

IRRIGATION LEGEND				
SYMBOL	PSI	SPACING	FLOW (GPM)	DESCRIPTION
	50	25'	0.942.04	ROTARY SPRINKLER (4" POP) WITH CHECK VALVE (STANDARD NOZZLES)
	30	15'	0.98 1.85 1.85	6-INCH POP UP SPRAY SPRINKLER WITH CHECK VALVE AND PRESSURE REGULATION.
	30	12'	0.68 1.3 1.3 2.6	
	30	10'	0.74 0.74 1.58	
	30	8'	0.82 0.82	
	30	4x30'	1.93	
	30	4x15'	1.93	
	45	18'		IN-LINE EMITTER DRIP TUBING (0.6 GPH)
				IN-LINE DRIP TUBING ON 36" TREE RING (0.9 GPH EMITTERS WITH 12" SPACINGS). USE WITH 2 GPH DEEP DRIP STAKES. CONNECT STAKE DISTRIBUTION TUBING TO A 2 GPH POINT SOURCE EMITTER AND TO A SELF-PIERCING BARBED TRANSFER FITTING (PROVIDE 3 STAKES PER INDIVIDUAL LANDSCAPE TREE).
				IN-LINE DRIP TUBING ON 36" TREE RING (0.9 GPH EMITTERS WITH 12" SPACINGS). USE WITH 2 GPH DEEP DRIP STAKES. CONNECT STAKE DISTRIBUTION TUBING TO A 2 GPH POINT SOURCE EMITTER AND TO A SELF-PIERCING BARBED TRANSFER FITTING (PROVIDE 4 STAKES PER INDIVIDUAL STREET TREE).
				1" 24 VOLT ELECTRIC ZONE VALVE
				1-1/2" ISOLATION GATE VALVE
				1" QUICK COUPLING VALVE
				MANUAL FLUSHING VALVE
				1" 24 VOLT ELECTRIC ZONE VALVE W/ DISK FILTER AND 45 PSI PRESSURE REGULATOR (DRIP)
				1" SCHEDULE 40 PVC LATERAL PIPING
				1-1/2" CLASS-200 PVC MAINLINE PIPING
				CLASS-160 PVC PIPE SLEEVE (3" UNLESS INDICATED)
				INSTALL SCH-40 PVC WIRE CONDUIT ADJACENT TO ALL MAINLINE PIPE SLEEVES. MINIMUM WIRE CONDUIT SIZE TO BE 1 1/2-INCH, UNLESS OTHERWISE NOTED. SEE SLEEVING DETAIL.
				AUTOMATIC RAIN SENSOR
				MOISTURE SENSOR
				AUTOMATIC MOISTURE SENSOR BASED SMART CONTROLLER
				LIGHTING SURGE ARRESTOR WITH GROUND
				IRRIGATION FLOW METER/NORMALLY OPEN MASTER VALVE
				IRRIGATION WATER METER IN ENCLOSURE (SEE DETAILS)
				BACKFLOW PREVENTION DEVICE IN ENCLOSURE (SEE DETAILS)
				1-1/2" STOP AND WASTE VALVE (SEE DETAILS)
VALVE DESIGNATION:		ABBREVIATION:		
	STATION NO.		SL. = SLEEVE	
	6 -- FLOW			
	1"			

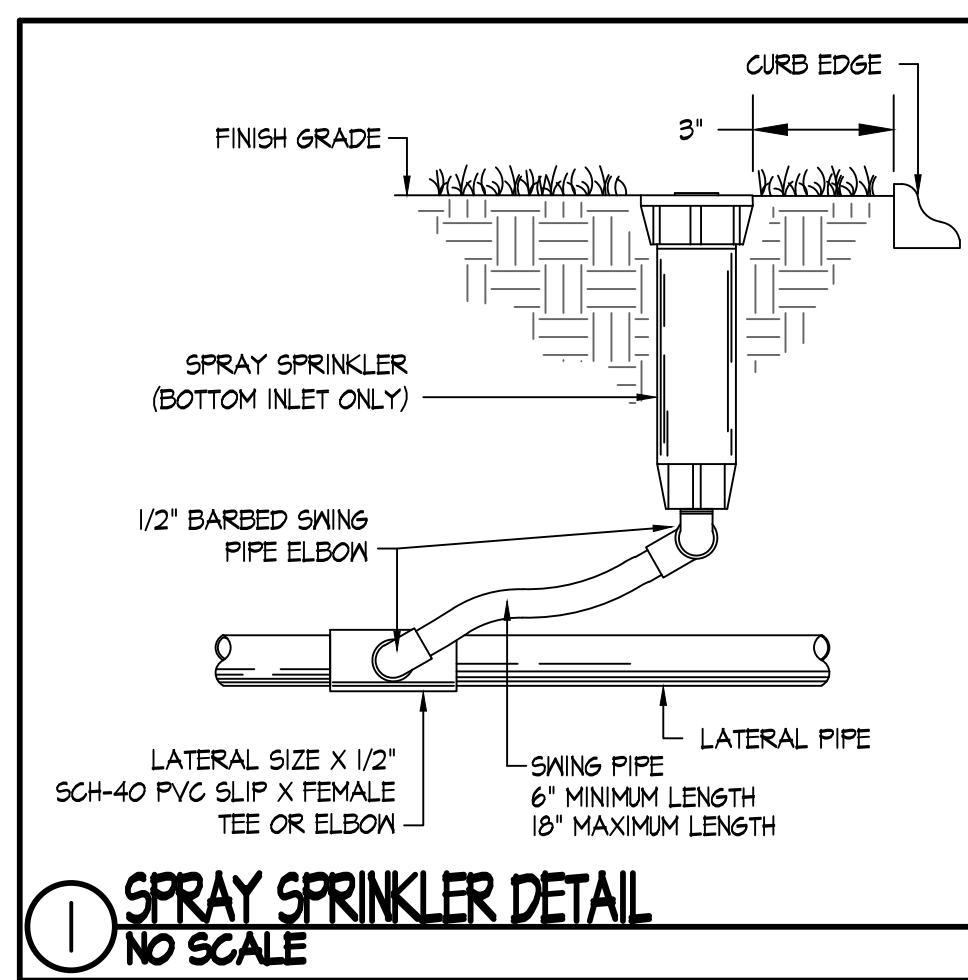
- IRRIGATION NOTES**
- COORDINATE FINAL LOCATION OF DRIP TUBING, SPRINKLERS AND NOZZLE SELECTION WITH FINAL APPROVED LANDSCAPE.
 - PIPE AND VALVE LOCATIONS ARE DIAGRAMMATIC, CONTRACTOR SHALL FIELD VERIFY.
 - VALVES AND VALVE BOXES SHALL BE PLACED, WHERE POSSIBLE, IN PLANTED AREAS UNDER MULCH.
 - INSTALL PIPING AS FAR FROM TREES AND ROOT BALLS AS POSSIBLE WHILE MAINTAINING SPRINKLER AND DRIP TUBE SPACING.
 - TWO-WIRE COMMUNICATION CABLE FROM CONTROLLER TO DECODERS SHALL BE POLYETHYLENE DOUBLE JACKETED OR UF-B UL PVC DOUBLE JACKETED TWO CONDUCTOR SOLID CORE #14/4 AWG DESIGNED FOR DIRECT BURIAL. SUFFICIENT SLACK SHOULD BE LEFT FOR COMMUNICATION CABLE AT DECODER LOCATIONS TO ALLOW DECODER, SOLENOID, AND SPLICE TO BE BROUGHT ABOVE GRADE.
 - RAIN SENSOR WIRES SHALL BE #14 AWG GAUGE SINGLE STRAND BLUE FROM RAIN SENSOR TO CONTROLLER. RAIN SENSOR TO BE INSTALLED ON LIGHT POLE APPROVED BY OWNERS REPRESENTATIVE. RAIN SENSOR SHALL BE LOCATED WITHIN 200 FEET OF THE CONTROLLER.
 - QUICK COUPLING VALVES SHALL BE INSTALLED ON 1 INCH PVC SWING JOINTS WITH BRASS INSERTS AND STABILIZERS. (SEE DETAIL)
 - SPRAY AND ROTARY SPRINKLERS SHALL BE INSTALLED ON SWING PIPE ASSEMBLIES, MINIMUM LENGTH TO BE 6 INCHES, 18 INCH MAXIMUM LENGTH.
 - IRRIGATION SYSTEM IS DESIGNED FOR SEPARATE WATER SUPPLY TO PROVIDE 30 GPM MAXIMUM FROM NEW 1.5-INCH SERVICE. SYSTEM TO REQUIRE TO PSI DYNAMIC PRESSURE AT IRRIGATION CONTRACTOR'S POINT OF CONNECTION IN LANDSCAPED AREA.
 - CONTRACTOR SHALL TEST DYNAMIC PRESSURE BEFORE STARTING WORK. REPORT ANY DEVIATION FROM PRESSURE REQUIRED TO OWNER'S REPRESENTATIVE BEFORE CONTINUING.
 - INSTALL CONTROLLER IN BACKFLOW PREVENTER/METER CABINET AS SHOWN IN DETAILS. HARD WIRE TO 120 VOLT, DEDICATED 20 AMP CIRCUIT. ROUTE COMMUNICATION CABLE TO CONTROLLER VIA 1-1/2 INCH CONDUIT.
 - INSTALL RAIN SENSOR ON EXTERIOR OF BACKFLOW PREVENTER/METER CABINET AS SHOWN IN DETAILS.
 - ABOVE GROUND WIRING, INSIDE AND OUTSIDE OF BUILDING, SHALL BE INSTALLED IN RIGID PVC CONDUIT FOR VANDALISM PROTECTION.
 - COORDINATE LOCATION OF EXISTING AND FUTURE UTILITIES ON SITE AND CONTACT PROPER AUTHORITIES AND UTILITY COMPANIES BEFORE THE START OF WORK.
 - IN-LINE DRIP TUBING TO BE INSTALLED 6" FROM MASONRY WALLS, FLANTER SIDE WALLS, AND CURBING, ON AN 18" CENTER TO CENTER ROW SPACING.
 - FLUSH LATERAL LINES BEFORE INSTALLING IN-LINE DRIP TUBING OR SPRINKLERS.
 - STAKE IN-LINE DRIP TUBING AT MINIMUM 5 FOOT INTERVALS TO PREVENT MOVEMENT, AND THREE PER TREE DRIP RING.
 - IN-LINE DRIP TUBING TO BE INSTALLED 2" BELOW GRADE. NO DRIP LINE TUBING SHALL BE VISIBLE.
 - INSTALL MANUAL FLUSH VALVES AT LOWEST POINT OF EXHAUST HEADER, GENERALLY WHERE SHOWN ON THE DRAWINGS.
 - SPRAY AND ROTOR SPRINKLERS FOR TURF SHALL HAVE 6 INCH POP UP HEIGHT.
 - CONTRACTOR MUST SUBMIT PRODUCT SHEETS AS PER THE WRITTEN SPECIFICATIONS TO THE IRRIGATION CONSULTANT FOR APPROVAL PRIOR TO ORDERING MATERIAL AND BEGINNING WORK.
 - ANY MATERIAL SUBSTITUTIONS WHICH VARY FROM THE SPECIFIED PRODUCTS MUST BE SUBMITTED TO THE IRRIGATION CONSULTANT FOR APPROVAL AS PART OF THE SUBMITTAL PROCESS.
 - ONCE APPROVED SUBMITTALS HAVE BEEN RETURNED TO THE CONTRACTOR, WORK MAY BEGIN. THE IRRIGATION CONSULTANT MUST BE NOTIFIED A MINIMUM OF 7-DAYS IN ADVANCE OF THE START OF WORK TO COORDINATE ON-SITE SUPERVISION AND ADMINISTRATION.
 - SEE IRRIGATION DETAILS FOR ADDITIONAL NECESSARY INFORMATION.



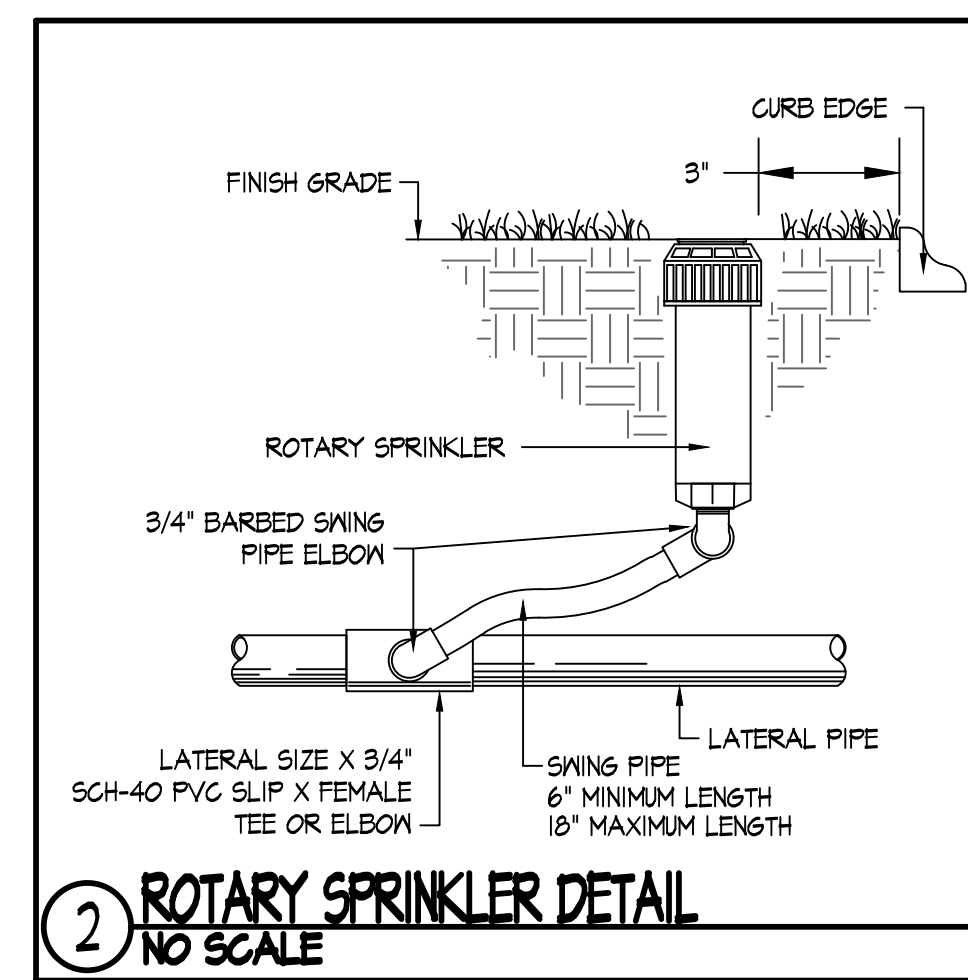
NATIONAL COLLEGIATE LANDSCAPE COMPETITION
IRRIGATION DESIGN
2025

SHEET TITLE:
IRRIGATION PLAN

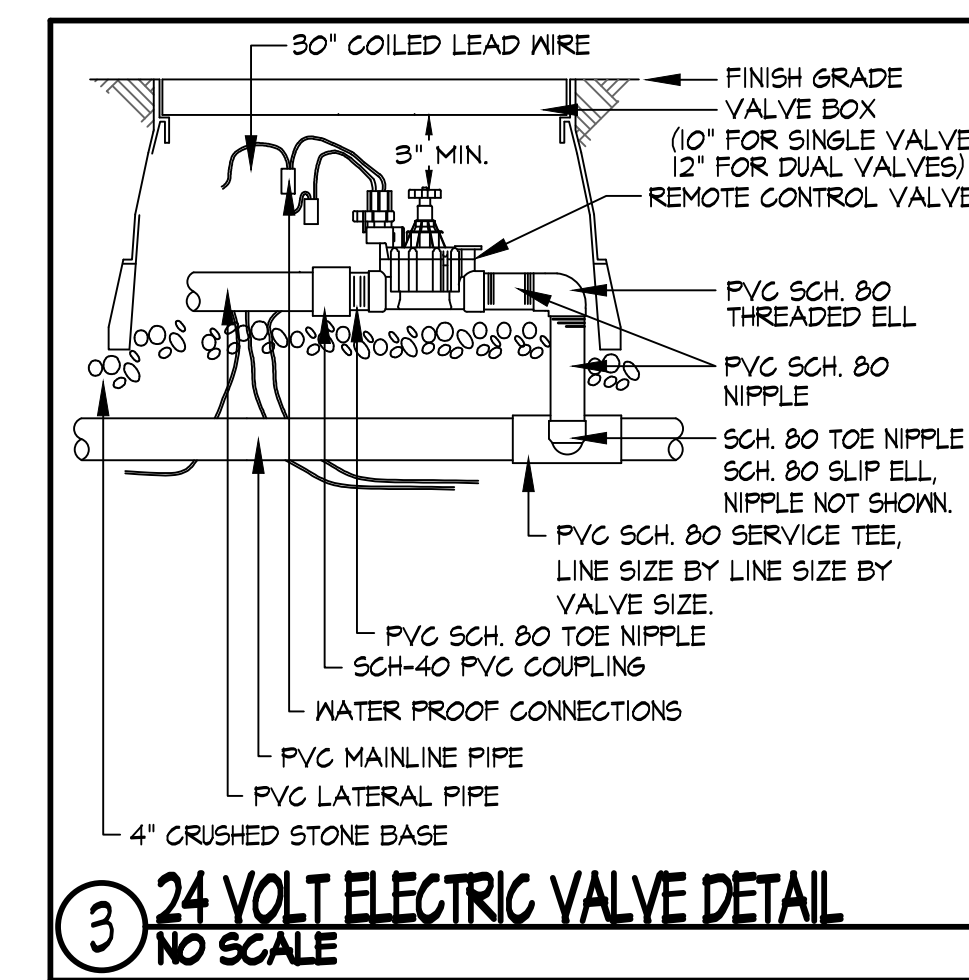
SHEET
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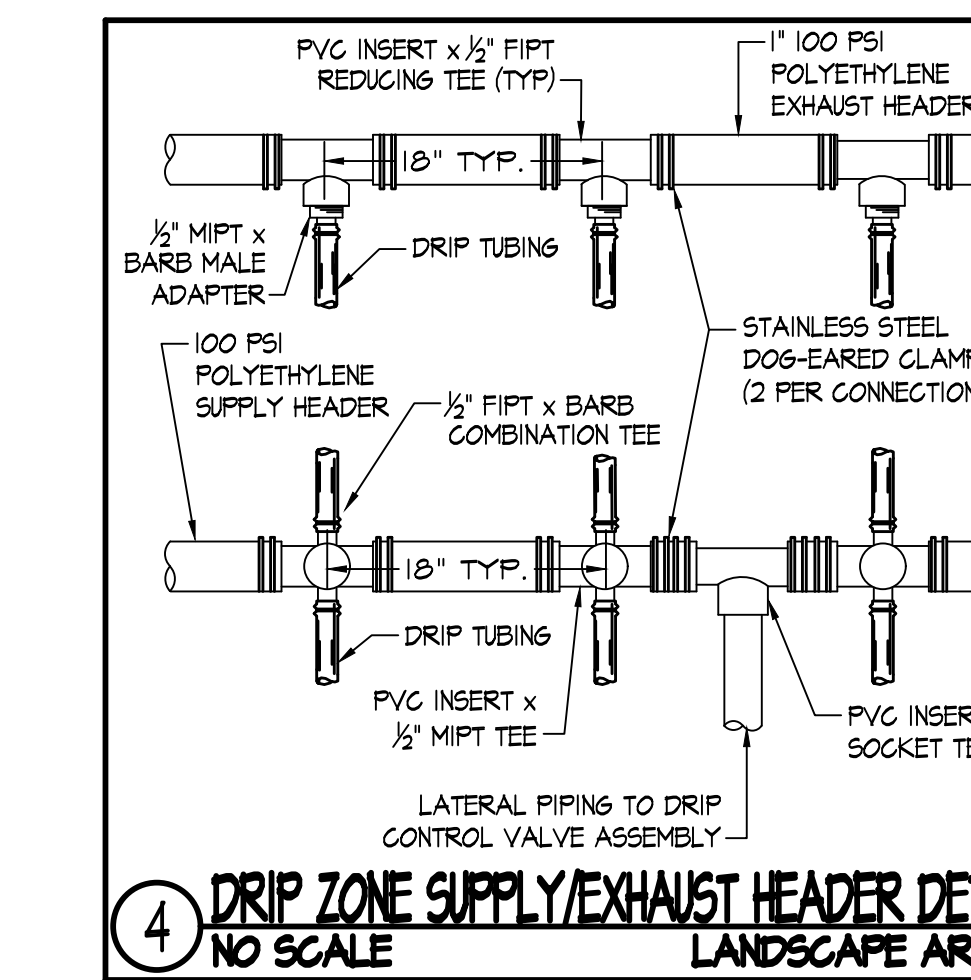
1 SPRAY SPRINKLER DETAIL
NO SCALE



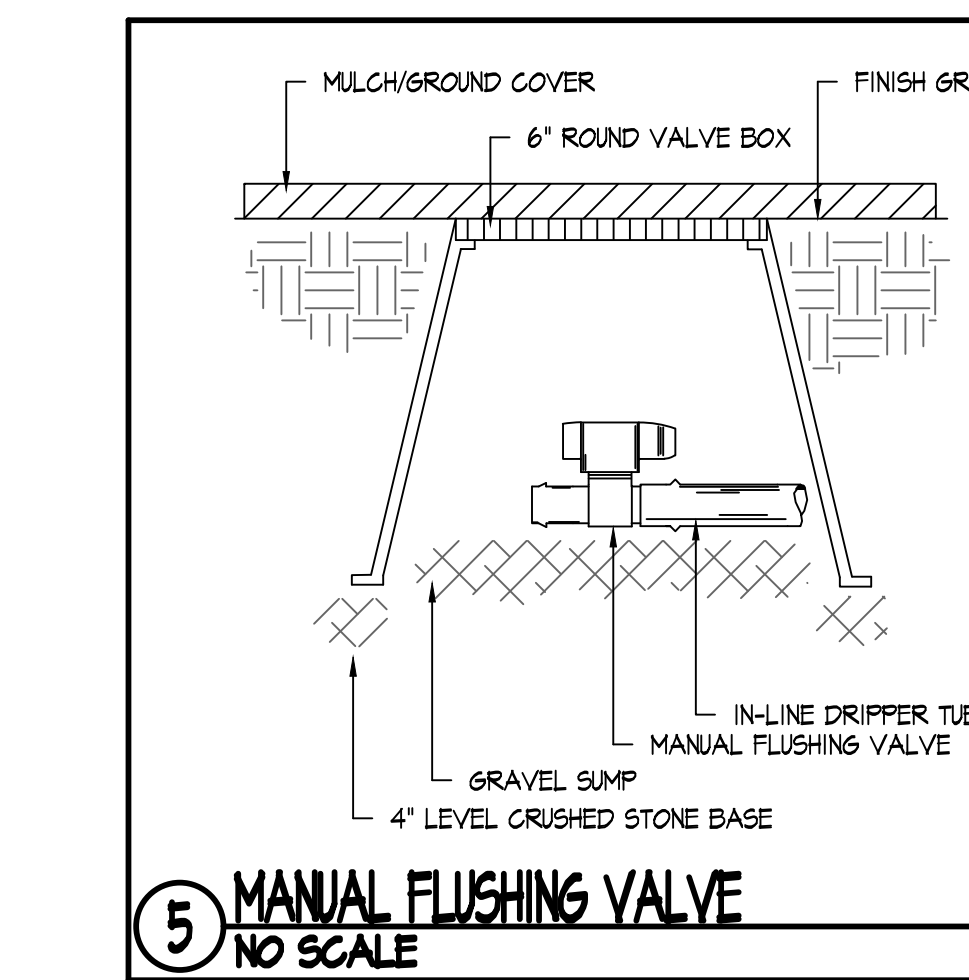
2 ROTARY SPRINKLER DETAIL
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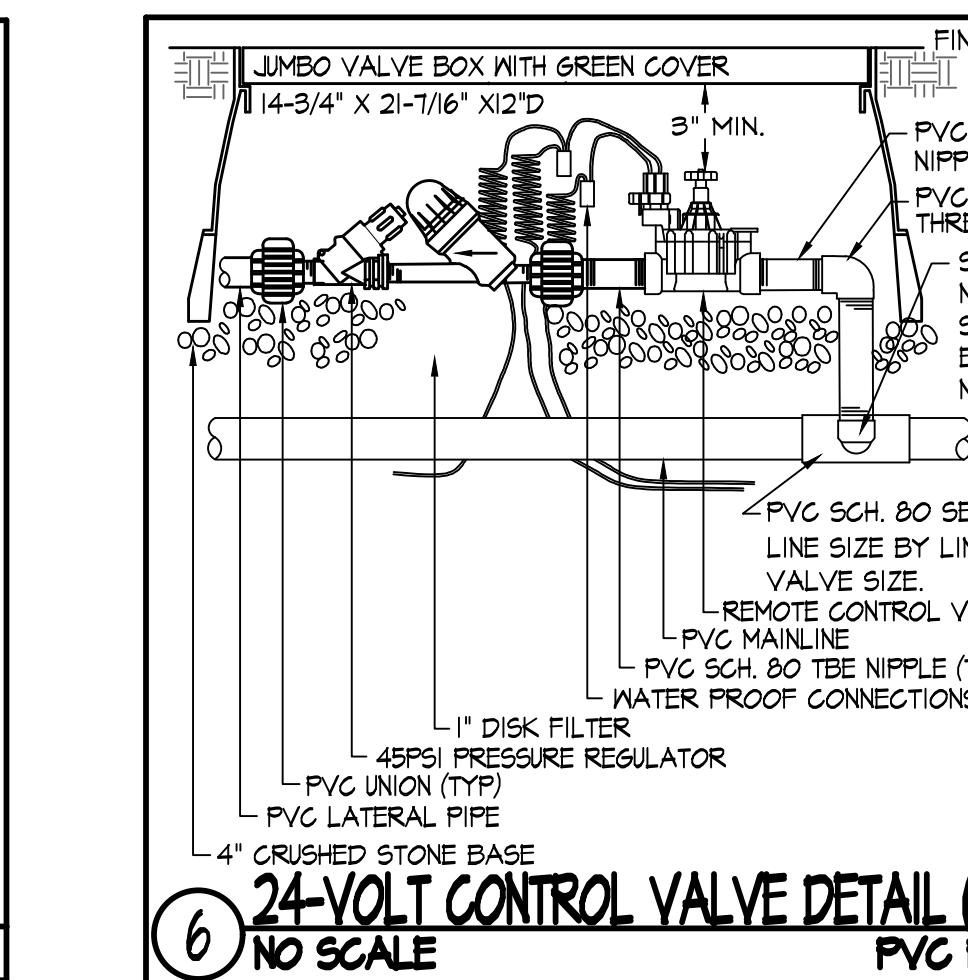
3 24 VOLT ELECTRIC VALVE DETAIL
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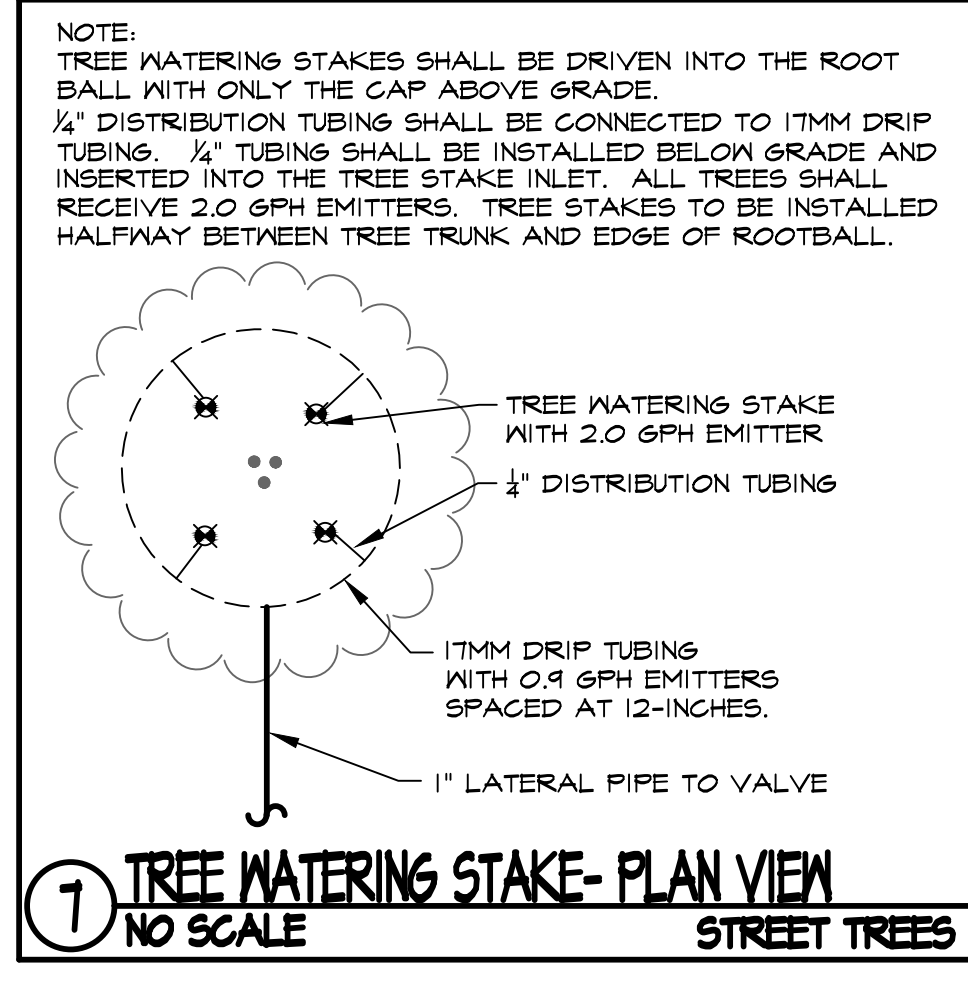
4 DRIP ZONE SUPPLY/EXHAUST HEADER DETAIL
NO SCALE



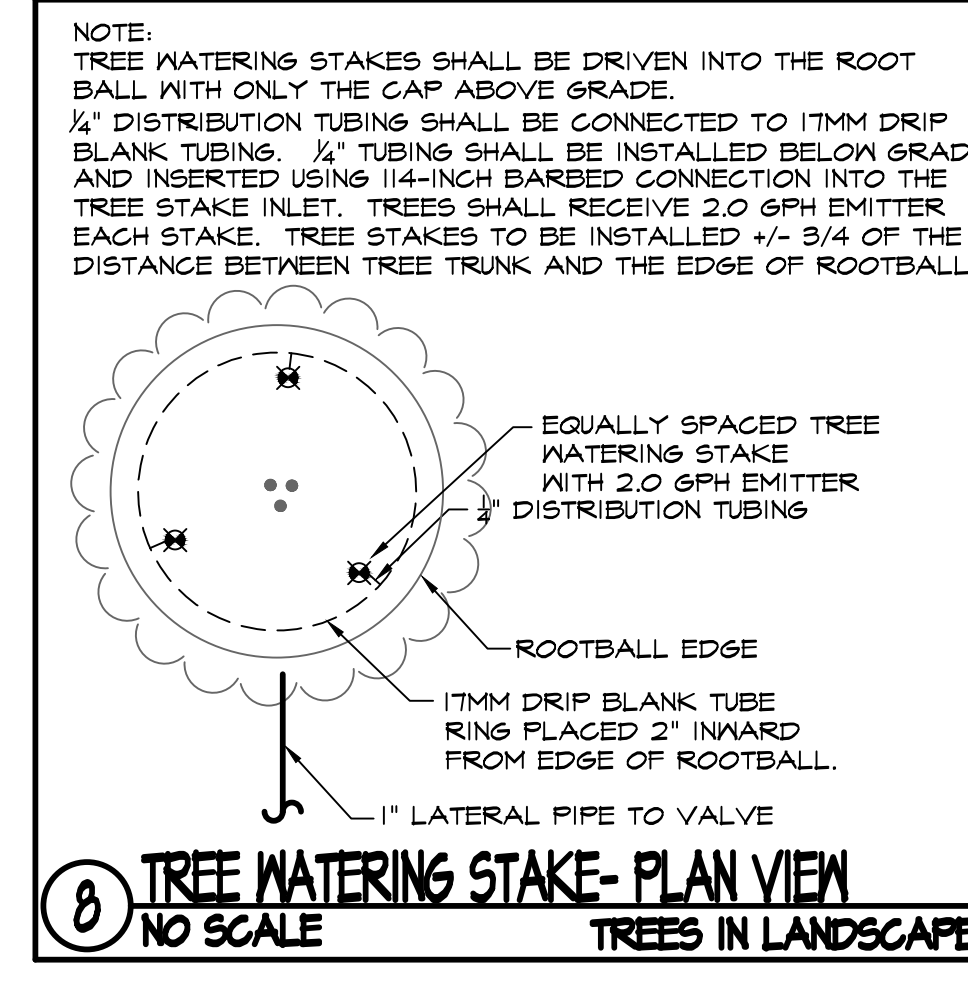
5 MANUAL FLUSHING VALVE
NO SCALE



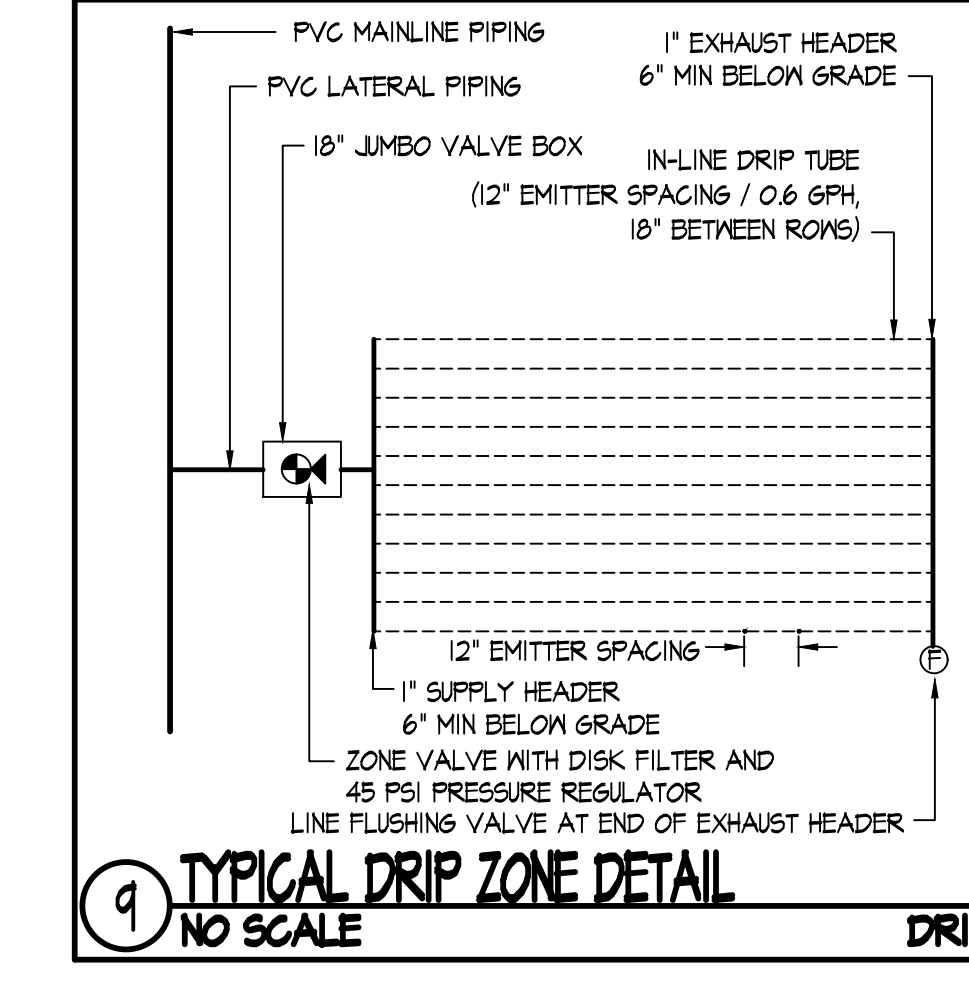
6 24-VOLT CONTROL VALVE DETAIL (DRIP)
NO SCALE



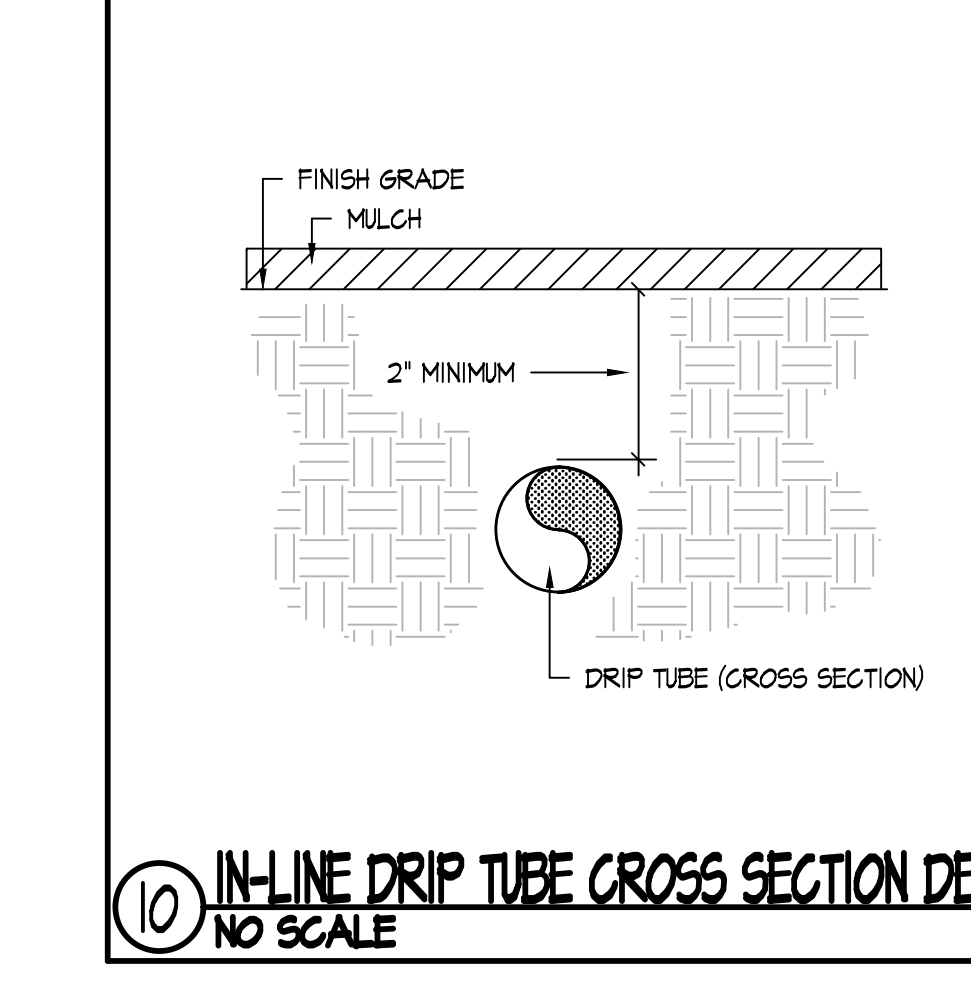
7 TREE WATERING STAKE - PLAN VIEW
NO SCALE



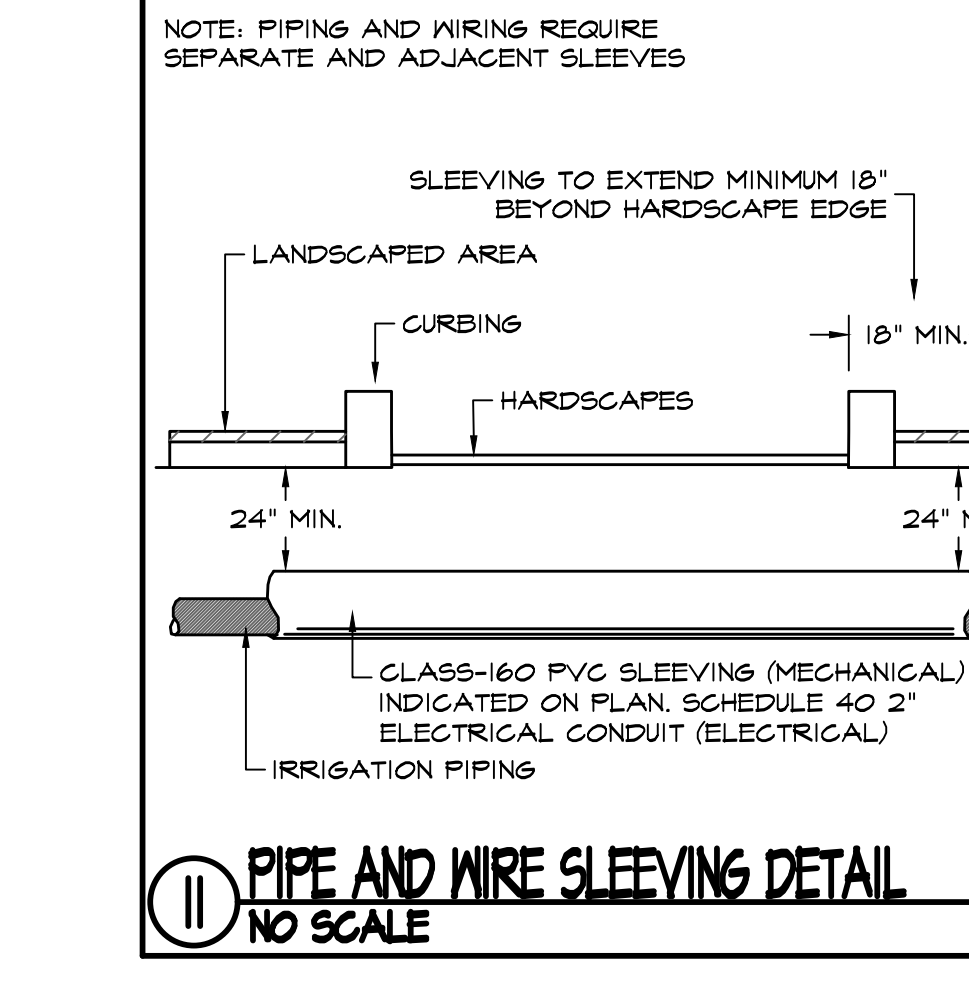
8 TREE WATERING STAKE - PLAN VIEW
NO SCALE



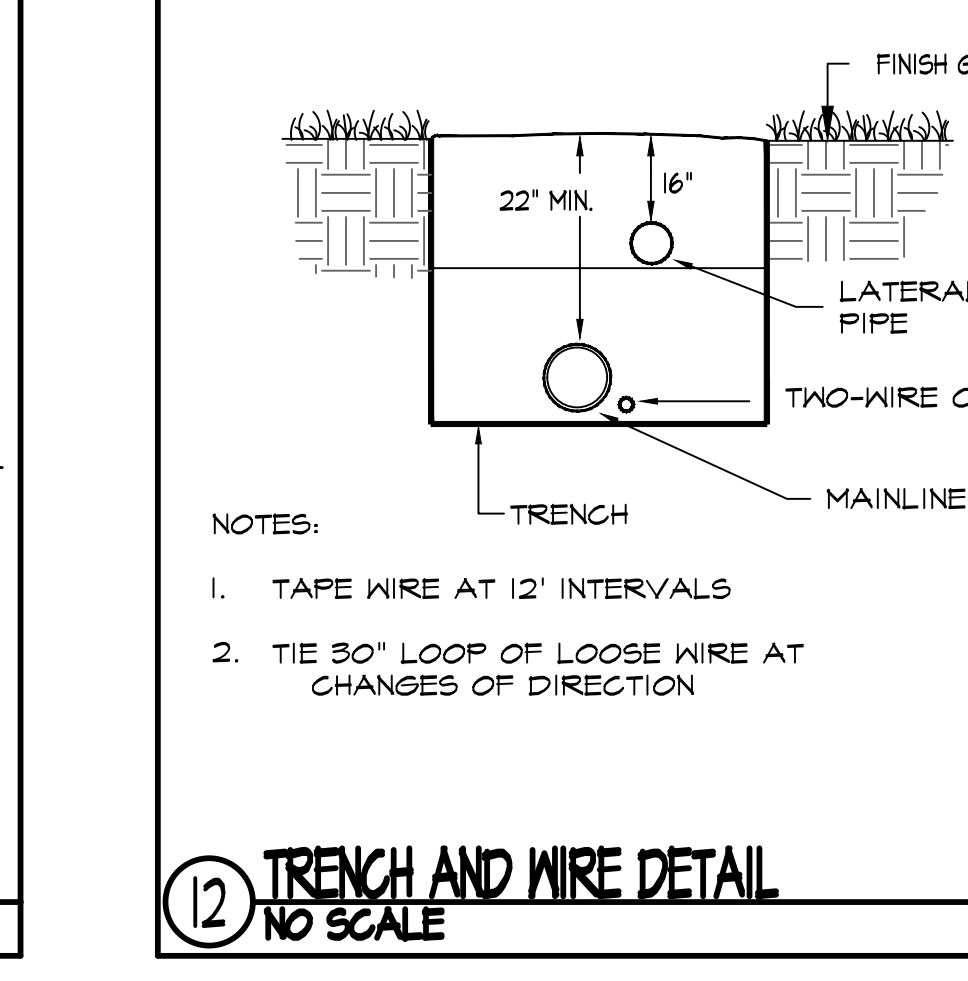
9 TYPICAL DRIP ZONE DETAIL
NO SCALE



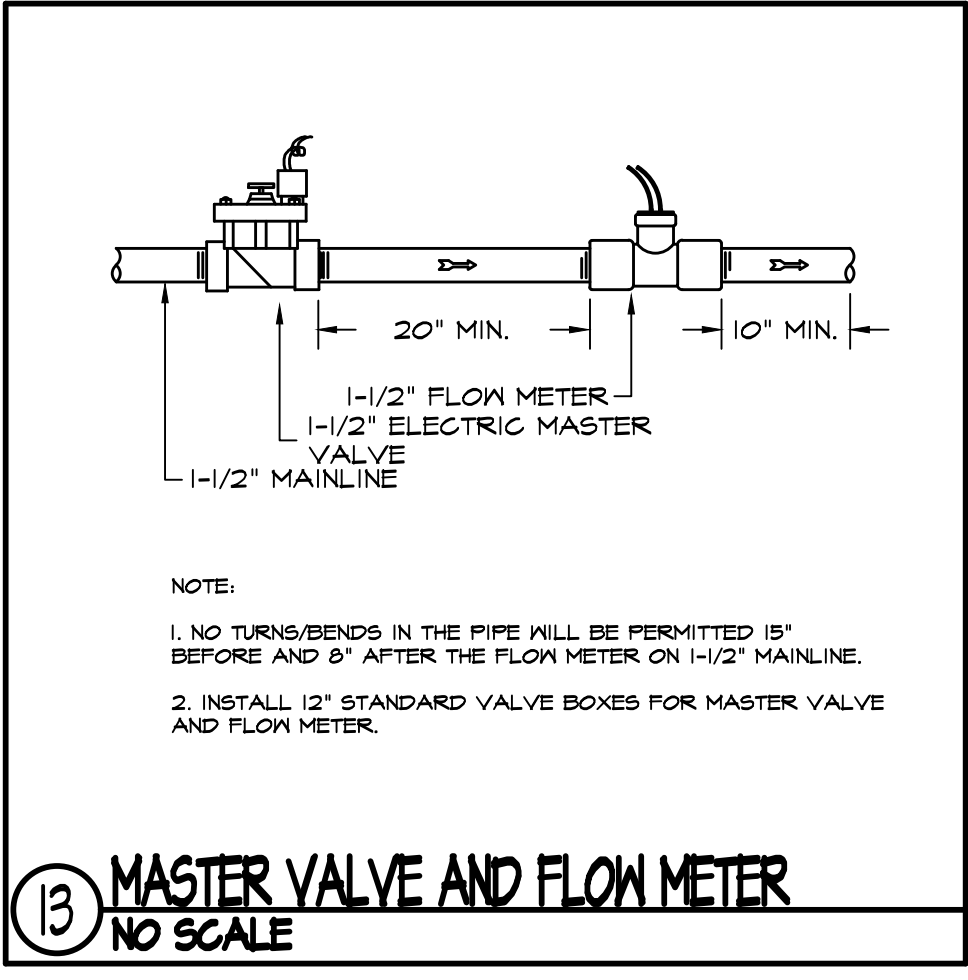
10 IN-LINE DRIP TUBE CROSS SECTION DETAIL
NO SCALE



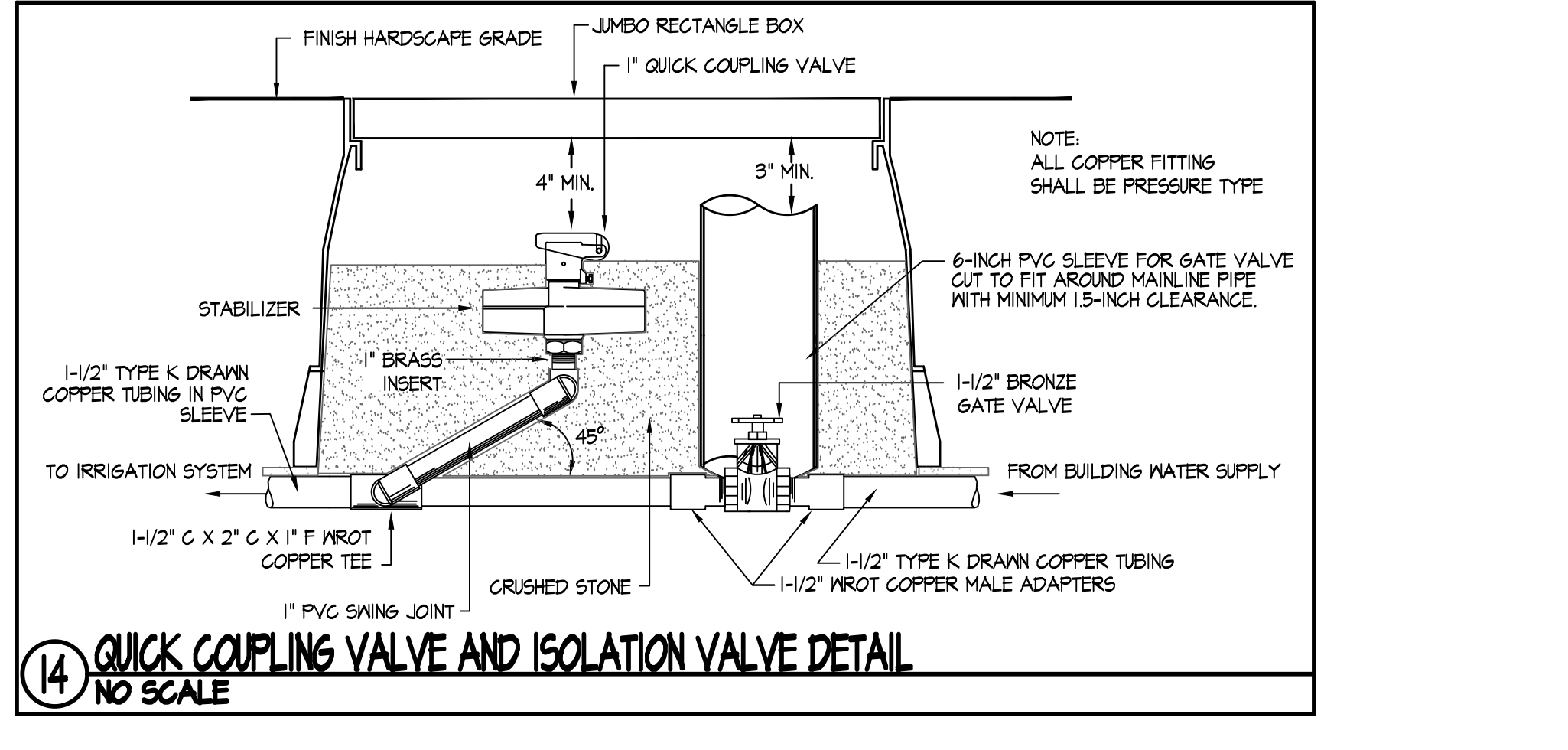
11 PIPE AND WIRE SLEWING DETAIL
NO SCALE



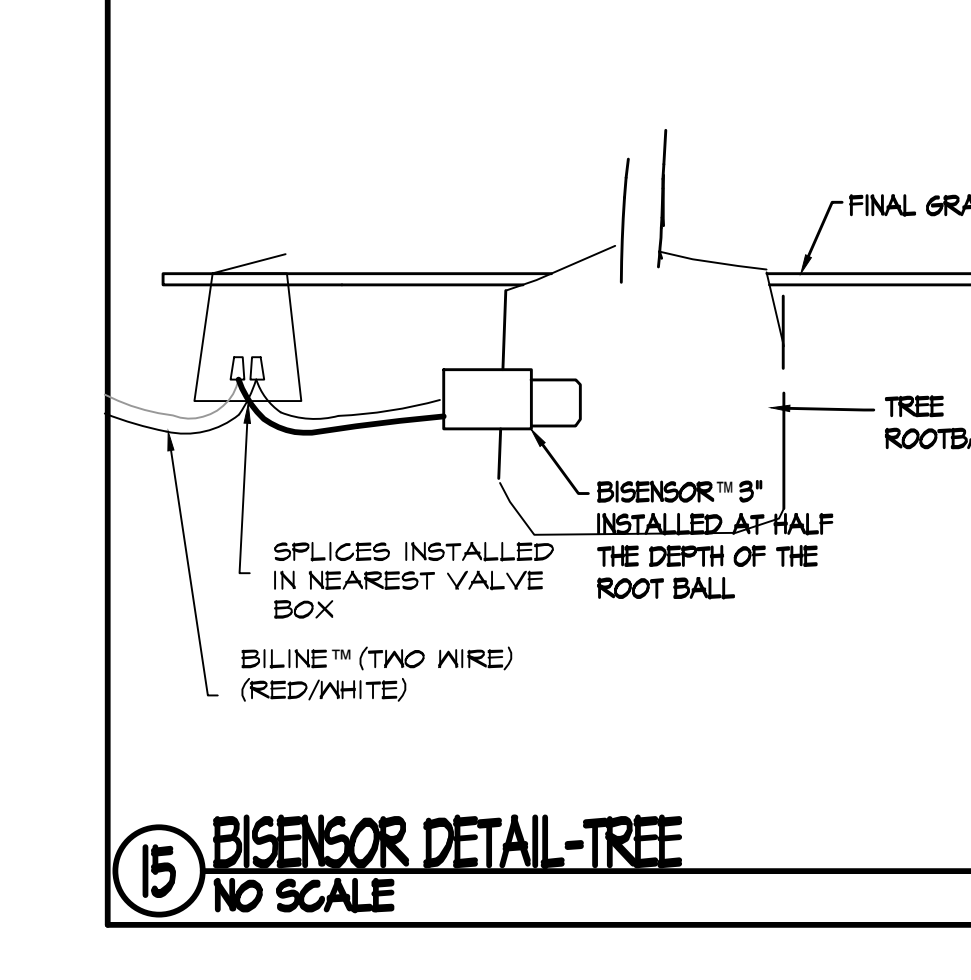
12 TRENCH AND WIRE DETAIL
NO SCALE



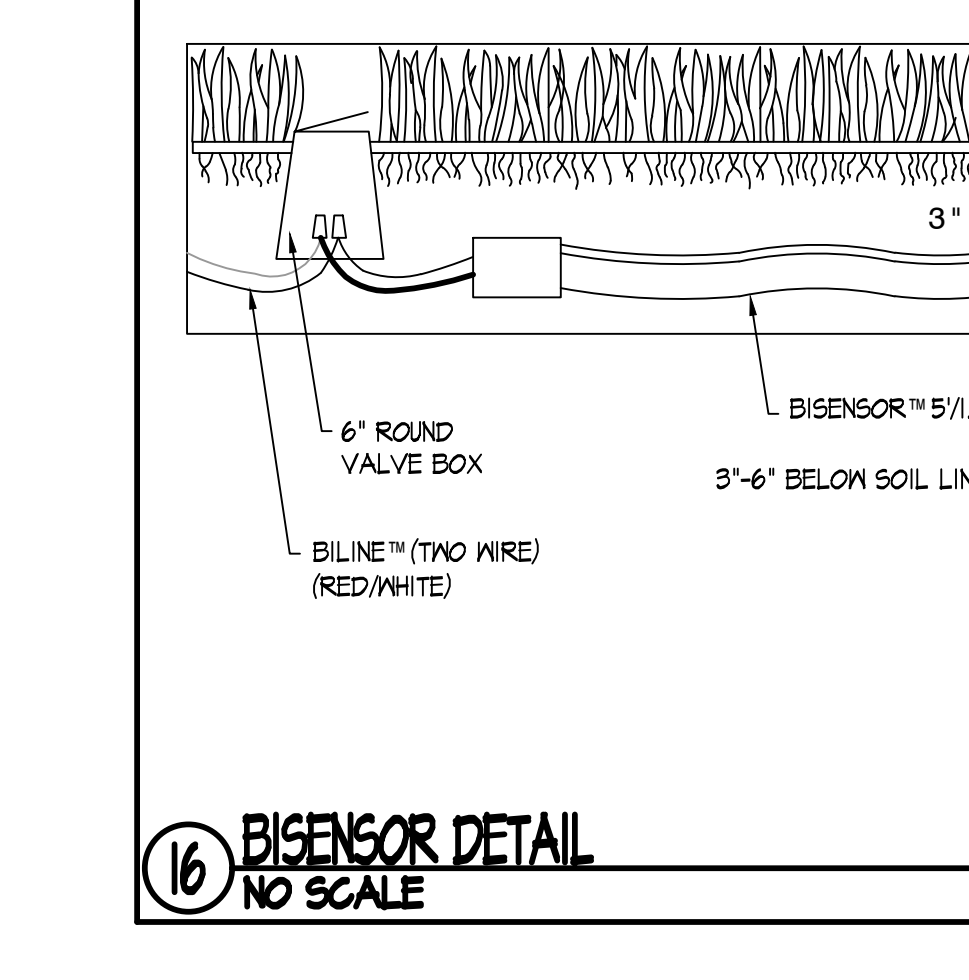
13 MASTER VALVE AND FLOW METER
NO SCALE



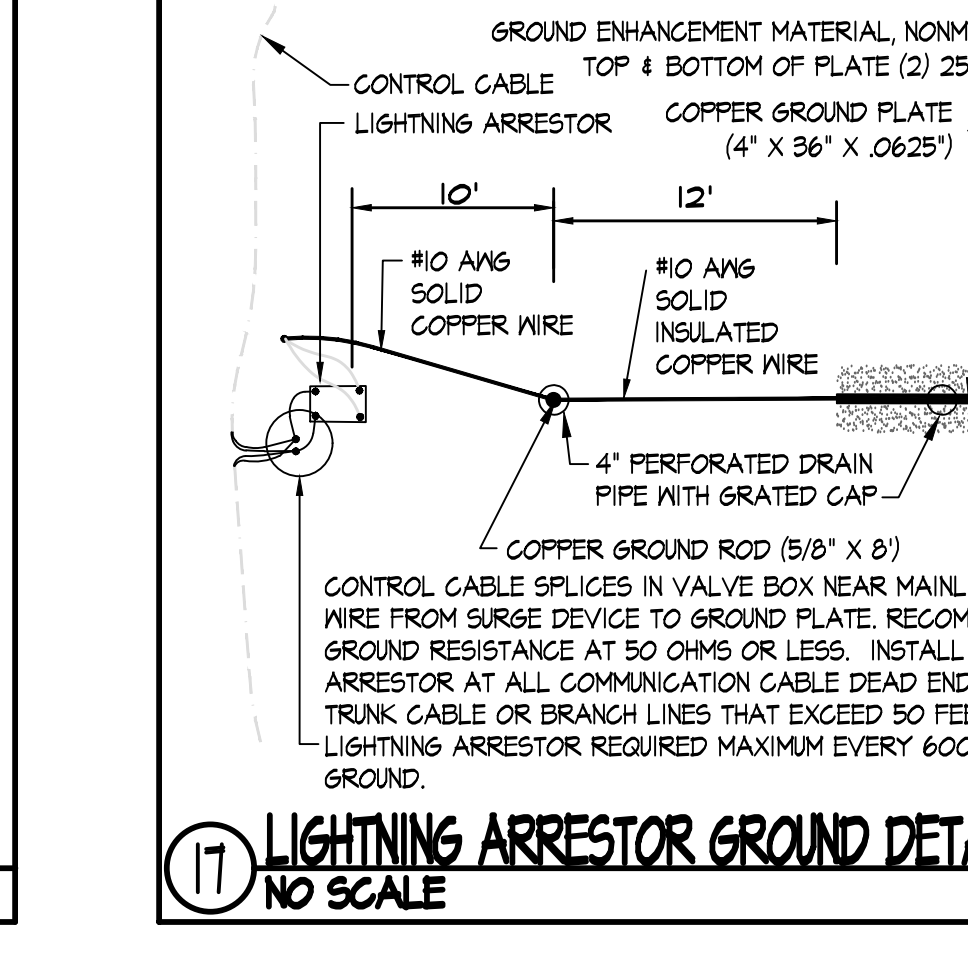
14 QUICK COUPLING VALVE AND ISOLATION VALVE DETAIL
NO SCALE



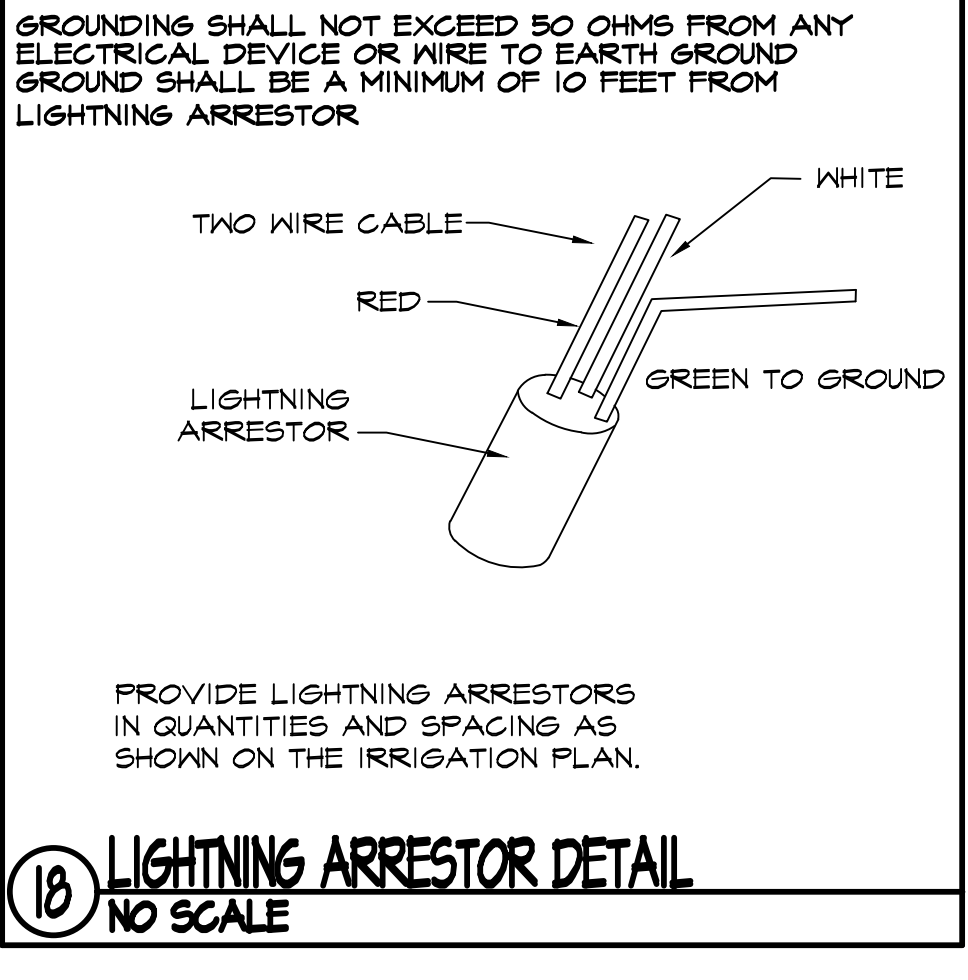
15 BISENSOR DETAIL - TREE
NO SCALE



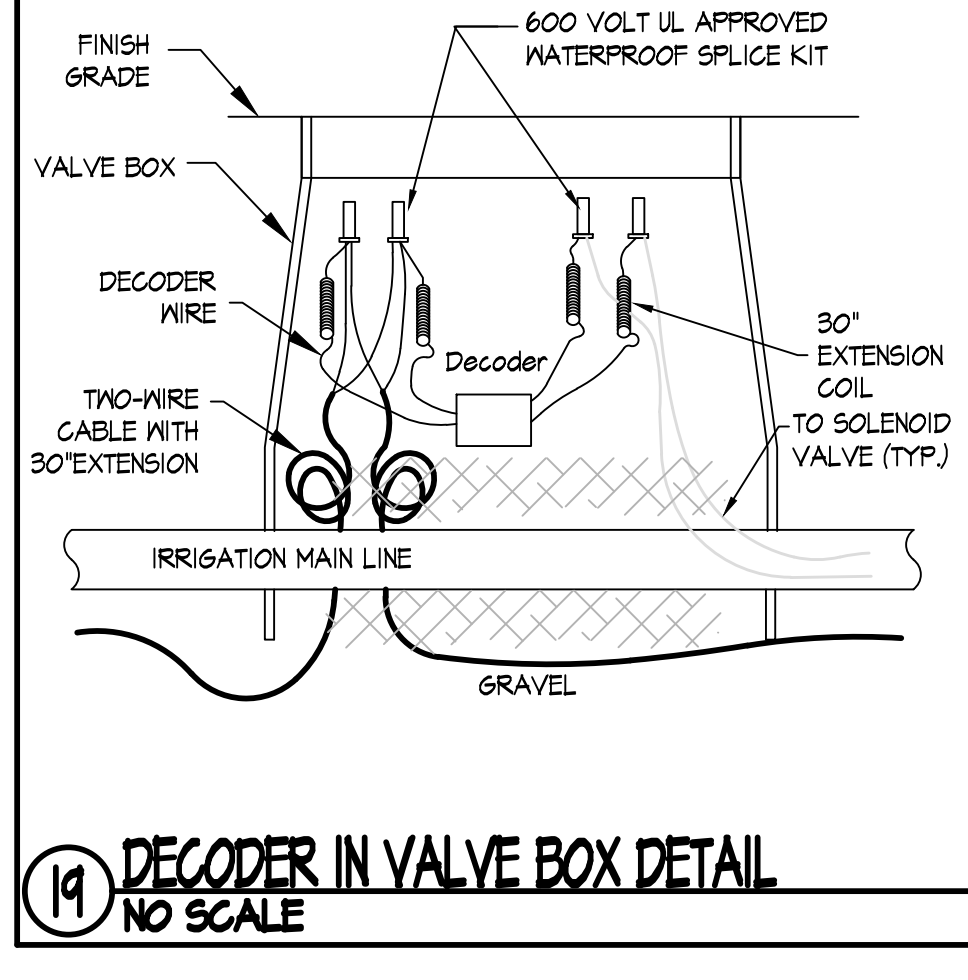
16 BISENSOR DETAIL
NO SCALE



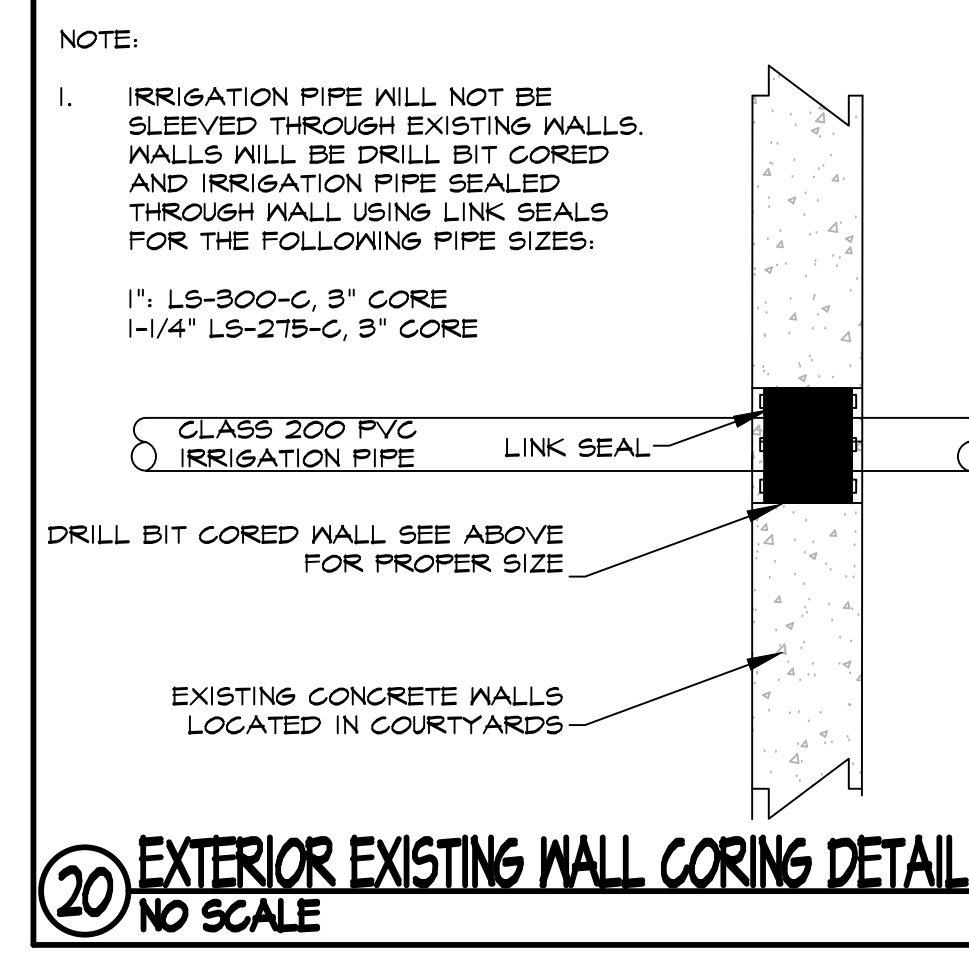
17 LIGHTNING ARRESTOR GROUND DETAIL
NO SCALE



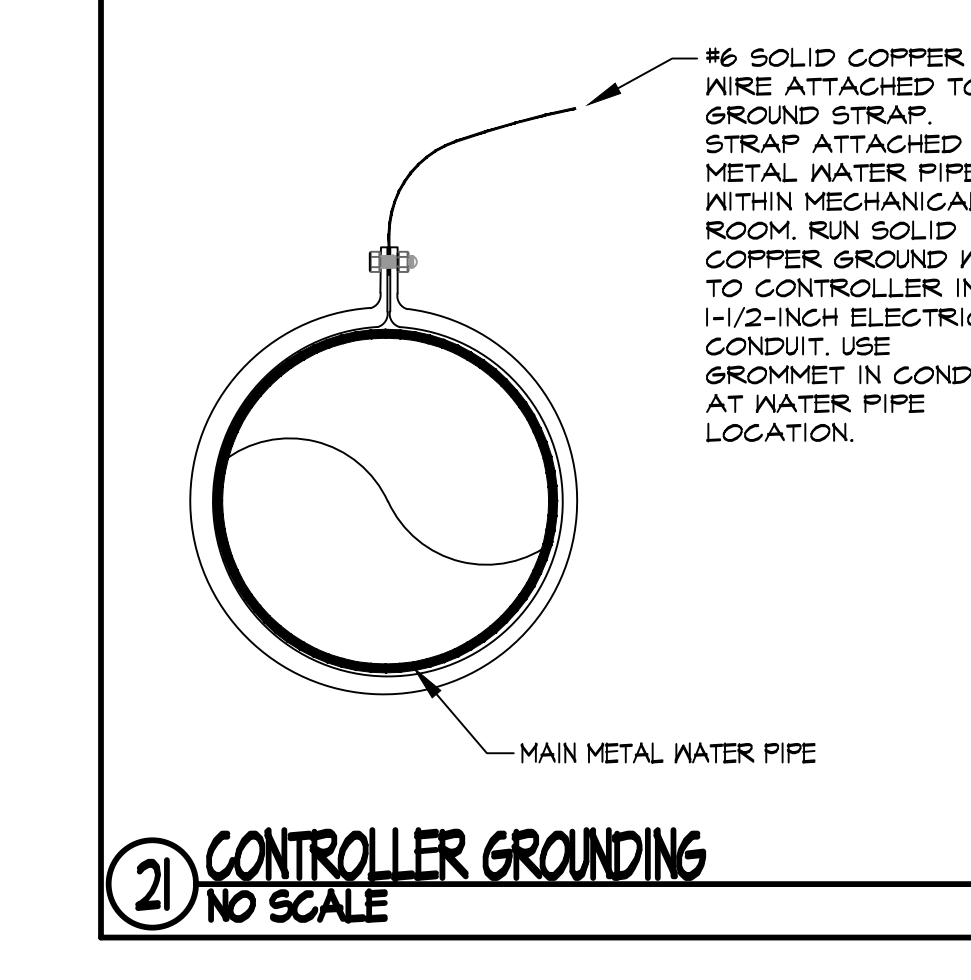
18 LIGHTNING ARRESTOR DETAIL
NO SCALE



19 DECODER IN VALVE BOX DETAIL
NO SCALE



20 EXTERIOR EXISTING WALL CORING DETAIL
NO SCALE



21 CONTROLLER GROUNDING
NO SCALE

