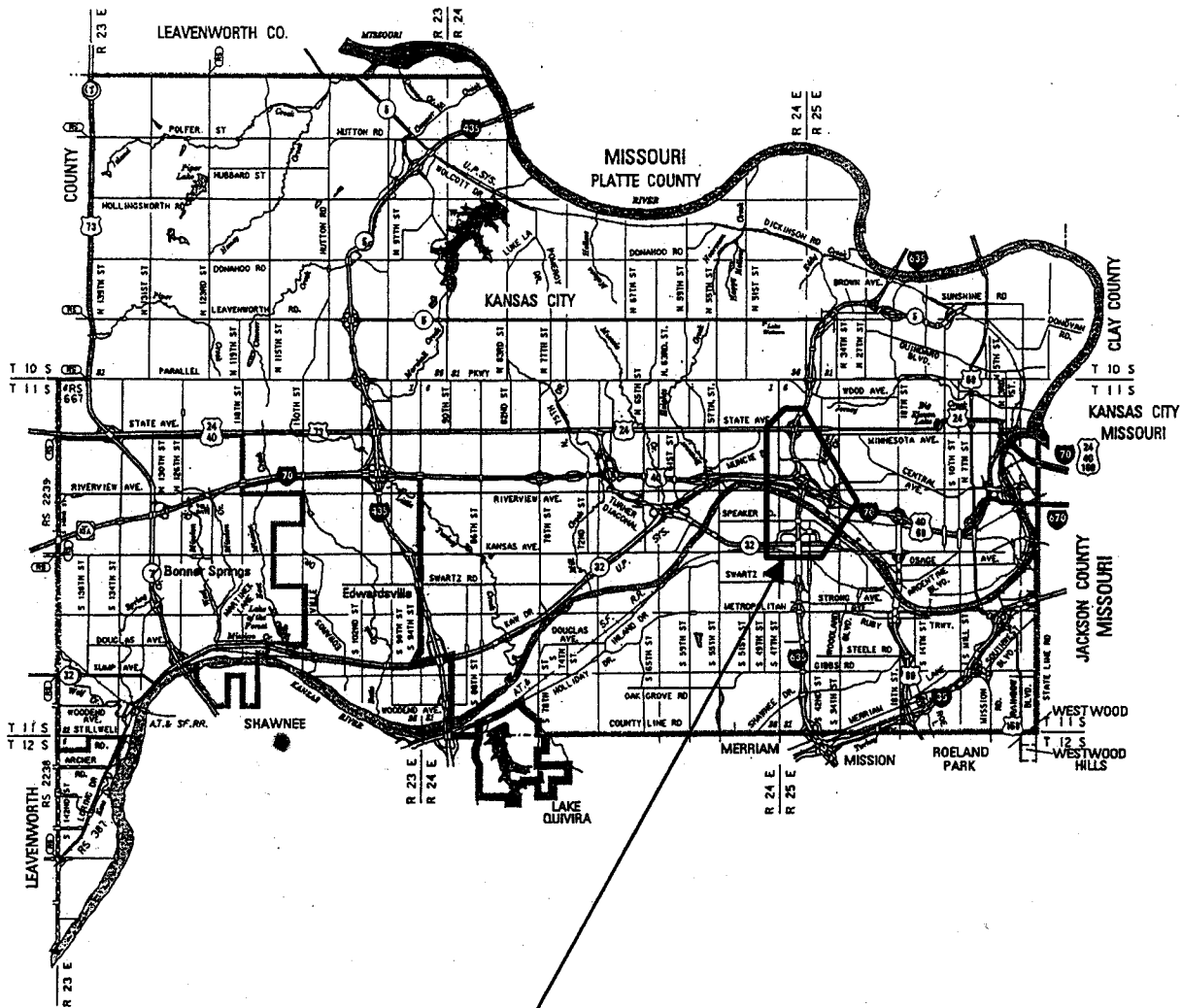


SW 7-11-25E

70 over 435
CD1



Project No. 635-105 K-4890-01
From the junction with K-32, north to
0.5 kilometer north of the junction with US-24

Project No. 70-105 K-4890-02
From 19.399 kilometers east of the Leavenworth/
Wyandotte County Line, east 2.113 kilometers

Wyandotte County



KANSAS DEPARTMENT OF TRANSPORTATION

ROUTE-COUNTY NO. 70-105	SOUNDING NO. CDN01	SHEET 1 OF 1
BRIDGE STA. 2+015.655	PROJECT NO. K-4890-02	BRIDGE NO. 70-105-12.5(15C)WB
DESCRIPTION BR 156 W. Bd I-70 OVER S. Bd. I-635		HOLE STA. 1+599.10, 22m R+BL
GEOLOGIST R. RYAN	VERTICLE SCALE	DATE JANUARY 3, 2001
DRILLER J. BURNS	RIG CME-55	ELEVATION TOP OF HOLE 250.41
GROUND WATER ELEV.	TOTAL DEPTH OF HOLE 18.90 m	ELEVATION TOP OF ROCK 249.40

BIT TYPE & NO.	GEOLOGIC NAME	STRATIGRAPHIC COLUMN	DEPTH	ELEVATION IN METERS	CLASSIFICATION OF MATERIALS DESCRIPTION AND REMARKS	UNCONFINED COMPRESSION	STANDARD PENETRATION OR CASING DRIVE	
							BLOWS	ELEV.
	SHALE				TOP HOLE ELEV. = 250.41			
			1.01	250	249.40 CLAY. DARK GRAY TO DARK GRAY-BROWN. SANDY. W/SCATTERED GRASS	74,076.9		249.10
	DRUM FM.			248	LIMESTONE, BROWNISH GRAY TO GRAY, THICK TO THIN BEDDED, W/THIN SHALE SEAMS,	61,970.9		247.21
			3.78	246	246.57 CRINDID STONE			
	WYANDOTA MBR.		5.24	244	SHALE, GREEN-GRAY TO BLACK TO DARK GRAY, CLAYEY, PLATEY	49,027.5		244.62
				242	LIMESTONE, GRAY TO GRAY-BROWN W/ ORANGE-BROWN STAINS, N/SCATTERED THIN GRAY TO OLIVE GRAY SHALE SEAMS & STRINGERS, THICK BEDDED	38,217.1		243.46
	WESTER VILLE MBR.			240	CHERT @ TOP	26,447.9		241.85
			10.54	238	239.82	63,667.3		240.69
	WEAVER MBR.			236	SHALE, DARK GRAY, PLATEY	3,163.3		237.94
			13.65	234	236.72	10,353.8		236.54
	BLACK MBR.			232	LIMESTONE GRAY, 2 BEDS SEPERATED BY DARK GRAY SHALE.	9,331.5		235.78
			15.69	230	234.68 SHALEY @ TOP	30,846.3		234.80
	FONTANA MBR.			228	SHALE, DARK GRAY, LIMEY @ BASE	2,424.0		233.52
			17.46	226	232.92	71,791.3		232.34
			18.90	224	LIMESTONE, DARK GRAY, SHALEY TOP, CHERTY, VERY			
					TO 231.49			
	DENNIS FORMATION							
	WINTERSET MBR.							

Core Description Log pg. 1			Project 70-105K-4890-02
			Bridge No. 70-105-12.51(156)(W.Bd.)
January 03, 2001			Bridge 156 W. Bd. I-70 Over S.Bd. I-635 And Ramp T-4
			BL. W. Bd. I-70 Bridge Station 2+015.655
			Wyandotte County
CD No. 1, Sta. 1+999.10, 22.0 m Rt. BL. W. Bd. I-70, Top Hole Elev. = 250.41			
Drill CME-55			
Hollow Stem Augers:	250.41	0.0-1.01	Clay, dark gray to dark gray-brown, sandy, w/gravel and cobbles
	249.40	1.01-TD.	Top of Limestone
Hawthorne	249.40	1.01-1.07	Limestone, brownish-gray, (Drum)
	249.34	1.07-TD.	SIS
Core No.1	249.34	0.0-0.52	Limestone, brownish-gray, thick bedded, slightly weathered, crinoid stems, w/thin gray clay shale seams
1.07-1.52m	248.82	0.52-TD.	SIS RQD = 71%
Cut 0.52 m			
Rec 0.43 m			
Core No. 2	248.82	0.0-0.70	Shale, brownish-gray, broken, thin bedded, w/soft gray-brown clayey shale seams, weathered, crinoid stems
1.52 - 2.22 m	248.12	0.70-T.D.	SIS RQD = 25%
Cut 0.70 m			
Rec 0.61 m			
Core No. 3	248.12	0.0-0.67	Limestone, brownish-gray, w/thin olive-brown shaley seams, thin bedded, broken
2.22 - 2.90 m	247.45	0.67-T.D.	SIS RQD = 37%
Cut 0.67 m			
Rec 0.73 m			
Core No. 4	247.45	0.0-0.15	Limestone, gray w/thin shale seam (Drum)
2.90 - 3.75 m	247.30	0.15-0.85	Limestone, gray, thick bedded, w/thin shale seam
Cut 0.85 m	246.60	0.85-T.D.	SIS RQD = 100%
Rec 0.91 m			

Core Description Log pg. 2				Project 70- 105K - 4890 - 02
				Bridge No. 70 - 105-12.51 (156)(W.Bd.)
January 03, 2001				Bridge 156 W.Bd. I-70 Over S.Bd. I-635 And Ramp T-4
				BL W.Bd. I-70 Bridge Station 2+015.300
				Wyandotte County
Core Drill No. 1 cont.				
Core No. 5	246.60	0.0-0.03	Limestone, gray, shaley	
3.75 - 5.27 m	246.57	0.03-0.76	Shale, green-gray, clayey, (Quivira)	
Cut 1.52 m	245.84	0.76-1.01	Shale, black, carbonaceous, platey, clayey	
Rec 1.52 m	245.59	1.01-1.49	Shale, dark gray, platey, clayey	
	245.11	1.49-1.52	Limestone, gray, (Westerville)	
	245.08	1.52-T.D.	SIS RQD = 84%	
Core No. 6	245.08	0.0-1.52	Limestone, gray, w/chert and orange-brown stains, thick bedded, thin shale seam at base	
5.27 - 6.80 m	243.56	1.52-T.D.	SIS RQD = 94%	
Cut 1.52 m				
Rec 1.52 m				
Core No. 7	243.56	0.0-1.13	Limestone, gray-brown, w/orange-brown stains	
6.80 - 8.32 m	242.43	1.13-1.28	Shale, green-gray, w/Ls seam	
Cut 1.52 m	242.28	1.28-1.52	Limestone, gray-brown	
Rec 1.52 m	242.04	1.52-T.D.	SIS RQD = 94%	
Core No. 8	242.04	0.0-0.34	Limestone, gray-brown, w/orange-brown stains	
8.32 - 9.84	241.70	0.34-0.76	Shale, olive-gray w/thin Ls seam	
Cut 1.52 m	241.28	0.76-1.52	Limestone, gray w/soft dark gray shale seam	
Rec 1.52 m	240.52	1.52-T.D.	SIS RQD = 70%	
Core No. 9	240.52	0.0-0.70	Limestone, gray	
9.84 - 11.37	239.82	0.70-1.52	Shale, dark gray, platey, (Wea)	
Cut 1.52 m	239.00	1.52-T.D.	SIS RQD = 74%	
Rec 1.43 m				

Core Description Log pg. 3				Project 635 - 105K - 4890 - 01
				Bridge No. 70 - 105-12.51(156)(W. Bd.)
January 03, 2001				Bridge 156 W. Bd. I-70 Over S. Bd. I-635 And Ramp T-4
				BL W. Bd. I-70 Bridge Station 2+015.655
				Wyandotte County
Core Drill No. 1 cont.				
Core No. 10	239.00	0.0-1.43	Shale, dark gray, platy	
11.37 - 12.80 m	237.57	1.43-T.D.	SIS	RQD=92%
Cut 1.43 m				
Rec 1.55 m				
Core No. 11	237.57	0.0-0.85	Shale, dark gray	
12.80 - 14.32 m	236.72	0.85-1.37	Limestone, very shaley, brachiopod shells, (Block)	
Cut 1.52 m	236.20	1.37-1.52	Shale, dark gray	
Rec 1.52 m	236.05	1.52-T.D.	SIS	RQD = 96%
Core No. 12	236.05	0.0-0.52	Shale, dark gray	
14.32-15.85 m	235.53	0.52-1.37	Limestone, gray, shaley, (Block)	
Cut 1.52 m	234.68	1.37-1.52	Shale, dark gray	
Rec 1.49 m	234.53	1.52-T.D.	SIS	RQD=88%
Core No. 13	234.53	0.0-1.52	Shale, dark gray, (Fontana)	
15.85-17.37 m	233.01	1.52-T.D.	SIS	RQD = 94%
Cut 1.52 m				
Rec 1.55 m				
Core No. 14	233.01	0.0-0.09	Shale, limey	
17.37-18.90 m	232.92	0.09-0.36	Limestone, dark gray, shaley, cherty, very hard	
Cut 1.52 m	232.65	0.36-1.31	Limestone, dark gray, (Winterset)	
Rec 1.46 m	231.70	1.31-1.52	Shale, dark gray,	
	231.49	1.52-T.D.	SIS	RQD = 96%
T.D. 18.90 = 231.49 (Winterset)				
		Level Run		
	+	HI	-	Elev.
TBM	1.591	252.67		TBM = 251.079, Rebar in pier column - Ramp T-8
CD # 1			2.263	250.407