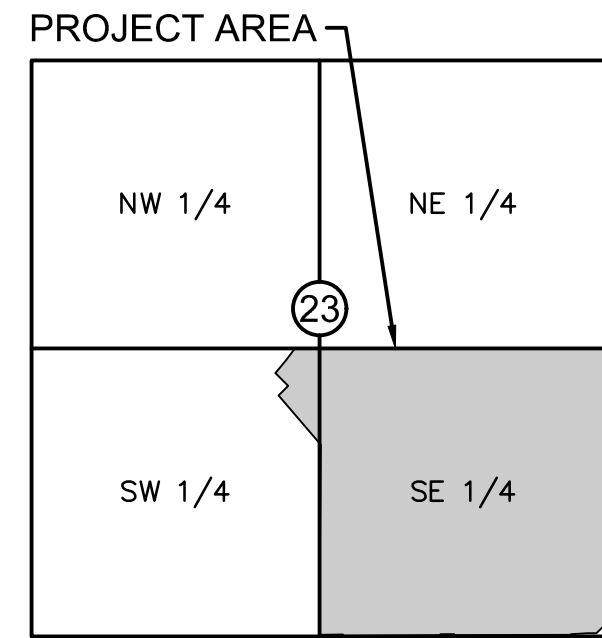


# HOOK FARMS FIRST PLAT STREET AND STORM SEWER PLANS

SECTION 23, TOWNSHIP 47 N, RANGE 32 W  
IN LEE'S SUMMIT, JACKSON COUNTY, MISSOURI



**VICINITY MAP**  
S23, T47N, R32W  
SCALE 1"=2000'

PROJECT TEAM & UTILITY CONTACT LIST	
<b>OWNER / DEVELOPER</b>	HUNT MIDWEST REAL ESTATE DEVELOPMENT, INC. 8300 NE UNDERGROUND DRIVE KANSAS CITY, MO 64161 CONTACT: AARON SCHMIDT PHONE: 816.459.4285 EMAIL: ASCHMIDT@HUNTMIDWEST.COM
<b>ENGINEER</b>	OLSSON 1301 BURLINGTON STREET, SUITE 100 NORTH KANSAS CITY, MISSOURI 64116 CONTACT: JULIE E. SELLERS, P.E. PHONE: 816.361.1177
<b>SURVEYOR</b>	OLSSON 1301 BURLINGTON STREET, SUITE 100 NORTH KANSAS CITY, MISSOURI 64116 CONTACT: JASON ROUDEBUSH, P.L.S. PHONE: 816.361.1177

<input type="checkbox"/>	NOT FOR CONSTRUCTION
<input checked="" type="checkbox"/>	REVIEWED FOR CONSTRUCTION



**PROPERTY DESCRIPTION:**

A tract of land in the Southeast Quarter of Section 23, Township 47 North, Range 32 West of the 5th Principal Meridian in Lee's Summit, Jackson County, Missouri being bounded and described by or under the direct supervision of Jason S Roubesh, P.L.S. 2002014092 as follows: Commencing at the Southeast corner of said Southeast Quarter; thence North 02°45'34" East, on the East line of said Southeast Quarter, 2,635.08 feet to the Northeast corner of said Southeast Quarter; thence North 87°45'24" West, on the North line of said Southeast Quarter, 50.00 feet to the Southeast corner of Lot 3, EAGLE CREEK—FIRST PLAT, a subdivision in said Lee's Summit recorded as Instrument Number 110409 in Book 165 at Page 01 in Jackson County Recorder of Deeds Office, also being the Northwest corner of SW Pryor Road as described in the Right of Way Deed recorded as Instrument Number 20050087407 in said Jackson County Recorder of Deeds Office, also being Point of Beginning of the tract of land to be herein described; thence South 02°45'34" West, on the existing Westerly right-of-way line of said SW Pryor Road of said Right of Way Deed, 1,220.74 feet; thence leaving said existing Westerly right-of-way line, North 87°00'50" West, 245.56 feet; thence North 02°59'10" East, 25.00 feet; thence North 87°00'50" West, 438.50 feet; thence North 60°49'13" West, 252.48 feet; thence North 67°11'53" West, 74.21 feet; thence North 27°18'12" East, 138.17 feet; thence Westerly, on a curve to the left, having an initial tangent bearing of North 62°41'48" West with a radius of 275.00 feet, a central angle of 11°57'16" and an arc distance of 57.38 feet; thence North 15°20'56" East, 50.00 feet; thence North 29°10'47" East, 375.17 feet; thence North 07°19'52" East, 64.17 feet; thence South 87°00'50" East, 126.12 feet; thence North 02°59'10" East, 116.00 feet; thence North 42°00'50" West, 19.80 feet; thence North 02°59'10" East, 50.00 feet; thence South 87°00'50" East, 36.00 feet; thence North 02°59'10" East, 277.38 feet to a point on the South line of said EAGLE CREEK—FIRST PLAT and said North line of said Southeast Quarter; thence South 87°45'24" East, on said South and said North line, 643.83 feet to the Point of Beginning. Containing 953,270 square feet or 21.88 acres, more or less.

Sheet List Table	
Sheet Number	Sheet Title
C101	TITLE SHEET
C102	GENERAL NOTES
C103	GENERAL LAYOUT
C104	GRADING PLAN
C105	SWALE 1 PLAN & PROFILE
C106	SWALE 2 PLAN & PROFILE
C107	SWALE 3 PLAN & PROFILE
C108	SWALE 3 PLAN & PROFILE CONT'D
C109	SWALE 4 PLAN & PROFILE
C110	WATER QUALITY BASIN PLAN
C111	ROADWAY PLAN & PROFILE (SW WHEATFIELD COURT)
C112	ROADWAY PLAN & PROFILE (SW FARM FIELD ROAD)
C113	ROADWAY PLAN & PROFILE (SW FARM FIELD ROAD)
C114	ROADWAY PLAN & PROFILE (SW 26TH TERRACE)
C115	ROADWAY PLAN & PROFILE (SW 26TH TERRACE)
C116	ROADWAY PLAN & PROFILE (SW FARM FIELD COURT)
C117	ROADWAY PLAN & PROFILE (SW HOOK FARM DRIVE)
C118	ROADWAY PLAN & PROFILE (SW HOOK FARM DRIVE)
C119	ROADWAY PLAN & PROFILE (SW HOOK FARM DRIVE)
C120	TRAFFIC CONTROL PLAN
C121	SW WHEATFIELD COURT & SW FARM FIELD ROAD
C122	SW FARM FIELD ROAD & SW 26TH TERRACE
C123	SW 26TH TERRACE
C124	SW FARM FIELD ROAD & SW FARM FIELD COURT
C125	SW FARM FIELD ROAD & SW HOOK FARM DRIVE
C126	SW HOOK FARM DRIVE & SW HOOK FARM DRIVE
C127	SW FARM FIELD COURT & SW HOOK FARM DRIVE
C128	SW WHEAT FIELD COURT CUL-DE-SAC
C129	STORM SEWER PLAN & PROFILE (LINE 1)
C130	STORM SEWER PLAN & PROFILE (LINE 1 CONT'D)
C131	STORM SEWER PLAN & PROFILE (LINE 2)
C132	STORM SEWER PLAN & PROFILE (LINE 3 & 9)
C133	STORM SEWER PLAN & PROFILE (LINE 4)
C134	STORM SEWER PLAN & PROFILE (LINE 4 CONT'D)
C135	STORM SEWER PLAN & PROFILE (LINES 5, 6, & 8)
C136	STORM SEWER PLAN & PROFILE (LINE 7)
C137	MASTER DRAINAGE PLAN
C138	DRAINAGE PLAN
C139	DRAINAGE TABLES
C140	STORM DETAILS

# olsson

Olsson - Civil Engineering  
Missouri Certificate of Authority #001592  
1301 Burlington Street  
North Kansas City, MO 64116  
www.olsson.com



REV. NO.	DATE	REVISIONS DESCRIPTION
1	06/15/2020	REVISED PER CITY COMMENTS
2	06/25/2020	REVISED PER CITY COMMENTS
3	09/10/2020	REVISED PIPE INSULATION
4	10/01/2020	REVISED PER CITY COMMENTS
5	11/18/2020	REVISED LOTS 25-29 GRADING
6	02/17/2021	REVISED ADA RAMPS
7	03/12/2021	REVISED ADA RAMPS

TITLE SHEET		STREET AND STORM SEWER PLANS	
HOOK FARMS FIRST PLAT		2020	
LEE'S SUMMIT, MO			

drawn by:	CGW
checked by:	JES
approved by:	NDH
QA/QC by:	JES
project no.:	019-4061
date:	04/20/2020

**RELEASE FOR CONSTRUCTION**  
AS NOTED ON PLANS REVIEW  
DEVELOPMENT SERVICES  
LEE'S SUMMIT, MISSOURI  
04/05/2021

SHEET  
C101

DWG: F:\2019\4061-4500\019-4061-Design\AutoCAD\Final Plans\Sheets\GNCV\Street and Storm Plans\C\_TTL01\_0194061.dwg  
DATE: Mar 30, 2021 1:44pm  
USER: nhsaiser  
XREFS: C\_PTBK\_0194061\_34x22  
C\_PBNY\_0194061



USER: nhaiser

Storm Plans\C\_V\_TTL01\_0194061.dwg

Sheets\GNCV\Street and Storm Plans\C\_PBN DY\_0194061

Design\40-Design\AutoCAD\Final Plans\GNCV\Street and Storm Plans\C\_PBN DY\_0194061\_34x22

DATE: Jun 29, 2020 5:57pm

DWG: F:\2019\4001-4500\019-4061\40-Design\AutoCAD\Final Plans\GNCV\Street and Storm Plans\C\_PBN DY\_0194061\_34x22

### GENERAL NOTES

- THE CONTRACTOR SHALL BE RESPONSIBLE FOR ENSURING THAT THE PLANS IN THEIR POSSESSION ARE THE MOST CURRENT VERSION ISSUED, ARE FULLY COORDINATED WITH ALL SUBCONTRACTORS, AND PRESENT ON SITE AT ALL TIMES. CURRENT PLANS PREPARED BY OLSSON MAY BE OBTAINED AT THE DIRECTION OF OLSSON'S CLIENT. DIRECT REQUESTS TO OLSSON MAY REQUIRE ADDITIONAL AUTHORIZATIONS, AGREEMENTS, AND/OR FEES. PLEASE CONTACT THE ENGINEER FOR INFORMATION.
- THE CONTRACTOR SHALL BE RESPONSIBLE FOR ANY DEVIATIONS FROM THESE PLANS UNLESS WRITTEN APPROVAL FROM ENGINEER, OWNER, AND DEVELOPER.
- ALL WORK AND MATERIALS SHALL BE SUBJECT TO INSPECTION AND APPROVAL BY THE OWNER OR THE OWNER'S REPRESENTATIVE.
- ALL ESTIMATES OF QUANTITIES ARE FOR INFORMATIONAL PURPOSES ONLY. THE CONTRACTOR SHALL BE RESPONSIBLE FOR DETERMINING QUANTITIES AND ITEMS OF WORK.
- THE CONTRACTOR SHALL BE RESPONSIBLE FOR PROVIDING ALL LABOR, MATERIALS, AND EQUIPMENT REQUIRED TO COMPLETE THE WORK SHOWN IN THE PLANS.
- THE CONTRACTOR SHALL BE RESPONSIBLE FOR OBTAINING ALL REQUIRED PERMITS, PAYING ALL FEES, AND FOR OTHERWISE COMPLYING WITH ALL APPLICABLE REGULATIONS GOVERNING THE WORK.
- THE CONTRACTOR SHALL NOT ENGAGE IN ACTIVITIES THAT MAY ENCROACH ON WATERS OF THE U.S., INCLUDING WETLANDS, UNTIL ANY NECESSARY PERMITS MAY BE OBTAINED. THE CONTRACTOR SHALL REVIEW AND COMPLY WITH ALL CONDITIONS DESCRIBED IN THE PERMIT.
- THE CONTRACTOR SHALL BE SOLELY RESPONSIBLE FOR CONDITIONS OF THE JOB SITE, THE SAFETY OF ALL PERSONS INCLUDING VISITORS AND THE GENERAL PUBLIC, AND PROPERTY DURING PERFORMANCE OF THE WORK. THIS REQUIREMENT WILL APPLY CONTINUOUSLY THROUGHOUT THE PROJECT AND NOT BE LIMITED BY WORKING HOURS. ANY CONSTRUCTION OBSERVATION BY THE ENGINEER OF THE CONTRACTOR'S PERFORMANCE IS NOT INTENDED TO INCLUDE REVIEW OF THE ADEQUACY OF THE CONTRACTOR'S SAFETY MEASURES.
- PRIOR TO COMMENCEMENT OF WORK THE CONTRACTOR SHALL NOTIFY AND COORDINATE WITH ALL UTILITY COMPANIES AND OBTAIN ANY RELEVANT INFORMATION. NOTIFY ENGINEER OF ANY DISCREPANCIES.
- THE CONTRACTOR IS RESPONSIBLE FOR THE PROTECTION OF ALL BOUNDARY CORNERS AND SECTION CORNERS. ANY BOUNDARY CORNER AND/OR SECTION CORNER DISTURBED OR DAMAGED BY CONSTRUCTION ACTIVITIES SHALL BE RESET BY A LAND SURVEYOR LICENSED IN THE STATE OF MISSOURI, AT THE CONTRACTOR'S EXPENSE.
- THE CONTRACTOR IS RESPONSIBLE FOR THE PROTECTION OF ADJACENT PROPERTIES AND SHALL TAKE ALL PRECAUTIONS NECESSARY TO PREVENT DAMAGE DURING CONSTRUCTION. THE CONTRACTOR IS ALSO RESPONSIBLE FOR REPAIRING ANY DAMAGE RESULTING FROM CONSTRUCTION ACTIVITIES.
- PRIOR TO MOVING OFF THE JOB THE CONTRACTOR SHALL NOTIFY THE OWNER AND ENGINEER TO PERFORM A FINAL WALK-THROUGH OF THE CONSTRUCTION SITE.

### REFERENCES

- ARCHITECTURAL AND STRUCTURAL ELEMENTS SHOWN IN THESE PLANS ARE FOR REFERENCE ONLY. CONTRACTORS AND SURVEYORS SHALL REFERENCE THEIR RESPECTIVE PLANS FOR DESIGN INFORMATION.
- THE CONTRACTOR SHALL ADHERE TO THE SITE PREPARATION AND STRUCTURAL FILL RECOMMENDATIONS IN THE GEOTECHNICAL REPORT AS PROVIDED BY THE GEOTECHNICAL ENGINEER INCLUDING ALL CURRENT ADDENDUMS, THE STANDARDS AND SPECIFICATIONS OF LEE'S SUMMIT, MISSOURI SHALL ALSO APPLY AND TAKE PRECEDENCE WHEN STRICTER THAN THE GEOTECHNICAL REPORT OR WHEN NO GEOTECHNICAL REPORT IS GIVEN.
- UNLESS EXPLICITLY DESCRIBED OTHERWISE WITHIN THESE PLANS THE FOLLOWING SHALL APPLY:
  - ALL CONSTRUCTION, INCLUDING THOSE LISTED BELOW, SHALL CONFORM TO THE LATEST CODES AND ORDINANCES OF LEE'S SUMMIT, MISSOURI.
  - ALL CONSTRUCTION IN MISSOURI DEPARTMENT OF TRANSPORTATION RIGHT-OF-WAY SHALL CONFORM TO THE LATEST SPECIFICATIONS ADOPTED BY U.S. DEPARTMENT OF TRANSPORTATION AND MISSOURI DEPARTMENT OF TRANSPORTATION.
  - ALL TRAFFIC CONTROL SIGNAGE SHALL CONFORM WITH THE CURRENT EDITION OF THE MANUAL FOR UNIFORM TRAFFIC CONTROL DEVICES (MUTCD).
  - ALL UTILITY EXTENSIONS AND CONSTRUCTION SHALL CONFORM TO THE STANDARDS AND SPECIFICATIONS OF THE UTILITY COMPANIES..
  - ALL EXTERIOR PAVEMENT (PCC, ASPHALT, ETC.) SHALL BE IN CONFORMANCE WITH THE SPECIFICATIONS OF LEE'S SUMMIT, MISSOURI AND THE RECOMMENDATIONS OF THE GEOTECHNICAL REPORT.
- THE CONTRACTOR IS RESPONSIBLE FOR CONTACTING THE DELIVERY MANAGER AND COORDINATING ANY MAILBOXES THAT MAY BE DISTURBED. FAILURE TO DO SO MAY SUBJECT THE CONTRACTOR TO PROSECUTION BY THE FEDERAL GOVERNMENT.

### EXISTING CONDITIONS

- THE CONTRACTOR SHALL VISIT THE SITE AND BECOME FAMILIAR WITH THE EXISTING CONDITIONS OF THE PROJECT AREA.
- THE CONTRACTOR SHALL BE RESPONSIBLE FOR PERFORMING THEIR OWN INVESTIGATIONS AND MAKING THEIR OWN ASSUMPTIONS REGARDING SITE SURFACE AND SUBSURFACE CONDITIONS. THIS INCLUDES THE LOCATION AND CONSISTENCY OF ANY EXISTING ROCK LAYERS UNDERLYING THE PROJECT SITE. CONTACT THE ENGINEER REGARDING ANY DISCREPANCIES THAT MAY AFFECT THE ABILITY TO CONSTRUCT FROM THESE PLANS AS DESIGNED.
- EXISTING CONDITIONS WERE DETERMINED THROUGH A VARIETY OF METHODS THAT MAY INCLUDE SURVEY, AERIAL IMAGERY, AVAILABLE RECORDS, GIS DATA, ETC. SUBSURFACE CONDITIONS ARE APPROXIMATE AND MAY NOT INCLUDE ALL UTILITIES AND OTHER SITE IMPROVEMENTS PRESENT ON SITE. THE CONTRACTOR SHALL MAKE EXPLORATION EXCAVATIONS AND LOCATE EXISTING UNDERGROUND UTILITIES SUFFICIENTLY AHEAD OF CONSTRUCTION TO PERMIT REVISIONS TO PLANS WHEN CONFLICTS AND DISCREPANCIES ARE FOUND.

### CONSTRUCTION

- THE CONTRACTOR SHALL INSTALL TRAFFIC CONTROL WHILE WORKING IN THE PUBLIC RIGHT-OF-WAY AS SHOWN IN THESE PLANS. IF PLANS ARE NOT PROVIDED, CONTRACTOR SHALL COORDINATE AND PROVIDE CONTROLS TO THE SATISFACTION OF THE RIGHT-OF-WAY OWNER.
- THE CONTRACTOR SHALL PROTECT ALL TREES OVER 3" CALIPER FROM DAMAGE. NO TREE SHALL BE REMOVED WITHOUT PERMISSION OF THE OWNER, UNLESS SHOWN OTHERWISE ON THESE PLANS.
- IN ADDITION TO THE CONDITIONS OF THE GEOTECHNICAL REPORT AND AS A MINIMUM THE CONTRACTOR SHALL PERFORM THE GRADING AS FOLLOWS:
  - THE CONSTRUCTION AREA SHALL BE CLEARED, GRUBBED, AND STRIPPED OF TOPSOIL AND ORGANIC MATTER FROM ALL AREAS TO BE OCCUPIED BY BUILDING AND PAVING. STRIPPING EXISTING TOPSOIL AND ORGANIC MATTER SHALL BE TO A MINIMUM DEPTH OF 6 INCHES. TOPSOIL FOR REPLACEMENT ON SLOPES MAY BE STOCKPILED ON SITE IN AREAS DESIGNATED BY THE OWNER. CONTRACTOR SHALL REMOVE EXCESS STRIPPINGS AND EXCESS EXCAVATION WITHIN 30 DAYS OF COMPLETION OF GRADING OPERATIONS.
  - AREAS TO RECEIVE FILL AND AREAS CUT TO SUBGRADE LEVEL SHALL BE SCARIFIED AND THE TOP 8-INCH DEPTH COMPACTED TO 95% STANDARD PROCTOR DENSITY. THE SUBGRADE SHALL BE PROOF ROLLED WITH A MODERATELY HEAVY LOADED DUMP TRUCK OR SIMILAR APPROVED CONSTRUCTION EQUIPMENT TO DETECT UNSUITABLE SOIL CONDITIONS. ANY UNSUITABLE AREAS SHALL BE UNDERCUT AND REPLACED WITH SUITABLE MATERIAL BEFORE ANY FILL MATERIAL CAN BE APPLIED.
  - FILL SHALL BE PLACED IN MAXIMUM OF 8 INCH LIFTS.
  - TOPSOIL SHALL BE PLACED TO A MINIMUM DEPTH OF 6 INCHES OVER ALL AREAS DISTURBED BY THE WORK. LARGE STONES, STICKS AND LUMPS SHALL BE REMOVED OR BROKEN UP, AND THE TOPSOIL SHALL BE LEVELED AND RAKED. ALL DISTURBED AREAS SHALL BE LANDSCAPED PER LANDSCAPE PLANS OR SHALL BE SEEDED, FERTILIZED, MULCHED, WATERED AND MAINTAINED UNTIL HARDY GRASS GROWTH IS ESTABLISHED.
  - CONTRACTOR SHALL PROVIDE COMPACTION TEST RESULTS AS REQUIRED.
- THE CONTRACTOR SHALL DISPOSE ALL WASTE MATERIAL RESULTING FROM THE PROJECT OFF-SITE AND IN STRICT CONFORMANCE WITH ALL LOCAL CODES AND ORDINANCES.
- ALL MANHOLES, CATCH BASINS, UTILITY VALVES AND METER PITS ARE TO BE ADJUSTED OR REBUILT TO GRADE AS REQUIRED. NOT ALL ADJUSTMENTS ARE INDICATED IN THE PLANS.
- THE CONTRACTOR SHALL STREET SWEEP OR OTHERWISE CLEAN ALL ACCESS ROUTES TO THE SITE AT CONCLUSION OF THE PROJECT.

### SHOP DRAWINGS

- THE CONTRACTOR SHALL SUBMIT SHOP DRAWINGS A MINIMUM OF 7 DAYS PRIOR TO THE REQUESTED DATE OF APPROVAL. ENGINEER SHALL REVIEW SHOP DRAWINGS OR SAMPLES CONFORMANCE WITH THE DESIGN FOR THIS PROJECT AS DESCRIBED IN THE PLANS. THE CONTRACTOR SHALL BE RESPONSIBLE FOR ERRORS OR OMISSIONS IN SHOP DRAWINGS. THE ENGINEER'S REVIEW SHALL NOT EXTEND TO MEANS OR METHODS OF CONSTRUCTION. CONTRACTOR SHALL BE RESPONSIBLE FOR ANY VARIATION FROM THE REQUIREMENTS OF THE CONTRACT DOCUMENTS UNLESS CONTRACTOR HAS NOTIFIED ENGINEER OF EACH SUCH VARIATION AT THE TIME OF SUBMISSION, AND OBTAINED ENGINEER'S WRITTEN APPROVAL OF EACH SUCH VARIATION. PRIOR TO SUBMITTING EACH SHOP DRAWING OR SAMPLE, CONTRACTOR SHALL HAVE REVIEWED AND VERIFIED:
  - ALL FIELD MEASUREMENTS, QUANTITIES, DIMENSIONS, SPECIFIED PERFORMANCE CRITERIA, INSTALLATION REQUIREMENTS, MATERIALS, CATALOG NUMBERS AND SIMILAR INFORMATION WITH RESPECT THERETO;
  - ALL MATERIALS WITH RESPECT TO INTENDED USE, FABRICATION, SHIPPING, HANDLING, STORAGE, ASSEMBLY AND INSTALLATION PERTAINING TO THE PERFORMANCE OF THE WORK;
  - ALL INFORMATION RELATIVE TO MEANS, METHODS, TECHNIQUES, SEQUENCES AND PROCEDURES OF CONSTRUCTION AND SAFETY PRECAUTIONS AND PROGRAMS INCIDENT THERETO;
  - CONTRACTOR SHALL ALSO HAVE REVIEWED AND COORDINATED EACH SHOP DRAWING OR SAMPLE WITH OTHER SHOP DRAWINGS AND SAMPLES, AND WITH THE REQUIREMENTS OF THE WORK AND THE CONTRACT DOCUMENTS.
  - ALL SUBMITTED SHOP DRAWINGS SHALL BEAR A STAMP OR SPECIFIC WRITTEN INDICATION AND SIGNATURE THAT CONTRACTOR HAS FULLY COMPLETED THE ABOVE TASKS.
- SHOP DRAWINGS AS DESCRIBED ABOVE ARE REQUIRED FOR, BUT NOT LIMITED TO, THE FOLLOWING:
  - ALL STORM SEWER STRUCTURES TO BE INSTALLED WITH THIS PROJECT.
  - ALL SANITARY SEWER STRUCTURES TO BE INSTALLED WITH THIS PROJECT.
  - ALL SITE FENCING AND RAILING INCLUDING ANY GATES.
  - ALL LANDSCAPE AND RETAINING WALLS.
  - ANY ITEMS IN THESE PLANS THAT ALLOW FOR AN "APPROVED EQUAL" ALTERNATIVE.

### STORM SEWER PLAN NOTES

- PRIOR TO COMMENCEMENT OF WORK THE CONTRACTOR SHALL NOTIFY AND COORDINATE CONSTRUCTION WITH LEE'S SUMMIT, MISSOURI.
- ALL PIPE LENGTHS AND ELEVATIONS ARE CALCULATED LINEARLY FROM CENTER OF STRUCTURE TO CENTER OF STRUCTURE.
- COORDINATES ARE PROVIDED AT THE CENTER OF STRUCTURE. ADDITIONAL COORDINATES PROVIDED ARE PER LOCAL CODES AND ORDINANCES OR AS AN AID WHEN ORIENTING THE BOX DURING INSTALLATION.
- THE CONTRACTOR SHALL EXPOSE EXISTING UTILITIES AT LOCATIONS OF POSSIBLE CONFLICT AND POINTS OF CONNECTION PRIOR TO ANY CONSTRUCTION OF STORM SEWER.
- STORM SEWER TRENCHES SHALL BE CONSTRUCTED SUCH THAT UNDISTURBED EXISTING SOIL OR FILL COMPACTED TO 95% PROCTOR DENSITY IS AT A DEPTH THAT IS 18" ABOVE TOP OF PROPOSED PIPE.
- STRUCTURE INVERT CHANNELS SHALL BE SMOOTH, CIRCULAR, AND CONFORMING TO ½ THE ADJACENT PIPE SECTION (INVERT TO CENTER). CHANGES IN DIRECTION OF FLOW SHALL BE MADE WITH A SMOOTH CURVE AND MAINTAIN SHAPE THROUGHOUT. CHANGES IN GRADE OF ADJACENT PIPES SHALL BE TRANSITIONED SMOOTHLY AND EVENLY THROUGH THE STRUCTURE.
- PIPE PENETRATIONS SHALL BE GROUTED TO ENSURE WATERTIGHT SEALS.

ESTIMATE OF QUANTITIES				
ITEM NO.	DESCRIPTION	UNIT	QUANTITY	AS-BUILT
STREET				
1	EXCAVATION	C.Y.	5,854	
2	EMBANKMENT	C.Y.	15,100	
3	SUBGRADE STABILIZATION (6" FLYASH TREATMENT)	S.Y.	11,866	
4	6" ASPHALT PAVEMENT	S.Y.	9,612	
5	CONCRETE CURB & GUTTER (CG-2)	L.F.	6,335	
6	CONCRETE CURB & GUTTER (CG-1 DRY)	L.F.	245	
7	5' CONCRETE SIDEWALK	L.F.	143	
8	ADA RAMP	EA.	11	
9	STOP SIGNS	EA.	5	
10	STREET NAME SIGNS	EA.	10	
11	TYPE IV OBJECT MARKERS	EA.	2	
STORM				
12	STD. CURB INLET (5'x3' INSIDE)	EA.	19	
13	STD. CURB INLET (6'x3' INSIDE)	EA.	3	
14	STD. FIELD INLET (4'x4' INSIDE)	EA.	6	
15	STD. MANHOLE (5' DIA. INSIDE)	EA.	1	
16	WATER QUALITY BASIN OUTLET STRUCTURE	EA.	1	
17	6" PVC	L.F.	175.99	
18	15" HDPE	L.F.	419.42	
19	18" HDPE	L.F.	1552.87	
20	24" HDPE	L.F.	436.49	
21	30" HDPE	L.F.	284.64	
22	36" HDPE	L.F.	94.79	
23	18" FLARED END SECTION	L.F.	2	
24	24" FLARED END SECTION	L.F.	1	
25	30" FLARED END SECTION	EA.	1	
26	36" FLARED END SECTION	EA.	1	
27	15" HDPE PLUG	EA.	1	
28	RIPRAP	S.Y.	55.1	

# olsson

Olsson - Civil Engineering  
 Missouri Certificate of Authority #001592  
 1301 Burlington Street  
 North Kansas City, MO 64116  
 TEL 816.361.1177  
 FAX 816.361.1888  
 www.olsson.com



REV. NO.	DATE	REVISIONS DESCRIPTION
1	06/15/2020	REVISED PER CITY COMMENTS
2	06/25/2020	REVISED PER CITY COMMENTS

GENERAL NOTES  
 STREET AND STORM SEWER PLANS  
 HOOK FARMS  
 FIRST PLAT  
 LEE'S SUMMIT, MO

2020

REVISIONS

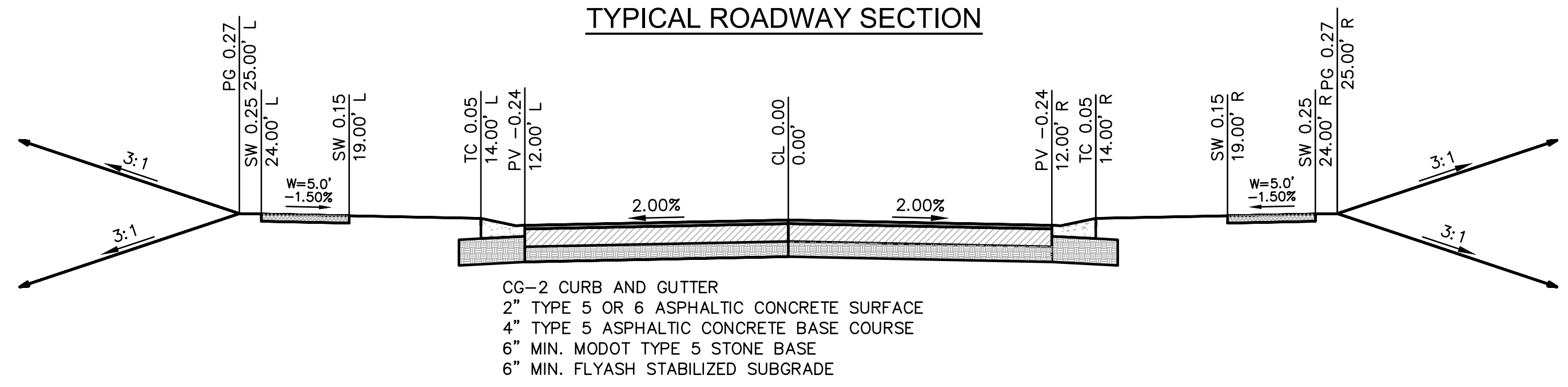
drawn by: CGW  
 checked by: JES  
 approved by: NDH  
 QA/QC by: JES  
 project no.: 019-4061  
 drawing no.:  
 date: 04/20/2020

**RELEASE FOR CONSTRUCTION**  
 AS NOTED ON PLANS REVIEW  
 DEVELOPMENT SERVICES  
 LEE'S SUMMIT, MISSOURI  
 04/05/2021

SHEET C102

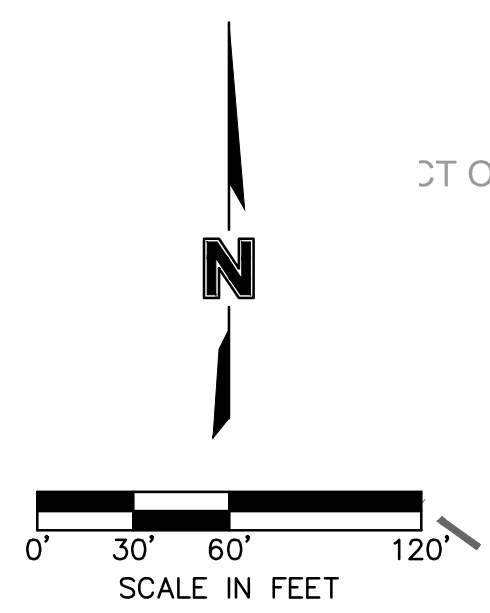
DWG: F:\2019\4001-4500\019-4061-40-Design\AutoCAD\Final Plans\Storm Plans\GEN01\_0194061.dwg USER: nheiser C\_PUTIL\_0194061  
 DATE: Mar 12, 2021 10:04am XREFS: C\_PTBK\_0194061\_34x22 C\_PBASE\_0194061 C\_PBASE\_0194061 C\_PBASE\_0194061

**TYPICAL ROADWAY SECTION**



CG-2 CURB AND GUTTER  
 2" TYPE 5 OR 6 ASPHALTIC CONCRETE SURFACE  
 4" TYPE 5 ASPHALTIC CONCRETE BASE COURSE  
 6" MIN. MODOT TYPE 5 STONE BASE  
 6" MIN. FLYASH STABILIZED SUBGRADE

RESIDENTIAL LOCAL STREET - ENTRANCE (48' BK-BK)  
 SW 26TH TERRACE  
 CG-2 CURB & GUTTER  
 CG-1 DRY CURB & GUTTER AT MEDIAN  
 2" TYPE 6 ASPHALTIC CONCRETE SURFACE  
 4" TYPE 5 ASPHALTIC CONCRETE BASE COURSE  
 6" MIN. MODOT TYPE 5 STONE BASE  
 6" FLYASH STABILIZED SUBGRADE

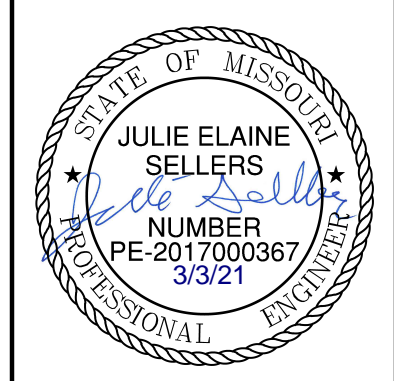


RELEASE FOR CONSTRUCTION  
 AS NOTED ON PLANS REVIEW  
 DEVELOPMENT SERVICES  
 LEE'S SUMMIT, MISSOURI  
 04/05/2021



ITEM # 10'X10' SWBT  
 Doc. No. 199610062758  
 Bk. 1-2906 Pg. 251

ITEM # 10' C.F.T.P.  
 Doc. No. 199910026996  
 FALLS IN R/W



REV. NO.	DATE	REVISIONS DESCRIPTION
1	06/15/2020	REVISED PER CITY COMMENTS
2	06/25/2020	REVISED PER CITY COMMENTS
3	09/10/2020	REVISED PIPE INSULATION
4	10/01/2020	REVISED PER CITY COMMENTS
5	11/18/2020	REVISED LOTS 25-29 GRADING
6	02/17/2021	REVISED ADA RAMPS
7	03/12/2021	REVISED ADA RAMPS

GENERAL LAYOUT  
 STREET AND STORM SEWER PLANS

HOOK FARMS  
 FIRST PLAT

LEE'S SUMMIT, MO

2020

drawn by: CGW  
 checked by: JES  
 approved by: NDH  
 QA/QC by: JES  
 project no.: 019-4061  
 drawing no.:  
 date: 04/20/2020

**olsson**

Olsson - Civil Engineering  
 Missouri Certificate of Authority #001592  
 1301 Burlington Street  
 North Kansas City, MO 64116  
 TEL 816.361.1177  
 FAX 816.361.1888  
 www.olson.com

**GENERAL NOTES:**

1. CONTRACTOR SHALL ADHERE TO THE "DESIGN AND CONSTRUCTION MANUAL" SECTION 2100 AS ADOPTED BY THE CITY OF LEE'S SUMMIT (LATEST EDITION), FOR EXCAVATION AND EMBANKMENT WORK WITHIN THE PROPOSED RIGHT-OF-WAY.
2. AREAS OF CONSTRUCTION SHALL BE STRIPPED OF ALL VEGETATION, ORGANIC MATTER AND TOPSOIL TO A DEPTH AS RECOMMENDED BY GEOTECHNICAL ENGINEER AND OR TESTING AGENCY. SOILS REMOVED DURING SITE STRIPPING SHOULD BE EVALUATED TO DETERMINE IF PORTIONS OF THE TOPSOIL STRATUM MAY BE UTILIZED AS STRUCTURAL FILL WITHIN PAVEMENT AREAS. ANY MATERIAL NOT DEEMED AS SUITABLE FILL MATERIAL BY THE GEOTECHNICAL ENGINEER AND OR TESTING AGENCY SHALL BE REMOVED FROM THE JOB SITE BY THE CONTRACTOR AT HIS EXPENSE.
3. ALL EMBANKMENT OUTSIDE OF RIGHT-OF-WAY SHOULD BE PLACED IN CONTROLLED LIFTS HAVING A MAXIMUM LOOSE LIFT THICKNESS OF 8". EMBANKMENT SHOULD BE COMPACTED TO A MINIMUM OF 95% OF THE MATERIALS MAXIMUM DRY DENSITY AS DETERMINED BY ASTM D-698 (STANDARD PROCTOR COMPACTION). MOISTURE CONTENT OF THE FILL AT THE TIME OF COMPACTION SHALL BE WITHIN A RANGE OF -0 TO +4 PERCENT OF OPTIMUM MOISTURE CONTENT.

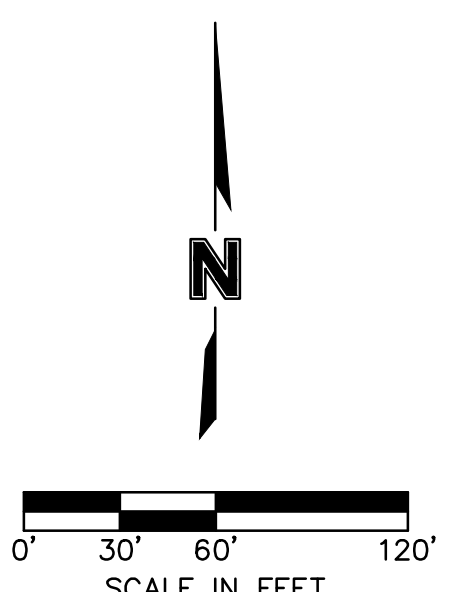
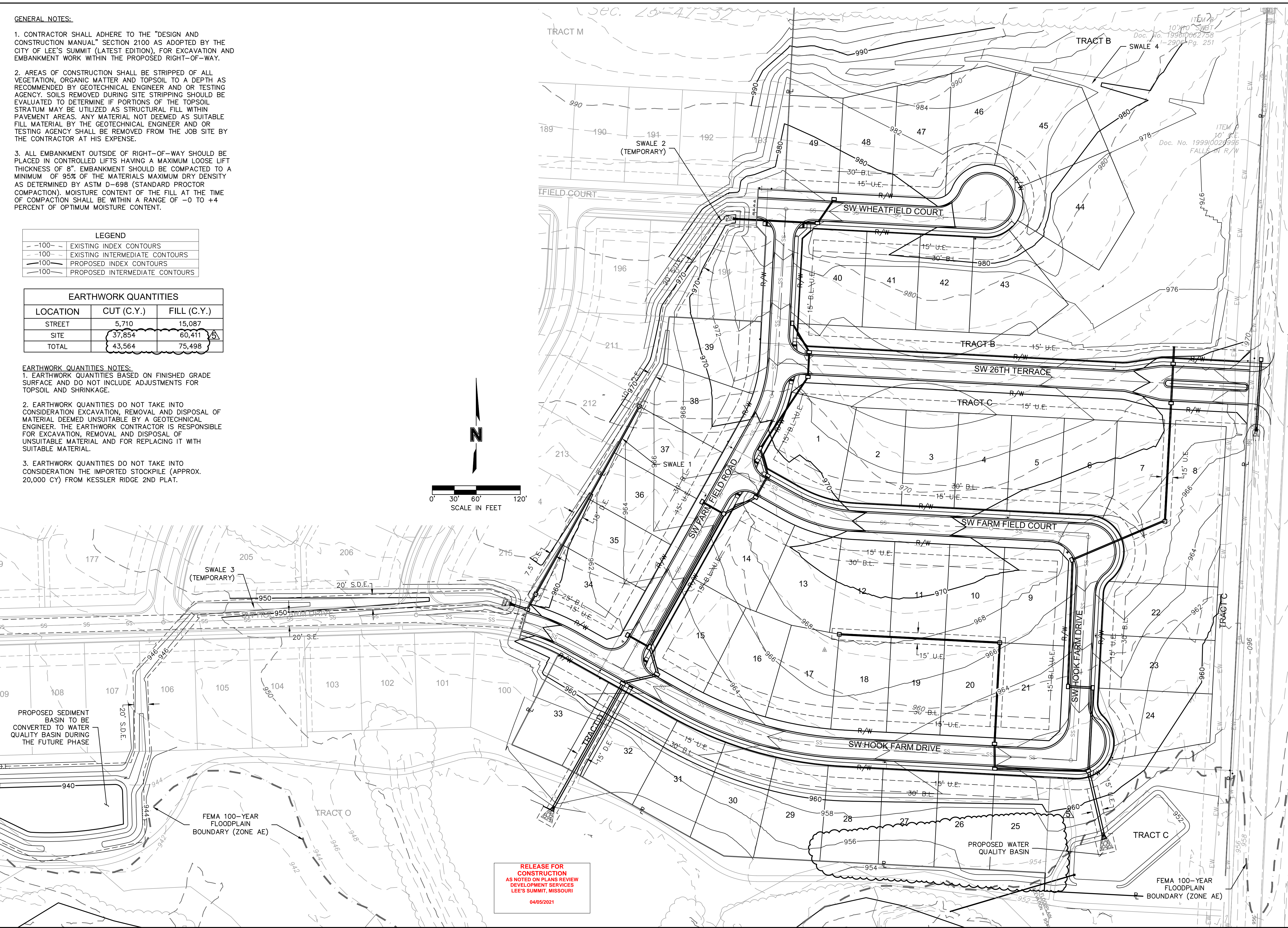
LEGEND	
-100-	EXISTING INDEX CONTOURS
-100-	EXISTING INTERMEDIATE CONTOURS
-100-	PROPOSED INDEX CONTOURS
-100-	PROPOSED INTERMEDIATE CONTOURS

EARTHWORK QUANTITIES		
LOCATION	CUT (C.Y.)	FILL (C.Y.)
STREET	5,710	15,087
SITE	37,854	60,411
TOTAL	43,564	75,498

**EARTHWORK QUANTITIES NOTES:**

1. EARTHWORK QUANTITIES BASED ON FINISHED GRADE SURFACE AND DO NOT INCLUDE ADJUSTMENTS FOR TOPSOIL AND SHRINKAGE.
2. EARTHWORK QUANTITIES DO NOT TAKE INTO CONSIDERATION EXCAVATION, REMOVAL AND DISPOSAL OF MATERIAL DEEMED UNSUITABLE BY A GEOTECHNICAL ENGINEER. THE EARTHWORK CONTRACTOR IS RESPONSIBLE FOR EXCAVATION, REMOVAL AND DISPOSAL OF UNSUITABLE MATERIAL AND FOR REPLACING IT WITH SUITABLE MATERIAL.
3. EARTHWORK QUANTITIES DO NOT TAKE INTO CONSIDERATION THE IMPORTED STOCKPILE (APPROX. 20,000 CY) FROM KESSLER RIDGE 2ND PLAT.

DWG: F:\2019\4061-4500\019-4061-40-Design\AutoCAD\Final Plans\Storm Plans\VC\_GRD01\_0194061.dwg  
 DATE: Mar 12, 2021 10:04am  
 XREFS: C:\PTBLK\_0194061\_34x22 C:\PBASE\_0194061 C:\PUTIL\_0194061 C:\FBASE\_0194061  
 USER: nheiser  
 C:\PUTIL\_0194061 C:\FBASE\_0194061



**RELEASE FOR CONSTRUCTION**  
 AS NOTED ON PLANS REVIEW  
 DEVELOPMENT SERVICES  
 LEE'S SUMMIT, MISSOURI  
 04/05/2021

**olsson**

Olsson - Civil Engineering  
 Missouri Certificate of Authority #001592  
 1301 Burlington Street  
 North Kansas City, MO 64116  
 TEL 816.361.1177  
 FAX 816.361.1888  
 www.olson.com

STATE OF MISSOURI  
 JULIE ELAINE SELLERS  
 NUMBER PE-2017000367  
 3/3/21  
 PROFESSIONAL ENGINEER

REV. NO.	DATE	REVISIONS DESCRIPTION
1	08/15/2020	REVISED PER CITY COMMENTS
2	08/25/2020	REVISED PER CITY COMMENTS
3	09/10/2020	REVISED PIPE INSULATION
4	10/01/2020	REVISED PER CITY COMMENTS
5	11/18/2020	REVISED LOTS 25-29 GRADING
6	02/17/2021	REVISED ADA RAMPS
7	03/12/2021	REVISED ADA RAMPS

GRADING PLAN  
STREET AND STORM SEWER PLANS

HOOK FARMS  
FIRST PLAT

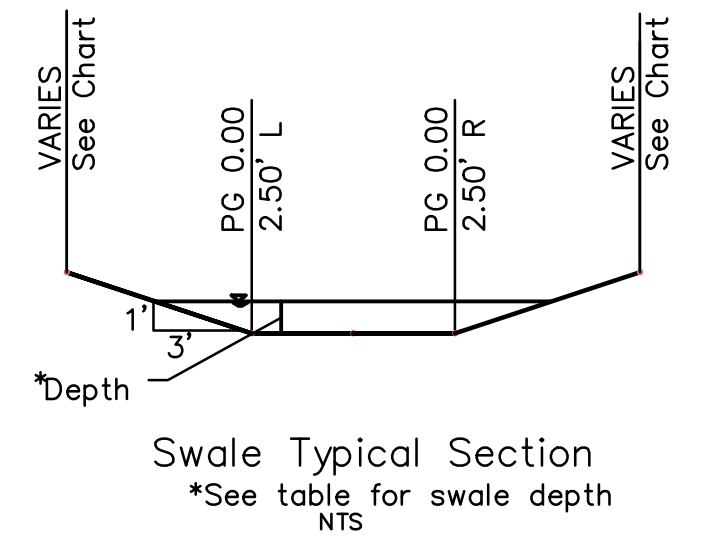
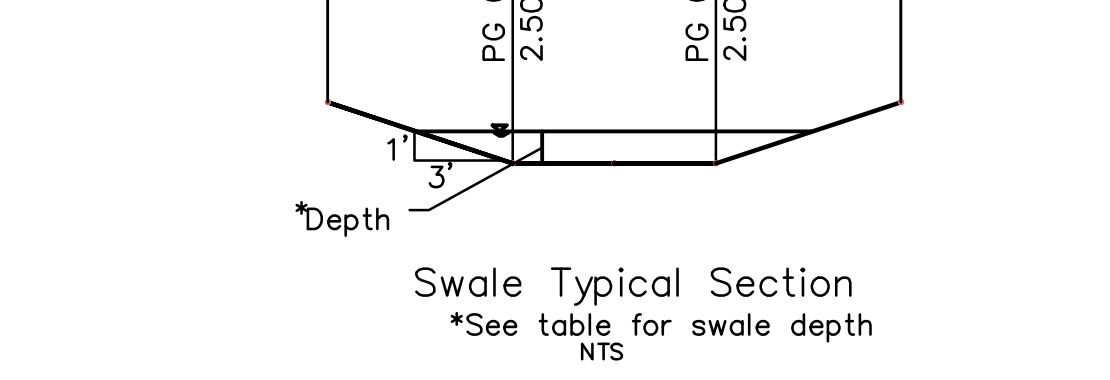
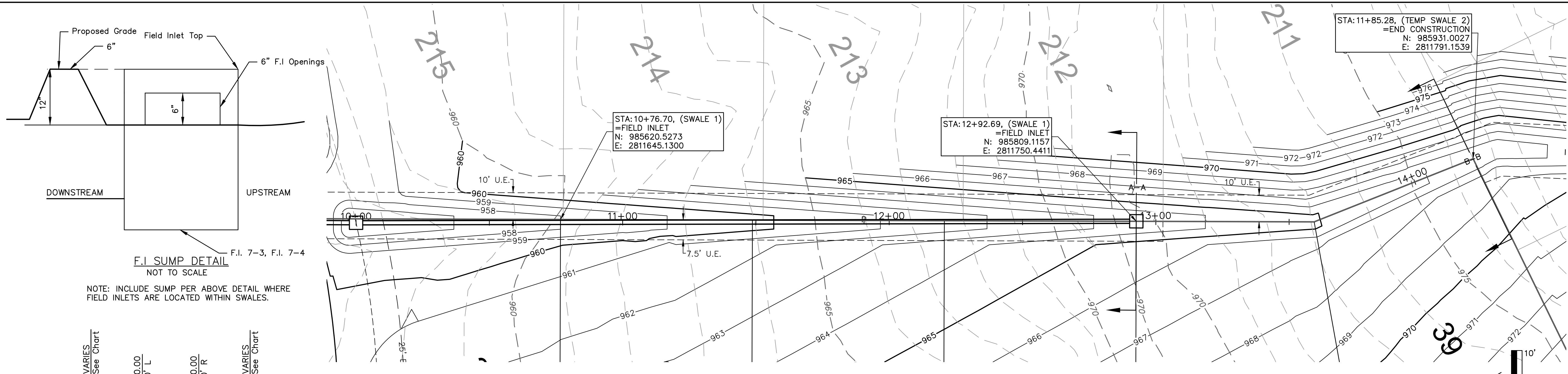
2020

REVISIONS

drawn by: CGW  
 checked by: JES  
 approved by: NDH  
 QA/QC by: JES  
 project no.: 019-4061  
 drawing no.:  
 date: 04/20/2020

SHEET C104

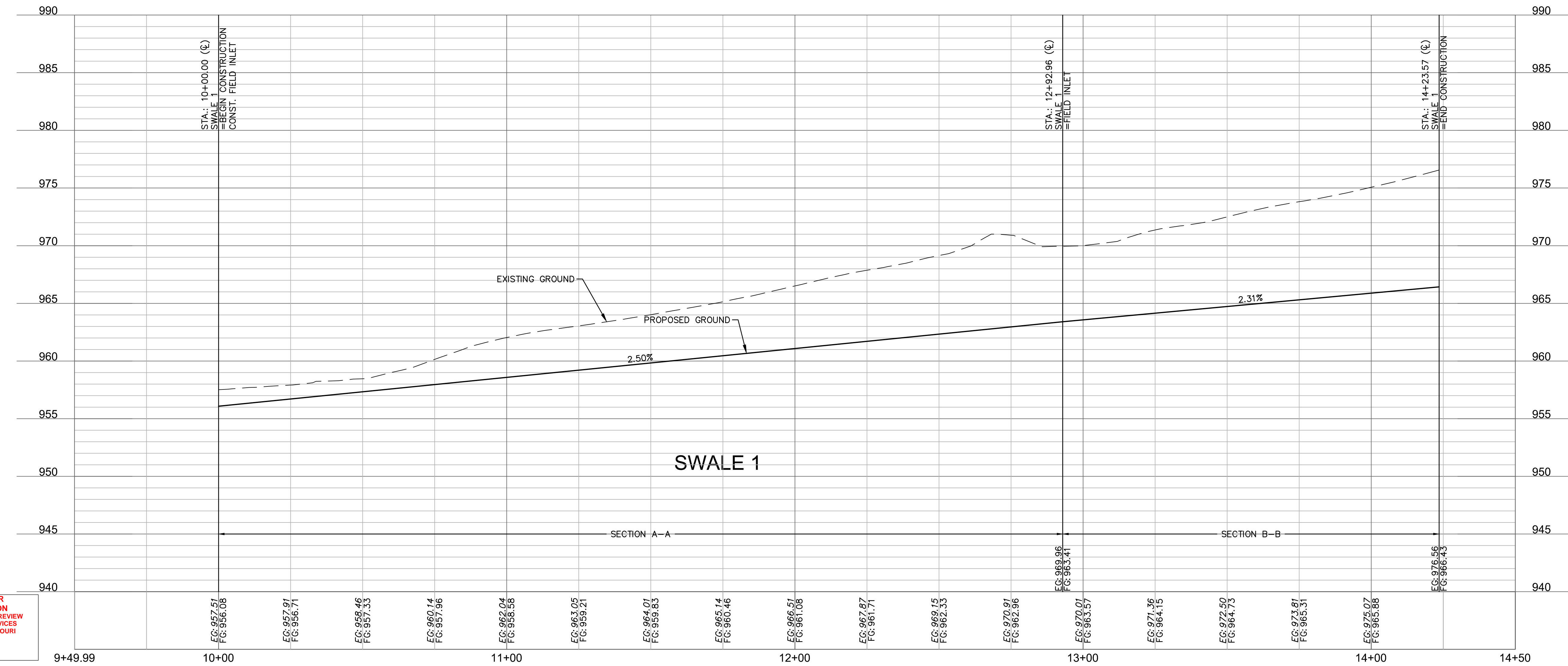
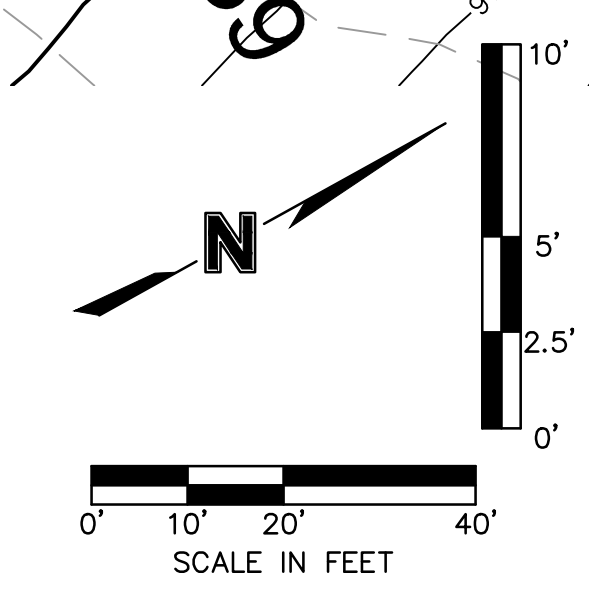
DWG: F:\2019\4001-4500\019-4061\40-Design\AutoCAD\Final Plans\Storm Plans\SW\_01\_0194061.dwg  
 DATE: Jun 29, 2020 5:59pm  
 XREFS: C:\PTBLK\_0194061\_34x22 C:\XBASE\_0194061 C:\PBASE\_0194061 C:\PSURF\_0194061 C:\PUTIL\_0194061  
 USER: nheiser



**SWALE GRADING NOTES:**

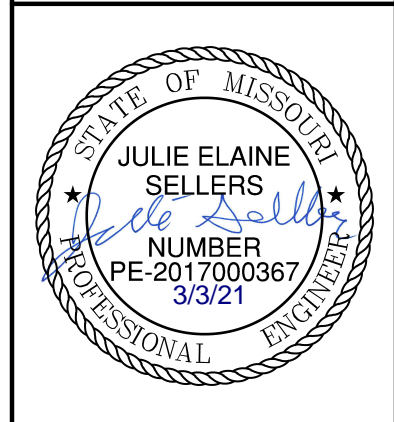
1. CONTRACTOR SHALL CONSTRUCT SWALES WITH MINIMUM SLOPE, WIDTH AND DEPTH AS SHOWN IN THE SWALE DESIGN TABLES.
2. AS-BUILT SURVEY IS REQUIRED/APPROVED BY CITY FOR ALL SWALES AND PRIOR TO APPROVAL FOR ANY BUILDING FOUNDATION PERMIT. CONTRACTOR SHALL BE REQUIRED TO REGRADE SWALES AT CONTRACTOR'S EXPENSE IF ABOVE REQUIREMENTS ARE NOT MET.

SECTION	SECTION DATA						RESULTS							
	Mannings Coefficient	Channel Slope (%)	Min. Swale Depth (ft)	Left Side Slope (H:V)	Right Side Slope (H:V)	Bottom Width (ft)	Discharge (cfs)	Water Depth (ft)	Flow Area (ft <sup>2</sup> )	Velocity (ft/sec)	Wetted Perimeter (ft)	Top Width (ft)	Specific Energy (ft)	Shear Stress (lbs/ft <sup>2</sup> )
A-A	0.03	2.50%	1.41	3:1	3:1	5	9.28	0.41	2.55	3.63	7.59	7.46	0.62	0.525
B-B	0.03	2.50%	1.34	3:1	3:1	5	6.84	0.34	2.05	3.34	7.15	7.04	0.51	0.447



RELEASE FOR CONSTRUCTION AS NOTED ON PLANS REVISION DEVELOPMENT SERVICES LEE'S SUMMIT, MISSOURI  
 04/05/2021

**olsson**  
 Olsson - Civil Engineering  
 Missouri Certificate of Authority #001592  
 1301 Burlington Street  
 North Kansas City, MO 64116  
 TEL 816.361.1177  
 FAX 816.361.1888  
 www.olson.com



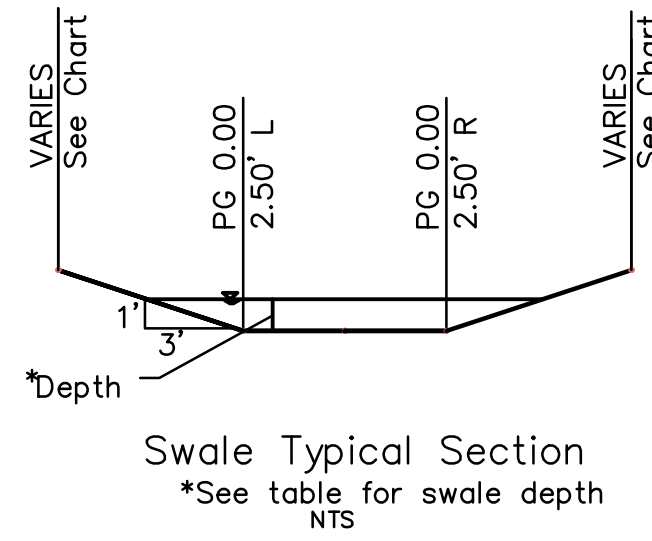
REV. NO.	DATE	REVISIONS DESCRIPTION
1	06/15/2020	REVISED PER CITY COMMENTS
2	06/25/2020	REVISED PER CITY COMMENTS

SWALE 1 PLAN & PROFILE  
 STREET AND STORM SEWER PLANS  
 HOOK FARMS  
 FIRST PLAT  
 LEE'S SUMMIT, MO  
 2020

drawn by: CGW  
 checked by: JES  
 approved by: NDH  
 QA/QC by: JES  
 project no.: 019-4061  
 drawing no.:  
 date: 04/20/2020

SHEET C105

DWG: F:\2019\4001-4500\019-4061\40-Design\AutoCAD\Final Plans\Sheets\GNCV\Street and Storm Plans\SW\_01\_0194061.dwg  
 DATE: Jun 29, 2020 5:59pm  
 XREFS: C:\PTBLK\_0194061\_34x22 C:\PBDY\_0194061 C:\XBASE\_0194061 C:\PBANDY\_0194061 C:\PBASE\_0194061 C:\PSURF\_0194061 C:\PUTIL\_0194061

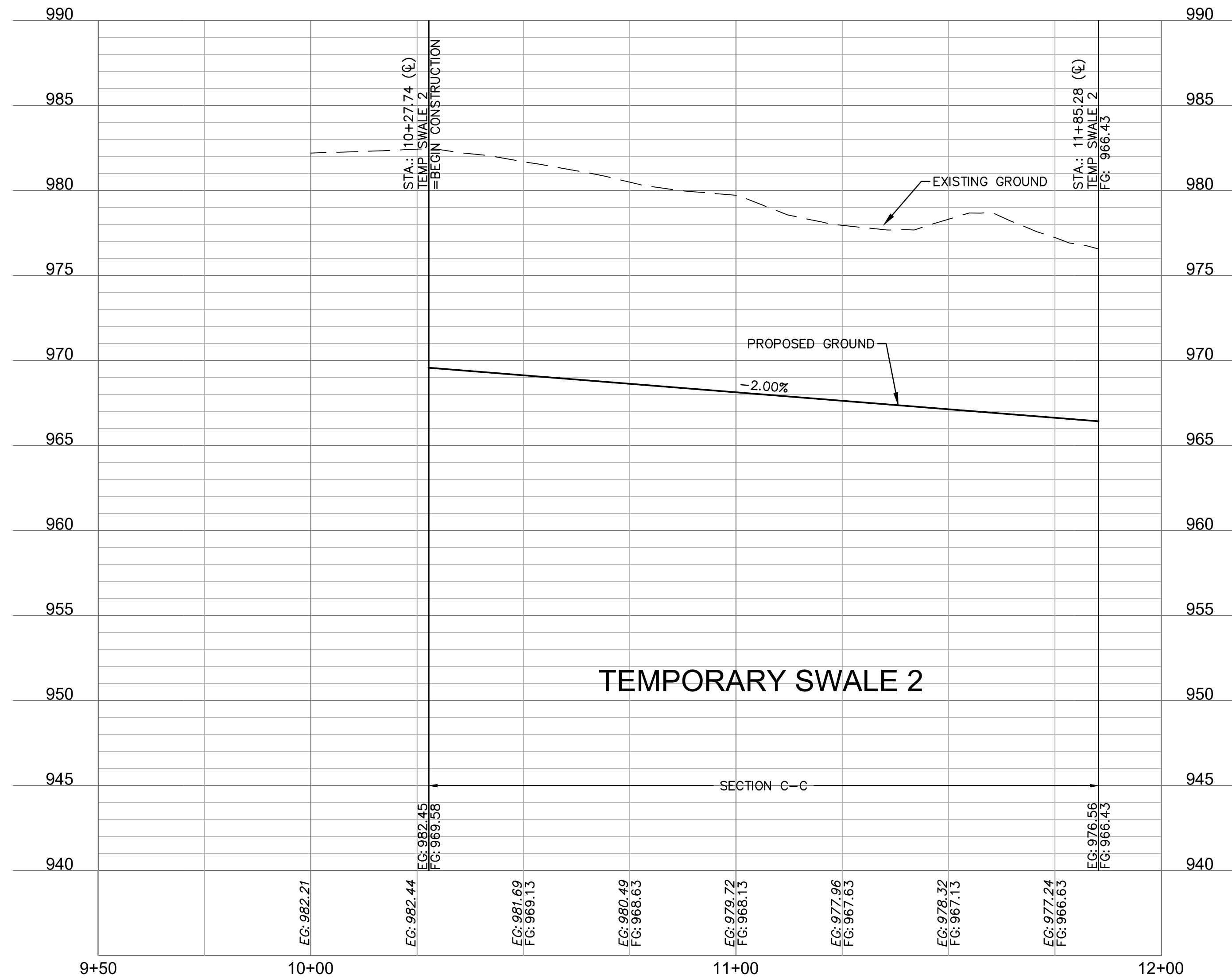
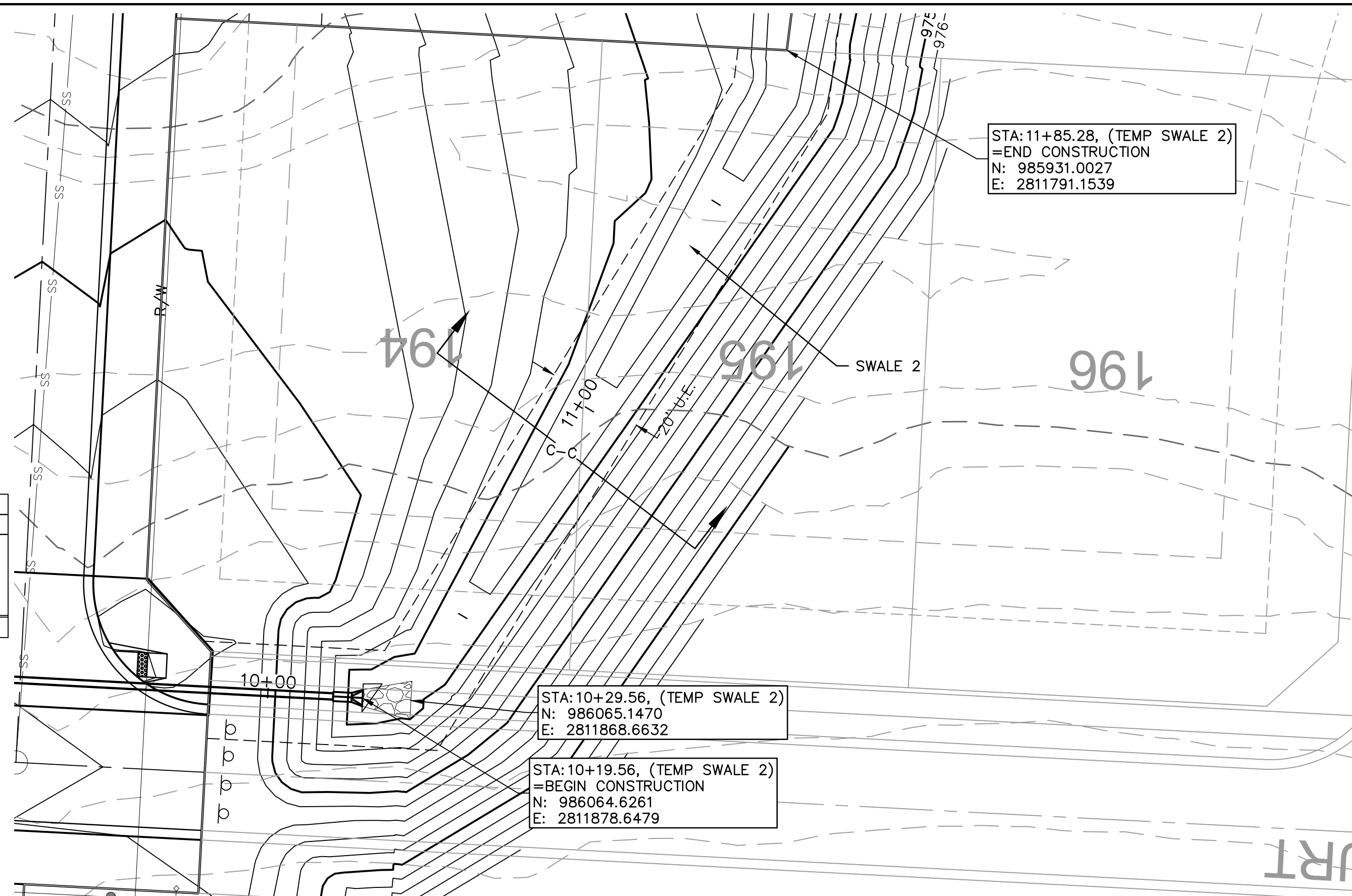


SWALE DESIGN TABLE (100-YEAR RETURN FREQUENCY)

SECTION DATA								RESULTS						
SECTION	Mannings Coefficient	Channel Slope (%)	Min. Swale Depth (ft)	Left Side Slope (H:V)	Right Side Slope (H:V)	Bottom Width (ft)	Discharge (cfs)	Water Depth (ft)	Flow Area (ft <sup>2</sup> )	Velocity (ft/sec)	Wetted Perimeter (ft)	Top Width (ft)	Specific Energy (ft)	Shear Stress (lbs/ft <sup>2</sup> )
C-C	0.03	2.00%	1.23	3:1	3:1	5	19.60	0.23	1.31	2.28	6.45	6.38	0.31	0.253

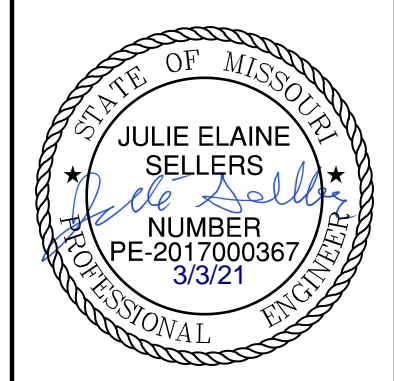
SWALE GRADING NOTES:

- CONTRACTOR SHALL CONSTRUCT SWALES WITH MINIMUM SLOPE, WIDTH AND DEPTH AS SHOWN IN THE SWALE DESIGN TABLES.
- AS-BUILT SURVEY IS REQUIRED/APPROVED BY CITY FOR ALL SWALES AND PRIOR TO APPROVAL FOR ANY BUILDING FOUNDATION PERMIT. CONTRACTOR SHALL BE REQUIRED TO REGRADE SWALES AT CONTRACTOR'S EXPENSE IF ABOVE REQUIREMENTS ARE NOT MET.



RELEASE FOR CONSTRUCTION AS NOTED ON PLANS REVIEW LEE'S SUMMIT, MISSOURI 04/05/2021

**olsson**  
 Olsson - Civil Engineering  
 Missouri Certificate of Authority #001592  
 1301 Burlington Street  
 North Kansas City, MO 64116  
 TEL 816.361.1177  
 FAX 816.361.1888  
 www.olson.com

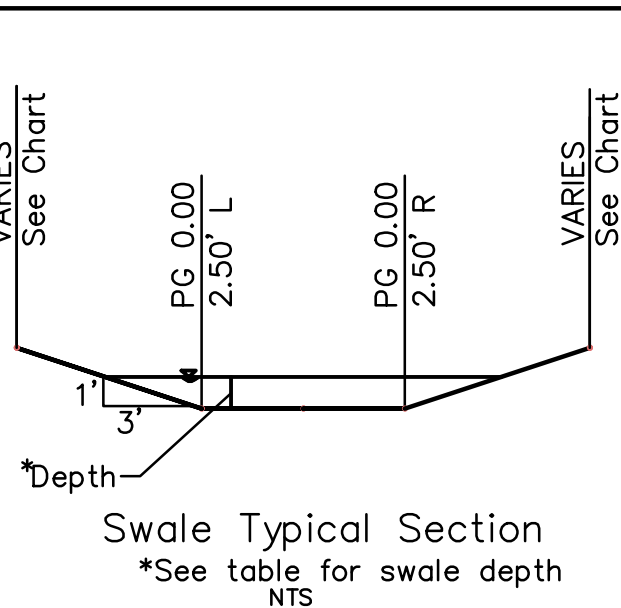
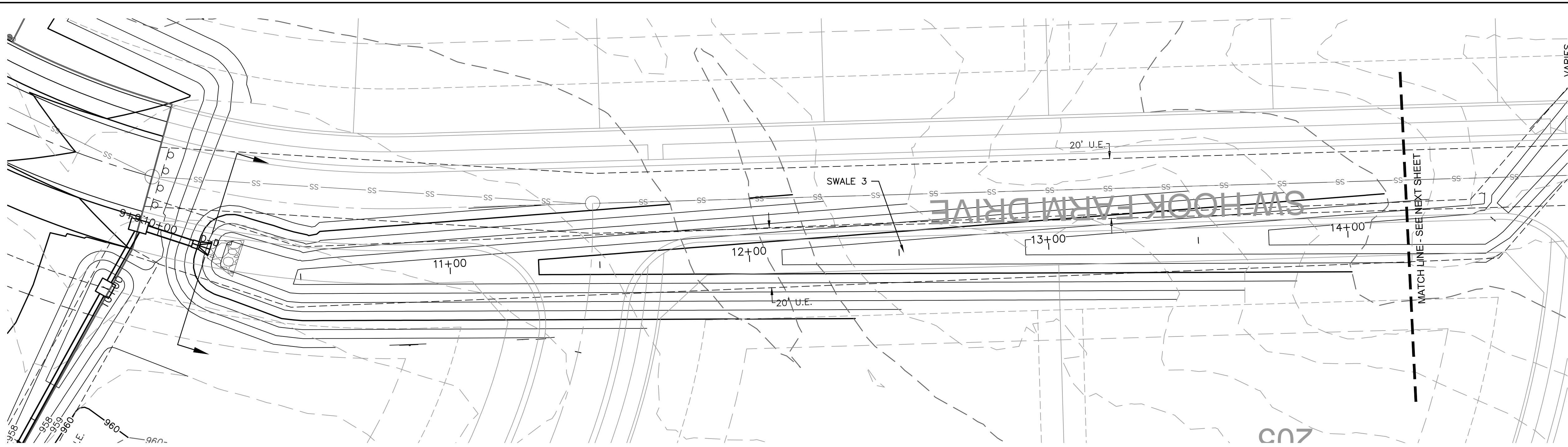


REV. NO.	DATE	REVISIONS DESCRIPTION
1	08/15/2020	REVISED PER CITY COMMENTS
2	08/25/2020	REVISED PER CITY COMMENTS

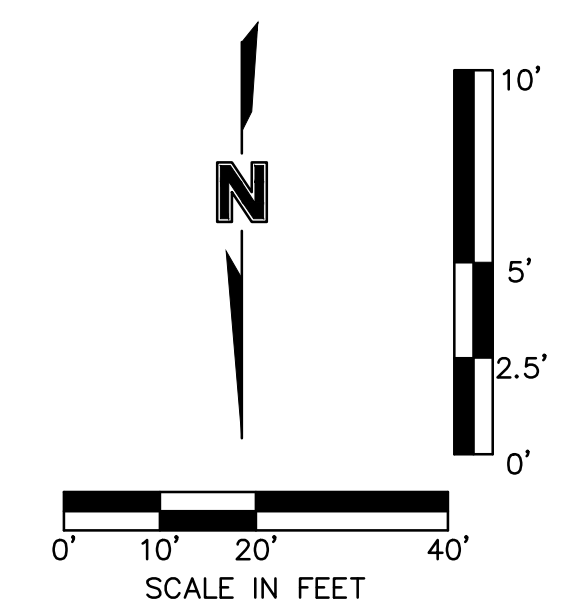
SWALE 2 PLAN & PROFILE  
 STREET AND STORM SEWER PLANS  
 HOOK FARMS  
 FIRST PLAT  
 LEE'S SUMMIT, MO  
 2020

drawn by: CGW  
 checked by: JES  
 approved by: NDH  
 QA/QC by: JES  
 project no.: 019-4061  
 drawing no.:  
 date: 04/20/2020

DWG: F:\2019\4001-4500\019-4061-Design\AutoCAD\Final Plans\Storm Plans\SW\_01\_0194061.dwg  
 DATE: Jun 29, 2020 5:59pm  
 XREFS: C:\PTBLK\_0194061\_34x22 C:\PBNDRY\_0194061 C:\PBASE\_0194061 C:\PSURF\_0194061 C:\PUTIL\_0194061  
 USER: nheiser C:\PBASE\_0194061

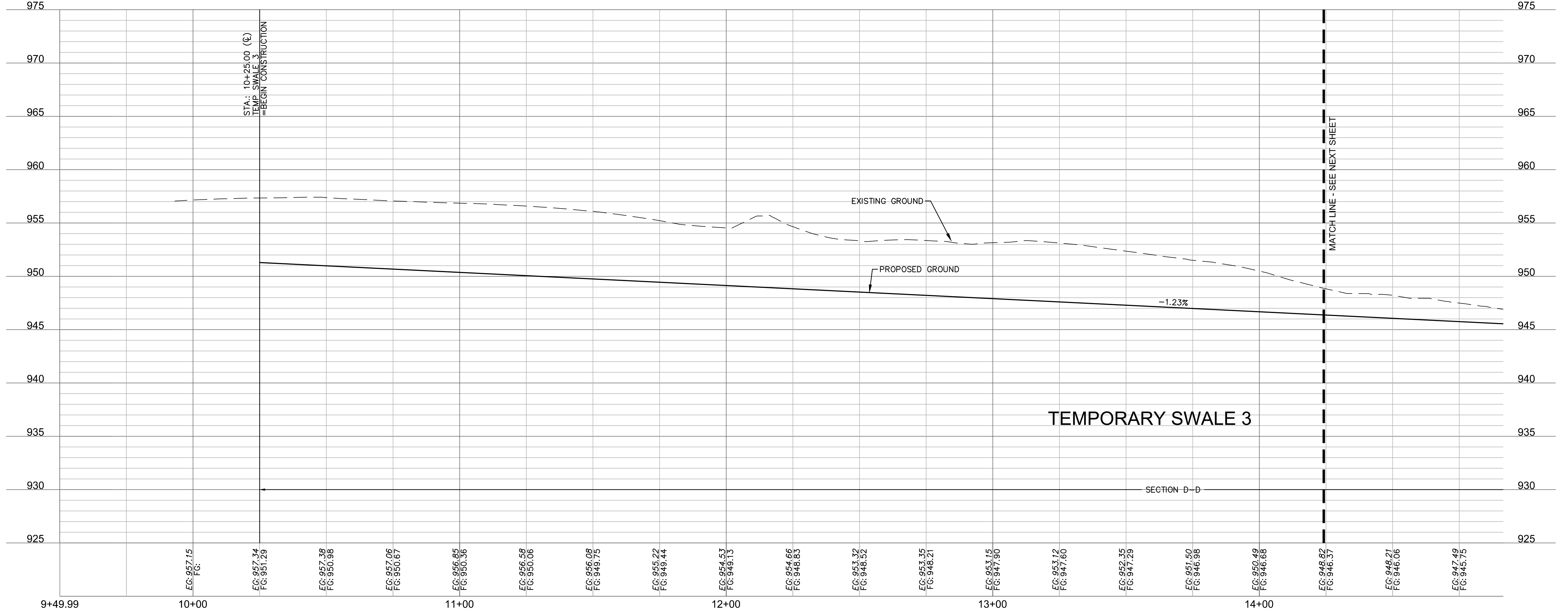


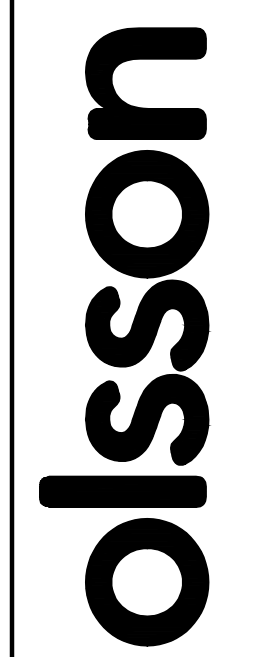
**RELEASE FOR CONSTRUCTION**  
 AS NOTED ON PLANS REVIEW  
 DEVELOPMENT SERVICES  
 LEE'S SUMMIT, MISSOURI  
 04/05/2021



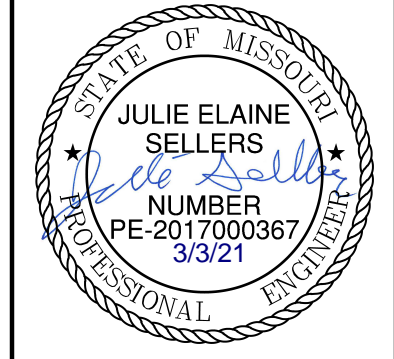
SWALE DESIGN TABLE (100-YEAR RETURN FREQUENCY)														
SECTION DATA								RESULTS						
SECTION	Mannings Coefficient	Channel Slope (%)	Min. Swale Depth (ft)	Left Side Slope (H:V)	Right Side Slope (H:V)	Bottom Width (ft)	Discharge (cfs)	Water Depth (ft)	Flow Area (ft <sup>2</sup> )	Velocity (ft/sec)	Wetted Perimeter (ft)	Top Width (ft)	Specific Energy (ft)	Shear Stress (lbs/ft <sup>2</sup> )
D-D	0.03	1.23%	2.03	3:1	3:1	5	36.35	1.03	8.33	4.36	11.51	11.18	1.33	0.556

**SWALE GRADING NOTES:**  
 1. CONTRACTOR SHALL CONSTRUCT SWALES WITH MINIMUM SLOPE, WIDTH AND DEPTH AS SHOWN IN THE SWALE DESIGN TABLES.  
 2. AS-BUILT SURVEY IS REQUIRED/APPROVED BY CITY FOR ALL SWALES AND PRIOR TO APPROVAL FOR ANY BUILDING FOUNDATION PERMIT. CONTRACTOR SHALL BE REQUIRED TO REGRADE SWALES AT CONTRACTOR'S EXPENSE IF ABOVE REQUIREMENTS ARE NOT MET.





Olsson - Civil Engineering  
 Missouri Certificate of Authority #001592  
 1301 Burlington Street  
 North Kansas City, MO 64116  
 TEL 816.361.1177  
 FAX 816.361.1888  
 www.olsson.com



REV. NO.	DATE	REVISIONS DESCRIPTION
1	06/15/2020	REVISED PER CITY COMMENTS
2	06/25/2020	REVISED PER CITY COMMENTS

SWALE 3 PLAN & PROFILE  
 STREET AND STORM SEWER PLANS

HOOK FARMS  
 FIRST PLAT

LEE'S SUMMIT, MO

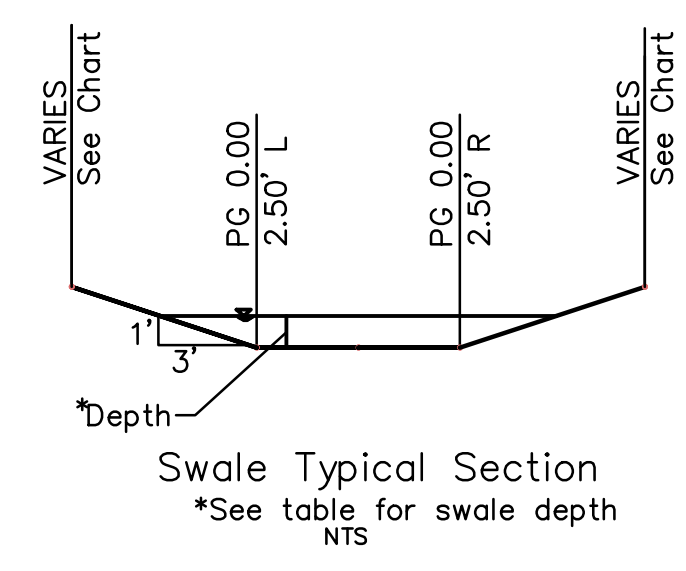
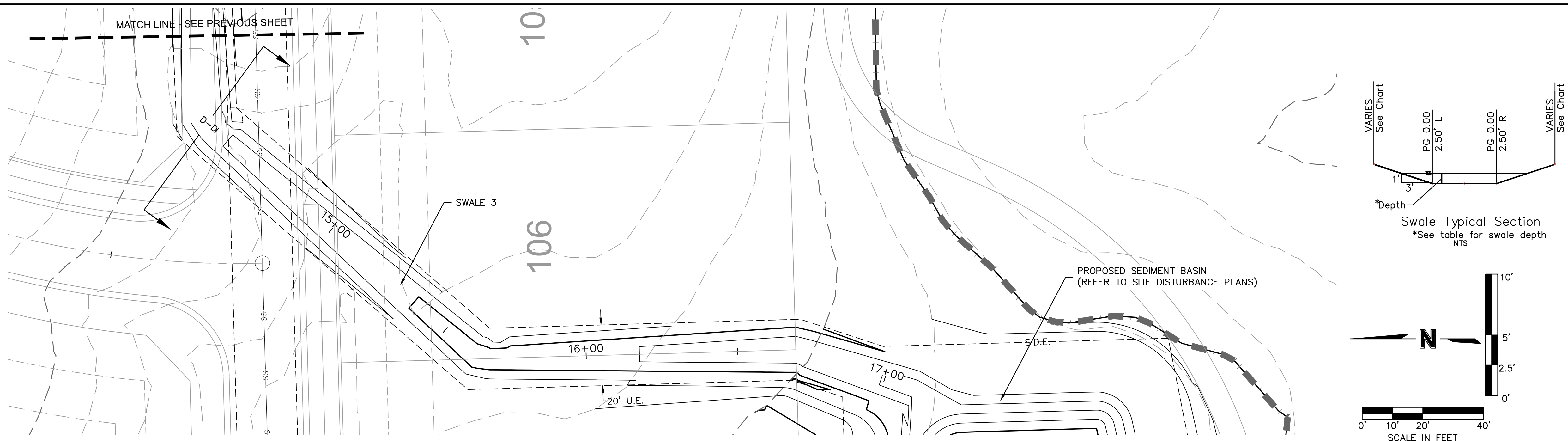
2020

REVISIONS

drawn by: CGW  
 checked by: JES  
 approved by: NDH  
 QA/QC by: JES  
 project no.: 019-4061  
 drawing no.:  
 date: 04/20/2020

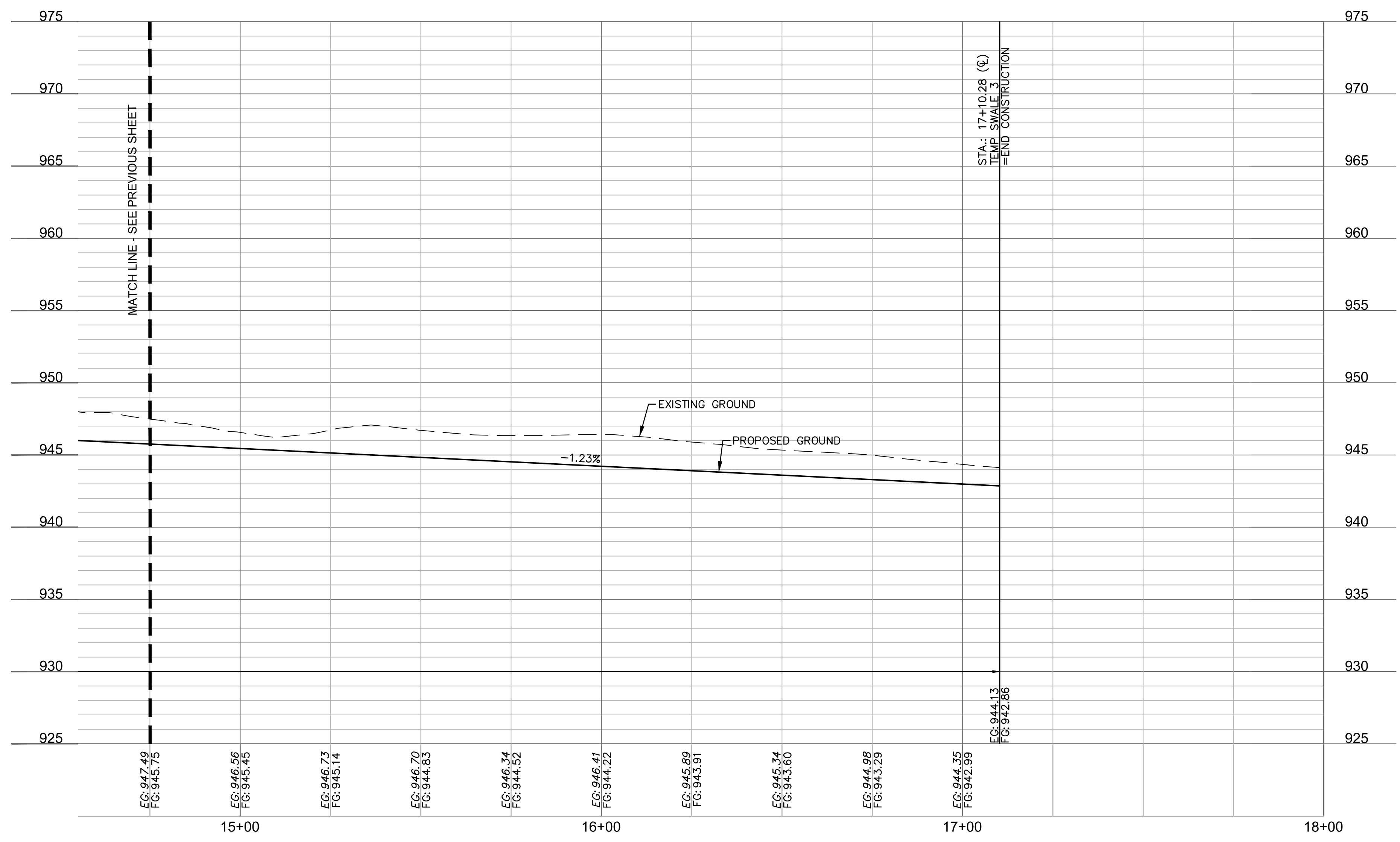
**SHEET**  
**C107**

DWG: F:\2019\4001-4500\019-4061\40-Design\AutoCAD\Final Plans\Storm Plans\SW\_01\_0194061.dwg USER: nheiser  
 DATE: Jun 29, 2020 5:59pm XREFS: C:\PTBLK\_0194061\_34x22 C:\PBNY\_0194061 C:\XBASE\_0194061 C:\PSURF\_0194061 C:\PUTIL\_0194061



SWALE DESIGN TABLE (100-YEAR RETURN FREQUENCY)														
SECTION DATA							RESULTS							
SECTION	Mannings Coefficient	Channel Slope (%)	Min. Swale Depth (ft)	Left Side Slope (H:V)	Right Side Slope (H:V)	Bottom Width (ft)	Discharge (cfs)	Water Depth (ft)	Flow Area (ft <sup>2</sup> )	Velocity (ft/sec)	Wetted Perimeter (ft)	Top Width (ft)	Specific Energy (ft)	Shear Stress (lbs/ft <sup>2</sup> )
D-D	0.03	1.23%	2.03	3:1	3:1	5	36.35	1.03	8.33	4.36	11.51	11.18	1.33	0.556

- SWALE GRADING NOTES:**
- CONTRACTOR SHALL CONSTRUCT SWALES WITH MINIMUM SLOPE, WIDTH AND DEPTH AS SHOWN IN THE SWALE DESIGN TABLES.
  - AS-BUILT SURVEY IS REQUIRED/APPROVED BY CITY FOR ALL SWALES AND PRIOR TO APPROVAL FOR ANY BUILDING FOUNDATION PERMIT. CONTRACTOR SHALL BE REQUIRED TO REGRADE SWALES AT CONTRACTOR'S EXPENSE IF ABOVE REQUIREMENTS ARE NOT MET.



RELEASE FOR CONSTRUCTION AS NOTED ON PLANS REVIEW DEVELOPMENT SERVICES LEE'S SUMMIT, MISSOURI  
 04/05/2021

Olsson - Civil Engineering  
 Missouri Certificate of Authority #001592  
 1301 Burlington Street  
 North Kansas City, MO 64116  
 TEL 816.361.1177  
 FAX 816.361.1888  
 www.olson.com

REV. NO.	DATE	REVISIONS DESCRIPTION	BY
1	06/15/2020	REVISED PER CITY COMMENTS	
2	06/25/2020	REVISED PER CITY COMMENTS	

SWALE 3 PLAN & PROFILE CONT'D  
 STREET AND STORM SEWER PLANS

HOOK FARMS  
 FIRST PLAT

LEE'S SUMMIT, MO

2020

REVISIONS

drawn by: _____	CGW
checked by: _____	JES
approved by: _____	NDH
QA/QC by: _____	JES
project no.: _____	019-4061
date: _____	04/20/2020

**SHEET C108**



DWG: F:\2019\4001-4500\019-4061-Design\AutoCAD\Final Plans\Storm Plans\SW\_01\_0194061.dwg USER: nheiser  
 DATE: Jun 29, 2020 6:00pm XREFS: C:\PTBLK\_0194061\_34x22 C:\XBASE\_0194061 C:\PBASE\_0194061 C:\PUTIL\_0194061

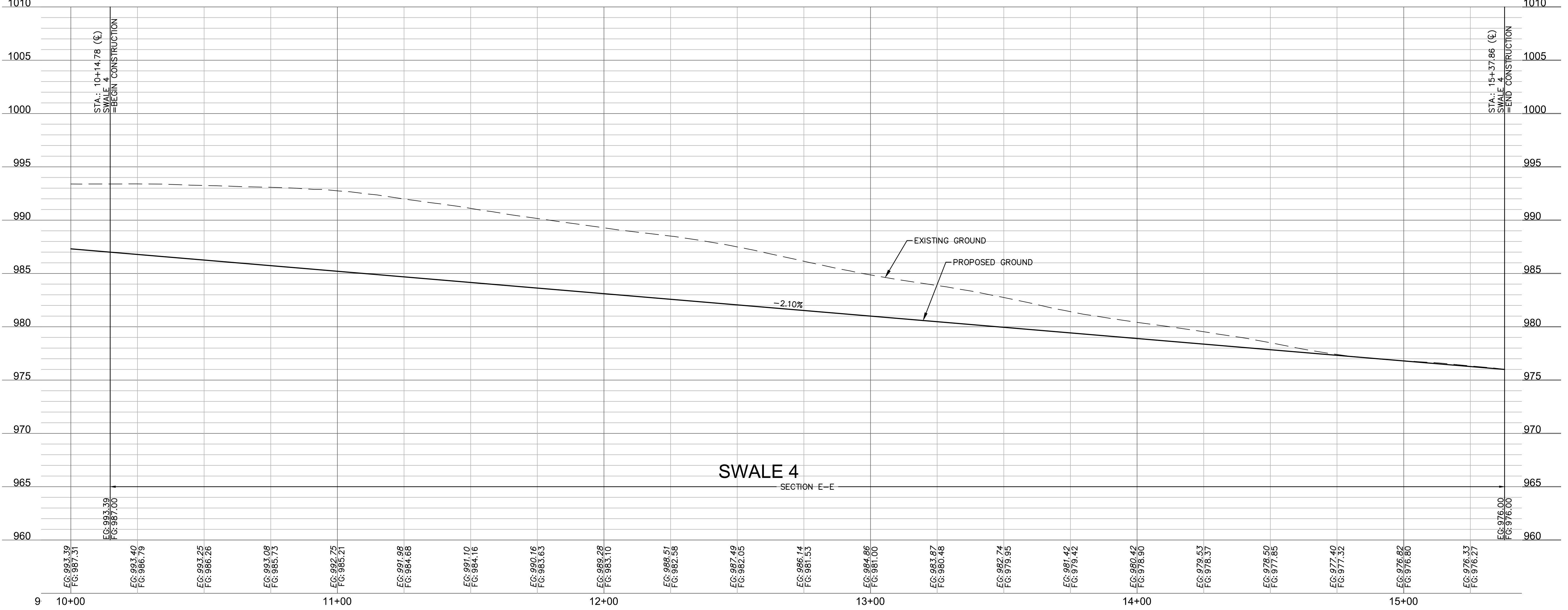
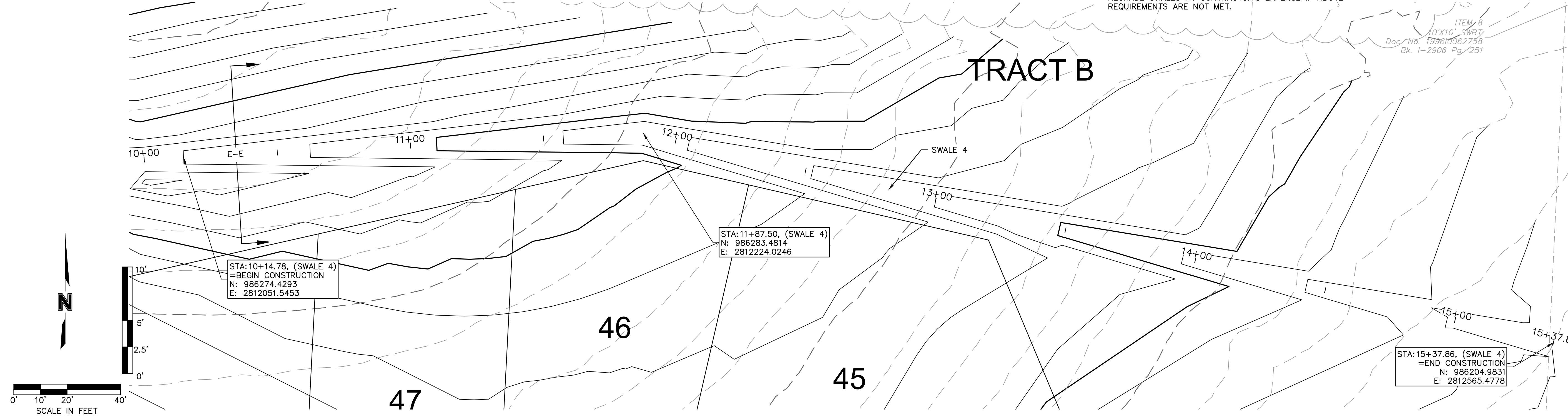
SWALE DESIGN TABLE (100-YEAR RETURN FREQUENCY)														
SECTION DATA								RESULTS						
SECTION	Manning's Coefficient	Channel Slope (%)	Min. Swale Depth (ft)	Left Side Slope (H:V)	Right Side Slope (H:V)	Bottom Width (ft)	Discharge (cfs)	Water Depth (ft)	Flow Area (ft <sup>2</sup> )	Velocity (ft/sec)	Wetted Perimeter (ft)	Top Width (ft)	Specific Energy (ft)	Shear Stress (lbs/ft <sup>2</sup> )
E-E	0.03	2.10%	1.39	3:1	3:1	5	7.99	0.39	2.41	3.32	7.47	7.34	0.56	0.422

**SWALE GRADING NOTES:**

- CONTRACTOR SHALL CONSTRUCT SWALES WITH MINIMUM SLOPE, WIDTH AND DEPTH AS SHOWN IN THE SWALE DESIGN TABLES.
- AS-BUILT SURVEY IS REQUIRED/APPROVED BY CITY FOR ALL SWALES AND PRIOR TO APPROVAL FOR ANY BUILDING FOUNDATION PERMIT. CONTRACTOR SHALL BE REQUIRED TO REGRADE SWALES AT CONTRACTOR'S EXPENSE IF ABOVE REQUIREMENTS ARE NOT MET.

RELEASE FOR CONSTRUCTION  
 AS NOTED ON PLANS REVIEW  
 DEVELOPMENT SERVICES  
 LEE'S SUMMIT, MISSOURI  
 04/05/2021

ITEM 8  
 10'X10' SWBY  
 Doc No. 199610062758  
 Bk. 1-2906 Pg. 251



**olsson**  
 Olsson - Civil Engineering  
 Missouri Certificate of Authority #001592  
 1301 Burlington Street  
 North Kansas City, MO 64116  
 TEL 816.361.1177  
 FAX 816.361.1888  
 www.olsosn.com

STATE OF MISSOURI  
 JULIE ELAINE SELLERS  
 PROFESSIONAL ENGINEER  
 NUMBER PE-2017000367  
 3/3/21

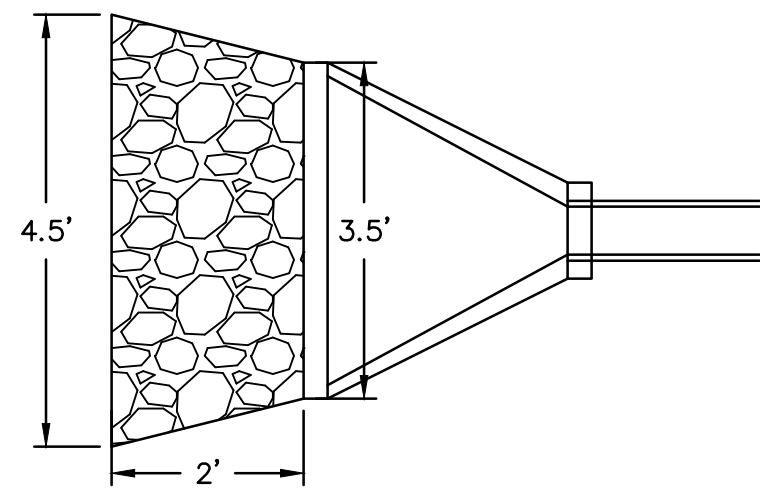
REV. NO.	DATE	REVISIONS DESCRIPTION
1	08/15/2020	REVISED PER CITY COMMENTS
2	08/25/2020	REVISED PER CITY COMMENTS

SWALE 4 PLAN & PROFILE  
 STREET AND STORM SEWER PLANS  
 HOOK FARMS  
 FIRST FLAT  
 LEE'S SUMMIT, MO  
 2020

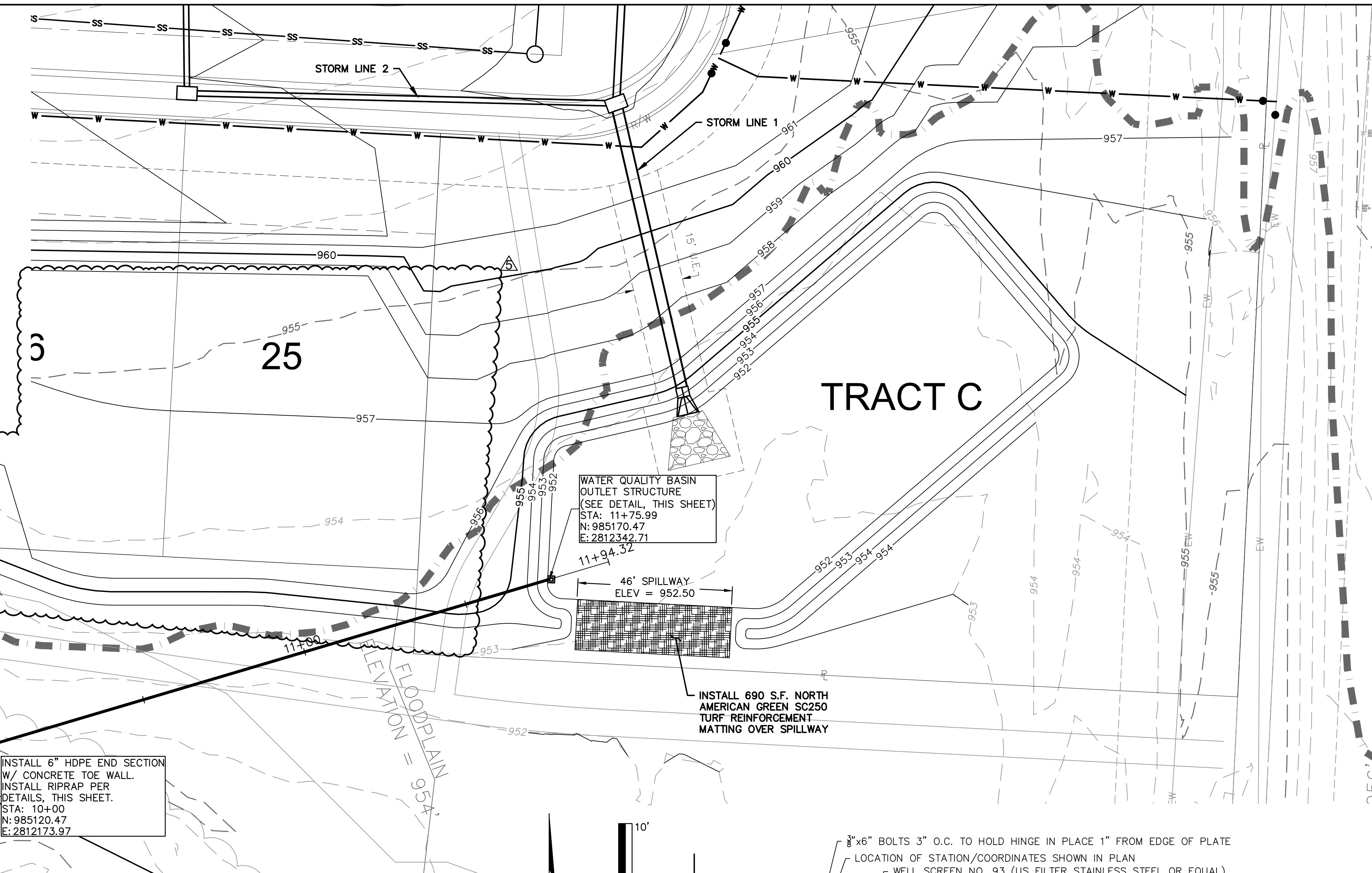
DWG: F:\2019\4001-4500\019-4061\40-Design\AutoCAD\Final Plans\Storm Plans\NC\_DBP01\_0194061.dwg  
 DATE: Dec 03, 2020 8:36am XREFS: C:\PTBLK\_0194061\_34x22 C:\XBASE\_0194061 C:\PBASE\_0194061 C:\PBNDY\_0194061 C:\PUTIL\_0194061  
 USER: rneiser

Riprap Calculations							
End Section	Q <sub>100</sub> (cfs)	Pipe Diameter (ft)	Class*	D50* (in)	Apron Length (ft)	Apron Depth (ft)	Area (SY)
WQv Outlet	0.93	0.5	1	5	2	1.46	0.5

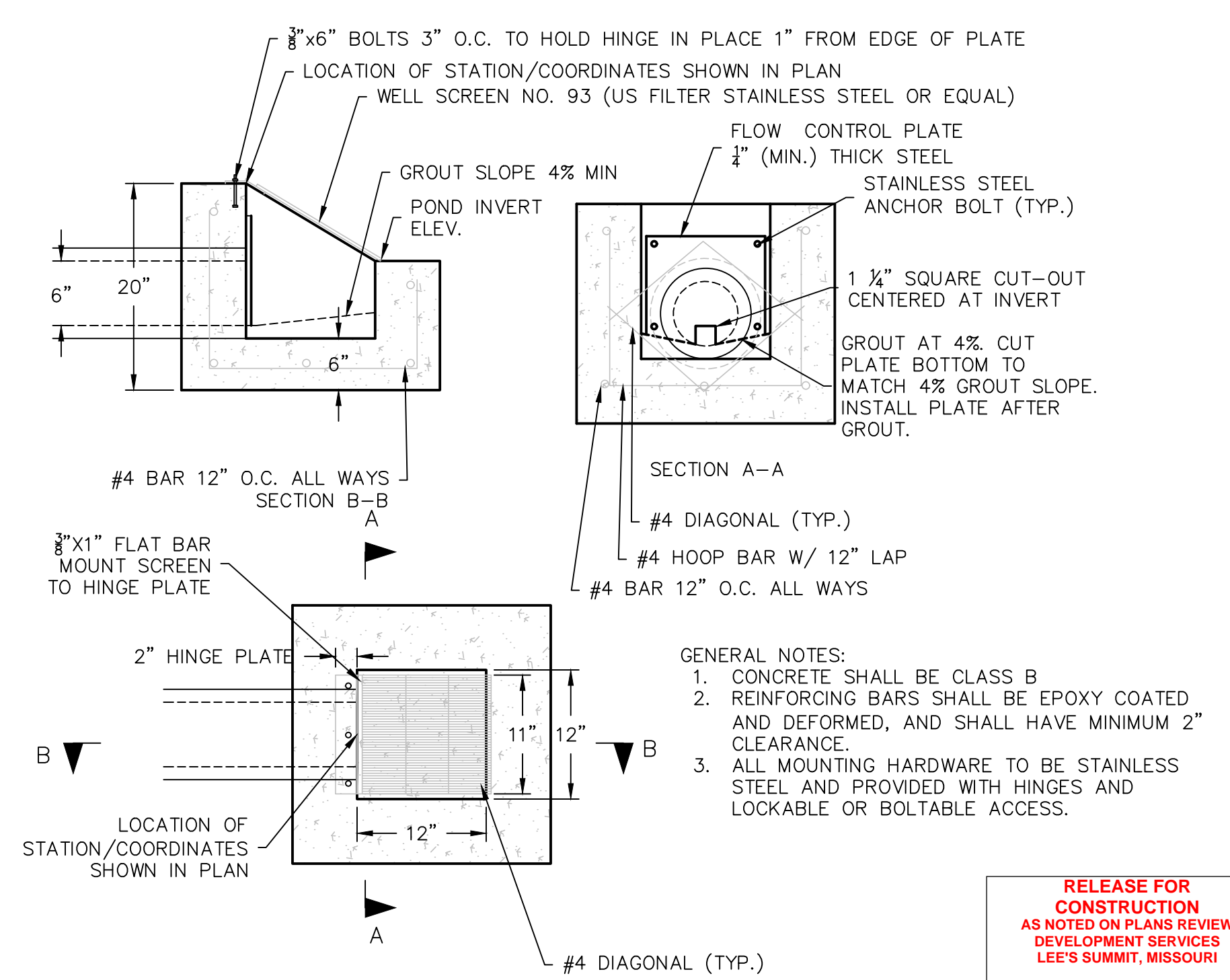
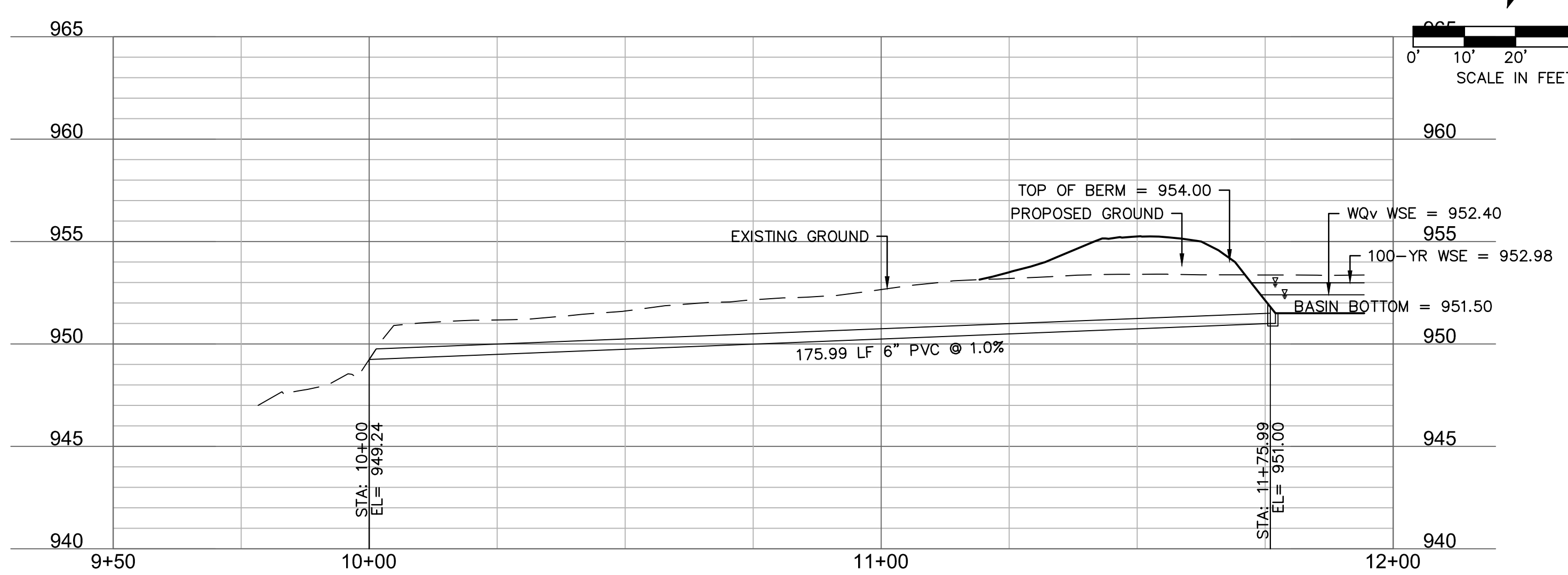
\*Per Table 10.1 HEC 14-FHWA-Energy Dissipators Pg. 10-18



Scale: 1"=2'  
 02 RIPRAP OUTLET PROTECTION



WATER QUALITY OUTLET (9+50 - 12+00)



RELEASE FOR CONSTRUCTION  
 AS NOTED ON PLANS REVIEW  
 DEVELOPMENT SERVICES  
 LEE'S SUMMIT, MISSOURI  
 04/05/2021

Olsson - Civil Engineering  
 Missouri Certificate of Authority #001592  
 1301 Burlington Street  
 North Kansas City, MO 64116  
 TEL 816.361.1177  
 FAX 816.361.1888  
 www.olsson.com

JULIE ELAINE SELLERS  
 NUMBER PE-2017000367  
 3/3/21

REV. NO.	DATE	REVISIONS DESCRIPTION	BY
1	08/15/2020	REVISED PER CITY COMMENTS	
2	08/25/2020	REVISED PER CITY COMMENTS	
3	09/10/2020	REVISED PIPE INSULATION	
4	10/01/2020	REVISED PER CITY COMMENTS	
5	11/18/2020	REVISED LOTS 25-29 GRADING	

WATER QUALITY BASIN PLAN  
 STREET AND STORM SEWER PLANS

HOOK FARMS  
 FIRST FLAT





LEE'S SUMMIT, MO

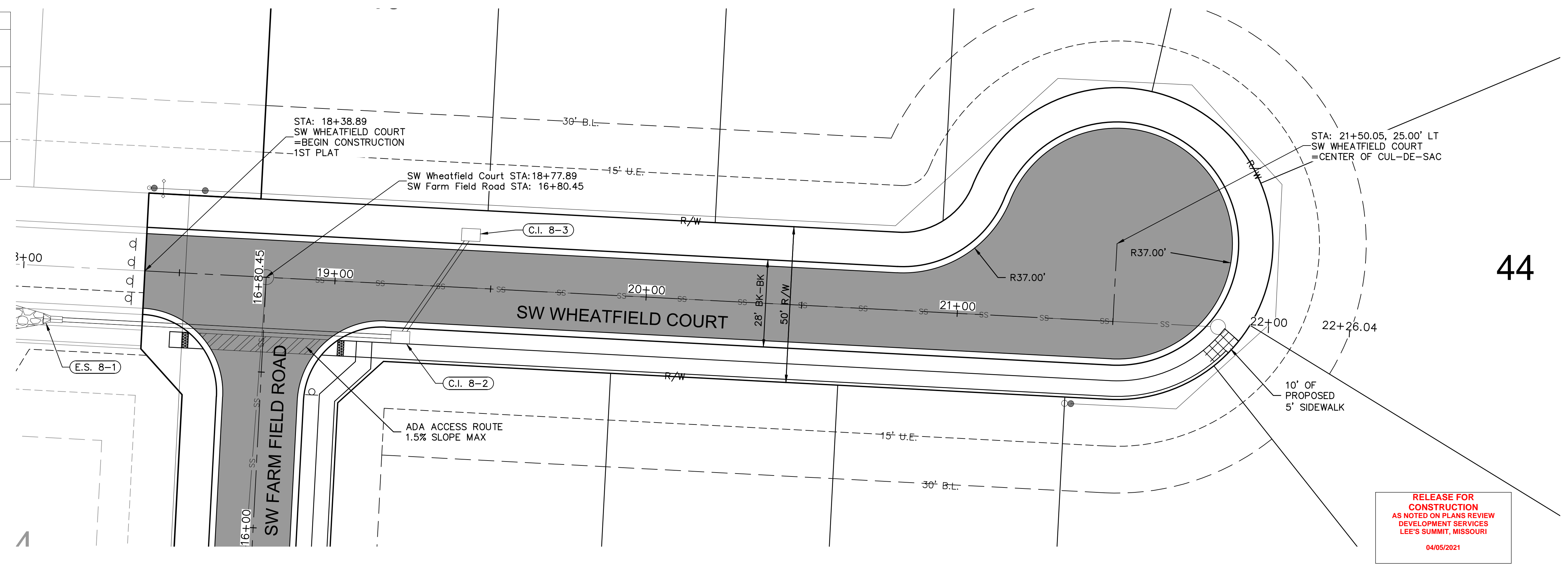
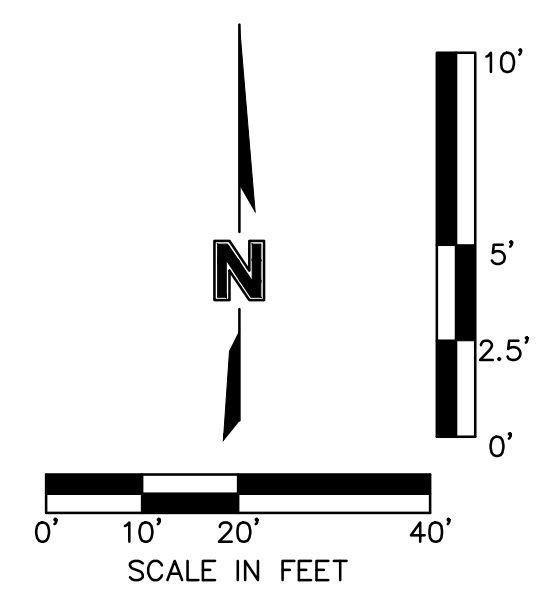
2020

REVISIONS

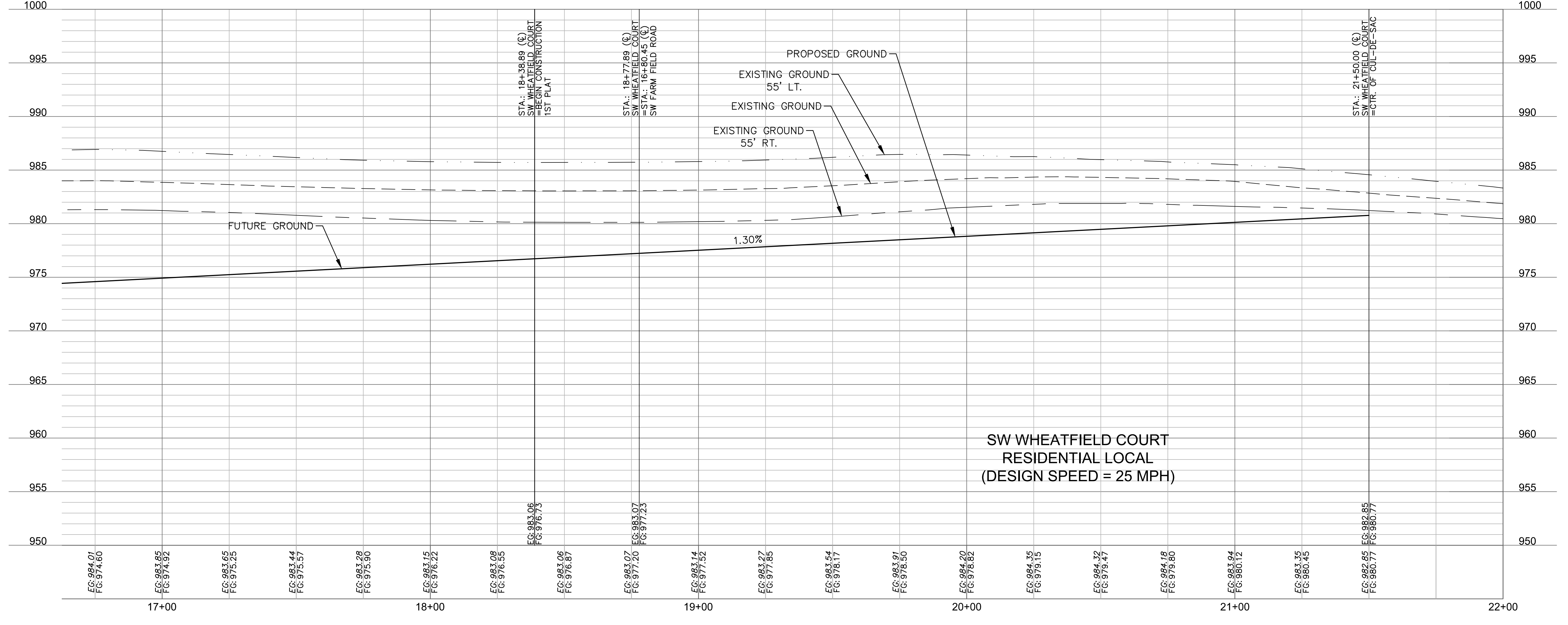
drawn by: CGW  
 checked by: JES  
 approved by: NDH  
 QA/QC by: JES  
 project no.: 019-4061  
 drawing no.:  
 date: 04/20/2020

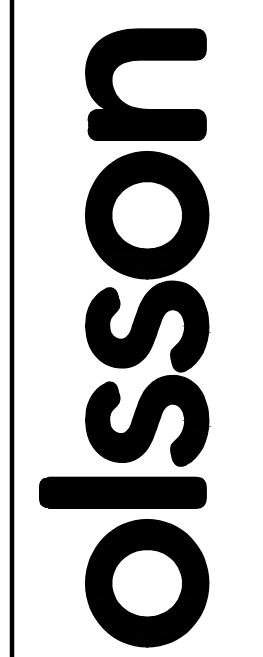
DWG: F:\2019\4001-4500\019-4061-40-Design\AutoCAD\Final Plans\Sheets\GNCV\Street and Storm Plans\VC\_RPP01\_0194061.dwg USER: nheiser C\_PSTRM\_0194061  
 DATE: Mar 30, 2021 1:44pm XREFS: C\_PTBK\_0194061\_34x22 C\_PBASE\_0194061 C\_PBASE\_0194061 C\_PPUTIL\_0194061 C\_PPATT\_0194061 C\_PBASE\_0194061 C\_PSTRM\_0194061

LEGEND	
	ADA ACCESS ROUTE
	ASPHALT PAVEMENT
	CG-2 CURB & GUTTER
	PROPOSED SIDEWALK

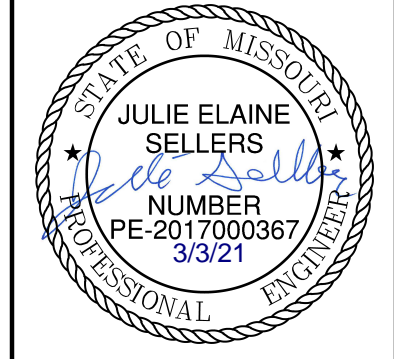


**RELEASE FOR CONSTRUCTION**  
 AS NOTED ON PLANS REVIEW  
 DEVELOPMENT SERVICES  
 LEE'S SUMMIT, MISSOURI  
 04/05/2021





Olsson - Civil Engineering  
 Missouri Certificate of Authority #001592  
 1301 Burlington Street  
 North Kansas City, MO 64116  
 TEL 816.361.1177  
 FAX 816.361.1888  
 www.olson.com



JULIE ELAINE SELLERS  
 NUMBER PE-2017000367  
 3/3/21  
 PROFESSIONAL ENGINEER

REV. NO.	DATE	REVISIONS DESCRIPTION
1	06/15/2020	REVISED PER CITY COMMENTS
2	06/25/2020	REVISED PER CITY COMMENTS
3	09/10/2020	REVISED PIPE INSULATION
4	10/01/2020	REVISED PER CITY COMMENTS
5	11/18/2020	REVISED LOTS 25-29 GRADING
6	02/17/2021	REVISED ADA RAMPS
7	03/12/2021	REVISED ADA RAMPS

ROADWAY PLAN & PROFILE (SW WHEATFIELD COURT)  
 STREET AND STORM SEWER PLANS

HOOK FARMS  
 FIRST PLAT

LEE'S SUMMIT, MO

BY: \_\_\_\_\_

2020

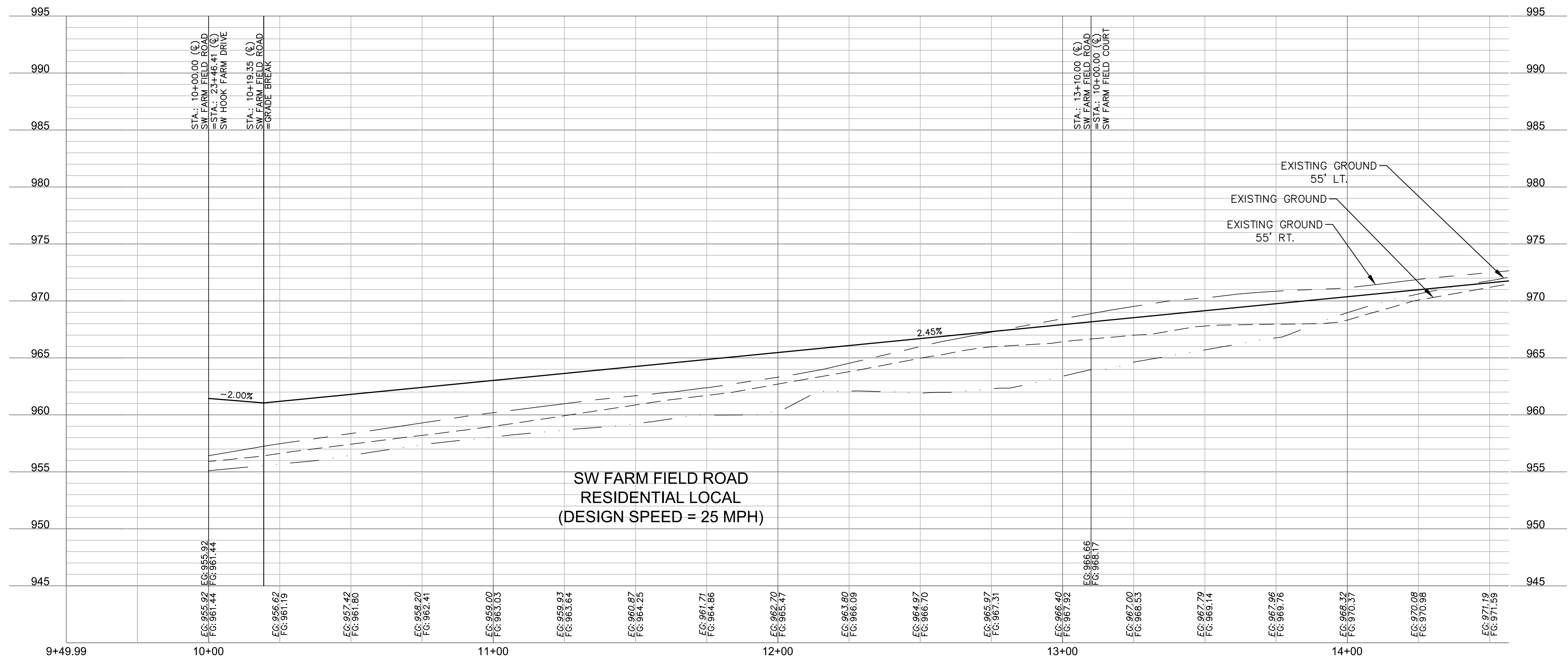
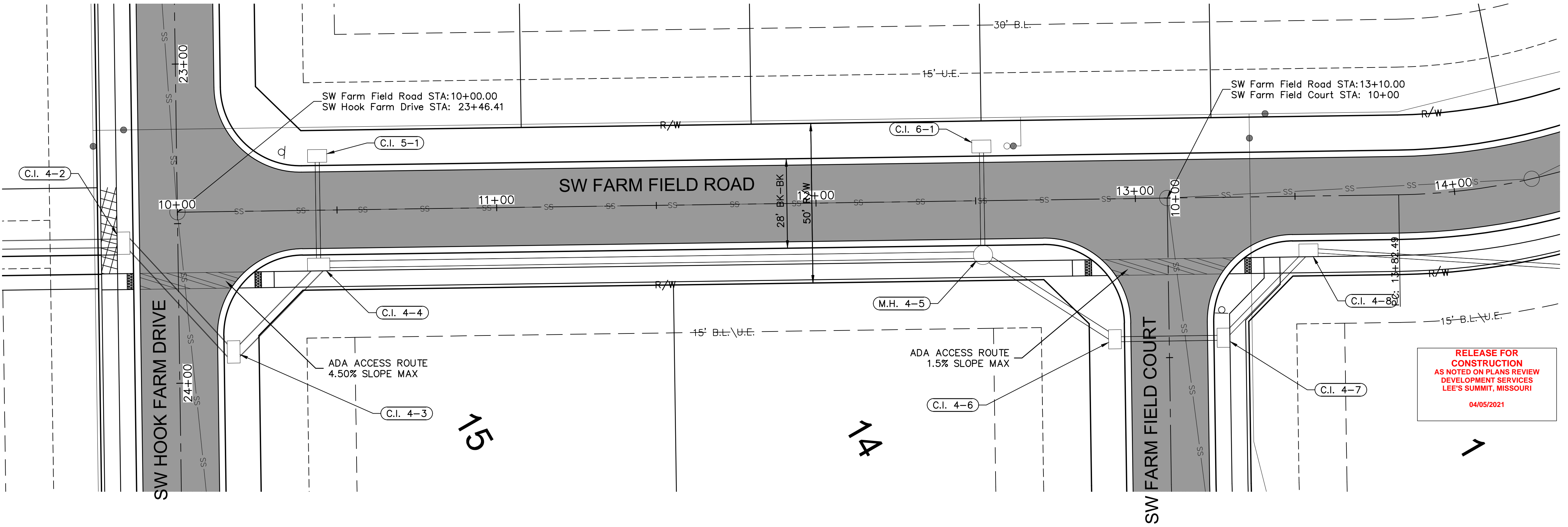
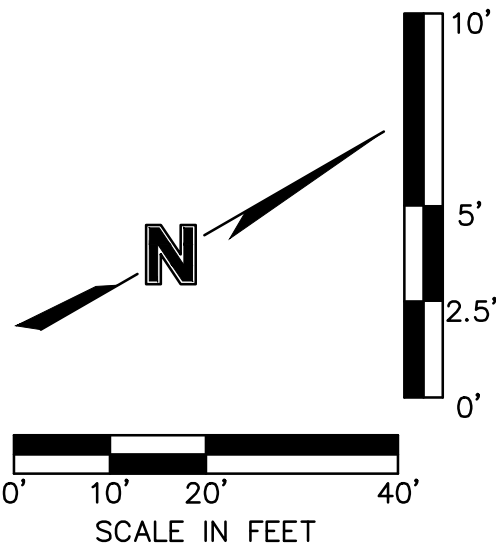
REVISIONS

drawn by: \_\_\_\_\_ CGW  
 checked by: \_\_\_\_\_ JES  
 approved by: \_\_\_\_\_ NDH  
 QA/QC by: \_\_\_\_\_ JES  
 project no.: 019-4061  
 drawing no.: \_\_\_\_\_  
 date: 04/20/2020

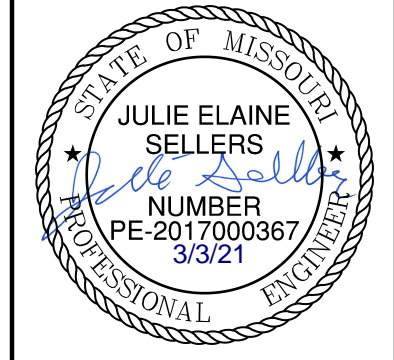
SHEET C111

DWG: F:\2019\4001-4500\019-4061-Design\AutoCAD\Final Plans\Sheets\GNCV\Street and Storm Plans\C\_RPP01\_0194061.dwg  
 DATE: Mar 30, 2021 1:44pm XREFS: C:\PTBLK\_0194061\_34x22 C:\PBASE\_0194061 C:\XBASE\_0194061 C:\PPATT\_0194061 C:\PUTIL\_0194061 C:\PSURF\_0194061 C:\PBASE\_0194061 C:\PPSTRM\_0194061 USER: nheiser

LEGEND	
	ADA ACCESS ROUTE
	ASPHALT PAVEMENT
	CG-2 CURB & GUTTER



RELEASE FOR CONSTRUCTION  
 AS NOTED ON PLANS REVIEW  
 DEVELOPMENT SERVICES  
 LEE'S SUMMIT, MISSOURI  
 04/05/2021



REV. NO.	DATE	REVISIONS DESCRIPTION
1	08/15/2020	REVISED PER CITY COMMENTS
2	08/25/2020	REVISED PER CITY COMMENTS
3	09/10/2020	REVISED PER CITY COMMENTS
4	10/01/2020	REVISED PER CITY COMMENTS
5	11/18/2020	REVISED PER CITY COMMENTS
6	02/17/2021	REVISED ADA RAMPS
7	03/12/2021	REVISED ADA RAMPS

ROADWAY PLAN & PROFILE (SW FARM FIELD ROAD) STREET AND STORM SEWER PLANS	BY
HOOK FARMS FIRST PLAT	
LEE'S SUMMIT, MO	2020

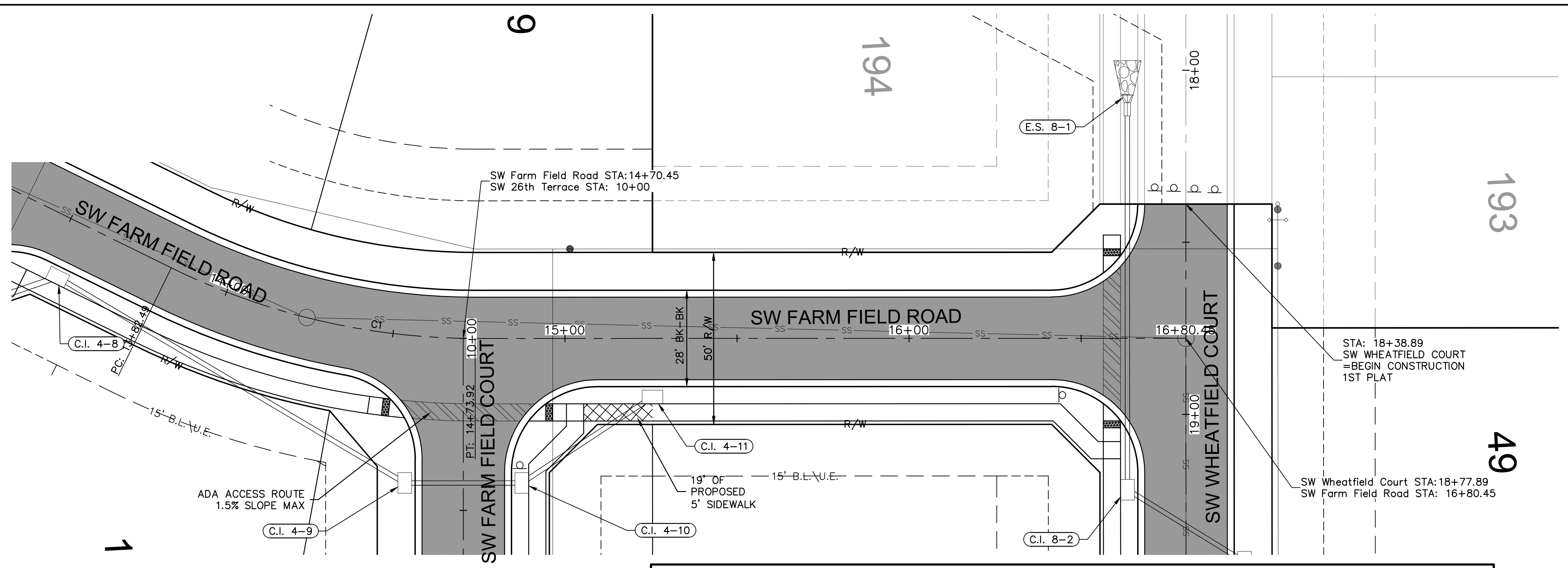
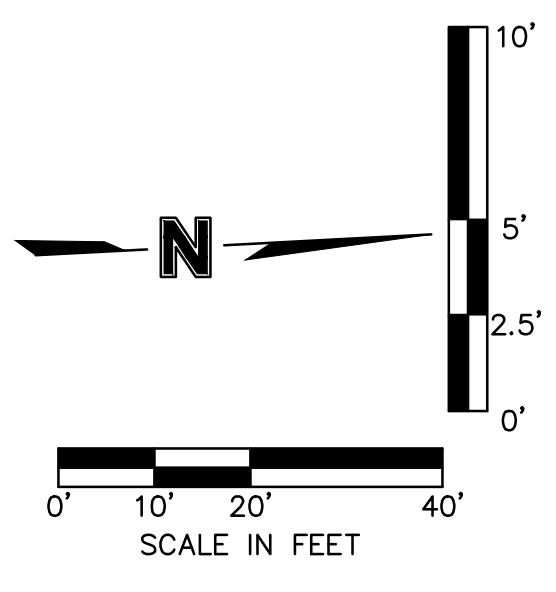
drawn by: CGW  
 checked by: JES  
 approved by: NDH  
 QA/QC by: JES  
 project no.: 019-4061  
 drawing no.:  
 date: 04/20/2020

SHEET  
C112

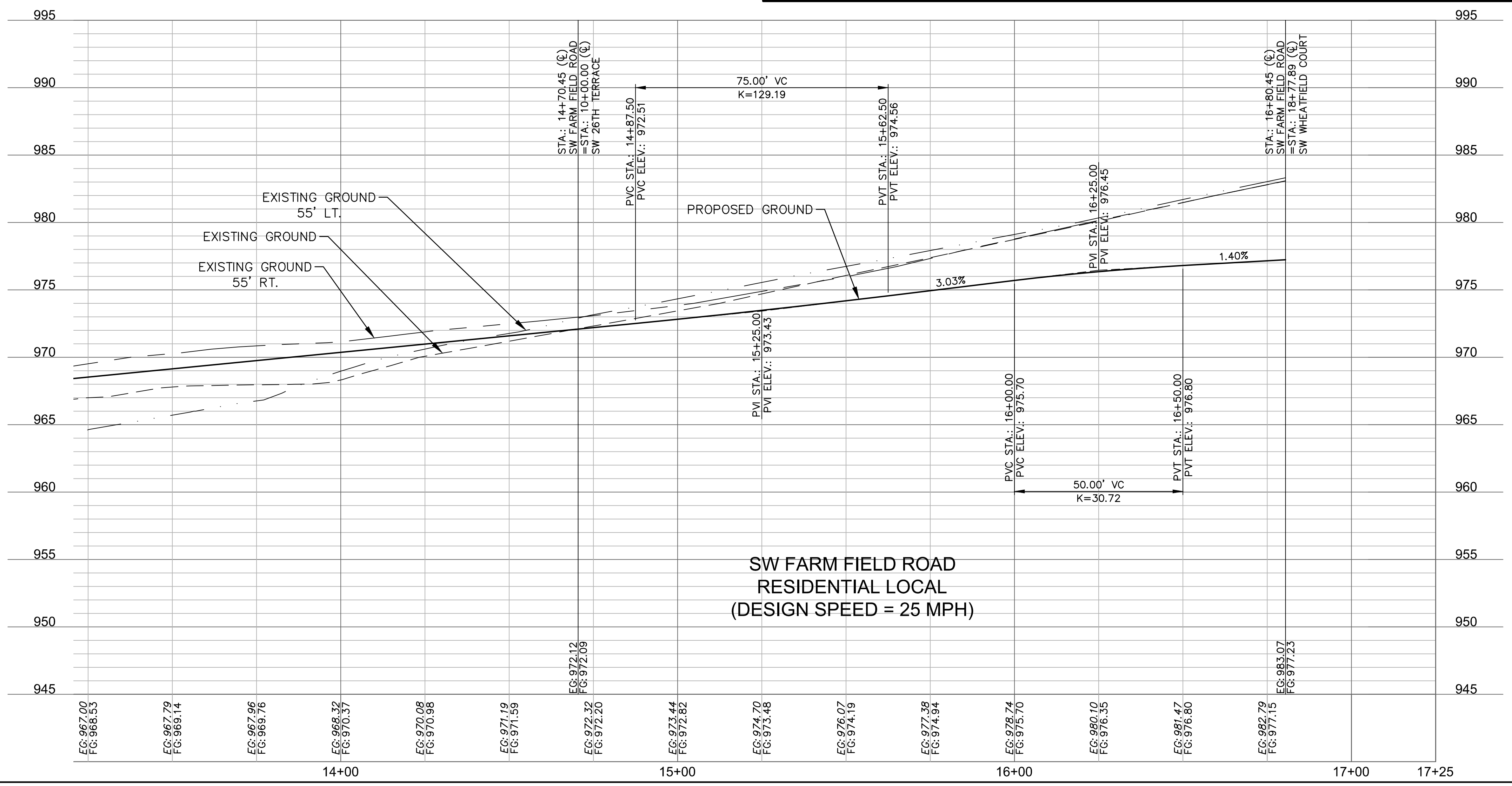
**olsson**  
 Olsson - Civil Engineering  
 Missouri Certificate of Authority #001592  
 1301 Burlington Street  
 North Kansas City, MO 64116  
 TEL 816.361.1177  
 FAX 816.361.1888  
 www.olson.com

DWG: F:\2019\4001-4500\019-4061-Design\AutoCAD\Final Plans\Sheets\GNCV\Street and Storm Plans\VC\_RPP01\_0194061.dwg  
 DATE: Mar 30, 2021 1:44pm XREFS: C:\PTBLK\_0194061\_34x22 C:\PNDY\_0194061 C:\XBASE\_0194061 C:\FBASE\_0194061 C:\PPATT\_0194061 C:\PUTIL\_0194061 C:\PSTRM\_0194061  
 USER: nheiser

LEGEND	
	ADA ACCESS ROUTE
	ASPHALT PAVEMENT
	CG-2 CURB & GUTTER



ALIGNMENT CURVES								
CURVE ID #	STATION RANGE	START COORD.	END COORD.	RADIUS (FT)	LENGTH (FT)	DELTA	TANGENT	P.I. STATION (BACK)
C1	13+82.49 14+73.92	N: 985784.58 E: 2811914.27	N: 985871.67 E: 2811939.38	200.00	91.43	026°11'37"	46.53	14+27.39



SW FARM FIELD ROAD  
 RESIDENTIAL LOCAL  
 (DESIGN SPEED = 25 MPH)

RELEASE FOR  
 CONSTRUCTION  
 AS NOTED ON PLANS REVIEW  
 DEVELOPMENT SERVICES  
 LEE'S SUMMIT, MISSOURI  
 04/05/2021

**olsson**

Olsson - Civil Engineering  
 Missouri Certificate of Authority #001592  
 1301 Burlington Street  
 North Kansas City, MO 64116  
 TEL 816.361.1177  
 FAX 816.361.1888  
 www.olson.com

STATE OF MISSOURI  
 JULIE ELAINE SELLERS  
 PE-2017000367  
 3/3/21  
 PROFESSIONAL ENGINEER

REV. NO.	DATE	REVISIONS DESCRIPTION
1	06/15/2020	REVISED PER CITY COMMENTS
2	06/25/2020	REVISED PER CITY COMMENTS
3	09/10/2020	REVISED PIPE INSULATION
4	10/01/2020	REVISED PER CITY COMMENTS
5	11/18/2020	REVISED LOTS 25-29 GRADING
6	02/17/2021	REVISED ADA RAMPS
7	03/12/2021	REVISED ADA RAMPS

BY \_\_\_\_\_

ROADWAY PLAN & PROFILE (SW FARM FIELD ROAD)  
 STREET AND STORM SEWER PLANS


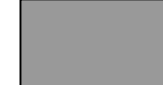


HOOK FARMS  
 FIRST PLAT

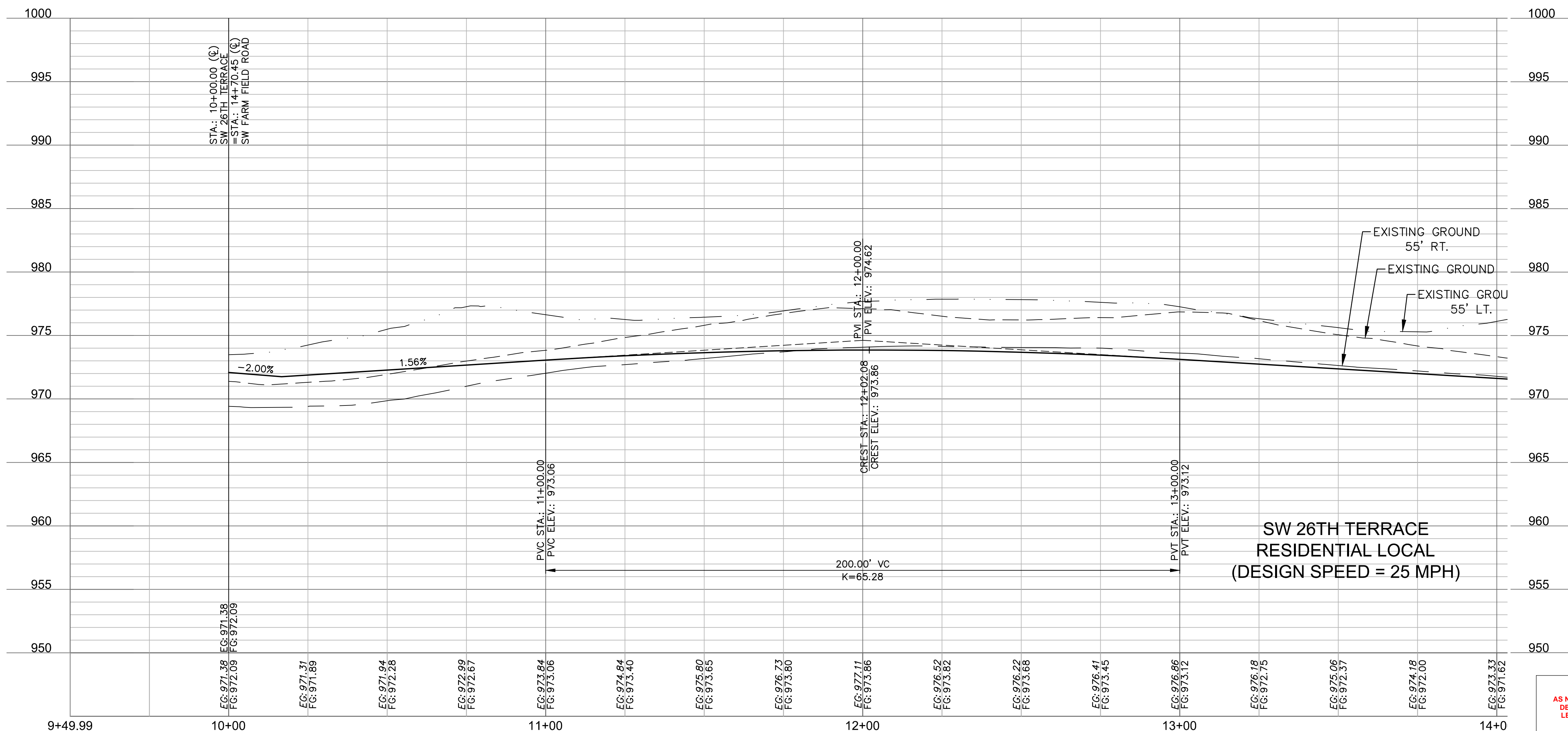
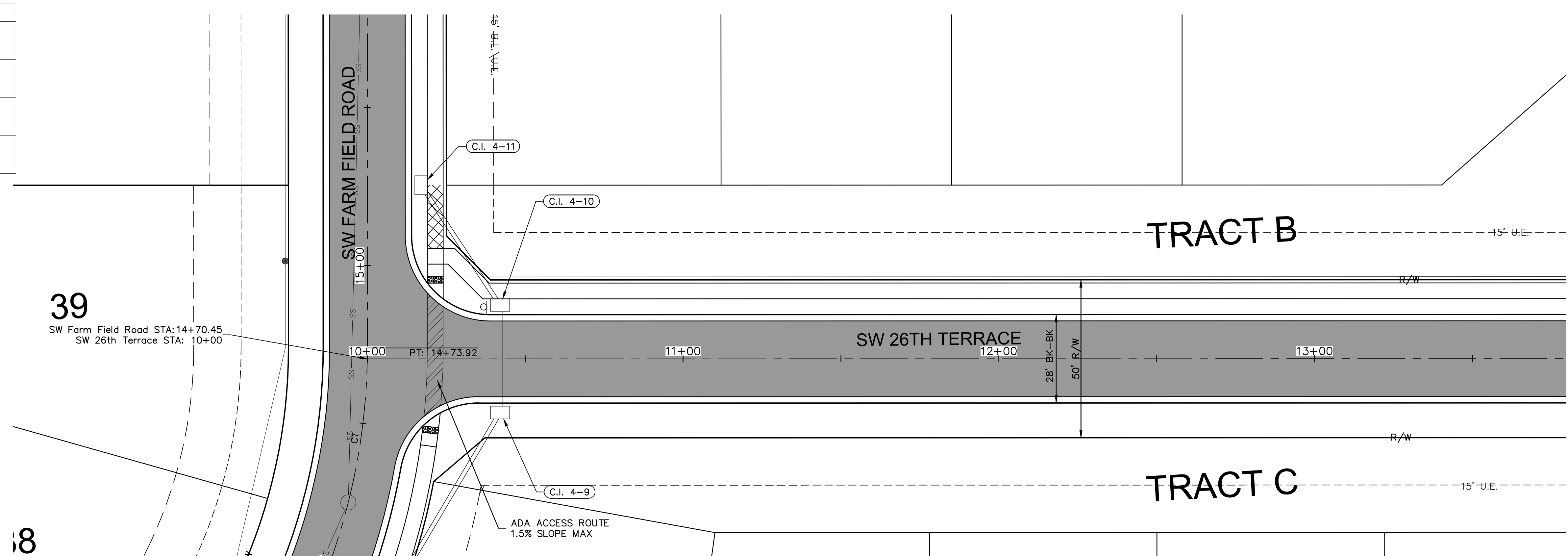
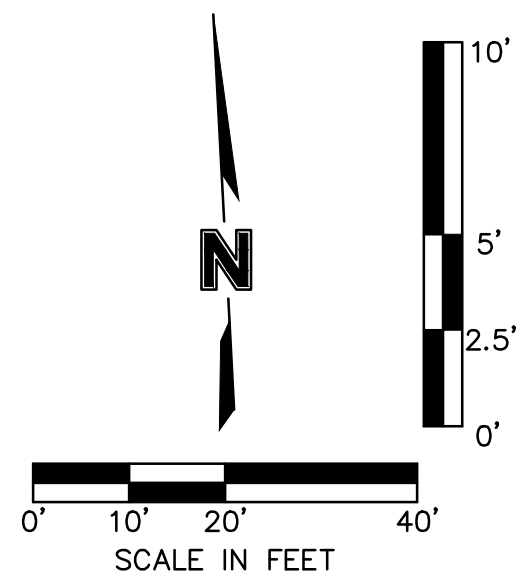
LEE'S SUMMIT, MO 2020

drawn by: CGW  
 checked by: JES  
 approved by: NDH  
 QA/QC by: JES  
 project no.: 019-4061  
 drawing no.:  
 date: 04/20/2020

SHEET  
 C113

DWG: F:\2019\4001-4500\019-4061-Design\AutoCAD\Final Plans\Sheets\GNCV\Street and Storm Plans\C\_RPP01\_0194061.dwg USER: nheiser C\_PSTRM\_0194061  
 DATE: Mar 30, 2021 1:45pm XREFS: C\_PTBK\_0194061\_34x22 C\_PBNY\_0194061 C\_XBASE\_0194061 C\_PBASE\_0194061 C\_PUTIL\_0194061 C\_PPATT\_0194061 C\_PATT\_0194061

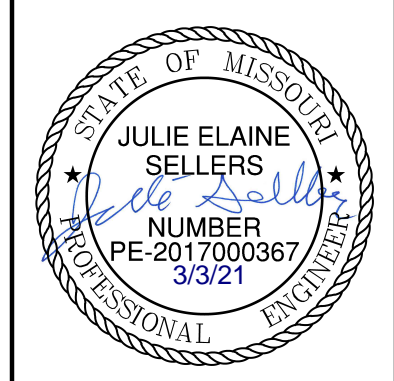
LEGEND	
	ADA ACCESS ROUTE
	ASPHALT PAVEMENT
	CG-2 CURB & GUTTER
	PROPOSED SIDEWALK



RELEASE FOR  
CONSTRUCTION  
AS NOTED ON PLANS REVIEW  
DEVELOPMENT SERVICES  
LEE'S SUMMIT, MISSOURI  
04/05/2021

**olsson**

Olsson - Civil Engineering  
Missouri Certificate of Authority #001592  
1301 Burlington Street  
North Kansas City, MO 64116  
TEL 816.361.1177  
FAX 816.361.1888  
www.olson.com



REV. NO.	DATE	REVISIONS DESCRIPTION	BY
1	06/15/2020	REVISED PER CITY COMMENTS	
2	06/25/2020	REVISED PER CITY COMMENTS	
3	09/10/2020	REVISED PIPE INSULATION	
4	10/01/2020	REVISED PER CITY COMMENTS	
5	11/18/2020	REVISED LOTS 25-29 GRADING	
6	02/17/2021	REVISED ADA RAMPS	
7	03/12/2021	REVISED ADA RAMPS	

ROADWAY PLAN & PROFILE (SW 26TH TERRACE)  
STREET AND STORM SEWER PLANS

HOOK FARMS  
FIRST PLAT

2020

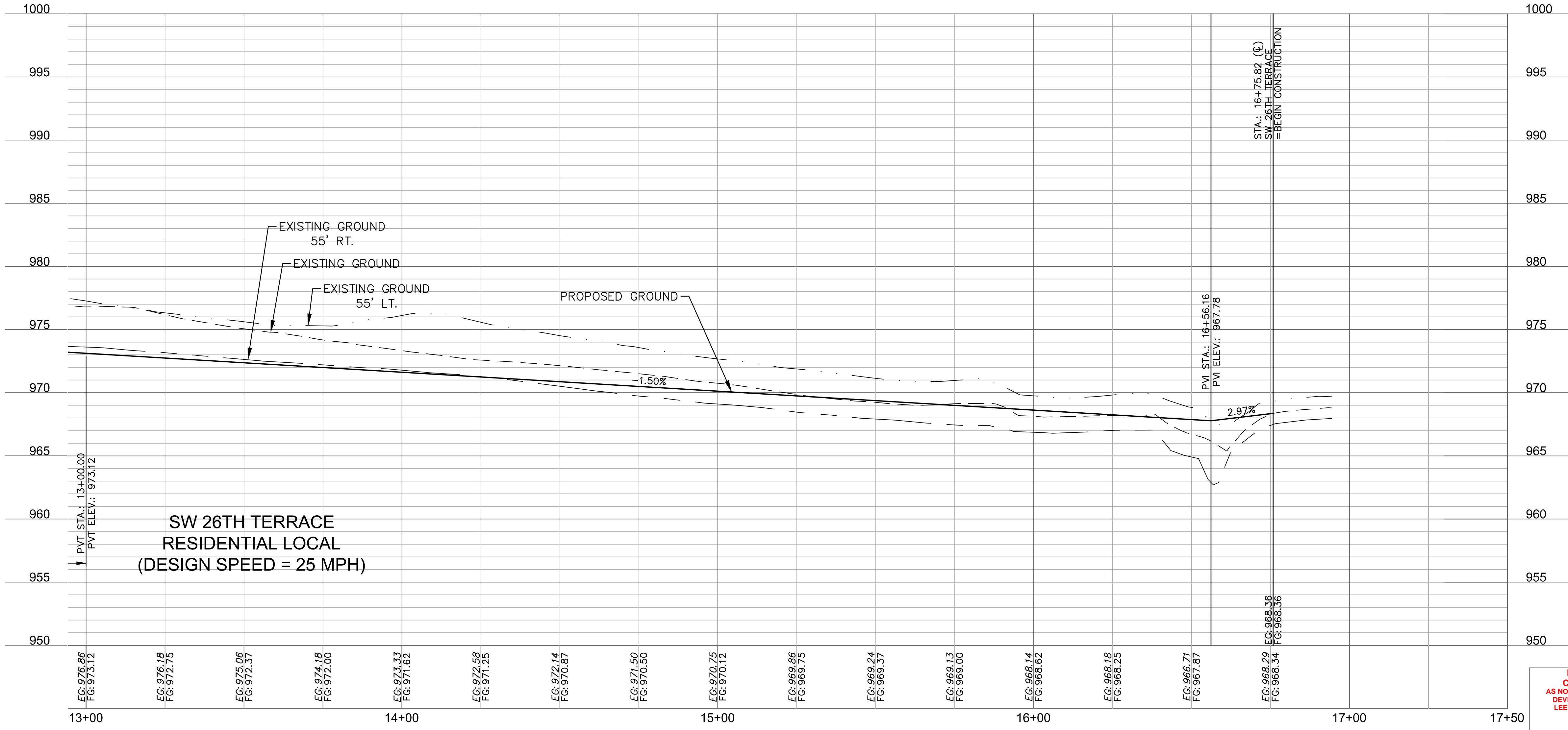
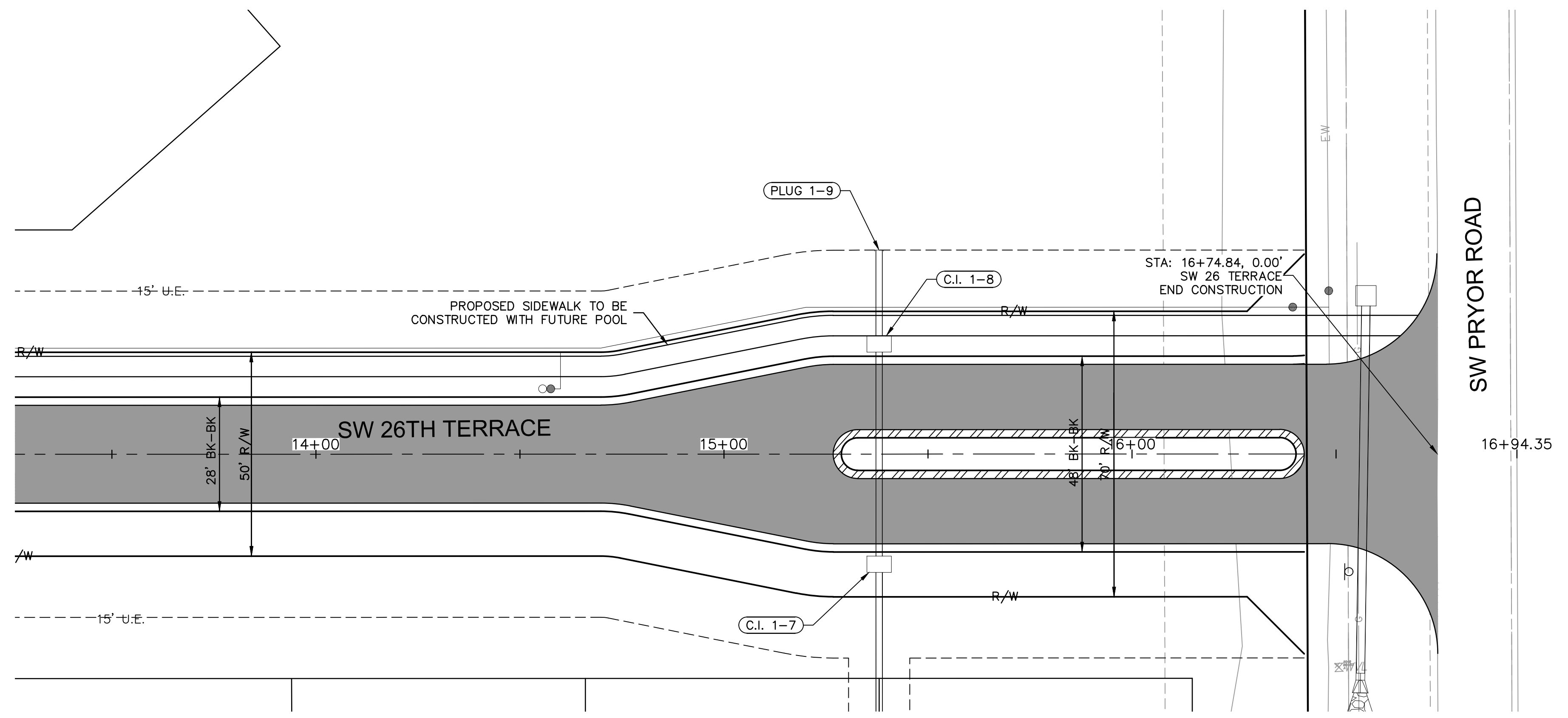
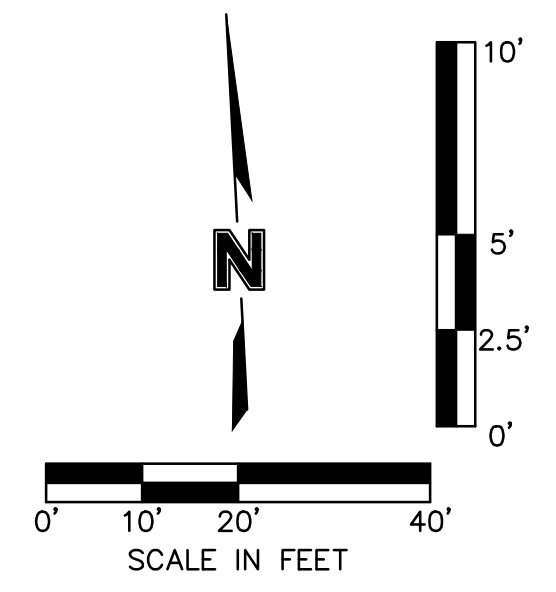
LEE'S SUMMIT, MO

drawn by: CGW  
checked by: JES  
approved by: NDH  
QA/QC by: JES  
project no.: 019-4061  
drawing no.:  
date: 04/20/2020

SHEET  
C114

DWG: F:\2019\4001-4500\019-4061-40-Design\AutoCAD\Final Plans\Storm Plans\VC\_RPP01\_0194061.dwg USER: nheiser C:\PSTRM\_0194061  
 DATE: Mar 30, 2021 1:45pm XREFS: C:\PTBLK\_0194061\_34x22 C:\PBASE\_0194061 C:\PPATT\_0194061 C:\PUTIL\_0194061 C:\PSURF\_0194061 C:\FBASE\_0194061

LEGEND	
	ADA ACCESS ROUTE
	ASPHALT PAVEMENT
	CG-2 CURB & GUTTER
	PROPOSED SIDEWALK
	CG-1 CURB & GUTTER



RELEASE FOR  
CONSTRUCTION  
AS NOTED ON PLANS REVIEW  
DEVELOPMENT SERVICES  
LEE'S SUMMIT, MISSOURI  
04/05/2021

Olsson - Civil Engineering  
Missouri Certificate of Authority #001592  
1301 Burlington Street  
North Kansas City, MO 64116  
TEL 816.361.1177  
FAX 816.361.1888  
www.olsson.com

REV. NO.	DATE	REVISIONS DESCRIPTION
1	06/15/2020	REVISED PER CITY COMMENTS
2	06/25/2020	REVISED PER CITY COMMENTS
3	09/10/2020	REVISED PER CITY COMMENTS
4	10/01/2020	REVISED PER CITY COMMENTS
5	11/18/2020	REVISED PER CITY COMMENTS
6	02/17/2021	REVISED ADA RAMPS
7	03/12/2021	REVISED ADA RAMPS

ROADWAY PLAN & PROFILE (SW 26TH TERRACE)  
STREET AND STORM SEWER PLANS

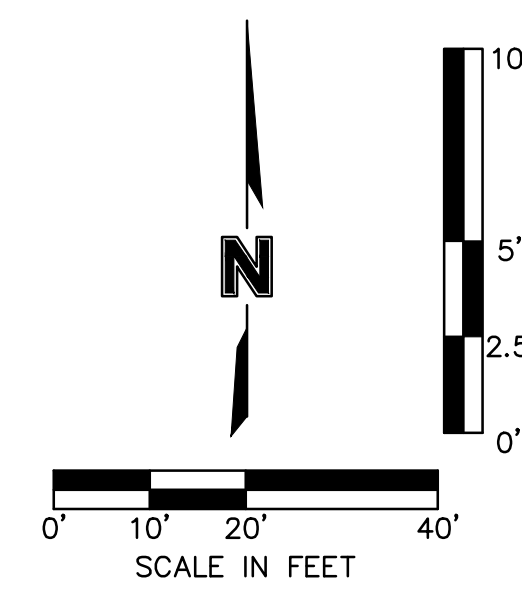
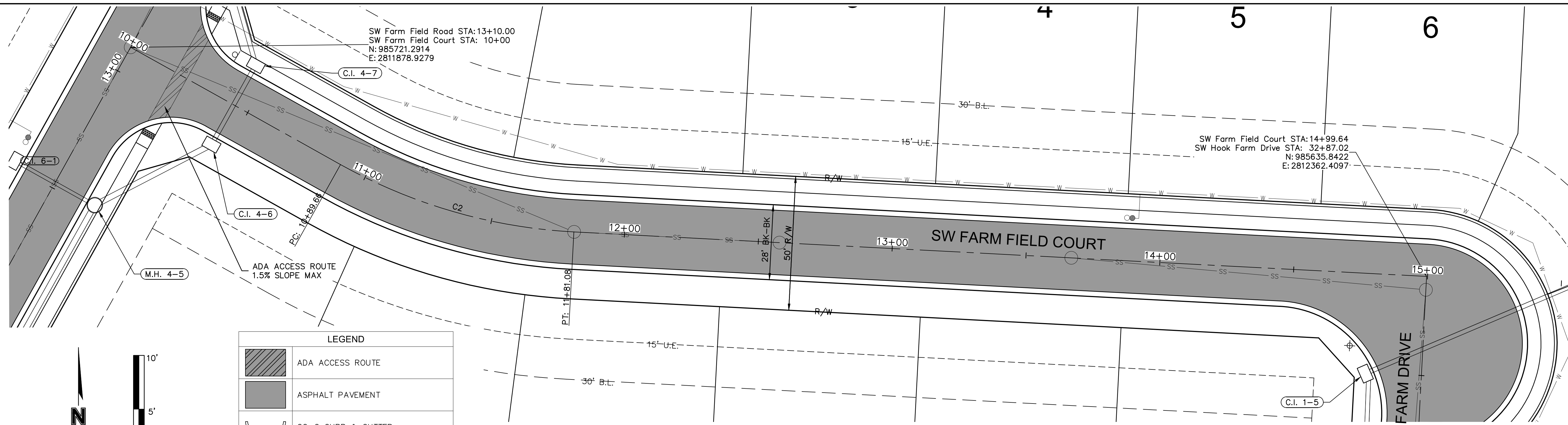
HOOK FARMS  
FIRST FLAT

2020

LEE'S SUMMIT, MO

drawn by:	CGW
checked by:	JES
approved by:	NDH
QA/QC by:	JES
project no.:	019-4061
drawing no.:	
date:	04/20/2020

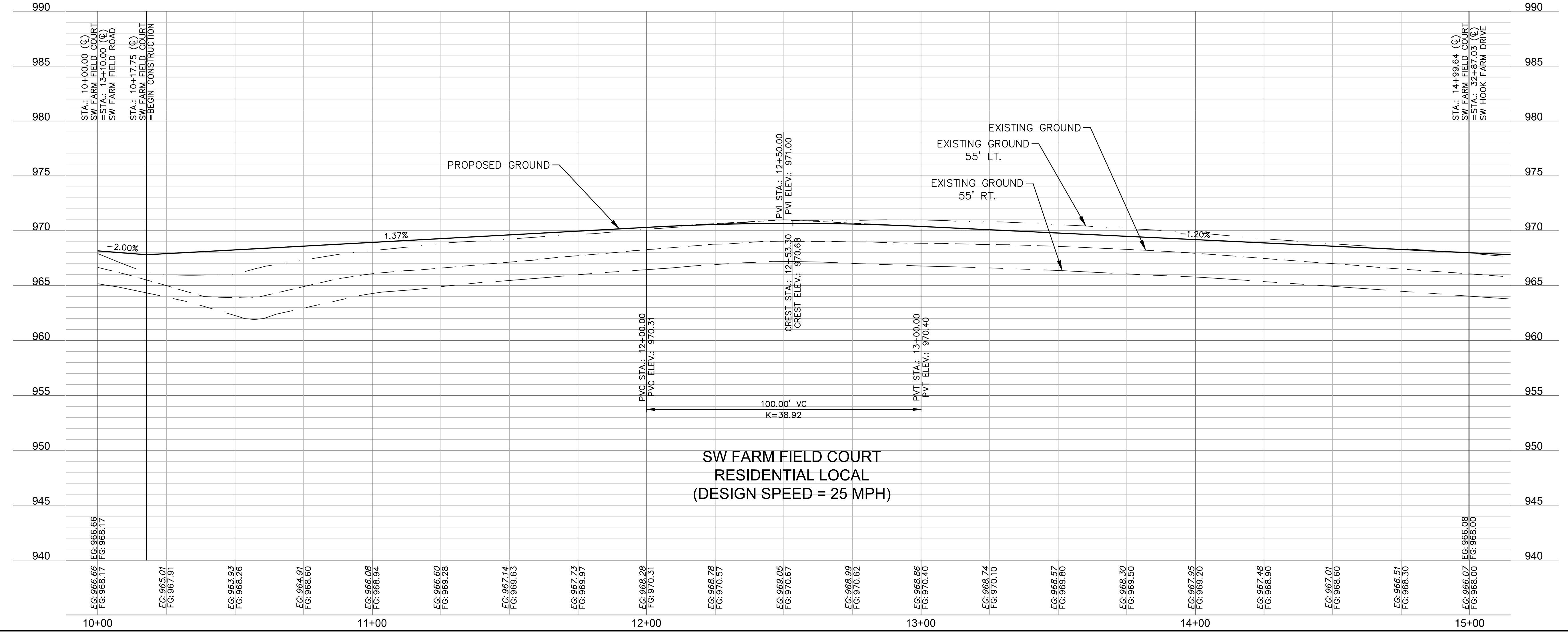
DWG: F:\2019\4001-4500\019-4061-Design\AutoCAD\Final Plans\Storm Plans\VC\_RPP02\_0194061.dwg USER: nheiser  
 DATE: Mar 30, 2021 1:45pm XREFS: C:\PTBLK\_0194061\_34x22 C:\PBASE\_0194061 C:\PSURF\_0194061 C:\PPATT\_0194061 C:\PUTIL\_0194061 C:\PSTRM\_0194061



LEGEND	
	ADA ACCESS ROUTE
	ASPHALT PAVEMENT
	CG-2 CURB & GUTTER
	PROPOSED SIDEWALK
	CG-1 CURB & GUTTER

ALIGNMENT CURVES								
CURVE ID #	STATION RANGE	START COORD.	END COORD.	RADIUS (FT)	LENGTH (FT)	DELTA	TANGENT	P.I. STATION (BACK)
C2	10+89.66 11+81.08	N: 985677.58 E: 281195.721	N: 985652.47 E: 281204.29	200.00	91.42	026°11'22"	46.52	11+34.56

**RELEASE FOR CONSTRUCTION**  
 AS NOTED ON PLANS REVIEW  
 DEVELOPMENT SERVICES  
 LEE'S SUMMIT, MISSOURI  
 04/05/2021



**olsson**

Olsson - Civil Engineering  
 Missouri Certificate of Authority #001592  
 1301 Burlington Street  
 North Kansas City, MO 64116  
 TEL 816.361.1177  
 FAX 816.361.1888  
 www.olson.com

---

REV. NO.	DATE	REVISIONS DESCRIPTION
1	06/15/2020	REVISED PER CITY COMMENTS
2	06/25/2020	REVISED PER CITY COMMENTS
3	09/10/2020	REMOVED PIPE INSULATION
4	10/01/2020	REVISED PER CITY COMMENTS
5	11/18/2020	REVISED LOTS 25-29 GRADINGS
6	02/17/2021	REVISED ADA RAMPS
7	03/12/2021	REVISED ADA RAMPS

---

ROADWAY PLAN & PROFILE (SW WHEATFIELD COURT) STREET AND STORM SEWER PLANS	2020	REVISIONS
HOOK FARMS FIRST PLAT		
LEE'S SUMMIT, MO		

---

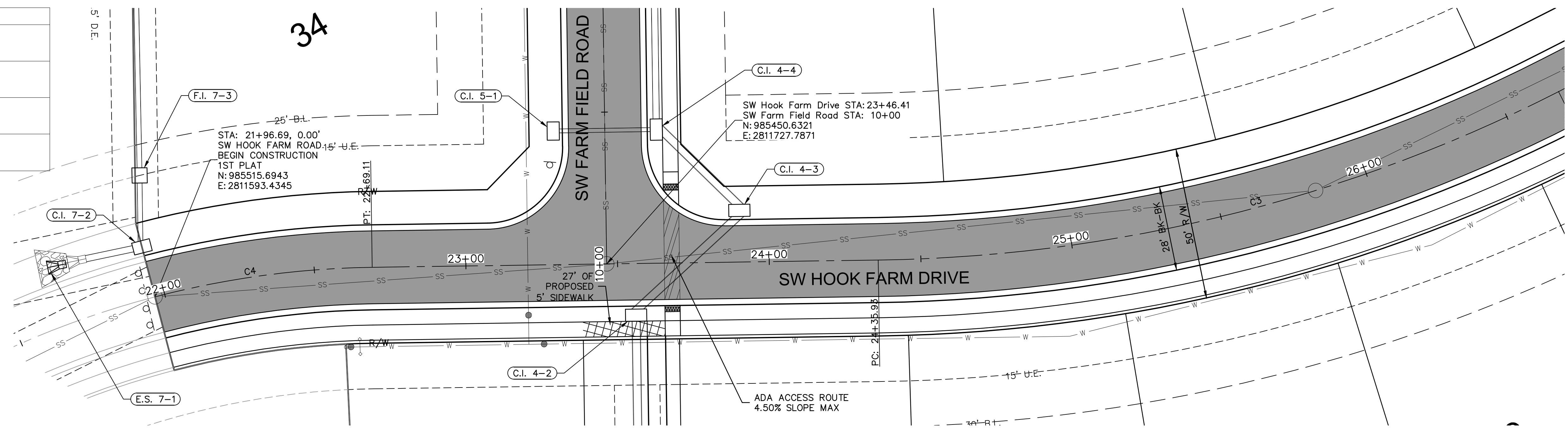
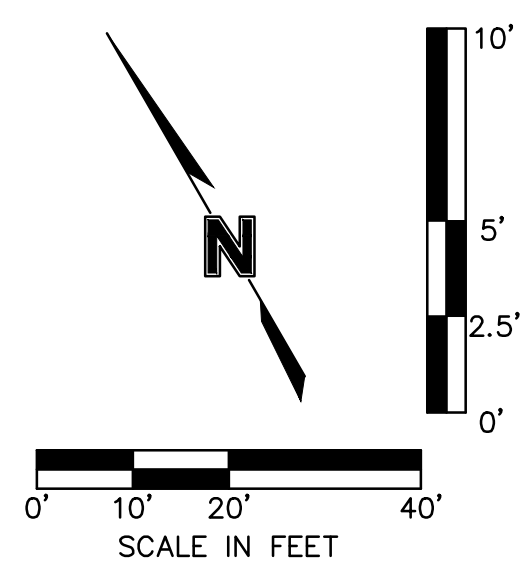
drawn by: CGW checked by: JES approved by: NDH QA/QC by: JES project no.: 019-4061 drawing no.: date: 04/20/2020	SHEET C116
--	---------------



DWG: F:\2019\4001-4500\019-4061\40-Design\AutoCAD\Final Plans\GNCV\Street and Storm Plans\VC\_RPP02\_0194061.dwg  
 DATE: Mar 30, 2021 1:45pm  
 XREFS: C\_PBDLK\_0194061\_34x22 C\_PBASE\_0194061 C\_PBASE\_0194061 C\_PPATTI\_0194061 C\_PPATTI\_0194061 C\_PSTRM\_0194061 C\_PSTRM\_0194061  
 USER: nheiser

**LEGEND**

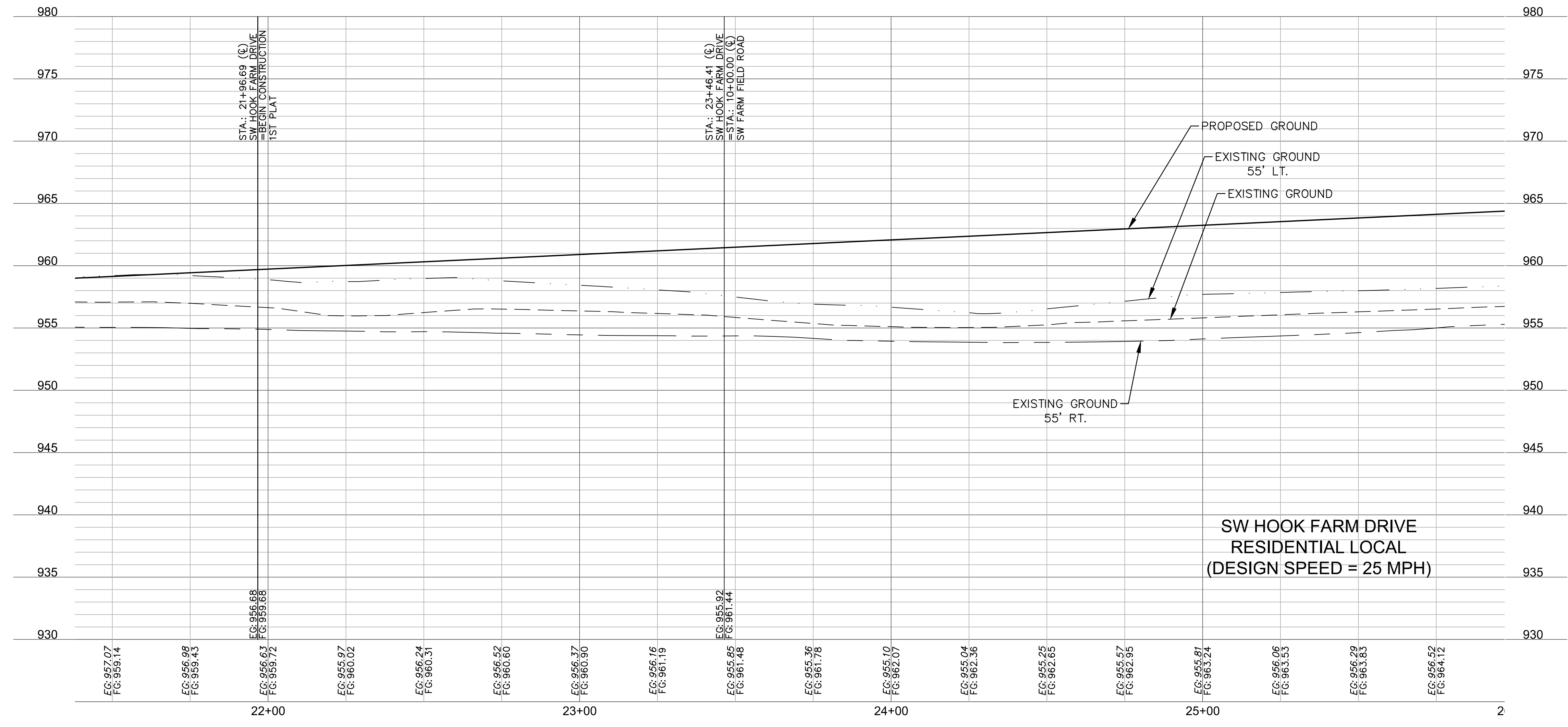
	ADA ACCESS ROUTE
	ASPHALT PAVEMENT
	CG-2 CURB & GUTTER
	PROPOSED SIDEWALK



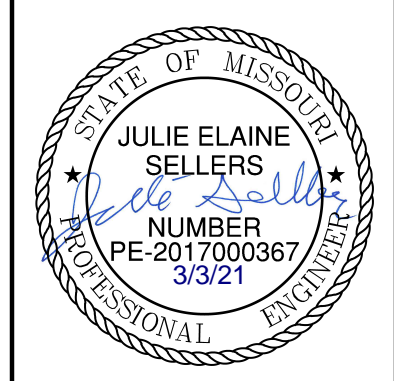
**ALIGNMENT CURVES**

CURVE ID #	STATION RANGE	START COORD.	END COORD.	RADIUS (FT)	LENGTH (FT)	DELTA	TANGENT	P.I. STATION (BACK)
C3	24+35.93 26+68.94	N: 985406.99 E: 2811805.95	N: 985342.96 E: 2812027.88	510.00	233.00	026°10'37"	118.57	25+50.37
C4	21+07.71 22+69.11	N: 985526.27 E: 2811505.41	N: 985488.32 E: 2811660.29	300.00	161.40	030°49'31"	82.71	21+86.40

**RELEASE FOR CONSTRUCTION**  
 AS NOTED ON PLANS REVIEW  
 DEVELOPMENT SERVICES  
 LEE'S SUMMIT, MISSOURI  
 04/05/2021



**olsson**  
 Olsson - Civil Engineering  
 Missouri Certificate of Authority #001592  
 1301 Burlington Street  
 North Kansas City, MO 64116  
 TEL 816.361.1177  
 FAX 816.361.1888  
 www.olson.com



**REVISIONS**

REV. NO.	DATE	REVISIONS DESCRIPTION
1	06/15/2020	REVISED PER CITY COMMENTS
2	06/25/2020	REVISED PER CITY COMMENTS
3	09/10/2020	REVISED PIPE INSULATION
4	10/01/2020	REVISED PER CITY COMMENTS
5	11/18/2020	REVISED LOTS 25-29 GRADING
6	02/17/2021	REVISED ADA RAMPS
7	03/12/2021	REVISED ADA RAMPS

**ROADWAY PLAN & PROFILE (SW HOOK FARM DRIVE)  
 STREET AND STORM SEWER PLANS**

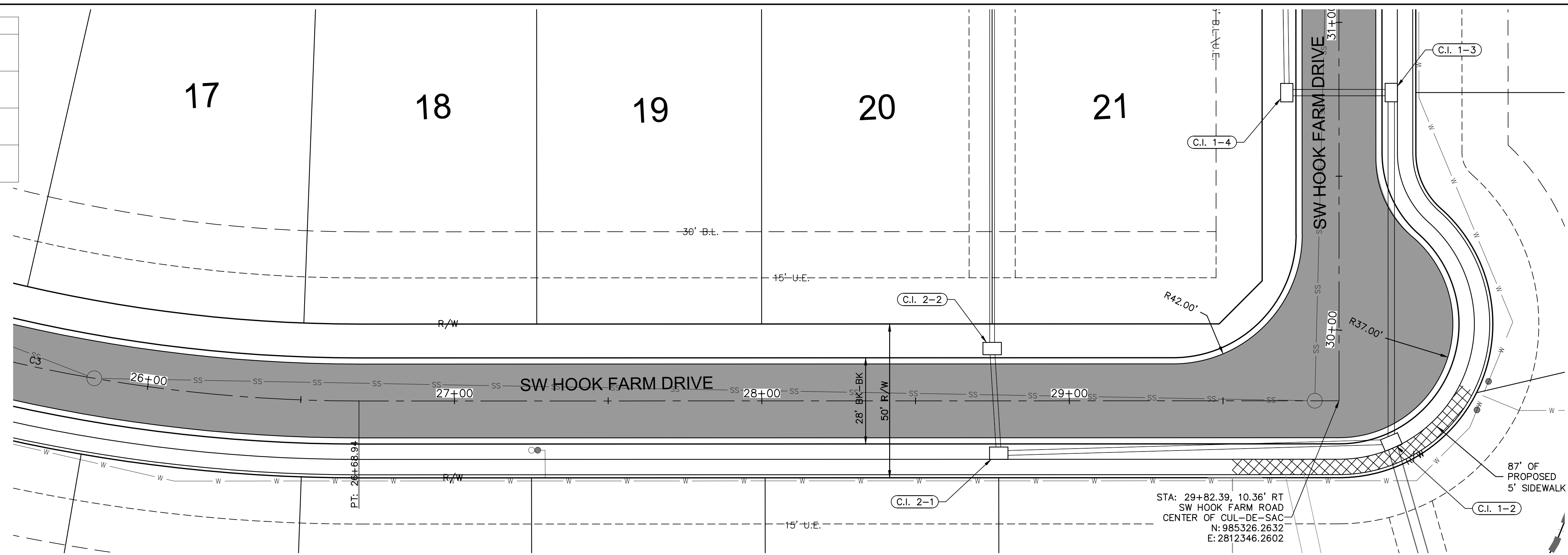
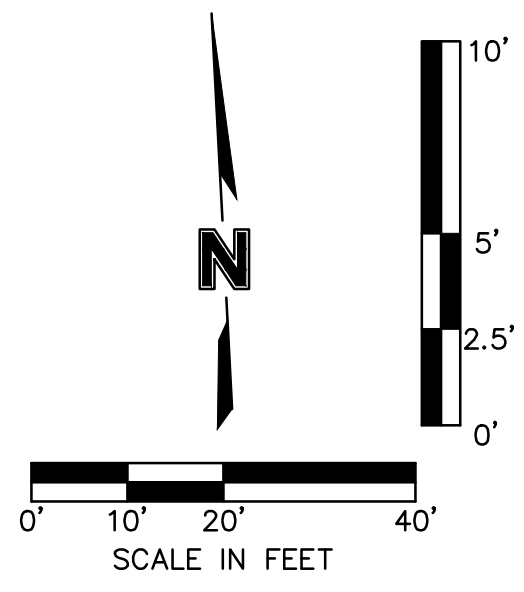
HOOK FARMS  
 FIRST PLAT

LEE'S SUMMIT, MO 2020

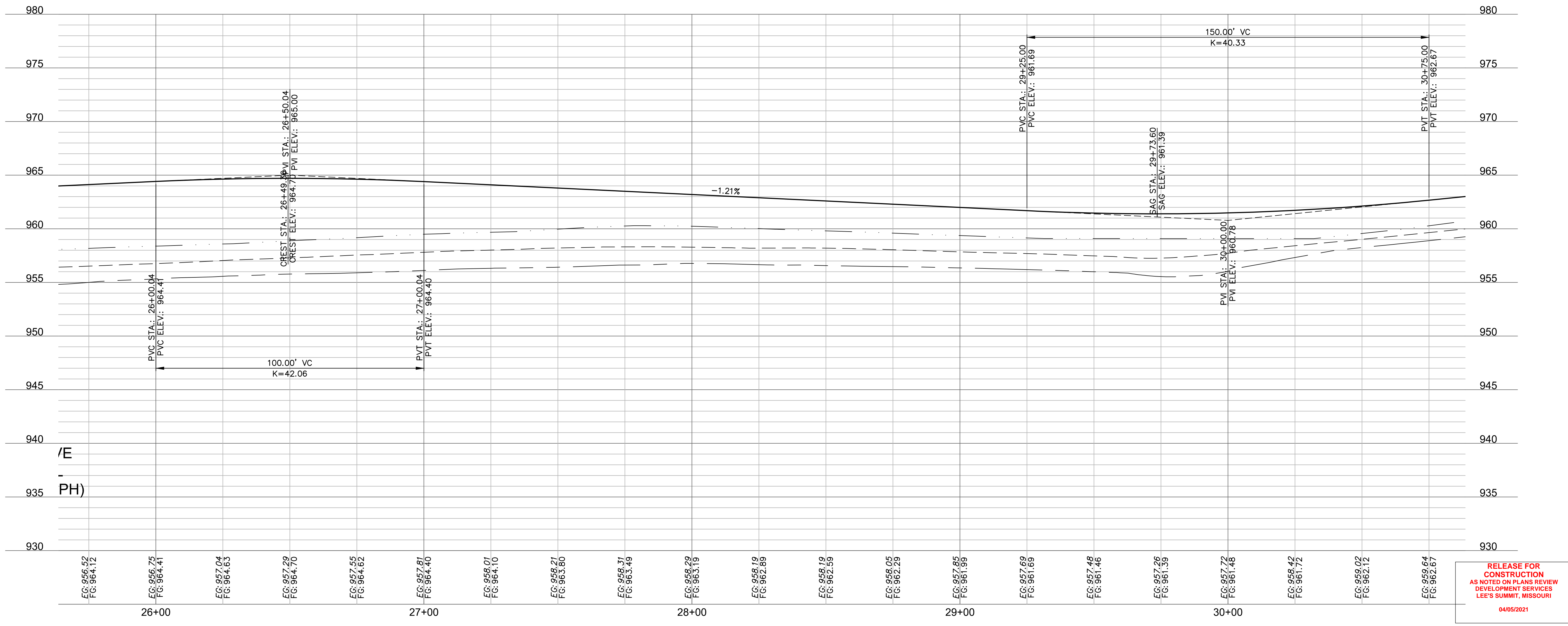
drawn by: CGW  
 checked by: JES  
 approved by: NDH  
 QA/QC by: JES  
 project no.: 019-4061  
 drawing no.:  
 date: 04/20/2020

DWG: F:\2019\4001-4500\019-4061-Design\AutoCAD\Final Plans\Sheets\GNV\Street and Storm Plans\VC\_RPP02\_0194061.dwg USER: nheiser  
 DATE: Mar 30, 2021 1:45pm XREFS: C\_P\BLK\_0194061\_34x22 C\_P\NDY\_0194061 C\_P\BASE\_0194061 C\_P\PATTI\_0194061 C\_P\PURF\_0194061 C\_P\UTIL\_0194061 C\_P\STRM\_0194061

LEGEND	
	ADA ACCESS ROUTE
	ASPHALT PAVEMENT
	CG-2 CURB & GUTTER
	PROPOSED SIDEWALK



STA: 29+82.39, 10.36' RT  
 SW HOOK FARM ROAD  
 CENTER OF CUL-DE-SAC  
 N: 985326.2632  
 E: 2812346.2602



RELEASE FOR CONSTRUCTION  
 AS NOTED ON PLANS REVIEW  
 DEVELOPMENT SERVICES  
 LEE'S SUMMIT, MISSOURI  
 04/05/2021

**olsson**

Olsson - Civil Engineering  
 Missouri Certificate of Authority #001592  
 1301 Burlington Street  
 North Kansas City, MO 64116  
 TEL 816.361.1177  
 FAX 816.361.1888  
 www.olsson.com

REV. NO.	DATE	REVISIONS DESCRIPTION
1	06/15/2020	REVISED PER CITY COMMENTS
2	06/25/2020	REVISED PER CITY COMMENTS
3	09/10/2020	REMOVED PIPE INSULATION
4	10/01/2020	REVISED PER CITY COMMENTS
5	11/18/2020	REVISED LOTS 25-29 GRADING
6	02/17/2021	REVISED ADA RAMPS
7	03/12/2021	REVISED ADA RAMPS

BY	DATE	REVISIONS

ROADWAY PLAN & PROFILE (SW HOOK FARM DRIVE)  
 STREET AND STORM SEWER PLANS

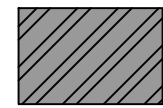

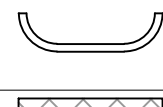

HOOK FARMS  
 FIRST PLAT

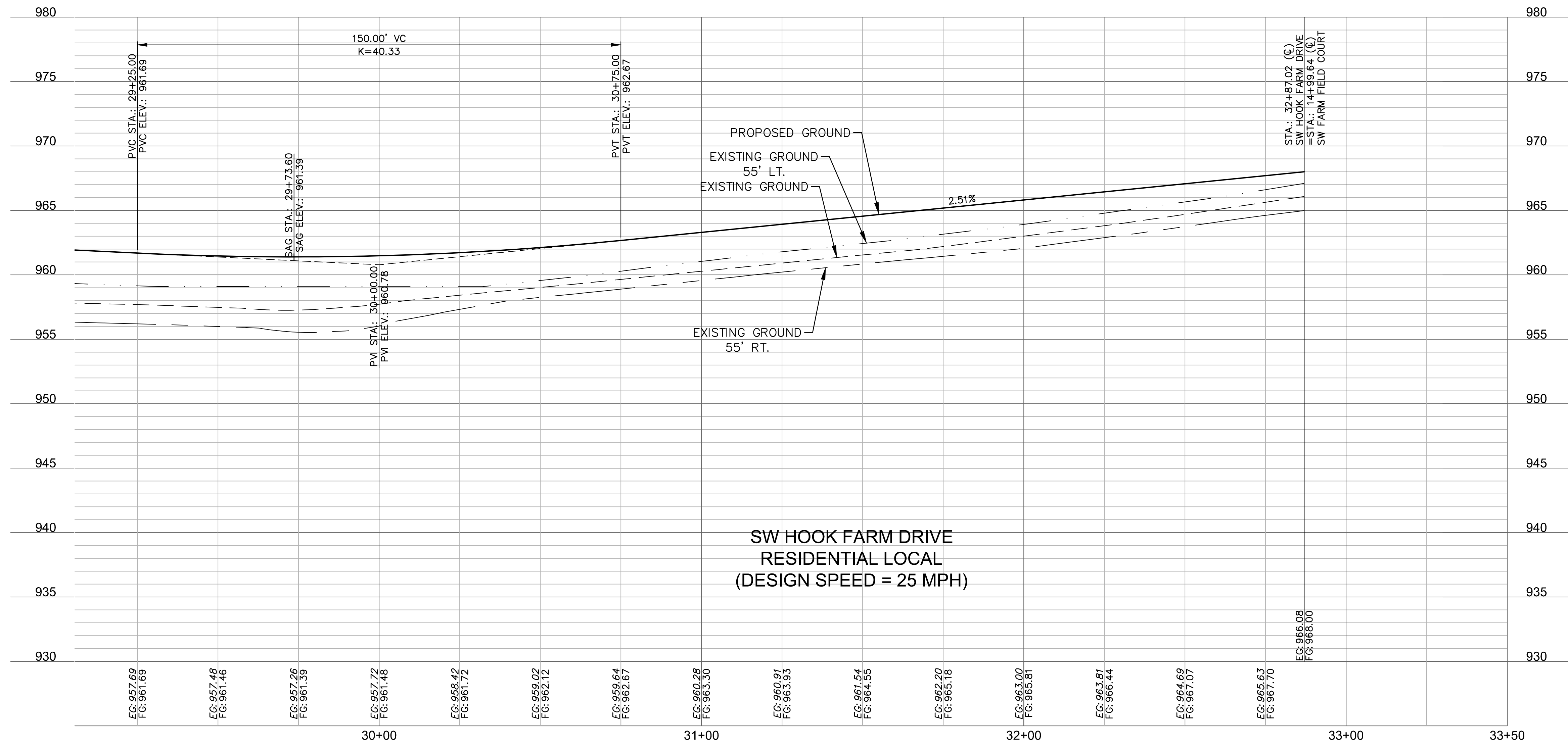
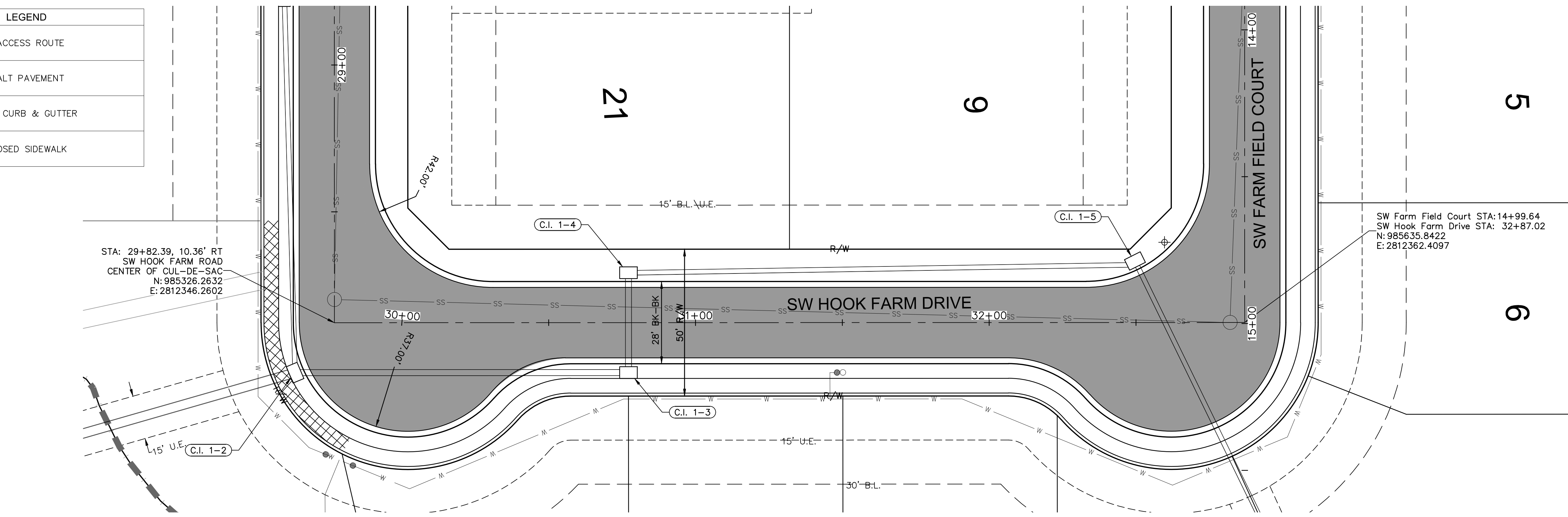
LEE'S SUMMIT, MO

2020

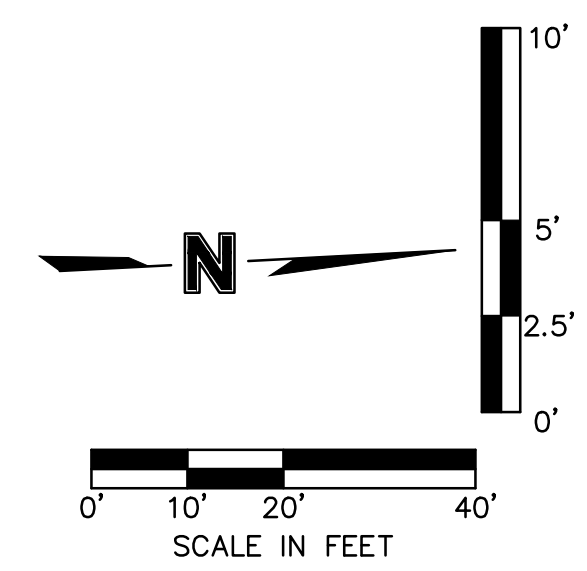
drawn by: CGW	checked by: JES
approved by: NDH	QA/QC by: JES
project no.: 019-4061	drawing no.:
date: 04/20/2020	

DWG: F:\2019\4001-4500\019-4061-Design\AutoCAD\Final Plans\Storm Plans\VC\_RPP02\_0194061.dwg USER: nheiser C\_PSTRM\_0194061  
 DATE: Mar 30, 2021 1:45pm XREFS: C\_PTBK\_0194061\_34x22 C\_PBASE\_0194061 C\_PPATT\_0194061 C\_PUTIL\_0194061 C\_PSURF\_0194061 C\_FBASE\_0194061

LEGEND	
	ADA ACCESS ROUTE
	ASPHALT PAVEMENT
	CG-2 CURB & GUTTER
	PROPOSED SIDEWALK



RELEASE FOR  
 CONSTRUCTION  
 AS NOTED ON PLANS REVIEW  
 DEVELOPMENT SERVICES  
 LEE'S SUMMIT, MISSOURI  
 04/05/2021



**olsson**  
 Olsson - Civil Engineering  
 Missouri Certificate of Authority #001592  
 1301 Burlington Street  
 North Kansas City, MO 64116  
 TEL 816.361.1177  
 FAX 816.361.1888  
 www.olson.com

STATE OF MISSOURI  
 JULIE ELAINE SELLERS  
 PE-2017000367  
 3/3/21  
 PROFESSIONAL ENGINEER

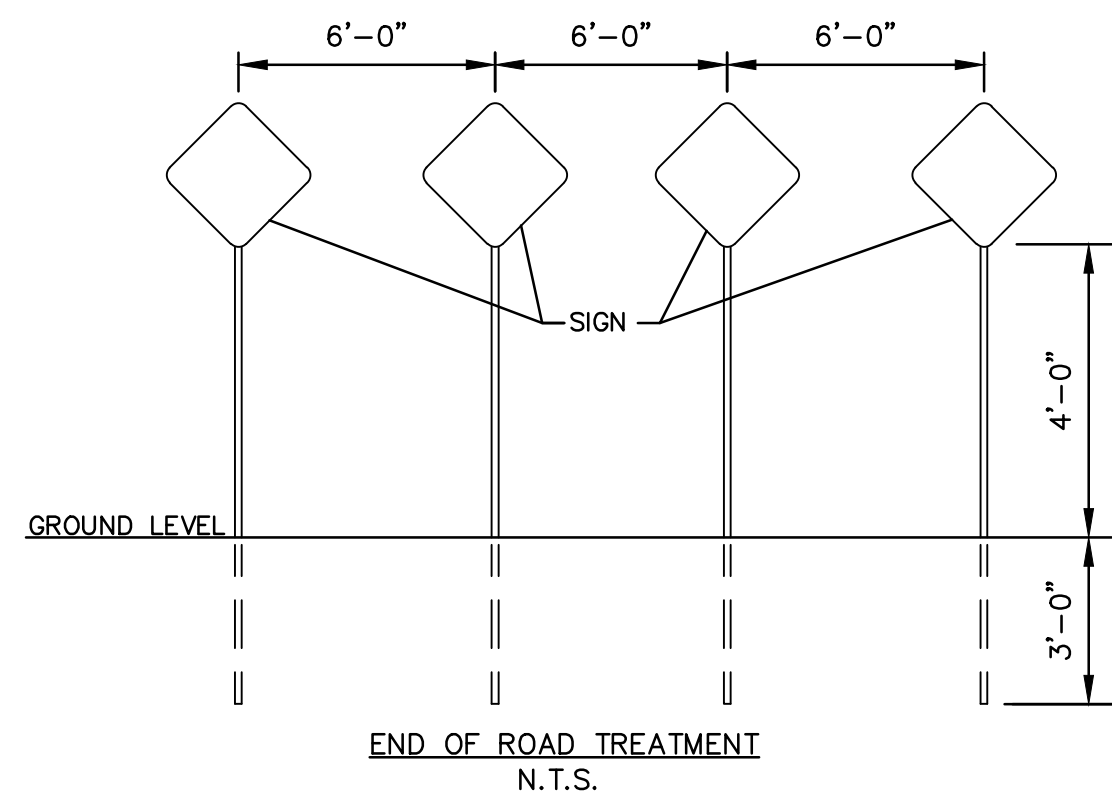
REV. NO.	DATE	REVISIONS DESCRIPTION
1	08/15/2020	REVISED PER CITY COMMENTS
2	08/25/2020	REVISED PER CITY COMMENTS
3	09/10/2020	REMOVED PIPE INSULATION
4	10/01/2020	REVISED PER CITY COMMENTS
5	11/18/2020	REVISED LOTS 25-29 GRADINGS
6	02/17/2021	REVISED ADA RAMPS
7	03/12/2021	REVISED ADA RAMPS

ROADWAY PLAN & PROFILE (SW HOOK FARM DRIVE)  
 STREET AND STORM SEWER PLANS  
 HOOK FARMS  
 FIRST PLAT  
 LEE'S SUMMIT, MO  
 2020

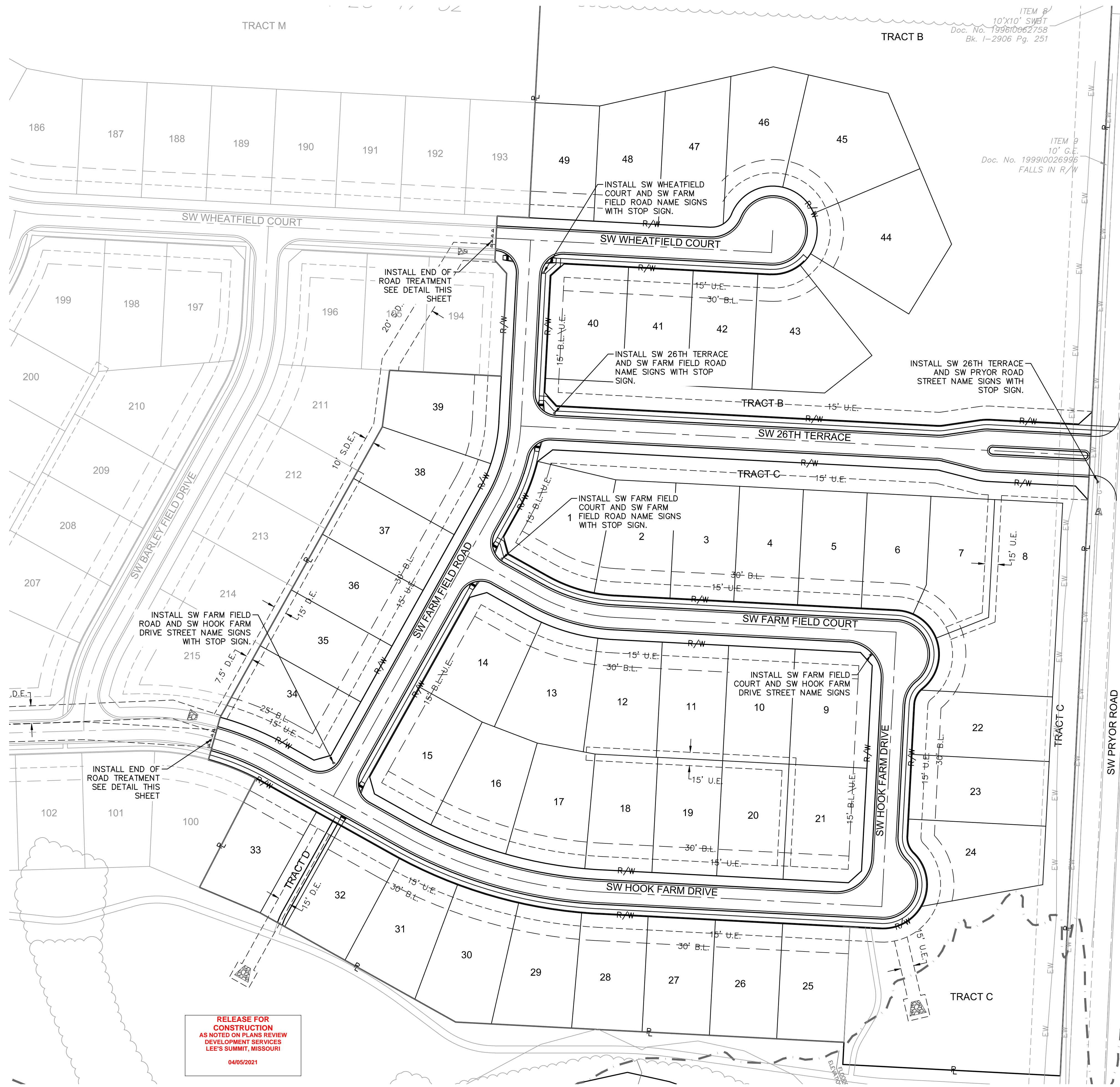
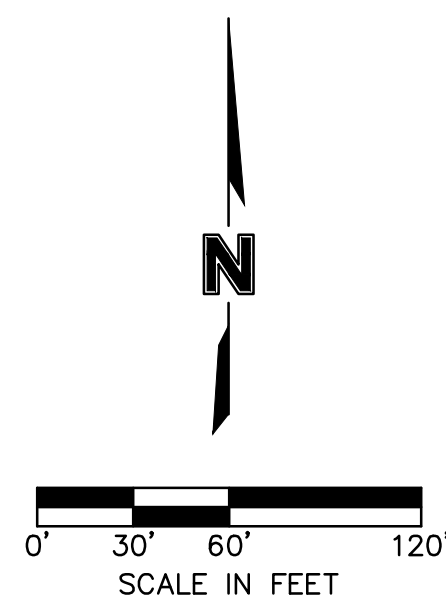
drawn by: CGW  
 checked by: JES  
 approved by: NDH  
 QA/QC by: JES  
 project no.: 019-4061  
 drawing no.:  
 date: 04/20/2020

SHEET  
 C119

DWG: F:\2019\4001-4500\019-4061-40-Design\AutoCAD\Final Plans\Storm Plans\TC\_P01\_0194061.dwg USER: mheiser  
 DATE: Mar 12, 2021 11:03am XREFS: C\_P\TBLK\_0194061\_34x22 C\_P\BASE\_0194061 C\_P\BASE\_0194061



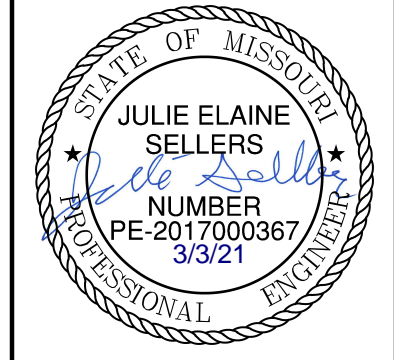
OBJECT MARKERS (TYPE OM4-3, 18"X18") ARE TO BE INSTALLED 2' FROM END OF PROPOSED PAVEMENT.



RELEASE FOR CONSTRUCTION AS NOTED ON PLANS REVIEW DEVELOPMENT SERVICES LEE'S SUMMIT, MISSOURI  
 04/05/2021

ITEM 8  
 10'X10' SWBT  
 Doc. No. 199910062758  
 Bk. 1-2906 Pg. 251

ITEM 9  
 10' G.E.  
 Doc. No. 199910026996  
 FALLS IN R/W



REV. NO.	DATE	REVISIONS DESCRIPTION
1	08/15/2020	REVISED PER CITY COMMENTS
2	08/25/2020	REVISED PER CITY COMMENTS
3	09/10/2020	REVISED PER CITY COMMENTS
4	10/01/2020	REVISED PER CITY COMMENTS
5	11/18/2020	REVISED LOTS 25-29 GRADING
6	02/17/2021	REVISED ADA RAMPS
7	03/12/2021	REVISED ADA RAMPS

BY	DATE	REVISIONS
	2020	

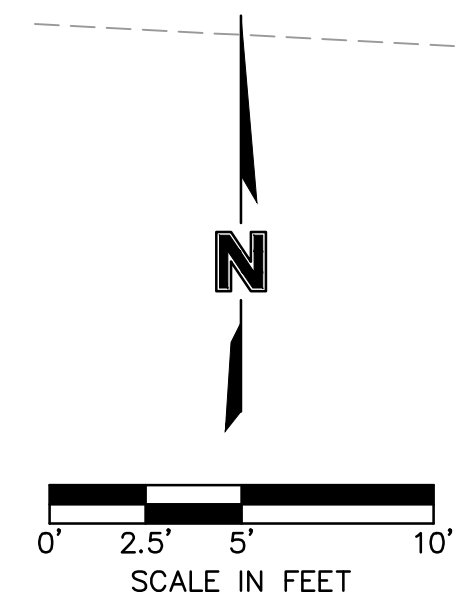
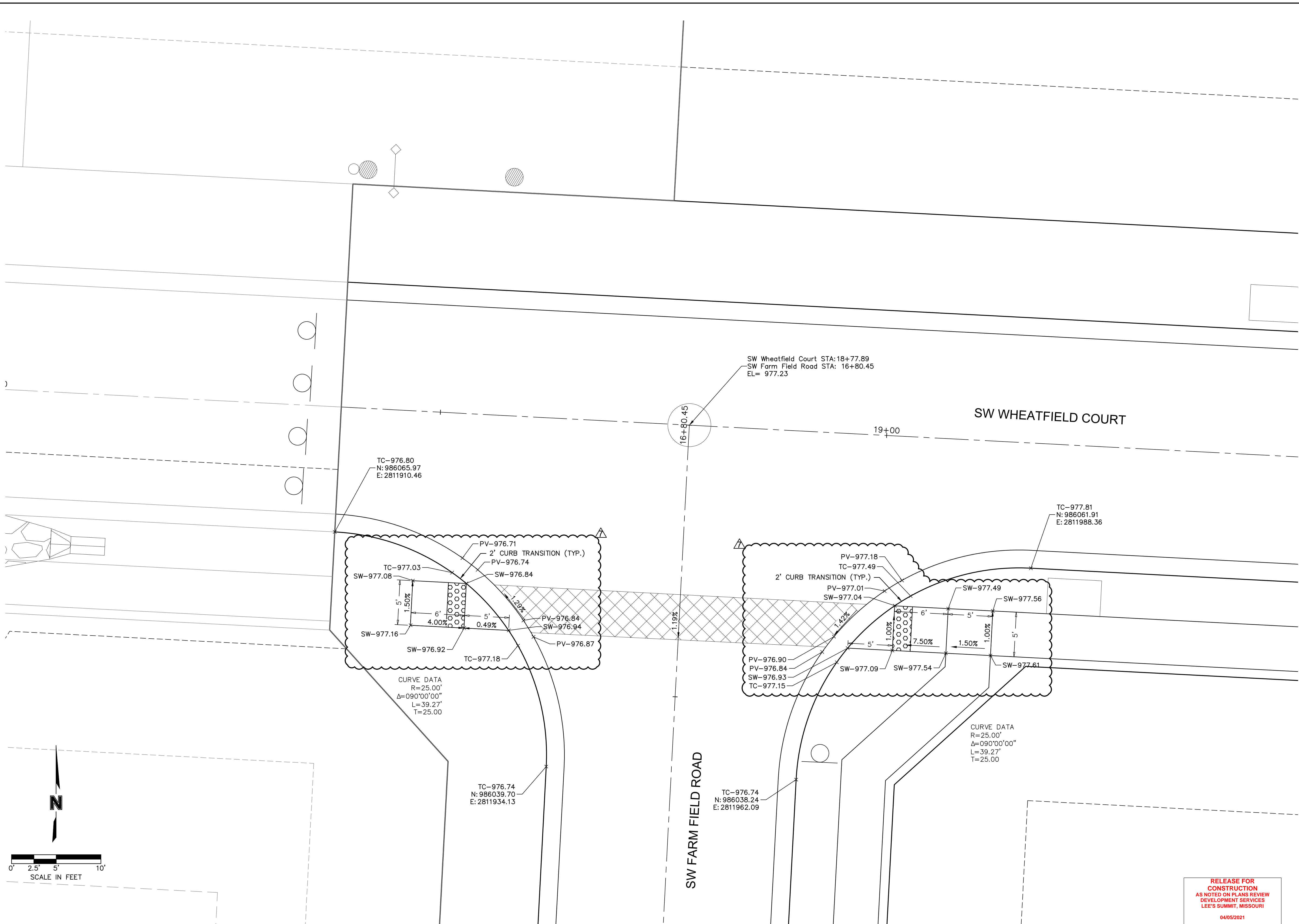
drawn by: CGW  
 checked by: JES  
 approved by: NDH  
 QA/QC by: JES  
 project no.: 019-4061  
 drawing no.:  
 date: 04/20/2020

SHEET C120

**olsson**  
 Olsson - Civil Engineering  
 Missouri Certificate of Authority #001592  
 1301 Burlington Street  
 North Kansas City, MO 64116  
 TEL 816.361.1177  
 FAX 816.361.1888  
 www.olson.com

TRAFFIC CONTROL PLAN  
 STREET AND STORM SEWER PLANS  
 HOOK FARMS  
 FIRST PLAT  
 LEE'S SUMMIT, MO

DWG: F:\2019\4001-4500\019-4061-Design\AutoCAD\Final Plans\Storm Plans\CV\_Street and Storm Plans\CV\_INT01\_0194061.dwg USER: nheiser  
 DATE: Mar 30, 2021 1:45pm XREFS: C\_PBDK\_0194061\_34x22 C\_PBASE\_0194061 C\_PUTIL\_0194061 C\_FBASE\_0194061



TC-976.80  
 N: 986065.97  
 E: 2811910.46

SW Wheatfield Court STA: 18+77.89  
 SW Farm Field Road STA: 16+80.45  
 EL= 977.23

TC-977.81  
 N: 986061.91  
 E: 2811988.36

CURVE DATA  
 R=25.00'  
 $\Delta=090^{\circ}00'00''$   
 L=39.27'  
 T=25.00

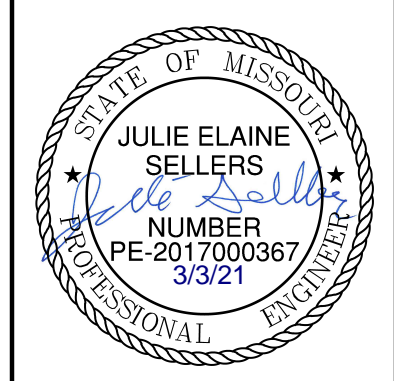
CURVE DATA  
 R=25.00'  
 $\Delta=090^{\circ}00'00''$   
 L=39.27'  
 T=25.00

TC-976.74  
 N: 986039.70  
 E: 2811934.13

TC-976.74  
 N: 986038.24  
 E: 2811962.09

**RELEASE FOR CONSTRUCTION**  
 AS NOTED ON PLANS REVIEW  
 DEVELOPMENT SERVICES  
 LEE'S SUMMIT, MISSOURI  
 04/05/2021

Olsson - Civil Engineering  
 Missouri Certificate of Authority #001592  
 1301 Burlington Street  
 North Kansas City, MO 64116  
 TEL 816.361.1177  
 FAX 816.361.7888  
 www.olsson.com



REV. NO.	DATE	REVISIONS DESCRIPTION
1	08/15/2020	REVISED PER CITY COMMENTS
2	08/25/2020	REVISED PER CITY COMMENTS
3	09/10/2020	REVISED PIPE INSULATION
4	10/01/2020	REVISED PER CITY COMMENTS
5	11/18/2020	REVISED LOTS 25-29 GRADING
6	02/17/2021	REVISED ADA RAMPS
7	03/12/2021	REVISED ADA RAMPS

SW WHEATFIELD COURT & SW FARM FIELD ROAD  
 STREET AND STORM SEWER PLANS

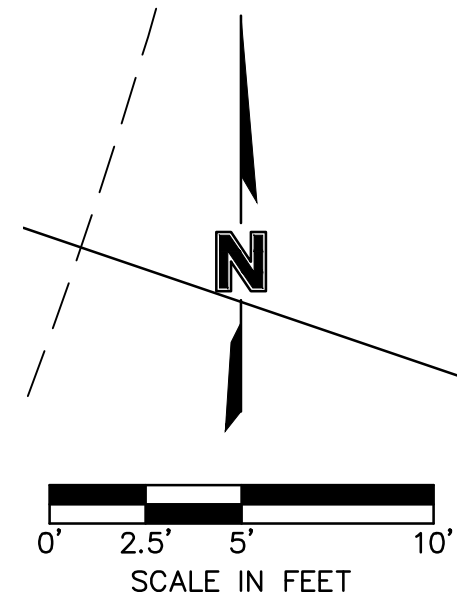
HOOK FARMS  
 FIRST FLAT

LEE'S SUMMIT, MO 2020

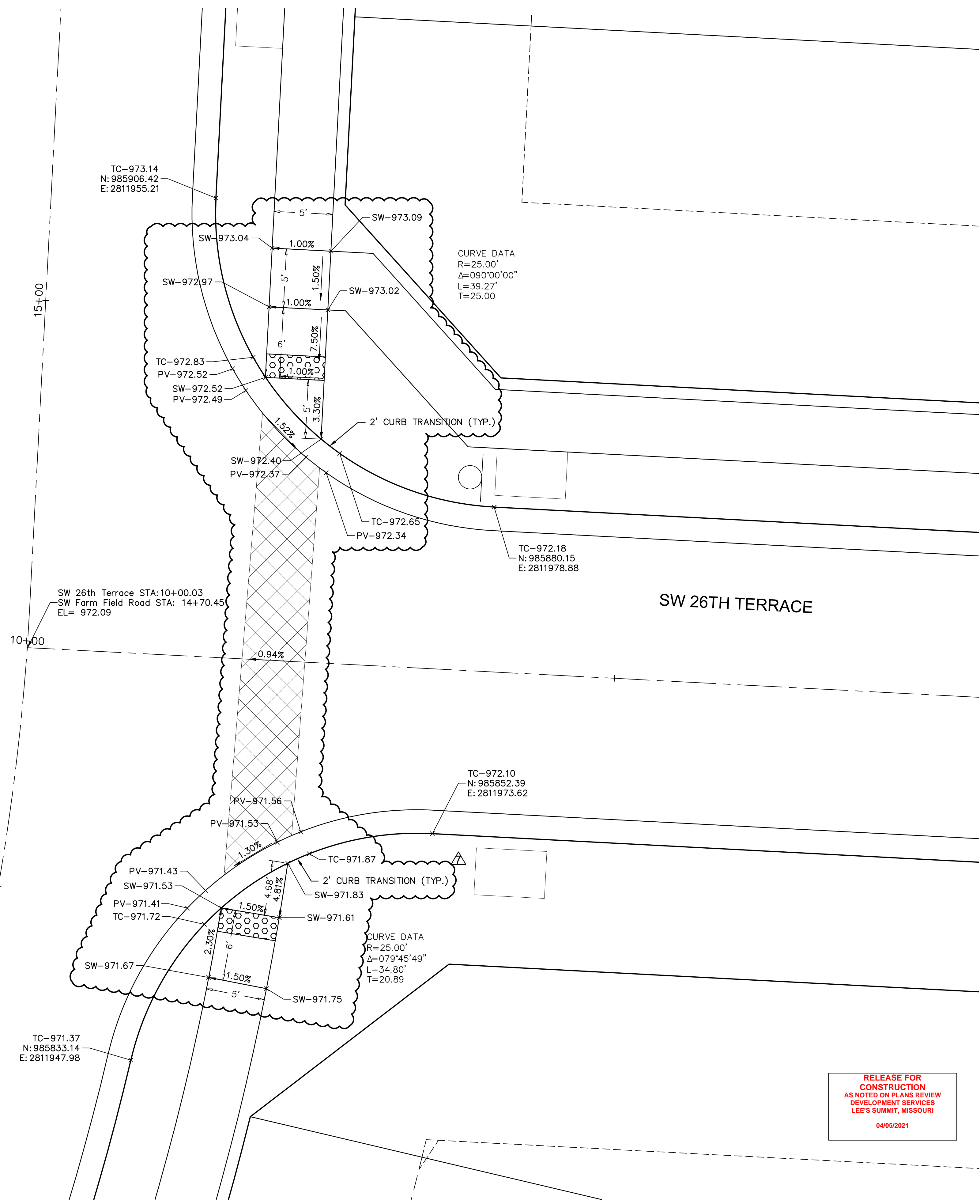
drawn by: CGW  
 checked by: JES  
 approved by: NDH  
 QA/QC by: JES  
 project no.: 019-4061  
 drawing no.:  
 date: 04/20/2020

**SHEET C121**

DWG: F:\2019\4001-4500\019-4061-Design\AutoCAD\Final Plans\GNCV\Street and Storm Plans\NC\_INT01\_0194061.dwg USER: nheiser C\_PUTIL\_0194061  
 DATE: Mar 30, 2021 1:45pm XREFS: C\_PTBK\_0194061\_34x22 C\_XBASE\_0194061 C\_PBASE\_0194061 C\_PBASE\_0194061



SW FARM FIELD ROAD



CURVE DATA  
 R=25.00'  
 $\Delta=090^{\circ}00'00''$   
 L=39.27'  
 T=25.00'

CURVE DATA  
 R=25.00'  
 $\Delta=079^{\circ}45'49''$   
 L=34.80'  
 T=20.89'

SW 26th Terrace STA: 10+00.03  
 SW Farm Field Road STA: 14+70.45  
 EL= 972.09

RELEASE FOR  
 CONSTRUCTION  
 AS NOTED ON PLANS REVIEW  
 DEVELOPMENT SERVICES  
 LEE'S SUMMIT, MISSOURI  
 04/05/2021

SW FARM FIELD ROAD & SW 26TH TERRACE  
 STREET AND STORM SEWER PLANS

HOOK FARMS  
 FIRST FLAT

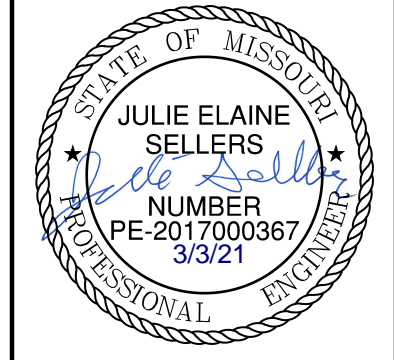
LEE'S SUMMIT, MO

2020

drawn by: CGW  
 checked by: JES  
 approved by: NDH  
 QA/QC by: JES  
 project no.: 019-4061  
 drawing no.:  
 date: 04/20/2020

SHEET  
 C122

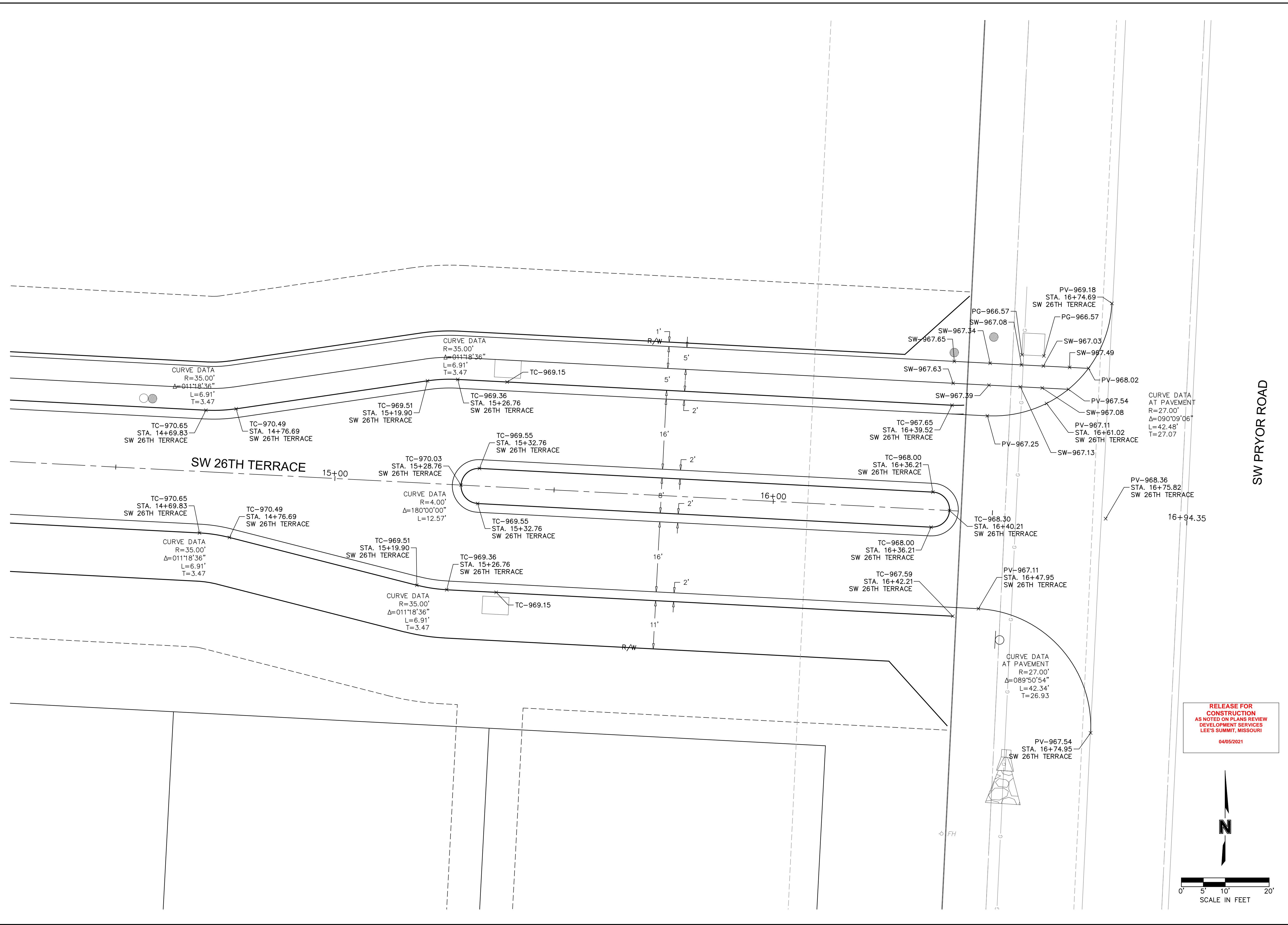
REV. NO.	DATE	REVISIONS DESCRIPTION	BY
1	08/15/2020	REVISED PER CITY COMMENTS	
2	08/25/2020	REVISED PER CITY COMMENTS	
3	09/10/2020	REVISED PER CITY COMMENTS	
4	10/01/2020	REVISED PER CITY COMMENTS	
5	11/18/2020	REVISED PER CITY COMMENTS	
6	02/17/2021	REVISED ADA RAMPS	
7	03/12/2021	REVISED ADA RAMPS	



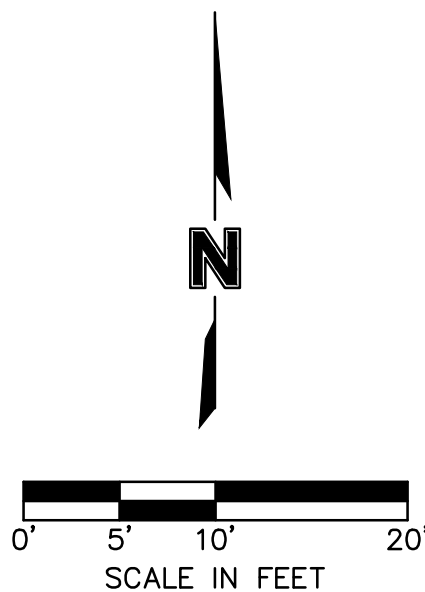
**olsson**

Olsson - Civil Engineering  
 Missouri Certificate of Authority #001592  
 1301 Burlington Street  
 North Kansas City, MO 64116  
 TEL 816.361.1177  
 FAX 816.361.7888  
 www.olsosn.com

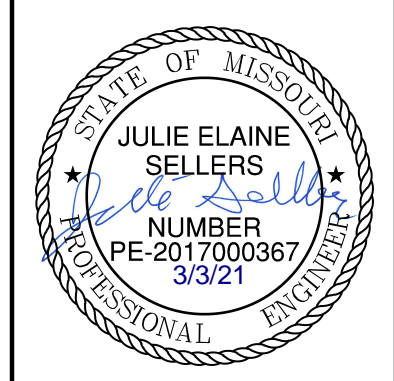
DWG: F:\2019\4001-4500\019-4061-Design\AutoCAD\Final Plans\Sheets\GNCV\Street and Storm Plans\NC\_INT02\_0194061.dwg  
 DATE: Mar 30, 2021 1:45pm  
 XREFS: C\_PTBK\_0194061\_34x22 C\_PBND\_0194061 C\_PBASE\_0194061 C\_PUTIL\_0194061 C\_PBASE\_0194061 USER: nheiser



**RELEASE FOR CONSTRUCTION**  
 AS NOTED ON PLANS REVIEW  
 DEVELOPMENT SERVICES  
 LEE'S SUMMIT, MISSOURI  
 04/05/2021



**olsson**  
 Olsson - Civil Engineering  
 Missouri Certificate of Authority #001592  
 1301 Burlington Street  
 North Kansas City, MO 64116  
 TEL 816.361.1177  
 FAX 816.361.1888  
 www.olson.com



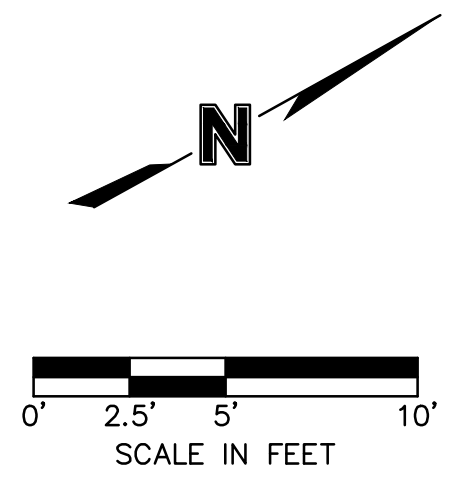
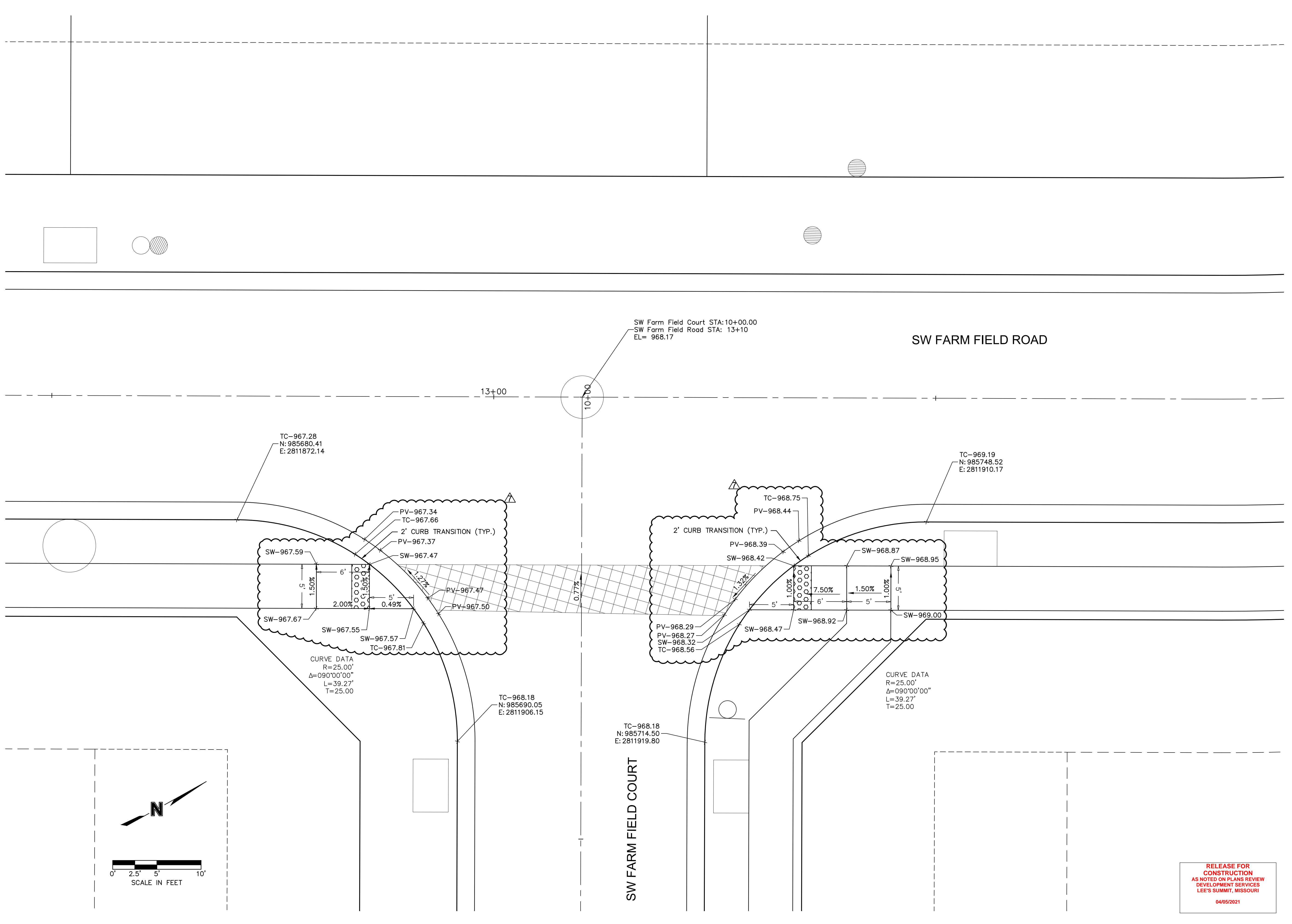
REV. NO.	DATE	REVISIONS DESCRIPTION
1	06/15/2020	REVISED PER CITY COMMENTS
2	06/25/2020	REVISED PER CITY COMMENTS
3	09/10/2020	REVISED PIPE INSULATION
4	10/01/2020	REVISED PER CITY COMMENTS
5	11/18/2020	REVISED LOTS 25-29 GRADINGS
6	02/17/2021	REVISED ADA RAMPS
7	03/12/2021	REVISED ADA RAMPS

SW 26TH TERRACE STREET AND STORM SEWER PLANS  
 HOOK FARMS FIRST PLAT  
 LEE'S SUMMIT, MO  
 2020

drawn by: CGW  
 checked by: JES  
 approved by: NDH  
 QA/QC by: JES  
 project no.: 019-4061  
 drawing no.:  
 date: 04/20/2020

SHEET C123

DWG: F:\2019\4001-4500\019-4061-Design\AutoCAD\Final Plans\Sheet\GNCV\Street and Storm Plans\C\_INT01\_0194061.dwg USER: nheiser  
 DATE: Mar 30, 2021 1:45pm XREFS: C\_PTBK\_0194061\_34x22 C\_PBASE\_0194061 C\_PBASE\_0194061 C\_PUTIL\_0194061



**RELEASE FOR CONSTRUCTION**  
 AS NOTED ON PLANS REVIEW  
 DEVELOPMENT SERVICES  
 LEE'S SUMMIT, MISSOURI  
 04/05/2021

**olsson**

Olsson - Civil Engineering  
 Missouri Certificate of Authority #001592  
 1301 Burlington Street  
 North Kansas City, MO 64116  
 TEL 816.361.1177  
 FAX 816.361.1888  
 www.olsosn.com

STATE OF MISSOURI  
 JULIE ELAINE SELLERS  
 NUMBER PE-2017000367  
 3/3/21  
 PROFESSIONAL ENGINEER

REV. NO.	DATE	REVISIONS DESCRIPTION
1	06/15/2020	REVISED PER CITY COMMENTS
2	06/25/2020	REVISED PER CITY COMMENTS
3	09/10/2020	REVISED PER CITY COMMENTS
4	10/01/2020	REVISED PER CITY COMMENTS
5	11/18/2020	REVISED LOTS 25-29 GRADINGS
6	02/17/2021	REVISED ADA RAMPS
7	03/12/2021	REVISED ADA RAMPS

SW FARM FIELD ROAD & SW FARM FIELD COURT  
 STREET AND STORM SEWER PLANS

HOOK FARMS  
 FIRST PLAT

LEE'S SUMMIT, MO

2020

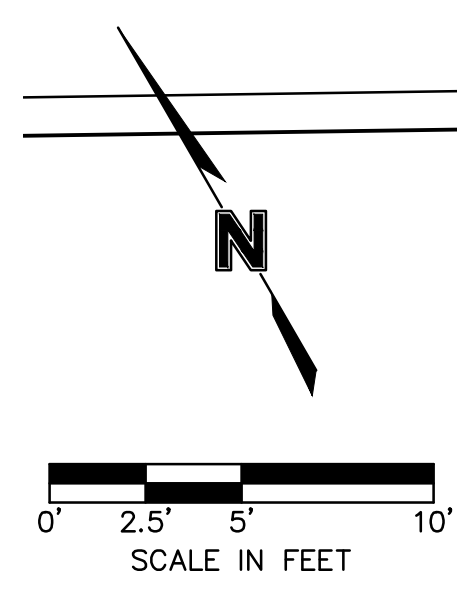
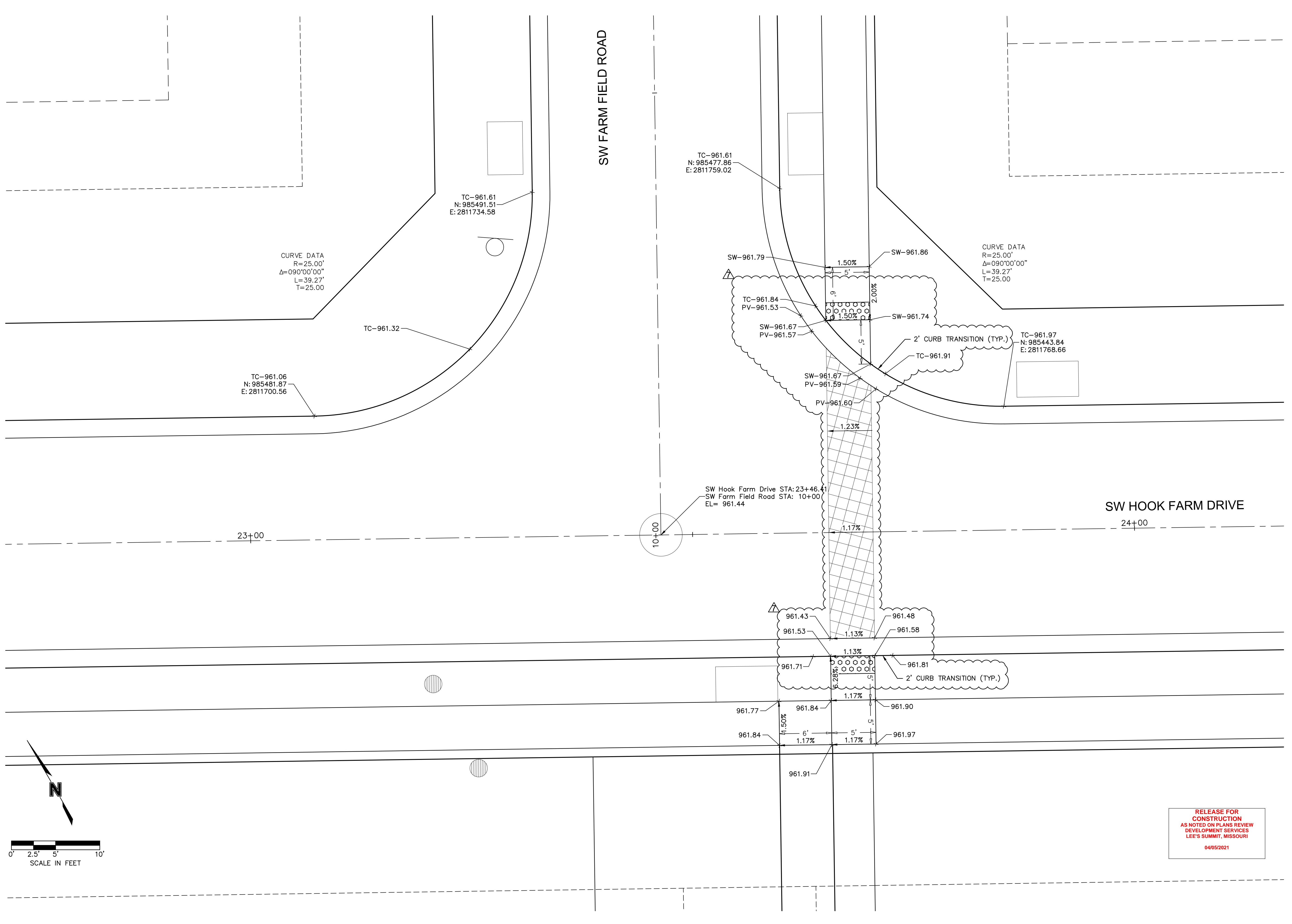
REVISIONS

drawn by:	CGW	
checked by:	JES	
approved by:	NDH	
QA/QC by:	JES	
project no.:	019-4061	
drawing no.:		
date:	04/20/2020	

**SHEET C124**



DWG: F:\2019\4001-4500\019-4061-Design\AutoCAD\Final Plans\GNV\Street and Storm Plans\NC\_INT02\_0194061.dwg USER: nhriser  
 DATE: Mar 30, 2021 2:15pm XREFS: C\_PDBLK\_0194061\_34x22 C\_PBASE\_0194061 C\_XBASE\_0194061 C\_PUTIL\_0194061 C\_FBASE\_0194061



RELEASE FOR CONSTRUCTION  
 AS NOTED ON PLANS REVIEW  
 DEVELOPMENT SERVICES  
 LEE'S SUMMIT, MISSOURI  
 04/05/2021

Olsson - Civil Engineering  
 Missouri Certificate of Authority #001592  
 1301 Burlington Street  
 North Kansas City, MO 64116  
 TEL 816.361.1177  
 FAX 816.361.7888  
 www.olsson.com

JULIE ELAINE SELLERS  
 NUMBER PE-2017000367  
 3/3/21

REV. NO.	DATE	REVISIONS DESCRIPTION	BY
1	06/15/2020	REVISED PER CITY COMMENTS	
2	06/25/2020	REVISED PER CITY COMMENTS	
3	09/10/2020	REVISED PIPE INSULATION	
4	10/01/2020	REVISED PER CITY COMMENTS	
5	11/18/2020	REVISED LOTS 25-29 GRADINGS	
6	02/17/2021	REVISED ADA RAMPS	
7	03/12/2021	REVISED ADA RAMPS	

SW FARM FIELD ROAD & SW HOOK FARM DRIVE  
 STREET AND STORM SEWER PLANS

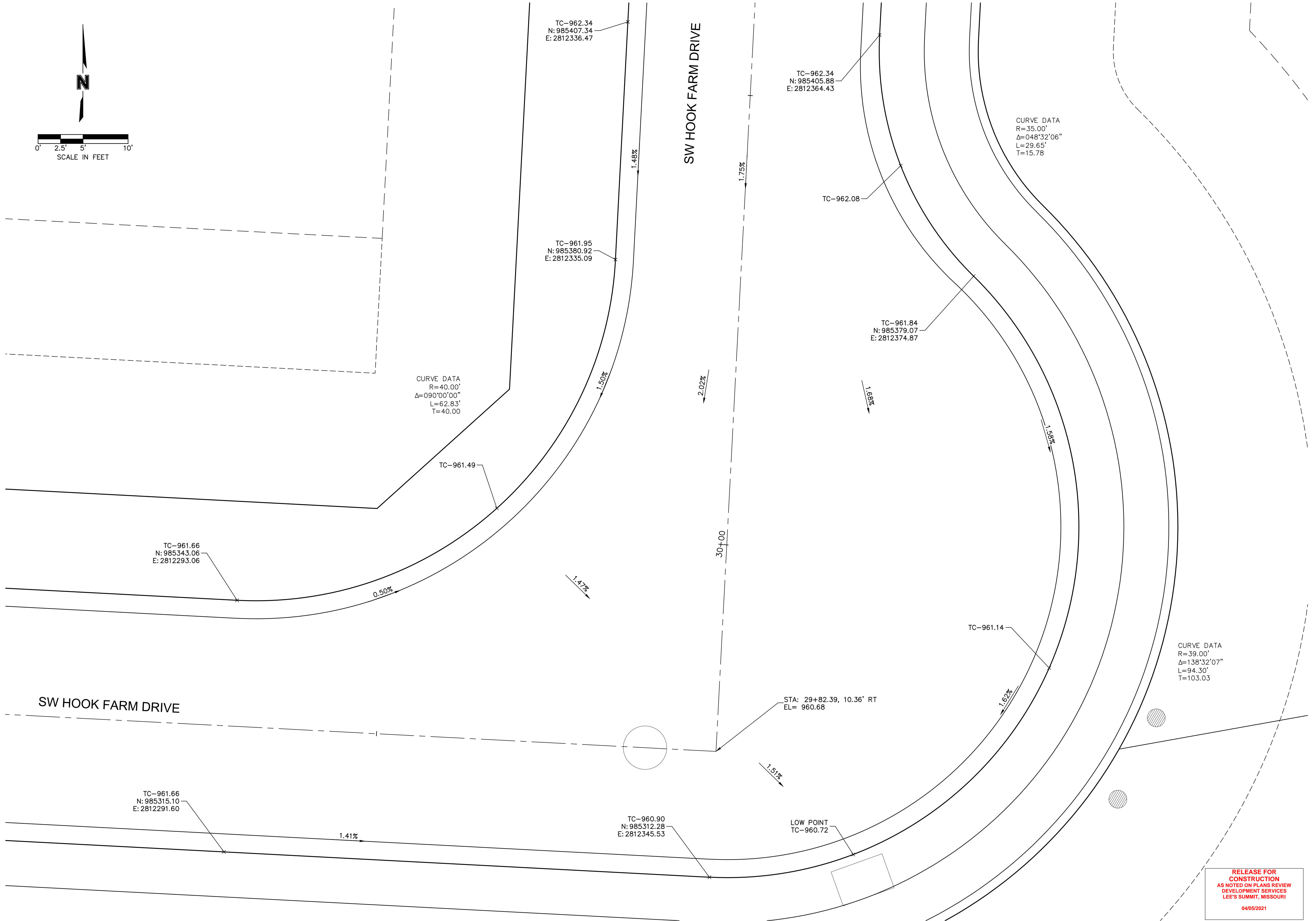
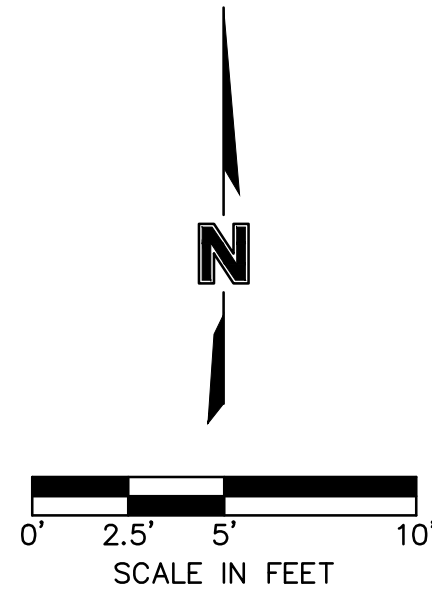
HOOK FARMS  
 FIRST PLAT

LEE'S SUMMIT, MO 2020

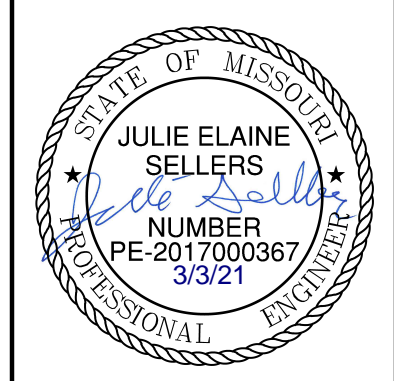
drawn by: CGW  
 checked by: JES  
 approved by: NDH  
 QA/QC by: JES  
 project no.: 019-4061  
 drawing no.:  
 date: 04/20/2020

SHEET C125

DWG: F:\2019\4001-4500\019-4061\40-Design\AutoCAD\Final Plans\NCV\Street and Storm Plans\NCV\INT02\_0194061.dwg USER: nhaiser C:\PUTIL\_0194061  
 DATE: Jun 29, 2020 6:46pm XREFS: C:\PTBLK\_0194061\_34x22 C:\PBNDY\_0194061 C:\PBASE\_0194061 C:\FBASE\_0194061



**olsson**  
 Olsson - Civil Engineering  
 Missouri Certificate of Authority #001592  
 1301 Burlington Street  
 North Kansas City, MO 64116  
 TEL 816.361.1177  
 FAX 816.361.1888  
 www.olsson.com



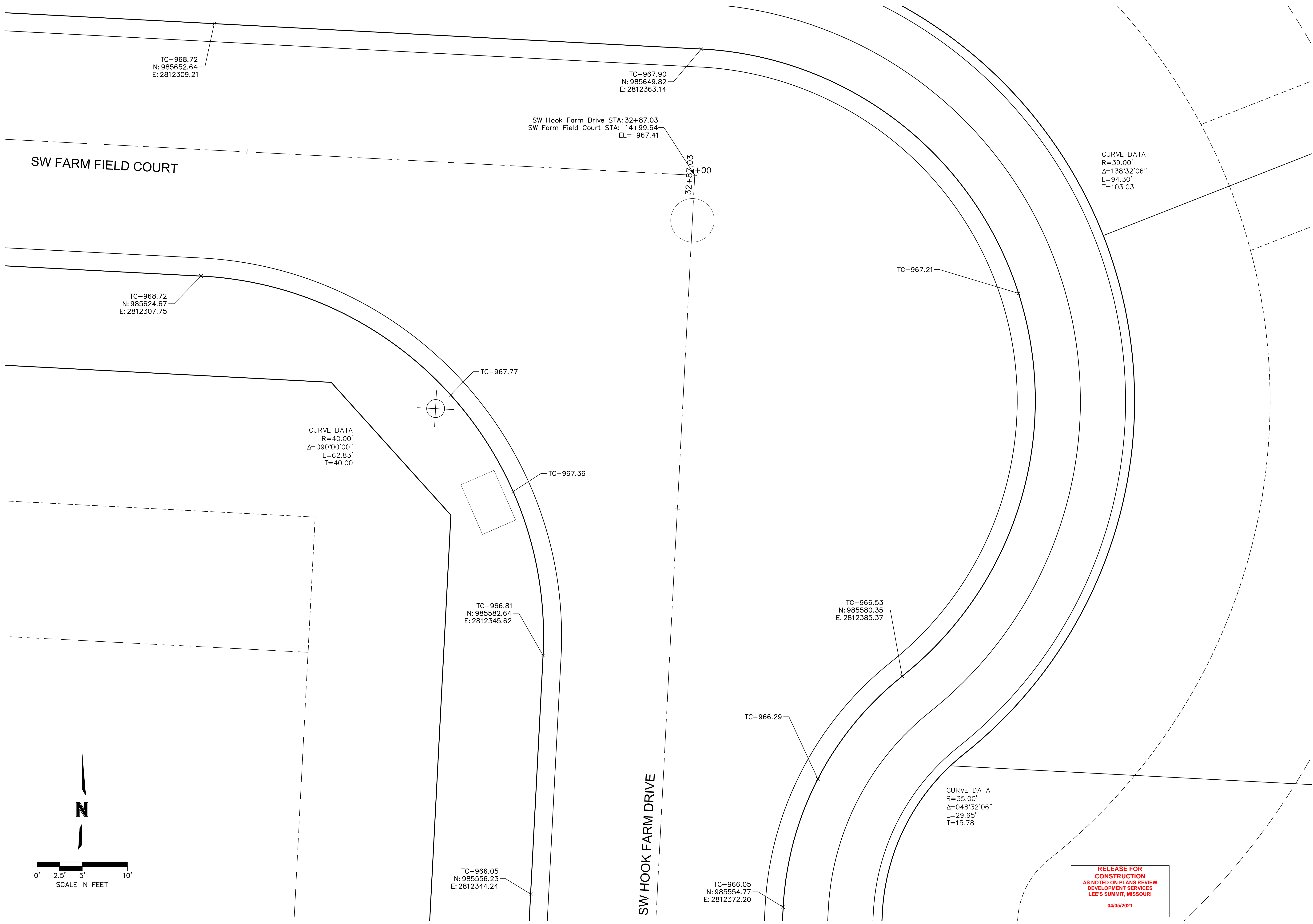
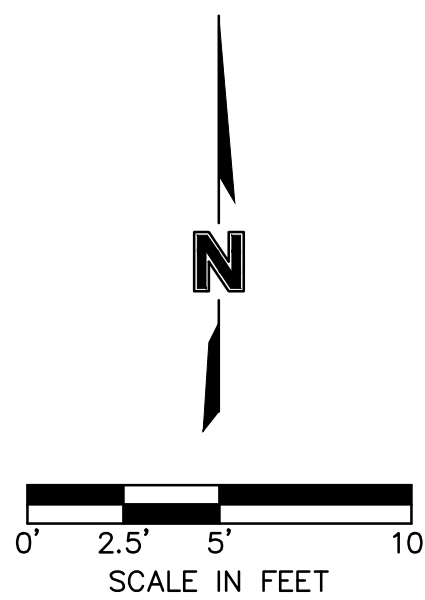
REV. NO.	DATE	REVISIONS DESCRIPTION	BY
1	06/15/2020	REVISED PER CITY COMMENTS	
2	06/25/2020	REVISED PER CITY COMMENTS	

SW HOOK FARM DRIVE & SW HOOK FARM DRIVE  
 STREET AND STORM SEWER PLANS  
 HOOK FARMS  
 FIRST PLAT  
 LEE'S SUMMIT, MO  
 2020

drawn by: CGW  
 checked by: JES  
 approved by: NDH  
 QA/QC by: JES  
 project no.: 019-4061  
 drawing no.:  
 date: 04/20/2020

**RELEASE FOR CONSTRUCTION**  
 AS NOTED ON PLANS REVIEW  
 DEVELOPMENT SERVICES  
 LEE'S SUMMIT, MISSOURI  
 04/05/2021

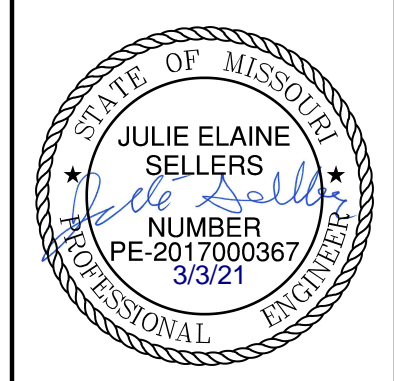
DWG: F:\2019\4001-4500\019-4061-Design\AutoCAD\Final Plans\Sheets\GNCV\Street and Storm Plans\NC\_INT02\_0194061.dwg USER: nhaiser  
 DATE: Jun 29, 2020 6:46pm XREFS: C\_P\BLK\_0194061\_34x22 C\_P\BNDY\_0194061 C\_P\BASE\_0194061 C\_P\UTIL\_0194061



**RELEASE FOR CONSTRUCTION**  
 AS NOTED ON PLANS REVIEW  
 DEVELOPMENT SERVICES  
 LEE'S SUMMIT, MISSOURI  
 04/05/2021

**olsson**

Olsson - Civil Engineering  
 Missouri Certificate of Authority #001592  
 1301 Burlington Street  
 North Kansas City, MO 64116  
 TEL 816.361.1177  
 FAX 816.361.1888  
 www.olson.com



REV. NO.	DATE	REVISIONS DESCRIPTION	BY
1	06/15/2020	REVISED PER CITY COMMENTS	
2	06/25/2020	REVISED PER CITY COMMENTS	

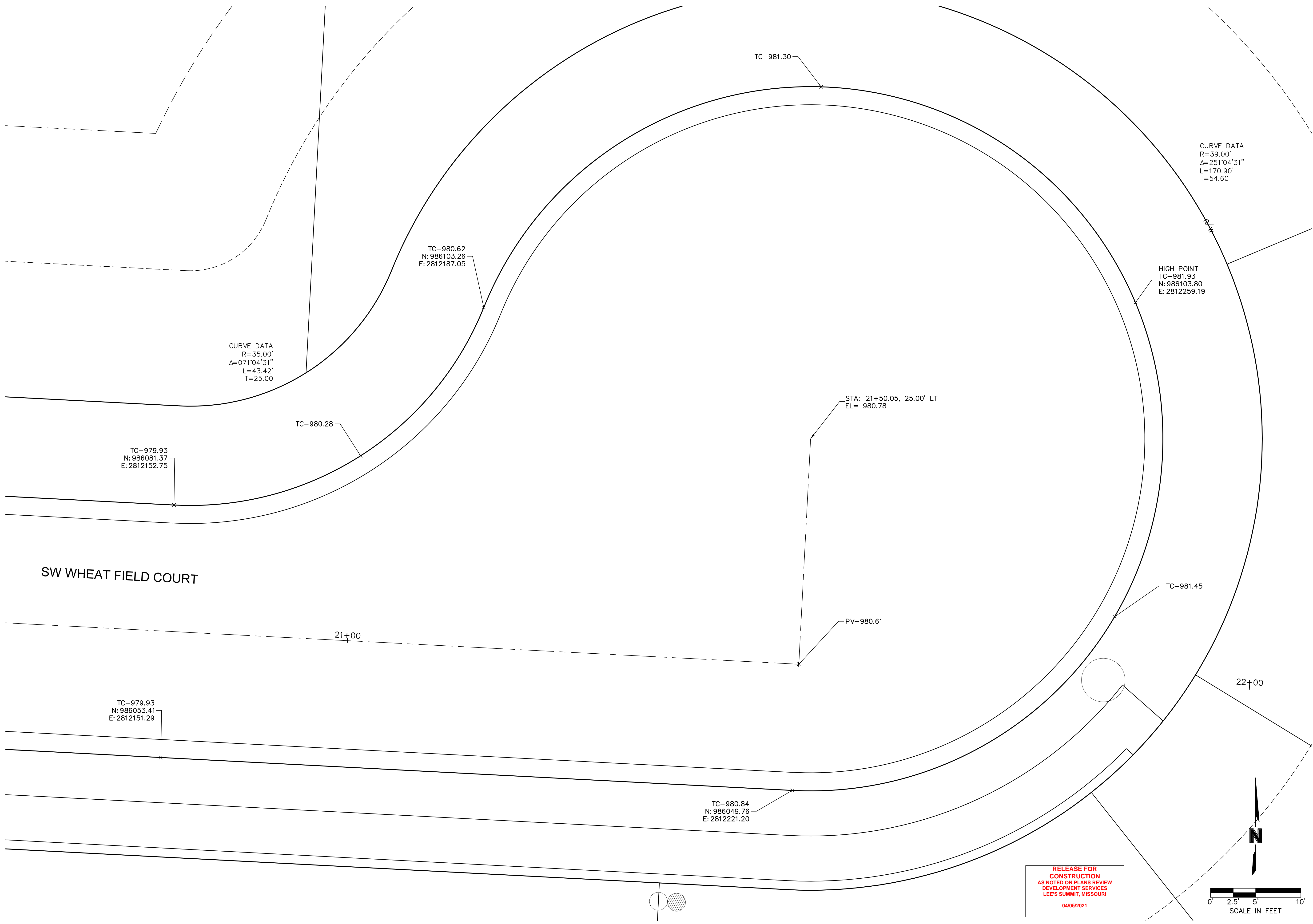
SW FARM FIELD COURT & SW HOOK FARM DRIVE  
 STREET AND STORM SEWER PLANS

HOOK FARMS  
 FIRST PLAT

LEE'S SUMMIT, MO 2020

drawn by: CGW  
 checked by: JES  
 approved by: NDH  
 QA/QC by: JES  
 project no.: 019-4061  
 drawing no.:  
 date: 04/20/2020

DWG: F:\2019\4001-4500\019-4061-40-Design\AutoCAD\Final Plans\Sheets\GNCV\Street and Storm Plans\CV\INT02\_0194061.dwg USER: nhraiser C\_PUTIL\_0194061  
 DATE: Jun 29, 2020 6:46pm XREFS: C:\PTBLK\_0194061\_34x22 C\_XBASE\_0194061 C\_PBASE\_0194061 C\_FBASE\_0194061



CURVE DATA  
 R=39.00'  
 Δ=251°04'31"  
 L=170.90'  
 T=54.60

CURVE DATA  
 R=35.00'  
 Δ=071°04'31"  
 L=43.42'  
 T=25.00

HIGH POINT  
 TC-981.93  
 N: 986103.80  
 E: 2812259.19

STA: 21+50.05, 25.00' LT  
 EL= 980.78

**RELEASE FOR CONSTRUCTION**  
 AS NOTED ON PLANS REVIEW  
 DEVELOPMENT SERVICES  
 LEE'S SUMMIT, MISSOURI  
 04/05/2021

Olsson - Civil Engineering  
 Missouri Certificate of Authority #001592  
 1301 Burlington Street  
 North Kansas City, MO 64116  
 TEL 816.361.1177  
 FAX 816.361.1888  
 www.olsosn.com

JULIE ELAINE SELLERS  
 NUMBER PE-2017000367  
 3/3/21  
 PROFESSIONAL ENGINEER

REV. NO.	DATE	REVISIONS DESCRIPTION	BY
1	06/15/2020	REVISED PER CITY COMMENTS	
2	06/25/2020	REVISED PER CITY COMMENTS	

SW WHEAT FIELD COURT CUL-DE-SAC  
 STREET AND STORM SEWER PLANS  
 HOOK FARMS  
 FIRST PLAT  
 LEE'S SUMMIT, MO  
 2020

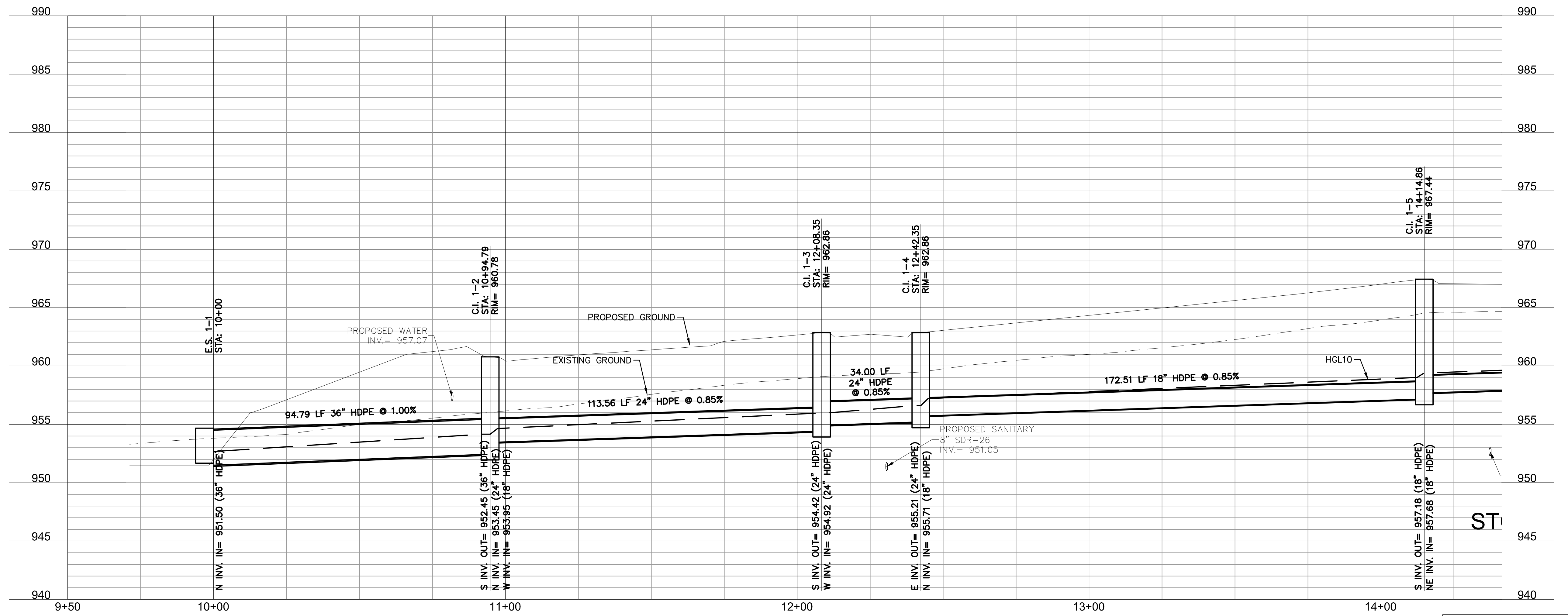
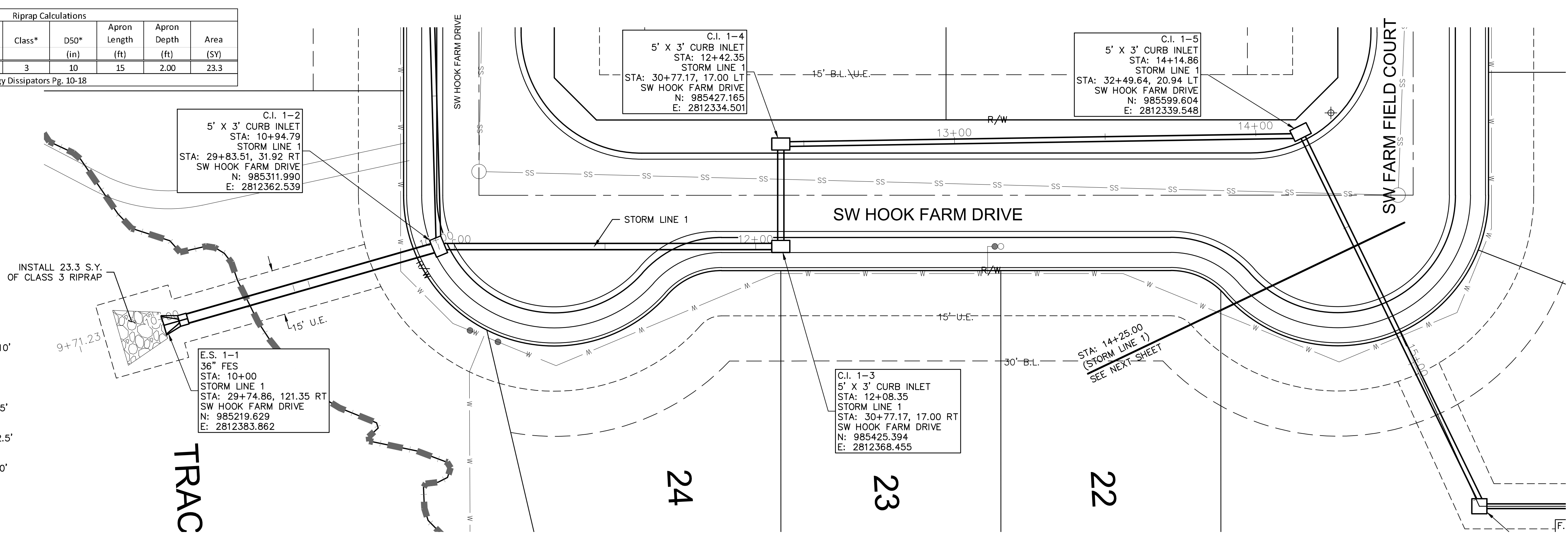
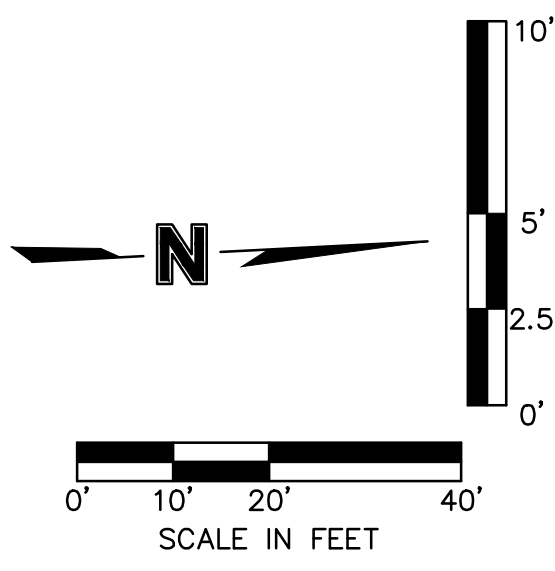
drawn by: CGW  
 checked by: JES  
 approved by: NDH  
 QA/QC by: JES  
 project no.: 019-4061  
 drawing no.:  
 date: 04/20/2020

SHEET C128

DWG: F:\2019\4001-4500\019-4061-Design\AutoCAD\Final Plans\Storm Plans\Storm Plans\STM01\_0194061.dwg USER: nheiser C\_PSTRM\_0194061 C\_PBASE\_0194061 C\_PUTIL\_0194061  
DATE: Jun 30, 2020 7:14am XREFS: C\_PBLK\_0194061\_34x22 C\_PNDY\_0194061 C\_PBASE\_0194061 C\_PBASE\_0194061 C\_PBASE\_0194061

Riprap Calculations							
End Section	Q <sub>100</sub> (cfs)	Pipe Diameter (ft)	Class*	D50* (in)	Apron Length (ft)	Apron Depth (ft)	Area (Sq)
E.S. 1-1	48.24	3	3	10	15	2.00	23.3

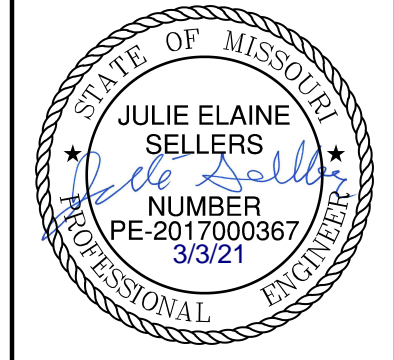
\*Per Table 10.1 HEC 14-FHWA-Energy Dissipators Pg. 10-18



**RELEASE FOR CONSTRUCTION**  
AS NOTED ON PLANS REVIEW  
DEVELOPMENT SERVICES  
LEE'S SUMMIT, MISSOURI  
04/05/2021

# olsson

Olsson - Civil Engineering  
Missouri Certificate of Authority #001592  
1301 Burlington Street  
North Kansas City, MO 64116  
TEL 816.361.1177  
FAX 816.361.1888  
www.olsosn.com



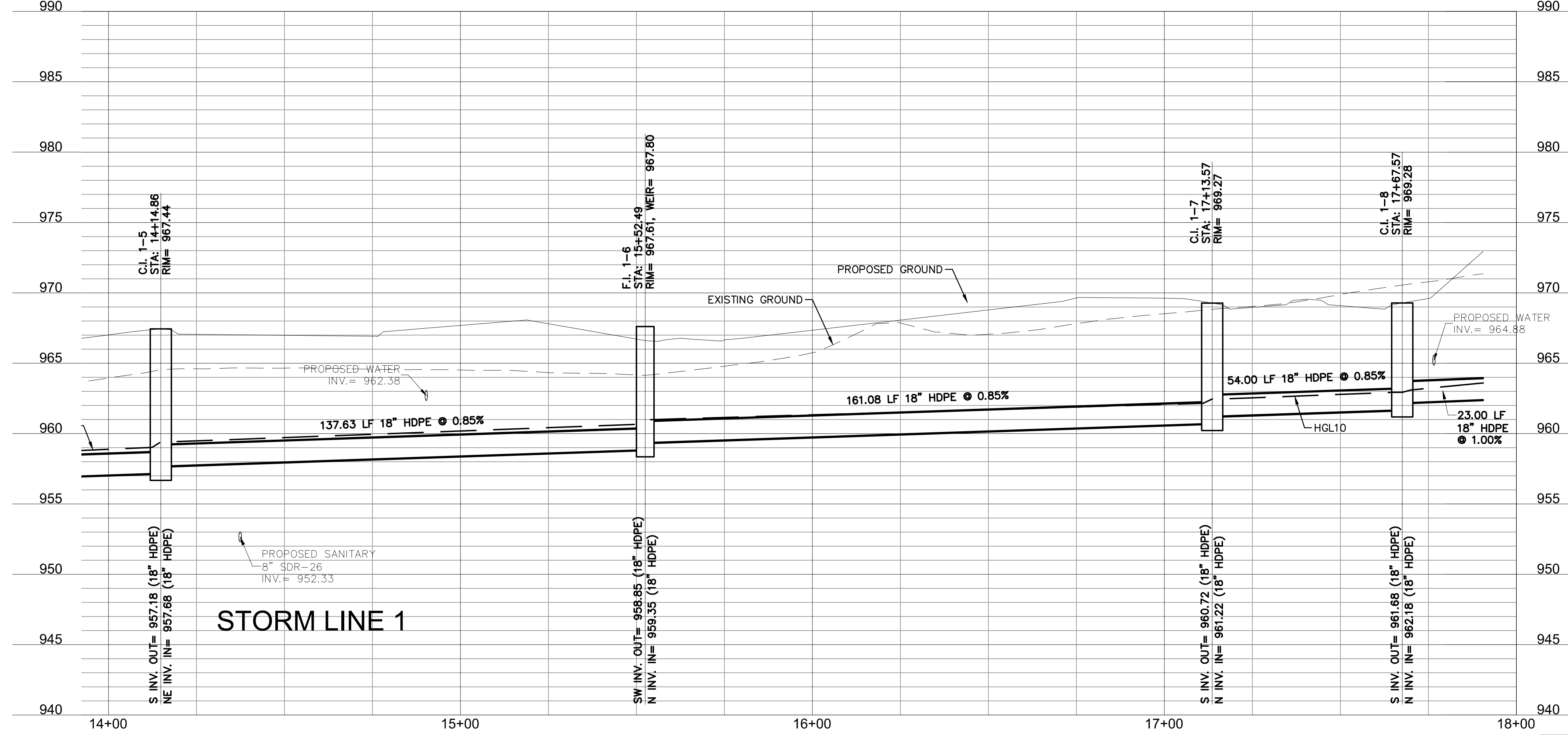
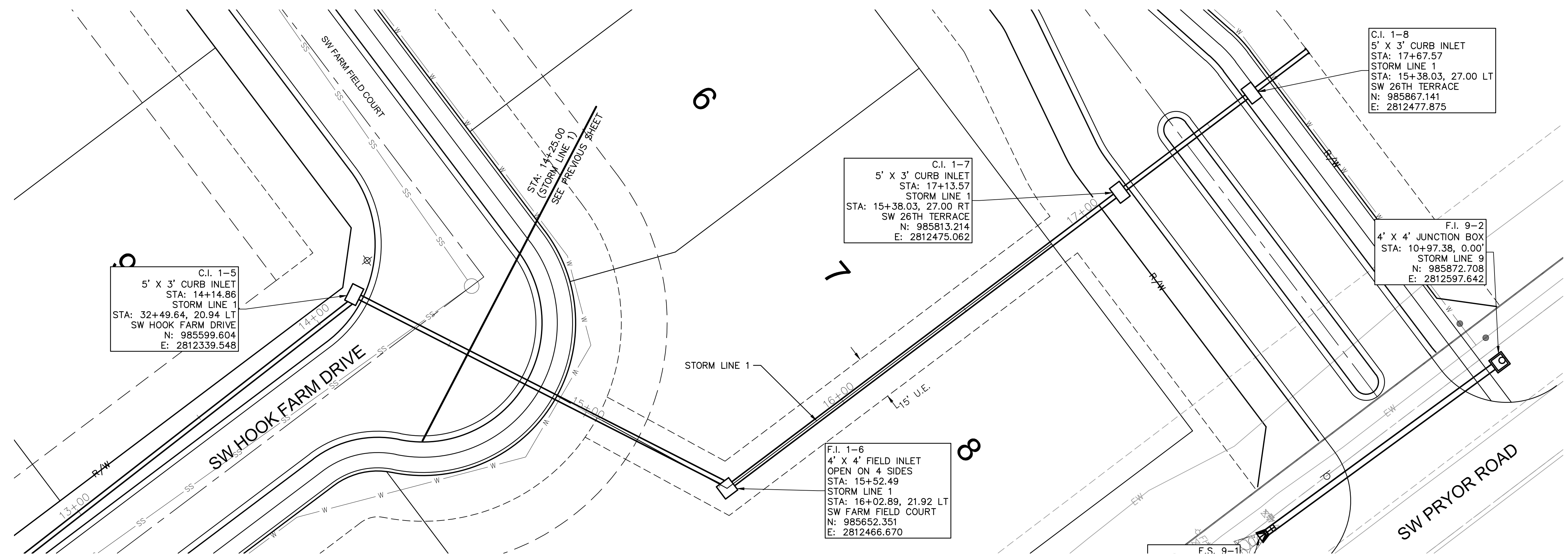
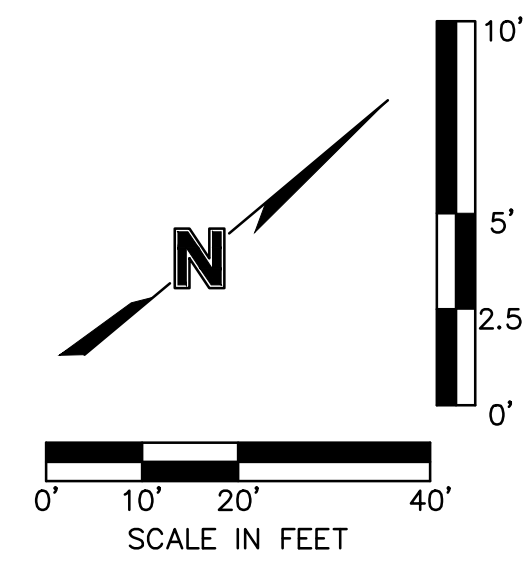
REV. NO.	DATE	REVISIONS DESCRIPTION
1	06/15/2020	REVISED PER CITY COMMENTS
2	06/25/2020	REVISED PER CITY COMMENTS

BY	DATE	REVISIONS DESCRIPTION

drawn by: CGW  
checked by: JES  
approved by: NDH  
QA/QC by: JES  
project no.: 019-4061  
drawing no.:  
date: 04/20/2020

**STORM SEWER PLAN & PROFILE (LINE 1)**  
**STREET AND STORM SEWER PLANS**  
HOOK FARMS  
FIRST FLAT  
LEE'S SUMMIT, MO  
2020  
SHEET  
C129

DWG: F:\2019\4001-4500\019-4061-40-Design\AutoCAD\Final Plans\Storm Plans\NCV\Street and Storm Plans\0194061.dwg  
 DATE: Jun 30, 2020 7:14am XREFS: C:\PTBLK\_0194061\_34x22 C:\PBASE\_0194061 C:\PBASE\_0194061 C:\PSTRM\_0194061 C:\PSURF\_0194061 C:\PUTIL\_0194061  
 USER: nheiser



**RELEASE FOR CONSTRUCTION**  
 AS NOTED ON PLANS REVIEW  
 DEVELOPMENT SERVICES  
 LEE'S SUMMIT, MISSOURI  
 04/05/2021

**olsson**

Olsson - Civil Engineering  
 Missouri Certificate of Authority #001592  
 1301 Burlington Street  
 North Kansas City, MO 64116  
 TEL 816.361.1177  
 FAX 816.361.1888  
 www.olson.com

REV. NO.	DATE	REVISIONS DESCRIPTION
1	06/15/2020	REVISED PER CITY COMMENTS
2	06/25/2020	REVISED PER CITY COMMENTS

STORM SEWER PLAN & PROFILE (LINE 1 CONT'D)  
 STREET AND STORM SEWER PLANS

HOOK FARMS  
 FIRST FLAT

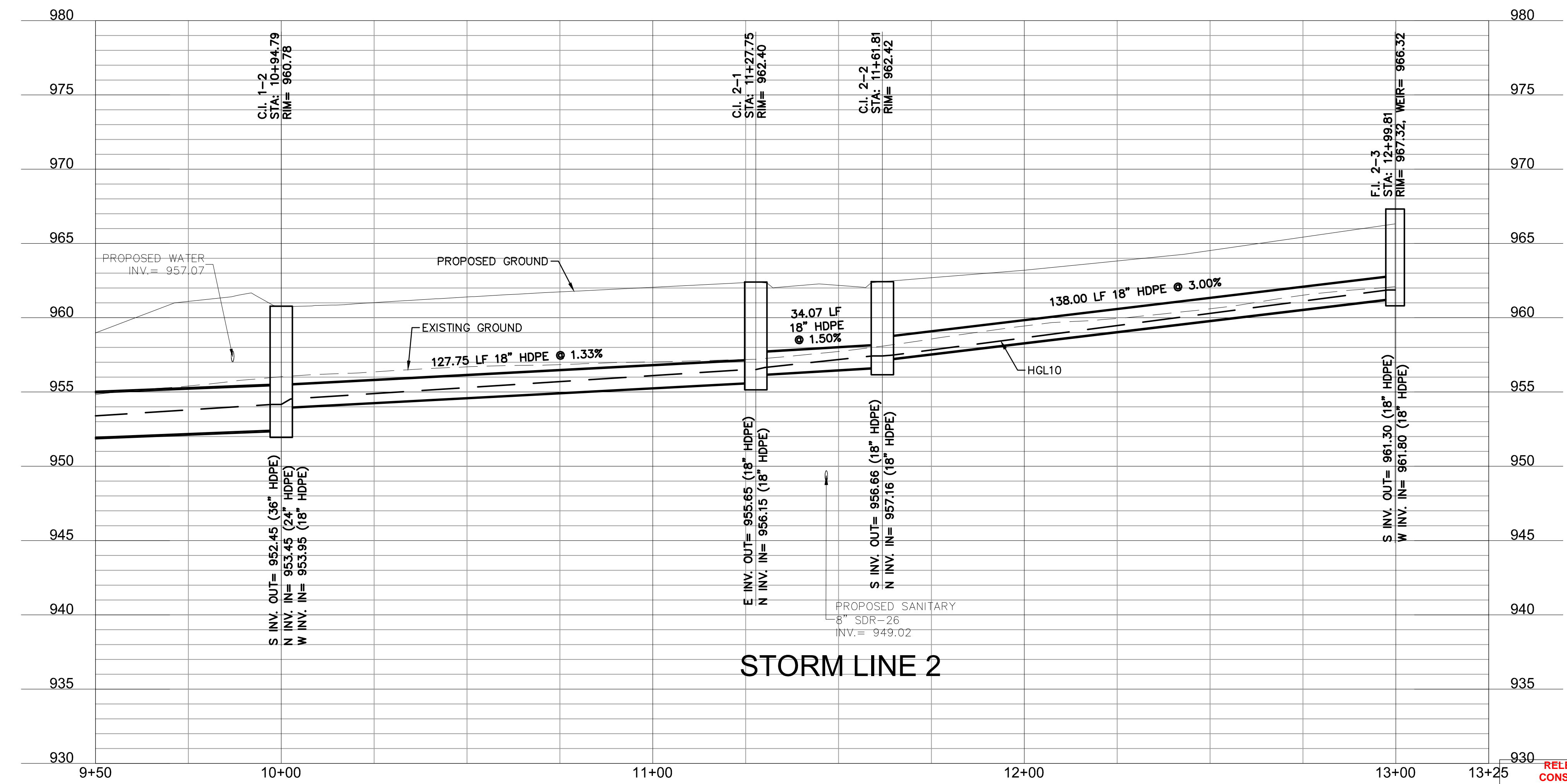
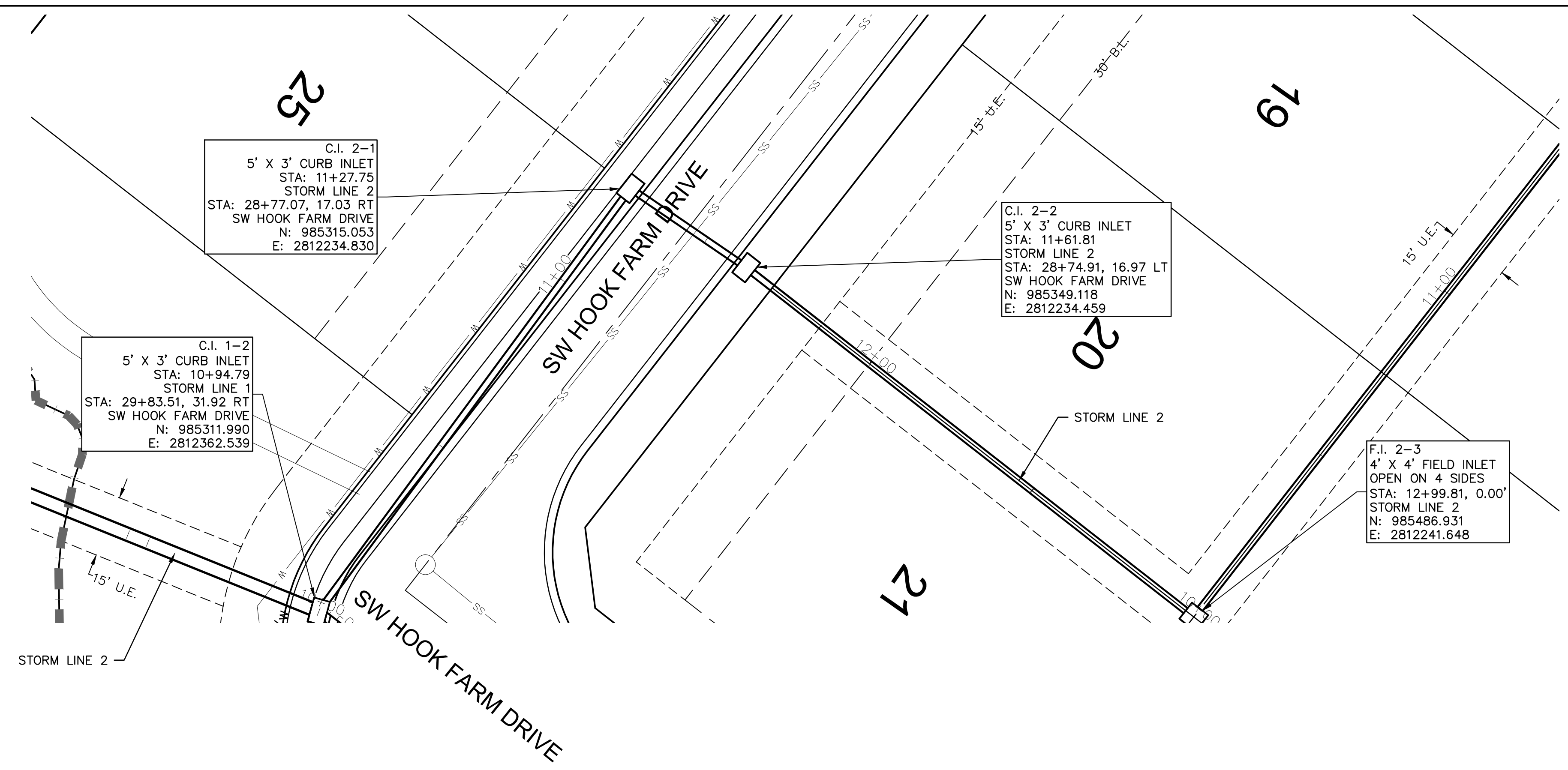
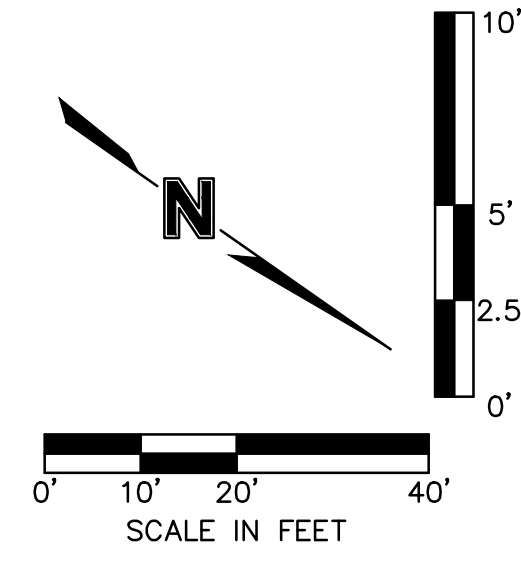
LEE'S SUMMIT, MO

2020

drawn by: CGW  
 checked by: JES  
 approved by: NDH  
 QA/QC by: JES  
 project no.: 019-4061  
 drawing no.:  
 date: 04/20/2020

**SHEET**  
**C130**

DWG: F:\2019\4001-4500\019-4061-Design\AutoCAD\Final Plans\Sheet\GNCV\Street and Storm Plans\0194061.dwg  
 DATE: Jun 30, 2020 7:14am XREFS: C:\PTBLK\_0194061\_34x22 C:\PBDY\_0194061 C:\PBASE\_0194061 C:\PBASE\_0194061 C:\PSTRM\_0194061 C:\PSURF\_0194061 C:\PUTIL\_0194061  
 USER: nheiser



RELEASE FOR CONSTRUCTION  
 AS NOTED ON PLANS REVIEW  
 DEVELOPMENT SERVICES  
 LEE'S SUMMIT, MISSOURI  
 04/05/2021

**olsson**

Olsson - Civil Engineering  
 Missouri Certificate of Authority #001592  
 1301 Burlington Street  
 North Kansas City, MO 64116  
 TEL 816.361.1177  
 FAX 816.361.1888  
 www.olson.com

**JULIE ELAINE SELLERS**  
 PROFESSIONAL ENGINEER  
 NUMBER PE-2017000367  
 3/3/21

REV. NO.	DATE	REVISIONS DESCRIPTION	BY
1	06/15/2020	REVISED PER CITY COMMENTS	
2	06/25/2020	REVISED PER CITY COMMENTS	

**STORM SEWER PLAN & PROFILE (LINE 2)**  
 STREET AND STORM SEWER PLANS

HOOK FARMS  
 FIRST PLAT

2020

REVISIONS

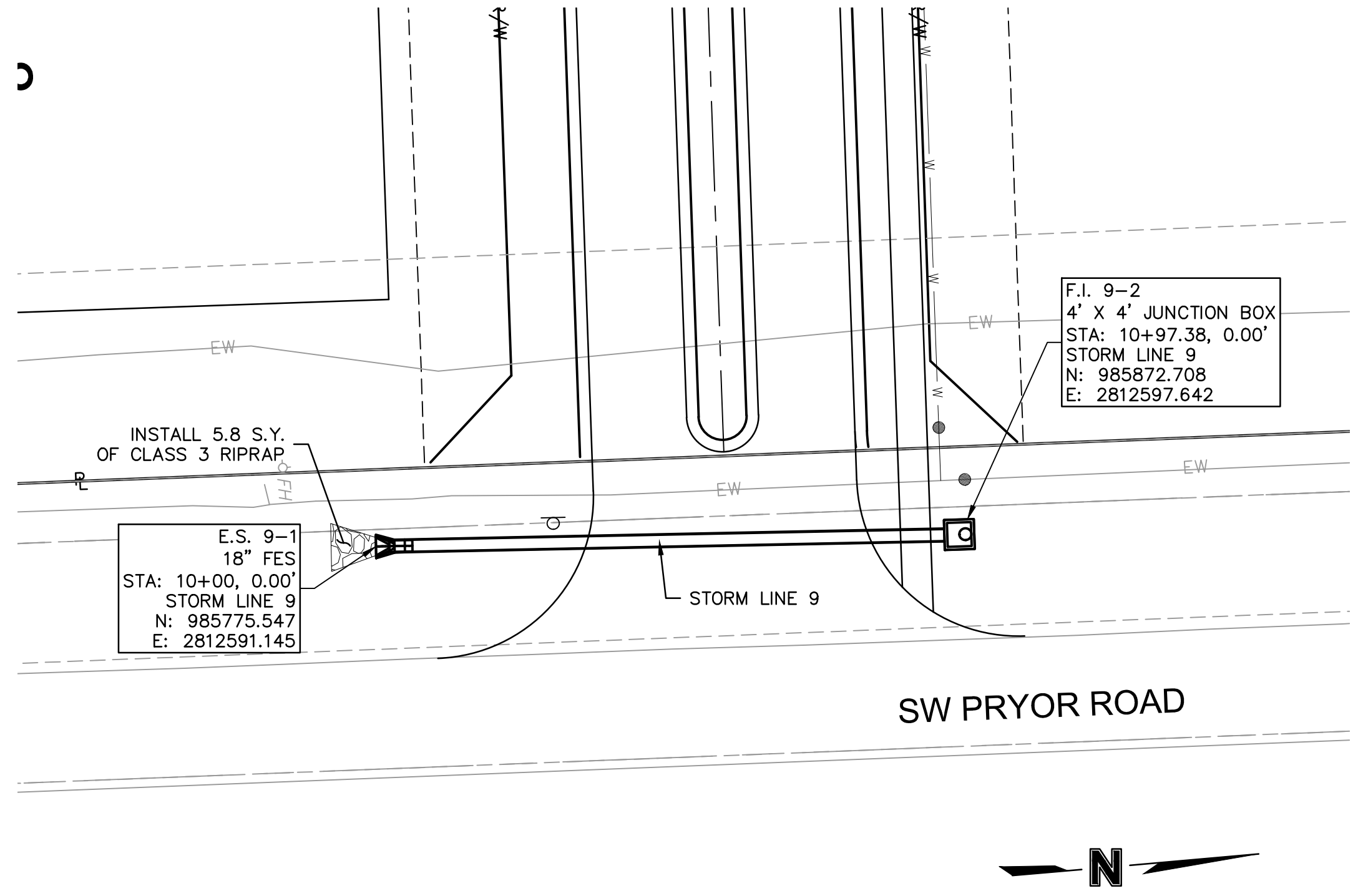
LEE'S SUMMIT, MO

04/20/2020

drawn by: CGW  
 checked by: JES  
 approved by: NDH  
 QA/QC by: JES  
 project no.: 019-4061  
 drawing no.:  
 date: 04/20/2020

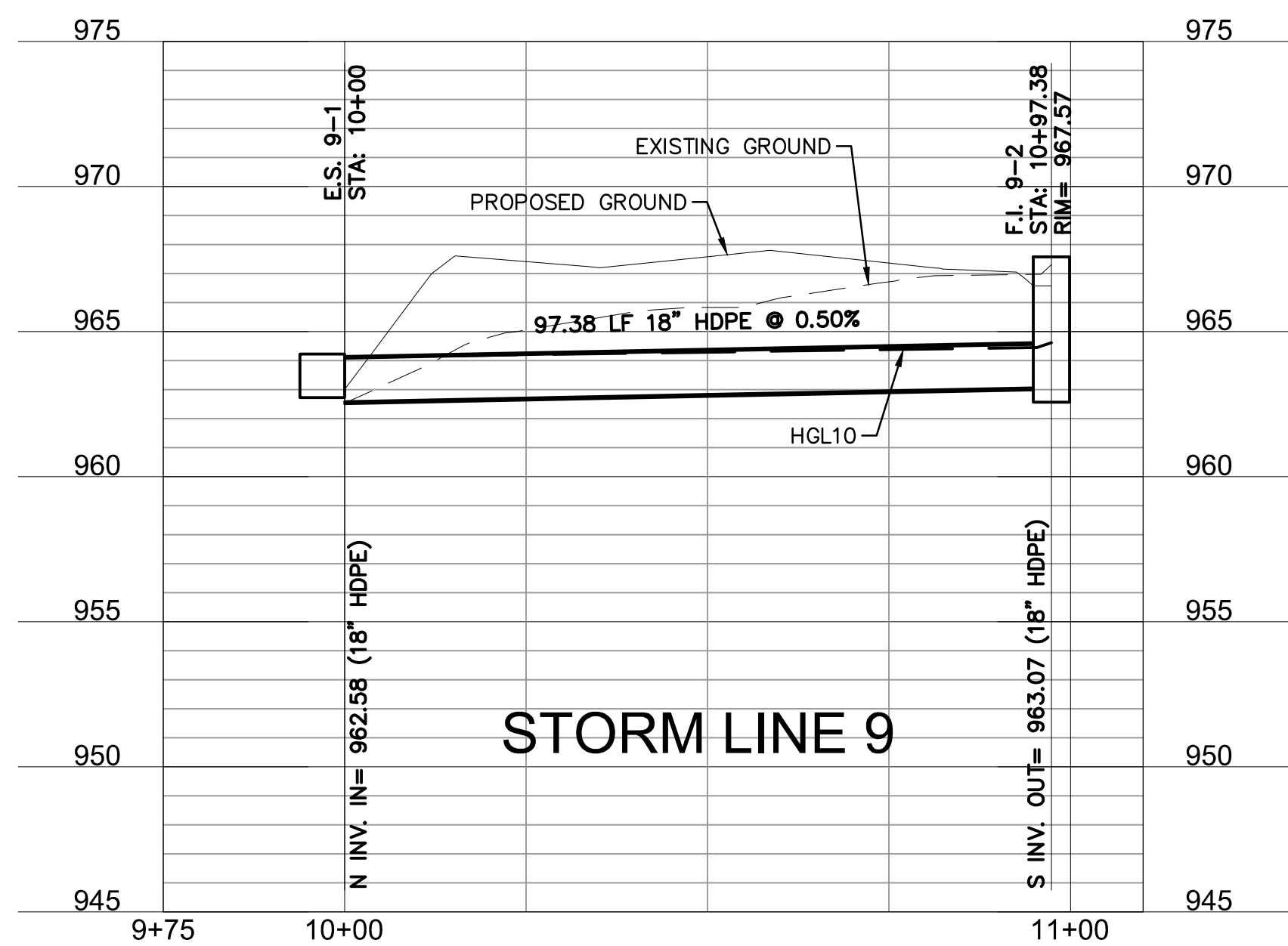
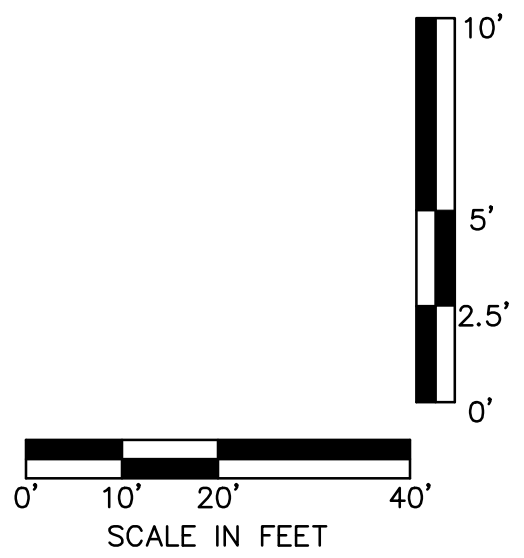
**SHEET C131**

DWG: F:\2019\4001-4500\019-4061\40-Design\AutoCAD\Final Plans\Storm Plans\CV\_STM01\_0194061.dwg USER: nheiser  
 DATE: Jun 30, 2020 7:14am XREFS: C:\PTBLK\_0194061\_34x22 C:\PBDY\_0194061 C:\XBASE\_0194061 C:\PBASE\_0194061 C:\PSTRM\_0194061 C:\PSURF\_0194061 C:\PUTIL\_0194061

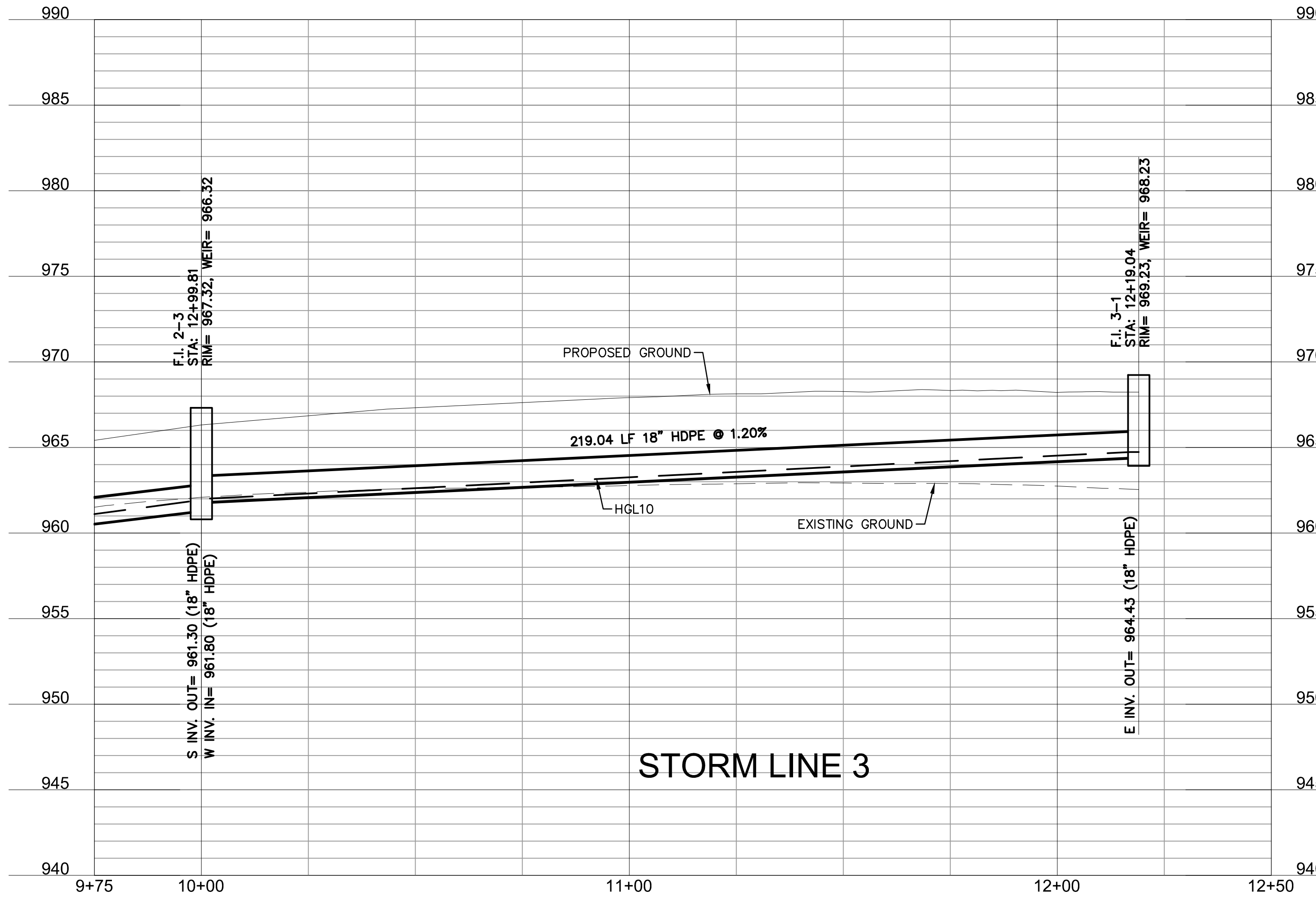
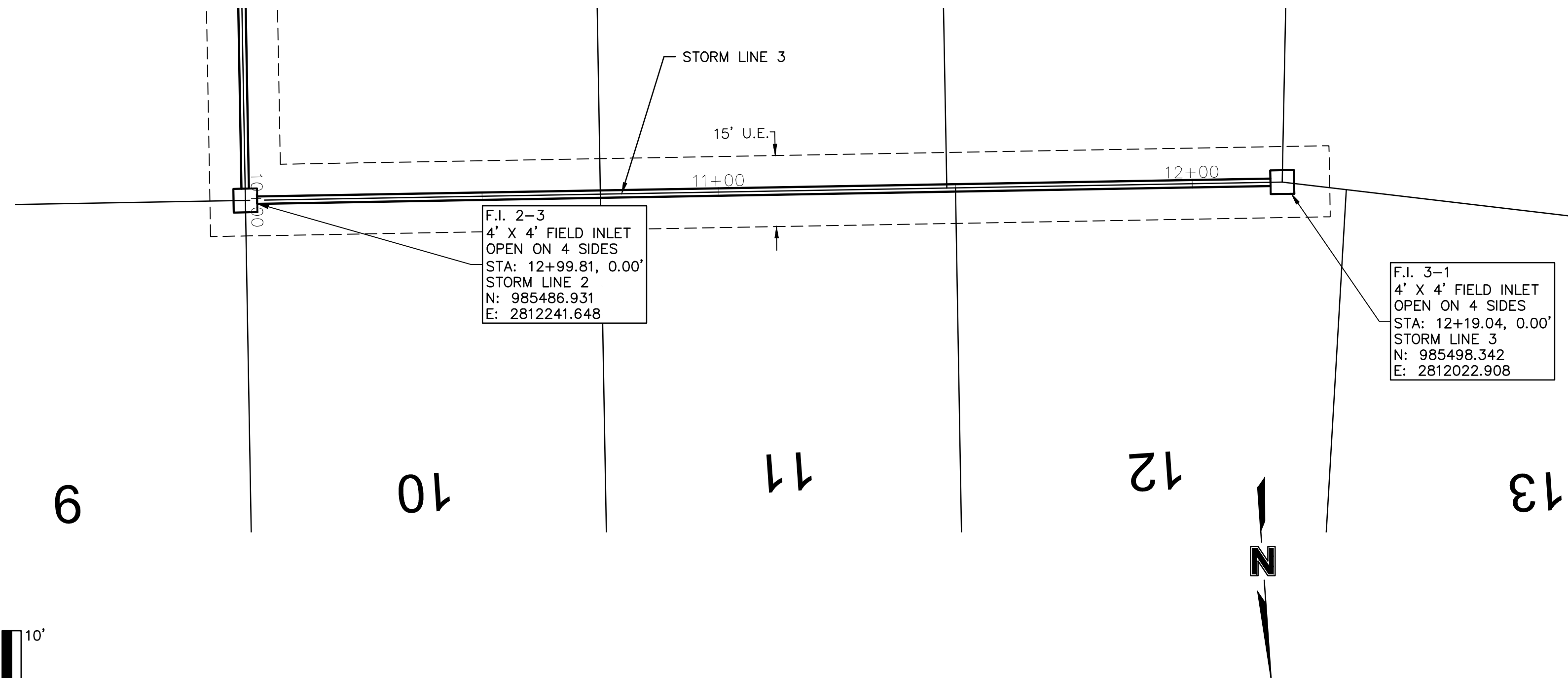


Riprap Calculations							
End Section	Q <sub>100</sub> (cfs)	Pipe Diameter (ft)	Class*	D50* (in)	Apron Length (ft)	Apron Depth (ft)	Area (SY)
E.S. 9-1	14.93	1.5	3	10	7.5	2.00	5.8

\*Per Table 10.1 HEC 14-FHWA-Energy Dissipators Pg. 10-18



RELEASE FOR  
CONSTRUCTION  
AS NOTED ON PLANS REVIEW  
DEVELOPMENT SERVICES  
LEE'S SUMMIT, MISSOURI  
04/05/2021



**olsson**  
 Olsson - Civil Engineering  
 Missouri Certificate of Authority #001592  
 1301 Burlington Street  
 North Kansas City, MO 64116  
 TEL 816.361.1177  
 FAX 816.361.7888  
 www.olson.com

JULIE ELAINE SELLERS  
 PE-2017000367  
 3/3/21

REV. NO.	DATE	REVISIONS DESCRIPTION	BY
1	08/15/2020	REVISED PER CITY COMMENTS	
2	08/25/2020	REVISED PER CITY COMMENTS	

STORM SEWER PLAN & PROFILE (LINE 3 & 9)  
 STREET AND STORM SEWER PLANS  
 HOOK FARMS  
 FIRST FLAT  
 LEE'S SUMMIT, MO  
 2020

drawn by: CGW  
 checked by: JES  
 approved by: NDH  
 QA/QC by: JES  
 project no.: 019-4061  
 drawing no.:  
 date: 04/20/2020

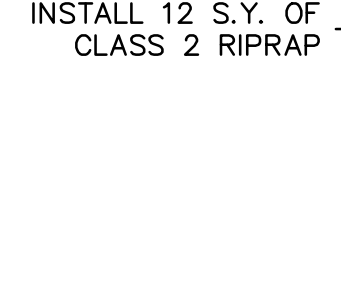
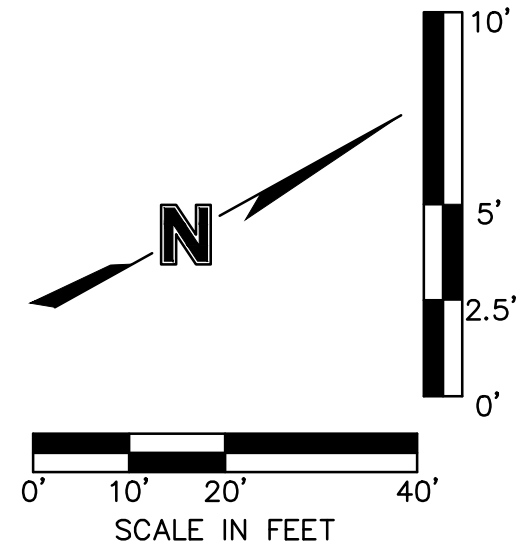
SHEET C132



DWG: F:\2019\4001-4500\019-4061\40-Design\AutoCAD\Final Plans\Storm Plans\Storm Plans\019-4061.dwg USER: nheiser  
 DATE: Jun 29, 2020 6:53pm XREFS: C:\PTBLK\_0194061\_34x22 C:\PBASE\_0194061 C:\XBASE\_0194061 C:\PSURF\_0194061 C:\PSTRM\_0194061 C:\PBASE\_0194061 C:\PUTIL\_0194061

Riprap Calculations							
End Section	Q <sub>100</sub> (cfs)	Pipe Diameter (ft)	Class*	D50* (in)	Apron Length (ft)	Apron Depth (ft)	Area (SY)
E.S. 4-1	27.38	2.5	2	6	10	1.65	12.0

\*Per Table 10.1 HEC 14-FHWA-Energy Dissipators Pg. 10-18



E.S. 4-1  
 30" FES  
 STA: 10+00  
 STORM LINE 4  
 N: 985258.303  
 E: 2811631.226

33

32

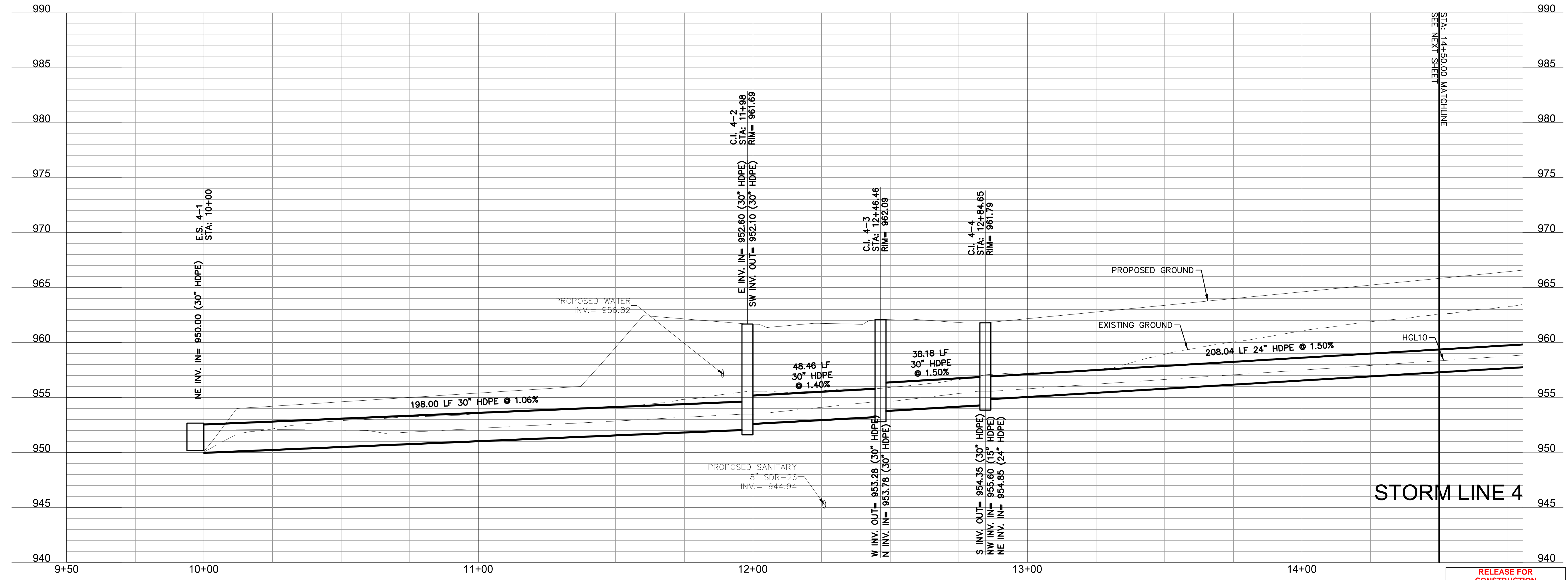
C.I. 4-2  
 6' X 3' CURB INLET  
 STA: 11+98  
 STORM LINE 4  
 STA: 23+55.88, 17.00 RT  
 SW HOOK FARM DRIVE  
 N: 985431.176  
 E: 2811727.761

C.I. 4-3  
 6' X 3' CURB INLET  
 STA: 12+46.46  
 STORM LINE 4  
 STA: 23+90.41, 17.00 LT  
 SW HOOK FARM DRIVE  
 N: 985444.022  
 E: 2811774.492

C.I. 4-4  
 6' X 3' CURB INLET  
 STA: 12+84.65  
 STORM LINE 4  
 STA: 10+44.00, 17.00 RT  
 SW FARM FIELD ROAD  
 N: 985480.760  
 E: 2811764.082

C.I. 5-1  
 5' X 3' CURB INLET  
 STA: 10+34  
 STORM LINE 5  
 STA: 10+44.00, 17.00 LT  
 SW FARM FIELD ROAD  
 N: 985497.337  
 E: 2811734.397

M.H. 4-5  
 60" MH  
 STA: 14+92.68  
 STORM LINE 4  
 STA: 12+52.04, 17.00 RT  
 SW FARM FIELD ROAD  
 N: 985662.394  
 E: 2811865.510



RELEASE FOR CONSTRUCTION  
 AS NOTED ON PLANS REVIEW  
 DEVELOPMENT SERVICES  
 LEE'S SUMMIT, MISSOURI  
 04/05/2021

**olsson**

Olsson - Civil Engineering  
 Missouri Certificate of Authority #001592  
 1301 Burlington Street  
 North Kansas City, MO 64116  
 TEL 816.361.1177  
 FAX 816.361.1888  
 www.olson.com

STATE OF MISSOURI  
 JULIE ELAINE SELLERS  
 PROFESSIONAL ENGINEER  
 NUMBER PE-2017000367  
 3/3/21

REV. NO.	DATE	REVISIONS DESCRIPTION
1	06/15/2020	REVISED PER CITY COMMENTS
2	06/25/2020	REVISED PER CITY COMMENTS

STORM SEWER PLAN & PROFILE (LINE 4)  
 STREET AND STORM SEWER PLANS

HOOK FARMS  
 FIRST FLAT

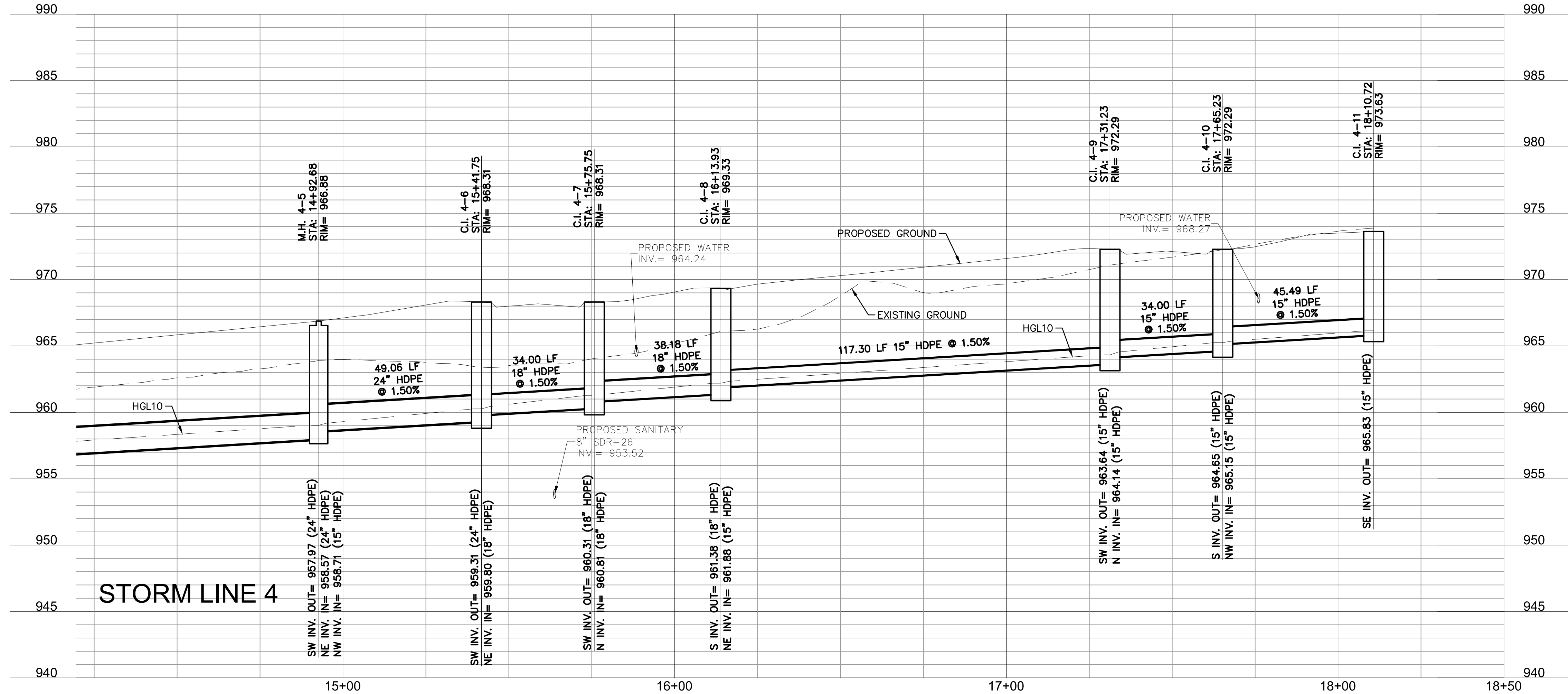
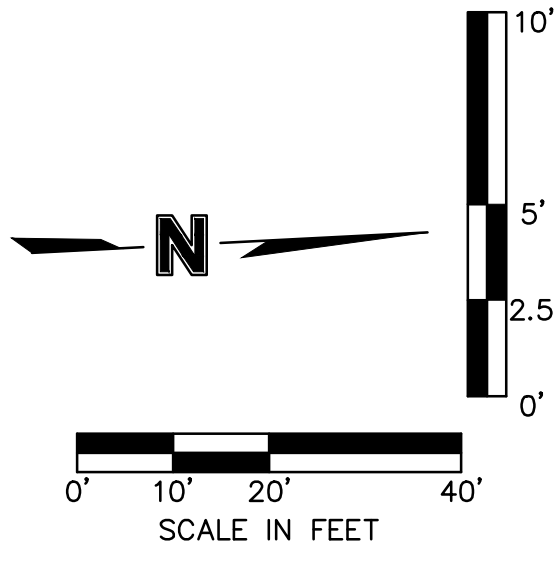
LEE'S SUMMIT, MO

2020

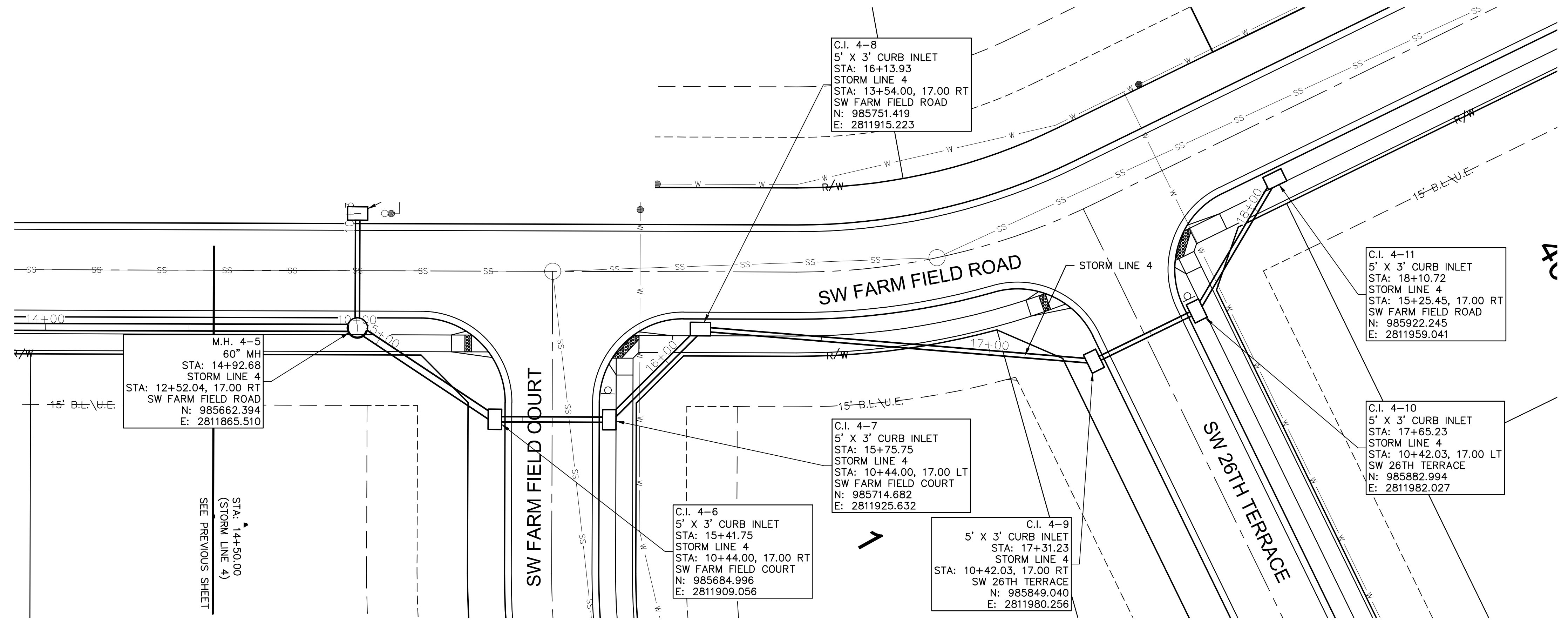
drawn by: CGW  
 checked by: JES  
 approved by: NDH  
 QA/QC by: JES  
 project no.: 019-4061  
 drawing no.:  
 date: 04/20/2020

SHEET C133

DWG: F:\2019\4001-4500\019-4061-Design\AutoCAD\Final Plans\Storm Plans\NCV\Street and Storm Plans\NCV\_STM02\_0194061.dwg  
 DATE: Jun 29, 2020 6:53pm XREFS: C:\PTBLK\_0194061\_34x22 C:\PBASE\_0194061 C:\PBNDY\_0194061 C:\PSTRM\_0194061 C:\PSURF\_0194061 C:\PUTIL\_0194061 USER: nheiser



RELEASE FOR  
 CONSTRUCTION  
 AS NOTED ON PLANS REVIEW  
 DEVELOPMENT SERVICES  
 LEE'S SUMMIT, MISSOURI  
 04/20/2021



Olsson - Civil Engineering  
 Missouri Certificate of Authority #001592  
 1301 Burlington Street  
 North Kansas City, MO 64116  
 TEL 816.361.1177  
 FAX 816.361.7888  
 www.olson.com

REV. NO.	DATE	REVISIONS DESCRIPTION
1	06/15/2020	REVISED PER CITY COMMENTS
2	06/25/2020	REVISED PER CITY COMMENTS

STORM SEWER PLAN & PROFILE (LINE 4 CONT'D)  
 STREET AND STORM SEWER PLANS

HOOK FARMS  
 FIRST FLAT

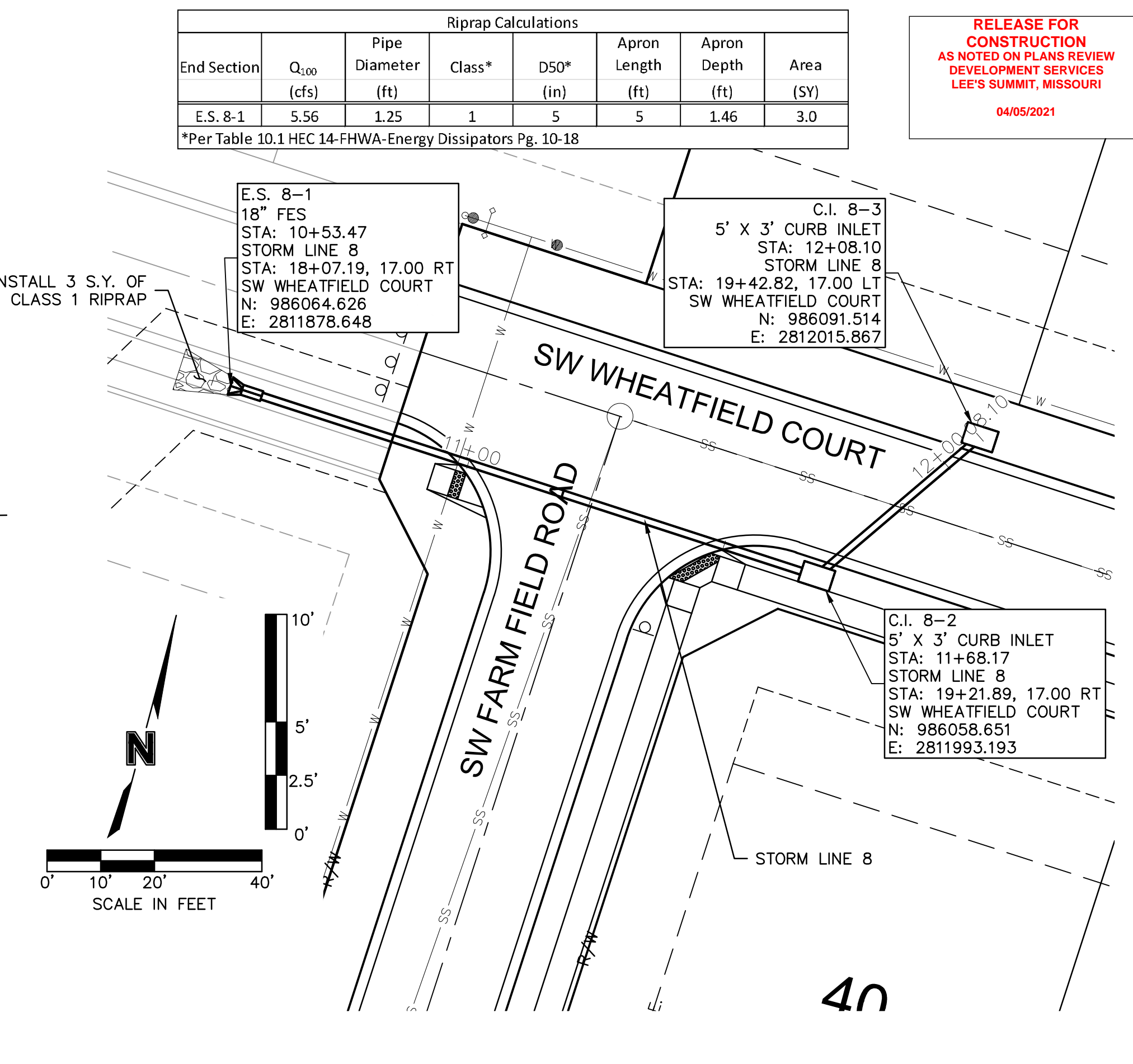
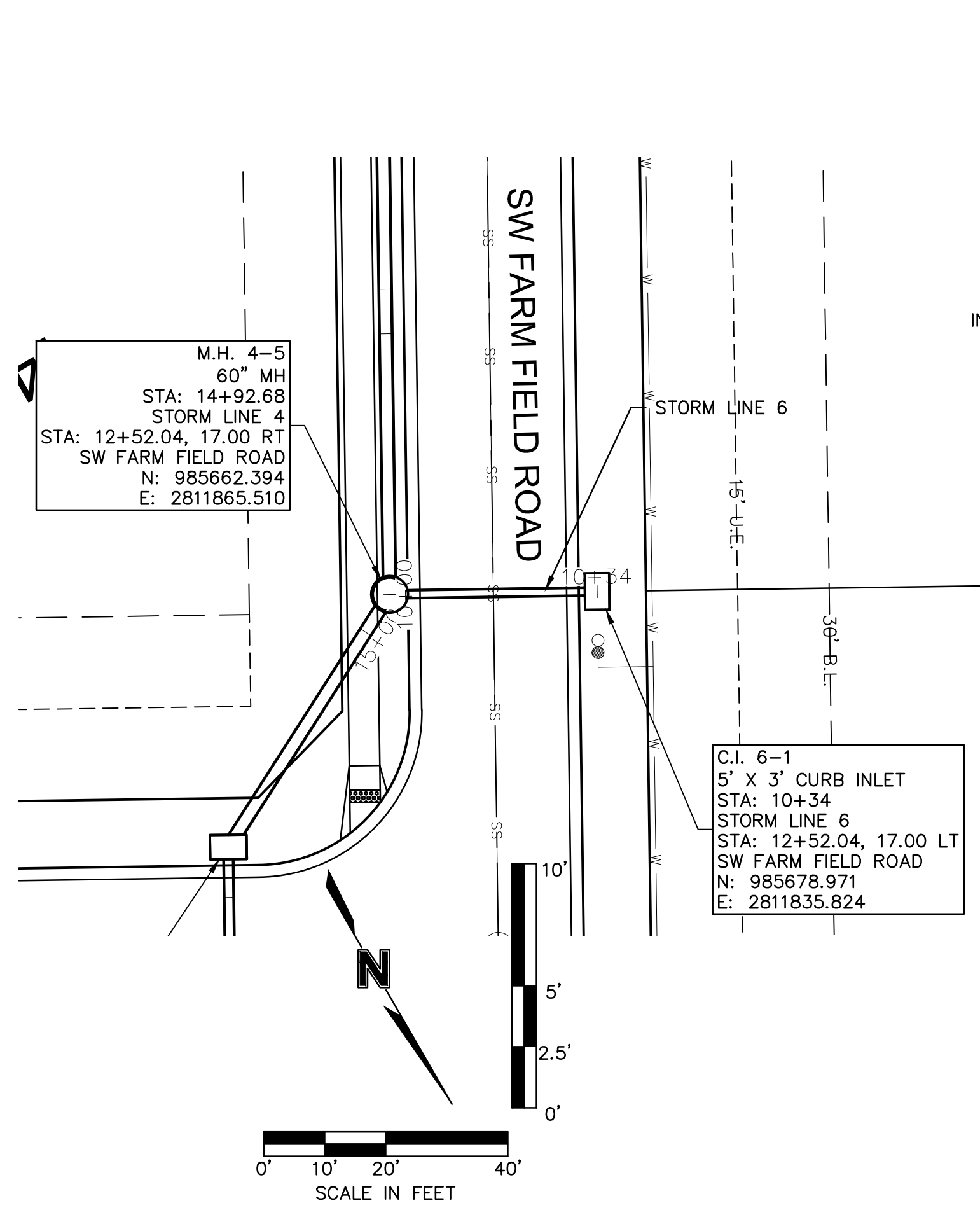
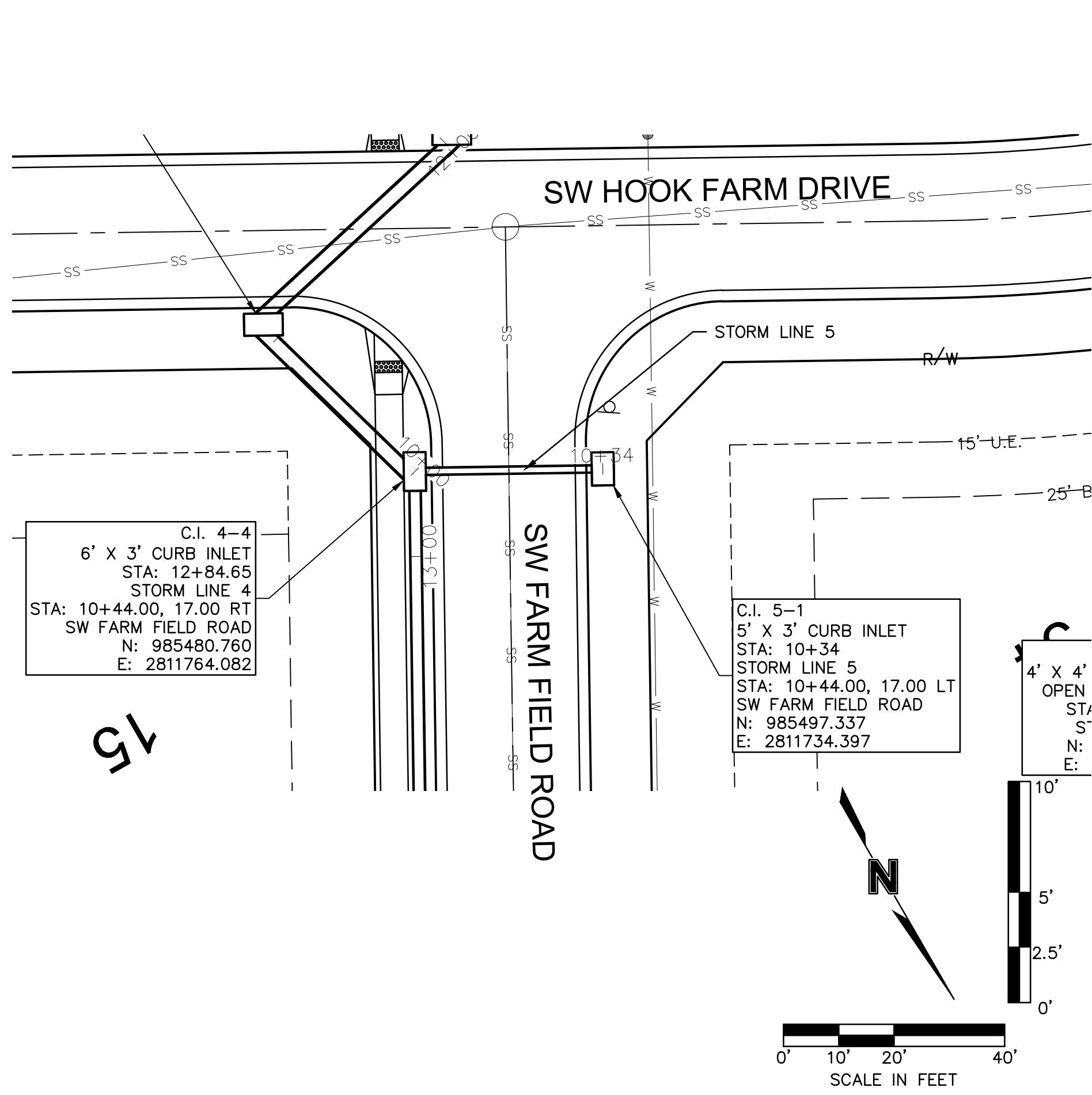
BY	DATE
	2020

LEE'S SUMMIT, MO

SHEET  
C134

CGW  
 checked by: JES  
 approved by: NDH  
 QA/QC by: JES  
 project no.: 019-4061  
 drawing no.:  
 date: 04/20/2020

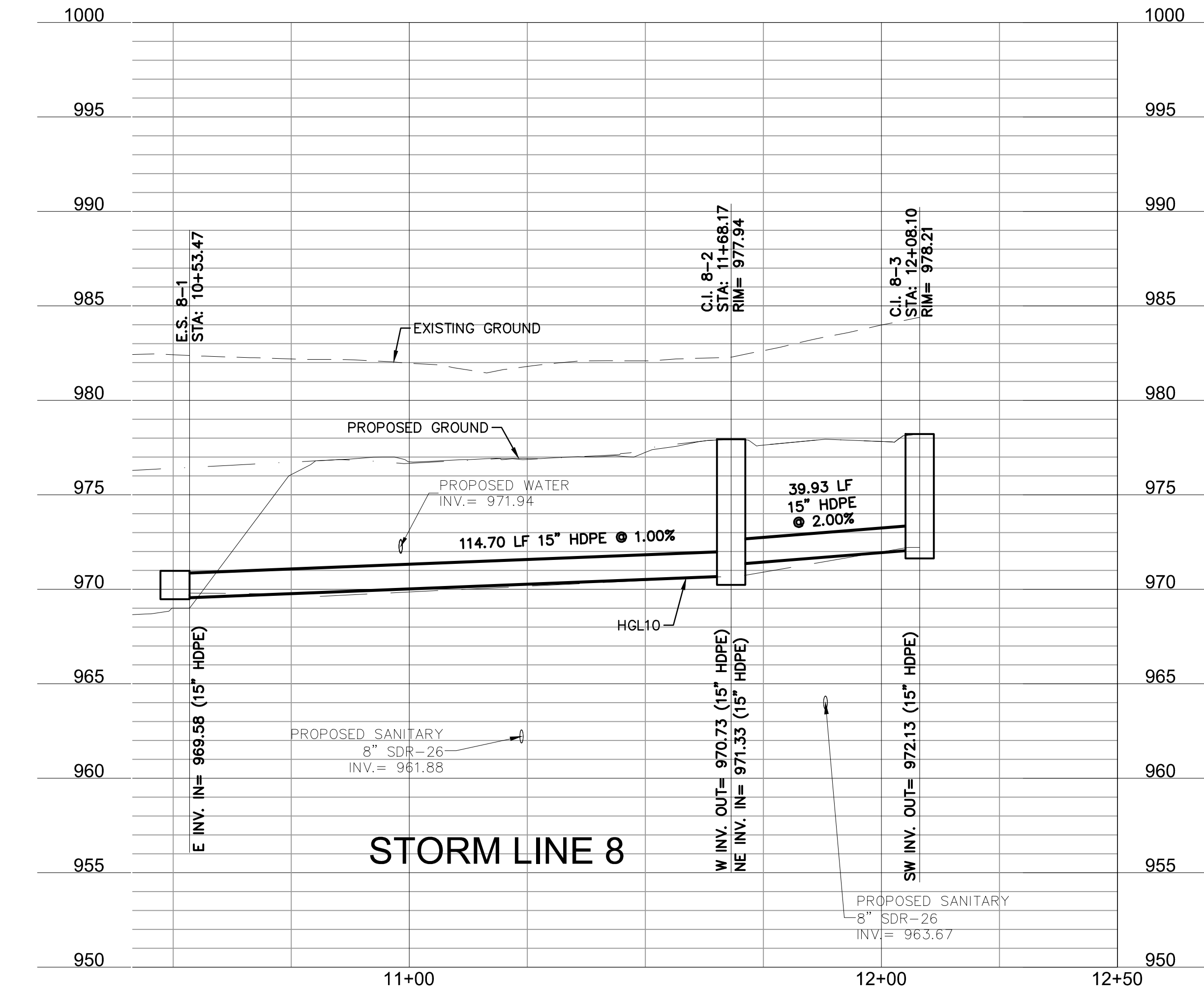
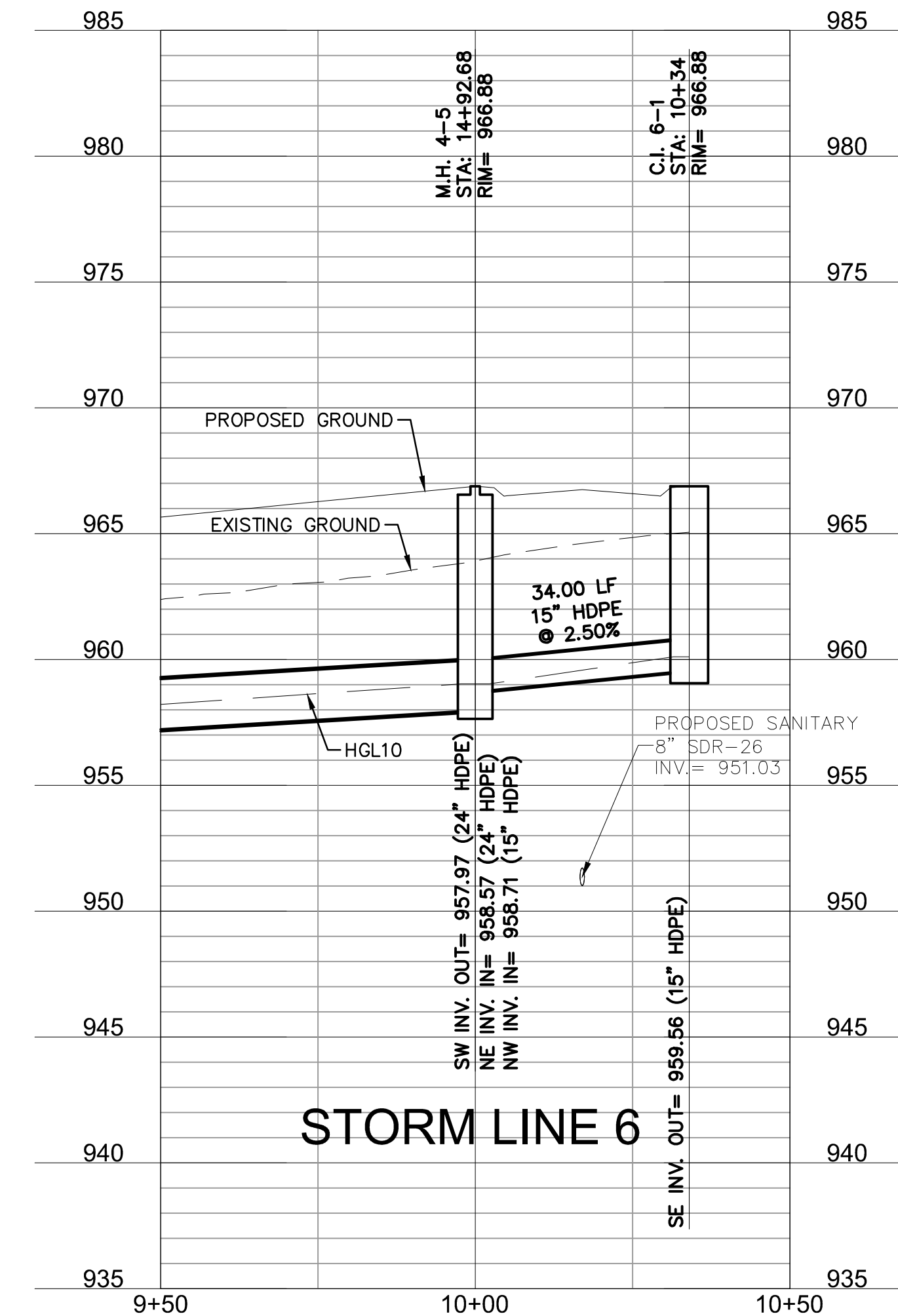
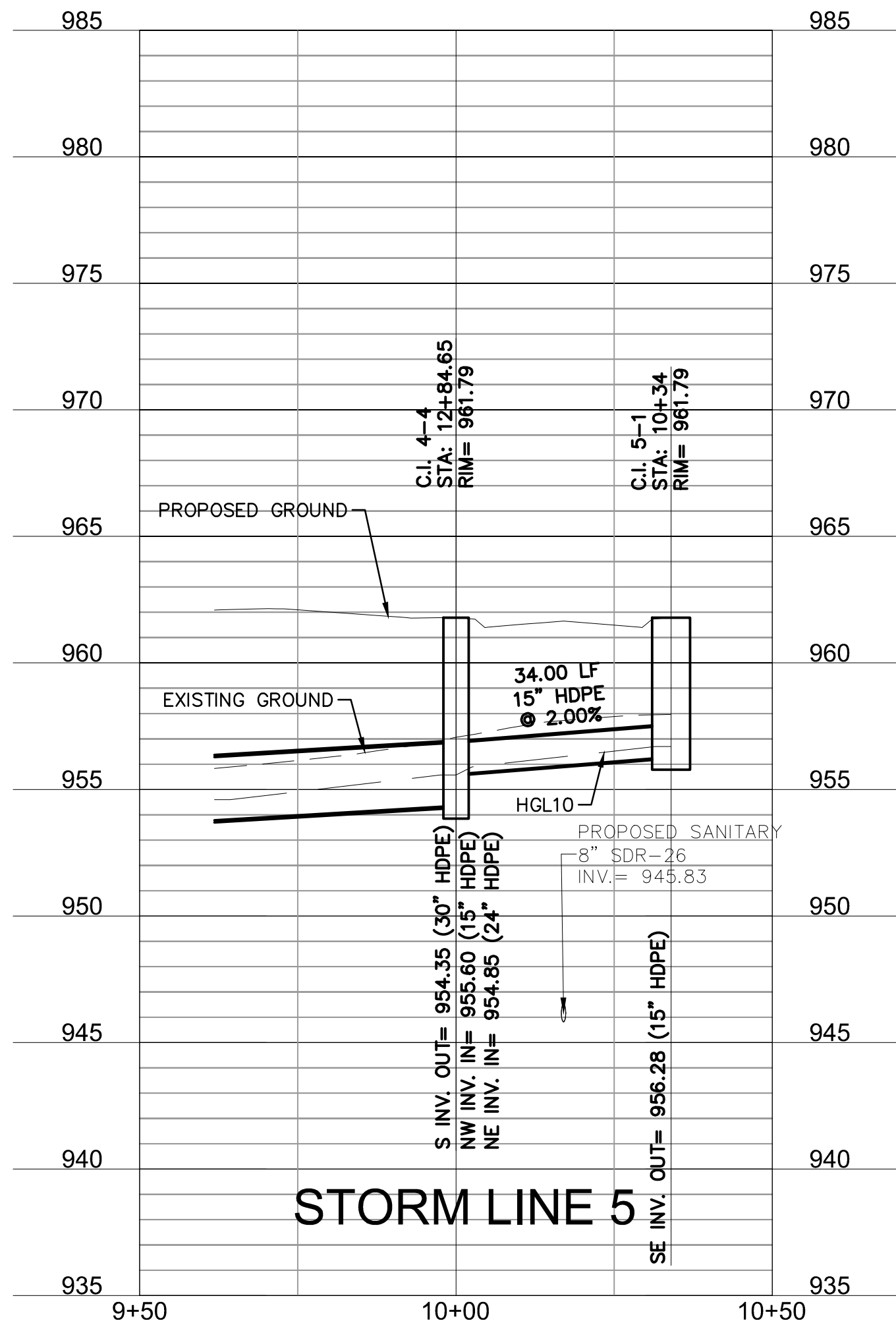
DWG: F:\2019\4001-4500\019-4061-40-Design\AutoCAD\Final Plans\Storm Plans\NC\_STM02\_0194061.dwg  
 DATE: Jun 29, 2020 6:53pm  
 USER: nheiser  
 XREFS: C:\PTBLK\_0194061\_34x22 C:\PBASE\_0194061 C:\PSTRM\_0194061 C:\PSURF\_0194061 C:\PUTIL\_0194061



Riprap Calculations							
End Section	Q <sub>100</sub> (cfs)	Pipe Diameter (ft)	Class*	D50* (in)	Apron Length (ft)	Apron Depth (ft)	Area (SY)
E.S. 8-1	5.56	1.25	1	5	5	1.46	3.0

\*Per Table 10.1 HEC 14-FHWA-Energy Dissipators Pg. 10-18

RELEASE FOR CONSTRUCTION  
 AS NOTED ON PLANS REVIEW  
 DEVELOPMENT SERVICES  
 LEE'S SUMMIT, MISSOURI  
 04/05/2021



**olsson**  
 Olsson - Civil Engineering  
 Missouri Certificate of Authority #001592  
 1301 Burlington Street  
 North Kansas City, MO 64116  
 TEL 816.361.1177  
 FAX 816.361.1888  
 www.olson.com

STATE OF MISSOURI  
 JULIE ELAINE SELLERS  
 LICENSE NUMBER  
 PE-2017000367  
 3/3/21  
 PROFESSIONAL ENGINEER

REV. NO.	DATE	REVISIONS DESCRIPTION
1	06/15/2020	REVISED PER CITY COMMENTS
2	06/25/2020	REVISED PER CITY COMMENTS

BY: \_\_\_\_\_

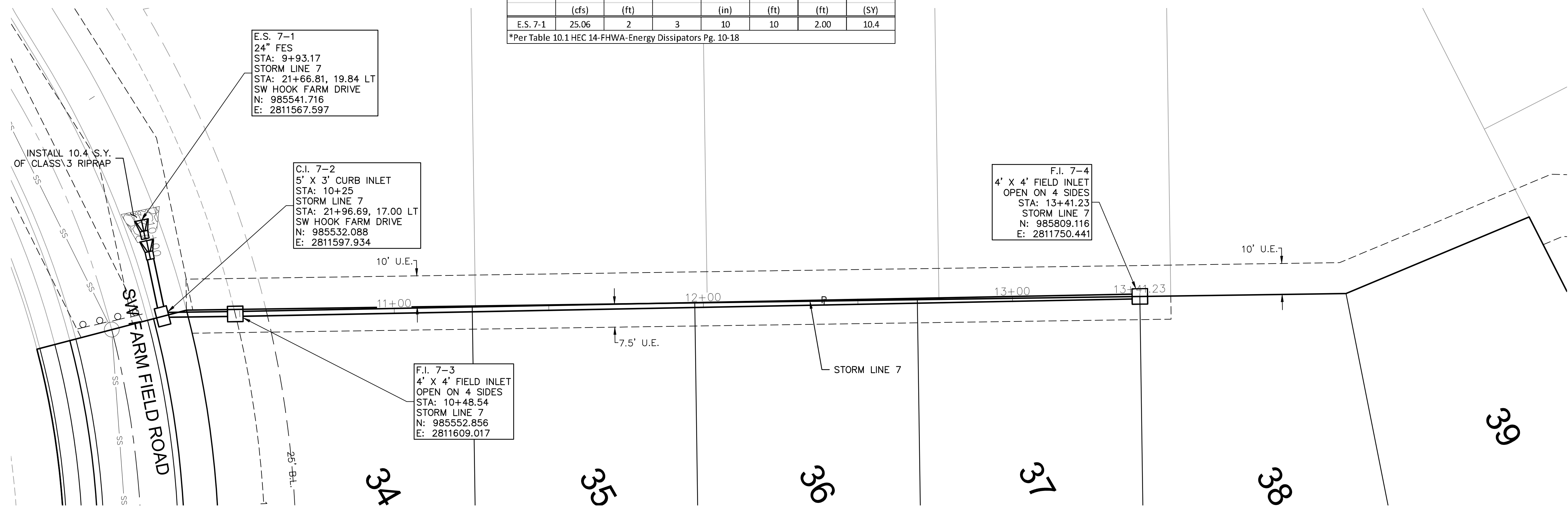
STORM SEWER PLAN & PROFILE (LINES 5, 6, & 8)  
 STREET AND STORM SEWER PLANS  
 HOOK FARMS  
 FIRST FLAT  
 LEE'S SUMMIT, MO

2020

drawn by: CGW  
 checked by: JES  
 approved by: NDH  
 QA/QC by: JES  
 project no.: 019-4061  
 drawing no.:  
 date: 04/20/2020

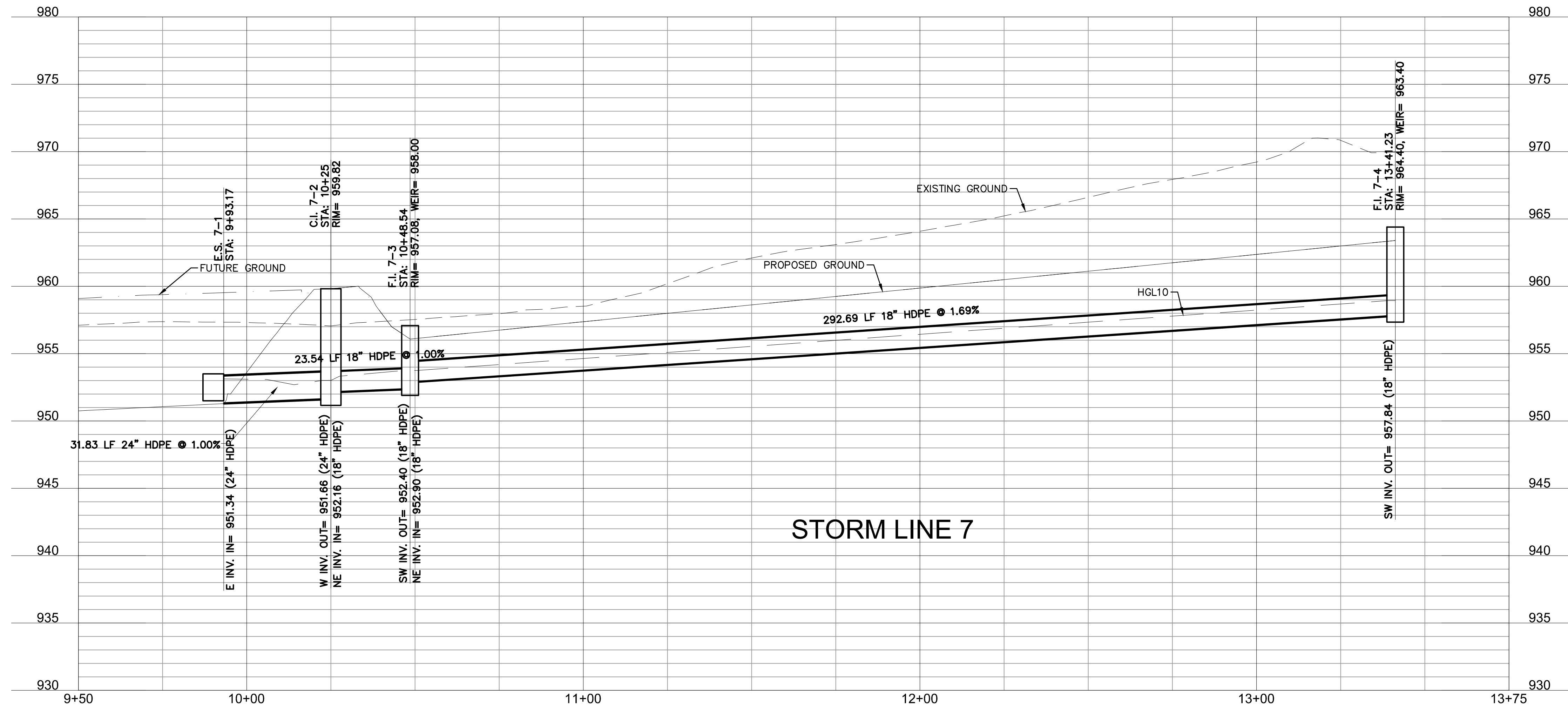
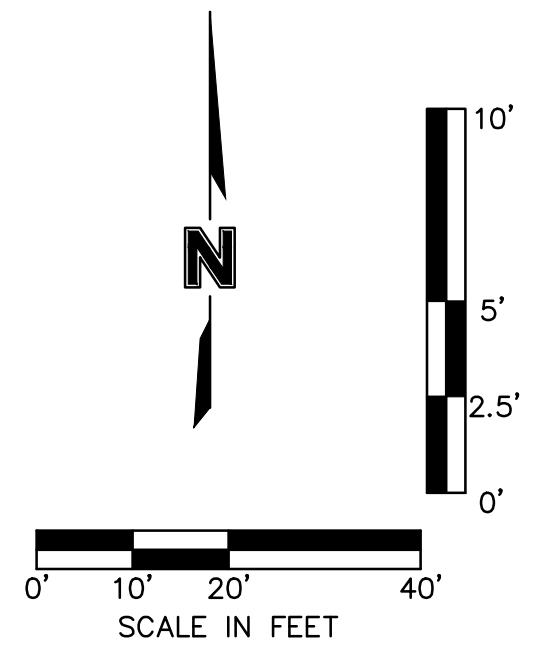
SHEET C135

DWG: F:\2019\4001-4500\019-4061-Design\AutoCAD\Final Plans\Storm Plans\STM02\_0194061.dwg USER: nheiser C:\PSURF\_0194061 C:\PUTIL\_0194061  
 DATE: Jun 29, 2020 6:53pm XREFS: C:\PTBLK\_0194061\_34x22 C:\XBASE\_0194061 C:\PBASE\_0194061 C:\PSTRM\_0194061 C:\PSURF\_0194061



Riprap Calculations							
End Section	Q <sub>100</sub> (cfs)	Pipe Diameter (ft)	Class*	D50* (in)	Apron Length (ft)	Apron Depth (ft)	Area (SY)
E.S. 7-1	25.06	2	3	10	10	2.00	10.4

\*Per Table 10.1 HEC 14-FHWA-Energy Dissipators Pg. 10-18



RELEASE FOR CONSTRUCTION  
AS NOTED ON PLANS REVIEW  
DEVELOPMENT SERVICES  
LEE'S SUMMIT, MISSOURI  
04/05/2021

Olsson - Civil Engineering  
Missouri Certificate of Authority #001592  
1301 Burlington Street  
North Kansas City, MO 64116  
TEL 816.361.1177  
FAX 816.361.1888  
www.olsson.com

JULIE ELAINE SELLERS  
NUMBER PE-2017000367  
3/3/21

REV. NO.	DATE	REVISIONS DESCRIPTION
1	06/15/2020	REVISED PER CITY COMMENTS
2	06/25/2020	REVISED PER CITY COMMENTS

STORM SEWER PLAN & PROFILE (LINE 7)  
STREET AND STORM SEWER PLANS

HOOK FARMS  
FIRST FLAT

LEE'S SUMMIT, MO

2020

REVISIONS

drawn by: CGW  
checked by: JES  
approved by: NDH  
QA/QC by: JES  
project no.: 019-4061  
drawing no.:  
date: 04/20/2020

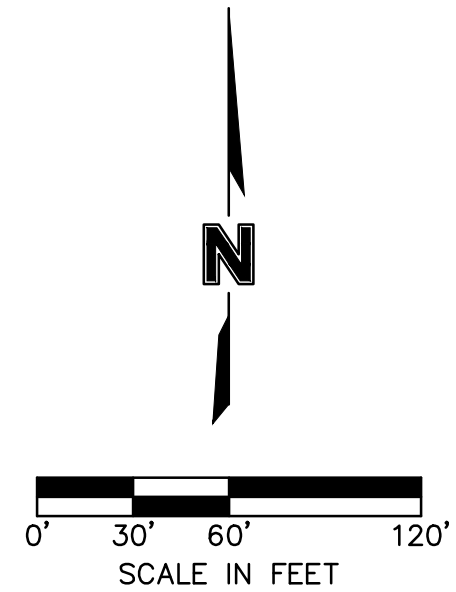
SHEET C136

DWG: F:\2019\4001-4500\019-4061\40-Design\AutoCAD\Final Plans\Storm Plans\NC\_STM03\_0194061.dwg  
 DATE: Nov 25, 2020 3:06pm  
 USER: nheiser  
 XREFS: C\_PTBULK\_0194061\_34x22 C\_PBNDY\_0194061 C\_XBASE\_0194061 C\_PUBITL\_0194061 C\_PSTRM\_0194061 C\_FBASE\_0194061

LEGEND	
—100—	FINISHED INDEX CONTOURS
-100-	FINISHED INTERMEDIATE CONTOURS
—	RIDGE LINE
A	DRAINAGE AREA
C	RUNOFF COEFFICIENT
C.I. 0-D	STORM STRUCTURE NUMBER

- NOTES:**
- MBOE – MINIMUM BUILDING OPENING ELEVATION
- NOTES:**
- INDIVIDUAL LOT OWNERS SHALL NOT CHANGE OR OBSTRUCT THE DRAINAGE FLOW LINES OR PATHS ON THE LOTS, AS SHOWN ON THE MASTER DRAINAGE PLAN, UNLESS SPECIFIC APPLICATION IS MADE AND APPROVED BY THE CITY ENGINEER.
  - PLAT IS LOCATION IN ZONE X, "AREAS OUTSIDE THE 1-PERCENT ANNUAL CHANCE FLOODPLAINS, AREAS OF 1-PERCENT ANNUAL CHANCE SHEET FLOW FLOODING WHERE THE AVERAGE DEPTHS ARE LESS THAN 1 FOOT, AREAS OF 1-PERCENT ANNUAL CHANCE STREAM FLOODING WHERE THE CONTRIBUTING DRAINAGE AREA IS LESS THAN 1 SQUARE MILE, OR AREAS PROTECTED FROM THE 1-PERCENT ANNUAL CHANCE FLOOD BY LEVEES. NO BASE FLOOD ELEVATIONS OR DEPTHS ARE SHOWN WITHIN THIS ZONE"
  - PLAT IS LOCATED OUTSIDE OF ANY REQUIRED BUFFER ZONES FOR NATURAL STREAMS.
  - MBOE ELEVATIONS HAVE BEEN PROVIDED AT EACH LOT CORNER. INTERPOLATION WILL BE ALLOWED BETWEEN THE RIGHT AND LEFT SIDE MBOE'S SHOWN ON THE MASTER DRAINAGE PLAN, DEPENDING ON THE LOCATION OF THE LOWEST OPENING ON THE PROPOSED STRUCTURE.
  - REFER TO SHEET C105-C109 FOR SWALE GRADING DETAILS.
  - DRAINAGE PATHS TO BE CONSTRUCTED BETWEEN EACH OF THE LOTS LABELED AS STANDARD LOTS TO DRAIN WEST.
  - NO BUILDING PERMITS WILL BE ISSUED UNTIL AN AS-GRADED MASTER DRAINAGE PLAN HAS BEEN SUBMITTED TO THE CITY AND APPROVED BY THE CITY.

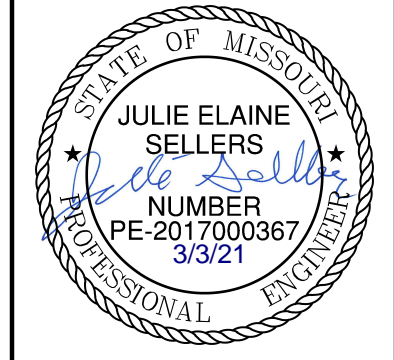
- BASEMENT TYPES**
- (S) STANDARD
  - (D) DAYLIGHT
  - (WO) WALK-OUT



RELEASE FOR CONSTRUCTION  
 AS NOTED ON PLANS REVIEW  
 DEVELOPMENT SERVICES  
 LEE'S SUMMIT, MISSOURI  
 04/05/2021

olsson

Olsson - Civil Engineering  
 Missouri Certificate of Authority #001592  
 1301 Burlington Street  
 North Kansas City, MO 64116  
 TEL 816.361.1177  
 FAX 816.361.7888  
 www.olsson.com



REV. NO.	DATE	REVISIONS DESCRIPTION
1	08/15/2020	REVISED PER CITY COMMENTS
2	08/25/2020	REVISED PER CITY COMMENTS
3	09/10/2020	REVISED PIPE INSULATION
4	10/01/2020	REVISED PER CITY COMMENTS
5	11/18/2020	REVISED LOTS 25-29 GRADING

**MASTER DRAINAGE PLAN  
 STREET AND STORM SEWER PLANS**

**HOOK FARMS  
 FIRST PLAT**

LEE'S SUMMIT, MO

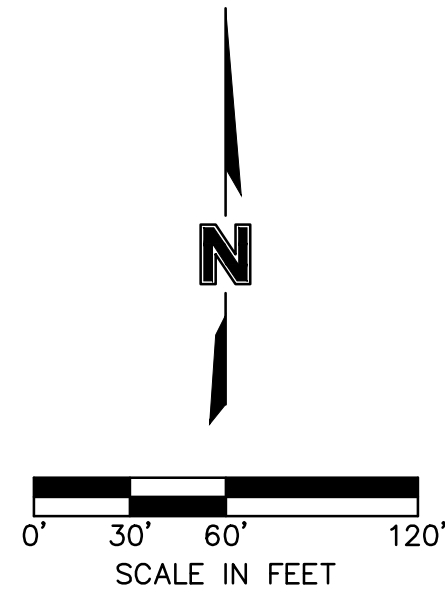
2020

drawn by: CGW  
 checked by: JES  
 approved by: NDH  
 QA/QC by: JES  
 project no.: 019-4061  
 drawing no.:  
 date: 04/20/2020

SHEET  
 C137

DWG: F:\2019\4001-4500\019-4061-40-Design\AutoCAD\Final Plans\Storm Plans\VC\_STM04\_0194061.dwg USER: nheiser C\_PSTRM\_0194061  
 DATE: Jun 30, 2020 7:14am XREFS: C\_P\BLK\_0194061\_34x22 C\_P\BASE\_0194061 C\_P\UTIL\_0194061 C\_P\FBASE\_0194061

LEGEND	
— 100	FINISHED INDEX CONTOURS
- - - 100	FINISHED INTERMEDIATE CONTOURS
—	RIDGE LINE
A	DRAINAGE AREA
C	RUNOFF COEFFICIENT
C.I. 0-0	STORM STRUCTURE NUMBER



**RELEASE FOR CONSTRUCTION**  
 AS NOTED ON PLANS REVIEW  
 DEVELOPMENT SERVICES  
 LEE'S SUMMIT, MISSOURI  
 04/05/2021

**olsson**

Olsson - Civil Engineering  
 Missouri Certificate of Authority #001592  
 1301 Burlington Street  
 North Kansas City, MO 64116  
 TEL 816.361.1177  
 FAX 816.361.1888  
 www.olson.com

STATE OF MISSOURI  
 JULIE ELAINE SELLERS  
 NUMBER PE-2017000367  
 3/3/21  
 PROFESSIONAL ENGINEER

REV. NO.	DATE	REVISIONS DESCRIPTION
1	08/15/2020	REVISED PER CITY COMMENTS
2	06/25/2020	REVISED PER CITY COMMENTS

**DRAINAGE PLAN**  
**STREET AND STORM SEWER PLANS**

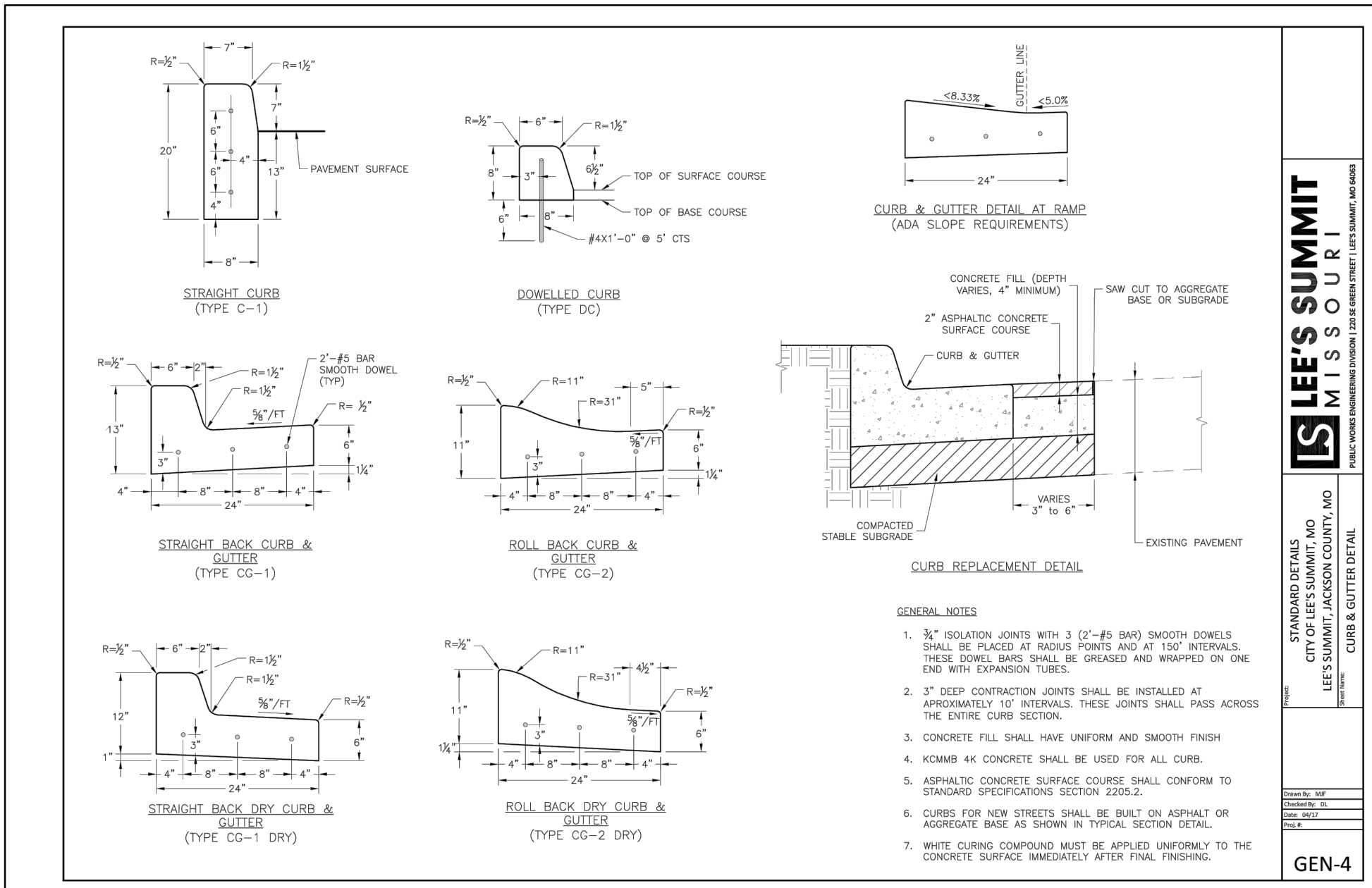
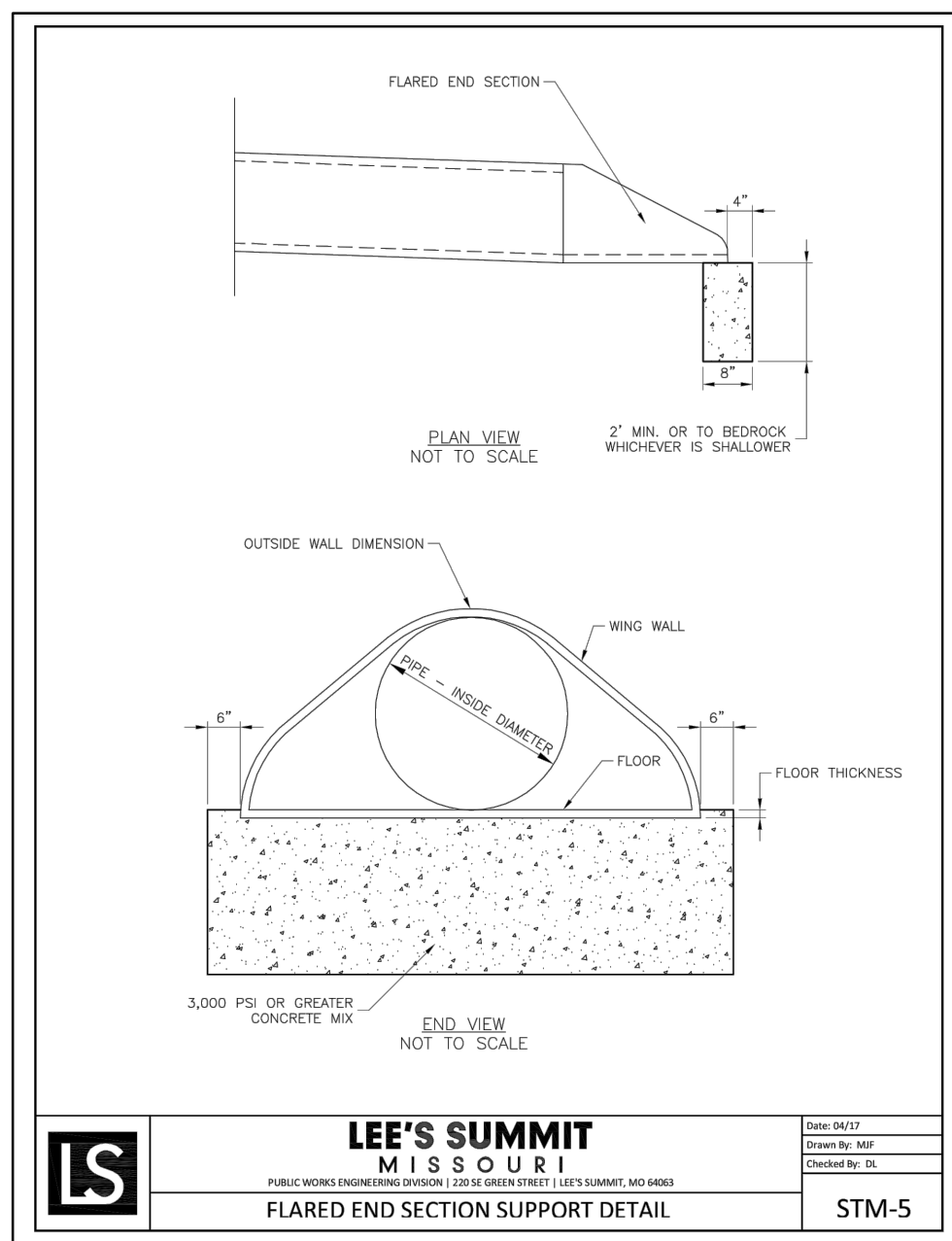
**HOOK FARMS**  
**FIRST FLAT**

LEE'S SUMMIT, MO 2020

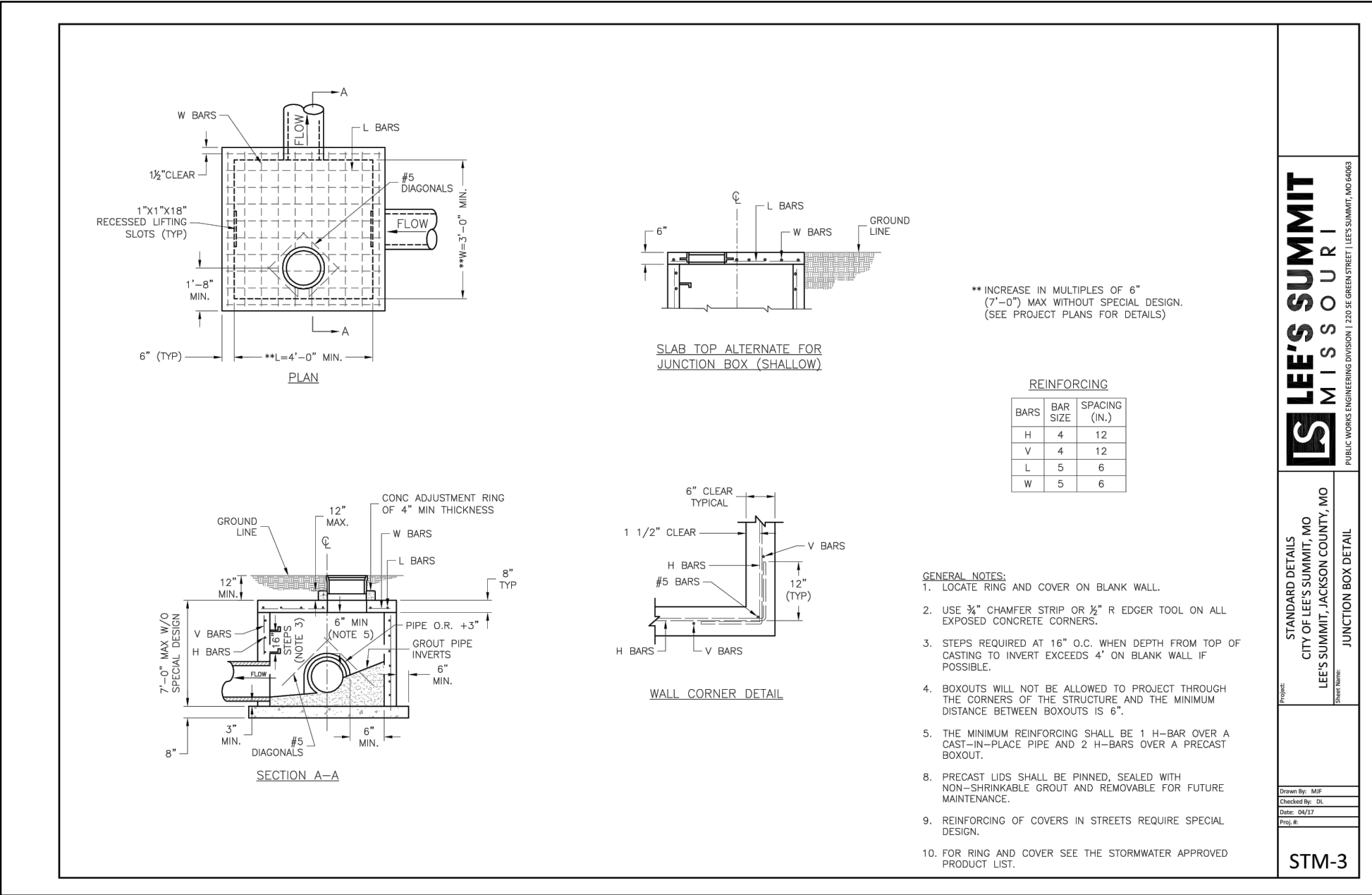
drawn by: CGW  
 checked by: JES  
 approved by: NDH  
 QA/QC by: JES  
 project no.: 019-4061  
 drawing no.:  
 date: 04/20/2020

**SHEET C138**

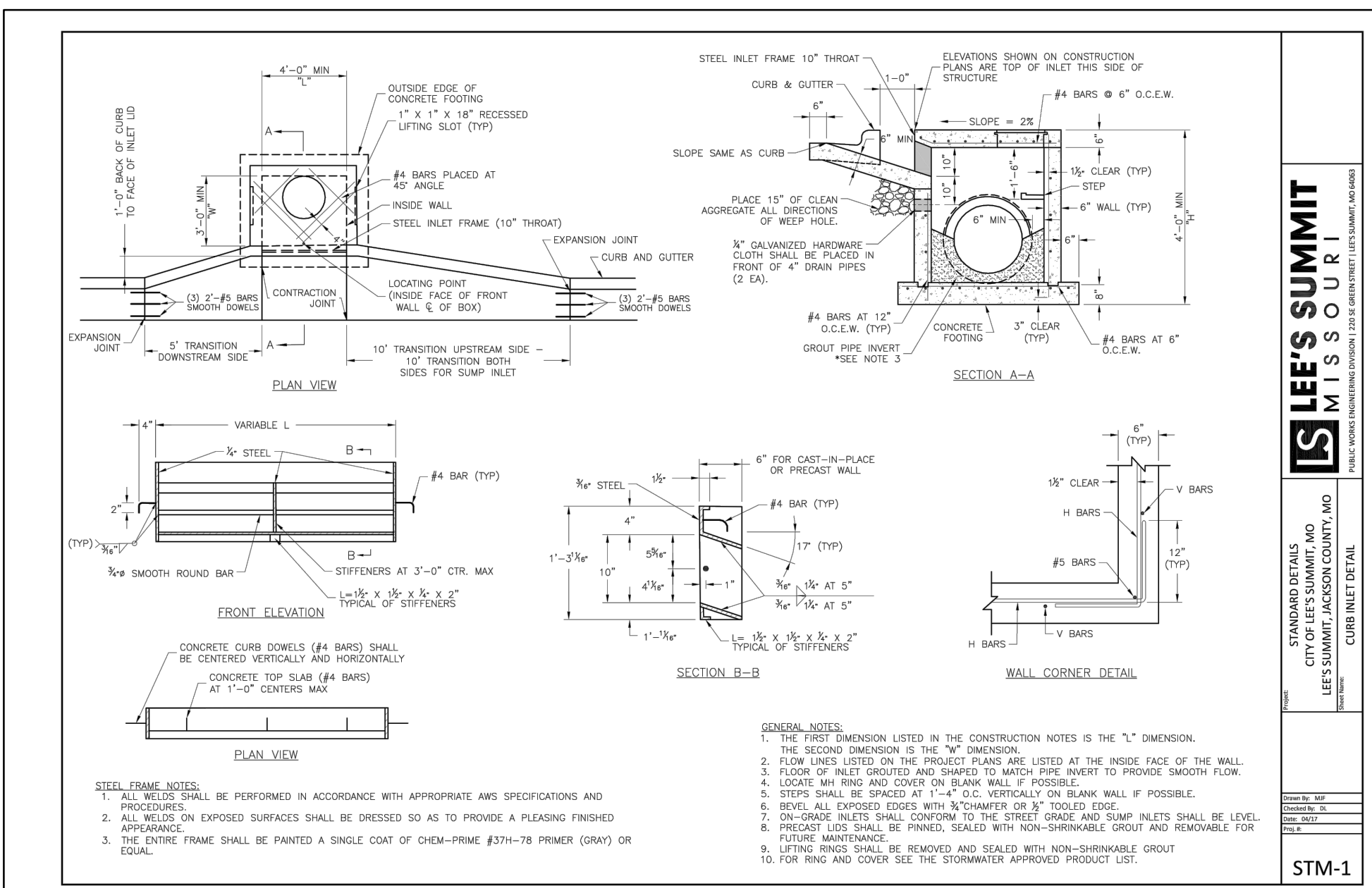




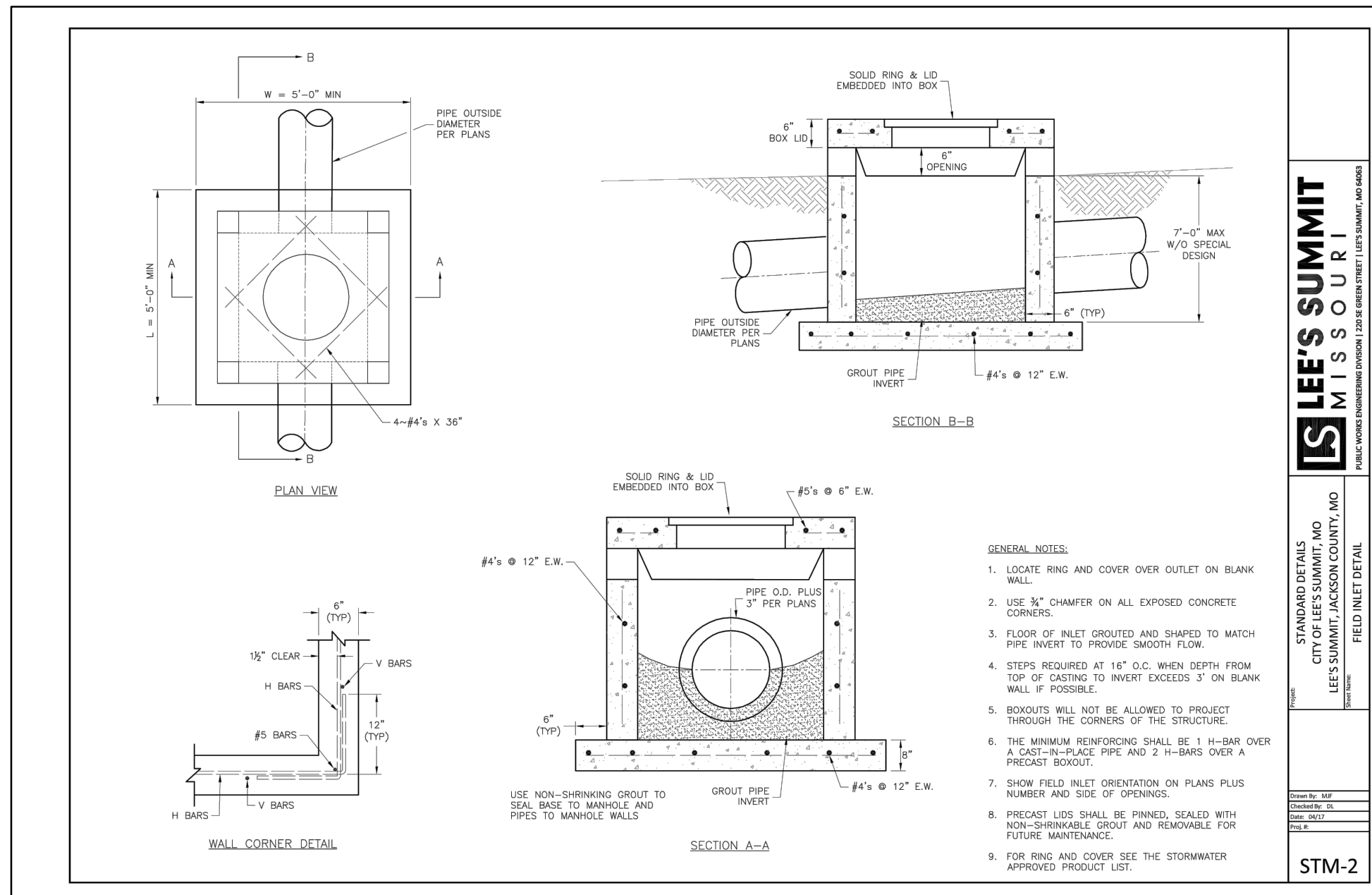
**LEE'S SUMMIT MISSOURI**  
 STANDARD DETAILS  
 CITY OF LEE'S SUMMIT, MO  
 LEE'S SUMMIT, JACKSON COUNTY, MO  
 CURB & GUTTER DETAIL  
 GEN-4



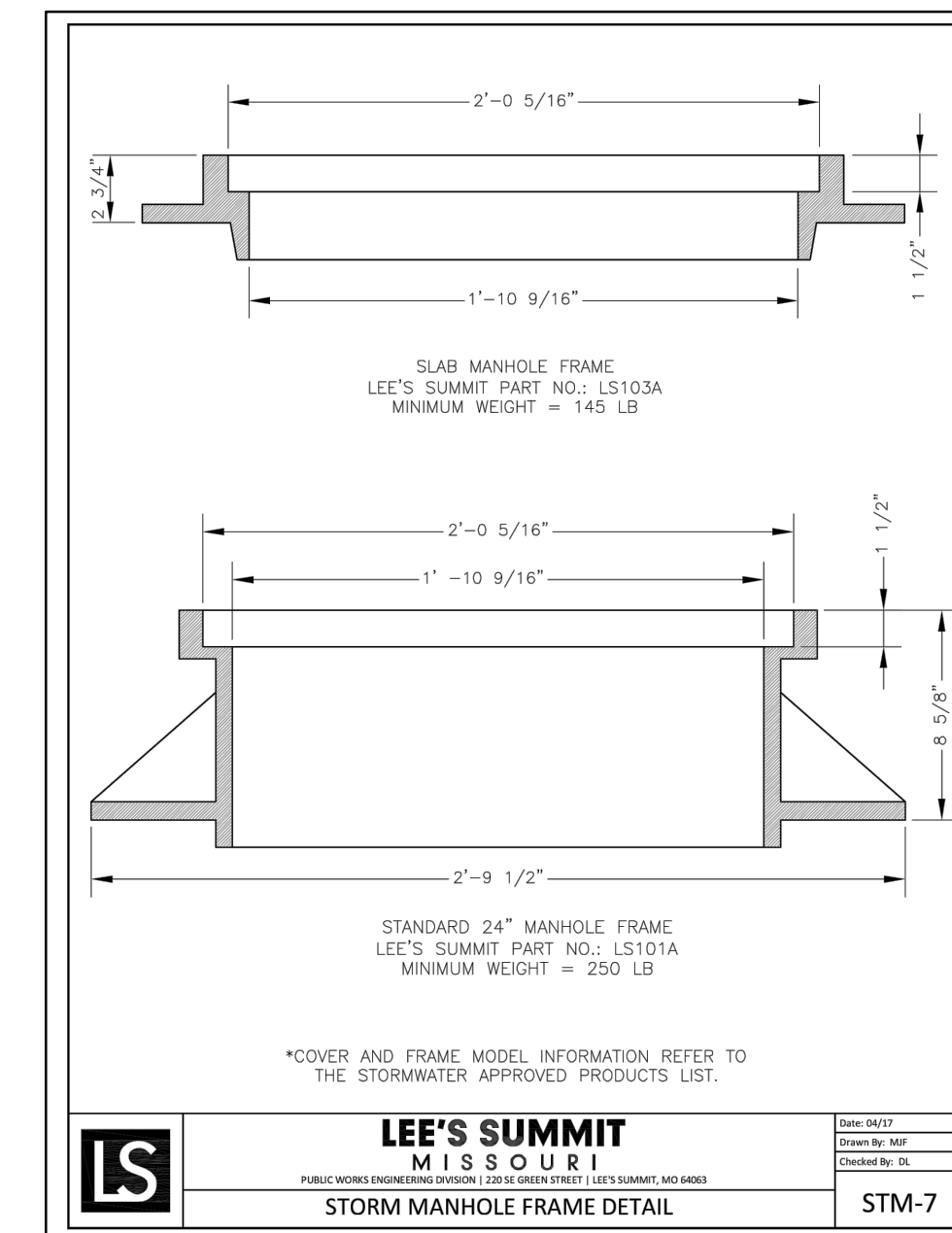
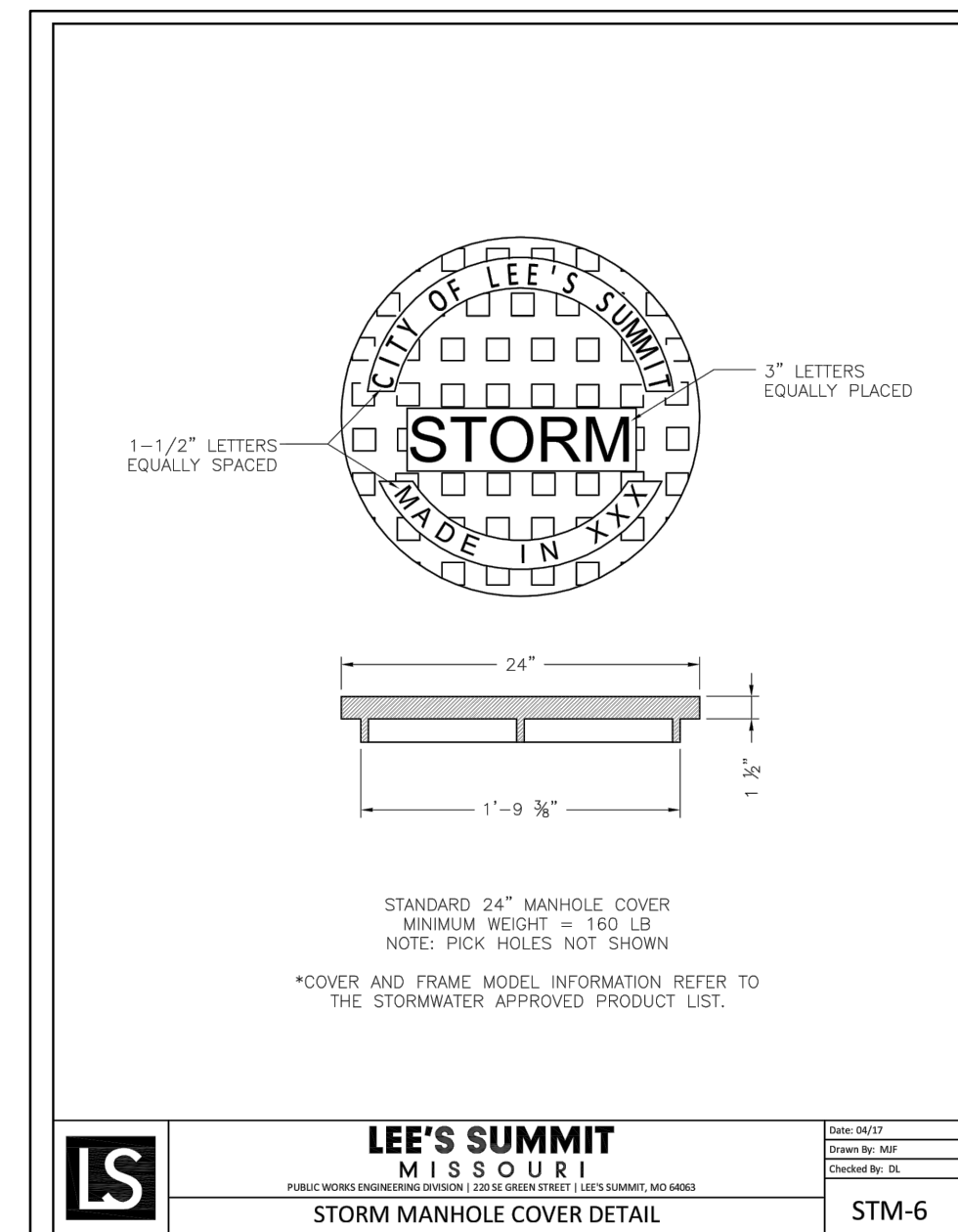
**LEE'S SUMMIT MISSOURI**  
 STANDARD DETAILS  
 CITY OF LEE'S SUMMIT, MO  
 LEE'S SUMMIT, JACKSON COUNTY, MO  
 JUNCTION BOX DETAIL  
 STM-3



**LEE'S SUMMIT MISSOURI**  
 STANDARD DETAILS  
 CITY OF LEE'S SUMMIT, MO  
 LEE'S SUMMIT, JACKSON COUNTY, MO  
 CURB INLET DETAIL  
 STM-1



**LEE'S SUMMIT MISSOURI**  
 STANDARD DETAILS  
 CITY OF LEE'S SUMMIT, MO  
 LEE'S SUMMIT, JACKSON COUNTY, MO  
 FIELD INLET DETAIL  
 STM-2



**LEE'S SUMMIT MISSOURI**  
 STANDARD DETAILS  
 CITY OF LEE'S SUMMIT, MO  
 LEE'S SUMMIT, JACKSON COUNTY, MO  
 SLAB MANHOLE FRAME  
 STANDARD 24" MANHOLE FRAME  
 STM-7



**LEE'S SUMMIT MISSOURI**  
 STANDARD DETAILS  
 CITY OF LEE'S SUMMIT, MO  
 LEE'S SUMMIT, JACKSON COUNTY, MO  
 FLARED END SECTION SUPPORT DETAIL  
 STM-5

**olsson**  
 Olsson - Civil Engineering  
 Missouri Certificate of Authority #001592  
 1301 Burlington Street  
 North Kansas City, MO 64116  
 TEL 816.361.1177  
 FAX 816.361.1888  
 www.olson.com

**JULIE ELAINE SELLERS**  
 MISSOURI PROFESSIONAL ENGINEER  
 NUMBER PE-2017000367  
 3/3/21

REV. NO.	DATE	REVISIONS DESCRIPTION
1	08/15/2020	REVISED PER CITY COMMENTS
2	08/25/2020	REVISED PER CITY COMMENTS

**STORM DETAILS**  
**STREET AND STORM SEWER PLANS**  
**HOOK FARMS**  
**FIRST FLAT**  
 LEE'S SUMMIT, MO  
 2020

drawn by: CGW  
 checked by: JES  
 approved by: NDH  
 QA/QC by: JES  
 project no.: 019-4061  
 drawing no.:  
 date: 04/20/2020

**RELEASE FOR CONSTRUCTION**  
 AS NOTED ON PLANS REVIEW  
 DEVELOPMENT SERVICES  
 LEE'S SUMMIT, MISSOURI  
 04/05/2021