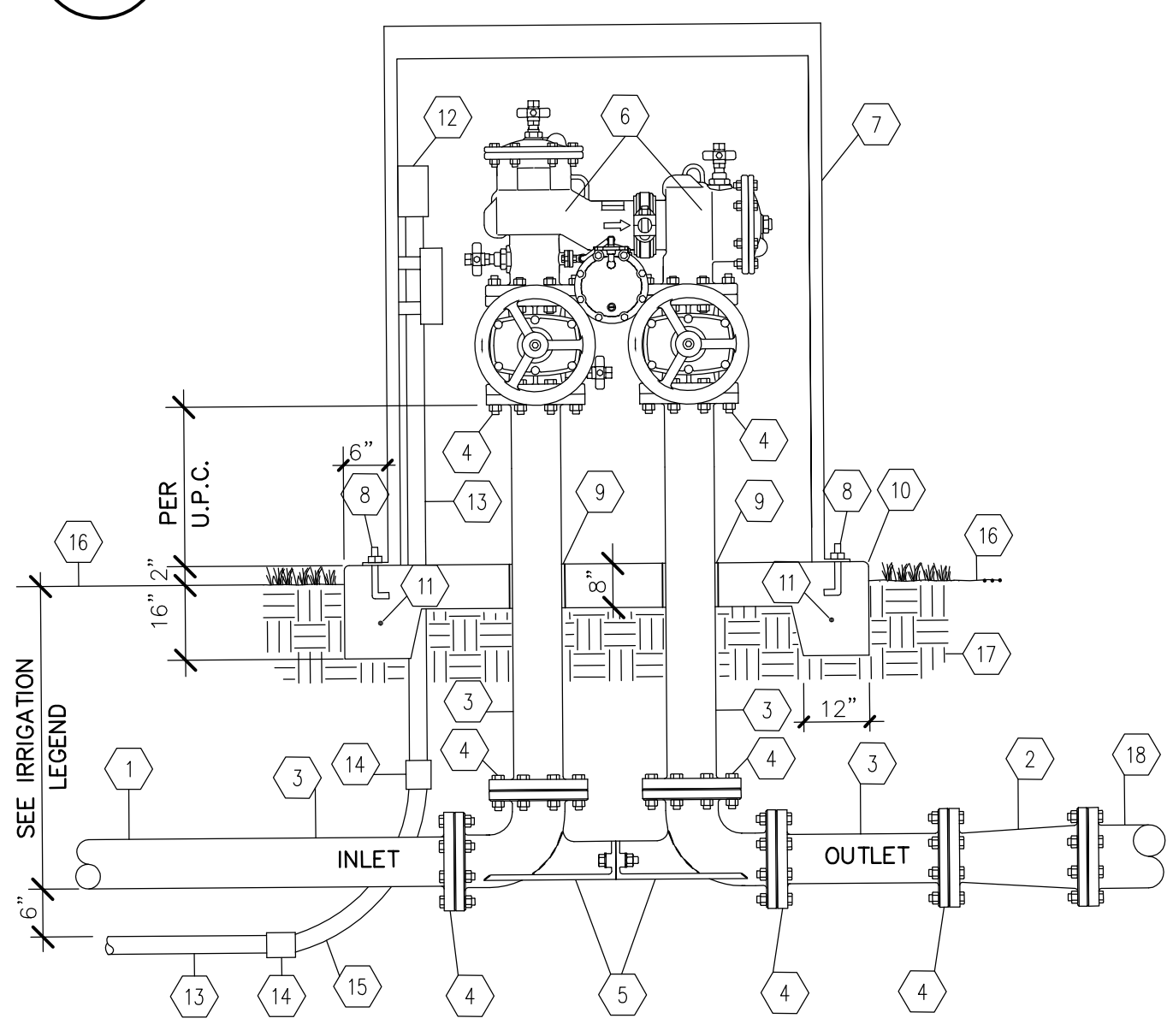


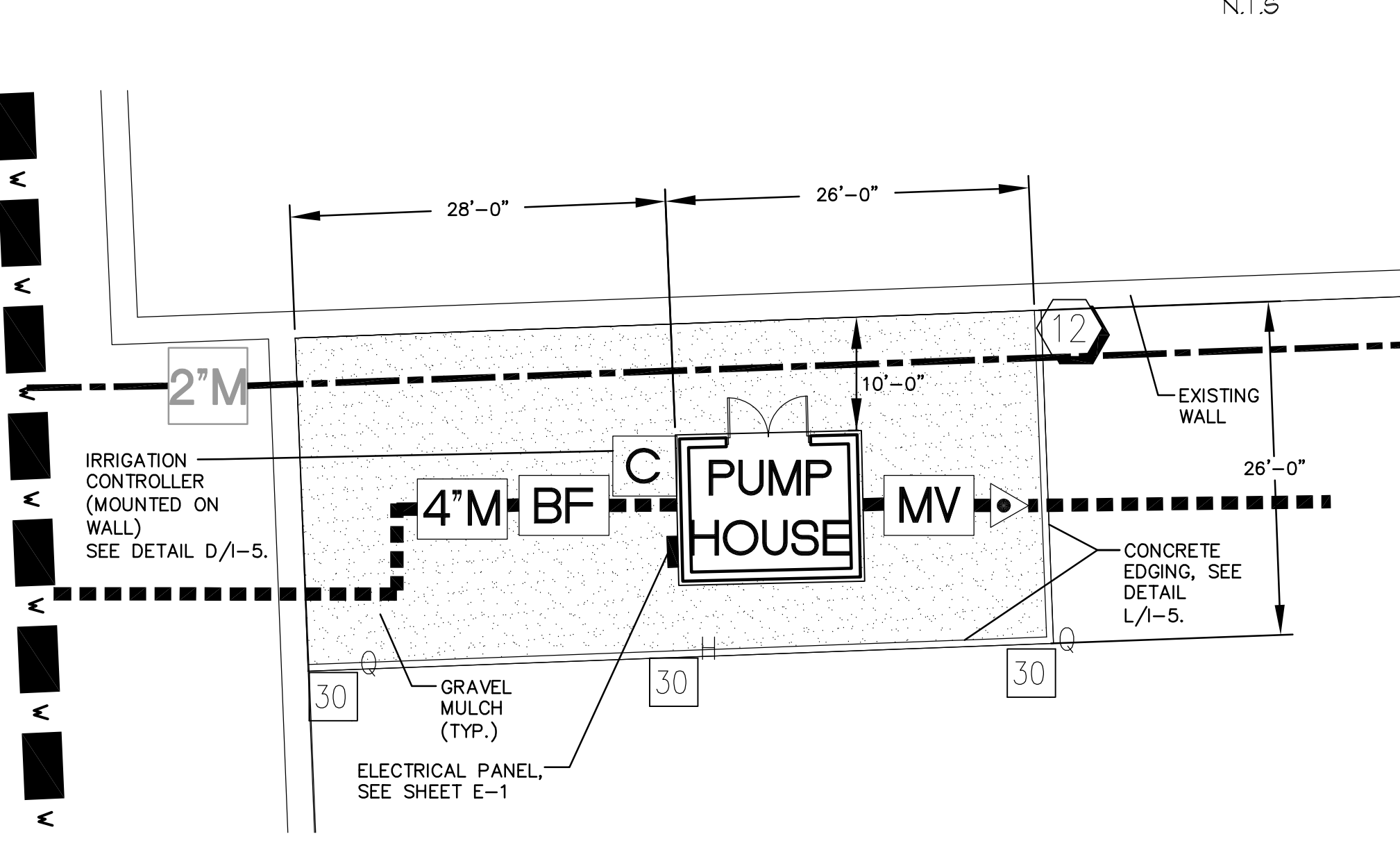
- GENERAL NOTES:**
- PUMP STATION SHALL BE AS DESCRIBED IN THE "PUMP STATION SPECIFICATIONS" AT RIGHT AND SHALL BE PROVIDED BY RAINBIRD CORPORATION (602) 725-5511, OR EQUAL, REFERENCE QUOTE CVM093009602C.
 - THIS DRAWING IS NOT TO BE USED FOR CONSTRUCTION. CONTACT FACTORY FOR CERTIFIED DRAWING.
 - CONCRETE SLAB SHALL BE CONSTRUCTED AS DETAILED ON SHEET A-1.

DUAL 5HP 280V THREE PHASE PUMP STATION



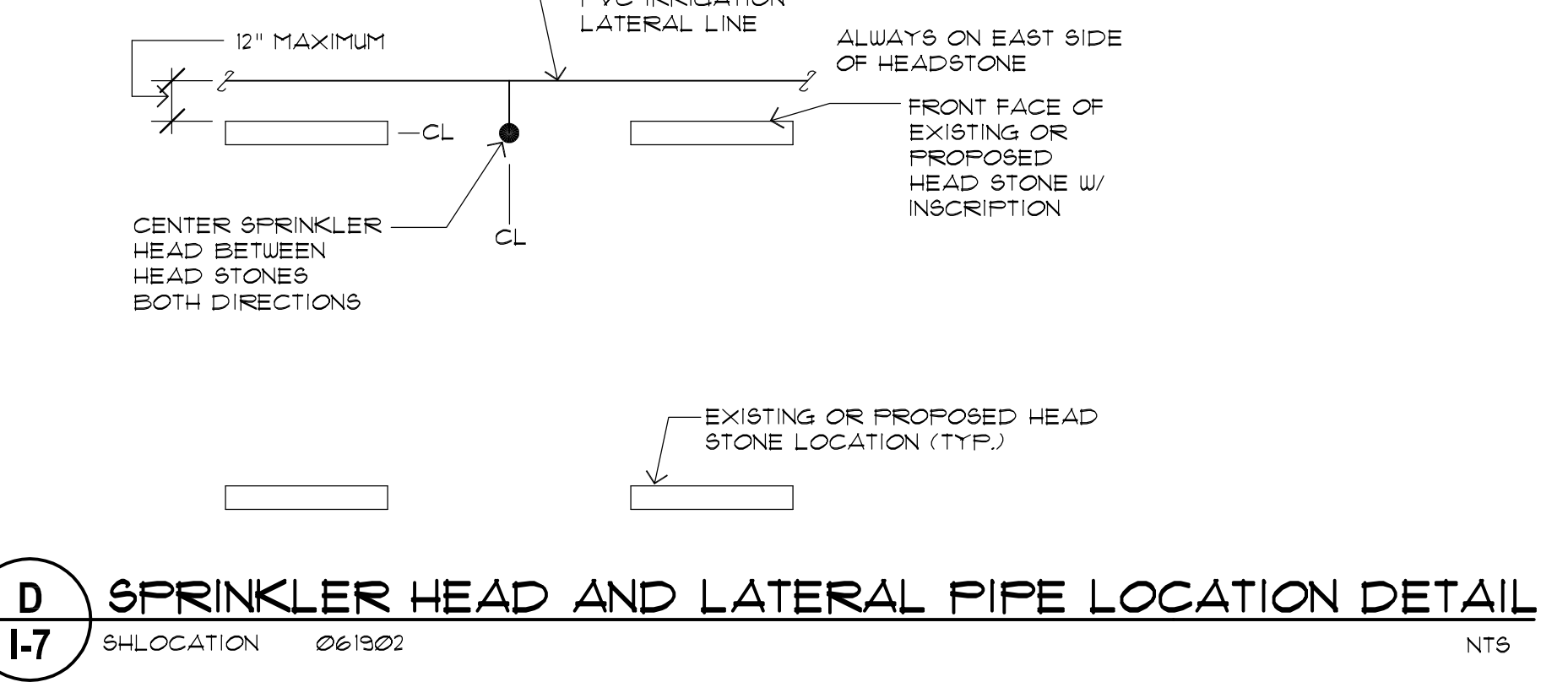
- DUCTILE IRON IRRIGATION MAINLINE, SIZE 4"
 - FLANGED DUCTILE IRON REDUCER - 4" TO 6"
 - DUCTILE IRON SPOOL PIECE WITH WELDED FLANGES, SIZE 4"
 - WELDED STEEL FLANGE, SIZE 4" WITH BOLT AND GASKET SET.
 - FEBCO MODEL 611 FLANGE X FLANGE VALVE SETTER, SIZE 4"
 - FEBCO 880/880V SERIES REDUCED PRESSURE BACKFLOW PREVENTER WITH NRS GATE VALVES, SIZE 4"
 - HOT BOX MODEL NO. HB4FEM, FIBER-GLASS INSULATED ENCLOSURE WITH 1000 WATT HEATER & BEIGE EXTERIOR.
 - 1/2" X 6" ANCHOR BOLTS (8 MINIMUM).
 - 1/2" FELT EXPANSION MATERIAL FORMED TO FIT PIPE.
 - 3000 PSI CONCRETE PAD, 8" THICK
 - #4 REBAR HORIZONTAL AND CONTINUOUS.
 - ELECTRICAL JUNCTION BOX (PER N.E.C.).
 - 3/4" ELECTRICAL CONDUIT (PER N.E.C.).
 - 3/4" ELECTRICAL COUPLING (PER N.E.C.).
 - 3/4" ELECTRICAL SWEET ELL. (PER N.E.C.).
 - FINISH GRADE
 - COMPACT SUB-GRADE TO 95% MODIFIED PROCTOR.
 - DUCTILE IRON IRRIGATION MAINLINE, SIZE 4".
- NOTE: ALL ELECTRICAL SHALL BE INSTALLED WITH RAIN TIGHT FITTINGS

REDUCED PRESSURE BACKFLOW PREVENTER



PUMP HOUSE AREA ENLARGEMENT

PUMP STATION SPECIFICATIONS			
BASIC INFORMATION			
Quote Number: CVM093009602C		Date: 10/5/2009	
Distributor Name: TBD		Job Name: Ft. Scott National Cemetery	
Distributor Contact: TBD		Job City: Ft. Scott	
Distributor Phone: TBD		Job State/Province: KS	
Distributor Email: TBD		Job Country: USA	
Rain Bird Sales Rep: Herb Hofmann		Sales Region: C	
PUMP STATION DETAILS			
Design Flow Rate:	200 GPM	Voltage:	208 V
Rated Discharge Pressure:	105 PSI	Phase:	3 P
Boost Pressure:	40 PSI	Hertz:	60 HZ
Suction Pressure:	65 PSI	Estimated Full Load Amps:	52 AMPS
		Apparent Power:	19 KVA
		Main Disconnect Size:	60 AMPS
		Pump Station Model Number:	XM20500208
PUMP STATION DESCRIPTION			
This quote is for a pre-fabricated pumping station designed to produce the rated discharge pressure from the Minimum Design Flow Rate up to the Maximum Design Flow Rate as per the Pump Station Details listed on this quote. Pumps for this application are designed for use in flooded suction, suction lift and boosting applications only. The main pumps of this packaged system are of a vertical multi-stage centrifugal type and are designed for indoor or outdoor applications.			
PUMP AND MOTOR DETAILS			
QTY.	SIZE	DESCRIPTION	
2	100 GPM	Vertical multistage inline main pumps with cast iron discharge heads	
	104 FEET	Includes silent check valve and isolation valves	
	CR20-2	Pump Model	
2	5 HP	Vertical main motors, 3450RPM, ODP/TEFC, NEMA B, Class F insulation, 1.15 SF, Cont. duty rated	
• Motor 1 is VFD started; Motor 2 is DOL			
MECHANICAL SYSTEM DETAILS			
QTY.	SIZE	DESCRIPTION	
1		Variable Frequency Drive [VFD] (Manufactured by Mitsubishi)	
1		Programmable Logic Controller [PLC] (Manufactured by Mitsubishi)	
1	GT1020	Monochrome Touch-screen operator interface (Manufactured by Mitsubishi)	
1		Circuit breaker motor protection	
1		NEMA 4 Electrical enclosure with interior panel light	
1		Liquid filled suction and discharge pressure gauges	
1		Discharge check valves, and pump station isolation valves	
1	4"	ANSI flanged discharge connection	
1	4"	ANSI flanged suction connection	
1		Green polyester based full surface powder coated steel piping and fittings for corrosion resistance	
CONTROL SYSTEM DETAILS			
QTY.	SIZE	DESCRIPTION	
1		Automatic pressure ramp-up capability (Standard)	
1		Electrical overload shutdown safety (Auto Restart Capability)	
1		VFD fault shutdown (Auto Restart Capability)	
1		Automatic system diagnostic utility (Standard)	
1		High pressure and low pressure discharge safeties (Auto Restart Capability)	
1		PLC emergency bypass - Manual mode (Standard)	
1		Heat exchanger for Variable Frequency Drive	
1		Individual motor low voltage, phase loss, and phase balance protection safeties (Optional Auto Restart Capability)	
1		Surge protection	
1		Low Pressure discharge alarm - Dry run protection	
1		Thermal sensor for overheating and shutdown	
1		Rain Bird Corporation guarantees its pump station products to be free of defects in materials and workmanship for a period of one (1) year from the date of startup, but not later than sixteen (16) months from the date of invoice.	



SPRINKLER HEAD AND LATERAL PIPE LOCATION DETAIL

RECORD DRAWINGS

Revisions

Date

URS

2020 K STREET, SUITE 300
Washington, DC 20006
TELEPHONE: (202) 872-0277
FAX: (202) 872-0282
• Civil Engineers
• Architects & Landscape Architects
• Structural Engineers
• Mechanical, Electrical & Plumbing Engineers

GREER STAFFORD SJCF

MORROW REARDON WILKINSON MILLER, LTD.
LANDSCAPE ARCHITECTS
210 La Veta NE, Albuquerque, NM 87108
505.265.2259 FAX 505.265.9837
mrw@mrmwm.com

NATIONAL CEMETERY ADMINISTRATION

Drawing Title

IRRIGATION DETAILS

Project Title

FORT SCOTT NATIONAL CEMETERY

Date

JULY 14, 2011

Project No.

893-CM3-011

Approved: Director, Memorial Service Network

Building Number

Checked DCW

Drawn AD

Approved: Director, Office of Construction Management

Location

FORT SCOTT NATIONAL CEMETERY
FORT SCOTT, KANSAS

DRAWING NO.

I-7

Dwg. 12 of 14