ROUNDED UP.
CONTOUR OF VAULT FLOOR 24" ABOVE VAULT FLOOR.

- NOTES:
1. ROMAC RFA, OR APPROVED EQUIVALENT.
 2. BADGER METER'S RECORDALL FIRE SERIES COMBINED FIRE AND DOMESTIC WATER METER ASSEMBLY, PER CITY, FUTURE COUNT AND WATER APPLICATION SHALL BE SUPPLIED TO CITY WATER METER DEPT. AND CITY SHALL DETERMINE AND SELECT THE APPROPRIATE METER SIZE AND METER TYPE.
 3. ACCESS HATCH DOUBLE LEAF AL. FRAME WITH SS COMPONENTS: HALLIDAY WSS, HALLIDAY H2W ISO RATED LID FOR OFF-STREET/INDIRECT TRAFFIC ASSESS. DIMENSIONS AS SHOWN, OR APPROVED EQUALS. DO NOT INSTALL IN DIRECT TRAFFIC DESIGNED FOR OFF-STREET LOCATIONS NOT SUBJECTED TO HIGH DENSITY TRAFFIC. PRIMARY LEAF OF HATCH SHALL BE POSITIONED OVER THE ACCESS LADDER OF THE VAULT.
 4. ALUMINUM FIXED LADDER RUNGERS 8" OFF VAULT WALL, 12" VERTICAL SPACING, (FIRST RUNG >7" AND < 12" FROM FLOOR), LADDER ARM STOPS 2" FROM CEILING (MINIMUM), ANCHOR LADDER EVERY 4 FEET (MIN.).
 5. GATE VALVE WITH VALVE BOX PER CITY STD. DTL. G30, TYPICAL VALVE BOX SETTING INSIDE & OUTSIDE OF PAVEMENT. VALVE SHALL BE 1/2" (SEE STD) + M (VAULT DIA) STICK.
 6. DUCTILE IRON TEE (ANNA FLANGED TYP.) W/ BURIED SERVICE RATED GASKETS & 304 SS BOLTS, NUTS, & LOCKING WASHERS TORQUED TO ANNA SPECS FOR FLANGED FITTINGS.
 7. DUCTILE IRON 90-DEGREE BEND (MECHANICAL JOINT WITH MEGALUG EA. END).
 8. PRECAST CONCRETE VAULT, 5,000 PSI (DIMENSIONS AS SHOWN).
 9. SUMP DRAIN: POSITIVE GRAVITY DRAIN WITH 4" SCH 40 PVC WHERE POSSIBLE, ELSE 3" DEEP SUMP, FLOOR SLOPED 2K TO DRAIN/SUMP.
 10. LADDER POST TO EXTERIOR ABOVE HATCH TO FACILITATE VAULT ACCESS: BILCO LU-4, JL LP-4, OR APPROVED EQUIVALENT.
 11. ADJUSTABLE PIPE SUPPORT SADDLE ASTM 304 S.S., TRUMBULL ITEM NO. 384-583X OR ENGINEER APPROVED EQUAL WITH 2" SCH 40 EXTENSION PIPE 304 S.S. ADJUSTABLE PIPE SUPPORTS SHALL BE USED TO FIT PRECASTER ELARGED 1" CLEAR SPACE BETWEEN PIPE FLANGE AND VAULT FLOOR, VAULT CEILING HEIGHT SHALL CONSIDER RISING STEM AND YOKE GATE VALVE OPERATION HEIGHT.
 12. BYPASS GATE VALVE (UL LISTED & FM APPROVED, FL-WL1) WITH HANDWHEEL OPERATOR (N.C.)
 13. METER TRANSDUCER CORE 2" HOLE IN SECONDARY LEAF OF THE HATCH FOR ATTACHING METER TRANSDUCER, AND SUFFICIENT CORD LENGTH SO HATCH LD. CAN BE OPENED.
 14. (4) 5/8" REDHEAD S.S. CONCRETE ANCHOR BOLTS WITH 5/8" S.S. HEX HEAD ANCHOR NUTS AND 1/2" 5/8" HEAVY S.S. WASHER DRILL AND MOUNT INTO CONCRETE FLOOR-SUMP WITH 3" MINIMUM EMBEDMENT IN-CONCRETE.
 15. 1" THICK NON-SHRINK GROUT LEVELING COURSE.
 16. 1" STAINLESS STEEL SPACER UNDER BASEPLATE.
 17. PIPE SPOOL SHALL BE OF FACTORY FLANGE (NO BOLT-ON OR SCREW-ON) BY PLAIN END.

4"-8" FIRE & DOMESTIC METER AND VAULT ASSEMBLY N.T.S.
Revised January 2023
STANDARD DETAIL 023
CITY OF LA VERGNE, TENNESSEE
O & M File No. 442-55
© 2023 Griggs & Maloney, Inc.
GRIGGS & MALONEY INCORPORATED
P.O. BOX 3904, MURFREESBORO, TN 37133-0904
(615) 895-8221 • FAX (615) 895-0832



DETAILS

5450 Murfreesboro Road
La Vergne, TN

3rd Civil District of Rutherford County, Tennessee

Date: August, 2022 N.T.S. Sheet 9 of 9



Item #: 5.

Item Title: Site Plan - Avenue Grading - Addition of 8,188 Square Feet on 4.73 Acres. Requested by Ragan-Smith. Property located at 121 Jones Boulevard (Tax Map 17, Parcel 6). I-2 (Heavy Industrial) Zoning District. Property owned by Barlow Builders.

Reviewed By:

Location:

(Insert map here)

Summary: On behalf of their client, Ragan-Smith is requesting site plan approval for a proposed addition to an existing building at the corner of Jones Boulevard and Waldron Road. There is a one-story building along with a two-story addition indicated on the plan. The total lot size is 4.73 acres. The existing building contains 8,651 sq. ft. The added space is slated to become office area for the business and would total 8188 sq. feet. The space in the rear (to the northeast) is an existing gravel lot and is partly made of concrete. This parcel is contained within the Murfreesboro Road/Waldron Overlay Streetscape District and must adhere to the applicable overlay provisions.

Staff Comments / Technical Items:

Planning

Bo Logan - 615-287-8702
blogan@lavergetn.gov

(Technical items go here)

Jake Blair - 615-287-8702
jblair@lavergetn.gov

Engineering

Gary Lide - 615-28-8703
glide@lavergetn.gov

1. The fence height and type must be specified on the drawings.
2. The dumpster enclosure design **MUST** be shown. Please add a detail for the enclosure.

3. Provide proposed building addition height. If greater than 30', the driving aisle through parking lot must be minimum 26' wide (this is a fire code, confirm with Fire Marshal)

Utilities

Scott Tatalovich - 615-287-8739

statalovich@lavergneth.gov

Comments regarding the Utility Plan (Sht C4.1):

1. Water service should be shown as "*existing* 6"W Service" because it's already built. It is not "proposed."

a) 6"W was installed across the street in a steel casing pipe.

b) The 6"W tapped the existing 8"W in Jones Blvd. The City's line turns to 6"W after the FH.

c) Developer should show what was constructed to scale, plans are not currently drawn to scale (the 1" irrig meter and 6" combined fire and domestic vault are not the same size). The 6" combined fire and domestic water tap didn't occur at a cross for the FH.

2. The irrigation service is also existing.

a) The City reused the existing domestic water tap for the irrigation meter.

b) The City ran a 1" Pex line that inside the steel casing for the 6" water service for the irrigation meter box.

3. FYI, I'm told by Public Works staff that the location of the City's 1.5" low pressure sewer line is close to or possibly under the edge of the sidewalk.

Codes

Randolph Salyers - 615-287-8605

rsalyers@lavergneth.gov

(Technical items go here)

Fire

Curtis Brinkley - 615-405-5931

cbrinkley@lavergneth.gov

The building heights need to be determined before access can be approved.

FDC must be no further than 10ft off any fire department access road.

The fire hydrant listed on Jones Blvd can not be used as an approved hydrant. Access is across the road. Please note another existing hydrant within 150' of the FDC or add a private hydrant.

Police

JJ Eubank - 615-287-8613

jeubank@lavergneth.gov

No comments.

***Note:** The above technical items may not be the only corrections and/or issues needing to be resolved to get approval from the planning commission. New items can be brought up at the workshop and staff can add items at any time that might have been overlooked. It is the applicant's responsibility to make sure that all technical

items are addressed and that no new issues exist before the planning commission meeting. Addressing all technical items does not constitute approval. It is the planning commission's decision whether an item passes or fails. Revised plans are due to staff by the following Monday at close of business unless other arrangements are made and documented.

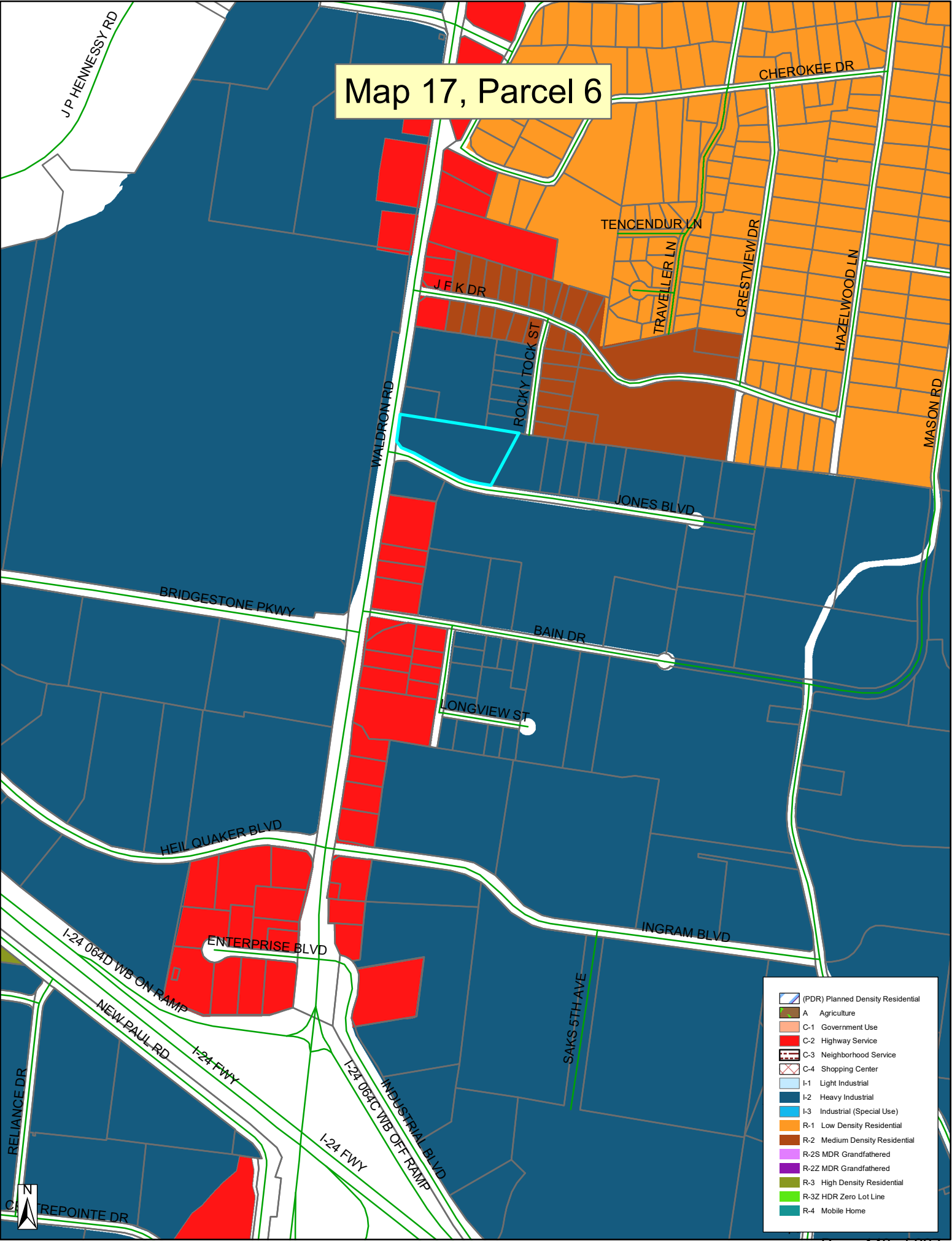
Map 17, Parcel 6



Map 17, Parcel 6



Map 17, Parcel 6









NOT FOR
CONSTRUCTION

AVENUE GRADING OFFICE BUILDING FOR BARLOW BUILDERS

121 JONES BOULEVARD & 381 WALDRON ROAD LAVERGNE RUTHERFORD COUNTY, TENNESSEE

JOB NO.	WK ORDER	-	-	-
20124	1954	-	-	-
DESIGNED:	EMP	-	-	-
DRAWN:	GBB	-	-	-
SCALE:	1"=30'	-	-	-
DATE:	MARCH 22, 2021	1	03-22-2021	PER CITY COMMENTS
		REV. #	DATE	DESCRIPTION

OVERALL SITE LAYOUT PLAN

C1.1

SITE PLANS
AVENUE GRADING OFFICE BUILDING
FOR
BARLOW BUILDERS

SITE DATA:

PROPERTY INFORMATION:

STREET ADDRESS: 381 WALDRON ROAD & 121 JONES BOULEVARD
CITY: LAVERGNE
STATE: TENNESSEE
COUNTY: RUTHERFORD
CIVIL DISTRICT: 3
TAX MAP: 17
PARCEL: 6
LOT SIZE: 4.73 ± ACRES

ZONING INFORMATION:

ZONING CLASSIFICATION: I-2 (HEAVY INDUSTRIAL)
ZONING OVERLAY: WALDRON ROAD/MURFREESBORO ROAD
STREETSCAPE DISTRICT
EXISTING USE: WAREHOUSE AND OUTDOOR STORAGE
PROPOSED USE: OFFICE AND OUTDOOR STORAGE

BUILDING AREA DATA:

EXISTING BUILDING TO REMAIN: 8,651 SF
PROPOSED BUILDING AREA: 3,338 SF
TOTAL BUILDING AREA: 11,989 SF

BUILDING SETBACKS:

FRONT YARD: 10'
FRONT BUILDING SETBACK: 40'
SIDE BUILDING: 20'
REAR BUILDING: 15'
MAX HEIGHT: 50'

PARKING SUMMARY:

1 SPACE PER 400 SF OF FLOOR AREA FOR OFFICE AND/OR SALES
3,338 SF OF FLOOR AREA FOR OFFICE AND/OR SALES = 9 SPACES
1 SPACE PER 4,000 SF OF GROSS FLOOR AREA
8,651 SF OF GROSS FLOOR AREA = 3 SPACES
TOTAL PARKING REQUIRED = 12 SPACES

PARKING PROVIDED:
REGULAR PARKING = 14 SPACES
VAN ACCESSIBLE SPACES = 1 SPACES
TOTAL PARKING PROVIDED = 15 SPACES

SITE SURFACE INFORMATION:

PERVIOUS AREA: 3.85 ACRES
IMPERVIOUS AREA: 0.88 ACRES
FLOOR AREA RATIO: 0.06

SURVEY INFORMATION:

BOUNDARY AND TOPOGRAPHIC INFORMATION TAKEN FROM
A SURVEY BY RAGAN-SMITH ASSOCIATES DATED 10/09/20.

FLOOD INFORMATION:

FEMA MAP#: 47149C0015H
EFFECTIVE DATE: JANUARY 5, 2007
BY SCALED MAP LOCATION AND GRAPHIC PLOTTING ONLY, THIS PROPERTY LIES
WITHIN FLOOD ZONE "X", AS DESIGNATED ON CURRENT FEDERAL EMERGENCY
MANAGEMENT AGENCY MAP NO. 47149C0015H, WITH AN EFFECTIVE DATE OF
JANUARY 5, 2007, WHICH MAKES UP A PART OF THE NATIONAL FLOOD
INSURANCE ADMINISTRATION REPORT; COMMUNITY NO. 470167, PANEL NO. 0015,
SUFFIX H, WHICH IS THE CURRENT FLOOD INSURANCE RATE MAP
FOR THE COMMUNITY IN WHICH SAID PREMISES IS SITUATED. SAID MAP DEFINES
ZONE "X" UNDER "OTHER AREAS" AS AREAS DETERMINED TO BE OUTSIDE THE
0.2% ANNUAL CHANCE FLOODPLAIN.

CONTACTS

OWNER/DEVELOPER

BARLOW BUILDERS
BYRD CAIN
3020 STANSBERRY LANE, SUITE 101
FRANKLIN, TN 37069
615-376-1680
BYRDCAIN@BELLSOUTH.NET

CIVIL

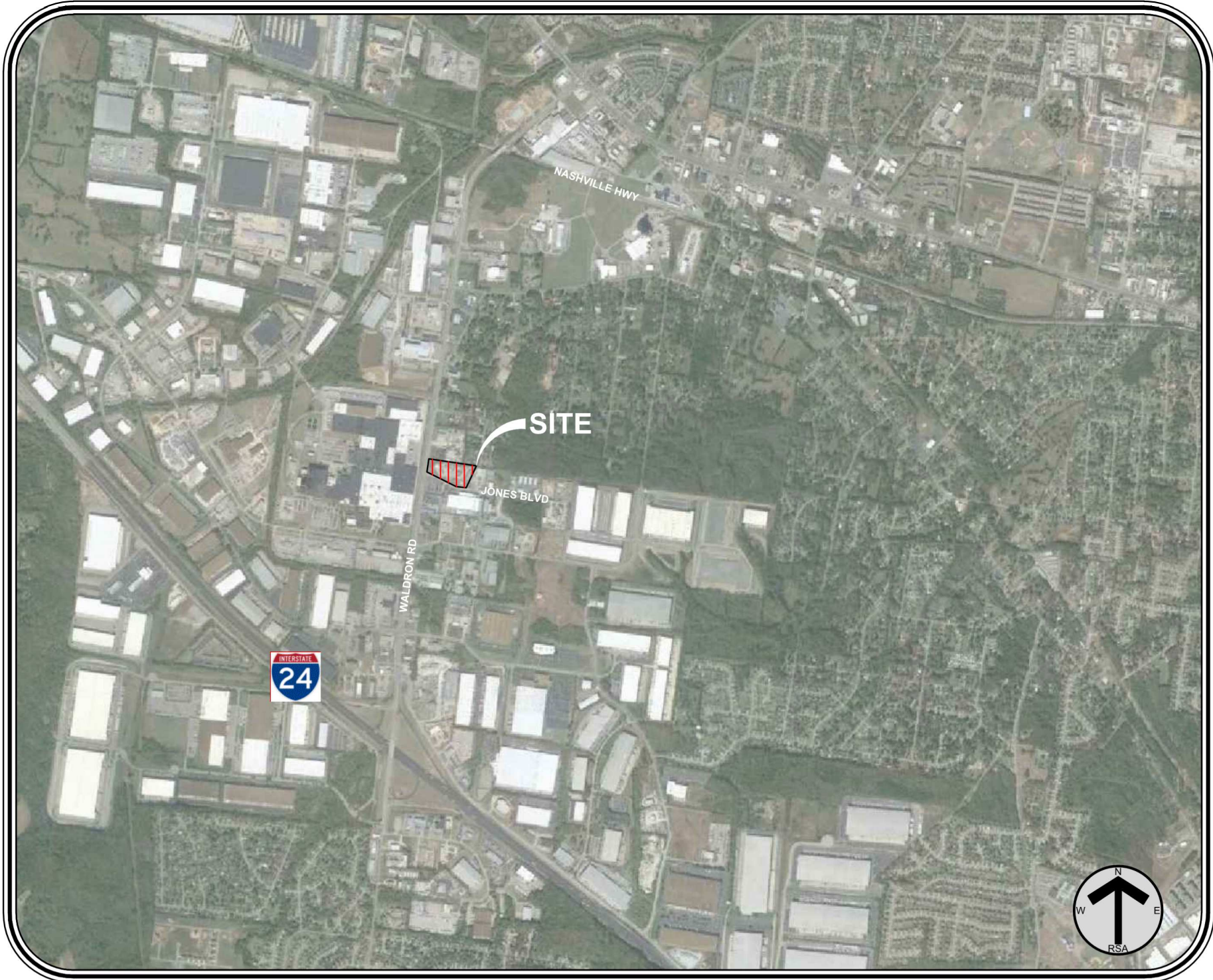
RAGAN-SMITH ASSOCIATES
ERIC PARL
315 WOODLAND STREET
NASHVILLE, TN 37206
(615) 244-8591
EPARL@RAGANSMITH.COM

LANDSCAPE ARCHITECTURE

RAGAN-SMITH ASSOCIATES
ANDREW TARSI
315 WOODLAND STREET
NASHVILLE, TN 37206
(615) 244-8591
ATARSI@RAGANSMITH.COM

ARCHITECTURE

BARLOW BUILDERS
J.R. ROLLINS
3020 STANSBERRY LANE, SUITE 101
FRANKLIN, TN, 37069
(615) 376-1680
JR@BARLOWBUILDERS.COM



MAP SOURCE: GOOGLE EARTH PRO-2020

LOCATION MAP

NOT TO SCALE

INDEX OF SHEETS

SHEET DESCRIPTION

C0.0 COVER SHEET

CIVIL PLANS

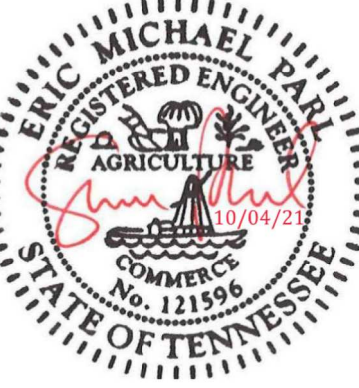
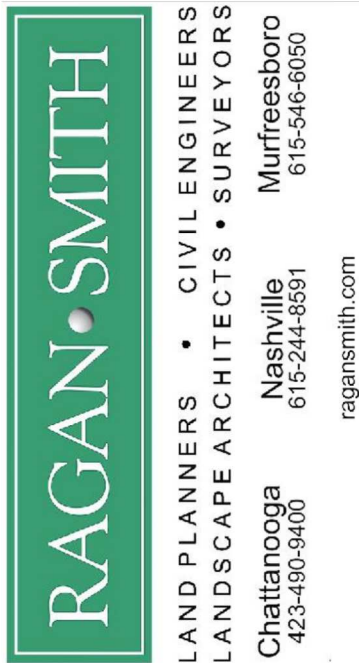
C0.1 CIVIL NOTES
C0.2 EXISTING CONDITIONS
C0.3 DEMOLITION PLAN
C1.1 OVERALL SITE LAYOUT PLAN
C1.2 ENLARGED SITE LAYOUT PLAN
C2.1 INITIAL EROSION CONTROL PLAN
C3.1 SITE GRADING, DRAINAGE & EROSION CONTROL PLAN
C3.2 FINAL EROSION CONTROL PLAN
C4.1 UTILITY PLAN
C5.1 CONSTRUCTION DETAILS
C5.2 CONSTRUCTION DETAILS

LANDSCAPE ARCHITECTURAL PLANS

L1.1 LANDSCAPE PLAN
L1.2 LANDSCAPE NOTES AND DETAILS

ARCHITECTURAL PLANS

1 ARCHITECTURAL ELEVATIONS - FRONT AND RIGHT SIDE
2 ARCHITECTURAL ELEVATIONS - REAR AND LEFT SIDE



AVENUE GRADING OFFICE BUILDING
FOR
BARLOW BUILDERS
121 JONES BOULEVARD & 381 WALDRON ROAD, LAVERGNE RUTHERFORD COUNTY, TENNESSEE

JOB NO.	WK. ORDER	DESIGNED	DRAWN	SCALE	DATE	REV.	DATE	DESCRIPTION
20124	1954	EMP	GBB	NOT TO SCALE	MARCH 22, 2021	1	03-22-2021	PER CITY COMMENTS

COVER SHEET

C0.0



Know what's below.
Call before you dig.

RSA STANDARD NOTES

SITE GENERAL NOTES

1. The contractor shall verify the location of all existing utilities in the proximity of the construction area and report any discrepancies to the owner's representative prior to beginning work.
2. The contractor shall conform to all local, state and federal codes and obtain all permits prior to beginning work.
3. The contractor shall check all finished grades and dimensions and report any discrepancies to the owner's representative prior to beginning work.
4. Dimensions are to the face of curb, edge of concrete and face of building unless noted otherwise.
5. Proposed building footprint is for graphic purposes only. Contractor shall use the current architectural drawings for building stakeout and verify that there are no discrepancies with these plans.
6. All traffic markings shall conform to the manual of uniform traffic control device (MUTCD). All pavement marking shall be thermoplastic unless directed otherwise by the owner's representative.
7. All handicap ramps, parking spaces and accessible routes shall comply with the current ADA requirements.
8. Exterior door landings shall be provided per the local building code. Contractor shall coordinate door locations and adjacent sidewalk/landing grades with these plans and report any discrepancies to the owner's representative.

SITE CONSTRUCTION NOTES

1. The necessary permits for the work shown on these site development plans will be obtained by the contractor prior to commencement of any work on this project. The contractor shall give all necessary notices and obtain all permits and pay all fees involved in securing said permits. He shall also comply with all city, county and state building laws, ordinances or regulations relating to the construction of the project.
2. The contractor shall be responsible for and shall bear all expenses of field staking necessary for site and building layout. All layout shall be performed in accordance with the site layout plan.
3. The location of existing piping and underground utilities, such as water and gas lines, electrical and telephone conduits, etc., as shown on this portion of the plans have been determined from the best available information by actual surveys, or taken from the records and drawings of the existing utilities. However, the civil engineer does not assume responsibility that, during construction, the possibility of utilities other than those shown may be encountered or that actual location of those shown may vary somewhat from the location designated on this portion of the plans. In areas where it is necessary that the exact locations of underground lines be known, the contractor shall, at this own expense, furnish all labor and tools to either verify and substantiate or definitively establish the location of the lines.
4. The contractor must understand that the work is entirely at his risk until same is accepted and he will be held responsible for its safety by the owner. Therefore, the contractor shall furnish and install all necessary temporary works for the protection of the work, including barricades, warning signs, and lights.
5. The site development portion of this project will be subject to the inspection and final approval of the local planning, codes, water and sewer departments (and/or utility districts), engineering/public works departments and fire marshal's office.
6. If, during the construction of the site development portion of this project, a question of intent or clarity arises from either the plans or specifications, the contractor will immediately bring the matter to the attention of the civil engineer or owner's representative for resolution before the affected work items are initiated or pursued further.
7. The contractor will exercise extreme caution in the use of equipment in and around overhead and/or underground power lines. If at any time in the pursuit of this work the contractor must work in close proximity of the above-noted lines, the electric and/or telephone companies shall be contacted prior to such work and the proper safety measures taken. The contractor should make a thorough examination of the overhead lines in the project area prior to the initiation of construction.
8. The contractor shall be responsible for any damage done to the premises or adjacent premises, or injuries to the public during the construction of the work, caused by himself, his subcontractors, or the carelessness of any of his employees.

DEMOLITION NOTES

1. The contractor will be required to remove all excavated materials and such items shall become the property of the contractor. All items shall be properly disposed of at an off-site location. The contractor shall outline any and all possible haul routes and shall be prepared to submit such to the local jurisdiction public works department, the civil engineer and other authorities for approval.
2. If, at any time, prior to or during the demolition work, hazardous material is encountered, the contractor shall notify the owner's representative and appropriate governmental agency.
3. The contractor shall notify adjacent owners of work that may affect their property, potential noise, utility outage or disruption. Such operations shall be conducted by the contractor with minimum interference to adjacent owners. Adjacent egress and access shall be properly maintained at all times. Do not close or obstruct any roadways, parking or sidewalks without permission from the adjacent owners or the local jurisdiction public works department.
4. Prior to the commencement of demolition/grading operations, all overhead and underground utilities shall be located. All removal and/or relocation of utilities shall be coordinated with the respective utility companies.
5. The contractor will provide all necessary protective measures to safeguard existing utilities from damage during construction of this project. In the event that special equipment is required to work over or around the utilities, the contractor will be required to furnish such equipment at no additional cost to owner.
6. The contractor will be solely responsible for contacting all affected utilities prior to submitting his bid to determine the extent to which utility disconnections and/or adjustments will have upon the schedule of the work for the project. Some utility facilities may need to be adjusted concurrently with the contractor's operations, while some work may be required around utility facilities that will remain in place. It is understood and agreed that the contractor will receive no additional compensation for delays or inconvenience caused by the utility adjustment.

EROSION PREVENTION AND SEDIMENT CONTROLS

1. All control measures must be properly installed and maintained in accordance with the manufacturer's specifications, TDEC and local standards.
2. Design, inspection, and maintenance of BMPs described and shown on these plans shall be consistent or exceed recommendations contained in the current edition of TDEC's Tennessee erosion control handbook.
3. BMP capacity [sediment traps, silt fences, sedimentation ponds, and other sediment control] shall not be reduced by more than 50% at any given time. if periodic inspections or other information indicates a control has been used inappropriately or incorrectly, the contractor must replace or modify the control for relevant site situations.
4. Where permanent or temporary vegetation cover is used as a control measure, the timing of the planting is critical. planning for planting of vegetation cover during winter or dry months should be avoided.
5. If sediment escapes the permitted area, off-site accumulations of sediment that have not reached a stream must be removed at a frequency sufficient to minimize offsite impacts. The contractor shall not initiate remediation/restoration of a stream without consulting the division first. The NOI general permit does not authorize access to private property, arrangements concerning removal of sediment on adjoining property must be settled by the contractor and adjoining landowner.
6. Litter, construction debris, and construction chemicals exposed to storm water shall be picked up prior to anticipated storm events or before being carried off of the site by wind or otherwise prevented from becoming a pollutant source for storm water discharges. After use, materials used for EPSC should be removed or otherwise prevented from becoming a pollutant source for storm water discharge.
7. Erodible material storage areas (including overburden and stockpiles of soil) and borrow pits are considered part of the site and should be addressed with appropriate bmp's accordingly.
8. Pre-construction vegetative ground cover shall not be destroyed, removed, or disturbed more than 15 days prior to grading or earth moving unless the area is stabilized. contractor shall sequence events to minimize the exposure time of graded or denuded areas. Clearing and grubbing shall be held to the minimum necessary for grading and equipment operation. Existing vegetation at the site should be preserved to the maximum extent practicable.
9. EPSC measures must be in place and functional before moving operations begin and must be constructed and maintained throughout the construction period. Temporary measures may be removed at the beginning of the workaday, but must be replaced at the end of the workday.
10. The following records shall be maintained on or near site: the dates when major grading activities occur; the dates when construction activities temporarily or permanently cease or a portion of the site; the dates when stabilization measures are initiated; inspection records and rainfall records. Contractor shall maintain a rain gauge and daily rainfall records at the site, or use a reference site for a record of daily amount of precipitation.
11. A copy of the SWPPP shall be retained on-site and should be accessible to the director and the public. Once site is inactive or does not have an onsite location adequate to store the SWPPP, the location of the SWPPP, along with a contact phone number, shall be posted on-site. If the SWPPP is located off-site, reasonable local access to the plan, during normal working hours, must be provided.
12. Off-site vehicle tracking of sediments and the generation of dust shall be minimized. A stabilized construction access (a point of entrance/exit to a construction site) shall be constructed as needed to reduce the tracking of mud and dirt onto public roads by construction vehicles.
13. Inspections must be performed at least twice every calendar week. Inspections shall be performed at least 72 hours apart, where sites or portions of construction sites have been temporarily stabilized, or runoff is unlikely due to winter conditions or due to extreme drought, such inspection has to be conducted once per month until thawing or precipitation results in runoff or construction activities resumes. Inspection requirement do not apply to definable areas that have been finally stabilized, as designed by the engineer. Written notification of the intent to change the inspection frequency and the justification for such request must be submitted to the local environmental field office, or the division's Nashville central office for projects of TDOT or TVA. Should the division discover that monthly inspection of the division discover that monthly inspections of the site are not appropriate due to insufficient stabilization measures or otherwise, twice weekly inspections shall resume. The division may inspect the site to confirm or deny the notification to conduct monthly inspections.
14. Inspectors performing the required twice weekly inspections must have an active certification and a record of certification must be kept on site. Based on the results of the inspection, any inadequate control measures or control measures in disrepair shall be replaced or modified, or repaired as necessary, before the next rain event, but in no case more than 7 days after the need identified.
15. Outfall points shall be inspected to determine whether EPSC measures are effective in preventing significant impacts to receiving waters. Where discharge locations are inaccessible, nearby downstream locations shall be inspected. Locations where vehicles enter or exit the site shall be inspected for evidence of offsite sediment tracking.
16. Refueling construction equipment and construction equipment maintenance shall be performed in a designated placed determined by the contractor. Any spills to be cleaned up immediately and clean up to follow TDEC standards.

SITE GRADING & STORM DRAINAGE NOTES

1. Erosion control sediment barriers and tree protection barrier shall be installed prior beginning site work.
2. No heavy equipment shall cross or be stored outside the limits of construction, within tree protections zones, or under the drip line of existing trees to remain.
3. Topsoil stripped from areas to be graded shall be stockpiled on site in a location approved by the owner's representative. Drainage shall be routed around stockpile locations for the duration of grading operations. Erosion control measures shall be installed to prevent loss of topsoil material.
4. Prior to beginning construction, contractor shall review geotechnical report.
5. All cut and fill shall be performed under the direction/observation of the geotechnical engineer.
6. The suitability of soils for fill material shall be determined by the geotechnical engineer.
7. Unless directed otherwise by geotechnical engineer, all fill areas shall be raised in lifts not exceeding 8" in thickness. the relative compaction of each layer shall not be less than 95% of the standard proctor maximum dry density (ASTM D-698) in all areas of fill within open areas and 98% of same specification for areas under roads, parking, sidewalks, building slabs, and foundations.
8. All grading shall be completed to the grades indicated within these plans. final grades shall provide proper drainage and prevent standing water.
9. All storm drainage castings to be John Bouchard & Sons Co. or approved equal, unless otherwise noted.
10. All storm drainage pipes to be RCP, Class III, unless otherwise noted.
11. Installation of pipe material shall be placed with a screen stone envelope and when under pavement entire trench to be backfilled with screen stone to subgrade. Size of stone, envelopes, and trenches to be specified by municipalities for public lines and private lines to adhere to common practices for installation requirements.

SITE UTILITY NOTES

1. All materials and workmanship for utility lines and appurtenances shall be in strict compliance with the governing utility company and local codes. Prior to construction contractor shall notify utility company. (see utility contact information)
2. Contractor shall coordinate site electrical, gas, telephone, and cable with the respective utility company for service layout and design information. Any proposed layout of these utilities depicted on these drawings is graphical only and not intended to represent design of these utilities.
3. Prior to commencement of construction, contractor shall obtain all permits and pay any required tap and connection fees.
4. All trenching, pipe laying and backfilling shall be in accordance with federal OSHA regulations.
5. Site contractor shall construct all utility services to within 5' of building.
6. Contractor shall be responsible for coordinating the sequencing of construction for all utility lines to avoid conflicts.
7. Contractor shall coordinate size and location of water, sewer and stormwater connections to the building as depicted on the building mechanical plans and the site utility plan and notify the engineer or owner's representative of any discrepancies.
8. Water services lines 1/2" - 3" shall be Type-K copper and 4" or larger shall be ductile iron pipe - Class 52 unless otherwise required by utility company.
9. Fire line installation and thrust blocking location and sizing shall be per N.F.P.A. and local fire department requirements.
10. Water meter manufacturer/model number and vault specifications shall be per the water utility company.
11. Backflow device (RPBP/DDCVA) manufacturer/model number shall be per the water utility company.
12. Contractor shall install hot box enclosure (pre-finished dark green) on all exterior above-ground backflow devices. Domestic and fire backflow devices shall be heated. Contractor shall coordinate providing appropriate electrical service to backflow device.
13. Contractor shall coordinate location of backflow device with the building mechanical drawings.
14. Sanitary sewer service lines shall be SDR 35 PVC unless specified otherwise.
15. Maintain a 10' horizontal and 18" vertical separation between sanitary sewer and water lines.
16. All fire line mains to be installed by licensed fire protection contractor.
17. Installation of pipe material shall be placed with a screen stone envelope and when under pavement entire trench to be backfilled with screen stone to subgrade. Size of stone, envelopes, and trenches to be specified by municipalities for public lines and private lines to adhere to common practices for installation requirements.

TREE PROTECTION NOTES

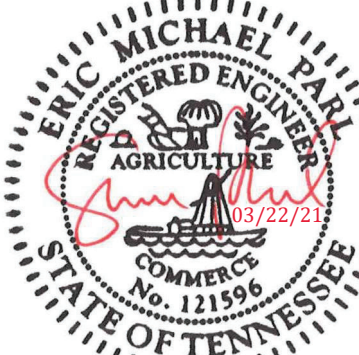
1. Any required excavation in or around the protection zone to accommodate underground services, footings, etc., shall be indicated on the plan, and shall be excavated by hand. In addition, related root pruning shall be accomplished by a certified arborist via ansi a-300-95 standard so as to minimize impact of the general root system. No disturbance, including trenching, is permitted within tree protection zones.
2. The storage of building materials or stockpiling shall not be permitted within the limits of or against the protection barriers.
3. Trees within the protection barriers must be adequately cared for throughout the construction process (i.e., they must be watered sufficiently, particularly if the tree's root system has been disturbed by excavation). Fill shall not be placed upon the root system in such a manner as to endanger the health or life of the affected tree.
4. Tree protection barrier shall be constructed prior to the issuance of any permits and shall remain intact throughout the entire period of construction.

GEOTECHNICAL NOTE

1. No geotechnical study has been conducted on this site. however, the design for the site improvements shown on this plan has relied on experience with similar projects and similar soil/site conditions. If, in the pursuit of this work by the contractor, conditions or circumstances are encountered that are different than reflected in these plans or that appear to impact the scope of the work, the contractor will immediately notify the civil engineer, and the owner/developer before any remedial course of action or design change is initiated. All parties (owner, civil engineer, proper governmental agencies, and contractor) must be in agreement and the magnitude of the cost/time required for the measures established.

RAGAN•SMITH

LAND PLANNERS • CIVIL ENGINEERS
LANDSCAPE ARCHITECTS • SURVEYORS
Chattanooga Murfreesboro
Nashville
615-544-8591
615-546-6060
ragansmith.com



AVENUE GRADING OFFICE BUILDING

FOR

BARLOW BUILDERS

121 JONES BOULEVARD & 381 WALDRON ROAD, LAVERGNE RUTHERFORD COUNTY, TENNESSEE

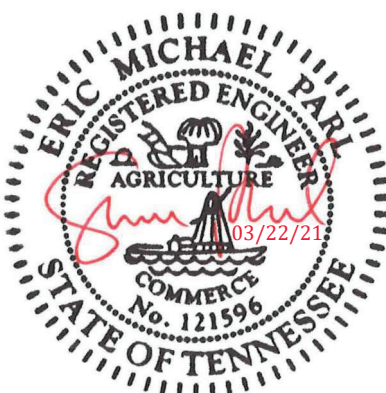
JOB NO.	WK. ORDER	DESIGNED:	DRAWN:	SCALE:	DATE:	REV.	DATE:	DESCRIPTION:
20124	1954	EMP	GBB	NOT TO SCALE	MARCH 22, 2021	#		

CIVIL NOTES

C0.1



RAGAN SMITH
LAND PLANNERS • CIVIL ENGINEERS
LANDSCAPE ARCHITECTS • SURVEYORS
Nashville, Tennessee
615-544-8591
615-546-6060
ragansmith.com



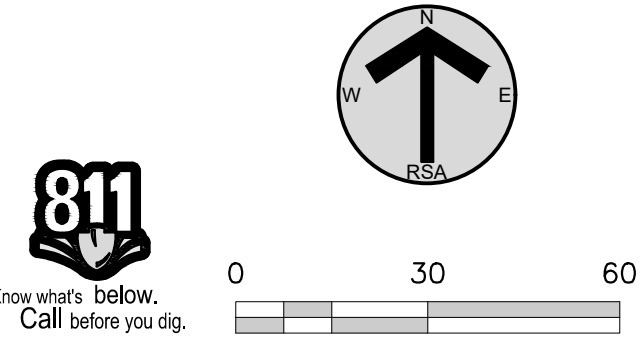
AVENUE GRADING OFFICE BUILDING FOR BARLOW BUILDERS

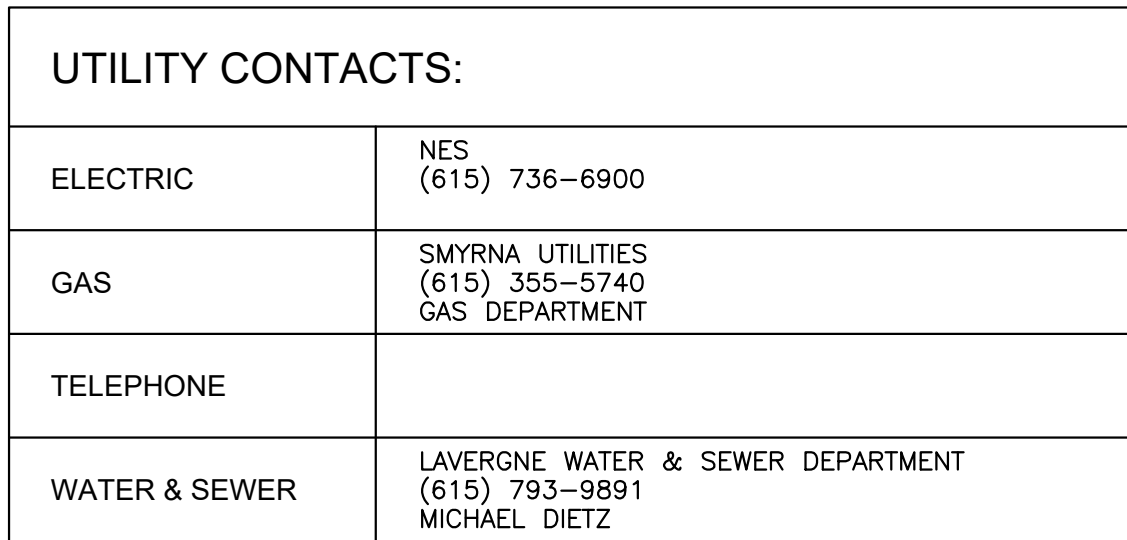
121 JONES BOULEVARD & 381 WALDRON ROAD, LAVERGNE RUTHERFORD COUNTY, TENNESSEE

JOB NO.	20124	DESIGNED:	EMP	DRAWN:	GBB	SCALE:	1"=30'	DATE:	MARCH 22, 2021	REV.	DATE	DESCRIPTION:
WK. ORDER	1954											

EXISTING
CONDITIONS
C0.2

- LEGEND**
- IR(N) IRON ROD (NEW) (1/2" x 18" W/CAP STAMPED "RAGAN SMITH & ASSOCIATES")
 - IR(O) IRON ROD (OLD)
 - MONITORING WELL
 - CATCH BASIN/CURB INLET
 - SEWER CLEAN-OUT
 - UTILITY POLE
 - UTILITY POLE W/ ANCHOR
 - UTILITY POLE W/ LIGHT
 - CATV- OVERHEAD CABLE TELEVISION LINE
 - SA- SANITARY SEWER LINE
 - FIRE HYDRANT
 - WATER VALVE
 - WATER LINE
 - RCP- REINFORCED CONCRETE PIPE
 - CONCRETE SURFACE
 - GRAVEL SURFACE
 - ASPHALT SURFACE
 - R.O.R.C.T. REGISTER'S OFFICE FOR RUTHERFORD COUNTY, TENNESSEE





121 JONES BOULEVARD & 381 WALDRON ROAD, LAVERGNE RUTHERFORD COUNTY, TENNESSEE

DEMOLITION PLAN

C0.3



Page 151 of 22

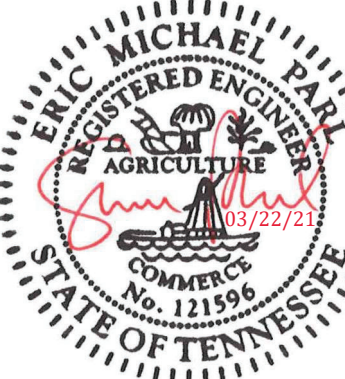
©2015 MICHAEL SMITH ENGINEERS, INC. ALL RIGHTS RESERVED. THIS LAYOUT PLAN IS A PRELIMINARY DESIGN. IT IS NOT TO BE USED FOR CONSTRUCTION. ANY CHANGES TO THIS LAYOUT PLAN MUST BE APPROVED BY MICHAEL SMITH ENGINEERS, INC. DATE: 03/22/2021 1:30 PM



LEGEND

- PROPOSED BUILDING
- PROPOSED CONCRETE WALK
- PROPOSED LIGHT DUTY ASPHALT PAVEMENT
- PROPOSED/EXISTING GREEN SPACE
- EXISTING ASPHALT PAVEMENT
- EXISTING GRAVEL
- EXISTING CONCRETE

RAGAN SMITH
LAND PLANNERS • CIVIL ENGINEERS
LANDSCAPE ARCHITECTS • SURVEYORS
Nashville
Chattanooga
615-244-8891
615-456-6050
ragansmith.com



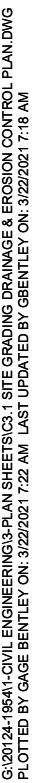
AVENUE GRADING OFFICE BUILDING
FOR
BARLOW BUILDERS
121 JONES BOULEVARD & 381 WALDRON ROAD, LAVERGNE RUTHERFORD COUNTY, TENNESSEE

JOB NO.	WK. ORDER	DESIGNED	DRAWN	SCALE	DATE	REV.	DATE	DESCRIPTION
20124	1954	EMP	GBB	1"=20'	03-22-2021	1	MARCH 22, 2021	PER CITY COMMENTS

ENLARGED SITE
LAYOUT PLAN

C1.2





ALL ENTRANCES OF ANY BUILDING WHICH IS CONSIDERED A HANDICAP ACCESSIBLE ENTRANCE IS TO BE PROVIDED FOR A MINIMUM OF 60"x60" LANDING FOR A SINGLE DOOR AND A 72"x60" LANDING FOR A DOUBLE DOOR, IF A PROPOSED ACCESS EXCEEDS A 72" WIDTH THE LANDING IS TO ACCOMMODATE SAID ACCESS WIDTH. SAID LANDING IS NOT TO EXCEED A 1% GRADE (1/8"/FOOT FALL) IN ANY DIRECTION. CONTRACTOR IS TO COORDINATE WITH DESIGNING ARCHITECT FOR ALL LOCATIONS, LAYOUTS, ELEVATIONS AND TREATMENTS TO ANY PROPOSED BUILDING ACCESS.

1. ALL STORMWATER WORKS ON THIS PROJECT WILL BE CONSTRUCTED TO BE IN COMPLIANCE WITH THE CITY OF LA VERGNE WORKS SPECIFICATIONS AND REQUIREMENTS.
2. THE TOP FOR STORMWATER PIPING WILL BE BEDDED WITH 4" OF CRUSHED STONE TO RECEIVE THE CURLVE PIPE AND GIVE A UNIFORM BEARING ALONG THE RUN OF THE TRENCH. REMAINING TRENCH SECTION TO BE BACKFILLED WITH CLEAN STONE #57 TO TOP OF PIPE OR TO SUBGRADE GRADE IF GRADED TO TOP OF PIPE.
3. TOP OF CASTING EL. REFERS TO TOP OF GRATE OF "K" AND "M" & "H" CASTINGS. DRAINAGE STRUCTURE CASTING SHALL BE DRY SET WHEN BUILT AND MORTAR SET LATER WHEN ADJUSTED TO GRADE OF FINAL SURFACE TREATMENT.
4. B.W. REFERS TO FINISHED GRADE AT BOTTOM OF WALL.

	PROPOSED BUILDING
	PROPOSED CONCRETE WALK
	PROPOSED LIGHT DUTY ASPHALT PAVEMENT
	PROPOSED/EXISTING GREEN SPACE
	EXISTING GRAVEL
	EXISTING CONCRETE

AVENUE GRADING OFFICE BUILDING
FOR
BARLOW BUILDERS

[illegible]

JOB NO.	20124	WK ORDER	1954	-	-	-
DESIGNED:		EMP		-	-	-
DRAWN:		GBB		-	-	-
SCALE:		1"=20'		-	-	-
DATE:	MARCH 22, 2021	REV. #	1	03-22-2021	PER CITY COMMENTS	
					DESCRIPTION	

SITE GRADING, DRAINAGE & EROSION CONTROL PLAN

C3.1



1. ALL 3:1 SLOPES OR GREATER TO HAVE NAG SC150 MATTING.
2. SEE LANDSCAPE PLAN FOR GROUND COVER STABILIZATION.

ALL ENTRANCES ON ANY BUILDING WHICH IS CONSIDERED A HANDICAP ACCESSIBLE ENTRANCE IS TO BE PROVIDED FOR A MINIMUM OF 60"x60" LANDING FOR A SINGLE DOOR AND A 72"x60" LANDING FOR A DOUBLE DOOR, IF A PROPOSED ACCESS EXCEEDS A 72" WIDTH THE LANDING IS TO ACCOMMODATE SAID ACCESS WIDTH. SAID LANDING IS NOT TO EXCEED A 1% GRADE (1/8"/FOOT FALL) IN ANY DIRECTION. CONTRACTOR IS TO COORDINATE WITH DESIGNING ARCHITECT FOR ALL LOCATIONS, LAYOUTS, ELEVATIONS AND TREATMENTS TO ANY PROPOSED BUILDING ACCESS.

1. ALL STORMWATER WORKS ON THIS PROJECT WILL BE CONSTRUCTED TO BE IN COMPLIANCE WITH THE CITY OF LA VERGNE WORKS SPECIFICATIONS AND REQUIREMENTS.
2. THE TOP OF STORMWATER PIPING WILL BE BEDDED WITH 4" OF CRUSHED STONE TO RECEIVE THE CULVERT PIPE AND GIVE A UNIFORM BEARING ALONG THE RUN OF THE TRENCH. REMAINING TRENCH SECTION TO BE BACKFILLED WITH CLEAN STONE #57 TO TOP OF PIPE OR TO SUBGRADE IF NOT BEDDED TO TOP OF PIPE.
3. TOP OF CASTING EL. REFERS TO TOP OF GRADE OF "K" AND "M" & "H" CASTINGS. DRAINAGE STRUCTURE CASTING SHALL BE DRY SET WHEN BUILT AND MORTAR SET LATER WHEN ADJUSTED TO GRADE OF FINAL SURFACE TREATMENT.
4. B.W. REFERS TO FINISHED GRADE AT BOTTOM OF WALL.

	PROPOSED BUILDING
	PROPOSED CONCRETE WALK
	PROPOSED LIGHT DUTY ASPHALT PAVEMENT
	PROPOSED/EXISTING GREEN SPACE
	EXISTING GRAVEL
	EXISTING CONCRETE

LAND PLANNERS • CIVIL ENGINEERS
LANDSCAPE ARCHITECTS • SURVEYORS

Chattanooga 423-430-9400
Nashville 615-244-8591
Murfreesboro 615-546-6050

ragansmith.com



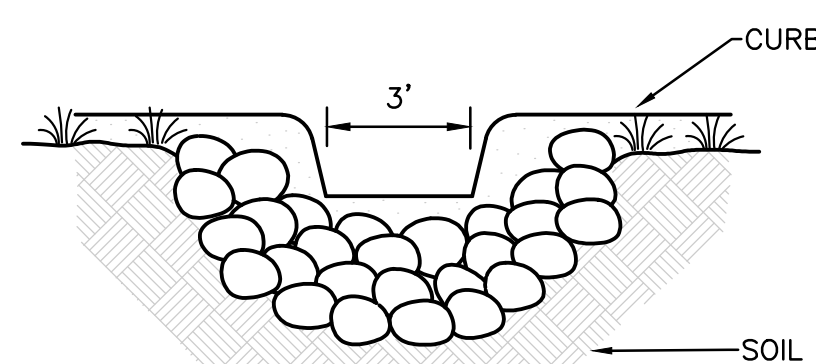
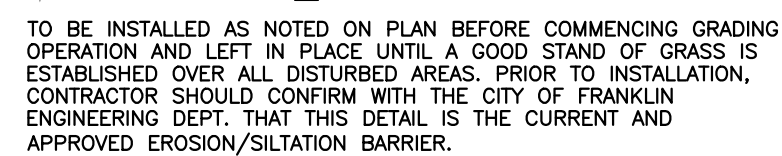
AVENUE GRADING OFFICE BUILDING FOR BARLOW BUILDERS

121 JONES BOULEVARD & 381 WALDRON ROAD, LAVERGNE RUTHERFORD COUNTY, TENNESSEE

DATE:	MARCH 22, 2021	REV. #	DATE:	DESCRIPTION:
SCALE:	1"=20'			
DRAWN:	GBB			
DESIGNED:	EMP			
20124	1954			
WK. ORDER				

FINAL EROSION CONTROL PLAN

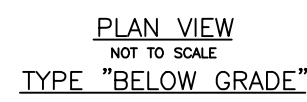
C3.2



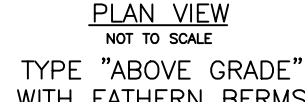
NOT TO SCALE



ROCK CHECK DAM



NOT TO SCALE



PLAN VIEW
NOT TO SCALE
TYPE "ABOVE GRADE"
WITH FATHERN BERMS



NOT TO SCALE



NOT TO SCALE

BASED ON PIPE SIZE

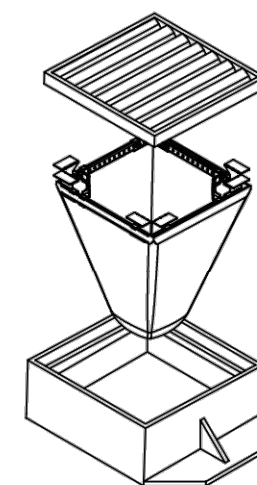
1	2	3	4
---	---	---	---



NTS



1. ALL FRAMING IS CONSTRUCTED OF CORROSION RESISTANT STEEL (ZINC PLATED OR GALVANIZED) FOR 7 YEAR MINIMUM SERVICE LIFE.
2. UPON ORDERING CONFIRMATION OF THE DOT CALLOUT, PRECAST OR CASTING MAKE AND MODEL, OR DETAILED DIMENSIONAL FORMS MUST BE PROVIDED TO CONFIGURE AND ASSEMBLE YOUR CUSTOMIZED FLEXSTORM INLET FILTER. PART NUMBER ALONE IS NOT SUFFICIENT.
3. FOR WRITTEN SPECIFICATIONS AND MAINTENANCE GUIDELINES VISIT WWW.INLETFILTERS.COM



FLEXSTORM
INLET FILTERS

ALL PRODUCTS MANUFACTURED
BY INLET & PIPE PROTECTION, INC.
A DIVISION OF ADS, INC.
WWW.INLETFILTERS.COM
(866) 287-8655 PH
(630) 355-3477 FX
INFO@INLETFILTERS.COM

SIZE	DWG NO
C	FLEXSTORM CATCH IT

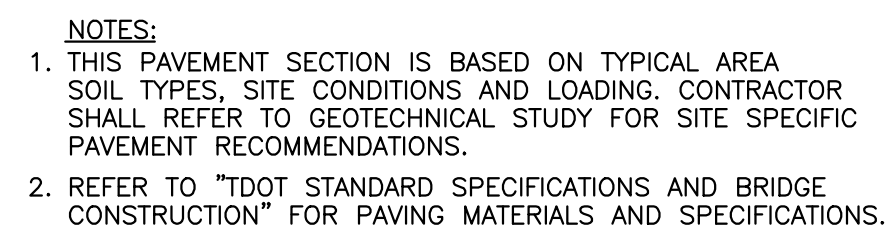
SCALE		SHEET 1 OF 1
-------	--	--------------

AVENUE GRADING OFFICE BUILDING FOR BARLOW BUILDERS

121 JONES BOULEVARD & 381 WALDRON ROAD LAVERGNE RUTHERFORD COUNTY, TENNESSEE

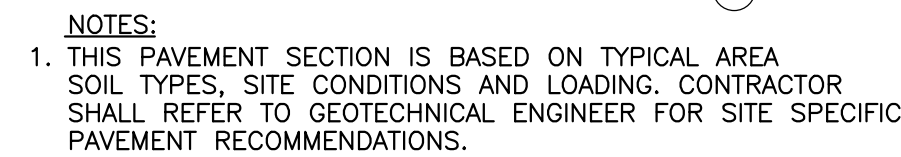
JOB NO.	WK ORDER	DATE	REV	DATE	DESCRIPTION
20124	1954				
DESIGNED:	EMP				
DRAWN:	GBB				
SCALE:	NOT TO SCALE				
DATE:	MARCH 22, 2021				

C5.1



NOT TO SCALE

PROPOSED PAVEMENT SCHEDULE



NOT TO SCALE

PROPOSED PAVEMENT SCHEDULE



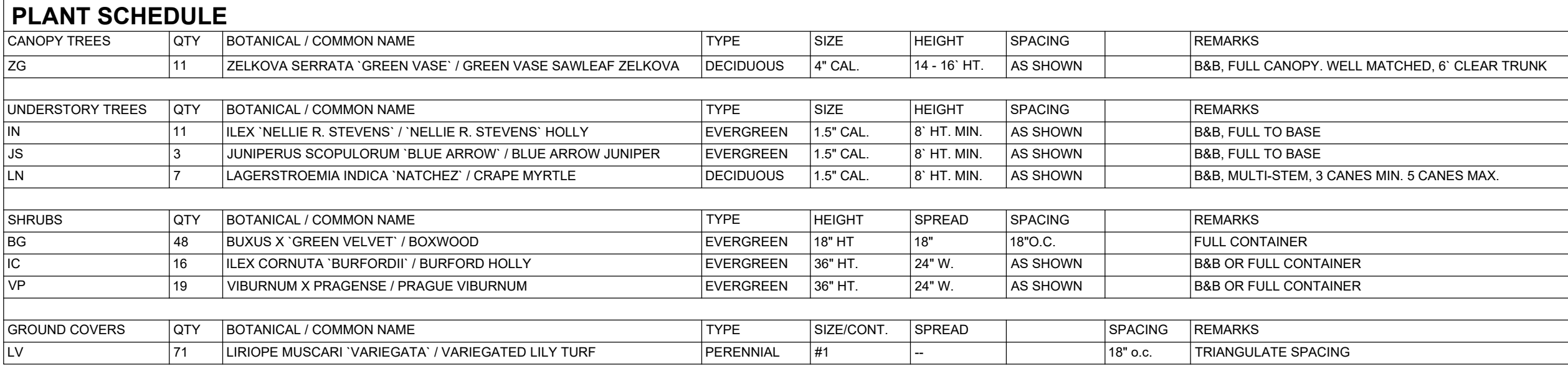
1. A VARIATION OF THE RAMP MAY BE USED IN CERTAIN CIRCUMSTANCES BUT MUST COMPLY WITH ADA SPECIFICATIONS

NOT TO SCALE



NOT TO SCALE



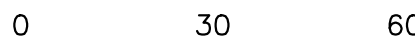


MAP 17G, GROUP
SMYRNA READ
RECORD BOOK 131
R.O.R.C.
1-2 HEAVY INDUST

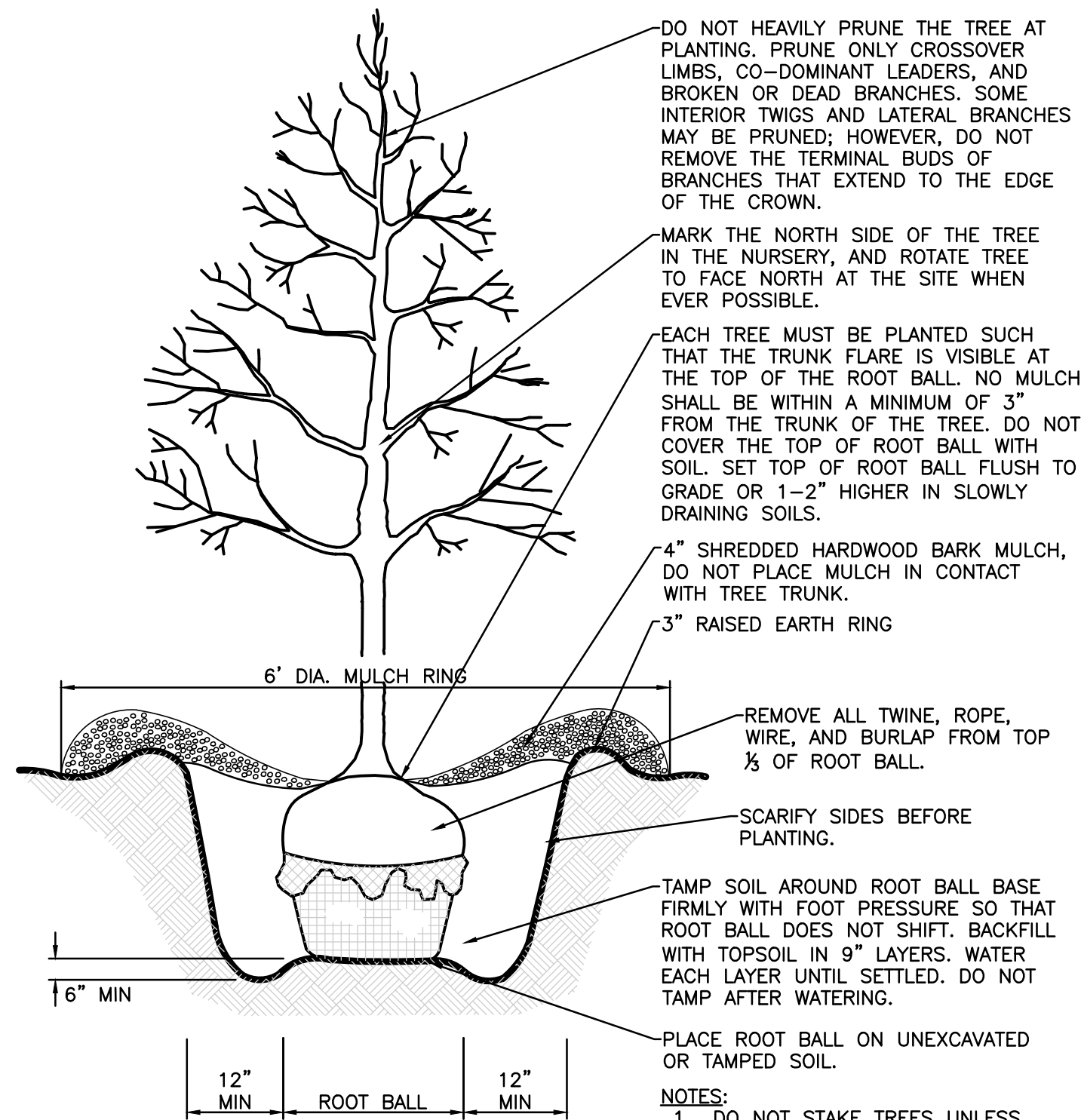
MAP 17G, GROUP A, PARCEL 15
DOUGLAS MATTHEW RUSSELL AND
WIFE, CHARLENE RUSSELL
DEED BOOK 314, PAGE 371,
R.O.R.C.T.
1-2 HEAVY INDUSTRIAL ZONING

MAP 17, PARCEL 7.04
CONNELLY AND
CONNELLY, LLC
RECORD BOOK 1164,
PAGE 2364, R.O.R.C.T.
1-2 HEAVY INDUSTRIAL ZONING

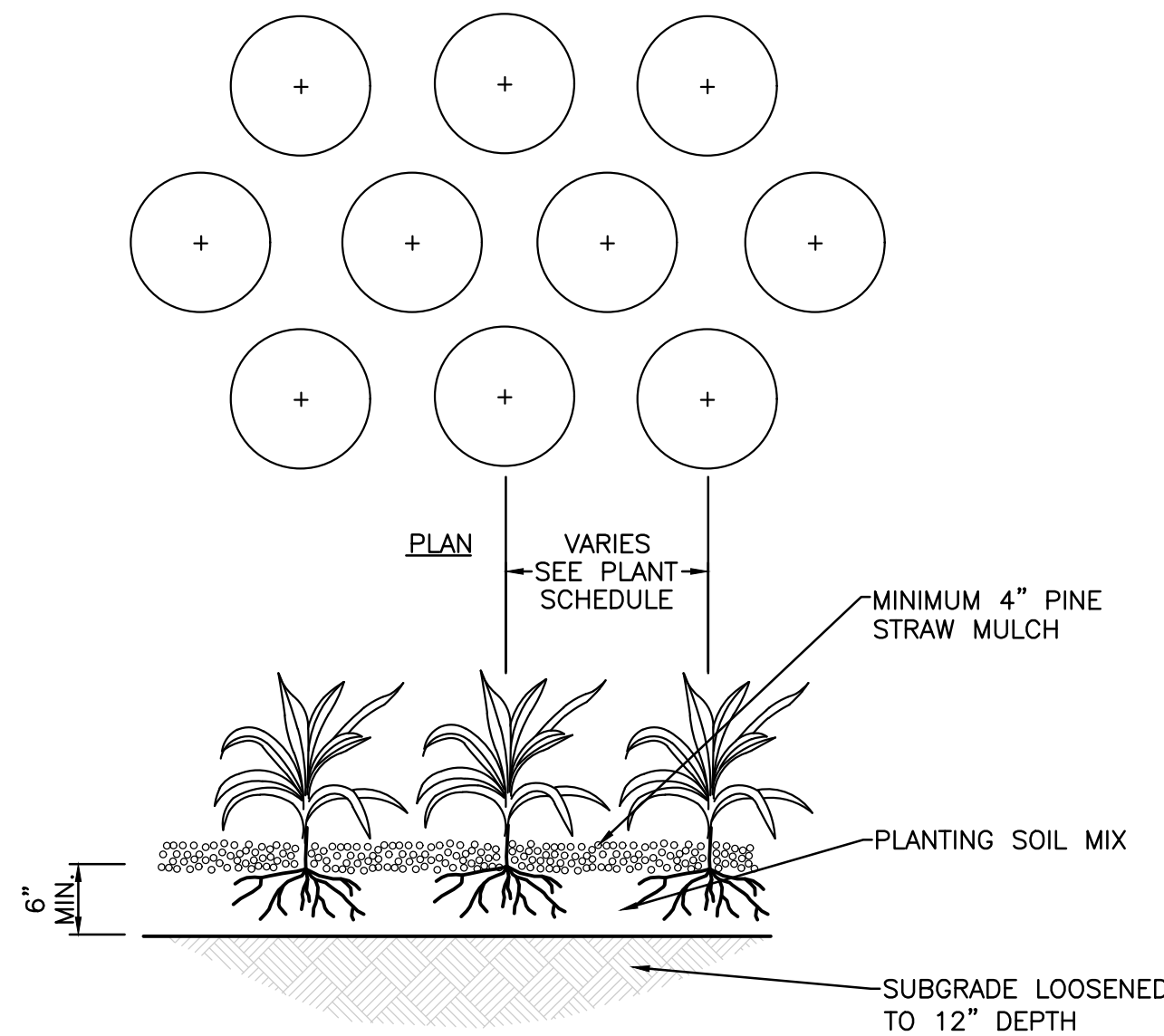
Know what's below.
Call before you dig.



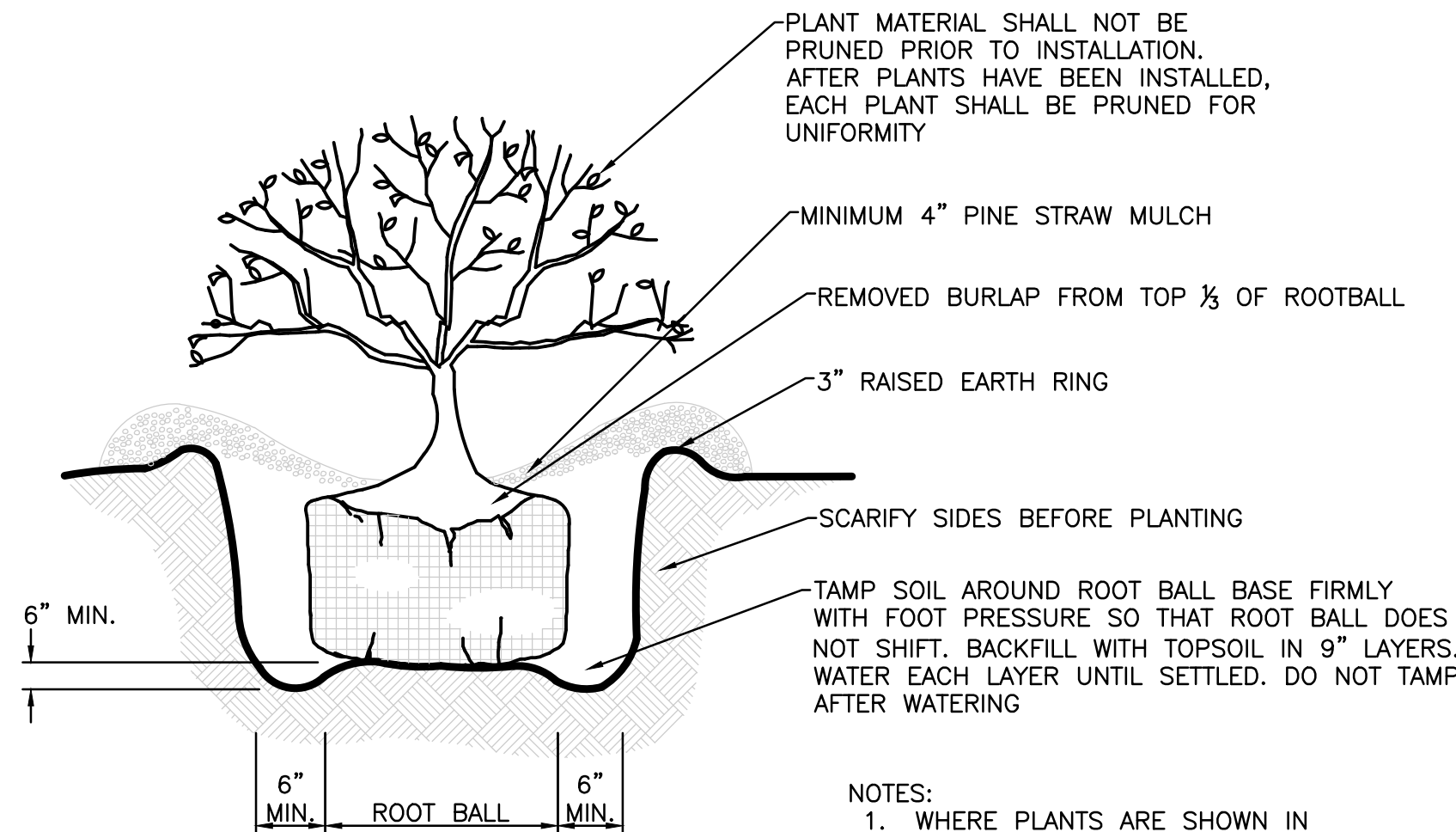
L1.1



TREE PLANTING
NOT TO SCALE



GROUNDCOVER PLANTING
NOT TO SCALE

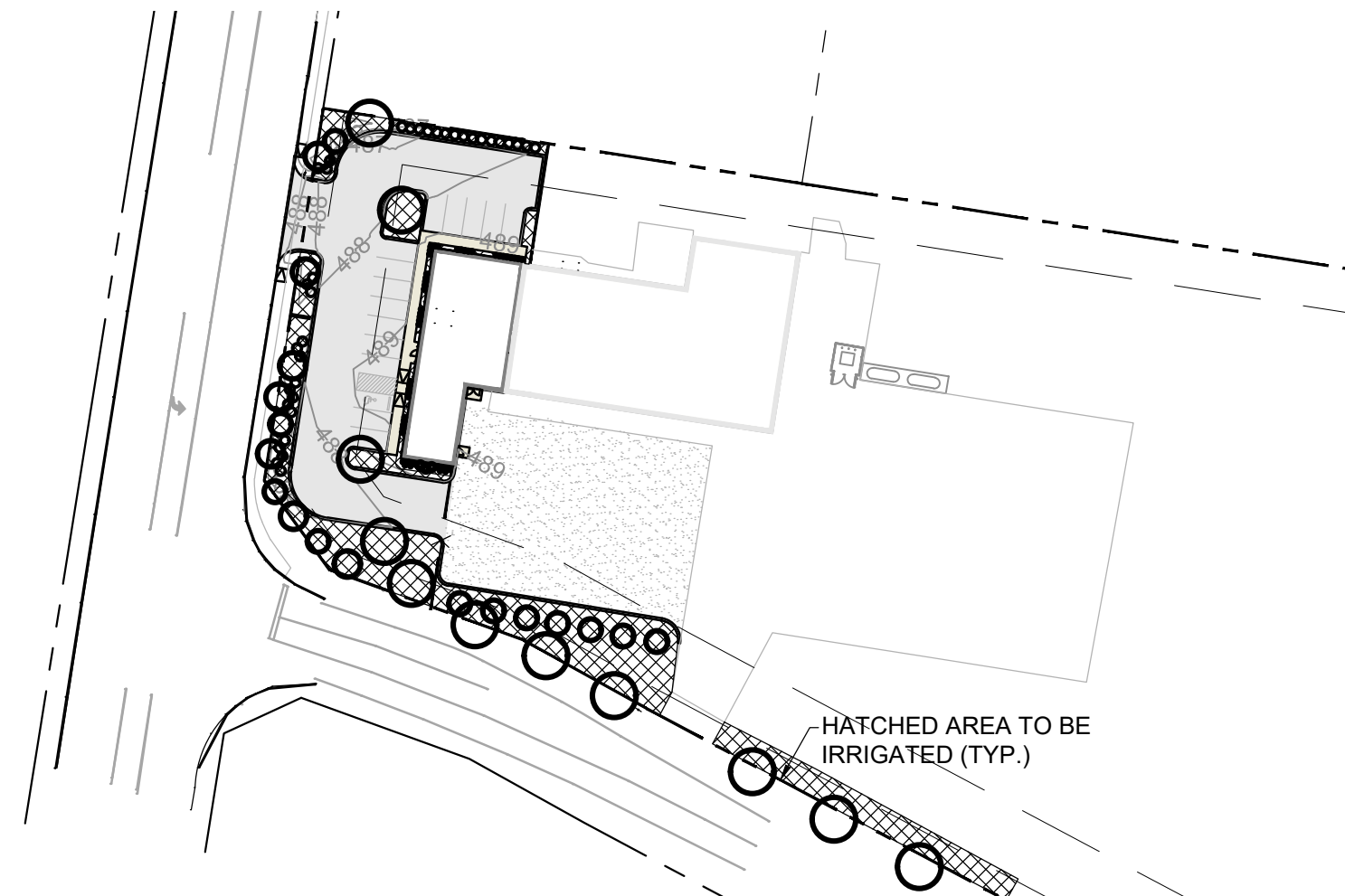


- NOTES:
- WHERE PLANTS ARE SHOWN IN BEDS, MULCH SHALL COVER ENTIRE BED AS DENOTED ON THE PLANS.
 - CONTAINER GROWN PLANT MATERIAL MAY BE SUBSTITUTED FOR BURLAP MATERIAL

SHRUB PLANTING
NOT TO SCALE

IRRIGATION NOTES:

- ALL PROPOSED PLANTED AREAS ARE TO BE IRRIGATED UTILIZING FULL COVERAGE DESIGN.
- SUBMIT PROPOSED IRRIGATION PLAN TO THE LANDSCAPE ARCHITECT OR OWNER'S REPRESENTATIVE FOR GENERAL REVIEW AND ACCEPTANCE.
- PROPOSED IRRIGATION SYSTEM SHOULD UTILIZE ANY WATER PUBLIC SYSTEMS IF ACCESSIBLE.
- PROPOSED IRRIGATION DESIGN SHOULD UTILIZE WATER EFFICIENT DESIGN TECHNIQUES SUCH AS THE USE OF DRIP IRRIGATION, MOISTURE SENSORS AND RAIN SENSORS TO MAXIMIZE WATER EFFICIENCY.
- IRRIGATION CONTRACTOR IS RESPONSIBLE FOR INSTALLING AN IRRIGATION SYSTEM THAT FUNCTIONS PROPERLY PER THE INTENT OF THE DESIGN. SHOULD THE IRRIGATION CONTRACTOR SEE A FLAW IN THE PROPOSED DESIGN AND/OR FINDS A PROBLEM IN THE FIELD THAT WILL NEGATIVELY AFFECT THE PERFORMANCE OF THE PROPOSED IRRIGATION SYSTEM, THE SAID CONTRACTOR IS RESPONSIBLE FOR INFORMING THE LANDSCAPE ARCHITECT/OWNER'S REPRESENTATIVE PRIOR TO INSTALLING OR ORDERING MATERIAL FOR THE PROPOSED IRRIGATION SYSTEM.
- IRRIGATION PLANS TO BE SUBMITTED PRIOR TO ISSUANCE OF PERMITS.



IRRIGATION AREA PLAN
NOT TO SCALE

PLANTING NOTES:

- ANY SERIES OF TREES TO BE PLACED IN A PARTICULAR ARRANGEMENT WILL BE FIELD CHECKED FOR ACCURACY. ANY PLANTS MISARRANGED WILL BE RELOCATED.
- SOIL USED IN BACKFILLING PLANTING PITS SHALL BE TOPSOIL AND MIXED WITH 25% PEAT BY VOLUME. EXCEPT FOR ERICACEOUS PLANTS, VERY ACID OR SOUR SOIL (SOIL HAVING A pH less than 6) SHALL BE MIXED WITH SUFFICIENT LIME TO PRODUCE A SLIGHTLY ACID REACTION (A pH of 6.0 to 6.5). ADD 10-10-10 COMMERCIAL FERTILIZER AT THE RATE OF 2 POUNDS PER CUBIC YARD. MIX BOTH FERTILIZER AND PEAT THOROUGHLY BY HAND OR ROTARY TILLER.
- SOIL USED IN BACKFILLING ERICACEOUS PLANTS SHALL BE TOPSOIL MIXED WITH 50% PEAT BY VOLUME. ADD 5-10-5 COMMERCIAL FERTILIZER AT THE RATE OF 5 POUNDS PER CUBIC YARD. MIX BOTH FERTILIZER AND PEAT THOROUGHLY BY HAND OR ROTARY TILLER.
- UPON SECURING PLANT MATERIAL AND BEFORE INSTALLATION, THE CONTRACTOR SHALL NOTIFY THE LANDSCAPE ARCHITECT OR OWNER'S REPRESENTATIVE FOR A PRE-INSTALLATION INSPECTION TO VERIFY ALL PLANT MATERIAL MEETS SPECIFICATION. MATCH TREES OF SAME SPECIES IN GROWTH CHARACTER AND UNIFORMITY.
- APPLY HERBICIDE (TRIFLORAL OR EQUIVALENT) TO ALL PLANT BEDS PRIOR TO PLANTING FOR NOXIOUS WEED CONTROL AT A RATE OF 2 POUNDS PER 1,000 SQUARE FEET.
- CONTRACTOR SHALL SUBMIT A 10 OUNCE SAMPLE OF THE TOPSOIL PROPOSED TO A TESTING LABORATORY FOR ANALYSIS. SUBMIT TEST RESULTS WITH RECOMMENDATIONS FOR SUITABILITY TO THE OWNER'S REPRESENTATIVE FOR APPROVAL.
- PLANTS SHALL BE ORIENTED FOR BEST APPEARANCE AND VERTICAL. ALL NON-BIODEGRADABLE ROOT CONTAINERS SHALL BE REMOVED.
- SELECTIVELY TRIM TREE BRANCHES BY 25%, MAINTAINING NATURAL SHAPE. PRUNE ALL DEAD AND BROKEN BRANCHES IN TREES AND SHRUBS. REMOVE TAGS, TWINE OR OTHER NON-BIODEGRADABLE MATERIAL.
- SCARIFY SUBSOIL IN PLANTING BEDS TO A DEPTH OF 3 INCHES. ALL PLANTING BEDS SHALL RECEIVE A MINIMUM OF 4 INCHES OF TOPSOIL.
- CONTRACTOR SHALL PROVIDE SMOOTH, NEATLY TRENCHED (3 INCH DEEP) BED EDGES.
- ALL PLANTING BEDS TO HAVE A MINIMUM 4 INCH DEEP PINE BARK MULCH, PINE STRAW MULCH OR OTHER MULCH AS SPECIFIED.
- DIMENSIONS FOR TRUNK CALIPER, HEIGHTS, AND SPREAD SPECIFIED ON THE MATERIAL SCHEDULE ARE A GENERAL GUIDE FOR THE MINIMUM REQUIRED SIZE OF EACH PLANT. QUALITY AND SIZE OF PLANTS, SPREAD OF ROOTS AND SIZE OF BALLS SHALL BE IN ACCORDANCE WITH A.N.S.I. Z60 "AMERICAN STANDARD FOR NURSERY STOCK" (CURRENT EDITION) AS PUBLISHED BY THE AMERICAN ASSOCIATION OF NURSERYMEN, INC.
- THE QUANTITIES INDICATED ON THE MATERIAL SCHEDULE ARE PROVIDED FOR THE BENEFIT OF THE CONTRACTOR, BUT SHOULD NOT BE ASSUMED TO ALWAYS BE CORRECT. IN THE EVENT OF A DISCREPANCY, THE PLANTING PLAN (PLANT SYMBOLS) WILL TAKE PRECEDENCE OVER THE MATERIAL SCHEDULE. THE CONTRACTOR SHALL BE RESPONSIBLE FOR HIS/HER OWN QUANTITY CALCULATIONS AND THE LIABILITY PERTAINING TO THOSE QUANTITIES AND ANY RELATED CONTRACT DOCUMENTS AND/OR PRICE QUOTATIONS.
- CONTRACTOR TO WARRANTY ALL MATERIAL FOR ONE YEAR AFTER DATE OF FINAL ACCEPTANCE.

SEEDING NOTES:

- SEED ALL DISTURBED AREAS WITH TURF-TYPE TALL FESCUE. THE SEED SHALL BE A BLEND OF 3-5 VARIETIES (ADDRESSING BOTH COLD HARDINESS AND DROUGHT TOLERANCE) FROM THE TOP 10% SELECTIONS IN THE NATIONAL TURFGRASS EVALUATION PROGRAM (N.T.E.P) TALL FESCUE TRIALS, MOST RECENT EVALUATION YEAR (WWW.NTEP.ORG). THE SEED SHALL BE CROP AND WEED FREE. SEED AT THE RATE OF 5 POUNDS PER 1,000 S.F. ALL SEED TO BE 98% PURE WITH 85% GERMINATION AND CONFORM TO ALL STATE REQUIREMENTS FOR GRASS SEED. THE FERTILIZER TO BE 6-12-12 COMMERCIAL TYPE WITH 50% OF ITS ELEMENTS DERIVED FROM ORGANIC SOURCES.
- PLACE STRAW MULCH ON SEEDED AREAS. STRAW TO BE OATS OR WHEAT STRAW, FREE FROM WEEDS, FOREIGN MATTER DETRIMENTAL TO PLANT LIFE, AND DRY. HAY OR CHOPPED CORNSTALKS ARE NOT ACCEPTABLE.
- THE CONTRACTOR SHALL VERIFY THAT THE PREPARED SOIL BASE IS READY TO RECEIVE WORK. CULTIVATE THE TOPSOIL TO A DEPTH OF 4 INCHES WITH A MECHANICAL TILLER AND SUBSEQUENTLY RAKE UNTIL SMOOTH. REMOVE FOREIGN MATERIALS COLLECTED DURING CULTIVATION AND RAKING OPERATIONS.
- APPLY FERTILIZER ACCORDING TO THE MANUFACTURER'S RECOMMENDATIONS. LIMESTONE MAY BE APPLIED WITH THE FERTILIZER. APPLY FERTILIZER AFTER SMOOTH RAKING AND PRIOR TO ROLLER COMPACTION AND MIX THOROUGHLY IN THE UPPER 2 INCHES OF TOPSOIL.
- APPLY SEED EVENLY IN TWO INTERSECTING DIRECTIONS AND RAKE IN LIGHTLY. WATER TOPSOIL LIGHTLY PRIOR TO APPLYING SEED. DO NOT SEED AREA IN EXCESS OF THAT WHICH CAN BE MULCHED ON THE SAME DAY.
- ROLL SEEDED AREA WITH ROLLER NOT EXCEEDING 112 POUNDS.
- IMMEDIATELY FOLLOWING SEEDING AND COMPACTING, APPLY STRAW MULCH AT THE RATE OF ONE AND ONE HALF BALES PER 1,000 SQUARE FEET. IMMEDIATELY AFTER MULCHING, APPLY WATER WITH A FINE SPRAY AND SATURATE THE GROUND TO A DEPTH OF 4 INCHES.
- CONTRACTOR IS RESPONSIBLE FOR WATERING SEEDED AREAS TO PREVENT GRASS AND SOIL FROM DRYING OUT UNTIL THE INSTALLATION IS INSPECTED AND ACCEPTED BY THE OWNER'S REPRESENTATIVE.
- CONTRACTOR IS RESPONSIBLE FOR RESEEDING BARE SPOTS FOR A PERIOD OF ONE YEAR AFTER ACCEPTANCE OF INSTALLATION.

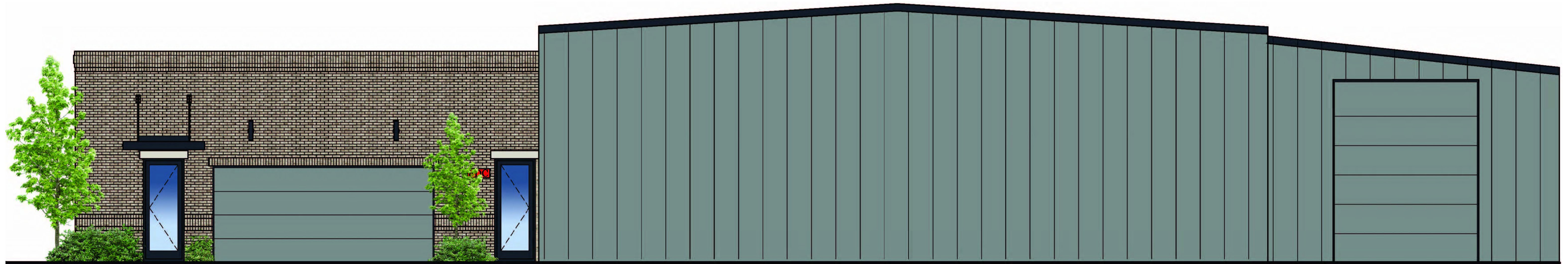
JOB NO.	WKS. ORDER	DESIGNED	DRAWN	SCALE	DATE	REV.	DATE	DESCRIPTION
20124	1954	APT	APT	NOT TO SCALE	MARCH 22, 2021	#		



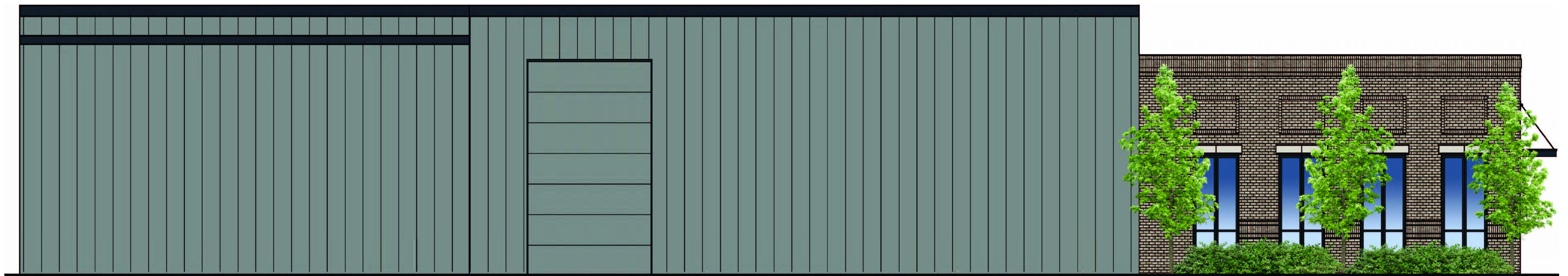
FRONT ELEVATION
SCALE: 1/4" = 1'-0"



RIGHT SIDE ELEVATION
SCALE: 1/4" = 1'-0"



REAR ELEVATION
SCALE: 1/4" = 1'-0"



LEFT SIDE ELEVATION
SCALE: 1/4" = 1'-0"



Item #: 6.

Item Title: Site Plan – 142 Stones River Road – Two Buildings Totaling 8,000 Square Feet Containing Showroom with Office and Indoor Storage on 8.61 Acres. Requested by James Nyquist. Property located at 142 Stones River Road (Tax Map 15M, Group C, Parcel 1). C-2 (Highway Service) Zoning District. Property owned by Titan Home Builders, LLC.

Reviewed By:

Location:

(Insert map here)

Summary: On behalf of their client, benesch and James Nyquist are requesting site plan approval for a proposed facility on Stones River Road adjacent to the railroad. This lot is proposed to have two new buildings comprised of 4,000 square feet and 4,000 square feet respectively. This parcel is contained within the Murfreesboro Road Overlay Streetscape District and must adhere to the applicable overlay provisions. Color elevations need to be provided as well as a materials board.

Staff Comments / Technical Items:

Planning

Bo Logan - 615-287-8702

blogan@laveragnetn.gov

1. Color elevations need to be provided. They must be full-size (24"x36").
2. A materials board is required that shows samples of all exterior materials including paint and trim colors.
3. Max height is wrong on C3.0 - Height is limited to 35 feet in C-2 district.

Jake Blair - 615-287-8702

jblair@laveragnetn.gov

Engineering

Gary Lide - 615-28-	Item	Drawing	Comment
8703		Number	

glide@laveragnetn.gov	1	C3.0	Provide sufficient information to locate building corner orientation from property line. The parking lot can be from buildings.
	2	C4.0	Show existing contours on this sheet as well as proposed
	3	C3.0	Show lane layout (striping) for driveway at intersection of Stones River
	4	C3.0	Show radius return on driveway at Stones River
	5	C3.0	Show locations of curb on driveway
	6	C3.0	Show distance from northern edge of proposed driveway to north property line at several locations
	7	C3.0	While it is understood that final location and dimensions of transformer pad(s) will depend upon electric utility, provide an estimated guess to ensure that there is adequate space
	8	C3.0	Provide location for dumpster pad(s). Also provide details of dumpster enclosure.
	9	C6.4	There are two sheets labeled 'C6.4'. Please correct.
	10	L2.0	Areas to be grass must be labeled as 'seed and straw mulch' if slopes are less than 5:1 and 'seed with erosion control mat' if slopes are steeper.
	11	C4.0	Show roof drain locations and how they are routed into retention basin.
	12	C5.0	Add note stating "No more than 500 feet of open utility trench will be allowed at one time."
	13	C3.0	Label of "40' Commercial Driveway" is confusing. Provide layout showing width and radius returns at Stones River
	14	C3.0	Provide turning template for fire-engine-sized truck doing a hammerhead turnaround to prove adequacy. Final determination will be by Fire Marshal.
	15	C4.0 and C4.2	Sheet C4.2 and calculations appear to show entire portion of driveway being in drainage area PS-1 and draining into infiltration trench. Sheet C4.0 contours do not indicate a curb along southern edge of driveway which would divert large amounts of the driveway into drainage area PS-2 which is untreated. Please clarify.
	16	C4.0	Please provide detail regarding how stormwater is going to get across cell tower access drive from the west to get to infiltration basin.
	17	C6.4	Please add depth dimension to infiltration trench section and prove volume shown in calculations.
	18	C6.4 and Calcs	Please provide perc test results demonstrating that the subgrade provides the necessary infiltration rate.
	19	C6.4 (the first one)	Detail 1 - Add elevations specific to project.
	20	C6.4 (the first one)	Detail 5 - Add elevations specific to project.
	21	C6.4 (the first one)	Detail 1 - State that Grate Option = 'Standard'
	22	C4.0 and calcs	The site does not have an offsite outfall and drains to area in the southwest corner where it stands within the

		railroad ROW. Provide pre- versus post- calculations elevation of the water during the 100-year/24-storm. calculations must assume an outflow rate of 0 cfs and calculated to show the impact on the depth in that area this development.
23	C5.0	Per NFPA 1, a building served by a dead end access within 400 feet of a fire hydrant. A single fire hydrant on a minimum 6-inch line depending on friction losses flow rates. Fire Marshal has final say on this.
24	C5.0	Coordinate with Public Works engineer regarding water
25	C5.0	Show clean-outs and elevations along private sewer
26	C5.0	Apply to Public Works Engineer for water and sewer availability.
27	C5.0	Coordinate with Public Works engineer regarding proper sewer tap to existing manhole.

Utilities

Scott Tatalovich - 615-287-8739
statalovich@lavergn.net

1. Connect sewer service to public sewer, per City Standard Sewer Specifications and Details, see details 1.0 and 2.0. Connection is made to the pipe not the manhole. Specs are available on the City's website.
2. Customer's water meter size and type will be defined by the City's Meter Department Manager after customer fills out a fixture count form for their project during water service application. Water service application can be made at the Codes Department.

Codes

Randolph Salyers - 615-287-8605
rsalyers@lavergn.net

Fire

Curtis Brinkley - 615-405-5931
cbrinkley@lavergn.net

1. A private fire hydrant will be needed due to the length of the road.
2. The proposed turnaround is not an approved "Hammerhead" turnaround. Please display a turning template for a 2015 Sutphen mid-mount 100' aerial bucket truck to determine if the proposed parking lot will allow for adequate turnaround operations.
3. The access road where a hydrant is to be located must be 26' wide, according to Appendix D of the IFC 2018.

Police

JJ Eubank - 615-287-8613
jeubank@lavergn.net

(Technical items go here)

***Note:** The above technical items may not be the only corrections and/or issues needing to be resolved to get approval from the planning commission. New items can be brought up at the workshop and staff can add items at any time that might have been overlooked. It is the applicant's responsibility to make sure that all technical items are addressed and that no new issues exist before the planning commission meeting. Addressing all technical items does not constitute approval. It is the planning commission's decision whether an item passes or fails. Revised plans are due to staff by the following Monday at close of business unless other arrangements are made and documented.

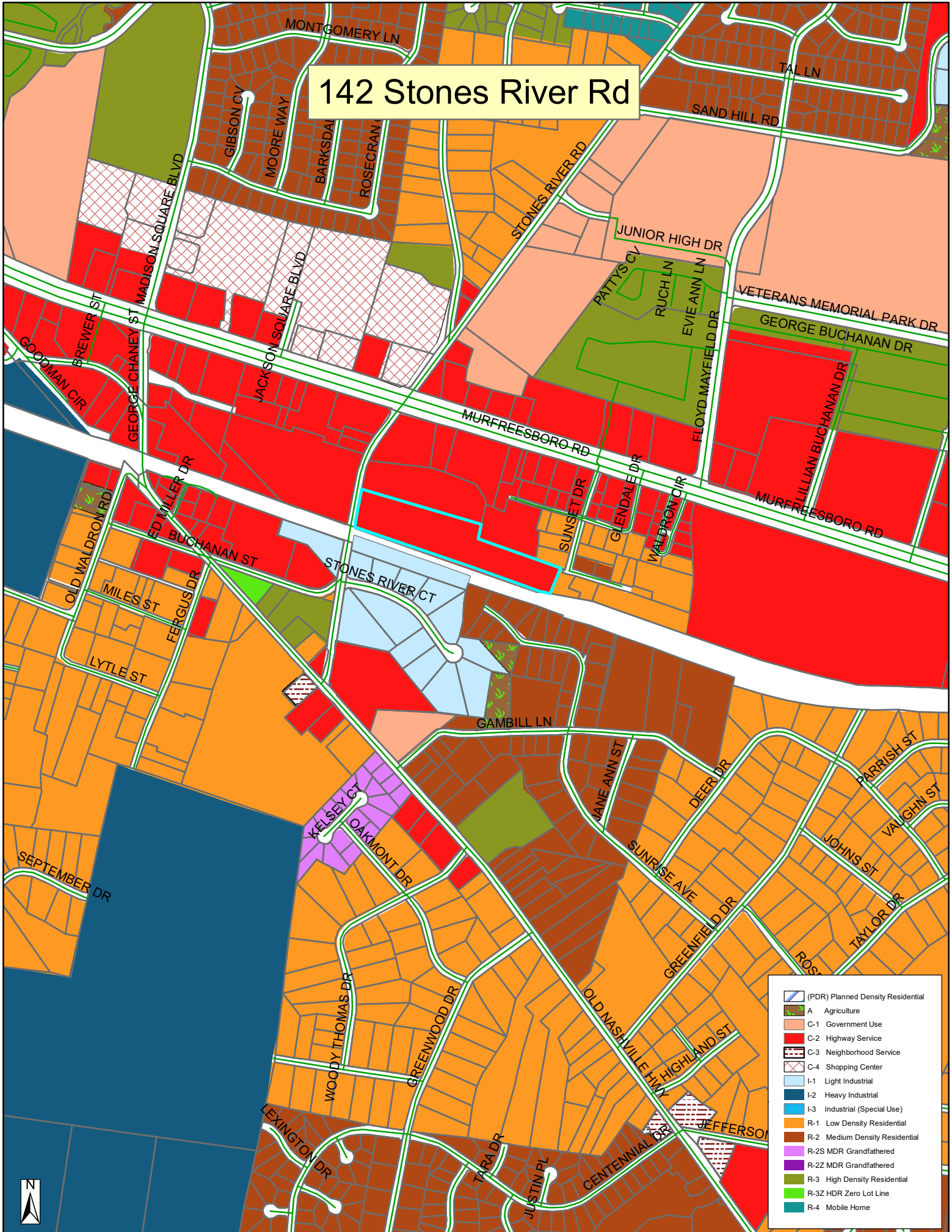
142 Stones River Rd



142 Stones River Rd



142 Stones River Rd



	(PDR) Planned Density Residential
	A Agriculture
	C-1 Government Use
	C-2 Highway Service
	C-3 Neighborhood Service
	C-4 Shopping Center
	I-1 Light Industrial
	I-2 Heavy Industrial
	I-3 Industrial (Special Use)
	R-1 Low Density Residential
	R-2 Medium Density Residential
	R-2S MDR Grandfathered
	R-2Z MDR Grandfathered
	R-3 High Density Residential
	R-3Z HDR Zero Lot Line
	R-4 Mobile Home



Item #: 7.

Item Title: Site Plan – Marlowe La Vergne – 376 Apartments on 27.49 Acres. Requested by Kimley Horn. Property located at 243 Blair Road (Tax Map 32, Parcel 6). R-3 (High Density Residential) Zoning District. Property owned by Martin Shofner.

Reviewed By:

Location:
(Insert map here)

Summary:

Staff Comments / Technical Items:

Planning

Bo Logan - 615-287-8702
blogan@lavergnethn.gov

1. Front setback is incorrect - Must show 35 feet, not 30 feet.
2. Height of Buildings needs to be shown - currently says TBD.
3. Note 5 on the Title Sheet says "Metro Water Services".
4. Phone number for Bo Logan is incorrect.
5. Required parking spaces for all R-3 is always 3 spaces - the required parking for Marlowe is 1,128 spaces.
6. Minimum spacing for all buildings is 30 feet.

Jake Blair - 615-287-8702
jblair@lavergnethn.gov

Engineering

Gary Lide - 615-28-8703
glide@lavergnethn.gov

1. It is understood that this is intended to be a 'conceptual' site plan. However, Site Plans fall under the Zoning Ordinance which does not have a 'Conceptual Site Plan' submittal and review

process. The following are the items that are lacking which will be required for a Site Plan meeting the Zoning Ordinance criteria:

- a. All buildings must be located by coordinate or bearing and distance to an exact location
 - b. All required construction details including pavement sections, curb sections, accessible parking details, manholes, utility connections, utility details, stormwater details, etc.
 - c. Full set of erosion control plans including initial, intermediate, and final will be required.
 - d. Provide dimensions of open space
 - e. Signage plan must be included
 - f. Complete construction plans including sizes and slopes of all drainage pipes, sizes and elevations of all catch basins and manholes, construction details for drainage items
 - g. Show riprap at all pipe outfalls leaving the site. Dragons teeth are not acceptable by themselves.
2. Sheet C2-00 shows proposed grades over the existing cemetery. Please make sure that the plans show no changes in elevation in the cemetery area and also shows reasonable access provided to the cemetery.
 3. Complete construction plans for water and sewer utilities including all pipe sizes and types, slopes for sewer lines, sizes and elevations for manholes, meters valve boxes, fire system, and construction details for the utilities.
 4. Traffic Study is not included and is required.
 5. Label all retaining walls with maximum heights.
 6. Provide details of the architectural appearance of all retaining walls (especially those fronting on Blair Road) and add to the exterior materials board for review by the Planning Commission.
 7. Provide a table clarifying which buildings are split elevation and which are full three stories.
 8. Provide number of units per building.
 9. Hydraulic Calculations:
 - a. Provide a comprehensive schematic showing which drainage areas are draining to which ponds and POAs.
 - b. In Pond 1, the calculations show a single outfall structure and a single barrel. The drawings show three outfall structures. Please clarify.

- c. Please show where water quality calculations are included which demonstrate an 80% removal of TSS from the first ½" of runoff from all impermeable areas.
 - d. The portion of Drainage Area 1 north of Building 2 appears to drain directly into the back of Building 2 and then might go to Pond 2. Provide clarity on where this water goes and make the calculations match.
10. All buildings in La Vergne greater than 5,000 SF must be sprinklered.
 11. To handle multiple fire hydrants and fully-sprinklered buildings on this site, the six-inch line in Blair Road from the site entrance to the 12" existing line at Vineyard Lane will have to be upsized to an 8".
 12. For the same reason, 8" water lines will be needed through the entire site rather than the 6" lines shown. Hydraulic pressure calculations will be required.
 13. Mission Hills Subdivision is about to start construction immediately north of this site and has a stub out to the northern boundary of the site named Altair Avenue. This will be located approximately 85 feet west of the iron pin which is the southeast corner of the John Gilleland Living Trust property. A stub out of an 8" waterline should be made from the Marlowe water system to that point. It is due north of Building 2. Discussions need to be held with the City concerning whether the waterline through the complex would become public and each building separately metered.
 14. The connection to Altair Avenue in Mission Hills to the north appears to be required by fire codes as an emergency access point to the rear of this complex. This will require reworking the location of Building 2. Fire Marshal to confirm.
 15. Since buildings are sprinklered, FDCs must be shown on the Utility Plan. They must be farther than 50' from a building and within 100' of a fire hydrant.
 16. More detail must be provided regarding the driveways in and out of the site on Blair road including width, lane layout and striping, proposed radius return, distance between driveways, and distance from driveway to nearest property corner.

Utilities

Scott Tatalovich - 615-287-8739
statalovich@lavergn.net

1. Water availability letter will be written by the City's consulting engineer. Water availability letter cannot be completed until the Draft Water Master Plan is finalized. This could be several more weeks. Water availability letter cannot be written until a fire flow test is supplied. Fire flow test was requested on May 10, and is usually completed within two weeks.
2. A public water line loop, 8-inch diameter, will likely be required through the development from Blair Rd and Vinyard Ln to the development's northern boundary.
3. Sewer availability letter will be written by the City's consulting engineer. Because this property is within the boundaries of the Interlocal Agreement – Blair Rd Drainage Basin – 2018-02, sewer will flow to Town of Smyrna collection system. The current nearest point of connection is near 303 Blair Rd. Planning and design for sewerage required for this development will take some time and coordination to determine.

Codes

Randolph Salyers - 615-287-8605
rsalyers@lavergn.net

Fire

Curtis Brinkley - 615-405-5931
cbrinkley@lavergn.net

1. D103.1 Where a fire hydrant is located on a fire apparatus access road, the minimum road width shall be 26 feet (7925 mm), exclusive of shoulders.
2. D106.2 Multiple-family residential projects having more than 200 dwelling units shall be provided with two separate and approved fire apparatus access roads regardless of whether they are equipped with an approved automatic sprinkler system.
- D106.3 Remoteness. Where two fire apparatus access roads are required, they shall be placed a distance apart equal to not less than one-half of the length of the maximum overall diagonal dimension of the property or area to be served, measured in a straight line between accesses.
3. D105.2 Width. Aerial fire apparatus access roads shall have a minimum unobstructed width of 26 feet (7925 mm), exclusive of shoulders in the immediate vicinity of the building or portion thereof.
4. The project will need a turning template for the 2014 100' mid-mount Sutphen aerial bucket truck.

Police

JJ Eubank - 615-287-8613
jeubank@lavergn.net

(Technical items go here)

***Note:** The above technical items may not be the only corrections and/or issues needing to be resolved to get approval from the planning commission. New items can be brought up at the workshop and staff can add items at any time that might have been overlooked. It is the applicant's responsibility to make sure that all technical items are addressed and that no new issues exist before the planning commission meeting. Addressing all technical items does not constitute approval. It is the planning commission's decision whether an item passes or fails. Revised plans are due to staff by the following Monday at close of business unless other arrangements are made and documented.

243 Blair Rd

WATER TOWER TRL

BLAIR RD

BLAIR OAKS CT

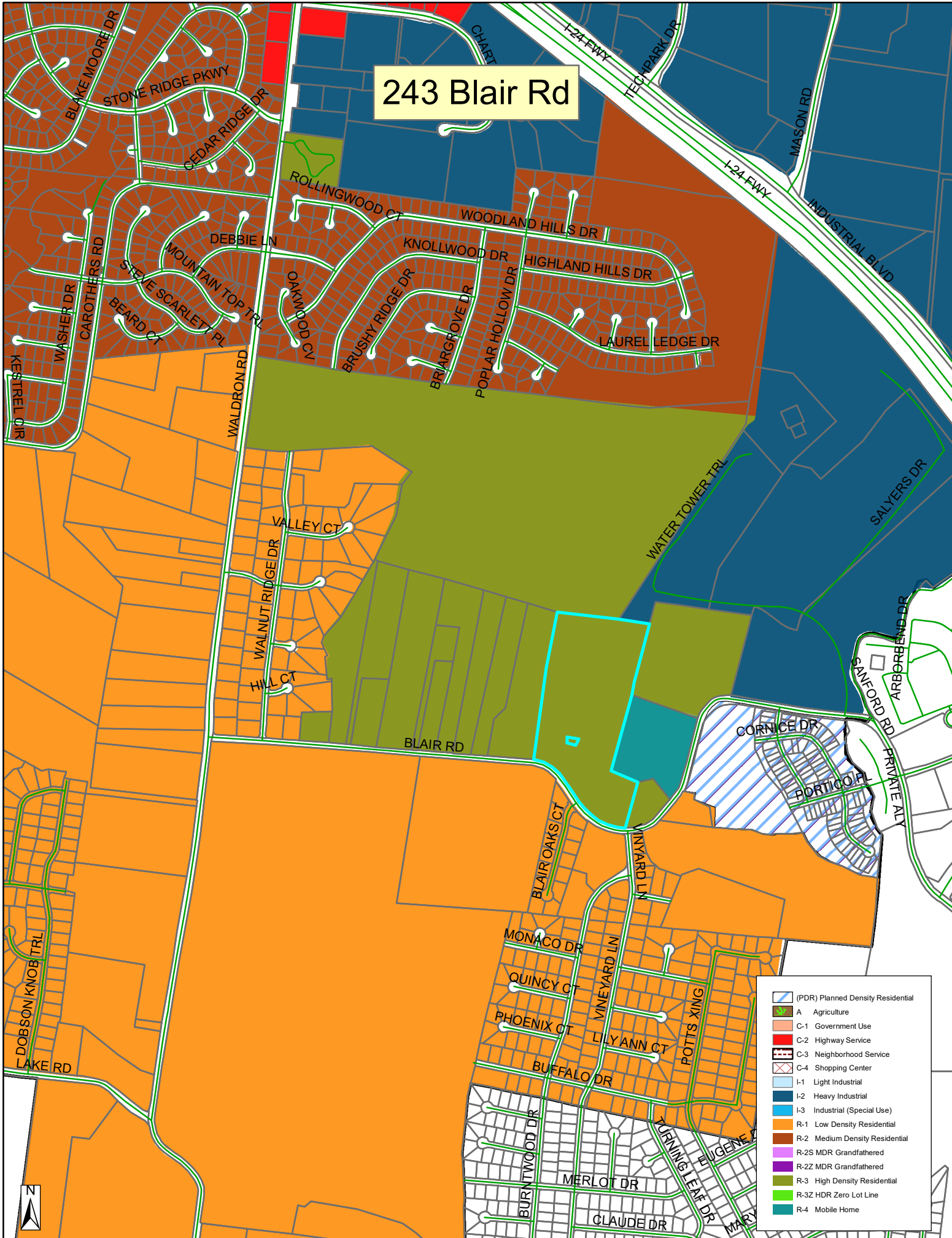
VINYARD LN





243 Blair Rd





Drawing name: K:\NSH_LDEV\118702000 - Shofner-Greystar La Vergne\4-CADD\PlanSheets\CO-00 COVER.dwg CO-00 COVER May 01, 2023 9:59am by: Garrett.Froula

MARLOWE LA VERGNE - CONCEPTUAL SITE PLAN

Page 178 of 227

1. PRIOR TO CONSTRUCTION THE CONTRACTOR SHALL BE RESPONSIBLE FOR

- Drawing name: K:\NSH LDEV\118702000 - Shofner-Greystar La Vergne\4-CADD\PlanSheets\C0-01 GENERAL NOTES.dwg C0-01 GENERAL NOTES May 01, 2023 9:59am by: Garrett.Froula

1. NOTIFICATIONS:

2. DISPOSAL GUIDELINES:

- ### SITE INFORMATION:

- EROSION AND SEDIMENT CONTROL INFORMATION:**

- ### ADA COMPLIANCE:

- 9:59am by: Garrett.Froula

1. PRODUCT CRITERIA:

- REINFORCING STEEL INFORMATION (SITE WORK ONLY):**

- STORM SEWER NOTES:**

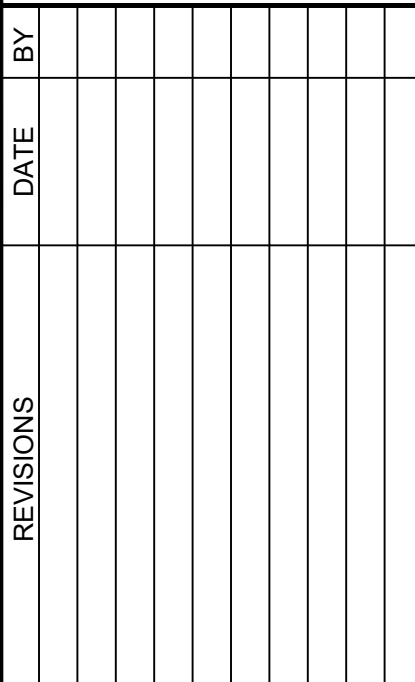
- A. DO NOT EXCEED CLEARING AND GRUBBING LIMITS OF CONSTRUCTION LINES INDICATED ON THE PLANS.
- B. ALL AREAS OUTSIDE THE LIMITS OF CONSTRUCTION LINE SHALL NOT BE CROSSED BY HEAVY EQUIPMENT OR USED FOR STORING HEAVY EQUIPMENT OR MATERIALS.
- C. NO EQUIPMENT SHALL BE STORED UNDER THE DRIP LINE OF TREES TO REMAIN.
- D. DO NOT FALL ANY TREES OR PUSH PILES OF DEBRIS AGAINST ANY TREES TO REMAIN.
- E. REMOVE ALL STUMPS, ROCKS, ASPHALT & CONCRETE DEBRIS, ETC. AND DISPOSE OFF SITE IN ACCORDANCE WITH LOCAL, STATE & FEDERAL REGULATIONS.
- F. CONTACT ALL UTILITY AUTHORITIES WHO HAVE LINES WITHIN THE CLEARING AND GRUBBING LIMITS BEFORE STARTING WORK
- E. ALL EROSION CONTROL SEDIMENT BARRIERS, SILT FENCES, AND TREE PROTECTION DEVICES SHALL BE INSTALLED PRIOR TO STARTING CLEARING AND GRUBBING.
- F. AFTER STAKING IS COMPLETED, TREES WITHIN GRADING LIMITS TO BE SAVED WILL BE IDENTIFIED BY THE OWNER'S REPRESENTATIVE. FIELD CHANGES TO GRADING PLANS SHALL BE MADE FOR SMOOTH TRANSITION OF GRADES AROUND ALL TREES WHICH REQUIRE TREE WELLS WITHIN THE GRADING LIMITS.
- G. ALL CLEARING SHALL BE LIMITED TO AREAS TO BE GRADED WITHIN 15 CALENDAR DAYS.

GRADING NOTES:

- A. TOPSOIL SHALL BE STORED ON SITE IN LOCATIONS APPROVED BY THE OWNER'S REPRESENTATIVE. DRAINAGE SHALL ROUT AROUND THESE TOPSOIL STOCKPILES FOR THE DURATION OF THE GRADING OPERATIONS. EROSION CONTROL MEASURES SHALL PREVENT THE LOSS OF TOPSOIL MATERIAL.
- B. UNSUITABLE SOILS SHALL BE UNIFORMLY SPREAD ACROSS NON-STRUCTURAL FILL AREAS AND COVERED WITH TOPSOIL AND SEEDED.
- C. FILL AREA SHALL BE PROOF-ROLLED WITH RUBBER-TIRED EQUIPMENT WITH A MINIMUM WEIGHT OF FIFTEEN TONS PRIOR TO BEGINNING FILL OPERATION. AREAS WHICH ARE SOFT OR UNSTABLE SHALL BE UNDERCUT UNTIL STABLE SOILS ARE FOUND. RE-COMPACTION OF THESE SOILS SHALL BE TO 98% MAXIMUM DRY DENSITY AS PER ASTM D698 (STANDARD PROCTOR).
- D. CUT AREA SHALL BE PROOF-ROLLED AFTER FINAL SUBGRADE IS ACHIEVED IN THE SAME MANNER AS FILLED AREAS. SOFT OR UNSTABLE SOILS SHALL BE SCARIFIED TO A DEPTH OF 12" AND RE-COMPACTED TO 98% MAXIMUM DRY DENSITY AS PER ASTM D698 (STANDARD PROCTOR).
- E. ALL GRADING SHALL BE COMPLETED TO THE LEVEL INDICATED BY THE SCOPE OF WORK LISTED IN THE BID DOCUMENTS.
- F. ELEVATIONS SHOWN ON THE PLANS IS THE FINISH GRADE ELEVATION.
- G. GRADING SHALL BE SEQUENCED SO THAT BASE STONE IS PLACED WITHIN 10 CALENDAR DAYS PF ACHIEVING OPTIMUM SUBGRADE COMPACTION.
- H. SOILS TESTING LABORATORY/ SOILS ENGINEER. CONTRACTOR WILL EMPLOY A QUALIFIED SOILS TESTING LABORATORY/ ENGINEER TO OBSERVE THIS WORK AND MAKE TESTS AS REQUIRED.
- I. HAVE EARTH BORROW FILL, AGGREGATE, AND TOPSOIL, AND STRUCTURAL FILL TESTED AND APPROVED BY DESIGNATED TESTING LABORATORY BEFORE MOVING IT TO THE JOB SITE.
- J. CONTRACTOR SHALL OBSERVE PROOF-ROLLING OF AREAS WHERE BUILDING AND PAVING WILL BE LOCATED TO DETERMINE ADEQUACY OF SOIL COMPACTION AND IN-PLACE SOILS. OTHER AREAS WILL BE INSPECTED BY SOILS ENGINEER TO DETERMINE ADEQUACY IN THOSE AREAS. IF SOILS ARE NOT ADEQUATE TO BEAR WEIGHTS THAT WILL BE IMPOSED, TESTING LABORATORY WILL OBSERVE AND REPORT CORRECTIVE ACTION TAKEN.
- K. TEST IN-PLACE SOIL AND FILLED AND COMPACTED AREAS. IF THESE ARE NOT ADEQUATE TO BEAR WEIGHTS IMPOSED, TESTING LABORATORY WILL ADVISE THE OWNER'S REPRESENTATIVE OF THEIR RECOMMENDATIONS. HE WILL DIRECT ANY CORRECTIVE MEASURES THAT ARE NECESSARY.
- L. SOILS COMPACTION TESTING OF IN-PLACE AND FILLED AND COMPACTED AREAS WILL BE PERFORMED BY TESTING LABORATORY IN ACCORDANCE WITH THEIR REQUIREMENTS.
- M. THE SOILS ENGINEER'S AND TESTING LABORATORY'S FEES WILL BE PAID BY THE CONTRACTOR.
- N. APPLICABLE SPECIFICATIONS FOR COMPACTED FILL: THE FOLLOWING CURRENT AMERICAN SOCIETY OF TESTING MATERIALS (ASTM) STANDARDS ARE HEREBY MADE PART OF THIS SPECIFICATION:
- D421-58, DRY PREPARATION OF SOIL SAMPLES FOR GRAIN-SIZE ANALYSIS AND DETERMINATION OF SOIL CONSTANTS.
 - D422-63, STANDARD METHOD OF PARTICLE SIZE ANALYSIS OF SOILS.
 - D1140-54, METHOD OF TEST FOR AMOUNT OF MATERIAL IN SOILS FINER THAN NO.200 SIEVE.
 - D698, METHOD FOR LABORATORY COMPACTION CHARACTERISTICS OF SOIL USING STANDARD EFFORT
 - D1557-78, STANDARD TEST METHODS FOR MOISTURE-DENSITY RELATIONS OF SOILS AND SOIL-AGGREGATE MIXTURES UNDER 10 LB. (4.54-KG) RAMMER AND 18-INCH (457 MM) DROP.
- O. PROVIDE POSITIVE DRAINAGE AWAY FROM BUILDINGS AT ALL LOCATIONS UNLESS OTHERWISE NOTED.
- P. CONTRACTOR SHALL REVIEW THE SITE SPECIFIC GEOTECHNICAL REPORT PRIOR TO COMMENCING WITH GRADING OPERATIONS. WHERE CONFLICTS BETWEEN THE GRADING NOTES AND GEOTECHNICAL REPORT EXIST, THE MORE STRINGENT REQUIREMENT SHALL APPLY.
- Q. CONTRACTOR IS RESPONSIBLE FOR DOCUMENTING WITH LOAD TICKETS, PHOTOGRAPHS, LOG BOOK, VIDEO RECORDING AND OTHER MEANS AS NECESSARY TO VERIFY THE INSTALLATION OF STORMWATER BEST MANAGEMENT PRACTICES REQUIRED BY THE LOCAL MUNICIPALITY AND JURISDICTION. AS-BUILT TOPOGRAPHY AND UTILITY PLANS HAVING BEEN PREPARED BY A QUALIFIED LAND SURVEYOR ARE REQUIRED TO BE SUBMITTED TO KIMLEY-HORN AT THE CONCLUSION OF THE PROJECT FOR VERIFICATION OF DESIGN INTENT. ANY MODIFICATIONS TO THE GRADING AND UTILITY SYSTEMS REQUIRED, NOT PREVIOUSLY APPROVED BY THE OWNER AND ENGINEER ARE THE RESPONSIBILITY OF THE CONTRACTOR.



MARLOWE LA VERGNE
0420 EL AIR ROAD



DESIGNED BY: _____

W/IN BY: _____

APPROVED BY: _____

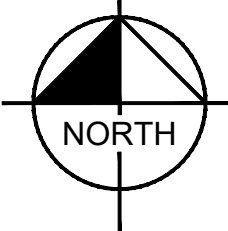
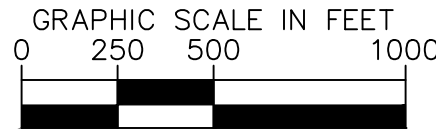
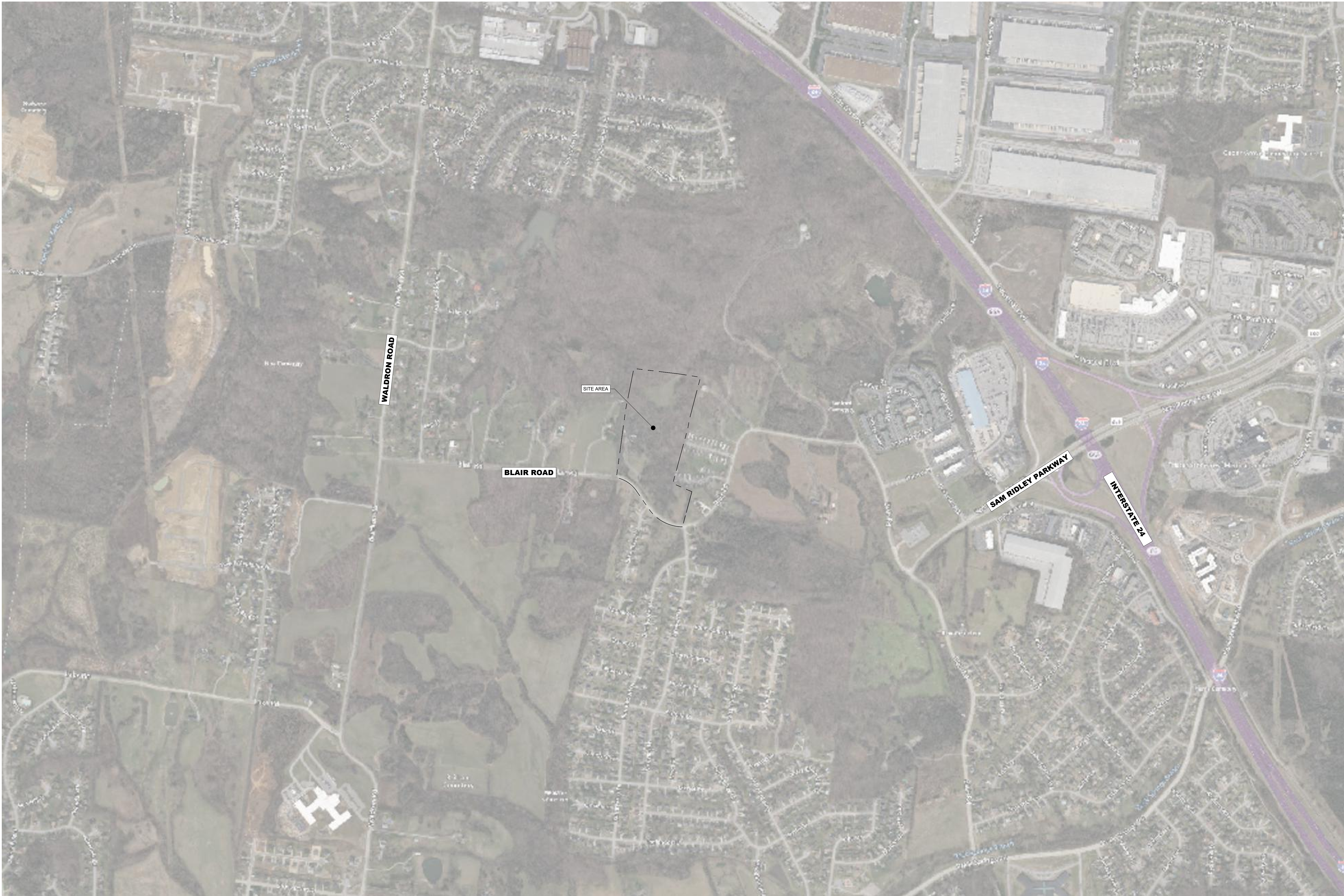
05/01/2023

GENERAL NOTES

SHEET NUMBER

C0-01

This document, together with the concepts and designs presented herein, is intended only for the specific purpose and client for which it was prepared. Reuse of and improper reliance on this document without written authorization and adaptation by Kimley-Horn and Associates, Inc. shall be without liability to Kimley-Horn and Associates, Inc.



REVISIONS		DATE	BY
No.	1		
	2		
	3		
	4		
	5		
	6		
	7		
	8		
	9		
	10		
DESIGNED BY:			
DRAWN BY:			
CHECKED BY:			
DATE:		05/01/2023	
KIMLEY-HORN PROJECT NO.		118702000	

VICINITY MAP

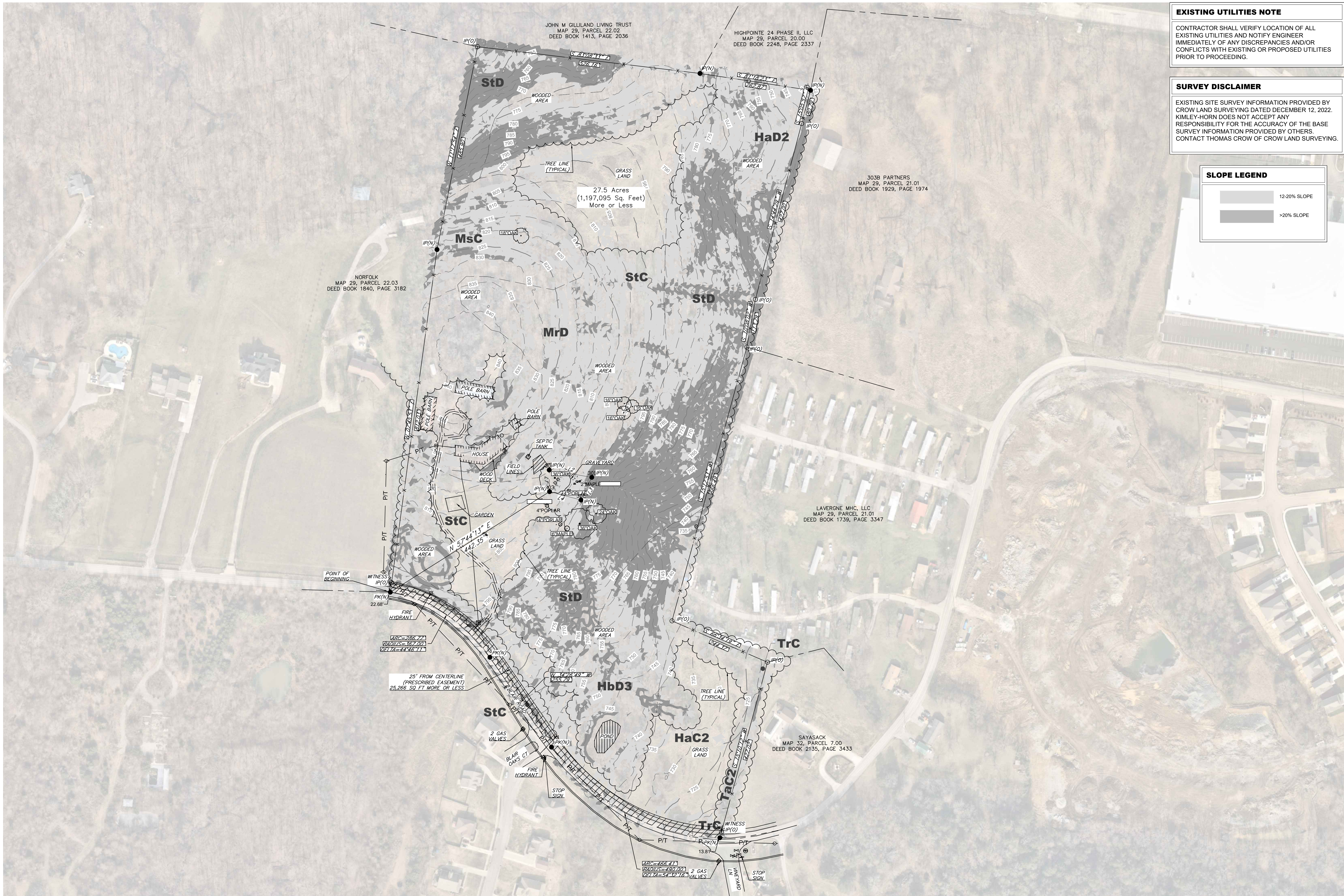
SHEET NUMBER
C0-02

MARLOWE LA VERGNE
243 BLAIR ROAD
LA VERGNE, TENNESSEE

Kimley»Horn

10 Lea Avenue Suite 400, Nashville, TN 37210
Main: 615.564.2701 | www.kimley-horn.com
© 2023 Kimley-Horn and Associates, Inc.

This document, together with the concepts and designs presented herein, is intended only for the specific purpose and client for which it was prepared. Reuse of and improper reliance on this document without written authorization and adaptation by Kimley-Horn and Associates, Inc. shall be without liability to Kimley-Horn and Associates, Inc.



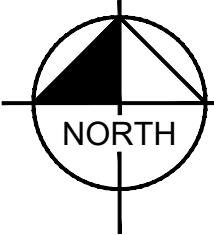
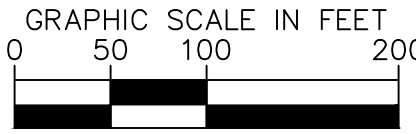
EXISTING UTILITIES NOTE

CONTRACTOR SHALL VERIFY LOCATION OF ALL EXISTING UTILITIES AND NOTIFY ENGINEER IMMEDIATELY OF ANY DISCREPANCIES AND/OR CONFLICTS WITH EXISTING OR PROPOSED UTILITIES PRIOR TO PROCEEDING.

SURVEY DISCLAIMER

EXISTING SITE SURVEY INFORMATION PROVIDED BY CROW LAND SURVEYING DATED DECEMBER 12, 2022. KIMLEY-HORN DOES NOT ACCEPT ANY RESPONSIBILITY FOR THE ACCURACY OF THE BASE SURVEY INFORMATION PROVIDED BY OTHERS. CONTACT THOMAS CROW OF CROW LAND SURVEYING.

SLOPE LEGEND



MARLOWE LA VERGNE
243 BLAIR ROAD
LA VERGNE, TENNESSEE



REVISIONS		DATE	BY
No.			
1			
2			
3			
4			
5			
6			
7			
8			
9			
10			
DESIGNED BY: _____			
DRAWN BY: _____			
CHECKED BY: _____			
DATE:		05/01/2023	
KIMLEY-HORN PROJECT NO.			
118702000			

EXISTING CONDITIONS

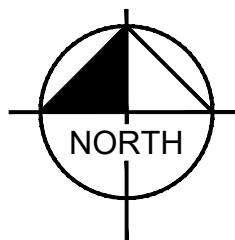
SHEET NUMBER

C1-00

Kimley»Horn

10 Lea Avenue Suite 400, Nashville, TN 37210
Main: 615.564.2701 | www.kimley-horn.com
© 2023 Kimley-Horn and Associates, Inc.

Drawing name: K:\NSH LDEV\118702000 - Shofner-Greystar La Vergne\4-CADD\PlanSheets\C2-00 SITE LAYOUT - OVERALL.dwg C2-00 SITE LAYOUT - OVERALL May 01, 2023 10:00am by: Garrett.Froula



1. ALL WORK AND MATERIALS SHALL COMPLY WITH ALL CITY/COUNTY/STATE REGULATIONS AND CODES AND O.S.H.A. STANDARDS.
2. ALL DIMENSIONS AND RADII ARE TO THE FACE OF CURB UNLESS OTHERWISE NOTED.
3. ALL RADII ARE 3' UNLESS NOTED OTHERWISE.
4. ALL CURBS SHALL BE SMOOTHLY WITH NO ABRUPT CHANGES AT TANGENT POINTS.
5. INSTALL CONCRETE JOINTS WHERE SHOWN ON PLANS AND DETAILS. ALIGN ON WALLS; BUILDING, RADII, ETC. EVENLY WITH BETWEEN ELEVATIONS. ALL CURBS SHALL HAVE 1/2" EPOXY JOINTS BETWEEN CONCRETE PAVEMENT AND ALL VERTICAL ELEMENTS (WALLS, CURBS, ETC.)
6. EXISTING STRUCTURES WITHIN CONSTRUCTION LIMITS ARE TO BE ABANDONED, REMOVED OR RELOCATED AS NECESSARY. ALL COST SHALL BE INCLUDED IN BASE BID.
7. ANY DAMAGED SECTIONS OF EXISTING INFRASTRUCTURE TO BE REPAIRED.
8. CONTRACTOR SHALL BE RESPONSIBLE FOR ALL RELOCATIONS, (UNLESS OTHERWISE NOTED ON PLANS) INCLUDING BUT NOT LIMITED TO, ALL UTILITIES, STORM DRAINAGE, SIGNS, TRAFFIC CONTROL MARKINGS, ETC., AS REQUIRED. ALL WORK SHALL BE IN ACCORDANCE WITH GOVERNING AUTHORITIES REQUIREMENTS AND SHALL BE APPROVED BY SUCH. ALL COST SHALL BE INCLUDED IN BASE BID.
9. SITE BOUNDARY, TOPOGRAPHY, UTILITY AND ROAD INFORMATION TAKEN FROM A SURVEY PROVIDED AS ALTA SURVEY SHEET
10. ALL EXPOSED UTILITY CONNECTIONS SHALL BE FIELD VERIFIED AND SUBJECT TO CHANGE PER UTILITY DISTRICT REQUEST.
11. CONTRACTOR SHALL TAKE ALL PRECAUTIONS TO FIND AND AVOID DISTURBING SITE UTILITIES. ALL UTILITIES ARE NOT SHOWN ON DRAWINGS. VERIFY LOCATION AND CONSIDER SUCH WHEN ESTIMATING.
12. ALL EXISTING TRAFFIC MARKINGS ON PRIVATE PROPERTY SHALL BE PAINT. UNLESS NOTED OTHERWISE, ALL PAVEMENT MARKINGS ON PUBLIC RIGHT-OF-WAY SHALL BE THERMOPLASTIC. UNLESS NOTED OTHERWISE, ALL PAVEMENT MARKINGS AT DRIVEWAYS SHALL BE WITHIN 10' OF THE INTERSECTING ROADWAY. SHALL BE THERMOPLASTIC.
13. ALL TRAFFIC CONTROL SIGNS AND PAVEMENT MARKING WILL BE IN ACCORDANCE WITH THE O.S.H.A. STANDARDS.
14. ALL DEVELOPMENT WITHIN THE BOUNDARIES OF THIS PLAN MEETS THE REQUIREMENTS OF THE AMERICANS WITH DISABILITIES ACT AND THE FAIR HOUSING ACT.
15. ADA: <http://www.ada.gov/>
U.S. Justice Dept.
http://www.justice.gov/athousing/fairhousing/about_fairhousing.asp
16. CONTRACTOR SHALL REFER TO THE ARCHITECTURAL PLANS FOR BUILDING DIMENSIONS AND EXACT BUILDING UTILITY ENTRANCE LOCATIONS.
17. ALL CURB TYPE SLABS SHALL BE MOUNDED WITH TPOISL 4" ABOVE THE CURB LINE TO PROMOTE POSITIVE DRAINAGE.
18. NO PEDESTRIAN PATHWAY SHALL EXCEED 2.0% CROSS SLOPE OR 5.0% LONGITUDINAL SLOPE.
19. ALL PARKING SPACES SHALL EXCEED 2.0% CROSS SLOPE IN ANY DIRECTION
20. ALL ADA ACCESSIBLE ROUTES INCLUDING CROSS WALKS, SIDEWALKS, DRIVEWAYS, AND PARKING ARE TO MEET ADA SLOPE REQUIREMENTS
21. THERE ARE TO BE NO VERTICAL OBSTRUCTIONS (POLES, SIGNS, GUY WIRES, ETC.) WITHIN SIDEWALK.
22. CONTRACTOR TO PLACE ASPHALT COURSE ONLY AFTER ALL CONSTRUCTION IS COMPLETED. ALL OTHER CONSTRUCTION TRAFFIC IS ANTICIPATED.

10 Lea Avenue Suite 400, Nashville, TN 37210
Main: 615.564.2701 | www.kimley-horn.com
© 2023 Kimley-Horn and Associates, Inc.

Page 182 of 227

This document, together with the concepts and designs presented herein, is intended only for the specific purpose and client for which it was prepared. Reuse of and improper reliance on this document without written authorization and adaptation by Kimley-Horn and Associates, Inc. shall be without liability to Kimley-Horn and Associates, Inc.

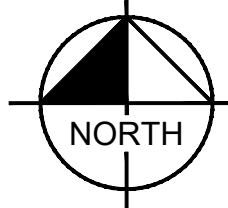
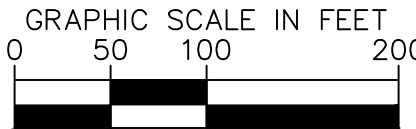
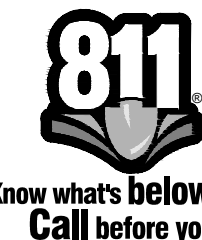


GRADING NOTES

- CONTRACTOR RESPONSIBLE FOR VERIFYING LOCATION, SIZE, AND ELEVATIONS OF EXISTING UTILITIES AT CONNECTION POINTS PRIOR TO GRADING OR INSTALLATION OF ANY PROPOSED UTILITIES. CONTRACTOR TO IMMEDIATELY NOTIFY OWNER'S REPRESENTATIVE IF DISCREPANCIES ARE FOUND.
- AREAS FOR CONSTRUCTION THAT REQUIRE DE-WATERING FOR EXCAVATION WILL BE DONE AT NO ADDITIONAL COST TO THE OWNER AND IN ACCORDANCE WITH SECTION 4.1.4 OF THE TENNESSEE GENERAL NPDES PERMIT FOR DISCHARGES OF STORMWATER ASSOCIATED WITH CONSTRUCTION ACTIVITIES.
- ADDITIONAL EROSION CONTROL DEVICES TO BE USED AS REQUIRED BY LOCAL INSPECTOR.
- DISTURBED AREAS LEFT IDLE FOR FIVE DAYS, AND NOT TO FINAL GRADE, WILL BE ESTABLISHED TO TEMPORARY VEGETATION. MULCH, TEMPORARY VEGETATION OR PERMANENT VEGETATION SHALL BE COMPLETED ON ALL EXPOSED AREAS WITHIN 14 DAYS AFTER DISTURBANCE. ALL AREAS TO FINAL GRADE WILL BE ESTABLISHED TO PERMANENT VEGETATION UPON COMPLETION.
- WHEN HAND PLANTING, MULCH (HAY OR STRAW) SHOULD BE UNIFORMLY SPREAD OVER SEED AREA WITHIN 24 HOURS OF SEEDING. IF UNABLE TO ACCOMPLISH, MULCH SHALL BE USED AS A TEMPORARY COVER. CONCENTRATED FLOW AREAS AND ALL SLOPES STEEPER THAN 2.5:1 AND WITH A HEIGHT OF TEN FEET OR GREATER (DOES NOT APPLY TO RETAINING WALLS), AND CUTS AND FILLS WITHIN BUFFERS, SHALL BE STABILIZED WITH THE APPROPRIATE EROSION CONTROL MATTING OR BLANKETS.
- THE GRADING PERMIT MUST BE DISPLAYED ON SITE AT ALL TIMES DURING CONSTRUCTION AND IN PLAIN VIEW FROM A PUBLIC ROAD OR STREET.
- EROSION AND SEDIMENT CONTROL DEVICES MUST BE DISPLAYED AND INSPECTED PRIOR TO ANY GRADING ON SITE. THE CONTRACTOR MUST CALL FOR AN INSPECTION TO OBTAIN A PERMIT TO GRADE. PLEASE CALL WITH ENOUGH LEAD-TIME FOR AN INSPECTION TO MEET YOUR SCHEDULE.
- SEDIMENT/EROSION CONTROL DEVICES MUST BE INSPECTED ACCORDING TO LOCAL AND STATE REQUIREMENTS AND AS STIPULATED IN THE STORMWATER POLLUTION PREVENTION PLAN. EACH DEVICE IS TO BE MAINTAINED OR REPLACED IF SEDIMENT ACCUMULATION HAS REACHED ONE HALF THE CAPACITY OF THE DEVICE. ADDITIONAL DEVICES MAY BE NECESSARY AS THE PROJECT PROGRESSES AND NEW CHANNELS HAVE DEVELOPED.
- THE ESCAPE OF SEDIMENT FROM THE SITE SHALL BE PREVENTED BY THE INSTALLATION OF EROSION AND SEDIMENT CONTROL MEASURES AND PRACTICES PRIOR TO, OR CONCURRENT WITH, LAND-DISTURBING ACTIVITIES.
- EROSION CONTROL MEASURES WILL BE MAINTAINED AT ALL TIMES. IF FULL IMPLEMENTATION OF THE PLAN DOES NOT PROVIDE FOR EFFECTIVE EROSION CONTROL, ADDITIONAL EROSION CONTROL AND SEDIMENT CONTROL MEASURES SHALL BE IMPLEMENTED TO CONTROL OR TREAT THE SEDIMENT SOURCE.
- CONTRACTOR SHALL REVIEW SITE GEOTECHNICAL REPORT BEFORE COMMENCING GRADING OPERATIONS.
- SEED ALL DISTURBED AREAS UNLESS OTHERWISE NOTED AS PART OF THIS CONTRACT. REFER TO LANDSCAPING PLANS FOR AREAS TO RECEIVE SOIL.
- INSTALL SOD OR RIPRAP IN SWALES AS INDICATED ON GRADING PLANS AND EROSION CONTROL PLANS.
- TOPSOIL ON SITE TO BE STRIPPED AND STOCKPILED FOR REUSE IN LAWN AREAS.
- ADEQUATE DRAINAGE, EROSION AND SEDIMENT CONTROL MEASURES, BEST MANAGEMENT PRACTICES, AND/OR OTHER WATER QUALITY MANAGEMENT FACILITIES SHALL BE PROVIDED AND MAINTAINED AT ALL TIMES DURING CONSTRUCTION. DAMAGES TO ADJACENT PROPERTY AND/OR THE CONSTRUCTION SITE CAUSED BY THE CONTRACTOR'S OR PROPERTY OWNER'S FAILURE TO PROVIDE AND MAINTAIN ADEQUATE DRAINAGE AND EROSION/SEDIMENT CONTROL FOR THE CONSTRUCTION AREA SHALL BE THE RESPONSIBILITY OF THE PROPERTY OWNER AND/OR CONTRACTOR.
- UNDERGROUND UTILITIES HAVE NOT BEEN VERIFIED BY THE OWNER, DESIGNER, OR THEIR REPRESENTATIVES. BEFORE YOU DIG CALL ONE CALL--811 OR 1-800-752-6007
- THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK AND AGREES TO BE RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT RESULT FROM THE CONTRACTOR'S FAILURE TO EXACTLY LOCATE AND PRESERVE ANY UNDERGROUND UTILITIES TO REMAIN.

GRADING PLAN LEGEND

- SPOT ELEVATION
HP HIGH POINT
TC TOP OF CURB
TW TOP OF WALL
INV INVERT
LP LOW POINT
BC BOTTOM OF CURB / GUTTER LINE
BW BOTTOM OF EXPOSED WALL
RIM TOP OF GRATE / COVER
- FINISH FLOOR ELEVATION
500 EXISTING CONTOUR
500 PROPOSED CONTOUR



Kimley»Horn

10 Lea Avenue Suite 400, Nashville, TN 37210
Main: 615.564.2701 | www.kimley-horn.com
© 2023 Kimley-Horn and Associates, Inc.

MARLOWE LA VERGNE
243 BLAIR ROAD
LA VERGNE, TENNESSEE



No.	DATE	BY	REVISIONS
1			
2			
3			
4			
5			
6			
7			
8			
9			
10			

DESIGNED BY: ---

DRAWN BY: ---

CHECKED BY: ---

DATE: 05/01/2023

KIMLEY-HORN PROJECT NO. 118702000

GRADING AND DRAINAGE PLAN - OVERALL

SHEET NUMBER

C4-00

This document, together with the concepts and designs presented herein, is intended only for the specific purpose and client for which it was prepared. Reuse of and improper reliance on this document without written authorization and adaptation by Kimley-Horn and Associates, Inc. shall be without liability to Kimley-Horn and Associates, Inc.

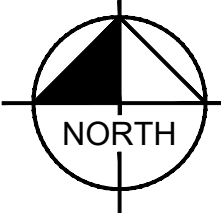
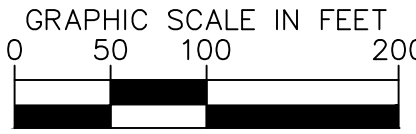
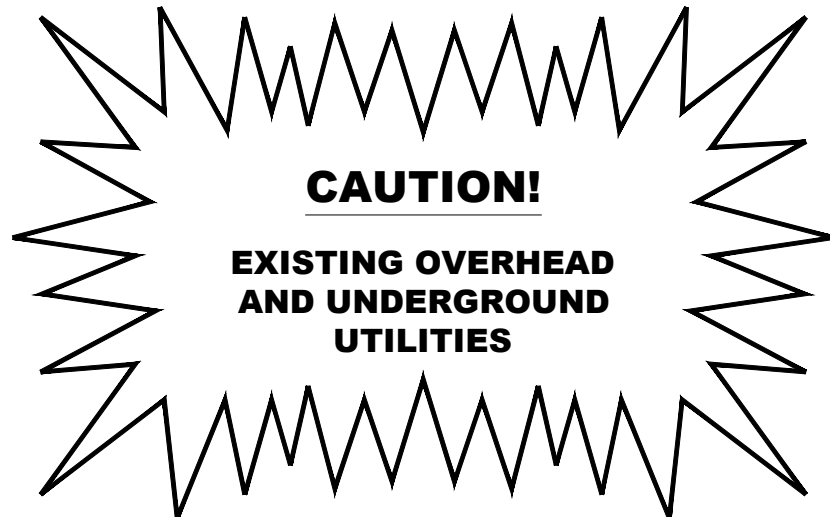


SITE UTILITY NOTES

- EXISTING UTILITIES SHALL BE VERIFIED IN FIELD PRIOR TO INSTALLATION OF ANY NEW PIPE LINES.
- THE CONTRACTOR SHALL NOTIFY THE INSPECTOR AT LEAST 7 DAYS PRIOR TO THE START OF SEWER CONSTRUCTION.
- THE LOCATIONS OF EXISTING UNDERGROUND AND OVERHEAD UTILITIES ARE SHOWN IN AN APPROXIMATE WAY ONLY AND HAVE NOT BEEN INDEPENDENTLY VERIFIED BY THE OWNER OR KIMLEY-HORN AND ASSOCIATES, INC. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UNDERGROUND AND OVERHEAD UTILITIES BEFORE COMMENCING WORK AND AGREES TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES WHICH MIGHT BE OCCASIONED BY THE CONTRACTORS FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UNDERGROUND AND OVERHEAD UTILITIES.
- CONTRACTOR TO COORDINATE ALL WORK WITH OTHER UTILITY INSTALLATIONS NOT PROVIDED IN THESE CONSTRUCTION DOCUMENTS (ELECTRIC, TELEPHONE, GAS, CABLE, ETC.) AND ALLOW FOR THEIR OPERATIONS AND CONSTRUCTION TO BE PERFORMED.
- ALL WORK AND MATERIALS SHALL COMPLY WITH THE CITY OF LA VERGNE, TOWN OF SMYRNA AND O.H.S.A. STANDARDS.
- ALL SEWER CONSTRUCTION AND MATERIALS SHALL BE IN ACCORDANCE WITH TOWN OF SMYRNA AND THE DEPARTMENT OF ENVIRONMENT AND CONSERVATION CURRENT SPECIFICATIONS.
- ALL FILL IS TO BE PLACED AND COMPACTED PRIOR TO INSTALLATION OF PUBLIC UTILITIES.
- ALL PIPES UNDER STREETS OR PAVED AREAS IN R.O.W. SHALL BE BACKFILLED WITH CRUSHED STONE.
- ALL AREAS BACKFILLED SHALL BE COMPACTED TO 95% STANDARD PROCTOR IN R.O.W.
- EXISTING UTILITIES SHALL BE VERIFIED IN FIELD PRIOR TO INSTALLATION OF ANY NEW PIPE LINES.
- THE CONTRACTOR'S AUTHORIZED FIELD REPRESENTATIVE SHALL NOTIFY THE APPROPRIATE UTILITY DEPARTMENT 48 HOURS PRIOR TO COMMENCING ANY WORK ON THE PROPOSED SANITARY SEWER LINE EXTENSIONS.
- ALL FIRE HYDRANTS INSTALLED FOR THIS DEVELOPMENT SHALL BE OF A TYPE ACCEPTABLE TO LA VERGNE UTILITY DISTRICT STANDARDS.
- LA VERGNE UTILITY DISTRICT AND/OR CONTRACTOR SHALL SET INDIVIDUAL WATER METERS IN FIELD AS REQUIRED.
- CONTRACTOR SHALL REPLACE IN LIKE KIND ALL PAVEMENT AREAS REMOVED OR DISTURBED AS A RESULT OF THE WATER MAIN INSTALLATION AND ASSOCIATED WORK.
- PUBLIC WATER MAIN TO HAVE MINIMUM OF 36\"/>
- ALL WATER LATERALS TO HAVE A MINIMUM OF 18\"/>
- CONTRACTOR SHALL BE A STATE OF TENNESSEE LICENSED CONTRACTOR APPROVED TO INSTALL PUBLIC WATER MAINS.
- CONTRACTOR SHALL OBTAIN AND PAY FOR ALL FEES, PERMITS AND LICENSES AS PART OF THE CONTRACT.
- NON-METALLIC DETECTION TAPE SHALL BE INSTALLED 18\"/>
- LUBRICANTS SHALL BE NON-TOXIC AND SHALL NOT PROMOTE BIOLOGICAL GROWTH. SOLVENT-CEMENTED JOINTS ARE NOT PERMITTED.
- PROCEDURES FOR DISINFECTING POTABLE WATERLINES SHALL CONFORM TO THE REQUIREMENTS OF A.W.W.A. C651. ALL WATERLINES SHALL BE DISINFECTED, BACTERIOLOGICAL TESTED, AND PRESSURE TREATED ACCORDING TO LA VERGNE UTILITY DISTRICT SPECIFICATIONS PRIOR TO LINE ACCEPTANCE AND THE WATERLINE BEING PLACED INTO SERVICE.
- PRESSURE AND LEAKAGE TESTS SHALL BE PERFORMED IN STRICT ACCORDANCE WITH CURRENT A.W.W.A. STANDARD C650 AND/OR MANUFACTURER'S PROCEDURES.
- ALL VALVES AND FITTINGS ARE TO CONFORM TO THE LATEST A.W.W.A. STANDARDS.
- THE CONTRACTOR SHALL MAKE ARRANGEMENTS WITH THE UTILITY ENTITY FOR CONNECTION TO THE EXISTING UTILITY LINES. THE CONTRACTOR SHALL ADJUST THE LOCATION OF THE PROPOSED WATERLINE TO AVOID CONFLICTS WITH OTHER UTILITIES.
- ALL CONCRETE USED FOR THRUST BLOCKS TO HAVE A MINIMUM 28 DAY COMPRESSIVE STRENGTH OF 3000 psi.
- THE CONTRACTOR IS RESPONSIBLE FOR THE COMPLETE INSTALLATION OF THE WATER SERVICE LINE AND FIRE LINE AS REQUIRED. THE CONTRACTOR SHALL PROVIDE A TAPPING VALVE AND SLEEVE AND OTHER MATERIAL AND EQUIPMENT AS REQUIRED FOR TAPPING THE EXISTING GROWTH. THE CONTRACTOR SHALL BE RESPONSIBLE FOR THE FEE TO LA VERGNE UTILITY DISTRICT AS REQUIRED FOR TAPPING THE EXISTING MAIN AND COORDINATE WITH LA VERGNE UTILITY DISTRICT AS REQUIRED.
- NO CONNECTION TO THE EXISTING SANITARY SEWER SYSTEM WILL BE PERMITTED UNTIL THE NEW SANITARY SEWER WORK HAS BEEN INSPECTED AND IS APPROVED BY THE APPROPRIATE UTILITY DEPARTMENT/DISTRICT.
- TEN-FOOT MINIMUM HORIZONTAL SEPARATION AND 18\"/>
- ALL SANITARY SEWER SERVICES WILL BE TEE OR WYE CONNECTED TO MAIN LINE.
- ALL MANHOLES TO HAVE TRAFFIC BEARING FRAMES AND COVERS UNLESS NOTED OTHERWISE ON THE PLAN/PROFILE SHEETS.

LEGEND

- | | |
|--|-----------------------------|
| | SANITARY SEWER MANHOLE |
| | SANITARY SEWER LINE |
| | FIRE HYDRANT |
| | 6\"/> |
| | DOMESTIC WATER MASTER METER |
| | DOMESTIC BACKFLOW PREVENTER |



MARLOWE LA VERGNE
243 BLAIR ROAD
LA VERGNE, TENNESSEE

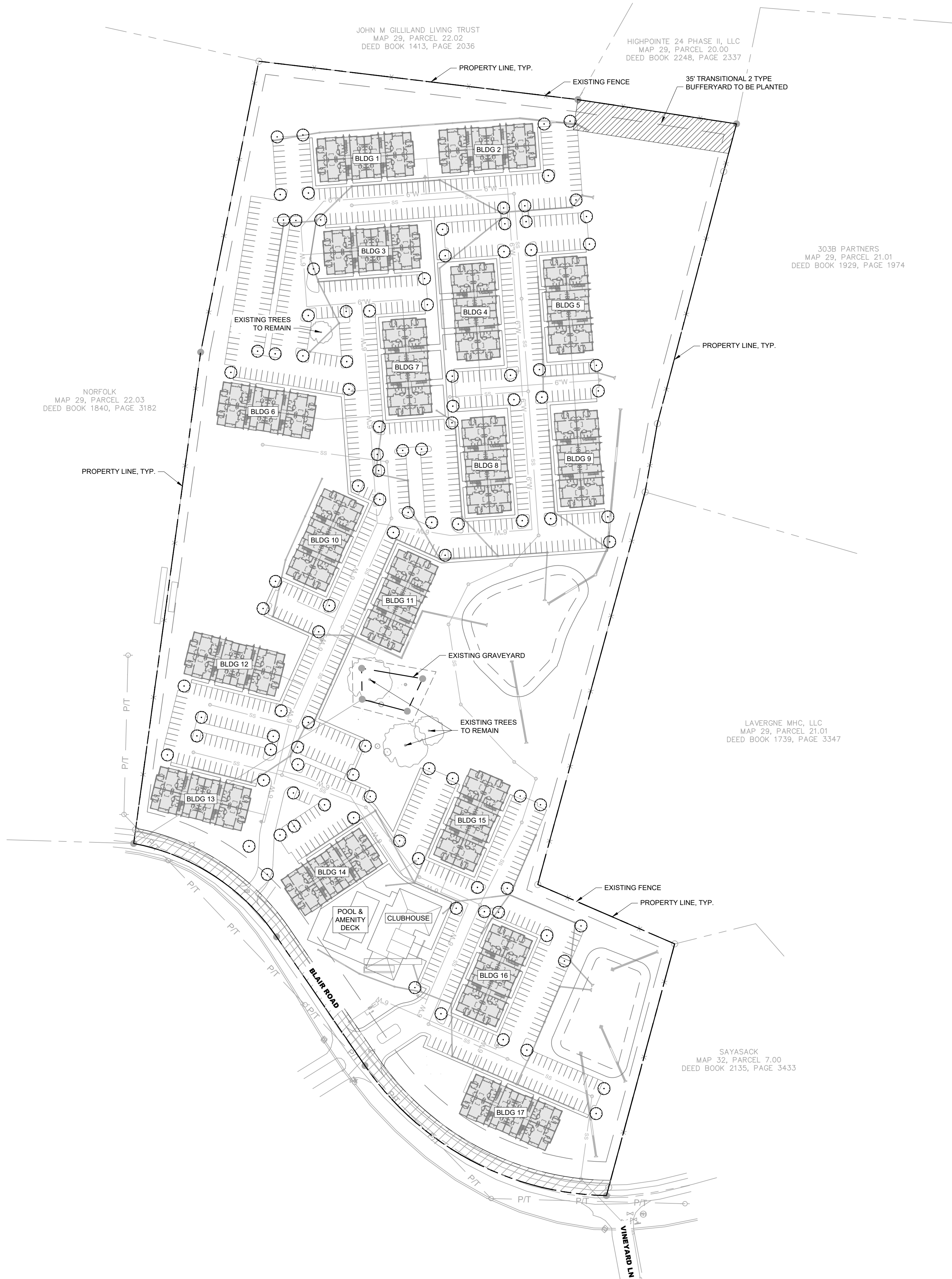


No.	REVISIONS										DATE	BY
	1	2	3	4	5	6	7	8	9	10		
DESIGNED BY:												
DRAWN BY:												
CHECKED BY:												
DATE:											05/01/2023	
KIMLEY-HORN PROJECT NO. 118702000												
UTILITY PLAN - OVERALL												
SHEET NUMBER C6-00												

Kimley»Horn

10 Lea Avenue Suite 400, Nashville, TN 37210
Main: 615.564.2701 | www.kimley-horn.com
© 2023 Kimley-Horn and Associates, Inc.

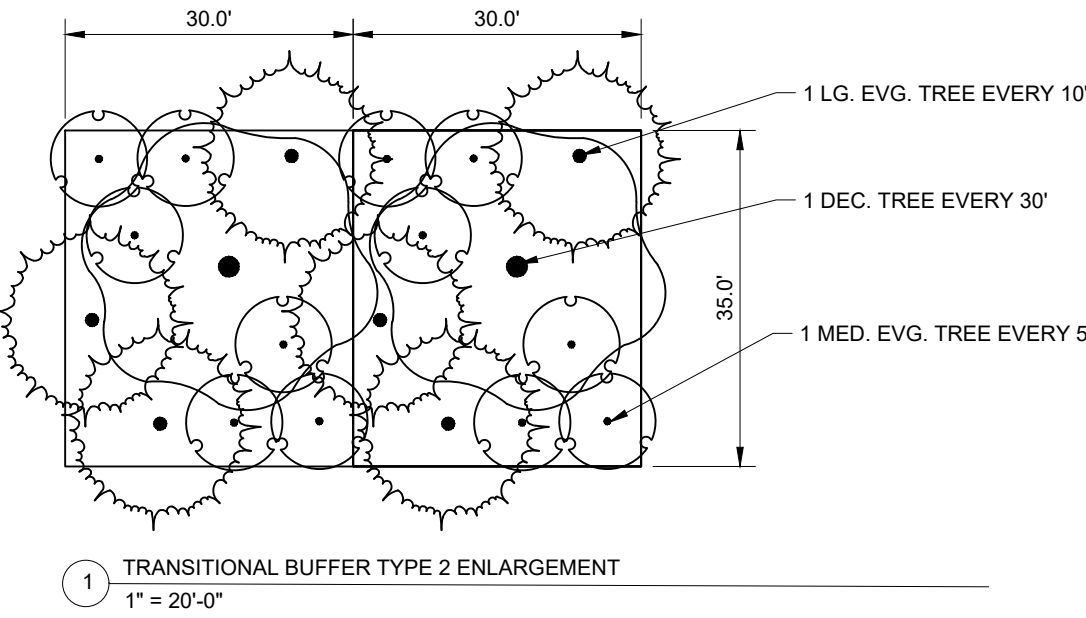
This document, together with the concepts and designs presented herein, is intended only for the specific purpose and client for which it was prepared. Reuse of and improper reliance on this document without written authorization and adaptation by Kimley-Horn and Associates, Inc. shall be without liability to Kimley-Horn and Associates, Inc.



LANDSCAPE DATA TABLE	
PROJECT NAME:	MARLOWE LA VERGNE
PROPERTY ADDRESS:	243 BLAIR ROAD LA VERGNE, TENNESSEE 37086
MAP AND PARCEL ID:	MAP 32 PARCEL 6.00
EXISTING ZONING:	R-3, HIGH DENSITY RESIDENTIAL
EXISTING LAND USE:	SINGLE FAMILY RESIDENTIAL
PROPOSED LAND USE:	HIGH DENSITY RESIDENTIAL
SITE AREA:	27.49 AC
BUILDING AREA:	±543,320 GSF
BUILDING PERMIT:	TBD
GRADING PERMIT:	TBD

- | LANDSCAPE REQUIREMENTS | |
|---------------------------------------|---|
| • | REQUIRED SITE PLANTINGS
PLANTINGS REQUIRED PER ACRE
2 CANOPY TREES
2 UNDERSTORY TREES
10 SHRUBS |
| • | PARKING SCREENING
ALL PARKING LOTS SHALL BE SCREENED FROM THE ROAD AND FROM ADJACENT PROPERTIES USING A 3-FOOT TALL SCREEN IN THE FORM OF AN EVERGREEN HEDGE, BERM, OR MASONRY WALL. THIS SCREEN MUST BE LOCATED WITHIN A LANDSCAPE BUFFER AREA ON THE PERIMETER OF THE PARKING LOT. |
| • | REQUIRED LANDSCAPE BUFFERYARDS
A TRANSITIONAL 2 TYPE, UNBROKEN STRIP OF OPEN SPACE MINIMUM 35' WIDE IS TO BE PLANTED BETWEEN INDUSTRIAL AND COMMERCIAL ZONING AREAS WITH:
1 LARGE EVERGREEN TREE EVERY 10 FEET
1 MEDIUM EVERGREEN TREE EVERY 5 FEET
1 DECIDUOUS TREE EVERY 30 FEET |
| *MINIMUM REQUIREMENTS ACHIEVED | |

BUFFER LEGEND	
	TRANSITIONAL 2 BUFFER



Kimley»Horn

10 Lea Avenue Suite 400, Nashville, TN 37210
Main: 615.564.2701 | www.kimley-horn.com
© 2023 Kimley-Horn and Associates, Inc.

MARLOWE LA VERGNE
243 BLAIR ROAD
LA VERGNE, TENNESSEE

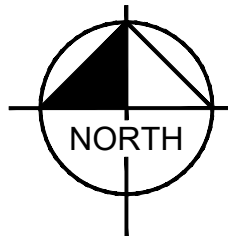
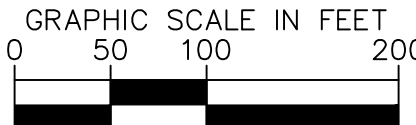
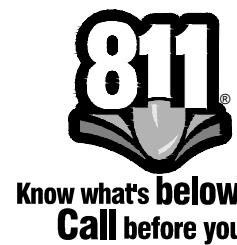


REVISIONS		DATE	BY
No.	1	2	3
DESIGNED BY:	OAS		
DRAWN BY:	OAS		
CHECKED BY:	CJJ		
DATE:	05/01/2023		
KIMLEY-HORN PROJECT NO. 118702000			

LANDSCAPE PLAN

SHEET NUMBER

L1-00





Item #: 8.

Item Title: Final Plat – Music City Campground – Two Commercial Lots on 6.88 Acres. Requested by Wamble & Associates. Property has frontage on Murfreesboro Road, Nir Shreibman Blvd. and 73rd Ave. (Tax Map 15, Parcels 16.02 and 15). C-2 (Highway Service) Zoning District. Property owned by Amnon Shreibman.

Reviewed By:

Location:

(Insert map here)

Summary: On behalf of the applicant, Wamble & Associates is requesting approval of the final plat for Music City Campground located on 6.88 acres. The property is located on 73rd Avenue, Nir Shreibman and Murfreesboro Road. The purpose of the final plat is only to move an existing boundary line.

Staff Comments / Technical Items:

Planning

Bo Logan - 615-287-8702 (Technical items go here)
blogan@lavergneth.gov

Jake Blair - 615-287-8702
jblair@lavergneth.gov

Engineering

Gary Lide - 615-28-8703 No comments
glide@lavergneth.gov

Utilities

Scott Tatalovich - 615-287-8739 (Technical items go here)
statalovich@lavergneth.gov

Codes

Randolph Salyers - 615-287-8605
rsalyers@lavergnnetn.gov

Fire

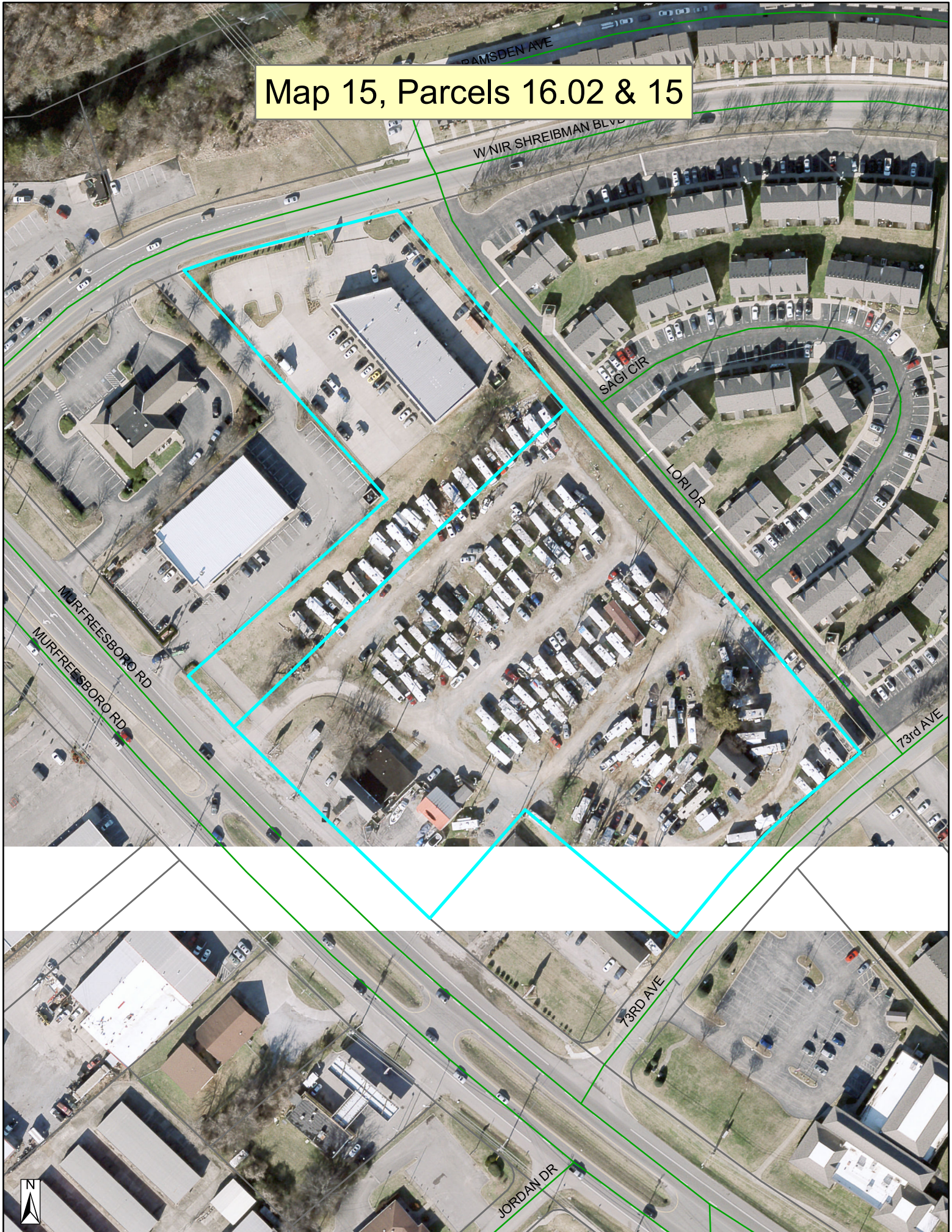
Curtis Brinkley - 615-405-5931 No comment
cbrinkley@lavergnnetn.gov

Police

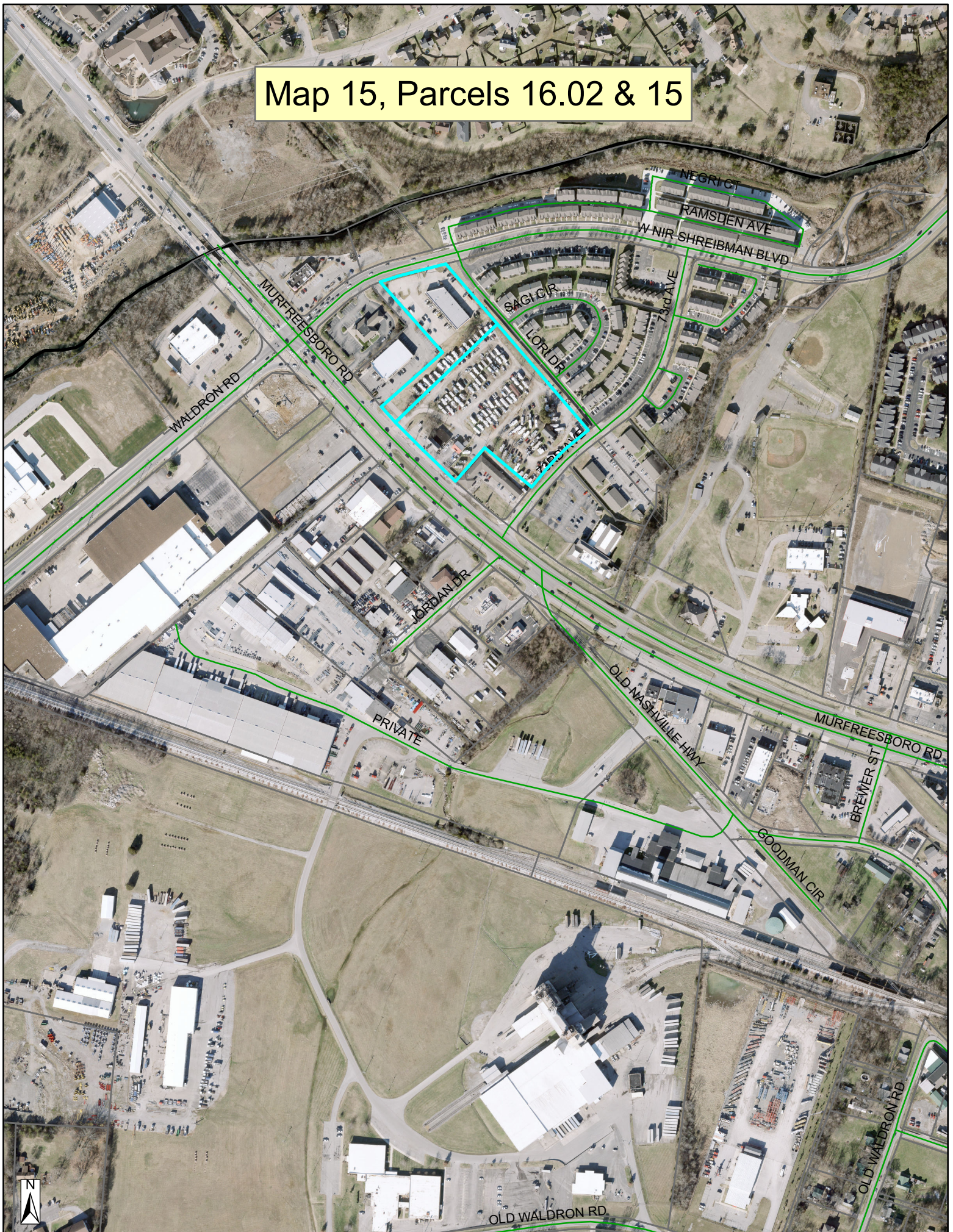
JJ Eubank - 615-287-8613 (Technical items go here)
jeubank@lavergnnetn.gov

***Note:** The above technical items may not be the only corrections and/or issues needing to be resolved to get approval from the planning commission. New items can be brought up at the workshop and staff can add items at any time that might have been overlooked. It is the applicant's responsibility to make sure that all technical items are addressed and that no new issues exist before the planning commission meeting. Addressing all technical items does not constitute approval. It is the planning commission's decision whether an item passes or fails. Revised plans are due to staff by the following Monday at close of business unless other arrangements are made and documented.

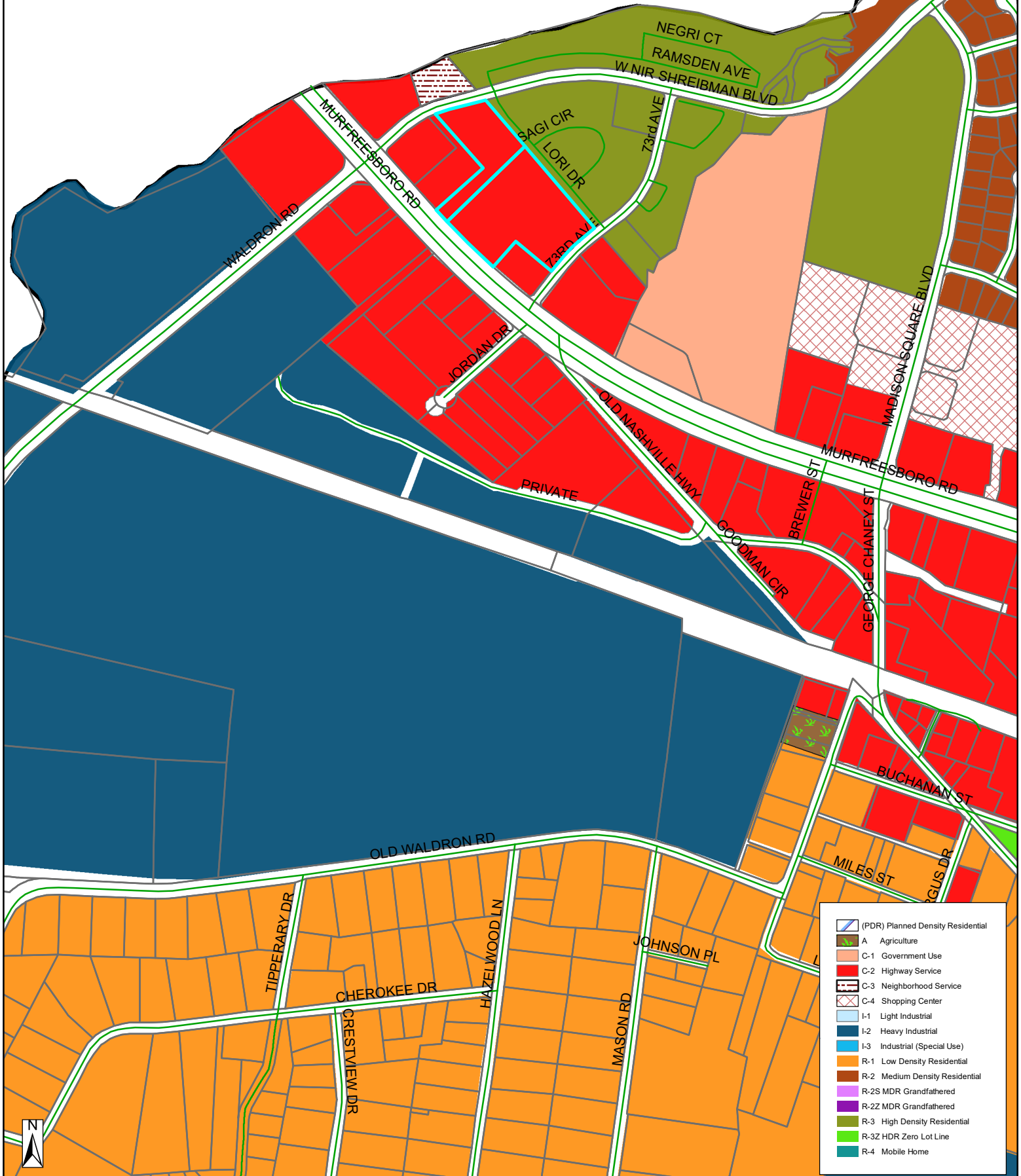
Map 15, Parcels 16.02 & 15



Map 15, Parcels 16.02 & 15



Map 15, Parcels 16.02 & 15



- (PDR) Planned Density Residential
- A Agriculture
- C-1 Government Use
- C-2 Highway Service
- C-3 Neighborhood Service
- C-4 Shopping Center
- I-1 Light Industrial
- I-2 Heavy Industrial
- I-3 Industrial (Special Use)
- R-1 Low Density Residential
- R-2 Medium Density Residential
- R-2S MDR Grandfathered
- R-2Z MDR Grandfathered
- R-3 High Density Residential
- R-3Z HDR Zero Lot Line
- R-4 Mobile Home



Item #: 9.

Item Title: Final Plat – Portico Place, Section 2, Phase 2 & Resubdivision of Common Areas A & B of Section 2, Phase 1 – 52 Lots on 15.69 Acres. Requested by SEC, Inc. Property located on Blair Road (Tax Map 29, Parcel 20.04). PDR (Planned Density Residential) Zoning District. Property owned by Blair Road, LLC.

Reviewed By:

Location:

(Insert map here)

Summary:

Staff Comments / Technical Items:

Planning

Bo Logan - 615-287-8702

blogan@laveragnetn.gov

(Technical items go here)

Jake Blair - 615-287-8702

jblair@laveragnetn.gov

Engineering

Gary Lide - 615-28-8703

glide@laveragnetn.gov

1. The fire hydrant locations shown on the Plat are incorrect. The water system, the sewer system, and the fire hydrants must be correctly shown.
2. Lot 34 is majorly encumbered by a stream buffer. This leaves a functional building footprint of about 36' across the front by 50' deep. No structures, decks, patios, etc. will be allowed to be constructed within the stream buffer. It is requested that the homebuilder and developer confirm that they will be able to build on this lot without requiring a variance

- to building anything in the stream buffer area or from the BOZA.
3. The Mail Kiosk with parking spaces is shown being constructed partially in the stream buffer this is not allowed. Field measurements by staff showed the existing mail kiosk to be 27' outside the buffer but it included no parking spaces.
 4. No performance bond amount has been submitted.

Utilities

Scott Tatalovich - 615-287-8739 Water and sewer utilities shown are incorrect, surveyor should
statalovich@lavergneth.gov seek assistance from Developer's engineer w.r.t. what has actually been installed. The plat shall be corrected and resubmitted for review. Known errors are number and/or location of FHs, blowoffs, valves, and sewer manholes and sewer lines.

Codes

Randolph Salyers - 615-287-8605 (Technical items go here)
rsalyers@lavergneth.gov

Fire

Curtis Brinkley - 615-405-5931 (Technical items go here)
cbrinkley@lavergneth.gov

Police

JJ Eubank - 615-287-8613 (Technical items go here)
jeubank@lavergneth.gov

***Note:** The above technical items may not be the only corrections and/or issues needing to be resolved to get approval from the planning commission. New items can be brought up at the workshop and staff can add items at any time that might have been overlooked. It is the applicant's responsibility to make sure that all technical items are addressed and that no new issues exist before the planning commission meeting. Addressing all technical items does not constitute approval. It is the planning commission's decision whether an item passes or fails. Revised plans are due to staff by the following Monday at close of business unless other arrangements are made and documented.

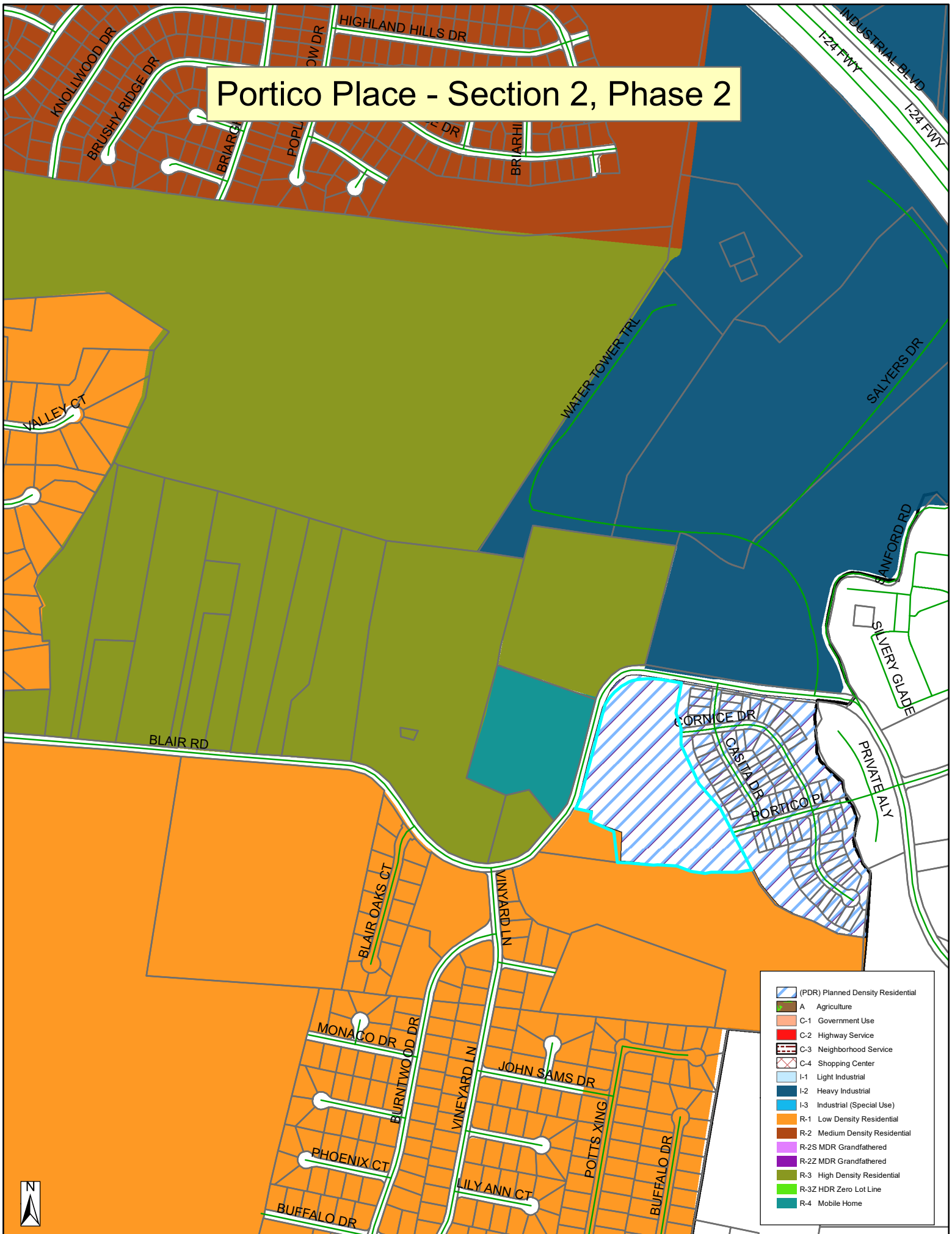
Portico Place - Section 2, Phase 2

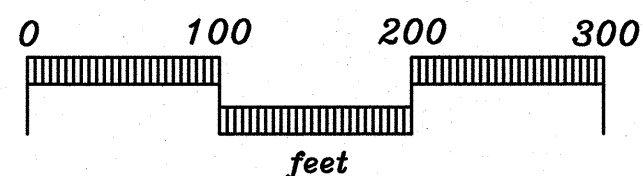


Portico Place - Section 2, Phase 2



Portico Place - Section 2, Phase 2





GENERAL NOTES

- THE PURPOSE OF THIS FINAL PLAT IS TO CREATE 52 SINGLE FAMILY LOTS BEING SUPPORTED WITH ROAD RIGHT-OF-WAY AND EASEMENTS.
- BEARING SYSTEM IS BASED ON TENNESSEE STATE PLANE COORDINATES TIED TO RUTHERFORD COUNTY CONTROL POINT RCC-01 (NAD 83-96).
- THIS PROPERTY LIES WITHIN ZONE X, NOT IN A SPECIAL FLOOD HAZARD AREA, PER FEMA FIRM MAPS FOR RUTHERFORD COUNTY, MAP NO. 4749C005 H, EFFECTIVE DATE: JANUARY 5, 2007.
- PARCELS MAY BE SUBJECT TO ADDITIONAL EASEMENTS AND/OR RESTRICTIONS, BY RECORD OR PRESCRIPTION, THAT A COMPLETE TITLE SEARCH MAY REVEAL.
- PROPERTY IS ZONED PDR. MINIMUM SETBACK REQUIREMENTS ARE:
FRONT - 15 FT. / (35 FT. TO GARAGE) - SIDE - 5 FT. - REAR - 15 FT.
- FOR EACH LOT SHOWN ON THIS PLAT, THERE SHALL BE PLANTED A MINIMUM OF ONE CANOPY TREE OF AT LEAST 2.5" CALIPER AND ONE UNDERSTORY TREE OF AT LEAST 1.5" CALIPER. THE TYPE OF TREE IS TO BE DETERMINED BY THE CITY OF LAVERGNE WITH THE DEVELOPER.
- ALL CRITICAL LOTS (WITH 15% SLOPES OR GREATER), ARE DENOTED WITH AN ASTERISK (*), ENGINEERED PLOT PLANS ARE REQUIRED FOR THESE LOTS PRIOR TO OBTAINING A BUILDING PERMIT.
- ALL COMMON AREAS AND DRAINAGE AREAS SHALL BE OWNED AND MAINTAINED BY THE HOMEOWNERS ASSOCIATION.
- DEVELOPER IS RESPONSIBLE FOR THE INSTALLATION OF STREET LIGHTS. STREET LIGHTS SHALL BE LOCATED NO MORE THAN 300 FEET APART.
- LOTS 34-39 AND 43-53 SHALL HAVE NO ACCESS TO BLAIR ROAD. ALL ACCESS FOR THESE LOTS SHALL BE FROM AND TO CORNICIE DRIVE FOR LOTS 34-39 AND PORTICO PLACE FOR LOTS 43-53.

MAP 29, PARCEL 21.01
SUNTRUST, TRUSTEE
R.B. 1307, PG. 2295
ZONED R-4

MAP 29, PARCEL 21.00
LIMP, LLC
R.B. 106, PG. 2478
ZONED R-4

MAP 32, PARCEL 9.00
LARRY J. GIBBONS
R.B. 573, PG. 2635
ZONED R-1

MAP 29, PARCEL 20.00
JOHN M. BYRNES
D.B. 545, PG. 456
ZONED I-2

MAP 32, PARCEL 9.00
NARON FAMILY TRUST
R.B. 52, PG. 398

MAP 32, PARCEL 9.00
NARON FAMILY TRUST
R.B. 52, PG. 398

MAP 32, PARCEL 6.04
SANDRA M. PARKER
R.B. 579, PG. 1539
ZONED R-1

CURVE DATA

CURVE	DELTA	RADIUS	ARC LENGTH	CHORD BEARING	CHORD LENGTH
C1	8°45'43"	500.00'	59.01'	S 79°55'43" W	58.97'
C2	8°45'43"	500.00'	59.01'	S 88°35'46" W	58.97'
C3	8°45'43"	500.00'	59.01'	N 88°35'46" W	58.97'
C4	8°01'34"	500.00'	55.59'	N 80°12'07" W	52.56'
C5	8°01'34"	500.00'	55.59'	N 74°01'33" W	52.56'
C6	8°45'43"	500.00'	59.01'	N 67°46'55" W	58.97'
C7	8°01'34"	500.00'	55.59'	N 62°31'36" W	52.56'
C8	8°01'34"	500.00'	55.59'	N 55°12'42" W	52.56'
C9	2°00'09"	500.00'	17.47'	N 5°20'50" W	17.47'
C10	26°58'52"	175.00'	62.41'	N 36°51'20" W	81.65'
C11	38°36'01"	175.00'	96.53'	N 0°13'54" W	95.30'
C12	22°02'31"	175.00'	67.32'	N 15°15'22" E	66.91'
C13	30°00'00"	25.00'	39.27'	N 75°16'38" E	35.36'
C14	61°17'56"	220.00'	62.56'	S 67°52'20" E	62.35'
C15	6°26'36"	50.00'	5.62'	N 62°56'41" W	5.62'
C16	14°24'	443.37'	9.64'	N 78°37'29" E	9.64'
C17	47°35'09"	50.00'	4.60'	S 69°49'31" E	4.60'
C18	48°42'52"	50.00'	4.54'	S 77°01'21" E	4.56'
C19	30°00'00"	25.00'	39.27'	S 14°43'22" E	35.36'
C20	26°58'52"	50.00'	23.81'	N 64°03'32" E	24.92'
C21	10°34'44"	25.00'	30.77'	N 89°00'04" E	28.67'
C22	4°35'06"	225.00'	18.00'	S 27°59'05" W	18.00'
C23	10°11'58"	225.00'	40.05'	S 20°35'33" W	40.00'
C24	1°23'43"	225.00'	45.08'	S 08°45'34" W	45.00'
C25	10°11'58"	225.00'	40.05'	S 0°05'06" E	40.00'
C26	10°11'58"	225.00'	40.05'	S 17°07'04" E	40.00'
C27	1°23'43"	225.00'	45.08'	S 20°10'21" E	45.00'
C28	10°11'58"	225.00'	40.05'	S 32°57'44" E	40.00'
C29	10°11'58"	225.00'	40.05'	S 43°09'42" E	40.00'
C30	1°00'00"	225.00'	0.00'	S 49°00'00" E	0.00'
C31	5°20'03"	550.00'	32.00'	S 52°00'47" E	32.00'
C32	4°09'31"	550.00'	39.92'	S 55°45'34" E	39.91'
C33	9°11'51"	550.00'	49.73'	S 60°25'56" E	49.72'
C34	9°11'51"	550.00'	49.73'	S 69°57'09" E	49.77'
C35	4°09'31"	550.00'	39.92'	S 70°17'30" E	39.91'
C36	4°09'31"	550.00'	39.92'	S 74°47'01" E	39.91'
C37	4°13'50"	550.00'	44.78'	S 80°42'21" E	44.78'
C38	4°09'31"	550.00'	39.92'	S 83°16'30" E	39.91'
C39	4°09'31"	550.00'	39.92'	S 87°26'02" E	39.91'
C40	4°09'31"	550.00'	39.92'	N 88°24'29" E	39.91'
C41	4°09'31"	550.00'	39.92'	N 84°14'56" E	39.91'
C42	4°09'31"	550.00'	39.92'	N 80°05'25" E	39.91'
C43	1°33'00"	550.00'	33.93'	N 80°44'59" E	33.91'
C44	2°34'39"	170.00'	68.50'	S 74°38'11" E	87.50'
C45	13°32'02"	220.00'	51.97'	N 82°47'00" W	51.85'
C46	2°01'01"	500.00'	17.64'	N 79°59'01" E	17.64'
C47	18°49'14"	50.00'	103.63'	N 54°25'23" E	86.08'
C48	18°25'58"	443.37'	15.01'	N 88°57'50" E	150.23'
C49	15°56'53"	50.00'	15.91'	N 84°41'49" E	15.91'
C50	37°52'52"	300.00'	203.36'	N 49°25'34" E	189.35'
C51	0°44'16"	443.37'	5.74'	N 77°38'09" E	5.74'
C52	15°14'09"	459.84'	106.23'	N 2°20'37" E	105.99'

LOT AREA TABLE

LOT	AREA	SO. FT. ACRES
1	16.473	0.35
2	17.673	0.35
3	18.673	0.35
4	19.673	0.35
5	20.673	0.35
6	21.673	0.35
7	22.673	0.35
8	23.673	0.35
9	24.673	0.35
10	25.673	0.35
11	26.673	0.35
12	27.673	0.35
13	28.673	0.35
14	29.673	0.35
15	30.673	0.35
16	31.673	0.35
17	32.673	0.35
18	33.673	0.35
19	34.673	0.35
20	35.673	0.35
21	36.673	0.35
22	37.673	0.35
23	38.673	0.35
24	39.673	0.35
25	40.673	0.35
26	41.673	0.35
27	42.673	0.35
28	43.673	0.35
29	44.673	0.35
30	45.673	0.35
31	46.673	0.35
32	47.673	0.35
33	48.673	0.35
34	49.673	0.35
35	50.673	0.35
36	51.673	0.35
37	52.673	0.35
38	53.673	0.35
39	54.673	0.35
40	55.673	0.35
41	56.673	0.35
42	57.673	0.35
43	58.673	0.35
44	59.673	0.35
45	60.673	0.35
46	61.673	0.35
47	62.673	0.35
48	63.673	0.35
49	64.673	0.35
50	65.673	0.35
51	66.673	0.35
52	67.673	0.35

LINE TABLE

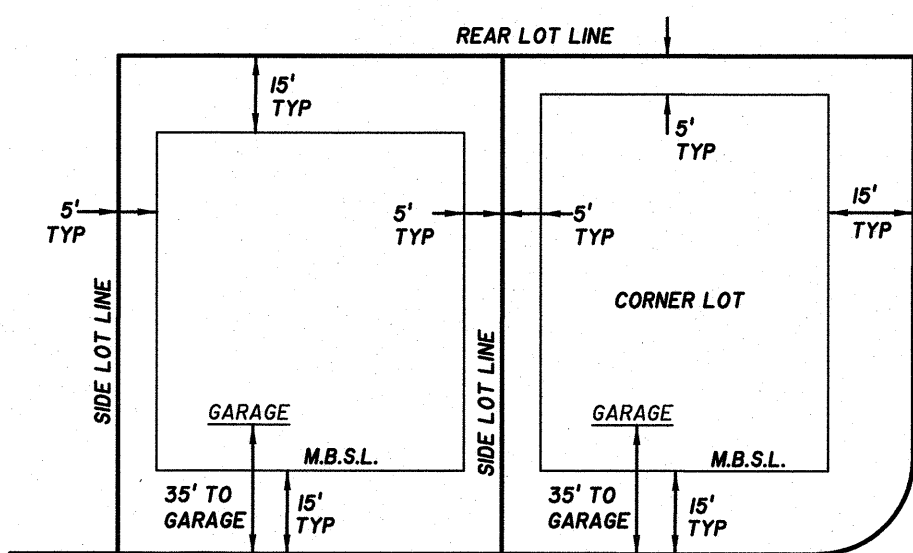
LINE	BEARING	DISTANCE
L1	S 08°06'55" W	16.38'
L2	S 0°48'24" W	57.41'
L3	S 08°56'51" E	67.80'
L4	S 83°04'03" W	26.00'
L5	S 06°55'57" E	50.00'
L6	N 83°04'03" W	32.51'
L7	S 06°45'57" E	76.07'
L8	S 20°14'48" E	55.73'
L9	S 23°00'27" E	45.67'
L10	S 23°24'46" E	47.89'
L11	S 27°59'31" E	41.99'
L12	S 32°30'21" E	24.96'
L13	S 70°40'25" W	36.68'
L14	S 83°10'15" W	21.44'
L15	N 59°43'22" W	30.34'
L16	S 18°59'02" W	25.31'
L17	N 1°23'44" W	24.97'
L18	S 85°00'46" W	26.12'
L19	N 50°16'56" E	34.33'

OPEN SPACE AREA TABLE

AREA	SO. FT. ACRES
OPEN SPACE A	54.04
OPEN SPACE B	132.609
OPEN SPACE C	1.057
OPEN SPACE D	30.337
OPEN SPACE E	53.963

RIGHT-OF-WAY AREA TABLE

AREA	SO. FT. ACRES
RIGHT-OF-WAY	84.541



TYPICAL MINIMUM BUILDING SETBACKS
N.T.S.

OWNER/DEVELOPER:
BLAIR ROAD, LLC
572 SAVANNAH HWY.
CHARLESTON, SC 29407

LAND DATA:
ZONING: PDR
52 LOTS ON 15.69± ACRES

BUILDING SETBACKS:
FRONT: 15'
SIDE: 5'
REAR: 15'

DEED REFERENCE:

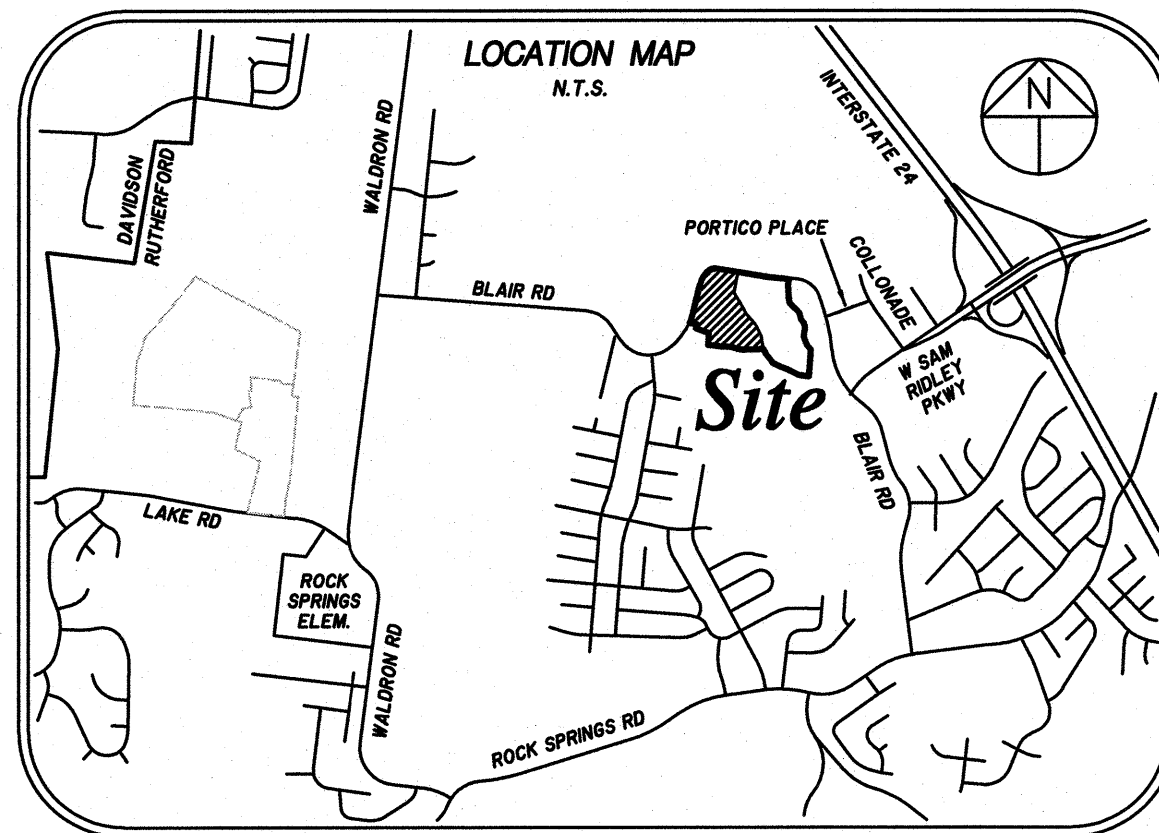
TAX MAP 29, PARCEL 20.04
RECORD BOOK 1655, PAGE 1199

REVISED COMMON AREA:
TAX MAP 29N, GROUP "A", PARCEL 1.01
&
TAX MAP 29N, GROUP "A", PARCEL 15.01

PLAT BOOK _____, PAGE _____

TIME OF RECORDING: _____

DATE OF RECORDING: _____



CERTIFICATE OF OWNERSHIP AND DEDICATION

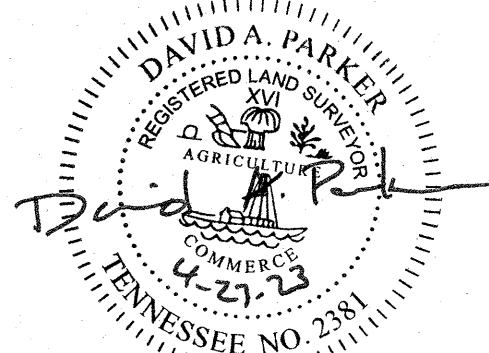
I (WE) HEREBY CERTIFY THAT I AM (WE ARE) THE OWNER(S) OF THE PROPERTY SHOWN AND DESCRIBED HEREON AS EVIDENCED IN BOOK NUMBER 1655, PAGE 1199, RUTHERFORD COUNTY, TENNESSEE, AND THAT I (WE) HEREBY ADOPT THIS PLAN OF SUBDIVISION WITH MY (OUR) FREE CONSENT ESTABLISH THE MINIMUM BUILDING RESTRICTION LINES AND THAT OFFERS OR IRREVOCABLE DEDICATION FOR ALL PUBLIC WAYS, UTILITIES, AND OTHER FACILITIES HAVE BEEN FILED.

DATE: 4-27-23
DEED REFERENCE: TAX MAP 29, PARCEL 20.04
TAX MAP 29N, GROUP "A", PARCEL 1.01
TAX MAP 29N, GROUP "A", PARCEL 15.01
RECORD BOOK 1655, PAGE 1199
NAME: BRIAN KERNAN, LAND DEVELOPMENT MANAGER
BLAIR ROAD, LLC
A TENNESSEE LIMITED LIABILITY COMPANY

CERTIFICATE OF ACCURACY

I HEREBY CERTIFY THAT TO THE BEST OF MY KNOWLEDGE AND BELIEF THAT THIS IS A TRUE AND ACCURATE SURVEY OF THE PROPERTY SHOWN HEREON; THAT THIS SURVEY MEETS OR EXCEEDS THE MINIMUM REQUIREMENTS OF AN URBAN LAND SURVEY, CATEGORY "1", AS PER STANDARDS OF PRACTICE ADOPTED BY THE BOARD OF EXAMINERS FOR LAND SURVEYORS FOR THE STATE OF TENNESSEE, AND THAT THE RATIO OF PRECISION IS GREATER THAN 1:10,000.

DATE: 4-27-23
TENN. R.L.S. NO. 2381
NAME: David A. Parker
REGISTERED LAND SURVEYOR



CERTIFICATE OF APPROVAL OF WATER SYSTEM

I HEREBY CERTIFY THAT THE WATER SYSTEM(S) OUTLINED OR INDICATED ON THE FINAL SUBDIVISION PLAT ENTITLED "PORTICO PLACE SECTION 2, PHASE 2" HAS/HAVE BEEN INSTALLED IN ACCORDANCE WITH CURRENT LOCAL AND STATE GOVERNMENT REQUIREMENTS, OR A SUFFICIENT BOND OR OTHER SURETY HAS BEEN FILED TO GUARANTEE SAID INSTALLATION.

DATE: _____ NAME: _____
AUTHORIZED APPROVING AGENT

CERTIFICATE OF APPROVAL OF SEWER SYSTEM

I HEREBY CERTIFY THAT THE SEWER SYSTEMS OUTLINED OR INDICATED ON THE SUBDIVISION FINAL PLAT ENTITLED "PORTICO PLACE SECTION 2, PHASE 2" HAVE BEEN INSTALLED IN ACCORDANCE WITH CURRENT LOCAL AND STATE GOVERNMENT REQUIREMENTS, OR A SUFFICIENT BOND OR OTHER SURETY HAS BEEN FILED TO GUARANTEE SAID INSTALLATION.

DATE: _____ NAME: _____
AUTHORIZED APPROVING AGENT

CERTIFICATE OF APPROVAL OF PUBLIC WAYS FOR BOND POSTING

I HEREBY CERTIFY (1) THAT ALL DESIGNATED PUBLIC WAYS ON THIS FINAL SUBDIVISION PLAT HAVE BEEN INSTALLED IN AN ACCEPTABLE MANNER AND ACCORDING TO THE SPECIFICATIONS OF THE LAVERGNE SUBDIVISION REGULATIONS, OR (2) THAT A PERFORMANCE BOND OR OTHER SURETY HAS BEEN POSTED WITH THE PLANNING COMMISSION TO GUARANTEE COMPLETION OF ALL REQUIRED IMPROVEMENTS IN CASE OF DEFAULT.

DATE: _____ NAME: _____
AUTHORIZED APPROVING AGENT

CERTIFICATE OF APPROVAL FOR RECORDING

I HEREBY CERTIFY THAT THE SUBDIVISION PLAT SHOWN HEREON HAS BEEN FOUND TO COMPLY WITH THE LAVERGNE SUBDIVISION REGULATIONS, WITH THE EXCEPTION OF SUCH VARIANCES, IF ANY, AS ARE NOTED IN THE MINUTES OF THE PLANNING COMMISSION, AND THAT IT HAS BEEN APPROVED FOR RECORDING IN THE OFFICE OF THE COUNTY REGISTER.

DATE: _____ NAME: _____
SECRETARY, PLANNING COMMISSION

FINAL PLAT

SECTION 2, PHASE 2 AND RESUBDIVISION OF COMMON AREAS A & B OF SECTION 2, PHASE 1 PORTICO PLACE SUBDIVISION

CITY OF LAVERGNE, TENNESSEE
3rd CIVIL DISTRICT, RUTHERFORD COUNTY

SEC, Inc. SITE ENGINEERING CONSULTANTS
ENGINEERING • SURVEYING • LAND PLANNING

850 MIDDLE TENNESSEE BLVD • MURFREESBORO, TENNESSEE 37129
PHONE (615) 890-7901 • FAX (615) 895-2567

PROJ. # 17024
DATE: 4-26-23
REV: 1
FILE: 17024 - PPSEC2PH2
FINALPLAT
DRAWN BY: AT
SCALE: 1" = 100'
SHEET 1 OF 3

MAP 29, PARCEL 21.01
SUNTRUST, TRUSTEE
R.B. 1307, PG. 2295
ZONED R-4

MAP 29, PARCEL 21.00
LMP, LLC
R.B. 106, PG. 2478
ZONED R-4

BENCHMARK
R.R. SPIKE IN POWER POLE
ELEV. 700.57
(NAVD 88)

MAP 32, PARCEL 8.00
LARRY J. GIBBONS
R.B. 573, PG. 2635
ZONED R-1

LEGEND

- IRON PIN (FOUND)
- IRON PIN SET (NEW)
- CONC. MONUMENT (FOUND)
- WATER LINE w/FIRE HYD. & BLOW OFF VALVE
- SEWER LINE w/MANHOLE

BLAIR ROAD (LOCAL) (R/W VARIES)

S 80°17'34" E 297.06'

C48

(104.19)

COMMON AREA "A"

54,042 SQ. FT.
1.241 AC.

EXISTING PARCEL
LINE TO BE
ABANDONED WITH
THE RECORDING OF
THIS PLAT

TOP OF BANK

60' STREAM BUFFER

UNNAMED TERRITORY TO ROCK SPRINGS BRANCH

TOP OF BANK

60' STREAM BUFFER

UNNAMED TERRITORY TO ROCK SPRINGS BRANCH

TOP OF BANK

60' STREAM BUFFER

UNNAMED TERRITORY TO ROCK SPRINGS BRANCH

TOP OF BANK

60' STREAM BUFFER

UNNAMED TERRITORY TO ROCK SPRINGS BRANCH

TOP OF BANK

60' STREAM BUFFER

UNNAMED TERRITORY TO ROCK SPRINGS BRANCH

TOP OF BANK

60' STREAM BUFFER

UNNAMED TERRITORY TO ROCK SPRINGS BRANCH

TOP OF BANK

60' STREAM BUFFER

UNNAMED TERRITORY TO ROCK SPRINGS BRANCH

TOP OF BANK

60' STREAM BUFFER

UNNAMED TERRITORY TO ROCK SPRINGS BRANCH

TOP OF BANK

60' STREAM BUFFER

UNNAMED TERRITORY TO ROCK SPRINGS BRANCH

TOP OF BANK

60' STREAM BUFFER

UNNAMED TERRITORY TO ROCK SPRINGS BRANCH

TOP OF BANK

60' STREAM BUFFER

UNNAMED TERRITORY TO ROCK SPRINGS BRANCH

TOP OF BANK

60' STREAM BUFFER

UNNAMED TERRITORY TO ROCK SPRINGS BRANCH

TOP OF BANK

60' STREAM BUFFER

UNNAMED TERRITORY TO ROCK SPRINGS BRANCH

TOP OF BANK

60' STREAM BUFFER

UNNAMED TERRITORY TO ROCK SPRINGS BRANCH

TOP OF BANK

60' STREAM BUFFER

UNNAMED TERRITORY TO ROCK SPRINGS BRANCH

TOP OF BANK

60' STREAM BUFFER

UNNAMED TERRITORY TO ROCK SPRINGS BRANCH

TOP OF BANK

60' STREAM BUFFER

UNNAMED TERRITORY TO ROCK SPRINGS BRANCH

TOP OF BANK

60' STREAM BUFFER

UNNAMED TERRITORY TO ROCK SPRINGS BRANCH

TOP OF BANK

60' STREAM BUFFER

UNNAMED TERRITORY TO ROCK SPRINGS BRANCH

TOP OF BANK

60' STREAM BUFFER

UNNAMED TERRITORY TO ROCK SPRINGS BRANCH

TOP OF BANK

60' STREAM BUFFER

UNNAMED TERRITORY TO ROCK SPRINGS BRANCH

TOP OF BANK

60' STREAM BUFFER

UNNAMED TERRITORY TO ROCK SPRINGS BRANCH

TOP OF BANK

60' STREAM BUFFER

UNNAMED TERRITORY TO ROCK SPRINGS BRANCH

TOP OF BANK

60' STREAM BUFFER

UNNAMED TERRITORY TO ROCK SPRINGS BRANCH

TOP OF BANK

60' STREAM BUFFER

UNNAMED TERRITORY TO ROCK SPRINGS BRANCH

TOP OF BANK

60' STREAM BUFFER

UNNAMED TERRITORY TO ROCK SPRINGS BRANCH

TOP OF BANK

60' STREAM BUFFER

UNNAMED TERRITORY TO ROCK SPRINGS BRANCH

TOP OF BANK

60' STREAM BUFFER

UNNAMED TERRITORY TO ROCK SPRINGS BRANCH

TOP OF BANK

60' STREAM BUFFER

UNNAMED TERRITORY TO ROCK SPRINGS BRANCH

CURVE DATA

CURVE	DELTA	RADIUS	ARC LENGTH	CHD BEARING	CHD LENGTH
C1	6°45'43"	500.00'	59.01'	S 79°52'49" W	58.97'
C2	6°45'43"	500.00'	59.01'	S 86°38'34" W	58.97'
C3	6°45'43"	500.00'	59.01'	S 86°38'34" W	58.97'
C4	6°45'43"	500.00'	59.01'	N 80°12'07" W	52.56'
C5	6°45'43"	500.00'	59.01'	N 74°10'33" W	52.56'
C6	6°45'43"	500.00'	59.01'	N 67°46'58" W	52.56'
C7	6°45'43"	500.00'	59.01'	N 67°46'58" W	52.56'
C8	6°45'43"	500.00'	59.01'	N 55°21'42" W	52.56'
C9	6°45'43"	500.00'	59.01'	N 55°21'42" W	52.56'
C10	6°45'43"	500.00'	59.01'	N 55°21'42" W	52.56'
C11	6°45'43"	500.00'	59.01'	N 55°21'42" W	52.56'
C12	6°45'43"	500.00'	59.01'	N 55°21'42" W	52.56'
C13	6°45'43"	500.00'	59.01'	N 55°21'42" W	52.56'
C14	6°45'43"	500.00'	59.01'	N 55°21'42" W	52.56'
C15	6°45'43"	500.00'	59.01'	N 55°21'42" W	52.56'
C16	6°45'43"	500.00'	59.01'	N 55°21'42" W	52.56'
C17	6°45'43"	500.00'	59.01'	N 55°21'42" W	52.56'
C18	6°45'43"	500.00'	59.01'	N 55°21'42" W	52.56'
C19	6°45'43"	500.00'	59.01'	N 55°21'42" W	52.56'
C20	6°45'43"	500.00'	59.01'	N 55°21'42" W	52.56'
C21	6°45'43"	500.00'	59.01'	N 55°21'42" W	52.56'
C22	6°45'43"	500.00'	59.01'	N 55°21'42" W	52.56'
C23	6°45'43"	500.00'	59.01'	N 55°21'42" W	52.56'
C24	6°45'43"	500.00'	59.01'	N 55°21'42" W	52.56'
C25	6°45'43"	500.00'	59.01'	N 55°21'42" W	52.56'
C26	6°45'43"	500.00'	59.01'	N 55°21'42" W	52.56'
C27	6°45'43"	500.00'	59.01'	N 55°21'42" W	52.56'
C28	6°45'43"	500.00'	59.01'	N 55°21'42" W	52.56'
C29	6°45'43"	500.00'	59.01'	N 55°21'42" W	52.56'
C30	6°45'43"	500.00'	59.01'	N 55°21'42" W	52.56'
C31	6°45'43"	500.00'	59.01'	N 55°21'42" W	52.56'
C32	6°45'43"	500.00'	59.01'	N 55°21'42" W	52.56'
C33	6°45'43"	500.00'	59.01'	N 55°21'42" W	52.56'
C34	6°45'43"	500.00'	59.01'	N 55°21'42" W	52.56'
C35	6°45'43"	500.00'	59.01'	N 55°21'42" W	52.56'
C36	6°45'43"	500.00'	59.01'	N 55°21'42" W	52.56'
C37	6°45'43"	500.00'	59.01'	N 55°21'42" W	52.56'
C38	6°45'43"	500.00'	59.01'	N 55°21'42" W	52.56'
C39	6°45'43"	500.00'	59.01'	N 55°21'42" W	52.56'
C40	6°45'43"	500.00'	59.01'	N 55°21'42" W	52.56'
C41	6°45'43"	500.00'	59.01'	N 55°21'42" W	52.56'
C42	6°45'43"	500.00'	59.01'	N 55°21'42" W	52.56'
C43	6°45'43"	500.00'	59.01'	N 55°21'42" W	52.56'
C44	6°45'43"	500.00'	59.01'	N 55°21'42" W	52.56'
C45	6°45'43"	500.00'	59.01'	N 55°21'42" W	52.56'
C46	6°45'43"	500.00'	59.01'	N 55°21'42" W	52.56'
C47	6°45'43"	500.00'	59.01'	N 55°21'42" W	52.56'
C48	6°45'43"	500.00'	59.01'	N 55°21'42" W	52.56'
C49	6°45'43"	500.00'	59.01'	N 55°21'42" W	52.56'
C50	6°45'43"	500.00'	59.01'	N 55°21'42" W	52.56'
C51	6°45'43"	500.00'	59.01'	N 55°21'42" W	52.56'
C52	6°45'43"	500.00'	59.01'	N 55°21'42" W	52.56'

LOT AREA TABLE

AREA	SQ. FT.	ACRES
L1	5,473.03	0.125
L2	5,473.03	0.125
L3	5,473.03	0.125
L4	5,473.03	0.125
L5	5,473.03	0.125
L6	5,473.03	0.125
L7	5,473.03	0.125
L8	5,473.03	0.125
L9	5,473.03	0.125
L10	5,473.03	0.125
L11	5,473.03	0.125
L12	5,473.03	0.125
L13	5,473.03	0.125
L14	5,473.03	0.125
L15	5,473.03	0.125
L16	5,473.03	0.125
L17	5,473.03	0.125
L18	5,473.03	0.125
L19	5,473.03	0.125
L20	5,473.03	0.125
L21	5,473.03	0.125
L22	5,473.03	0.125
L23	5,473.03	0.125
L24	5,473.03	0.125
L25	5,473.03	0.125
L26	5,473.03	0.125
L27	5,473.03	0.125
L28	5,473.03	0.125
L29	5,473.03	0.125
L30	5,473.03	0.125
L31	5,473.03	0.125
L32	5,473.03	0.125
L33	5,473.03	0.125
L34	5,473.03	0.125
L35	5,473.03	0.125
L36	5,473.03	0.125
L37	5,473.03	0.125
L38	5,473.03	0.125
L39	5,473.03	0.125
L40	5,473.03	0.125
L41	5,473.03	0.125
L42	5,473.03	0.125
L43	5,473.03	0.125
L44	5,473.03	0.125
L45	5,473.03	0.125
L46	5,473.03	0.125
L47	5,473.03	0.125
L48	5,473.03	0.125
L49	5,473.03	0.125
L50	5,473.03	0.125
L51	5,473.03	0.125
L52	5,473.03	0.125
L53	5,473.03	0.125
L54	5,473.03	0.125
L55	5,473.03	0.125
L56	5,473.03	0.125
L57	5,473.03	0.125
L58	5,473.03	0.125
L59	5,473.03	0.125
L60	5,473.03	0.125
L61	5,473.03	0.125
L62	5,473.03	0.125
L63	5,473.03	0.125
L64	5,473.03	0.125
L65	5,473.03	0.125
L66	5,473.03	0.125
L67	5,473.03	0.125
L68	5,473.03	0.125
L69	5,473.03	0.125
L70	5,473.03	0.125
L71	5,473.03	0.125
L72	5,473.03	0.125
L73	5,473.03	0.125
L74	5,473.03	0.125
L75	5,473.03	0.125
L76	5,473.03	0.125
L77	5,473.03	0.125
L78	5,473.03	0.125
L79	5,473.03	0.125
L80	5,473.03	0.125
L81	5,473.03	0.125
L82	5,473.03	0.125
L83	5,473.03	0.125
L84	5,473.03	0.125
L85	5,473.03	0.125
L86	5,473.03	0.125
L87	5,473.03	0.125
L88	5,473.03	0.125
L89	5,473.03	0.125
L90	5,473.03	0.125
L91	5,473.03	0.125
L92	5,473.03	0.125
L93	5,473.03	0.125
L94	5,473.03	0.125
L95	5,473.03	0.125
L96	5,473.03	0.125
L97	5,473.03	0.125
L98	5,473.03	0.125
L99	5,473.03	0.125
L100	5,473.03	0.125

LINE TABLE

LINE	BEARING	DISTANCE
L1	S 0°06'55" W	16.39'
L2	S 0°48'24" W	57.41'
L3	S 0°55'57" E	67.80'
L4	S 83°04'03" W	56.50'
L5	S 08°55'57" E	50.00'
L6	N 83°04'03" E	32.51'
L7	S 06°55'57" E	76.07'
L8	S 22°14'46" E	55.73'
L9	S 25°02'27" E	49.67'
L10	S 29°24'42" E	47.89'
L11	S 29°59'51" E	41.92'
L12	S 15°31'21" E	24.86'
L13	S 76°40'26" W	32.88'
L14	S 83°04'03" W	21.44'
L15	N 59°43'22" W	50.34'
L16	S 13°59'02" W	28.31'
L17	N 12°23'44" W	24.37'
L18	S 85°00'46" E	25.02'
L19	N 30°16'58" E	34.39'

OPEN SPACE AREA TABLE

EN SPACE	AREA	SQ. FEET	ACRES
EN SPACE A	34,042	1.24	
EN SPACE B	132,609	3.04	



Item #: 10.

Item Title: Final Plat – Tidal Wave Addition to La Vergne Plat No. 2 – Two Commercial Lots on 3.86 Acres. Requested by Gonzalez-Strength & Associates. Property located at Murfreesboro Road and Fergus Road (Tax Map 18, Parcel 1.04). C-2 (Highway Service) Zoning District. Property owned by TWAS Properties, LLC.

Reviewed By:

Location:

(Insert map here)

Summary: The applicant wishes to create an additional building lot to the north of the newly opened car wash. The property is all zoned C-2.

Staff Comments / Technical Items:

Planning

Bo Logan - 615-287-8702
blogan@lavergnen.gov

1. Tax Map and Parcel Number MUST appear on the plat.

Jake Blair - 615-287-8702
jblair@lavergnen.gov

Engineering

Gary Lide - 615-28-8703
glide@lavergnen.gov

No comments

Utilities

Scott Tatalovich - 615-287-8739 (Technical items go here)
statalovich@lavergnen.gov

Codes

Randolph Salyers - 615-287-8605
rsalyers@lavergn.net

Fire

Curtis Brinkley - 615-405-5931 No Comment
cbrinkley@lavergn.net

Police

JJ Eubank - 615-287-8613 (Technical items go here)
jeubank@lavergn.net

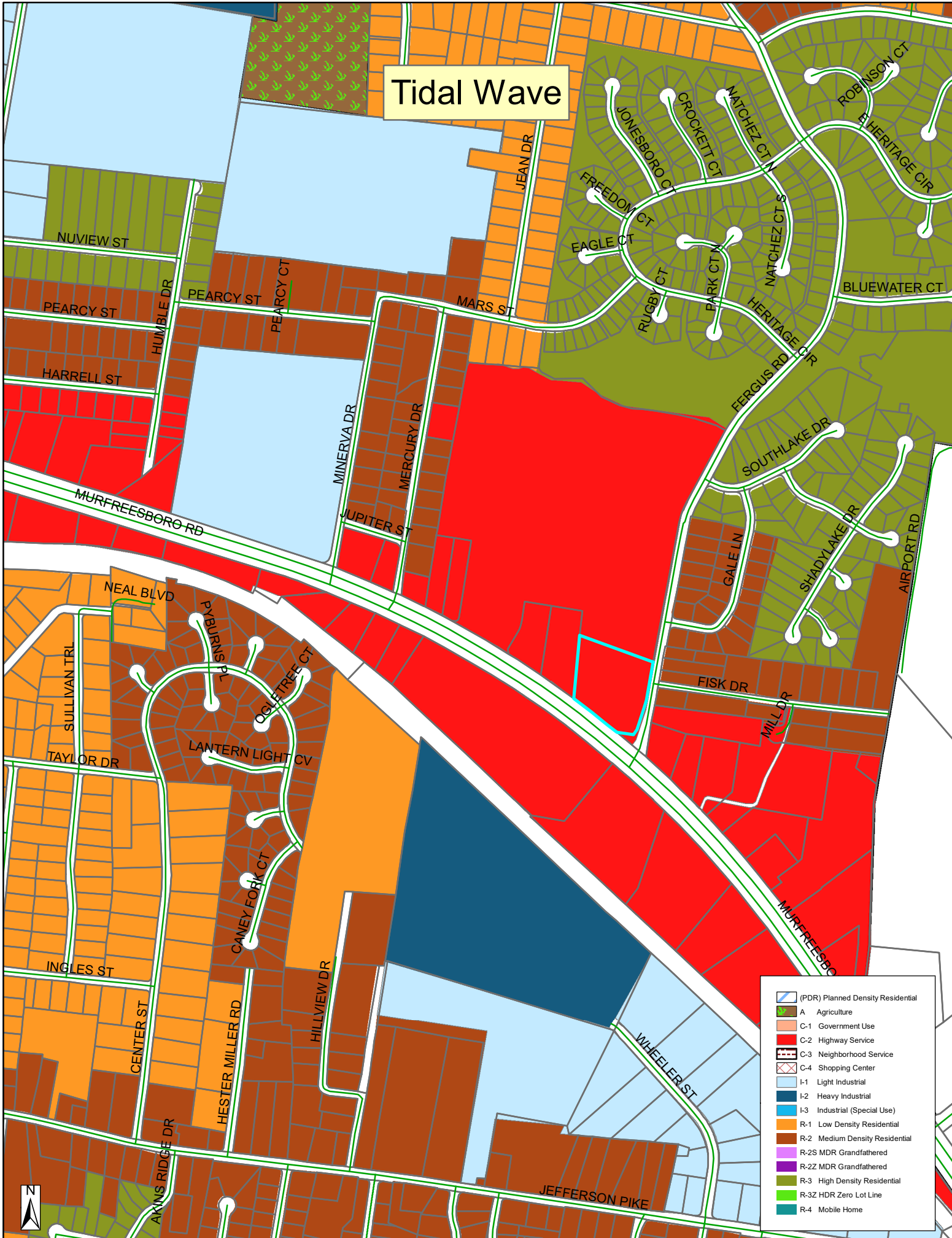
***Note:** The above technical items may not be the only corrections and/or issues needing to be resolved to get approval from the planning commission. New items can be brought up at the workshop and staff can add items at any time that might have been overlooked. It is the applicant's responsibility to make sure that all technical items are addressed and that no new issues exist before the planning commission meeting. Addressing all technical items does not constitute approval. It is the planning commission's decision whether an item passes or fails. Revised plans are due to staff by the following Monday at close of business unless other arrangements are made and documented.

Tidal Wave





Tidal Wave



NOTES

- All easements and rights of way of which the surveyor has knowledge are shown hereon; others may exist of which the surveyor has no knowledge and of which there is no observable evidence.
- According to the Flood Insurance Rate Map (FIRM) for Rutherford County, Tennessee (community-panel number 47149C0020J, dated October 16, 2008), a portion of the subject property lies within Zone X, defined as "areas determined to be outside the 0.2% annual chance floodplain" and a portion of the subject property lies within Special Flood Hazard Areas Subject To Inundation By The 1% Annual Chance Flood, defined as "The 1% annual chance flood (100 year flood), also known as the base flood, is the flood that has a 1% chance of being equaled or exceeded in any given year. The Special Flood Hazard Area is the area subject to flooding by the 1% annual chance flood. Areas of Special Flood Hazard includes Zones A, AE, AH, AO, AR, A99, V and VE. The Base Flood Elevation is the water-surface elevation of the 1% annual chance flood.
- North arrow and bearings shown hereon are based on Conic Projection - Tennessee - NAD 83 adjusted 2011 and derived by using NGS OPUS Solutions.
- Equipment used to collect the survey data was a Trimble S6 Series Robotic total station and a Trimble TSC3 tablet Data Collector.
- GPS equipment used to establish control on site was a Trimble R12 GR5 GPS receiver.
- 95% of the project was located using conventional robotic total station, only the survey control was set with GPS equipment.
- Locations generated using Real Time Kinematic (RTK) vectors had a Root Mean Square (RMS) of no more than 0.04' horizontal.
- Distances shown hereon are ground distances.

LEGEND

- IFF IRON PIN FOUND
- IPS IRON PIN SET (5/8" REBAR w/CAP)
- CONCRETE MONUMENT FOUND
- + CROSS FOUND
- CALCULATED POINT

GPS NOTES FOR SITE CONTROL

POSITION ACCURACY: 95% CONFIDENCE LEVEL
TYPE OF GPS FIELD PROCEDURE: STATIC
DATES OF SURVEY: 11/03/2021
DATUM/EPOCH: NAD 83
(2011)/EPOCH-2010.00
PUBLISHED/FIXED-CONTROL USE: OPUS GPS
GEOID MODEL: 2018
COMBINED GRID FACTOR(S): 0.99993065
COMBINED SCALE FACTOR CALCULATED USING CARLSON SOFTWARE.

ABBREVIATIONS

P.O.C.	POINT OF COMMENCEMENT	(D2)	REAL BOOK 528, PAGE 715
P.O.B.	POINT OF BEGINNING	R.R.	RAILROAD
(M)	MEASURED	EL.	ELEVATION
(C)	CALCULATED	B.L.D.G.	BUILDING
(D)	DEED BOOK 1343, PAGE 2792		
(S)	SURVEY PERFORMED BY HIDDLESTON-STEEL ENGINEERING DATED OCTOBER 2014		

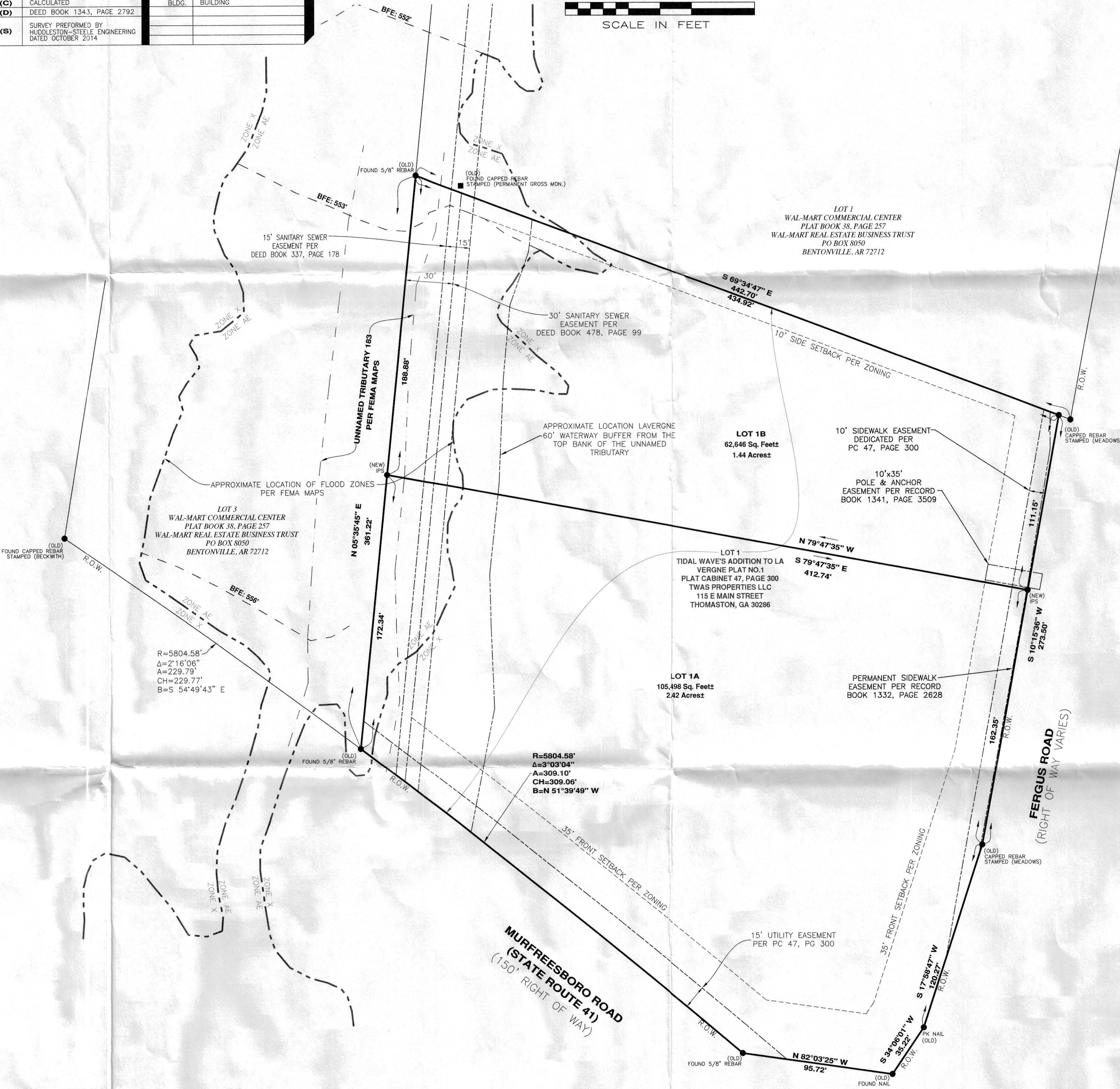
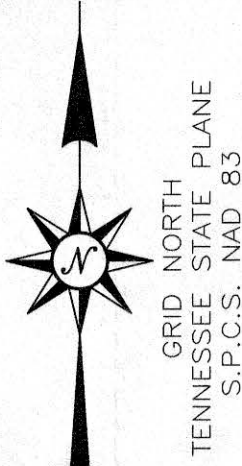
CURRENT ZONING

ZONING: C-2

BUILDING SETBACK REQUIREMENTS:

FRONT: 35 FEET
REAR: 20 FEET
SIDE: 10 FEET

0' 40' 80' 120'
SCALE IN FEET



CERTIFICATE OF OWNERSHIP AND DEDICATION

I (we) hereby verify that I am (we are) the owner(s) of the property shown and described hereon as evidenced in Book Number 2189, Page 2032, County Registers Office, and I (we) hereby adopt this plan of subdivision with my (our) free consent, establish the minimum building restriction lines, and that offers or irrevocable dedication for all public ways, utilities, and other facilities have been filed.

TWAS PROPERTIES LLC

OWNER:

DATE:

TITLE (IF ACTING FOR PARTNERSHIP OR CORPORATION)

CERTIFICATE OF SURVEY ACCURACY

I (we) hereby certify that to the best of my (our) knowledge and belief this is a true and accurate survey of the property shown hereon; that this is a Category 1 Land Survey as defined in Title 62, Chapter 18, Tennessee Code Annotated, and that the ratio of precision is greater than or equal to 1: 24,802.

Derek S. Meadows

Tennessee, Reg. No. 2839
Gonzalez-Strength & Associates, Inc.

Dated: 4/28/23

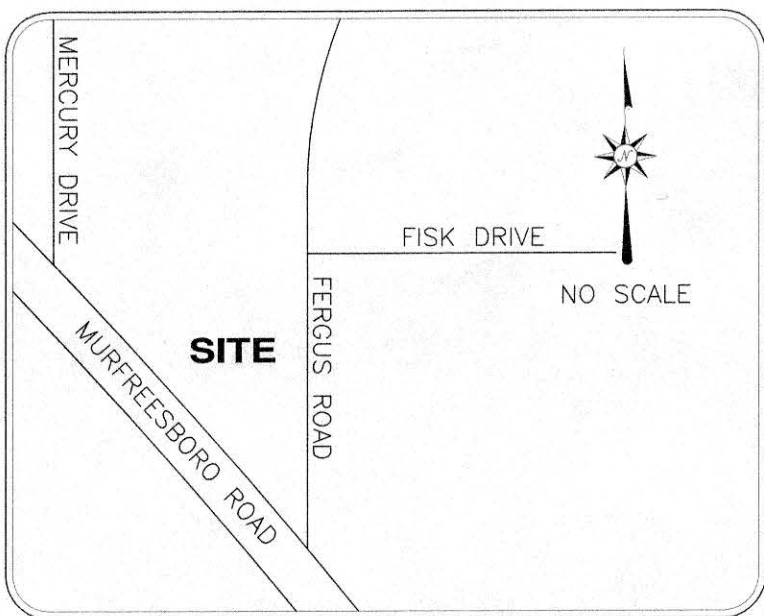
CERTIFICATE OF APPROVAL FOR RECORDING

I hereby certify that the subdivisions plat shown hereon has been found to comply with the La Vergne Subdivision Regulations, with the exception of such variances, if any, as are noted in the minutes of the planning commission, and that it has been approved for recording in the Office of the County Register.

SECRETARY, PLANNING COMMISSION

Dated: _____

VICINITY MAP



Tennessee 811
Know what's below
Call before you dig.
Dial 811
Or Call 800-351-1111

ALL PARTS OF THIS SURVEY AND DRAWING HAVE BEEN COMPLETED IN ACCORDANCE WITH THE CURRENT REQUIREMENTS OF THE STANDARDS OF PRACTICE FOR SURVEYING IN THE STATE OF TENNESSEE.

PLAT REFERENCE

OWNER: TWAS PROPERTIES LLC
DEED: Deed Book 2189, Page 2032

PROPERTY MAP REFERENCE

SUBJECT SITE MAY BE IDENTIFIED AS PARCEL NUMBER R0007815 ON RUTHERFORD COUNTY TAX MAP.

MINOR SUBDIVISION

PURPOSE OF THIS PLAT IS TO CREATE 2 LOTS FROM 1 EXISTING LOT FOR COMMERCIAL DEVELOPMENT.

TIDAL WAVE'S ADDITION TO LA VERGNE PLAT NO. 2

Being a survey of Lot 1 Tidal Wave's Addition to La Vergne Plat No.1 as recorded in Plat Cabinet 47, Page 300 and being situated in the 2nd Civil District in the Town of La Vergne, County of Rutherford, State of Tennessee and being recorded in Deed Book 2189, Page 2032 in the Register's Office for Rutherford County, Tennessee.

Prepared by:

GSA
GONZALEZ - STRENGTH & ASSOCIATES, INC.
ENGINEERING, LAND PLANNING, & SURVEYING
1550 WOODS OF RIVERCHASE DRIVE - SUITE 200
HOOVER, ALABAMA 35244
PHONE: (205) 942-2486
FAX: (205) 942-3033
Gonzalez-Strength.com

APRIL 2023

JOB #22-0113



Item #: 11.

Item Title: Preliminary Plat – Arbor Ridge, Sections 4, 5, 9A & 10 – 227 Lots on Approximately 86 Acres. Requested by SEC, Inc. Property located on Waldron Road and Blair Road (Tax Map 32, Parcel 4). PDR (Planned Density Residential) Zoning District. Property owned by Starlight Homes Tennessee, LLC.

Reviewed By:

Location:

(Insert map here)

Summary:

Staff Comments / Technical Items:

Planning

Bo Logan - 615-287-8702

blogan@laveragnetn.gov

(Technical items go here)

Jake Blair - 615-287-8702

jblair@laveragnetn.gov

Engineering

Gary Lide - 615-28-8703

glide@laveragnetn.gov

1. (Cover Sheet) The drawings provided do not constitute Construction Drawings. Remove “& Construction Drawings” from the title.
2. (All drawings) Per SubRegs 3-102.2/8, culverts, driveway tiles, and associated drainage structures must be shown and sized. None have been shown. Please provide the required drainage system to the drawings.
3. Per SubRegs 3-101.1/13, sufficient hydraulic calculations must be provided with the Concept Plan to demonstrate that the design storms

required in the Stormwater Management Ordinance (2-, 10-, 25-, 50-, 100-year/24 hour) can be handled with the proposed detention system. Please provide those calculations now.

4. (All drawings) Provide contour labeling.
5. Lots 144, 145, 167, 168, 169, 170, 436, 443, 463, 464, and 465 are critical lots. Please mark them with an asterisk.
6. (C1.0) Please provide more detailed information for culvert crossing between Section 3 and 4 including with which section the permanent culvert is intended to be constructed.
7. (All drawings) please confirm if the design intent is for electrical and gas utilities to be in the right-of-way.
8. Per SubRegs 3-102.2/24, please provide landscaping plans.
9. Per SubRegs 3-102.2/25, please show slopes with between 12-20% slopes with general soil types. And separately show slopes 20% and greater.
10. Per SubRegs 3-102.2/27, please show and explain drainage easements required.

Utilities

Scott Tatalovich - 615-287-8739 (Technical items go here)
statalovich@lavergnnetn.gov

Codes

Randolph Salyers - 615-287-8605
rsalyers@lavergnnetn.gov

Fire

Curtis Brinkley - 615-405-5931 No Comment
cbrinkley@lavergnnetn.gov

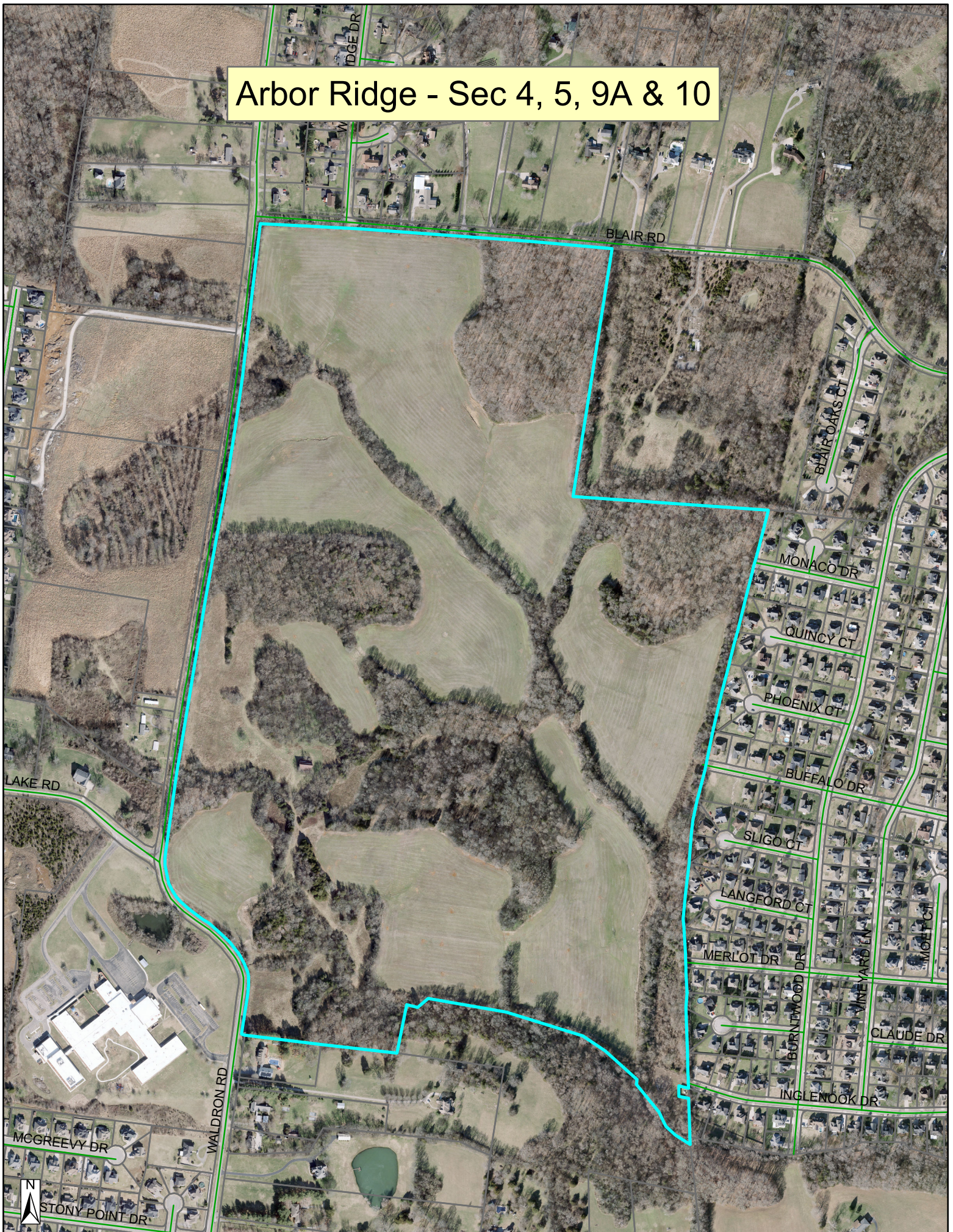
Police

JJ Eubank - 615-287-8613 (Technical items go here)
jeubank@lavergnnetn.gov

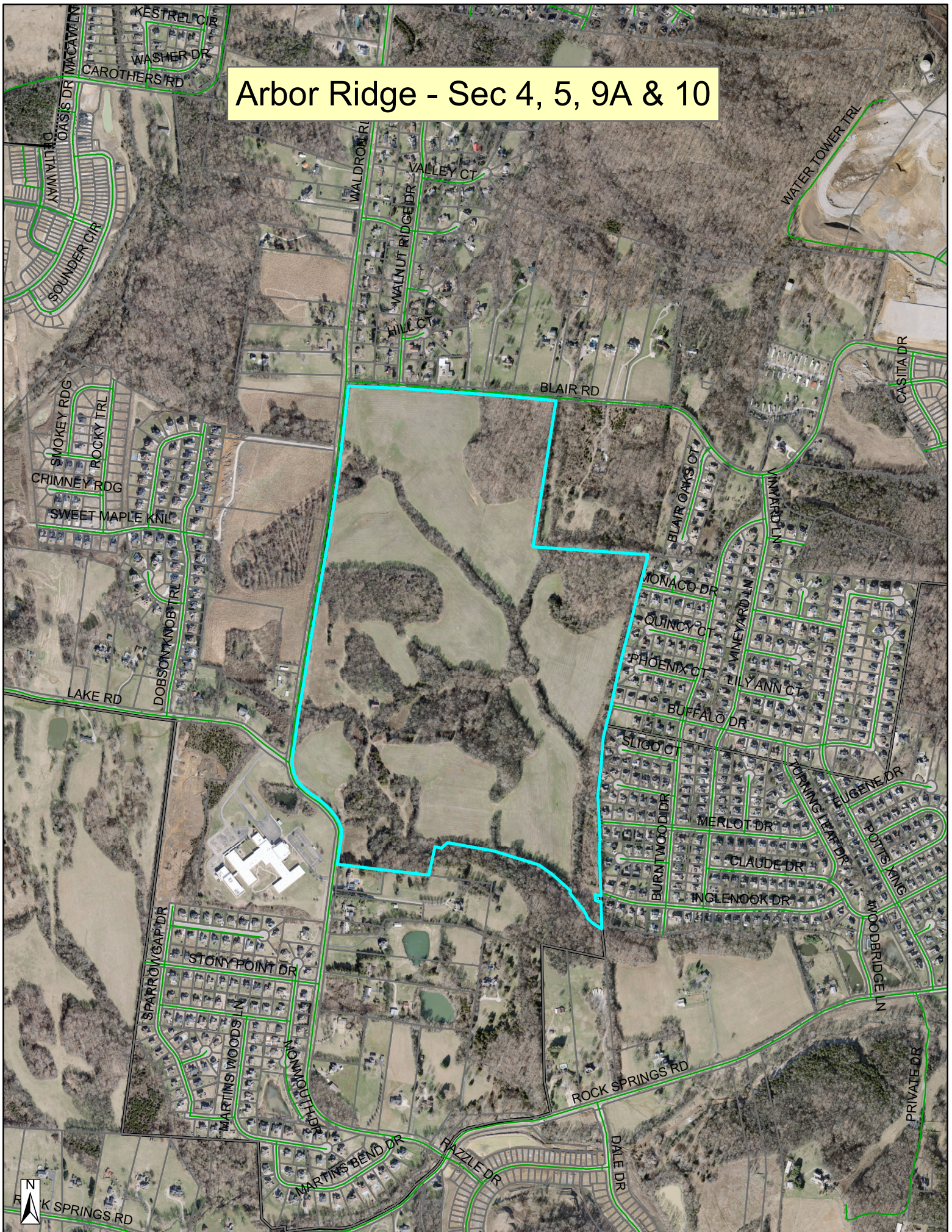
***Note:** The above technical items may not be the only corrections and/or issues needing to be resolved to get approval from the planning commission. New items can be brought up at the workshop and staff can add items at any time that might have been overlooked. It is the applicant's responsibility to make sure that all technical items are addressed and that no new issues exist before the planning commission meeting. Addressing all technical items does not constitute approval. It is the planning commission's decision whether an item passes

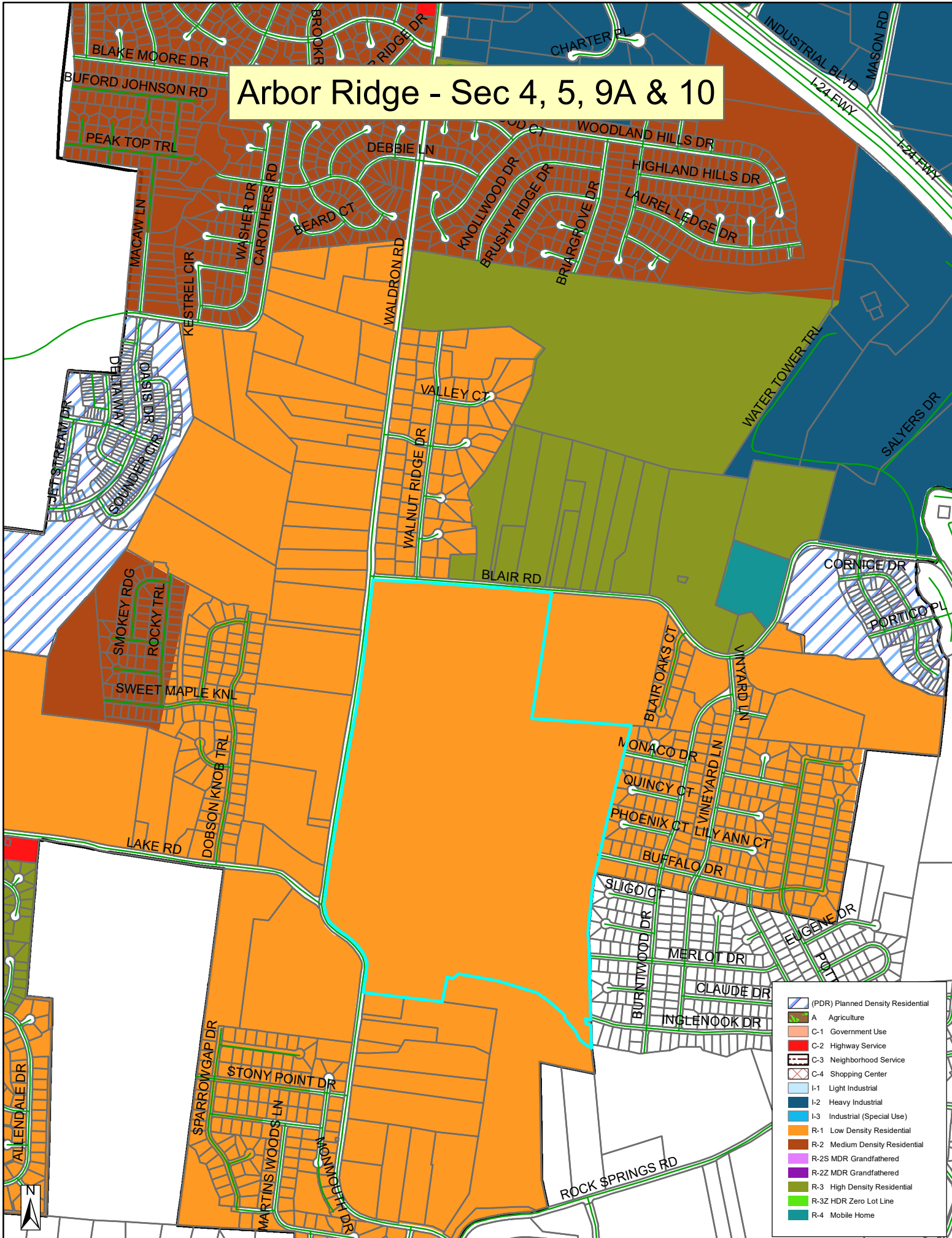
or fails. Revised plans are due to staff by the following Monday at close of business unless other arrangements are made and documented.

Arbor Ridge - Sec 4, 5, 9A & 10



Arbor Ridge - Sec 4, 5, 9A & 10





Arbor Ridge - Sec 4, 5, 9A & 10

- (PDR) Planned Density Residential
- A Agriculture
- C-1 Government Use
- C-2 Highway Service
- C-3 Neighborhood Service
- C-4 Shopping Center
- I-1 Light Industrial
- I-2 Heavy Industrial
- I-3 Industrial (Special Use)
- R-1 Low Density Residential
- R-2 Medium Density Residential
- R-2S MDR Grandfathered
- R-2Z MDR Grandfathered
- R-3 High Density Residential
- R-3Z HDR Zero Lot Line
- R-4 Mobile Home

Arbor Ridge

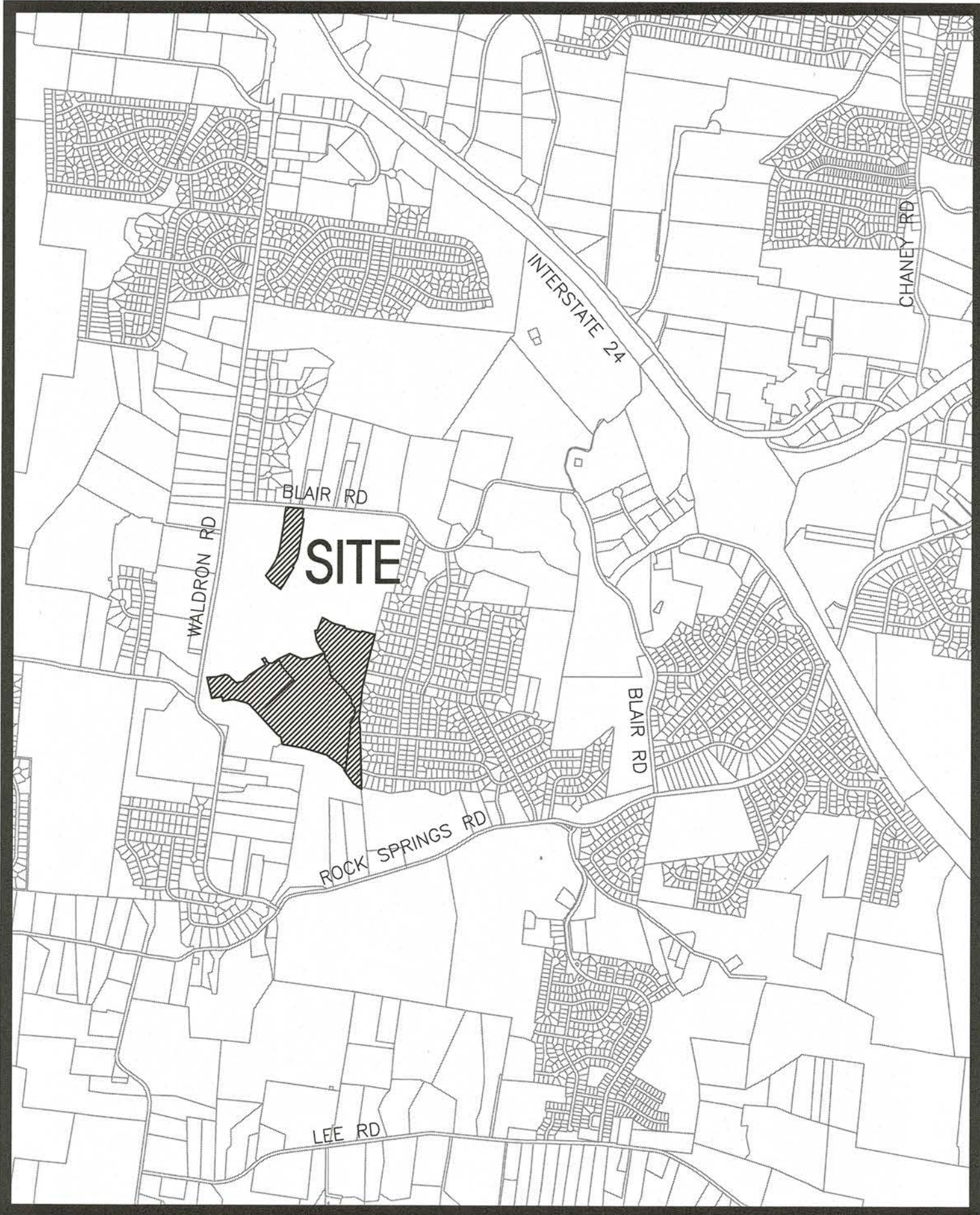
Section 4, 5, 9A, & 10

La Vergne, Tennessee

Preliminary Plat & Construction Drawings

Drawing Index

Sheet No.	Title
C0.0	Cover Sheet
C0.2	Master Plan
C1.0-1.8	Preliminary Plat



Site Location Map
Not To Scale

Owner/Developer:
Starlight Homes Tennessee LLC
99 E. Main St, Suite 200
Franklin, TN 37064
Contact: Christian Macari

Floodplain Note:
This site lies within Zone X, areas determined to be outside the 0.2% annual chance flood plain. FEMA FIRM map #47149C0105H, Dated Jan. 5, 2007.

Deed Reference:
Tax Map 32, Parcel 4.00
Zoning: PDR (Planned Density Residential)
Section 4: 46 Lots on 9.10± Acres
Section 5: 32 Lots on 13.85± Acres
Section 9A: 44 Lots on 22.86± Acres
Swction 10: 105 Lots on 39.28± Acres
Min. Lot Size = 41' Wide; 5,740 Sq.Ft. Minimum

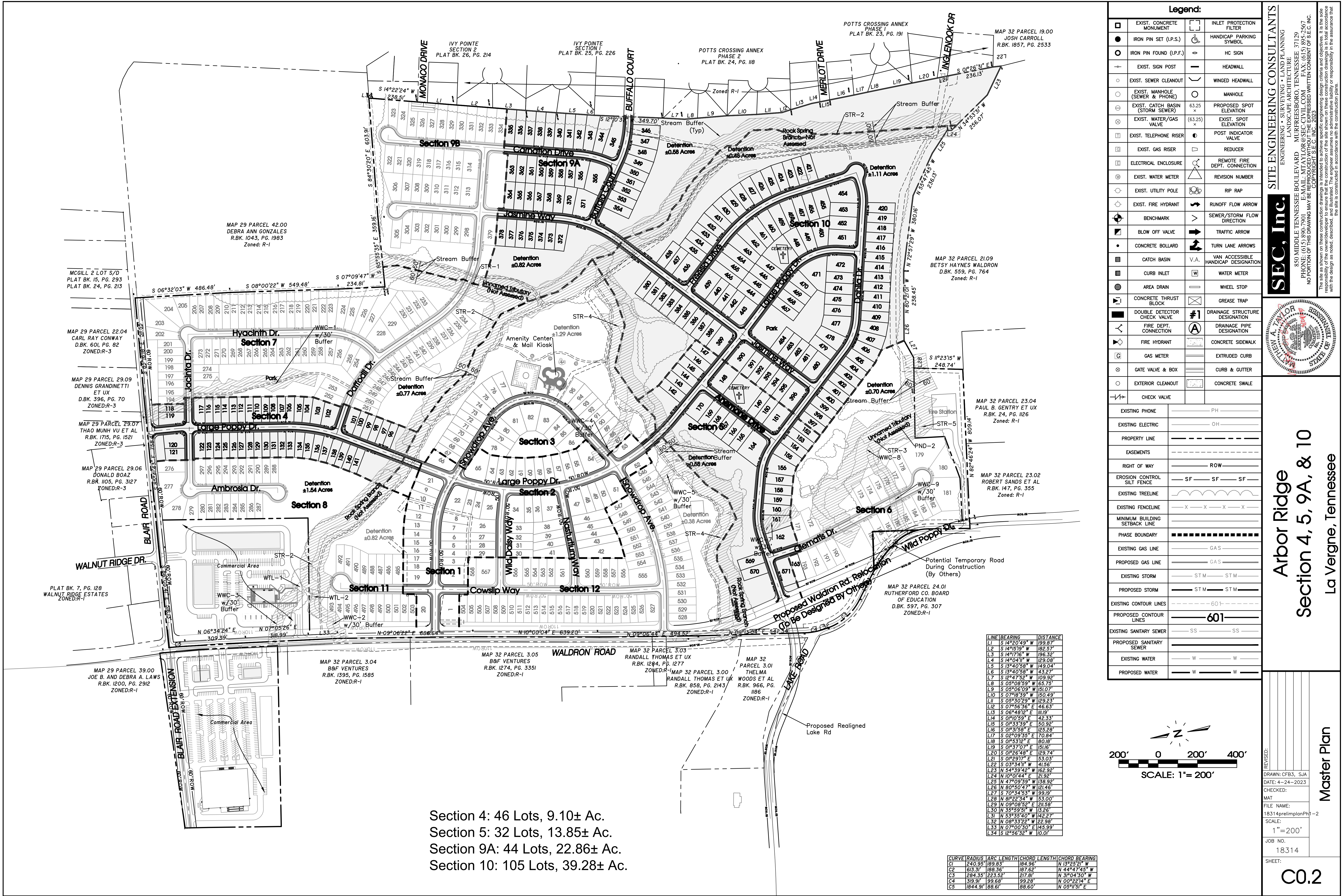
SEC, Inc. SITE ENGINEERING CONSULTANTS
ENGINEERING • SURVEYING • LAND PLANNING
LANDSCAPE ARCHITECTURE
850 MIDDLE TENNESSEE BOULEVARD MURFREESBORO, TENNESSEE 37129
PHONE: (615) 890-7901 E-MAIL: MTAYLOR@SEC-CIVIL.COM FAX: (615) 895-2567
NO PORTION OF THIS DRAWING MAY BE REPRODUCED WITHOUT THE EXPRESSED WRITTEN CONSENT OF S.E.C. INC.
COPYRIGHT SEC, INC. 2023

By: Matthew A. Taylor Date: April 24, 2023
Matthew A. Taylor, P.E. TN. Reg. #112515



Watershed: East Branch Hurricane Creek (Not Supporting)
5-yr, 24-hr EPSC Storm Event

Sheet C0.0
Arbor Ridge
Section 4, 5, 9A, & 10
Preliminary Plat & Construction Drawings
S.E.C. Project #18314
Date: 4-24-2023
Revised:



SEC, Inc.

ENGINEERING • SURVEYING • LAND PLANNING

LANDSCAPE ARCHITECTURE

850 MIDDLE TENNESSEE BOULEVARD
MURFREESBORO, TENNESSEE 37129
PHONE: (615) 890-7901 E-MAIL: MTAYLOR@SEC-CIVIL.COM FAX: (615) 895-2567
NO PORTION OF THIS DRAWING MAY BE REPRODUCED WITHOUT THE EXPRESSED WRITTEN CONSENT OF SEC, INC.
COPYRIGHT SEC, INC., 2023

THIS DRAWING IS THE PROPERTY OF SEC, INC. AND IS NOT TO BE REPRODUCED OR TRANSMITTED IN ANY FORM OR BY ANY MEANS, ELECTRONIC OR MECHANICAL, WITHOUT THE WRITTEN PERMISSION OF SEC, INC. THE ENGINEER ASSUMES NO ADMINISTRATIVE LIABILITY OR RESPONSIBILITY IN TOTAL ACCORDANCE WITH THE DESIGN AS NOTED, DESCRIBED, AND ILLUSTRATED. THE ENGINEER ASSUMES NO ADMINISTRATIVE LIABILITY OR RESPONSIBILITY IN TOTAL ACCORDANCE WITH THE DESIGN AS NOTED, DESCRIBED, AND ILLUSTRATED.

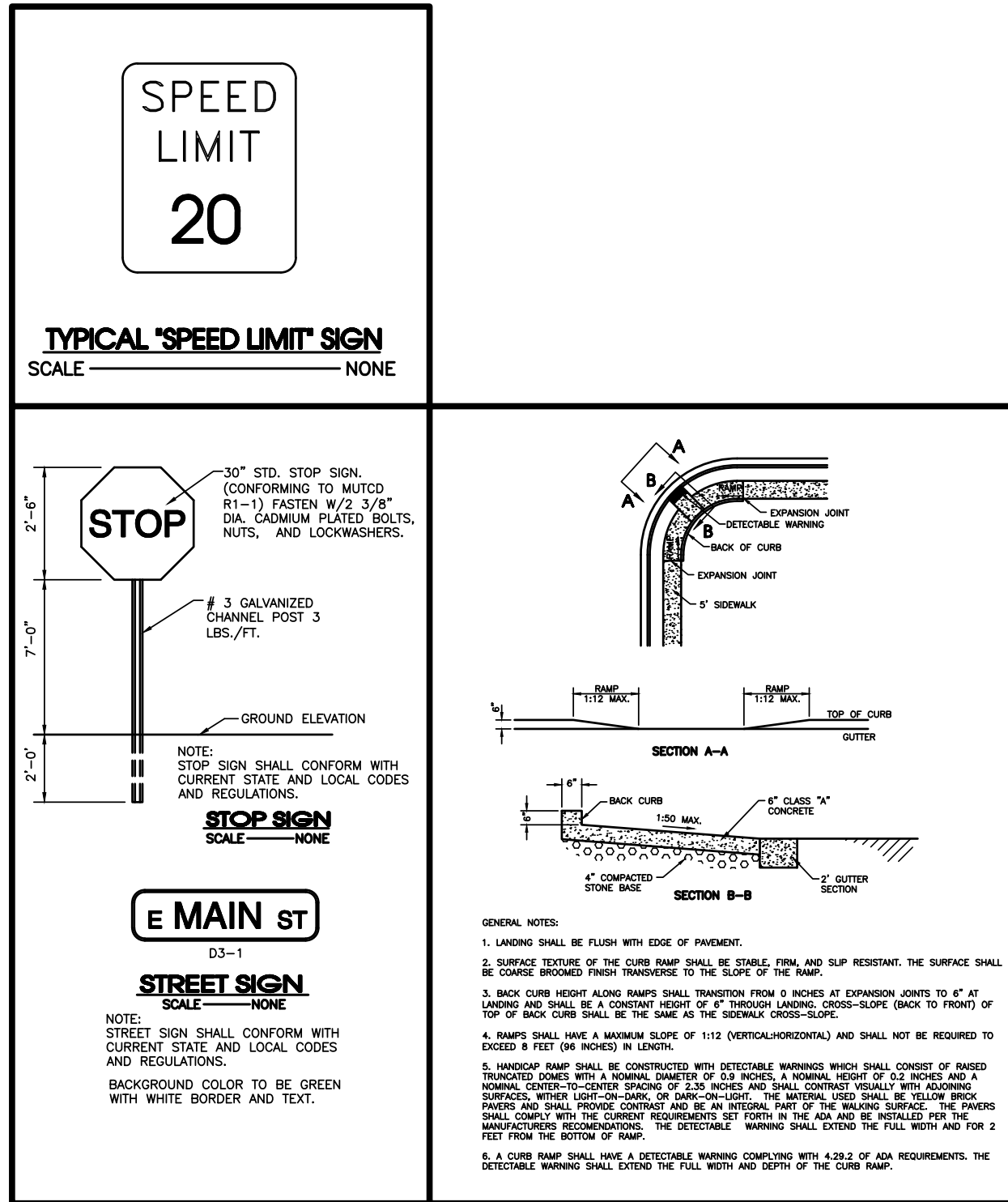
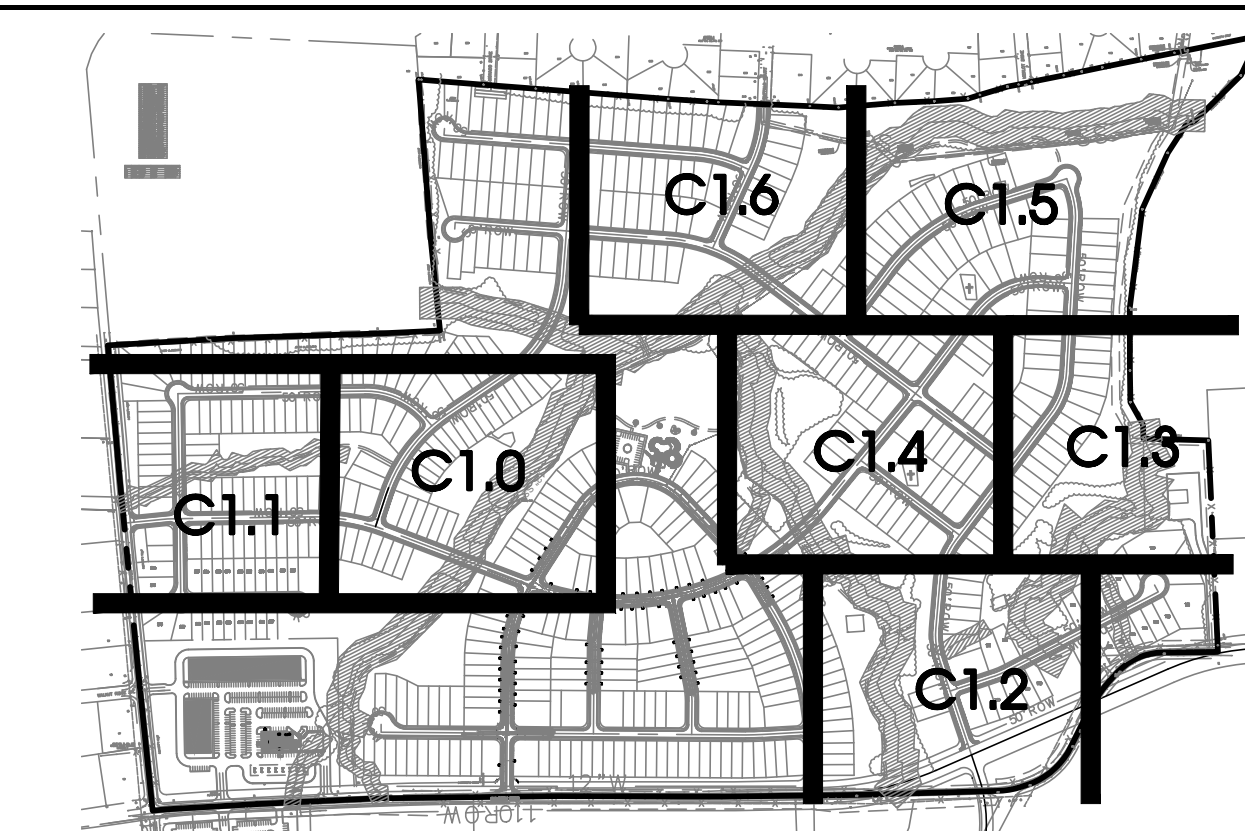
Arbor Ridge

Section 4, 5, 9A, & 10

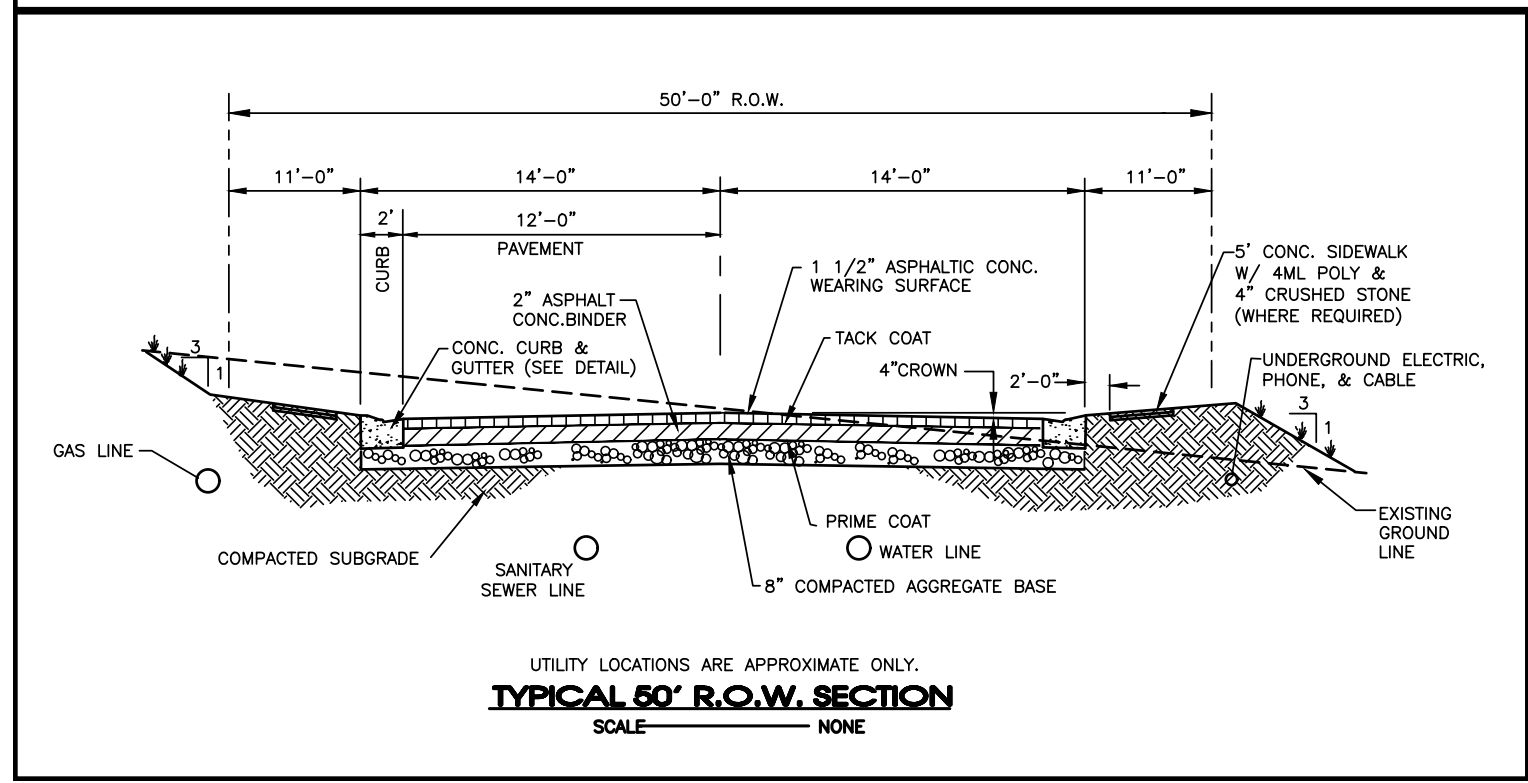
La Vergne, Tennessee

Master Plan

C0.2



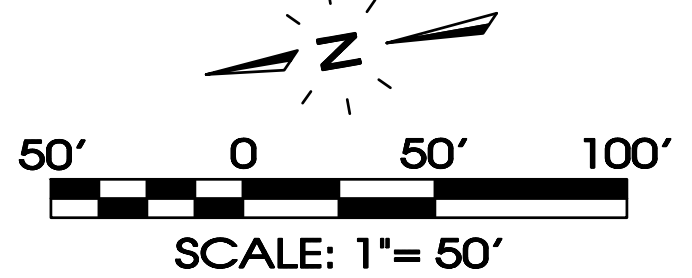
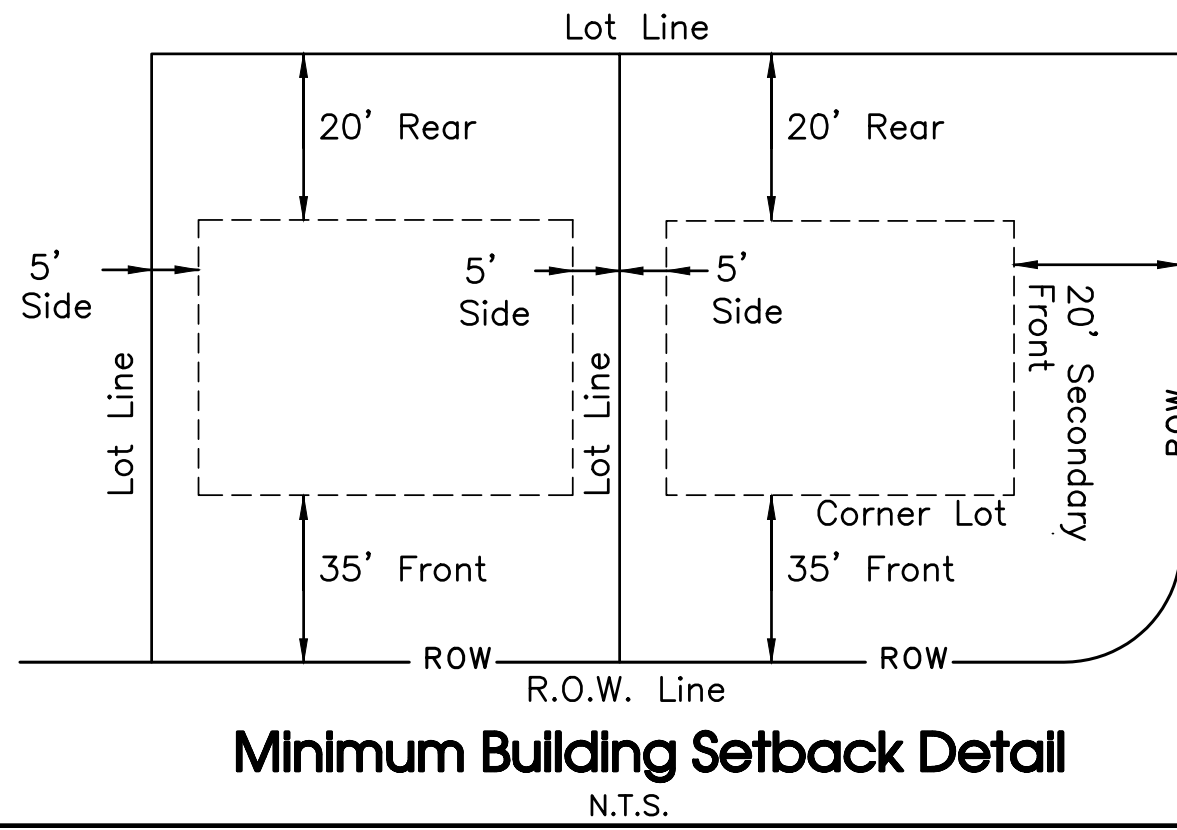
- GENERAL NOTES
1. THE PURPOSE OF THIS PRELIMINARY PLAT IS TO CREATE 95 SINGLE FAMILY LOTS.
SECTION 4: 46 LOTS
SECTION 5: 32 LOTS
SECTION 9A: 44 LOTS
SECTION 10: 105 LOTS
 2. BEARING SYSTEM IS BASED ON TENNESSEE STATE PLANE COORDINATES TIED TO RUTHERFORD COUNTY CONTROL POINT RCC-011 (NAD 83-96).
 3. THIS PROPERTY LIES WITHIN ZONE X, PER FEMA FIRM MAPS FOR RUTHERFORD COUNTY, MAP NO. 47149C0105H, EFFECTIVE DATE: JANUARY 5, 2007.
 4. PARCELS MAY BE SUBJECT TO ADDITIONAL ESMT'S AND/OR RESTRICTIONS, BY RECORD OR PRESCRIPTION, THAT A COMPLETE TITLE SEARCH MAY REVEAL.
 5. PROPERTY IS ZONED PDR (PLANNED DENSITY RESIDENTIAL). MINIMUM SETBACK REQUIREMENTS ARE: FRONT=35' FT. - SIDE=5' FT. - REAR=20' FT.
 6. ALL CRITICAL LOTS (WITH 15% SLOPES OR GREATER), ARE DENOTED WITH AN ASTERISK. ENGINEERED PLOT PLANS ARE REQUIRED FOR THESE LOTS PRIOR TO OBTAINING A BUILDING PERMIT.
 7. ALL COMMON AREAS SHALL BE OWNED AND MAINTAINED BY THE HOMEOWNERS ASSOCIATION.
 8. DEVELOPER IS RESPONSIBLE FOR THE INSTALLATION OF STREET LIGHTS. STREET LIGHTS SHALL BE LOCATED NO MORE THAN 300 FEET APART.
 9. NO MORE THAN 500 LINEAR FEET TOTAL OF TRENCHING WILL BE ALLOWED TO BE OPEN AT ONE TIME. (ALL UTILITIES & STORM DRAINS).



Note: Developer Is Responsible For The Installation Of Street Lights. Street Lights Shall Be Located No More Than 300 Feet Apart.

The proposed electrical, gas, water and telecommunications information shown hereon is not an actual design to be used for construction, and is for reference and illustrative purposes only. The contractor shall refer to the actual final design for each proper discipline (electrical, civil, mechanical, etc.) with the Tennessee professional engineer's seal, for precise design information

- Electrical Legend
- TRANSFORMER 36"x40"
 - MANHOLE
 - STREET LIGHT
 - SWITCHER
 - PRIMARY PULLBOX
 - SECONDARY PULLBOX 24" x 36"
 - CONDUIT-SEE NOTE
 - 3 PH Sector Cabinet



Legend:			
☐	EXIST. CONCRETE MONUMENT		BENCHMARK
☒	IRON PIN SET (I.P.S.)		HANDICAP PARKING SYMBOL
☐	IRON PIN FOUND (I.P.F.)	V.A.	VAN ACCESSIBLE HANDICAP DESIGNATION
	EXIST. SIGN POST		HC SIGN
☐	EXIST. SEWER CLEANOUT		PROPOSED SIGN POST
	EXIST. MANHOLE (SEWER & PHONE)		CONCRETE BOLLARD
	EXIST. CATCH BASIN (STORM SEWER)		WHEEL STOP
	EXIST. WATER/GAS VALVE		CONCRETE SIDEWALK
	EXIST. TELEPHONE RISER		EXTRUDED CURB
	EXIST. GAS RISER		CURB & GUTTER
	ELECTRICAL ENCLOSURE		TRAFFIC ARROW
	EXIST. WATER METER		TURN LANE ARROWS
☐	EXIST. UTILITY POLE		REVISION NUMBER
	EXIST. FIRE HYDRANT		DRAINAGE STRUCTURE DESIGNATION
	POST INDICATOR VALVE		DRAINAGE PIPE DESIGNATION
	BLOW OFF VALVE		RIP RAP
	REDUCER		RUNOFF FLOW ARROW
	REMOTE FIRE DEPT. CONNECTION		INLET FILTER PROTECTION
	CONCRETE THRUST BLOCK	63.25 x	PROPOSED SPOT ELEVATION
	DOUBLE DETECTOR CHECK VALVE	(63.25) x	EXIST. SPOT ELEVATION
	FIRE DEPT. CONNECTION		SEWER/STORM FLOW DIRECTION
	FIRE HYDRANT		CATCH BASIN
	GATE VALVE & BOX		CURB INLET
	WATER METER		AREA DRAIN
	GAS METER		HEADWALL
	GREASE TRAP		WINGED HEADWALL
☐	EXTERIOR CLEANOUT ECO		CONCRETE SWALE
☐	MANHOLE		TYPE- X- HEADWALL

Owner/Developer:
Starlight Homes Tennessee LLC
99 E. Main St. Suite 200
Franklin, TN 37064
Contact: Christian Macari

Floodplain Note:
This site lies within Zone X, areas determined to be outside the 0.2% annual chance flood plain. FEMA FIRM map #47149C0105H, Dated Jan. 5, 2007.

Deed Reference:
Tax Map 32, Parcel 4.00
Zoning: PDR (Planned Density Residential)
Section 4: 46 Lots on 9.10± Acres
Section 5: 32 Lots on 13.85± Acres
Section 9A: 44 Lots on 22.86± Acres
Section 10: 105 Lots on 39.28± Acres
Min. Lot Size = 41' Wide; 5,740 Sq.Ft. Minimum

SEC, Inc.

ENGINEERING • SURVEYING • LAND PLANNING

LANDSCAPE ARCHITECTURE

850 MIDDLE TENNESSEE BOULEVARD
MURFREESBORO, TENNESSEE 37129
E-MAIL: MTAYLOR@SEC-CIVIL.COM F.A.X: (615) 895-2567
PHONE: (615) 890-7901
NO PORTION OF THIS DRAWING MAY BE REPRODUCED WITHOUT THE EXPRESSED WRITTEN CONSENT OF S.E.C. INC.
COPYRIGHT SEC, INC., 2023

STATE OF TENNESSEE

REGISTERED PROFESSIONAL ENGINEER

LANDSCAPE ARCHITECT

NO. 10000

EXPIRATION DATE 12/31/2024

Arbor Ridge
Section 4, 5, 9A, & 10
La Vergne, Tennessee

PREPARED BY

DATE: 4-24-2023

CHECKED BY

FILE NAME:

18314prelimplanPh-2

SCALE:

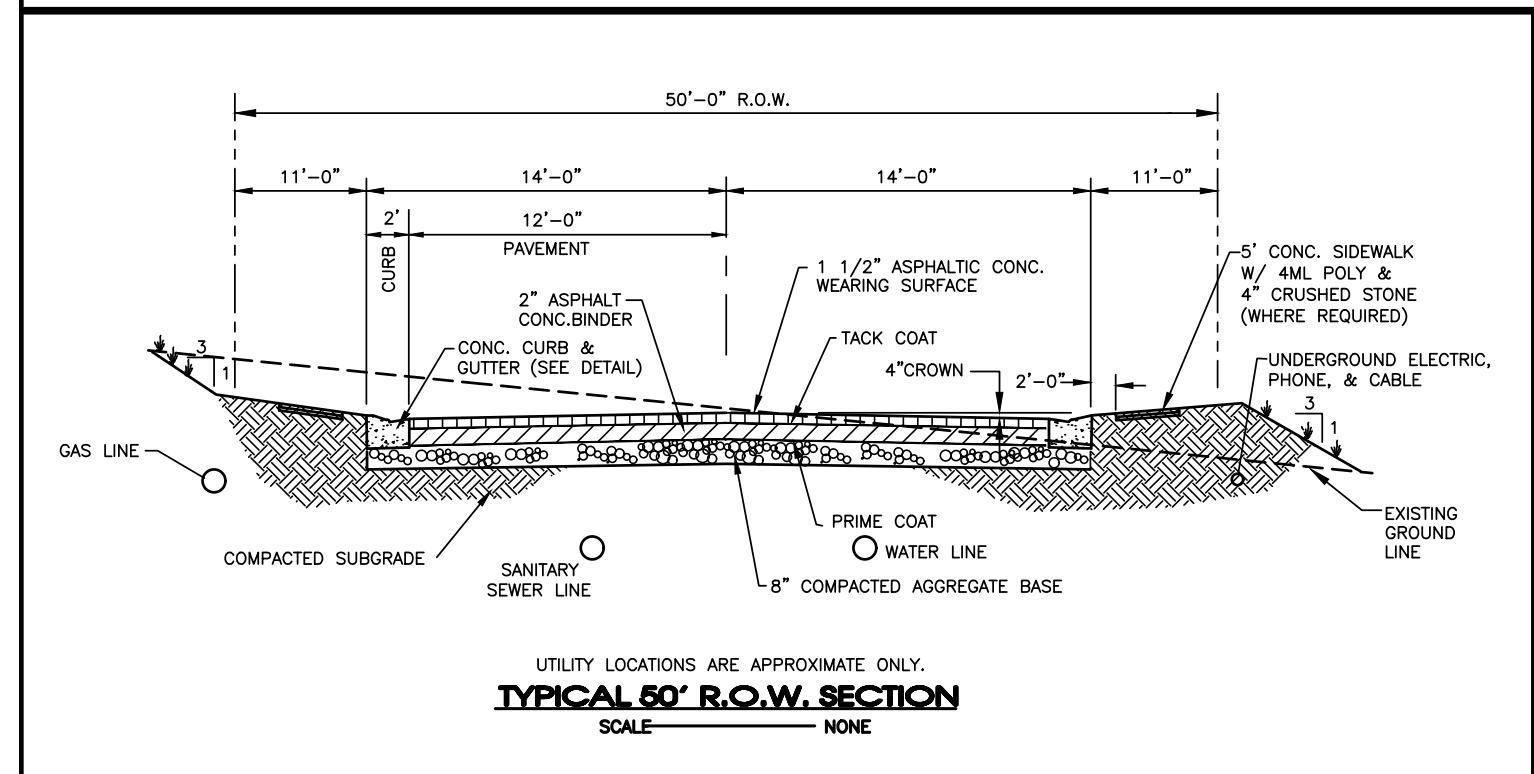
1"=50'

JOB NO.

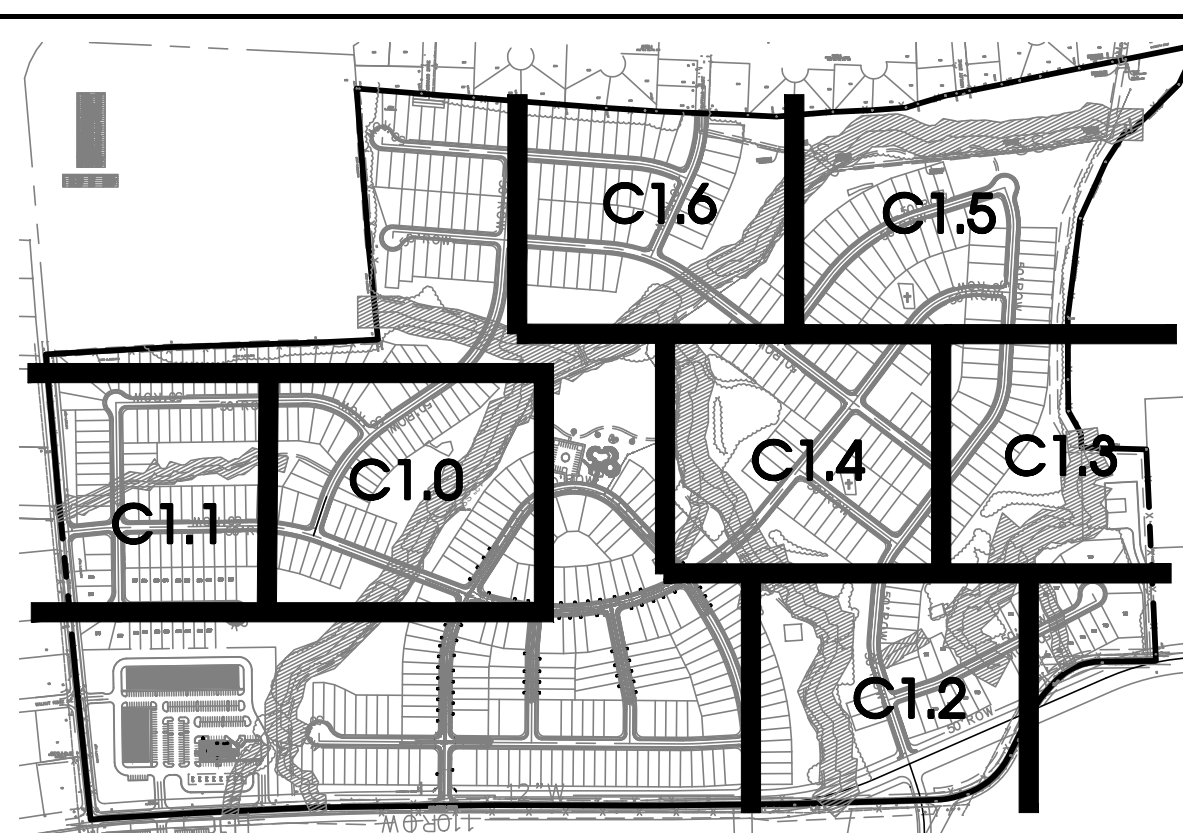
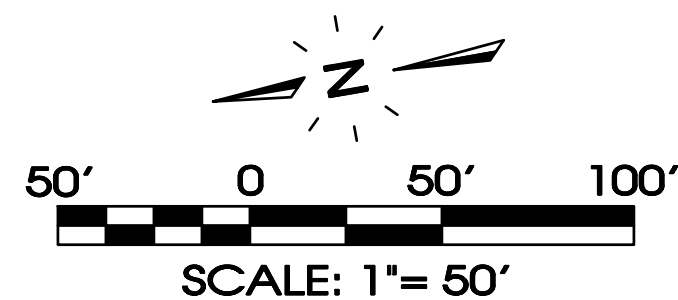
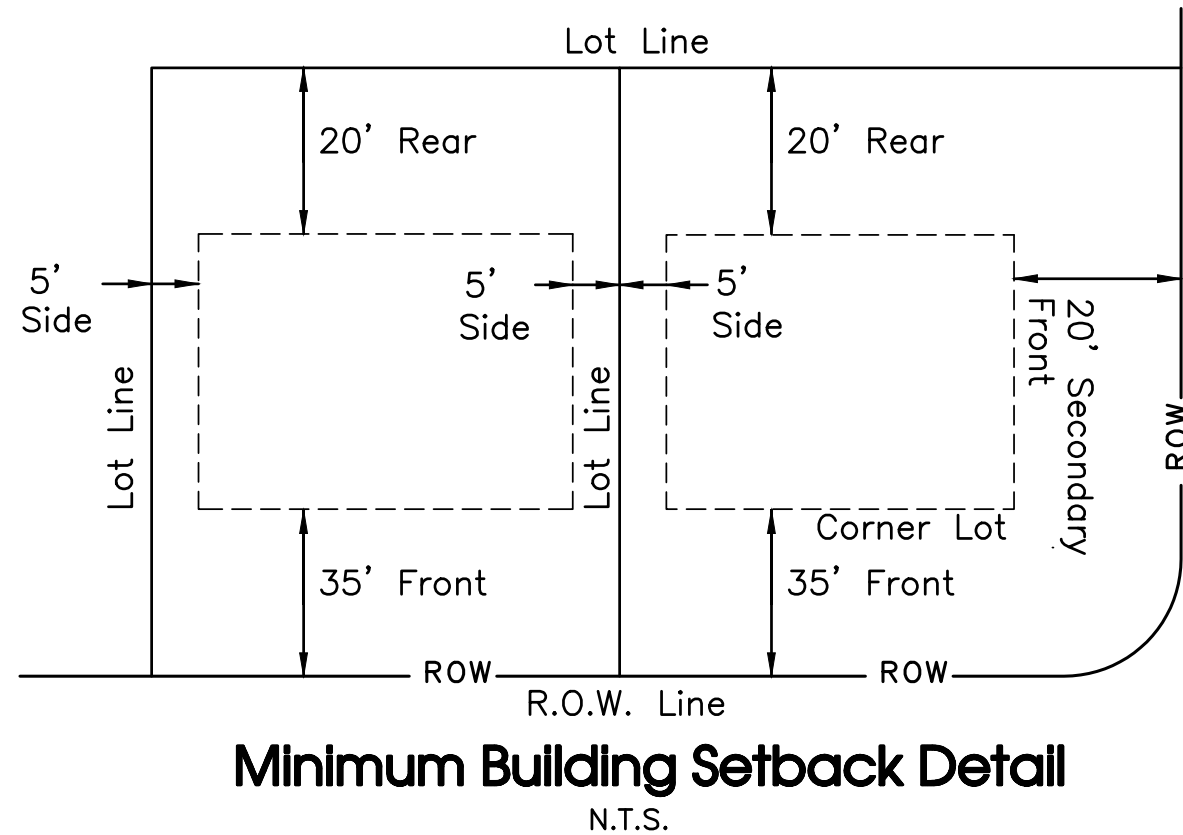
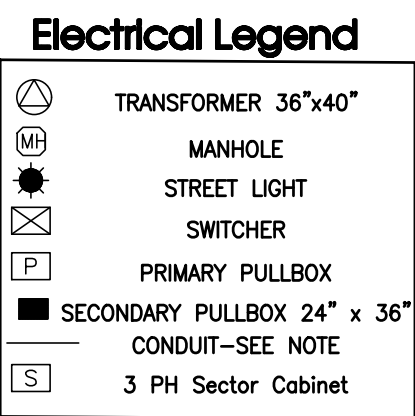
18314

SHEET:

C1.0

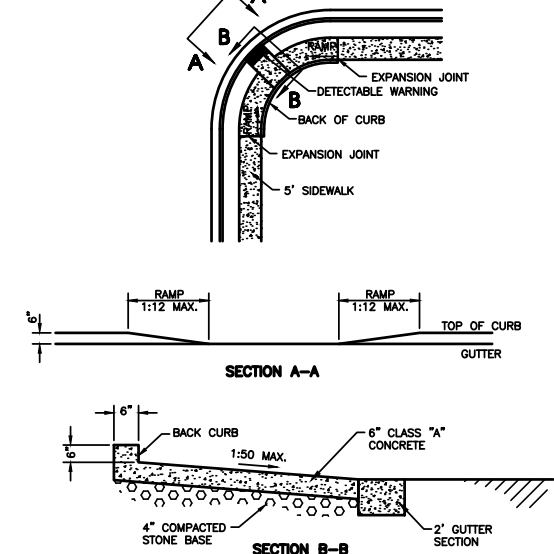
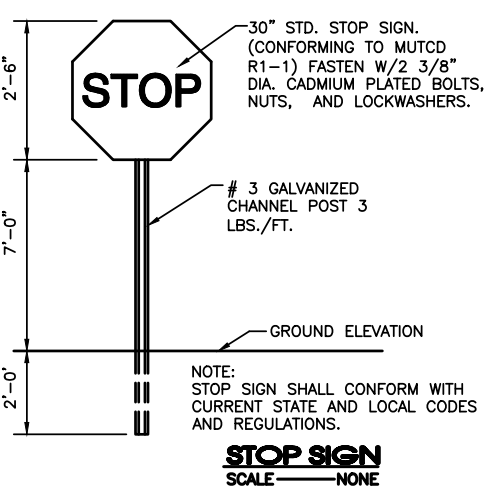


The proposed electrical, gas, water and telecommunications information shown hereon is not an actual design to be used for construction, and is for reference and illustrative purposes only. The contractor shall refer to the actual final design for each proper discipline (electrical, civil, mechanical, etc.) with the Tennessee professional engineer's seal, for precise design information



SPEED
LIMIT
20

TYPICAL "SPEED LIMIT" SIGN
SCALE _____ NON



- GENERAL NOTES
1. THE PURPOSE OF THIS PRELIMINARY PLAT IS TO CREATE 95 SINGLE FAMILY LOTS.
SECTION 4: 46 LOTS
SECTION 5: 32 LOTS
SECTION 9A: 44 LOTS
SECTION 10: 105 LOTS
 2. BEARING SYSTEM IS BASED ON TENNESSEE STATE PLANE COORDINATES TIED TO RUTHERFORD COUNTY CONTROL POINT RCC-011 (NAD 83-96).
 3. THIS PROPERTY LIES WITHIN ZONE X, PER FEMA FIRM MAPS FOR RUTHERFORD COUNTY, MAP NO. 47149C0105H, EFFECTIVE DATE: JANUARY 5, 2007.
 4. PARCELS MAY BE SUBJECT TO ADDITIONAL ESMT'S AND/OR RESTRICTIONS, BY RECORD OR PRESCRIPTION, THAT A COMPLETE TITLE SEARCH MAY REVEAL.
 5. PROPERTY IS ZONED PDR (PLANNED DENSITY RESIDENTIAL). MINIMUM SETBACK REQUIREMENTS ARE: FRONT=35' FT. - SIDE=5' FT. - REAR=20' FT.
 6. ALL CRITICAL LOTS (WITH 15% SLOPES OR GREATER), ARE DENOTED WITH AN ASTERISK. ENGINEERED PLOT PLANS ARE REQUIRED FOR THESE LOTS PRIOR TO OBTAINING A BUILDING PERMIT.
 7. ALL COMMON AREAS SHALL BE OWNED AND MAINTAINED BY THE HOMEOWNERS ASSOCIATION.
 8. DEVELOPER IS RESPONSIBLE FOR THE INSTALLATION OF STREET LIGHTS. STREET LIGHTS SHOULD BE LOCATED NO MORE THAN 300 FEET APART.
 9. NO MORE THAN 500 LINEAR FEET TOTAL OF TRENCHING WILL BE ALLOWED TO BE OPEN AT ONE TIME. (ALL UTILITIES & STORM DRAINS).

Legend:			
	EXIST. CONCRETE MONUMENT		BENCHMARK
	IRON PIN SET (I.P.S.)		HANDICAP PARKING SYMBOL
	IRON PIN FOUND (I.P.F.)	V.A.	VAN ACCESSIBLE HANDICAP DESIGNATION
	EXIST. SIGN POST		HC SIGN
	EXIST. SEWER CLEANOUT		PROPOSED SIGN POST
	EXIST. MANHOLE (SEWER & PHONE)		CONCRETE BOLLARD
	EXIST. CATCH BASIN (STORM SEWER)		WHEEL STOP
	EXIST. WATER/GAS VALVE		CONCRETE SIDEWALK
	EXIST. TELEPHONE RISER		EXTRUDED CURB
	EXIST. GAS RISER		CURB & GUTTER
	ELECTRICAL ENCLOSURE		TRAFFIC ARROW
	EXIST. WATER METER		TURN LANE ARROWS
	EXIST. UTILITY POLE		REVISION NUMBER
	EXIST. FIRE HYDRANT		DRAINAGE STRUCTURE DESIGNATION
	POST INDICATOR VALVE		DRAINAGE PIPE DESIGNATION
	BLOW OFF VALVE		RIP RAP
	REDUCER		RUNOFF FLOW ARROW
	REMOTE FIRE DEPT. CONNECTION		INLET FILTER PROTECTION
	CONCRETE THURST BLOCK	63.25	PROPOSED SPOT ELEVATION
	DOUBLE DETECTOR CATCH VALVE	(63.25) x	EXIST. SPOT ELEVATION
	FIRE DEPT. CONNECTION		SEWER/STORM FLOW DIRECTION
	FIRE HYDRANT		CATCH BASIN
	GATE VALVE & BOX		CURB INLET
	WATER METER		AREA DRAIN
	GAS METER		HEADWALL
	GREASE TRAP		WINGED HEADWALL
	EXTERIOR CLEANOUT ECO		CONCRETE SWALE
	MANHOLE		TYPE - X - HEADWALL

EXISTING PHONE	_____ PH _____
EXISTING ELECTRIC	_____ OH _____
PROPERTY LINE	=====
EASEMENTS	-----
RIGHT OF WAY	===== 50' ROW =====
EROSION CONTROL SILT FENCE	_____ SF _____ SF _____ SF _____
EROSION EEL	_____ E _____ E _____ E _____
EXISTING TREELINE	
EXISTING FENCELINE	_____ X _____ X _____ X _____ X _____
MINIMUM BUILDING SETBACK LINE	=====
PHASE BOUNDARY	=====
EXISTING GAS LINE	_____ GAS _____
PROPOSED GAS LINE	===== GAS =====
EXISTING STORM	_____ ST M _____ ST M _____
PROPOSED STORM	===== ST M ===== ST M =====
EXISTING CONTOUR LINES	----- 60' -----
PROPOSED CONTOUR LINES	===== 60' =====
EXISTING SANITARY SEWER	_____ SS _____ SS _____
PROPOSED SANITARY SEWER	=====
EXISTING WATER	_____ W _____ W _____
PROPOSED WATER	===== W ===== W =====

Owner/Developer:
Starlight Homes Tennessee LLC
99 E. Main St, Suite 200
Franklin, TN 37064
Contact: Christian Macari

Floodplain Note:
This site lies within Zone X, areas determined to be outside the 0.2% annual chance flood plain. FEMA FIRM map #47149C0105H, Dated Jan. 5, 2007.

Deed Reference:
Tax Map 32, Parcel 4.00
Zoning: PDR (Planned Density Residential)
Section 4: 46 Lots on 9.10± Acres
Section 5: 32 Lots on 13.85± Acres
Section 9A: 44 Lots on 22.86± Acres
Swction 10: 105 Lots on 39.28± Acres
Min. Lot Size = 41' Wide; 5,740 Sq.Ft. Minimum



SEC, Inc.

SITE ENGINEERING CONSULTANTS

ENGINEERING • SURVEYING • LAND PLANNING
LANDSCAPE ARCHITECTURE

850 MIDDLE TENNESSEE BOULEVARD MURFREESBORO, TENNESSEE 37129

PHONE: (615) 890-7700 E-MAIL: MTAYLOR@SEC-CIVIL.COM FAX: (615) 895-2567

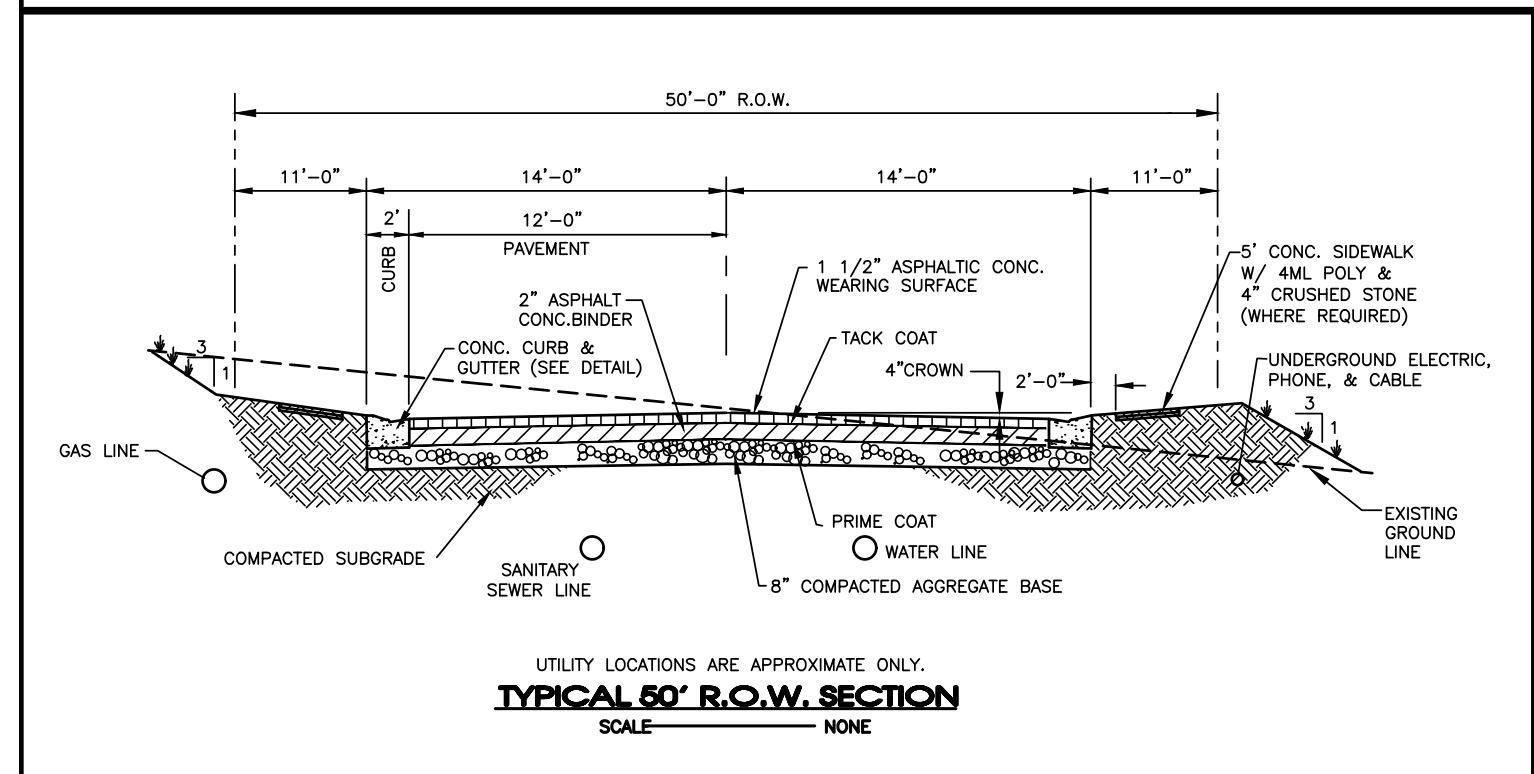
NO PORTION OF THIS DRAWING MAY BE REPRODUCED WITHOUT WRITTEN CONSENT OF SEC, INC.

COPYRIGHT SEC, INC. 2014

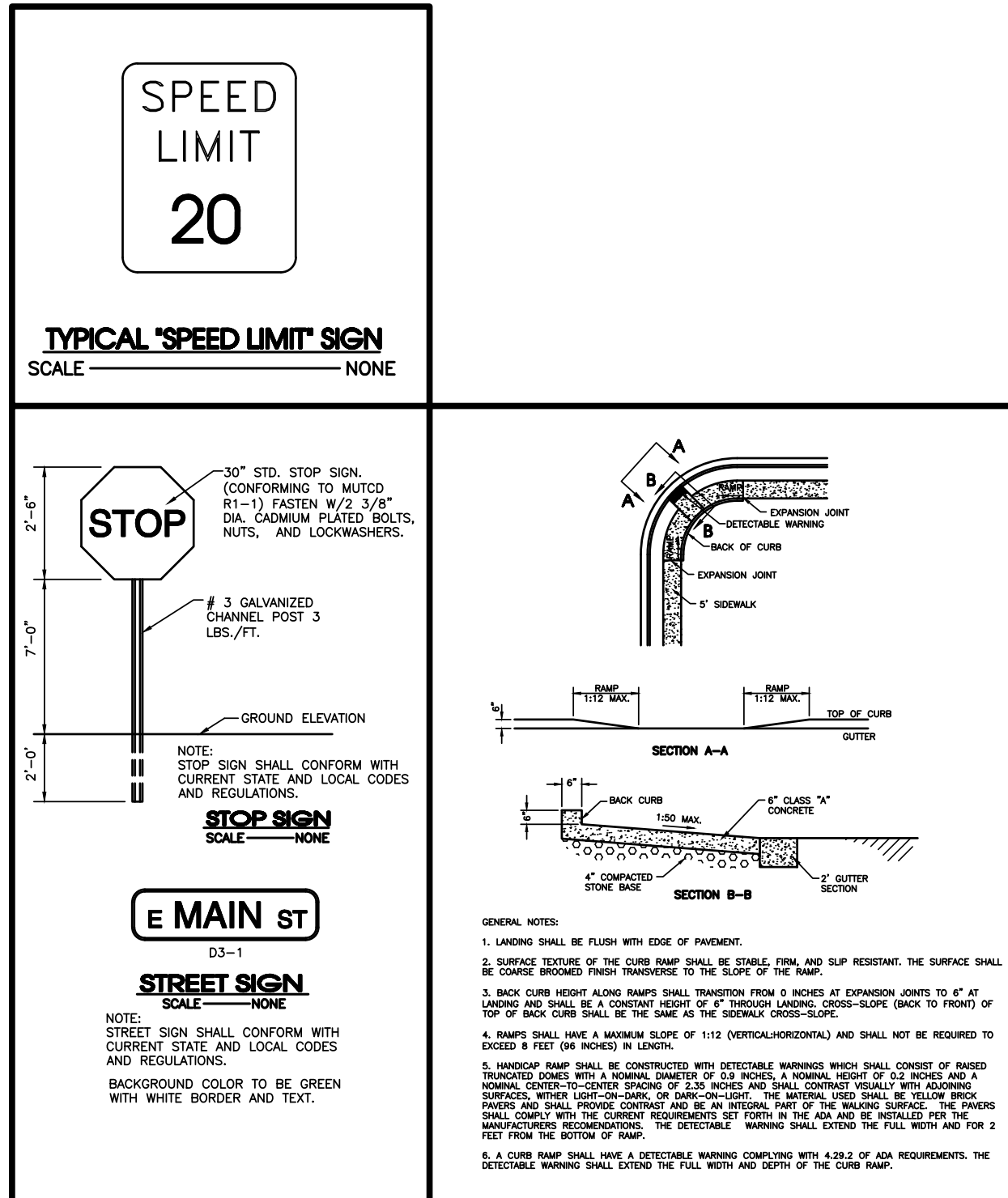
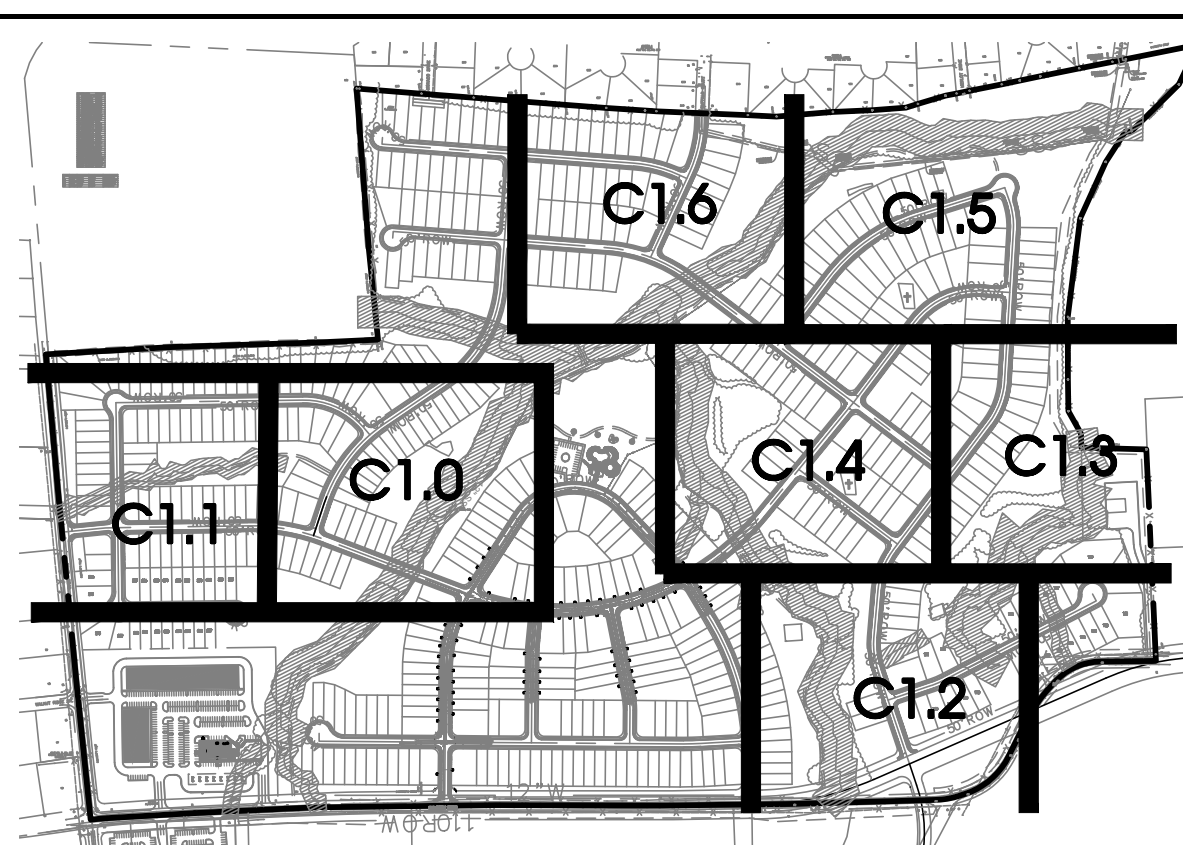
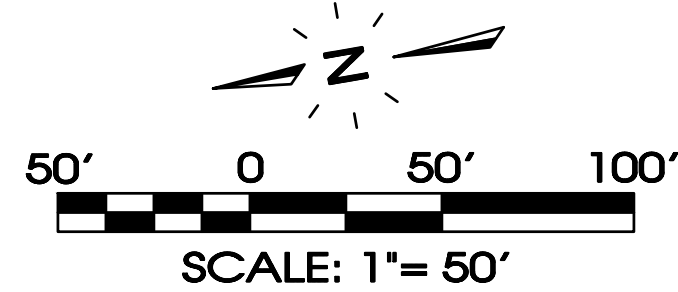
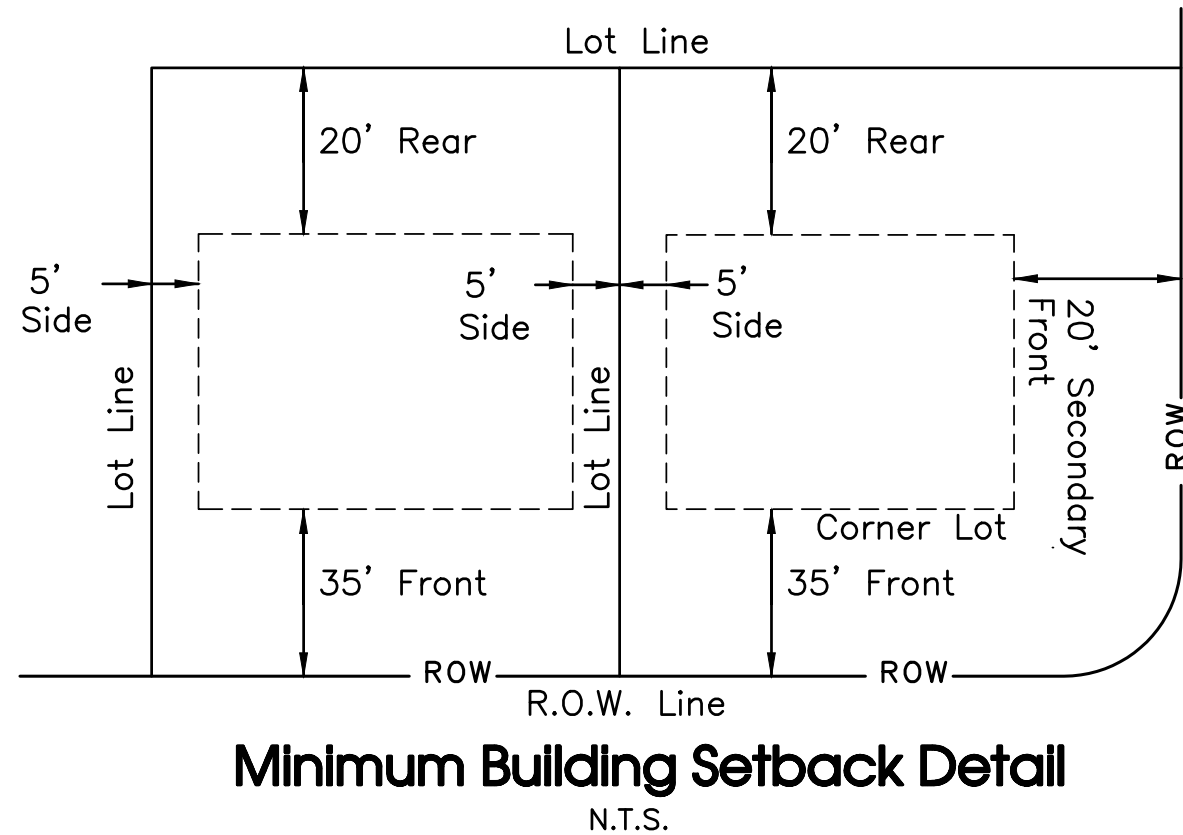
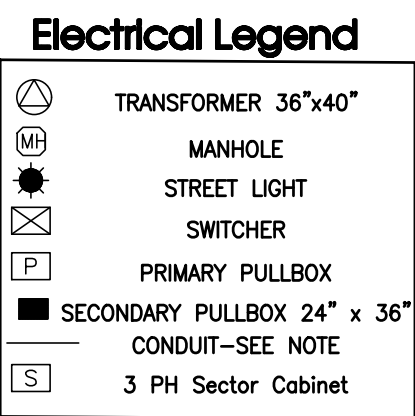
The site as shown on these construction drawings is intended to achieve specific engineering design criteria and objectives. It is the sole responsibility of the owner/developer to ensure that the construction of the site shown on these construction drawings is in total accordance with the design as noted, described, and detailed on these drawings. SEC, Inc. assumes no liability for the assurance that the site is constructed in accordance with the construction plans.

Arbor Ridge
Section 4, 5, 9A, & 10
La Vergne, Tennessee

						Preliminary Plat
REVISED:						
DRAWN: CFB3, SJA						
DATE: 4-24-2023						
CHECKED:						
MAT						
FILE NAME:						
18314prelimplanPh					-z	
SCALE:						
1" = 50'						
JOB NO.						
18314						
SHEET:						
C1.1						



The proposed electrical, gas, water and telecommunications information shown hereon is not an actual design to be used for construction, and is for reference and illustrative purposes only. The contractor shall refer to the actual final design for each proper discipline (electrical, civil, mechanical, etc.) with the Tennessee professional engineer's seal, for precise design information



- GENERAL NOTES
1. THE PURPOSE OF THIS PRELIMINARY PLAT IS TO CREATE 95 SINGLE FAMILY LOTS.
SECTION 4: 46 LOTS
SECTION 5: 32 LOTS
SECTION 9A: 44 LOTS
SECTION 10: 105 LOTS
 2. BEARING SYSTEM IS BASED ON TENNESSEE STATE PLANE COORDINATES TIED TO RUTHERFORD COUNTY CONTROL POINT RCC-011 (NAD 83-96).
 3. THIS PROPERTY LIES WITHIN ZONE X, PER FEMA FIRM MAPS FOR RUTHERFORD COUNTY, MAP NO. 47149C0105H, EFFECTIVE DATE: JANUARY 5, 2007.
 4. PARCELS MAY BE SUBJECT TO ADDITIONAL ESMT'S AND/OR RESTRICTIONS, BY RECORD OR PRESCRIPTION, THAT A COMPLETE TITLE SEARCH MAY REVEAL.
 5. PROPERTY IS ZONED PDR (PLANNED DENSITY RESIDENTIAL). MINIMUM SETBACK REQUIREMENTS ARE: FRONT=35' FT. - SIDE=5' FT. - REAR=20' FT.
 6. ALL CRITICAL LOTS (WITH 15% SLOPES OR GREATER), ARE DENOTED WITH AN ASTERISK. ENGINEERED PLOT PLANS ARE REQUIRED FOR THESE LOTS PRIOR TO OBTAINING A BUILDING PERMIT.
 7. ALL COMMON AREAS SHALL BE OWNED AND MAINTAINED BY THE HOMEOWNERS ASSOCIATION.
 8. DEVELOPER IS RESPONSIBLE FOR THE INSTALLATION OF STREET LIGHTS. STREET LIGHTS SHOULD BE LOCATED NO MORE THAN 300 FEET APART.
 9. NO MORE THAN 500 LINEAR FEET TOTAL OF TRENCHING WILL BE ALLOWED TO BE OPEN AT ONE TIME. (ALL UTILITIES & STORM DRAINS).

Legend:		
	EXIST. CONCRETE MONUMENT	 BENCHMARK
	IRON PIN SET (I.P.S.)	 HANDICAP PARKING SYMBOL
	IRON PIN FOUND (I.P.F.)	V.A. VAN ACCESSIBLE HANDICAP DESIGNATION
	EXIST. SIGN POST	 HC SIGN
	EXIST. SEWER CLEANOUT	 PROPOSED SIGN POST
	EXIST. MANHOLE (SEWER & PHONE)	 CONCRETE BOLLARD
	EXIST. CATCH BASIN (STORM SEWER)	 WHEEL STOP
	EXIST. WATER/GAS VALVE	 CONCRETE SIDEWALK
	EXIST. TELEPHONE RISER	 EXTRUDED CURB
	EXIST. GAS RISER	 CURB & GUTTER
	ELECTRICAL ENCLOSURE	 TRAFFIC ARROW
	EXIST. WATER METER	 TURN LANE ARROWS
	EXIST. UTILITY POLE	 REVISION NUMBER
	EXIST. FIRE HYDRANT	#1 DRAINAGE STRUCTURE DESIGNATION
	POST INDICATOR VALVE	 DRAINAGE PIPE DESIGNATION
	BLOW OFF VALVE	 RIP RAP
	REDUCER	 RUNOFF FLOW ARROW
	REMOTE FIRE DEPT. CONNECTION	 INLET FILTER PROTECTION
	CONCRETE THRUST BLOCK	63.25 x 63.25 PROPOSED SPOT ELEVATION
	DOUBLE DETECTOR CHECK VALVE	(63.25) x (63.25) EXIST. SPOT ELEVATION
	FIRE DEPT. CONNECTION	> SEWER/STORM FLOW DIRECTION
	FIRE HYDRANT	 CATCH BASIN
	GATE VALVE & BOX	 CURB INLET
	WATER METER	 AREA DRAIN
	GAS METER	 HEADWALL
	GREASE TRAP	 WINGED HEADWALL
	EXTERIOR CLEANOUT ECO	 CONCRETE SWALE
	MANHOLE	 TYPE- X- HEADWALL

EXISTING PHONE	_____ PH _____
EXISTING ELECTRIC	_____ OH _____
PROPERTY LINE	=====
EASEMENTS	- - - - -
RIGHT OF WAY	===== 50' ROW =====
EROSION CONTROL SILT FENCE	____ SF ____ SF ____ SF ____
EROSION EEL	_____ E _____ E _____ E _____
EXISTING TREELINE	~~~~~
EXISTING FENCELINE	___ X ___ X ___ X ___ X ___
MINIMUM BUILDING SETBACK LINE	=====
PHASE BOUNDARY	■■■■■■■■■■■■■■■■■■■■■■■■■
EXISTING GAS LINE	----- GAS -----
PROPOSED GAS LINE	===== GAS =====
EXISTING STORM	_____ STM _____ STM _____
PROPOSED STORM	===== <u>STM</u> ===== <u>STM</u> =====
EXISTING CONTOUR LINES	-----60±-----
PROPOSED CONTOUR LINES	===== <u>60±</u> =====
EXISTING SANITARY SEWER	_____ SS _____ SS _____
PROPOSED SANITARY SEWER	=====
EXISTING WATER	_____ W _____ W _____
PROPOSED WATER	===== <u>W</u> ===== <u>W</u> =====

Owner/Developer:
Starlight Homes Tennessee LLC
99 E. Main St, Suite 200
Franklin, TN 37064
Contact: Christian Macari

Floodplain Note:
This site lies within Zone X, areas determined to be outside the 0.2% annual chance flood plain. FEMA FIRM map #47149C0105H, Dated Jan. 5, 2007.

Deed Reference:
Tax Map 32, Parcel 4.00
Zoning: PDR (Planned Density Residential)
Section 4: 46 Lots on 9.10± Acres
Section 5: 32 Lots on 13.85± Acres
Section 9A: 44 Lots on 22.86± Acres
Swction 10: 105 Lots on 39.28± Acres
Min. Lot Size = 41' Wide; 5,740 Sq.Ft. Minimum



SITE ENGINEERING CONSULTANTS

ENGINEERING • SURVEYING • LAND PLANNING
LANDSCAPE ARCHITECTURE

850 MIDDLE TENNESSEE BOULEVARD
MURFREESBORO, TENNESSEE 37129

PHONE: (615) 890-7701 E-MAIL: MTAYLOR@SEC-CIVIL.COM FAX: (615) 895-2567

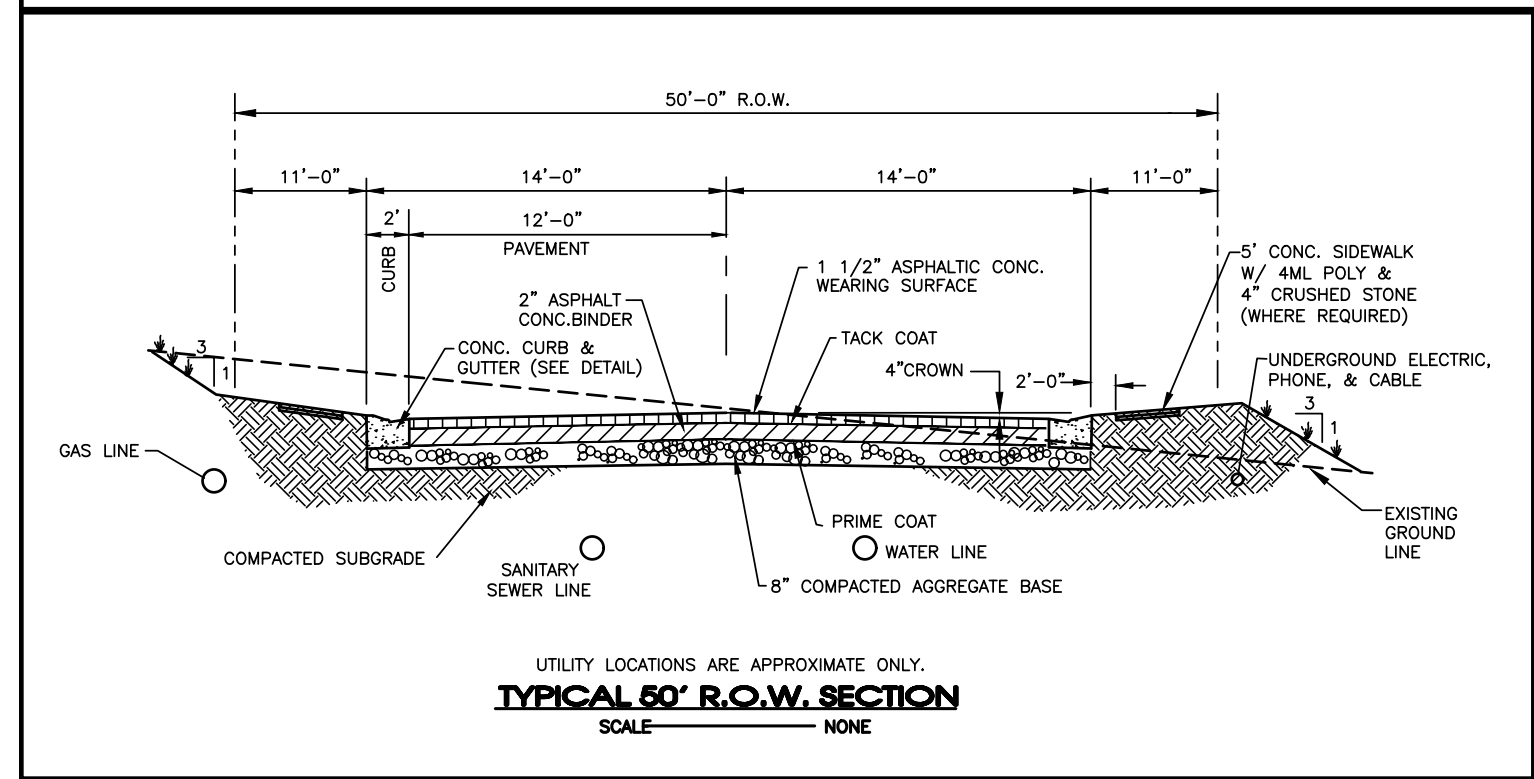
NO PORTION OF THIS DRAWING MAY BE REPRODUCED WITHOUT WRITTEN CONSENT OF S.E.C. INC.

DESIGNED BY
COPYRIGHT S.E.C. INC. 2023

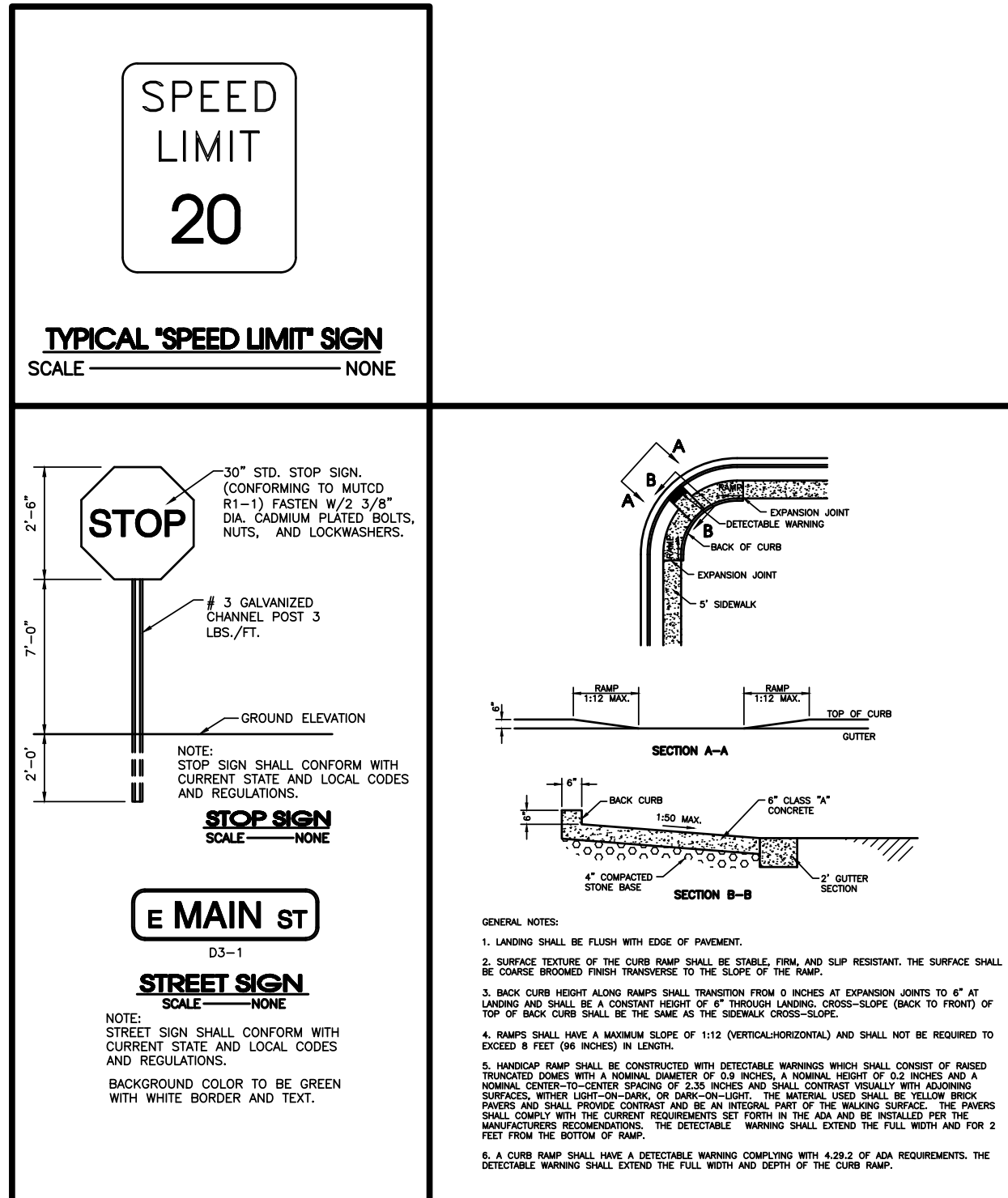
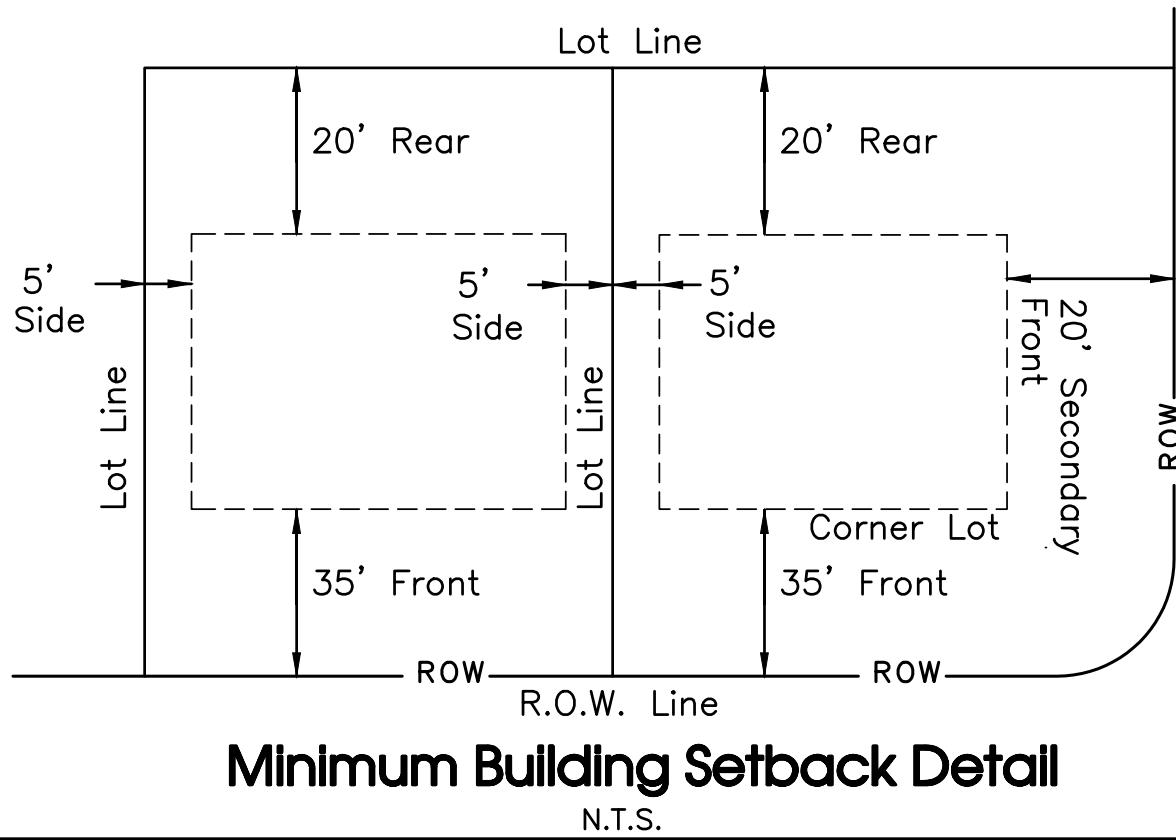
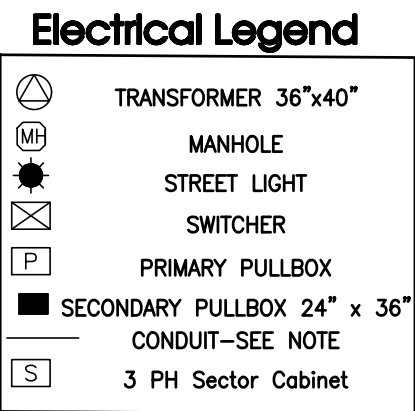
The site as shown on these construction drawings is intended to achieve specific design criteria and objectives. It is the sole responsibility of the owner/developer to ensure that the construction of the site shown on these construction drawings is in total accordance with the design as noted, described, and detailed on these drawings. The site is constructed in accordance with the construction plans.

Arbor Ridge
Section 4, 5, 9A, & 10
La Vergne, Tennessee

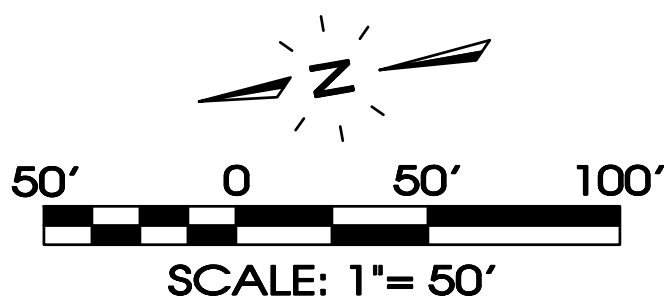
REUSED:	
DRAWN: CFB3, SJA	Preliminary Plat
DATE: 4-24-2023	
CHECKED: MAT	
FILE NAME:	
SCALE: 1"=50'	
JOB NO. 18314	
SHEET:	C1.2



The proposed electrical, gas, water and telecommunications information shown hereon is not an actual design to be used for construction, and is for reference and illustrative purposes only. The contractor shall refer to the actual final design for each proper discipline (electrical, civil, mechanical, etc.) with the Tennessee professional engineer's seal, for precise design information



- GENERAL NOTES
1. THE PURPOSE OF THIS PRELIMINARY PLAT IS TO CREATE 95 SINGLE FAMILY LOTS.
SECTION 4: 46 LOTS
SECTION 5: 32 LOTS
SECTION 9A: 44 LOTS
SECTION 10: 105 LOTS
 2. BEARING SYSTEM IS BASED ON TENNESSEE STATE PLANE COORDINATES TIED TO RUTHERFORD COUNTY CONTROL POINT RCC-011 (NAD 83-96).
 3. THIS PROPERTY LIES WITHIN ZONE X, PER FEMA FIRM MAPS FOR RUTHERFORD COUNTY, MAP NO. 47149C0105H, EFFECTIVE DATE: JANUARY 5, 2007.
 4. PARCELS MAY BE SUBJECT TO ADDITIONAL ESMT'S AND/OR RESTRICTIONS, BY RECORD OR PRESCRIPTION, THAT A COMPLETE TITLE SEARCH MAY REVEAL.
 5. PROPERTY IS ZONED PDR (PLANNED DENSITY RESIDENTIAL). MINIMUM SETBACK REQUIREMENTS ARE: FRONT=35' FT. - SIDE=5' FT. - REAR=20' FT.
 6. ALL CRITICAL LOTS (WITH 15% SLOPES OR GREATER), ARE DENOTED WITH AN ASTERISK. ENGINEERED PLOT PLANS ARE REQUIRED FOR THESE LOTS PRIOR TO OBTAINING A BUILDING PERMIT.
 7. ALL COMMON AREAS SHALL BE OWNED AND MAINTAINED BY THE HOMEOWNERS ASSOCIATION.
 8. DEVELOPER IS RESPONSIBLE FOR THE INSTALLATION OF STREET LIGHTS. STREET LIGHTS SHOULD BE LOCATED NO MORE THAN 300 FEET APART.
 9. NO MORE THAN 500 LINEAR FEET TOTAL OF TRENCHING WILL BE ALLOWED TO BE OPEN AT ONE TIME. (ALL UTILITIES & STORM DRAINS).



Legend:		
	EXIST. CONCRETE MONUMENT	 BENCHMARK
	IRON PIN SET (I.P.S.)	 HANDICAP PARKING SYMBOL
	IRON PIN FOUND (I.P.F.)	V.A. VAN ACCESSIBLE HANDICAP DESIGNATION
	EXIST. SIGN POST	 HC SIGN
	EXIST. SEWER CLEANOUT	 PROPOSED SIGN POST
	EXIST. MANHOLE (SEWER & PHONE)	 CONCRETE BOLLARD
	EXIST. CATCH BASIN (STORM SEWER)	 WHEEL STOP
	EXIST. WATER/GAS VALVE	 CONCRETE SIDEWALK
	EXIST. TELEPHONE RISER	 EXTRUDED CURB
	EXIST. GAS RISER	 CURB & GUTTER
	ELECTRICAL ENCLOSURE	 TRAFFIC ARROW
	EXIST. WATER METER	 TURN LANE ARROWS
	EXIST. UTILITY POLE	 REVISION NUMBER
	EXIST. FIRE HYDRANT	 #1 DRAINAGE STRUCTURE DESIGNATION
	POST INDICATOR VALVE	 DRAINAGE PIPE DESIGNATION
	BLOW OFF VALVE	 RIP RAP
	REDUCER	 RUNOFF FLOW ARROW
	REMOTE FIRE DEPT. CONNECTION	 INLET FILTER PROTECTION
	CONCRETE THRUST BLOCK	63.25 x 63.25 PROPOSED SPOT ELEVATION
	DOUBLE DETECTOR CHECK VALVE	(63.25) x 63.25 EXIST. SPOT ELEVATION
	FIRE DEPT. CONNECTION	> SEWER/STORM FLOW DIRECTION
	FIRE HYDRANT	 CATCH BASIN
	GATE VALVE & BOX	 CURB INLET
	WATER METER	 AREA DRAIN
	GAS METER	 HEADWALL
	GREASE TRAP	 WINGED HEADWALL
	EXTERIOR CLEANOUT ECO	 CONCRETE SWALE
	MANHOLE	 TYPE- X- HEADWALL

EXISTING PHONE	_____ PH _____
EXISTING ELECTRIC	_____ OH _____
PROPERTY LINE	=====
EASEMENTS	-----
RIGHT OF WAY	===== 50' ROW =====
EROSION CONTROL SILT FENCE	_____ SF _____ SF _____ SF _____
EROSION EEL	_____ E _____ E _____ E _____
EXISTING TREELINE	
EXISTING FENCELINE	_____ X _____ X _____ X _____ X _____
MINIMUM BUILDING SETBACK LINE	=====
PHASE BOUNDARY	=====
EXISTING GAS LINE	_____ GAS _____
PROPOSED GAS LINE	===== GAS =====
EXISTING STORM	_____ STM _____ STM _____
PROPOSED STORM	===== STM ===== STM =====
EXISTING CONTOUR LINES	----- - - - - 60' - - - -
PROPOSED CONTOUR LINES	----- 60' -----
EXISTING SANITARY SEWER	_____ SS _____ SS _____
PROPOSED SANITARY SEWER	=====
EXISTING WATER	_____ W _____ W _____
PROPOSED WATER	===== W ===== W =====

Owner/Developer:
Starlight Homes Tennessee LLC
99 E. Main St, Suite 200
Franklin, TN 37064
Contact: Christian Macari

Floodplain Note:
This site lies within Zone X, areas determined to be outside the 0.2% annual chance flood plain. FEMA FIRM map #47149C0105H, Dated Jan. 5, 2007.

Deed Reference:
Tax Map 32, Parcel 4.00
Zoning: PDR (Planned Density Residential)
Section 4: 46 Lots on 9.10± Acres
Section 5: 32 Lots on 13.85± Acres
Section 9A: 44 Lots on 22.86± Acres
Swction 10: 105 Lots on 39.28± Acres
Min. Lot Size = 41' Wide; 5,740 Sq.Ft. Minimum

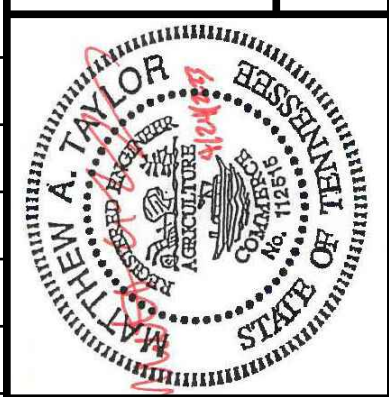


SITE ENGINEERING CONSULTANTS
ENGINEERING • SURVEYING • LAND PLANNING
LANDSCAPE ARCHITECTURE

850 MIDDLE TENNESSEE BOULEVARD
MURFREESBORO, TENNESSEE 37129

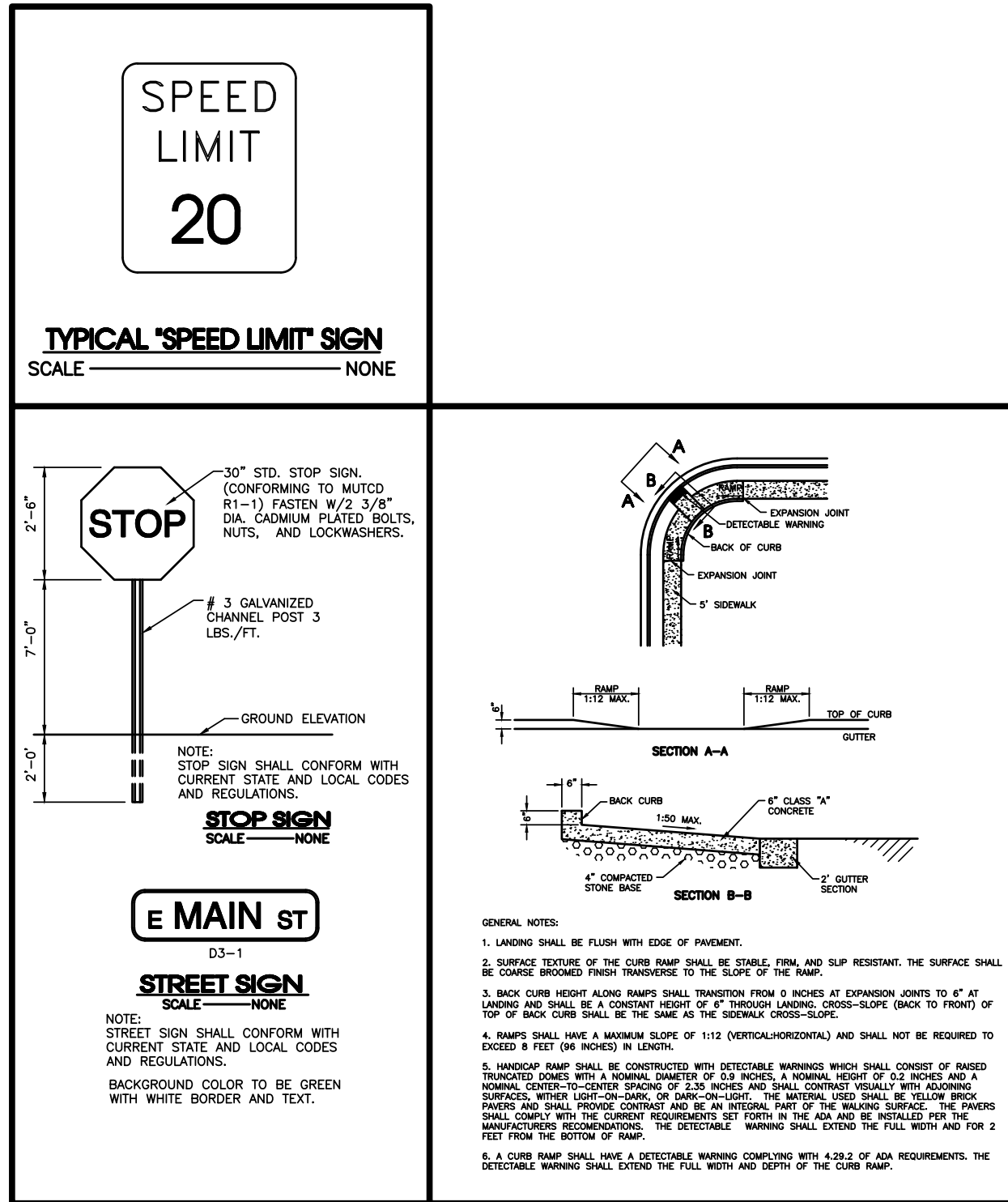
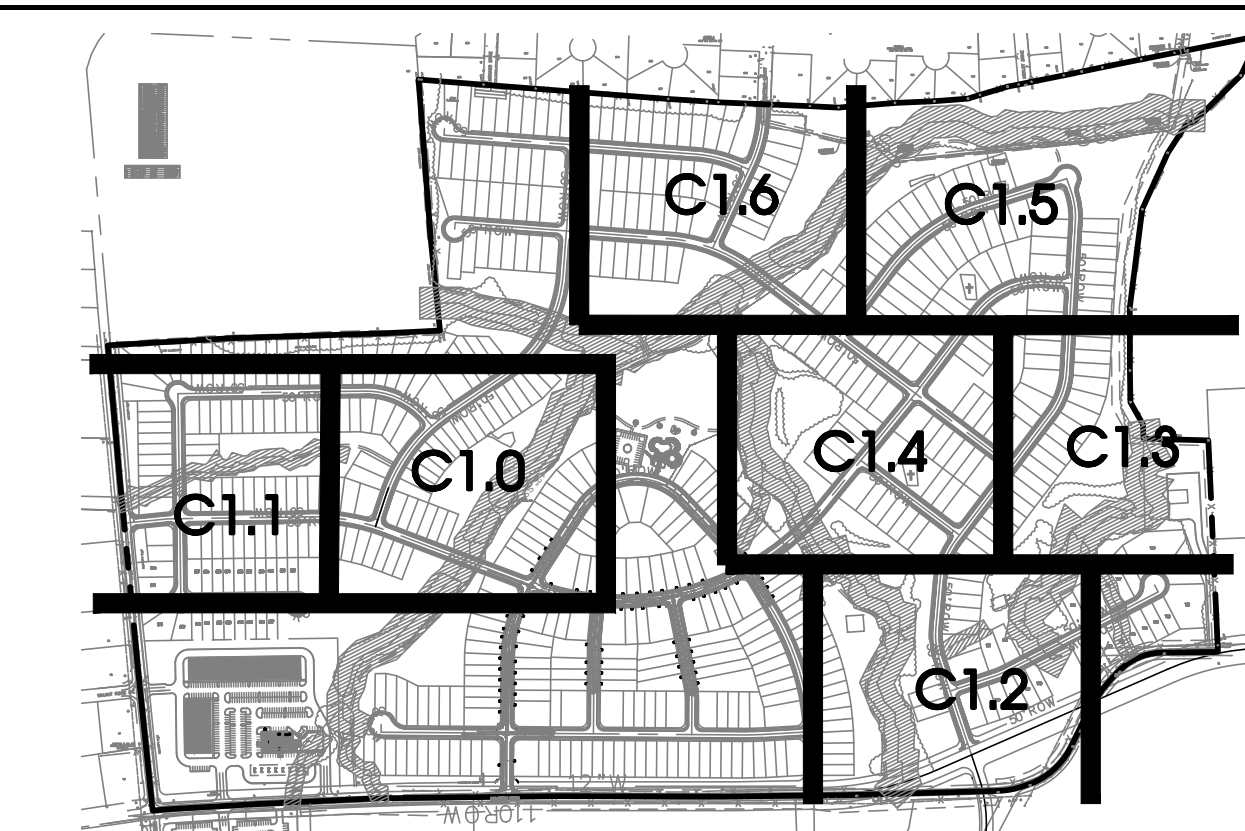
PHONE: (615) 890-7900 E-MAIL: MTAYLOR@SEC-CIVIL.COM FAX: (615) 895-2567
NO PORTION OF THIS DRAWING MAY BE REPRODUCED WITHOUT WRITTEN CONSENT OF SEC, INC.
COPYRIGHT SEC, INC. 2003

The site shown on these construction drawings is intended to achieve specific engineering design criteria and objectives. It is the sole responsibility of the owner/developer to ensure that the construction of the site shown on these construction drawings is in total accordance with the design and engineering criteria and objectives shown on these drawings. SEC, Inc. does not warrant or guarantee that the site is constructed in accordance with the construction plans.

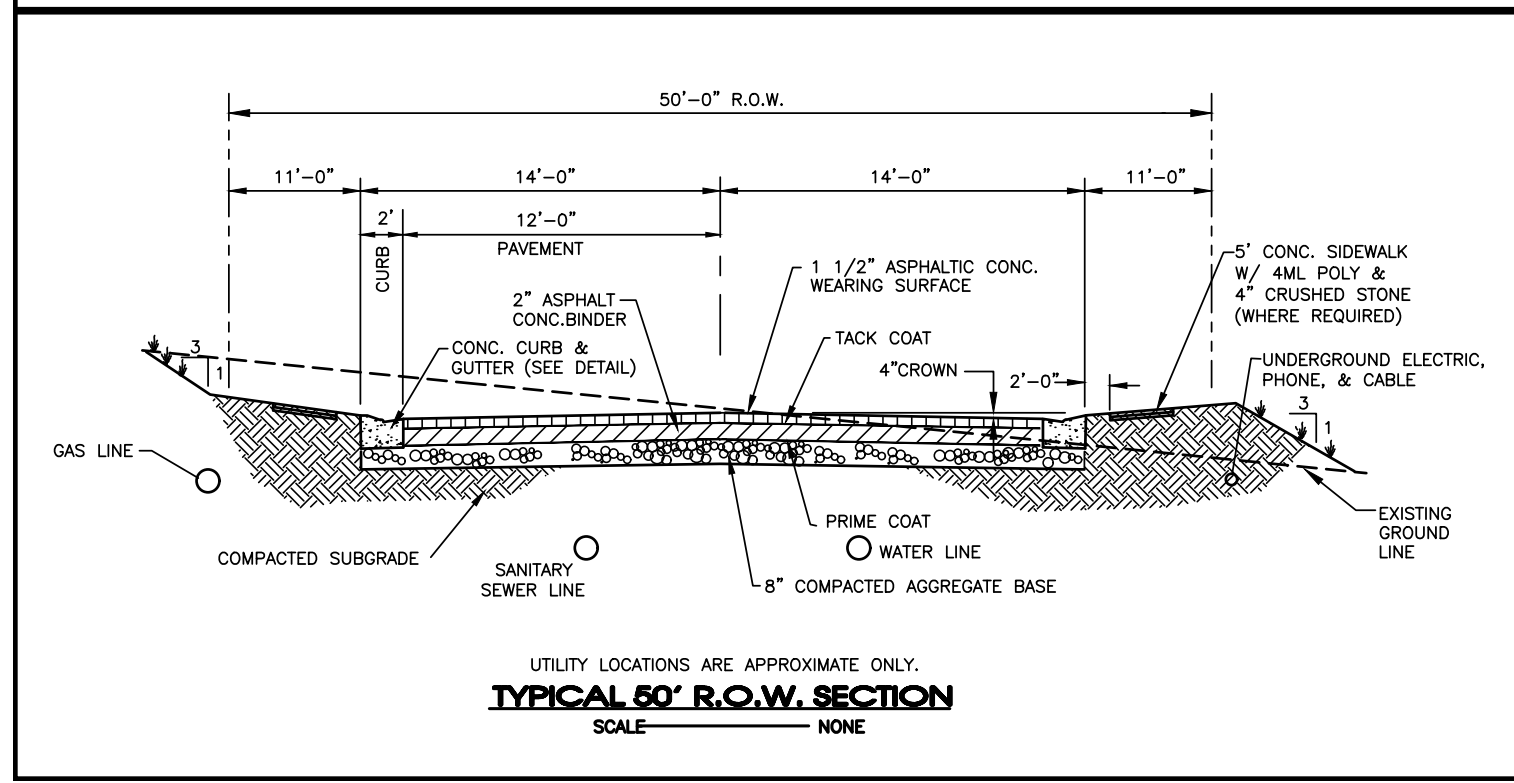


Arbor Ridge
Section 4, 5, 9A, & 10
La Vergne, Tennessee

REVISED: DRAWN: CFB3, SJA DATE: 4-24-2023 CHECKED: MAT FILE NAME: 18314preliminPhn1-2 SCALE: 1"=50' JOB NO. 18314	Preliminary Plot
C1.3	



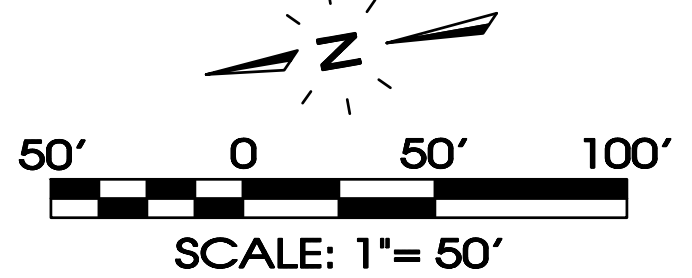
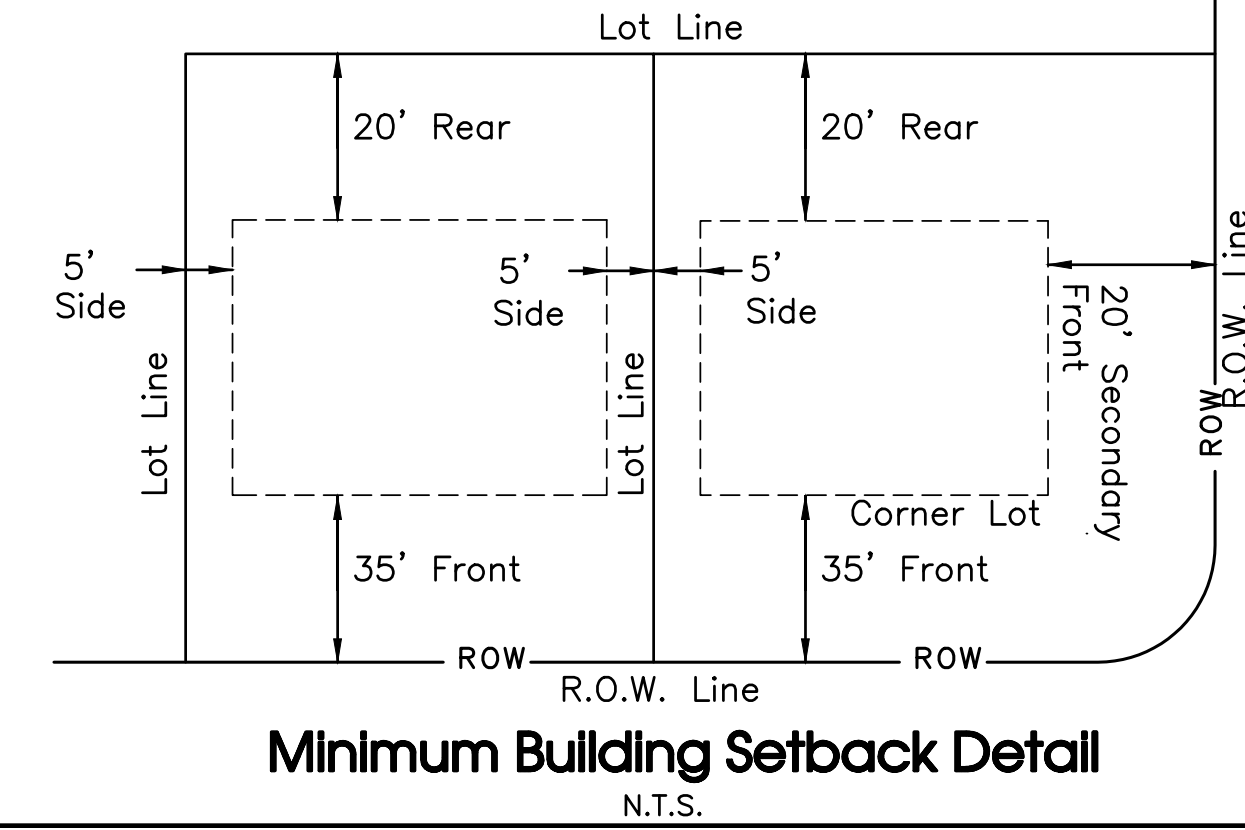
- GENERAL NOTES
- THE PURPOSE OF THIS PRELIMINARY PLAT IS TO CREATE 95 SINGLE FAMILY LOTS.
SECTION 4: 46 LOTS
SECTION 5: 32 LOTS
SECTION 9A: 44 LOTS
SECTION 10: 105 LOTS
 - BEARING SYSTEM IS BASED ON TENNESSEE STATE PLANE COORDINATES TIED TO RUTHERFORD COUNTY CONTROL POINT RCC-011 (NAD 83-96).
 - THIS PROPERTY LIES WITHIN ZONE X, PER FEMA FIRM MAPS FOR RUTHERFORD COUNTY, MAP NO. 47149C0105H, EFFECTIVE DATE: JANUARY 5, 2007.
 - PARCELS MAY BE SUBJECT TO ADDITIONAL ESMT'S AND/OR RESTRICTIONS, BY RECORD OR PRESCRIPTION, THAT A COMPLETE TITLE SEARCH MAY REVEAL.
 - PROPERTY IS ZONED PDR (PLANNED DENSITY RESIDENTIAL). MINIMUM SETBACK REQUIREMENTS ARE: FRONT=35' FT. - SIDE=5' FT. - REAR=20' FT.
 - ALL CRITICAL LOTS (WITH 15% SLOPES OR GREATER), ARE DENOTED WITH AN ASTERISK. ENGINEERED PLOT PLANS ARE REQUIRED FOR THESE LOTS PRIOR TO OBTAINING A BUILDING PERMIT.
 - ALL COMMON AREAS SHALL BE OWNED AND MAINTAINED BY THE HOMEOWNERS ASSOCIATION.
 - DEVELOPER IS RESPONSIBLE FOR THE INSTALLATION OF STREET LIGHTS. STREET LIGHTS SHALL BE LOCATED NO MORE THAN 300 FEET APART.
 - NO MORE THAN 500 LINEAR FEET TOTAL OF TRENCHING WILL BE ALLOWED TO BE OPEN AT ONE TIME. (ALL UTILITIES & STORM DRAINS).



Note: Developer Is Responsible For The Installation Of Street Lights. Street Lights Shall Be Located No More Than 300 Feet Apart.

The proposed electrical, gas, water and telecommunications information shown hereon is not an actual design to be used for construction, and is for reference and illustrative purposes only. The contractor shall refer to the actual final design for each proper discipline (electrical, civil, mechanical, etc.) with the Tennessee professional engineer's seal, for precise design information

- Electrical Legend**
- TRANSFORMER 36"x40"
 - MANHOLE
 - STREET LIGHT
 - SWITCHER
 - PRIMARY PULLBOX
 - SECONDARY PULLBOX 24" x 36"
 - CONDUIT-SEE NOTE
 - 3 PH Sector Cabinet



Legend:			
	EXIST. CONCRETE MONUMENT		BENCHMARK
	IRON PIN SET (I.P.S.)		HANDICAP PARKING SYMBOL
	IRON PIN FOUND (I.P.F.)		VAN ACCESSIBLE HANDICAP DESIGNATION
	EXIST. SIGN POST		H.C. SIGN
	EXIST. SEWER CLEANOUT		PROPOSED SIGN POST
	EXIST. MANHOLE (SEWER & PHONE)		CONCRETE BOLLARD
	EXIST. CATCH BASIN (STORM SEWER)		WHEEL STOP
	EXIST. WATER/GAS VALVE		CONCRETE SIDEWALK
	EXIST. TELEPHONE RISER		EXTRUDED CURB
	EXIST. GAS RISER		CURB & GUTTER
	ELECTRICAL ENCLOSURE		TRAFFIC ARROW
	EXIST. WATER METER		TURN LANE ARROWS
	EXIST. UTILITY POLE		REVISION NUMBER
	EXIST. FIRE HYDRANT		DRAINAGE STRUCTURE DESIGNATION
	POST INDICATOR VALVE		DRAINAGE PIPE DESIGNATION
	BLOW OFF VALVE		RIP RAP
	REDUCER		RUNOFF FLOW ARROW
	REMOTE FIRE DEPT. CONNECTION		INLET FILTER PROTECTION
	CONCRETE THRUST BLOCK		PROPOSED SPOT ELEVATION
	DOUBLE DETECTOR CHECK VALVE		EXIST. SPOT ELEVATION
	FIRE DEPT. CONNECTION		SEWER/STORM FLOW DIRECTION
	FIRE HYDRANT		CATCH BASIN
	GATE VALVE & BOX		CURB INLET
	WATER METER		AREA DRAIN
	GAS METER		HEADWALL
	GREASE TRAP		WINGED HEADWALL
	EXTERIOR CLEANOUT ECO		CONCRETE SWALE
	MANHOLE		TYPE-X- HEADWALL

EXISTING PHONE	PH
EXISTING ELECTRIC	OH
PROPERTY LINE	
EASEMENTS	
RIGHT OF WAY	50' ROW
EROSION CONTROL SILT FENCE	SF SF SF
EROSION EEL	E E E
EXISTING TREELINE	
EXISTING FENCELINE	X X X X
MINIMUM BUILDING SETBACK LINE	
PHASE BOUNDARY	
EXISTING GAS LINE	GAS
PROPOSED GAS LINE	GAS
EXISTING STORM	STM STM
PROPOSED STORM	STM STM
EXISTING CONTOUR LINES	601
PROPOSED CONTOUR LINES	601
EXISTING SANITARY SEWER	SS SS
PROPOSED SANITARY SEWER	
EXISTING WATER	W W
PROPOSED WATER	W W

Owner/Developer:
Starlight Homes Tennessee LLC
99 E. Main St. Suite 200
Franklin, TN 37064
Contact: Christian Macari

Floodplain Note:
This site lies within Zone X, areas determined to be outside the 0.2% annual chance flood plain. FEMA FIRM map #47149C0105H, Dated Jan. 5, 2007.

Deed Reference:
Tax Map 32, Parcel 4.00
Zoning: PDR (Planned Density Residential)
Section 4: 46 Lots on 9.10± Acres
Section 5: 32 Lots on 13.85± Acres
Section 9A: 44 Lots on 22.86± Acres
Section 10: 105 Lots on 39.28± Acres
Min. Lot Size = 41' Wide; 5,740 Sq.Ft. Minimum

SEC, Inc.
ENGINEERING • SURVEYING • LAND PLANNING
LANDSCAPE ARCHITECTURE
850 MIDDLE TENNESSEE BOULEVARD
MURFREESBORO, TENNESSEE 37129
PHONE: (615) 890-7901 E-MAIL: MTA@SEC-CIVIL.COM FAX: (615) 895-2467
NO PORTION OF THIS DRAWING MAY BE REPRODUCED WITHOUT THE EXPRESSED WRITTEN CONSENT OF SEC, INC.
COPYRIGHT SEC, INC., 2023

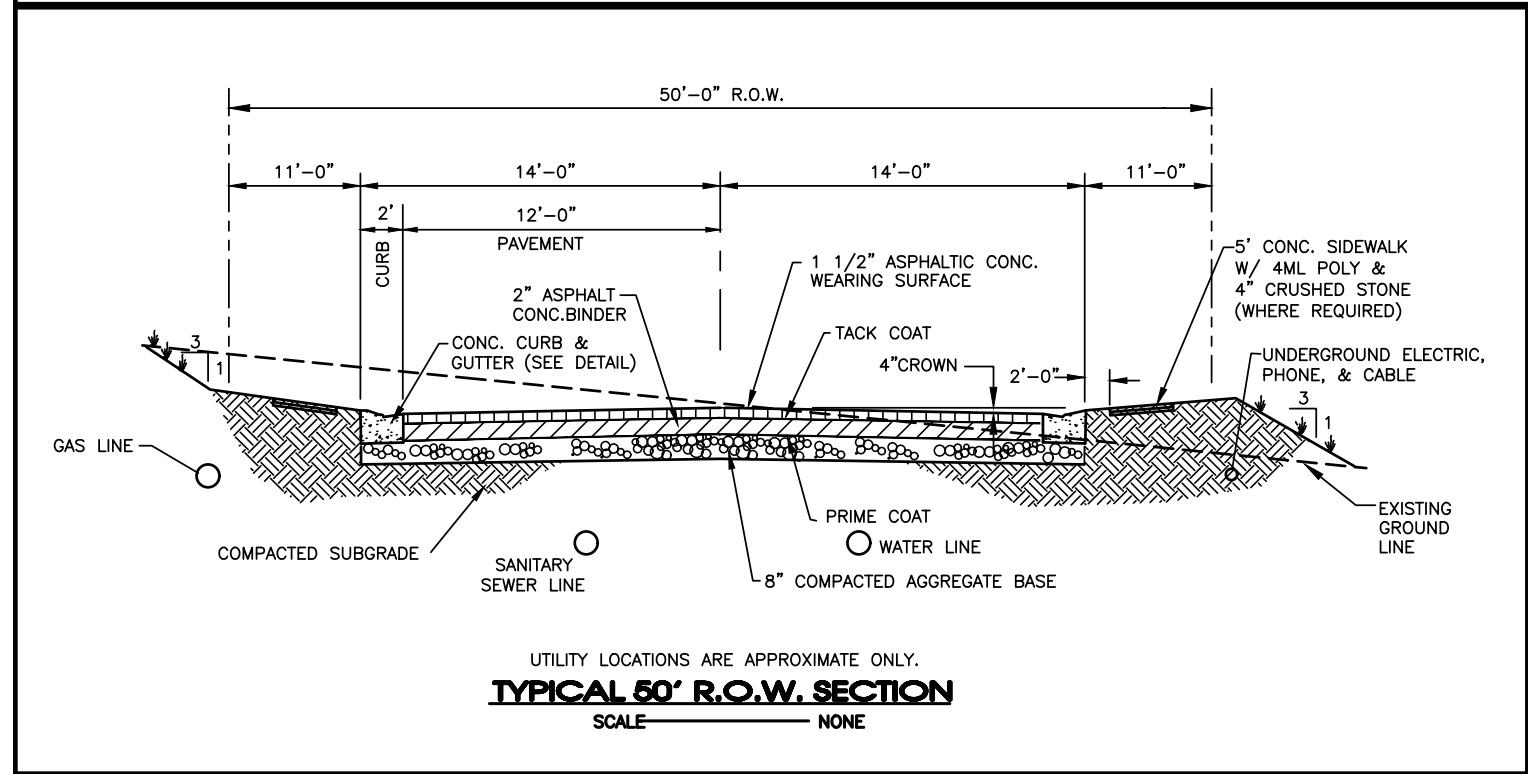
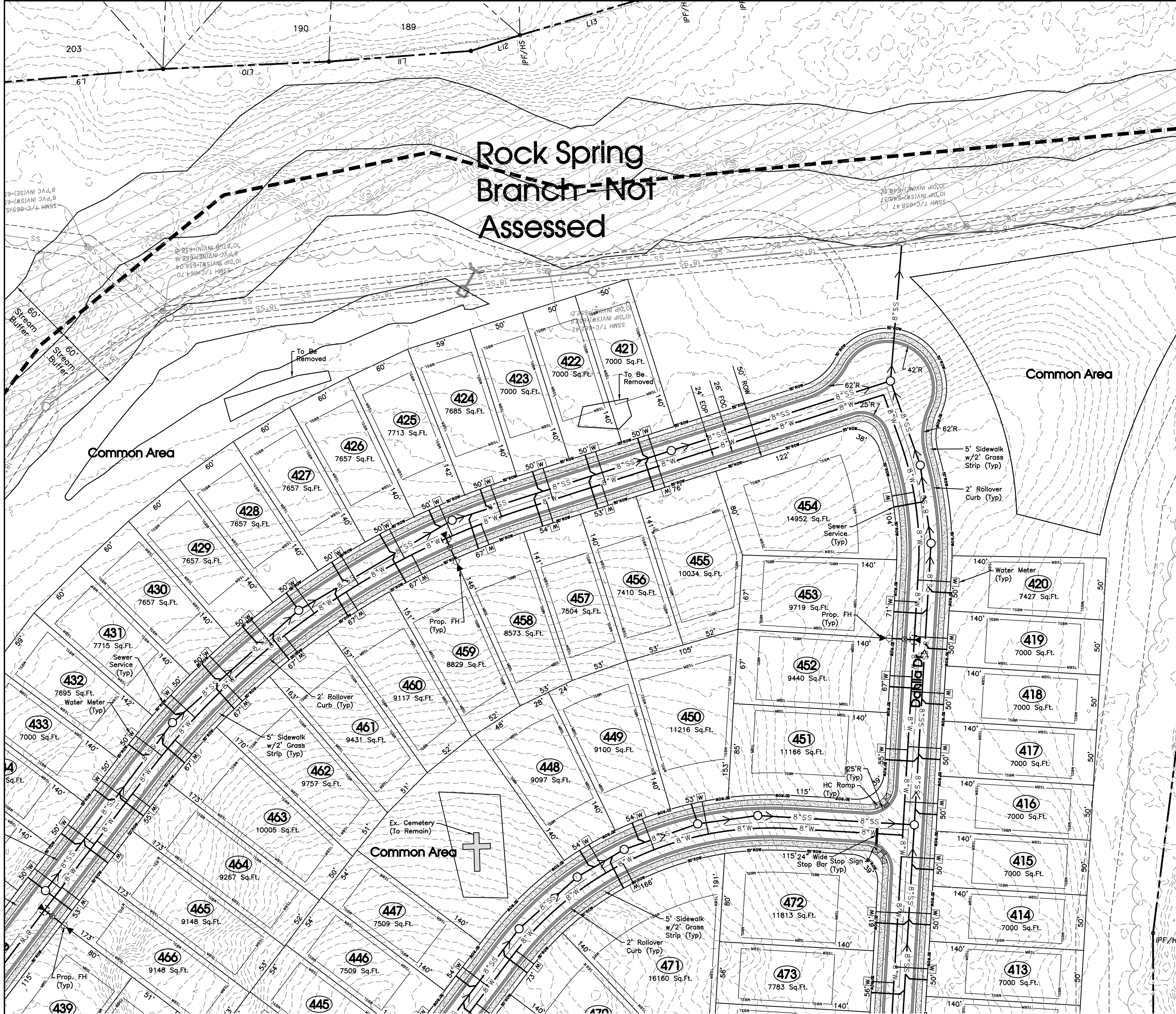
A. TAYLOR
REGISTERED PROFESSIONAL ENGINEER
STATE OF TENNESSEE

Arbor Ridge
Section 4, 5, 9A, & 10
La Vergne, Tennessee

Preliminary Plat

DRAWN: CFB3, SJA
DATE: 4-24-2023
CHECKED:
FILE NAME:
SCALE:
1"=50'
JOB NO.
18314
SHEET:

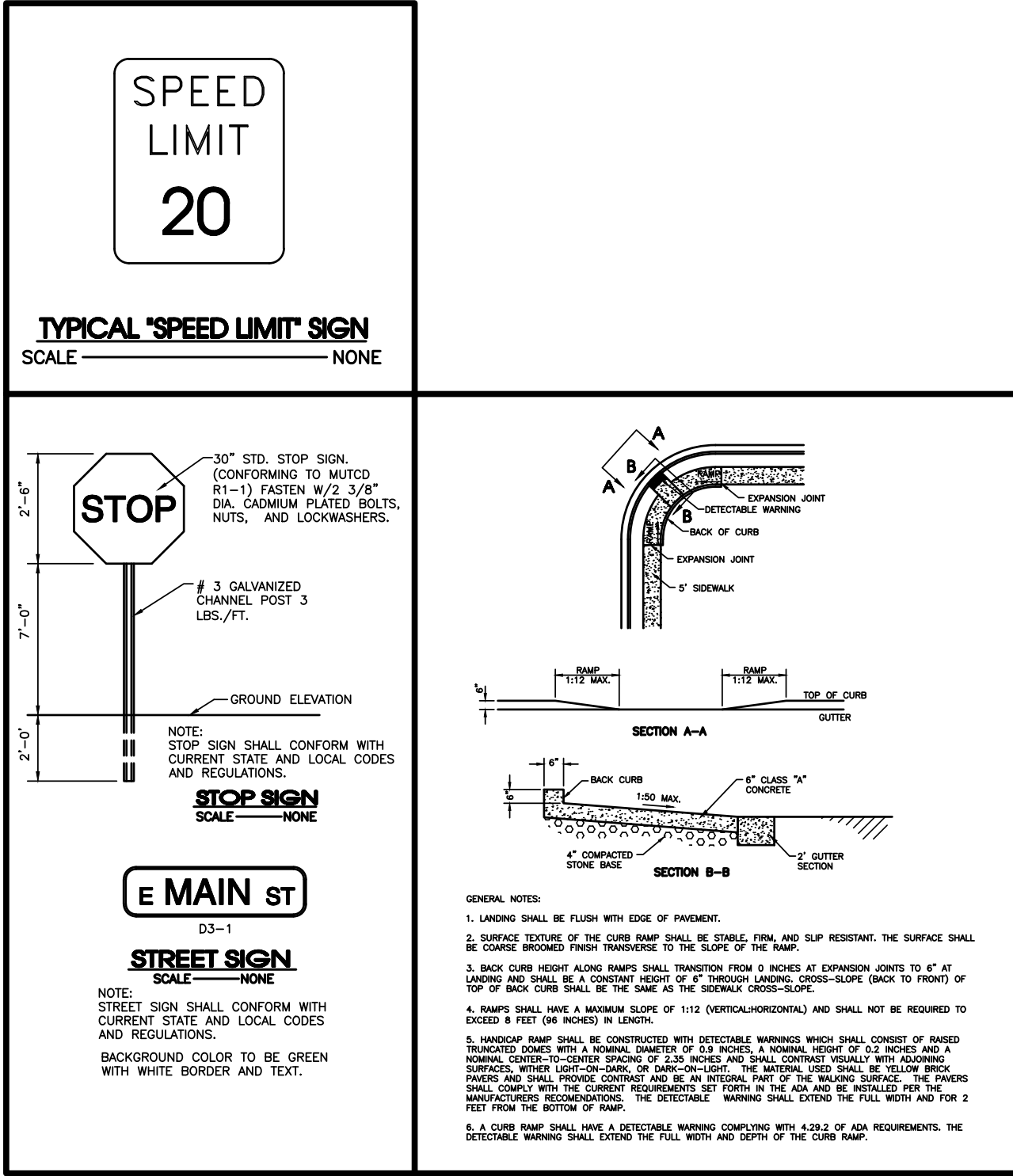
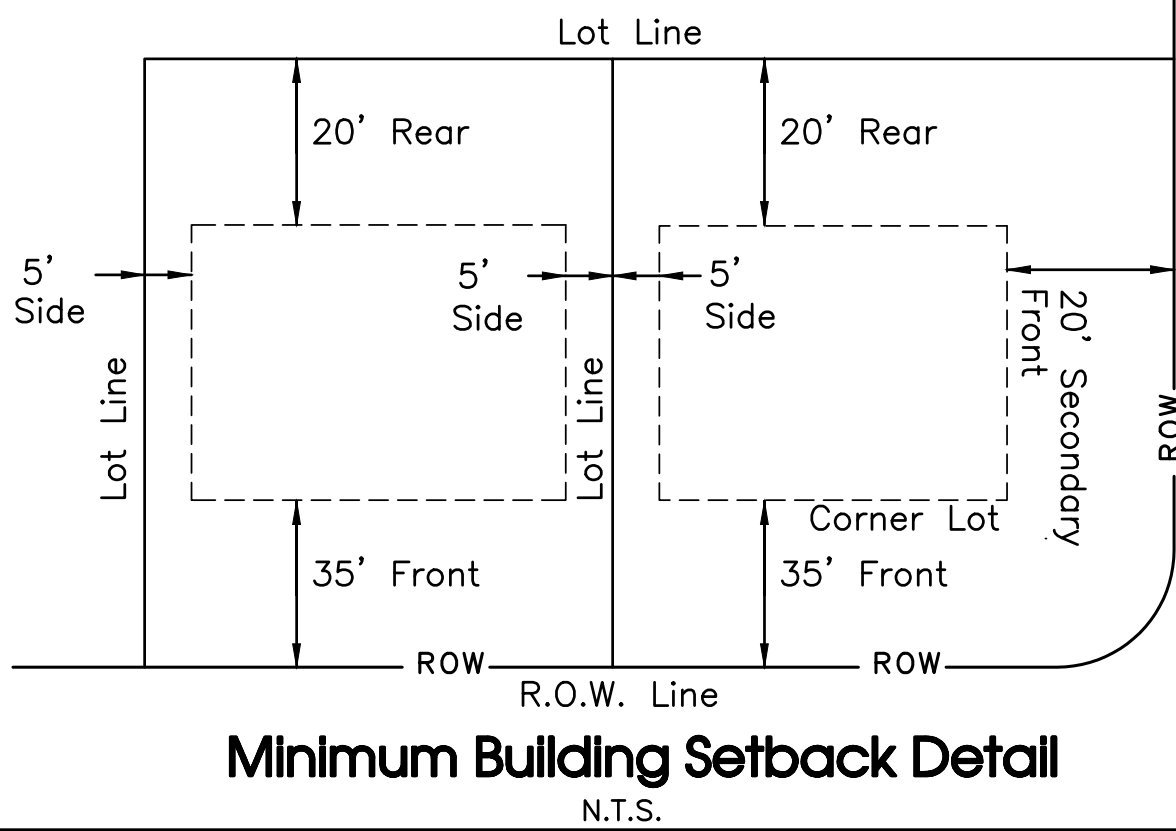
C1.4



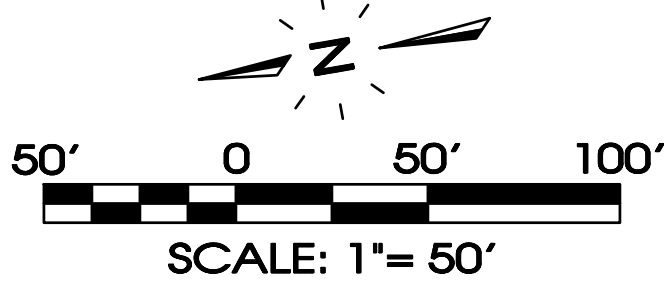
Note: Developer Is Responsible For The Installation Of Street Lights. Street Lights Shall Be Located No More Than 300 Feet Apart.

The proposed electrical, gas, water and telecommunications information shown hereon is not an actual design to be used for construction, and is for reference and illustrative purposes only. The contractor shall refer to the actual final design for each proper discipline (electrical, civil, mechanical, etc.) with the Tennessee professional engineer's seal, for precise design information

Electrical Legend	
	TRANSFORMER 36"x40"
	MANHOLE
	STREET LIGHT
	SWITCHER
	PRIMARY PULLBOX
	SECONDARY PULLBOX 24" x 36"
	CONDUIT-SEE NOTE
	3 PH Sector Cabinet



- GENERAL NOTES
- THE PURPOSE OF THIS PRELIMINARY PLAT IS TO CREATE 95 SINGLE FAMILY LOTS.
SECTION 4: 46 LOTS
SECTION 5: 32 LOTS
SECTION 9A: 44 LOTS
SECTION 10: 105 LOTS
 - BEARING SYSTEM IS BASED ON TENNESSEE STATE PLANE COORDINATES TIED TO RUTHERFORD COUNTY CONTROL POINT RCC-011 (NAD 83-96).
 - THIS PROPERTY LIES WITHIN ZONE X, PER FEMA FIRM MAPS FOR RUTHERFORD COUNTY, MAP NO. 47149C0105H, EFFECTIVE DATE: JANUARY 5, 2007.
 - PARCELS MAY BE SUBJECT TO ADDITIONAL ESMT'S AND/OR RESTRICTIONS, BY RECORD OR PRESCRIPTION, THAT A COMPLETE TITLE SEARCH MAY REVEAL.
 - PROPERTY IS ZONED PDR (PLANNED DENSITY RESIDENTIAL). MINIMUM SETBACK REQUIREMENTS ARE: FRONT=35' FT. - SIDE=5' FT. - REAR=20' FT.
 - ALL CRITICAL LOTS (WITH 15% SLOPES OR GREATER), ARE DENOTED WITH AN ASTERISK. ENGINEERED PLOT PLANS ARE REQUIRED FOR THESE LOTS PRIOR TO OBTAINING A BUILDING PERMIT.
 - ALL COMMON AREAS SHALL BE OWNED AND MAINTAINED BY THE HOMEOWNERS ASSOCIATION.
 - DEVELOPER IS RESPONSIBLE FOR THE INSTALLATION OF STREET LIGHTS. STREET LIGHTS SHALL BE LOCATED NO MORE THAN 300 FEET APART.
 - NO MORE THAN 500 LINEAR FEET TOTAL OF TRENCHING WILL BE ALLOWED TO BE OPEN AT ONE TIME. (ALL UTILITIES & STORM DRAINS).



Legend:			
	EXIST. CONCRETE MONUMENT		BENCHMARK
	IRON PIN SET (I.P.S.)		HANDICAP PARKING SYMBOL
	IRON PIN FOUND (I.P.F.)	V.A.	VAN ACCESSIBLE HANDICAP DESIGNATION
	EXIST. SIGN POST		HC SIGN
	EXIST. SEWER CLEANOUT		PROPOSED SIGN POST
	EXIST. MANHOLE (SEWER & PHONE)		CONCRETE BOLLARD
	EXIST. CATCH BASIN (STORM SEWER)		WHEEL STOP
	EXIST. WATER/GAS VALVE		CONCRETE SIDEWALK
	EXIST. TELEPHONE RISER		EXTRUDED CURB
	EXIST. GAS RISER		CURB & GUTTER
	ELECTRICAL ENCLOSURE		TRAFFIC ARROW
	EXIST. WATER METER		TURN LANE ARROWS
	EXIST. UTILITY POLE		REVISION NUMBER
	EXIST. FIRE HYDRANT	#1	DRAINAGE STRUCTURE DESIGNATION
	POST INDICATOR VALVE		DRAINAGE PIPE DESIGNATION
	BLOW OFF VALVE		RIP RAP
	REDUCER		RUNOFF FLOW ARROW
	REMOTE FIRE DEPT. CONNECTION		INLET FILTER PROTECTION
	CONCRETE THRUST BLOCK	63.25 x	PROPOSED SPOT ELEVATION
	DOUBLE DETECTOR CHECK VALVE	(63.25) x	EXIST. SPOT ELEVATION
	FIRE DEPT. CONNECTION		SEWER/STORM FLOW DIRECTION
	FIRE HYDRANT		CATCH BASIN
	GATE VALVE & BOX		CURB INLET
	WATER METER		AREA DRAIN
	GAS METER		HEADWALL
	GREASE TRAP		WINGED HEADWALL
	EXTERIOR CLEANOUT ECO		CONCRETE SWALE
	MANHOLE		TYPE- X- HEADWALL

EXISTING PHONE	PH
EXISTING ELECTRIC	OH
PROPERTY LINE	
EASEMENTS	
RIGHT OF WAY	50' ROW
EROSION CONTROL SILT FENCE	SF SF SF
EROSION EEL	E E E
EXISTING TREELINE	
EXISTING FENCELINE	X X X X
MINIMUM BUILDING SETBACK LINE	
PHASE BOUNDARY	
EXISTING GAS LINE	GAS
PROPOSED GAS LINE	GAS
EXISTING STORM	STM STM
PROPOSED STORM	STM STM
EXISTING CONTOUR LINES	601
PROPOSED CONTOUR LINES	601
EXISTING SANITARY SEWER	SS SS
PROPOSED SANITARY SEWER	
EXISTING WATER	W W
PROPOSED WATER	W W

Owner/Developer:
Starlight Homes Tennessee LLC
99 E. Main St. Suite 200
Franklin, TN 37064
Contact: Christian Macari

Floodplain Note:
This site lies within Zone X, areas determined to be outside the 0.2% annual chance flood plain. FEMA FIRM map #47149C0105H, Dated Jan. 5, 2007.

Deed Reference:
Tax Map 32, Parcel 4.00
Zoning: PDR (Planned Density Residential)
Section 4: 46 Lots on 9.10± Acres
Section 5: 32 Lots on 13.85± Acres
Section 9A: 44 Lots on 22.86± Acres
Section 10: 105 Lots on 39.28± Acres
Min. Lot Size = 41' Wide; 5,740 Sq.Ft. Minimum

ENGINEERING • SURVEYING • LAND PLANNING

LANDSCAPE ARCHITECTURE

SEC, Inc.

850 MIDDLE TENNESSEE BOULEVARD
MURFREESBORO, TENNESSEE 37129
PHONE: (615) 890-7901
E-MAIL: MTAYLOR@SEC-CIVIL.COM
FAX: (615) 895-2567
NO PORTION OF THIS DRAWING MAY BE REPRODUCED WITHOUT THE EXPRESSED WRITTEN CONSENT OF SEC, INC.
COPYRIGHT SEC, INC., 2023

THESE PLANS HAVE BEEN PREPARED BY THE ENGINEER OR ARCHITECT AND TO THE BEST OF HIS OR HER KNOWLEDGE AND BELIEF THEY COMPLY WITH ALL APPLICABLE LAWS, RULES AND REGULATIONS. THE ENGINEER OR ARCHITECT ASSUMES NO ADMINISTRATIVE LIABILITY OR RESPONSIBILITY IN THE TOTAL ACCORDANCE WITH THE DESIGN AS NOTED, DESCRIBED, AND ILLUSTRATED. THE ENGINEER ASSUMES NO ADMINISTRATIVE LIABILITY OR RESPONSIBILITY IN THE TOTAL ACCORDANCE WITH THE DESIGN AS NOTED, DESCRIBED, AND ILLUSTRATED.

Arbor Ridge

Section 4, 5, 9A, & 10

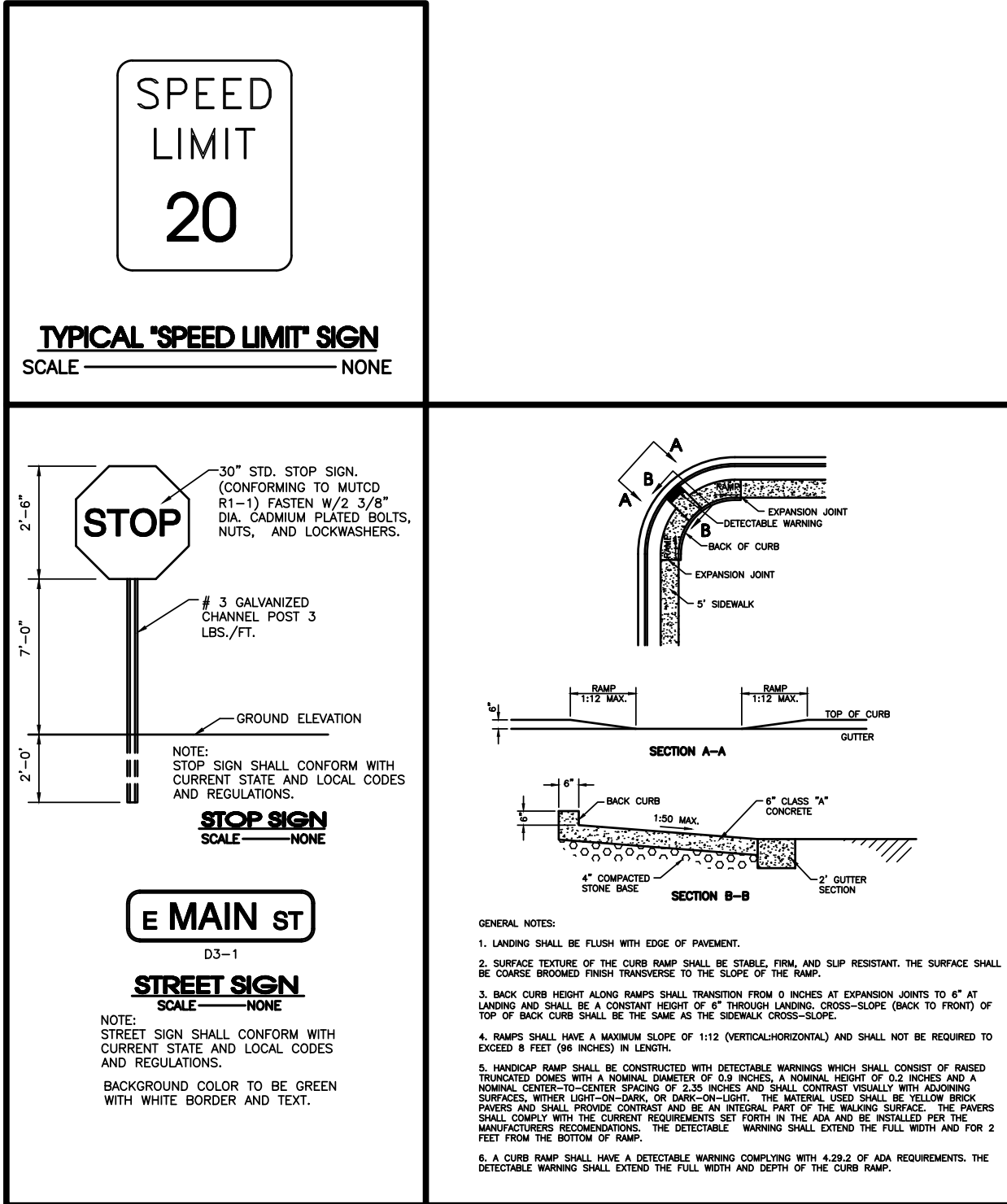
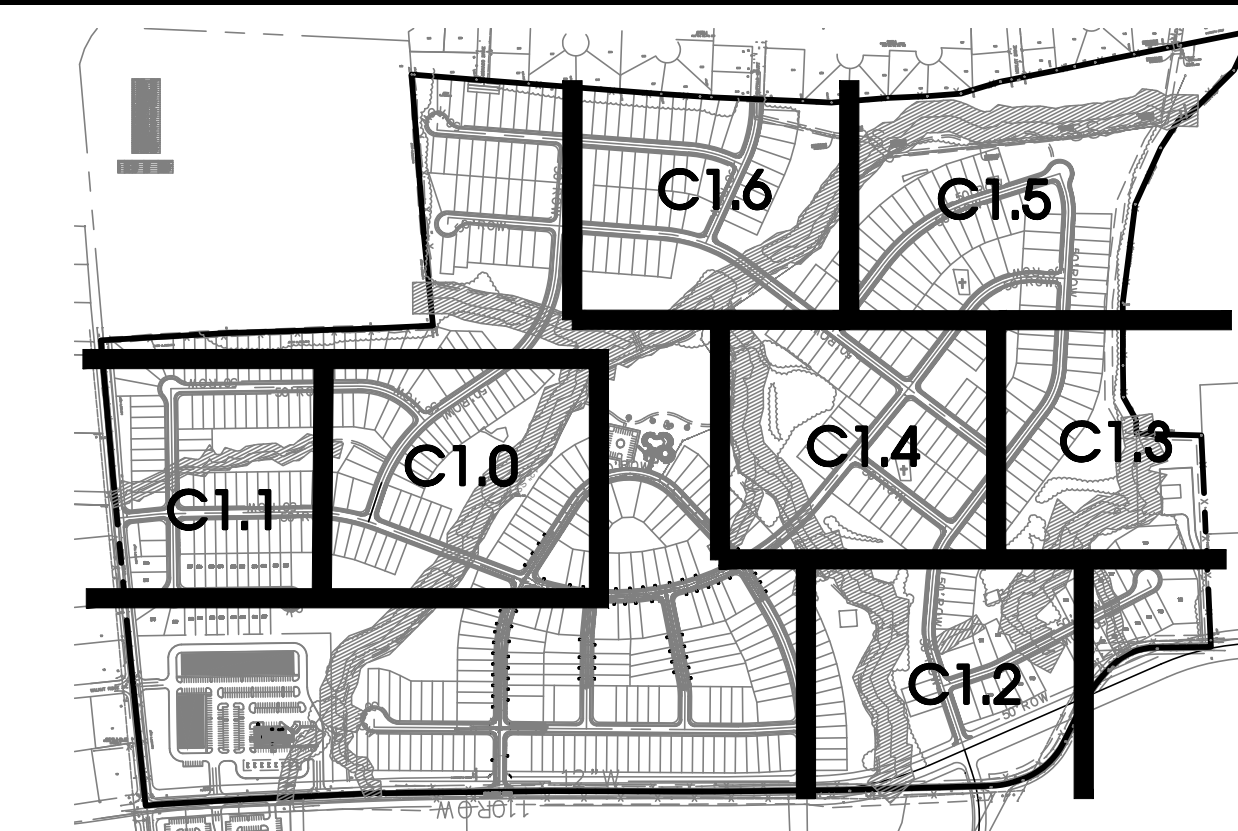
La Vergne, Tennessee

DRAWN: CFB3, SJA
DATE: 4-24-2023
CHECKED:
MAT
FILE NAME:
18314prelimplnph-2
SCALE:
1"=50'
JOB NO.
18314
SHEET:

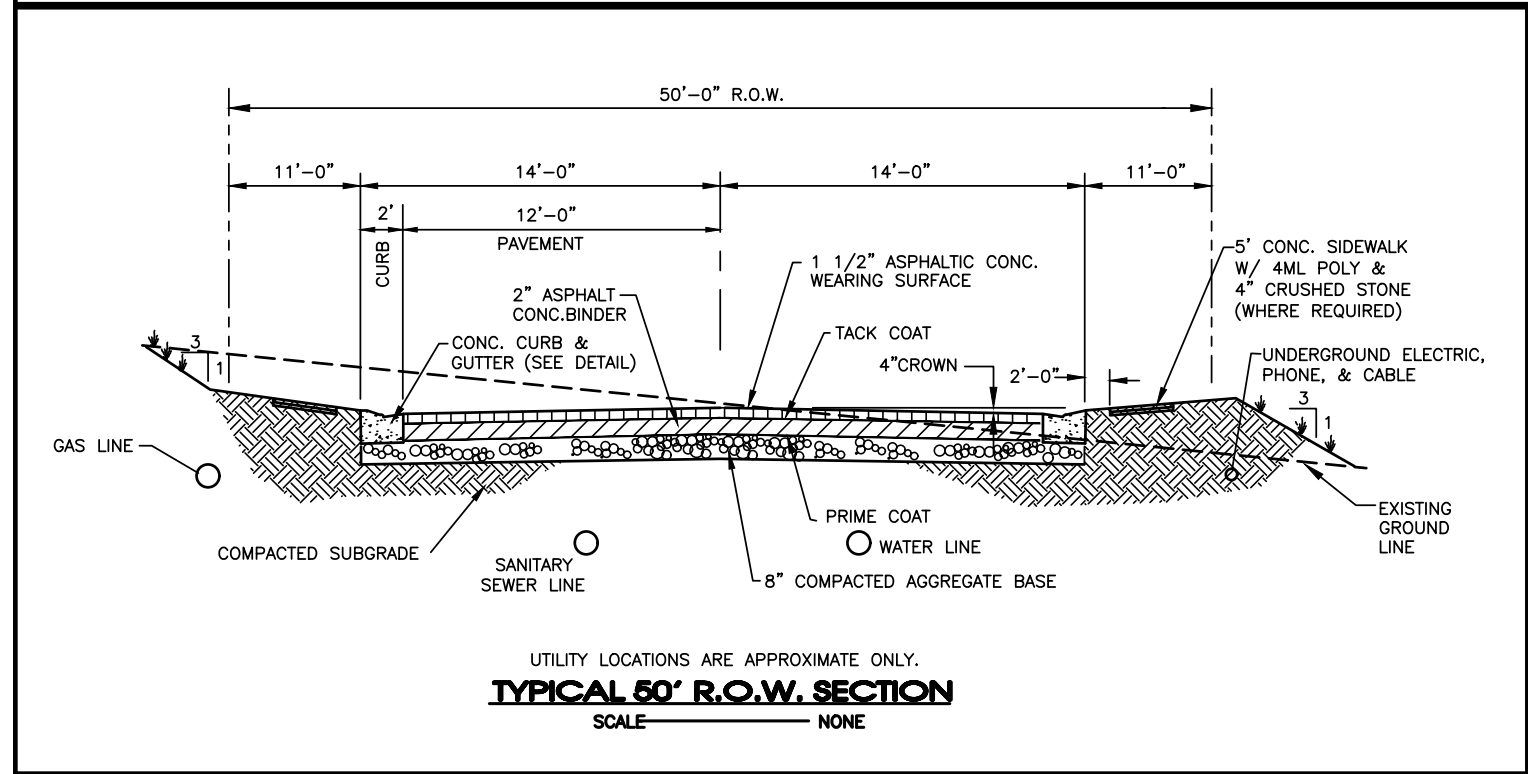
Preliminary Plat

C1.5

Page 218 of 227



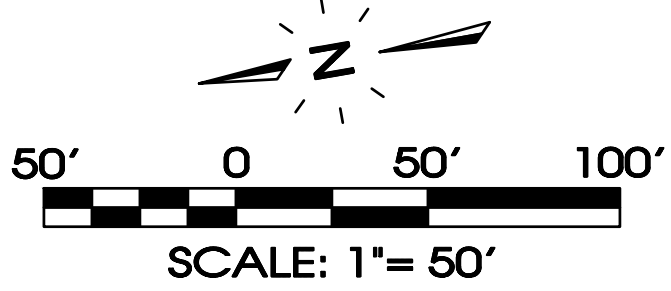
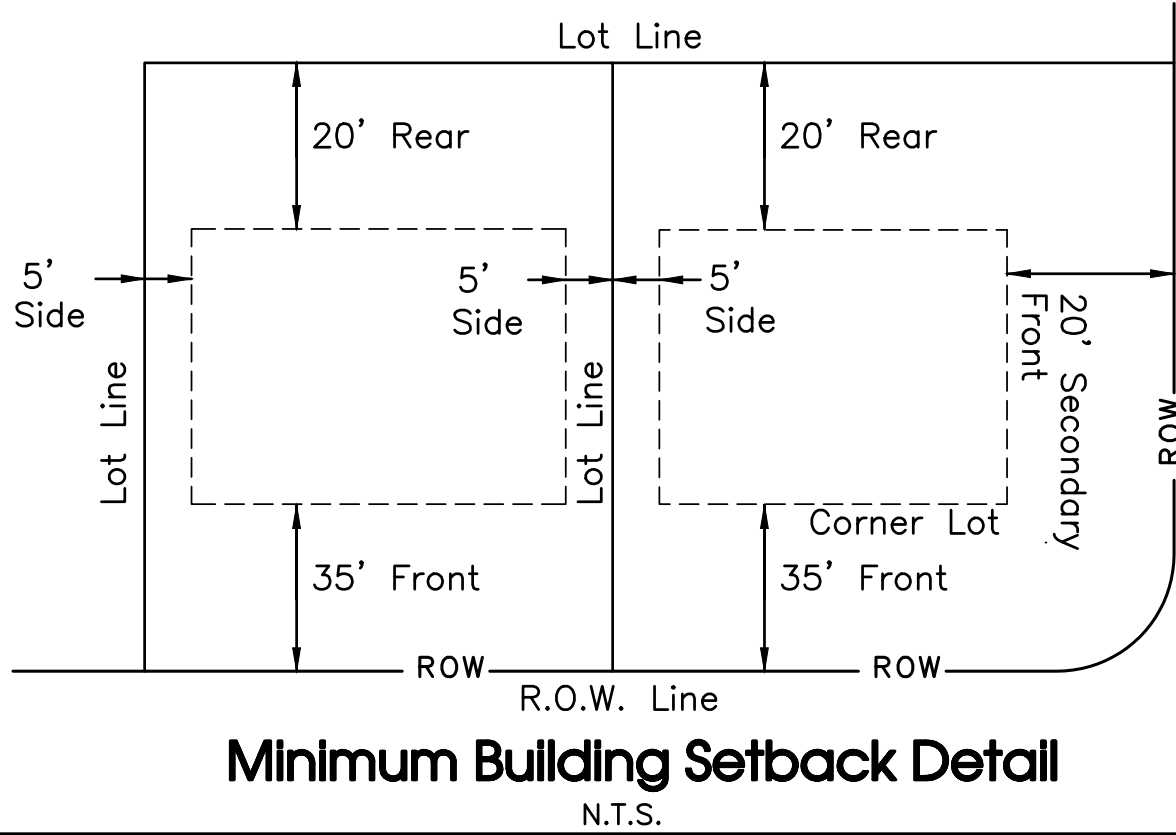
- GENERAL NOTES
- THE PURPOSE OF THIS PRELIMINARY PLAT IS TO CREATE 95 SINGLE FAMILY LOTS.
SECTION 4: 46 LOTS
SECTION 5: 32 LOTS
SECTION 9A: 44 LOTS
SECTION 10: 105 LOTS
 - BEARING SYSTEM IS BASED ON TENNESSEE STATE PLANE COORDINATES TIED TO RUTHERFORD COUNTY CONTROL POINT RCC-011 (NAD 83-96).
 - THIS PROPERTY LIES WITHIN ZONE X, PER FEMA FIRM MAPS FOR RUTHERFORD COUNTY, MAP NO. 47149C0105H, EFFECTIVE DATE: JANUARY 5, 2007.
 - PARCELS MAY BE SUBJECT TO ADDITIONAL ESMT'S AND/OR RESTRICTIONS, BY RECORD OR PRESCRIPTION, THAT A COMPLETE TITLE SEARCH MAY REVEAL.
 - PROPERTY IS ZONED PDR (PLANNED DENSITY RESIDENTIAL). MINIMUM SETBACK REQUIREMENTS ARE: FRONT=35' FT. - SIDE=5' FT. - REAR=20' FT.
 - ALL CRITICAL LOTS (WITH 15% SLOPES OR GREATER), ARE DENOTED WITH AN ASTERISK. ENGINEERED PLOT PLANS ARE REQUIRED FOR THESE LOTS PRIOR TO OBTAINING A BUILDING PERMIT.
 - ALL COMMON AREAS SHALL BE OWNED AND MAINTAINED BY THE HOMEOWNERS ASSOCIATION.
 - DEVELOPER IS RESPONSIBLE FOR THE INSTALLATION OF STREET LIGHTS. STREET LIGHTS SHALL BE LOCATED NO MORE THAN 300 FEET APART.
 - NO MORE THAN 500 LINEAR FEET TOTAL OF TRENCHING WILL BE ALLOWED TO BE OPEN AT ONE TIME. (ALL UTILITIES & STORM DRAINS).



Note: Developer Is Responsible For The Installation Of Street Lights. Street Lights Shall Be Located No More Than 300 Feet Apart.

The proposed electrical, gas, water and telecommunications information shown hereon is not an actual design to be used for construction, and is for reference and illustrative purposes only. The contractor shall refer to the actual final design for each proper discipline (electrical, civil, mechanical, etc.) with the Tennessee professional engineer's seal, for precise design information

- Electrical Legend
- TRANSFORMER 36"x40"
 - MANHOLE
 - STREET LIGHT
 - SWITCHER
 - PRIMARY PULLBOX
 - SECONDARY PULLBOX 24" x 36"
 - CONDUIT-SEE NOTE
 - 3 PH Sector Cabinet



Legend:	
	EXIST. CONCRETE MONUMENT
	IRON PIN SET (I.P.S.)
	IRON PIN FOUND (I.P.F.)
	EXIST. SIGN POST
	EXIST. SEWER CLEANOUT
	EXIST. MANHOLE (SEWER & PHONE)
	EXIST. CATCH BASIN (STORM SEWER)
	EXIST. WATER/GAS VALVE
	EXIST. TELEPHONE RISER
	EXIST. GAS RISER
	ELECTRICAL ENCLOSURE
	EXIST. WATER METER
	EXIST. UTILITY POLE
	EXIST. FIRE HYDRANT
	POST INDICATOR VALVE
	BLOW OFF VALVE
	REDUCER
	REMOTE FIRE DEPT. CONNECTION
	CONCRETE THRUST BLOCK
	DOUBLE DETECTOR CHECK VALVE
	FIRE DEPT. CONNECTION
	FIRE HYDRANT
	GATE VALVE & BOX
	WATER METER
	GAS METER
	GREASE TRAP
	EXTERIOR CLEANOUT ECO
	MANHOLE
	BENCHMARK
	HANDICAP PARKING SYMBOL
	V.A. VAN ACCESSIBLE HANDICAP DESIGNATION
	HC SIGN
	PROPOSED SIGN POST
	CONCRETE BOLLARD
	WHEEL STOP
	CONCRETE SIDEWALK
	EXTRUDED CURB
	CURB & GUTTER
	TRAFFIC ARROW
	TURN LANE ARROWS
	REVISION NUMBER
	#1 DRAINAGE STRUCTURE DESIGNATION
	DRAINAGE PIPE DESIGNATION
	RIP RAP
	RUNOFF FLOW ARROW
	INLET FILTER PROTECTION
	63.25 x PROPOSED SPOT ELEVATION
	(63.25) x EXIST. SPOT ELEVATION
	> SEWER/STORM FLOW DIRECTION
	CATCH BASIN
	CURB INLET
	AREA DRAIN
	HEADWALL
	WINGED HEADWALL
	CONCRETE SWALE
	TYPE- X- HEADWALL

EXISTING PHONE	PH
EXISTING ELECTRIC	OH
PROPERTY LINE	
EASEMENTS	
RIGHT OF WAY	50' ROW
EROSION CONTROL SILT FENCE	SF SF
EROSION EEL	E E
EXISTING TREELINE	
EXISTING FENCELINE	X X X X
MINIMUM BUILDING SETBACK LINE	
PHASE BOUNDARY	
EXISTING GAS LINE	GAS
PROPOSED GAS LINE	GAS
EXISTING STORM	ST.M. ST.M.
PROPOSED STORM	ST.M. ST.M.
EXISTING CONTOUR LINES	60 60
PROPOSED CONTOUR LINES	60 60
EXISTING SANITARY SEWER	SS SS
PROPOSED SANITARY SEWER	
EXISTING WATER	W W
PROPOSED WATER	W W

Owner/Developer:
Starlight Homes Tennessee LLC
99 E. Main St. Suite 200
Franklin, TN 37064
Contact: Christian Macari

Floodplain Note:
This site lies within Zone X, areas determined to be outside the 0.2% annual chance flood plain. FEMA FIRM map #47149C0105H, Dated Jan. 5, 2007.

Deed Reference:
Tax Map 32, Parcel 4.00
Zoning: PDR (Planned Density Residential)
Section 4: 46 Lots on 9.10± Acres
Section 5: 32 Lots on 13.85± Acres
Section 9A: 44 Lots on 22.86± Acres
Section 10: 105 Lots on 39.28± Acres
Min. Lot Size = 41' Wide; 5,740 Sq.Ft. Minimum

ENGINEERING • SURVEYING • LAND PLANNING

LANDSCAPE ARCHITECTURE

SEC, Inc.

850 MIDDLE TENNESSEE BOULEVARD
MURFREESBORO, TENNESSEE 37129
PHONE: (615) 890-7901
E-MAIL: MTAYLOR@SEC-CIVIL.COM
FAX: (615) 895-2567
NO PORTION OF THIS DRAWING MAY BE REPRODUCED WITHOUT THE EXPRESSED WRITTEN CONSENT OF SEC, INC.
COPYRIGHT SEC, INC., 2023

STATE OF TENNESSEE

REGISTERED PROFESSIONAL ENGINEER

REGISTERED LAND SURVEYOR

REGISTERED LANDSCAPE ARCHITECT

REGISTERED PLANNING

Arbor Ridge

Section 4, 5, 9A, & 10

La Vergne, Tennessee

PRELIMINARY

DATE: 4-24-2023

CHECKED: MAT

FILE NAME: 18314preliminaryPlot-2

SCALE: 1"=50'

JOB NO. 18314

SHEET: C1.6

Page 219 of 227



Item #: 12.

Item Title: Concept Plan – Chaney Place – 50 Townhomes on 4.30 Acres. Requested by SEC, Inc. Property located at 237 Chaney Blvd. (Tax Map 28, Parcels 10 & 11). R-3 (High Density Residential) Zoning District. Property owned by Ole South Properties, Inc.

Reviewed By:

Location:

(Insert map here)

Summary: The applicant, SEC, Inc., is requesting approval of a concept plan on approximately 4.30 acres. This property is zoned R-3 (High Density Residential). The property is located at 237 & 245 Chaney Boulevard. The concept plan shows the development of approximately 50 townhomes. There is a mixture of zoning in the area including R-3, R-1 and R-2.

Staff Comments / Technical Items:

Planning

Bo Logan - 615-287-8702
blogan@lavergnen.gov

1. Height is limited to 3 stories or 35 feet.
2. The 15 feet of separation between buildings may need to be reviewed by the Planning Commission, and ultimately the BOZA.

Jake Blair - 615-287-8702
jblair@lavergnen.gov

Engineering

Gary Lide - 615-28-8703
glide@lavergnen.gov

1. Please provide the gross square footage of each four-unit building.
2. Please provide NFPA 80A calculations confirming that 15' separation is sufficient to meet fire codes.

3. Per SubRegs 3-101.2/13, please provide hydraulic calculations sufficient to prove that detention area provided can be designed to meet pre- versus post requirements for design storms from the Stormwater Management Ordinance
4. Given that the site is within 1,000 feet of La Vergne High School and is on Chaney Road which is a heavily-traveled Road connecting Old Nashville Road in La Vergne and Sam Ridley Road in Smyrna, a traffic study will be required. This study should look at both driveways and include whether turn lanes are needed in Chaney Road. It should also look at School Peaks as well as AM/PM peaks.

Utilities

Scott Tatalovich - 615-287-8739
statalovich@lavergnethn.gov

Utility engineer provided water and sewer availability letter for this development on March 30, 2023.
Engineer is unable to comment until both existing and proposed water and sewer utilities are shown on the plans.

Codes

Randolph Salyers - 615-287-8605
rsalyers@lavergnethn.gov

Fire

Curtis Brinkley - 615-405-5931
cbrinkley@lavergnethn.gov

A building height over 30' could affect the project layout.
The height of the concept is not listed.

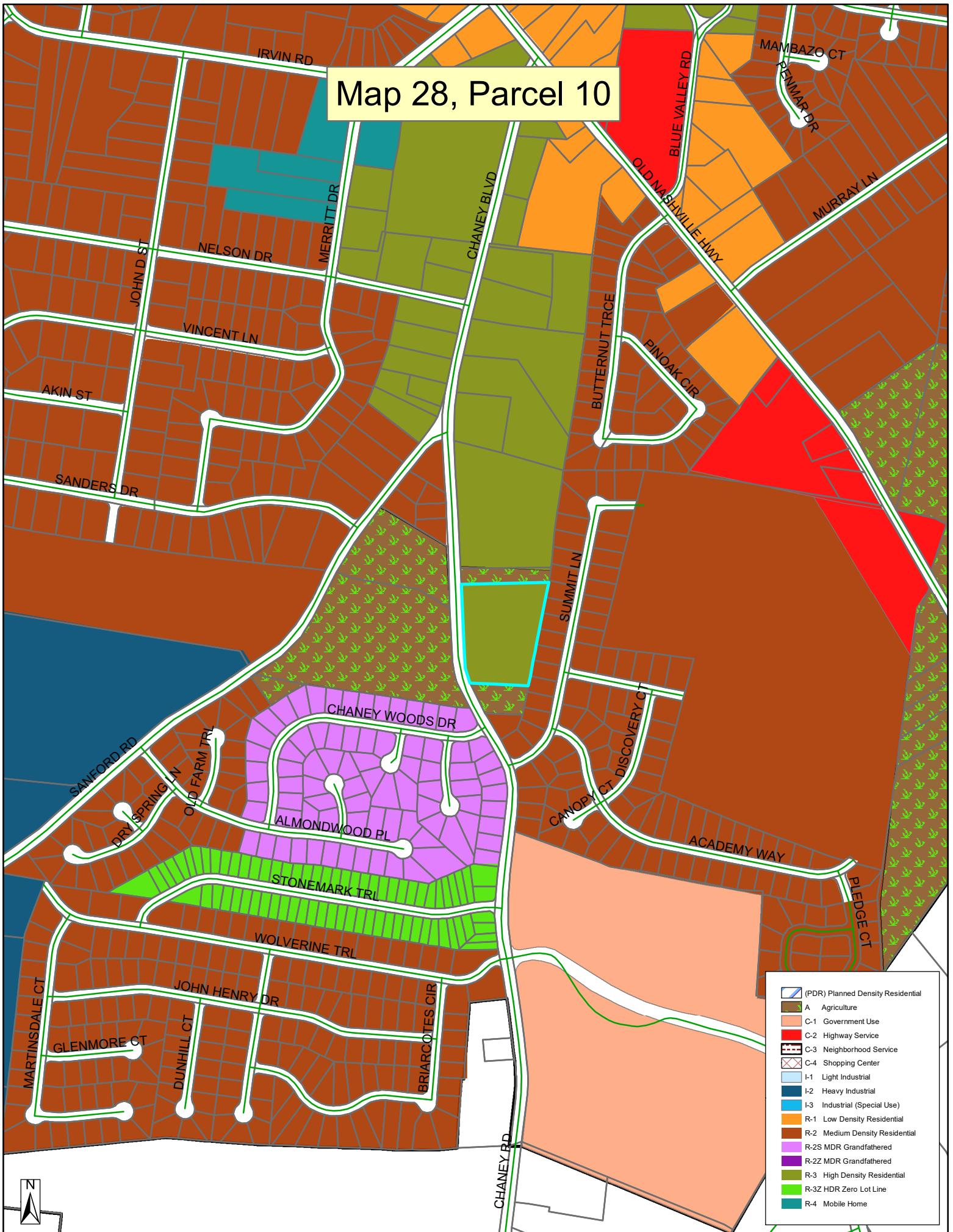
Police

JJ Eubank - 615-287-8613
jeubank@lavergnethn.gov

(Technical items go here)

***Note:** The above technical items may not be the only corrections and/or issues needing to be resolved to get approval from the planning commission. New items can be brought up at the workshop and staff can add items at any time that might have been overlooked. It is the applicant's responsibility to make sure that all technical items are addressed and that no new issues exist before the planning commission meeting. Addressing all technical items does not constitute approval. It is the planning commission's decision whether an item passes or fails. Revised plans are due to staff by the following Monday at close of business unless other arrangements are made and documented.

Map 28, Parcel 10



- (PDR) Planned Density Residential
- A Agriculture
- C-1 Government Use
- C-2 Highway Service
- C-3 Neighborhood Service
- C-4 Shopping Center
- I-1 Light Industrial
- I-2 Heavy Industrial
- I-3 Industrial (Special Use)
- R-1 Low Density Residential
- R-2 Medium Density Residential
- R-2S MDR Grandfathered
- R-2Z MDR Grandfathered
- R-3 High Density Residential
- R-3Z HDR Zero Lot Line
- R-4 Mobile Home

237 Chaney Blvd

CHANNEY BLVD

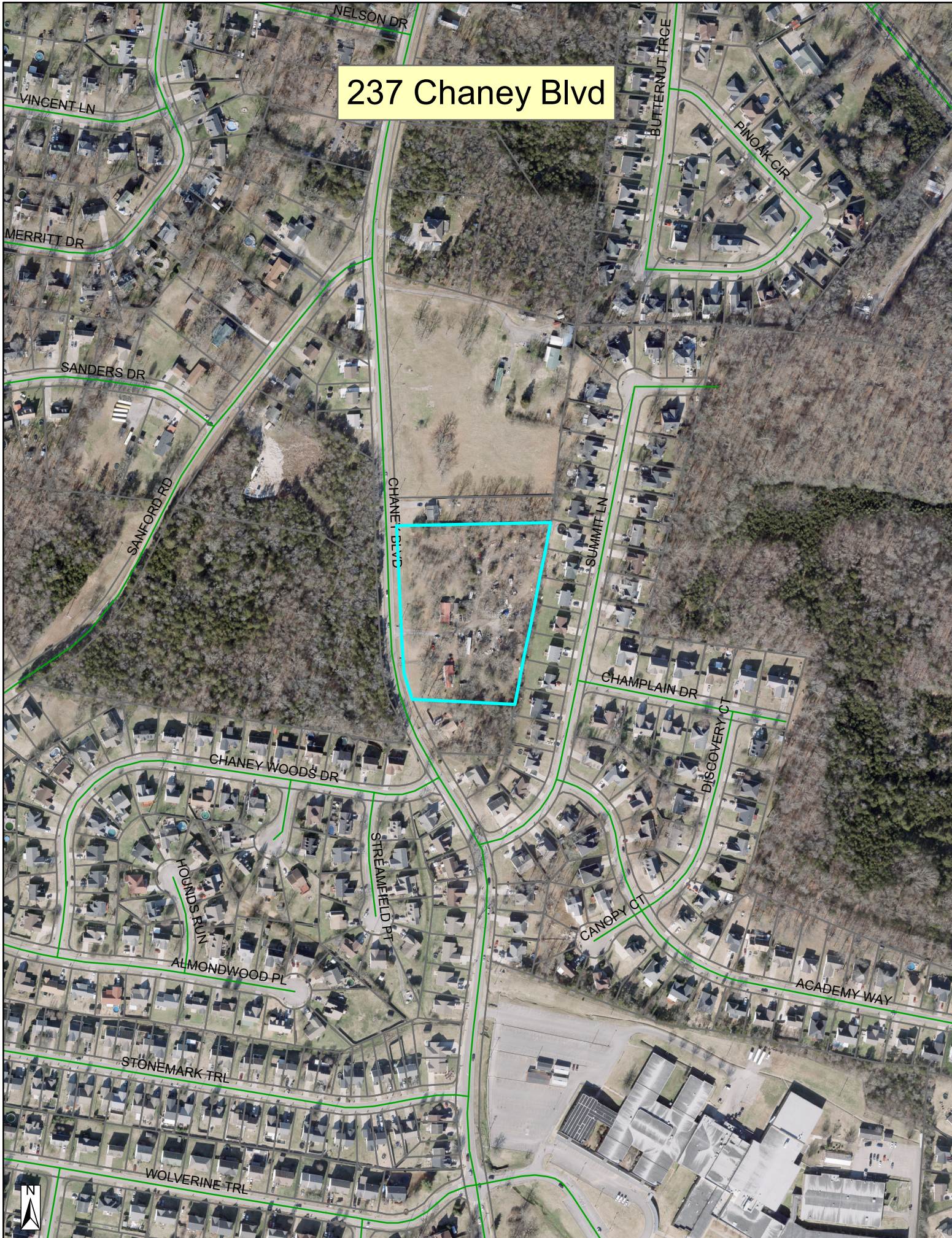
SUMMIT LN

CHAMPLAIN DR

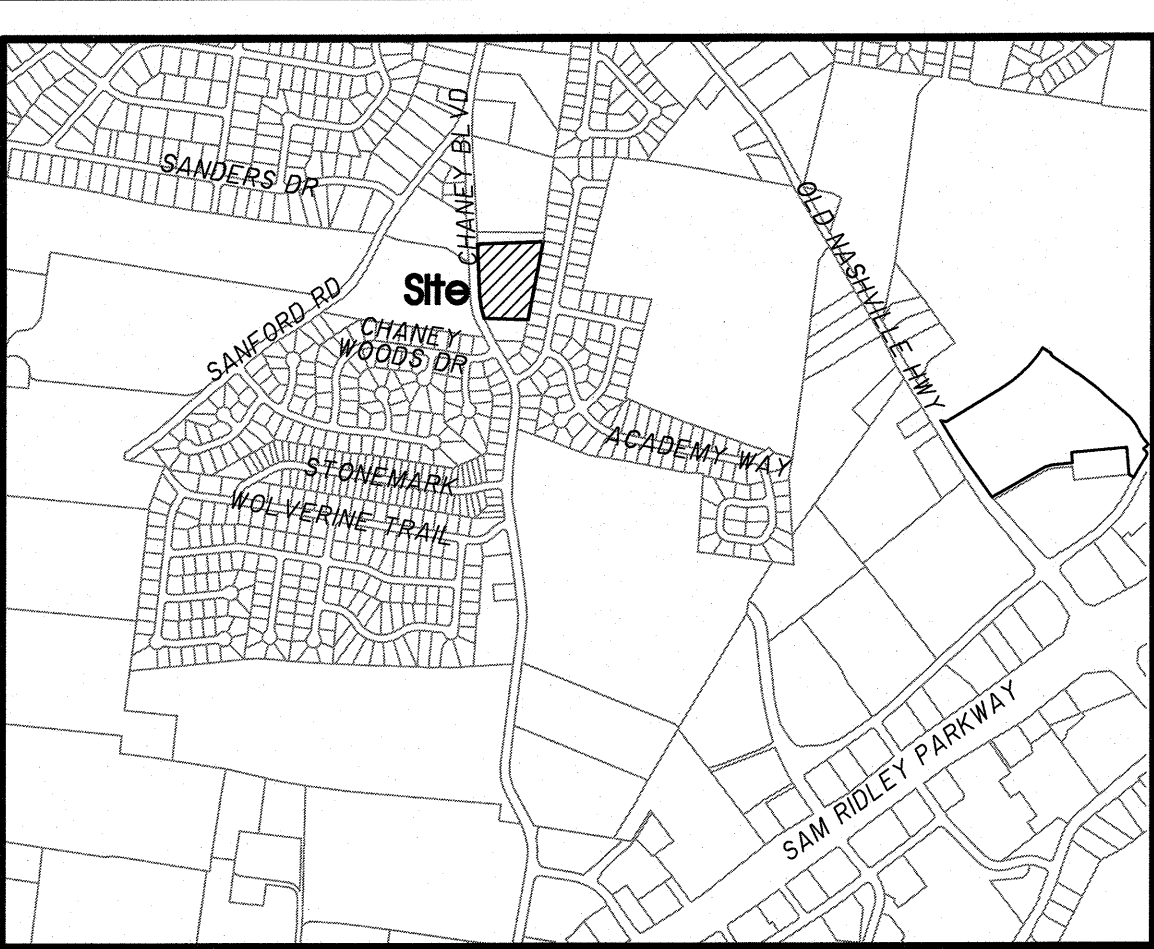
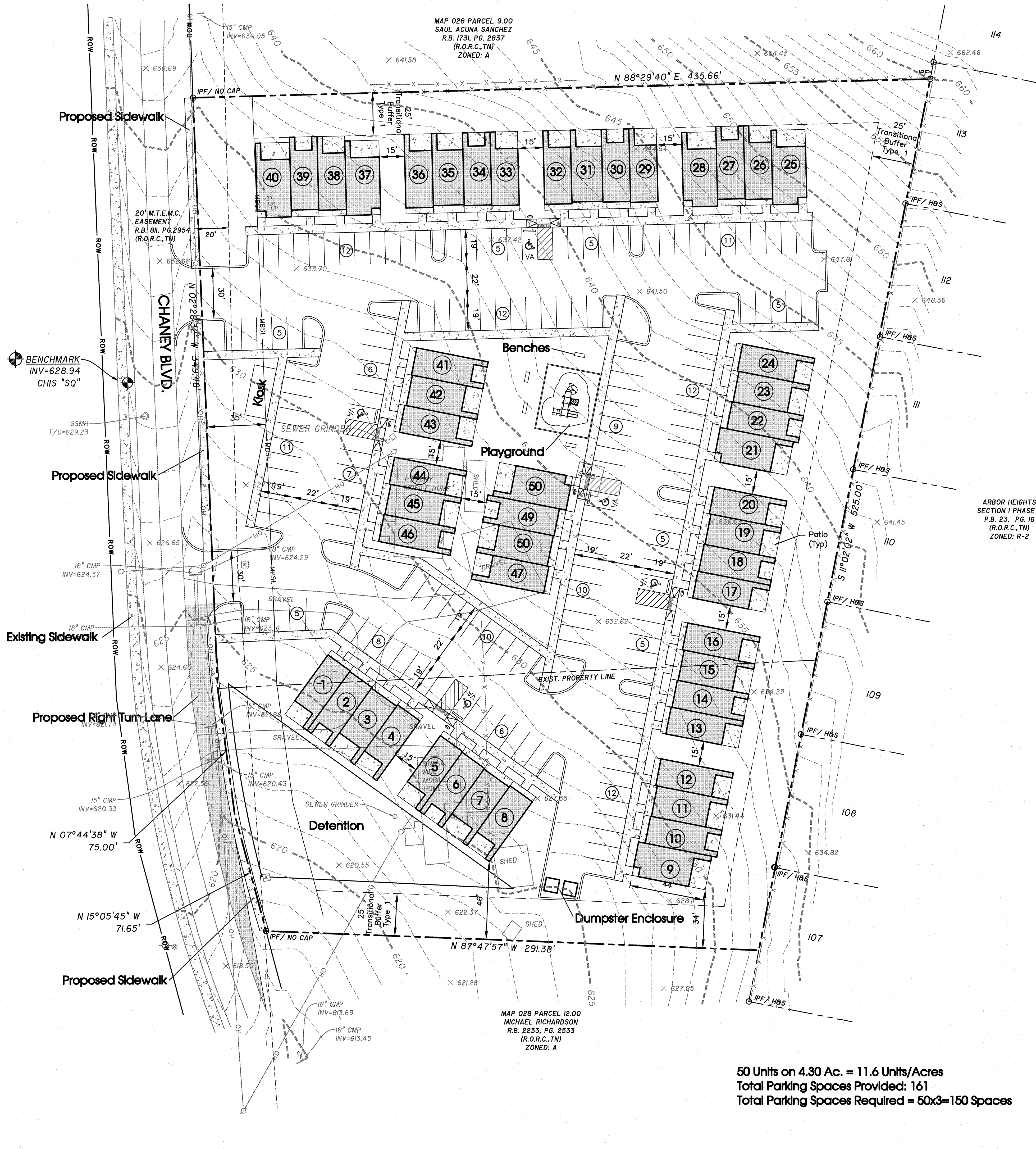
ACADEMY WAY

CHANEY WOODS DR

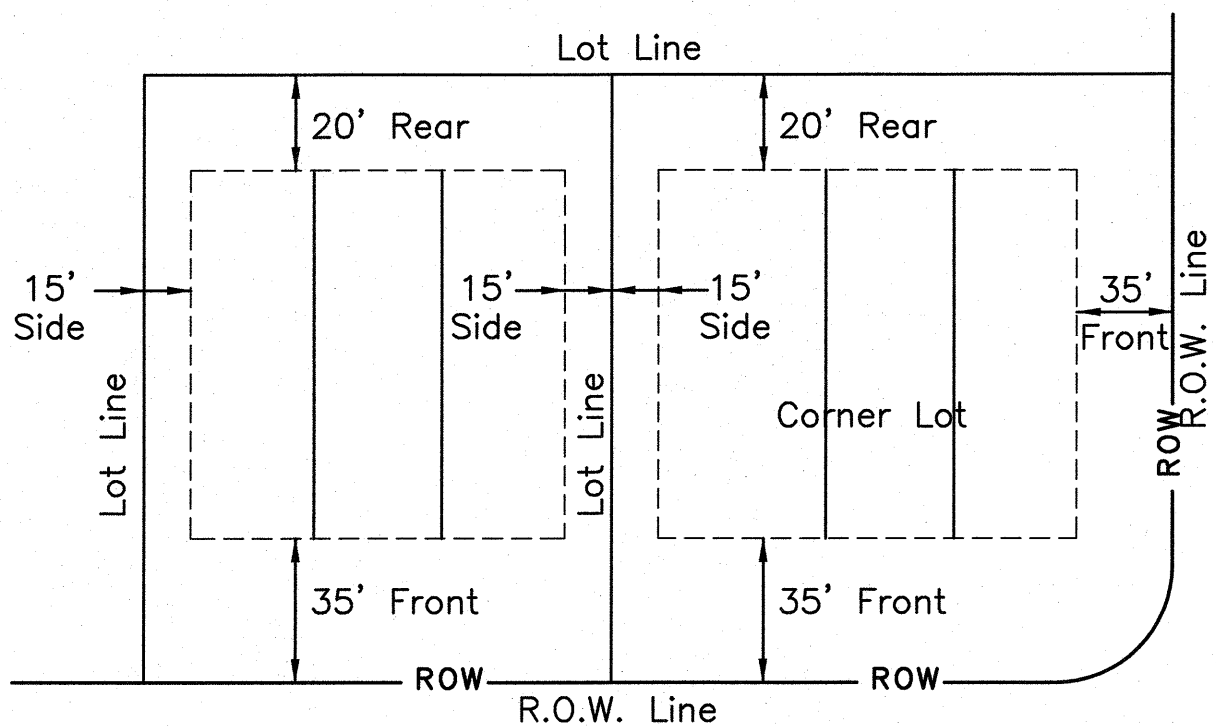




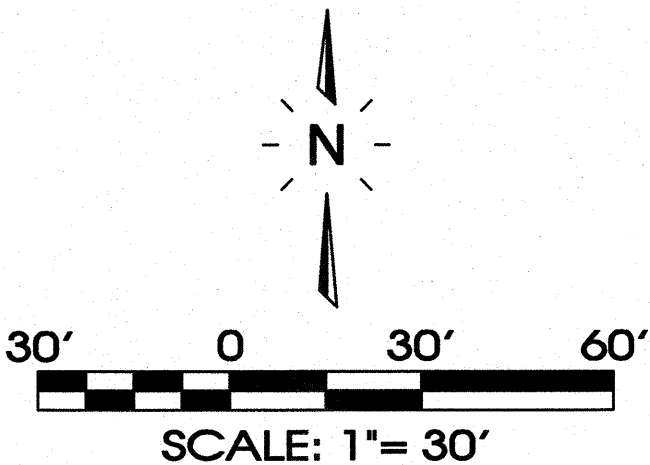
237 Chaney Blvd



Site Location Map
Not To Scale



Minimum Building Setback Detail
Multi-Family Dwelling
N.T.S.



Legend:

EXIST. CONCRETE MONUMENT	BENCHMARK
IRON PIN SET (I.P.S.)	HANDICAP PARKING SYMBOL
IRON PIN FOUND (I.P.F.)	V.A. VAN ACCESSIBLE HANDICAP DESIGNATION
EXIST. SIGN POST	HC SIGN
EXIST. SEWER CLEANOUT	PROPOSED SIGN POST
EXIST. MANHOLE (SEWER & PHONE)	CONCRETE BOLLARD
EXIST. CATCH BASIN (STORM SEWER)	WHEEL STOP
EXIST. WATER/GAS VALVE	CONCRETE SIDEWALK
EXIST. TELEPHONE RISER	EXTRUDED CURB
ELECTRICAL ENCLOSURE	CURB & GUTTER
EXIST. WATER METER	TRAFFIC ARROW
EXIST. UTILITY POLE	TURN LANE ARROWS
EXIST. FIRE HYDRANT	REVISION NUMBER
POST INDICATOR VALVE	DRAINAGE STRUCTURE DESIGNATION
BLOW OFF VALVE	DRAINAGE PIPE DESIGNATION
REDUCER	RIP RAP
REMOTE FIRE DEPT. CONNECTION	INLET FILTER PROTECTION
CONCRETE THRUST BLOCK	PROPOSED SPOT ELEVATION
DOUBLE DETECTOR CHECK VALVE	EXIST. SPOT ELEVATION
FIRE DEPT. CONNECTION	SEWER/STORM FLOW DIRECTION
FIRE HYDRANT	CATCH BASIN
GATE VALVE & BOX	CURB INLET
WATER METER	AREA DRAIN
GAS METER	HEADWALL
GREASE TRAP	WINGED HEADWALL
EXTERIOR CLEANOUT ECO	CONCRETE SWALE
MANHOLE	TYPE - X- HEADWALL

EXISTING PHONE	PH
EXISTING ELECTRIC	OH
PROPERTY LINE	
EASEMENTS	
RIGHT OF WAY	ROW
EROSION CONTROL SILT FENCE	SF SF
EROSION EEL	E E E
EXISTING TREELINE	
EXISTING FENCELINE	X X X X
MINIMUM BUILDING SETBACK LINE	MBSL
PHASE BOUNDARY	
EXISTING GAS LINE	GAS
PROPOSED GAS LINE	GAS
EXISTING STORM	ST.M
PROPOSED STORM	ST.M
EXISTING CONTOUR LINES	601
PROPOSED CONTOUR LINES	601
EXISTING SANITARY SEWER	SS
PROPOSED SANITARY SEWER	SS
EXISTING WATER	W W
PROPOSED WATER	W W

EXISTING PHONE	PH
EXISTING ELECTRIC	OH
PROPERTY LINE	
EASEMENTS	
RIGHT OF WAY	ROW
EROSION CONTROL SILT FENCE	SF SF
EROSION EEL	E E E
EXISTING TREELINE	
EXISTING FENCELINE	X X X X
MINIMUM BUILDING SETBACK LINE	MBSL
PHASE BOUNDARY	
EXISTING GAS LINE	GAS
PROPOSED GAS LINE	GAS
EXISTING STORM	ST.M
PROPOSED STORM	ST.M
EXISTING CONTOUR LINES	601
PROPOSED CONTOUR LINES	601
EXISTING SANITARY SEWER	SS
PROPOSED SANITARY SEWER	SS
EXISTING WATER	W W
PROPOSED WATER	W W

Owner/Developer:
Ole South Properties, Inc.
262 Robert Rose Dr.
Murfreesboro, TN 37129
Contact: Dan Bobo

Floodplain Note:
This site lies within Zone X, areas determined to be outside the 0.2% annual chance flood plain. FEMA FIRM map #47149C0106H, Dated Jan. 5, 2007.

Deed Reference:
Tax Map 28, Parcel 10.00 & 11.00
Zoned: R3
50 Townhomes
Total Land Area: 4.30 Acres
Density: 11.6 d.u./acre (14.5 Allowed)
R.Bk: 2332, Pg. 3395

SEC, Inc.
ENGINEERING • SURVEYING • LAND PLANNING
LANDSCAPE ARCHITECTURE
850 MIDDLE TENNESSEE BOULEVARD
MURFREESBORO, TENNESSEE 37129
PHONE: (615) 890-7901 E-MAIL: MTA@SEC-CIVIL.COM FAX: (615) 895-2567
NO PORTION OF THIS DRAWING MAY BE REPRODUCED WITHOUT THE EXPRESSED WRITTEN CONSENT OF SEC, INC.
COPYRIGHT SEC, INC. 2022

Chaney Place
LaVergne, Tennessee

Concept Plan

REVISIONS:
DRAWN: PRN
DATE: 4-24-2023
CHECKED:
MAT
FILE NAME:
Concept C.dwg
SCALE:
1"=30'
JOB NO.
22118
SHEET:
1 Of 1



Item #: 13.

Item Title: Set Bond Amount for Holmes Place (Tax Map 14, Parcel 24). Requested by Wamble & Associates. R-2 (Medium Density Residential) Zoning District.

Reviewed By:

Location:

(Insert map here)

Summary: Wamble & Assoc., on behalf of their client, is requesting that the Planning Commission set the bond amount for the public improvements at Holmes Place (Tax Map 014, Parcel 024.00), consisting of 31 lots on approximately 12.89 acres. Per the Subdivision Regulations, the developer has submitted three (3) construction bids, an average plus the required 20% contingency, and an estimate provided by the engineer.

Staff Comments / Technical Items:

Planning

Bo Logan - 615-287-8702

(Technical items go here)

blogan@laverghnetn.gov

Jake Blair - 615-287-8702

jblair@laverghnetn.gov

Engineering

Gary Lide - 615-287-8703

Review complete - no comments.

glide@laverghnetn.gov

Utilities

Scott Tatalovich - 615-287-8739 (Technical items go here)

statalovich@laverghnetn.gov

Codes

Randolph Salyers - 615-287-8605 (Technical items go here)
rsalyers@lavergnetrn.gov

Fire

Curtis Brinkley - 615-405-5931 (Technical items go here)
cbrinkley@lavergnetrn.gov

Police

JJ Eubank - 615-287-8613 (Technical items go here)
jeubank@lavergnetrn.gov

***Note:** The above technical items may not be the only corrections and/or issues needing to be resolved to get approval from the planning commission. New items can be brought up at the workshop and staff can add items at any time that might have been overlooked. It is the applicant's responsibility to make sure that all technical items are addressed and that no new issues exist before the planning commission meeting. Addressing all technical items does not constitute approval. It is the planning commission's decision whether an item passes or fails. Revised plans are due to staff by the following Monday at close of business unless other arrangements are made and documented.