

Final Development Plan

100 NE Douglas Street

Section 6, Township 47 North, Range 31 West

Lee's Summit, Jackson County, Missouri

INDEX OF SHEETS:

- C.001 ~ COVER SHEET
- C.050 ~ ESC PHASE 1 - PRE CLEARING PLAN
- C.051 ~ ESC PHASE 2 - INACTIVE AREA STABILIZATION PLAN
- C.052 ~ ESC PHASE 3 - FINAL RESTORATION PLAN
- C.053 ~ ESC - STANDARD DETAILS
- C.100 ~ SITE PLAN
- C.200 ~ GRADING PLAN
- C.300 ~ UTILITY PLAN
- C.301 ~ STORM SEWER PLAN AND PROFILE
- L.100 ~ LANDSCAPE PLAN
- L.101 ~ LANDSCAPE PLAN DETAILS

PROPERTY DESCRIPTION

ALL PAVING ON THE PRIVATE PARKING LOT WILL COMPLY WITH THE UNIFIED DEVELOPMENT ORDINANCE ARTICLE 8 IN TERMS OF PAVING THICKNESS AND BASE.

OIL - GAS WELLS
 ACCORDING TO EDWARD ALTON MAY JR'S ENVIRONMENTAL IMPACT STUDY OF ABANDONED OIL AND GAS WELLS IN LEE'S SUMMIT, MISSOURI IN 1995, THERE ARE NOT OIL AND GAS WELLS WITHIN 185 FEET OF THE PROPERTY AS SURVEYED HEREON.

SURVEY AND PLAT NOTES:
 THE SUBJECT PROPERTY SURVEYED LIES WITHIN A FLOOD ZONE DESIGNATED ZONE (X), AREAS LOCATED OUTSIDE THE 100 YEAR FLOOD PLAIN, PER F.E.M.A. MAP, COMMUNITY PANEL NO. 29095C0417G EFFECTIVE DATE: JANUARY 20, 2017.

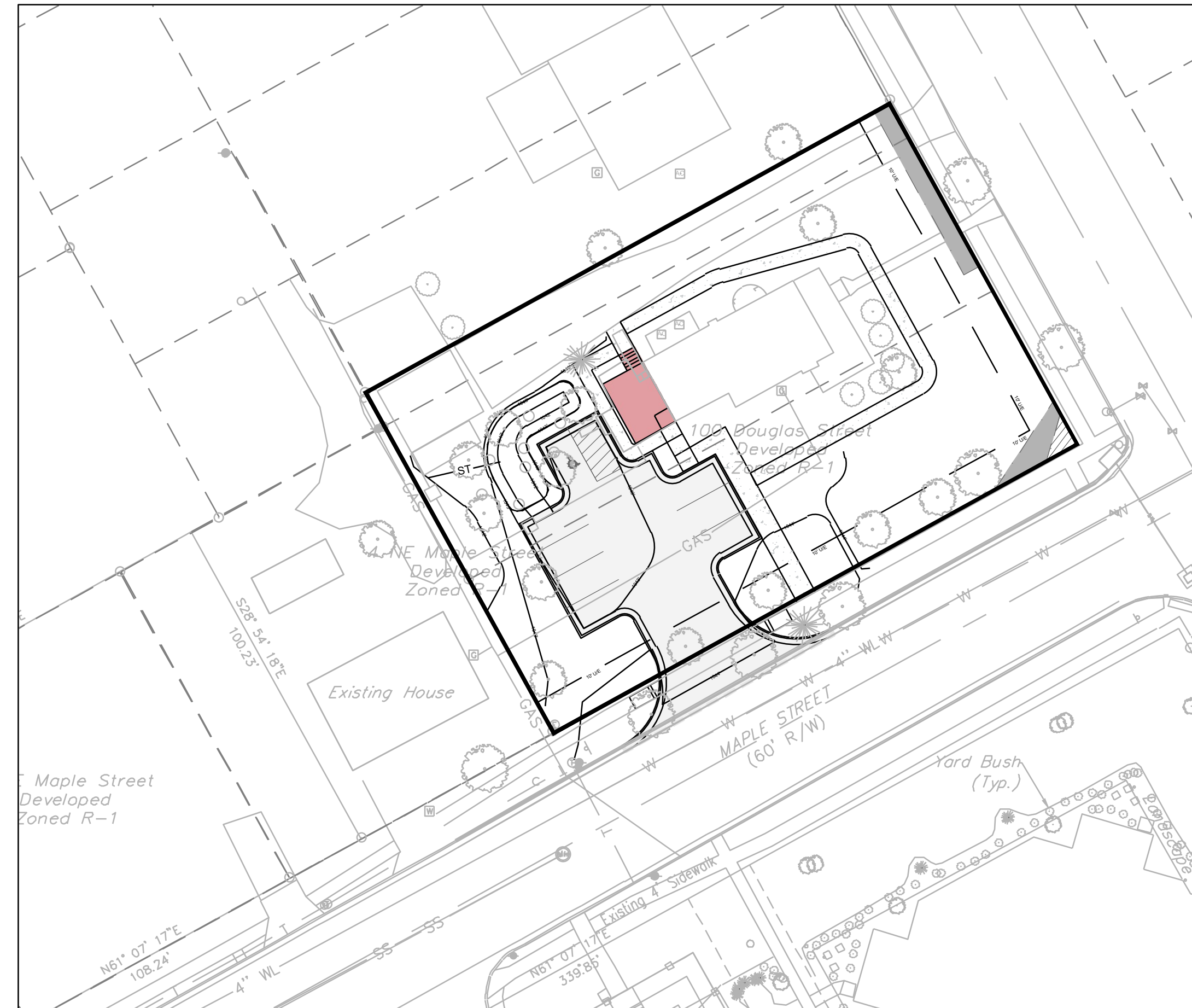
UTILITY COMPANIES:

THE FOLLOWING LIST OF UTILITY COMPANIES IS PROVIDED FOR INFORMATION ONLY. WE DO NOT OFFER ANY GUARANTEE OR WARRANTY THAT THIS LIST IS COMPLETE OR ACCURATE. THE CONTRACTOR SHALL BE RESPONSIBLE FOR CONTACTING ALL UTILITY COMPANIES THAT MAY BE AFFECTED BY THE PROPOSED CONSTRUCTION AND VERIFYING THE ACTUAL LOCATION OF EACH UTILITY LINE. THE CONTRACTOR SHALL NOTIFY ENGINEERING SOLUTIONS AT 816.623.9888 OF ANY CONFLICT WITH PROPOSED IMPROVEMENTS.

- EVERGY - 298-1196
- MISSOURI GAS ENERGY - 796-5261
- SOUTHWESTERN BELL TELEPHONE - 761-5011
- COMCAST CABLE - 795-1100
- WILLIAMS PIPELINE - 422-6300
- CITY OF LEE'S SUMMIT PUBLIC WORKS - 969-1800
- CITY OF LEE'S SUMMIT PUBLIC WORKS INSPECTIONS - 969-1800
- CITY OF LEE'S SUMMIT WATER UTILITIES - 969-1900
- MISSOURI ONE CALL (DIG RITE) - 1-800-344-7483

GENERAL NOTES:

- 1 - ALL CONSTRUCTION SHALL CONFORM TO THE CITY OF LEE'S SUMMIT DESIGN AND CONSTRUCTION MANUAL AS ADOPTED BY ORDINANCE 5813.
- 2 - ALL REQUIRED EASEMENTS WITHIN THE BOUNDARY OF THIS PROJECT SHALL BE PROVIDED BY SEPARATE DOCUMENT.
- 3 - ANY REQUIRED EASEMENT LOCATED OUTSIDE OF THE BOUNDARY OF THIS PROJECT SHALL BE PROVIDED FOR BY SEPARATE INSTRUMENT PRIOR TO ISSUANCE OF CONSTRUCTION PERMITS.
- 4 - THE CONTRACTOR SHALL CONTACT THE CITY'S DEVELOPMENT SERVICES ENGINEERING INSPECTORS 48 HOURS PRIOR TO ANY LAND DISTURBANCE WORK AT (816) 969-1200.
- 5 - THE CONTRACTOR SHALL NOTIFY ENGINEERING SOLUTIONS AT 816.623.9888 OF ANY CONFLICT WITH THE IMPROVEMENTS PROPOSED BY THESE PLANS AND SITE CONDITIONS.
- 6 - THE CONTRACTOR SHALL NOTIFY THE CITY ENGINEER AND OBTAIN THE APPROPRIATE BLASTING PERMITS FOR A REQUIRED BLASTING. IF BLASTING IS ALLOWED, ALL BLASTING SHALL CONFORM TO STATE REGULATIONS AND LOCAL ORDINANCES.



Land Use Schedule

a. Total floor area	1,102 sq. ft.
b. Number of dwelling units	N/A
c. Land area	18,948.60 sq. ft. 0.44 acres
d. Number of required and proposed parking spaces	7 Standard / 1 Handicap 7 Standard / 1 Handicap
e. Impervious coverage	4,262 sq. ft.
Parking/Sidewalk	1,102 sq. ft.
Building	5,364 sq. ft. (28.3% of Site)
f. Floor Area Ratio (FAR)	5.8%
g. Dwelling units per acre, with and without common area:	N/A
h. The range of land uses to be permitted in each designated area of the development.	Office

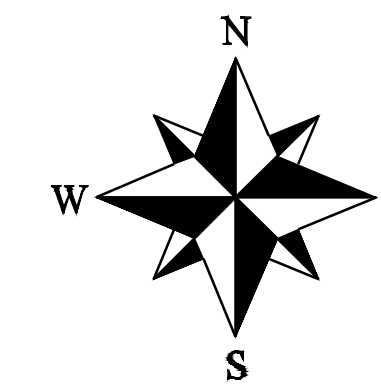
REVISD ZONING TO TNZ.

Current Zoning: TNZ

Sanitary Sewer Service
 Existing Sanitary Sewer service from south of property.

Water Service
 Existing Service from south of property.

Storm Sewer
 New storm line and detention.



SITE LOCATION MAP

SCALE" 1"=30'

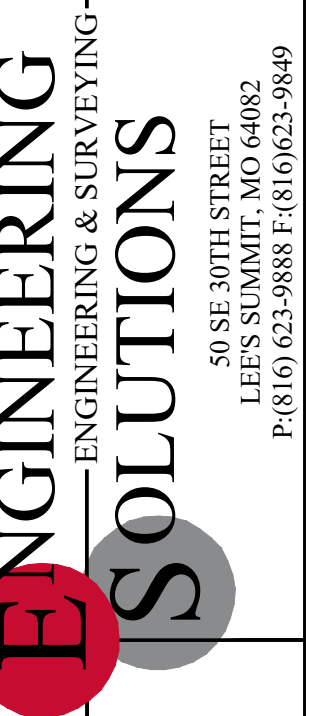


Summary of Quantities:

ITEM AND DESCRIPTION	UNIT	ESTIMATED QUANTITY
GEOGRID	S.Y.	432.00
MoDOT Type 5 Base	S.Y.	432.00
ASPHALT PAVING	S.Y.	336.00
CURBING	FT	280.00
CLEARING, GRADING & GRUBBING	LS	1
SILT FENCE	FT	425.00
INLET PROTECTION	UNIT	-
SEEDING / MULCHING/ FERTILIZING	AC	0.20
PRIVATE SIDEWALK	S.F.	808.00
ADA SIDEWALK RAMP	UNIT	2

LEGEND:

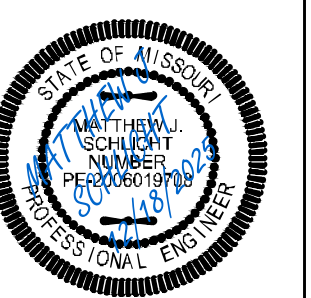
Existing Underground Power	—UGP—	—UGP—
Existing Conc. Curb & Gutter	=====	
Existing Wood Fence	—X—	—X—
Existing Gas Main	—GAS—	—GAS—
Existing Water Main	-X-W/M-	-X-W/M-
Existing Storm Sewer	-X-STM-	-X-STM-
Existing Sanitary Sewer	-X-SAN-	-X-SAN-
Existing Underground Telephone	—UGT—	—UGT—
Existing Overhead Power	—OHE—	
Proposed Storm Sewer	—ST—	—ST—
Proposed Sanitary Sewer	—SS—	—SS—
Proposed Underground Power	—UGT—	—UGT—
Proposed Gas Service	—GAS—	
Proposed B" D.I.P. Water	—W—	
Proposed Electrical Service	—UGP—	—UGP—



Professional Registration
 Missouri
 Engineering 2005002186-D
 Surveying 2005008318-D
 Kansas
 Engineering E-1695
 Surveying LS-218
 Oklahoma
 Engineering 6254
 Nebraska
 Engineering CA2821

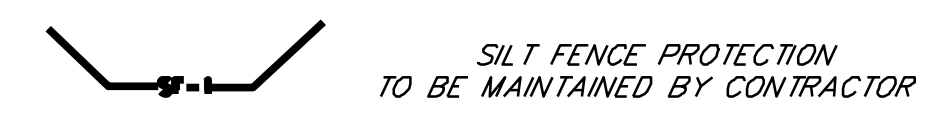
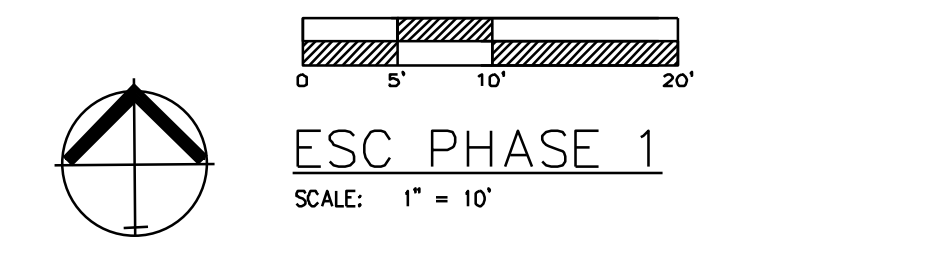
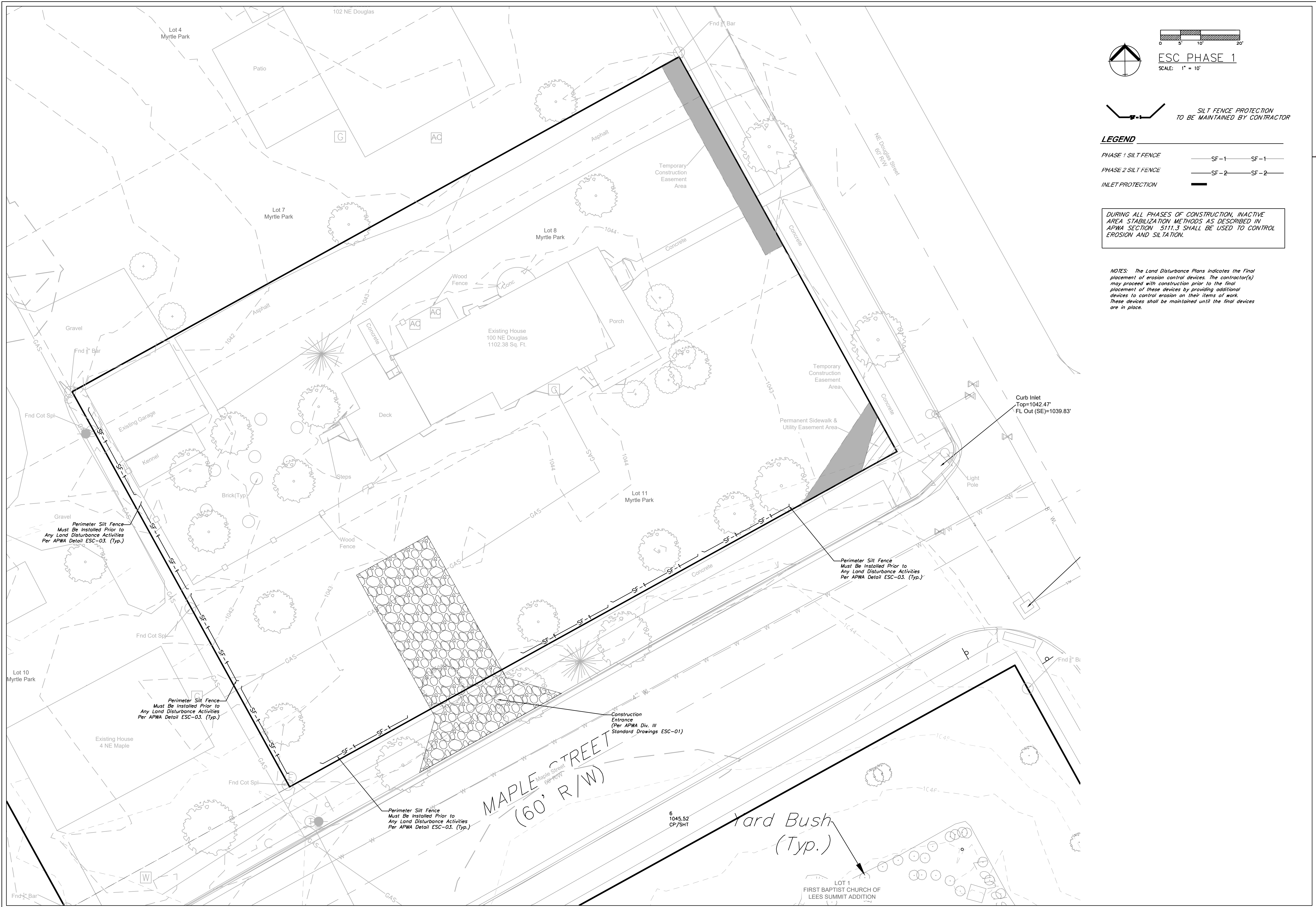
Project: 100 NE DOUGLAS STREET
 Issue Date: June 24, 2025
 Lee's Summit, Jackson County, Missouri

COVER SHEET
 Final Development Plans for:
 100 NE DOUGLAS STREET
 Lee's Summit, Jackson County, Missouri



Matthew J. Schlicht
 MO PE 2006019708
 KS PE 19071
 OK PE 25228
 NE PE E-14335

REVISIONS
 REV. 12/18/2025



LEGEND

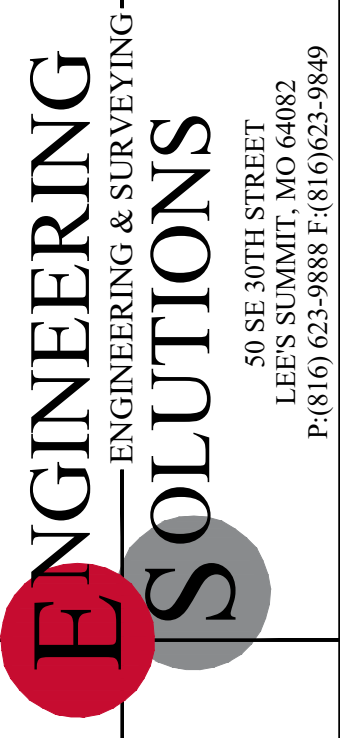
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PHASE 2 SILT FENCE — SF-2 — SF-2 —

INLET PROTECTION —————

DURING ALL PHASES OF CONSTRUCTION, INACTIVE AREA STABILIZATION METHODS AS DESCRIBED IN APWA SECTION 5111.3 SHALL BE USED TO CONTROL EROSION AND SILTATION.

NOTES: The Land Disturbance Plans indicates the final placement of erosion control devices. The contractor(s) may proceed with construction prior to the final placement of these devices by providing additional devices to control erosion on their items of work. These devices shall be maintained until the final devices are in place.



Professional Registration
 Missouri
 Engineering 200502186-D
 Surveying 200503318-D
 Kansas
 Engineering E-1695
 Surveying LS-218
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 Nebraska
 Engineering CA2821

Project: 100 NE DOUGLAS STREET
 LSMD
 Issue Date: June 24, 2025

ESC PHASE 1 - Pre Clearing Plan
 Final Development Plans for:
 100 NE DOUGLAS STREET
 Lee's Summit, Jackson County, Missouri

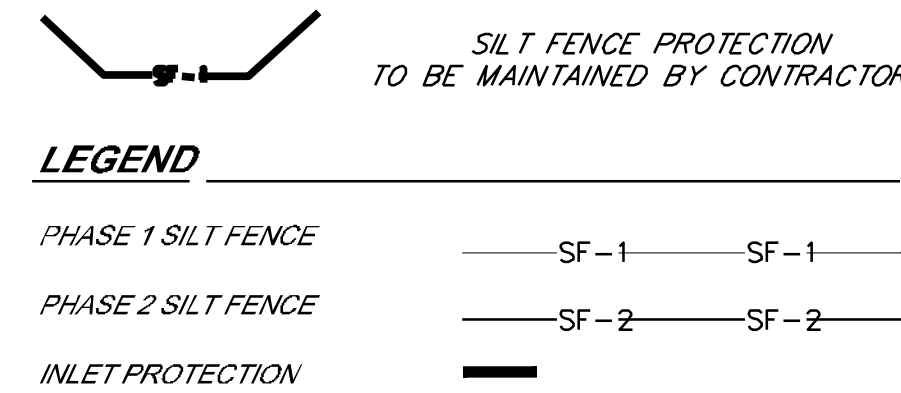
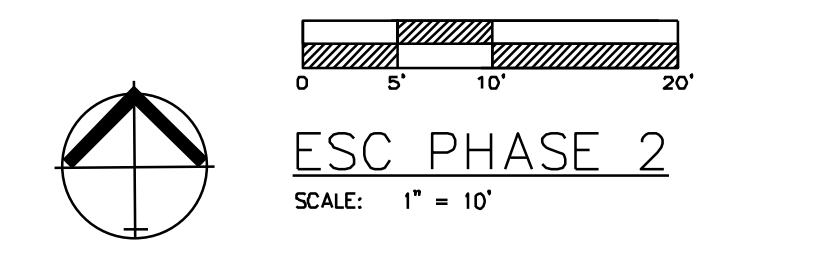
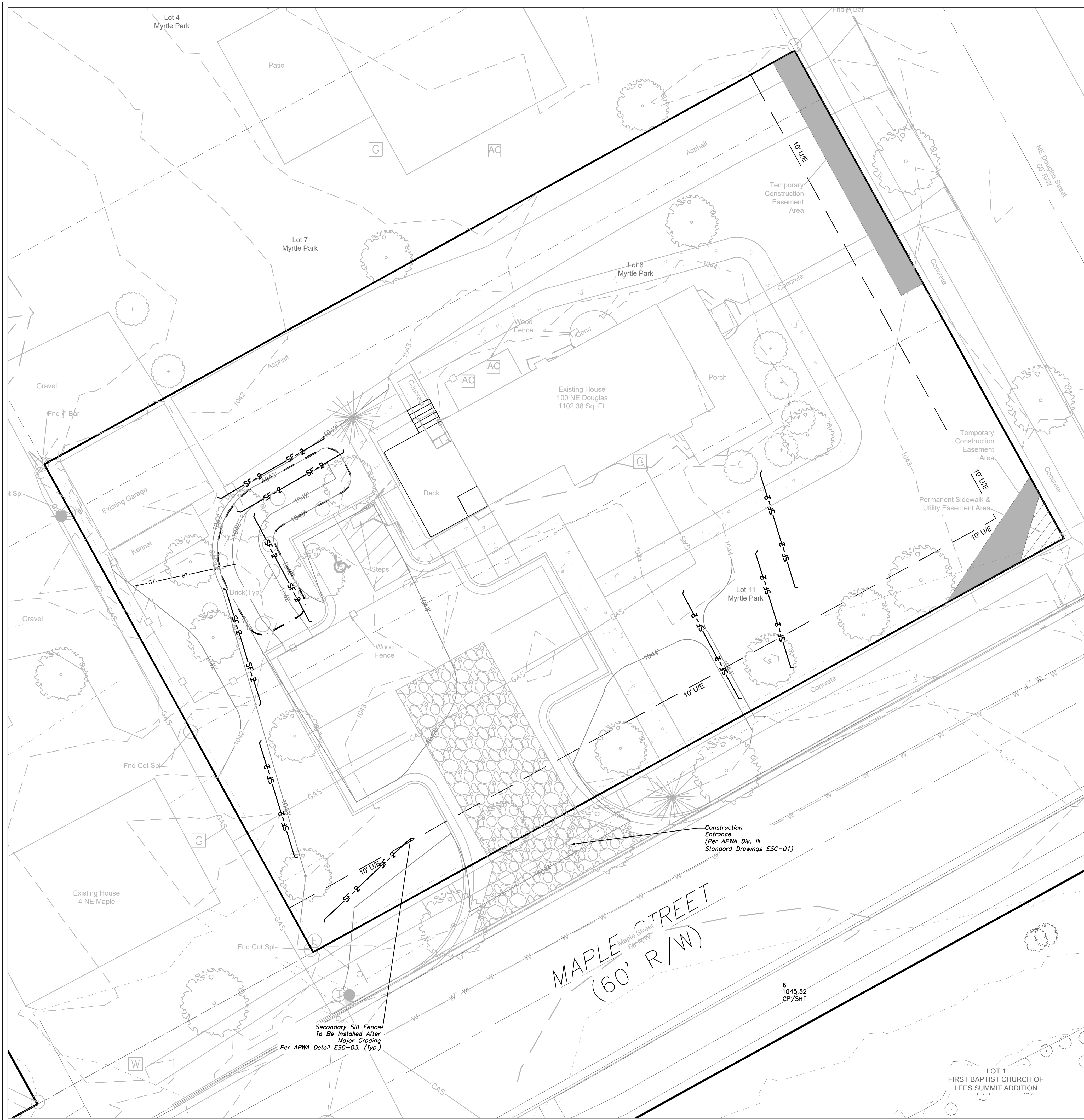
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DURING ALL PHASES OF CONSTRUCTION, INACTIVE AREA STABILIZATION METHODS AS DESCRIBED IN APWA SECTION 5111.3 SHALL BE USED TO CONTROL EROSION AND SILTATION.

NOTES: The Land Disturbance Plans indicates the final placement of erosion control devices. The contractor(s) may proceed with construction prior to the final placement of these devices by providing additional devices to control erosion on their items of work. These devices shall be maintained until the final devices are in place.

EROSION CONTROL DESCRIPTION:

- 1.) SILT FENCE SHALL BE PLACED AT THE PERIMETER OF THE GRADING AND AT INTERMEDIATE AREAS THROUGHOUT THE SITE AS SHOWN ON THE PLAN. INLET SEDIMENT TRAPS SHALL BE PLACED SURROUNDING ALL STORM INLETS.
- 2.) INSTALL TEMPORARY CONSTRUCTION ENTRANCE AS SHOWN ON PLAN.

EROSION CONTROL PROCEDURE:

- 1.) SILT FENCE AND TEMPORARY CONSTRUCTION ENTRANCE SHALL BE INSTALLED AT THE PERIMETER OF THE GRADED AREAS PRIOR TO BEGINNING OF CLEARING OR DEMOLITION OPERATIONS. THE CONTRACTOR SHALL INSTALL SILT FENCE AS SHOWN ON PLANS AS GRADING PROGRESSES.

TEMPORARY CONSTRUCTION ENTRANCE NOTES:

- A.) INSTALLATION**
- 1.) AVOID LOCATING ON STEEP SLOPES OR AT CURVES ON PUBLIC STREETS. IF POSSIBLE, LOCATE WHERE PERMANENT ROADS WILL EVENTUALLY BE CONSTRUCTED.
 - 2.) REMOVE ALL VEGETATION AND OTHER UNSUITABLE MATERIAL FROM THE FOUNDATION AREA, GRADE AND CROWN FOR POSITIVE DRAINAGE.
 - 3.) IF SLOPE TOWARDS THE PUBLIC ROAD EXCEEDS 2% CONSTRUCT A 8 TO 8 INCH HIGH RIDGE WITH 3H: 1V SIDE SLOPES ACROSS THE FOUNDATION APPROXIMATELY 15 FEET FROM THE EDGE OF THE PUBLIC ROAD TO DIVERT RUNOFF AWAY FROM IT.
 - 4.) INSTALL PIPE UNDER THE ENTRANCE IF NEEDED TO MAINTAIN DRAINAGE DITCHES ALONG PUBLIC ROADS.
 - 5.) PLACE STONE TO DIMENSIONS AND GRADES AS SHOWN ON PLANS. LEAVE SURFACE SMOOTH AND SLOPED FOR DRAINAGE.
 - 6.) DIVERT ALL SURFACE RUNOFF AND DRAINAGE FROM THE ENTRANCE TO A SEDIMENT CONTROL DEVICE.
 - 7.) IF WET CONDITIONS ARE ANTICIPATED PLACE GEOTEXTILE FABRIC ON THE GRADED FOUNDATION TO IMPROVE STABILITY.
- B.) TROUBLESHOOTING**
- 1.) CONSULT WITH A QUALIFIED DESIGN PROFESSIONAL IF ANY OF THE FOLLOWING OCCUR:
 - INADEQUATE RUNOFF CONTROLS TO THE EXTENT THAT SEDIMENT WASHES ONTO PUBLIC ROADS
 - INSTALL DIVERSIONS OR OTHER RUNOFF CONTROL MEASURES
 - SMALL STONE, THIN PAD, OR ABSENCE OF GEOTEXTILE FABRIC RESULTS IN RUTS AND MUDDY CONDITIONS AS STONE IS PRESSED INTO SOIL - INCREASE STONE SIZE THICKNESS OR ADD GEOTEXTILE FABRIC.
 - PAD TOO SHORT FOR HEAVY CONSTRUCTION TRAFFIC - EXTEND PAD BEYOND THE MINIMUM 50 FOOT LENGTH AS NECESSARY.
- C.) INSPECTION AND MAINTENANCE**
- 1.) INSPECT STONE PAD AND SEDIMENT DISPOSAL AREA WEEKLY AND AFTER ANY RAIN EVENT.
 - 2.) RESHAPE PAD AS NEEDED FOR PROPER DRAINAGE AND RUNOFF CONTROL.
 - 3.) TOP DRESS WITH CLEAN 2 AND 3 INCH STONE AS NEEDED.
 - 4.) IMMEDIATELY REMOVE MUD OR SEDIMENT TRACKED OR WASHED ONTO PUBLIC ROADWAY. REPAIR ANY BROKEN ROAD PAVEMENT IMMEDIATELY.
 - 5.) REMOVE ALL TEMPORARY ROAD MATERIALS FROM AREAS WHERE PERMANENT VEGETATION WILL BE ESTABLISHED.

MAINTENANCE:

TO MAINTAIN THE EROSION AND SEDIMENT CONTROLS, THE FOLLOWING PROCEDURES WILL BE PERFORMED:

SEDIMENT CAPTURE DEVICES: SEDIMENT WILL BE REMOVED FROM THE UPSTREAM OR UPSLOPE SIDE OF THE FILTER FABRIC FENCES. WHEN THE DEPTH OF ACCUMULATED SEDIMENT REACHES ABOUT ONE-THIRD THE HEIGHT OF THE STRUCTURE.

STORM SEWER INLETS: ANY SEDIMENT IN THE STORM SEWER INLETS WILL BE REMOVED AND DISPOSED OF PROPERLY.

TEMPORARY CONTROLS: ALL TEMPORARY CONTROLS WILL BE REMOVED AFTER THE DISTURBED AREAS HAVE BEEN STABILIZED.

INSPECTION PROCEDURES:

INSPECTIONS WILL BE DONE BY THE RESPONSIBLE PERSON(S) AT LEAST ONCE EVERY WEEK AND WITHIN 24 HOURS EACH STORM EVENT PRODUCING ANY AMOUNT OF RAINFALL. AREAS THAT HAVE BEEN RESEDED WILL BE INSPECTED REGULARLY AFTER SEED GERMINATION TO ENSURE COMPLETE COVERAGE OF EXPOSED AREAS. DISTURBED AREAS THAT HAVE NOT BEEN FINALLY STABILIZED SHALL HAVE ALL POLLUTION CONTROL MEASURES INSPECTED FOR PROPER INSTALLATION, OPERATION AND MAINTENANCE. LOCATIONS WHERE STORM WATER LEAVES THE SITE SHALL BE INSPECTED FOR EVIDENCE OF EROSION OR SEDIMENT DEPOSITION. ANY DEFICIENCIES SHALL BE NOTED IN A REPORT OF THE INSPECTION AND CORRECTED WITHIN SEVEN CALENDAR DAYS OF THE INSPECTION. THE PERMITTEE SHALL PROMPTLY NOTIFY THE SITE CONTRACTORS RESPONSIBLE FOR OPERATION AND MAINTENANCE OF POLLUTION CONTROL DEVICES OF DEFICIENCIES.

IF THE EXISTING GROUND COVER IS NATURAL GRASS, DISTURBED AREAS SHALL BE TEMPORARILY SEEDDED WITH WHEATRYRGE AT A RATE OF 1.5 POUNDS PER 1000 SQUARE FEET. PERMANENT SEEDING SHALL CONSIST OF 90% IN THREE EQUAL PARTS OF THIN SLADE, TURF-TYPE, TALL FESCUE AND 10% BLUEGRASS SEED AT A RATE OF 10 POUNDS PER 1000 SQUARE FEET. BOTH TEMPORARY AND PERMANENT SEEDING AREAS SHALL BE MULCHED AND WATERED TO MAINTAIN THE PROPER MOISTURE LEVEL OF THE SOIL TO ESTABLISH GRASS. NEW GRASS SHALL BE WATERED AND MAINTAINED UNTIL IT REACHES A HEIGHT OF 3 INCHES. ANY BARE AREAS SHALL BE RESEDED.

ALL EROSION CONTROL DEVICES SHALL BE REMOVED BY GENERAL CONTRACTOR AFTER SITE STABILIZATION IS COMPLETE AND APPROVED BY ENGINEER.

THE DEVELOPER WILL DESIGNATE A QUALIFIED PERSON OR PERSONS TO PERFORM THE FOLLOWING INSPECTIONS:

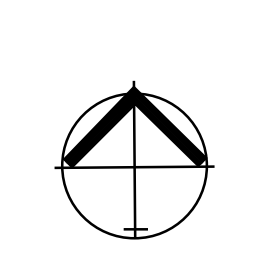
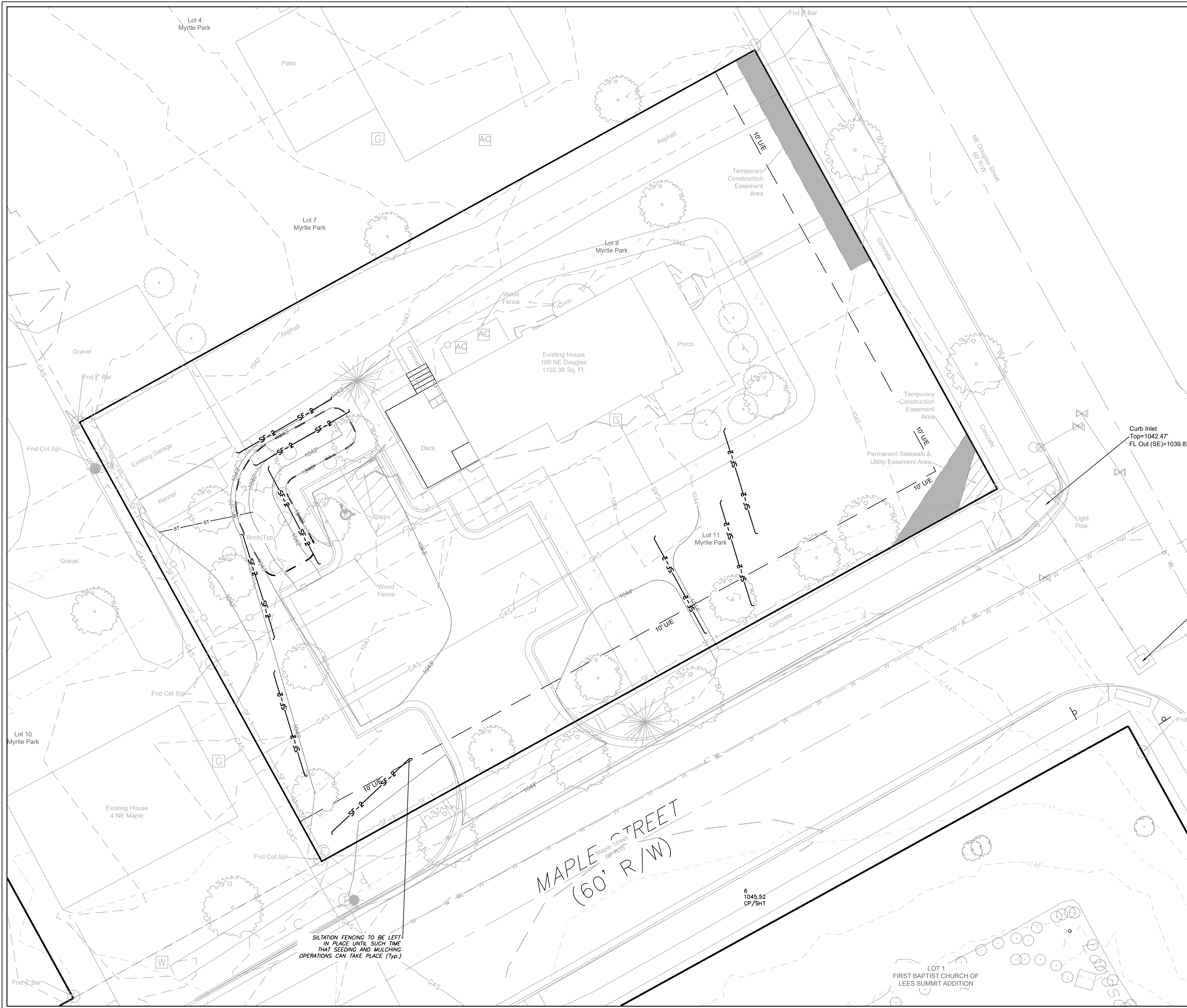
STABILIZATION MEASURES: DISTURBED AREAS AND AREAS USED FOR STORAGE OF MATERIALS THAT ARE EXPOSED TO PRECIPITATION WILL BE INSPECTED FOR EVIDENCE OF OR THE POTENTIAL FOR POLLUTANTS ENTERING THE DRAINAGE SYSTEM. AFTER A PORTION OF THE SITE IS FINALLY STABILIZED, INSPECTIONS WILL BE CONDUCTED AT LEAST ONCE EVERY MONTH THROUGHOUT THE LIFE OF THE PROJECT. CONTRACTOR CAN CONTACT ENGINEERING SOLUTIONS FOR COPIES OF THE INSPECTION FORM TO BE USED FOR STABILIZATION MEASURES.

STRUCTURAL CONTROLS: FILTER FABRIC FENCES AND ALL OTHER EROSION AND SEDIMENT MEASURES IDENTIFIED IN THE PLAN WILL BE INSPECTED REGULARLY FOR PROPER POSITIONING, ANCHORING, AND EFFECTIVENESS IN TRAPPING SEDIMENTS. SEDIMENT WILL BE REMOVED FROM THE UPSTREAM OR UPSLOPE SIDE OF THE FILTER FABRIC. CONTRACTOR CAN CONTACT ENGINEERING SOLUTIONS FOR COPIES OF THE INSPECTION FORM TO BE USED FOR STABILIZATION MEASURES.

DISCHARGE POINTS: DISCHARGE POINTS OR LOCATIONS WILL BE INSPECTED TO DETERMINE WHETHER EROSION CONTROL MEASURES ARE EFFECTIVE IN PREVENTING SIGNIFICANT AMOUNTS OF POLLUTANTS FROM ENTERING RECEIVING WATERS.

CONSTRUCTION ENTRANCE: LOCATIONS WHERE VEHICLES ENTER OR EXIT THE SITE WILL BE INSPECTED FOR EVIDENCE OF OFF-SITE SEDIMENT TRACKING.

A LOG OF EACH INSPECTION SHALL BE KEPT. THE INSPECTION REPORT IS TO INCLUDE THE FOLLOWING MINIMUM INFORMATION: INSPECTOR'S NAME, DATE OF INSPECTION, OBSERVATIONS RELATIVE TO THE EFFECTIVENESS OF THE POLLUTION CONTROL DEVICES, ACTIONS TAKEN OR NECESSARY TO CORRECT DEFICIENCIES, AND LISTING OF AREAS WHERE LAND DISTURBANCE OPERATIONS HAVE PERMANENTLY OR TEMPORARILY STOPPED. THE INSPECTION REPORT SHALL BE SIGNED BY THE PERMITTEE OR BY THE PERSON PERFORMING THE INSPECTION IF DULY AUTHORIZED TO DO SO.



ESC PHASE FINAL
SCALE: 1" = 20'



- LEGEND**
- PHASE 1 SILT FENCE — SF-1 — SF-1
 - PHASE 2 SILT FENCE — SF-2 — SF-2
 - INLET PROTECTION — [Symbol] — [Symbol]

DURING ALL PHASES OF CONSTRUCTION, INACTIVE AREA STABILIZATION METHODS AS DESCRIBED IN APWA SECTION 5111.3 SHALL BE USED TO CONTROL EROSION AND SILTATION.

NOTES: The Land Disturbance Plans indicates the final placement of erosion control devices. The contractor(s) may proceed with construction prior to the final placement of these devices by providing additional devices to control erosion on their items of work. These devices shall be maintained until the final devices are in place.

SEED AND MULCH NOTES:

All areas disturbed by construction activities shall be seeded and mulched. Seeding shall be done before the proposed seedbed becomes eroded, crusted over, or dried out and shall not be done when the ground is frozen, or covered with snow. The seed shall comply with the requirements of the Missouri Seed Law and the Federal Seed Act. Also, it shall contain no seed of any plant on the Federal Noxious Weed List. Other weed seeds shall not exceed one percent by weight of mix.

Seed and Fertilizer Rate:

- Mix 1 - Rye Grass / Blue Grass ----- 2000
- 100 lbs. per Acre
- Mix 2 - Tall Fescue / Blue Grass ----- 195
- lbs. per Acre
- Lime ----- 800
- lbs per Acre (50 lbs. per 1000 sq. ft.)
- Fertilizer ----- 800
- to 1200 lbs per Acre (25 lbs per 1000 sq. ft.)

During the dates December 15th through May 31 ALL lime fertilizer, seed and mulch shall be applied to finished slopes of disturbed areas. During the months of June, July, October and November 1st through December 15th, lime fertilizer, seed and mulch shall be applied at the following rates:

- Lime - 100% of specified quantity
- Fertilizer - 75% of the specified quantity
- Seed - 50% of the specified quantity
- Mulch - 100% of the specified quantity

Mulch shall be vegetative type, cereal straw from stalks of oats, rye, or barley, or approved equal. The straw shall be free of prohibited weed seed and relatively free of all other noxious and undesirable seed. Mulch shall be applied at the rate of 2 tons per acre, (70 to 90 lbs per 1000 sq. ft.). Mulch shall be embedded by a mulch anchoring tool or disk type roller having flat serrated disks spaced not more than 10 inches apart and cleaning scrapers shall be provided.

ONCE SITE IS 90% VEGETATED ALL ESC DEVICES SHALL BE REMOVED AND ANY DISTURBED AREAS SHALL BE RESTORED

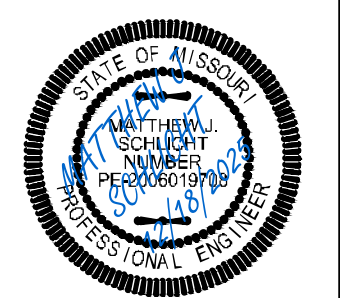
SILTATION FENCING TO BE LEFT IN PLACE UNTIL SUCH TIME THAT SEEDING AND MULCHING OPERATIONS CAN TAKE PLACE (Typ.)

ENGINEERING SOLUTIONS
ENGINEERING & SURVEYING
50 SE 30TH STREET
LEES SUMMIT, MO 64082
P: (816) 623-9888 F: (816) 623-9849

Professional Registration
Missouri
Engineering 200502186-D
Surveying 2005038318-D
Kansas
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Project: 100 NE DOUGLAS STREET
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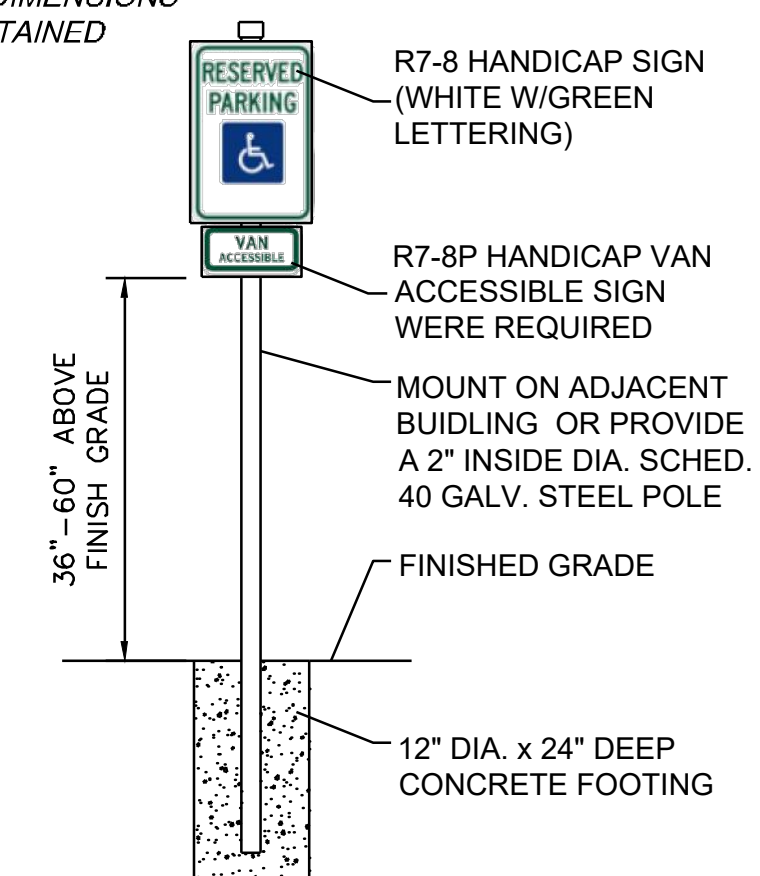
ESC PHASE 3 - Final Restoration Plan
Final Development Plans for:
100 NE DOUGLAS STREET
Lee's Summit, Jackson County, Missouri



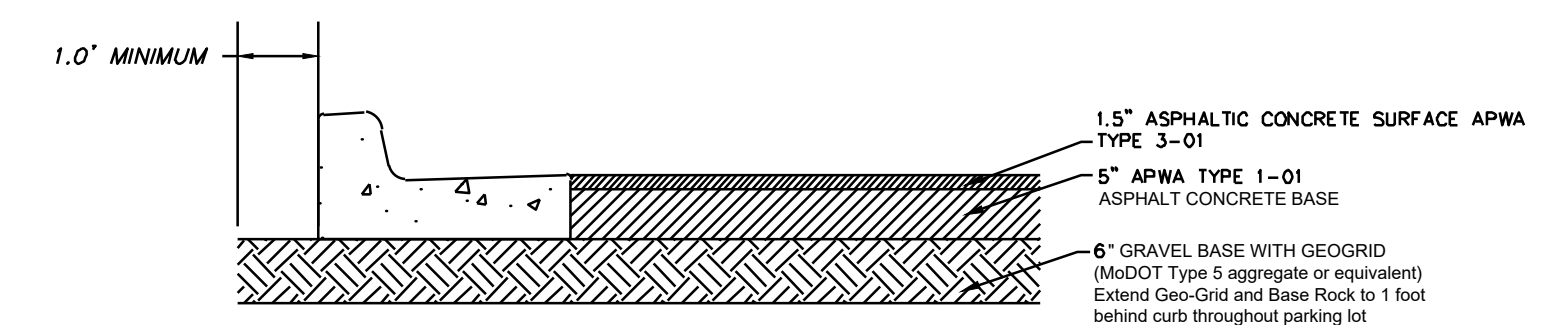
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NE PE E-14335

REVISIONS
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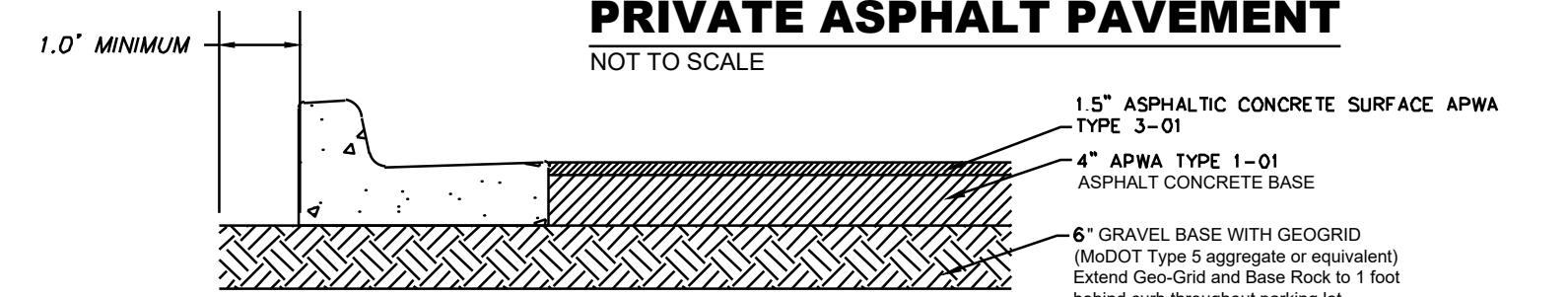
SIGN MAY BE WALL MOUNTED DIRECTLY TO BUILDING. DIMENSIONS MUST BE MAINTAINED



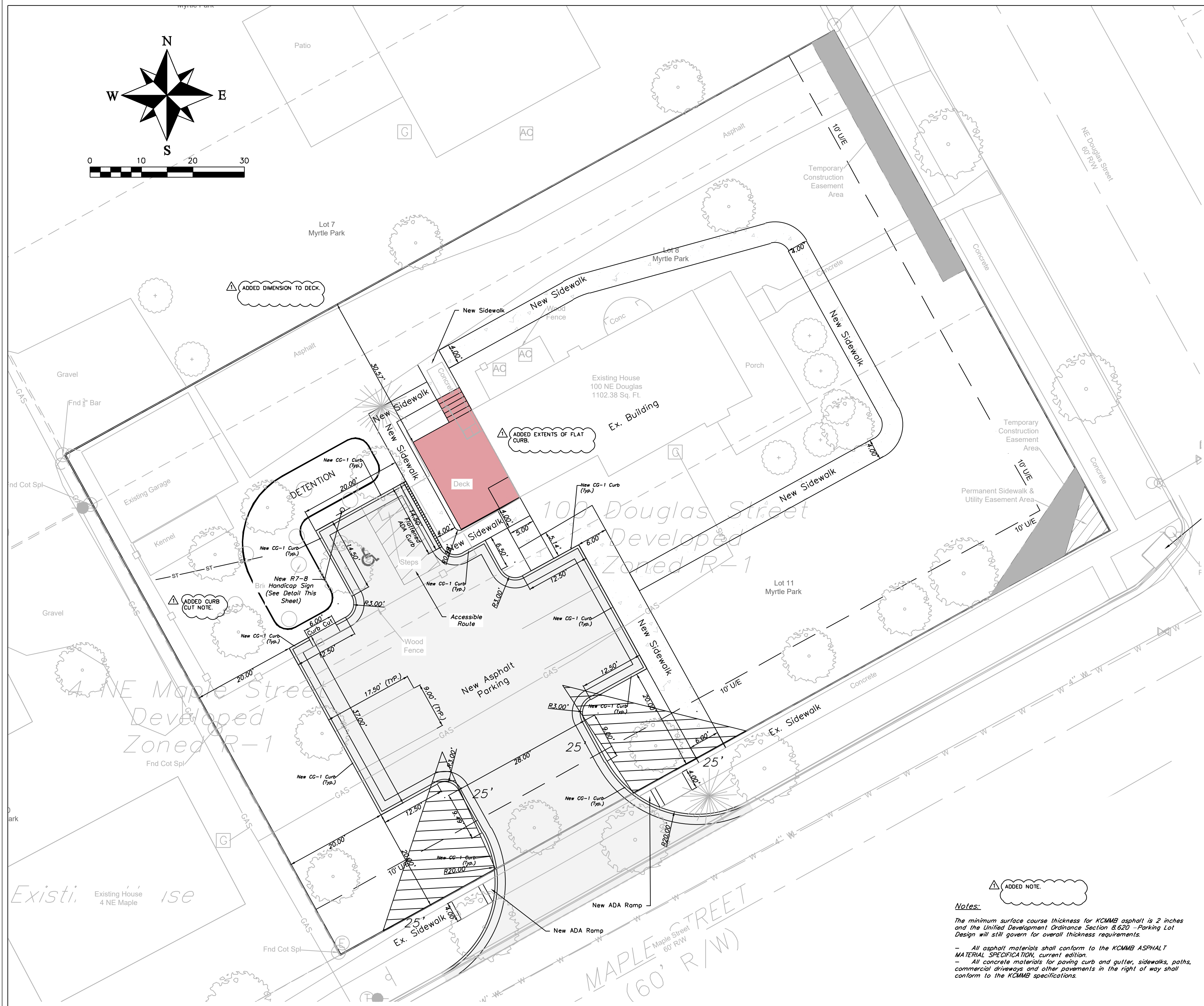
HANDICAP SIGN DETAIL
NOT TO SCALE



"DRIVE LANE" PRIVATE ASPHALT PAVEMENT
NOT TO SCALE

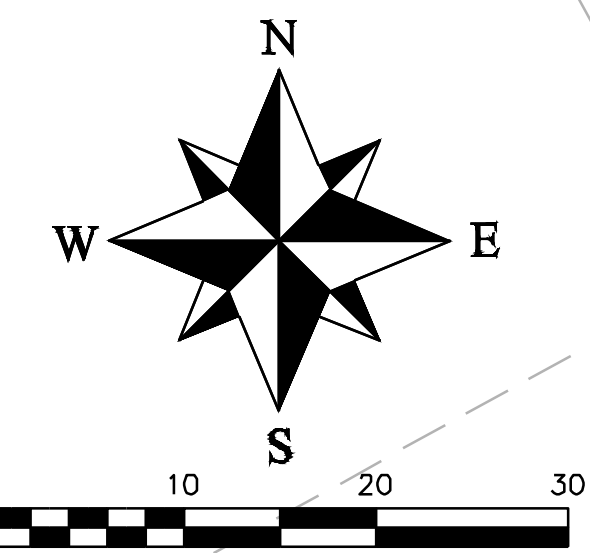


"PARKING STALLS" PRIVATE ASPHALT PAVEMENT
NOT TO SCALE



ADDED NOTE.

Notes:
The minimum surface course thickness for KCMMB asphalt is 2 inches and the Unified Development Ordinance Section 8.620 - Parking Lot Design will still govern for overall thickness requirements.
- All asphalt materials shall conform to the KCMMB ASPHALT MATERIAL SPECIFICATION, current edition.
- All concrete materials for paving curb and gutter, sidewalks, paths, commercial driveways and other pavements in the right of way shall conform to the KCMMB specifications.



ENGINEERING SOLUTIONS
ENGINEERING & SURVEYING
50 SE 30TH STREET
LEES SUMMIT, MO 64082
P: (816) 623-9888 F: (816) 623-9849

Professional Registration
Missouri
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100 NE DOUGLAS STREET
Lee's Summit, Jackson County, Missouri

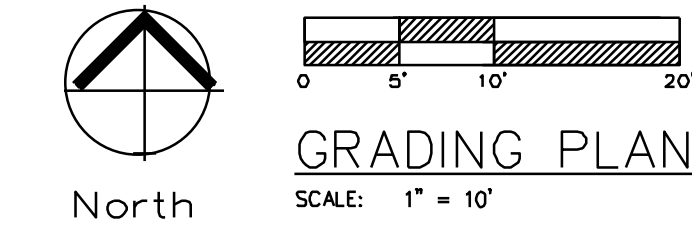
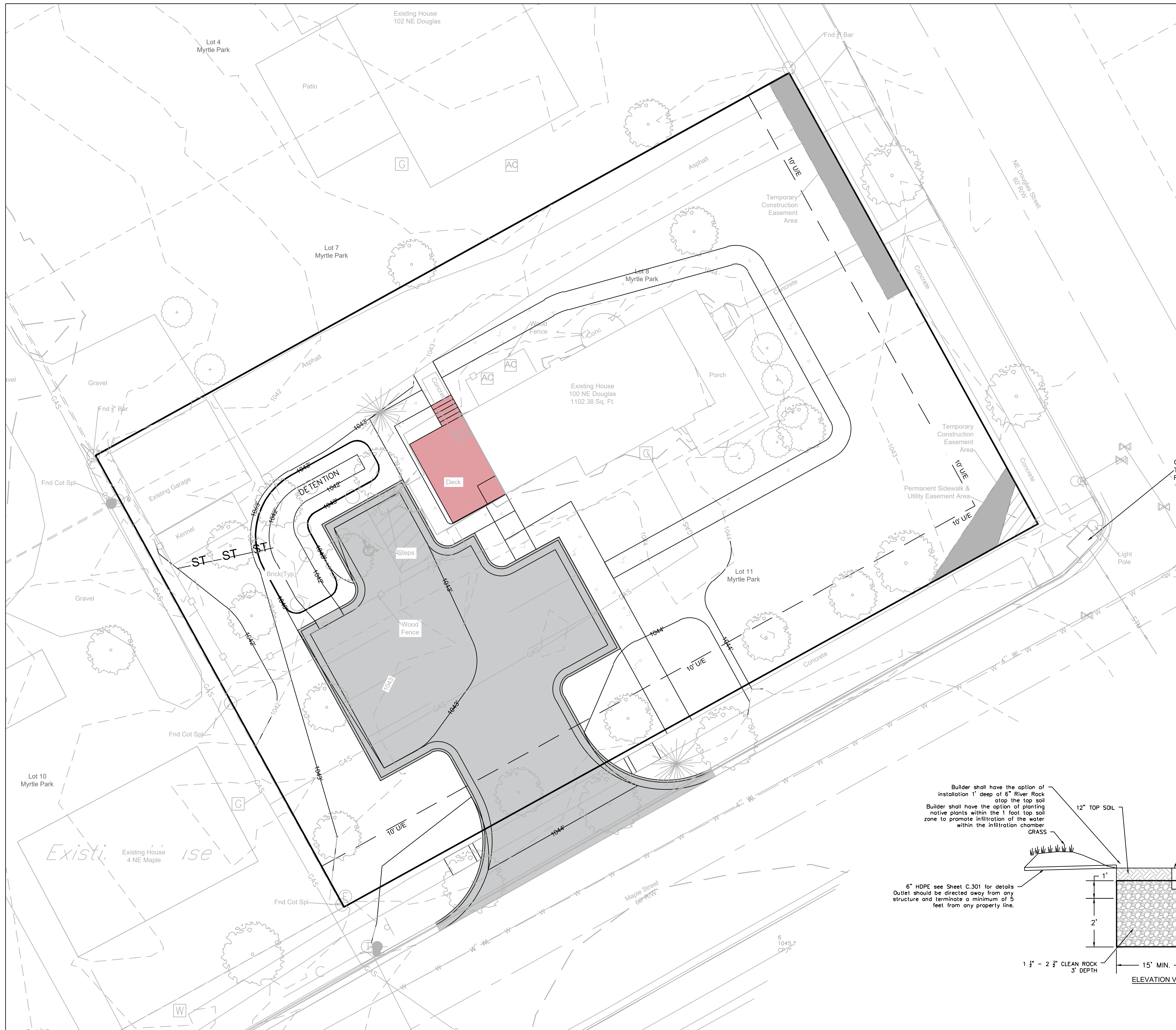
Project: 100 NE DOUGLAS
LSMO
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SITE PLAN
Final Development Plans for:
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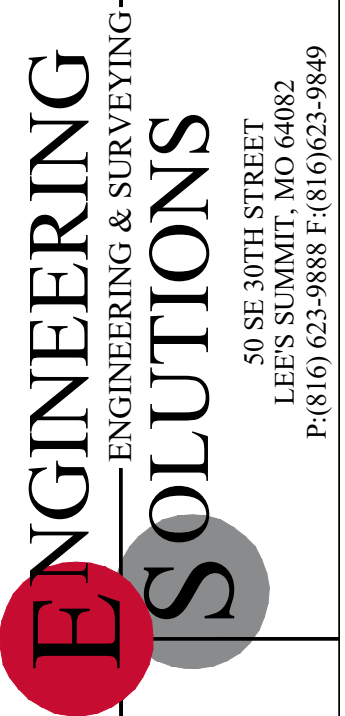
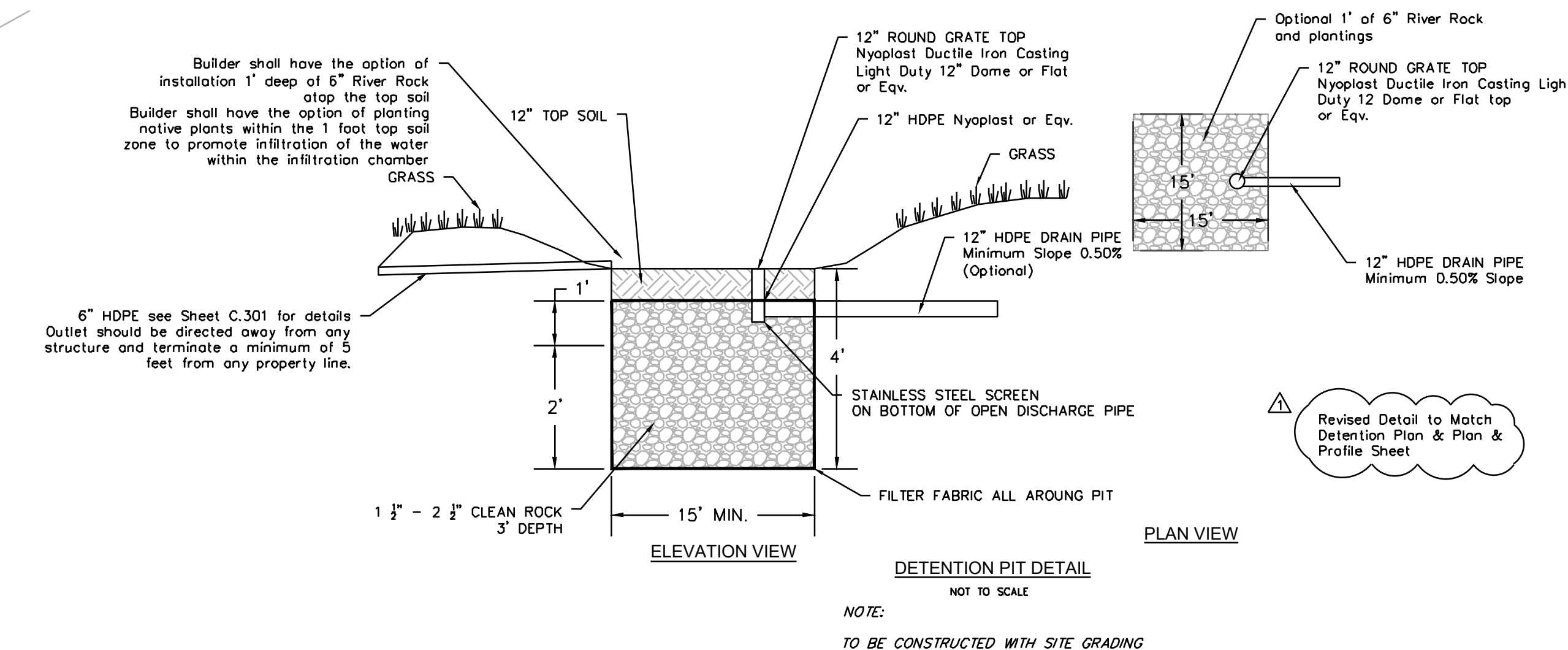


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NE PE E-14335

REVISIONS
REV. 12/18/2025



- Notes**
1. Contractor is responsible for verifying all existing utility locations prior to excavation
 2. There are no known natural or artificial water storage detention areas, or wetlands in the area designated for construction
 3. No part of the project lies within the 100 year flood plain
 4. All erosion and sediment control measures need to be implemented prior to construction
 5. Additional erosion control may be required by the City Engineer, Design Engineer or Owner at any time problematic areas are noted in the field or existing measures are found to be ineffective
 6. Soil Stabilization of disturbed areas shall be completed within 14 days of construction inactivity
 7. Contractor responsible for all density testing of roadway subgrade and granular base.



Professional Registration
 Missouri
 Engineering 2005002186-D
 Surveying 200500319-D
 Kansas
 Engineering E-1695
 Surveying LS-218
 Oklahoma
 Engineering 6254
 Nebraska
 Engineering CA2821

Project:
 100 NE DOUGLAS STREET
 Lee's Summit, Jackson County, Missouri

Issue Date:
 June 24, 2025

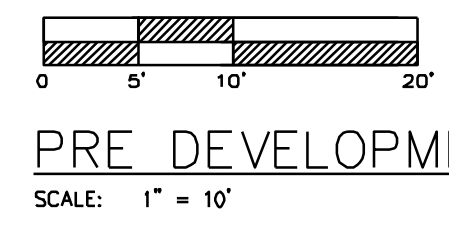
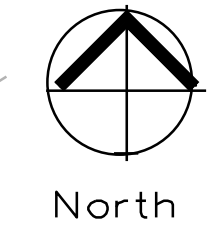
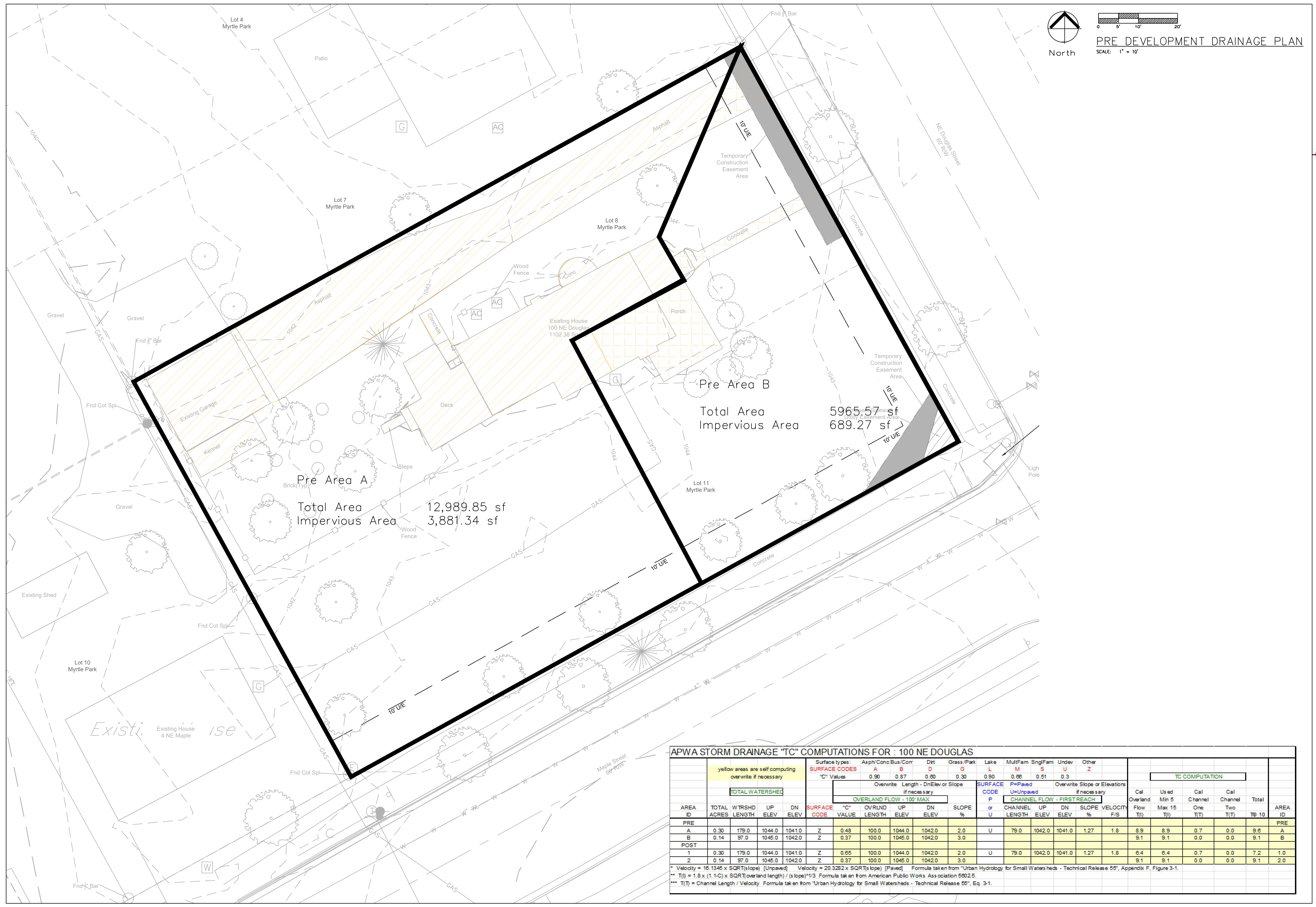
Grading Plan
 Final Development Plans for:
 100 NE DOUGLAS STREET
 Lee's Summit, Jackson County, Missouri



Matthew J. Schlicht
 MO PE 2006019708
 KS PE 19071
 OK PE 25226
 NE PE E-14335

REVISIONS

REV. 12/18/2025	



PRE DEVELOPMENT DRAINAGE PLAN
SCALE: 1" = 10'

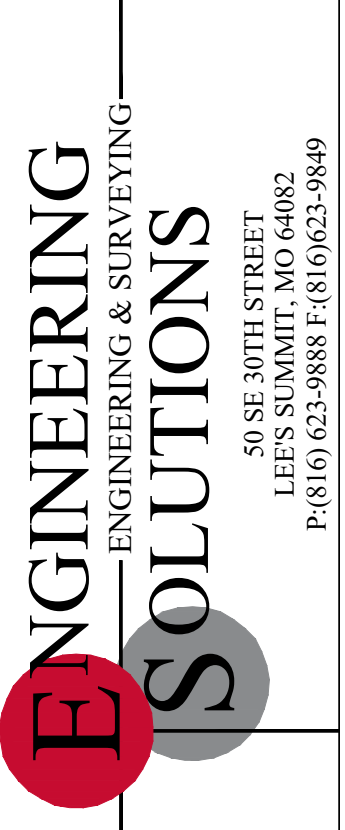
Pre Area A
Total Area Impervious Area
12,989.85 sf
3,881.34 sf

Pre Area B
Total Area Impervious Area
5965.57 sf
689.27 sf

APWA STORM DRAINAGE "TC" COMPUTATIONS FOR : 100 NE DOUGLAS

AREA ID	TOTAL ACRES	WTRSHD LENGTH	UP ELEV	DN ELEV	SURFACE CODES				SLOPE %	SURFACE CODE	TC COMPUTATION				AREA ID							
					A	B	D	G			Cal Overland Flow (T)	Used Min 5 (T)	Cal Channel One (T)	Cal Channel Two (T)		Total (T)						
PRE																						
A	0.30	179.0	1044.0	1041.0	Z	0.48	100.0	1044.0	1042.0	2.0	U	79.0	1042.0	1041.0	1.27	1.8	8.9	8.9	0.7	0.0	9.6	A
B	0.14	97.0	1045.0	1042.0	Z	0.37	100.0	1045.0	1042.0	3.0							9.1	9.1	0.0	0.0	9.1	B
POST																						
1	0.30	179.0	1044.0	1041.0	Z	0.65	100.0	1044.0	1042.0	2.0	U	79.0	1042.0	1041.0	1.27	1.8	6.4	6.4	0.7	0.0	7.2	1.0
2	0.14	97.0	1045.0	1042.0	Z	0.37	100.0	1045.0	1042.0	3.0							9.1	9.1	0.0	0.0	9.1	2.0

* Velocity = 16.1345 x SQRT(slope) [Unpaved] Velocity = 20.3282 x SQRT(slope) [Paved] Formula taken from "Urban Hydrology for Small Watersheds - Technical Release 55", Appendix F, Figure 3-1.
 ** T(1) = 1.8 x (1.1-C) x SQRT(overland length) / (s slope)^{1/3} Formula taken from American Public Works Association 5602.5.
 *** T(T) = Channel Length / Velocity Formula taken from "Urban Hydrology for Small Watersheds - Technical Release 55", Eq. 3-1.

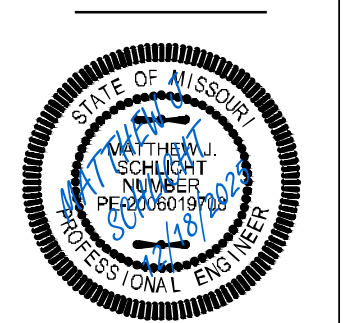


Professional Registration
Missouri
Engineering 2005002186-D
Surveying 200500319-D
Kansas
Engineering E-1695
Surveying LS-218
Oklahoma
Engineering 6254
Nebraska
Engineering CA2821

100 NE DOUGLAS STREET
Lee's Summit, Jackson County, Missouri

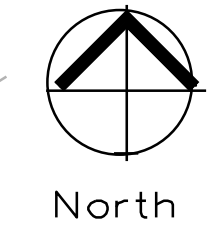
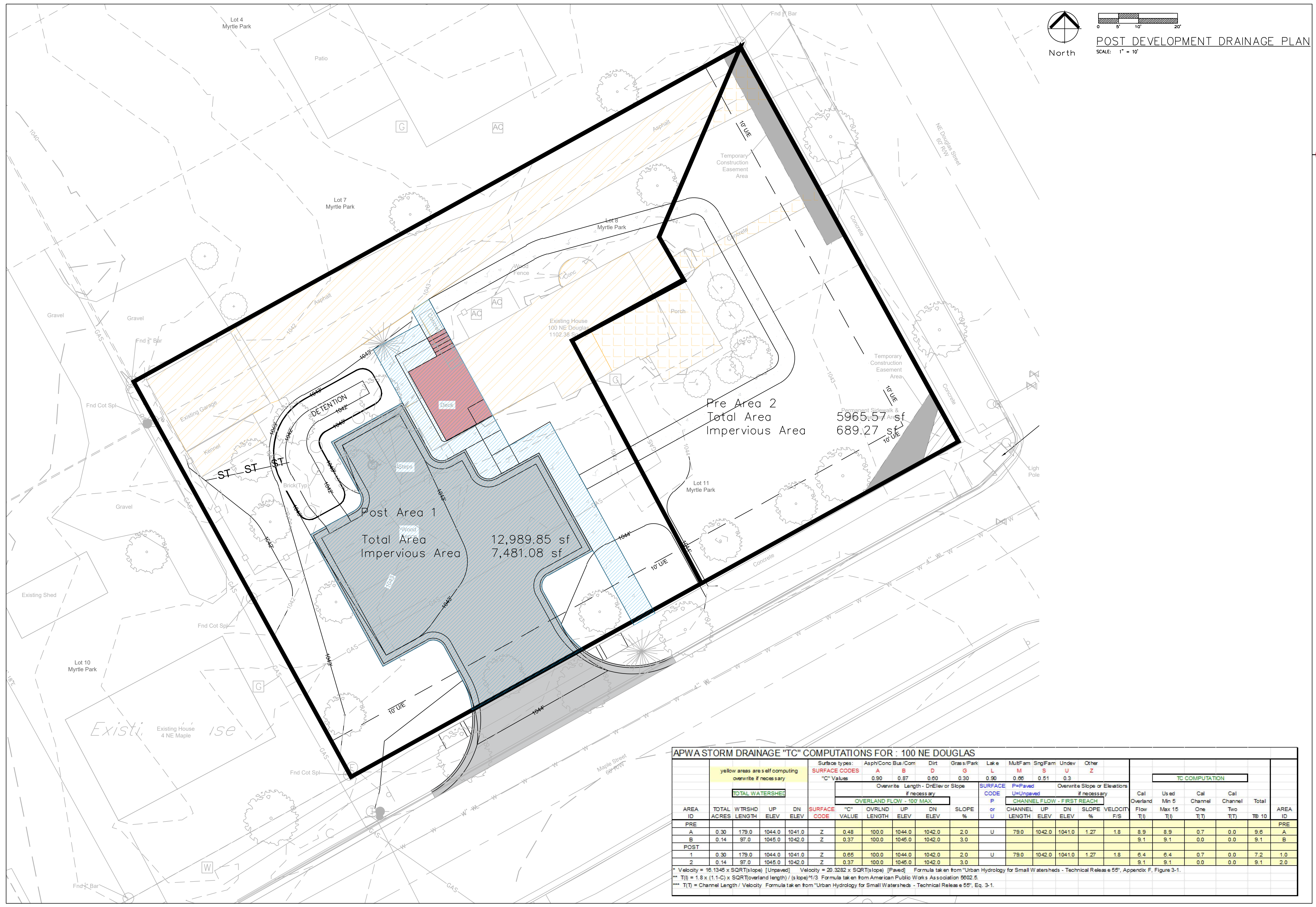
Project:
100 NE DOUGLAS
LSMO
Issue Date:
June 24, 2025

Pre Development
Final Development Plans for:
100 NE DOUGLAS STREET
Lee's Summit, Jackson County, Missouri



Matthew J. Schlott
MO PE 2006019708
KS PE 19071
OK PE 25226
NE PE E-14335

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REV. 12/18/2025



POST DEVELOPMENT DRAINAGE PLAN
SCALE: 1" = 10'

APWA STORM DRAINAGE "TC" COMPUTATIONS FOR : 100 NE DOUGLAS

AREA ID	TOTAL ACRES	WTRSHD LENGTH	UP ELEV	DN ELEV	SURFACE TYPES					SLOPE %	SURFACE CODE	P=Unpaved or CHANNEL FLOW	TC COMPUTATION					AREA ID				
					A	B	D	G	L				M	S	U	Z	Cal Overland Flow		Used Min 5	Cal Channel One	Cal Channel Two	Total T@ 10
PRE	0.30	179.0	1044.0	1041.0	Z	0.48	100.0	1044.0	1042.0	2.0	U	79.0	1042.0	1041.0	1.27	1.8	8.9	8.9	0.7	0.0	9.6	A
B	0.14	97.0	1045.0	1042.0	Z	0.37	100.0	1045.0	1042.0	3.0						9.1	9.1	0.0	0.0	9.1	B	
POST	0.30	179.0	1044.0	1041.0	Z	0.65	100.0	1044.0	1042.0	2.0	U	79.0	1042.0	1041.0	1.27	1.8	6.4	6.4	0.7	0.0	7.2	1.0
2	0.14	97.0	1045.0	1042.0	Z	0.37	100.0	1045.0	1042.0	3.0						9.1	9.1	0.0	0.0	9.1	2.0	

* Velocity = 16.1345 x SQRT(slope) [Unpaved] Velocity = 20.3282 x SQRT(slope) [Paved] Formula taken from "Urban Hydrology for Small Watersheds - Technical Release #55", Appendix F, Figure 3-1.
 ** T(T) = 1.8 x (1.1-C) x SQRT(overland length) / (s slope)^{1/3} Formula taken from American Public Works Association 5802.5
 *** T(T) = Channel Length / Velocity Formula taken from "Urban Hydrology for Small Watersheds - Technical Release #55", Eq. 3-1.

ENGINEERING SOLUTIONS
ENGINEERING & SURVEYING
50 SE 30TH STREET
LEES SUMMIT, MO 64082
P: (816) 623-9888 F: (816) 623-9849

Professional Registration
Missouri
Engineering 2005002186-D
Surveying 200500319-D
Kansas
Engineering E-1655
Surveying LS-218
Oklahoma
Engineering 6254
Nebraska
Engineering CA2821

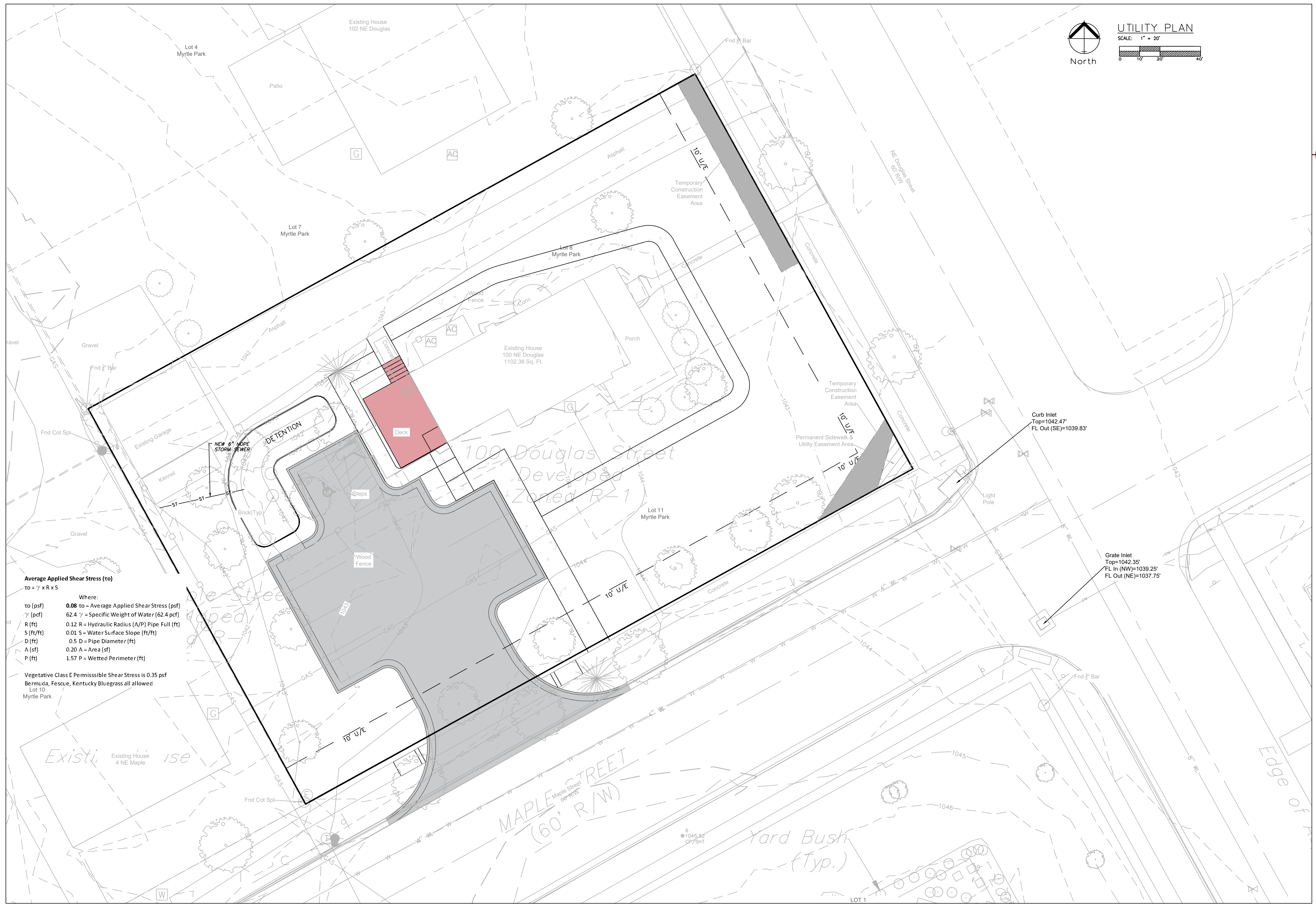
Project: 100 NE DOUGLAS STREET
Issue Date: June 24, 2025

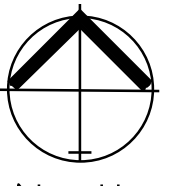
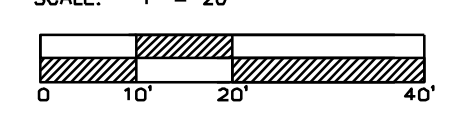
Post Development Final Development Plans for:
100 NE DOUGLAS STREET
Lee's Summit, Jackson County, Missouri

Matthew J. Schlacht
MO PE 2006019708
KS PE 19071
OK PE 25226
NE PE E-14325

REVISIONS
REV. 12/18/2025

C.202



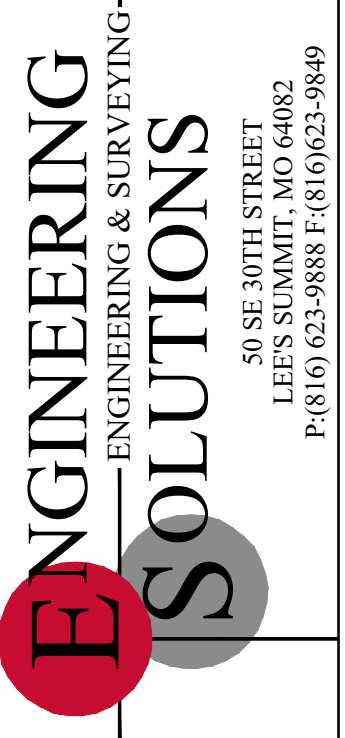

UTILITY PLAN
 SCALE: 1" = 20'


Average Applied Shear Stress (τ_o)
 $\tau_o = \gamma \times R \times S$

Where:

- τ_o (psf) 0.08 τ_o = Average Applied Shear Stress (psf)
- γ (pcf) 62.4 γ = Specific Weight of Water (62.4 pcf)
- R (ft) 0.12 R = Hydraulic Radius (A/P) Pipe Full (ft)
- S (ft/ft) 0.01 S = Water Surface Slope (ft/ft)
- D (ft) 0.5 D = Pipe Diameter (ft)
- A (sf) 0.20 A = Area (sf)
- P (ft) 1.57 P = Wetted Perimeter (ft)

Vegetative Class E Permissible Shear Stress is 0.35 psf
 Bermuda, Fescue, Kentucky Bluegrass all allowed



Professional Registration
 Missouri
 Engineering 2006002186-D
 Surveying 200600319-D
 Kansas
 Engineering E-1655
 Surveying LS-216
 Oklahoma
 Engineering 6254
 Nebraska
 Engineering CA2821

Project:
 100 NE DOUGLAS STREET
 LSHO
 Issue Date: June 24, 2025

Utility Plan
 Final Development Plans for:
 100 NE DOUGLAS STREET
 Lee's Summit, Jackson County, Missouri

Project:
 100 NE DOUGLAS STREET
 LSHO
 Issue Date: June 24, 2025

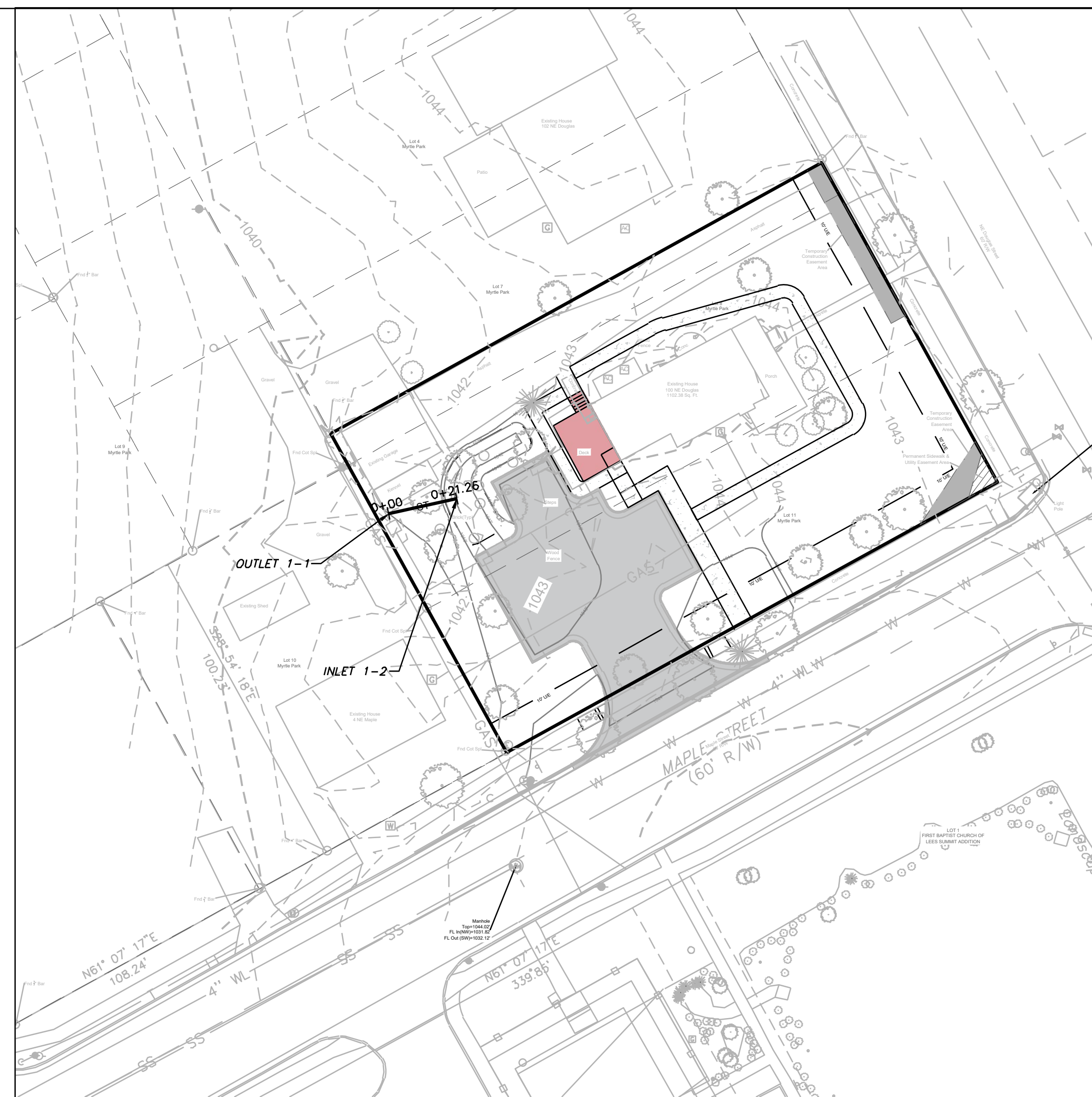
Utility Plan
 Final Development Plans for:
 100 NE DOUGLAS STREET
 Lee's Summit, Jackson County, Missouri



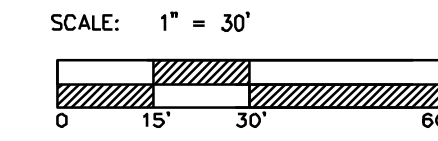
Matthew J. Schlicht
 MO PE 2006019708
 KS PE 19071
 OK PE 25226
 NE PE E-14325

REVISIONS
 REV. 12/18/2025

NO.	DATE	DESCRIPTION

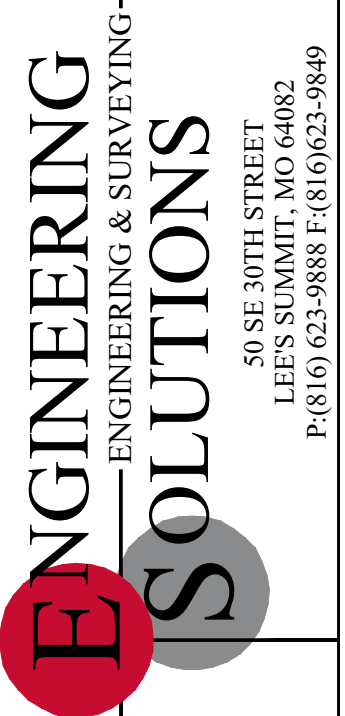
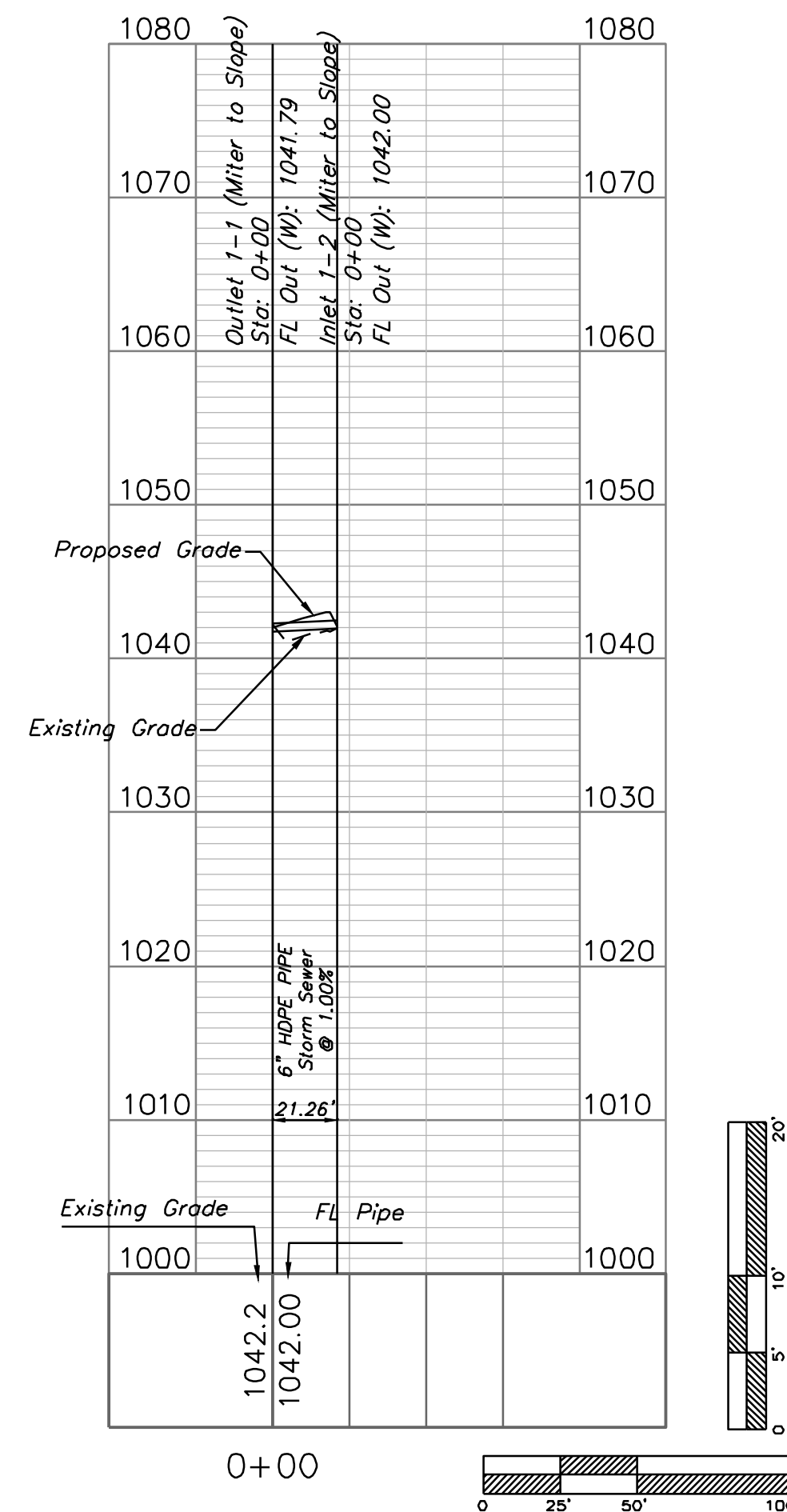


STORM SEWER PLAN AND PROFILE



STORM LINE 1

Revised Plan & Profile
Slope on inverts to Match
Drainage Study



Professional Registration
Missouri
Engineering 200502186-D
Surveying 2005008318-D
Kansas
Engineering E-1695
Surveying LS-218
Oklahoma
Engineering 6254
Nebraska
Engineering CA2821

100 NE DOUGLAS STREET
Lee's Summit, Jackson County, Missouri

Project:
100 NE DOUGLAS
LSMO
Issue Date:
June 24, 2025

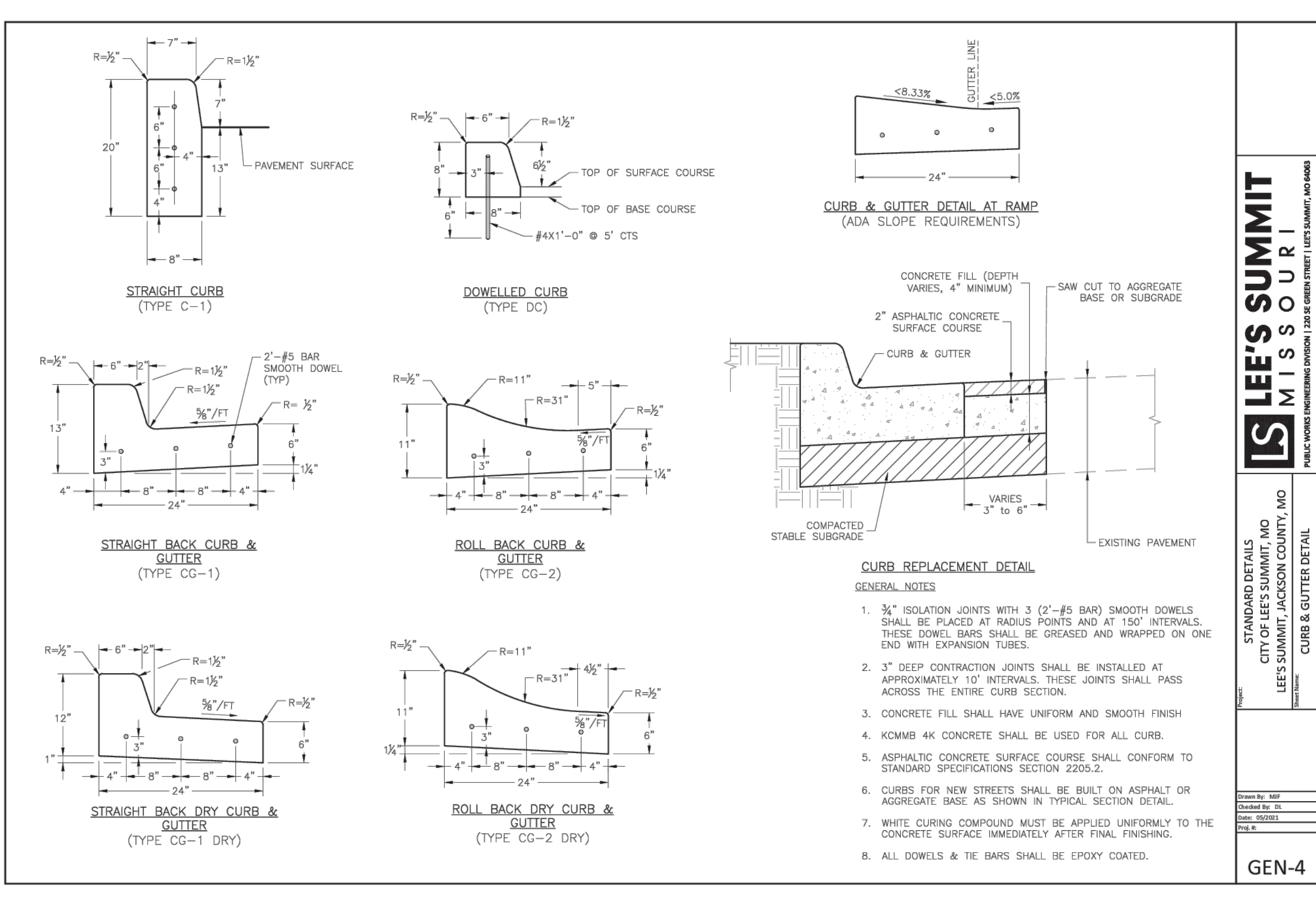
Storm Sewer Plan and Profile
Final Development Plans for:
100 NE DOUGLAS STREET
Lee's Summit, Jackson County, Missouri



Matthew J. Schlicht
MO PE 2006019708
KS PE 19071
OK PE 25226
NE PE E-14335

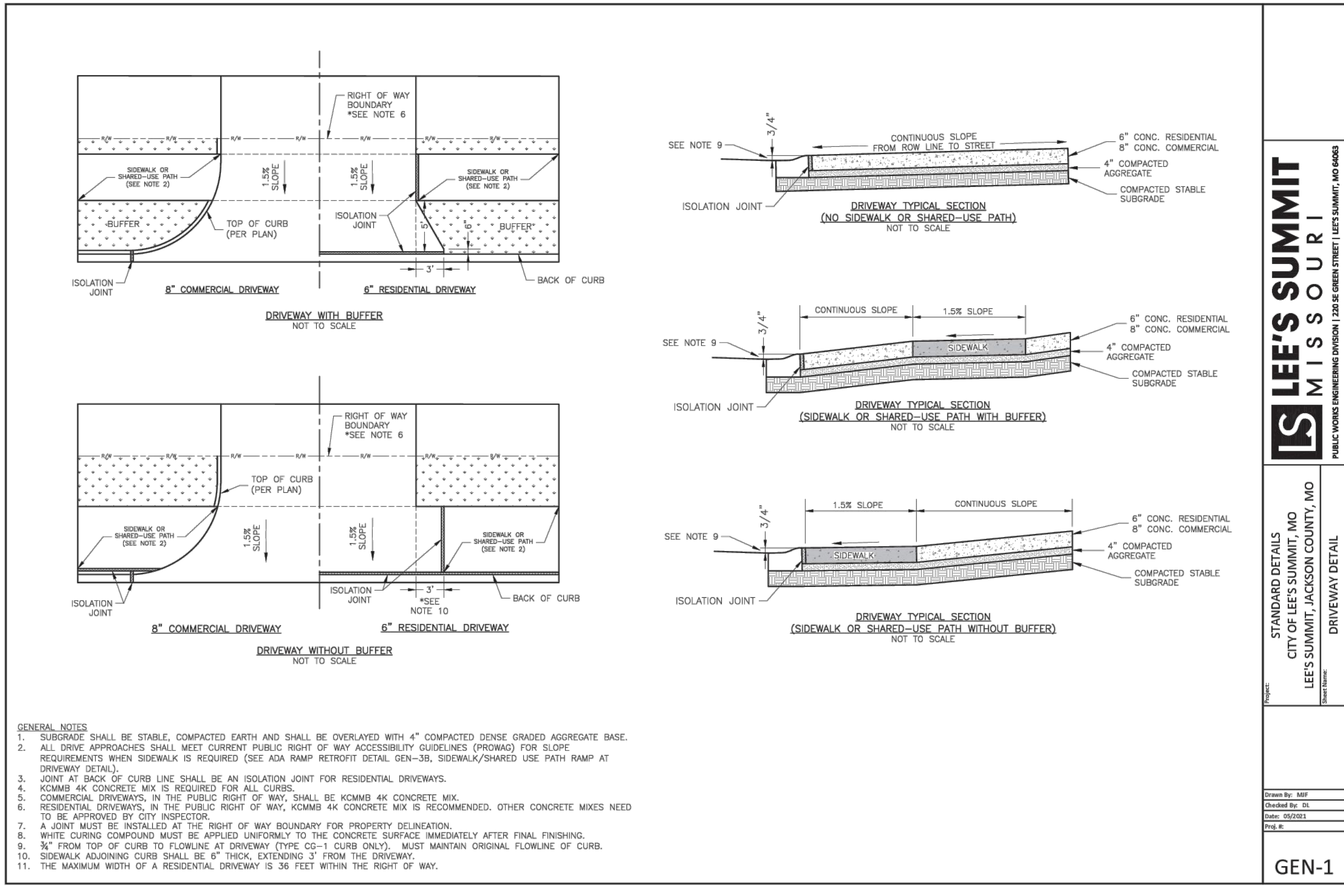
REVISIONS

REV. 12/18/2025	



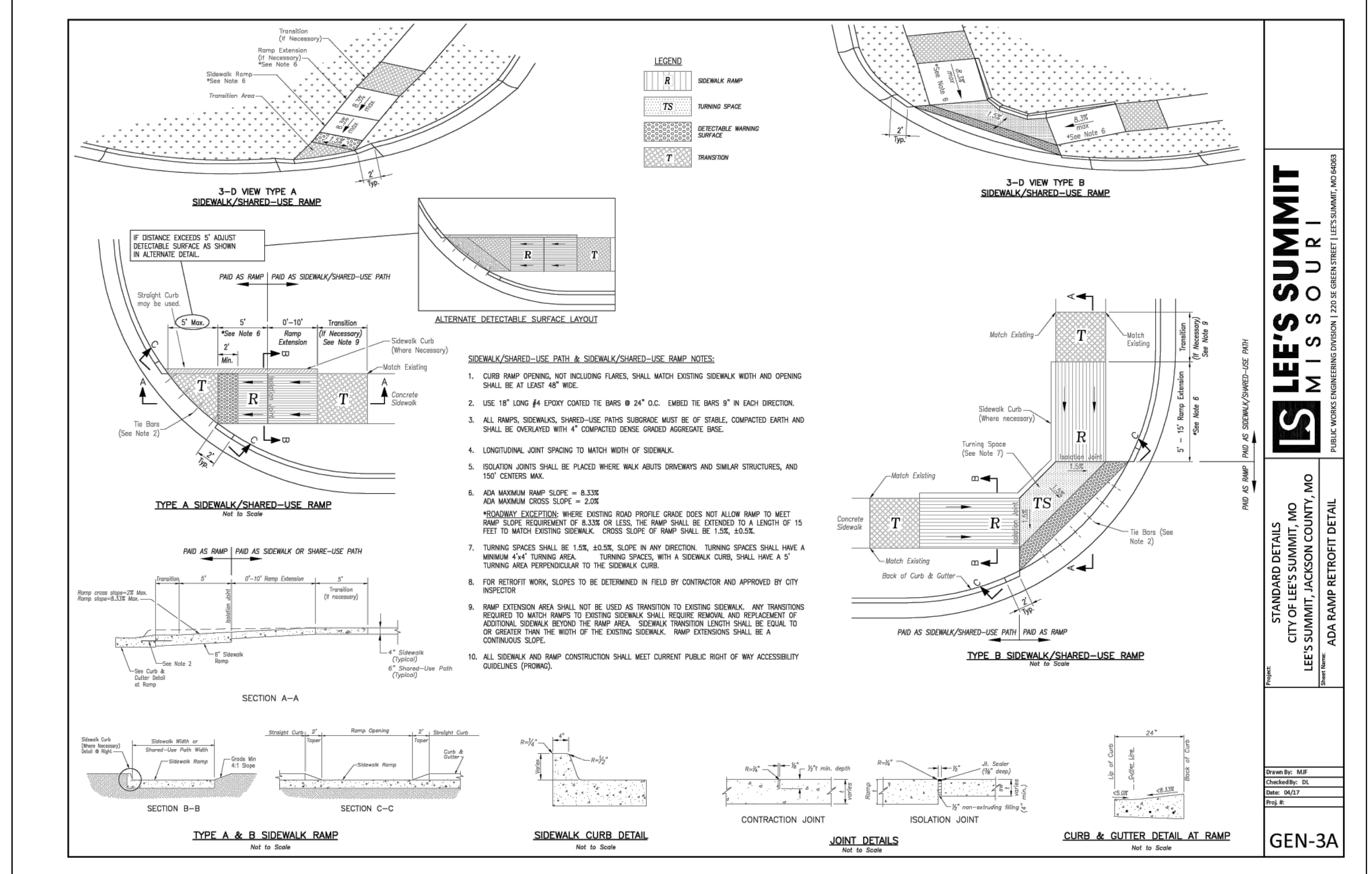
LEE'S SUMMIT MISSOURI
 PUBLIC WORKS ENGINEERING DIVISION | 220 SE GREEN STREET | LEE'S SUMMIT, MO 64082

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



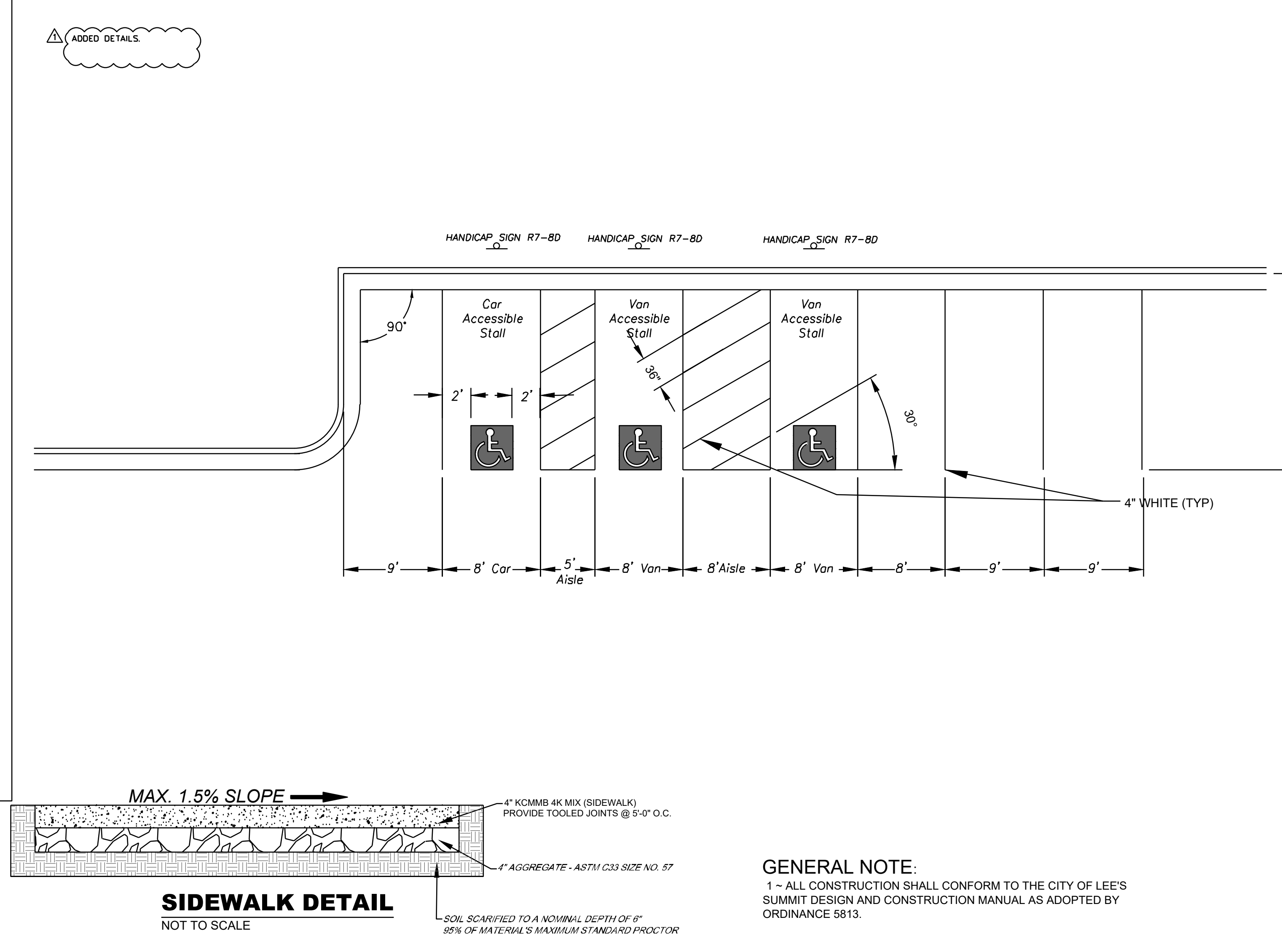
LEE'S SUMMIT MISSOURI
 PUBLIC WORKS ENGINEERING DIVISION | 220 SE GREEN STREET | LEE'S SUMMIT, MO 64082

STANDARD DETAILS
 CITY OF LEE'S SUMMIT, MO
 LEE'S SUMMIT, JACKSON COUNTY, MO
 DRIVEWAY DETAIL
 GEN-1

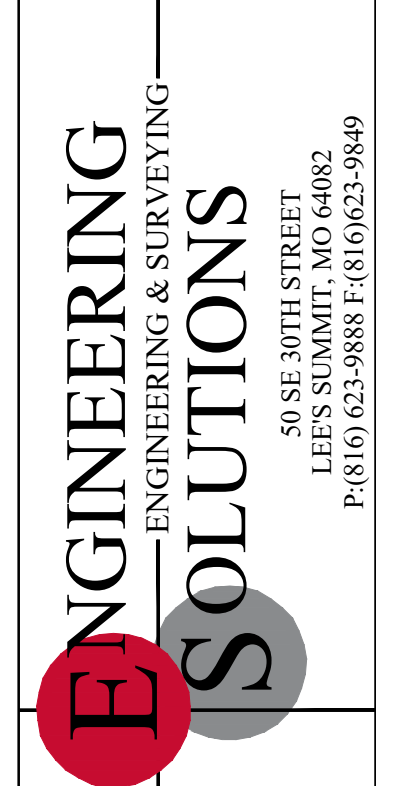


LEE'S SUMMIT MISSOURI
 PUBLIC WORKS ENGINEERING DIVISION | 220 SE GREEN STREET | LEE'S SUMMIT, MO 64082

STANDARD DETAILS
 CITY OF LEE'S SUMMIT, MO
 LEE'S SUMMIT, JACKSON COUNTY, MO
 ADA RAMP RETROFIT DETAIL
 GEN-3A



GEN-1

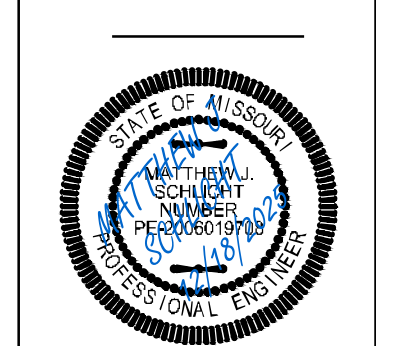


Professional Registration
 Missouri
 Engineering 2005002186-D
 Surveying 2005003818-D
 Kansas
 Engineering E-1695
 Surveying LS-218
 Oklahoma
 Engineering SC24
 Nebraska
 Engineering CA2821

100 NE DOUGLAS STREET
 Lee's Summit, Jackson County, Missouri

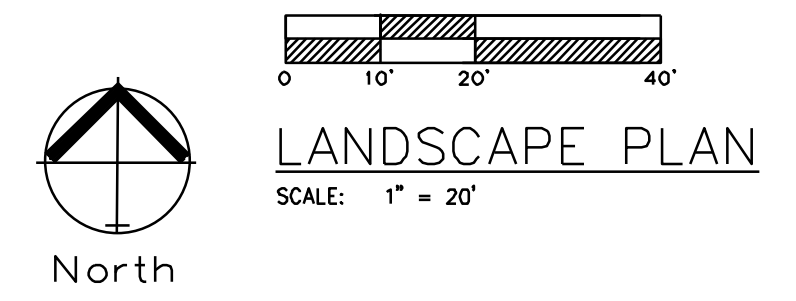
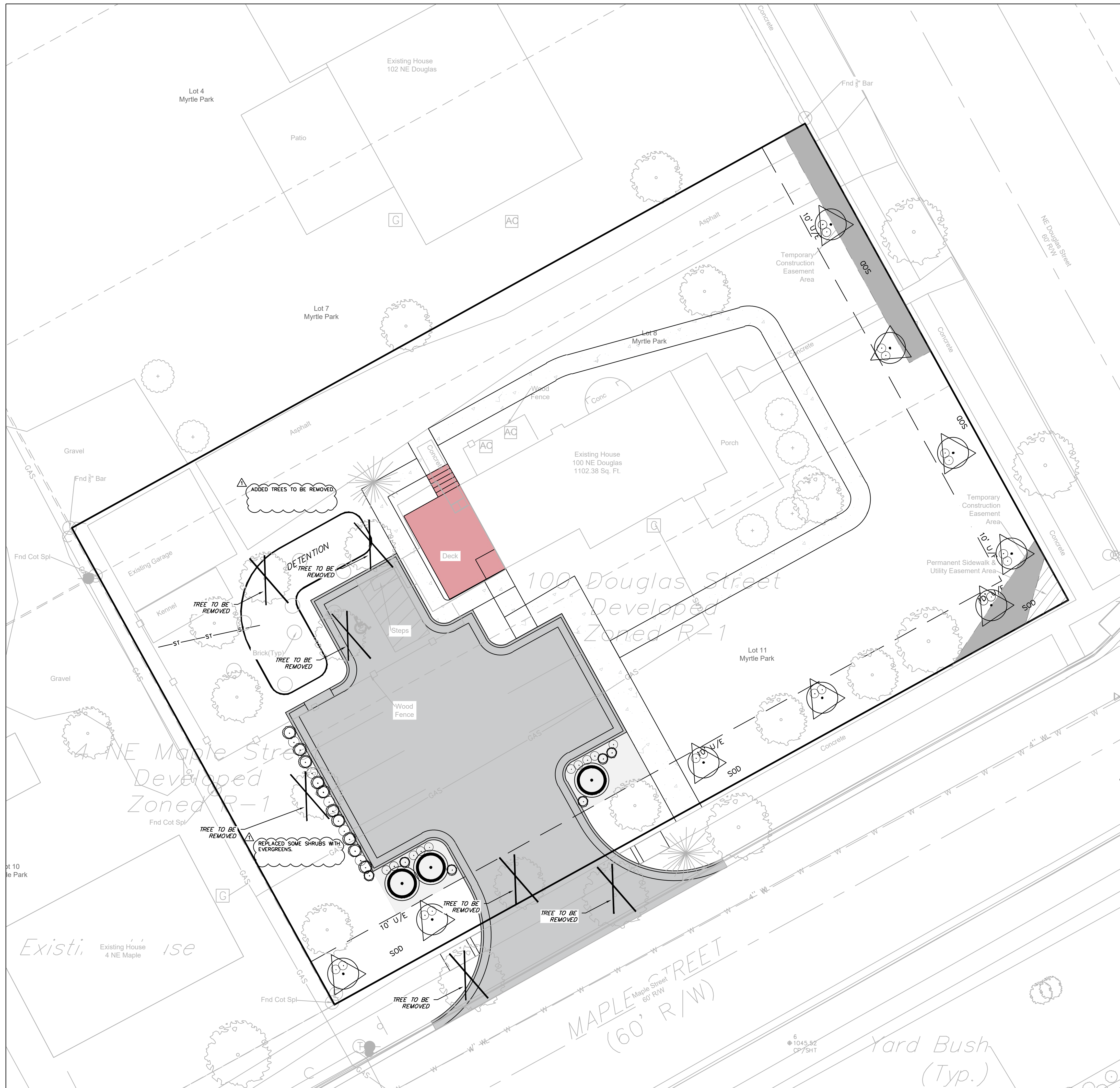
Project: 100NE DOUGLAS
 LSMD
 Issue Date: June 24, 2025

Standard Details
 Final Development Plans for:
 100 NE DOUGLAS STREET
 Lee's Summit, Jackson County, Missouri



Matthew J. Schlicht
 MO PE 000019708
 KS PE 19071
 OK PE 25226
 NE PE E-14335

REVISIONS
 REV. 12/18/2025



LANDSCAPE WORKSHEET			
	ORDINANCE REQUIREMENT	REQUIRED FOR THIS SITE	PROPOSED LANDSCAPE
14.090.A.1 Street Frontage Trees (Maple St)	1 tree per 30 feet of street frontage	140 ft. of street frontage /30= 5 trees required	5 Trees Provided
14.090.A.3 Street Frontage Shrubs (Maple St)	1 shrub per 20 feet of street frontage	140 ft. of street frontage /20= 7 shrubs required	10 shrubs provided
14.090.A.1 Street Frontage Trees (NE Douglas St)	1 tree per 30 feet of street frontage	111 ft. of street frontage /30= 4 trees required	4 Trees Provided
14.090.A.3 Street Frontage Shrubs (NE Douglas St)	1 shrub per 20 feet of street frontage	111 ft. of street frontage /20= 6 shrubs required	8 shrubs provided
14.090.B.1 Open Yard Shrubs	2 shrubs per 5000 sq. ft. of total lot area excluding building and parking	18,948 sq. ft. of total lot area minus 5,364 sq. ft. of bldg. & parking= 13,584 sq. ft. /5,000 x 2 = 6 shrubs	6 shrubs
14.090.B.3 Open Yard Trees	1 tree per 5000 sq. ft. of total lot area excluding building and parking.	18,948 sq. ft. of total lot area minus 5,364 sq. ft. of bldg. & parking= 13,584 sq. ft. /5,000 = 3 trees	3 Provided
14.110. Parking Lot Landscape	5% of entire parking area (spaces, aisles & drives); 1 island at end of every parking bay, min. 9' wide	3,606 sq. ft. of parking area x .05 = 180 sq. ft. of landscape parking lot islands required	306 sq. ft.
14.120 Screening of Parking Lot, Road	12 shrubs per 40 linear feet (must be 2.5 feet tall; berms may be combined with shrubs)	34 linear feet/40 x 12	10 shrubs provided

* STREET SHRUBS ARE SATISFIED WITH PARKING LOT SCREENING REQUIREMENTS.

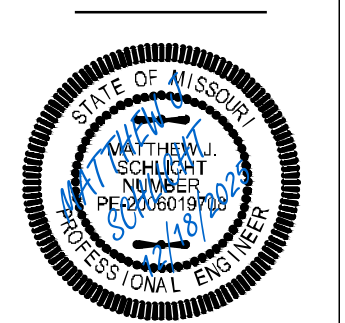
REVISD SHRUB TYPE.

PLANTING SCHEDULE:
 IS FOR PHASE 1 ONLY; AT FULL BUILD THE UNIFIED DEVELOPMENT ORDINANCE REQUIREMENTS SHALL BE MET.

SYMBOL	QUANT.	KEY	NAME	SIZE
tree	--	TA	AMERICAN BASSWOOD LINDEN TILIA AMERICANA	3.0" CAL
evergreen	16	SR	SKYROCKET JUNIPER JUNIPERUS SCOPULORUM "SKYROCKET"	8' HL
tree	3	RB	OKLAHOMA REDBUD CERCIS RENIFORMIS "OKLAHOMA"	3.0" CAL
shrub	39	VI	FIRE CHIEF Arborvitae	2 Gallon Pot
ornamental tree	9	SC	SPRING SNOW CRABAPPLE MALUS SP "SPRING SHOW"	1.5" CAL
tree	--	CG	COLORADO GREEN SPRUCE PICEA PUNGENS	2.5" CAL

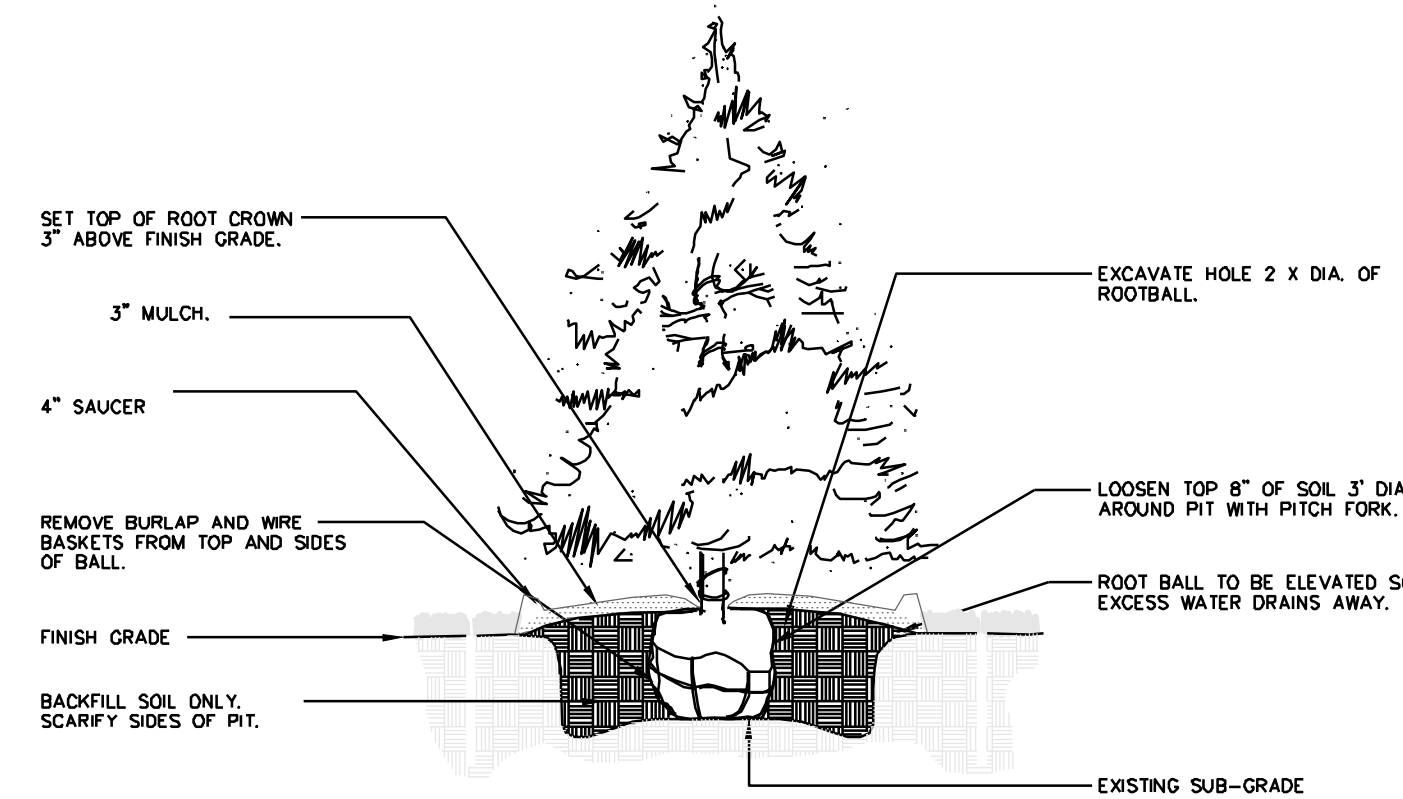
REVISD ORNAMENTAL TREES NUMBER IN TABLE.

REPLACED SOME SHRUBS WITH EVERGREENS.

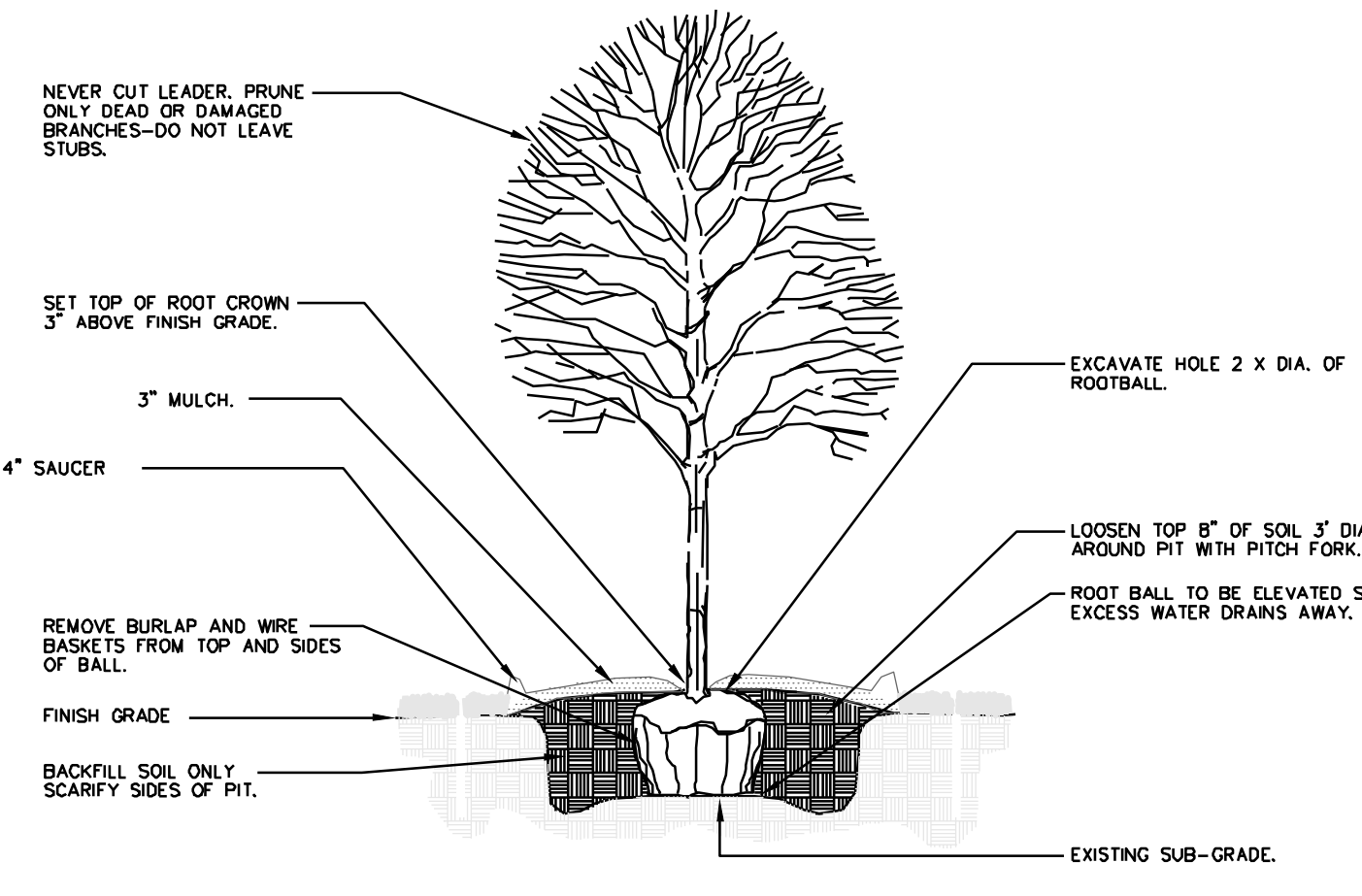


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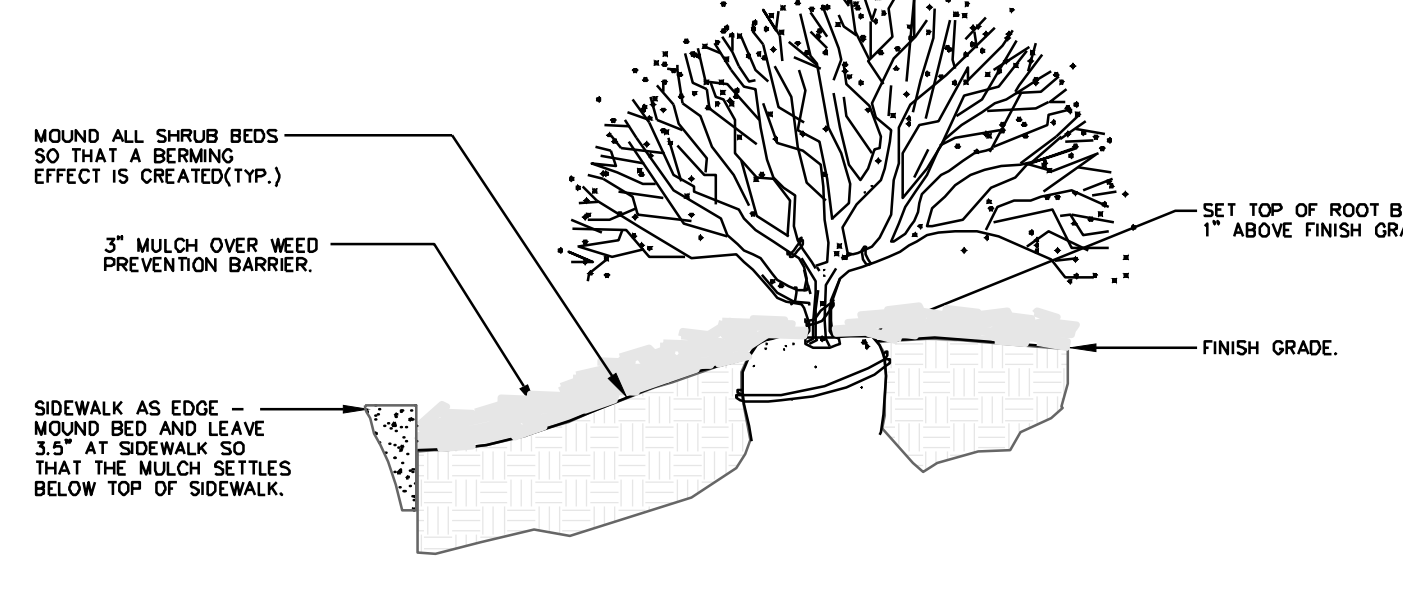
REVISIONS
 REV. 12/18/2025



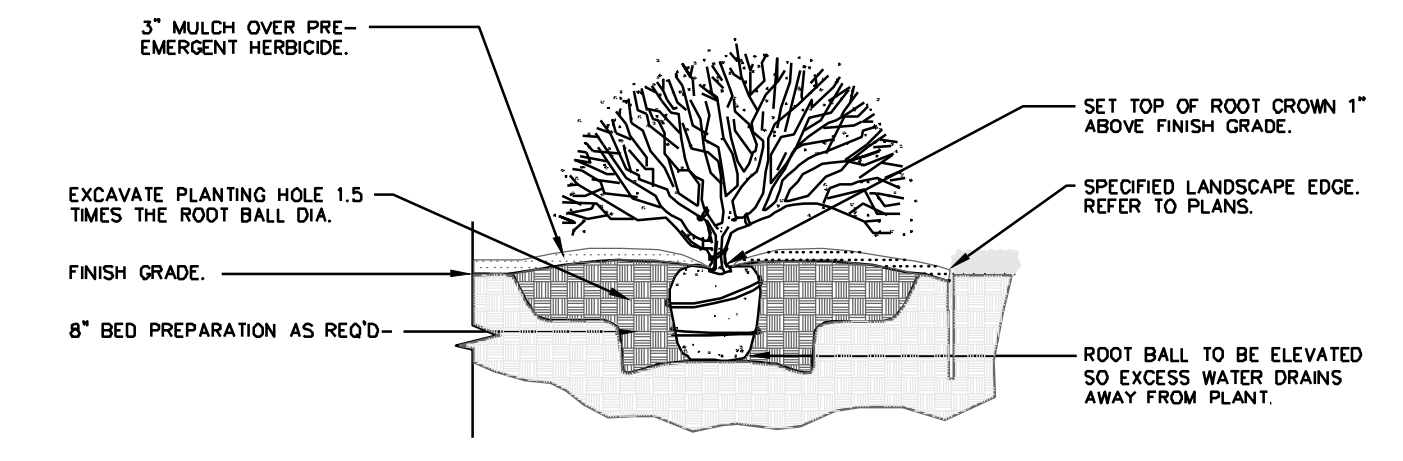
1 **EVERGREEN TREE PLANTING** NTA



2 **DECIDUOUS TREE PLANTING** NTA



3 **SIDEWALK EDGE AT PLANT BED** NTA



4 **SHRUB PLANTING** NTA

GENERAL LANDSCAPE NOTES:
PLANT MATERIAL

1. ALL PLANT MATERIAL SHALL BE FIRST CLASS REPRESENTATIVES OF SPECIFIED SPECIES, VARIETY OR CULTIVAR, IN HEALTHY CONDITION WITH NORMAL WELL DEVELOPED BRANCHES AND ROOT PATTERNS. PLANT MATERIAL MUST BE FREE OF OBJECTIONABLE FEATURES. PLANTS SHALL COMPLY IN ALL APPLICABLE RESPECTS WITH PROPER STANDARDS AS SET FORTH IN THE AMERICAN ASSOCIATION OF NURSERMEN'S "AMERICAN STANDARD OF NURSERY STOCK", ANSI Z601-2004.
2. SHRUBS SHALL BE CONTAINER GROWN AND WILL BE FREE OF DISEASE AND PESTS. NO BARE ROOT, ALL PLANT BEDS TO BE MULCHED TO A DEPTH OF 3" WITH DARK BROWN, HARDWOOD MULCH. PLANTING BEDS ARE TO BE FREE OF WEEDS AND GRASS. TREAT BEDS WITH A PRE-EMERGENT HERBICIDE PRIOR TO PLANTING AND MULCH PLACEMENT. APPLY IN ACCORDANCE WITH STANDARD TRADE PRACTICE.
3. HOLE AREA FOR TREE TO BE TWICE (2x) THE DIAMETER OF THE ROOT BALL AND ROOT BALL SHALL BE SLIGHTLY MOUNDED FOR WATER RUN-OFF.
4. ALL PLANT MATERIALS SHALL BE PROTECTED FROM THE DRYING ACTION OF THE SUN AND WIND AFTER BEING DUG WHILE BEING TRANSPORTED, AND WHILE AWAITING PLANTING. BALLS OF PLANTS WHICH CANNOT BE PLANTED IMMEDIATELY SHALL BE PROTECTED FROM DRYING ACTION BY COVERING THEM WITH MOST MULCH. PERIODICALLY APPLY WATER TO MULCH-COVERED BALLS TO KEEP MOST. IF PLANTING SHOULD OCCUR DURING GROWING SEASON, APPLY ANTI-DESICCANT TO LEAVES BEFORE TRANSPORT TO REDUCE THE LIKELIHOOD OF WINDBURN. REAPPLY ANTI-DESICCANT AFTER PLANTING TO REDUCE TRANSPIRATION. REMOVE TWINE AND BURLAP FROM ROOT BALLS' SOIL ON TOP OF CONTAINERIZED OR BALLED PLANTS IS TO BE REMOVED UNTIL ALL PLANTS' ROOT FLARES ARE EXPOSED. THIS IS THE NATIVE SOIL LINE AT WHICH PLANTING DEPTHS SHOULD BE MEASURED.
5. AFTER PLANTING IS COMPLETED, PRUNE MINIMALLY TO REMOVE DEAD OR INJURED TWIGS AND BRANCHES. PRUNE IN SUCH A MANNER AS NOT TO CHANGE THE NATURAL HABIT OR SHAPE OF THE PLANT. MAKE CUTS BACK TO BRANCH COLLAR, NOT FLUSH. DO NOT PAINT ANY CUTS WITH TREE PAINT. CENTRAL LEADERS SHALL NOT BE REMOVED.
6. GUARANTEE TREES, SHRUBS, GROUND COVER PLANTS FOR ONE CALENDAR YEAR FOLLOWING PROVISIONAL ACCEPTANCE OF THE OVERALL PROJECT. DURING THE GUARANTEE PERIOD, PLANTS THAT DIE DUE TO NATURAL CAUSES OR THAT ARE UNHEALTHY OR UNSIGHTLY IN CONDITION, SHALL BE REPLACED BY THE CONTRACTOR.

LAWN AND TURF AREAS

7. ALL LAWN AREAS TO BE SODDED AS SHOWN ON PLANS. SOD SHALL COMPLY WITH US DEPT. OF AGRICULTURE RULES AND REGULATIONS UNDER THE FEDERAL SEED ACT AND EQUAL IN QUALITY TO STANDARDS FOR CERTIFIED SEED. SOD SHALL BE HEALTHY, THICK TURF HAVING UNDERGONE A PROGRAM OF REGULAR FERTILIZING, MOWING AND WEED CONTROL. SEED AND SOD SHALL BE A TURF-TYPE TALL FESCUE (3 WAY) BLEND. SEED BLEND SHALL CONSIST OF THE FOLLOWING:

TURF-TYPE TALL FESCUE	90%
KENTUCKY BLUEGRASS	10%
8. ALL AREAS DISTURBED SHALL BE SODDED.

INSTALLATION

9. THE INSTALLATION OF ALL PLANT MATERIALS SHALL BE IN COMPLIANCE WITH THE REQUIREMENTS OF THE CITY OF LEE'S SUMMIT, MO, AND LANDSCAPE INDUSTRY STANDARDS.
10. ALL LANDSCAPE AREAS TO BE FREE OF ALL BUILDING DEBRIS AND TRASH, BACK FILLED WITH CLEAN FILL SOIL AND TOP DRESSED WITH 4" OF TOPSOIL. TOPSOIL SHALL HAVE A pH RANGE OF 5.5 TO 7 AND A 4% ORGANIC MATERIAL MINIMUM ASTM D5558.
11. PLANT BEDS TO BE "MOUNDED". ALL PLANT MATERIAL, PLANT BEDS, MULCH AND DUG EDGE ARE TO BE INSTALLED PER LANDSCAPE PLANS, DETAILS, AND MANUFACTURER'S RECOMMENDATIONS.
12. REESTABLISH FINISH GRADES TO WITHIN ALLOWABLE TOLERANCES ALLOWING 3/4" FOR SOD AND 3" FOR MULCH IN PLANT BEDS. HAND RAKE ALL AREAS TO SMOOTH EVEN SURFACES FREE OF DEBRIS, CLODS, ROCKS, AND VEGETATIVE MATTER GREATER THAN 1".
13. ALL PLANT BEDS, SHRUBS AND TREES SHALL BE MULCHED WITH 3" OF DARK BROWN, HARDWOOD MULCH, EXCEPT IF NOTED AS ROCK. DARK BROWN, HARDWOOD MULCH SHALL BE INSTALLED OVER DEWITT PRO 5 WEED CONTROL FABRIC IN PLANT BEDS ONLY.
14. CONTRACTOR IS RESPONSIBLE FOR INITIAL WATERING UPON INSTALLATION.
15. DUG EDGES ARE TO BE DUG WHERE MULCH BEDS ARE ADJACENT TO TURF AREAS. NO EDGING IS REQUIRED ADJACENT TO PAVEMENT OR CURB.
16. THE EXACT LOCATION OF ALL UTILITIES, STRUCTURES, AND UNDERGROUND UTILITIES SHALL BE DETERMINED AND VERIFIED ON SITE BY THE LANDSCAPE CONTRACTOR PRIOR TO INSTALLATION OF THE MATERIALS. DAMAGE TO EXISTING UTILITIES AND OR STRUCTURES SHALL BE REPLACED TO THEIR ORIGINAL CONDITION BY THE LANDSCAPE CONTRACTOR AT NO COST TO THE OWNER.
17. LANDSCAPE CONTRACTOR IS RESPONSIBLE FOR OBTAINING NECESSARY PERMITS AND APPROVALS AND RECORD INSPECTIONS BY LEGAL AUTHORITIES.
18. PROVISIONS SHALL BE MADE FOR READILY ACCESSIBLE IRRIGATION WITHIN 100' MAX. OF ALL LANDSCAPED AREAS INCLUDING ALL PLANT BEDS, INDIVIDUAL TREES, AND TURF AREAS. ALL LAWN AREAS (AS SHOWN ON PLANS) WILL BE IRRIGATED BY AN AUTOMATIC SPRINKLER SYSTEM. THE LANDSCAPE CONTRACTOR IS RESPONSIBLE FOR THE DESIGN AND INSTALLATION OF ALL IRRIGATION COMPONENTS, SLEEVING, PIPE, AND CONTROL. DESIGN DRAWINGS OF IRRIGATION SYSTEM SHALL BE SUBMITTED TO THE LANDSCAPE ARCHITECT AND OWNER FOR REVIEW AND APPROVAL PRIOR TO INSTALLATION.
19. ANY SUBSTITUTIONS OR DEVIATIONS SHALL BE REQUESTED IN WRITING BY THE CONTRACTOR FOR APPROVAL BY THE LANDSCAPE ARCHITECT PRIOR TO INSTALLATION OF PLANT MATERIALS. ALL PLANTS ARE TO BE LOCATED AS SPECIFIED ON DRAWINGS.

MAINTENANCE BY OWNER

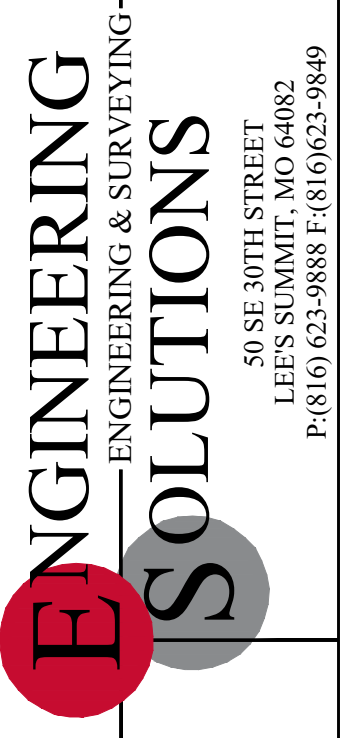
20. ALL SHRUBS ARE TO BE MAINTAINED IN THEIR NATURAL SHAPE TO ALLOW EVENTUAL GROWTH INTO A HEDGE.
21. MAINTAIN NATURAL HABIT OF ALL SPECIFIED PLANT MATERIAL.
22. NEW SOD TO BE THOROUGHLY WATERED UNTIL ROOTS "TAKE HOLD" OF SOD BED. CONTINUE WATERING AS REQUIRED, UNTIL COMPLETELY ESTABLISHED.

IRRIGATION PERFORMANCE SPECIFICATION:

THE FOLLOWING CRITERIA SHALL BE CONSIDERED MINIMUM STANDARDS FOR DESIGN AND INSTALLATION OF LANDSCAPE IRRIGATION SYSTEM:

1. GENERAL - IRRIGATION SYSTEM TO INCLUDE DRIP IRRIGATION OF SHRUB BEDS ADJACENT TO BUILDINGS, SPRAY HEADS IN THE PARKING ISLANDS, AND ROTORS AROUND THE PERIMETER OF THE PARKING LOTS. HEADS SHALL THROW AWAY FROM BUILDING AND ACID SPRAYING OVER SIDEWALKS.
2. IRRIGATION SYSTEM SHALL CONFORM TO ALL INDUSTRY STANDARDS AND ALL FEDERAL, STATE AND LOCAL LAWS GOVERNING DESIGN AND INSTALLATION.
3. WATERLINE TYP#, SIZE LOCATION, PRESSURE AND FLOW SHALL BE FIELD VERIFIED PRIOR TO SYSTEM DESIGN AND INSTALLATION.
4. ALL MATERIALS SHALL BE FROM NEW STOCK FREE OF DEFECTS AND CARRY A MINIMUM ONE YEAR WARRANTY FROM THE DATE OF SUBSTANTIAL COMPLETION.
5. THE IRRIGATION SYSTEM SHALL BE DESIGNED AND INSTALLED IN SUCH A WAY THAT ALL SYSTEM COMPONENTS OPERATE WITHIN THE GUIDELINES ESTABLISHED BY THE MANUFACTURER.
6. LAWN AREA AND SHRUB BEDS SHALL BE ON SEPARATE CIRCUITS.
7. PROVIDE WATER TAP, METER SET, METER VAULT AND ALL OTHER OPERATIONS NECESSARY TO PROVIDE WATER FOR IRRIGATION SHALL CONFORM TO LOCAL WATER GOVERNING AUTHORITY GUIDELINES AND STANDARDS.
8. BACKFLOW PREVENTION SHALL BE PROVIDED IN ACCORDANCE WITH STATE AND LOCAL REGULATIONS.
9. IRRIGATION CONTROLLER TO BE LOCATED IN UTILITY ROOM INSIDE BUILDING, AS IDENTIFIED BY OWNER.
10. IRRIGATION CONTROLLER STATIONS SHALL BE LABELED TO CORRESPOND WITH THE CIRCUIT IT CONTROLS.
11. CONTRACTOR SHALL PROVIDE TO THE OWNER WRITTEN OPERATION INFORMATION FOR ALL SYSTEM COMPONENTS.
12. CONTRACTOR SHALL PROVIDE TO THE OWNER ALL KEYS, ACCESS TOOLS, WRENCHES AND ADJUSTING TOOLS NECESSARY TO GAIN ACCESS, ADJUST AND CONTROL THE SYSTEM.
13. CONTRACTOR SHALL PROVIDE SHOP DRAWINGS TO THE OWNER FOR REVIEW AND APPROVAL PRIOR TO INSTALLATION.
14. AN AUTOMATIC RAIN SHUT-OFF OR MOISTURE DEVICE SHALL BE INSTALLED.
15. INSTALL SCHEDULE 40 PVC SLEEVES UNDER ALL CURBS, PAVING AND SIDEWALKS. SLEEVES TO BE TWICE THE SIZE OF THE LINE IT HOUSES.
16. INSTALL MANUAL DRAIN VALVES AT LOWEST POSSIBLE ELEVATION ON IRRIGATION MAIN TO ALLOW GRAVITY DRAINING OF MAIN DURING WINTER MONTHS. PROVIDE QUICK COUPLERS AT MULTIPLE LOCATIONS TO ALLOW FOR EASY "BLOWING OUT" OF LATERAL AND MAIN LINES.
17. ZONES OR NOZZLES SHALL BE DESIGNED WITH MATCHED PRECIPITATION RATES.
18. MINIMUM LATERAL DEPTH IS 15" AND MAIN DEPTH IS 18".
19. SUBMIT DESIGN DRAWING WITH BID TO ALLOW OWNER TO EVALUATE SYSTEM. INCLUDE CUT SHEETS OF ALL COMPONENTS AND ZONE TABLE ILLUSTRATING FLOWS AND ANTICIPATED PRESSURE AT FURTHEST HEAD.
20. AN "AS-BUILT" SCALED DRAWING SHALL BE PROVIDED TO THE OWNER BY THE CONTRACTOR AND SHALL INCLUDE UT NOT BE LIMITED TO THE FOLLOWING:
 - a. AS CONSTRUCTED LOCATION OF ALL COMPONENTS
 - b. COMPONENT NAME, MANUFACTURER, MODEL INFORMATION, SIZE AND QUANTITY
 - c. PIPE SIZE AND QUANTITY
 - d. INDICATION OF SPRINKLER HEAD SPRAY PATTERN
 - e. CIRCUIT IDENTIFICATION SYSTEM
 - f. DETAILED METHOD OF WINTERIZED SYSTEM

SUBMIT AS-BUILT DRAWING IN FULL SIZE DRAWING FORM AS WELL AS PDF ELECTRONIC FORMAT. (SCANNING FULL SIZE COPY OF PLAN IS ACCEPTABLE IF IT CAN BE PRINTED TO SCALE.)



Professional Registration
Missouri
Engineering 200502186-D
Surveying 2005008318-D
Kansas
Engineering E-1695
Surveying LS-218
Oklahoma
Engineering 6264
Nebraska
Engineering CA2821

Project:
100 NE DOUGLAS STREET
LSMO
Issue Date:
June 24, 2025

100 NE DOUGLAS STREET
Lee's Summit, Jackson County, Missouri

LANDSCAPE PLAN DETAILS
Final Development Plans for:
100 NE DOUGLAS STREET
Lee's Summit, Jackson County, Missouri



Matthew J. Schlicht
MO PE 2005019708
KS PE 19071
OK PE 25228
NE PE E-14335

REVISIONS

REV. 12/18/2025	