Illinois Department of Transportation
Division of Highways
Geotechnology, Inc

SOIL BORING LOG

Date 4/14/10

ROUTE FAP 998 DESCRIPTION Trilevel Interchange LOGGED BY RFW

SECTION 82-1 LOCATION East St. Louis, IL, SEC. 18, TWP. 2N, RNG. 9W

COUNTY St. Clair DRILLING METHOD HSA with MR below 40 ft HAMMER TYPE CME 750X / 73%

STRUCT. NO. 082-W306
Station NA

BORING NO. RW-414
Station 70+70
Offset 30ft Left
Ground Surface Elev. 418.6 ft

Surface Water Elev. Unknown ft
Stream Bed Elev. Unknown ft

Groundwater Elev.:
First Encounter 380.6 ft ▼
Upon Completion ** ft
After ** Hrs. ** ft

DEPTH (ft)	BLOWS (/6")	UCS Qu (tsf)	MOIST (%)
Black, CINDERS, with sand, gravel, and brick fragments (FILL)			
	4		
	2		
	4		
	3		
	5		11
-5	6		
412.3			
Stiff, brown, SILTY CLAY	2		
	3	1.7	22
	3	S	
410.6			
Soft to medium stiff, brown to gray, SILT	2		
	2		29
-10	2		
	2		
	3		23
	3		
	3		
	4		17
-15	3		
	2		
	2	0.5	31
	2	S	
	2		
-20	3	0.7	29
	4	S	

DEPTH (ft)	BLOWS (/6")	UCS Qu (tsf)	MOIST (%)
Soft to medium stiff, brown to gray, SILT *(continued)*			
	2		
	2	1.3	40
stiff	3	S	
	3		
	3	0.8	28
-25	4	S	
392.3			
Medium dense, brown, FINE GRAINED SAND	4		
Grain Size Distribution Conducted	7		6
	8		
	5		
	6		10
-30	7		
386.6			
Medium stiff, gray, SILT	2		
	2	0.8	31
-35	2	B	
380.6 ▼			
Medium dense, brown, FINE GRAINED SAND	6		
	8		
-40	10		

The Unconfined Compressive Strength (UCS) Failure Mode is indicated by (B-Bulge, S-Shear, P-Penetrometer)
The SPT (N value) is the sum of the last two blow values in each sampling zone (AASHTO T206)
* Rimac attempted, not measured due to sample disturbance
** Not measured due to drilling methods used

BBS, from 137 (Rev. 8-99)

Date 4/14/10

ROUTE FAP 998 DESCRIPTION Trilevel Interchange LOGGED BY RFW

SECTION 82-1 LOCATION East St. Louis, IL, SEC. 18, TWP. 2N, RNG. 9W

COUNTY St. Clair DRILLING METHOD HSA with MR below 40 ft HAMMER TYPE CME 750X / 73%

STRUCT. NO. 082-W306
Station NA

BORING NO. RW-414
Station 70+70
Offset 30ft Left
Ground Surface Elev. 418.6 ft

Surface Water Elev. Unknown ft
Stream Bed Elev. Unknown ft

Groundwater Elev.:
First Encounter 380.6 ft ▼
Upon Completion ** ft
After ** Hrs. ** ft

DEPTH (ft)	BLOWS (/6")	UCS Qu (tsf)	MOIST (%)
Medium dense, brown, FINE GRAINED SAND *(continued)*			
	10		
Grain Size Distribution Conducted	14		
-45	15		
371.6			
Medium dense, brown, FINE TO MEDIUM GRAINED SAND, trace gravel			
	7		
	8		
358.6 -50	8		
End of Boring			
-55			
-60			

The Unconfined Compressive Strength (UCS) Failure Mode is indicated by (B-Bulge, S-Shear, P-Penetrometer)
The SPT (N value) is the sum of the last two blow values in each sampling zone (AASHTO T206)
* Rimac attempted, not measured due to sample disturbance
** Not measured due to drilling methods used

BBS, from 137 (Rev. 8-99)

Illinois Department of Transportation
Division of Highways
Geotechnology, Inc

SOIL BORING LOG

Date 4/15/10

ROUTE FAP 998 DESCRIPTION Trilevel Interchange LOGGED BY RFW

SECTION 82-1 LOCATION East St. Louis, IL, SEC. 18, TWP. 2N, RNG. 9W

COUNTY St. Clair DRILLING METHOD HSA with MR below 35 ft HAMMER TYPE CME 750X / 73%

STRUCT. NO. 082-W306
Station NA

BORING NO. RW-415
Station 69+20
Offset 10ft Left
Ground Surface Elev. 417.9 ft

Surface Water Elev. Unknown ft
Stream Bed Elev. Unknown ft

Groundwater Elev.:
First Encounter ** ft
Upon Completion ** ft
After ** Hrs. ** ft

DEPTH (ft)	BLOWS (/6")	UCS Qu (tsf)	MOIST (%)
Black, CINDERS, with sand, gravel, and brick (FILL)			
	4		
415.9	5	3.3	26
Very stiff to stiff, gray to brown, CLAY	4	B	
	3		
	3	2.9	25
-5	4	B	
	2		
	2	1.7	27
	3	B	
409.9			
Soft to very stiff, brown, SILT	1		
	2		15
-10	2		
	2		
	1	2.2	30
	2	B	
	2		
403.6			
Stiff, brown, CLAY	2	1.4	38
-15	3	S	
	2		
400.9	2	1.3	31
Stiff, brown, SILT	5	S	
	4		
	4		9
-20	5		

DEPTH (ft)	BLOWS (/6")	UCS Qu (tsf)	MOIST (%)
Stiff, brown, SILT *(continued)* 397.4			
Medium dense, brown, FINE GRAINED SAND	4		
Grain Size Distribution Conducted	7		6
	9		
394.1			
Stiff, gray, CLAY	2		
	2	1.7	32
-25	2	S	
	1		
	1	1.3	40
	2	S	
389.9			
Stiff, brown, SILTY LOAM	8		
388.6			
Medium dense, brown, FINE GRAINED SAND	8		25
-30	11		
	7		
	8		
-35	8		
	17		
dense, with gravel	19		
-40	14		

The Unconfined Compressive Strength (UCS) Failure Mode is indicated by (B-Bulge, S-Shear, P-Penetrometer)
The SPT (N value) is the sum of the last two blow values in each sampling zone (AASHTO T206)
* Rimac attempted, not measured due to sample disturbance
** Not measured due to drilling methods used

BBS, from 137 (Rev. 8-99)

082-W306-76C75-Boring Logs Sheets 6-18.dgn

ZROKA engineering
Zroka Engineering, P.C.
4216 North Hermitage
Chicago, IL 60613

USER NAME = Scott Whitney	DESIGNED - PMM	REVISED -
	DRAWN - MJK	REVISED -
PLOT SCALE = 20.0000 ' / IN.	CHECKED - DAZ	REVISED -
PLOT DATE = 3/9/2011	DATE - 3-18-2011	REVISED -

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION

RETAINING WALL 082-W306
BORING LOGS

SCALE: N.T.S. | SHEET NO. 14 OF 18 SHEETS | STA. 60+50.00 TO STA. 74+11.55

F.A.I. RTE.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
70	82-1-1HB	ST. CLAIR	319	267
		CONTRACT NO. 76C75		
	ILLINOIS FED. AID PROJECT			