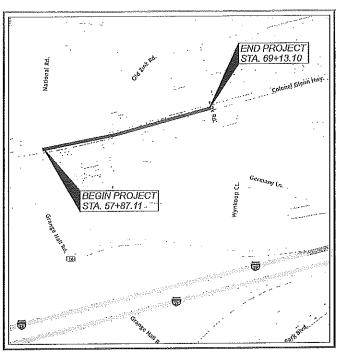
DESIGN AGENCY

KLEINGERS

KJC



#### **LOCATION MAP**

LATITUDE: 39°46'30" LONGITUDE: -84°04'40"



PORTION TO BE IMPROVED

#### DESIGN DESIGNATION

CURRENT ADT (2021)	19,100
DESIGN YEAR ADT (2036)	20,000
DESIGN HOURLY VOLUME (2036)	2,300
DIRECTIONAL DISTRIBUTION	50%
TRUCKS (24 HOUR B&C)	1.3%
DESIGN SPEED	45 MPH
LEGAL SPEED	45 MPH
DESIGN FUNCTIONAL CLASSIFICATION:	
03 PRINCIPLE ARTERIAL (URBAN)	
NHS PROJECT	YES

# STATE OF OHIO DEPARTMENT OF TRANSPORTATION

# GRE CR 1 1.07 COLONEL GLENN HIGHWAY

CITY OF BEAVERCREEK

GREENE COUNTY

### INDEX OF SHEETS:

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LIGHTING DETAILS	19-20

# FEDERAL PROJECT NUMBER

#### RAILROAD INVOLVEMENT

#### PROJECT DESCRIPTION

THIS PROJECT INCLUDES DECORATIVE HARDSCAPE ENHANCEMENTS TO COLONEL GLENN HIGHWAY FROM NATIONAL ROAD TO ZINK ROAD INCLUDING BRICK PAVERS, SEATING WALLS, AND LIGHTING. THIS PROJECT ALSO INCLUDES THE REPLACEMENT OF DETERIORATED SECTIONS OF SIDEWALK.

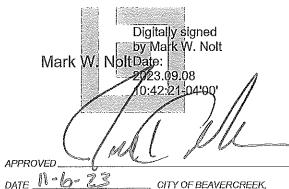
#### EARTH DISTURBED AREAS

PROJECT EARTH DISTURBED AREA: 0.12 ACRES ESTIMATED CONTRACTOR EARTH DISTURBED AREA: 0.0 NOTICE OF INTENT EARTH DISTURBED AREA: N/A (NOI NOT REQUIRED)

#### 2023 SPECIFICATIONS

THE STANDARD SPECIFICATIONS OF THE STATE OF OHIO, DEPARTMENT OF TRANSPORTATION, INCLUDING SUPPLEMENTAL SPECIFICATIONS LISTED IN THE PLANS AND CHANGES LISTED IN THE PROPOSAL SHALL GOVERN THIS IMPROVEMENT.

I HEREBY APPROVE THESE PLANS AND DECLARE THAT THE MAKING OF THIS IMPROVEMENT WILL NOT REQUIRE THE CLOSING TO TRAFFIC OF THE HIGHWAY AND THAT PROVISIONS FOR THE MAINTENANCE AND SAFETY OF TRAFFIC WILL BE AS SET FORTH ON THE PLANS AND ESTIMATES.

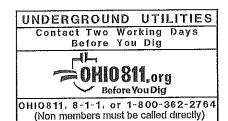


CITY OF BEAVERCREEK, CITY ENGINEER

# **DESIGN EXCEPTIONS**

#### ADA DESIGN WAIVERS

NOT REQUIRED



PLAN PREPARED BY:



ENGINEER'S SEAL:

ENGINEER'S SEAL:

LIGHTING PLANS ONLY

# FINAL TRACINGS - 9/8/2023

- January -	OFFICE AND ADMOTHUSTION DESIGNACE										LEMENTAL FICATIONS	SPECIAL PROVISIONS
BP-3.1	1/21/22	HL-10.11	7/15/22							800	4/21/23	
BP-5.1	7/15/22	HL-10.12	1/20/23							813	10/19/18	
BP-7.1		HL-10.13	1/20/23							832	7/21/23	
		HL-20.11	10/21/22							913	4/16/21	
LA-1.1	10/15/10	HL-30.11	1/15/21							<b>.</b>		
LA-2.1		HL-30.22	1/15/21							<b>!</b>		
		HL-60,11	7/21/17							L		
MT-95.31	7/19/19									ļ		
MT-101.90	7/17/20									ļ		
MT-105.10	1/17/20									ļ		
MT-110.10	7/19/13							J		L		
										<u> </u>		
TC-41.20	10/18/13									<u> </u>		
TC-42.20	10/18/13											
TC-52.20	1/15/21							1		<u> </u>		

GRE-CR-1

REVIEWER YSY 09/08/23 ROJECT IO 115009

MAG NAIL SET STA. 61+32.98, 73.27' RT N: 650259.91 E: 1524970.78 ELEV: 986.59 CROSS NOTCH STA. 57+59.24, 45.05' LT N: 650303.32 E: 1524580.37 ELEV: 978.12

CROSS NOTCH STA. 68.94.59, 52.38' LT N: 650567.18 E: 1525680.47 ELEV: 993.88

LOT 1 SONIC PLAT ZINK ROAD LOT 3 LOT 17 P.B. 36 PG. 381A-B MEIJER 107 P.C. 34 PG. 174A-175A B42-0001-0009-0-0104-00 MEIJER STORES LIMITED PARTNERSHIP VOL. 1498 PG. 281 FRANK REESE PLAT P.B. 30 PG. 397A & 397B B42-0001-0009-0-0024-00 SRI REAL ESTATE PROPERTIES LLC 2019002569 B42-0001-0002-0-0098-00 WAFFLE HOUSE, INC VOL. 1054 PG. 602 0.541 ACRES (DEED) END PROJECT STA. 69+13.10 BEGIN PROJECT STA, 57+87.11 ·== 0 STA 68+94.59 OFF -52.38' FXR/W - X R/W 68 67 **Ø** CONSTRUCTION -65 561.26' 63 STA 57+59,24 OFF -45.05' STA 61+32.98 OFF 73.27' COLONEL GLENN HIGHWAY # | [CCC) B42-0001-0009-0-0094-00 WILLIAM AYERS TRUSTEE 2019021209 1.101 ACRES (DEED) CURVE DATA
P.I. = Sta. 72+55.94
A = 02\*59'45" RT
Dc = 00\*19'59"
R = 17,207.75'
T = 449.97' CURVE DATA P.I. = Sta. 59+62.97 A = 05°38'21" LT Dc = 01°00'00" R = 5,729.65' B42-0001-0009-0-0044-00 JERRY J KRUG VOL. 800 PG. 744  $L = 899.74^{\circ}$ T = 282.19'E = 5.88'B42-0001-0009-0-0092-00 KIDD INVESTMENTS LTD VOL. 1652 PG. 907 L = 563,92° WRIGHT PARTNERS SUBDIVISION
P.C. 35 PG. 171B-172B
B42-0001-0009-0-0113-00
WRIGHT PARTNERS E = 6.94'

CONTROL POINTS



CR 1 1.07 COL. GLENN HWY. SCHEMATIC LAYOUT

GRE

HORIZONTAL SCALE IN FEET

DESIGNER KJC REVIEWER YSY 09/08/23 PROJECT IO 115009

SHEET TOTAL 2 20

WATER & SANITARY: GREENE COUNTY SANITARY ENGINEERS 667 DAYTON-XENIA ROAD XENIA, OH 45385 937-562-5000 ATTN: RANDY GILBERT RGILBERT@CO.GREENE.OH.US ATTN: MARISSA RAGLIN MRAGLIN@CO.GREENE.OH.US

ELECTRIC AND GAS: 1900 DRYDEN RD. DAYTON, OH 45439 937-554-9063 ATTN: BILL WARD WILLIAM.WARD@AES.COM

VECTREN 6500 CLYO ROAD CENTERVILLE, OH 45459 937-312-2521 ATTN: JEFF PIKE AND JEFF DONNELLY PUBLICPROJECT@CENTERPOINTENERGY.COM JEFFRY.T.PIKE@CENTERPOINTENERGY.COM JEFFRY.DONNELLY@CENTERPOINTENERGY.COM

**EVERSTREAM SOLUTIONS** 1065 WOODMAN DRIVE DAYTON, OH 45432 ATTN: KANN KHAY KKHAY@EVERSTREAM.NET

TELEPHONE: AT&T OHIO 7201 FAR HILLS AVENUE CENTERVILLE, OH 45459 937-296-3588 ATTN: ALAN STUTES AS1634@ATT.COM

CROWN CASTLE FIBER (LIGHTOWER) 10188 INTERNATIONAL BLVD CINCINNATI, OH 45246 216-810-7165 ATTN: CRAIG SNELL CRAIG.SNELL@CROWNCASTLE.COM

BRIGHTSPEED ATTN: LESLIE DINGMAN RELOCATION@LUMEN.COM LESLIE.DINGMAN@LUMEN.COM

CHARTER (SPECTRUM) - DAYTON 3691 TURNER ROAD DAYTON, OH 45415 ATTN: MARY EVANS DL-SOUTHERN-OHIO-OUTSIDE-PLANT@CHARTER.COM MARY, EVANS@CHARTER, COM

221 E 4TH STREET (BUILDING 121-900) CINCINNATI, OH 45202 513-565-7187 ATTN: BRECK COWAN ROADPROJECTS@CINBELL.COM BRECK.COWAN@ALTAFIBER.COM

METRONET 336 EAST NATIONAL ROAD VANDALIA, OHIO 45377 937-576-1556

STORM SEWER: CITY OF BEAVERCREEK - ENGINEERING 1368 RESEARCH PARK DRIVE BEAVERCREEK, OH 45432 937-427-5513 ATTN: JEFF MOORMAN MOORMAN@BEAVERCREEKOHIO.GOV

CITY OF BEAVERCREEK 789 ORCHARD LANE BEAVERCREEK, OH 45432 STREET SUPERINTENDENT 937-427-5540 BRANDENBURG@BEAVERCREEKOHIO.GOV

UTILITY NOTIFICATION
ALL PROPER PRECAUTIONS SO AS NOT TO DISTURB OR DAMAGE SUBSURFACE IMPROVEMENTS SHALL BE OBSERVED. THE CONTRACTOR SHALL CONTACT THE OHIO UTILITIES PROTECTION SERVICE (OUPS) 48 HOURS PRIOR TO ANY EXCAVATION OR DIGGING TO ASSURE UNDERGROUND UTILITY LOCATIONS. (1800-362-2764). IT SHALL BE THE UTILITY COMPANY'S RESPONSIBILITY TO PROTECT SUCH UNDERGROUND UTILITIES, THE CONTRACTOR SHALL BE RESPONSIBLE FOR REPAIR OF ANY DAMAGED UTILITIES AT HIS OWN COST. LOCATIONS OF UTILITIES ARE APPROXIMATE AND MAY NOT BE COMPLETE, THE CONTRACTOR SHOULD VERIFY WITH THE APPROPRIATE UTILITY COMPANY. THE COST FOR THE ABOVE DESCRIBED WORK IS INCIDENTAL TO THE OVERALL BID PRICE OF THE PROJECT, CONTRACTOR MAY NEED TO HAND DIG IN CERTAIN AREAS OR ALTER PLANTING LAYOUTS TO ENSURE NO UTILITY CONFLICTS

COOPERATION WITH UTILITY COMPANIES
WHILE THE WORK OF THIS CONTRACT IS BEING PERFORMED, THE UTILITY COMPANIES MAY BE WORKING IN THE AREA ADJUSTING AND RESETTING EXISTING FACILITIES, THE CONTRACTOR SHALL FULLY COOPERATE WITH UTILITY COMPANIES SO THAT THE ENTIRE WORK IS COMPLETED IN A MANNER CONSISTENT WITH GOOD CONSTRUCTION PRACTICES. THE CONTRACTOR, UTILITIES, AND ENGINEER SHALL DISCUSS THE NECESSARY CONSTRUCTION SCHEDULES TO COMPLETE THE PROJECT AT THE PRE-CONSTRUCTION MEETING.

ALL UTILITIES WHICH ARE SHOWN OR LOCATED DURING THE COURSE OF CONSTRUCTION THAT ARE FOUND TO BE IN CONFLICT WITH THESE PLANS ARE TO BE RELOCATED OR ADJUSTED BY THE OWNER

PROTECTING EXISTING UNDERGROUND UTILITIES
THE CONTRACTOR SHALL BE RESPONSIBLE FOR STAKING, MARKING, OR OTHERWISE DESIGNATING THE LOCATIONS OF THE UNDERGROUND UTILITIES IN THE CONSTRUCTION AREAS IN SUCH A MANNER AS TO INDICATE THEIR COURSE TOGETHER WITH THE APPROXIMATE DEPTH OF WHICH THEY WERE INSTALLED. THE MARKING OR LOCATING SHALL BE COORDINATED TO STAY APPROXIMATELY TWO DAYS AHEAD OF PLANNED CONSTRUCTION. EXTREME CARE SHALL BE TAKEN IN THE VICINITY OF THE EXISTING UTILITIES. IT SHALL BE THE RESPONSIBILITY OF THE CONTRACTOR TO ISOLATE, BRACE, SUPPORT, SHEET, ETC. AND PROTECT THE EXISTING UTILITY FROM MOVING EITHER HORIZONTALLY OR VERTICALLY. IF SUCH MOVEMENT DOES OCCUR DUE TO THE CONTRACTOR'S OPERATIONS, HE SHALL REPAIR THE UTILITY AT HIS EXPENSE. THE CONTRACTOR MAY ELECT TO REMOVE AND RECONSTRUCT PORTIONS OF THE EXISTING UTILITY AT HIS OWN EXPENSE IF HE SO DESIRES. SHOULD AN UNLOCATED OR AN EXTREME VARIANCE IN LOCATION OF

DO NOT INTERRUPT EXISTING UTILITIES SERVING FACILITIES OCCUPIED AND USED BY THE ENGINEER OR OTHERS, EXCEPT WHEN PERMITTED IN WRITING BY THE ENGINEER AND THEN ONLY AFTER ACCEPTABLE TEMPORARY UTILITY SERVICING HAS BEEN PROVIDED. COOPERATION WITH THE ENGINEER IN KEEPING RESPECTIVE SERVICES AND FACILITIES IN OPERATION IS ESSENTIAL. IT SHALL BE THE RESPONSIBILITY OF THE CONTRACTOR TO PERFORM HIS WORK IN SUCH A MANNER AS NOT TO DAMAGE OR DESTROY ANY EXISTING UTILITY. IF ANY SUCH DAMAGE DOES OCCUR DUE TO THE CONTRACTOR'S OPERATIONS, HE SHALL NOTIFY THE ENGINEER IMMEDIATELY AND REPLACE THE DAMAGED PORTION IMMEDIATELY, AND AT HIS EXPENSE

A UTILITY BE ENCOUNTERED DURING EXCAVATION, CONSULT THE

IGINEER IMMEDIATELY FOR DIRECTIONS.

CLEARING AND GRUBBING ALTHOUGH THERE ARE NO TREES OR STUMPS SPECIFICALLY MARKED FOR REMOVAL WITHIN THE LIMITS OF THE PROJECT, A LUMP SUM QUANTITY IS INCLUDED IN THE GENERAL SUMMARY FOR ITEM 201, CLEARING AND GRUBBING. ALL PROVISIONS AS SET FORTH IN THE SPECIFICATIONS UNDER THIS ITEM ARE INCLUDED IN THE LUMP SUM PRICE BID FOR ITEM 201, CLEARING AND GRUBBING.

**ELEVATION DATUM** 

USE THE FOLLOWING VERTICAL POSITIONING AND HORIZONTAL POSITIONING PARAMETERS FOR ALL SURVEYING

VERTICAL POSITIONING ORTHOMETERIC HEIGHT DATUM: NAVO 88 GEOID: GEOID 18

HORIZONTAL POSITIONING REFERENCE FRAME: US STATE PLANE 1983 **FLLIPSOID: WGS 84** MAP PROJECTION: LAMBERT CONFORMAL COORDINATE SYSTEM: STATE PLANE OHIO SOUTH ZONE COMBINED SCALE FACTOR: 1.0000801199

ORIGIN OF COORDINATE SYSTEM: 651415,2462, 1529881.3645

UNITS ARE IN U.S. SURVEY FEET. USE THE FOLLOWING CONVERSION FACTOR: 1 METER= 3,280833333 U.S. SURVEY FEET.

STANDARD SPECIFICATIONS

THE STANDARD SPECIFICATIONS OF THE CITY OF BEAVERCREEK AND THE STATE OF OHIO, DEPARTMENT OF TRANSPORTATION, CONSTRUCTION AND MATERIALS SPECIFICATIONS (CMS), DATED JANUARY 1, 2023, AND THE NOTED STANDARD CONSTRUCTION DRAWINGS SHALL GOVERN THIS IMPROVEMENT.

WHEREVER THE WORD "DIRECTOR" OR "ENGINEER" OCCURS, IT IS TO MEAN THE CITY OF BEAVERCREEK ENGINEER AND/OR HIS DESIGNATED REPRESENTATIVE, LIMITED TO THE PARTICULAR DUTIES ENTRUSTED TO HIM.

THE WORK LIMITS SHOWN ON THESE PLANS ARE FOR THE PHYSICAL CONSTRUCTION, PROVIDE THE INSTALLATION AND OPERATION OF ALL WORK ZONE TRAFFIC CONTROL AND WORK ZONE TRAFFIC CONTROL DEVICES REQUIRED BY THESE PLANS WHETHER INSIDE OR OUTSIDE THESE WORK LIMITS.

PROTECTION OF AREA OUTSIDE WORK LIMITS

THE CONTRACTOR SHALL BE RESPONSIBLE FOR THE PROTECTION OF AREAS OUTSIDE OF THE DESIGNATED WORK LIMITS, BUT WHICH MAY BE ADJACENT TO THOSE WORK LIMITS. THIS WILL INCLUDE THOSE AREAS USED BY CONSTRUCTION TRAFFIC FOR ACCESS TO AND FROM THE WORK AREAS. WHERE THE ENGINEER DETERMINES THAT THE CONTRACTOR'S OPERATIONS HAVE BEEN RESPONSIBLE FOR DAMAGE TO AREAS OUTSIDE OF THE WORK LIMITS, THE CONTRACTOR SHALL BE RESPONSIBLE FOR THE REPAIR OF THE AREA SUBJECT TO THE APPROVAL OF THE ENGINEER. NO ADDITIONAL COMPENSATION WILL BE DUE TO THE CONTRACTOR FOR ANY REPAIR OF THESE AREAS.

SUBSURFACE CONDITIONS PRIOR TO BIDDING THE WORK, THE CONTRACTOR SHALL EXAMINE AND INSPECT THE CONSTRUCTION SITE TO DETERMINE THE LOCATION OF THE WORK WITH RESPECT TO THE OBSTACLES TO BE ENCOUNTERED INCLUDING, WITHOUT LIMITATION, THE CHARACTER OF SURFACE OR SUBSURFACE CONDITIONS AND SHALL MAKE SUCH ADDITIONAL INVESTIGATION AS THEY MAY DEEM NECESSARY FOR THE PLANNING AND PROPER EXECUTION OF THE WORK, INCLUDING CONTACTING AND COORDINATING WITH UTILITY COMPANIES FOR MOVES, SUPPORT, TEMPORARY SERVICE, ETC.

THE CONTRACTOR SHALL BE RESPONSIBLE FOR COMPLYING WITH ALL FEDERAL, STATE, AND LOCAL SAFETY REQUIREMENTS AND EXERCISING PRECAUTIONS AT ALL TIMES FOR THE PROTECTION OF PERSONS AND PROPERTY, IT IS THE RESPONSIBILITY OF THE CONTRACTOR TO INITIATE, MAINTAIN, AND SUPERVISE ALL SAFETY REQUIREMENTS, PRECAUTIONS, AND PROGRAMS IN CONNECTION WITH THE WORK.

THE CONTRACTOR SHALL COORDINATE WITH THE CITY FOR FROSION & SEDIMENT CONTROL THROUGH THE LIFE OF THE PROJECT. THIS MAY INVOLVE THE USE OF SILT FENCE, DIKES, SEDIMENT PITS, MULCHES, FILTER FABRICS, AND OTHER DEVICES AND METHODS, PARTICULAR CARE SHALL BE TAKEN TO AVOID EROSION AND SEDIMENTATION ON EXISTING PAVED AND GRAVELED

PROJECT CONTROL AND STATIONING

THE PROJECT CONTROL INCLUDING REFERENCE POINTS, BENCHMARKS, STATIONING, ALIGNMENTS AND COORDINATES PROVIDED IN THIS PLAN ARE PER SURVEY PERFORMED BY THE **PAY ITEMS** 

THE CONTRACTOR'S BID SHALL INCLUDE ALL ITEMS NECESSARY TO MAKE A COMPLETE PROJECT AS SHOWN ON THESE PLANS, ALL ASSOCIATED AND MISCELLANEOUS COSTS SHALL BE INCLUDED IN THE PRICE BID FOR THE VARIOUS ITEMS LISTED IN THE GENERAL

ALL ITEMS OF WORK CALLED FOR ON THE PLANS FOR WHICH NO SPECIFIED METHOD OF PAYMENT IS PROVIDED SHALL BE PERFORMED BY THE CONTRACTOR, AND THE COST OF SAME SHALL BE INCLUDED IN THE BID PRICE FOR RELATED ITEMS.

ITEM 608 - WALKWAY, MISC.: UNIT PAVER SEE DETAILS 1 & 5 / SHEET 12

THIS WORK SHALL CONSIST OF THE CONSTRUCTION OF CLAY UNIT PAVER PATIO AREAS, CLAY UNIT PAVERS IN THE TREE LAWN, AND AT THE CORNER OF THE STREET INTERSECTIONS AS SHOWN ON THE PLANS AND PER THE DETAILS SHOWN IN THESE PLANS. THE WORK SHALL INCLUDE ALL EXCAVATION, EMBANKMENT, SUBGRADE PREPARATION, AGGREGATE BASE, CONCRETE BASE, SETTING BED, JOINT SAND, PAVERS AND OTHER LABOR, EQUIPMENT, MATERIALS AND APPURTENANCES REQUIRED TO CONSTRUCT PAVER PLAZAS AS SHOWN ON THE PLANS.

PAVERS SHALL BE NOMINALLY 4" X 8" X 2 1/2" CLAY BRICK, SOLID (UNCORED), COMPLYING WITH REQUIREMENTS OF ASTM C902. CLASS SIX, TYPE 1 STANDARD SPECIFICATIONS FOR PEDESTRIAN PAVING.

COLOR SHALL BE A BLEND TO MATCH THE CITY OF BEAVERCREEK STANDARD. THE PAVER TYPE SHALL MATCH WHITACRE GREER COLOR 80 (CLEAR RED), COLOR 92 (ANTIQUE) AND COLOR 43 (TANGERINE) OR THE COLOR RANGE OF THE 'ENGLISH EDGE FULL RANGE' MANUFACTURED BY THE PINE HALL COMPANY. CONTRACTOR TO PROVIDE SAMPLES TO THE CITY OF BEAVERCREEK FOR APPROVAL PRIOR TO CONSTRUCTION, CONTRACTOR TO PERFORM MOCK UP OF PAVER LAYOUT TO BE APPROVED BY THE CITY OF BEAVERCREEK PRIOR TO INSTALLATION OF UNIT PAVERS.

FINAL GOLOR SHALL BE SELECTED BY THE CITY OF BEAVERCREEK ENGINEER FROM MANUFACTURER'S FULL RANGE OF STANDARD COLORS, SUBMIT FULL SIZE UNITS FOR SELECTION PRIOR TO

SAND FOR SETTING BED SHALL BE SOUND, SHARP, WASHED, NATURAL SAND OR CRUSHED STONE COMPLYING WITH GRADATION REQUIREMENTS IN ASTM C 33/C 33M FOR FINE AGGREGATE.

SAND FOR JOINTS SHALL BE FINE, SHARP, WASHED, NATURAL SAND OR CRUSHED STONE WITH 100 PERCENT PASSING NO. 16 SIEVE AND NO MORE THAN 10 PERCENT PASSING NO. 200 SIEVE, MIXED WITH POLYMERS FOR PAVEMENT JOINT STABILIZATION.

DO NOT USE FROZEN MATERIALS OR BUILD ON FROZEN SUBGRADE OR SETTING BEDS. PLACE BITUMINOUS SETTING BED ONLY WHEN AMBIENT TEMPERATURE IS ABOVE 40 DEGREES F AND WHEN BASE IS

MIX PAVERS FROM SEVERAL PALLETS OR CUBES, AS THEY ARE PLACED, TO PRODUCE UNIFORM BLEND OF COLORS AND TEXTURES.

CUT UNIT PAVERS WITH MOTOR-DRIVEN MASONRY SAW EQUIPMENT TO PROVIDE PATTERN INDICATED AND TO FIT ADJOINING WORK NEATLY, USE FULL UNITS WITHOUT CUTTING WHERE POSSIBLE. JOINT PATTERN SHALL BE AS INDICATED ON THE DRAWIN

DO NOT EXCEED 1/16-INCH UNIT-TO-UNIT OFFSET FROM FLUSH (LIPPAGE) NOR 1/8 INCH IN 24 INCHES AND 1/4 INCH IN 10 FEET FROM LEVEL, OR INDICATED SLOPE, FOR FINISHED SURFACE OF PAVING.

INSTALL ALL EDGE RESTRAINTS BEFORE PLACING UNIT PAVERS.

PLACE LEVELING COURSE AND SCREED TO A THICKNESS OF 1 TO 1-1/2 INCHES, TAKING CARE THAT MOISTURE CONTENT REMAINS CONSTANT AND DENSITY IS LOOSE AND UNIFORM UNTIL PAVERS ARE SET AND COMPACTED

TREAT LEVELING COURSE WITH HERBICIDE TO INHIBIT GROWTH OF

PLACE PAVERS CAREFULLY BY HAND IN STRAIGHT COURSES, MAINTAINING ACCURATE ALIGNMENT AND UNIFORM TOP SURFACE. PROTECT NEWLY LAID PAVERS WITH PLYWOOD PANELS ON WHICH WORKERS CAN STAND, IF ADDITIONAL LEVELING OF PAVING IS REQUIRED, AND BEFORE TREATING JOINTS, ROLL PAVING WITH POWER ROLLER.

PLACE UNIT PAVERS WITH HAND-TIGHT JOINTS, FILL JOINTS BY SWEEPING POLYMERIC SAND OVER PAVED SURFACE UNTIL JOINTS ARE FILLED, REMOVE EXCESS SAND AFTER JOINTS ARE FILLED.

REMOVE AND REPLACE UNIT PAVERS THAT ARE LOOSE, CHIPPED, BROKEN, STAINED, OR OTHERWISE DAMAGED OR THAT DO NOT MATCH ADJOINING UNITS. PROVIDE NEW UNITS TO MATCH ADJOINING UNITS AND INSTALL IN SAME MANNER AS ORIGINAL UNITS, WITH SAME JOINT TREATMENT AND WITH NO EVIDENCE OF REPLACEMENT

PAYMENT SHALL BE AT THE PER SQUARE FOOT UNIT PRICE INSTALLED OF ITEM 608 - WALKWAY MISC.: UNIT PAVER, COMPLETE, WHICH SHALL INCLUDE LAYOUT, EXCAVATION, DISPOSAL OF EXCESS MATERIAL, PREPARATION OF SUBGRADE PER ODOT 608, SAND BED, EDGE RESTRAINT, AND PAVERS, THIS ITEM SHALL INCLUDE ALL LABOR, EQUIPMENT AND MATERIALS SHALL BE INCLUDED IN THE CONTRACT UNIT PRICE FOR ITEM 608 - WALKWAY MISC.: UNIT PAVER, ITEM 305 CONCRETE BASE, ITEM 304 AGGREGATE BASE, AND ITEM 204 SUBGRADE COMPACTION ARE QUANTIFIED SEPARATELY.

DESIGN AGENCY



ESIGNER

KJC REVIEWER YSY 09/08/23 PROJECTIO

115009

TOTAL 20

1.07

ITEM 623 CONSTRUCTION LAYOUT STAKES

IT IS THE CONTRACTORS RESPONSIBILITY TO LAYOUT CONSTRUCTION STAKES FOR THE PROJECT. THIS WORK CONSISTS OF FURNISHING, PLACING, AND MAINTAINING CONSTRUCTION LAYOUT STAKES NECESSARY FOR THE PROPER EXECUTION OF THE WORK UNDER THE CONTRACT AND REMOVING ALL STAKES AT THE COMPLETION OF THE PROJECT.

#### GENERAL REQUIREMENTS

PER JANUARY 1, 2023 ODOT CONSTRUCTION & MATERIAL SPECIFICATIONS MANUAL ALL PLANT MATERIALS, TURF GRASS, AND PLANTING OPERATIONS TO MEET OR EXCEED STANDARDS SET OUT IN ODOT ITEMS 659, 661, & 662, UNLESS OTHERWISE NOTED. CONTRACTOR SHALL PROVIDE AN ONA (OHIO NURSERYMAN'S ASSOCIATION) CERTIFIED LANDSCAPE TECHNICIAN TO SUPERVISE THE PLANTING OPERATIONS.

ITEM 659 SEEDING AND MULCHING, AS PER PLAN THIS ITEM SHALL CONSIST OF FURNISHING ALL LABOR, TOOLS, MACHINERY, MATERIALS, AND PROCESSES REQUIRED FOR THE PLANTING OF SEEDED AREAS. SEEDING SHALL OCCUR TO THE PROJECT LIMITS SHOWN ON THE PLANS. ALL AREAS DISTURBED BY CONSTRUCTION, SHALL BE RESTORED, FINE GRADED, AND

SEEDED, COST FOR DAMAGE RESTORATION OF EXISTING TURF

ITEM SHALL BE IN COMPLIANCE WITH THE REQUIREMENTS OF ITEM 659 SEEDING AND MULCHING UNLESS OTHERWISE DESCRIBED

AREAS DURING CONSTRUCTION SHALL BE AT THE CONTRACTOR'S

AREAS WITHIN THE PROJECT AREA THAT WILL BE GRADED AND DISTURBED ARE TO BE SEEDED WITH THE FOLLOWING SEED MIX. PROVIDE OWNER WITH CERTIFIED SEED MIX LABEL PRIOR TO APPLICATION FOR APPROVAL

- 80-90% TURF-TYPE TALL FESCUE (3 LB. /1,000 SQ. FT.)
- 5-10% KENTUCKY BLUEGRASS (3 LB. /1,000 SQ. FT.)
- 5-10% PERENNIAL RYEGRASS (2 LB. /1,000 SQ. FT.)

AREAS WITHIN THE PROJECT AREA THAT ARE NOT DISTURBED SHALL BE INTER-SEEDED PER ITEM 659.21 WITH THE SAME MIX.

ALL DESIGNATED TURF AREAS TO BE HYDRO SEEDED WITH A WOOD FIBER MULCH AS NOTED IN ODOT ITEM 659.15

ITEM 650,03 LIME SHALL BE APPLIED PER SPECIFICATION, AND SHALL BE INCIDENTAL TO THIS ITEM.

ITEM 659.04 COMMERCIAL FERTILIZER SHALL BE INCIDENTAL TO THIS ITEM.

ITEM 659.05 TOPSOIL SHALL BE INCIDENTAL TO THIS ITEM. ALL AREAS TO BE SEEDED SHALL HAVE A MINIMUM OF 4 INCHES OF

ITEM 659.17 WATER SHALL BE INCIDENTAL TO THIS ITEM.

ITEM 659,20 REPAIR SEEDING AND MULCHING SHALL BE INCIDENTAL TO THIS ITEM.

ITEM 659.23 PERFORMANCE: AT END OF MAINTENANCE PERIOD, A HEALTHY, UNIFORM, CLOSE STAND OF GRASS HAS BEEN ESTABLISHED, FREE OF WEEDS AND SURFACE IRREGULARITIES, WITH COVERAGE EXCEEDING 90 PERCENT OVER ANY 10 SQ. FT. AND BARE SPOTS NOT EXCEEDING 3 BY 3 INCHES.

PAYMENT: THE COST OF THESE ITEMS SHALL INCLUDE ALL MATERIALS, EQUIPMENT COORDINATION AND LABOR COSTS ASSOCIATED WITH SUPPLYING AND INSTALLING SEEDING AND MULCHING AS PER PLAN.

#### MOWING DURING CONSTRUCTION

ALL MOWING SHALL BE DONE BY THE CONTRACTOR. THE COST OF MOWING COORDINATION WITH THE CITY SHALL BE INCLUDED IN THE VARIOUS SEEDING BID ITEMS. NO SEPARATE PAYMENT WILL BE MADE FOR MOWING COORDINATION.

#### ITEM 661.11 MULCH, AS PER PLAN

THE FOLLOWING REVISIONS TO ODOT 661 SHALL BE APPLICABLE TO THIS PROJECT 661.11 MULCH.

CHANGE THE SECOND SENTENCE IN THE SECOND PARAGRAPH TO READ, "...3-INCH LAYER OF LANDSCAPE MULCH...".

MULCH SHALL BE A FINELY SHREDDED DARK HARDWOOD MULCH. BLACK COLOR. 100% AGED SHREDDED HARDWOOD, TRIPLE

#### PERIOD OF ESTABLISHMENT

DURING PLANTING: MAINTENANCE SHALL BEGIN IMMEDIATELY AFTER EACH PLANT IS PLANTED AND SHALL CONTINUE FOR A

PERIOD OF ONE YEAR AFTER COMPLETION OF PROJECT. PLANTS SHALL BE WATERED, MULCHED AND PRUNED, WEED GROWTH CONTROLLED, AND OTHERWISE MAINTAINED AS NEEDED DURING THE WARRANTY PERIOD. SETTLED PLANTS SHALL BE RAISED AND STRAIGHTENED. IF STAKING OR GUY WIRES ARE USED, THEY SHALL BE TIGHTENED AND REPAIRED.

#### WARRANTY:

THE CONTRACTOR SHALL WARRANTY ALL PLANTS TO BE IN SATISFACTORY GROWING CONDITION AND TO LIVE FOR A PERIOD OF ONE YEAR FROM COMPLETION OF PROJECT. ALL PLANTS INSTALLED PRIOR TO DECEMBER 31ST SHALL BE GUARANTEED TO BREAK INTO GROWTH (NOT JUST BUD BREAK) AND 2ND SPRING. PLANTS THAT ARE MORE THAN 25 PERCENT DEAD OR IN AN UNHEALTHY CONDITION WILL BE REPLACED AS MANY TIMES AS NECESSARY DURING THE ONE YEAR MAINTENANCE BOND.

ADDITIONALLY, IT SHALL BE THE RESPONSIBILITY OF THE CONTRACTOR TO WATER AND PERFORM ANY MAINTENANCE AS NECESSARY FOR THE CONTINUOUS VIGOR OF THE PLANTS DURING THE WARRANTY PERIOD. THE COST OF WATERING AND MAINTENANCE WILL BE AT THE SOLE COST OF THE CONTRACTOR. CONTRACTOR MUST COORDINATE WITH THE CITY AS NECESSARY FOR TRAFFIC CONTROL, AS NEEDED.

IN ORDER TO PROVIDE PLANT MATERIALS THAT MEET THE SOIL AND CLIMATE CONDITIONS OF BEAVERCREEK, OHIO, THEY MUST BE OBTAINED FROM SOUTHWEST/SOUTH CENTRAL OHIO, TREES OF THE SAME SPECIES SHALL BE PURCHASED FROM THE SAME NURSERY SO AS TO PROVIDE UNIFORMITY AMONG EACH SPECIES.

IT IS THE CONTRACTOR'S RESPONSIBILITY TO CLEAN THE CONSTRUCTION SITE AFTER EACH DAY OF WORK. PRIVATE LOTS SHALL BE FREE OF ANY DEBRIS, SAFETY HAZARDS, AND/OR OBSTRUCTIONS. IF A TREE PIT IS UNPROTECTED, IT SHALL HAVE FENCE PROTECTION TO PREVENT INJURY. SIDEWALKS AND STREETS SHALL BE FREE OF ANY DEBRIS, ROCKS, LOOSE MATERIAL AND OBSTRUCTIONS AT ALL TIMES. AT THE TIME OF FINAL COMPLETION, CONTRACTOR MUST CLEAN ALL ROADS, SIDEWALKS, AND PRIVATE LOTS PER THE CITY'S DIRECTION.

#### ITEM 661 PLANTING TREES, SHRUBS, AND VINES GENERAL PLANTING NOTES

- 1. LANDSCAPE WATERING PER ODOT ITEM 662 IS CONSIDERED INCIDENTAL TO ODOT ITEM 661 AND MUST BE CONTINUED THROUGH THE ESTABLISHMENT PERIOD AS OUTLINED UNDER ODOT ITEM 661.14. THE COST FOR LANDSCAPE WATERING SHALL BE CONSIDERED INCIDENTAL TO ODOT ITEM 661 AND MUST BE CONTINUED THROUGH THE ESTABLISHMENT PERIOD AS OUTLINED UNDER ODOT ITEM 661.14.
- CONTRACTOR MUST FOLLOW STANDARD HORTICULTURAL PRACTICES DURING THE PERIOD OF ESTABLISHMENT TO ENSURE THAT ALL THE PLANTS MAINTAIN GROWTH AND VIGOR. THE CONTRACTOR SHALL WATER, RE-MULCH, RE-STAKE AND CULTIVATE / WEED AS NECESSARY.
- ALL LANDSCAPE BEDS TO RECEIVE A GRANULAR PRE-EMERGENT WEED PREVENTATIVE PRIOR TO MULCHING PER ODOT ITEM 661. (PREEN, TREFLAN, OR ACCEPTED **FOUIVALENT**
- ALL PLANTS ARE TO BE BALLED AND BURLAPPED (B&B) OR IN CONTAINERS AS NOTED IN PLANT SCHEDULE. NO BARE ROOTED OR CONTAINER TREES ARE PERMITTED. SIZES ARE PER OHIO NURSERY ASSOCIATION STANDARDS.
- 5. PLANT IN ACCORDANCE WITH PLAN NOTE ITEM 661: PLANTING TREES, SHRUBS, AND GROUNDCOVER AS PER PLAN AND ODOT L.A. 1.1 AND LA 1.2 STANDARD CONSTRUCTION DRAWINGS.
- 6. SIZE OF PIT VARIES WITH SIZE OF ROOT BALL.
- SPREAD FERTILIZER EVENLY IN SAUCER PRIOR TO PLANTING PER ODOT ITEM 661.
- ALL PLANT MATERIAL FURNISHED SHALL BE FULL, WELL BRANCHED, WELL PROPORTIONED, AND HAVE A VIGOROUS, WELL DEVELOPED ROOT SYSTEM CAPABLE OF SUSTAINING
- 9. ALL TREES AND SHRUBS SHALL BE NO. 1 GRADE PLANTS WITH GROWTH AND BRANCHING HABIT TYPICAL OF THE SPECIES. NO PARK GRADE (NO. 2 OR 3 GRADE) PLANTS WILL BE ACCEPTED.
- 10. ALL TREES WITHIN A SPECIES SHALL HAVE MATCHING FORM. ALL PLANT MATERIAL SHALL BE OF THE SIZE AND TYPE
- 11. IF SUBSTITUTIONS ARE REQUIRED, ALL SUBSTITUTIONS MUST BE APPROVED BY THE ENGINEER PRIOR TO CONSTRUCTION.
- 12. OBSTRUCTIONS: NOTIFY OWNER OR OWNER'S REPRESENTATIVE IF UNEXPECTED ROCKS OR OBSTRUCTIONS DETRIMENTAL TO TREES OR SHRUBS ARE ENCOUNTERED DURING EXCAVATION.
- 13. THE COST FOR ALL FERTILIZER, HERBICIDE, WATERING, AND PLANTS, THAT MUST OCCUR BASED ON NEW PLANTING / CONSTRUCTION SHALL BE INCIDENTAL TO ITEM 661 AND 662 LANDSCAPE PLANTINGS AND WATERING.
- 14. THE CONTRACTOR SHALL CONDUCT WATERING OPERATIONS IN COMPLIANCE WITH ALL PROJECT SPECIFICATIONS AND SHALL PROTECT AGAINST WETTING OF THE PAVEMENT SURFACE

- 15. EACH CONTRACTOR SHALL NOTIFY THE OWNER'S REP. IMMEDIATELY IF A DISCREPANCY IS FOUND BETWEEN THE DIMENSION GIVEN ON THE PLANS AND ACTUAL DIMENSIONS IN THE FIELD.
- 16. REMOVE ALL TWINE, ROPE, BURLAP, AND WIRE FROM TOP HALF OF ROOTBALL.
- 17. NOTIFY OWNER OR OWNER'S REPRESENTATIVE IF SUBSOIL CONDITIONS EVIDENCE UNEXPECTED WATER SEEPAGE OR RETENTION IN TREE OR SHRUB PIT.
- 18. ITEM 661.10 B PLANTING BEDS SHALL BE MODIFIED TO READ: ONE MONTH BEFORE CULTIVATION, TREAT ALL PLANTING BEDS THAT ARE TO BE DEVELOPED IN AREAS OF EXISTING TURF WITH PRE-EMERGENT AND POST-EMERGENT TYPE HERBICIDES, USE A STATE-LICENSED PESTICIDE APPLICATOR TO APPLY THE HERBICIDE ACCORDING TO THE MANUFACTURER'S INSTRUCTIONS. BEFORE PLANTING, TOP DRESS ALL PLANTING BEDS WITH A MINIMUM OF 6 INCHES OF BACKFILL MIX, THEN CULTIVATE IT TO A DEPTH OF 12 INCHES USING A PLOW, DISC, OR ROTO-TILLER.
- 19. ALL ABOVE ITEMS ARE INCIDENTAL TO ODOT 661 ITEM AND SHALL BE CONTINUED THROUGH WARRANTY PERIOD.

PAYMENT: THE COST FOR THESE ITEMS SHALL INCLUDE ALL MATERIALS, EQUIPMENT, COORDINATION, AND LABOR COSTS ASSOCIATED WITH INSTALLING ITEM 661 TREES, SHRUBS, AND VINES AND THE NOTES AND DETAILS

#### ITEM 690 SPECIAL - BENCH

BACKED BENCH WITHOUT INTERMEDIATE ARMS OR DIVIDERS, SEE DETAIL 2 / SHEET 12.

#### MANUFACTURERS:

- 1. BASIS-OF-DESIGN: LANDSCAPE FORMS, INC.; MODEL: SCARBOROUGH.
- DUMOR, INC.; MODEL: BENCH 160.
- VICTOR STANLEY, INC.; MODEL: RBF-28.
- OR APPROVED FOUAL

BENCHES SHALL BE COMMERCIAL GRADE MEETING THE FOLLOWING MINIMUM SPECIFICATIONS

#### DIMENSIONS:

- 1. DEPTH: 28".
- OVERALL HEIGHT: 34".
- ARM HEIGHT: 28"
- LENGTH: 48".

SEAT PATTERN: STRAP.

## COLOR: BLACK POWDERCOAT.

#### MATERIAL:

- SEAT PATTERN: STEEL STRAPS 1-1/2" x 0.188".
- PANEL SUPPORTS: END FRAMES ARE 1" x 1" SOLID STEEL, JOINED BY 1-1/2" DIAMETER, 0.120" WALL THICKNESS TUBULAR STEEL, SEAT PANELS ARE PERIMETER WELDED TO THE END

SURFACE MOUNTING PER MANUFACTURER'S SPECIFICATIONS. PROVIDE ANCHORS OF SUFFICIENT LENGTH TO MOUNT INTO CONCRETE BASE BELOW UNIT PAVERS.

PAYMENT FOR ALL LABOR, EQUIPMENT AND MATERIALS FOR ITEM SPECIAL - BENCH SHALL BE INCLUDED IN THE CONTRACT UNIT PRICE FOR ITEM SPECIAL - BENCH.

#### ITEM 690 SPECIAL - BACKFILL MIX

BACKFILL MIX SHALL BE PER TEM 661.09 EXCEPT MODIFIED TO

FOR ALL PLANTINGS, USE BACKFILL MIX CONSISTING OF THE FOLLOWING.

- 1. PART TOPSOIL PER ITEM 659.05
- 2. PART SPHAGNUM PEAT MOSS
- 3. PART EPA RATED CLASS IV COMPOST PER ITEM 659.06

INSTALL BACKFILL MIX TO 12" DEPTH IN ALL PLANT BEDS.

DO NOT USE BACKFILL MIX THAT IS FROZEN OR MUDDY.

PAYMENT FOR BACKFILL MIX AND PLACEMENT OF BACKFILL MIX SHALL BE PAID FOR IN ITEM SPECIAL - BACKFILL MIX.

#### PRE-CONSTRUCTION MEETING

FOLLOWING THE AWARD OF THE CONTRACT AND BEFORE STARTING ANY WORK, THE CONTRACTOR AND HIS SUPERINTENDENT, SHALL MEET WITH THE ENGINEER FOR A PRE-CONSTRUCTION MEETING. THE PURPOSE OF SUCH IS FOR REVIEWING THE SITE, AND ANY RESTRICTIONS AND REGULATIONS GOVERNING THE WORK.

ANY SCHEDULES, REQUESTS, PAPERS, APPROVALS, SUBMITTALS, SHOP DRAWINGS, CHANGES, ETC. AS CALLED FOR IN THE CONTRACT DOCUMENTS SHALL BE DONE AT THIS TIME UNLESS OTHERWISE DIRECTED.

#### PERMITS, FEES AND NOTICES

THE CONTRACTOR SHALL OBTAIN, AT HIS EXPENSE, ANY AND ALL PERMITS AND INSPECTIONS REQUIRED FOR THE EXECUTION OF THE WORK BY LOCAL LAWS, ORDINANCES, RULES AND

#### **FXISTING FACILITIES**

IT SHALL BE THE RESPONSIBILITY OF THE CONTRACTOR TO PERFORM HIS WORK IN SUCH A MANNER AS NOT TO DAMAGE OR DESTROY ANY EXISTING FACILITY. IF ANY SUCH DAMAGE DOES OCCUR DUE TO THE CONTRACTOR'S OPERATIONS, HE SHALL REPLACE THE DAMAGED PORTION AT HIS EXPENSE AND TO THE SATISFACTION OF THE ENGINEER.

#### EXAMINATION OF THE SITE

THE CONTRACTOR SHALL CAREFULLY EXAMINE THE SITE OF THE PROPOSED WORK, THE PLANS AND SPECIFICATIONS. THE SUBMISSION OF A BID SHALL BE CONSIDERED EVIDENCE THAT THE CONTRACTOR HAS MADE SUCH EXAMINATION AND IS SATISFIED AS TO THE CONDITIONS TO BE ENCOUNTERED IN PERFORMING THE WORK IN ACCORDANCE WITH THE PLANS AND SPECIFICATIONS.

#### SECURITY AND PROTECTION PROVISIONS

THE TYPES OF TEMPORARY SECURITY AND PROTECTION PROVISIONS REQUIRED INCLUDE, BUT NOT BY WAY OF LIMITATION, BARRICADES, WARNING SIGNS/LIGHTS, SITE ENCLOSURE FENCE, ETC. AND SIMILAR PROVISIONS INTENDED TO MINIMIZE PROPERTY LOSSES, PERSONAL INJURIES AND CLAIMS FOR DAMAGE TO THE PROJECT SITE. THE CONTRACTOR SHALL PROVIDE ANY PROTECTION SERVICES AND SYSTEMS IN COORDINATION WITH ACTIVITIES AND IN A MANNER TO ACHIEVE 24-HOUR, 7-DAY PER-WEEK EFFECTIVENESS.

TRENCHES THAT ARE OPEN SHALL NOT REMAIN UNPROTECTED AT ANY TIME. DURING NON-WORKING HOURS, TRENCHES SHALL BE CLOSED AND ANY EQUIPMENT ON THE SITE SHALL BE ADEQUATELY FENCED

DESIGN AGENC



KJC YSY 09/08/23 PROJECT IO 115009

TOTAL

THE CONTRACTOR SHALL MAINTAIN TRAFFIC AT ALL TIMES IN ACCORDANCE WITH THE REQUIREMENTS OF ITEM 614 AND THE OHIO MANUAL OF UNIFORM TRAFFIC CONTROL DEVICES (OMUTCD); AND THE APPLICABLE STANDARD DRAWINGS FOR MAINTENANCE OF TRAFFIC (MT-SERIES); AND AS OUTLINED HEREIN.

A MINIMUM OF ONE (1) LANE OF TRAFFIC IN EACH DIRECTION SHALL BE MAINTAINED AT ALL TIMES BY USE OF THE EXISTING PAVEMENT

UNLESS OTHERWISE APPROVED BY THE ENGINEER, WORK SHALL BE LIMITED TO ONE SIDE/SECTION AT A TIME. UNLESS DETAILED HEREIN OR OTHERWISE APPROVED BY THE ENGINEER, ALL NORMAL TRAFFIC MOVEMENTS FOR CROSS STREET INTERSECTIONS ARE TO BE MAINTAINED AT ALL TIMES. A MINIMUM LANE WIDTH OF TEN (10) FEET SHALL BE MAINTAINED AT ALL TIMES. AS PER THE OMUTCD, OPPOSING TRAFFIC SHALL BE SEPARATED BY A RETRO-REFLECTIVE CENTERLINE OR APPROPRIATELY SPACED DRUMS AT ALL TIMES.

ACCESS TO ALL ABUTTING BUSINESS AND RESIDENCES, AND OPERATION OF ALL TRAFFIC CONTROL AND TRAFFIC CONTROL DEVICES REQUIRED BY THE OMUTCD SHALL BE PROVIDED BY THE CONTRACTOR WHETHER INSIDE OR OUTSIDE THESE WORK LIMITS.

THE CONTRACTOR SHALL SUBMIT TO THE CITY OF BEAVERCREEK A DESCRIPTION OF THE PROPOSED SEQUENCE OF CONSTRUCTION OPERATIONS, LANE CLOSURES, AND DRIVE ACCESS FOR APPROVAL PRIOR TO

THE CONTRACTOR SHALL NOTIFY THE FOLLOWING 4B HOURS IN ADVANCE OF ANY STREET CLOSURE OR LANE CLOSURE:

GREENE COUNTY SHERIFF'S DEPARTMENT, PHONE 937-562-4800 THE CITY OF BEAVERCREEK POLICE DEPARTMENT, PHONE 937-426-1225

THE CONTRACTOR IS RESPONSIBLE FOR MAINTAINING ALL EQUIPMENT AND INFRASTRUCTURE FOR THE DURATION OF THE PROJECT.

TRAFFIC SHALL BE MAINTAINED AT ALL INTERSECTIONS AND DRIVES AT ALL TIMES AND SHALL BE CONTROLLED WITH FLAGGERS AND TRAFFIC CONTROL DEVICES AS REQUIRED AND SHALL BE SUBJECT TO THE APPROVAL OF THE ENGINEER. UNLESS OTHERWISE SPECIFIED, A SEPARATE LEFT TURN STORAGE LANE WITH A MINIMUM OF FIFTY (50) FEET IN LENGTH IS TO BE PROVIDED AT ALL TIMES AT APPROPRIATE INTERSECTIONS BY MEANS OF CHANNELIZING DEVICES.

THE NORMAL OPERATION OF ALL TRAFFIC SIGNALS SHALL BE MAINTAINED AT ALL TIMES UNLESS OTHERWISE APPROVED IN ADVANCE BY THE ENGINEER. CARE SHALL BE EXERCISED NOT TO PERFORM ANY WORK WHICH MIGHT AFFECT THE OPERATION OF TRAFFIC SIGNAL DETECTORS OR UNDERGROUND WIRING UNTIL ARRANGEMENTS HAVE BEEN MADE WITH THE CITY OF BEAVERCREEK ENGINEERING DEPARTMENT AT

SPECIFIC COORDINATION WILL BE NECESSARY WITH WRIGHT STATE UNIVERSITY AND THE NUTTER CENTER. THE CONTRACTOR SHALL COORDINATE TRAFFIC FLOW AND THE BEST DIRECTION IN WHICH PATRONS/COMMUTERS SHOULD BE ADVISED TO APPROACH THE UNIVERSITY OR EVENT CENTER.

NO WORK SHALL BE PERFORMED AND ALL AVAILABLE LANES AND TURNING MOVEMENTS SHALL BE OPEN TO TRAFFIC DURING THE FOLLOWING DESIGNATED HOLIDAYS OR EVENTS:

NEW YEAR'S (OBSERVED) MEMORIAL DAY FOURTH OF JULY (OBSERVED)

LABOR DAY TOTAL SOLAR ECLIPSE (4/8/24) GENERAL/REGULAR ELECTION DAY (NOV) THANKSGIVING CHRISTMAS (OBSERVED)

THE PERIOD OF TIME THAT THE LANES ARE TO BE OPEN DEPENDS ON THE DAY OF THE WEEK ON WHICH THE HOLIDAY OR EVENT FALLS. THE FOLLOWING SCHEDULE SHALL BE USED TO DETERMINE THIS PERIOD;

DAY OF HOLIDAY OR EVENT	TIME ALL LANES MUST BE OPEN TO TRAFFIC
SUNDAY	12:00N FRIDAY THROUGH 6:00 AM MONDAY
MONDAY	12:00N FRIDAY THROUGH 6:00 AM TUESDAY
MONDAY (TOTAL SOLAR ECLIPSE)	12:00N FRIDAY THROUGH 6:00AM WEDNESDAY
TUESDAY	12:00N MONDAY THROUGH 6:00 AM WEDNESDAY
TUESDAY (GEN/REG, ELECTION)	5;00 AM TUESDAY THROUGH 12:00 AM WEDNESDAY
WEDNESDAY	12:00N TUESDAY THROUGH 6:00 AM THURSDAY
THURSDAY	12;00N WEDNESDAY THROUGH 6:00 AM FRIDAY
THURSDAY (THANKSGIVING ONLY)	12:00N WEDNESDAY THROUGH 6:00 AM MONDAY
FRIDAY	12:00N THURSDAY THROUGH 6:00 AM MONDAY
SATURDAY	12:00N FRIDAY THROUGH 6:00 AM MONDAY

ADDITIONALLY, ALL AVAILABLE LANES AND TURNING MOVEMENTS WITHIN THE PROJECT AREA ARE TO BE OPEN TO TRAFFIC A MINIMUM OF TWO (2) HOURS BEFORE AND AFTER A SCHEDULED EVENT AT THE NUTTER CENTER. THE CONTRACTOR SHALL CONTACT THE NUTTER CENTER AT (937) 775-3498 TO OBTAIN THE EVENT SCHEDULE

REFERENCE OTHER CONTRACT DOCUMENTS (SPECIAL CONDITIONS) FOR ADDITIONAL SPECIAL EVENTS

SHOULD THE CONTRACTOR FAIL TO MEET ANY OF THESE REQUIREMENTS, THE CONTRACTOR SHALL BE ASSESSED A DISINCENTIVE IN THE AMOUNT OF \$50 FOR EACH MINUTE THE ABOVE DESCRIBED LANE CLOSURE RESTRICTIONS ARE VIOLATED.

LENGTH AND DURATION OF LANE CLOSURES AND RESTRICTIONS SHALL BE AT THE APPROVAL OF THE ENGINEER. IT IS THE INTENT TO MINIMIZE THE IMPACT TO THE TRAVELING PUBLIC. LANE CLOSURES OR RESTRICTIONS OVER SEGMENTS OF THE PROJECT IN WHICH NO WORK IS ANTICIPATED WITHIN A REASONABLE TIME FRAME, AS DETERMINED BY THE ENGINEER, SHALL NOT BE PERMITTED. THE LEVEL OF UTILIZATION OF MAINTENANCE OF TRAFFIC DEVICES SHALL BE COMMENSURATE WITH THE WORK IN PROGRESS.

ALL WORK AND TRAFFIC CONTROL DEVICES SHALL BE IN ACCORDANCE WITH C&MS 614 AND OTHER APPLICABLE PORTIONS OF THE SPECIFICATIONS, AS WELL AS THE OHIO MANUAL OF UNIFORM TRAFFIC CONTROL DEVICES. PAYMENT FOR ALL LABOR, EQUIPMENT AND MATERIALS SHALL BE INCLUDED IN THE LUMP SUM CONTRACT PRICE FOR ITEM 614, MAINTAINING TRAFFIC, UNLESS SEPARATELY ITEMIZED IN THE PLAN.

EQUIPMENT AND MATERIAL STORAGE

IN ORDER TO PROVIDE FOR THE SAFETY OF THE GONTRACTOR AND THE TRAVELING PUBLIC, THE CONTRACTOR'S ATTENTION IS DIRECTED TO THE FOLLOWING:

- A. CONSTRUCTION EQUIPMENT, MATERIALS, AND VEHICLES IN USE DURING WORKING HOURS SHALL NOT BE PARKED OR STORED ANY CLOSER THAN TEN (10) FEET TO THE EDGE OF THE LOCAL TRAFFIC ACCESS ROUTE, UNLESS BEHIND DRUMS OR TEMPORARY CONCRETE BARRIER.
- PRIVATE VEHICLES SHALL NOT BE PARKED WITHIN THE EXISTING RIGHT OF WAY LIMITS OF THIS PROJECT EXCEPT IN AREAS DESIGNATED BY THE ENGINEER.
- C. CONSTRUCTION EQUIPMENT, MATERIALS, AND VEHICLES SHALL NOT BE STORED WITHIN TWENTY-FIVE (25) FEET OF THE TRAVELED EDGE OF PAVEMENT DURING NON-WORKING HOURS UNLESS APPROPRIATE PRECAUTIONARY MEASURES HAVE BEEN TAKEN AND PRIOR APPROVAL HAS BEEN GIVEN BY THE ENGINEER

MAINTAINING TRANSIT SERVICE

IF THE CONTRACTOR NEEDS TO CLOSE DOWN OR INTERRUPT SERVICE TO AN EXISTING BUS STOP ALONG COLONEL GLENN HIGHWAY THE CONTRACTOR MUST NOTIFY, A MINIMUM OF THIRTY (30) DAYS BEFORE ANTICIPATED CLOSURE, NOTIFY JOHN HOFF AT GREATER DAYTON RTA (937-425-8355), JEFF MOORMAN, CITY OF BEAVERCREEK, CITY ENGINEER (937-427-5513), AND LEE HARRIS, CITY OF FAIRBORN, CITY ENGINEER (937-754-3055) SO THAT TEMPORARY BUS STOPS CAN BE LOCATED OUTSIDE THE WORK AREA AS NEEDED.

PEDESTRIAN ACCESS

PEDESTRIAN TRAFFIC SHALL BE MAINTAINED. EXISTING SIDEWALKS ON THE NORTH SIDE OF COLONEL GLENN HIGHWAY SHALL REMAIN OPEN TO ALL PEDESTRIANS FOR THE ENTIRETY OF THE PROJECT. FLAGGERS MAY BE USED TO MAINTAIN PEDESTRIAN ACCESS. IF A CROSSWALK IS TO BE CLOSED, THEN PEDESTRIAN TRAFFIC SHALL BE DETOURED AS SHOWN ON ODOT S.C.D. MT-110.10.

CROSSWALKS SHALL BE CLOSED ONLY WHEN EXCAVATION REQUIRES CLOSURE OR WHILE THE CROSSWALK IS BEING REPLACED. WHEN A MARKED CROSSWALK IS CLOSED THE CONTRACTOR SHALL INSTALL A SUFFICIENT NUMBER OF BARRICADES TO BLOCK THE CROSSWALK AT EACH END AS NECESSARY.

TO MINIMIZE THE OVERALL IMPACT TO PEDESTRIANS AT INTERSECTIONS, FULL CORNER ACCESS RESTRICTIONS SHOULD BE LIMITED TO ONLY ONE CORNER DURING ANY TIME PERIOD, PEDESTRIAN RESTRICTIONS SHOULD BE CLEARLY DELINEATED AS SHOWN IN MT-110.10. PEDESTRIAN SIGNAL HEADS WHICH ARE ASSOCIATED WITH CLOSED OR RE-ROUTED CROSSINGS SHALL BE COVERED PER CMS 632.25.

COST FOR THE ABOVE DESCRIBED WORK SHALL BE CONSIDERED INCIDENTAL TO THE LUMP SUM BID FOR ITEM 614. MAINTENANCE OF TRAFFIC.

THROUGHOUT THE DURATION OF THE PROJECT, THE CONTRACTOR SHALL NOTIFY THE PROJECT ENGINEER IN WRITING OF ALL TRAFFIC RESTRICTIONS AND UPCOMING MAINTENANCE OF TRAFFIC CHANGES. THE CONTRACTOR SHALL ENSURE THE WRITTEN NOTIFICATION IS SUBMITTED IN A TIMELY MANNER TO ALLOW THE PROJECT ENGINEER TO MEET THE REQUIRED TIME FRAMES SET FORTH IN THE TABLE BELOW TO INFORM THE CITY OF BEAVERCREEK, JEFF MOORMAN (937-427-5513). THIS NOTIFICATION SHALL BE RECEIVED BY THE PROJECT ENGINEER PRIOR TO THE PHYSICAL SETUP OF ANY APPLICABLE SIGNS OR MESSAGE BOARDS.

INFORMATION SHOULD INCLUDE, BUT IS NOT LIMITED TO, ALL CONSTRUCTION ACTIVITIES THAT IMPACT OR INTERFERE WITH TRAFFIC AND SHALL LIST THE SPECIFIC LOCATION, TYPE OF WORK, ROAD STATUS, DATE AND TIME OF RESTRICTION, DURATION OF RESTRICTION, NUMBER OF LANES MAINTAINED, NUMBER OF LANES CLOSED, MINIMUM VERTICAL CLEARANCE, MINIMUM WIDTH OF DRIVABLE PAVEMENT, DETOUR ROUTES, IF APPLICABLE, AND ANY OTHER INFORMATION REQUESTED BY THE PROJECT ENGINEER.

#### NOTIFICATION TIME TABLE

ITEM	DURATION OF CLOSURE	NOTICE DUE TO PERMITS & PIU
RAMP & ROAD	>= 2 WEEKS	21 CALENDAR DAYS PRIOR TO CLOSURE
CLOSURES	> 12 HOURS & < 2 WEEKS	14 CALENDAR DAYS PRIOR TO CLOSURE
GEOOD. III	< 12 HOURS	4 BUSINESS DAYS PRIOR TO CLOSURE
I ANE CLOSURES &	>= 2 WEEKS	14 CALENDAR DAYS PRIOR TO CLOSURE
RESTRICTIONS	< 2 WEEKS	5 BUSINESS DAYS PRIOR TO CLOSURE
START OF CONSTRUCTION &	N/A	14 CALENDAR DAYS PRIOR TO CLOSURE
TRAFFIC PATTERN CHANGES		

ANY UNFORESEEN CONDITIONS NOT SPECIFIED IN THE PLANS REQUIRING TRAFFIC RESTRICTIONS SHALL ALSO BE REPORTED TO THE PROJECT ENGINEER USING THE NOTIFICATION TIME TABLE.

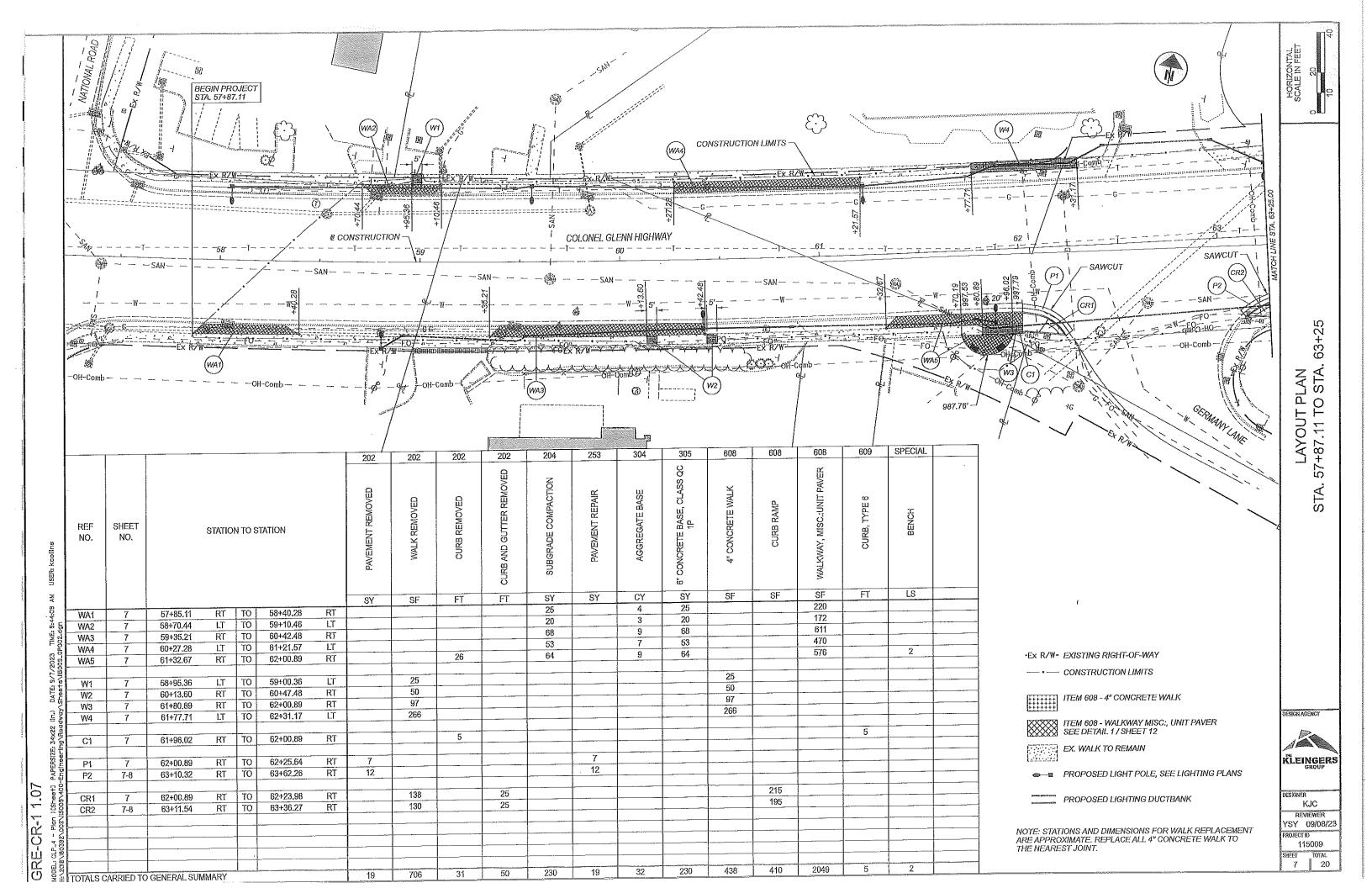
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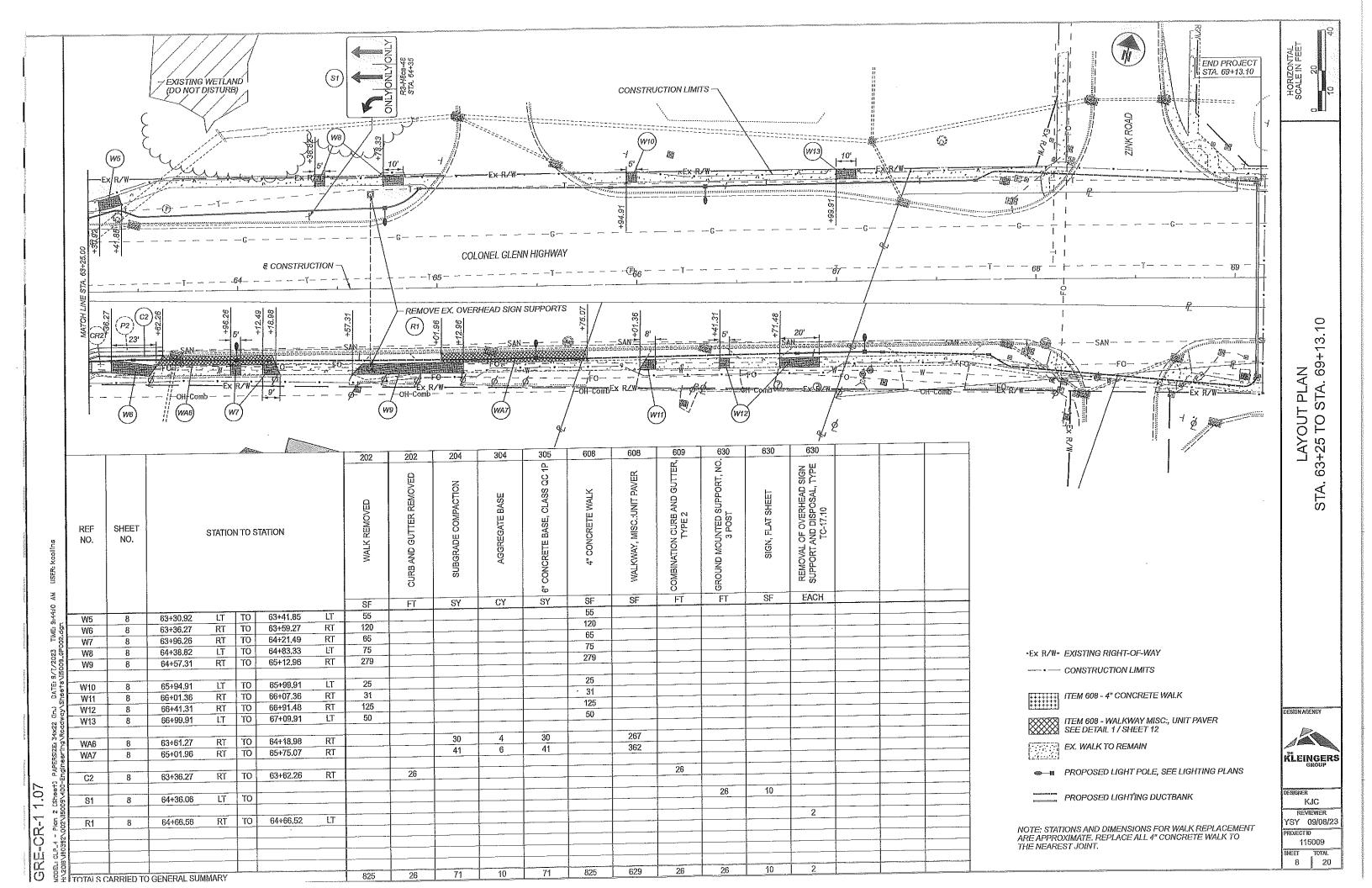


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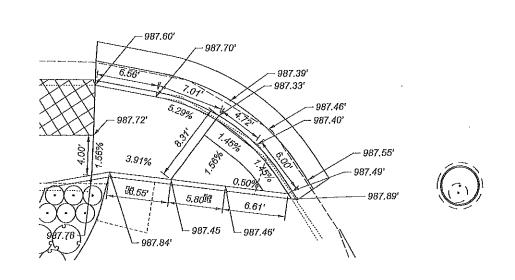
PROJECT ID

115009
SHEET TOTAL
9 20

5.50%

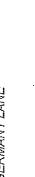
989.48'

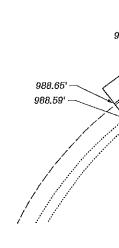
## COLONEL GLENN HIGHWAY



62 !

GRE-CR-1 1.07 MODEL: CLP-5 - Plan IISheet1 P. HANZOBNIBOSSZNOOZNIBOOSYGO-E





ITEM 608 - 4" CONCRETE WALK KLEINGERS ITEM 608 - WALKWAY MISC:, UNIT PAVER SEE DETAIL 1 / SHEET 12

EX. WALK TO REMAIN

SHRUBS & PERENNIALS, SEE DETAILS 2 & 5, SHEET 13

PROPOSED LIGHTING DUCTBANK

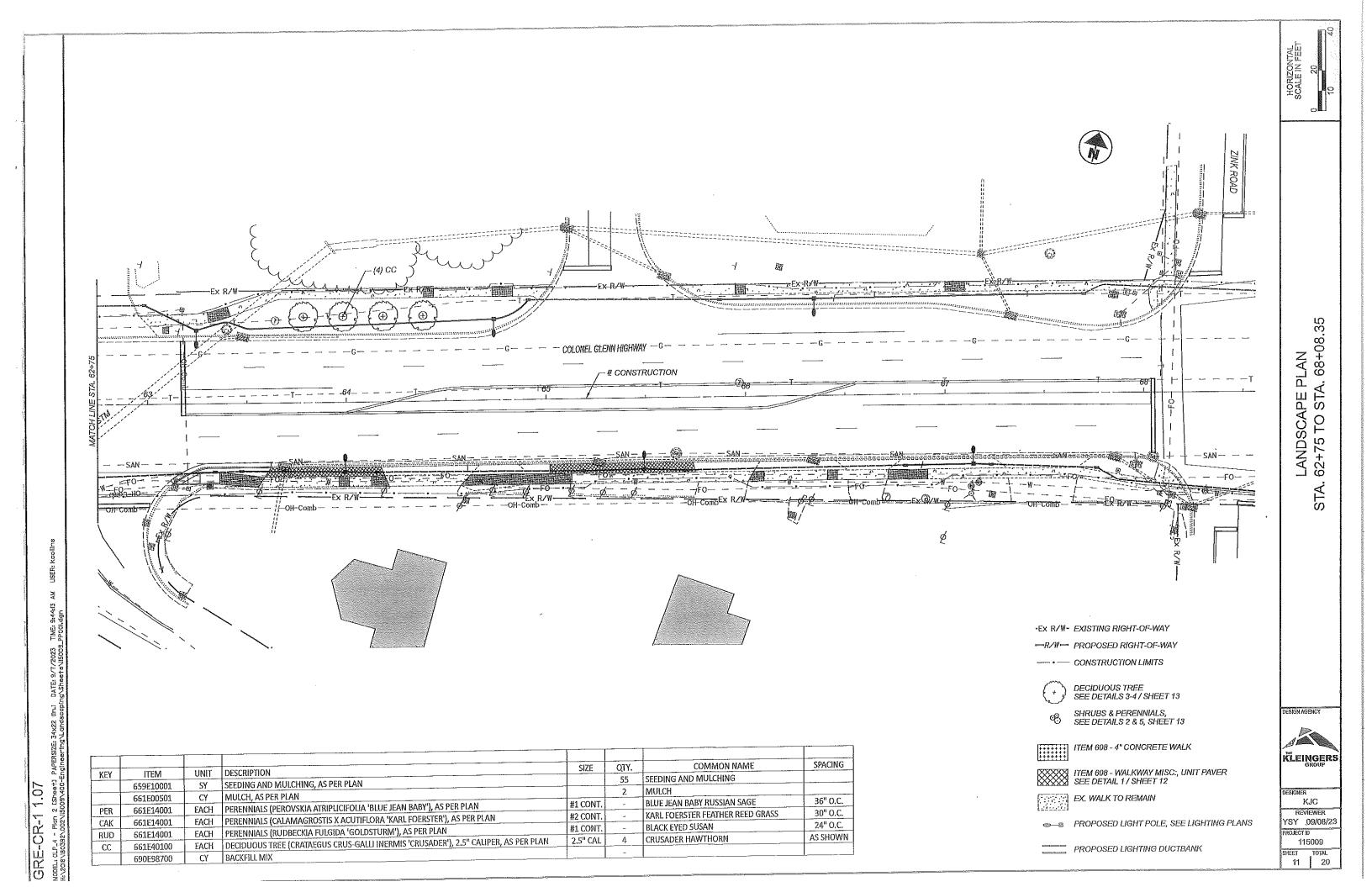
MATTONAL ROAD  RVIII  ESTERATIONAL ROAD  TOTAL ROAD  TOTAL ROAD  TOTAL ROAD		Land Control of the C		
CO EX RIVE		A RAW 132	EX R/W.	
58		COLONEL GLENN HIGHWAY	-@ CONSTRUCTION	OHLComb
	EX IV Transcription of the Comb	OH-DOMBO	EX R/W  en-comb  (12) I	PER 16 COMB PRINT AND THE PRIN
				-EX R/W- EXISTING RIGHT-OF-WAY

14514	(TEAA	116377	DESCRIPTION	SIZE	QTY.	COMMON NAME	SPACING
KEY	ITEM	UNIT	The state of the s		33	SEEDING AND MULCHING	
İ	659E10001	SY	SEEDING AND MULCHING, AS PER PLAN	_			
	661E00501	CY	MULCH, AS PER PLAN		8	MULCH	
···				#1 CONT.	6	BLUE JEAN BABY RUSSIAN SAGE	36" O.C.
PER	661E14001	EACH	PERENNIALS (PEROVSKIA ATRIPLICIFOLIA 'BLUE JEAN BABY'), AS PER PLAN	#2 CONT.		KARL FOERSTER FEATHER REED GRASS	30" O.C.
CAK	661E14001	EACH	PERENNIALS (CALAMAGROSTIS X ACUTIFLORA 'KARL FOERSTER'), AS PER PLAN				
RUD	661E14001	EACH	PERENNIALS (RUDBECKIA FULGIDA 'GOLDSTURM'), AS PER PLAN	#1 CONT.		BLACK EYED SUSAN	24" O.C.
		LACII	TECHNICAL FIRST CONTACTUS	2.5" CAL	-	CRUSADER HAWTHORN	AS SHOWN
CC	661E40100	EACH	DECIDUOUS TREE (CRATAEGUS CRUS-GALLI INERMIS 'CRUSADER'), 2.5" CALIPER, AS PER PLAN	2.5 0,12			
	690E98700	CY	BACKFILL MIX		32		

DATE: 9/7/2023 TIME: 9:44:13 AM Ing\Shee+s\li5009\_PF001.dgn GRE-CR-1 1.07
MODEL: C.P.4 - Plan 1;Shee+1 PAPERSIZE: 34x22 (In.)
H:\ZOBYBO352\002\USD033\400-EngineerThg\Landscop

USER: kcoliins

KJC REVIEWER YSY 09/08/23 ● PROPOSED LIGHT POLE, SEE LIGHTING PLANS PROJECT ID 115009 SHEET TOTAL 10 20

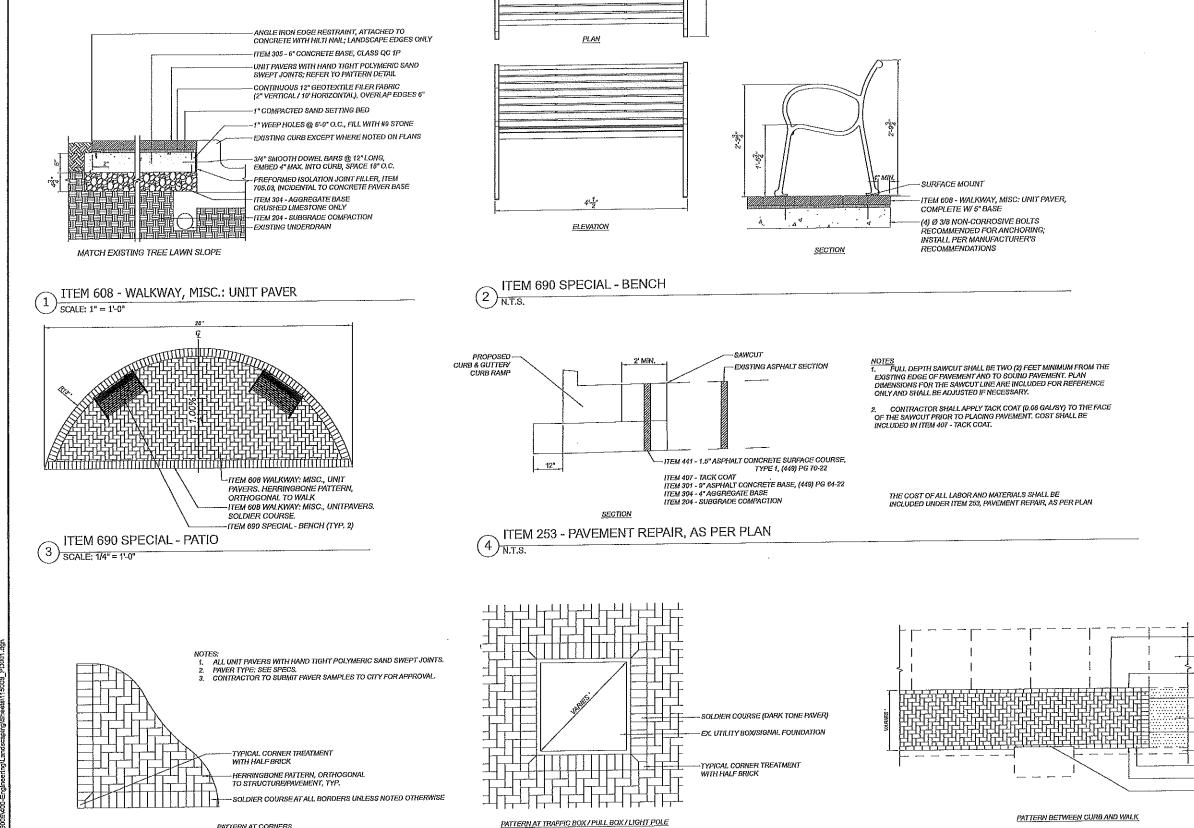




PATTERN AT CORNERS

UNIT PAVER PATTERNS

(5) N.T.S.



SURFACE MOUNT BENCHES, PROVIDE ANCHORS OF SUFFICIENT LENGTH TO ATTACH INTO CONCRETE

BASE BENEATH UNIT PAVERS.

1.07 OKE-CK-

REVIEWER YSY 09/08/23 ROJECTID 115009 TOTAL 12 20

DESIGNER KJC

DESIGN AGENCY

KLEINGERS

HERRINGBONE PATTERN. ORTHOGONAL TO STREET - FXISTING / NEW SIDEWALK

FLUSH WITH TOP OF SIDEWALK

-SOLDIER COURSE AT ENDS

- ANGLE IRON EDGE RESTRAINT, ATTACHED TO CONCRETE WITH HILTI NAIL; LANDSCAPE EDGES ONLY

STRETCHER COURSE, ALONG CURB AND WALK

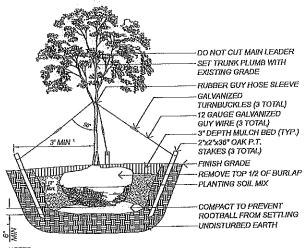
EX. DRAIN INLET, CUT STRETCHER COURSE

FLUSH WITH TOP OF EXISTING CURB

1.07

PLANT BED EDGING DETAIL (1) N.T.S.

CONTAINER PLANT - PLANTING SOIL MIX SCARIFY SIDES & BOTTOM OF ROOT SYSTEM PERENNIAL / ORNAMENTAL GRASS PLANTING



OTES:

TOP OF ROOT BALL TO BE 2\*-3" ABOVE ADJACENT FINISHED GRADE.

REMOVE ALL LABELS, TAGS, OR OTHER FOREIGN MATERIALS FROM LIMBS.

REMOVE GUY WIRES, TURNBUCKLES, HOSE AND STAKES 1 YEAR AFTER PLANTING.

THE AMOUNT OF PRUNING SHALL BE LIMITED TO THE MINIMUM NECESSARY TO

REMOVE DEAD OR INJURED TWIGS AND BRANCHES AND TO COMPENSATE FOR THE

LOSS OF ROOTS DURING TRANSPLANTING. RETAIN NORMAL SHAPE OF TREE.

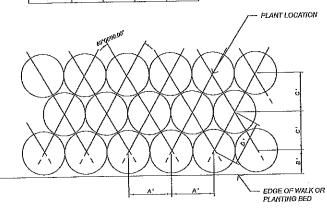
OWNERS REPRESENTATIVE WILL DETERMINE AMOUNT OF PRUNING NECESSARY.

PLANT TREES AT SAME GRADE AS GROWN IN THE NURSERY.

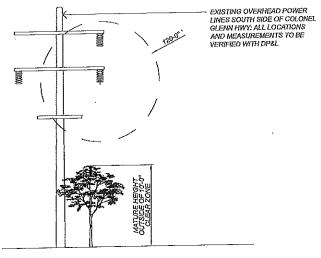
# DECIDUOUS TREE PLANTING (3) N.T.S.

SPACING	Α	В	C	D
12"	12"	6"	10"	12"
18"	18"	8"	15	18"
24"	24ª	10°	20"	24"
30"	30°	15"	25"	30"
36°	36"	18°	31"	36"
48"	48"	21₹	41"	48"

A = SPACING B = SP/2 C = SP/1.2 D = SPACING



PERENNIAL SPACING



TREE PLANTINGS AT OVEREHEAD POWER LINES 4 N.T.S.

DESIGN AGENCY



DESIGNER KJC REVIEWER

YSY 09/08/23 PROJECT ID

115009 SHEET TOTAL

13 20

IN ADDITION TO THE REQUIREMENTS OF THE ODOT C&MS, LIGHT POLES INSTALLED ON THIS PROJECT SHALL BE AS FOLLOWS:

THE LIGHT POLE AND BRACKET ARM SHALL PROVIDE A FINAL LUMINAIRE MOUNTING HEIGHT OF 35 FEET ABOVE THE TOP OF THE POLE BASE.

LIGHT POLE AND BRACKET ARM SHALL HAVE A BLACK FINISH 9FEDSTD 595B 17038) THAT CONFORMS TO ODOT

SUPPLEMENTAL SPECIFICATION 916.

POLES SHALL BE ABLE TO ACCOMMODATE A BANNER ARM ON THE BACK SIDE OF THE POLE (OPPOSITE OF ROAD SIDE). COORDINATION WITH THE CITY OF BEAVERCREEK FOR BANNER ARM DESIGN AND SIZE.

ITEM 625 - LIGHT POLE, MISC.: LIGHT POLE WITH BRACKET ARM

THE ALPHA NUMERIC IDENTIFIED SHALL BE PLACED ON THE BACK SIDE OF THE HANDHOLE COVER. IDENTIFIER SHALL NOT BE PLACED ON THE EXTERNAL SURFACE OF THE POLE.

PAYMENT WILL BE MADE AT THE CONTRACT UNIT BID PRICE FOR EACH "ITEM 625 - LIGHT POLE, MISC.: LIGHT POLE WITH BRACKET ARM (MILLERBERND)" WHICH SHALL BE FULL COMPENSATION FOR ALL LABOR, MATERIALS, EQUIPMENT, AND INCIDENTALS REQUIRED TO COMPLETE THIS ITEM IN A SATISFACTORY AND WORKMANLIKE MANNER.

ITEM 625 - LIGHT POLE, MISC.: LIGHT POLE WITH BRACKET ARM (MILLERBERND) - ALTERNATE BID

IN ADDITION TO THE REQUIREMENTS OF THE ODOT C&MS, LIGHT POLES INSTALLED ON THIS PROJECT SHALL BE AS FOLLOWS:

LIGHT POLES SHALL BE AS MANUFACTURED BY MILLERBERND AND SHALL BE THE EURO (DES) STYLE. THE LIGHT POLE AND BRACKET ARM SHALL PROVIDE A FINAL LUMINAIRE MOUNTING HEIGHT OF 35 FEET ABOVE THE TOP OF THE POLE BASE.

LIGHT POLE AND BRACKET ARM SHALL HAVE A BLACK FINISH 9FEDSTD 595B 17038) THAT CONFORMS TO ODOT SUPPLEMENTAL SPECIFICATION 916.

POLES SHALL BE ABLE TO ACCOMMODATE A BANNER ARM ON THE BACK SIDE OF THE POLE (OPPOSITE OF ROAD SIDE). CORDINATION WITH THE CITY OF BEAVERCREEK FOR BANNER ARM DESIGN AND SIZE.

THE ALPHA NUMERIC IDENTIFIED SHALL BE PLACED ON THE BACK SIDE OF THE HANDHOLE COVER. IDENTIFIER SHALL NOT BE PLACED ON THE EXTERNAL SURFACE OF THE POLE.

SEE DETAIL (A/17) FOR ADDITIONAL INFORMATION.

PAYMENT WILL BE MADE AT THE CONTRACT UNIT BID PRICE FOR EACH "ITEM 625 - LIGHT POLE, MISC.: LIGHT POLE WITH BRACKET ARM (MILLERBERND)" WHICH SHALL BE FULL COMPENSATION FOR ALL LABOR, MATERIALS, EQUIPMENT, AND INCIDENTALS REQUIRED TO COMPLETE THIS ITEM IN A SATISFACTORY AND WORKMANLIKE MANNER.

ITEM 625 - LUMINAIRE, CONVENTIONAL, 240V, LED, 18000-19000 LUMENS. AS PER PLAN

IN ADDITION TO THE REQUIREMENTS OF THE ODOT C&MS, CONVENTIONAL LUMINAIRES INSTALLED ON THIS PROJECT SHALL BE AS FOLLOWS:

LUMINAIRES FOR CONVENTIONAL LIGHTING UNITS SHALL BE EITHER THE ROADFOCUS AS MANUFACTURED BY SIGNIFY LUMEC (CATALOG# RFM-160W48LED4K-G2-4UNV-BK), THE AUTOBAHN ATBM AS MANUFACTURED BY HOLOPHANE (CATALOG# ATBM\_P30\_MVOLT\_R3\_BK) OR THE EVOLVE ERLH AS MANUFACTURED BY GE LIGHTING (CATALOG# ERLH\_0\_16C340\_BLCK). THE LED LAMP SOURCE SHALL HAVE A COLOR TEMPERATURE OF 4000K. THE ROADFOCUS FIXTURE SHALL HAVE A TYPE IV DISTRIBUTION. THE ATBM FIXTURE AND THE ERLH FIXTURE SHALL HAVE A TYPE III DISTRIBUTION. LUMINAIRES SHALL BE ORIENTED TOWARDS THE CENTERLINE OF COLONEL GLENN HIGHWAY.

LUMINAIRES SHALL INCLUDE A 7-PIN DIMMING RECEPTACLE.

THE LUMINAIRE HOUSING AND ALL VISIBLE MOUNTING HARDWARE SHALL HAVE A BLACK FINISH PER THE MANUFACTURER'S SPECIFICATIONS.

PAYMENT WILL BE MADE AT THE CONTRACT UNIT BID PRICE FOR EACH "ITEM 625 - LUMINAIRE, CONVENTIONAL, 240V, LED, 18000-19000 LUMENS, AS PER PLAN" WHICH SHALL BE FULL COMPENSATION FOR ALL LABOR, MATERIALS, EQUIPMENT, AND INCIDENTALS REQUIRED TO COMPLETE THIS ITEM IN A SATISFACTORY AND WORKMANLIKE MANNER.

ITEM 625 - LUMINAIRE, CONVENTIONAL, 240V, LED, 18000-19000 LUMENS, AS PER PLAN (SIGNIFY LUMEC) - ALTERNATE BID

LUMINAIRES FOR CONVENTIONAL LIGHTING UNITS SHALL BE THE ROADFOCUS AS MANUFACTURED BY SIGNIFY LUMEC (CATALOG# RFM-160W48LED4K-G2-4-UNV-BK). THE LED LAMP SOURCE SHALL HAVE A COLOR TEMPERATURE OF 4000K AND SHALL HAVE A TYPE IV DISTRIBUTION. LUMINAIRES SHALL BE ORIENTED TOWARDS THE CENTERLINE OF COLONEL GLENN HIGHWAY

LUMINAIRES SHALL INCLUDE A 7-PIN DIMMING RECEPTACLE.

THE LUMINAIRE HOUSING AND ALL VISIBLE MOUNTING HARDWARE SHALL HAVE A BLACK FINISH PER THE MANUFACTURER'S SPECIFICATIONS.

PAYMENT WILL BE MADE AT THE CONTRACT UNIT BID PRICE FOR EACH "ITEM 625 - LUMINAIRE, CONVENTIONAL, 240V, LED, 18000-19000 LUMENS, AS PER PLAN (SIGNIFY LUMEC) - ALTERNATE BID" WHICH SHALL BE FULL COMPENSATION FOR ALL LABOR, MATERIALS, EQUIPMENT, AND INCIDENTALS REQUIRED TO COMPLETE THIS ITEM IN A SATISFACTORY AND WORKMANLIKE MANNER

ITEM 625 - LIGHT POLE FOUNDATION, 24' X 6' DEEP, AS PER PLAN

IN ADDITION TO THE REQUIREMENTS OF THE ODOT C&MS, LIGHT POLE FOUNDATIONS INSTALLED ON THIS PROJECT SHALL BE AS

IT IS THE INTENT OF THESE PLANS THAT THE FOUNDATION PLACEMENTS TO NOT CONFLICT WITH EXISTING UTILITIES. THE CONTRACTOR SHALL COMPLETE EXPLORATORY EXCAVATIONS, AS NEEDED, TO ENSURE POLE LOCATIONS CAN BE CONSTRUCTED AT BASE BID LOCATIONS. SHOULD THE CONTRACTOR FIND CONFLICT WITH THE UNDERGROUND OR OVERHEAD UTILITIES, THE CONTRACTOR SHALL COORDINATE WITH THE CITY ENGINEER ON AN ACCEPTABLE LOCATION.

PAYMENT WILL BE MADE AT THE CONTRACT UNIT BID PRICE FOR EACH "ITEM 625 - LIGHT POLE FOUNDATION, 24" X 6' DEEP, AS PER PLAN" WHICH SHALL BE FULL COMPENSATION FOR ALL LABOR, MATERIALS, EQUIPMENT, EXPLORATORY EXCAVATION AND INCIDENTALS REQUIRED TO COMPLETE THIS ITEM IN A SATISFACTORY AND WORKMANLIKE MANNER.

ITEM 625 - TRANSFORMER BASE, MISC.: ALUMINUM TRANSFORMER BASE

IN ADDITION TO THE REQUIREMENTS OF THE ODOT C&MS, TRANSFORMER BASES INSTALLED ON THIS PROJECT SHALL BE AS FOLLOWS:

TRANSFORMER BASES SHALL BE A MAX OF 17" TALL, BE MADE OF ALUMINUM, AND BE APPROVED FOR BREAKAWAY CAPABILITY. THE CONNECTOR BOLT CIRCLE SHALL BE ABLE TO ACCOMMODATE THE BOLT CIRCLE OF THE CHOSEN LIGHT POLE.

THE TRANSFORMER BASE SHALL BE FLUSH WITH THE CONCRETE FOUNDATION. LEVELING NUTS ARE NOT ACCEPTABLE

TRANSFORMER BASES SHALL HAVE A BLACK FINISH (FEDSTD 595B 1703B) THAT CONFORMS TO ODOT SUPPLEMENTAL SPECIFICATION 916

PAYMENT WILL BE MADE AT THE CONTRACT UNIT BID PRICE FOR EACH "ITEM 625 - TRANSFORMER BASE, MISC.: ALUMINUM TRANSFORMER BASE" WHICH SHALL BE FULL COMPENSATION FOR ALL LABOR, MATERIALS, EQUIPMENT, AND INCIDENTALS REQUIRED TO COMPLETE THIS ITEM IN A SATISFACTORY AND WORKMANLIKE MANNER.

DESIGN AGENCY



DESIGNER TAH REVIEWER MWN 06/30/23

PROJECTIO
115009
SUBSET TOTAL
0 0

EET TOTAL

14 20

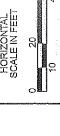
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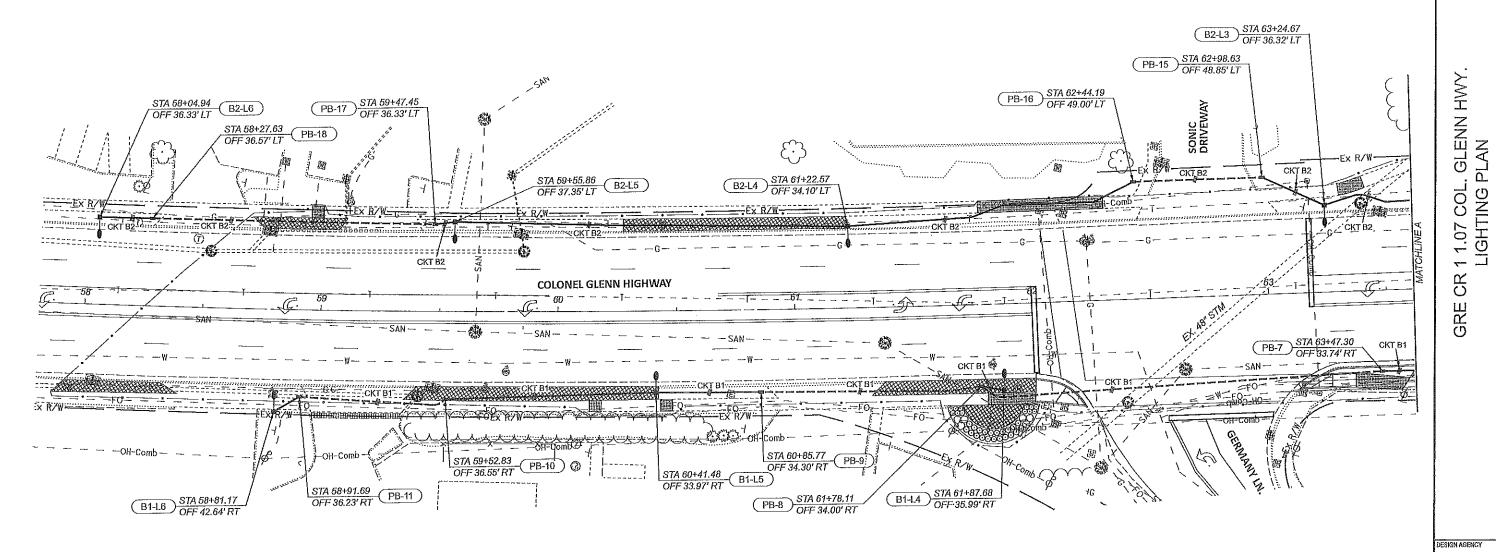
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SHEET NO.	STATION TO STATION	SIDE	POLE / PULL BOX NO.	CONNECTION, FUSED PULL APART	CONNECTION, UNFUSED PULL APART	TRANSFORMER BASE, MISC.: ALUMINUM TRANSFORMER BASE	LIGHT POLE, MISO.: LIGHT POLE WITH BRACKET ARM	LIGHT POLE, MISC.: LIGHT POLE WITH BRACKET ARM (MILLERBERND) - ALTERNATE BID	LIGHT POLE FOUNDATION, 24" X 6' DEEP	LIGHT POLE FOUNDATION, 24" X 6' DEEP, AS PER PLAN	NO. 4 AWG 600 VOLT DISTRIBUTION CABLE	NO. 10 AWG POLE AND BRACKET CABLE	CONDUIT, 2", 725.051	CONDUIT, JACKED OR DRILLED, 725.052, 4"	LUMINAIRE, CONVENTIONAL, 240V, LED, 18000-19000 LUMENS, AS PER PLAN	LUMINAIRE, CONVENTIONAL, 240V, LED, 18000-19000 LUMËNS, AS PER PLAN (SIGNIFY LUMEC) - ALTERNATE BID	TRENCH, 24" DEEP	PULL BOX, 725,06, SIZE4	GROUND ROD	UNDERGROUND WARNINGMARKING TAPE	
				EA	EA	EA	EA	EA	EA	EA	FT	FT	FT	FT	EA	EA	FT	EA	EA	FT	4
	CKT "B2"											123			1	1			1		-
17	STA 58+04.94	LT	B2-L6	2	1	1	1 1	1	1		99	120	23				23			23	1 ≿
17	STA 58+04.94 STA 58+27.63	LT	B2-L6 TO PB-18			-	<u> </u>	-										1			SUBSUMMARY
17	STA 58+27.63	LT	PB-18	-		-		-	<u> </u>		387			119							1
17	STA 58+27.63 STA 59+47.45	LT	PB-18 TO PB-17															1			1 5
17	STA 59+47.45 STA 59+47.45 STA 59+55.86	LT LT	PB-17 PB-17 TO B2-L5	-							54		8			<u> </u>	8			8	1 5
17	STA 59+47.45 STA 59+55.86 STA 59+55.86	LT	B2-L5	2	1	1	1	1	1			123			1	1	,		1	400	_ <u>\</u>
17 17	STA 59+55.86 STA 61+22.57	LT	B2-L5 TO B2-L4								528		166				166			166	Щ Щ
17	STA 61+22.57	LT	B2-L4	2	1	1	1	1	1			123	100		1	1	400		1	123	1
17	STA 61+22.57 STA 62+44.19	LT	B2-L4 TO PB-16								399		123				123	1		123	
17	STA 62+44.19	LT	PB-16								400			54							LIGHTING
17	STA 62+44.19 STA 62+98.63	LT	PB-16 TO PB-15								192			07				1			
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17	STA 62+98.63 STA 63+24.67	LT	PB-15 TO B2-L3					1	1		111	123	20		1	1			1		े ले
17	STA 63+24.67	LT	B2-L3	2	1	1	1	· · · · · ·			483	,,,,,,	151				151			151	
17, 18	STA 63+24.67 STA 64+74.13	L.T	B2-L3 TO B2-L2			1	1	1	1		100	123			1	1			1		]
18	STA 64+74.13	LT	B2-L2	2	1	- '	· · · · · · · · · · · · · · · · · · ·	<del> '</del>			105		25				25			25	]
18	STA 64+74.13 STA 64+91.25	LT	B2-L2 TO PB-14 PB-14			<u> </u>												1			_
18	STA 64+91.25 STA 64+91.25 STA 65+86.95	LT LT	PB-14 TO PB-13		<u>-</u>						318			96							
18	STA 64+91.25 STA 65+86.95 STA 65+86.95	LT	PB-13															. 1		J+ <del>y</del>	-
18 18	STA 65+86.95 STA 66+34.34	LT	PB-13 TO B2-L1								171		47		,		47		,	47	4
18	STA 66+34.34	LT	B2-L1	2	1	1	1	1	1			123	105		7	7	135		1	135	4
18	STA 66+34,34 STA 67+69.76	LT	B2-L1 TO PB-12								435		135				100	1		100	1
18	STA 67+69.76	LT	PB-12								459			143							-
18	STA 67+69.76 STA 69+11.30	LT	PB-12 TO Ex.PB-B								441			170							
18	STA 69+11.30 STA 69+11.45	LT/RT	Ex. PB-B to Ex. PB-A								33										1
18	STA 69+11.45 STA 69+04.88	RT	Ex. PB-A to Ex. LA			<del> </del>															1
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CKT B1: 3 #8 AWG

CKT B2; 3 #8 AWG







# LIGHTING NOTES

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GRE-CR-1

- 1. ALL CONDUIT UNDER ROADWAYS SHALL BE TYPE 725.052, 4", JACKED OR DRILLED AND ALL CONDUIT NOT UNDER ROADWAYS SHALL BE TYPE 725.051, 2" AND INSTALLED IN TRENCH, EXCEPT WHERE OTHERWISE NOTED.
- 2. ALL BRACKET ARMS AND LUMINAIRES SHALL BE ORIENTED PERPENDICULAR TO, AND FACING, THE COLONEL GLENN HIGHWAY CENTERLINE.
- 3. LOCATION OF TRENCH AND CONDUIT RUNS SHOWN ON THE DRAWING ARE APPROXIMATE, MAINTAIN 36" HORIZONTAL CLEARANCE AND 12" VERTICAL CLEARANCE FROM WATER, SANITARY, AND GAS LINES, MAINTAIN 12" HORIZONTAL CLEARANCE AND 12" VERTICAL CLEARANCE FROM UNDERGROUND TELECOM AND UNDERGROUND ELECTRIC LINES. FIELD ADJUST AS NEEDED.
- 4. LIGHT POLE PLACEMENT WAS DESIGNED WITH ELECTRICAL CLEARANCE IN MIND, NO PART OF A LIGHT POLE SHALL BE WITHIN A 5-FT HORIZONTAL OFFSET FROM AN OVERHEAD POWER LINE.
- 5. TRANSFORMER BASES SHALL BE FLUSH WITH CONCRETE FOUNDATION. LEVELING NUTS ARE NOT ACCEPTABLE.
- 6. SEE DETAILS ON SHEET 19 FOR CIRCUIT INFORMATION
- 7. TOP OF LIGHT FOUNDATION FOR PROPOSED LIGHT B1-L6 SHALL BE CONSTRUCTED FLUSH WITH THE TOP OF THE CURB AT THE

# **LEGEND**

- EX. LIGHTING CONTROL CABINET
- PULL BOX, 13" X 24" X 24", 725.06
- CONDUIT, TRENCHED
- ---- CONDUIT, JACKED OR DRILLED

KLEINGERS TAH REVIEWER MWN 06/30/23

GRE

PROJECTID 115009 0 0 CKT B2: 3 #8 AWG



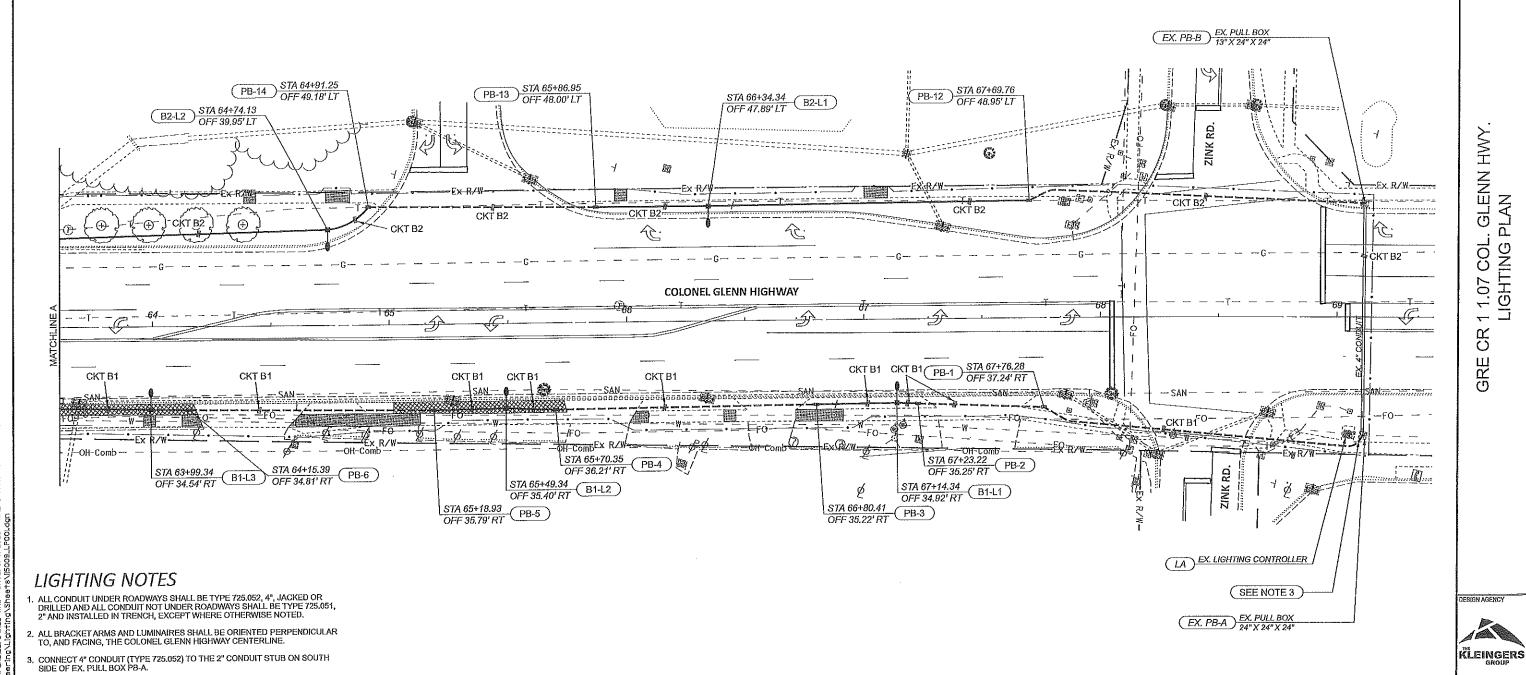
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GRE-CR-1

LOCATION OF TRENCH AND CONDUIT RUNS SHOWN ON THE DRAWING ARE APPROXIMATE. MAINTAIN 36" HORIZONTAL CLEARANCE AND 12" VERTICAL CLEARANCE FROM WATER, SANITARY, AND GAS LINES. MAINTAIN 12" HORIZONTAL CLEARANCE AND 12" VERTICAL CLEARANCE FROM UNDERGROUND TELECOM AND UNDERGROUND ELECTRIC LINES. FIELD ADJUST AS NEEDED.

LIGHT POLE PLACEMENT WAS DESIGNED WITH ELECTRICAL CLEARANCE IN MIND. NO PART OF A LIGHT POLE SHALL BE WITHIN A 5-FT HORIZONTAL OFFSET FROM AN OVERHEAD POWER LINE.

6. TRANSFORMER BASES SHALL BE FLUSH WITH CONCRETE FOUNDATION. LEVELING NUTS ARE NOT ACCEPTABLE.

7. SEE DETAILS ON SHEET 19 FOR CIRCUIT INFORMATION

0

EX. LIGHTING CONTROL CABINET

**LEGEND** 

PULL BOX, 13" X 24" X 24", 725.06

PROPOSED LIGHT POLE

CONDUIT, TRENCHED

115009 0 0 --- CONDUIT, JACKED OR DRILLED TOTAL

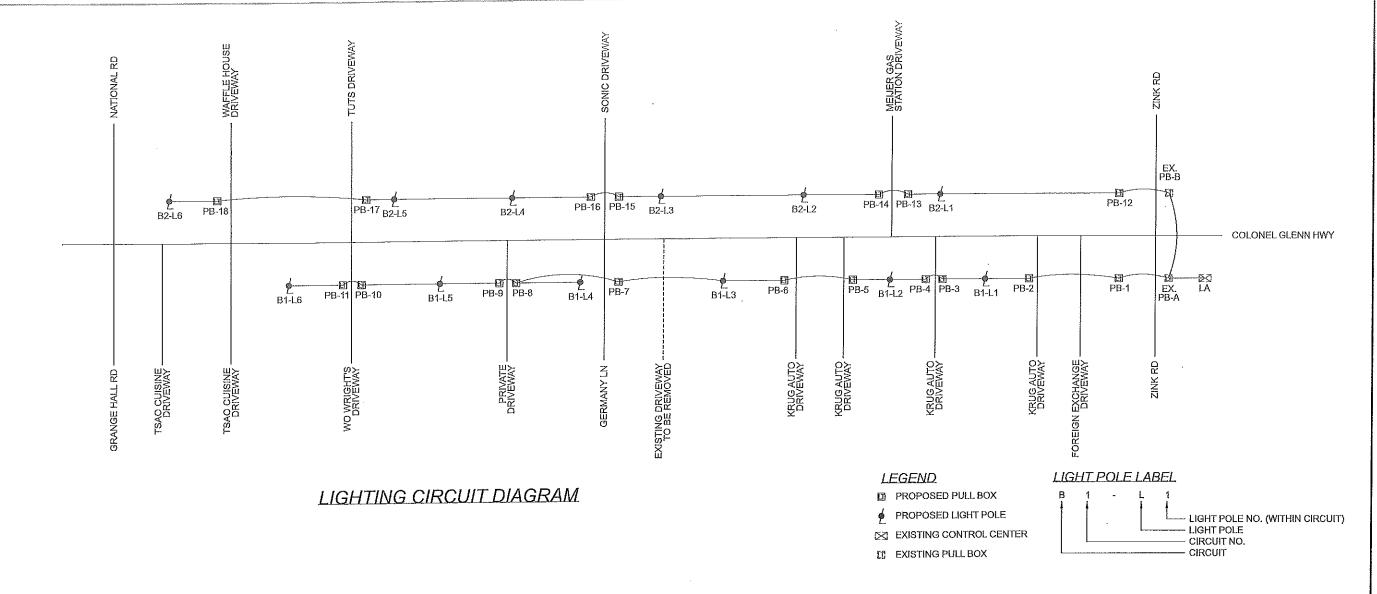
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REVIEWER

MWN 06/30/23

PROJECTIO

18



# CIRCUIT B2 VOLTAGE DROP 'NORTH CIRCUIT'

Section			Amp	eres	Amporo		Voltage	Drop		
From	То	Design Feet	At Point	oint Accum. Feet AWG		AWG	In Section	Accum.	% Drop	At Point
B2-L6	B2-L5	160	0.75	0.75	120	б	0.12	3,66	3.05	B2-L6
B2-L5	B2-L4	165	0.75	1.50	248	6	0.24	3,54	2,95	B2-L5
B2-L4	B2-L3	215	0.75	2,25	484	6	0.47	3,30	2.75	B2-L4
B2-L3	B2-L2	150	0.75	3.00	450	6	0.44	2.82	2.35	B2-L3
B2-L2	B2-L1	173	0.75	3.75	649	6	0.64	2.38	1.99	B2-L2
B2-L1	LA	396	0.75	4.50	1,782	6	1.75	1.75	1.46	B2-L1

# CIRCUIT B1 VOLTAGE DROP 'SOUTH CIRCUIT'

GRE-CR-1 1.07

	Section		Amp	eres	Ampere- Feet	AWG	Voltage	Drop		At Point
From	То	Design Feet	At Point	Accum.			In Section	Accum.	% Drop	
B1-L6	B1-L5	174	0.75	0.75	131	6	0.13	2.98	2.48	B1-L6
B1-L5	81-L4	157	0.75	1.50	236	6	0.23	2.85	2.37	B1-L5
B1-L4	B1-L3	238	0.75	2,25	536	6	0.52	2,62	2.18	B1-L4
B1-L3	B1-L2	160	0.75	3.00	480	6	0.47	2.09	1.74	B1-L3
Bi-L2	B1-L1	175	0.75	3.75	656	6	0.64	1.62	1.35	B1-L2
B1-L1	LA	222	0.75	4.50	999	6	0.98	0.98	0.82	B1-L1

DESIGN AGENCY



DESIGNER
TAH
REVIEWER
MWN 06/30/23
PROJECT ID
115009
8UBSET TOTAL

 B1-L3
 B1-L2
 160
 0.75
 3.00
 480
 6
 0.47
 2.09
 1.74
 B1-L3

 B1-L2
 B1-L1
 175
 0.75
 3.75
 656
 5
 0.64
 1.62
 1.35
 B1-L2

 B1-L1
 1A
 222
 0.75
 4.50
 999
 6
 0.98
 0.98
 0.82
 B1-L1



REVIEWER MWN 06/30/23

115009 SHEET TOTAL 20 20