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DATE:
FILE:

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	SINGLE BOX CULVERTS		
SCC-MD	Cast-In-Place Miscellaneous Details	CD-SCC-21.dgn	(2 Sheets)
◩ SCC-3 & 4	C-I-P 3' & 4' Span Boxes	CD-SCC34-21.dgn	(2 Sheets)
◩ SCC-5 & 6	C-I-P 5' & 6' Span Boxes	CD-SCC56-21.dgn	(2 Sheets)
◩ SCC-7	C-I-P 7' Span Boxes	CD-SCC07-21.dgn	(2 Sheets)
◩ SCC-8	C-I-P 8' Span Boxes	CD-SCC08-21.dgn	(2 Sheets)
◩ SCC-9	C-I-P 9' Span Boxes	CD-SCC09-21.dgn	(2 Sheets)
◩ SCC-10	C-I-P 10' Span Boxes	CD-SCC10-21.dgn	(3 Sheets)
SCP-MD	Precast Miscellaneous Details	CD-SCP-MD-20.dgn	
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MC-MD	Cast-In-Place Miscellaneous Details	CD-MC-MD-20.dgn	
MC-3-23	C-I-P 3' Spans for Lengthening	CD-MC323-20.dgn	(2 sheets)
MC-4-23	C-I-P 4' Spans for Lengthening	CD-MC423-20.dgn	(2 sheets)
MC-5-20	C-I-P 5' Spans thru 20' Fill	CD-MC520-20.dgn	(2 sheets)
MC-5-23	C-I-P 5' Spans thru 23' Fill	CD-MC523-20.dgn	(2 sheets)
MC-6-16	C-I-P 6' Spans thru 16' Fill	CD-MC616-20.dgn	(2 sheets)
MC-6-20	C-I-P 6' Spans thru 20' Fill	CD-MC620-20.dgn	(2 sheets)
MC-6-23	C-I-P 6' Spans thru 23' Fill	CD-MC623-20.dgn	(2 sheets)
MC-7-10	C-I-P 7' Spans thru 10' Fill	CD-MC710-20.dgn	(2 sheets)
MC-7-16	C-I-P 7' Spans thru 16' Fill	CD-MC716-20.dgn	(2 sheets)
MC-7-20	C-I-P 7' Spans thru 20' Fill	CD-MC720-20.dgn	(2 sheets)
MC-7-23	C-I-P 7' Spans thru 23' Fill	CD-MC723-20.dgn	(2 sheets)
MC-8-13	C-I-P 8' Spans thru 13' Fill	CD-MC813-20.dgn	(2 sheets)
MC-8-16	C-I-P 8' Spans thru 16' Fill	CD-MC816-20.dgn	(2 sheets)
MC-8-20	C-I-P 8' Spans thru 20' Fill	CD-MC820-20.dgn	(2 sheets)
MC-8-23	C-I-P 8' Spans thru 23' Fill	CD-MC823-20.dgn	(2 sheets)
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MC-9-13	C-I-P 9' Spans thru 13' Fill	CD-MC913-20.dgn	(2 sheets)
MC-9-16	C-I-P 9' Spans thru 16' Fill	CD-MC916-20.dgn	(2 sheets)
MC-9-20	C-I-P 9' Spans thru 20' Fill	CD-MC920-20.dgn	(2 sheets)
MC-9-23	C-I-P 9' Spans thru 23' Fill	CD-MC923-20.dgn	(2 sheets)
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MC-10-10	C-I-P 10' Spans thru 10' Fill	CD-MC1010-20.dgn	(2 sheets)
MC-10-13	C-I-P 10' Spans thru 13' Fill	CD-MC1013-20.dgn	(2 sheets)
MC-10-16	C-I-P 10' Spans thru 16' Fill	CD-MC1016-20.dgn	(2 sheets)
MC-10-20	C-I-P 10' Spans thru 20' Fill	CD-MC1020-20.dgn	(2 sheets)
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ECD	Ext Curb Details from 1' to 5'	CD-ECD-20.dgn	
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BCS	Supplement Wing & End Treatment	CD-BCS-20.dgn	
	Example for BCS	CD-EX-BCS-20.dgn	
SW-0	Straight Wings for 0 Degree Skew	CD-SW0-20.dgn	
FW-0	Flared Wings for 0 Degree Skew	CD-FW0-20.dgn	
FW-S	Flared Wings for Skews	CD-FWS-20.dgn	
PW	Parallel Wings Skewed/Non Skew	CD-PW-20.dgn	
	CONCRETE HEADWALLS FOR PIPE CULVERTS		
CH-FW-0	Flared Wings for 0 Degree Skew	CD-CH-FW0-20.dgn	
CH-FW-15	Flared Wings for 15 Degree Skew	CD-CH-FW15-20.dgn	
CH-FW-30	Flared Wings for 30 Degree Skew	CD-CH-FW30-20.dgn	
CH-FW-45	Flared Wings for 45 Degree Skew	CD-CH-FW45-20.dgn	
CH-FW-A-0	Flared Wings Arch Pipe 0 Degree	CD-CH-FWA0-20.dgn	
CH-FW-A-15	Flared Wings Arch Pipe 15 Degree	CD-CH-FWA15-20.dgn	
CH-FW-A-30	Flared Wings Arch Pipe 30 Degree	CD-CH-FWA30-20.dgn	
CH-FW-A-45	Flared Wings Arch Pipe 45 Degree	CD-CH-FWA45-20.dgn	
CH-PW-0	Parallel Wings Non Skewed	CD-CH-PW0-20.dgn	
CH-PW-S	Parallel Wings Skewed	CD-CH-PWS-20.dgn	
CH-PW-A-0	Parallel Wings Arch Pipe Non Skew	CD-CH-PWA0-20.dgn	
CH-PW-A-S	Parallel Wings Arch Pipe Skewed	CD-CH-PWAS-20.dgn	

Standard	Description	File Name	
	SAFETY END TREATMENT FOR BOX CULVERTS		
SETB-CD	Cross Drainage - Headwall 7' Max	CD-SETBCD-20.dgn	(2 Sheets)
◐ SETB-PD	Parallel Drainage - Headwall 7' Max	CD-SETBPD-22.dgn	(2 sheets)
SETB-SW-0	Straight Wings 0 Degree Skew C/D	CD-SETB-SW0-20.dgn	(3 sheets)
	Example Calc for SETB-SW-0	CD-EX-SETB-SW0-20.dgn	(2 sheets)
SETB-FW-0	Flared Wings 0 Degree Skew C/D	CD-SETB-FW0-20.dgn	(3 sheets)
	Example Calc for SETB-FW-0	CD-EX-SETB-FW0-20.dgn	(2 sheets)
SETB-FW-S	Flared Wings 15, 30 Degree Skew C/D	CD-SETB-FWS-20.dgn	(3 sheets)
	Example Calc for SET-FW-S	CD-EX-SETB-FWS-20.dgn	(2 sheets)
SETBR	Retrofit Details for Existing	CD-SETBR-20.dgn	
	SAFETY END TREATMENT FOR PIPE CULVERTS		
SETP-CD	Cross Drainage for 12" - 60" Diameter	CD-SETP-CD-20.dgn	(2 sheets)
SETP-PD	Parallel Drainage for 12" - 72" Diameter	CD-SETP-PD-20.dgn	
SETP-CD-A	Cross Drainage for Design 1 - 7 Arch	CD-SETP-CDA-20.dgn	(3 sheets)
SETP-PD-A	Parallel Drainage for Design 1 - 9 Arch	CD-SETP-PDA-20.dgn	(2 sheets)
SETP-FW-0	Flared Wings 0 Degree Skew C/D Round	CD-SETP-FW0-20.dgn	(3 sheets)
SETP-FW-15	Flared Wings 15 Degree Skew C/D Round	CD-SETP-FW15-20.dgn	(3 sheets)
SETP-FW-30	Flared Wings 30 Degree Skew C/D Round	CD-SETP-FW30-20.dgn	(3 sheets)
SETP-FW-A-0	Flared Wings 0 Skew C/D Arch	CD-SETP-FWA0-20.dgn	(3 sheets)
SETP-FW-A-15	Flared Wings 15 Skew C/D Arch	CD-SETP-FWA15-20.dgn	(3 sheets)
SETP-FW-A-30	Flared Wings 30 Skew C/D Arch	CD-SETP-FWA30-20.dgn	(3 sheets)
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◆ PSET-SP	Precast End Treatment P/D Sq	CD-PSET-SP-21.dgn	
◩ PSET-RC	Precast End Treatment C/D Round	CD-PSET-RC-20.dgn	
PSET-RP	Precast End Treatment P/D Round	CD-PSET-RP-20.dgn	
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GS-ES-CD	Galvanized Steel End 12" - 60" Diameter C/D	CD-GSES-CD-20.dgn	(2 sheets)
GS-ES-PD	Galvanized Steel End 12" - 60" Diameter P/D	CD-GSES-PD-20.dgn	(2 sheets)
	STOCK PASS		
SP	Livestock Pass Under Roadway	CD-SP-20.dgn	
	INLET & DRAINS		
◭ CCO	Cast-In-Place Curb Inlet Outside Roadway	CD-CCO-23.dgn	(4 sheets)
IL-S	Sloping Inlet Type S with Grate	CD-IL-20.dgn	
SD	Roadway Slotted Drain	CD-SD-20.dgn	(2 sheets)
BD-1	Bridge Drain Details (Cast)	CD-BD1-20.dgn	
BD-2	Bridge Drain Details (Welded)	CD-BD2-20.dgn	(2 sheets)
BD-3	Bridge Drain Details (Welded) with Cast Options	CD-BD3-20.dgn	(2 sheets)
	PRECAST INLETS & MANHOLES		
PB	Precast Base	CD-PB-20.dgn	
	Example of PB Reducing Slab & Reduced Riser Sizes	CD-EX-PB-20.dgn	
◒ PBGC	Pipe and Box Grouted Connections	CD-PBGC-24.dgn	
PJB	Precast Junction Box	CD-PJB-20.dgn	
PDD	Design Data for PB and PJB	CD-PDD-20.dgn	
▲ PRM	Precast Round Manhole	CD-PRM-23.dgn	
◭ PCO	Precast Curb Inlet Outside Roadway	CD-PCO-23.dgn	(2 sheets)
◭ CGT-PCO	Curb & Gutter Transition Details for PCO Inlet	CD-CGT-PCO-23.dgn	
◭ PCU	Precast Curb Inlet Under Roadway	CD-PCU-23.dgn	(2 sheets)
◭ CGT-PCU	Curb & Gutter Transition Details for PCU Inlet	CD-CGT-PCU-23.dgn	
PSL	Precast Slab Lid	CD-PSL-20.dgn	(2 sheets)
	Example of PSL Styles and Sizes	CD-EX-PSL-20.dgn	
POD	Precast Overpass Drain	CD-POD-20.dgn	
PMBD	Precast Median Barrier Drain	CD-PMBD-20.dgn	(2 sheets)
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PAZD-CZ	Precast Area Zone Drain within Clear Zone	CD-PAZD-CZ-20.dgn	
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◒	Thermoplastic Pipe Installation	CD-TPI-24.dgn	
	BRIDGE RAIL ANCHORAGE DETAILS		
RAC	Box Culvert Rail Mounting Details	CD-RAC-20.dgn	(2 sheets)
RAC-R	Retro Guide for Box Culverts with Curbs 2' & less	CD-RAC-R-20.dgn	(2 sheets)
T631-CM	Mounting Details for T631 & T631LS Rails	CD-T631-CM-20.dgn	

Note: 1. An Excel 2010 spreadsheet to assist in filling out the following standards can be downloaded from the Bridge Standards web page on the TxDOT web site:
BCS
SETB-SW-0 (Sheet 3 of 3)
SETB-FW-0 (Sheet 3 of 3)
SETB-FW-S (Sheet 3 of 3)

2. A Type II Safety End Treatment Guide for Pipe Culverts can be downloaded from the Bridge Standards web page on the TxDOT web site.

3. A Guide to the Standard Inlet and Manhole Program and Approved Cast Iron Product Sheets for Precast Inlets and Manholes can be downloaded from the Bridge Standards web page on the TxDOT web site.

A list of bridge standards with revision dates or original drawing dates can be printed or downloaded from the Bridge Standards web page on the TxDOT web site.

Issue date of standards - February 2020
◩ Revision date of standards - April 2021
◆ Revision date of standards - December 2021
◐ Revision date of standards - June 2022
▲ Revision date of standards - March 2023
◭ Revision date of standards - June 2023
◒ Revision and issue date of standards - June 2024

Texas Department of Transportation

Bridge Division Standard

CULVERT AND DRAINAGE STANDARDS

FILE: RL-Table-24.dgn	DN: TxDOT	CK: TxDOT	DW: TxDOT	CK: TxDOT
©TxDOT	CONT	SECT	JOB	HIGHWAY
REVISIONS				
	DIST	COUNTY		SHEET NO.