ROUTE NO.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
FAP 42 (IL 127)	106 (B-2)	Montgomery	61	33
FED. ROAD DIST. NO. 7	ILLINOIS	FED. AID PROJECT-		

SHEET NO. 15

15 SHEETS

Contract #72150

Illinois Department of Transportation
Division of Highways
DOT Bureau 8

SOIL BORING LOG

Page 1 of 2

Date 1/1/06

ROUTE FAP 42 DESCRIPTION IL 127 over Little Bearcat Creek LOGGED BY M. Tappan

SECTION 106(B-2) LOCATION NW 14, SEC. 12, TWP. 7N, RNG. 4W, 3 PM

COUNTY Montgomery DRILLING METHOD HSA HAMMER TYPE 140 lb Auto

STRUCT. NO. 068-0507 Pr / 068-0504 Rr
Station 115+00

BORING NO. 1 S. Abut.
Station 115+51
Offset 57.05 RT
Ground Surface Elev. 559.9 ft

Surface Water Elev. 551.0 ft
Stream Bed Elev. 550.9 ft

Groundwater Elev.:
▽ First Encounter 550.9 ft
▼ Upon Completion Washed ft
▼ After 12 Days Hrs. 551.9 ft

Description	Elev.	Depth (ft)	Blows /6"	Qu (tsf)	UCS (%)	MOIST (%)
Lt. Brown & Gray Moist SILTY CLAY (Till)			1			
			1	0.6	22	
		-5	1	B		
			1			
			1	0.6	22	
			2	B		
▽	550.90		0			
Dark Gray Wet SiLt. to Fine Sand Free Water			0			
		-10	1			
	548.40					
Dark Gray V. Moist LOAM with Medium Sand Seams			W			
			O	0.3	30	
			H	B		
	545.90					
Dark Gray V. Moist SILTY CLAY with Loam Seams			0			
			0	0.5	23	
		-15	1	P		
			0			
with Wooly Fibers			0	0.5	27	
			1	B		
			0			
			1	0.5	23	
		-20	1	B		
Olive Brown and Gray Moist CLAY LOAM (TIll)	539.40					
			0			
			1	1.3	14	
			2	B		
			1			
			3	2.1	13	
		-25	5	B		
			1			
			5	4.9	13	
		-30	10	B		
			2			
Light Olive Brown			7	5.3	14	
		-35	10	B		
			2			
Gray			5	5.0	13	
		-40	9	B		

The Unconfined Compressive Strength (UCS) Failure Mode is indicated by (B-Bulge, S-Shear, P-Penetrometer, E-Estimated)
Abbreviations W.O.H – Sampler Advanced By Weight of Hammer, W.O.P – Advanced by Weight of Pipe, B.S. – Before Seating
The SPT (N value) is the sum of the last two blow values in each sampling zone (AASHTO T206) BBS, from 127 (Rev. 8-89)

Illinois Department of Transportation
Division of Highways
DOT Bureau 8

SOIL BORING LOG

Page 2 of 2

Date 1/1/06

ROUTE FAP 42 DESCRIPTION IL 127 over Little Bearcat Creek LOGGED BY M. Tappan

SECTION 106(B-2) LOCATION NW 14, SEC. 12, TWP. 7N, RNG. 4W, 3 PM

COUNTY Montgomery DRILLING METHOD HSA HAMMER TYPE 140 lb Auto

STRUCT. NO. 068-0507 Pr / 068-0504 Rr
Station 115+00

BORING NO. 1 S. Abut.
Station 115+51
Offset 57.05 RT
Ground Surface Elev. 559.9 ft

Surface Water Elev. 551.0 ft
Stream Bed Elev. 550.9 ft

Groundwater Elev.:
▽ First Encounter 550.9 ft
▼ Upon Completion Washed ft
▼ After 12 Days Hrs. 551.9 ft

Description	Elev.	Depth (ft)	Blows /6"	Qu (tsf)	UCS (%)	MOIST (%)
Olive Brown and Gray Moist CLAY LOAM (TIll) (continued)						
			1			
			6	4.9	13	
		-40	9	B		
			1			
			5	4.9	13	
		-50	9	B		
			4			
Gray Medium Dirty Sandy Gravel	506.40					
			13			
		-55	23			
Gray Moist CLAY LOAM (TIll) Drilled Stiff at 60'	503.90					
			2			
			8	5.4	14	
		-60	11	B		
Gray Moist CLAY LOAM (TIll) Drilled Stiff at 60' (continued)						
			1			
with Shaley Inclusions Encountered Natural Gas Pocket			8	5.7	13	
		-65	13	B		
			1			
			7	4.8	13	
		-70	13	B		
			2			
Gray Weathered Clayey Shale with Broken Argillaceous Limestone	485.40 / 484.90		15 / 45			8
No natural gas was noticed exiting the borehole at backfilling.						
			2			
			8	5.4	14	
		-80	11	B		

The Unconfined Compressive Strength (UCS) Failure Mode is indicated by (B-Bulge, S-Shear, P-Penetrometer, E-Estimated)
Abbreviations W.O.H – Sampler Advanced By Weight of Hammer, W.O.P – Advanced by Weight of Pipe, B.S. – Before Seating
The SPT (N value) is the sum of the last two blow values in each sampling zone (AASHTO T206) BBS, from 127 (Rev. 8-89)

Illinois Department of Transportation
Division of Highways
DOT Bureau 8

SOIL BORING LOG

Page 1 of 2

Date 1/1/06

ROUTE FAP 42 DESCRIPTION IL 127 over Little Bearcat Creek LOGGED BY M. Tappan

SECTION 106(B-2) LOCATION NW 14, SEC. 12, TWP. 7N, RNG. 4W, 3 PM

COUNTY Montgomery DRILLING METHOD HSA HAMMER TYPE 140 lb Auto

STRUCT. NO. 068-0507 Pr / 068-0504 Rr
Station 115+00

BORING NO. 2 N. Abut.
Station 115+87
Offset 45.05 LT
Ground Surface Elev. 558.5 ft

Surface Water Elev. 551.0 ft
Stream Bed Elev. 550.0 ft

Groundwater Elev.:
▽ First Encounter 550.0 ft
▼ Upon Completion Washed ft
▼ After 7 Days Hrs. 552.5 ft

Description	Elev.	Depth (ft)	Blows /6"	Qu (tsf)	UCS (%)	MOIST (%)
Gray Moist Medium SANDY GRAVEL with CL Seams			1			
			3			
		-5	3			
▼	551.00		5			
Old Broken Concrete			31			
			13			
▽	550.00					
Gray Wet Sand Loam to Fine Sand			1			
		-10	1		20	
	540.00		2			
Brown Fine to Medium SAND			W			
			O			
			H			
Brown Medium SANDY GRAVEL Washed			3			
		-15	3			
			3			
Gray Washed			1			
			2			
			1			
Washed			1			
		-20	2			
Brown Fine to Medium SAND (continued)			1			
Gray Dirty Medium SAND Washed			1			
			2			
			2			
	524.00		4			
Olive Brown Moist CLAY LOAM (TIll)		-25	5	1.3	14	
			3	B		
			5			
			13			
		-30	12	B		
			3			
			6	5.1	13	
		-35	11	B		
			2			
			5	4.9	13	
		-40	7	B		

The Unconfined Compressive Strength (UCS) Failure Mode is indicated by (B-Bulge, S-Shear, P-Penetrometer, E-Estimated)
Abbreviations W.O.H – Sampler Advanced By Weight of Hammer, W.O.P – Advanced by Weight of Pipe, B.S. – Before Seating
The SPT (N value) is the sum of the last two blow values in each sampling zone (AASHTO T206) BBS, from 127 (Rev. 8-89)

Illinois Department of Transportation
Division of Highways
DOT Bureau 8

SOIL BORING LOG

Page 2 of 2

Date 1/1/06

ROUTE FAP 42 DESCRIPTION IL 127 over Little Bearcat Creek LOGGED BY M. Tappan

SECTION 106(B-2) LOCATION NW 14, SEC. 12, TWP. 7N, RNG. 4W, 3 PM

COUNTY Montgomery DRILLING METHOD HSA HAMMER TYPE 140 lb Auto

STRUCT. NO. 068-0507 Pr / 068-0504 Rr
Station 115+00

BORING NO. 2 N. Abut.
Station 115+87
Offset 45.05 LT
Ground Surface Elev. 558.5 ft

Surface Water Elev. 551.0 ft
Stream Bed Elev. 550.0 ft

Groundwater Elev.:
▽ First Encounter 550.0 ft
▼ Upon Completion Washed ft
▼ After 7 Days Hrs. 552.5 ft

Description	Elev.	Depth (ft)	Blows /6"	Qu (tsf)	UCS (%)	MOIST (%)
Olive Brown Moist CLAY LOAM (TIll) (continued)			9	B		
			5	4.1	13	
		-45	9	B		
			5			
			4	3.3	13	
		-50	6	B		
			4			
			12	5.2	14	
		-55	13	B		
			4			
			13	6.4	14	
		-60				
Olive Brown Moist CLAY LOAM (TIll) (continued)			26	B		
			5			
		-65	7	4.6	15	
			10	B		
			1			
			5	3.9	15	
		-70	7	B		
Gray Poorly Indurated Argillaceous LIMESTONE Interbedded with Dark Gray Moist Clayey Shale	488.00					
Auger Refusal	484.00		100/0"			
Refer Station to Centerline of Relating Structure = 115+99 Refer Elevation to Centerline of Relating Structure = 554.30						
			4			
			13	6.4	14	
		-80				

The Unconfined Compressive Strength (UCS) Failure Mode is indicated by (B-Bulge, S-Shear, P-Penetrometer, E-Estimated)
Abbreviations W.O.H – Sampler Advanced By Weight of Hammer, W.O.P – Advanced by Weight of Pipe, B.S. – Before Seating
The SPT (N value) is the sum of the last two blow values in each sampling zone (AASHTO T206) BBS, from 127 (Rev. 8-89)

LIN ENGINEERING, LTD.
Consulting Engineers
Chatham, Illinois

Designed By: RKM | Checked By: MTH | Drawn By: AJF
Date: 04/07 | File: 068-0507.DGN

REVISIONS	
NAME	DATE

ILLINOIS DEPARTMENT OF TRANSPORTATION

SOIL BORINGS
ILLINOIS ROUTE 127 OVER
LITTLE BEARCAT CREEK
F.A.P. ROUTE 42 - SECTION 106 (B-2)
MONTGOMERY COUNTY
STATION 115+99.00
STRUCTURE NO. 068-0507

$FILEABBREV$
Aug-16-2007 11:20:53AM11:20:53 AM