

Agenda Item: 7.

MEMORANDUM

TO: Programs, Projects and Operations Subcommittee

FROM: Martin P. Cleveland, Construction Engineer

SUBJECT: Union Dike Trench Drain Repair Project

DATE: January 26, 2018

The Union Dike Trench Drain Repair Project is located between Valley and Fremont, Nebraska, as shown on the enclosed location map. The project consists of replacing 261 linear feet of deficient trench drain outlet pipe (e.g. cracked and deformed polyethylene pipe); and 2,092 linear feet of deficient trench drain pipe located in the landside slope of Union Dike. The trench drains were installed in 1989, as part of the Union Dike Levee Improvement Project to provide stability and underseepage relief for the levee during high river stages.

On January 25, 2018, the District opened bids for the Union Dike Trench Drain Repair Project. The 7 bids ranged from \$103,560 to \$ 219,525. The apparent low bid of \$103,560 was submitted by Niewohner Construction, Inc. Enclosed is a bid summary.

The Engineer's estimate of the cost of the Union Dike Trench Drain Repair Project is \$239,691.00.

Management recommends that the Programs, Projects and Operations Subcommittee recommend to the Board of Directors that the General Manager be authorized to execute a contract with Niewohner Construction, Inc. in the amount of \$103,560 for the construction of the Union Dike Trench Drain Repair Project, subject to changes deemed necessary by the General Manager and approval as to form by District Legal Counsel.

BID SUMMARY

Union Dike Trench Drain Repair NRD Project No. 528-2018

Opening Date: January 25, 2018

Opening Time: 1:00 p.m.

BIDDERS:				General Excavating		Bayshore Contractors		Niewohner Const.		Thompson Const.	
Item No.	Description	Estimated Quantity	Unit	Unit Price \$/LS or LF	Bid Price	Unit Price \$/LS or LF	Bid Price	Unit Price \$/LS or LF	Bid Price	Unit Price \$/LS or LF	Bid Price
1	MOBILIZATION	1	LS	10,000	10,000	19,184.02	19,184.02	15,000	15,000	25,000	25,000
2	12" TRENCH DRAIN OUTLET	261	LF	47	12,267	130	33,930	56	14,616	125	32,625
3	8" TRENCH DRAIN	2092	LF	44	92,048	35.86	75,028.78	32	66,944	75	156,900
4	8" TRENCH DRAIN PIPE	200	LF	20	4,000	32.91	6,582	35	7,000	25	5,000
5	TOTAL OF BID PRICE = 1+2+3	X	X		114,315		128,142.80		96,560		214,525
6	TOTAL OF BID PRICE = 1+2+3+4	X	X		118,315		134,724.80		103,560 *		219,525
7	BID BOND (Y OR N)				Y		Y		Y		Y

BIDDERS:				Valley Corp		Sibbersen Excavating		PSC Construction		Engineer's Estimate	
Item No.	Description	Estimated Quantity	Unit	Unit Price \$/LS or LF	Bid Price	Unit Price \$/LS or LF	Bid Price	Unit Price \$/LS or LF	Bid Price	Unit Price \$/LS or LF	Bid Price
1	MOBILIZATION	1	LS	10,881.94	10,881.94	5,000	5,000	15,000	15,000	20,000	20,000
2	12" TRENCH DRAIN OUTLET	261	LF	79.34	20,707.74	83.72	21,850.92	64	16,704	77	20,097
3	8" TRENCH DRAIN	2092	LF	39.49	82,613.08	83.72	175,142.24	60	125,520	94.50	197,694
4	8" TRENCH DRAIN PIPE	200	LF	40.59	8,118.00	8.65	1,730	10	2,000	9.50	1,900
5	TOTAL OF BID PRICE = 1+2+3	X	X		114,202.76		201,993.16		157,224		237,791
6	TOTAL OF BID PRICE = 1+2+3+4	X	X		122,320.76		203,723.16		159,224		239,691
7	BID BOND (Y OR N)				Y		Y		Y		

*** MANAGEMENT RECOMMENDATION**



Example Area Map

UNION DIKE TRENCH DRAIN OUTLETS

A1 - A6

FIGURE 2A STATION 122+45 - 151+05





PHOTO 6 - VIEW OF OUTLET A4 - PIPE CRIMPING/BUCKLING



PHOTO 7 - VIEW OF OUTLET A4 - PIPE OUT OF ROUND



Photos - Outlet A4
Union Dike -
Investigation of Trench Drain Outlets
Valley, Nebraska

Example Photos

DATE
 SEPTEMBER 2016

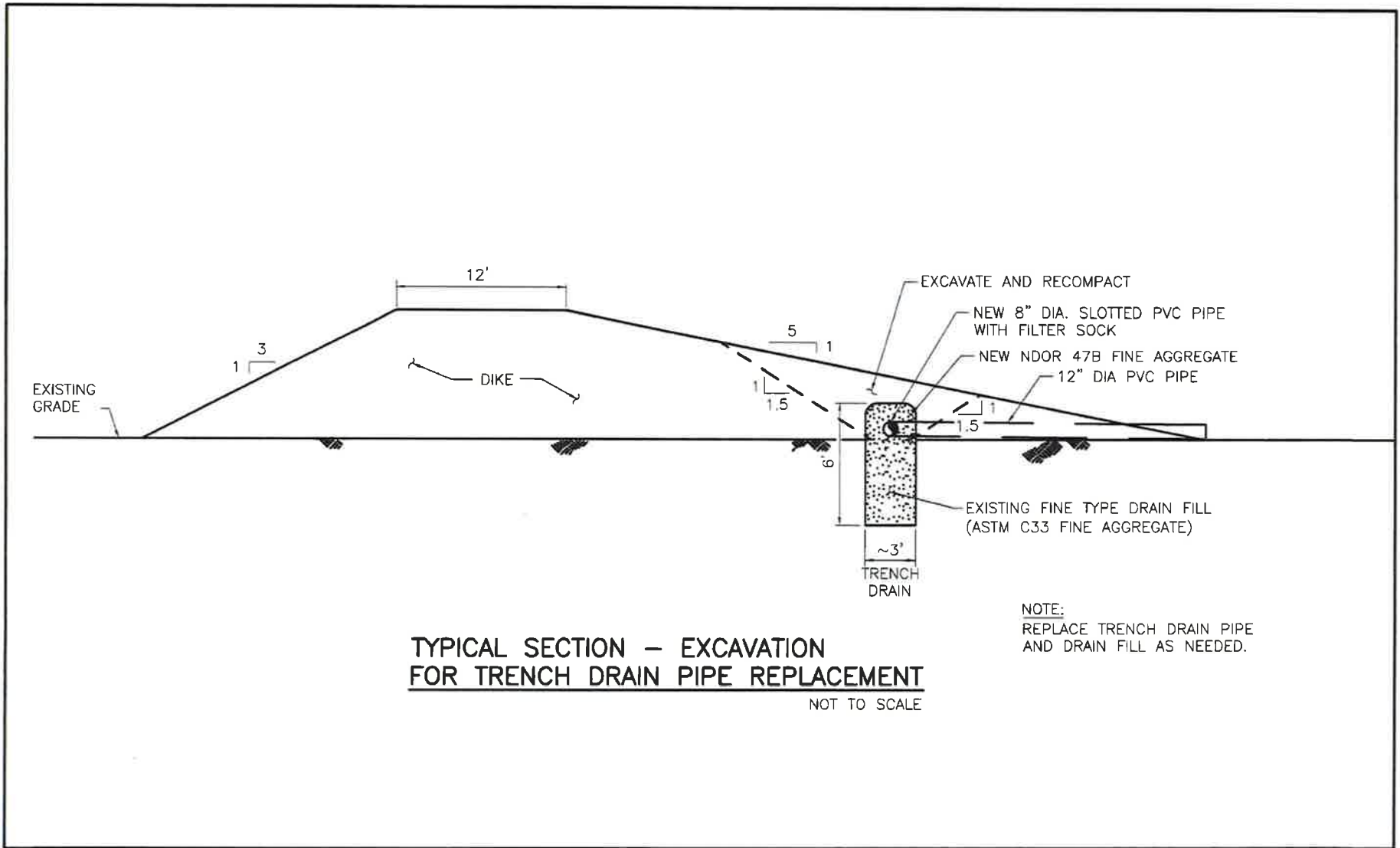
FIGURE

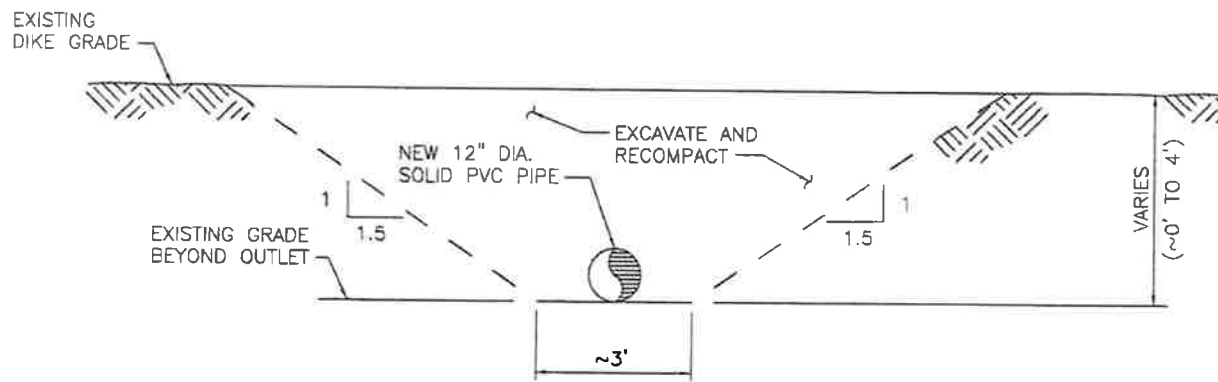


PHOTO 26 - VIEW OF TRENCH DRAIN SOUTHEAST OF OUTLET D1 - PIPE BUCKLED/COLLAPSED



PHOTO 27 - VIEW OF TRENCH DRAIN SOUTHEAST OF OUTLET D1 - PIPE BUCKLED/COLLAPSED





TYPICAL SECTION – EXCAVATION
FOR OUTLET PIPE REPLACEMENT

NOT TO SCALE



Excavation for Outlet Pipe Replacement

**Union Dike -
Investigation of Trench Drains and Outlets**

Valley, Nebraska

DATE

JAN. 2017

FIGURE

3