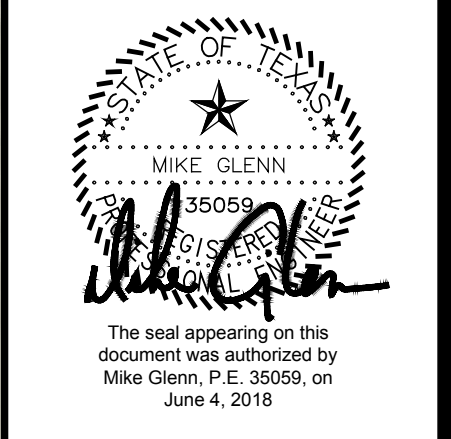


ADDENDUM #1

Date: 04/19/2018
Revision: 1

DOBBS PARKING LOT REVOLUTION
FOR
ROCKWALL I.S.D.
ROCKWALL, TEXAS

Project:



RECORD DRAWING
THIS IS TO CERTIFY THAT CHANGES AND
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OF THIS PROJECT.
Cheryl Ann
DATE: 08/09/2018
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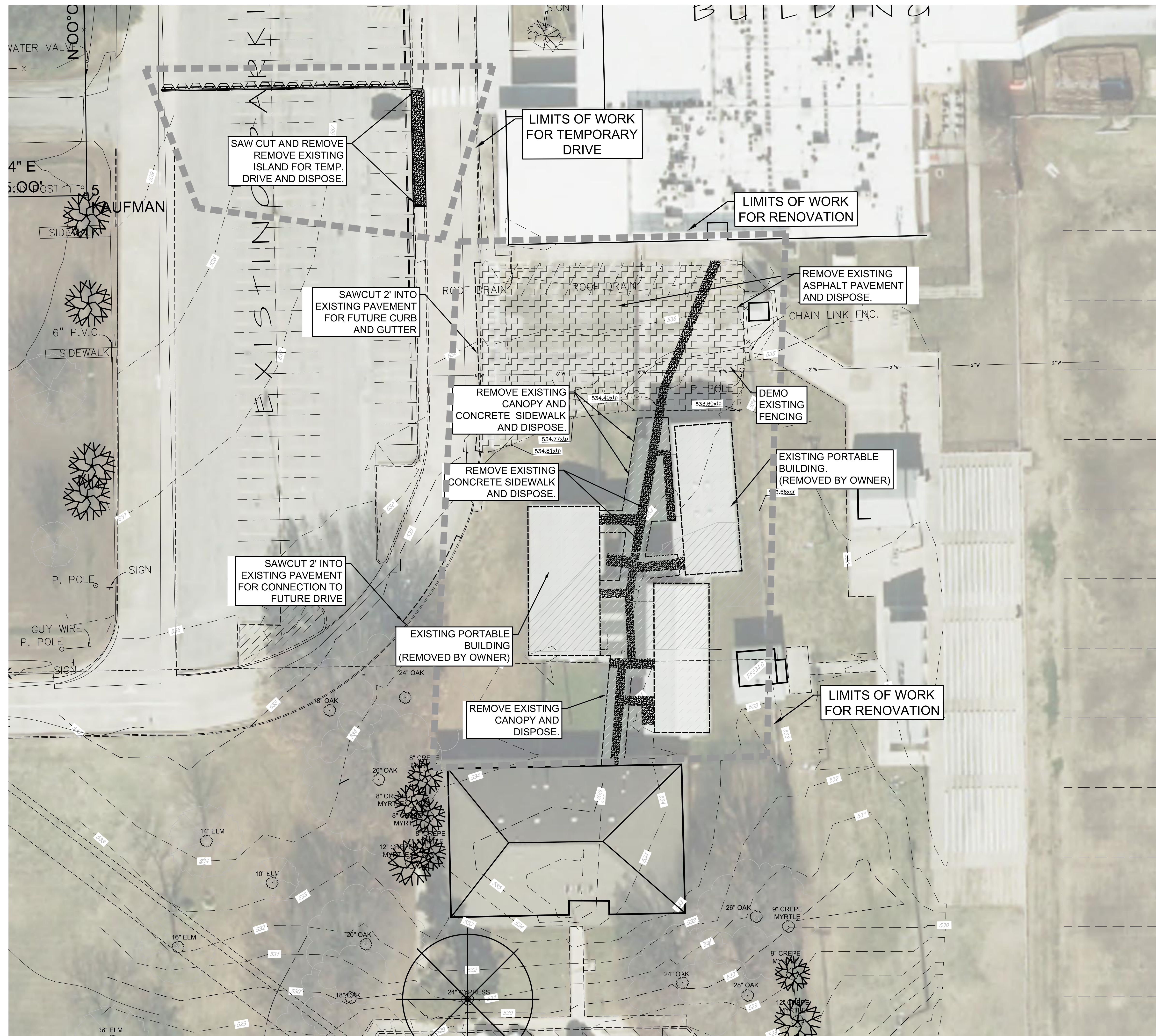
Job No. 1759-03-01
Sheet No. C01.01
Drawn By: RAH
Date: 06-04-2018

FOR INFORMATION ONLY

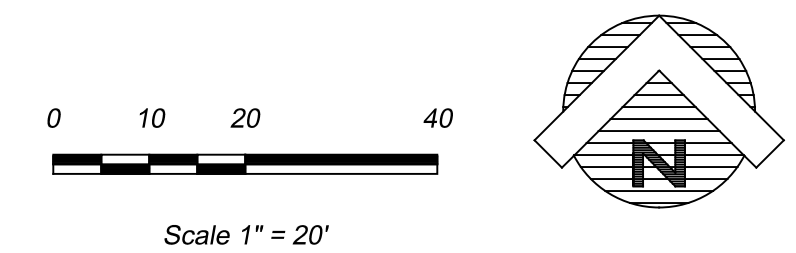
NOTE
UTILITIES HAVE BEEN PLOTTED FROM AVAILABLE MAPS AND RECORDS AND THEREFORE, THEIR LOCATIONS ARE APPROXIMATE ONLY. ELEVATIONS SHOWN ARE BASED ON FIELD MEASUREMENTS. THERE MAY BE OTHER UTILITIES, THE EXISTENCE OF WHICH ARE NOT KNOWN TO THE UNDERSIGNED. SIZE AND LOCATION OF ALL UNDERGROUND UTILITIES MUST BE VERIFIED PRIOR TO ANY CONSTRUCTION.

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- DEMOLITION NOTES:**
- CONTRACTOR SHALL CONSULT ALL UTILITY COMPANIES AND VERIFY LOCATION OF ALL UNDERGROUND UTILITIES PRIOR TO DEMOLITION. REMOVAL AND RELOCATION OF ALL UTILITY LINES, METERS, VALVES, ETC. SHALL BE PERFORMED PER REQUIREMENTS OF THE CITY OF ROCKWALL AND UTILITY COMPANIES. ANY DAMAGE TO PUBLIC UTILITIES SHALL BE THE GENERAL CONTRACTOR'S RESPONSIBILITY TO CORRECT.
 - ALL DEMOLITION AND CONSTRUCTION TO BE KEPT WITHIN THE BOUNDARIES OF THE SITE OR AS DESIGNATED BY CONSTRUCTION ENGINEER. ANY DAMAGE BY CONTRACTOR TO ADJOINING PROPERTIES OR ITEMS NOT IN THE DESIGNATED DEMOLITION AREA SHALL BE THE GENERAL CONTRACTOR'S RESPONSIBILITY TO CORRECT.
 - REMOVE ALL EXISTING UNDERGROUND UTILITIES, CAP AS REQUIRED. BACK FILL AND COMPACT PER TOWN OF ROCKWALL SPECIFICATIONS.
 - REMOVE SURFACE PAVING AS NEEDED TO COMPLETE PAVING PLAN.
 - REMOVE EXISTING SIGNAGE, INCLUDING POSTS AND FOUNDATIONS.
 - REMOVE ANY OTHER ITEMS NOT INDICATED ABOVE BUT WHICH MUST BE DEMOLISHED TO COMPLETE PROJECT AS DESIGNATED BY SITE PLAN.
 - DEMOLITION CONTRACTOR TO CONSULT WITH ARCHITECT OR OWNER ON SALVAGING OR RELOCATING ANY AND ALL PLAYGROUND EQUIPMENT PRIOR TO REMOVING ITEM FROM THE SITE.
 - CONTRACTOR TO USE TREE PROTECTION ON ALL EXISTING TREES THAT ARE TO REMAIN.
 - CONTRACTOR SHALL REMOVE ALL SPRINKLER HEADS AND EQUIPMENT IN THE AREAS OCCUPIED BY THE CONSTRUCTION AND STAGING AREAS. TERMINATE/CAP OFF ALL LINES AS REQUIRED. ALL SPRINKLER HEADS AND EQUIPMENT SHALL BE GIVEN TO THE OWNER. THE CONTRACTOR IS RESPONSIBLE FOR MAKING ALL NECESSARY CHANGES TO THE IRRIGATION SYSTEM THAT ARE REQUIRED TO KEEP THE REMAINING AREAS OUTSIDE THE CONSTRUCTION AREAS IN WORKING ORDER. THIS INCLUDES RELOCATION OF ANY VALVES, PIPING, CONTROLS, ETC., TO OPERATE THE SYSTEM.
 - NO STRUCTURES MAY BE DEMOLISHED WITHOUT A PERMIT FROM THE BUILDING DEPARTMENT. A SEPARATE PERMIT IS REQUIRED FOR EACH STRUCTURE. PAVING, WALLS, FENCES, UTILITIES, AND FLAT WORK CAN BE REMOVED WITHOUT A PERMIT. TRUSS MAY REQUIRE A PERMIT BASED ON THEIR DESIGNATION PER CITY'S TREE ORDINANCE.
 - ALL PIER TOPS SHOULD BE REMOVED A MINIMUM OF FIVE FEET BELOW PROPOSED FINISHED GRADES.



DEMOLITION LEGEND:

	EXISTING CONCRETE PAVING AND CURB TO BE REMOVED AND HAULED OFF.
	EXISTING SIDEWALK TO BE REMOVED AND HAULED OFF.
	EXISTING ASPHALT PAVING TO BE REMOVED AND HAULED OFF.
	EXISTING UNDERGROUND UTILITY OR OVERHEAD UTILITY TO BE REMOVED AND HAULED OFF.
	EXISTING BUILDING, FOUNDATION AND PIERS REMOVED AND HAULED OFF.

NOTE

UTILITIES HAVE BEEN PLOTTED FROM AVAILABLE MAPS AND RECORDS AND THEREFORE, THEIR LOCATIONS ARE APPROXIMATE ONLY. ELEVATIONS SHOWN ARE BASED ON FIELD MEASUREMENTS. THERE MAY BE OTHER UTILITIES, THE EXISTENCE OF WHICH ARE NOT KNOWN TO THE UNDERSIGNED. SIZE AND LOCATION OF ALL UNDERGROUND UTILITIES MUST BE VERIFIED PRIOR TO ANY CONSTRUCTION.

TOTAL DISTURBED ACRES	
DISTURBED ACRES:	32000 SQ. FEET 0.73 ACRES
EXISTING IMPERVIOUS AREA - REMOVED (DEMO)	
IMPERVIOUS AREA: PAVING, CANOPIES AND PORTABLES:	17,328 SF 0.398 ACRES

RECORD DRAWING
THIS IS TO CERTIFY THAT CHANGES AND CORRECTIONS HAVE BEEN MADE TO CONFORM TO THE CONTRACTOR'S RECORD OF THIS PROJECT.

Charalyn Amis
SIGNATURE

DATE: 08/09/2018
Glenn Engineering Corporation

NOTE:

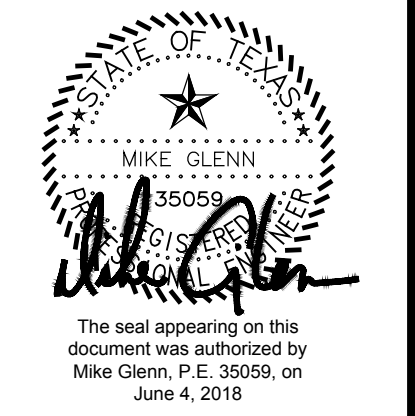
Contractor shall remove all sprinkler heads and equipment in the areas occupied by the construction and staging areas. Terminate/cap off all lines as required. All sprinkler heads and equipment shall be given to the owner. The contractor is responsible for making all necessary changes to the irrigation system that are required to keep the remaining areas outside the construction areas in working order. This includes relocation of any valves, piping, controls, etc., to operate the system.

At the completion of the construction project, this contractor is responsible for installation of an irrigation system throughout the areas that were involved in the construction. Equipment installed shall be the same as that which was removed. Owner will provide the equipment that was removed back to the contractor. Any additional equipment required will be by the contractor.

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Date: 04/19/2018
Revision: 1
ADDENDUM #1

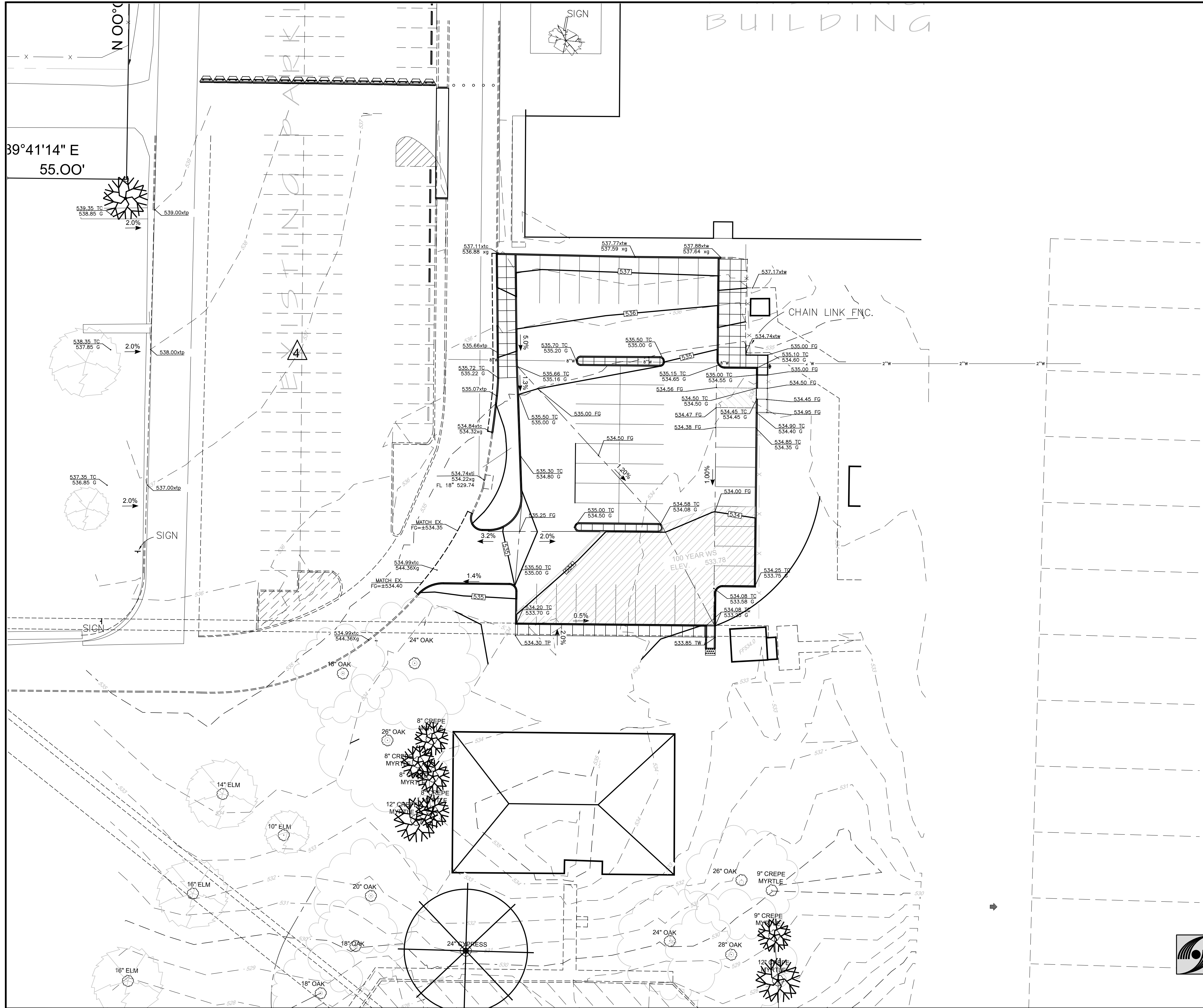
DOBBS PARKING LOT REVOLUTION FOR ROCKWALL I.S.D. ROCKWALL, TEXAS



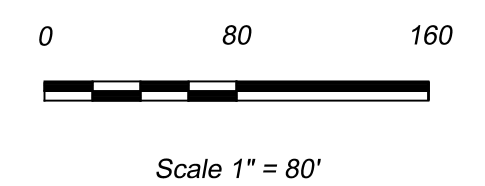
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DEMOLITION PLAN

Job No. 1759-03-01	Sheet No. C02.00
Drawn By: RAH	Date: 06-04-2018



- GENERAL NOTES:**
1. ALL WORK SHALL BE IN ACCORDANCE WITH THESE PLANS AND CITY OF ROCKWALL STANDARDS AND SPECIFICATIONS.
 2. ALL PROPOSED CONTOURS ARE APPROXIMATE. PROPOSED SPOT ELEVATIONS AND DESIGNATED GRADIENT ARE TO BE USED IN THE EVENT OF ANY DISCREPANCIES.
 3. THE GENERAL CONTRACTOR AND ALL SUBCONTRACTORS SHALL VERIFY THE SUITABILITY OF ALL EXISTING AND PROPOSED SITE CONDITIONS INCLUDING GRADES AND DIMENSIONS BEFORE COMMENCEMENT OF ANY CONSTRUCTION. IN THE EVENT OF ANY CONFLICT AND PRIOR TO COMMENCEMENT OF ANY CONSTRUCTION, IMMEDIATELY NOTIFY ENGINEER. MINOR ADJUSTMENTS OF FINISHED GRADE TO ACCOMPLISH SPOT DRAINAGE ARE ACCEPTABLE.
 4. POSITIVE DRAINAGE SHALL BE PROVIDED AWAY FROM ALL FOUNDATIONS AND STRUCTURES.
 5. ALL SPOT ELEVATIONS ARE TOP OF PAVEMENT OR GUTTER. TO OBTAIN TOP OF CURB ELEVATION, ADD 0.5 FEET.
 6. GROUND SHALL BE SCARIFIED PRIOR TO PLACING ANY FILL.
 7. FILL SHALL BE COMPACTED TO 95% WITH A SHEEPS FOOT ROLLER.
 8. ANY EXCESS EXCAVATION SHALL BE DISTRIBUTED AS DIRECTED BY THE OWNER OR THE ENGINEER.
 9. IT IS THE RESPONSIBILITY OF THE CONTRACTOR TO LOCATE AND/OR ESTABLISH A BENCHMARK PRIOR TO CONSTRUCTION AND MAINTAIN THE BENCHMARK DURING CONSTRUCTION.
 10. THE LOCATIONS OF ALL UTILITIES INDICATED ON THE PLANS ARE TAKEN FROM AVAILABLE PUBLIC RECORDS. THE EXACT LOCATION AND DEPTH OF ALL UTILITIES INDICATED MUST BE DETERMINED BY THE CONTRACTOR. IT SHALL BE THE DUTY OF THE CONTRACTOR TO ASCERTAIN WHETHER ANY ADDITIONAL FACILITIES OTHER THAN THOSE SHOWN ON THE PLANS MAY BE PRESENT.
 11. IT SHALL BE THE RESPONSIBILITY OF THE CONTRACTOR TO PROTECT ALL EXISTING UTILITIES IN THE CONSTRUCTION OF THIS PROJECT. ANY UTILITIES DAMAGED DURING THE CONSTRUCTION OF THIS PROJECT SHALL BE REPAIRED AT THE CONTRACTOR'S EXPENSE.
 12. NO WEEP HOLES SHALL BE COVERED.
 13. THIS SITE IS ASSUMED TO BE A BALANCED SITE BY ADJUSTING THE THE BENCHMARK ELEVATION. THE CONTRACTOR SHALL INFORM THE ENGINEERING OF THE ADJUSTMENT TO THE BENCHMARK TO ACHIEVE THE BALANCED SITE.
 14. 75-80% OF ALL DISTURBED AREA TO HAVE A MINIMUM 1" STAND OF GRASS PRIOR TO CITY ACCEPTANCE.



LEGEND

534.50 TC	= PROPOSED TOP OF CURB
534.00 G	= PROPOSED TOP OF PAVEMENT
534.50 FG	= PROPOSED TOP OF INLET
534.50 TI	= PROPOSED FINISH FLOOR
FF=558.00	= PROPOSED FINISH FLOOR
- - - - -	= PROPOSED LANDSCAPE BERM
→	= DIRECTION OF FLOW
535.07xtp	= EXISTING SHOT
- - - - -	= EXISTING CONTOUR

ADDENDUM #1
Date 04/19/2018
Revision / 1

Project: DOBBS PARKING LOT REVOLUTION FOR ROCKWALL I.S.D. ROCKWALL, TEXAS



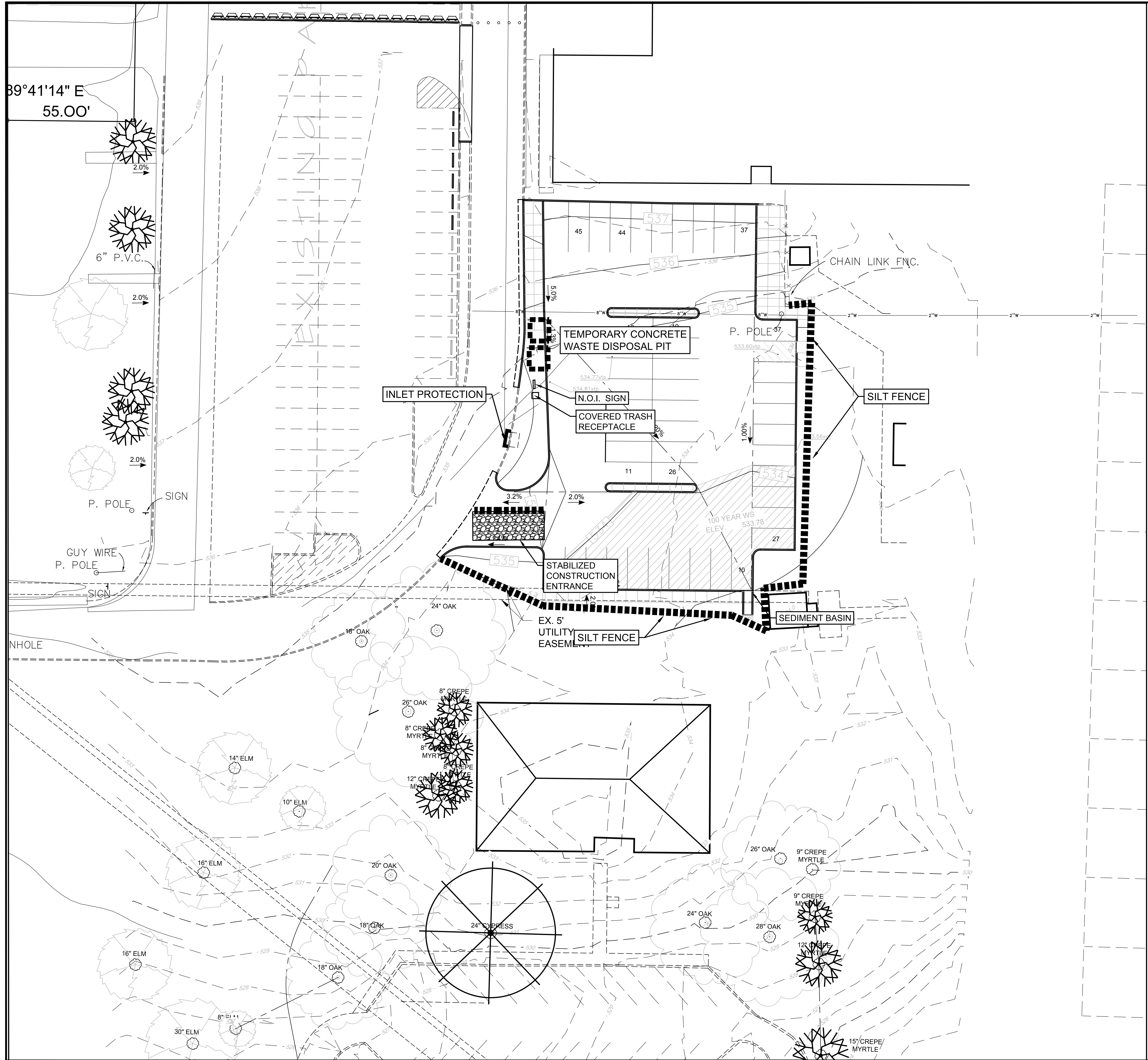
RECORD DRAWING
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Cheryl Annis
DATE: 08/09/2018
Glenn Engineering Corporation



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GRADING PLAN
Job No. 1759-03-01
Drawn By: RAH
Date: 06-04-2018
Sheet No. C04.00

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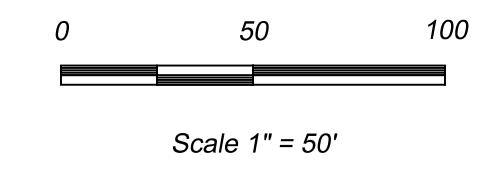
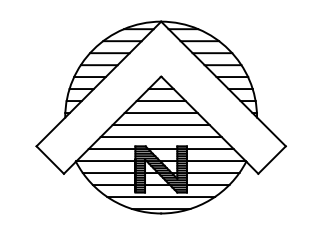


SEDIMENT CONTROL NOTES:

1. CONTRACTOR TO CHOOSE LOCATION OF CONSTRUCTION ENTRANCE. THIS ENTRANCE MUST BE USED BY ALL TRAFFIC ENTERING OR EXITING THE SITE. SEE SHEET CG 1.7 FOR STABILIZED CONSTRUCTION ENTRANCE DETAILS.
2. SEDIMENT CONTROL DEVICES SHALL BE INSTALLED ACCORDING TO THE CONTRACT DOCUMENTS AND AS DIRECTED BY THE ENGINEER. ALL DEVICES SHALL BE MAINTAINED SUCH THAT THEY FUNCTION AS INTENDED THROUGHOUT THE ENTIRE CONSTRUCTION PERIOD. THE STONE FROM ROCK CHECK DAMS SHALL BE USED AS ENERGY DISSIPATORS FOR PROPOSED STORM SEWER AT CONSTRUCTION COMPLETION.
3. CURB INLET PROTECTION SHALL BE INSTALLED AS SOON AS STORM DRAINAGE HAS BEEN CONSTRUCTED.
4. PLYWOOD INLET PROTECTION TO BE PLACED AT UPSTREAM END OF ALL UNFINISHED PIPING AT DAYS END.
5. ALL SEDIMENT CONTROL MEASURES TO REMAIN IN PLACE UNTIL ENTIRE SITE IS STABILIZED.
6. THE EXTENT AND DURATION OF DISTURBANCE TO THE DRAINAGEWAYS SHALL BE MINIMIZED. THE FOLLOWING CONSTRUCTION SEQUENCE SHALL BE FOLLOWED:
 - A. INSTALL STABILIZED CONSTRUCTION ENTRANCE.
 - B. INSTALL SILT FENCE PRIOR TO DISTURBING SOIL. PERIMETER SILT FENCE TO BE INSTALLED OUTSIDE OF ANY POINT TO BE DISTURBED.
 - C. DURING CONSTRUCTION, INLET PROTECTION SHALL BE INSTALLED AS NEEDED. ALL SEDIMENT CONTROL MEASURES SHALL BE INSPECTED AND MAINTAINED PER CONTRACT REQUIREMENTS. ALL DISTURBED AREAS WHICH ARE INACTIVE FOR LONG PERIODS OF TIME SHALL BE VEGETATED.
 - D. ONLY WHEN ENTIRE SITE IS STABILIZED AND CONSTRUCTION IS COMPLETE, SHALL SEDIMENT CONTROL MEASURES BE REMOVED.
7. CONTRACTOR SHALL CONTROL MUD ACCUMULATION ON ALL STREETS SURROUNDING THE PROJECT. NO MUD ACCUMULATION WILL BE ALLOWED IN PUBLIC STREETS.
8. MAINTAIN ALL FILTERS DURING CONSTRUCTION TO PREVENT ANY BLOCKAGES FROM ACCUMULATED SEDIMENT. ADDITIONAL HAY BALES MAY BE REQUIRED DURING CONSTRUCTION AS SPECIFIED BY ENGINEER OR CITY INSPECTOR.
9. ALL PROPOSED PARKING AREAS TO BE PAVED AS SOON AS POSSIBLE AFTER SUBGRADE IS PREPARED.
10. 80% OF ALL DISTURBED AREA SHALL BE COVERED (1 INCH IN HEIGHT) BY GRASS PRIOR TO CITY ACCEPTANCE.
11. ALL DETENTION FACILITIES SHALL BE INSTALLED AND FUNCTIONAL PER PLANS PRIOR TO ANY PAVING BEING PLACED ON SITE INCLUDING BUILDING FOUNDATION.
12. ALL SIDES, SLOPES AND TOP OF DETENTION BASIN SHALL BE SOODED OR ANCHORED ON SEEDED CURLEX PRIOR TO ANY PAVING BEING PLACED INCLUDING BUILDING FOUNDATION.
13. DETENTION BASIN SHALL BE UTILIZED AS SEDIMENT CONTROL BASIN DURING CONSTRUCTION OPERATIONS AND SHALL BE SIZED AND DETAILED PER THE REQUIREMENTS OF TCEQ.

LEGEND

- = INSTALL SILT FENCE
- = INSTALL ROCK CHECK DAM
- = INSTALL CURB INLET PROTECTION
- = INSTALL AREA DRAIN INLET PROTECTION
- = INSTALL SEDIMENT POND AT CURB INLET, WYE INLET OR AREA DRAIN



NOTE:
SEE SEDIMENT CONTROL DETAIL SHEET

RECORD DRAWING
THIS IS TO CERTIFY THAT CHANGES AND
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Charalyn Amigo

DATE: 08/09/2018
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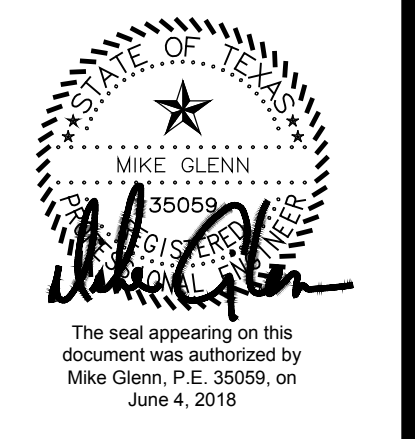
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Date 04/19/2018

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DOBBS PARKING LOT REVOCATION
FOR
ROCKWALL I.S.D.
ROCKWALL, TEXAS

Project:



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S.W.P.P.P. PLAN

Job No. 1759-03-01	Sheet No. C04.01
Drawn By: RAH	Date: 06-04-2018

SITE DESCRIPTION

PROJECT NAME & LOCATION: DOBBS ELEMENTARY SCHOOL
101 SOUTH CLARK STREET
ROCKWALL, TEXAS 75087

OWNER NAME & ADDRESS: ROCKWALL INDEPENDENT SCHOOL DISTRICT
801 EAST WASHINGTON
ROCKWALL, TEXAS

PROJECT DESCRIPTION: DOBBS PARKING RENOVATIONS

SEQUENCE OF MAJOR ACTIVITIES: PLACEMENT OF EROSION CONTROL DEVICES
DENUDE SITE
INSTALLATION OF UTILITY LINES
START FOUNDATION OF BUILDINGS
PLACEMENT OF CONCRETE PAVEMENT
COMPLETE BUILDINGS
PLACEMENT OF LANDSCAPE AND GRASS
REMOVAL OF EROSION CONTROL DEVICES

MAJOR SOIL DISTURBING ACTIVITIES: DENUDE SITE
INSTALLATION OF UTILITY LINES
PLACEMENT OF LANDSCAPE AND GRASS

PRE-DEVELOPMENT RUNOFF COEFFICIENT: 0.70

FINAL RUNOFF COEFFICIENT AFTER CONSTRUCTION: 0.70

TOTAL PROJECT AREA: 25.00 +/- ACRES

TOTAL AREA TO BE DISTURBED: 0.41 ACRES

DESCRIPTION OF EXISTING SOIL: CLAY SOILS

DESCRIPTION OF STABILIZATION OF EXISTING DRAINAGE WAYS:
SILT FENCE
INLET PROTECTION
DETENTION BASIN / SEDIMENT BASIN

DESCRIPTION OF EXISTING QUALITY OF STORM WATER DISCHARGE FOR SITE (IF AVAILABLE):
CITY STREETS
EXISTING STREAM

NAME OF RECEIVING WATERS:
CITY CURB AND GUTTER
CURB AND GUTTER ALONG ROADWAYS
ENCLOSED STORM SEWERS
LITTLE BUFFALO CREEK

ADDITIONAL COMMENTS:

ESTIMATED PROJECT START DATE: APRIL 2018

ESTIMATED PROJECT END DATE: AUGUST 2018

LATITUDE: 32°56'50" N

LONGITUDE: 96°23'33" W

NAME OF RECEIVING WATER: BUFFALO CREEK

STABILIZATION PRACTICES		
TEMPORARY	PERMANENT	
<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	SEED OR SOD
<input type="checkbox"/>	<input checked="" type="checkbox"/>	VEGETATION OTHER THAN SEED OR SOD
<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	EROSION CONTROL MATS
<input type="checkbox"/>	<input type="checkbox"/>	PRESERVATION OF NATURAL VEGETATION
<input type="checkbox"/>	<input type="checkbox"/>	OTHER (DESCRIBE)

ADDITIONAL COMMENTS:

STRUCTURAL PRACTICES		
TEMPORARY	PERMANENT	
<input checked="" type="checkbox"/>	<input type="checkbox"/>	SILT FENCE
<input checked="" type="checkbox"/>	<input type="checkbox"/>	ROCK BERMS
<input type="checkbox"/>	<input type="checkbox"/>	DIVERSION, INTERCEPTOR, OR PERIMETER DIKES
<input type="checkbox"/>	<input type="checkbox"/>	DIVERSION, INTERCEPTOR, OR PERIMETER SWALES
<input type="checkbox"/>	<input type="checkbox"/>	PIPE SLOPE DRAIN
<input type="checkbox"/>	<input type="checkbox"/>	TRIANGULAR SEDIMENT FILTER DIKE
<input checked="" type="checkbox"/>	<input type="checkbox"/>	INLET PROTECTION
<input type="checkbox"/>	<input type="checkbox"/>	STONE OUTLET SEDIMENT TRAP
<input type="checkbox"/>	<input type="checkbox"/>	SEDIMENT BASIN (REQUIRED FOR 10 ACRES OR LARGER WHERE ATTAINABLE)
<input type="checkbox"/>	<input type="checkbox"/>	CHECK DAM
<input type="checkbox"/>	<input type="checkbox"/>	TEMPORARY SEDIMENT TANK
<input checked="" type="checkbox"/>	<input type="checkbox"/>	STABILIZED CONSTRUCTION ENTRY
<input type="checkbox"/>	<input type="checkbox"/>	SANDBAG BERM
<input type="checkbox"/>	<input type="checkbox"/>	OTHER (DESCRIBE)

ADDITIONAL COMMENTS:

OTHER ADDITIONAL STORM WATER MANAGEMENT FEATURES

PERMANENT	
<input checked="" type="checkbox"/>	CURB & GUTTER
<input checked="" type="checkbox"/>	STORM SEWER INLETS
<input checked="" type="checkbox"/>	STORM SEWER
<input checked="" type="checkbox"/>	CULVERTS
<input type="checkbox"/>	STORM WATER DETENTION POND
<input type="checkbox"/>	VELOCITY DISSIPATION DEVICES
<input type="checkbox"/>	OTHER (DESCRIBE)

ADDITIONAL COMMENTS:

EROSION AND SEDIMENT CONTROLS

- MAINTENANCE/INSPECTION PROCEDURES**
- THE CONTRACTOR SHALL PROVIDE AND MAINTAIN A RAIN GAUGE UTILIZING MIN. 0.1 INCH INCREMENTS AT THE PROJECT SITE.
 - CONTROL MEASURES WILL BE INSPECTED AT LEAST ONCE A WEEK OR WITHIN 24 HOURS OF ANY STORM EVENT OF 0.5 INCH OR GREATER. IF A REPAIR IS NECESSARY IT WILL BE DONE AT THE EARLIEST PRACTICABLE DATE.
 - INSPECTION WILL BE PERFORMED BY THE OWNERS REPRESENTATIVE AT LEAST ONCE A WEEK AS WELL AS AFTER EVERY 0.5 INCH OF RAIN OR GREATER. AN INSPECTION AND MAINTENANCE REPORT WILL BE MADE FOR EACH INSPECTION AND KEPT AT THE PROJECT SITE. THE INSPECTION SHOULD USE THE OPERATOR INSPECTION FORM IN THE NCTCOG CONSTRUCTION BMP MANUAL OR OTHER FORM APPROVED BY THE CITY.
 - THE CONTRACTOR SHALL KEEP RECORDS OF THE CONSTRUCTION ACTIVITY ON THE SITE.
OTHER (DESCRIBE)

SEQUENCE AND TIMING OF INDICATED EROSION CONTROL PRACTICES AND/OR FEATURES
(INCLUDE TREATMENT OF STOCKPILED DIRT FOR FUTURE USE)

PRIOR TO STARTING CONSTRUCTION:
PLACEMENT OF SILT FENCES
INSTALLATION OF INLET PROTECTION FOR STREET INLETS

DURING CONSTRUCTION:
INSPECTION AND MAINTENANCE OF SILT FENCES
INSTALLATION OF INLET PROTECTION FOR ON-SITE PAVING

COMPLETION OF SITE:
INSTALLATION OF LANDSCAPE AND GRASS
REMOVAL OF EROSION CONTROL DEVICES

SITE RATING FACTOR UTILIZING INDICATED EROSION CONTROL & MEASURES = 0.70
(MUST BE 0.70 OR LARGER)

EROSION AND SEDIMENT CONTROLS

OTHER BEST MANAGEMENT (HOUSEKEEPING) PRACTICES
THE FOLLOWING INDICATED PRACTICES SHALL BE FOLLOWED:

- LIME STABILIZATION**
 ATTACHED BMP S-11 FROM NCTCOG CONSTRUCTION BMP MANUAL
— OTHER (DESCRIBE):
- SOLID WASTE MANAGEMENT**
 ATTACHED BMP W-2 FROM NCTCOG CONSTRUCTION BMP MANUAL
— OTHER (DESCRIBE):
- HAZARDOUS WASTE MANAGEMENT**
 ATTACHED BMP W-2 FROM NCTCOG CONSTRUCTION BMP MANUAL
— STORAGE AREAS (DESCRIBE):
- OTHER (DESCRIBE):
- CONCRETE WASTE MANAGEMENT**
 ATTACHED BMP W-3 FROM NCTCOG CONSTRUCTION BMP MANUAL
— OTHER (DESCRIBE):
- SANDBLASTING WASTE MANAGEMENT**
 ATTACHED BMP W-4 FROM NCTCOG CONSTRUCTION BMP MANUAL
— OTHER (DESCRIBE):
- DUST REDUCTION MEASURES**
 DISTURBED AREAS DAMPENED PERIODICALLY FOR DUST CONTROL
— EXCESS DIRT ON ADJACENT ROADS REMOVED DAILY
— OTHER (DESCRIBE):

SIGNATORY REQUIREMENTS

THE CITY HAS ADOPTED THE NORTH CENTRAL TEXAS COUNCIL OF GOVERNMENTS (NCTCOG) CONSTRUCTION BMP MANUAL. THESE OUTLINES WERE DEVELOPED AS AN AID FOR THOSE PREPARING STORM WATER POLLUTION PREVENTION PLANS (SW3P'S) FOR VARIOUS CONSTRUCTION ACTIVITIES IN THE CITY. THEIR USE DOES NOT RELIEVE THE DESIGN ENGINEER OR OPERATOR(S) FROM COMPLYING WITH THE NCTCOG BMP MANUAL OR THE NATIONAL POLLUTION DISCHARGE ELIMINATION SYSTEM (NPDES) GENERAL PERMIT FOR STORM WATER DISCHARGE FROM CONSTRUCTION SITES.

THE SW3P SHALL BE SEALED BY A TEXAS REGISTERED PROFESSIONAL ENGINEER AND CERTIFIED BY THE OWNER THAT THE INFORMATION IS TRUE AND THAT THEY ASSUME RESPONSIBILITY FOR THE PLAN. ADDITIONALLY, THEY SHALL CERTIFY THAT THE PLAN MEETS STATE AND LOCAL REQUIREMENTS FOR EROSION AND SEDIMENT CONTROL AND STORM WATER QUALITY. IN ALL CASES, A DULY AUTHORIZED REPRESENTATIVE AS INDICATED IN THE GENERAL PERMIT MAY CERTIFY THIS PLAN.

PRIOR TO THE COMMENCEMENT OF WORK, THE OWNER AND GENERAL CONTRACTOR MUST SUBMIT NOTICES OF INTENT (NOI) AS CO-PERMITTEES TO DISCHARGE STORM WATER FROM A CONSTRUCTION SITE UNDER THE NPDES PERMIT. ADDITIONALLY, ALL CONTRACTORS AND SUBCONTRACTORS (INCLUDING FRANCHISE UTILITIES) WHOSE ACTIVITIES IMPACT THE SW3P MUST SIGN AN APPROVED CERTIFICATION THAT THEY UNDERSTAND THEIR RESPONSIBILITIES UNDER THE PLAN. NO WORK WILL BE ALLOWED UNTIL COPIES OF ALL APPROPRIATE NOIS AND CERTIFICATIONS ARE RECEIVED BY THE CITY.

ALLOWABLE NON-STORM WATER DISCHARGES

- DISCHARGES FROM FIRE FIGHTING ACTIVITIES.
 - FIRE HYDRANT FLUSHINGS. *
 - WATER USED TO WASH VEHICLES OR CONTROL DUST.
 - POTABLE WATER SOURCES (INCLUDING WATERLINE FLUSHINGS CONTAINING LESS THAN 1000 GALLONS). *
 - UNCONTAMINATED GROUND WATER (INCLUDING DEWATERING GROUNDWATER INFILTRATION).
 - FOUNDATION OR FOOTING DRAINS WHERE FLOWS ARE NOT CONTAMINATED WITH PROCESS MATERIALS SUCH AS SOLVENTS.
 - SPRINGS, RIPARIAN HABITATS, WETLANDS AND UNCONTAMINATED GROUNDWATER.
 - IRRIGATION WATER.
 - EXTERIOR BUILDING WASH DOWN WITHOUT DETERGENTS.
 - PAVEMENT WASH WATERS WHERE SPILLS OR LEAKS OF TOXIC OR HAZARDOUS MATERIALS HAVE NOT OCCURRED (UNLESS ALL SPILL MATERIAL HAS BEEN REMOVED) AND WHERE DETERGENTS ARE NOT USED.
 - AIR CONDITIONING CONDENSATE.
- * HEAVILY CHLORINATED WATER (3.5 MGL OR GREATER FREE CHLORINE) RESULTING FROM WATER LINE STERILIZATION SHALL BE DIRECTED UNDER PERMIT TO THE SANITARY SEWER UNLESS OTHERWISE NOTED. THE CONTRACTOR SHALL APPLY TO THE ENGINEERING DEPARTMENT FOR A SANITARY SEWER DISCHARGE PERMIT AFTER THE MANDATORY CHLORINE RETENTION TIME (USUALLY 24 HOURS). THE HEAVILY CHLORINATED WATER MAY BE DISCHARGED TO THE SANITARY SEWER, BEGINNING TWO WORKING DAYS AFTER PERMIT APPLICATION.

RECORD DRAWING
THIS IS TO CERTIFY THAT CHANGES AND CORRECTIONS HAVE BEEN MADE TO CONFORM TO THE CONTRACTOR'S RECORD OF THIS PROJECT.

Cheryl Ann...

DATE: 08/09/2018
Glenn Engineering Corporation

GLENN ENGINEERING
TEXAS REGISTRATION NUMBER: F-303
PHONE 972-717-3151 FAX 972-717-2176
105 DECKER COURT, SUITE 910 IRVING, TEXAS 75062

ADDENDUM #1
Date 04/19/2018
Revision / 1

DOBBS PARKING LOT REVOVATION FOR ROCKWALL I.S.D. ROCKWALL, TEXAS

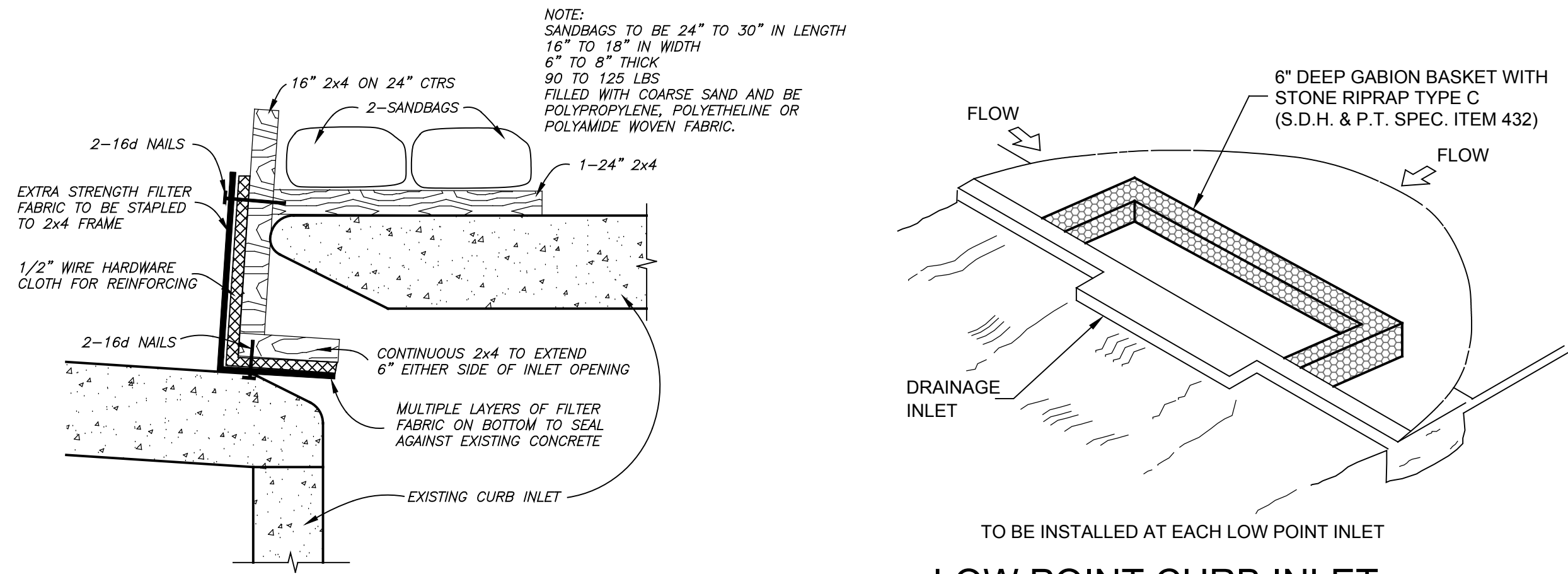


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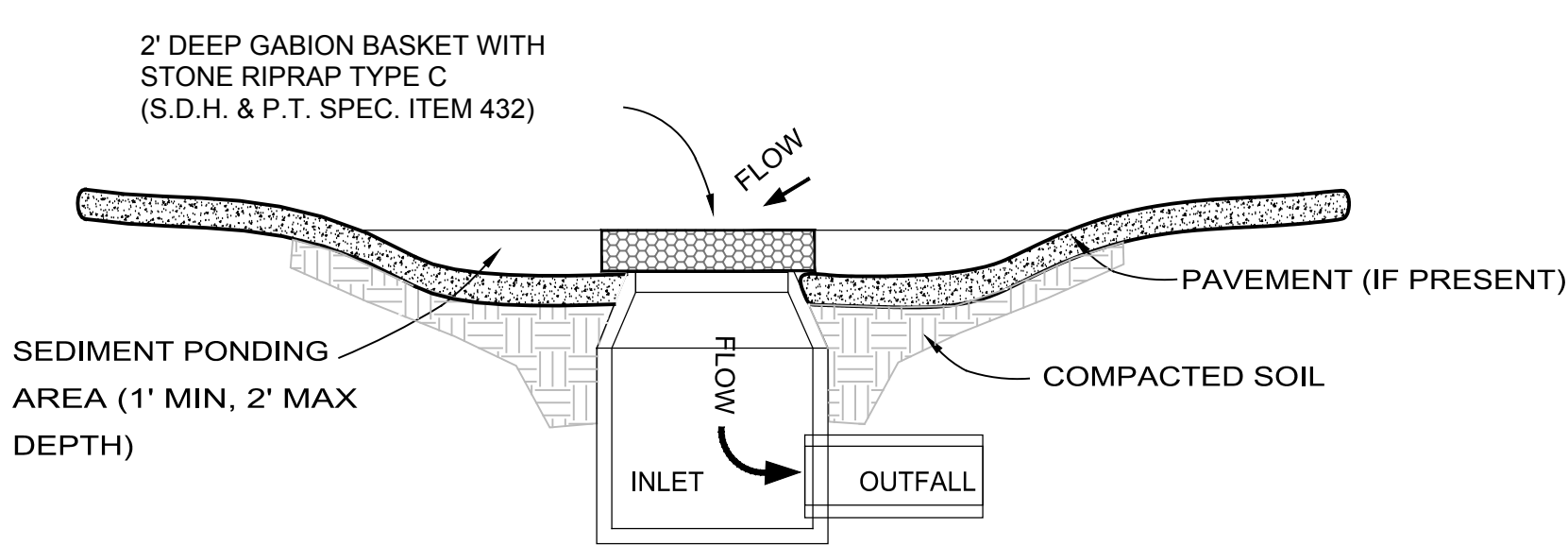
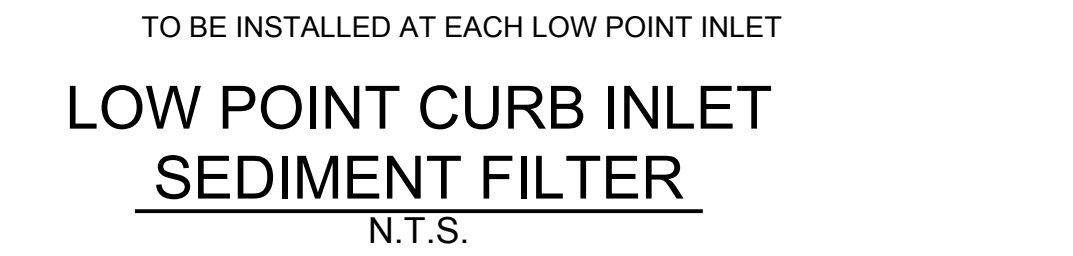
S.W.P.P.P. DETAILS

Job No. 1759-03-01
Sheet No. C04.02
Drawn By: RAH
Date: 06-04-2018

EROSION CONTROL PLAN



CURB INLET PROTECTION ON GRADE
NOT TO SCALE



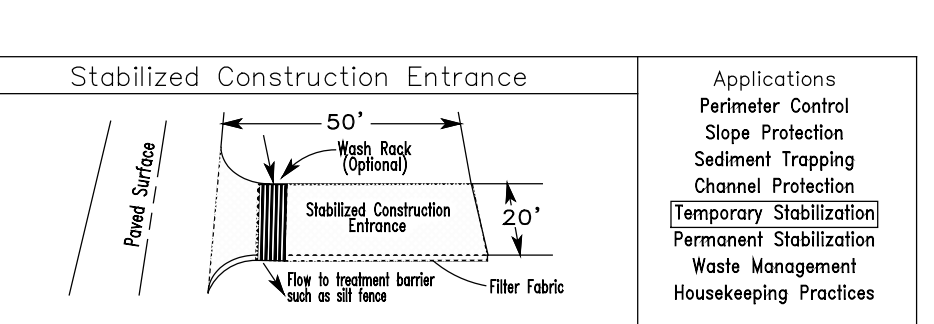
SEDIMENT POND @ CURB INLETS & AREA DRAINS
NOT TO SCALE

Solid Waste Management	
<p>DESCRIPTION Large volumes of solid waste are often generated at construction sites including: packaging, pallets, wood waste, concrete waste, soil, electrical wiring, cuttings, and a variety of other materials. The solid waste management practice lists techniques to minimize the potential of storm water contamination from solid waste through appropriate storage and disposal practices.</p> <p>PRIMARY USE These practices should be a part of all construction practices. By limiting the trash and debris on site, storm water quality is improved along with reduced clean up requirements of the completion of the project.</p> <p>APPLICATIONS The solid waste management practice for construction sites is based on proper storage and disposal practices by construction workers and supervisors. Key elements of the program are education and modification of improper disposal habits. Cooperation and vigilance is required on the part of supervisors and workers to ensure that the recommendations and procedures are followed. Following are lists describing the targeted materials and recommended procedures:</p> <p>Targeted Solid Waste Materials Paper and cardboard containers Plastic packaging Styrofoam packing and forms Insulation materials (non-hazardous) Wood pallets Pipe and electrical cuttings concrete, brick, and mortar waste Shingle cuttings and waste Roofing tar Steel cuttings, nails, rust residue Gypsum board cuttings and waste SOD/Wallboard cuttings and waste Miscellaneous cuttings and waste Food waste Demolition waste</p> <p>Storage Practices Wherever possible, minimize production of solid waste materials. Designate a foreman or supervisor to oversee and enforce proper solid waste procedures. Instruct construction workers in proper solid waste procedures. Segregate potentially hazardous waste from non-hazardous construction site debris. Keep solid waste materials under cover in either a closed dumpster or other enclosed trash container that limits contact with rain and runoff. Store waste materials away from drainage ditches, swales and catch basins. Do not allow trash containers to overflow. Do not allow waste materials to accumulate on the ground. Prohibit littering by workers and visitors. Police area daily for litter and debris. Enforce solid waste handling and storage procedures.</p> <p>Disposal Practices If feasible, segregate recyclable waste from non-recyclable waste and dispose of properly. General construction debris may be hauled to a licensed construction debris landfill (typically less expensive than a sanitary landfill). Use waste facilities approved by local jurisdiction. Runoff which comes into contact with unprotected waste shall be directed into structural dirt treatment such as silt fence to remove debris.</p> <p>Education Educate all workers on solid waste storage and disposal procedures. Instruct workers in identification of solid waste and hazardous waste. Have regular meetings to discuss and reinforce disposal procedures (incorporate in regular safety sessions). Clearly mark on all solid waste containers which materials are acceptable.</p> <p>Quality Control Foreman and/or construction supervisor shall monitor on-site solid waste storage and disposal procedures. Discipline workers who repeatedly violate procedures.</p> <p>Requirements Job-site waste handling and disposal education and awareness program. Commitment by management to implement and enforce Solid Waste Management Program. Compliance by workers. Sufficient and appropriate waste storage containers. Timely removal of stored solid waste materials. Possible modest cost impact for additional waste storage containers. Minimal overall cost impact.</p> <p>LIMITATIONS Only addresses non-hazardous solid waste. One part of a comprehensive construction site management program.</p>	<p>Applications Perimeter Control Slope Protection Sediment Trapping Channel Protection Temporary Stabilization Permanent Stabilization Waste Management Housekeeping Practices</p> <p>Targeted Constituents Sediment Nutrients Toxic Materials Oil & Grease Floatable Materials Other Construction Wastes</p> <p>Implementation Requirements Capital Costs Maintenance Training Subsidiarity for Slopes > 5X</p> <p>Legend Significant Impact Medium Impact Low Impact Unknown or Questionable Impact</p> <p>W-2</p>

Stabilized Construction Entrance	
<p>DESCRIPTION A stabilized construction entrance consists of a pad consisting of gravel, crushed stone, or other rock like material on top of geotextile filter cloth to facilitate the wash down and removal of sediment and other debris from construction equipment prior to exiting the construction site. For added effectiveness, a wash rock area can be incorporated into the design to further reduce sediment tracking. For long term projects, cattle guards or other type of permanent rock system can be used in conjunction with a wash rock. This directly addresses the problem of silt mud deposition in roadways used for construction site access.</p> <p>PRIMARY USE Stabilized construction entrances are used primarily for sites in which significant truck traffic occurs on a daily basis. It reduces the need to remove sediment from streets. If used properly, it also directs the majority of traffic to a single location, reducing the number and quantity of disturbed areas on the site and providing protection for other structural controls through traffic control.</p> <p>APPLICATIONS Stabilized construction entrances are a required part of the erosion control plan for all site developments larger than 5 acres and a recommended practice for all construction sites. It is not suitable for long, linear projects. If possible, small entrances should be incorporated into small lot construction due to the large percentage of disturbed area on the site and the high potential for off-site tracking of silt and mud.</p> <p>DESIGN CRITERIA Stabilized construction entrances are to be constructed such that drainage across the entrance is directed to a controlled, stabilized outlet on site with provisions for storage, proper filtration and removal of wash water. The entrance must be properly graded so that storm water is not allowed to leave the site and enter roadways. Minimum width of entrance shall be 20 feet, but in no case shall the width be less than that of the entry way to be used. Minimum depth of entrance shall be 12 inches for the entire length of the control. Minimum dimensions for entrances of tract areas less than 1 acre shall be an average lot depth of 100 feet with a minimum entrance width of 20 feet and a minimum entrance depth of 50 feet. Minimum 4" to 8" rock, (No crushed concrete allowed).</p> <p>LIMITATIONS Stabilized entrances are rather expensive considering that it must be installed in combination with one or more other sediment control techniques, but it may be cost effective compared to labor intensive street cleaning. Inspections should be made on a regular basis and after large storm events in order to ascertain whether or not sediment and pollution are being effectively detained on site. When sediment has substantially clogged the void area between the rocks, the aggregate mat must be washed down or replaced. Periodic re-grading and top dressing with additional stone must be done to keep the efficiency of the entrance from diminishing.</p> <p>MAINTENANCE REQUIREMENTS Inspections should be made on a weekly basis, especially after large storm events. If the fabric becomes clogged, it should be cleaned or if necessary, replaced.</p> <p>LIMITATIONS Minor ponding will likely occur at the upstream side of the silt fence resulting in minor floodable flooding.</p> <p>Fences which are constructed in swales or low areas subject to concentrated flow may be concentrated overtopped resulting in failure of the filter fence. Silt fences subject to areas of concentrated flow (waterways with flows > 1 cfs) are not acceptable.</p> <p>Silt fence can interfere with construction operations, therefore planning of access routes onto the site is critical.</p> <p>Silt fence can fail structurally under heavy storm flows, creating maintenance problems and reducing the effectiveness of the system.</p> <p>MAINTENANCE REQUIREMENTS Inspections should be made on a weekly basis, especially after large storm events. If the fabric becomes clogged, it should be cleaned or if necessary, replaced.</p> <p>Sediment should be removed when it reaches approximately one-half the height of the fence.</p>	<p>Applications Perimeter Control Slope Protection Sediment Trapping Channel Protection Temporary Stabilization Permanent Stabilization Waste Management Housekeeping Practices</p> <p>Targeted Constituents Sediment Nutrients Toxic Materials Oil & Grease Floatable Materials Other Construction Wastes</p> <p>Implementation Requirements Capital Costs Maintenance Training Subsidiarity for Slopes > 5X</p> <p>Legend Significant Impact Medium Impact Low Impact Unknown or Questionable Impact</p> <p>Fe=0.75 S-1</p>

Inlet Protection	
<p>DESCRIPTION Inlet protection consists of a variety of methods of intercepting sediment of low point inlets through the use of stone filters, fabric and other materials. This is normally located at the inlet, providing either detention or filtration to reduce sediment and floatable materials in storm water.</p> <p>PRIMARY USE Inlet protection is normally used as a secondary defense in site erosion control due to the limited effectiveness and applicability of the technique. It is normally used in new developments that include new inlets or roads with new curb inlets or during major repairs to existing roadways. Inlet protection has limited use in developed areas due to the potential for flooding, traffic safety and pedestrian safety and maintenance problems. Inlet protection can reduce sediment in storm sewer system by serving as a back up system to on-site controls or by reducing sediment loads from controls with limited effectiveness such as stone dikes.</p> <p>APPLICATIONS Different variations are used for different conditions as follows: Filter barrier protection (similar to a silt fence barrier around the inlet) is appropriate when the drainage area is less than five (5) percent. This type of protection is not applicable in paved areas. (See details, Section 9) Block and gravel (crushed stone, recycled concrete is also appropriate) protection is used when flows exceed 0.5 cfs and it is necessary to allow for overtopping to prevent flooding (See sketch at top of fact sheet). Wire mesh and gravel protection (where the drainage area is less than five (5) percent) is used when flows exceed 0.5 cfs and construction traffic may occur over the inlet. This form of protection may be used with both curb and drop inlets (See details Section 9). Excavated impoundment protection around a drop inlet may be used for protection against sediment entering a storm drain system. With this method, it is necessary to install weep holes to allow the impoundment to drain completely. The impoundment shall be sized such that the volume of excavation shall be equal to 1800 to 3500 cubic feet per acre of contributing drainage area entering the inlet for full effectiveness. Smaller volumes can be used for reduced effectiveness (SEE details Section 9).</p> <p>Filter fabric protection shall be designed and maintained in a manner similar to silt fence. Maximum depth of flow shall be (8) eight inches or less depending on vehicular and pedestrian traffic. Positive drainage is critical in the design of inlet protection. If overflow is not provided for the inlet, flows which exceed the capacity of the protection system shall be routed through established swales, streets or other watercourses to minimize damage due to ponding and to provide for public safety.</p> <p>LIMITATIONS Ponding will occur at the inlet with possible flooding as a result. Inlet protection is only viable at low point inlets. Inlets which are on a slope cannot be effectively protected because storm water will bypass the inlet and continue downstream, causing an overload condition at inlets beyond.</p> <p>MAINTENANCE REQUIREMENTS Inspections should be made on a weekly basis, especially after large (>0.5 inches) storm events. When all fence is used and the fabric becomes clogged, it should be cleaned or if necessary, replaced. Also, sediment should be removed when it reaches approximately one-half the height of the fence. If a pump is used, sediment should be removed when the volume of the basin is reduced by 50%.</p> <p>For systems using stone filters, when the stone filter becomes clogged with sediment, the stones must be pulled away from the inlet. Stone cleaning of gravel at construction site may be difficult, an alternative approach would be to use the clogged stone as fill material and put new stone around the inlet.</p>	<p>Applications Perimeter Control Slope Protection Sediment Trapping Channel Protection Temporary Stabilization Permanent Stabilization Waste Management Housekeeping Practices</p> <p>Targeted Constituents Sediment Nutrients Toxic Materials Oil & Grease Floatable Materials Other Construction Wastes</p> <p>Implementation Requirements Capital Costs Maintenance Training Subsidiarity for Slopes > 5X</p> <p>Legend Significant Impact Medium Impact Low Impact Unknown or Questionable Impact</p> <p>Fe=0.67-0.75 S-4</p>

Silt Fence	
<p>DESCRIPTION A silt fence consists of geotextile fabric supported by poultry netting or other backing stretched between metal posts with the lower edge of the fabric securely embedded in the soil. The fence is typically located downstream of disturbed areas to intercept runoff in the form of sheet flow. Silt fence provides both filtration and time for sedimentation to reduce sediment and it reduces the velocity of the runoff. Properly designed silt fence is economical since it can be re-located during construction and re-used on other projects.</p> <p>PRIMARY USE Silt fence is normally used as perimeter control located downstream of disturbed areas. It is only feasible for non-concentrated, sheet flow conditions.</p> <p>APPLICATIONS Silt fence is an economical means to treat overland, non-concentrated flows for all types of projects. Silt fences are used as perimeter control devices for both site developments and linear (roadway) type projects. They are most effective with coarse to silty soil types. Due to the potential of clogging, silt fence should not be used with clay soil types.</p> <p>In order to reduce the length of silt fence, it should be placed adjacent to the down slope side of the construction activities.</p> <p>elevation (along a contour line) where possible. Maximum slope adjacent to the fence is 1:1. Maximum distance of flow to silt fence should be 200 feet or less. Maximum concentrated flow to silt fence shall be 1 CFS per 20 feet of fence. If 50% or less of soil, by weight, passes the U.S. Standard sieve No. 200, select the equivalent opening size (E.O.S.) to retain 85% of the soil. Maximum equivalent opening size shall be 70 (#70 sieve). Minimum equivalent opening size shall be 100 (#100 sieve). If 85% or more of soil, by weight, passes the U.S. Standard sieve No. 200, silt fences shall not be used due to potential clogging. Sufficient room for the operation of sediment removal equipment shall be provided between the silt fence and other obstructions in order to properly maintain the fence. The ends of the fence shall be turned upstream to prevent bypass of stormwater.</p> <p>LIMITATIONS Minor ponding will likely occur at the upstream side of the silt fence resulting in minor floodable flooding.</p> <p>Fences which are constructed in swales or low areas subject to concentrated flow may be concentrated overtopped resulting in failure of the filter fence. Silt fences subject to areas of concentrated flow (waterways with flows > 1 cfs) are not acceptable.</p> <p>Silt fence can interfere with construction operations, therefore planning of access routes onto the site is critical.</p> <p>Silt fence can fail structurally under heavy storm flows, creating maintenance problems and reducing the effectiveness of the system.</p> <p>MAINTENANCE REQUIREMENTS Inspections should be made on a weekly basis, especially after large storm events. If the fabric becomes clogged, it should be cleaned or if necessary, replaced.</p> <p>Sediment should be removed when it reaches approximately one-half the height of the fence.</p>	<p>Applications Perimeter Control Slope Protection Sediment Trapping Channel Protection Temporary Stabilization Permanent Stabilization Waste Management Housekeeping Practices</p> <p>Targeted Constituents Sediment Nutrients Toxic Materials Oil & Grease Floatable Materials Other Construction Wastes</p> <p>Implementation Requirements Capital Costs Maintenance Training Subsidiarity for Slopes > 5X</p> <p>Legend Significant Impact Medium Impact Low Impact Unknown or Questionable Impact</p> <p>Fe=0.75 S-1</p>



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Concrete Waste Management	
<p>DESCRIPTION Concrete waste at construction sites comes in two forms: 1) excess fresh concrete mix including truck and equipment washing, and 2) concrete dust and concrete debris resulting from demolition. Both forms have the potential to impact water quality through storm water runoff contact with the waste.</p> <p>PRIMARY USE Concrete waste is present at most construction sites. This BMP should be utilized at sites in which concrete waste is present.</p> <p>APPLICATIONS A number of water quality parameters can be affected by introduction of concrete - especially fresh concrete. Concrete affects the pH of runoff, causing significant chemical changes in water bodies and harming aquatic life. Suspended solids in the form of both cement and aggregate dust are also generated from both fresh and demolished concrete waste.</p> <p>Current Unacceptable Waste Concrete Disposal Practices Dumping in vacant areas on the job-site. Blind dumping off-site. Dumping into ditches or drainage facilities. Avoid unacceptable disposal practices listed above. Develop pre-determined, safe concrete disposal areas. Provide a washout area with a minimum of 6 cubic feet of containment area volume for every 10 cubic yards of concrete poured. Never dump waste concrete illicitly or without proper owners knowledge and consent. Treat runoff from storage areas through the use of structural controls as required.</p> <p>Education Drivers and equipment operators should be instructed on proper disposal and equipment washing practices (see above). Supervisors must be made aware of the potential for environmental consequences of improperly handled concrete waste.</p> <p>Enforcement The construction site manager or foreman must ensure that employees and pre-mix companies follow proper procedures for concrete disposal and equipment washing. Employees violating disposal or equipment cleaning directives must be re-educated or disciplined if necessary.</p> <p>Demolition Practices Monitor weather and wind direction to ensure concrete dust is not entering drainage structures and surface waters. Where appropriate, construct sediment traps or other types of sediment detention devices downstream of demolition activities.</p> <p>Requirements Use pre-determined disposal sites for waste concrete. Prohibit dumping waste concrete anywhere but pre-determined areas. Assign pre-determined truck and equipment washing areas. Educate drivers and operators on proper disposal and equipment cleaning procedures. Education. Minimal cost impact for training and monitoring. Concrete disposal cost depends on availability and distance to suitable disposal areas. Additional costs involved in equipment washing should be significant.</p> <p>LIMITATIONS This concrete waste management program is one part of a comprehensive construction site waste management program.</p>	<p>Applications Perimeter Control Slope Protection Sediment Trapping Channel Protection Temporary Stabilization Permanent Stabilization Waste Management Housekeeping Practices</p> <p>Targeted Constituents Sediment Nutrients Toxic Materials Oil & Grease Floatable Materials Other Construction Wastes</p> <p>Implementation Requirements Capital Costs Maintenance Training Subsidiarity for Slopes > 5X</p> <p>Legend Significant Impact Medium Impact Low Impact Unknown or Questionable Impact</p> <p>W-3</p>

Stabilized Construction Entrance	
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ALLOWABLE NON-STORM WATER DISCHARGES	
<p>DISCHARGES FROM FIRE FIGHTING ACTIVITIES. FIRE HYDRANT FLUSHINGS. WATER USED TO WASH VEHICLES OR CONTROL DUST. POTABLE WATER SOURCES (INCLUDING WATERLINE FLUSHINGS CONTAINING LESS THAN 1000 GALLONS). UNCONTAMINATED GROUND WATER (INCLUDING DEWATERING GROUNDWATER INFILTRATION). FOUNDATION OR FOOTING DRAINS WHERE FLOWS ARE NOT CONTAMINATED WITH PROCESS MATERIALS SUCH AS SOLVENTS. SPRINGS, RIPARIAN HABITATS, WETLANDS AND UNCONTAMINATED GROUNDWATER. IRRIGATION WATER. EXTERIOR BUILDING WASH DOWN WITHOUT DETERGENTS. PAVEMENT WASH WATERS WHERE SPILLS OR LEAKS OF TOXIC OR HAZARDOUS MATERIALS HAVE NOT OCCURRED (UNLESS ALL SPILL MATERIAL HAS BEEN REMOVED) AND WHERE DETERGENTS ARE NOT USED. AIR CONDITIONING CONDENSATE. HEAVILY CHLORINATED WATER (3.5 MG/L OR GREATER FREE CHLORINE) RESULTING FROM WATER LINE STERILIZATION SHALL BE DIRECTED UNDER PERMIT TO THE SANITARY SEWER UNLESS OTHERWISE NOTED. THE CONTRACTOR SHALL APPLY TO THE ENGINEERING DEPARTMENT FOR A SANITARY SEWER DISCHARGE PERMIT AFTER THE MANDATORY CHLORINE RETENTION TIME (USUALLY 24 HOURS). THE HEAVILY CHLORINATED WATER MAY BE DISCHARGED TO THE SANITARY SEWER, BEGINNING TWO WORKING DAYS AFTER PERMIT APPLICATION.</p>	<p>Applications Perimeter Control Slope Protection Sediment Trapping Channel Protection Temporary Stabilization Permanent Stabilization Waste Management Housekeeping Practices</p> <p>Targeted Constituents Sediment Nutrients Toxic Materials Oil & Grease Floatable Materials Other Construction Wastes</p> <p>Implementation Requirements Capital Costs Maintenance Training Subsidiarity for Slopes > 5X</p> <p>Legend Significant Impact Medium Impact Low Impact Unknown or Questionable Impact</p> <p>Fe=N/A S-9</p>

RECORD DRAWING
THIS IS TO CERTIFY THAT CHANGES AND CORRECTIONS HAVE BEEN MADE TO CONFORM TO THE CONTRACTOR'S RECORD OF THIS PROJECT.

Cheryl Ann

DATE: 08/09/2018
Glenn Engineering Corporation

GLENN ENGINEERING
TEXAS REGISTRATION NUMBER: F-303
PHONE 972-717-3151 105 DECKER COURT, SUITE 910 IRVING, TEXAS 75062
FAX 972-717-2176

ADDENDUM #1

Date: 04/19/2018
Revision: 1

DOBBS PARKING LOT REVOLUTION FOR ROCKWALL I.S.D. ROCKWALL, TEXAS

Project: DOBBS PARKING LOT REVOLUTION FOR ROCKWALL I.S.D. ROCKWALL, TEXAS

MIKE GLENN
350595
The seal appearing on this document was authorized by Mike Glenn, P.E. 350595, on June 4, 2018.

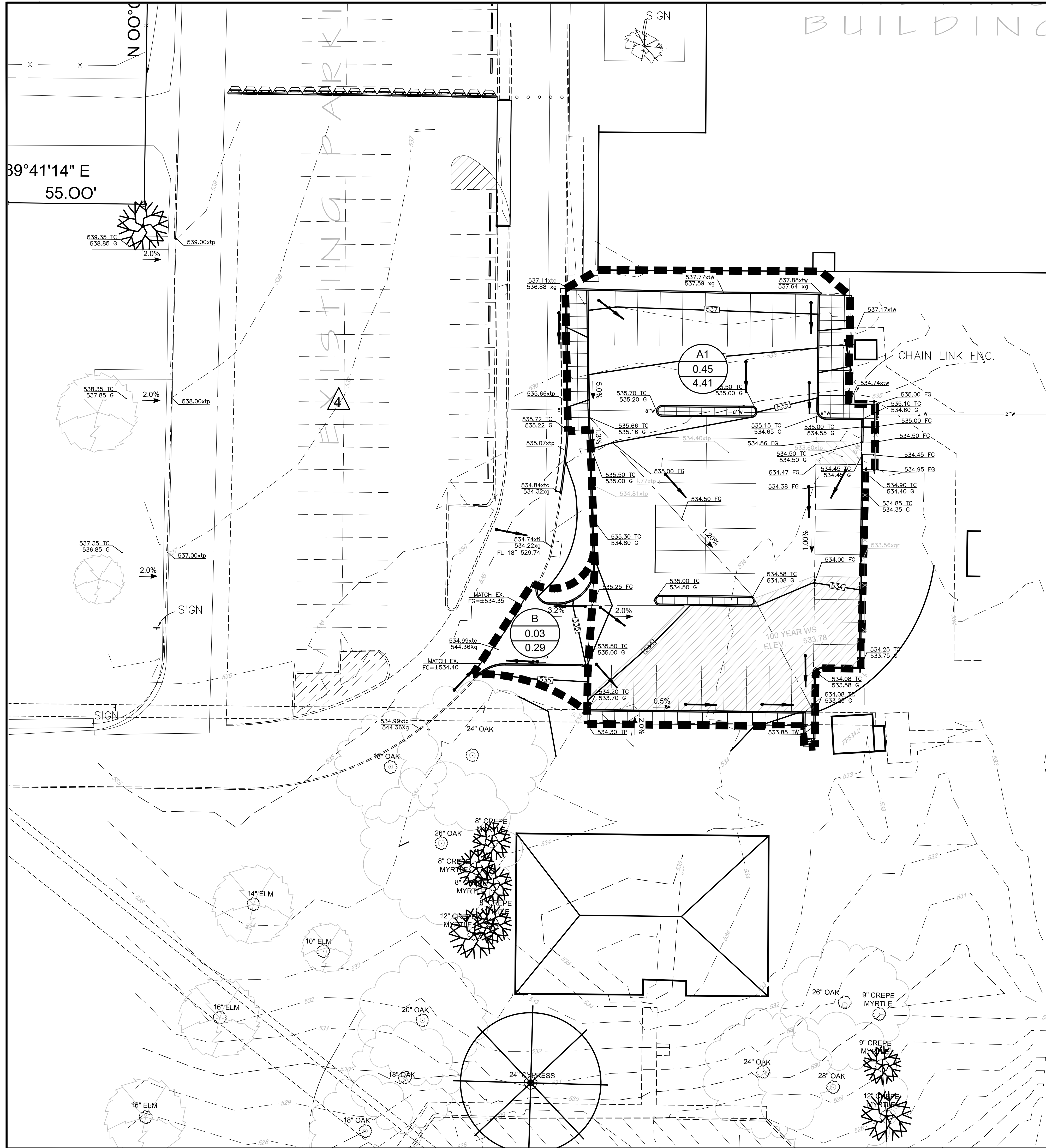
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S.W.P.P.P. DETAILS

Job No. 1759-03-01
Sheet No. C04.03
Drawn By: RAH
Date: 06-04-2018

PLYWOOD PROTECTION AT PIPE
N.T.S.

ROCK CHECK DAM DETAIL
N.T.S.

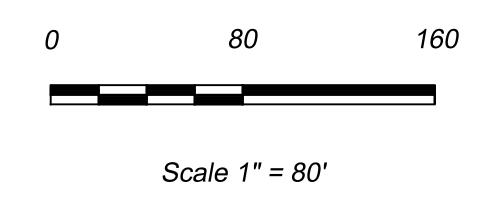


PRE DEVELOPEMENT RUNOFF CALCULATIONS DOBBS PARKING RENOVATIONS							
AREA ID	DRAINAGE AREA (ACRES)	RUNOFF COEFFICIENT "W"	C*A	TIME OF CONCENTRATION MINUTES	INTENSITY "1100" (INCHES/HR)	DESIGN FLOW "Q 100" (CFS)	DRAINS TO / REMARKS
TO BASIN							
A1	0.45	0.84	0.38	10	9.80	3.704	SHEET FLOW
B	0.03	0.35	0.01	10	9.80	0.103	GRASS AREA
						SUM OF AREAS "Q100"	3.807 (round to 3.81)

POST DEVELOPEMENT RUNOFF CALCULATIONS DOBBS PARKING RENOVATIONS							
AREA ID	DRAINAGE AREA (ACRES)	RUNOFF COEFFICIENT "C"	C*A	TIME OF CONCENTRATION MINUTES	INTENSITY "1100" (INCHES/HR)	DESIGN FLOW "Q 100" (CFS)	DRAINS TO / REMARKS
TO BASIN							
A1	0.45	1.00	0.45	10	9.80	4.41	TO SIDEWALK FLUME / DETENTION WIER
B	0.03	1.00	0.03	10	9.80	0.29	TO EXISTING DRIVE
						SUM OF AREAS "Q100"	4.7

DRAINAGE STUDY LEGEND

- ▬ DRAINAGE DIVIDE (NEW)
- A1
0.25
2.00
- 435
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- 499
- 500



TOTAL DISTURBED ACRES	
DISTURBED ACRES:	32000 SQ. FEET 0.73 ACRES
EXISTING IMPERVIOUS AREA - REMOVED (DEMO)	
IMPERVIOUS AREA: PAVING, CANOPIES AND PORTABLES.	17,328 SF 0.398 ACRES
PROPOSED IMPERVIOUS AREA	
IMPERVIOUS ACRES: PAVING AND SIDEWALKS	19,000 SF 0.436 ACRES
TOTAL CHANGE IN IMPERVIOUS AREA	
PROPOSED 19,000 SF - EXISTING 17,328 SF =	1,672 SF OR 0.038 ACRES
FLOW CHANGE DUE TO IMPERVIOUS AREA	
$(1.0)(9.8)(0.038) - (0.35)(9.8)(0.038) = 0.242$ CFS	
EXISTING WEIGHTED "C" CALCULATION	
WEIGHTED C = $(1.0 \text{ IMPERVIOUS AREA} + 0.35 \text{ UNDEVELOPED AREA}) / \text{TOTAL AREA}$	
$((1.0 * .36) + (0.35 * .09)) / .45 =$	
$(0.36 + 0.032) / .45 = 0.87$	

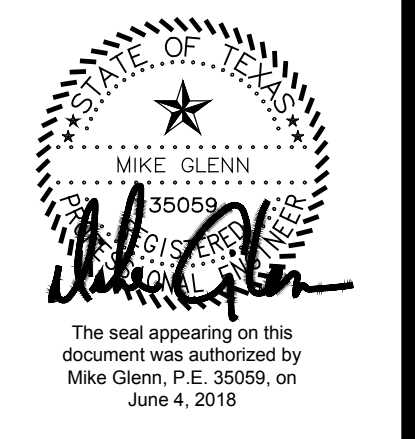
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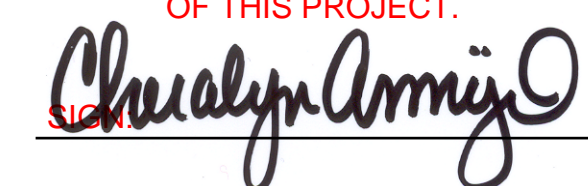
Date 04/19/2018

Revision / 1


DOBBS PARKING LOT REVOLUTION FOR ROCKWALL I.S.D. ROCKWALL, TEXAS

Project:



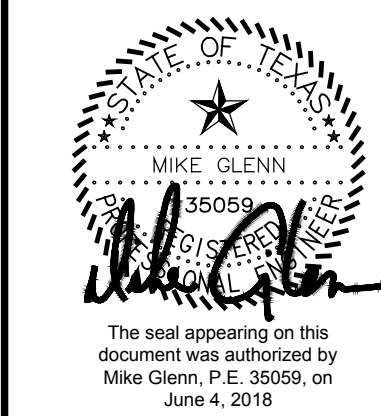
RECORD DRAWING
 THIS IS TO CERTIFY THAT CHANGES AND CORRECTIONS HAVE BEEN MADE TO CONFORM TO THE CONTRACTOR'S RECORD OF THIS PROJECT.

 DATE: 08/09/2018
 Glenn Engineering Corporation

Huckabee
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www.huckabee-inc.com 800.687.1229


GLENN ENGINEERING
 TEXAS REGISTRATION NUMBER: F-303
 PHONE 972-717-3151 FAX 972-717-2176
 105 DECKER COURT, SUITE 910 IRVING, TEXAS 75062

DRAINAGE AREA MAP
 Job No. 1759-03-01 Sheet No. C04.04
 Drawn By: RAH
 Date: 06-04-2018

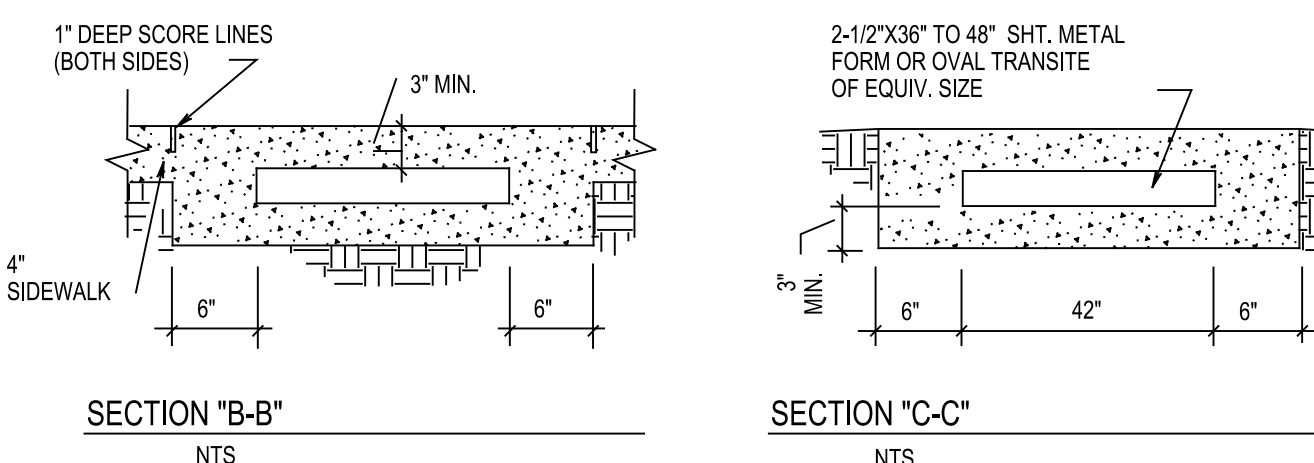
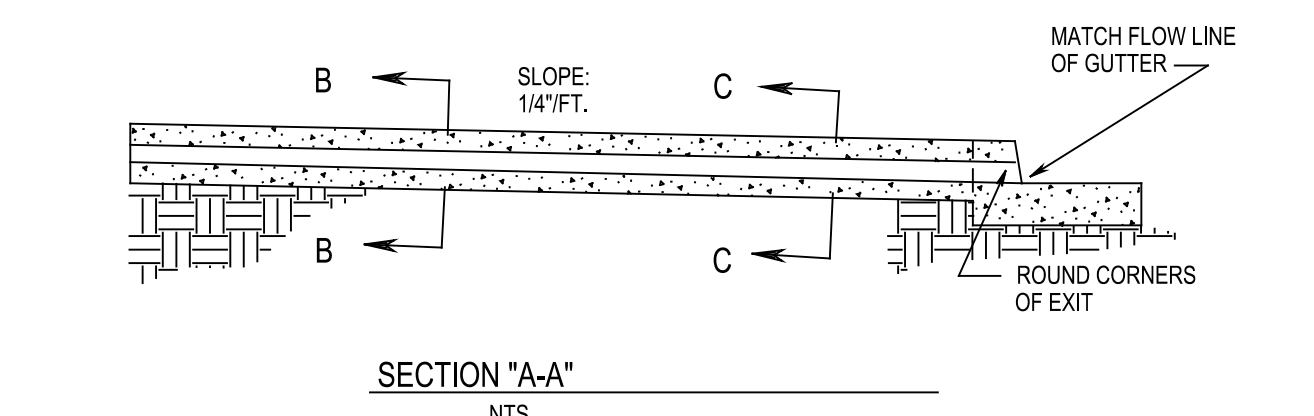
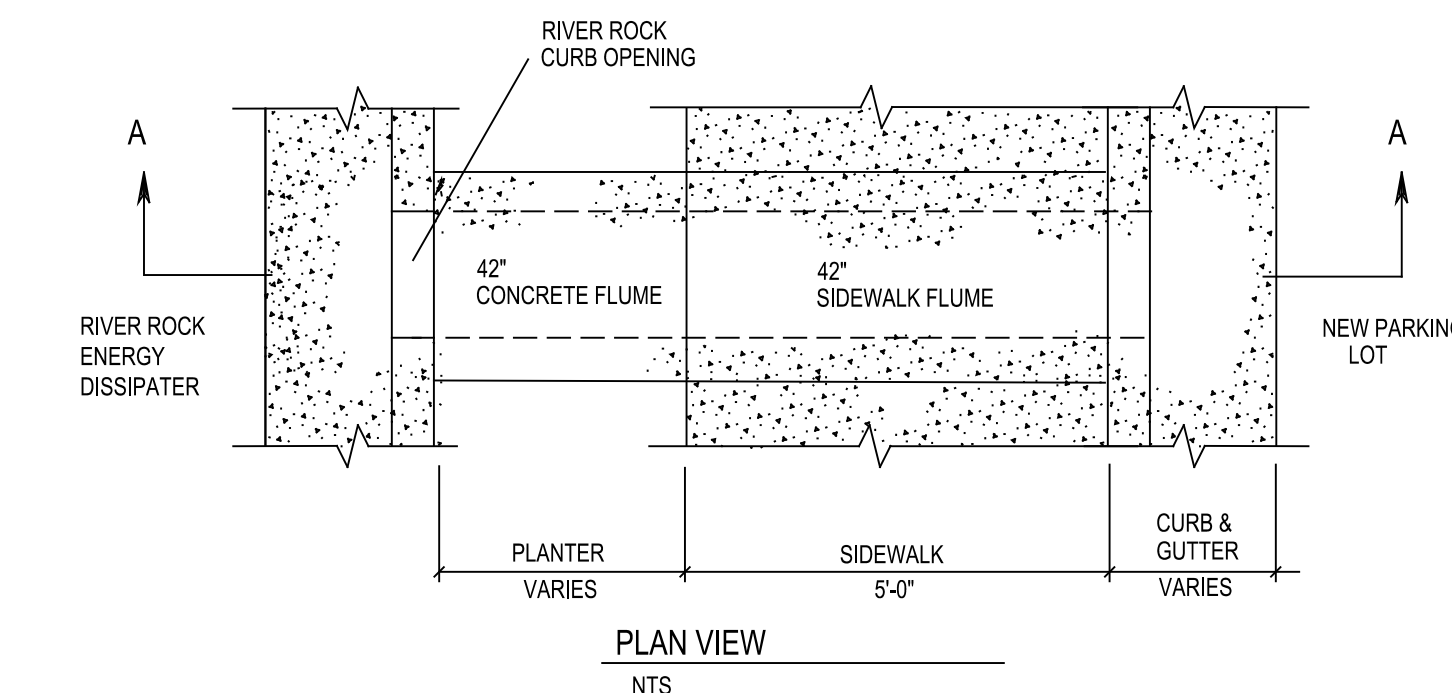
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The seal appearing on this document was authorized by Mike Glenn, P.E. 35059, on June 4, 2018.

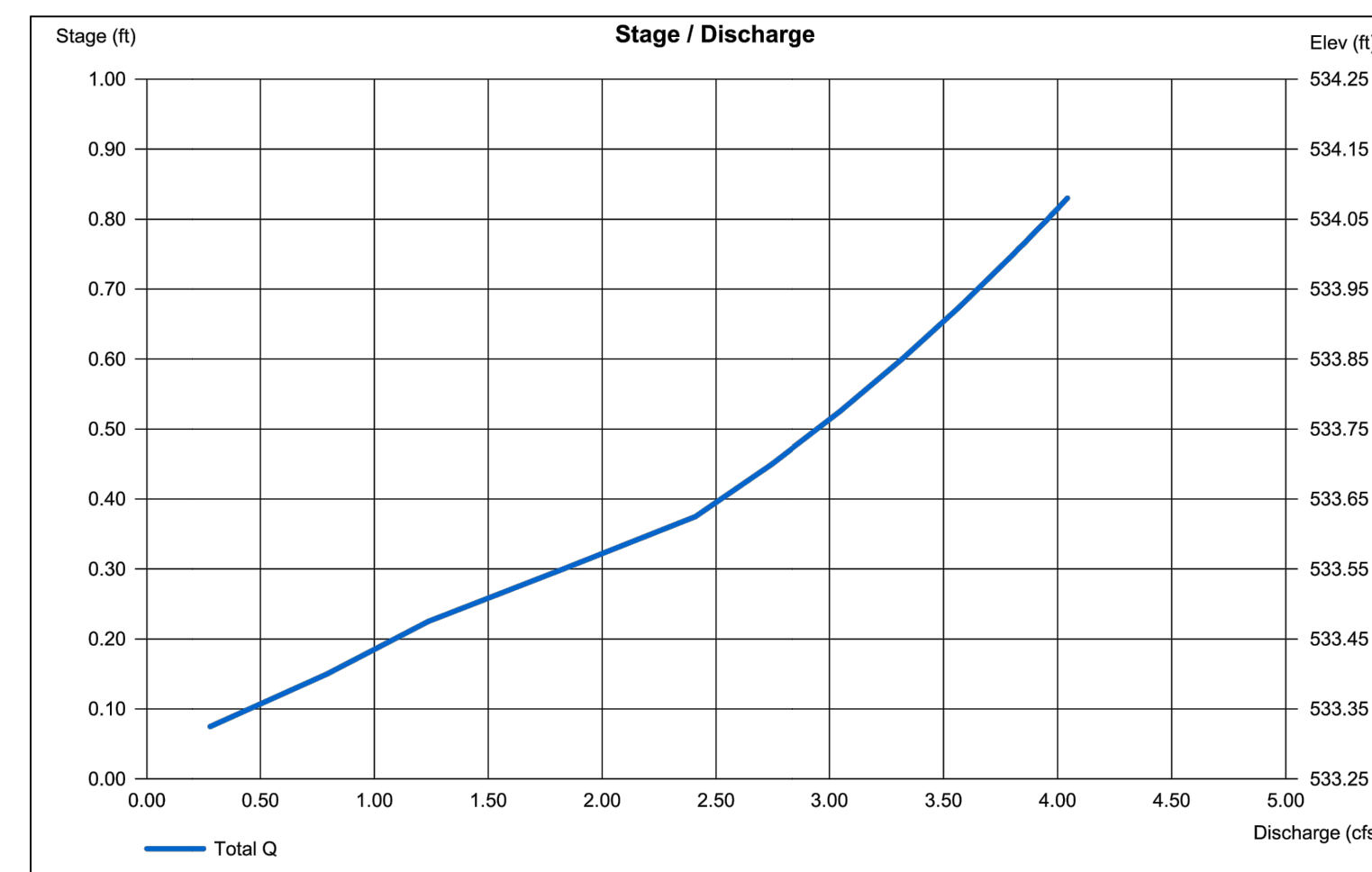


PROPOSED DRAINAGE CALCULATIONS
 Job No. 1759-03-01
 Sheet No. C04.05
 Drawn By: RAH
 Date: 06-04-2018



- NOTES:
1. CONCRETE TO BE 3000 PSI 5.5 SACK MINIMUM
 2. WHERE CURB, GUTTER, AND SIDEWALK IS EXISTING, REMOVE 20\"/>

SIDEWALK FLUME / DETENTION WIER
 SCALE AS SHOWN



WEIR FLOW TO DEPTH CALCULATIONS

STORM (YR)	FLOW (CFS)	HEIGHT ABOVE CREST (FT)
2	1.71	0.28
5	2.03	0.33
10	2.32	0.36
25	2.61	0.42
50	2.8	0.47
100	3.05	0.52

Table 3.2: Runoff Coefficient for Types of Land Use

TYPE OF AREA OR LAND USE	ADOPTED RUNOFF COEFFICIENT
Parks or Open Areas	0.35
Single Family Residential or Duplex	0.50
School	0.70
Apartments	0.75
Townhouse	0.80
Churches	0.80
Industrial	0.90
Commercial Business	0.90
Mercantile District	0.90
Retail	0.90
Parking Lot	0.90
Major and Minor Arterials - R.O.V.	0.90

OUTLET DEVICE = 42" x 3" SLOT IN CURB - BOTTOM ELEV. 533.25

Q allowable OUT OF POND	Q actual OUT OF OUT FALL STRUCTURE	W.S.
Q2 = 1.97 cfs	1.71 cfs	533.53 W.S.
Q5 = 2.27 cfs	2.03 cfs	533.58 W.S.
Q10 = 2.64 cfs	2.32 cfs	533.61 W.S.
Q25 = 3.09 cfs	2.61 cfs	533.67 W.S.
Q50 = 3.35 cfs	2.80 cfs	533.72 W.S.
Q100 = 3.65 cfs	3.05 cfs	533.77 W.S.

GLENN ENGINEERING
 TEXAS REGISTRATION NUMBER: F-303
 PHONE 972-717-3151 105 DECKER COURT, SUITE 910 IRVING, TEXAS 75062
 FAX 972-717-2176

PRESENT CONDITIONS
 $Q = C \cdot I \cdot A$
 $C = 0.87$
 $T_c = 10 \text{ MINUTES}$
 $I100 = 9.8 \text{ in/hr}$
 $Q100 = (0.87)(9.8)(0.45 \text{ ACRES}) + (.35)(9.8)(.03) - 0.29(\text{BYPASS}) = 3.65 \text{ CFS MAXIMUM RELEASE RATE}$

PROPOSED CONDITIONS WITHOUT BASIN "A"
 $Q = C \cdot I \cdot A$
 $C = 1.0 \text{ USED (0.90 PARKING LOT)}$
 $T_c = 10 \text{ MINUTES}$
 $I100 = 9.8 \text{ in/hr}$
 $Q100 = (1.0)(9.8)(0.45 \text{ ACRES}) = 4.41 \text{ CFS}$

PROPOSED CONDITIONS WITH BASIN "A"
 STORM DURATIONS ONSITE DEVELOPED

STORM DURATION	INFLOW	OUTFLOW
10 MINUTES	$I = 9.8 \text{ Q} = (1.0)(9.8)(0.45 \text{ ACRES}) = 4.41$	$(10 \text{ min})(4.41 \text{ cfs})(60 \text{ sec/min}) = 2646 \text{ cf}$
15 MINUTES	$I = 9.0 \text{ Q} = (1.0)(9.0)(0.45 \text{ ACRES}) = 4.05$	$(15 \text{ min})(4.05 \text{ cfs})(60 \text{ sec/min}) = 2738 \text{ cf}$
20 MINUTES	$I = 8.3 \text{ Q} = (1.0)(8.3)(0.45 \text{ ACRES}) = 3.74$	$(20 \text{ min})(3.74 \text{ cfs})(60 \text{ sec/min}) = 3285 \text{ cf}$
30 MINUTES	$I = 6.9 \text{ Q} = (1.0)(6.9)(0.45 \text{ ACRES}) = 3.10$	$(30 \text{ min})(3.10 \text{ cfs})(60 \text{ sec/min}) = 2646 \text{ cf}$
40 MINUTES	$I = 5.8 \text{ Q} = (1.0)(5.8)(0.45 \text{ ACRES}) = 2.61$	$(40 \text{ min})(2.61 \text{ cfs})(60 \text{ sec/min}) = 2190 \text{ cf}$
50 MINUTES	$I = 5.0 \text{ Q} = (1.0)(5.0)(0.45 \text{ ACRES}) = 2.25$	$(50 \text{ min})(2.25 \text{ cfs})(60 \text{ sec/min}) = 1800 \text{ cf}$
60 MINUTES	$I = 4.5 \text{ Q} = (1.0)(4.5)(0.45 \text{ ACRES}) = 2.03$	$(60 \text{ min})(2.03 \text{ cfs})(60 \text{ sec/min}) = 7665 \text{ cf}$
70 MINUTES	$I = 4.0 \text{ Q} = (1.0)(4.0)(0.45 \text{ ACRES}) = 1.80$	$(70 \text{ min})(1.80 \text{ cfs})(60 \text{ sec/min}) = 8760 \text{ cf}$
80 MINUTES	$I = 3.7 \text{ Q} = (1.0)(3.7)(0.45 \text{ ACRES}) = 1.67$	$(80 \text{ min})(1.67 \text{ cfs})(60 \text{ sec/min}) = 9855 \text{ cf}$
90 MINUTES	$I = 3.5 \text{ Q} = (1.0)(3.5)(0.45 \text{ ACRES}) = 1.58$	$(90 \text{ min})(1.58 \text{ cfs})(60 \text{ sec/min}) = 10950 \text{ cf}$
100 MINUTES	$I = 3.4 \text{ Q} = (1.0)(3.4)(0.45 \text{ ACRES}) = 1.53$	$(100 \text{ min})(1.53 \text{ cfs})(60 \text{ sec/min}) = 12045 \text{ cf}$
110 MINUTES	$I = 3.2 \text{ Q} = (1.0)(3.2)(0.45 \text{ ACRES}) = 1.44$	$(110 \text{ min})(1.44 \text{ cfs})(60 \text{ sec/min}) = 13140 \text{ cf}$

MAXIMUM STORM VOLUMES

STORM DURATION	INFLOW	OUTFLOW
10 MINUTES	$(10 \text{ min})(4.41 \text{ cfs})(60 \text{ sec/min}) = 2646 \text{ cf}$	$(0.50)(20 \text{ min})(3.65 \text{ cfs})(60 \text{ sec/min}) = 456 \text{ cf}$
15 MINUTES	$(15 \text{ min})(4.05 \text{ cfs})(60 \text{ sec/min}) = 3645 \text{ cf}$	$(0.50)(25 \text{ min})(3.65 \text{ cfs})(60 \text{ sec/min}) = 908 \text{ cf}$
20 MINUTES	$(20 \text{ min})(3.74 \text{ cfs})(60 \text{ sec/min}) = 4482 \text{ cf}$	$(0.50)(30 \text{ min})(3.65 \text{ cfs})(60 \text{ sec/min}) = 1203 \text{ cf}$
30 MINUTES	$(30 \text{ min})(3.10 \text{ cfs})(60 \text{ sec/min}) = 5589 \text{ cf}$	$(0.50)(40 \text{ min})(3.65 \text{ cfs})(60 \text{ sec/min}) = 1200 \text{ cf}$
40 MINUTES	$(40 \text{ min})(2.61 \text{ cfs})(60 \text{ sec/min}) = 6264 \text{ cf}$	$(0.50)(50 \text{ min})(3.65 \text{ cfs})(60 \text{ sec/min}) = 789 \text{ cf}$
50 MINUTES	$(50 \text{ min})(2.25 \text{ cfs})(60 \text{ sec/min}) = 6750 \text{ cf}$	$(0.50)(60 \text{ min})(3.65 \text{ cfs})(60 \text{ sec/min}) = 180 \text{ cf}$
60 MINUTES	$(60 \text{ min})(2.03 \text{ cfs})(60 \text{ sec/min}) = 7290 \text{ cf}$	$(0.50)(70 \text{ min})(3.65 \text{ cfs})(60 \text{ sec/min}) = -357 \text{ cf}$
70 MINUTES	$(70 \text{ min})(1.80 \text{ cfs})(60 \text{ sec/min}) = 7560 \text{ cf}$	$(0.50)(80 \text{ min})(3.65 \text{ cfs})(60 \text{ sec/min}) = -1200 \text{ cf}$
80 MINUTES	$(80 \text{ min})(1.67 \text{ cfs})(60 \text{ sec/min}) = 7992 \text{ cf}$	$(0.50)(90 \text{ min})(3.65 \text{ cfs})(60 \text{ sec/min}) = -1839 \text{ cf}$
90 MINUTES	$(90 \text{ min})(1.58 \text{ cfs})(60 \text{ sec/min}) = 8505 \text{ cf}$	$(0.50)(100 \text{ min})(3.65 \text{ cfs})(60 \text{ sec/min}) = -2418 \text{ cf}$
100 MINUTES	$(100 \text{ min})(1.53 \text{ cfs})(60 \text{ sec/min}) = 9180 \text{ cf}$	$(0.50)(110 \text{ min})(3.65 \text{ cfs})(60 \text{ sec/min}) = -2865 \text{ cf}$
110 MINUTES	$(110 \text{ min})(1.44 \text{ cfs})(60 \text{ sec/min}) = 9504 \text{ cf}$	$(0.50)(120 \text{ min})(3.65 \text{ cfs})(60 \text{ sec/min}) = -3636 \text{ cf}$

PROPOSED CONDITIONS WITH BASIN "A"
 MAXIMUM VOLUME REQUIRED IS 1203 CF AT THE 20 MIN. STORM DURATION
 MAXIMUM VOLUME PROVIDED IS 1259 CF AT THE 20 MIN. STORM DURATION
 TOP OF POND = 534.08 (TOP OF CURB)
 100 YEAR WATER SURFACE = 533.77 WS

RECORD DRAWING
 THIS IS TO CERTIFY THAT CHANGES AND CORRECTIONS HAVE BEEN MADE TO CONFORM TO THE CONTRACTOR'S RECORD OF THIS PROJECT.

 DATE: 08/09/2018
 Glenn Engineering Corporation

EXECUTIVE SUMMARY DETENTION BASIN
 100 YEAR

QMAX TO PROPOSED BASIN (CFS)	QMAX OUT OF BASIN (ROUTED) (CFS)	ALLOWABLE OUT OF BASIN (CFS)	MAX WATER SURFACE ELEVATION	MAX. STORAGE C.F. REQUIRED	MAX. STORAGE C.F. PROVIDED
4.41	3.05	3.75	533.78	672	1,259

EXECUTIVE SUMMARY DETENTION BASIN
 50 YEAR

QMAX TO PROPOSED BASIN (CFS)	QMAX OUT OF BASIN (ROUTED) (CFS)	ALLOWABLE OUT OF BASIN (CFS)	MAX WATER SURFACE ELEVATION	MAX. STORAGE C.F. REQUIRED	MAX. STORAGE C.F. PROVIDED
4.05	2.80	3.44	533.72	589	1,259

EXECUTIVE SUMMARY DETENTION BASIN
 25 YEAR

QMAX TO PROPOSED BASIN (CFS)	QMAX OUT OF BASIN (ROUTED) (CFS)	ALLOWABLE OUT OF BASIN (CFS)	MAX WATER SURFACE ELEVATION	MAX. STORAGE C.F. REQUIRED	MAX. STORAGE C.F. PROVIDED
3.73	2.61	3.17	533.67	535	1,259

EXECUTIVE SUMMARY DETENTION BASIN
 10 YEAR

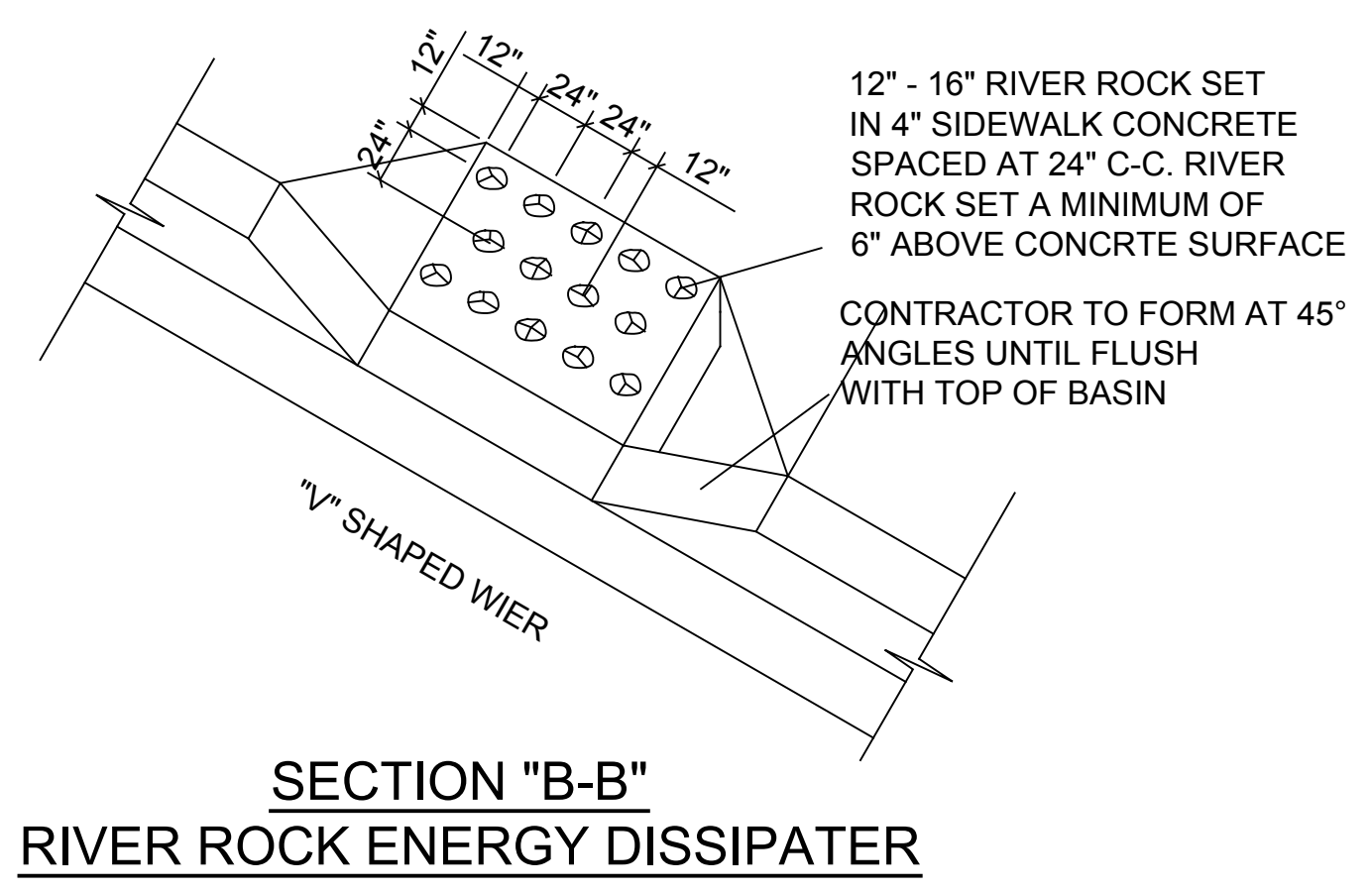
QMAX TO PROPOSED BASIN (CFS)	QMAX OUT OF BASIN (ROUTED) (CFS)	ALLOWABLE OUT OF BASIN (CFS)	MAX WATER SURFACE ELEVATION	MAX. STORAGE C.F. REQUIRED	MAX. STORAGE C.F. PROVIDED
3.2	2.32	2.71	533.61	463	1,259

EXECUTIVE SUMMARY DETENTION BASIN
 5 YEAR

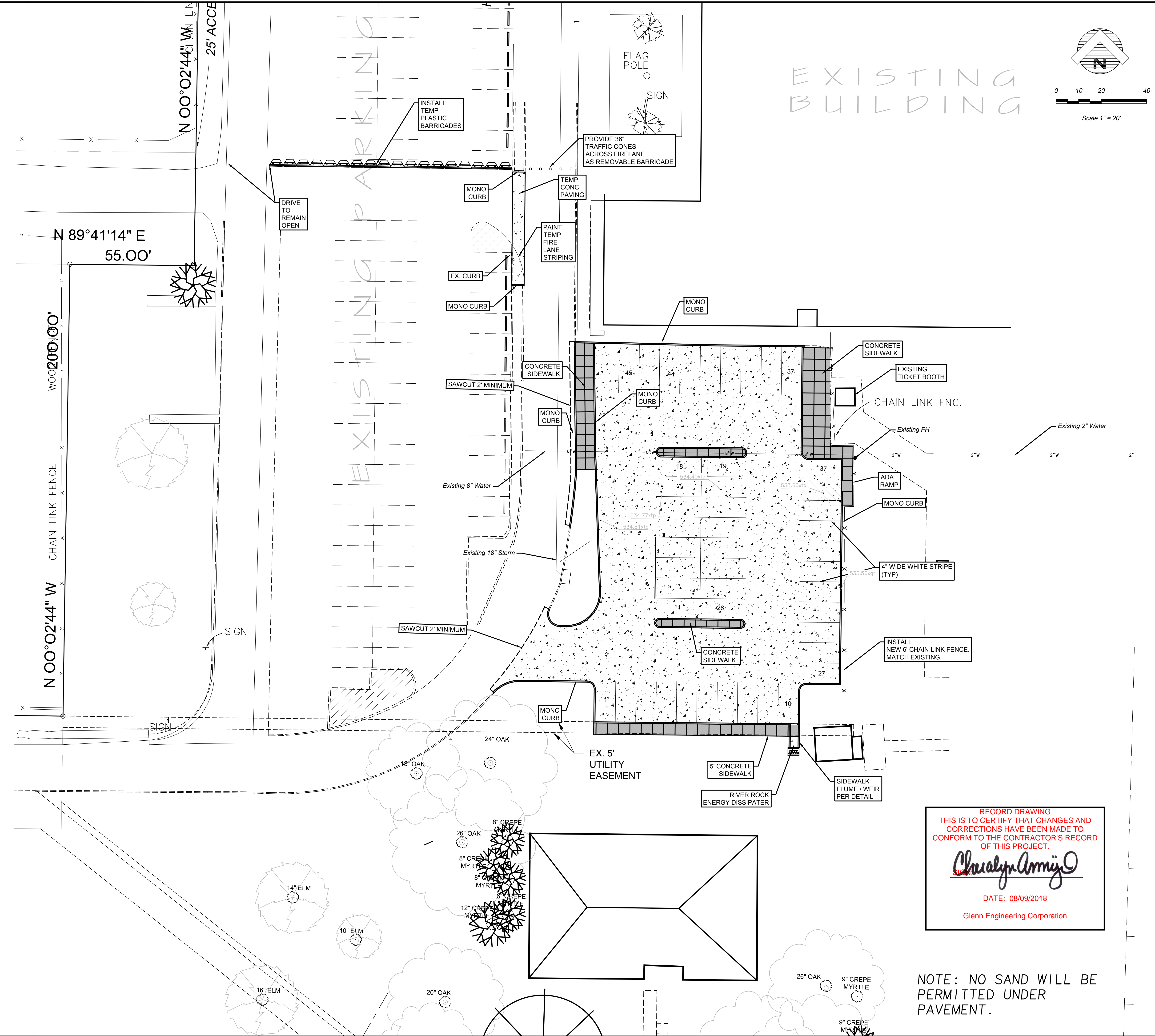
QMAX TO PROPOSED BASIN (CFS)	QMAX OUT OF BASIN (ROUTED) (CFS)	ALLOWABLE OUT OF BASIN (CFS)	MAX WATER SURFACE ELEVATION	MAX. STORAGE C.F. REQUIRED	MAX. STORAGE C.F. PROVIDED
2.75	2.03	2.33	533.58	415	1,259

EXECUTIVE SUMMARY DETENTION BASIN
 2 YEAR

QMAX TO PROPOSED BASIN (CFS)	QMAX OUT OF BASIN (ROUTED) (CFS)	ALLOWABLE OUT OF BASIN (CFS)	MAX WATER SURFACE ELEVATION	MAX. STORAGE C.F. REQUIRED	MAX. STORAGE C.F. PROVIDED
2.39	1.71	2.02	533.53	363	1,259



SECTION "B-B"
 RIVER ROCK ENERGY DISSIPATER



PAVING NOTES:

THE INITIAL SOIL TEST AND REPORT BY FUGRO SOUTH, INC. PROJECT NO 0703-1081 AND ANY AND ALL SUBSEQUENT REPORTS PREPARED FOR THIS PROJECT BY FUGRO SOUTH OR BY OTHER FIRM, AGENCY OR ENTITY, EVEN THOUGH NO SPECIFIC REFERENCE TO ANY SUCH REPORTS ARE CONTAINED IN THE PLANS AND/OR SPECIFICATIONS FOR THIS PROJECT, ARE MADE A PART OF THIS PLAN. A COPY CAN BE OBTAINED THROUGH THE ARCHITECT OR ENGINEER.

I. PAVEMENT SUB GRADE FOR A & B, BELOW

THE CLAY SOILS ENCOUNTERED NEAR THE EXISTING GROUND SURFACE WILL PROBABLY CONSTITUTE THE SUB GRADE FOR MOST OF THE PARKING AND DRIVE AREAS. THEREFORE, IT IS RECOMMENDED THAT THESE SOILS BE IMPROVED PRIOR TO CONSTRUCTION OF THE PAVEMENTS.

IT IS RECOMMENDED THAT THE EXISTING CLAY SOILS IN DRIVE AND PARKING AREAS BE EXCAVATED TO ACHIEVE FINAL SUB GRADE ELEVATION. THE EXPOSED SURFACE OF THE CLAYS SHOULD BE SCARIFIED TO A DEPTH OF AT LEAST 6 INCHES AND MIXED WITH AN ESTIMATED 7 PERCENT OF HYDRATED LIME (BY DRY UNIT WEIGHT) IN CONFORMANCE WITH TEXAS HIGHWAY DEPARTMENT ITEM 280, ASSUMING AN IN-PLACE UNIT WEIGHT OF 100 PCF FOR THE PAVEMENT SUB GRADE SOILS. THIS PERCENTAGE OF LIME EQUATES TO ABOUT 32 LBS OF LIME PER SQ. YARD OF SUB GRADE TREATED. THE ACTUAL AMOUNT OF LIME REQUIRED SHOULD BE DETERMINED BY ADDITIONAL LABORATORY TESTS. IT IS RECOMMENDED THAT THE LIME STABILIZATION PROCEDURES EXTEND AT LEAST 4 FT. BEYOND THE EDGE OF THE PAVEMENT TO MINIMIZE THE EFFECTS OF SEASONAL SHRINKING UPON THE EXTREME EDGES OF PAVEMENT. THE SOIL-LIME MIXTURE SHOULD THEN BE COMPACTED TO AT LEAST 95 PERCENT OF STANDARD PROCTOR MAXIMUM DENSITY (ASTM D 998) WITHIN 3 PERCENTAGE POINTS OF THE OPTIMUM MOISTURE CONTENT. IN ALL AREAS WHERE HYDRATED LIME IS USED TO STABILIZE THE SUB GRADE SOILS, ROUTINE ATTERBERG-LIMIT TESTS SHOULD BE PERFORMED TO ASSURE THAT THE RESULTING PLASTICITY INDEX OF THE SOIL-LIME MIXTURE IS AT/OR BELOW 15. NO SAND IS ALLOWED.

THE CLIENT SHOULD BE AWARE THAT MECHANICAL LIME STABILIZATION OF THE PAVEMENT SUB GRADE SOILS WILL NOT PREVENT DEEP SEATED MOVEMENT OF THE UNDERLYING UNTREATED MATERIALS. FUTURE MAINTENANCE OF PAVEMENTS SHOULD BE EXPECTED OVER THE LIFE OF THE STRUCTURE.

II. PAVING

CONCRETE DRIVEWAY APPROACHES SHALL BE A MINIMUM OF 6 INCHES THICK. CONCRETE DRIVEWAY APPROACHES SHALL HAVE A RISE OF NOT LESS THAN 6 INCHES NOR MORE THAN 9 INCHES FROM THE FLOW LINE OF THE GUTTER TO A POINT 10 FEET BEHIND THE FACE OF THE GUTTER. CONCRETE FOR DRIVEWAYS SHALL BE A MINIMUM OF 3,600 PSI (5 SACK MIX) IN 28 DAYS CONCRETE WITH 4 PERCENT ENTRAINED AIR. THE GRADE BELOW THE DRIVEWAY, INCLUDING 4 FOOT OUTSIDE OF THE OUTER EDGE OF THE DRIVEWAY SHALL BE COMPACTED TO 95% STANDARD PROCTOR DENSITY, AND AS INDICATED IN THE "PAVEMENT SUB GRADE NOTES".

DRIVEWAYS SHALL HAVE CONTRACTION JOINTS NOT MORE THAN 15 FEET APART, BOTH TRANSVERSELY AND LONGITUDINALLY ONE-HALF INCH EXPANSION JOINT SHALL BE PLACED ON THE PROPERTY LINES BETWEEN THE APPROACH AND THE DRIVEWAY. THE JOINTS SHALL BE FILLED WITH PRE-MOLDED GRAY BITUMINOUS EXPANSION JOINT FILLER AND SHALL EXTEND THE ENTIRE DEPTH AND LENGTH OF THE CONCRETE SECTIONS.

FINISHING SHALL BE AS INDICATED IN SECTION III.

NOTE: NO CONCRETE SHALL BE PLACED FOR DRIVEWAYS UNTIL THE SUB GRADE REINFORCEMENT PLACEMENT HAS BEEN INSPECTED AND APPROVED BY THE CITY OR STATE (WHICHEVER IS APPLICABLE).

B. PARKING LOTS

PARKING LOT SUB GRADE SHALL BE AS INDICATED IN SECTION I.

PAVING SHALL BE 5" REINFORCED CONCRETE IN LIGHT TRAFFIC AREAS AND 6" REINFORCED CONCRETE IN HEAVY TRAFFIC AREAS. 3,600 PSI (5 SACK MIX) IN 28 DAYS CONCRETE WITH 4-6% ENTRAINED AIR REINFORCED WITH #4 BARS AT 18" O.C.E.W. SUPPORTED WITH PROPER SUPPORT CHAIRS. EXPANSION JOINTS SHALL BE AT 15' MAXIMUM O.C. AND SAW-CUT CONTRACTION JOINTS AT MAXIMUM 15' O.C. ALL JOINTS TO BE CLEANED AND FILLED WITH HOT POURED RUBBER (GRAY).

FINISHING SHALL BE AS INDICATED IN SECTION III.

C. ON-SITE SIDEWALKS

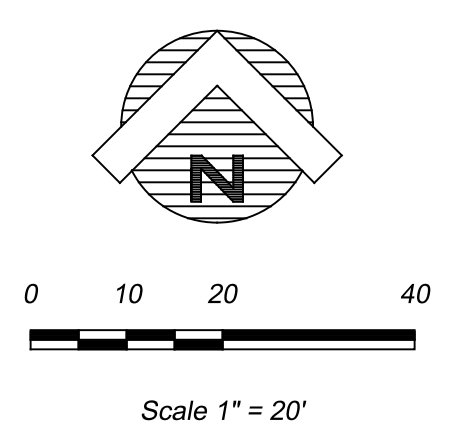
CONCRETE SIDEWALKS SHALL BE A WIDTH AS DESIGNATED ON SITE PLAN AND A MINIMUM OF 4 INCHES THICK. CONSTRUCTED OF 3,600 PSI (5 SACK MIX) IN 28 DAYS CONCRETE WITH 4-6% ENTRAINED AIR AND REINFORCED WITH #3 BARS AT 18" O.C.E.W. TOOLED CONSTRUCTION JOINTS SHALL BE 5'-0" O.C. ONE-HALF INCH EXPANSION JOINT SHALL BE PLACED EVERY 40 FEET AND WHERE NEW WORK IS CONSTRUCTED ADJACENT TO OTHER CONCRETE WORK (WALLS, FOUNDATION, CURB, ETC.), THE JOINTS SHALL BE FILLED WITH 1/2 INCH PRE-MOLDED GRAY BITUMINOUS EXPANSION JOINT FILLER AND SHALL EXTEND THE ENTIRE DEPTH AND WIDTH OF THE CONCRETE SECTION.

FINISH OF SIDEWALKS SHALL BE WITH A BROOM FINISH PER ENGINEER. WALKS SHALL HAVE TOOLED CURB EDGES & TOOLED JOINTS.

III. FINISHING FOR CONCRETE DRIVEWAY, PARKING LOT AND STREET CURBS

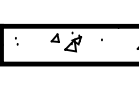

THE EXPOSED SURFACES OF DRIVEWAYS AND PARKING LOT SHALL HAVE A MONOLITHIC FINISH BY FLOATING WITH A WOODEN FLAT UNTIL A SLIGHT EXCESS OF SAND APPEARS ON THE SURFACES. IN NO CASE SHALL THE SURFACE BE LEFT SLICK OR WITH A GLOSSY FINISH. EXPOSED SURFACES OF SIDEWALKS SHALL HAVE A MONOLITHIC FINISH BY TROWLING WITH A STEEL TROWEL AND BRUSHED LIGHTLY WITH AN APPROVED BROOM. THE EDGE OF ALL CONCRETE SHALL BE NEATLY ROUNDED TO THE REQUIRED RADIUS WITH AN EDGING TOOL.

THE EXPOSED SURFACE OF CURBS AND CURBS WITH GUTTER SHALL BE SHAPED WITH A "MULE" AND BRUSHED WITH A WET BRUSH AT RIGHT ANGLE TO THE LINE OF THE CURB TO PRODUCE A UNIFORM TEXTURED SURFACE. THE EDGES SHALL BE NEATLY ROUNDED OFF TO THE REQUIRED RADIUS. USE OF GROUT OVER A ROUGH FINISHED TEXTURE WILL NOT BE ALLOWED.



EXISTING BUILDING

PAVING LEGEND

-  PROPOSED 6" REINFORCED CONCRETE PAVEMENT
3,600 P.S.I. CONCRETE, 6 1/2 SACK HAND FINISH
6 SACK MACHINE FINISH
WITH #4 REBARS ON 18" CENTERS EACH WAY.
-  PROPOSED 4" REINFORCED CONCRETE SIDEWALK
3,600 PS 6 1/2 SACK MACHINE FINISH WITH #3 REBAR ON
18" CENTERS EACH WAY.

RECORD DRAWING
THIS IS TO CERTIFY THAT CHANGES AND
CORRECTIONS HAVE BEEN MADE TO
CONFORM TO THE CONTRACTOR'S RECORD
OF THIS PROJECT.

Chalya Armijo

DATE: 08/09/2018
Glenn Engineering Corporation

NOTE: NO SAND WILL BE PERMITTED UNDER PAVEMENT.

SEE LANDSCAPE PLAN LS 1.01 FOR SLEEVES UNDER ALL PAVING WALKS, DRIVES AND PARKING. SEE M.E.P. PLANS ES 1.01 FOR ALL SLEEVE LOCATIONS FOR LIGHTING.

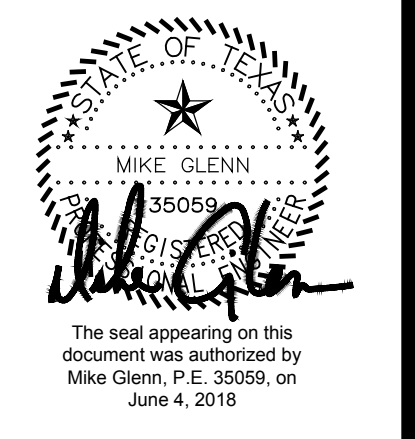
GLENN ENGINEERING
TEXAS REGISTRATION NUMBER: F-303
PHONE 972-717-3151 105 DECKER COURT, SUITE 910 IRVING, TEXAS 75062
FAX 972-717-2176

ADDENDUM #1

Date 04/19/2018
Revision / 1

DOBBS PARKING LOT REVOCATION
FOR
ROCKWALL I.S.D.
ROCKWALL, TEXAS

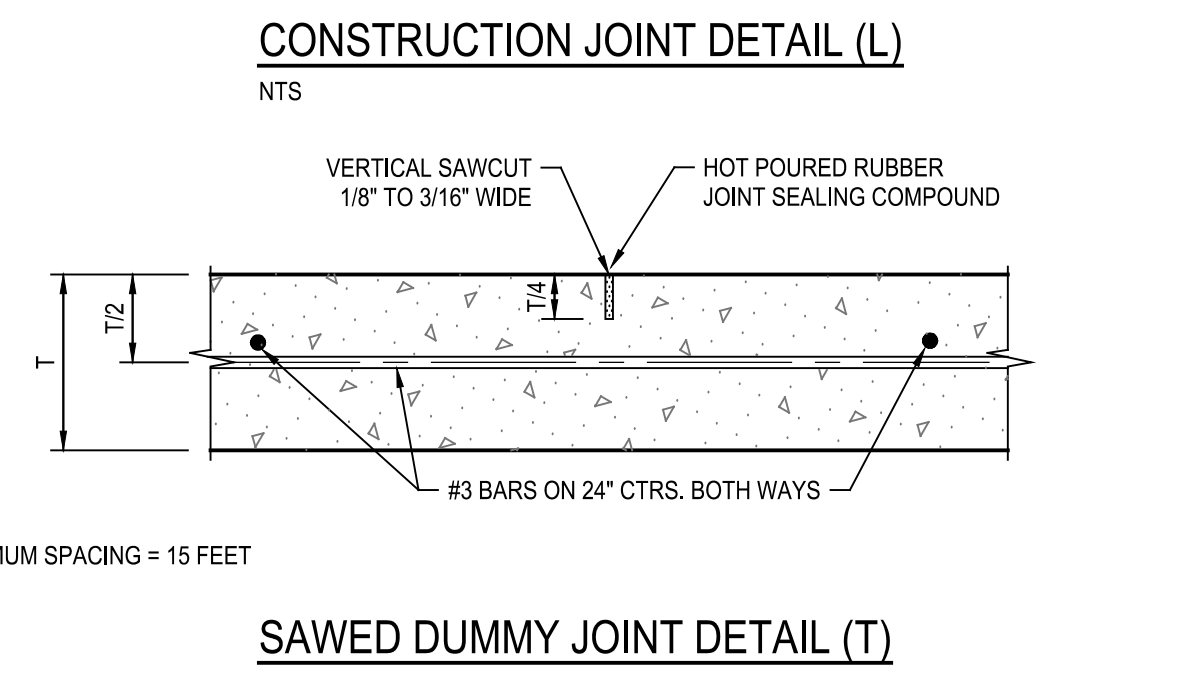
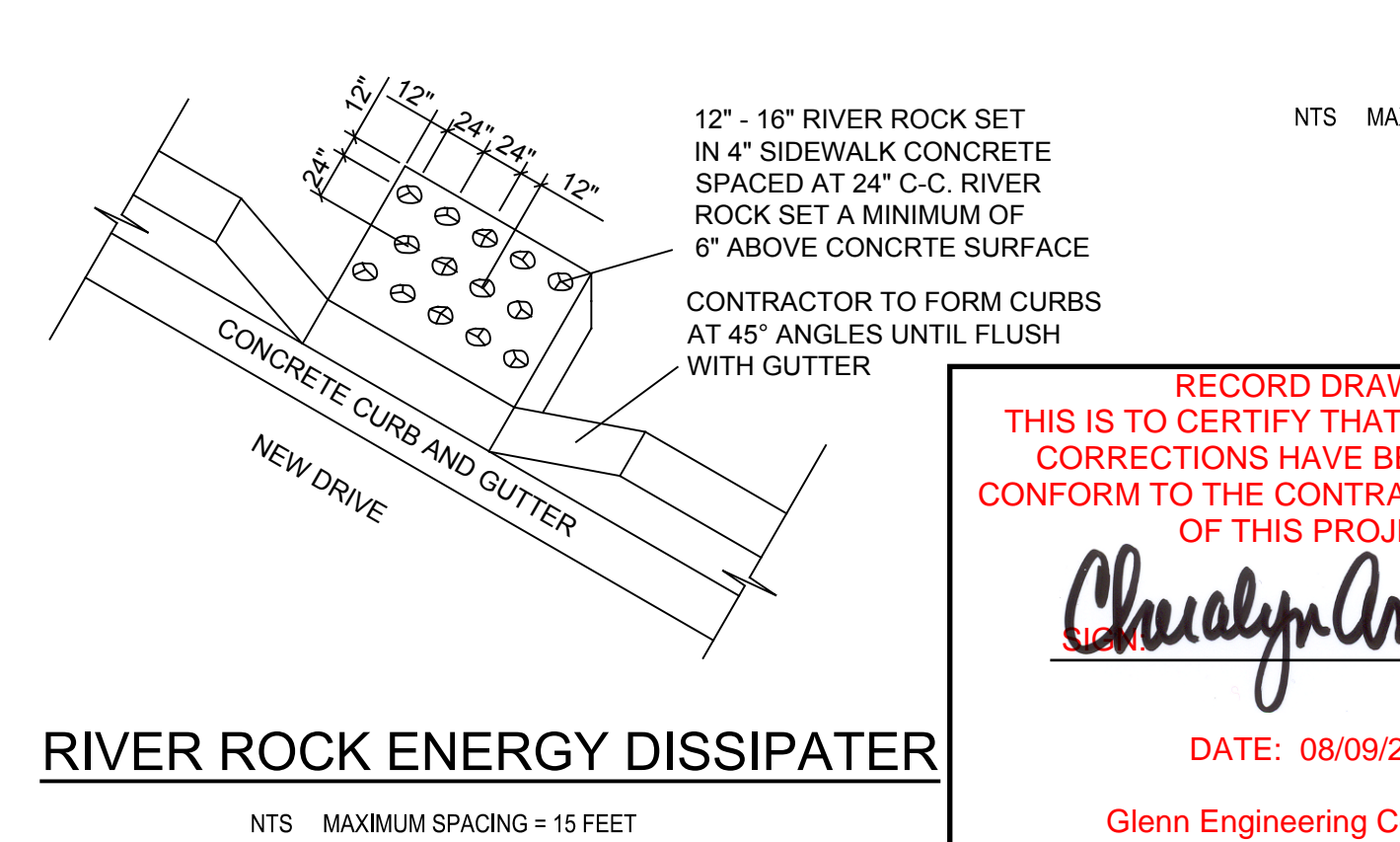
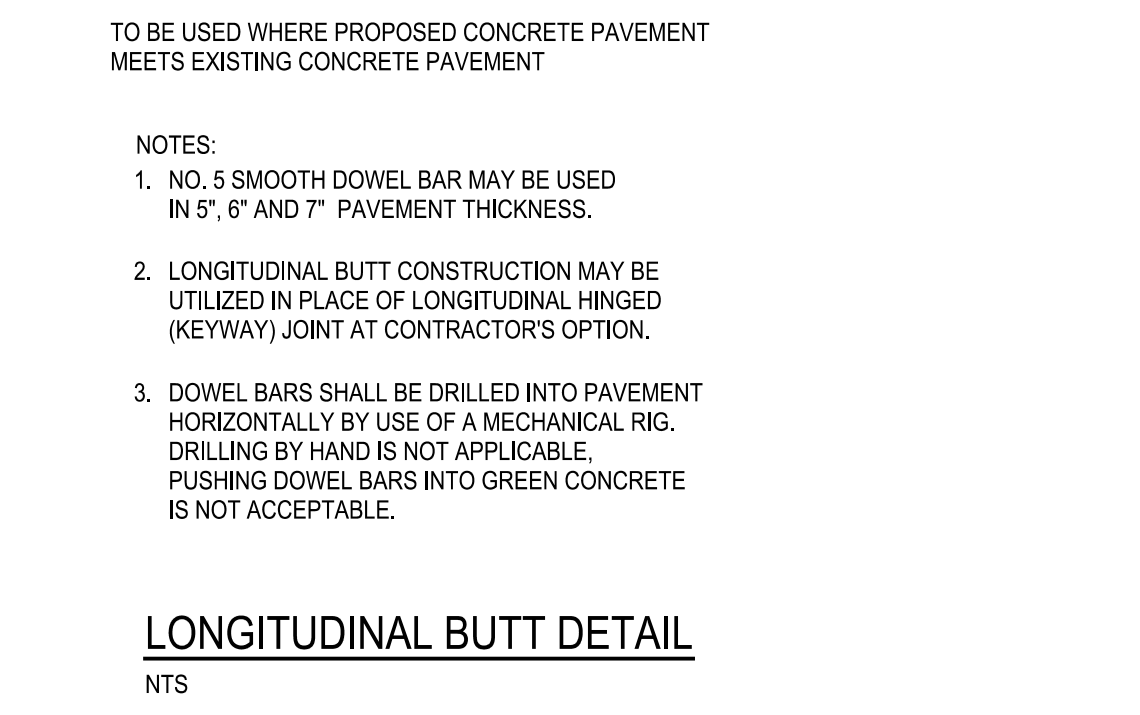
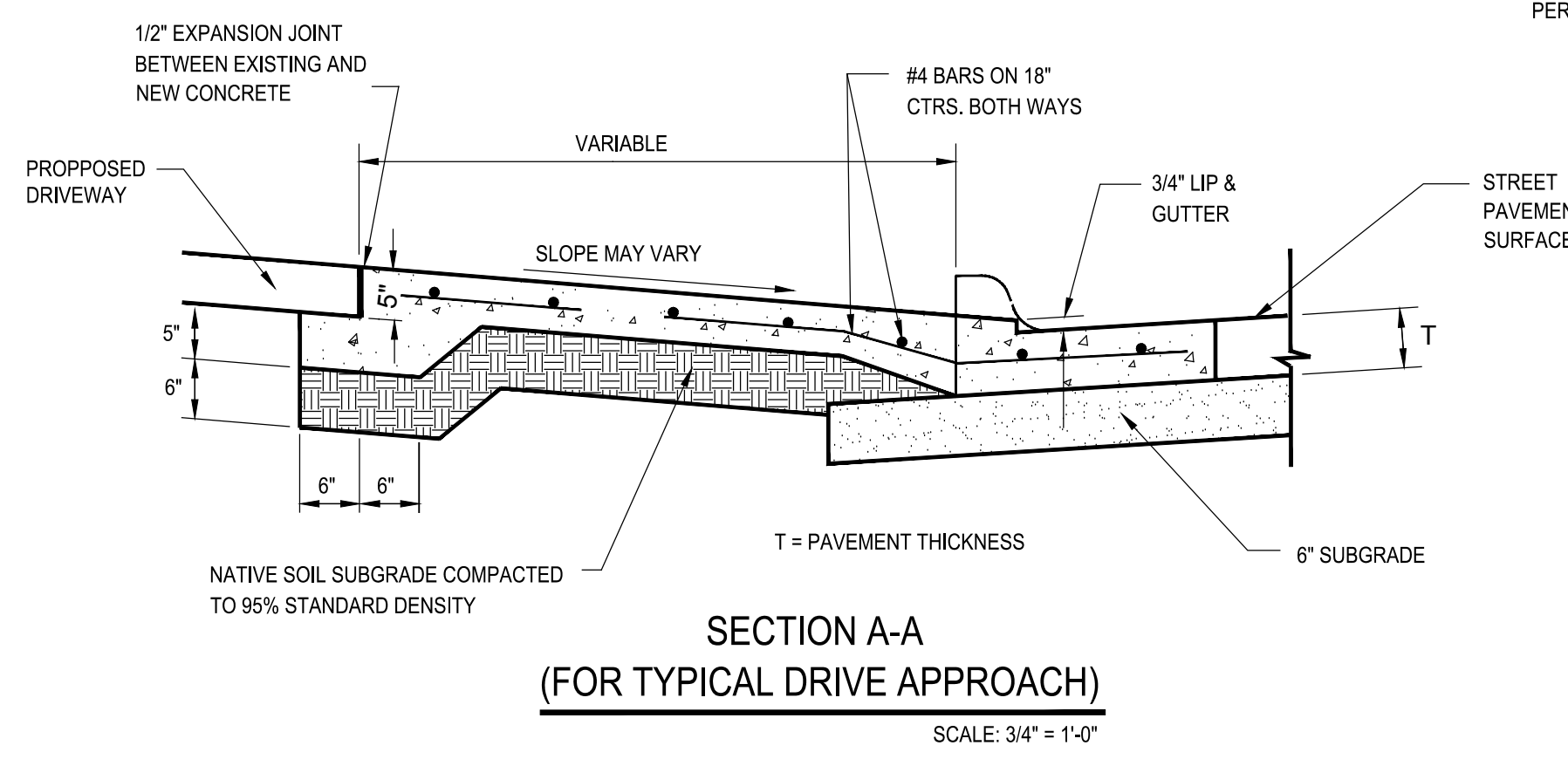
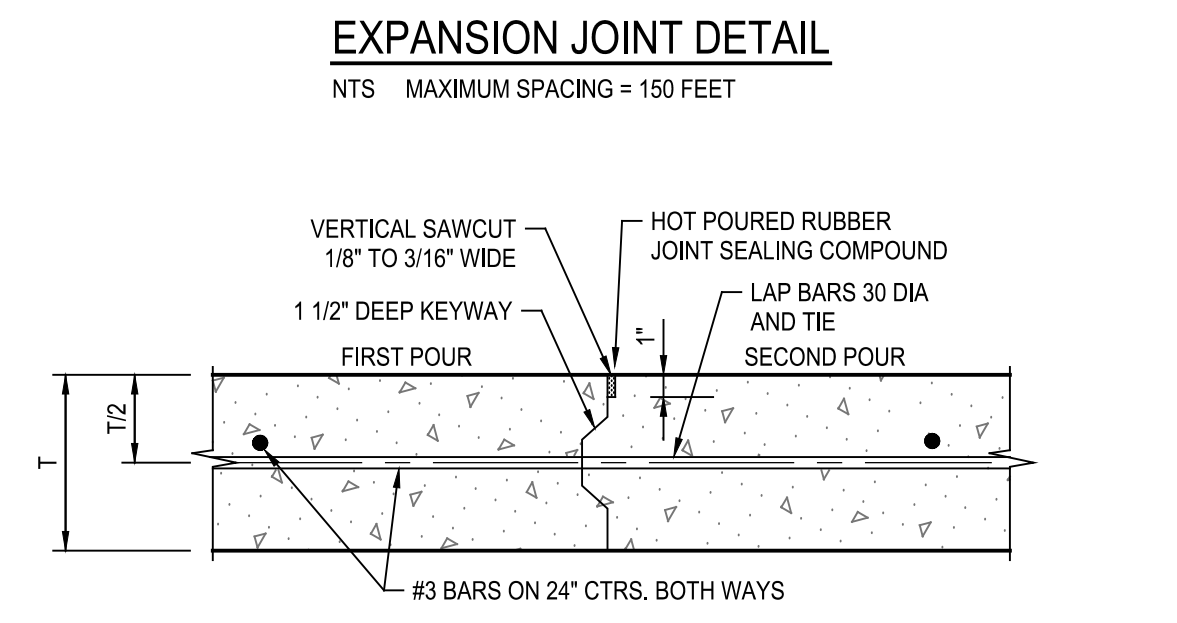
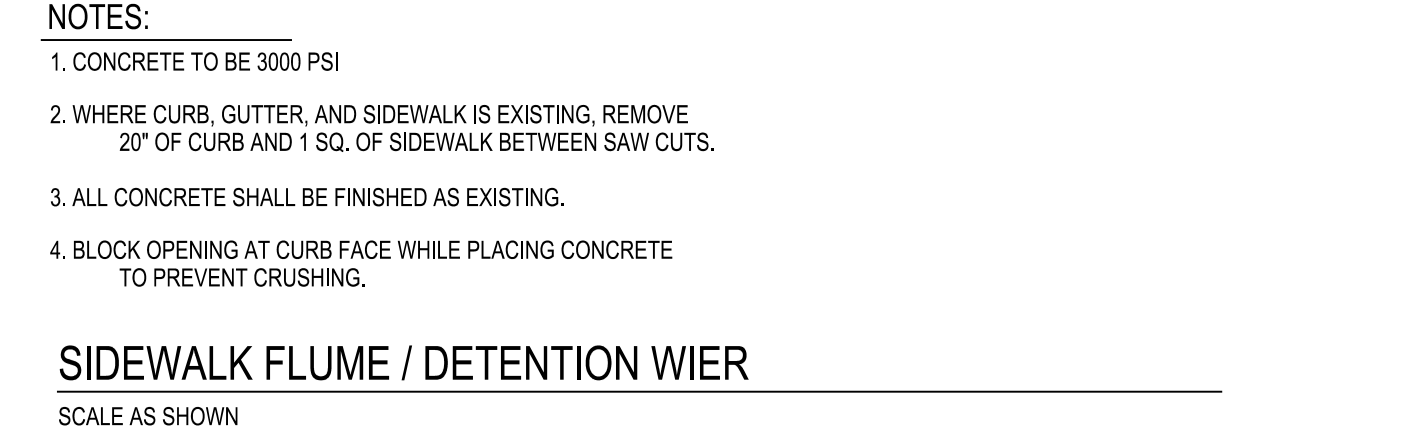
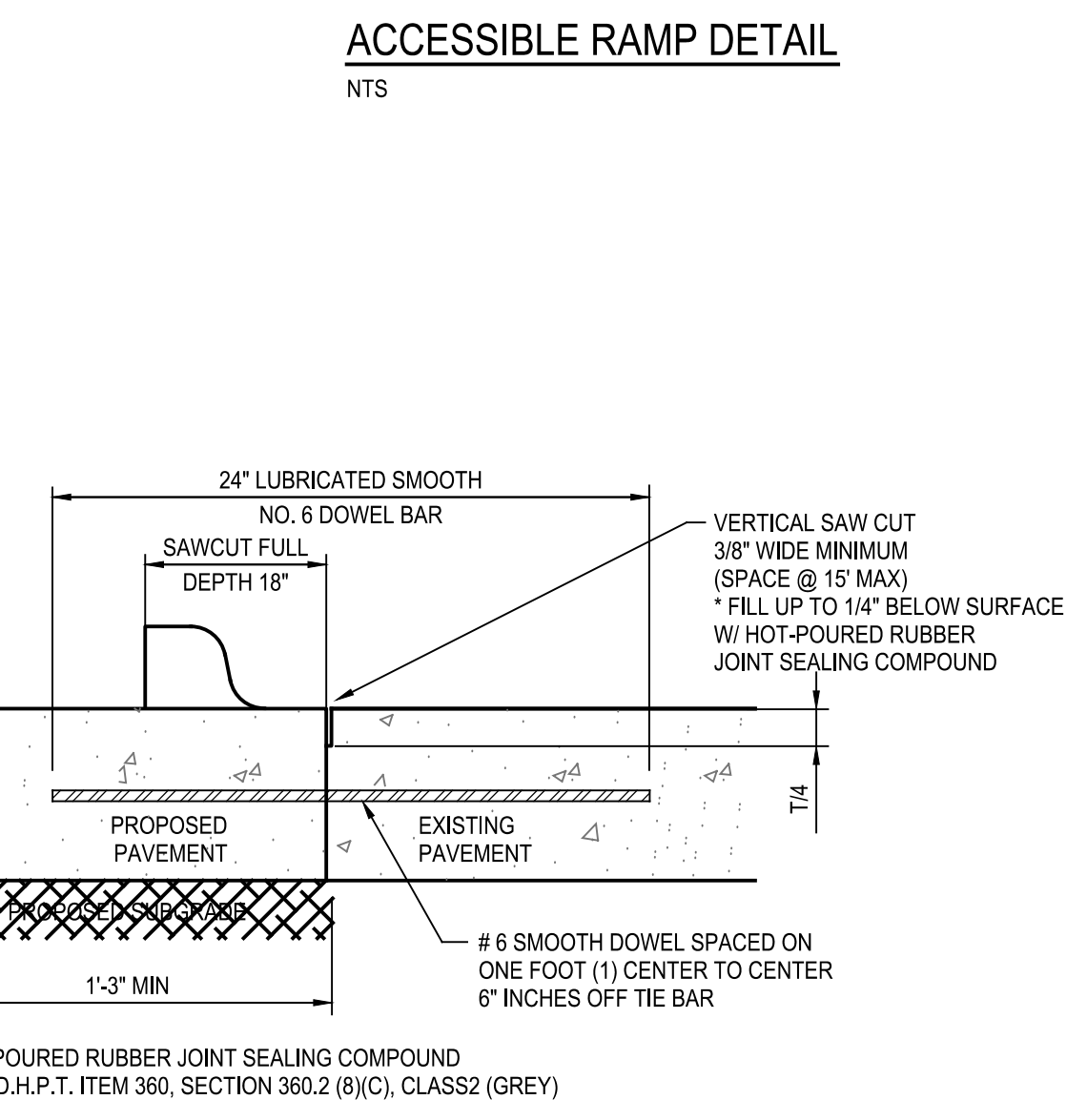
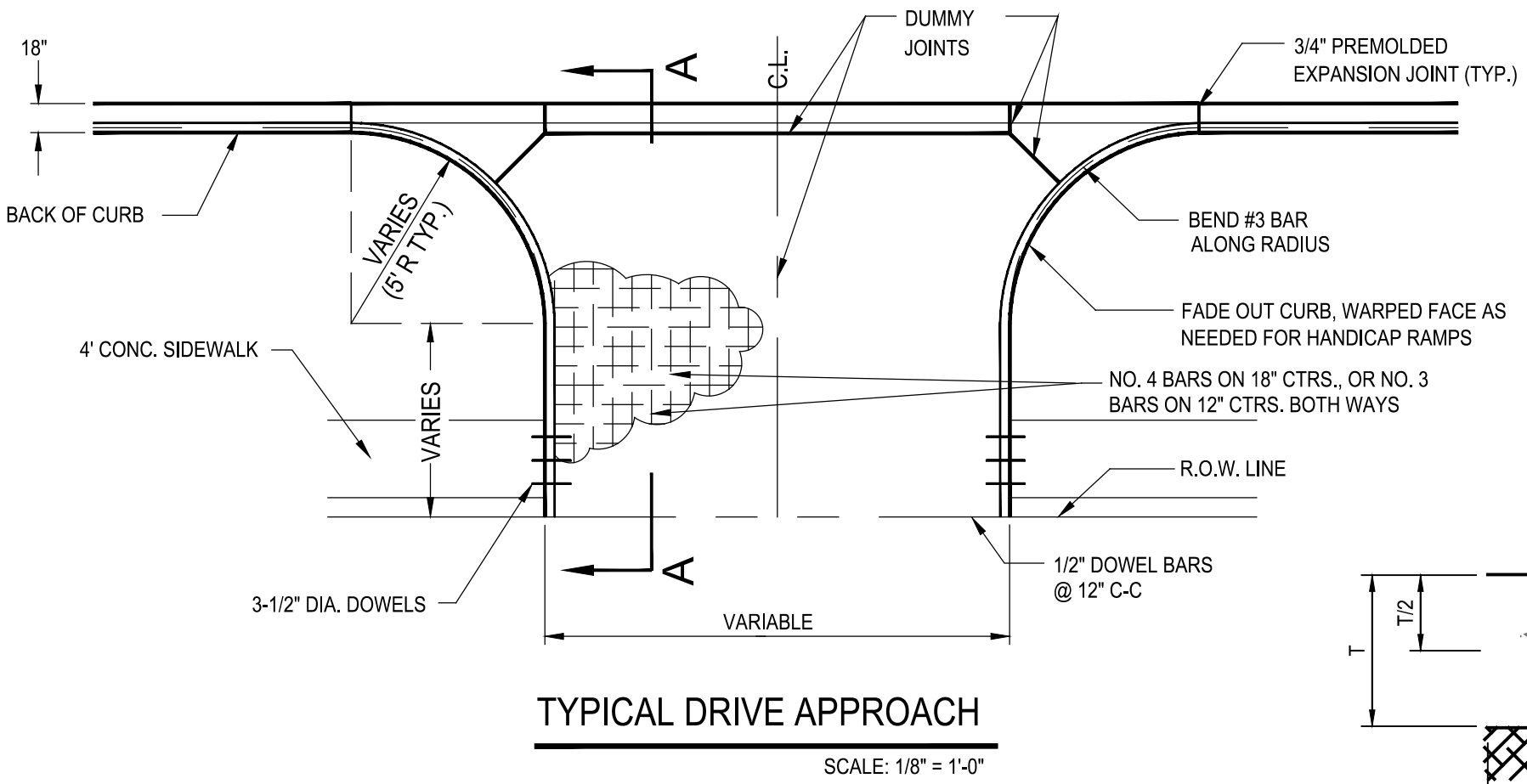
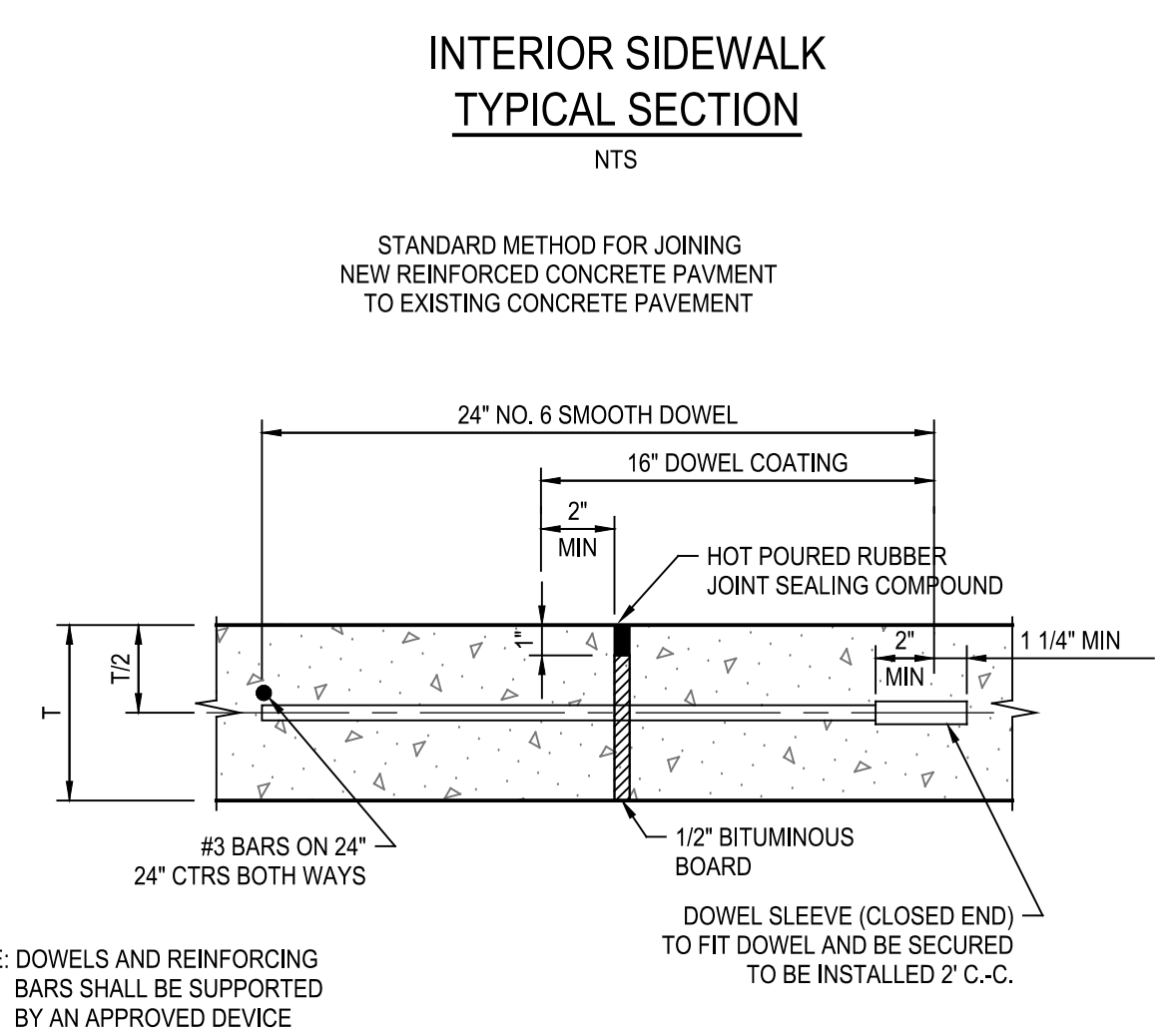
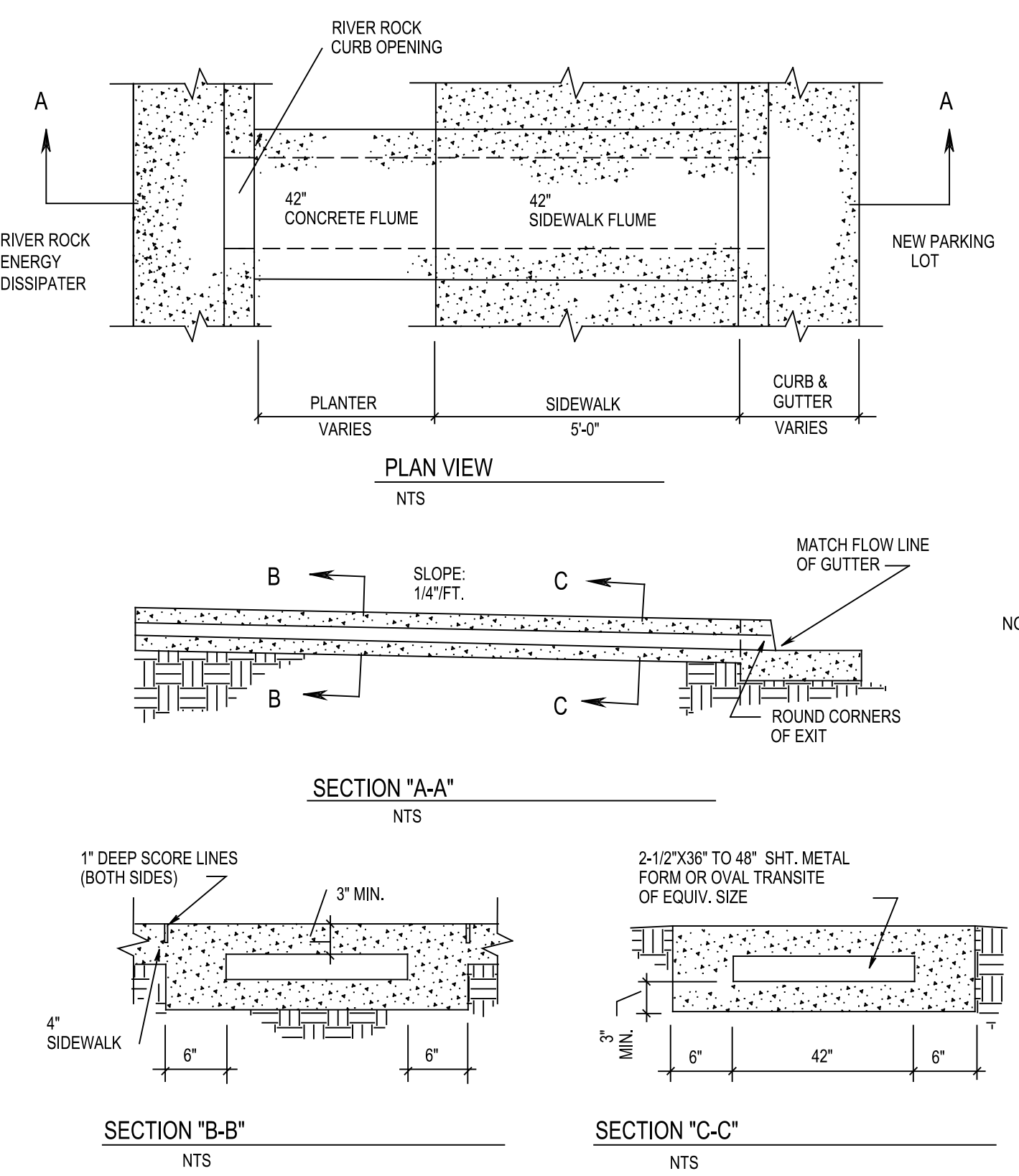
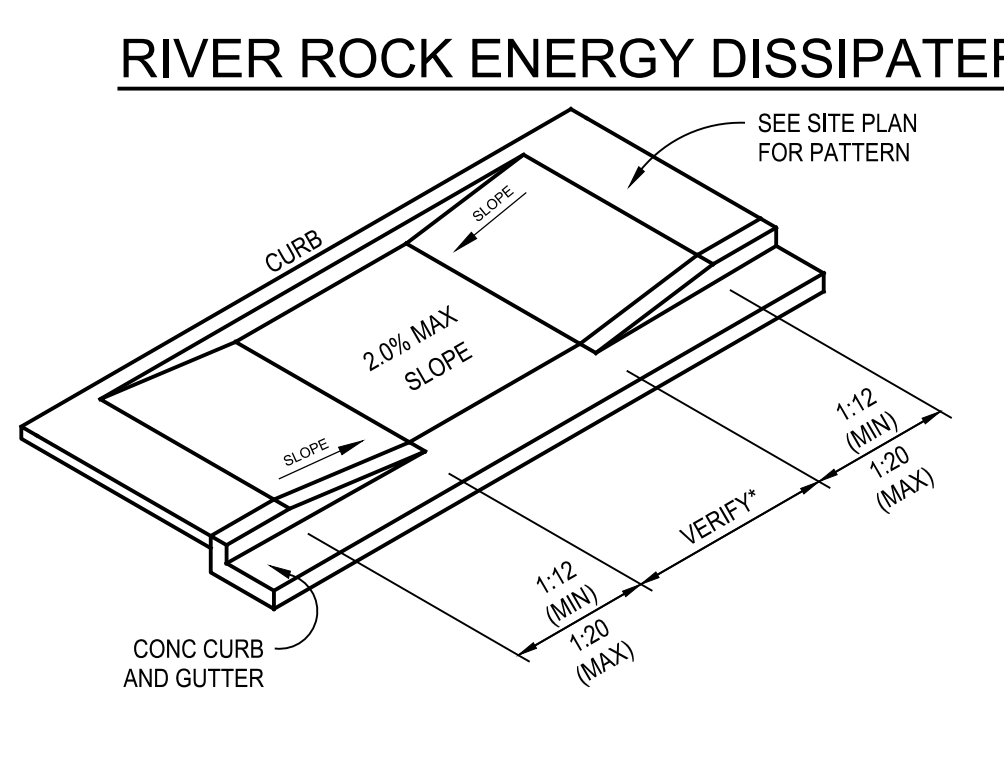
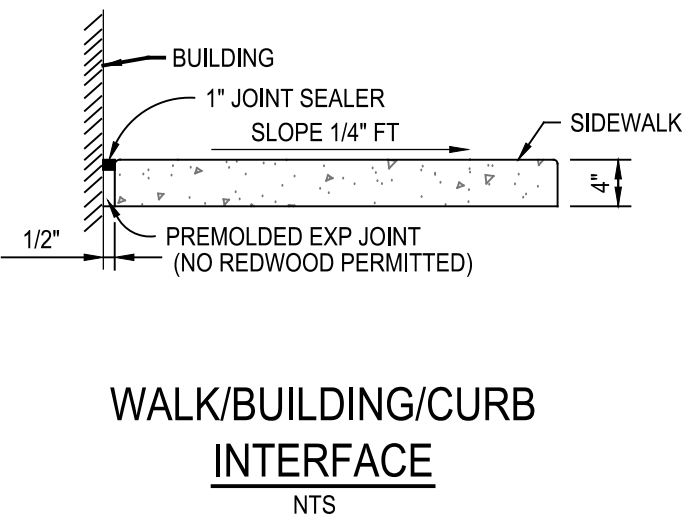
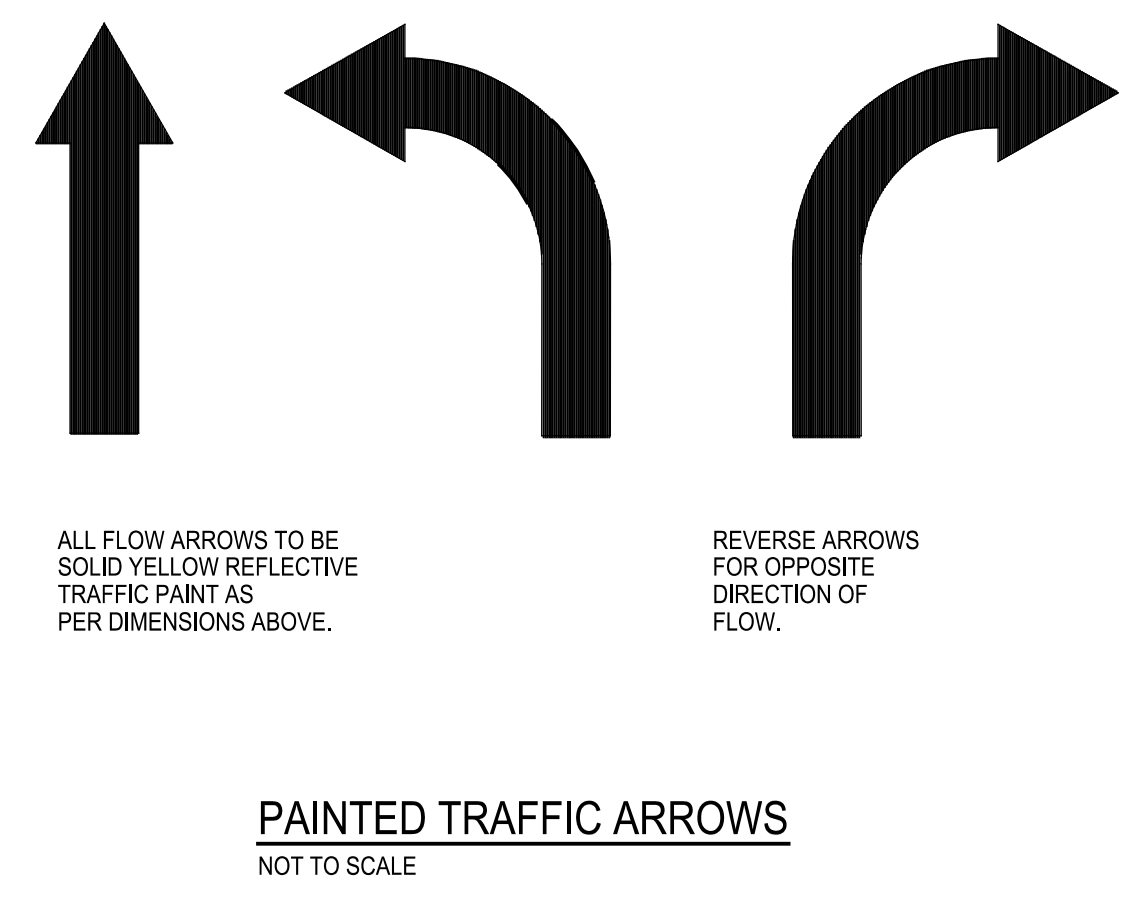
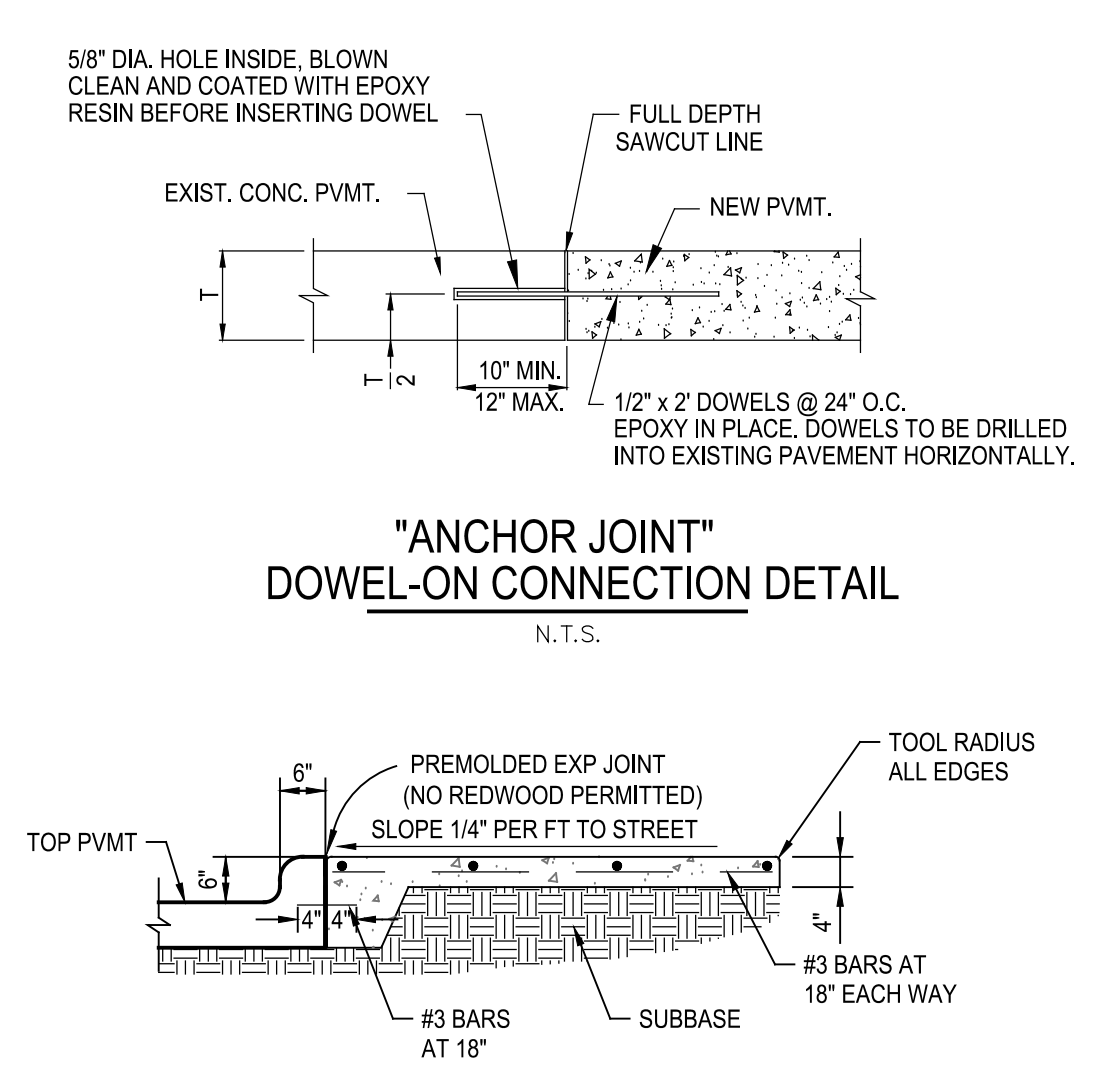
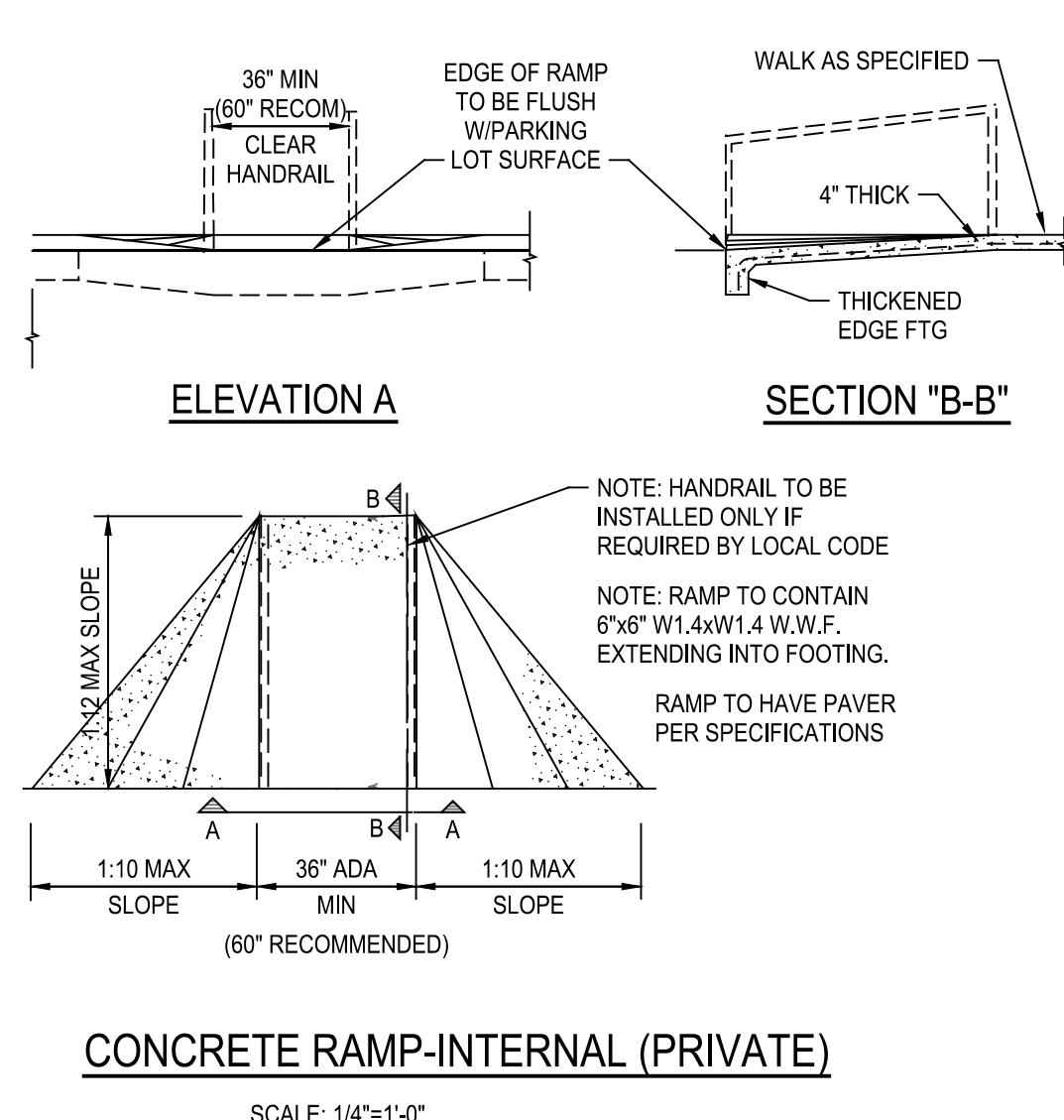
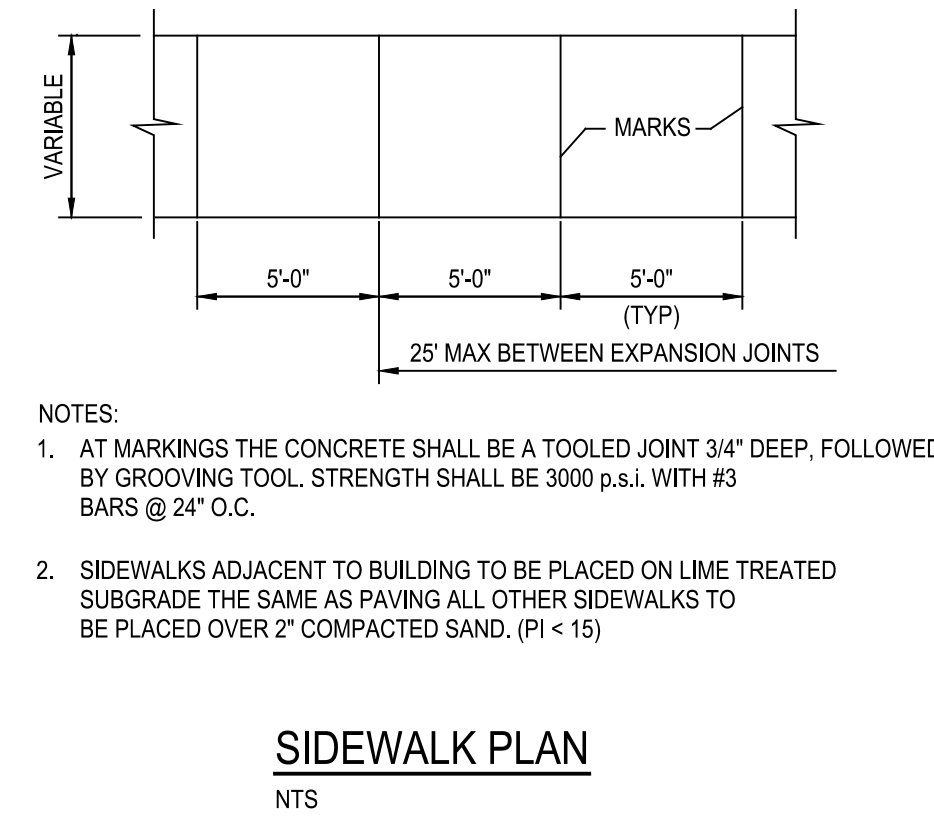
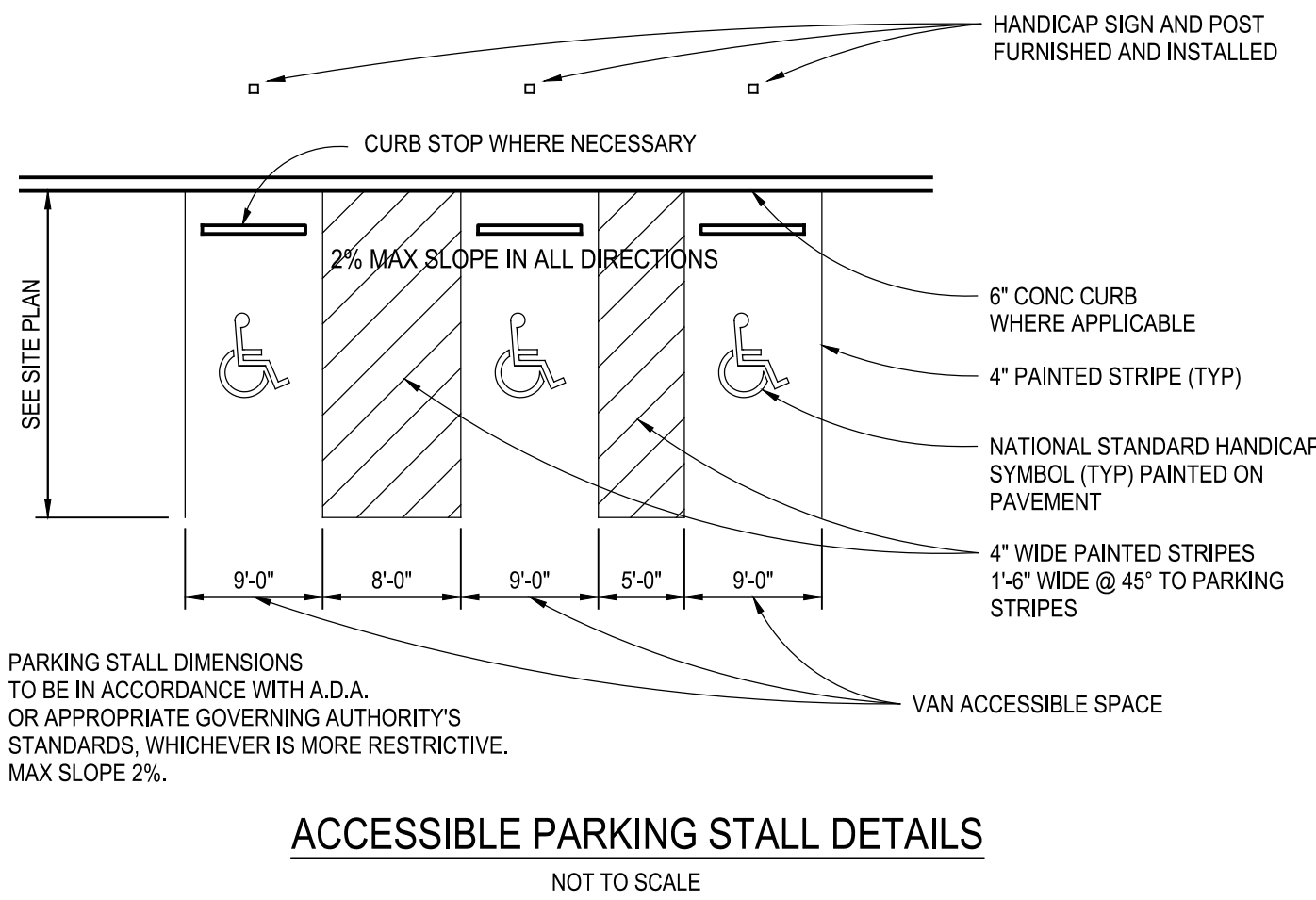
Project:



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NORTH PAVING PLAN

Job No. 1759-03-01
Sheet No. C06.00
Drawn By: RAH
Date: 06-04-2018



NOTE: NO SAND WILL BE PERMITTED UNDER PAVEMENT.

ADDENDUM #1
Date: 04/19/2018
Revision: 1

Project: DOBBS PARKING LOT REVOLUTION FOR ROCKWALL I.S.D. ROCKWALL, TEXAS

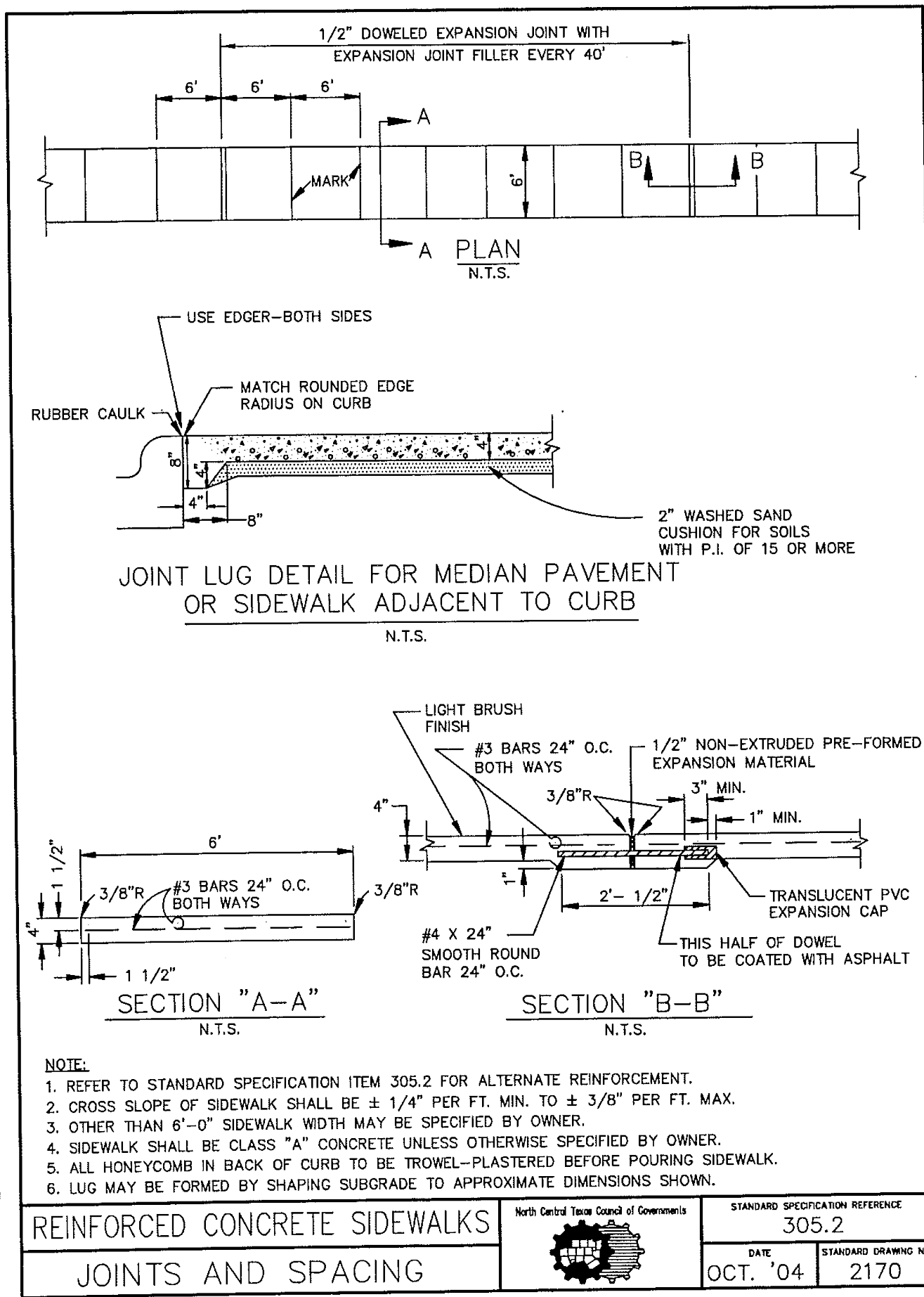
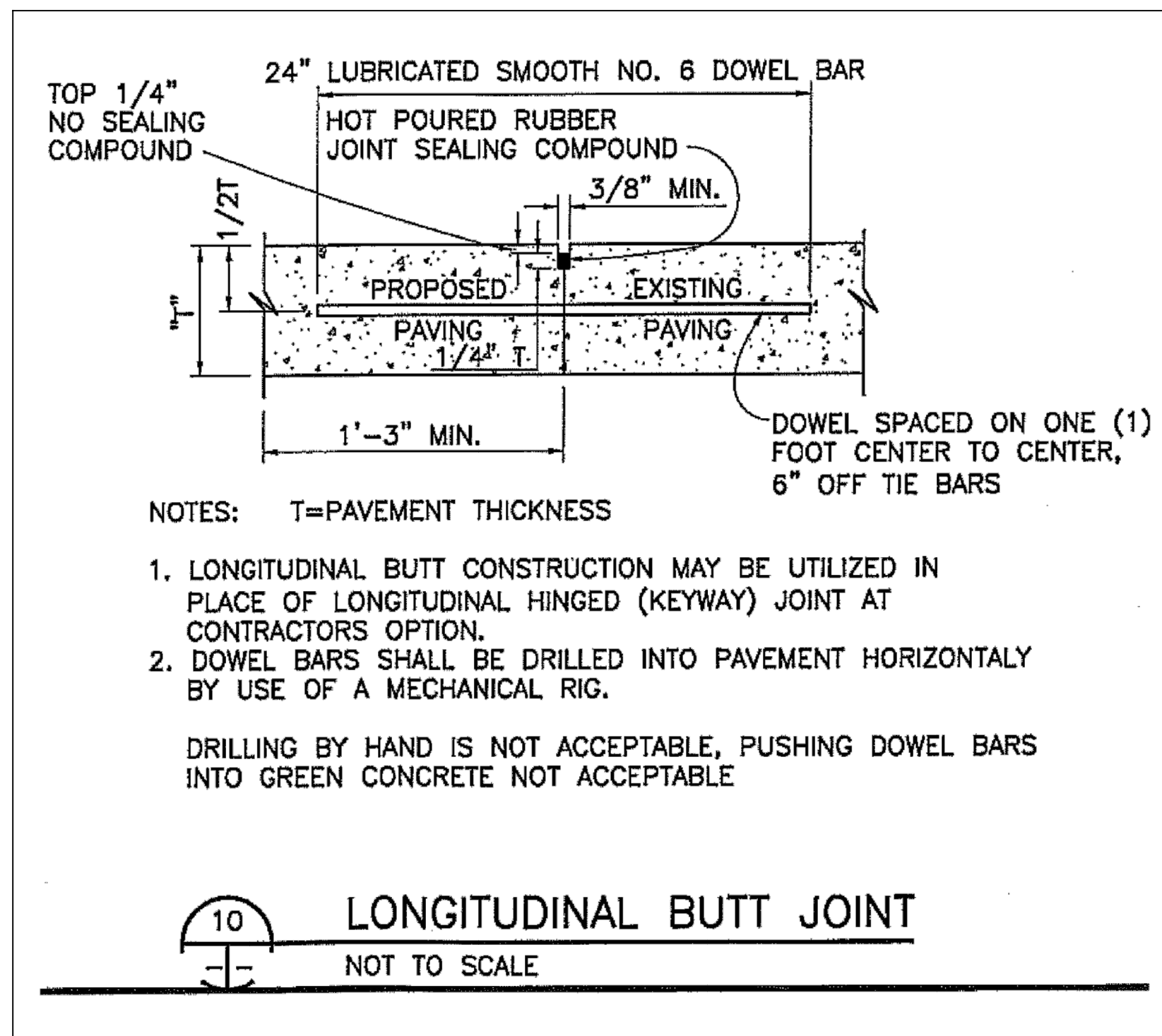


PAVING DETAILS
Job No. 1759-03-01
Sheet No. C06.01
Date: 06-04-2018

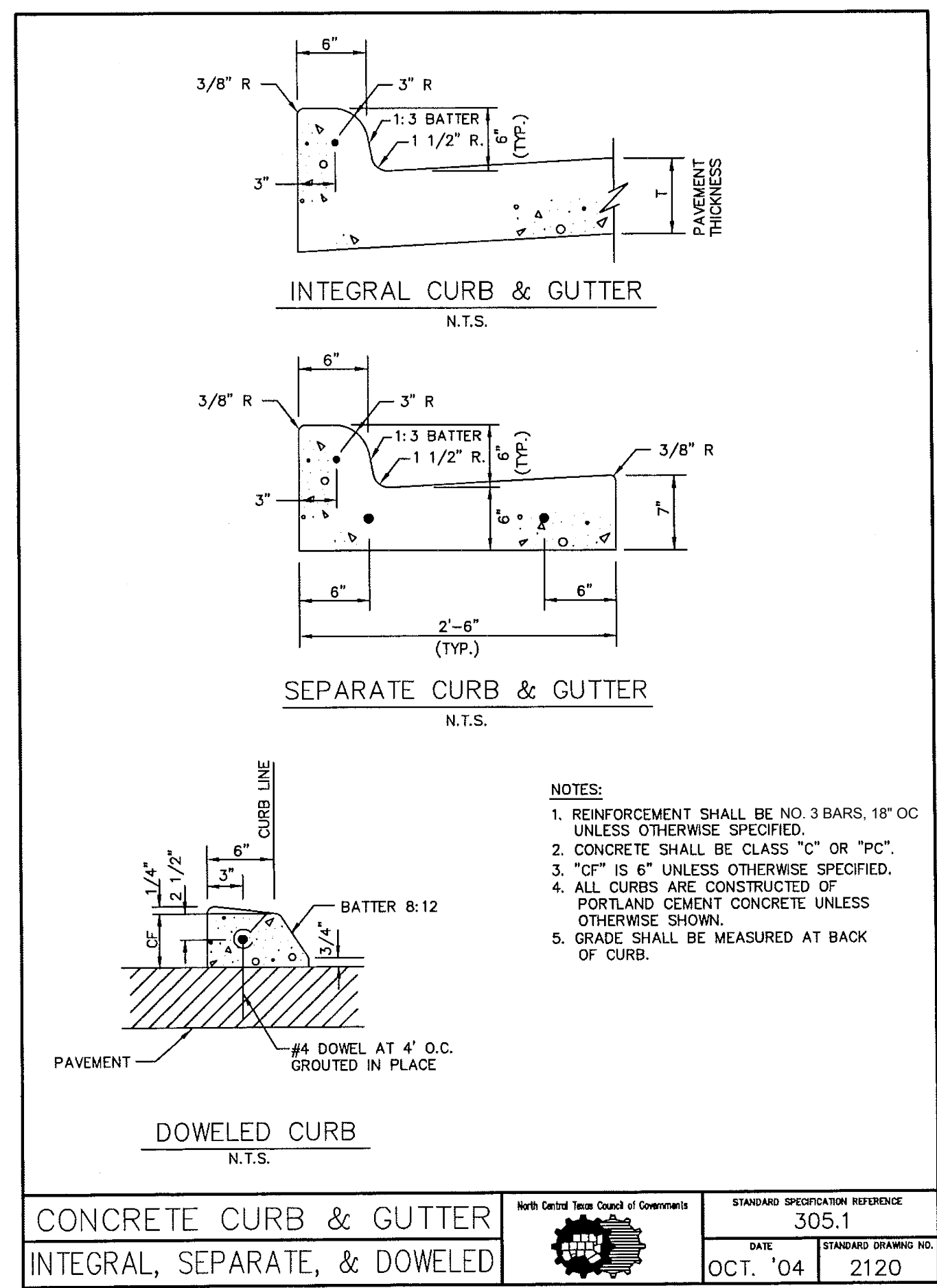
RECORD DRAWING
THIS IS TO CERTIFY THAT CHANGES AND CORRECTIONS HAVE BEEN MADE TO CONFORM TO THE CONTRACTOR'S RECORD OF THIS PROJECT.
Cheryl Army
DATE: 08/09/2018
Glenn Engineering Corporation

PAVING DETAILS
SCALE: AS SHOWN
GLENN ENGINEERING
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PHONE 972-717-3151
105 DECKER COURT, SUITE 910 IRVING, TEXAS 75062

Plotted: Jun 4, 2018, 2:46 PM by user: tony.armijo
 \\ROBERT-PC\Public\z\Bob\Projects\ROCKWALL\DOBBS COMBINED\DOBBS PARKING LOT REVOLUTION.dwg



*NOTE: NO SAND UNDER PUBLIC SIDEWALK



RECORD DRAWING
THIS IS TO CERTIFY THAT CHANGES AND CORRECTIONS HAVE BEEN MADE TO CONFORM TO THE CONTRACTOR'S RECORD OF THIS PROJECT.

Charalyn Armijo

DATE: 08/09/2018

Glenn Engineering Corporation

GLENN ENGINEERING
TEXAS REGISTRATION NUMBER: F-303
PHONE 972-717-3151 FAX 972-717-2176
105 DECKER COURT, SUITE 910 IRVING, TEXAS 75062

ADDENDUM #1

Date 04/19/2018

Revision / 1

DOBBS PARKING LOT REVOLUTION FOR ROCKWALL I.S.D. ROCKWALL, TEXAS

STATE OF TEXAS
MIKE GLENN
35059
The seal appearing on this document was authorized by Mike Glenn, P.E. 35059, on June 4, 2018.

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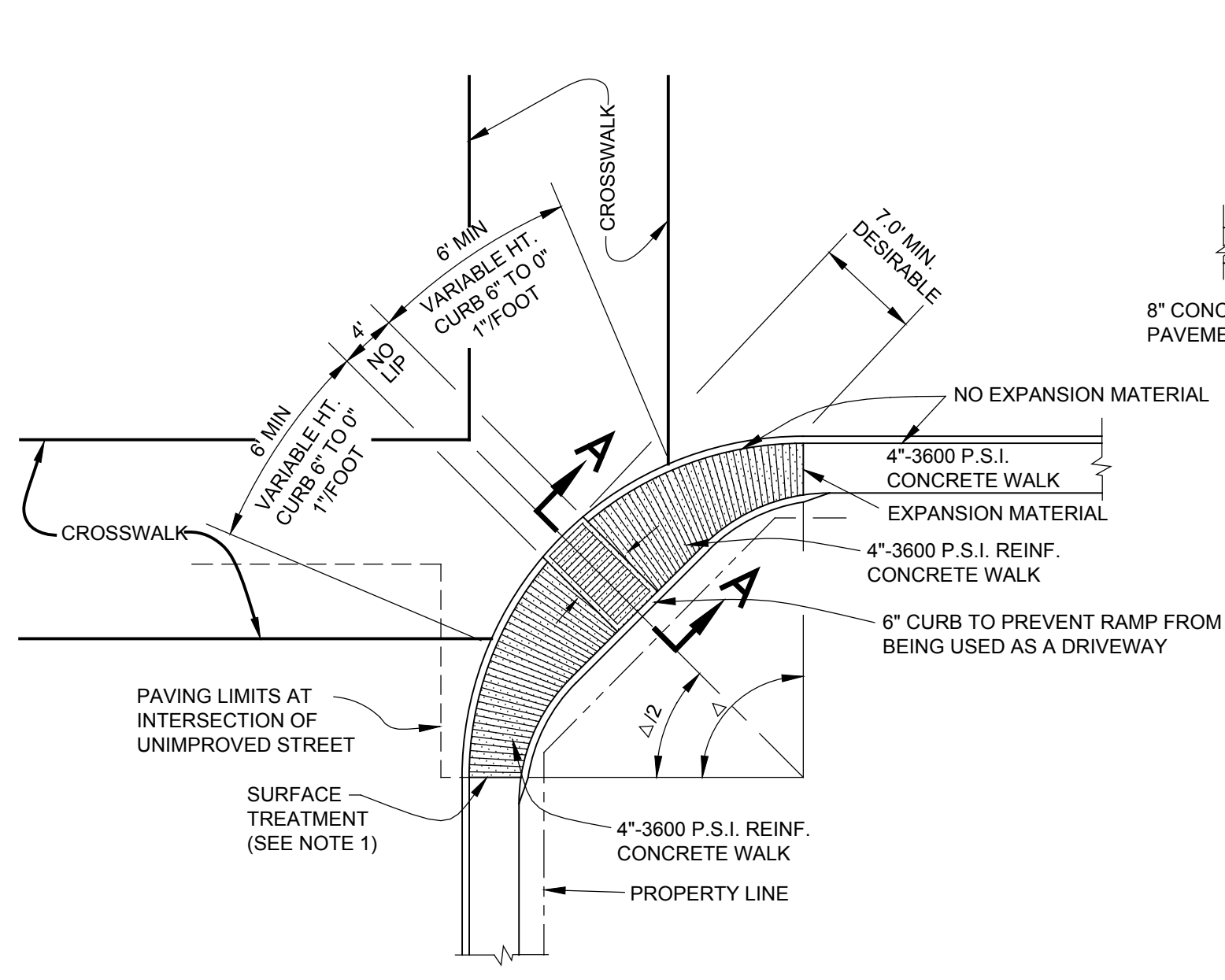
PAVING DETAILS

Job No. 1759-03-01

Sheet No. C06.02

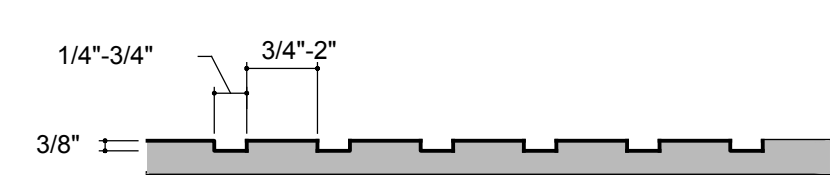
Drawn By: RAH

Date: 06-04-2018

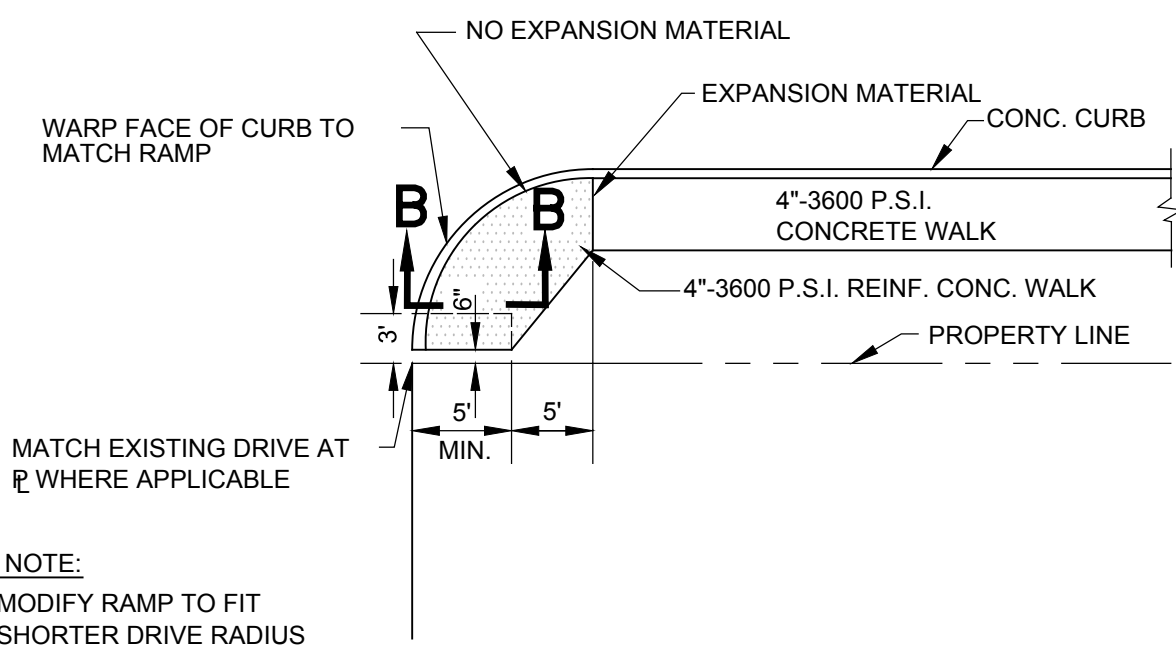


BARRIER FREE RAMP DETAIL AT INTERSECTING STREET

(WALK ABUTTING CURB) SCALE: 3/32" = 1'-0"

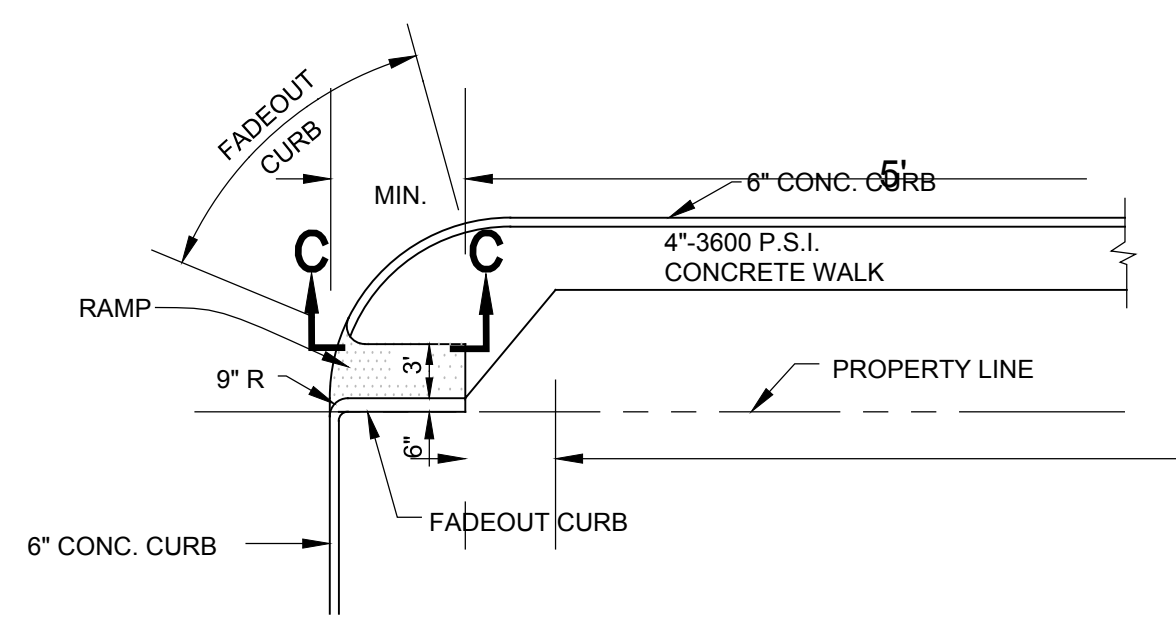


GROOVE DETAIL



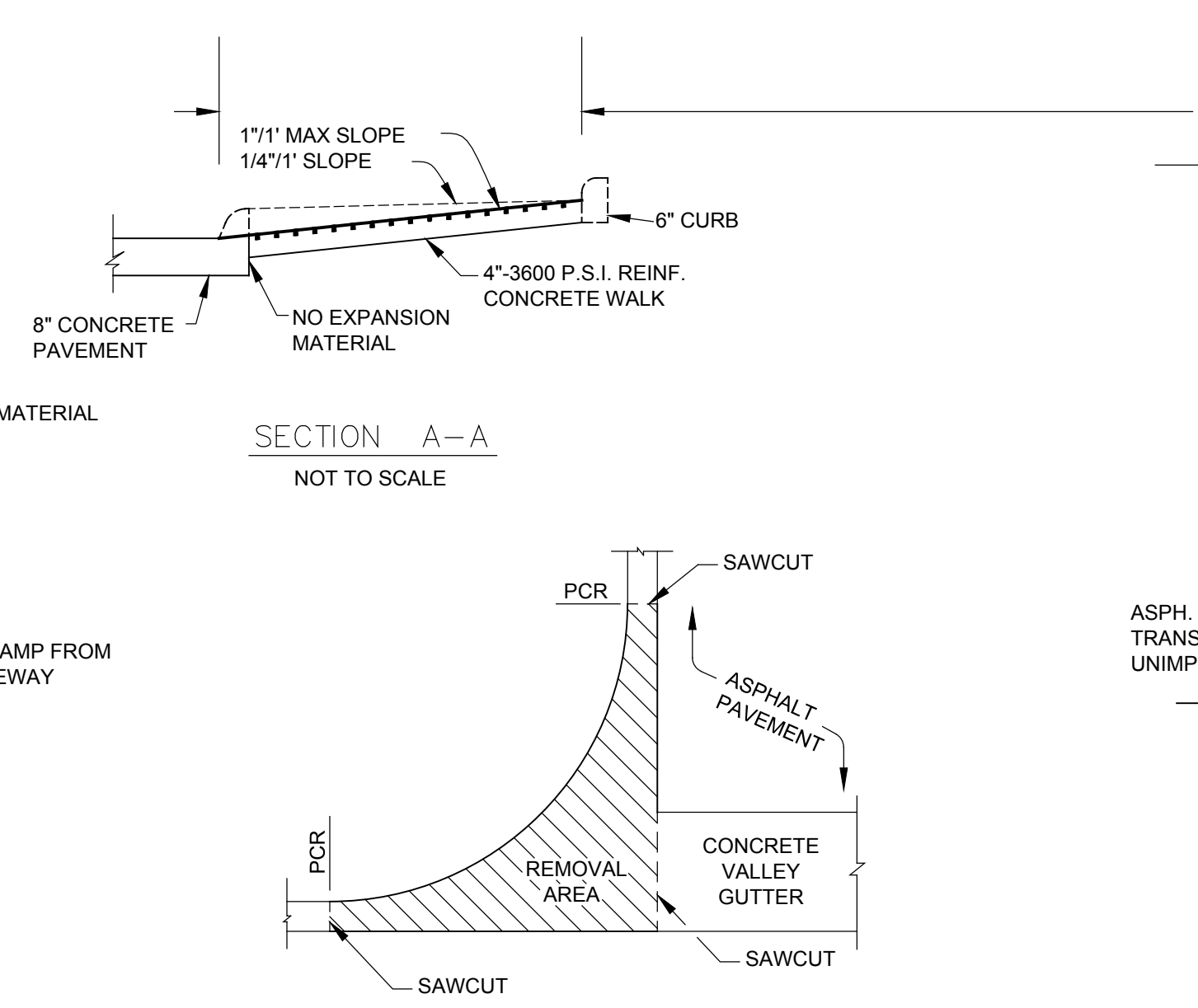
BARRIER FREE RAMP DETAIL AT DRIVE

(WALK ABUTTING CURB) SCALE: 3/32" = 1'-0"

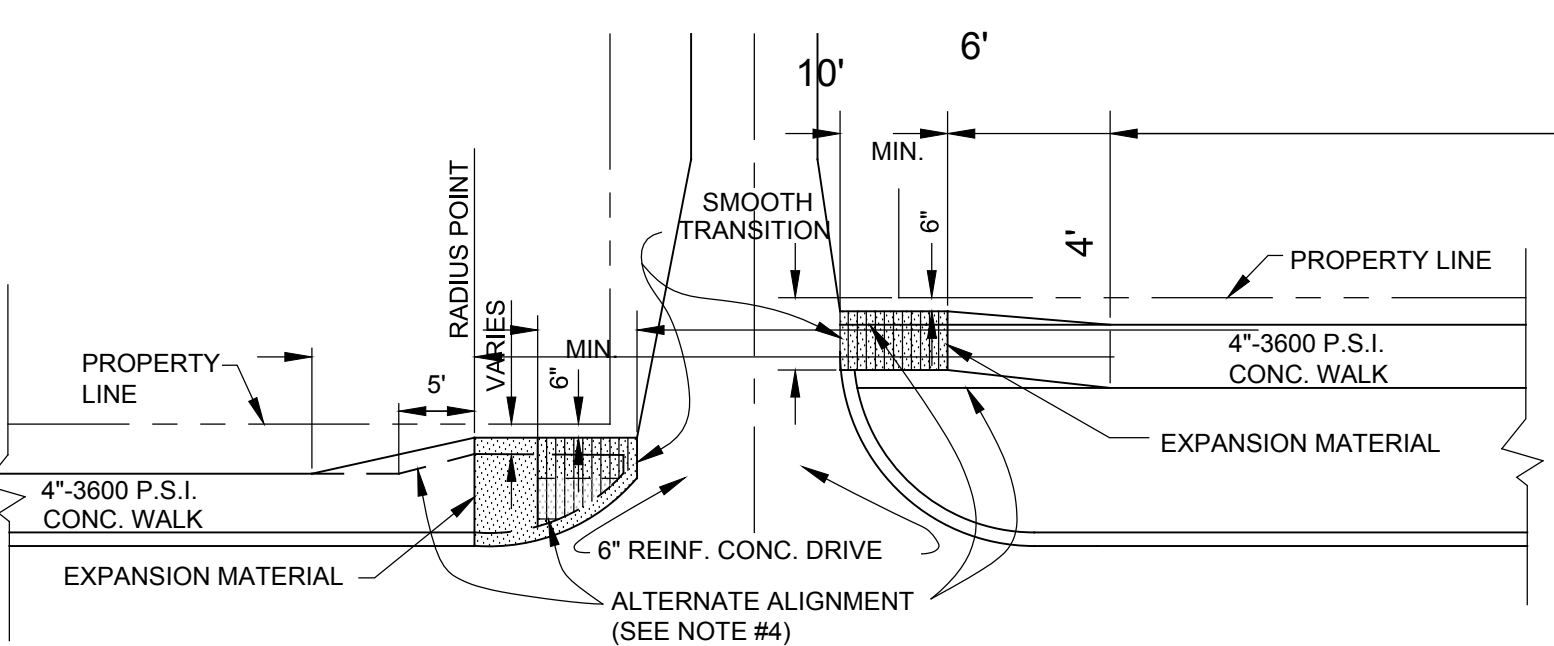


BARRIER FREE RAMP AT CURBED DRIVE

(WALK ABUTTING CURB) SCALE: 3/32" = 1'-0"

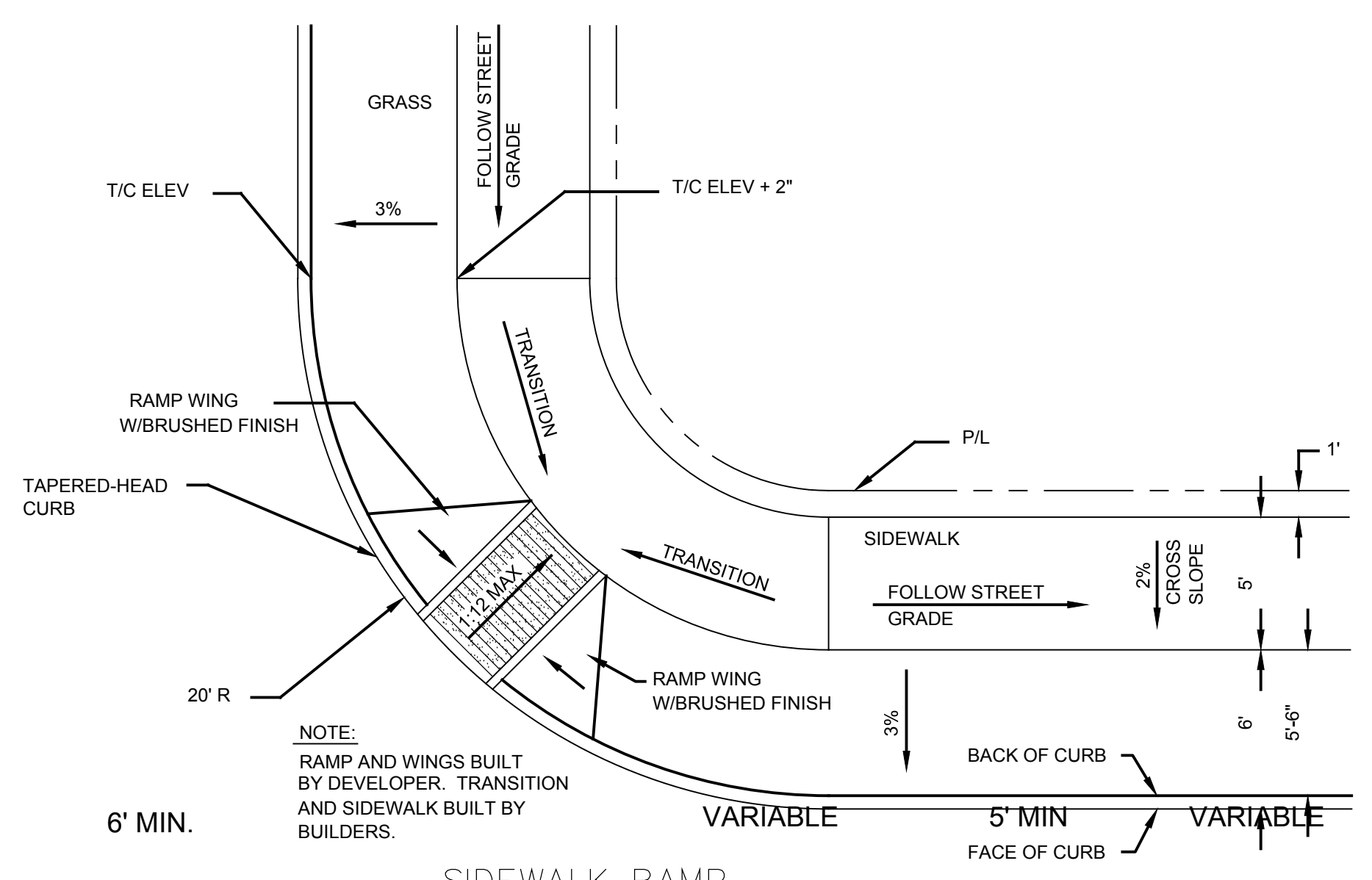


REMOVAL AREA FOR CONSTRUCTION OF A BARRIER FREE RAMP

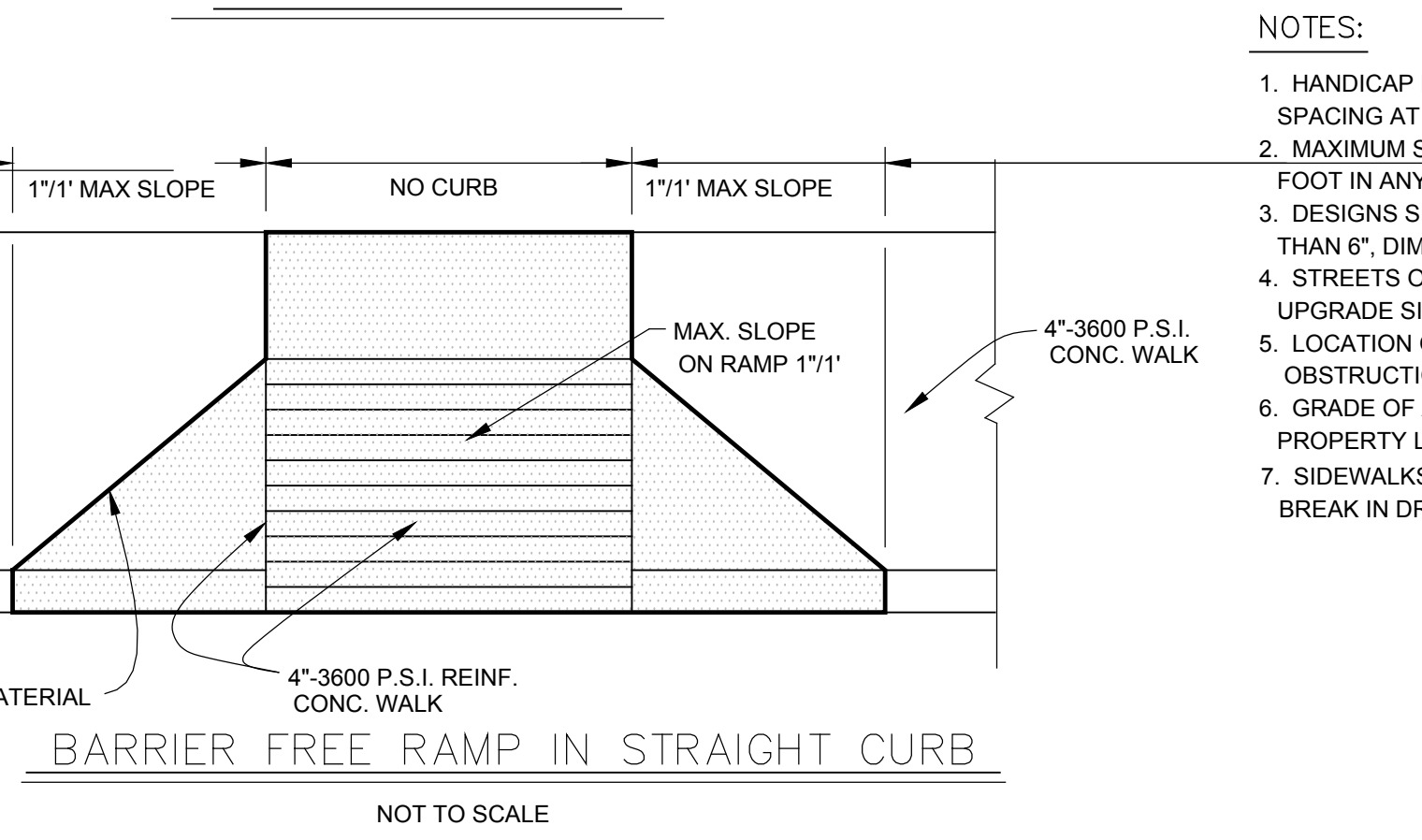


BARRIER FREE RAMPS AT ALLEYS

SCALE: 3/32" = 1'-0"



SIDEWALK RAMP

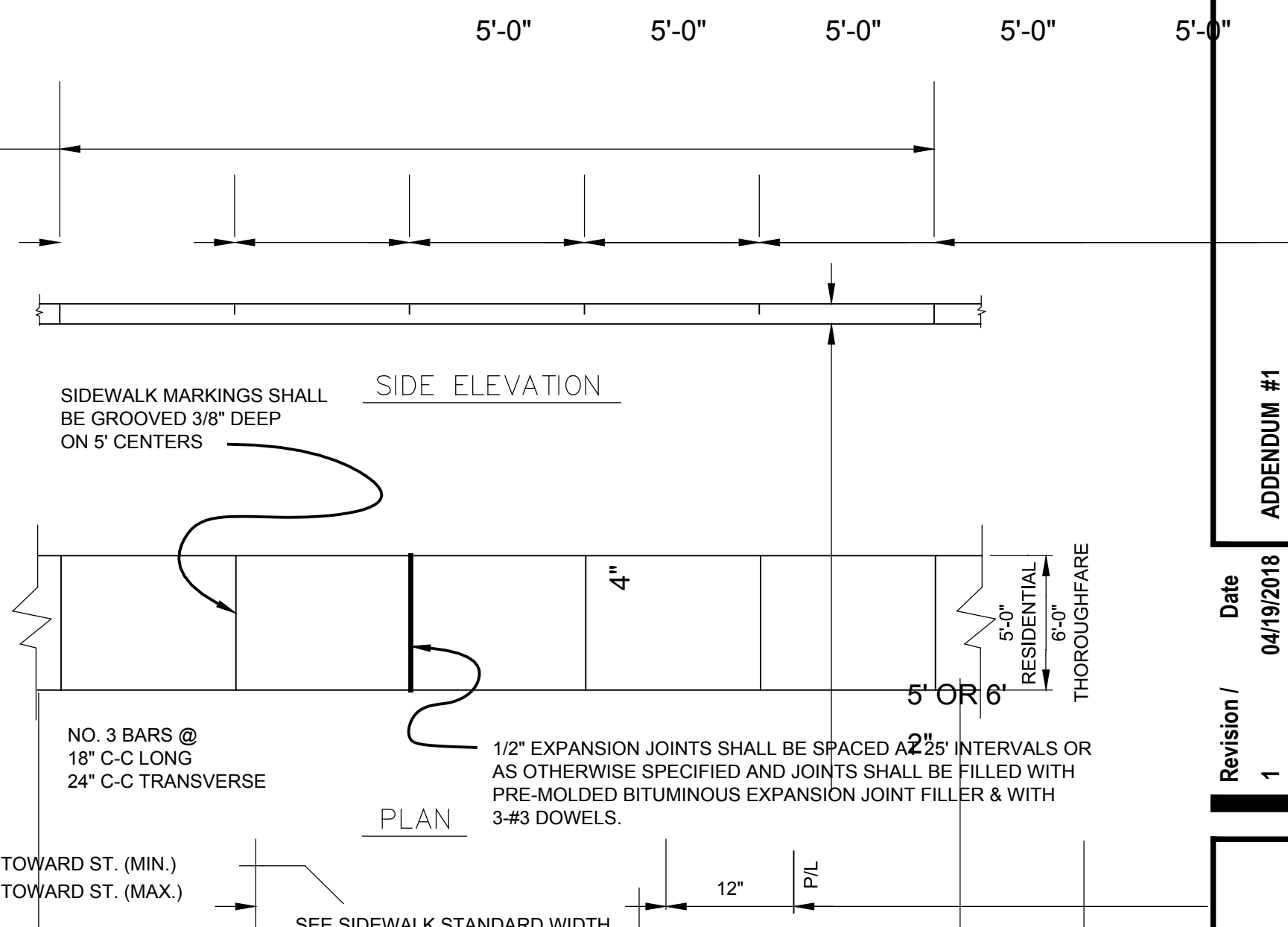
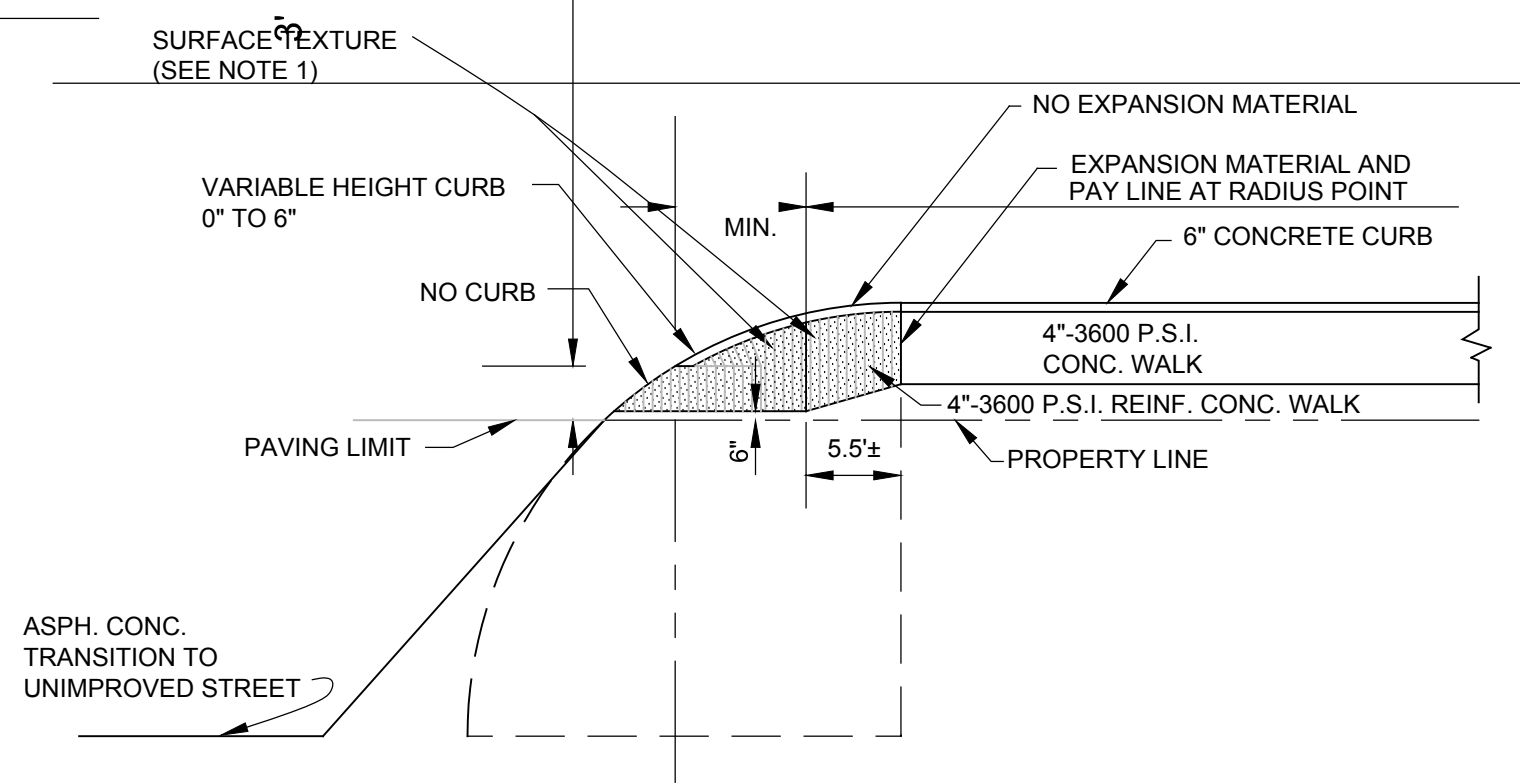


BARRIER FREE RAMP IN STRAIGHT CURB

NOT TO SCALE

BARRIER FREE RAMP AT INTERSECTION WITH RESTRICTED RIGHT-OF-WAY

(WALK ABUTTING CURB) SCALE: 3/32" = 1'-0"



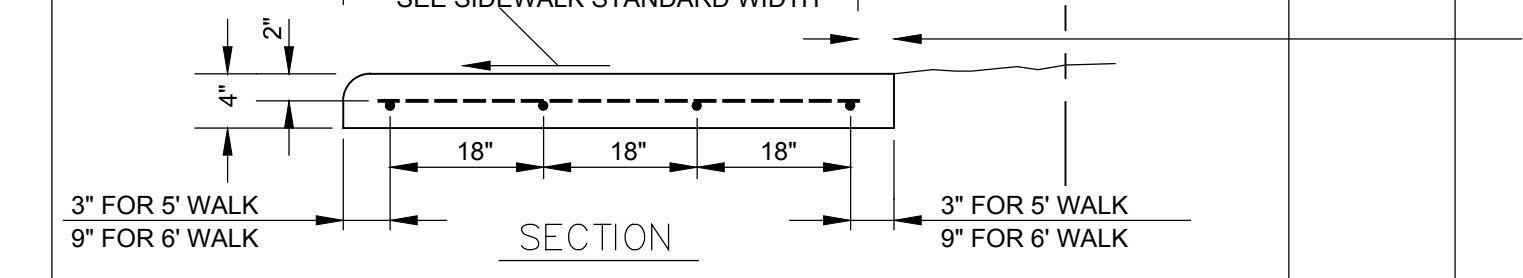
SIDE ELEVATION

PLAN

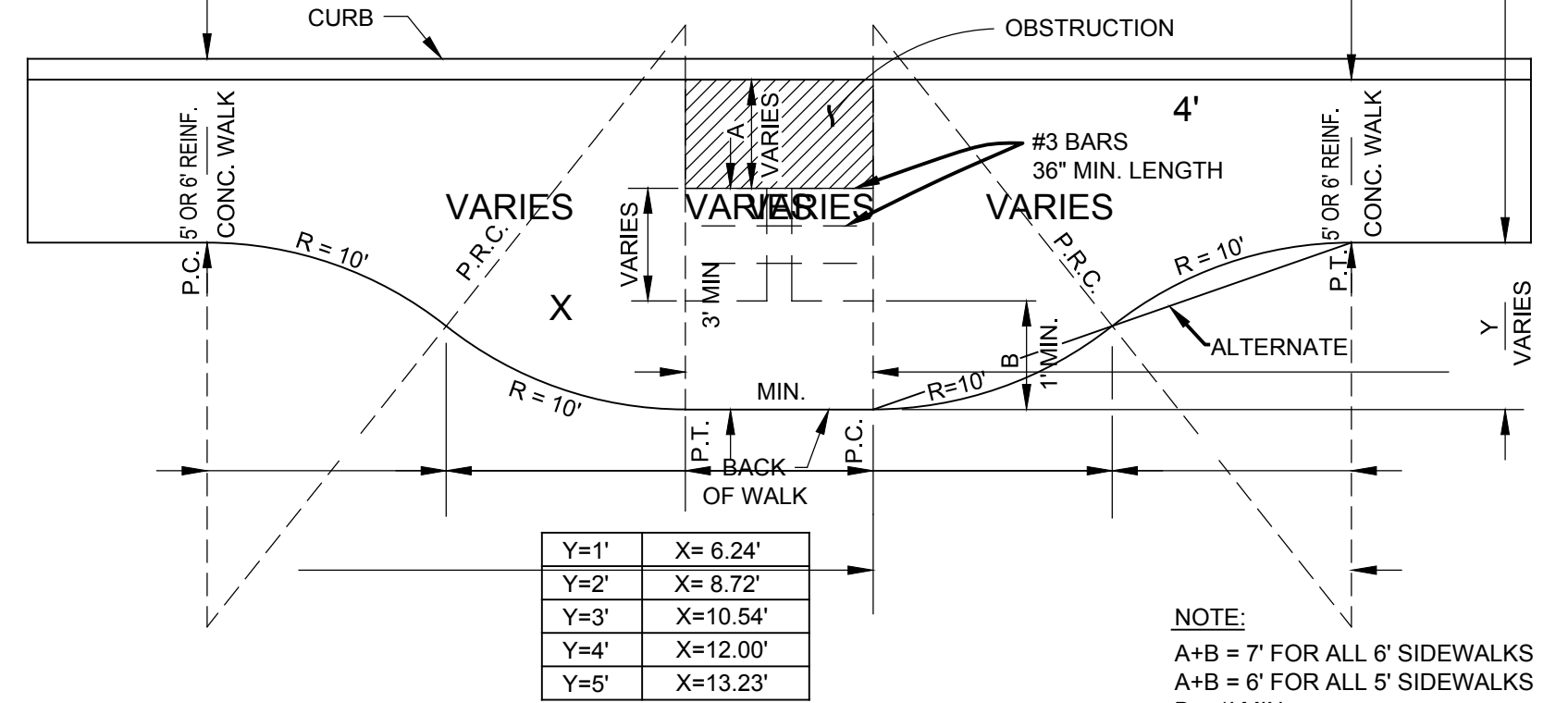
CONCRETE SIDEWALK

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

SLOPE 1/4' FT. TOWARD ST. (MIN.) SLOPE 3/4' FT. TOWARD ST. (MAX.)



SECTION



Y=1'	X= 6.24'
Y=2'	X= 8.72'
Y=3'	X=10.54'
Y=4'	X=12.00'
Y=5'	X=13.23'

SIDEWALK WIDENING REQUIRED AROUND OBSTACLES IN SIDEWALK

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

STREET CLASSIFICATION	SIDEWALK WIDTH
A	6'
B	6'
D, RESIDENTIAL	5'
E, RESIDENTIAL	5'
F	5'

NOTES:

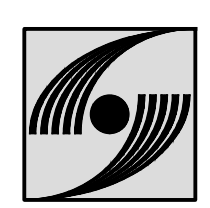
- HANDICAP RAMPS SHALL INCLUDE GROOVES 1/4"-3/4" WIDE AT 3/4"-2" SPACING AT A MAX. DEPTH OF 3/8". RAMPS SHALL BE STAINED/DYED RED.
- MAXIMUM SLOPE ON BARRIER FREE RAMPS MUST NOT EXCEED 1" PER FOOT IN ANY DIRECTION.
- DESIGNS SHOWN ARE FOR 6" CURBS. FOR CURBS WITH HEIGHT GREATER THAN 6", DIMENSIONS MUST BE INCREASED PROPORTIONATELY.
- STREETS ON STEEP GRADE WILL REQUIRE LONGER TRANSITION ON UPGRADE SIDE.
- LOCATION OF BARRIER FREE RAMP MAY BE SHIFTED TO CLEAR OBSTRUCTIONS.
- GRADE OF ANY INTERSECTING DRIVE FROM GUTTER LINE OF STREET TO PROPERTY LINE SHALL NOT EXCEED 8%.
- SIDEWALKS CROSSING STEEP DRIVEWAYS MUST HAVE 2% CROSS-SLOPE BREAK IN DRIVE.

RECORD DRAWING
THIS IS TO CERTIFY THAT CHANGES AND CORRECTIONS HAVE BEEN MADE TO CONFORM TO THE CONTRACTOR'S RECORD OF THIS PROJECT.

Charlynn Army
DATE: 08/09/2018
Glenn Engineering Corporation

*NOTE: PRIVATE SIDEWALK ONLY

*NOTE: ALL 3600 PSI CONCRETE TO BE 6.5 SACK MIX



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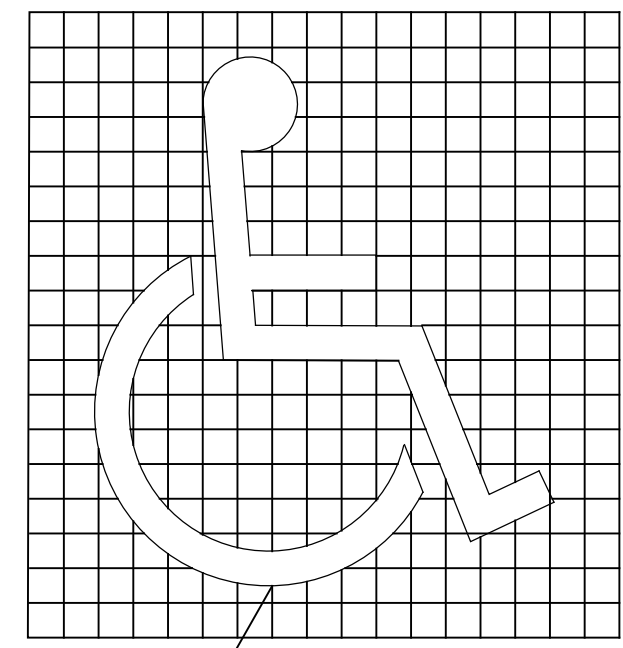
ADDENDUM #1
Date 04/19/2018
Revision / 1

Project: DOBBS PARKING LOT REVOVATION FOR ROCKWALL I.S.D. ROCKWALL, TEXAS



PAVING DETAILS

Job No. 1759-03-01
Sheet No. C06.03
Drawn By: RAH
Date: 06-04-2018

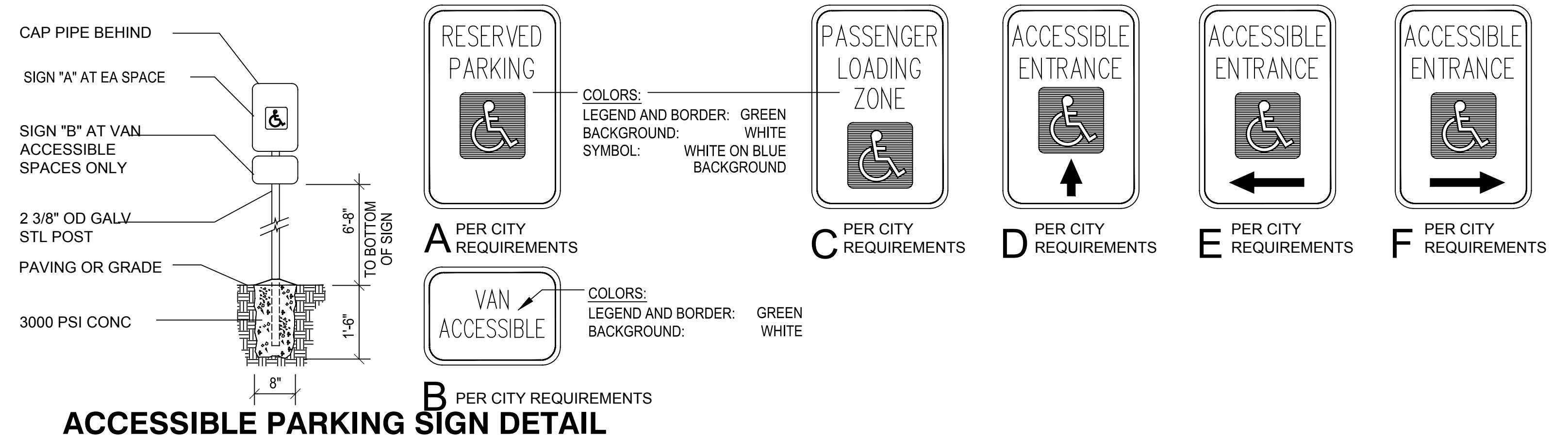


NOTE:
GRID FOR LAYOUT
PURPOSES ONLY.

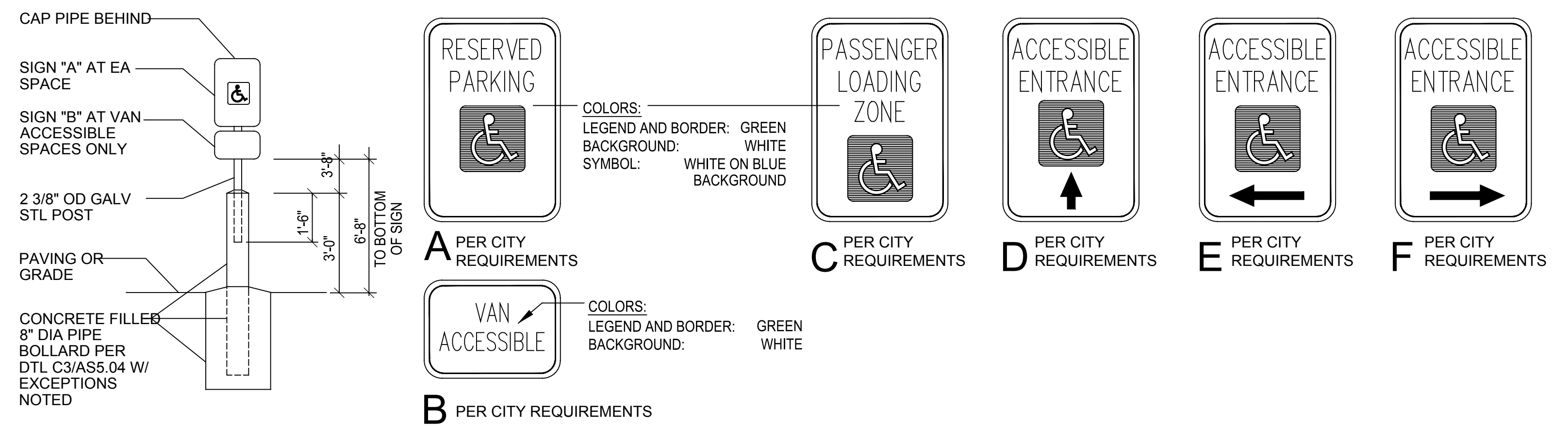
PAINT IN ACCORDANCE WITH
"STATE OF TEXAS ACCESSIBILITY
STANDARDS"

ACCESSIBLE SYMBOL DETAIL
NTS

ADDENDUM #1
Date 04/19/2018
Revision / 1



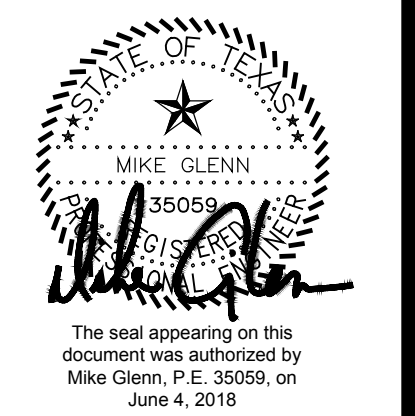
ACCESSIBLE PARKING SIGN DETAIL
NTS



ACCESSIBLE PARKING SIGN DETAIL
NTS

DOBBS PARKING LOT REVOLUTION
FOR
ROCKWALL I.S.D.
ROCKWALL, TEXAS

Project:



RECORD DRAWING
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CONFORM TO THE CONTRACTOR'S RECORD
OF THIS PROJECT.

Charalyn Armijo

DATE: 08/09/2018
Glenn Engineering Corporation



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PAVING DETAILS

Job No. 1759-03-01
Sheet No. C06.04
Drawn By: RAH
Date: 06-04-2018