

Appendix C

Boring Logs

Project No.	175559008	Location	N 603148.82, E 1410894.84 (NAD27)		
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-AC	Total Depth	61.5 ft
Location	Humphreys County, Tennessee	Surface Elevation	391.4 ft. (NGVD29)		
Project Type	Geotechnical Exploration	Date Started	3/10/09	Completed	3/10/09
Supervisor	N. Puckett Driller J. Felts	Depth to Water	24.0 ft	Date/Time	3/10/09
Logged By	N. Puckett	Automatic Hammer	<input checked="" type="checkbox"/>	Safety Hammer	<input type="checkbox"/>
		Other	<input type="checkbox"/>		

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth	
391.4'	0.0'	Top of Hole							
		POORLY GRADED GRAVEL							Boring advanced using 3 1/4" Hollow Stem Augers
388.5'	2.9'	LEAN CLAY with Sand, brown, moist, medium to very stiff		SPT-1	3.0 - 4.5	1.3	10-9-10	16	
			SPT-2	4.5 - 6.0	1.3	5-10-14	17		
			SPT-3	6.0 - 7.5	1.4	5-6-8	21		
			SPT-4	7.5 - 9.0	1.0	3-5-8	19		
			SPT-5	9.0 - 10.5	1.4	3-7-15	19		
			SPT-6	10.5 - 12.0	1.3	7-5-7	20		
			SPT-7	12.0 - 13.5	1.2	4-11-7	16		
			SPT-8	13.5 - 15.0	1.2	4-4-5	18		
			SPT-9	15.0 - 16.5	0.7	6-4-7	21		
			SPT-10	16.5 - 18.0	1.4	1-3-4	21		
			SPT-11	18.0 - 19.5	1.5	2-3-4	23		
			SPT-12	19.5 - 21.0	1.3	1-3-3	22		
			SPT-13	21.0 - 22.5	1.3	1-5-7	17	organic matter from 21' to 22.5'	
367.8'	23.6'	LEAN CLAY, brown and gray, moist, medium to very stiff		SPT-14	22.5 - 24.0	0.4	6-4-3	19	Began using drilling fluid at 24.0 feet
			SPT-15	24.0 - 25.5	0.2	2-1-3	22		
			SPT-16	25.5 - 27.0	0.7	2-1-2	19		
362.1'	29.3'	SILT, brown, wet, stiff, with sand and organics		SPT-17	27.0 - 28.5	0.5	0-2-6	25	
360.4'	31.0'		SPT-18	28.5 - 30.0	1.5	3-4-5	26		
		LEAN CLAY, brown and gray, wet, medium stiff		SPT-19	30.0 - 31.5	0.6	6-3-2	26	
358.7'	32.7'		SPT-20	31.5 - 33.0	0.5	2-2-7	20		
358.0'	33.4'	FLY ASH, black and gray, wet, medium dense		SPT-21	33.0 - 34.5	1.0	3-2-1	27	
355.7'	35.7'		SPT-22	34.5 - 36.0	1.0	1-3-3	28		
		LEAN CLAY, brown and gray, wet, very soft to soft		ST-1	36.0 - 38.0	0.0		--	
			SPT-23	38.0 - 39.5	1.0	0-0-2	35		
			SPT-24	39.5 - 41.0	1.5	0-0-0	33		
			SPT-25	41.0 - 42.5	1.3	0-0-3	30		
		LEAN CLAY, brown and gray, moist, soft to stiff, increasing amount of silt with depth		SPT-26	42.5 - 44.0	1.1	0-3-4	28	

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Project No.	175559008	Location	N 603148.82, E 1410894.84 (NAD27)	
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-AC	Total Depth 61.5 ft

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth	
329.9'	61.5'	LEAN CLAY, brown and gray, moist, soft to stiff, increasing amount of silt with depth <i>(Continued)</i>		SPT-27	44.0 - 45.5	1.2	1-5-6	28	Boring backfilled with bentonite grout from 0.0 ft to 61.5 ft sand and gravel at 61.3 ft
				ST-2	45.5 - 47.5	2.0		25	
				SPT-28	47.5 - 49.0	1.2	6-10-10	25	
				SPT-29	49.0 - 50.5	1.5	3-6-8	28	
				SPT-30	52.5 - 54.0	1.5	4-3-4	26	
				SPT-31	55.0 - 56.5	1.5	0-0-5	28	
				SPT-32	57.5 - 59.0	1.5	2-3-4	27	
				SPT-33	60.0 - 61.5	1.3	3-5-12	21	

No Refusal /
Bottom of Hole

Project No.	175559008	Location	N 603133.83, E 1410898.66 (NAD27)	
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-AC-PZ	Total Depth 26.0 ft
Location	Humphreys County, Tennessee	Surface Elevation	391.6 ft. (NGVD29)	
Project Type	Geotechnical Exploration	Date Started	4/1/09	Completed 4/1/09
Supervisor	N. Puckett	Driller	Tim Caudill	Depth to Water 22.6 ft
Logged By	N. Puckett	Date/Time	5/27/09	
		Automatic Hammer	<input type="checkbox"/>	Safety Hammer <input type="checkbox"/>
		Other	<input type="checkbox"/>	

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth	
391.6'	0.0'	Top of Hole							
		OVERBURDEN							Boring advanced using 4 1/4" Hollow Stem Augers
				ST-1	5.0 - 7.0	0.7		18	Piezometer constructed from 15 ft of 1" PVC Riser Pipe and 10 ft of 1" PVC Slotted Screen
				ST-2	10.0 - 12.0	0.4		22	
									Screened zone from 15 ft to 25 ft
									Piezometer backfilled with sand, bentonite pellets, and bentonite grout from 0.0 ft to 26.0 ft
365.6'	26.0'	No Refusal / Bottom of Hole							

Project No.	175559008	Location	N 603144.12, E 1410980.20 (NAD27)	
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-AT	Total Depth 51.5 ft
Location	Humphreys County, Tennessee	Surface Elevation	368.4 ft. (NGVD29)	
Project Type	Geotechnical Exploration	Date Started	3/19/09	Completed 3/19/09
Supervisor	Russ Mehnert Driller G. Thompson	Depth to Water	10.5 ft	Date/Time 3/19/09
Logged By	Russ Mehnert	Automatic Hammer	<input checked="" type="checkbox"/>	Safety Hammer <input type="checkbox"/> Other <input type="checkbox"/>

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth	
368.4'	0.0'	Top of Hole							
		LEAN CLAY, brown, gray and tan, moist, soft to very stiff, roots and gravel from 3.0' to 4.5'		SPT-1	0.0 - 1.5	1.0	5-7-9	15	Boring advanced using 3 1/4" Hollow Stem Augers Began using drilling fluid at 10.5 feet
				SPT-2	1.5 - 3.0	0.8	7-5-5	14	
				SPT-3	3.0 - 4.5	0.1	5-7-9	15	
				SPT-4	4.5 - 6.0	0.6	1-1-1	26	
				SPT-5	6.0 - 7.5	1.3	2-2-1	25	
				SPT-6	7.5 - 9.0	1.1	2-2-2	26	
				SPT-7	9.0 - 10.5	1.2	2-2-3	28	
				SPT-8	10.5 - 12.0	0.2	1-2-2	23	
				SPT-9	12.0 - 13.5	1.5	1-2-2	30	
				SPT-10	13.5 - 15.0	1.5	1-1-2	28	
				SPT-11	15.0 - 16.5	1.5	2-1-2	27	
				SPT-12	16.5 - 18.0	1.5	2-3-2	33	
				SPT-13	18.0 - 19.5	1.5	WOH-2-2	29	
				SPT-14	19.5 - 21.0	1.5	4-6-9	24	
				SPT-15	21.0 - 22.5	1.5	4-9-10	30	
				SPT-16	22.5 - 24.0	1.5	5-7-10	27	
				SPT-17	24.0 - 25.5	1.2	5-8-9	25	
				SPT-18	25.5 - 27.0	1.5	6-7-9	23	
				SPT-19	27.0 - 28.5	1.5	5-5-7	25	
				SPT-20	28.5 - 30.0	1.5	3-4-4	26	
				SPT-21	30.0 - 31.5	1.5	3-3-3	29	
				SPT-22	32.5 - 34.0	1.5	2-3-3	29	
				SPT-23	35.0 - 36.5	1.5	3-2-4	27	
329.7'	38.7'			SPT-24	37.5 - 39.0	1.5	2-4-10	27	
		WELL GRADED SAND with Silt, red, brown and tan, wet, medium dense to dense		SPT-25	40.0 - 41.5	0.0	9-22-24	--	
				SPT-26	42.5 - 44.0	1.0	4-6-5	17	

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Project No.	175559008	Location	N 603144.12, E 1410980.20 (NAD27)		
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-AT	Total Depth	51.5 ft

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth	
316.9'	51.5'	WELL GRADED SAND with Silt, red, brown and tan, wet, medium dense to dense <i>(Continued)</i>		SPT-27	45.0 - 46.5	1.5	5-9-10	20	Boring backfilled with bentonite grout from 0.0 ft to 51.5 ft
				SPT-28	47.5 - 49.0	1.5	7-7-10	24	
				SPT-29	50.0 - 51.5	1.5	5-7-11	23	

No Refusal /
Bottom of Hole

WOH=Weight of
Hammer

Project No.	175559008	Location	N 603144.12, E 1410980.20 (NAD27)		
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-AT-PZ	Total Depth	21.0 ft
Location	Humphreys County, Tennessee	Surface Elevation	368.4 ft. (NGVD29)		
Project Type	Geotechnical Exploration	Date Started	3/19/09	Completed	3/19/09
Supervisor	Russ Mehnert	Driller	G. Thompson	Depth to Water	9.0 ft
Logged By	Russ Mehnert	Automatic Hammer	<input type="checkbox"/>	Safety Hammer	<input type="checkbox"/>
		Other	<input type="checkbox"/>		

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth	
368.4'	0.0'	Top of Hole							
		OVERBURDEN							Boring advanced using 3 1/4" Hollow Stem Augers
									Piezometer constructed from 10 ft of 1" PVC Riser Pipe and 10 ft of 1" PVC Slotted Screen
									Screened zone from 10 ft to 20 ft
									Piezometer backfilled with sand, bentonite pellets, and bentonite grout from 0.0 ft to 21.0 ft
347.4'	21.0'			ST-1	19.0 - 21.0	1.8		25	

No Refusal /
Bottom of Hole

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Project No.	175559008	Location	N 602313.93, E 1410981.18 (NAD27)	
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-BC	Total Depth 61.5 ft
Location	Humphreys County, Tennessee	Surface Elevation	391.5 ft. (NGVD29)	
Project Type	Geotechnical Exploration	Date Started	3/17/09	Completed 3/17/09
Supervisor	N. Puckett Driller Tim Caudill	Depth to Water	40.0 ft	Date/Time 3/17/09
Logged By	N. Puckett	Automatic Hammer	<input checked="" type="checkbox"/>	Safety Hammer <input type="checkbox"/> Other <input type="checkbox"/>

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth	
391.5'	0.0'	Top of Hole							
390.0'	1.5'	POORLY GRADED GRAVEL							Boring advanced using 4 1/4" Hollow Stem Augers
		LEAN CLAY with Sand, brown and gray, moist, medium stiff to very stiff, occasional gravel		SPT-1	1.5 - 3.0	1.1	5-7-9	18	
			SPT-2	3.0 - 4.5	1.2	5-7-9	17		
			SPT-3	4.5 - 6.0	1.4	5-7-8	21		
			SPT-4	6.0 - 7.5	1.2	5-7-6	18		
			SPT-5	7.5 - 9.0	1.3	4-4-8	21		
			SPT-6	9.0 - 10.5	1.0	5-9-12	25		
			SPT-7	10.5 - 12.0	1.5	3-4-7	20		
			SPT-8	12.0 - 13.5	1.3	7-7-8	20		
			SPT-9	13.5 - 15.0	1.4	4-5-6	18		
			SPT-10	15.0 - 16.5	1.4	4-7-9	18		
			SPT-11	16.5 - 18.0	1.4	5-6-7	22		
			SPT-12	18.0 - 19.5	1.5	3-5-7	17		
			SPT-13	19.5 - 21.0	1.3	2-2-5	23		
			SPT-14	21.0 - 22.5	0.9	2-3-4	21		
			SPT-15	22.5 - 24.0	1.1	2-3-4	20		
			SPT-16	24.0 - 25.5	1.2	2-4-6	20		
			SPT-17	25.5 - 27.0	0.9	2-5-5	25		
363.3'	28.2'				SPT-18	27.0 - 28.5	1.2	3-7-11	14
		SILT, brown and gray, moist to wet, stiff, gravel throughout		SPT-19	28.5 - 30.0	0.5	2-5-9	19	
			SPT-20	30.0 - 31.5	1.5	4-4-9	22		
			SPT-21	31.5 - 33.0	1.2	5-10-8	29		
			ST-1	33.0 - 35.0	0.6		28		
355.5'	36.0'			SPT-22	35.0 - 36.5	1.1	2-2-4	29	
		LEAN CLAY, brown and gray, wet, medium stiff, with silt lenses		SPT-23	36.5 - 38.0	1.5	2-2-3	28	
			SPT-24	38.0 - 39.5	1.5	3-3-3	25		
			SPT-25	39.5 - 41.0	1.5	0-0-4	29		
351.0'	40.5'			SPT-26	41.0 - 42.5	1.1	3-4-5	26	
		LEAN CLAY, gray to brown and gray, moist, soft to stiff, odor from 40.5' to 42.5'		SPT-27	42.5 - 44.0	1.4	1-4-4	27	
									Began using drilling fluid at 40.0 feet

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Project No.	175559008	Location	N 602313.93, E 1410981.18 (NAD27)		
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-BC	Total Depth	61.5 ft

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth	
330.0'	61.5'	LEAN CLAY, gray to brown and gray, moist, soft to stiff, odor from 40.5' to 42.5' (Continued)		SPT-28	45.0 - 46.5	1.1	2-4-5	28	Boring backfilled with bentonite grout from 0.0 ft to 61.5 ft
				SPT-29	47.5 - 49.0	1.4	2-3-4	24	
				SPT-30	50.0 - 51.5	1.3	5-7-7	26	
				SPT-31	52.5 - 54.0	1.3	5-6-6	22	
				SPT-32	55.0 - 56.5	1.5	5-6-8	25	
				SPT-33	57.5 - 59.0	1.4	5-6-7	23	
				SPT-34	60.0 - 61.5	1.4	4-4-4	28	

No Refusal /
Bottom of Hole

Project No.	175559008	Location	N 602314.45, E 1410988.89 (NAD27)	
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-BC-PZ	Total Depth 26.0 ft
Location	Humphreys County, Tennessee	Surface Elevation	392.4 ft. (NGVD29)	
Project Type	Geotechnical Exploration	Date Started	4/1/09	Completed 4/1/09
Supervisor	N. Puckett	Driller	Tim Caudill	Depth to Water 9.7 ft
Logged By	N. Puckett	Date/Time	5/27/09	
		Automatic Hammer	<input type="checkbox"/>	Safety Hammer <input type="checkbox"/>
		Other	<input type="checkbox"/>	

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth	
392.4'	0.0'	Top of Hole							
		OVERBURDEN							
				ST-1	5.0 - 7.0	0.9		19	Boring advanced using 4 1/4" Hollow Stem Augers Piezometer constructed from 15 ft of 1" PVC Riser Pipe and 10 ft of 1" PVC Slotted Screen
				ST-2	10.0 - 12.0	0.7		18	
									Screened zone from 15 ft to 25 ft
									Piezometer backfilled with sand, bentonite pellets, and bentonite grout from 0.0 ft to 26.0 ft
366.4'	26.0'								

No Refusal /
Bottom of Hole

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Project No.	175559008	Location	N 602326.17, E 1411067.30 (NAD27)	
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-BT	Total Depth 51.5 ft
Location	Humphreys County, Tennessee	Surface Elevation	369.8 ft. (NGVD29)	
Project Type	Geotechnical Exploration	Date Started	3/18/09	Completed 3/18/09
Supervisor	Russ Mehnert	Driller	G. Thompson	Depth to Water 24.0 ft
Logged By	Russ Mehnert	Automatic Hammer	<input checked="" type="checkbox"/>	Safety Hammer <input type="checkbox"/> Other <input type="checkbox"/>

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth	
369.8'	0.0'	Top of Hole							
		LEAN CLAY with Organics and Gravel, gray and various browns, moist to wet, very soft to very stiff		SPT-1	0.0 - 1.5	1.2	2-5-8	17	Boring advanced using 3 1/4" Hollow Stem Augers
			SPT-2	1.5 - 3.0	0.8	4-5-8	18		
			SPT-3	3.0 - 4.5	1.2	2-4-6	20		
			SPT-4	4.5 - 6.0	1.2	5-5-6	21		
			SPT-5	6.0 - 7.5	1.3	5-8-7	23		
			SPT-6	7.5 - 9.0	1.0	4-3-5	24		
			SPT-7	9.0 - 10.5	1.2	4-7-6	24		
			SPT-8	10.5 - 12.0	1.5	2-3-4	26		
			SPT-9	12.0 - 13.5	1.5	3-4-5	26		
			SPT-10	13.5 - 15.0	1.3	1-2-4	27		
			SPT-11	15.0 - 16.5	1.5	3-3-4	27		
			SPT-12	16.5 - 18.0	1.5	3-4-4	30		
			SPT-13	18.0 - 19.5	1.5	2-2-3	29		
			SPT-14	19.5 - 21.0	1.5	2-5-6	26		
			SPT-15	21.0 - 22.5	1.4	5-7-9	26		
			SPT-16	22.5 - 24.0	1.5	2-4-4	26		
			SPT-17	24.0 - 25.5	0.8	2-2-2	28		
			SPT-18	25.5 - 27.0	0.2	WOH	29		
			SPT-19	27.0 - 28.5	1.0	2-2-2	34		
			SPT-20	28.5 - 30.0	1.5	1-2-4	28		
			SPT-21	30.0 - 31.5	1.2	3-4-5	28		
			SPT-22	32.5 - 34.0	1.5	2-3-4	27		
			SPT-23	35.0 - 36.5	1.5	2-3-3	29		
			SPT-24	37.5 - 39.0	1.5	2-2-1	29		
329.3'	40.5'	POORLY GRADED SAND with Gravel, red, brown and gray, wet, loose		SPT-25	40.0 - 41.5	1.5	4-5-2	22	Began using drilling fluid at 24.0 feet
328.8'	41.0'		SPT-26	42.5 - 44.0	1.5	1-2-1	30		

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Project No.	175559008	Location	N 602326.17, E 1411067.30 (NAD27)	
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-BT	Total Depth 51.5 ft

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth	
324.6'	45.2'	SANDY LEAN CLAY with Gravel, gray and tan, wet, soft to stiff <i>(Continued)</i>		SPT-27	45.0 - 46.5	1.3	5-9-21	22	Boring backfilled with bentonite grout from 0.0 ft to 51.5 ft
				SPT-28	47.5 - 49.0	1.0	7-22-22	17	
318.3'	51.5'	WELL GRADED SAND with Silt, red brown and tan, wet, medium dense to dense		SPT-29	50.0 - 51.5	1.5	8-5-9	20	

No Refusal /
Bottom of Hole

WOH=Weight of Hammer



Project No.	175559008	Location	N 602326.17, E 1411067.30 (NAD27)		
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-BT-PZ	Total Depth	33.0 ft
Location	Humphreys County, Tennessee	Surface Elevation	369.8 ft. (NGVD29)		
Project Type	Geotechnical Exploration	Date Started	3/18/09	Completed	3/18/09
Supervisor	Russ Mehnert	Driller	G. Thompson	Depth to Water	11.0 ft
Logged By	Russ Mehnert	Automatic Hammer	<input type="checkbox"/>	Safety Hammer	<input type="checkbox"/>
		Other	<input type="checkbox"/>		

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth	
369.8'	0.0'	Top of Hole							
		OVERBURDEN							Boring advanced using 3 1/4" Hollow Stem Augers
									Piezometer constructed from 22 ft of 1" PVC Riser Pipe and 10 ft of 1" PVC Slotted Screen
				ST-1	16.0 - 18.0	1.2		27	Screened zone from 22 ft to 32 ft
336.8'	33.0'								Piezometer backfilled with sand, bentonite pellets, and bentonite grout from 0.0 ft to 33.0 ft

No Refusal /
Bottom of Hole



Project No.	175559008	Location	N 601437.52, E 1411070.75 (NAD27)		
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-CC	Total Depth	61.5 ft
Location	Humphreys County, Tennessee	Surface Elevation	391.6 ft. (NGVD29)		
Project Type	Geotechnical Exploration	Date Started	3/17/09	Completed	3/18/09
Supervisor	N. Puckett	Driller	Tim Caudill	Depth to Water	24.5 ft
Logged By	N. Puckett	Automatic Hammer	<input checked="" type="checkbox"/>	Safety Hammer	<input type="checkbox"/>
		Other	<input type="checkbox"/>		

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks	
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth		
391.6'	0.0'	Top of Hole								
389.6'	2.0'	POORLY GRADED GRAVEL							Boring advanced using 4 1/4" Hollow Stem Augers	
		LEAN CLAY, brown and gray, moist, medium stiff to very stiff		SPT-1	2.0 - 3.5	0.9	4-4-6	15		
			SPT-2	3.5 - 5.0	1.2	3-5-6	17			
			SPT-3	5.0 - 6.5	1.4	3-6-6	20			
			SPT-4	6.5 - 8.0	1.2	5-6-7	20			
			SPT-5	8.0 - 9.5	1.1	5-6-6	19			
			SPT-6	9.5 - 11.0	1.5	3-6-8	18			
			SPT-7	11.0 - 12.5	1.4	5-7-9	17			
			SPT-8	12.5 - 14.0	1.4	5-9-11	20			
			SPT-9	14.0 - 15.5	1.1	5-8-11	16			
			SPT-10	15.5 - 17.0	1.1	5-7-8	16			
			SPT-11	17.0 - 18.5	1.5	3-6-6	20			
			SPT-12	18.5 - 20.0	1.3	6-12-8	12			
			SPT-13	20.0 - 21.5	0.9	4-5-6	16			
			SPT-14	21.5 - 23.0	1.0	6-3-4	18			
367.1'	24.5'	- with gravel and fly ash from 19.5 to 20.0 feet		SPT-15	23.0 - 24.5	0.8	3-2-3	20	Began using drilling fluid at 24.5 feet	
		POORLY GRADED GRAVEL with Silt and Sand, brown, wet, loose to medium dense		SPT-16	24.5 - 26.0	0.0	3-5-6	--		
			SPT-17	26.0 - 27.5	0.0	3-7-15	--			
			SPT-18	27.5 - 29.0	0.6	6-12-7	15			
			SPT-19	29.0 - 30.5	0.4	4-3-3	14			
			SPT-20	30.5 - 32.0	0.1	4-5-4	--			
			SPT-21	32.0 - 33.5	0.0	2-3-1	--			
357.1'	34.5'				SPT-22	33.5 - 35.0	0.8	0-0-2		24
			SILT, brown and gray, wet, very soft		SPT-23	35.0 - 36.5	0.2	0-0-2		28
354.6'	37.0'					SPT-24	36.5 - 38.0	1.5		2-2-3
				LEAN CLAY, brown and gray, wet, medium stiff, occasional gravel		SPT-25	38.0 - 39.5	0.7	1-2-2	33
		SPT-26			39.5 - 41.0	0.0	5-4-3	--		
		SPT-27			41.0 - 42.5	0.4	6-2-3	22		
		SPT-28			42.5 - 44.0	0.9	3-3-3	19		

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Project No.	175559008	Location	N 601437.52, E 1411070.75 (NAD27)	
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-CC	Total Depth 61.5 ft

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth	
330.1'	61.5'	LEAN CLAY, brown and gray, wet, medium stiff, occasional gravel (Continued)		SPT-29	44.0 - 45.5	0.4	2-5-2	29	Boring backfilled with bentonite grout from 0.0 ft to 61.5 ft
				SPT-30	45.5 - 47.0	1.5	0-0-3	30	
				SPT-31	47.0 - 48.5	1.5	4-3-4	27	
				SPT-32	48.5 - 50.0	1.5	2-2-2	33	
				SPT-33	50.0 - 51.5	1.4	1-2-4	28	
				ST-1	53.0 - 55.0	2.0		29	
				SPT-34	55.0 - 56.5	1.3	WOH	26	
				SPT-35	56.5 - 58.0	1.3	WOR	27	
				SPT-36	58.0 - 59.5	1.3	0-0-1	26	
				SPT-37	60.0 - 61.5	1.4	4-6-12	21	

No Refusal /
Bottom of Hole

WOH=Weight of Hammer,
WOR=Weight of Rods

Project No.	175559008	Location	N 601439.64, E 1411087.11 (NAD27)	
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-CC-PZ	Total Depth 26.0 ft
Location	Humphreys County, Tennessee	Surface Elevation	392.5 ft. (NGVD29)	
Project Type	Geotechnical Exploration	Date Started	4/1/09	Completed 4/1/09
Supervisor	N. Puckett	Driller	Tim Caudill	Depth to Water 23.6 ft
Logged By	N. Puckett	Date/Time	5/27/09	
		Automatic Hammer	<input type="checkbox"/>	Safety Hammer <input type="checkbox"/>
		Other	<input type="checkbox"/>	

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth	
392.5'	0.0'	Top of Hole							
		OVERBURDEN							Boring advanced using 4 1/4" Hollow Stem Augers
				ST-1	5.0 - 7.0	0.9		17	Piezometer constructed from 15 ft of 1" PVC Riser Pipe and 10 ft of 1" PVC Slotted Screen
				ST-2	10.0 - 12.0	0.9		20	
									Screened zone from 15 ft to 25 ft
									Piezometer backfilled with sand, bentonite pellets, and bentonite grout from 0.0 ft to 26.0 ft
366.5'	26.0'								

No Refusal /
Bottom of Hole

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Project No.	175559008	Location	N 601382.49, E 1410633.59 (NAD27)	
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-CCA	Total Depth 49.0 ft
Location	Humphreys County, Tennessee	Surface Elevation	394.6 ft. (NGVD29)	
Project Type	Geotechnical Exploration	Date Started	8/27/09	Completed 8/27/09
Supervisor	P. Cooper Driller M. Martin	Depth to Water	N/A	Date/Time 8/27/09N/A
Logged By	B. Wyatt	Automatic Hammer	<input checked="" type="checkbox"/>	Safety Hammer <input type="checkbox"/> Other <input type="checkbox"/>

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth	
394.6'	0.0'	Top of Hole							
		FLY ASH, black, moist, very loose to dense		SPT-1	0.0 - 1.5	1.0	3-7-6	--	Boring advanced using 3.25" hollow stem auger.
				SPT-2	2.5 - 4.0	1.1	13-18-21	--	
				SPT-3	5.0 - 6.5	1.3	7-5-5	--	
		-with some bottom ash between 7.5' to 11.5'		SPT-4	7.5 - 9.0	0.7	WOH-5-5	--	
				SPT-5	10.0 - 11.5	1.2	WOH-1-1	--	
				SPT-6	12.5 - 14.0	0.7	WOH- WOH-WOH	--	
				SPT-7	15.0 - 16.5	1.5	WOH- WOH-WOH	--	
				SPT-8	17.5 - 19.0	1.5	3-2-3	--	
				SPT-9	20.0 - 21.5	1.1	4-4-4	--	
				SPT-10	22.5 - 24.0	1.3	1-1-1	--	
368.1'	26.5'			SPT-11	25.0 - 26.5	0.9	2-4-3	--	
		BOTTOM ASH, black, moist to wet, loose to dense		SPT-12	27.5 - 29.0	1.5	11-20-19	--	
				SPT-13	30.0 - 31.5	1.2	6-6-7	--	
				SPT-14	32.5 - 34.0	1.5	5-8-8	--	
				SPT-15	35.0 - 36.5	1.2	1-2-4	--	
355.6'	39.0'	-with some clay at 39.0'		SPT-16	37.5 - 39.0	0.7	1-2-2	--	
		LEAN CLAY, tan and grayish brown, moist, stiff to very stiff, with trace fine to medium sand, silty		SPT-17	40.0 - 41.5	1.5	2-2-2	--	
				SPT-18	42.5 - 44.0	1.5	WOH-3-6	--	

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Project No.	175559008	Location	N 601382.49, E 1410633.59 (NAD27)	
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-CCA	Total Depth 49.0 ft

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth	
345.6'	49.0'	LEAN CLAY, tan and grayish brown, moist, stiff to very stiff, with trace fine to medium sand, silty <i>(Continued)</i>		SPT-19	45.0 - 46.5	1.5	2-6-6	--	Boring backfilled with bentonite grout from 0.0' to 49.0'.
				SPT-20	47.5 - 49.0	1.5	8-8-8	--	

No Refusal /
Bottom of Hole

Project No.	175559008	Location	N 601449.55, E 1411148.76 (NAD27)		
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-CT	Total Depth	51.5 ft
Location	Humphreys County, Tennessee	Surface Elevation	368.9 ft. (NGVD29)		
Project Type	Geotechnical Exploration	Date Started	3/17/09	Completed	3/17/09
Supervisor	Russ Mehnert	Driller	G. Thompson	Depth to Water	15.0 ft
Logged By	Russ Mehnert	Automatic Hammer	<input checked="" type="checkbox"/>	Safety Hammer	<input type="checkbox"/>
		Other	<input type="checkbox"/>		

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth	
368.9'	0.0'	Top of Hole							
		SANDY LEAN CLAY with Gravel, various browns and gray, moist to wet, soft to very stiff		SPT-1	0.0 - 1.5	0.7	3-5-7	19	Boring advanced using 3 1/4" Hollow Stem Augers
			SPT-2	1.5 - 3.0	1.2	5-5-6	16		
			SPT-3	3.0 - 4.5	0.8	4-3-3	17		
			SPT-4	4.5 - 6.0	1.1	2-5-12	15		
			SPT-5	6.0 - 7.5	0.8	12-7-6	14		
			SPT-6	7.5 - 9.0	0.9	2-2-2	16		
			SPT-7	9.0 - 10.5	1.3	3-4-8	18		
			SPT-8	10.5 - 12.0	0.7	3-7-4	12		
			SPT-9	12.0 - 13.5	1.1	3-4-3	16		
			SPT-10	13.5 - 15.0	1.0	1-2-3	27		
			SPT-11	15.0 - 16.5	1.0	1-2-2	24		
			SPT-12	16.5 - 18.0	1.4	1-2-1	31		
			SPT-13	18.0 - 19.5	0.9	WOH-1-2	28		
		LEAN CLAY, brown and gray, moist to wet, very soft to medium stiff		SPT-14	19.5 - 21.0	0.8	WOH-1-1	26	Began using drilling fluid at 15.0 feet
			SPT-15	21.0 - 22.5	1.5	2-2-2	34		
			SPT-16	22.5 - 24.0	1.3	WOH-1-1	32		
			SPT-17	25.0 - 26.5	1.5	WOH-2-5	29		
			SPT-18	27.5 - 29.0	0.5	2-3-3	39		
			SPT-19	30.0 - 31.5	1.5	1-2-1	29		
			SPT-20	32.5 - 34.0	1.5	WOH-1-2	32		
			LEAN CLAY with Gravel, brown and gray, moist to wet, medium stiff to stiff		SPT-21	35.0 - 36.5	1.1	2-2-3	
		SPT-22		37.5 - 39.0	1.5	4-4-5	23		
		SPT-23		40.0 - 41.5	1.5	5-6-5	21		
		SPT-24		42.5 - 44.0	1.5	2-4-4	25		

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Project No.	175559008	Location	N 601449.55, E 1411148.76 (NAD27)		
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-CT	Total Depth	51.5 ft

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth	
321.4'	47.5'	LEAN CLAY with Gravel, brown and gray, moist to wet, medium stiff to stiff <i>(Continued)</i>		SPT-25	45.0 - 46.5	1.5	2-2-13	30	Boring backfilled with bentonite grout from 0.0 ft to 51.5 ft
		POORLY GRADED SAND with Silt, brown, wet, medium dense		SPT-26	47.5 - 49.0	1.1	7-20-27	16	
317.4'	51.5'			SPT-27	50.0 - 51.5	0.8	6-12-15	18	

No Refusal /
Bottom of Hole

WOH=Weight of
Hammer

Project No.	175559008	Location	N 601449.55, E 1411148.76 (NAD27)		
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-CT-PZ	Total Depth	26.0 ft
Location	Humphreys County, Tennessee	Surface Elevation	368.9 ft. (NGVD29)		
Project Type	Geotechnical Exploration	Date Started	3/17/09	Completed	3/17/09
Supervisor	Russ Mehnert	Driller	G. Thompson	Depth to Water	8.4 ft
Logged By	Russ Mehnert	Automatic Hammer	<input type="checkbox"/>	Safety Hammer	<input type="checkbox"/>
		Other	<input type="checkbox"/>		

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth	
368.9'	0.0'	Top of Hole							
		OVERBURDEN							Boring advanced using 3 1/4" Hollow Stem Augers
									Piezometer constructed from 15.2 ft of 1" PVC Riser Pipe and 10 ft of 1" PVC Slotted Screen
									Screened zone from 15.2 ft to 25.2 ft
									Piezometer backfilled with sand, bentonite pellets, and bentonite grout from 0.0 ft to 26.0 ft
342.9'	26.0'								

No Refusal /
Bottom of Hole

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Project No. <u>175559008</u>		Location <u>N 601113.79, E 1411129.20 (NAD27)</u>	
Project Name <u>Johnsonville Fossil Plant -- TVA</u>		Boring No. <u>STN-C1C</u>	Total Depth <u>40.5 ft</u>
Location <u>Humphreys County, Tennessee</u>		Surface Elevation <u>391.5 ft. (NGVD29)</u>	
Project Type <u>Geotechnical Exploration</u>		Date Started <u>9/1/09</u>	Completed <u>9/1/09</u>
Supervisor <u>P. Cooper</u> Driller <u>A. Clements</u>		Depth to Water <u>14.3 ft</u>	Date/Time <u>11/16/09</u>
Logged By <u>B. Wyatt</u>		Automatic Hammer <input checked="" type="checkbox"/> Safety Hammer <input type="checkbox"/> Other <input type="checkbox"/>	

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth	
391.5'	0.0'	Top of Hole							
		FAT CLAY, yellowish brown to orange brown and brown, moist, stiff to hard, with trace medium to coarse sand and fine gravel		SPT-1	0.0 - 1.5	0.8	49-40-35	--	Borings advanced using 3.25" hollow stem augers/
				SPT-2	1.5 - 3.0	1.2	47-49-26	--	
				SPT-3	3.0 - 4.5	1.5	15-15-21	--	
				SPT-4	4.5 - 6.0	1.5	17-19-19	--	
				SPT-5	6.0 - 7.5	1.2	16-22-25	--	
				SPT-6	7.5 - 9.0	1.5	9-9-14	--	
382.5'	9.0'	LEAN CLAY, reddish brown and gray, moist, stiff to very stiff, with trace medium to coarse sand, silty -with trace fine gravel below 25.5'		SPT-7	9.0 - 10.5	0.8	21-22-22	--	
				SPT-8	10.5 - 12.0	1.2	8-8-11	--	
				SPT-9	12.0 - 13.5	1.1	12-13-14	--	
				SPT-10	13.5 - 15.0	1.1	5-6-6	--	
				SPT-11	15.0 - 16.5	1.5	5-5-7	--	
				SPT-12	16.5 - 18.0	1.4	11-13-9	--	
				SPT-13	18.0 - 19.5	0.9	7-7-7	--	
				SPT-14	19.5 - 21.0	1.5	3-4-4	--	
				SPT-15	21.0 - 22.5	0.5	4-6-8	--	
				SPT-16	22.5 - 24.0	0.8	6-10-9	--	
				SPT-17	24.0 - 25.5	1.2	4-6-6	--	
				SPT-18	25.5 - 27.0	0.8	4-11-12	--	
				SPT-19	27.0 - 28.5	1.3	5-6-6	--	
				SPT-20	28.5 - 30.0	0.9	2-2-4	--	
				SPT-21	30.0 - 31.5	1.5	4-6-6	--	
				SPT-22	31.5 - 33.0	1.5	5-6-6	--	
				SPT-23	33.0 - 34.5	1.5	3-3-5	--	
				SPT-24	34.5 - 36.0	1.5	3-4-4	--	
				SPT-25	36.0 - 37.5	1.5	3-3-4	--	
				SPT-26	37.5 - 39.0	1.5	5-7-10	--	
351.0'	40.5'				SPT-27	39.0 - 40.5	1.5	11-8-10	
		No Refusal / Bottom of Hole							

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Project No.	175559008	Location	N 601113.79, E 1411129.20 (NAD27)	
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-C1C-PZ	Total Depth 30.0 ft
Location	Humphreys County, Tennessee	Surface Elevation	391.5 ft. (NGVD29)	
Project Type	Geotechnical Exploration	Date Started	9/1/09	Completed 9/1/09
Supervisor	P. Cooper	Driller	M. Martin	Depth to Water N/A
Logged By	B. Wyatt	Automatic Hammer	<input type="checkbox"/>	Safety Hammer <input type="checkbox"/> Other <input type="checkbox"/>

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth	
391.5'	0.0'	Top of Hole							
		SOIL OVERBURDEN							Boring advanced using 3 1/4" Hollow Stem Augers
									Piezometer constructed from 20 ft of 1" PVC Riser Pipe and 10 ft of 1" PVC Slotted Screen
									Screened zone from 20 ft to 30 ft
									Piezometer backfilled with sand, bentonite pellets, and bentonite grout from 0.0 ft to 30 ft
361.5'	30.0'	No Refusal / Bottom of Hole							

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Project No.	175559008	Location	N 601054.92, E 1410641.77 (NAD27)	
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-C1CA	Total Depth 51.5 ft
Location	Humphreys County, Tennessee	Surface Elevation	394.0 ft. (NGVD29)	
Project Type	Geotechnical Exploration	Date Started	8/27/09	Completed 8/27/09
Supervisor	P. Cooper Driller M. Martin	Depth to Water	11.5 ft	Date/Time 8/27/09
Logged By	B. Wyatt	Automatic Hammer	<input checked="" type="checkbox"/>	Safety Hammer <input type="checkbox"/> Other <input type="checkbox"/>

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth	
394.0'	0.0'	Top of Hole							
		FLY ASH, black, moist to wet, medium dense to very dense		SPT-1	0.0 - 1.5	1.1	4-16-12	--	Boring advanced using 3.25" hollow stem augers.
			SPT-2	2.5 - 4.0	1.5	12-34-43	--		
			SPT-3	5.0 - 6.5	1.5	6-16-18	--		
			SPT-4	7.5 - 9.0	1.3	6-12-18	--		
			SPT-5	10.0 - 11.5	1.4	3-5-8	--		
			SPT-6	12.5 - 14.0	1.2	3-5-5	--		
			SPT-7	15.0 - 16.5	1.5	3-4-3	--		
			SPT-8	17.5 - 19.0	1.5	4-2-3	--		
			SPT-9	20.0 - 21.5	1.2	1-2-2	--		
			SPT-10	22.5 - 24.0	1.5	4-6-9	--		
370.0'	24.0'	BOTTOM ASH, black, wet, medium dense to very dense		SPT-11	25.0 - 26.5	1.4	12-34-45	--	
			SPT-12	27.5 - 29.0	0.8	4-8-9	--		
			SPT-13	30.0 - 31.5	1.5	7-15-18	--		
			SPT-14	32.5 - 34.0	1.5	4-3-10	--		
			SPT-15	35.0 - 36.5	1.5	5-6-7	--		
355.0'	39.0'	-with some clay at 39.0'		SPT-16	37.5 - 39.0	1.5	2-7-13	--	
		LEAN CLAY, brown to grayish brown, moist, very soft to very stiff		SPT-17	40.0 - 41.5	1.5	WOH- WOH-WOH	--	
			SPT-18	42.5 - 44.0	1.5	6-10-10	--		

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Project No.	175559008	Location	N 601054.92, E 1410641.77 (NAD27)
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-C1CA Total Depth 51.5 ft

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth	
342.5'	51.5'	LEAN CLAY, brown to grayish brown, moist, very soft to very stiff <i>(Continued)</i>		SPT-19	45.0 - 46.5	1.5	4-7-9	--	Boring backfilled with bentonite grout from 0.0' to 51.5'.
				SPT-20	47.5 - 49.0	1.5	4-7-8	--	
				SPT-21	50.0 - 51.5	1.5	8-9-10	--	

No Refusal /
Bottom of Hole

Project No.	175559008	Location	N 601029.42, E 1410415.09 (NAD27)		
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-C1CB	Total Depth	61.5 ft
Location	Humphreys County, Tennessee	Surface Elevation	398.4 ft. (NGVD29)		
Project Type	Geotechnical Exploration	Date Started	8/26/09	Completed	8/26/09
Supervisor	P. Cooper Driller M. Martin	Depth to Water	2.5 ft	Date/Time	8/26/09
Logged By	B. Wyatt	Automatic Hammer	<input checked="" type="checkbox"/>	Safety Hammer	<input type="checkbox"/>
		Other	<input type="checkbox"/>		

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth	
398.4'	0.0'	Top of Hole							
		FLY ASH, black, moist to wet, very loose to medium dense		SPT-1	0.0 - 1.5	0.9	4-6-6	--	Boring advanced with 3.25" hollow stem augers.
				SPT-2	2.5 - 4.0	0.9	6-5-5	--	
				SPT-3	5.0 - 6.5	0.7	1-2-3	--	
				SPT-4	7.5 - 9.0	0.0	WOR-WOR-WOH	--	
				SPT-5	10.0 - 11.5	1.4	WOR-WOR-WOR	--	
				SPT-6	12.5 - 14.0	0.5	WOH-WOH-WOH	--	
				SPT-7	15.0 - 16.5	1.5	WOH-WOH-WOH	--	
				SPT-8	17.5 - 19.0	1.5	1-2-1	--	
				SPT-9	20.0 - 21.5	1.5	WOH-WOH-WOH	--	
				SPT-10	22.5 - 24.0	1.5	WOR-WOR-WOR	--	
				SPT-11	25.0 - 26.5	1.5	WOR-WOR-WOH	--	
				SPT-12	27.5 - 29.0	1.5	WOH-1-1	--	
				SPT-13	30.0 - 31.5	1.5	1-3-2	--	
				SPT-14	32.5 - 34.0	1.5	3-3-3	--	
		-trace bottom ash at 35.0' to 36.5'		SPT-15	35.0 - 36.5	0.6	7-10-3	--	
				SPT-16	37.5 - 39.0	1.0	3-5-7	--	
				SPT-17	40.0 - 41.5	1.0	4-7-9	--	
		-trace bottom ash at 42.5' to 44.0'		SPT-18	42.5 - 44.0	1.4	4-4-4	--	

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Project No.	175559008	Location	N 601029.42, E 1410415.09 (NAD27)		
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-C1CB	Total Depth	61.5 ft

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth	
349.4'	49.0'	FLY ASH, black, moist to wet, very loose to medium dense <i>(Continued)</i>		SPT-19	45.0 - 46.5	1.5	WOH-1-1	--	Boring backfilled with bentonite grout from 0.0' to 61.5'.
				SPT-20	47.5 - 49.0	1.5	WOR-WOH-2	--	
339.4'	59.0'	LEAN CLAY, brown and tan, moist, stiff to very stiff, with trace fine to medium sand		SPT-21	50.0 - 51.5	1.5	5-8-11	--	
				SPT-22	52.5 - 54.0	1.5	3-5-6	--	
				SPT-32	55.0 - 56.5	1.4	4-5	--	
				SPT-24	57.5 - 59.0	1.5	5-7-9	--	
336.9'	61.5'	SILTY CLAY, brown and tan, wet, very stiff, with trace fine to medium sand		SPT-25	60.0 - 61.5	1.5	6-6-8	--	

No Refusal /
Bottom of Hole

Project No.	175559008	Location	N 601033.28, E 1411220.15 (NAD27)		
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-C1T	Total Depth	15.5 ft
Location	Humphreys County, Tennessee	Surface Elevation	365.5 ft. (NGVD29)		
Project Type	Geotechnical Exploration	Date Started	12/15/09	Completed	12/15/09
Supervisor	S. Zayko	Driller	M. Wethington	Depth to Water	4.6 ft
Logged By	S. Zayko	Automatic Hammer	<input checked="" type="checkbox"/>	Safety Hammer	<input type="checkbox"/>
		Other	<input type="checkbox"/>		

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois. Cont. %	Remarks
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth	
365.5'	0.0'	Top of Hole							
359.0'	6.5'	GRAVEL with Clay and Sand, gray and brown, dry to moist, loose to medium dense, angular limestone gravel		SPT-1	0.0 - 1.5	1.0	2-4-17	15	Boring advanced using 3 1/4" Hollow Stem Augers Piezometer constructed from 9.0 ft of 1" PVC Riser Pipe and 5 ft of 1" PVC Slotted Screen Screened zone from 9.0 ft to 14.0 ft Piezometer backfilled with sand, bentonite pellets, and bentonite grout from 0.0 ft to 15.5 ft
				SPT-2	2.5 - 4.0	1.0	5-13-8	7	
				SPT-3	5.0 - 6.5	0.5	6-4-2	8	
350.0'	15.5'	SANDY LEAN CLAY with Gravel, brown and gray, moist, soft to medium stiff		SPT-4	7.5 - 9.0	1.0	1-2-2	25	
				SPT-5	10.0 - 11.5	1.2	1-2-3	25	
				SPT-6	12.5 - 14.0	1.0	3-3-3	23	
				SPT-7	14.0 - 15.5	0.8	1-1-1	24	

No Refusal /
Bottom of Hole

Project No.	175559008	Location	N 600191.17, E 1410774.31 (NAD27)		
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-DC	Total Depth	61.5 ft
Location	Humphreys County, Tennessee	Surface Elevation	390.0 ft. (NGVD29)		
Project Type	Geotechnical Exploration	Date Started	3/18/09	Completed	3/19/09
Supervisor	N. Puckett	Driller	Tim Caudill	Depth to Water	45.0 ft
Logged By	N. Puckett	Automatic Hammer	<input checked="" type="checkbox"/>	Safety Hammer	<input type="checkbox"/>
		Other	<input type="checkbox"/>		

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth	
390.0'	0.0'	Top of Hole							
		LEAN CLAY, brown and gray, moist, soft to very stiff - tree root encountered at 13.0 feet (approx. 6-in. diam.)		SPT-1	0.0 - 1.5	1.3	3-4-5	16	Boring advanced using 4 1/4" Hollow Stem Augers
			SPT-2	1.5 - 3.0	1.2	6-6-7	17		
			SPT-3	3.0 - 4.5	1.5	3-3-4	21		
			SPT-4	4.5 - 6.0	1.2	4-6-7	18		
			SPT-5	6.0 - 7.5	1.5	7-7-11	17		
			SPT-6	7.5 - 9.0	1.3	5-7-9	18		
			SPT-7	9.0 - 10.5	1.5	5-7-9	18		
			SPT-8	10.5 - 12.0	1.4	5-5-6	18		
			SPT-9	12.0 - 13.5	1.5	3-5-4	20		
			SPT-10	13.5 - 15.0	0.0	7-5-6	--		
			SPT-11	15.0 - 16.5	1.0	5-7-8	16		
			SPT-12	16.5 - 18.0	0.6	5-3-5	19		
			SPT-13	18.0 - 19.5	1.0	3-3-4	22		
			SPT-14	19.5 - 21.0	0.9	2-2-4	20		
			SPT-15	21.0 - 22.5	1.2	2-2-2	22		
			SPT-16	22.5 - 24.0	1.1	1-1-3	23		
365.0'	25.0'		SILT, brown, wet, very soft to very stiff		SPT-17	24.0 - 25.5	1.5	0-1-2	
		SPT-18		25.5 - 27.0	1.1	0-0-2	25		
		SPT-19		27.0 - 28.5	1.0	WOH	23		
		SPT-20		28.5 - 30.0	1.1	0-2-4	19		
		SPT-21		30.0 - 31.5	1.2	1-5-4	18		
		SPT-22		31.5 - 33.0	1.4	3-6-9	18		
		SPT-23		33.0 - 34.5	1.0	1-4-5	20		
355.5'	34.5'	LEAN CLAY, brown and gray, moist to wet, soft to very stiff, gravelly from 34.5' to 36.0', trace amount of sand throughout, increasing silt content with depth		SPT-24	34.5 - 36.0	1.0	2-4-6	17	
			SPT-25	36.0 - 37.5	1.4	1-1-2	26		
			SPT-26	37.5 - 39.0	1.4	0-2-5	26		
			SPT-27	39.0 - 40.5	1.5	3-5-7	24		
			SPT-28	40.5 - 42.0	1.5	3-5-8	23		
			SPT-29	42.0 - 43.5	1.5	3-6-6	22		

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Project No.	175559008	Location	N 600191.17, E 1410774.31 (NAD27)		
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-DC	Total Depth	61.5 ft

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth	
		LEAN CLAY, brown and gray, moist to wet, soft to very stiff, gravelly from 34.5' to 36.0', trace amount of sand throughout, increasing silt content with depth <i>(Continued)</i>		SPT-30	43.5 - 45.0	1.5	2-5-8	24	Began using drilling fluid at 45.0 feet
				SPT-31	45.0 - 46.5	1.3	2-3-6	24	
				SPT-32	46.5 - 48.0	1.4	4-4-7	23	
				SPT-33	48.0 - 49.5	1.5	4-7-9	26	
				SPT-34	49.5 - 51.0	1.4	3-7-8	24	
				SPT-35	51.0 - 52.5	1.5	7-7-9	22	
				SPT-36	52.5 - 54.0	1.5	6-6-8	22	
				SPT-37	55.0 - 56.5	1.5	4-6-7	22	
				SPT-38	57.5 - 59.0	1.1	5-5-5	24	Boring backfilled with bentonite grout from 0.0 ft to 61.5 ft
329.0'	61.0'		SPT-39	60.0 - 61.5	1.3	4-17-40	14		

329.0' 61.0'
328.5' 61.5'

SILTY SAND, brown, wet, very dense

No Refusal /
Bottom of Hole

WOH=Weight of Hammer

Project No.	175559008	Location	N 600184.33, E 1410790.81 (NAD27)		
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-DC-PZ	Total Depth	26.0 ft
Location	Humphreys County, Tennessee	Surface Elevation	391.2 ft. (NGVD29)		
Project Type	Geotechnical Exploration	Date Started	4/1/09	Completed	4/1/09
Supervisor	N. Puckett	Driller	Tim Caudill	Depth to Water	22.0 ft
Logged By	N. Puckett	Automatic Hammer	<input type="checkbox"/>	Safety Hammer	<input type="checkbox"/>
		Other	<input type="checkbox"/>		

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth	
391.2'	0.0'	Top of Hole							
		OVERBURDEN							Boring advanced using 4 1/4" Hollow Stem Augers
				ST-1	5.0 - 7.0	0.7		18	Piezometer constructed from 15 ft of 1" PVC Riser Pipe and 10 ft of 1" PVC Slotted Screen
				ST-2	10.0 - 12.0	0.9		19	
									Screened zone from 15 ft to 25 ft
									Piezometer backfilled with sand, bentonite pellets, and bentonite grout from 0.0 ft to 26.0 ft
365.2'	26.0'	No Refusal / Bottom of Hole							

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Project No.	175559008	Location	N 600147.64, E 1410847.53 (NAD27)		
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-DT	Total Depth	56.5 ft
Location	Humphreys County, Tennessee	Surface Elevation	365.3 ft. (NGVD29)		
Project Type	Geotechnical Exploration	Date Started	3/10/09	Completed	3/10/09
Supervisor	Russ Mehnert	Driller	G. Thompson	Depth to Water	18.0 ft
Logged By	Russ Mehnert	Automatic Hammer	<input checked="" type="checkbox"/>	Safety Hammer	<input type="checkbox"/>
		Other	<input type="checkbox"/>		

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth	
365.3'	0.0'	Top of Hole							
		LEAN CLAY with Gravel, brown, tan, and gray, moist, soft to stiff		SPT-1	0.0 - 1.5	1.0	3-3-5	18	Boring advanced using 3 1/4" Hollow Stem Augers
			SPT-2	1.5 - 3.0	1.2	4-6-7	17		
			SPT-3	3.0 - 4.5	1.1	3-4-5	19		
			SPT-4	4.5 - 6.0	1.3	3-2-6	20		
			SPT-5	6.0 - 7.5	1.5	5-7-9	20		
			SPT-6	7.5 - 9.0	1.5	5-5-8	18		
			SPT-7	9.0 - 10.5	1.5	3-3-8	23		
			SPT-8	10.5 - 12.0	1.0	2-3-2	38		
			SPT-9	12.0 - 13.5	1.5	2-3-4	29		
			SPT-10	13.5 - 15.0	1.5	2-2-4	28		
			SPT-11	15.0 - 16.5	1.5	2-3-4	25		
			SPT-12	16.5 - 18.0	1.0	3-2-4	26		
			ST-1	18.0 - 20.0	2.0		25		
			SPT-13	20.0 - 21.5	1.5	3-4-6	25		
			SPT-14	22.5 - 24.0	1.5	4-5-8	21		
			SPT-15	25.0 - 26.5	1.5	3-6-8	21		
			SPT-16	27.5 - 29.0	1.5	6-6-7	22		
			SPT-17	30.0 - 31.5	1.5	2-4-5	22		
331.5'	33.8'	POORLY GRADED SAND, dark brown, brown, tan, and gray, wet, loose to dense		SPT-18	32.5 - 34.0	1.5	4-6-10	24	Began using drilling fluid at 18.0 feet
			SPT-19	35.0 - 36.5	0.9	3-5-7	23		
			SPT-20	37.5 - 39.0	1.1	8-11-13	21		
			SPT-21	40.0 - 41.5	1.5	12-20-19	17		
			SPT-22	42.5 - 44.0	1.5	4-2-4	22		

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Project No.	175559008	Location	N 600147.64, E 1410847.53 (NAD27)	
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-DT	Total Depth 56.5 ft

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth	
308.8'	56.5'	POORLY GRADED SAND, dark brown, brown, tan, and gray, wet, loose to dense <i>(Continued)</i>		SPT-23	45.0 - 46.5	1.5	4-8-6	21	Boring backfilled with bentonite grout from 0.0 ft to 56.5 ft.
				SPT-24	47.5 - 49.0	1.5	2-2-2	34	
				SPT-25	50.0 - 51.5	1.2	11-11-11	24	
				SPT-26	52.5 - 54.0	1.0	7-9-10	20	
				SPT-27	55.0 - 56.5	1.4	7-10-12	24	

No Refusal /
Bottom of Hole

Project No.	175559008	Location	N 600147.64, E 1410847.53 (NAD27)	
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-DT-PZ	Total Depth 26.0 ft
Location	Humphreys County, Tennessee	Surface Elevation	365.3 ft. (NGVD29)	
Project Type	Geotechnical Exploration	Date Started	3/10/09	Completed 3/10/09
Supervisor	Russ Mehnert	Driller	G. Thompson	Depth to Water 5.2 ft
Logged By	Russ Mehnert	Date/Time 5/27/09		
		Automatic Hammer	<input type="checkbox"/>	Safety Hammer <input type="checkbox"/>
		Other <input type="checkbox"/>		

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth	
365.3'	0.0'	Top of Hole							
		OVERBURDEN							Boring advanced using 3 1/4" Hollow Stem Augers
									Piezometer constructed from 15.4 ft of 1" PVC Riser Pipe and 10 ft of 1" PVC Slotted Screen
									Screened zone from 15.4 ft to 25.4 ft
									Piezometer backfilled with sand, bentonite pellets, and bentonite grout from 0.0 ft to 26.0 ft
339.3'	26.0'								

No Refusal /
Bottom of Hole

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Project No.	175559008	Location	N 599528.35, E 1410416.19 (NAD27)	
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-EC	Total Depth 61.5 ft
Location	Humphreys County, Tennessee	Surface Elevation	390.2 ft. (NGVD29)	
Project Type	Geotechnical Exploration	Date Started	3/19/09	Completed 3/19/09
Supervisor	N. Puckett	Driller	J. Felts	Depth to Water 15.0 ft
Logged By	N. Puckett	Automatic Hammer	<input checked="" type="checkbox"/>	Safety Hammer <input type="checkbox"/> Other <input type="checkbox"/>

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth	
390.2'	0.0'	Top of Hole							
		OVERBURDEN							Boring advanced using 4 1/4" Hollow Stem Augers
									Began using drilling fluid at 15.0 feet
360.2'	30.0'	LEAN CLAY, brown and gray, moist, medium stiff to very stiff, gravelly from 33.0' to 34.5'							
				SPT-1	30.0 - 31.5	1.0	2-3-3	22	
				SPT-2	31.5 - 33.0	1.3	6-8-14	18	
				SPT-3	33.0 - 34.5	1.0	14-16-16	16	
				SPT-4	34.5 - 36.0	0.8	3-4-5	23	
				SPT-5	36.0 - 37.5	0.9	3-5-7	25	
				SPT-6	37.5 - 39.0	0.8	6-7-7	23	
				SPT-7	39.0 - 40.5	0.8	3-4-4	24	
				SPT-8	40.5 - 42.0	1.1	4-4-7	25	
				SPT-9	42.0 - 43.5	1.5	4-6-8	22	

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Project No. <u>175559008</u>		Location <u>N 599528.35, E 1410416.19 (NAD27)</u>	
Project Name <u>Johnsonville Fossil Plant -- TVA</u>		Boring No. <u>STN-EC</u> Total Depth <u>61.5 ft</u>	

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth	
342.2'	48.0'	LEAN CLAY, brown and gray, moist, medium stiff to very stiff, gravelly from 33.0' to 34.5' <i>(Continued)</i>		SPT-10	43.5 - 45.0	1.3	5-8-10	22	Boring backfilled with bentonite grout from 0.0 ft to 61.5 ft
				SPT-11	45.0 - 46.5	1.3	6-8-9	22	
				SPT-12	46.5 - 48.0	1.3	5-6-8	22	
				SPT-13	48.0 - 49.5	1.2	3-6-7	23	
332.2'	58.0'	SILT, brown and gray, moist, stiff, trace amounts of sand throughout		SPT-14	49.5 - 51.0	1.5	6-7-7	22	
				SPT-15	51.0 - 52.5	1.2	5-5-6	22	
				SPT-16	52.5 - 54.0	1.5	4-4-5	24	
				SPT-17	55.0 - 56.5	1.4	4-6-7	24	
				SPT-18	57.5 - 59.0	1.4	3-2-9	29	
328.7'	61.5'	SILTY SAND with Gravel, brown and gray, wet, medium dense		SPT-19	60.0 - 61.5	1.3	4-7-13	20	

No Refusal /
Bottom of Hole

Project No.	175559008	Location	N 599528.35, E 1410416.19 (NAD27)		
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-EC-A	Total Depth	33.0 ft
Location	Humphreys County, Tennessee	Surface Elevation	390.2 ft. (NGVD29)		
Project Type	Geotechnical Exploration	Date Started	4/7/09	Completed	4/7/09
Supervisor	N. Puckett	Driller	Tim Caudill	Depth to Water	17.0 ft
Logged By	N. Puckett	Automatic Hammer	<input checked="" type="checkbox"/>	Safety Hammer	<input type="checkbox"/>
		Other	<input type="checkbox"/>		

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth	
390.2'	0.0'	Top of Hole							
		LEAN CLAY, brown and gray, moist, medium to very stiff, gravel and sand content increases with depth		SPT-1	0.0 - 1.5	1.0	4-7-7	16	Boring advanced using 4 1/4" Hollow Stem Augers Rock and ash from 0 ft to 4 ft.
				SPT-2	3.0 - 4.5	1.2	4-7-9	18	
				SPT-3	4.5 - 6.0	1.5	4-5-6	17	
				SPT-4	6.5 - 8.0	1.2	4-4-6	26	
				SPT-5	9.0 - 10.5	0.9	3-4-6	20	
				SPT-6	11.5 - 13.0	1.2	2-2-4	16	
				SPT-7	14.0 - 15.5	0.6	2-4-5	16	
373.7'	16.5'	BOTTOM ASH, black moist to, wet, loose to medium dense		SPT-8	16.5 - 18.0	1.4	7-10-9	18	Began using drilling fluid at 17.0 feet
				SPT-9	19.0 - 20.5	1.4	2-3-3	21	
368.7'	21.5'	LEAN CLAY, brown and gray to tan, moist, very soft to stiff, gravel throughout		SPT-10	21.5 - 23.0	1.3	0-0-3	28	Boring backfilled with bentonite grout from 0.0 ft to 33.0 ft
				SPT-11	24.0 - 25.5	1.0	2-2-3	29	
				SPT-12	26.5 - 28.0	1.5	1-3-3	24	
				SPT-13	29.0 - 30.5	1.2	4-6-7	24	
				ST-1	31.0 - 33.0	1.3		22	
357.2'	33.0'	No Refusal / Bottom of Hole							

Project No.	175559008	Location	N 599517.65, E 1410428.37 (NAD27)	
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-EC-PZ	Total Depth 27.0 ft
Location	Humphreys County, Tennessee	Surface Elevation	390.4 ft. (NGVD29)	
Project Type	Geotechnical Exploration	Date Started	4/1/09	Completed 4/1/09
Supervisor	N. Puckett	Driller	Tim Caudill	Depth to Water 3.8 ft
Logged By	N. Puckett	Date/Time	5/27/09	
		Automatic Hammer	<input type="checkbox"/>	Safety Hammer <input type="checkbox"/>
		Other	<input type="checkbox"/>	

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth	
390.4'	0.0'	Top of Hole							
		OVERBURDEN							Boring advanced using 4 1/4" Hollow Stem Augers
				ST-1	5.0 - 7.0	1.3		19	Piezometer constructed from 15 ft of 1" PVC Riser Pipe and 10 ft of 1" PVC Slotted Screen
									Screened zone from 15 ft to 25 ft
				ST-2	25.0 - 27.0	0.8		20	Piezometer backfilled with sand, bentonite pellets, and bentonite grout from 0.0 ft to 27.0 ft
363.4'	27.0'	No Refusal / Bottom of Hole							

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Project No.	175559008	Location	N 599486.09, E 1410496.27 (NAD27)	
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-ET	Total Depth 55.5 ft
Location	Humphreys County, Tennessee	Surface Elevation	363.8 ft. (NGVD29)	
Project Type	Geotechnical Exploration	Date Started	3/9/09	Completed 3/9/09
Supervisor	Russ Mehnert	Driller	G. Thompson	Depth to Water 28.0 ft
Logged By	Russ Mehnert	Date/Time 3/9/09		
		Automatic Hammer	<input checked="" type="checkbox"/>	Safety Hammer <input type="checkbox"/>
		Other <input type="checkbox"/>		

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth	
363.8'	0.0'	Top of Hole							
		LEAN CLAY, brown, tan, and gray, moist, soft to stiff, with gravel, roots, peat, chert. Ash layer from 4.5' to 4.9'		SPT-1	0.0 - 1.5	0.8	2-1-2	21	Boring advanced using 3 1/4" Hollow Stem Augers SPT-2 low rec. due to large gravel
			SPT-2	1.5 - 3.0	0.2	2-3-3	20		
			SPT-3	3.0 - 4.5	1.5	6-6-7	21		
			SPT-4	4.5 - 6.0	1.5	5-5-8	21		
			ST-1	6.0 - 8.0	0.9		19		
			SPT-5	8.0 - 9.5	1.1	WOH-2-2	25		
			SPT-6	9.5 - 11.0	1.5	1-2-2	28		
			SPT-7	11.0 - 12.5	1.4	2-4-4	27		
			ST-2	12.5 - 14.5	1.8		26		
			SPT-8	14.5 - 16.0	1.5	2-2-2	27		
			SPT-9	16.0 - 17.5	1.5	2-4-4	24		
			SPT-10	17.5 - 19.0	1.5	3-6-9	20		
			SPT-11	19.0 - 20.5	1.5	4-6-9	22		
			SPT-12	21.5 - 23.0	1.5	6-10-10	22		
		SPT-13	24.0 - 25.5	1.5	2-5-8	25			
		SPT-14	26.5 - 28.0	1.3	4-4-6	26			
		POORLY GRADED SAND with Silt, brown, tan, gray, and black, wet, loose to medium dense		SPT-15	29.0 - 30.5	1.5	3-3-3	29	Perched zone from 11.0' to 12.0'
			SPT-16	31.5 - 33.0	1.5	4-10-6	18		
			SPT-17	34.0 - 35.5	1.0	6-13-14	17		
			SPT-18	36.5 - 38.0	1.1	7-10-14	15		
			SPT-19	39.0 - 40.5	1.5	14-12-12	17		
			SPT-20	41.5 - 43.0	1.2	4-10-12	20		
334.3'	29.5'								Began using drilling fluid at 28.0 feet

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Project No.	175559008	Location	N 599486.09, E 1410496.27 (NAD27)		
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-ET	Total Depth	55.5 ft

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth	
308.3'	55.5'	POORLY GRADED SAND with Silt, brown, tan, gray, and black, wet, loose to medium dense <i>(Continued)</i>		SPT-21	44.0 - 45.5	1.3	8-14-11	19	Boring backfilled with bentonite grout from 0.0 ft to 55.5 ft
				SPT-22	46.5 - 48.0	1.4	11-14-14	22	
				SPT-23	49.0 - 50.5	1.0	4-7-7	16	
				SPT-24	51.5 - 53.0	1.2	10-10-10	18	
				SPT-25	54.0 - 55.5	1.3	6-7-5	20	

No Refusal /
Bottom of Hole

WOH=Weight of Hammer



Project No.	175559008	Location	N 599486.09, E 1410496.27 (NAD27)		
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-ET-PZ	Total Depth	35.0 ft
Location	Humphreys County, Tennessee	Surface Elevation	363.8 ft. (NGVD29)		
Project Type	Geotechnical Exploration	Date Started	3/16/09	Completed	3/16/09
Supervisor	Russ Mehnert	Driller	G. Thompson	Depth to Water	5.5 ft
Logged By	Russ Mehnert	Automatic Hammer	<input type="checkbox"/>	Safety Hammer	<input type="checkbox"/>
		Other	<input type="checkbox"/>		

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth	
363.8'	0.0'	Top of Hole							
		OVERBURDEN							Boring advanced using 3 1/4" Hollow Stem Augers
									Piezometer constructed from 24 ft of 1" PVC Riser Pipe and 10 ft of 1" PVC Slotted Screen
									Screened zone from 24 ft to 34 ft
									Piezometer backfilled with sand, bentonite pellets, and bentonite grout from 0.0 ft to 35.0 ft
328.8'	35.0'								

No Refusal /
Bottom of Hole

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Project No.	175559008	Location	N 598898.88, E 1410062.79 (NAD27)	
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-FC	Total Depth 61.5 ft
Location	Humphreys County, Tennessee	Surface Elevation	389.4 ft. (NGVD29)	
Project Type	Geotechnical Exploration	Date Started	4/2/09	Completed 4/2/09
Supervisor	N. Puckett	Driller	Tim Caudill	Depth to Water 17.5 ft
Logged By	N. Puckett	Automatic Hammer	<input checked="" type="checkbox"/>	Safety Hammer <input type="checkbox"/> Other <input type="checkbox"/>

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth	
389.4'	0.0'	Top of Hole							
389.1'	0.3'	CRUSHED STONE		SPT-1	0.0 - 1.5	1.2	15-7-10	16	Boring advanced using 4 1/4" Hollow Stem Augers
		LEAN CLAY, brown and gray, moist, stiff to very stiff - with small rounded gravel below 10.5 feet		SPT-2	1.5 - 3.0	1.3	4-8-11	15	
			SPT-3	3.0 - 4.5	1.2	5-7-9	18		
			SPT-4	4.5 - 6.0	1.0	5-6-8	22		
			SPT-5	6.0 - 7.5	1.4	5-8-14	16		
			SPT-6	7.5 - 9.0	1.2	5-9-10	16		
			SPT-7	9.0 - 10.5	1.0	4-3-5	20		
			SPT-8	10.5 - 12.0	0.9	3-5-6	16		
			SPT-9	12.0 - 13.5	1.0	3-5-6	19		
374.9'	14.5'				SPT-10	13.5 - 15.0	1.5	4-30-49	
		BOTTOM ASH, black, moist to wet, medium to very dense		SPT-11	15.0 - 16.5	1.4	10-23-22	12	Began using drilling fluid at 17.5 feet
371.6'	17.8'	LEAN CLAY, brown and gray, moist to wet, medium to very stiff - dark gray layer from 32.0 to 35.0 feet		SPT-12	16.5 - 18.0	1.1	4-11-4	13	
			SPT-13	18.0 - 19.5	0.9	0-1-3	24		
			ST-1	19.5 - 21.5	1.5		25		
			SPT-14	21.5 - 23.0	1.0	3-3-5	26		
			SPT-15	23.0 - 24.5	1.0	2-2-4	22		
			SPT-16	24.5 - 26.0	1.2	2-2-5	24		
			SPT-17	26.0 - 27.5	1.3	4-6-8	22		
			SPT-18	27.5 - 29.0	1.5	5-7-9	22		
			SPT-19	29.0 - 30.5	0.9	4-5-4	25		
			SPT-20	30.5 - 32.0	0.9	5-7-9	25		
		SPT-21	32.0 - 33.5	1.0	2-2-3	23			
		SPT-22	33.5 - 35.0	1.2	1-3-2	25			
		ST-2	35.0 - 37.0	1.1		26			
		SPT-23	37.0 - 38.5	1.3	0-3-5	25			
		SPT-24	38.5 - 40.0	1.2	2-4-8	24			
		SPT-25	40.0 - 41.5	1.4	5-7-8	22			
		SPT-26	41.5 - 43.0	1.5	4-6-8	25			
		SPT-27	43.0 - 44.5	1.5	3-4-5	23			

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Project No.	175559008	Location	N 598898.88, E 1410062.79 (NAD27)	
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-FC	Total Depth 61.5 ft

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth	
335.4'	54.0'	LEAN CLAY, brown and gray, moist to wet, medium to very stiff <i>(Continued)</i>		ST-3	44.5 - 46.5	2.0		24	
				SPT-28	46.5 - 48.0	1.3	0-2-4	24	
				SPT-29	48.0 - 49.5	1.4	1-5-6	24	
				SPT-30	49.5 - 51.0	1.5	7-5-7	24	
				SPT-31	51.0 - 52.5	1.3	3-4-6	27	
				SPT-32	52.5 - 54.0	1.4	5-6-5	28	
				SPT-33	54.0 - 55.5	1.5	0-0-0	29	
328.4'	61.0'	SILT, dark gray and gray, wet, very soft to medium stiff		SPT-34	55.5 - 57.0	1.5	0-2-3	28	
				SPT-35	57.0 - 58.5	1.5	0-2-3	28	
				SPT-36	58.5 - 60.0	1.5	1-2-2	28	
				SPT-37	60.0 - 61.5	1.4	0-2-19	19	

Boring backfilled with bentonite grout from 0.0 ft to 61.5 ft

POORLY GRADED SAND with Gravel, gray, wet, dense

No Refusal / Bottom of Hole

Project No.	175559008	Location	N 598892.27, E 1410076.24 (NAD27)		
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-FC-PZ	Total Depth	26.0 ft
Location	Humphreys County, Tennessee	Surface Elevation	389.8 ft. (NGVD29)		
Project Type	Geotechnical Exploration	Date Started	4/7/09	Completed	4/7/09
Supervisor	N. Puckett	Driller	J. Felts	Depth to Water	3.6 ft
Logged By	N. Puckett	Automatic Hammer	<input type="checkbox"/>	Safety Hammer	<input type="checkbox"/>
		Other	<input type="checkbox"/>		

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth	
389.8'	0.0'	Top of Hole							
		OVERBURDEN							
				ST-1	5.0 - 7.0	1.3		18	Boring advanced using 3 1/4" Hollow Stem Augers Piezometer constructed from 15 ft of 1" PVC Riser Pipe and 10 ft of 1" PVC Slotted Screen
				ST-2	10.0 - 12.0	1.0		18	
									Screened zone from 15 ft to 25 ft
									Piezometer backfilled with sand, bentonite pellets, and bentonite grout from 0.0 ft to 26.0 ft
363.8'	26.0'	No Refusal / Bottom of Hole							

Project No.	175559008	Location	N 598868.34, E 1410145.49 (NAD27)	
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-FT	Total Depth 61.5 ft
Location	Humphreys County, Tennessee	Surface Elevation	362.9 ft. (NGVD29)	
Project Type	Geotechnical Exploration	Date Started	3/9/09	Completed 3/9/09
Supervisor	Russ Mehnert Driller G. Thompson	Depth to Water	27.5 ft	Date/Time 3/9/09
Logged By	Russ Mehnert	Automatic Hammer	<input checked="" type="checkbox"/>	Safety Hammer <input type="checkbox"/> Other <input type="checkbox"/>

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth	
362.9'	0.0'	Top of Hole							
		LEAN CLAY with Gravel, brown, tan, and gray, moist, soft to very stiff		SPT-1	0.0 - 1.5	0.9	0-2-2	22	Boring advanced using 3 1/4" Hollow Stem Augers
			SPT-2	1.5 - 3.0	1.0	5-7-7	18		
			SPT-3	3.0 - 4.5	1.4	4-5-8	20		
			SPT-4	4.5 - 6.0	0.1	2-3-3	23		
			SPT-5	6.0 - 7.5	1.2	3-2-3	22		
			SPT-6	7.5 - 9.0	1.3	3-5-5	25		
			SPT-7	9.0 - 10.5	1.5	2-1-2	25		
			SPT-8	10.5 - 12.0	1.4	WOH-1-3	23		
			SPT-9	12.0 - 13.5	1.5	3-6-8	24		
			SPT-10	13.5 - 15.0	1.3	9-10-14	22		
			SPT-11	15.0 - 16.5	1.5	3-5-7	23		
			SPT-12	17.5 - 19.0	1.5	6-7-9	23		
			SPT-13	20.0 - 21.5	1.5	5-6-7	23		
			SPT-14	22.5 - 24.0	1.5	5-7-9	25		
			SPT-15	25.0 - 26.5	1.5	2-5-5	23		
		SPT-16	27.5 - 29.0	1.3	WOH-2-2	29			
		POORLY GRADED SAND, brown, tan, and gray, wet, medium dense		SPT-17	30.0 - 31.5	1.0	5-5-7	14	Perched Zone 12.0' to 15.0'
			SPT-18	32.5 - 34.0	1.3	4-12-15	25		
			SPT-19	35.0 - 36.5	1.3	7-10-16	20		
			SPT-20	37.5 - 39.0	1.5	7-11-14	21		
			SPT-21	40.0 - 41.5	1.0	8-9-14	16		
			SPT-22	42.5 - 44.0	1.1	9-14-19	18		
332.9'	30.0'								Began using drilling fluid at 27.5 feet

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Project No.	175559008	Location	N 598868.34, E 1410145.49 (NAD27)	
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-FT	Total Depth 61.5 ft

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth	
310.1'	52.8'	POORLY GRADED SAND, brown, tan, and gray, wet, medium dense <i>(Continued)</i> - with clay lense at 52.5'		SPT-23	45.0 - 46.5	1.5	7-11-14	26	SPT-26 sample split
				SPT-24	47.5 - 49.0	1.2	5-6-9	30	
				SPT-25	50.0 - 51.5	1.5	2-2-3	30	
				SPT-26	52.5 - 54.0	1.3	5-6-9	16	
				SPT-27	55.0 - 56.5	0.7	6-7-8	19	
301.4'	61.5'	POORLY GRADED SAND with Gravel, brown, gray, tan, and black, wet, medium dense		SPT-28	57.5 - 59.0	0.7	5-6-7	18	Boring backfilled with bentonite grout from 0.0 ft to 61.5 ft
				SPT-29	60.0 - 61.5	1.0	9-12-11	19	

No Refusal /
Bottom of Hole

WOH=Weight of
Hammer



Project No.	175559008	Location	N 598868.34, E 1410145.49 (NAD27)		
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-FT-PZ	Total Depth	36.5 ft
Location	Humphreys County, Tennessee	Surface Elevation	362.9 ft. (NGVD29)		
Project Type	Geotechnical Exploration	Date Started	3/9/09	Completed	3/9/09
Supervisor	Russ Mehnert	Driller	G. Thompson	Depth to Water	1.9 ft
Logged By	Russ Mehnert	Automatic Hammer	<input type="checkbox"/>	Safety Hammer	<input type="checkbox"/>
		Other	<input type="checkbox"/>		

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth	
362.9'	0.0'	Top of Hole							
		OVERBURDEN							Boring advanced using 3 1/4" Hollow Stem Augers
									Piezometer constructed from 25.3 ft of 1" PVC Riser Pipe and 10 ft of 1" PVC Slotted Screen
									Screened zone from 25.3 ft to 35.3 ft
									Piezometer backfilled with sand, bentonite pellets, and bentonite grout from 0.0 ft to 36.5 ft
326.4'	36.5'								

No Refusal /
Bottom of Hole

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Project No.	175559008	Location	N 598719.43, E 1409736.38 (NAD27)		
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-GC	Total Depth	61.5 ft
Location	Humphreys County, Tennessee	Surface Elevation	389.6 ft. (NGVD29)		
Project Type	Geotechnical Exploration	Date Started	4/7/09	Completed	4/7/09
Supervisor	N. Puckett Driller J. Felts	Depth to Water	17.0 ft	Date/Time	4/7/09
Logged By	N. Puckett	Automatic Hammer	<input checked="" type="checkbox"/>	Safety Hammer	<input type="checkbox"/>
		Other	<input type="checkbox"/>		

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core						
389.6'	0.0'	Top of Hole							
389.2'	0.4'	POORLY GRADED GRAVEL		SPT-1	0.0 - 1.5	1.3	13-8-11	16	Boring advanced using 4 1/4" Hollow Stem Augers
		LEAN CLAY, brown and gray, moist, medium to stiff, increasing rock content with depth		SPT-2	1.5 - 3.0	1.1	8-8-9	20	
			SPT-3	3.0 - 4.5	1.3	3-5-8	16		
			SPT-4	4.5 - 6.0	1.5	5-5-9	17		
			SPT-5	6.0 - 7.5	1.4	4-8-8	18		
			SPT-6	7.5 - 9.0	1.3	5-10-13	16		
			SPT-7	9.0 - 10.5	1.3	5-7-10	17		
			SPT-8	10.5 - 12.0	1.3	3-6-8	15		
			SPT-9	12.0 - 13.5	0.5	2-5-6	19		
			SPT-10	13.5 - 15.0	0.9	2-5-8	19		
374.1'	15.5'	BOTTOM ASH, black, moist to wet, medium to dense		SPT-11	15.0 - 16.5	1.5	5-45-50	9	Began using drilling fluid at 17.0 feet
			SPT-12	16.5 - 18.0	0.9	12-18-19	15		
			SPT-13	18.0 - 19.5	1.2	10-13-5	16		
369.8'	19.8'	LEAN CLAY, brown and gray, moist to wet, stiff		SPT-14	19.5 - 21.0	0.9	2-4-5	23	
			SPT-15	21.0 - 22.5	0.9	4-3-7	21		
			ST-1	22.5 - 24.5	1.2		22		
			SPT-16	24.5 - 26.0	1.4	2-3-6	23		
			SPT-17	26.0 - 27.5	1.1	6-7-7	21		
			SPT-18	27.5 - 29.0	1.5	3-4-5	22		
			SPT-19	29.0 - 30.5	1.0	2-6-6	22		
			SPT-20	30.5 - 32.0	1.5	0-3-4	23		
			SPT-21	32.0 - 33.5	1.0	1-3-4	24		
			SPT-22	33.5 - 35.0	1.1	2-3-4	25		
			SPT-23	35.0 - 36.5	1.4	0-0-3	27		
			ST-2	36.5 - 38.5	1.5		22		
			SPT-24	38.5 - 40.0	1.5	5-5-6	24		
			SPT-25	40.0 - 41.5	1.3	3-6-9	24		
		SPT-26	41.5 - 43.0	1.5	3-5-7	25			
		SPT-27	43.0 - 44.5	1.5	5-7-12	23			

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Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth	
340.1'	49.5'	LEAN CLAY, brown and gray, moist to wet, stiff <i>(Continued)</i>		ST-3	44.5 - 46.5	1.6		29	Boring backfilled with bentonite grout from 0.0 ft to 61.5 ft
				SPT-28	46.5 - 48.0	1.5	1-6-6	26	
				SPT-29	48.0 - 49.5	1.5	6-7-8	25	
328.6' 328.1'	61.0' 61.5'	SILT, brown and gray to gray, wet, very soft to very stiff		SPT-30	49.5 - 51.0	1.5	3-3-4	22	
				SPT-31	51.0 - 52.5	1.5	6-6-7	25	
				SPT-32	52.5 - 54.0	1.4	6-5-8	24	
				SPT-33	54.0 - 55.5	1.5	5-8-17	25	
				SPT-34	55.5 - 57.0	1.5	0-0-0	28	
				SPT-35	57.0 - 58.5	1.5	4-5-3	27	
				SPT-36	58.5 - 60.0	0.0	0-0-0	--	
	SPT-37	60.0 - 61.5	1.5	0-1-19	27				
		POORLY GRADED SAND, brown, moist, dense							
		No Refusal / Bottom of Hole							

Project No.	175559008	Location	N 598696.58, E 1409758.99 (NAD27)	
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-GC-PZ	Total Depth 27.0 ft
Location	Humphreys County, Tennessee	Surface Elevation	389.8 ft. (NGVD29)	
Project Type	Geotechnical Exploration	Date Started	4/7/09	Completed 4/7/09
Supervisor	N. Puckett	Driller	J. Felts	Depth to Water 13.0 ft
Logged By	N. Puckett	Date/Time	5/27/09	
		Automatic Hammer	<input type="checkbox"/>	Safety Hammer <input type="checkbox"/>
		Other	<input type="checkbox"/>	

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth	
389.8'	0.0'	Top of Hole							
		OVERBURDEN							Boring advanced using 3 1/4" Hollow Stem Augers
				ST-1	5.0 - 7.0	1.3		18	Piezometer constructed from 15 ft of 1" PVC Riser Pipe and 10 ft of 1" PVC Slotted Screen
									Screened zone from 15 ft to 25 ft
				ST-2	25.0 - 27.0	0.7		19	Piezometer backfilled with sand, bentonite pellets, and bentonite grout from 0.0 ft to 27.0 ft
362.8'	27.0'	No Refusal / Bottom of Hole							

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Project No.	175559008	Location	N 598582.54, E 1409772.40 (NAD27)		
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-GT	Total Depth	51.0 ft
Location	Humphreys County, Tennessee	Surface Elevation	360.8 ft. (NGVD29)		
Project Type	Geotechnical Exploration	Date Started	3/10/09	Completed	3/10/09
Supervisor	Russ Mehnert Driller K. Clements	Depth to Water	24.5 ft	Date/Time	3/10/09
Logged By	Russ Mehnert	Automatic Hammer	<input checked="" type="checkbox"/>	Safety Hammer	<input type="checkbox"/>
		Other	<input type="checkbox"/>		

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth	
360.8'	0.0'	Top of Hole							
		LEAN CLAY with Gravel and Organics, brown and gray, moist, soft to very stiff		SPT-1	0.0 - 1.5	1.2	2-2-3	23	Boring advanced using 3 1/4" Hollow Stem Augers
			SPT-2	1.5 - 3.0	1.0	2-2-4	23		
			SPT-3	3.0 - 4.5	1.5	2-2-2	27		
			SPT-4	4.5 - 6.0	1.4	3-5-6	22		
			SPT-5	6.0 - 7.5	1.5	5-5-8	23		
			SPT-6	7.5 - 9.0	1.5	2-5-7	24		
			SPT-7	9.0 - 10.5	1.5	9-10-5	22		
			SPT-8	10.5 - 12.0	1.5	8-7-10	21		
			ST-1	12.0 - 14.0	2.0		28		
			SPT-9	14.5 - 16.0	1.5	WOH-4-6	22		
			SPT-10	17.0 - 18.5	1.5	3-5-7	23		
			SPT-11	19.5 - 21.0	1.5	3-4-6	24		
			SPT-12	22.0 - 23.5	1.5	3-4-5	23		
			SPT-13	24.5 - 26.0	1.5	3-4-6	22	Began using drilling fluid at 24.5 feet	
			SPT-14	27.0 - 28.5	1.5	1-1-1	26		
329.8'	31.0'	POORLY GRADED SAND with Gravel, tan, brown, and gray, wet, very loose to dense		SPT-15	29.5 - 31.0	1.5	WOH-1-1	26	
			SPT-16	32.0 - 33.5	1.2	10-13-18	17		
			SPT-17	34.5 - 36.0	0.6	6-5-6	18		
			SPT-18	37.0 - 38.5	1.0	3-7-7	27		
			SPT-19	39.5 - 41.0	0.6	WOH-WOH-1	21		
			SPT-20	42.0 - 43.5	0.4	7-7-7	18		

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Project No.	175559008	Location	N 598582.54, E 1409772.40 (NAD27)		
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-GT	Total Depth	51.0 ft

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth	
309.8'	51.0'	POORLY GRADED SAND with Gravel, tan, brown, and gray, wet, very loose to dense <i>(Continued)</i>		SPT-21	44.5 - 46.0	1.1	7-10-20	18	Boring backfilled with bentonite grout from 0.0 ft to 51.0 ft
				SPT-22	47.0 - 48.5	0.4	5-7-11	20	
				SPT-23	49.5 - 51.0	1.5	14-11-14	17	

No Refusal /
Bottom of Hole

WOH=Weight of Hammer



Project No.	175559008	Location	N 598582.54, E 1409772.40 (NAD27)		
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-GT-PZ	Total Depth	31.5 ft
Location	Humphreys County, Tennessee	Surface Elevation	360.8 ft. (NGVD29)		
Project Type	Geotechnical Exploration	Date Started	3/10/09	Completed	3/10/09
Supervisor	Russ Mehnert	Driller	K. Clements	Depth to Water	1.5 ft
Logged By	Russ Mehnert	Automatic Hammer	<input type="checkbox"/>	Safety Hammer	<input type="checkbox"/>
		Other	<input type="checkbox"/>		

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth	
360.8'	0.0'	Top of Hole							
		OVERBURDEN							Boring advanced using 3 1/4" Hollow Stem Augers
									Piezometer constructed from 20.4 ft of 1" PVC Riser Pipe and 10 ft of 1" PVC Slotted Screen
									Screened zone from 20.4 ft to 30.4 ft
									Piezometer backfilled with sand, bentonite pellets, and bentonite grout from 0.0 ft to 31.5 ft
329.3'	31.5'								

No Refusal /
Bottom of Hole

Project No.	175559008	Location	N 599345.93, E 1409646.07 (NAD27)		
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-HC	Total Depth	61.5 ft
Location	Humphreys County, Tennessee	Surface Elevation	389.5 ft. (NGVD29)		
Project Type	Geotechnical Exploration	Date Started	3/3/09	Completed	3/4/09
Supervisor	Russ Mehnert	Driller	G. Thompson	Depth to Water	15.5 ft
Logged By	Russ Mehnert	Automatic Hammer	<input checked="" type="checkbox"/>	Safety Hammer	<input type="checkbox"/>
		Other	<input type="checkbox"/>		

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core						
389.5'	0.0'	Top of Hole							
		LEAN CLAY with Sand, brown, gray, and red, moist, medium stiff to very stiff - layer of gravel from 8.0 to 8.7 feet		SPT-1	0.0 - 1.5	0.9	6-3-2	20	Boring advanced using 3 1/4" Hollow Stem Augers
			SPT-2	1.5 - 3.0	1.5	4-4-7	23		
			SPT-3	3.0 - 4.5	1.5	3-6-7	24		
			SPT-4	4.5 - 6.0	1.5	3-5-7	21		
			SPT-5	6.0 - 7.5	1.5	3-5-8	24		
			SPT-6	7.5 - 9.0	1.5	5-11-8	22		
			SPT-7	9.0 - 10.5	1.5	4-7-9	20		
			SPT-8	10.5 - 12.0	1.5	4-7-10	21		
			SPT-9	12.0 - 13.5	1.5	3-5-5	22		
375.0'	14.5'		SPT-10	13.5 - 15.0	1.5	5-7-23	13		
		BOTTOM ASH, dark gray and black, moist to wet, very loose to dense, with layers of clay and fly ash throughout		SPT-11	15.0 - 16.5	1.5	13-18-15	14	Began using drilling fluid at 15.5 feet
			SPT-12	16.5 - 18.0	1.5	2-1-1	33		
			SPT-13	18.0 - 19.5	1.5	8-10-12	14		
			SPT-14	19.5 - 21.0	1.3	12-13-10	13		
368.5'	21.0'	FLY ASH, dark gray, wet, very loose		SPT-15	21.0 - 22.5	0.9	3-2-1	37	
			SPT-16	22.5 - 24.0	1.5	2-1-1	39		
			SPT-17	24.0 - 25.5	1.5	WOR	33		
363.0'	26.5'	LEAN CLAY, tan, gray, and brownish yellow, moist to wet, medium stiff to stiff		SPT-18	25.5 - 27.0	1.5	WOR-WOH-3	27	
			SPT-19	27.0 - 28.5	0.9	3-3-4	23		
			SPT-20	28.5 - 30.0	0.9	3-3-6	21		
			SPT-21	30.0 - 31.5	1.3	4-5-7	28		
			SPT-22	31.5 - 33.0	1.4	5-7-10	22		
			SPT-23	33.0 - 34.5	1.4	4-4-7	25		
			SPT-24	34.5 - 36.0	1.5	4-5-7	26		
			SPT-25	36.0 - 37.5	1.5	5-8-7	32		
			SPT-26	37.5 - 39.0	1.5	3-5-5	23		
			SPT-27	39.0 - 40.5	1.5	4-5-6	27		
			SPT-28	40.5 - 42.0	1.5	4-4-5	26		
			SPT-29	42.0 - 43.5	1.5	3-3-5	27		

Project No.	175559008	Location	N 599345.93, E 1409646.07 (NAD27)		
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-HC	Total Depth	61.5 ft

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth	
335.5'	54.0'	LEAN CLAY, tan, gray, and brownish yellow, moist to wet, medium stiff to stiff <i>(Continued)</i>		SPT-30	43.5 - 45.0	1.5	2-2-4	31	Boring backfilled with bentonite grout from 0.0 ft to 61.5 ft
				SPT-31	45.0 - 46.5	1.5	2-3-4	29	
				SPT-32	46.5 - 48.0	1.5	5-6-6	27	
				SPT-33	48.0 - 49.5	1.5	2-3-3	29	
				SPT-34	49.5 - 51.0	1.5	3-4-8	26	
				SPT-35	51.0 - 52.5	1.5	4-4-5	28	
329.5'	60.0'	CLAYEY SAND with Gravel, tan and gray, wet, loose to dense		SPT-36	52.5 - 54.0	1.5	2-3-5	27	
				SPT-37	54.0 - 55.5	1.5	3-2-4	28	
				SPT-38	55.5 - 57.0	1.5	2-6-12	23	
				SPT-39	57.0 - 58.5	1.5	12-31-34	22	
328.0'	61.5'	POORLY GRADED SAND with Gravel, tan and gray, wet, dense		SPT-40	58.5 - 60.0	1.0	7-15-21	24	
				SPT-41	60.0 - 61.5	1.1	13-27-28	20	

No Refusal /
Bottom of Hole

WOH=Weight of Hammer,
WOR=Weight of Rods

Project No.	175559008	Location	N 599314.96, E 1409635.77 (NAD27)	
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-HC-PZ	Total Depth 27.0 ft
Location	Humphreys County, Tennessee	Surface Elevation	390.0 ft. (NGVD29)	
Project Type	Geotechnical Exploration	Date Started	4/2/09	Completed 4/2/09
Supervisor	N. Puckett	Driller	Tim Caudill	Depth to Water 3.6 ft
Logged By	N. Puckett	Date/Time	5/27/09	
		Automatic Hammer	<input type="checkbox"/>	Safety Hammer <input type="checkbox"/>
		Other	<input type="checkbox"/>	

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth	
390.0'	0.0'	Top of Hole							
		OVERBURDEN							Boring advanced using 3 1/4" Hollow Stem Augers
				ST-1	5.0 - 7.0	0.6		20	Piezometer constructed from 14.2 ft of 1" PVC Riser Pipe and 10 ft of 1" PVC Slotted Screen
									Screened zone from 14.2 ft to 24.2 ft
				ST-2	25.0 - 27.0	0.2		23	Piezometer backfilled with sand, bentonite pellets, and bentonite grout from 0.0 ft to 27.0 ft

No Refusal /
Bottom of Hole

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Project No.	175559008	Location	N 599331.00, E 1409595.58 (NAD27)		
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-HM	Total Depth	46.5 ft
Location	Humphreys County, Tennessee	Surface Elevation	377.9 ft. (NGVD29)		
Project Type	Geotechnical Exploration	Date Started	3/11/09	Completed	3/12/09
Supervisor	N. Puckett Driller J. Felts	Depth to Water	35.0 ft	Date/Time	3/11/09
Logged By	N. Puckett	Automatic Hammer	<input checked="" type="checkbox"/>	Safety Hammer	<input type="checkbox"/>
		Other	<input type="checkbox"/>		

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth	
377.9'	0.0'	Top of Hole							
377.7'	0.2'	TOPSOIL		SPT-1	0.0 - 1.5	1.4	3-4-7	20	Boring advanced using 3 1/4" Hollow Stem Augers
		LEAN CLAY, brown and gray, moist to wet, soft to very stiff		SPT-2	1.5 - 3.0	1.2	3-4-7	19	
			SPT-3	3.0 - 4.5	1.5	3-5-6	21		
			SPT-4	4.5 - 6.0	1.1	4-5-8	19		
			ST-1	6.0 - 8.0	1.5		20		
			SPT-5	8.0 - 9.5	1.1	4-4-5	21		
			SPT-6	9.5 - 11.0	0.6	1-1-2	20		
			SPT-7	11.0 - 12.5	1.2	2-3-4	22		
			SPT-8	12.5 - 14.0	0.9	2-4-6	21		
			SPT-9	14.0 - 15.5	1.1	2-4-6	24		
			SPT-10	15.5 - 17.0	1.1	6-7-8	23		
			SPT-11	17.0 - 18.5	1.3	2-4-5	22		
			SPT-12	18.5 - 20.0	1.2	1-2-4	24		
			SPT-13	20.0 - 21.5	1.2	4-7-8	23		
			SPT-14	21.5 - 23.0	1.2	2-3-4	23		
			SPT-15	23.0 - 24.5	1.0	1-3-6	23		
			SPT-16	24.5 - 26.0	1.4	2-5-5	25		
			SPT-17	26.0 - 27.5	1.5	5-6-6	29		
			SPT-18	27.5 - 29.0	1.2	2-4-5	25		
			SPT-19	29.0 - 30.5	1.5	2-3-5	24		
			SPT-20	30.5 - 32.0	1.0	1-3-4	25		
			SPT-21	32.0 - 33.5	1.5	4-6-7	24		
			SPT-22	33.5 - 35.0	1.5	2-4-5	24		
			SPT-23	35.0 - 36.5	1.5	3-3-5	24		
			SPT-24	36.5 - 38.0	1.5	2-4-4	25		
			SPT-25	39.5 - 41.0	1.5	3-5-6	25		
		SPT-26	42.5 - 44.0	1.5	2-5-6	27			

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Project No.	175559008	Location	N 599331.00, E 1409595.58 (NAD27)	
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-HM	Total Depth 46.5 ft

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth	
331.4'	46.5'	LEAN CLAY, brown and gray, moist to wet, soft to very stiff <i>(Continued)</i>		SPT-27	45.0 - 46.5	1.5	2-4-6	27	0.0 ft to 46.5 ft

No Refusal /
Bottom of Hole



Project No.	175559008	Location	N 599308.41, E 1409545.23 (NAD27)		
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-HT	Total Depth	51.5 ft
Location	Humphreys County, Tennessee	Surface Elevation	363.1 ft. (NGVD29)		
Project Type	Geotechnical Exploration	Date Started	3/11/09	Completed	3/11/09
Supervisor	N. Puckett	Driller	J. Felts	Depth to Water	29.0 ft
Logged By	N. Puckett	Automatic Hammer	<input checked="" type="checkbox"/>	Safety Hammer	<input type="checkbox"/>
		Other	<input type="checkbox"/>		

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core						
363.1'	0.0'	Top of Hole							
362.8'	0.3'	ROOT ZONE		SPT-1	0.0 - 1.5	1.5	3-7-9	21	Boring advanced using 3 1/4" Hollow Stem Augers
		LEAN CLAY, brown, medium to very stiff		SPT-2	1.5 - 3.0	1.4	6-9-9	18	
				SPT-3	5.0 - 6.5	1.5	3-4-5	22	
				SPT-4	7.5 - 9.0	1.3	2-2-3	28	
				SPT-5	10.0 - 11.5	1.5	2-3-3	25	
				SPT-6	12.5 - 14.0	1.5	2-5-6	25	
				SPT-7	15.0 - 16.5	1.5	2-3-4	29	
				SPT-8	17.5 - 19.0	1.4	1-2-3	26	
				SPT-9	20.0 - 21.5	1.3	2-4-5	24	
				SPT-10	22.5 - 24.0	1.4	3-5-7	25	
				SPT-11	25.0 - 26.5	1.4	4-5-7	25	
				SPT-12	27.5 - 29.0	1.5	2-3-4	28	
				SPT-13	30.0 - 31.5	1.3	2-2-2	28	
				SPT-14	32.5 - 34.0	1.1	1-3-15	26	
		WELL GRADED SAND with Silt and Gravel, brown, wet, medium dense to dense		SPT-15	35.0 - 36.5	1.0	6-10-11	18	Began using drilling fluid at 29.0 feet
				SPT-16	37.5 - 39.0	1.1	6-10-13	19	
				SPT-17	40.0 - 41.5	1.3	12-22-19	19	
				SPT-18	42.5 - 44.0	1.3	15-16-11	16	
329.6'	33.5'								

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Project No.	<u>175559008</u>	Location	<u>N 599308.41, E 1409545.23 (NAD27)</u>	
Project Name	<u>Johnsonville Fossil Plant -- TVA</u>	Boring No.	<u>STN-HT</u>	Total Depth <u>51.5 ft</u>

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth	
311.6'	51.5'	WELL GRADED SAND with Silt and Gravel, brown, wet, medium dense to dense <i>(Continued)</i>		SPT-19	45.0 - 46.5	1.2	4-5-7	16	Boring backfilled with bentonite grout from 0.0 ft to 51.5 ft
				SPT-20	47.5 - 49.0	1.4	19-15-12	16	
				SPT-21	50.0 - 51.5	1.5	12-16-16	15	

No Refusal /
Bottom of Hole



Project No. 175559008 Location N 599308.41, E 1409545.23 (NAD27)
 Project Name Johnsonville Fossil Plant -- TVA Boring No. **STN-HT-PZ** Total Depth 48.0 ft
 Location Humphreys County, Tennessee Surface Elevation 363.1 ft. (NGVD29)
 Project Type Geotechnical Exploration Date Started 3/11/09 Completed 3/11/09
 Supervisor N. Puckett Driller J. Felts Depth to Water 4.2 ft Date/Time 5/27/09
 Logged By N. Puckett Automatic Hammer Safety Hammer Other

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth	
363.1'	0.0'	Top of Hole							
		OVERBURDEN							Boring advanced using 3 1/4" Hollow Stem Augers Piezometer constructed from 27 ft of 1" PVC Riser Pipe and 20 ft of 1" PVC Slotted Screen Screened zone from 27 ft to 47 ft Piezometer backfilled with sand, bentonite pellets, and bentonite grout from 0.0 ft to 48.0 ft

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Project No.	175559008	Location	N 599308.41, E 1409545.23 (NAD27)
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-HT-PZ Total Depth 48.0 ft

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth	
315.1'	48.0'	OVERBURDEN (Continued)							

No Refusal /
Bottom of Hole

Project No.	<u>175559008</u>	Location	<u>N 600055.90, E 1409637.66 (NAD27)</u>		
Project Name	<u>Johnsonville Fossil Plant -- TVA</u>	Boring No.	STN-IC	Total Depth	<u>61.5 ft</u>
Location	<u>Humphreys County, Tennessee</u>	Surface Elevation	<u>389.8 ft. (NGVD29)</u>		
Project Type	<u>Geotechnical Exploration</u>	Date Started	<u>3/4/09</u>	Completed	<u>3/4/09</u>
Supervisor	<u>Russ Mehnert</u> Driller <u>G. Thompson</u>	Depth to Water	<u>15.2 ft</u>	Date/Time	<u>3/4/09</u>
Logged By	<u>Russ Mehnert</u>	Automatic Hammer	<input checked="" type="checkbox"/>	Safety Hammer	<input type="checkbox"/>
		Other	<input type="checkbox"/>		

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core						
389.8'	0.0'	Top of Hole							
389.4'	0.4'	POORLY GRADED GRAVEL		SPT-1	0.0 - 1.5	1.1	7-4-6	16	Boring advanced using 3 1/4" Hollow Stem Augers SPT-1 sample split
		LEAN CLAY, brown, moist, stiff to very stiff		SPT-2	1.5 - 3.0	1.0	6-8-9	18	
			SPT-3	3.0 - 4.5	1.2	3-5-6	20		
			SPT-4	4.5 - 6.0	1.5	3-3-7	20		
			SPT-5	6.0 - 7.5	1.3	5-7-11	15		
			SPT-6	7.5 - 9.0	1.3	3-4-7	22		
			SPT-7	9.0 - 10.5	1.3	3-3-5	22		
			SPT-8	10.5 - 12.0	1.5	4-5-7	21		
			SPT-9	12.0 - 13.5	1.4	1-4-8	23		
375.8'	14.0'	BOTTOM ASH, dark gray to black, moist to wet, medium dense		SPT-10	13.5 - 15.0	1.5	5-7-13	15	SPT-10 sample split
				SPT-11	15.0 - 16.5	1.3	5-12-11	15	Began using drilling fluid at 15.2 feet
371.3'	18.5'		SPT-12	16.5 - 18.0	1.5	4-10-6	16	SPT-13 sample split	
			SPT-13	18.0 - 19.5	1.4	3-5-3	23		
		FLY ASH with Organics, dark gray, moist to wet, very loose to loose		SPT-14	19.5 - 21.0	1.5	2-1-1	45	
			SPT-15	21.0 - 22.5	1.3	2-1-1	38		
			SPT-16	22.5 - 24.0	1.5	WOR-1-1	38		
			SPT-17	24.0 - 25.5	1.5	1-1-1	31		
363.8'	26.0'	LEAN CLAY, brown, tan, and gray, moist to wet, very soft to very stiff, with silt and sand layers throughout		SPT-18	25.5 - 27.0	1.1	WOH	29	SPT-18 sample split
			SPT-19	27.0 - 28.5	1.3	WOH-2-3	27		
			SPT-20	28.5 - 30.0	1.5	WOH-4-5	26		
			SPT-21	30.0 - 31.5	1.5	3-5-5	26		
			SPT-22	32.5 - 34.0	1.5	5-7-7	22		
			SPT-23	35.0 - 36.5	1.5	4-6-13	23		
			SPT-24	37.5 - 39.0	1.5	4-7-7	23		
			SPT-25	40.0 - 41.5	1.5	3-5-7	23		
			SPT-26	42.5 - 44.0	1.5	4-4-6	24		

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Project No.	175559008	Location	N 600055.90, E 1409637.66 (NAD27)	
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-IC	Total Depth 61.5 ft

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth	
328.3'	61.5'	LEAN CLAY, brown, tan, and gray, moist to wet, very soft to very stiff, with silt and sand layers throughout <i>(Continued)</i>		SPT-27	45.0 - 46.5	1.5	4-3-4	27	Boring backfilled with bentonite grout from 0.0 ft to 61.5 ft
				SPT-28	47.5 - 49.0	1.5	3-3-4	26	
				SPT-29	50.0 - 51.5	1.5	3-4-3	26	
				SPT-30	52.5 - 54.0	1.5	WOH-2-3	29	
				SPT-31	55.0 - 56.5	1.3	4-3-3	26	
				SPT-32	57.5 - 59.0	1.5	2-2-4	30	
				SPT-33	60.0 - 61.5	1.5	WOH-3-4	31	

No Refusal /
Bottom of Hole

WOH=Weight of Hammer,
WOR=Weight of Rods

Project No.	175559008	Location	N 600086.63, E 1409629.83 (NAD27)		
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-IC-PZ	Total Depth	32.0 ft
Location	Humphreys County, Tennessee	Surface Elevation	390.1 ft. (NGVD29)		
Project Type	Geotechnical Exploration	Date Started	4/1/09	Completed	4/1/09
Supervisor	N. Puckett	Driller	Tim Caudill	Depth to Water	3.3 ft
Logged By	N. Puckett	Automatic Hammer	<input type="checkbox"/>	Safety Hammer	<input type="checkbox"/>
		Other	<input type="checkbox"/>		

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth	
390.1'	0.0'	Top of Hole							
		OVERBURDEN							Boring advanced using 3 1/4" Hollow Stem Augers
				ST-1	10.0 - 12.0	0.9		20	Piezometer constructed from 20 ft of 1" PVC Riser Pipe and 10 ft of 1" PVC Slotted Screen
									Screened zone from 20 ft to 30 ft
				ST-2	30.0 - 32.0	0.9		22	Piezometer backfilled with sand, bentonite pellets, and bentonite grout from 0.0 ft to 32.0 ft
358.1'	32.0'	No Refusal / Bottom of Hole							

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Project No.	175559008	Location	N 600103.14, E 1409560.28 (NAD27)		
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-IT	Total Depth	51.5 ft
Location	Humphreys County, Tennessee	Surface Elevation	368.8 ft. (NGVD29)		
Project Type	Geotechnical Exploration	Date Started	3/23/09	Completed	3/24/09
Supervisor	B. Evans Driller J. Felts	Depth to Water	16.5 ft	Date/Time	3/24/09
Logged By	B. Evans	Automatic Hammer	<input checked="" type="checkbox"/>	Safety Hammer	<input type="checkbox"/>
		Other	<input type="checkbox"/>		

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core						
368.8'	0.0'	Top of Hole							
367.3'	1.5'	POORLY GRADED GRAVEL							Boring advanced using 3 1/4" Hollow Stem Augers
366.8'	2.0'	TOPSOIL		SPT-1	1.5 - 3.0	1.0	1-3-5	23	
		SANDY LEAN CLAY, brown, moist, medium stiff to very stiff		SPT-2	3.0 - 4.5	1.3	5-10-12	16	
			SPT-3	4.5 - 6.0	0.0	7-9-9	--		
			SPT-4	6.0 - 7.5	1.3	5-5-6	19		
			SPT-5	7.5 - 9.0	0.9	2-3-4	21		
			SPT-6	9.0 - 10.5	1.3	3-4-5	22		
			SPT-7	10.5 - 12.0	1.2	2-3-4	22		
			SPT-8	12.0 - 13.5	1.5	2-2-3	21		
			SPT-9	13.5 - 15.0	1.5	2-3-4	27		
			SPT-10	15.0 - 16.5	1.5	2-2-3	21		
			SPT-11	16.5 - 18.0	1.5	4-5-5	23	Began using drilling fluid at 16.5 feet	
			SPT-12	18.0 - 19.5	1.5	3-6-6	24		
			SPT-13	19.5 - 21.0	1.2	2-4-5	26		
			SPT-14	21.0 - 22.5	1.1	2-5-6	24		
			SPT-15	22.5 - 24.0	1.3	1-3-4	26		
			SPT-16	24.0 - 25.5	1.5	3-4-4	26		
			SPT-17	25.5 - 27.0	1.5	2-2-4	26		
			SPT-18	27.0 - 28.5	1.2	3-3-4	25		
337.3'	31.5'				SPT-19	30.0 - 31.5	1.5	2-4-5	25
		SILT, brown and tan, moist, medium stiff to stiff, sand content increasing with depth		SPT-20	32.5 - 34.0	1.5	4-5-4	26	
			SPT-21	35.0 - 36.5	1.5	2-3-3	27		
330.1'	38.7'		SPT-22	37.5 - 39.0	1.5	2-2-17	27		
		POORLY GRADED GRAVEL with Sand, reddish tan, medium dense to dense, traces of clay		SPT-23	40.0 - 41.5	1.2	6-13-6	17	
			SPT-24	42.5 - 44.0	1.3	17-20-24	19		

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Project No.	175559008	Location	N 600103.14, E 1409560.28 (NAD27)		
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-IT	Total Depth	51.5 ft

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth	
317.3'	51.5'	POORLY GRADED GRAVEL with Sand, reddish tan, medium dense to dense, traces of clay <i>(Continued)</i>		SPT-25	45.0 - 46.5	1.1	13-10-12	15	Boring backfilled with bentonite grout from 0.0 ft to 51.5 ft
				SPT-26	47.5 - 49.0	1.2	5-8-13	22	
				SPT-27	50.0 - 51.5	1.1	19-20-20	14	

No Refusal /
Bottom of Hole

Project No.	175559008	Location	N 600103.14, E 1409560.28 (NAD27)	
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-IT-PZ	Total Depth 25.0 ft
Location	Humphreys County, Tennessee	Surface Elevation	368.8 ft. (NGVD29)	
Project Type	Geotechnical Exploration	Date Started	3/23/09	Completed 3/24/09
Supervisor	B. Evans Driller J. Felts	Depth to Water	9.9 ft	Date/Time 5/27/09
Logged By	B. Evans	Automatic Hammer	<input type="checkbox"/>	Safety Hammer <input type="checkbox"/> Other <input type="checkbox"/>

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth	
368.8'	0.0'	Top of Hole							
		OVERBURDEN							
				ST-1	10.0 - 12.0	1.6		23	Boring advanced using 3 1/4" Hollow Stem Augers Piezometer constructed from 14 ft of 1" PVC Riser Pipe and 10 ft of 1" PVC Slotted Screen Screened zone from 14 ft to 24 ft Piezometer backfilled with sand, bentonite pellets, and bentonite grout from 0.0 ft to 25.0 ft
343.8'	25.0'								

No Refusal /
Bottom of Hole

Project No.	175559008	Location	N 600817.61, E 1409871.68 (NAD27)		
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-JC	Total Depth	61.0 ft
Location	Humphreys County, Tennessee	Surface Elevation	389.6 ft. (NGVD29)		
Project Type	Geotechnical Exploration	Date Started	3/5/09	Completed	3/5/09
Supervisor	Russ Mehnert	Driller	G. Thompson	Depth to Water	16.5 ft
Logged By	Russ Mehnert	Automatic Hammer	<input checked="" type="checkbox"/>	Safety Hammer	<input type="checkbox"/>
		Other	<input type="checkbox"/>		

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth	
389.6'	0.0'	Top of Hole							
		LEAN CLAY with Gravel and Organics, brown, tan, gray, and red, moist, medium stiff to very stiff		SPT-1	0.0 - 1.5	0.8	5-5-7	19	Boring advanced using 3 1/4" Hollow Stem Augers
			SPT-2	1.5 - 3.0	1.2	6-9-10	18		
			SPT-3	3.0 - 4.5	1.2	3-6-5	22		
			SPT-4	4.5 - 6.0	1.1	3-3-5	21		
			SPT-5	6.0 - 7.5	1.3	6-9-10	21		
			SPT-6	7.5 - 9.0	1.2	3-4-4	26		
			SPT-7	9.0 - 10.5	1.4	3-3-5	18		
			SPT-8	10.5 - 12.0	1.3	3-3-4	24		
			SPT-9	12.0 - 13.5	1.4	4-6-8	26		
375.2'	14.4'		BOTTOM ASH, dark gray to black, wet, very loose to dense		SPT-10	13.5 - 15.0	1.5	3-21-20	
		SPT-11		15.0 - 16.5	1.3	12-24-26	14		
		SPT-12		16.5 - 18.0	1.4	32-32-32	19		
		SPT-13		18.0 - 19.5	1.1	3-18-12	15		
		SPT-14		19.5 - 21.0	0.8	3-5-5	17		
		SPT-15		21.0 - 22.5	1.3	5-5-4	15		
		SPT-16		22.5 - 24.0	1.1	6-6-4	17		
		SPT-17		24.0 - 25.5	0.0	1-1-1	--		
		SPT-18		25.5 - 27.0	0.8	2-2-3	14		
362.6'	27.0'	FLY ASH, dark gray, wet, loose			SPT-19	27.0 - 28.5	1.2	1-1-2	26
362.1'	27.5'			ST-1	28.5 - 30.5	1.4		23	
		LEAN CLAY, tan, brown, and gray, moist to wet, very soft to very stiff		ST-2	32.5 - 34.5	0.0		--	
			SPT-20	34.5 - 36.0	1.5	4-8-12	26		
			SPT-21	37.0 - 38.5	1.5	5-6-8	28		
			SPT-22	39.5 - 41.0	1.5	5-6-10	25		
			SPT-23	42.0 - 43.5	1.5	3-5-6	28		

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Project No.	175559008	Location	N 600817.61, E 1409871.68 (NAD27)		
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-JC	Total Depth	61.0 ft

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth	
		LEAN CLAY, tan, brown, and gray, moist to wet, very soft to very stiff <i>(Continued)</i>		SPT-24	44.5 - 46.0	1.5	5-4-6	25	
				SPT-25	47.0 - 48.5	1.5	4-4-5	27	
				SPT-26	49.5 - 51.0	1.5	WOH-4-3	26	
				SPT-27	52.0 - 53.5	1.5	3-5-7	25	
				SPT-28	54.5 - 56.0	1.5	WOH	29	
				SPT-29	57.0 - 58.5	1.5	4-6-5	25	Boring backfilled with bentonite grout from 0.0 ft to 61.0 ft
330.1'	59.5'								
328.6'	61.0'	POORLY GRADED SAND with Gravel, tan and brown, wet, dense		SPT-30	59.5 - 61.0	1.0	9-15-14	19	

No Refusal /
Bottom of Hole

WOH=Weight of Hammer

Project No.	175559008	Location	N 600825.25, E 1409856.37 (NAD27)	
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-JC-PZ	Total Depth 26.0 ft
Location	Humphreys County, Tennessee	Surface Elevation	390.0 ft. (NGVD29)	
Project Type	Geotechnical Exploration	Date Started	4/1/09	Completed 4/1/09
Supervisor	N. Puckett	Driller	Tim Caudill	Depth to Water 2.8 ft
Logged By	N. Puckett	Automatic Hammer	<input type="checkbox"/>	Safety Hammer <input type="checkbox"/> Other <input type="checkbox"/>

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth	
390.0'	0.0'	Top of Hole							
		OVERBURDEN							Boring advanced using 3 1/4" Hollow Stem Augers
				ST-1	5.0 - 7.0	0.9		19	Piezometer constructed from 15 ft of 1" PVC Riser Pipe and 10 ft of 1" PVC Slotted Screen
				ST-2	10.0 - 12.0	0.8		20	
									Screened zone from 15 ft to 25 ft
									Piezometer backfilled with sand, bentonite pellets, and bentonite grout from 0.0 ft to 26.0 ft
364.0'	26.0'	No Refusal / Bottom of Hole							

Project No.	175559008	Location	N 600838.26, E 1409820.33 (NAD27)		
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-JT	Total Depth	51.5 ft
Location	Humphreys County, Tennessee	Surface Elevation	378.7 ft. (NGVD29)		
Project Type	Geotechnical Exploration	Date Started	3/25/09	Completed	3/26/09
Supervisor	B. Evans Driller J. Felts	Depth to Water	24.0 ft	Date/Time	3/25/09
Logged By	B. Evans	Automatic Hammer	<input checked="" type="checkbox"/>	Safety Hammer	<input type="checkbox"/>
		Other	<input type="checkbox"/>		

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core						
378.7'	0.0'	Top of Hole							
377.2'	1.5'	POORLY GRADED GRAVEL							Boring advanced using 3 1/4" Hollow Stem Augers
376.7'	2.0'	TOPSOIL		SPT-1	1.5 - 3.0	1.0	3-4-8	16	
374.7'	4.0'	SILT with Gravel, orangish tan, moist, stiff to very stiff		SPT-2	3.0 - 4.5	1.3	4-6-9	17	
		LEAN CLAY with Gravel, brown, moist, stiff to very stiff		SPT-3	4.5 - 6.0	1.2	4-6-8	19	
			SPT-4	6.0 - 7.5	1.5	4-6-9	22		
			SPT-5	7.5 - 9.0	1.0	3-5-8	20		
			SPT-6	9.0 - 10.5	1.2	3-6-8	20		
			SPT-7	10.5 - 12.0	1.5	3-7-9	22		
			SPT-8	12.0 - 13.5	1.1	4-4-8	19		
			SPT-9	13.5 - 15.0	1.3	4-5-8	22		
			SPT-10	15.0 - 16.5	1.1	3-5-9	23		
			SPT-11	16.5 - 18.0	1.5	3-6-9	20		
			SPT-12	18.0 - 19.5	1.0	3-5-6	19		
			SPT-13	19.5 - 21.0	1.1	2-4-6	18		
356.7'	22.0'		SPT-14	21.0 - 22.5	1.5	2-4-6	19		
		SILT with Sand, gray, moist, stiff		SPT-15	22.5 - 24.0	1.5	2-5-6	18	
			SPT-16	24.0 - 25.5	1.5	2-3-5	17		
351.7'	27.0'		SPT-17	25.5 - 27.0	1.5	2-3-5	18		
		LEAN CLAY, tan and brown, moist, stiff		SPT-18	27.0 - 28.5	1.5	3-5-8	22	
			SPT-19	28.5 - 30.0	1.5	3-5-8	23		
			SPT-20	30.0 - 31.5	1.5	3-4-8	24		
			SPT-21	31.5 - 33.0	1.5	3-5-7	23		
			SPT-22	33.0 - 34.5	1.5	2-3-5	26		
342.4'	36.3'		SPT-23	34.5 - 36.0	1.5	2-4-5	25		
			SPT-24	36.0 - 37.5	1.5	3-4-5	26		
		SILT with Sand, tan and brown, moist, stiff		SPT-25	40.0 - 41.5	1.5	3-2-5	27	
334.9'	43.8'		SPT-26	42.5 - 44.0	1.5	3-4-5	27		

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Project No.	<u>175559008</u>	Location	<u>N 600838.26, E 1409820.33 (NAD27)</u>	
Project Name	<u>Johnsonville Fossil Plant -- TVA</u>	Boring No.	<u>STN-JT</u>	Total Depth <u>51.5 ft</u>

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth	
		LEAN CLAY with Sand, dark gray, moist, soft to very stiff <i>(Continued)</i>		SPT-27	45.0 - 46.5	1.5	0-0-2	30	Boring backfilled with bentonite grout from 0.0 ft to 51.5 ft
				SPT-28	47.5 - 49.0	1.5	3-9-12	19	
328.2'	50.5'			SPT-29	50.0 - 51.5	1.5	40-28-22	15	
327.2'	51.5'	SILTY GRAVEL, tan and gray, dense							

No Refusal /
Bottom of Hole



Project No.	175559008	Location	N 600838.26, E 1409820.33 (NAD27)		
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-JT-PZ	Total Depth	35.0 ft
Location	Humphreys County, Tennessee	Surface Elevation	378.7 ft. (NGVD29)		
Project Type	Geotechnical Exploration	Date Started	3/26/09	Completed	3/26/09
Supervisor	B. Evans	Driller	J. Felts	Depth to Water	18.1 ft
Logged By	B. Evans	Automatic Hammer	<input type="checkbox"/>	Safety Hammer	<input type="checkbox"/>
		Other	<input type="checkbox"/>		

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth	
378.7'	0.0'	Top of Hole							
		OVERBURDEN							Boring advanced using 3 1/4" Hollow Stem Augers
				ST-1	10.0 - 12.0	1.1		19	Piezometer constructed from 24 ft of 1" PVC Riser Pipe and 10 ft of 1" PVC Slotted Screen
				ST-2	22.0 - 24.0	1.5		20	Screened zone from 24 ft to 34 ft
343.7'	35.0'								Piezometer backfilled with sand, bentonite pellets, and bentonite grout from 0.0 ft to 35.0 ft

No Refusal /
Bottom of Hole

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Project No.	175559008	Location	N 601569.19, E 1410142.99 (NAD27)		
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-KC	Total Depth	61.0 ft
Location	Humphreys County, Tennessee	Surface Elevation	389.8 ft. (NGVD29)		
Project Type	Geotechnical Exploration	Date Started	3/5/09	Completed	3/6/09
Supervisor	Russ Mehnert	Driller	G. Thompson	Depth to Water	16.5 ft
Logged By	Russ Mehnert	Automatic Hammer	<input checked="" type="checkbox"/>	Safety Hammer	<input type="checkbox"/>
		Other	<input type="checkbox"/>		

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core						
389.8'	0.0'	Top of Hole							
389.4'	0.4'	POORLY GRADED GRAVEL		SPT-1	0.0 - 1.5	1.0	5-5-7	18	Boring advanced using 3 1/4" Hollow Stem Augers
		LEAN CLAY with Sand, brown, tan, and gray, moist, stiff to very stiff		SPT-2	1.5 - 3.0	1.1	6-10-7	18	
			SPT-3	3.0 - 4.5	1.2	2-5-5	19		
			SPT-4	4.5 - 6.0	1.2	4-5-6	20		
			SPT-5	6.0 - 7.5	1.4	5-9-10	19		
			SPT-6	7.5 - 9.0	1.2	2-4-4	19		
			SPT-7	9.0 - 10.5	1.3	3-4-5	17		
			SPT-8	10.5 - 12.0	1.4	3-5-6	22		
			SPT-9	12.0 - 13.5	1.5	6-8-8	23		
375.9'	13.9'	BOTTOM ASH, dark gray to black, moist to wet, loose to dense, with fly ash layers		SPT-10	13.5 - 15.0	1.5	3-21-27	11	Began using drilling fluid at 16.5 feet
			SPT-11	15.0 - 16.5	1.5	13-19-36	13		
			SPT-12	16.5 - 18.0	1.5	20-22-26	18		
			SPT-13	18.0 - 19.5	1.3	6-12-12	15		
			SPT-14	19.5 - 21.0	1.3	6-12-14	16		
			SPT-15	21.0 - 22.5	1.5	12-9-7	14		
			SPT-16	22.5 - 24.0	1.4	4-5-5	38		
			SPT-17	24.0 - 25.5	1.5	4-3-2	43		
364.3'	25.5'	LEAN CLAY, brown, tan, and gray, moist to wet, very soft to very stiff		SPT-18	25.5 - 27.0	1.5	WOH	33	
			SPT-19	27.0 - 28.5	1.2	4-7-10	24		
			ST-1	28.5 - 30.5	1.9		23		
			SPT-20	30.5 - 32.0	1.3	5-8-12	24		
			SPT-21	34.5 - 36.0	1.5	4-6-7	19		
			SPT-22	37.0 - 38.5	1.5	3-5-6	22		
			SPT-23	39.5 - 41.0	1.5	3-3-5	25		
		SPT-24	42.0 - 43.5	1.5	2-4-5	26			

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Project No.	175559008	Location	N 601569.19, E 1410142.99 (NAD27)	
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-KC	Total Depth 61.0 ft

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth	
328.8'	61.0'	LEAN CLAY, brown, tan, and gray, moist to wet, very soft to very stiff <i>(Continued)</i> - with sand and gravel from 54.5 to 61.0 feet		SPT-25	44.5 - 46.0	1.5	3-3-3	26	Boring backfilled with bentonite grout from 0.0 ft to 61.0 ft
				SPT-26	47.0 - 48.5	1.5	WOH-2-4	27	
				SPT-27	49.5 - 51.0	1.5	3-5-5	28	
				SPT-28	52.0 - 53.5	1.5	3-3-6	27	
				SPT-29	54.5 - 56.0	1.5	4-5-5	26	
				SPT-30	57.0 - 58.5	1.5	4-6-8	26	
				SPT-31	59.5 - 61.0	1.5	1-3-18	31	

No Refusal /
Bottom of Hole

WOH=Weight of Hammer

Project No.	175559008	Location	N 601483.81, E 1410099.66 (NAD27)		
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-KC-PZ	Total Depth	26.0 ft
Location	Humphreys County, Tennessee	Surface Elevation	390.5 ft. (NGVD29)		
Project Type	Geotechnical Exploration	Date Started	4/1/09	Completed	4/1/09
Supervisor	N. Puckett	Driller	Tim Caudill	Depth to Water	3.5 ft
Logged By	N. Puckett	Automatic Hammer	<input type="checkbox"/>	Safety Hammer	<input type="checkbox"/>
		Other	<input type="checkbox"/>		

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth	
390.5'	0.0'	Top of Hole							
		OVERBURDEN							
				ST-1	5.0 - 7.0	1.2		18	Boring advanced using 3 1/4" Hollow Stem Augers Piezometer constructed from 15 ft of 1" PVC Riser Pipe and 10 ft of 1" PVC Slotted Screen
				ST-2	10.0 - 12.0	0.7		20	
									Screened zone from 15 ft to 25 ft
									Piezometer backfilled with sand, bentonite pellets, and bentonite grout from 0.0 ft to 26.0 ft
364.5'	26.0'	No Refusal / Bottom of Hole							

Project No.	175559008	Location	N 601488.26, E 1410056.92 (NAD27)	
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-KT	Total Depth 51.5 ft
Location	Humphreys County, Tennessee	Surface Elevation	377.6 ft. (NGVD29)	
Project Type	Geotechnical Exploration	Date Started	3/26/09	Completed 3/27/09
Supervisor	T. Speer Driller J. Felts	Depth to Water	27.0 ft	Date/Time 3/27/09
Logged By	T. Speer	Automatic Hammer	<input checked="" type="checkbox"/>	Safety Hammer <input type="checkbox"/> Other <input type="checkbox"/>

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth	
377.6'	0.0'	Top of Hole							
376.7'	0.9'	POORLY GRADED GRAVEL		SPT-1	0.0 - 1.5	0.9	2-7-6	9	Boring advanced using 3 1/4" Hollow Stem Augers
		LEAN CLAY, mottled brown and tan to gray, dry, medium to very stiff		SPT-2	1.5 - 3.0	1.0	7-7-8	18	
			SPT-3	3.0 - 4.5	0.8	6-6-7	18		
			SPT-4	4.5 - 6.0	1.5	5-7-7	18		
			SPT-5	6.0 - 7.5	1.3	5-7-8	19		
			SPT-6	7.5 - 9.0	0.9	3-6-6	21		
			SPT-7	9.0 - 10.5	1.3	3-6-8	20		
			SPT-8	10.5 - 12.0	1.4	4-8-11	20		
			SPT-9	12.0 - 13.5	1.5	3-8-12	19	Wood fragment encountered in SPT-9	
			SPT-10	13.5 - 15.0	1.4	3-7-12	16		
		- greenish gray clay mix from 21.0 to 21.5 feet		SPT-11	15.0 - 16.5	1.5	5-5-9	21	
			SPT-12	16.5 - 18.0	1.1	3-4-12	21		
			SPT-13	18.0 - 19.5	0.7	4-5-7	17		
			SPT-14	19.5 - 21.0	1.4	2-3-5	22		
			SPT-15	21.0 - 22.5	1.4	2-4-5	20	Wood fragment encountered in SPT-15	
			SPT-16	22.5 - 24.0	1.0	3-5-5	18		
			SPT-17	24.0 - 25.5	1.5	3-4-5	22		
			SPT-18	25.5 - 27.0	1.4	2-4-4	23		
			SPT-19	27.0 - 28.5	1.5	3-3-6	26	Began using drilling fluid at 27 feet	
		- sand content increasing with depth below 40.5 feet		SPT-20	28.5 - 30.0	1.0	2-4-6	24	
			SPT-21	30.0 - 31.5	0.7	2-4-6	25		
			SPT-22	31.5 - 33.0	1.5	3-4-6	25		
			SPT-23	33.0 - 34.5	1.5	3-4-5	28		
			SPT-24	34.5 - 36.0	1.3	2-4-5	26		
			SPT-25	36.0 - 37.5	1.3	2-4-4	28		
			SPT-26	37.5 - 39.0	1.5	2-3-4	29		
			SPT-27	39.0 - 40.5	1.5	2-3-4	26		
			SPT-28	40.5 - 42.0	1.4	2-4-5	27		
			SPT-29	42.0 - 43.5	1.5	2-4-3	25		

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Project No.	<u>175559008</u>	Location	<u>N 601488.26, E 1410056.92 (NAD27)</u>	
Project Name	<u>Johnsonville Fossil Plant -- TVA</u>	Boring No.	<u>STN-KT</u>	Total Depth <u>51.5 ft</u>

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth	
332.6'	45.0'			SPT-30	43.5 - 45.0	1.3	2-4-5	25	Boring backfilled with bentonite grout from 0.0 ft to 51.5 ft
		POORLY GRADED SAND with Gravel, reddish orange and tan, wet, medium dense to dense		SPT-31	45.0 - 46.5	1.0	7-18-20	18	
				SPT-32	47.5 - 49.0	1.0	5-27-24	17	
326.1'	51.5'			SPT-33	50.0 - 51.5	1.3	10-11-11	18	

No Refusal /
Bottom of Hole

Project No.	175559008	Location	N 601488.26, E 1410056.92 (NAD27)		
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-KT-PZ	Total Depth	36.0 ft
Location	Humphreys County, Tennessee	Surface Elevation	377.6 ft. (NGVD29)		
Project Type	Geotechnical Exploration	Date Started	3/30/09	Completed	3/30/09
Supervisor	N. Puckett	Driller	Tim Caudill	Depth to Water	18.6 ft
Logged By	N. Puckett	Automatic Hammer	<input type="checkbox"/>	Safety Hammer	<input type="checkbox"/>
		Other	<input type="checkbox"/>		

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth	
377.6'	0.0'	Top of Hole							
		OVERBURDEN							Boring advanced using 3 1/4" Hollow Stem Augers
				ST-1	12.0 - 14.0	1.6		19	Piezometer constructed from 25 ft of 1" PVC Riser Pipe and 10 ft of 1" PVC Slotted Screen
				ST-2	20.0 - 22.0	1.2		27	
									Screened zone from 25 ft to 35 ft
									Piezometer backfilled with sand, bentonite pellets, and bentonite grout from 0.0 ft to 36.0 ft
341.6'	36.0'	No Refusal / Bottom of Hole							

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Project No.	175559008	Location	N 602377.53, E 1410442.03 (NAD27)	
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-LC	Total Depth 61.0 ft
Location	Humphreys County, Tennessee	Surface Elevation	389.9 ft. (NGVD29)	
Project Type	Geotechnical Exploration	Date Started	3/6/09	Completed 3/6/09
Supervisor	Russ Mehnert Driller G. Thompson	Depth to Water	16.5 ft	Date/Time 3/6/09
Logged By	Russ Mehnert	Automatic Hammer	<input checked="" type="checkbox"/>	Safety Hammer <input type="checkbox"/> Other <input type="checkbox"/>

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth	
389.9'	0.0'	Top of Hole							
		LEAN CLAY, brown and gray, moist, medium to very stiff, with gravel in upper 1.5'. Chert and roots throughout		SPT-1	0.0 - 1.5	1.0	4-3-3	20	Boring advanced using 3 1/4" Hollow Stem Augers
				SPT-2	1.5 - 3.0	1.1	3-3-4	20	
				SPT-3	3.0 - 4.5	0.9	2-4-4	21	
				SPT-4	4.5 - 6.0	1.4	3-5-7	18	
				SPT-5	6.0 - 7.5	1.3	7-12-11	24	
				SPT-6	7.5 - 9.0	1.0	2-5-5	19	
				SPT-7	9.0 - 10.5	1.3	4-9-9	18	
				SPT-8	10.5 - 12.0	0.6	4-5-5	19	
				SPT-9	12.0 - 13.5	1.5	4-6-8	28	
375.6'	14.3'	BOTTOM ASH, dark gray to black, wet, medium dense to dense, with layers of clay		SPT-10	13.5 - 15.0	1.5	2-6-24	11	Began using drilling fluid at 16.5 feet
	SPT-11		15.0 - 16.5	1.0	8-30-18	15			
	SPT-12		16.5 - 18.0	1.5	10-14-20	14			
	SPT-13		18.0 - 19.5	1.0	4-15-12	14			
	SPT-14		19.5 - 21.0	1.5	6-27-27	17			
	SPT-15		21.0 - 22.5	1.5	20-32-40	15			
	SPT-16		22.5 - 24.0	1.1	8-16-8	16			
364.9'	25.0'	LEAN CLAY, tan, brown, and gray, moist, soft to very stiff		SPT-17	24.0 - 25.5	1.5	5-3-2	14	
	SPT-18		25.5 - 27.0	0.8	2-1-2	28			
	SPT-19		27.0 - 28.5	1.1	2-2-4	27			
	ST-1		28.5 - 30.5	1.6		22			
	SPT-20		30.5 - 32.0	1.5	2-6-6	22			
	SPT-21		34.5 - 36.0	1.2	3-2-1	26			
	SPT-22		37.0 - 38.5	1.3	3-2-4	28			
	SPT-23		39.5 - 41.0	1.5	4-6-8	27			
	SPT-24	42.0 - 43.5	1.5	6-8-10	25				

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Project No.	175559008	Location	N 602377.53, E 1410442.03 (NAD27)	
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-LC	Total Depth 61.0 ft

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth	
		LEAN CLAY, tan, brown, and gray, moist, soft to very stiff <i>(Continued)</i>		SPT-25	44.5 - 46.0	1.5	5-6-8	25	
			SPT-26	47.0 - 48.5	1.5	5-5-7	26		
			SPT-27	49.5 - 51.0	1.5	3-5-6	27		
			SPT-28	52.0 - 53.5	1.5	3-4-4	27		
			SPT-29	54.5 - 56.0	1.5	3-4-5	28		
			SPT-30	57.0 - 58.5	1.5	5-5-8	28		
328.9'	61.0'		SPT-31	59.5 - 61.0	1.5	4-8-12	28		

Boring backfilled with bentonite grout from 0.0 ft to 61.0 ft

No Refusal /
Bottom of Hole

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Project No.	175559008	Location	N 602374.84, E 1410429.97 (NAD27)	
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-LC-PZ	Total Depth 26.0 ft
Location	Humphreys County, Tennessee	Surface Elevation	390.5 ft. (NGVD29)	
Project Type	Geotechnical Exploration	Date Started	4/1/09	Completed 4/1/09
Supervisor	N. Puckett	Driller	Tim Caudill	Depth to Water 3.3 ft
Logged By	N. Puckett	Date/Time	5/27/09	
		Automatic Hammer	<input type="checkbox"/>	Safety Hammer <input type="checkbox"/>
		Other	<input type="checkbox"/>	

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth	
390.5'	0.0'	Top of Hole							
		OVERBURDEN							Boring advanced using 3 1/4" Hollow Stem Augers
				ST-1	5.0 - 7.0	0.8		20	Piezometer constructed from 15 ft of 1" PVC Riser Pipe and 10 ft of 1" PVC Slotted Screen
				ST-2	10.0 - 12.0	1.1		22	
									Screened zone from 15 ft to 25 ft
									Piezometer backfilled with sand, bentonite pellets, and bentonite grout from 0.0 ft to 26.0 ft
364.5'	26.0'								

No Refusal /
Bottom of Hole

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Project No.	175559008	Location	N 602392.94, E 1410352.26 (NAD27)	
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-LT	Total Depth 51.5 ft
Location	Humphreys County, Tennessee	Surface Elevation	366.3 ft. (NGVD29)	
Project Type	Geotechnical Exploration	Date Started	3/20/09	Completed 3/20/09
Supervisor	Russ Mehnert Driller G. Thompson	Depth to Water	19.5 ft	Date/Time 3/20/09
Logged By	Russ Mehnert	Automatic Hammer	<input checked="" type="checkbox"/>	Safety Hammer <input type="checkbox"/> Other <input type="checkbox"/>

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth	
366.3'	0.0'	Top of Hole							
		LEAN CLAY with Gravel, brown, tan and gray, moist to wet, medium stiff to very stiff		SPT-1	0.0 - 1.5	1.1	19-10-12	4	Boring advanced using 3 1/4" Hollow Stem Augers
			SPT-2	1.5 - 3.0	0.0	6-5-7	--		
			SPT-3	3.0 - 4.5	1.0	4-5-9	19		
			SPT-4	4.5 - 6.0	1.5	8-6-7	19		
			SPT-5	6.0 - 7.5	1.1	8-6-7	20		
			SPT-6	7.5 - 9.0	1.4	4-4-5	22		
			SPT-7	9.0 - 10.5	1.5	5-6-7	21		
			SPT-8	10.5 - 12.0	1.2	3-4-5	21		
			SPT-9	12.0 - 13.5	1.5	5-6-6	18		
			SPT-10	13.5 - 15.0	0.5	4-6-7	21		
			SPT-11	15.0 - 16.5	1.5	2-3-3	24		
			SPT-12	16.5 - 18.0	1.5	4-4-8	24		
			SPT-13	18.0 - 19.5	1.5	5-4-7	22		
			SPT-14	19.5 - 21.0	1.5	3-4-7	24		
			SPT-15	21.0 - 22.5	1.5	7-6-7	24		
			SPT-16	22.5 - 24.0	1.5	3-4-7	26		
			SPT-17	25.0 - 26.5	1.5	5-7-6	25		
			SPT-18	27.5 - 29.0	1.5	3-3-3	26		
			SPT-19	30.0 - 31.5	1.5	3-4-3	26		
333.8'	32.5'	SILT with Gravel, brown, tan and gray, wet, soft to medium stiff		SPT-20	32.5 - 34.0	1.5	WOH-2-2	28	Began using drilling fluid at 19.5 feet
			SPT-21	35.0 - 36.5	1.5	2-3-3	25		
328.2'	38.1'	POORLY GRADED SAND with Gravel, brown, tan and gray, wet, loose to medium dense		SPT-22	37.5 - 39.0	1.5	10-27-22	15	
			SPT-23	40.0 - 41.5	0.9	12-15-16	15		
			SPT-24	42.5 - 44.0	0.5	11-12-10	15		

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Project No.	<u>175559008</u>	Location	<u>N 602392.94, E 1410352.26 (NAD27)</u>	
Project Name	<u>Johnsonville Fossil Plant -- TVA</u>	Boring No.	STN-LT	Total Depth <u>51.5 ft</u>

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth	
314.8'	51.5'	POORLY GRADED SAND with Gravel, brown, tan and gray, wet, loose to medium dense <i>(Continued)</i>		SPT-25	45.0 - 46.5	0.8	8-15-10	18	Boring backfilled with bentonite grout from 0.0 ft to 51.5 ft
				SPT-26	47.5 - 49.0	0.7	9-4-4	23	
				SPT-27	50.0 - 51.5	1.5	8-11-10	20	

No Refusal /
Bottom of Hole

WOH=Weight of
Hammer



Project No.	175559008	Location	N 602392.94, E 1410352.26 (NAD27)		
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-LT-PZ	Total Depth	30.2 ft
Location	Humphreys County, Tennessee	Surface Elevation	366.3 ft. (NGVD29)		
Project Type	Geotechnical Exploration	Date Started	3/21/09	Completed	3/21/09
Supervisor	Russ Mehnert	Driller	G. Thompson	Depth to Water	7.8 ft
Logged By	Russ Mehnert	Automatic Hammer	<input type="checkbox"/>	Safety Hammer	<input type="checkbox"/>
		Other	<input type="checkbox"/>		

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth	
366.3'	0.0'	Top of Hole							
		OVERBURDEN							Boring advanced using 3 1/4" Hollow Stem Augers
									Piezometer constructed from 19.2 ft of 1" PVC Riser Pipe and 10 ft of 1" PVC Slotted Screen
				ST-1	19.5 - 21.5	1.2		24	Screened zone from 19.2 ft to 29.2 ft
336.1'	30.2'								Piezometer backfilled with sand, bentonite pellets, and bentonite grout from 0.0 ft to 30.2 ft

No Refusal /
Bottom of Hole

Project No.	175559008	Location	N 603157.11, E 1410726.95 (NAD27)		
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-MC	Total Depth	60.5 ft
Location	Humphreys County, Tennessee	Surface Elevation	390.6 ft. (NGVD29)		
Project Type	Geotechnical Exploration	Date Started	3/7/09	Completed	3/7/09
Supervisor	Russ Mehnert	Driller	G. Thompson	Depth to Water	16.5 ft
Logged By	Russ Mehnert	Automatic Hammer	<input checked="" type="checkbox"/>	Safety Hammer	<input type="checkbox"/>
		Other	<input type="checkbox"/>		

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth	
390.6'	0.0'	Top of Hole							
		LEAN CLAY with Gravel, brown and gray, moist, medium to very stiff, with bottom ash located in upper 3.7 feet		SPT-1	0.0 - 1.5	1.2	3-3-3	23	Boring advanced using 3 1/4" Hollow Stem Augers
			SPT-2	1.5 - 3.0	0.8	3-3-5	23		
			SPT-3	3.0 - 4.5	1.3	3-2-3	17		
			SPT-4	4.5 - 6.0	1.3	3-5-8	22		
			SPT-5	6.0 - 7.5	1.4	8-9-10	20		
			SPT-6	7.5 - 9.0	1.3	3-4-4	23		
			SPT-7	9.0 - 10.5	1.3	3-4-5	18		
			SPT-8	10.5 - 12.0	1.3	3-5-7	19		
			SPT-9	12.0 - 13.5	1.0	5-6-9	19		
			SPT-10	13.5 - 15.0	1.2	2-6-7	18		
375.4'	15.2'	BOTTOM ASH, dark gray to black, wet, loose to dense		SPT-11	15.0 - 16.5	1.3	12-22-15	12	Began using drilling fluid at 16.5 feet
			SPT-12	16.5 - 18.0	1.5	18-24-22	14		
			SPT-13	18.0 - 19.5	1.0	4-21-26	16		
			SPT-14	19.5 - 21.0	1.2	3-16-24	14		
			SPT-15	21.0 - 22.5	1.5	27-42-29	11		
			SPT-16	22.5 - 24.0	0.9	5-6-7	15		
			SPT-17	24.0 - 25.5	1.1	5-5-7	26		
			SPT-18	25.5 - 27.0	1.0	5-5-5	20		
			SPT-19	27.0 - 28.5	0.9	5-5-4	16		
361.1'	29.5'	LEAN CLAY with Gravel, tan, brown, and gray, moist to wet, soft to very stiff		ST-1	28.5 - 30.5	1.6		27	SPT-22 no recovery due to rock in spoon
			SPT-20	30.5 - 32.0	0.9	9-10-17	24		
			SPT-21	34.0 - 35.5	1.1	2-1-1	34		
			SPT-22	36.5 - 38.0	0.0	4-3-3	--		
			SPT-23	39.0 - 40.5	1.5	4-6-9	27		
		SPT-24	41.5 - 43.0	1.5	5-10-11	26			

Project No.	175559008	Location	N 603157.11, E 1410726.95 (NAD27)		
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-MC	Total Depth	60.5 ft

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth	
330.1'	60.5'	LEAN CLAY with Gravel, tan, brown, and gray, moist to wet, soft to very stiff <i>(Continued)</i>		SPT-25	44.0 - 45.5	1.5	5-8-10	26	Boring backfilled with bentonite grout from 0.0 ft to 60.5 ft
				SPT-26	46.5 - 48.0	1.5	9-9-9	28	
				SPT-27	49.0 - 50.5	1.5	7-8-8	26	
				SPT-28	51.5 - 53.0	1.5	5-6-6	28	
				SPT-29	54.0 - 55.5	1.5	4-6-6	24	
				SPT-30	56.5 - 58.0	1.5	4-5-7	27	
				SPT-31	59.0 - 60.5	0.6	4-7-8	25	

No Refusal /
Bottom of Hole

Project No.	175559008	Location	N 603157.20, E 1410719.51 (NAD27)	
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-MC-PZ	Total Depth 26.0 ft
Location	Humphreys County, Tennessee	Surface Elevation	391.1 ft. (NGVD29)	
Project Type	Geotechnical Exploration	Date Started	4/1/09	Completed 4/1/09
Supervisor	N. Puckett	Driller	Tim Caudill	Depth to Water 5.3 ft
Logged By	N. Puckett	Date/Time	5/27/09	
		Automatic Hammer	<input type="checkbox"/>	Safety Hammer <input type="checkbox"/>
		Other	<input type="checkbox"/>	

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth	
391.1'	0.0'	Top of Hole							
		OVERBURDEN							
				ST-1	5.0 - 7.0	0.8		19	Boring advanced using 3 1/4" Hollow Stem Augers Piezometer constructed from 15 ft of 1" PVC Riser Pipe and 10 ft of 1" PVC Slotted Screen
				ST-2	10.0 - 12.0	0.8		12	
									Screened zone from 15 ft to 25 ft
									Piezometer backfilled with sand, bentonite pellets, and bentonite grout from 0.0 ft to 26.0 ft
365.1'	26.0'	No Refusal / Bottom of Hole							

Project No.	175559008	Location	N 603187.15, E 1410653.44 (NAD27)		
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-MT	Total Depth	51.5 ft

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth	
		SILTY SAND with Gravel, brown and gray, wet, loose to dense <i>(Continued)</i>		SPT-24	45.0 - 46.5	0.7	5-8-9	17	Boring backfilled with bentonite grout from 0.0 ft to 51.5 ft
316.7'	48.9'			SPT-25	47.5 - 49.0	0.8	4-4-3	27	
314.8'	50.8'		SILT, gray, wet, soft to medium stiff, with gravel		SPT-26	50.0 - 51.5	1.5	4-7-7	
314.1'	51.5'	POORLY GRADED SAND, gray, wet, medium dense							
		No Refusal / Bottom of Hole							



Project No.	175559008	Location	N 603187.15, E 1410653.44 (NAD27)		
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-MT-PZ	Total Depth	32.5 ft
Location	Humphreys County, Tennessee	Surface Elevation	365.6 ft. (NGVD29)		
Project Type	Geotechnical Exploration	Date Started	3/20/09	Completed	3/20/09
Supervisor	Russ Mehnert	Driller	G. Thompson	Depth to Water	7.6 ft
Logged By	Russ Mehnert	Automatic Hammer	<input type="checkbox"/>	Safety Hammer	<input type="checkbox"/>
		Other	<input type="checkbox"/>		

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth	
365.6'	0.0'	Top of Hole							
		OVERBURDEN							Boring advanced using 3 1/4" Hollow Stem Augers
									Piezometer constructed from 21.8 ft of 1" PVC Riser Pipe and 10 ft of 1" PVC Slotted Screen
									Screened zone from 21.8 ft to 31.8 ft
									Piezometer backfilled with sand, bentonite pellets, and bentonite grout from 0.0 ft to 32.5 ft
333.1'	32.5'								

No Refusal /
Bottom of Hole

Project No.	175559008	Location	See Attached Layout	
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-B-1	Total Depth 31.5 ft
Location	Humphreys County, Tennessee	Surface Elevation	390.6 ft. (NGVD29)	
Project Type	Geotechnical Exploration	Date Started	2/24/09	Completed 2/24/09
Supervisor	N. Puckett Driller J. Felts	Depth to Water	17.0 ft	Date/Time 2/24/09
Logged By	N. Puckett	Automatic Hammer	<input checked="" type="checkbox"/>	Safety Hammer <input type="checkbox"/> Other <input type="checkbox"/>

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks		
Elevation	Depth		Rock Core							RQD	Run
390.6'	0.0'	Top of Hole									
390.0'	0.6'	POORLY GRADED GRAVEL									
		LEAN CLAY with Gravel, brown and gray, moist, stiff to very stiff		SPT-1	0.6 - 2.1	1.4	13-6-6	19	Boring advanced using 4 1/4" Hollow Stem Augers		
			SPT-2	3.0 - 4.5	1.5	4-5-6	19				
			SPT-3	5.0 - 6.5	1.5	2-4-5	22				
			SPT-4	7.5 - 9.0	1.2	3-5-5	21				
			SPT-5	10.0 - 11.5	1.3	4-5-5	19				
			SPT-6	12.5 - 14.0	1.5	5-8-12	23				
			SPT-7	15.0 - 16.5	1.4	6-5-6	18				
372.6'	18.0'		BOTTOM ASH, black, wet, loose		SPT-8	17.5 - 19.0	1.1	6-5-5		14	Began using drilling fluid at 17.0 feet
				SPT-9	20.0 - 21.5	1.4	2-3-3	25			
				ST-1	22.5 - 23.2	0.7		28			
				SPT-10	23.2 - 24.7	1.1	13-10-12	20			
				SPT-11	25.0 - 26.5	0.0	5-3-4	--			
				SPT-12	27.5 - 29.0	0.6	3-4-3	26			
359.1'	31.5'			SPT-13	30.0 - 31.5	0.5	7-5-9	22	Boring backfilled with bentonite grout from 0.0 ft to 31.5 ft		

No Refusal /
Bottom of Hole

Project No.	175559008	Location	See Attached Layout	
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-B-2	Total Depth 31.5 ft
Location	Humphreys County, Tennessee	Surface Elevation	390.2 ft. (NGVD29)	
Project Type	Geotechnical Exploration	Date Started	2/24/09	Completed 2/24/09
Supervisor	N. Puckett Driller J. Felts	Depth to Water	15.0 ft	Date/Time 2/24/09
Logged By	N. Puckett	Automatic Hammer	<input checked="" type="checkbox"/>	Safety Hammer <input type="checkbox"/> Other <input type="checkbox"/>

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth	
390.2'	0.0'	Top of Hole							
389.5'	0.7'	POORLY GRADED GRAVEL							
		LEAN CLAY, brown and gray, moist, stiff to very stiff, with gravel in upper 2'		SPT-1	1.5 - 3.0	1.4	3-3-12	20	Boring advanced using 4 1/4" Hollow Stem Augers
				SPT-2	5.0 - 6.5	1.5	2-3-5	22	
				SPT-3	7.5 - 9.0	1.5	5-7-9	17	
				SPT-4	10.0 - 11.5	1.5	3-5-8	21	
				SPT-5	12.5 - 14.0	1.3	4-8-8	16	
374.9'	15.3'	BOTTOM ASH, black, wet, medium dense		SPT-6	15.0 - 16.5	1.5	7-7-8	16	Began using drilling fluid at 15.0 feet
				SPT-7	17.5 - 19.0	0.3	2-2-9	20	
370.2'	20.0'	LEAN CLAY, brown, wet, medium stiff to stiff		SPT-8	20.0 - 21.5	0.9	2-2-3	20	Boring backfilled with bentonite grout from 0.0 ft to 31.5 ft
				SPT-9	22.5 - 24.0	1.1	1-2-4	24	
				SPT-10	25.0 - 26.5	1.3	3-4-5	25	
				SPT-11	27.5 - 29.0	1.3	4-6-8	22	
				SPT-12	30.0 - 31.5	1.3	4-6-8	18	

No Refusal /
Bottom of Hole

Project No.	175559008	Location	See Attached Layout	
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-B-3	Total Depth 31.5 ft
Location	Humphreys County, Tennessee	Surface Elevation	390.2 ft. (NGVD29)	
Project Type	Geotechnical Exploration	Date Started	2/24/09	Completed 2/24/09
Supervisor	N. Puckett Driller J. Felts	Depth to Water	18.0 ft	Date/Time 2/24/09
Logged By	N. Puckett	Automatic Hammer	<input checked="" type="checkbox"/>	Safety Hammer <input type="checkbox"/> Other <input type="checkbox"/>

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core						
390.2'	0.0'	Top of Hole							
389.9'	0.3'	POORLY GRADED GRAVEL							Boring advanced using 4 1/4" Hollow Stem Augers
		LEAN CLAY, brown and gray, moist, stiff to very stiff, with gravel in upper 1'		SPT-1	1.0 - 2.5	1.3	4-5-7	17	
				SPT-2	2.5 - 4.0	1.4	8-11-13	20	
				SPT-3	5.0 - 6.5	1.5	5-7-9	22	
				SPT-4	7.5 - 9.0	1.3	4-6-8	17	
				SPT-5	10.0 - 11.5	1.5	3-4-5	19	
				SPT-6	12.5 - 14.0	1.1	6-8-7	15	
375.0'	15.2'	BOTTOM ASH, black, wet, very loose to medium dense		SPT-7	15.0 - 16.5	1.5	7-6-5	21	Began using drilling fluid at 18.0 feet
371.5'	18.7'	LEAN CLAY, brown, wet, stiff		SPT-8	17.5 - 19.0	1.4	3-2-1	20	
				ST-1	20.0 - 22.0	1.8		25	
				SPT-9	22.5 - 24.0	1.0	4-6-9	22	
				SPT-10	25.0 - 26.5	1.3	4-5-9	27	
				SPT-11	27.5 - 29.0	1.3	4-6-9	25	Boring backfilled with bentonite grout from 0.0 ft to 31.5 ft
358.7'	31.5'			SPT-12	30.0 - 31.5	0.9	4-4-6	25	

No Refusal /
Bottom of Hole

Project No.	175559008	Location	See Attached Layout		
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-B-4	Total Depth	31.5 ft
Location	Humphreys County, Tennessee	Surface Elevation	389.5 ft. (NGVD29)		
Project Type	Geotechnical Exploration	Date Started	2/24/09	Completed	2/25/09
Supervisor	N. Puckett	Driller	J. Felts	Depth to Water	17.0 ft
Logged By	N. Puckett	Automatic Hammer	<input checked="" type="checkbox"/>	Safety Hammer	<input type="checkbox"/>
		Other	<input type="checkbox"/>		

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois. Cont. %	Remarks
Elevation	Depth		Rock Core						
389.5'	0.0'	Top of Hole							
389.1'	0.4'	POORLY GRADED GRAVEL							Boring advanced using 4 1/4" Hollow Stem Augers Began using drilling fluid at 17.0 feet Boring backfilled with bentonite grout from 0.0 ft to 31.5 ft
		LEAN CLAY, brown and gray, moist, medium stiff to very stiff, with gravel in the upper 0.7'		SPT-1	1.0 - 2.5	0.9	1-2-3	22	
				SPT-2	2.5 - 4.0	1.0	5-5-6	21	
				SPT-3	5.0 - 6.5	1.1	5-6-8	20	
				SPT-4	7.5 - 9.0	1.3	6-9-12	17	
				SPT-5	10.0 - 11.5	1.3	5-9-7	14	
				SPT-6	12.5 - 14.0	1.0	2-3-5	20	
374.0'	15.5'	BOTTOM ASH, black, moist to wet, loose to dense		SPT-7	15.0 - 16.5	1.4	13-27-40	11	
				SPT-8	17.5 - 19.0	0.0	29-6-6	14	
368.5'	21.0'	LEAN CLAY, brown and gray, moist, stiff		SPT-9	20.0 - 21.5	1.4	3-4-4	22	
				SPT-10	22.5 - 24.0	1.7	5-5-7	22	
				SPT-11	25.0 - 26.5	1.2	4-5-8	23	
				SPT-12	27.5 - 29.0	1.3	5-6-7	24	
358.0'	31.5'			SPT-13	30.0 - 31.5	1.4	3-4-4	25	

No Refusal /
Bottom of Hole

Project No.	175559008	Location	See Attached Layout	
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-B-5	Total Depth 31.5 ft
Location	Humphreys County, Tennessee	Surface Elevation	389.9 ft. (NGVD29)	
Project Type	Geotechnical Exploration	Date Started	2/25/09	Completed 3/3/09
Supervisor	N. Puckett Driller J. Felts	Depth to Water	17.0 ft	Date/Time 2/25/09
Logged By	N. Puckett	Automatic Hammer	<input checked="" type="checkbox"/>	Safety Hammer <input type="checkbox"/> Other <input type="checkbox"/>

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core						
389.9'	0.0'	Top of Hole							
389.6'	0.3'	POORLY GRADED GRAVEL							Boring advanced using 4 1/4" Hollow Stem Augers
		LEAN CLAY, brown and gray, moist, stiff to very stiff, with gravel in upper 0.8'		SPT-1	1.0 - 2.5	1.1	3-5-6	21	
			SPT-2	2.5 - 4.0	1.4	10-12-12	21		
			SPT-3	5.0 - 6.5	0.9	1-5-5	19		
			SPT-4	7.5 - 9.0	1.0	2-5-8	18		
			SPT-5	10.0 - 11.5	1.5	2-4-5	21		
			SPT-6	12.5 - 14.0	1.5	4-5-7	20		
374.5'	15.4'	BOTTOM ASH, black, moist to wet, medium dense		SPT-7	15.0 - 16.5	1.5	13-13-13	16	
			SPT-8	17.5 - 19.0	1.2	8-12-7	17		
			SPT-9	20.0 - 21.5	1.3	8-11-11	15		
364.9'	25.0'	LEAN CLAY, brown and gray, moist, stiff to soft		SPT-10	25.0 - 26.5	1.2	2-3-7	24	
			SPT-11	27.5 - 29.0	1.2	0-0-3	27		
358.4'	31.5'		SPT-12	30.0 - 31.5	0.5	0-0-3	30		

No Refusal /
Bottom of Hole

Project No. <u>175559008</u>	Location <u>See Attached Layout</u>
Project Name <u>Johnsonville Fossil Plant -- TVA</u>	Boring No. STN-B-6 Total Depth <u>31.5 ft</u>
Location <u>Humphreys County, Tennessee</u>	Surface Elevation <u>389.9 ft. (NGVD29)</u>
Project Type <u>Geotechnical Exploration</u>	Date Started <u>2/25/09</u> Completed <u>3/3/09</u>
Supervisor <u>N. Puckett</u> Driller <u>J. Felts</u>	Depth to Water <u>17.0 ft</u> Date/Time <u>2/25/09</u>
Logged By <u>N. Puckett</u>	Automatic Hammer <input checked="" type="checkbox"/> Safety Hammer <input type="checkbox"/> Other <input type="checkbox"/>

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth	
389.9'	0.0'	Top of Hole							
389.5'	0.4'	POORLY GRADED GRAVEL							
		LEAN CLAY, brown and gray, moist, medium stiff to very stiff		SPT-1	0.5 - 2.0	1.2	4-5-5	19	Boring advanced using 4 1/4" Hollow Stem Augers
			SPT-2	2.5 - 4.0	1.4	4-8-9	20		
			SPT-3	5.0 - 6.5	1.4	5-6-7	18		
			SPT-4	7.5 - 9.0	1.5	7-9-9	19		
			SPT-5	10.0 - 11.5	1.5	2-3-4	22		
			SPT-6	12.5 - 14.0	1.3	3-6-6	23		
374.2'	15.7'	BOTTOM ASH, black, moist to wet, medium dense		SPT-7	15.0 - 16.5	1.3	7-25-21	15	
			SPT-8	17.5 - 19.0	1.4	8-11-9	18		
			SPT-9	20.0 - 21.5	1.5	4-6-6	16		
			SPT-10	22.5 - 24.0	0.7	18-8-2	18		
			SPT-11	25.0 - 26.5	1.4	3-5-8	24		
364.5'	25.4'	LEAN CLAY, brown and gray, moist, stiff to very soft		SPT-12	27.5 - 29.0	0.0	3-2-2	--	
			SPT-13	30.0 - 31.5	0.5	0-0-2	24		

No Refusal /
Bottom of Hole

Project No.	175559008	Location	See Attached Layout		
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-B-7	Total Depth	31.5 ft
Location	Humphreys County, Tennessee	Surface Elevation	390.1 ft. (NGVD29)		
Project Type	Geotechnical Exploration	Date Started	2/25/09	Completed	3/3/09
Supervisor	N. Puckett Driller J. Felts	Depth to Water	15.0 ft	Date/Time	2/25/09
Logged By	N. Puckett	Automatic Hammer	<input checked="" type="checkbox"/>	Safety Hammer	<input type="checkbox"/>
		Other	<input type="checkbox"/>		

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core						
390.1'	0.0'	Top of Hole							
389.6'	0.5'	POORLY GRADED GRAVEL							Boring advanced using 4 1/4" Hollow Stem Augers
		LEAN CLAY, brown and gray, moist, stiff to very stiff, with gravel in upper 0.8'		SPT-1	1.0 - 2.5	1.3	6-10-11	17	
			SPT-2	2.5 - 4.0	1.2	6-10-13	17		
			SPT-3	5.0 - 6.5	1.5	4-8-9	22		
			SPT-4	7.5 - 9.0	1.2	4-6-10	16		
			SPT-5	10.0 - 11.5	1.5	3-6-6	20		
375.0'	15.1'	BOTTOM ASH, black, wet, loose to dense		SPT-6	12.5 - 14.0	1.3	4-7-11	21	Began using drilling fluid at 15.0 feet
			SPT-7	15.0 - 16.5	1.4	15-23-21	17		
			SPT-8	17.5 - 19.0	1.2	5-9-8	16		
367.6'	22.5'	LEAN CLAY with Gravel and Organics, brown and gray, moist, stiff to soft		SPT-9	20.0 - 21.5	1.5	10-3-3	15	Boring backfilled with bentonite grout from 0.0 ft to 31.5 ft
			SPT-10	22.5 - 24.0	1.1	3-4-5	14		
			SPT-11	25.0 - 26.5	1.3	4-4-5	24		
			SPT-12	27.5 - 29.0	1.1	3-2-2	27		
358.6'	31.5'		SPT-13	30.0 - 31.5	1.3	3-3-3	24		

No Refusal /
Bottom of Hole

Project No.	175559008	Location	See Attached Layout		
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-B-8	Total Depth	31.5 ft
Location	Humphreys County, Tennessee	Surface Elevation	389.9 ft. (NGVD29)		
Project Type	Geotechnical Exploration	Date Started	2/25/09	Completed	2/25/09
Supervisor	N. Puckett Driller J. Felts	Depth to Water	18.0 ft	Date/Time	2/25/09
Logged By	N. Puckett	Automatic Hammer	<input checked="" type="checkbox"/>	Safety Hammer	<input type="checkbox"/>
		Other	<input type="checkbox"/>		

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core						
389.9'	0.0'	Top of Hole							
389.5'	0.4'	POORLY GRADED GRAVEL							Boring advanced using 4 1/4" Hollow Stem Augers
		LEAN CLAY, brown and gray, moist, stiff to very stiff, with gravel in upper 0.7'		SPT-1	1.0 - 2.5	1.4	4-8-7	17	
				SPT-2	2.5 - 4.0	1.3	5-10-12	20	
				SPT-3	5.0 - 6.5	1.4	4-5-7	19	
				SPT-4	7.5 - 9.0	1.1	4-5-7	21	
				SPT-5	10.0 - 11.5	1.5	4-7-10	18	
374.9'	15.0'			SPT-6	12.5 - 14.0	1.3	4-5-6	22	Began using drilling fluid at 18.0 feet
		BOTTOM ASH, black, moist to wet, loose to medium dense		SPT-7	15.0 - 16.5	1.5	18-11-8	13	
				SPT-8	17.5 - 19.0	0.3	2-2-3	14	
368.9'	21.0'			SPT-9	20.0 - 21.5	1.1	1-2-3	26	
		LEAN CLAY, gray and brown, moist, medium stiff to very stiff		SPT-10	22.5 - 24.0	0.8	2-2-3	26	Boring backfilled with bentonite grout from 0.0 ft to 31.5 ft
				SPT-11	25.0 - 26.5	0.5	4-5-6	25	
				SPT-12	27.5 - 29.0	1.2	3-4-6	24	
358.4'	31.5'			SPT-13	30.0 - 31.5	1.1	4-7-9	22	

No Refusal /
Bottom of Hole



Project No.	175559008	Location	See Attached Layout		
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-B-8A	Total Depth	11.3 ft
Location	Humphreys County, Tennessee	Surface Elevation	389.9 ft. (NGVD29)		
Project Type	Geotechnical Exploration	Date Started	2/25/09	Completed	2/25/09
Supervisor	N. Puckett	Driller	J. Felts	Depth to Water	N/A
Logged By	N. Puckett	Automatic Hammer	<input checked="" type="checkbox"/>	Safety Hammer	<input type="checkbox"/>
		Other	<input type="checkbox"/>		

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth	
389.9'	0.0'	Top of Hole							
		OVERBURDEN							Boring advanced using 4 1/4" Hollow Stem Augers
									Boring backfilled with bentonite grout from 0.0 ft to 11.3 ft
378.6'	11.3'			ST-1	10.0 - 11.3	1.3		19	

No Refusal /
Bottom of Hole

Project No.	<u>175559008</u>	Location	<u>See Attached Layout</u>		
Project Name	<u>Johnsonville Fossil Plant -- TVA</u>	Boring No.	STN-B-9	Total Depth	<u>31.5 ft</u>
Location	<u>Humphreys County, Tennessee</u>	Surface Elevation	<u>389.7 ft. (NGVD29)</u>		
Project Type	<u>Geotechnical Exploration</u>	Date Started	<u>2/26/09</u>	Completed	<u>2/26/09</u>
Supervisor	<u>N. Puckett</u> Driller <u>J. Felts</u>	Depth to Water	<u>21.0 ft</u>	Date/Time	<u>2/26/09</u>
Logged By	<u>N. Puckett</u>	Automatic Hammer	<input checked="" type="checkbox"/>	Safety Hammer	<input type="checkbox"/>
		Other	<input type="checkbox"/>		

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core						
389.7'	0.0'	Top of Hole							
389.4'	0.3'	POORLY GRADED GRAVEL							Boring advanced using 4 1/4" Hollow Stem Augers
		LEAN CLAY, brown and gray, moist, stiff to very stiff, with gravel in upper 0.8'		SPT-1	1.0 - 2.5	1.4	5-9-10	18	
				SPT-2	2.5 - 4.0	1.3	9-12-12	20	
				SPT-3	5.0 - 6.5	1.5	4-6-8	20	
				SPT-4	7.5 - 9.0	1.5	4-7-9	18	
				SPT-5	10.0 - 11.5	1.0	3-7-9	14	
				SPT-6	12.5 - 14.0	1.4	4-6-8	22	
374.7'	15.0'	BOTTOM ASH, black, moist to wet, loose to dense		SPT-7	15.0 - 16.5	1.4	4-25-26	10	
				SPT-8	17.5 - 19.0	1.5	12-13-9	12	
				SPT-9	20.0 - 21.5	1.5	3-6-5	15	Began using drilling fluid at 21.0 feet
				SPT-10	22.5 - 24.0	1.5	5-3-1	16	
363.7'	26.0'	LEAN CLAY, brown and gray, wet, stiff		SPT-11	25.0 - 26.5	1.5	1-1-4	15	
				SPT-12	27.5 - 29.0	1.0	2-5-6	25	Boring backfilled with bentonite grout from 0.0 ft to 31.5 ft
358.2'	31.5'			SPT-13	30.0 - 31.5	1.3	2-4-5	23	

No Refusal /
Bottom of Hole

Project No.	175559008	Location	See Attached Layout	
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-B-10	Total Depth 31.5 ft
Location	Humphreys County, Tennessee	Surface Elevation	389.1 ft. (NGVD29)	
Project Type	Geotechnical Exploration	Date Started	2/26/09	Completed 2/26/09
Supervisor	N. Puckett Driller J. Felts	Depth to Water	22.0 ft	Date/Time 2/26/09
Logged By	N. Puckett	Automatic Hammer	<input checked="" type="checkbox"/>	Safety Hammer <input type="checkbox"/> Other <input type="checkbox"/>

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core						
389.1'	0.0'	Top of Hole							
388.9'	0.2'	BOTTOM ASH		SPT-1	0.0 - 1.5	1.2	4-6-8	14	Boring advanced using 4 1/4" Hollow Stem Augers
		LEAN CLAY, brown, moist, stiff to medium stiff, with gravel and ash throughout		SPT-2	2.5 - 4.0	1.3	3-5-4	18	
			SPT-3	5.0 - 6.5	1.5	2-2-2	23		
			SPT-4	7.5 - 9.0	1.3	1-2-3	22		
			SPT-5	10.0 - 11.5	1.5	2-3-3	22		
			SPT-6	12.5 - 14.0	1.5	3-4-5	20		
			SPT-7	15.0 - 16.5	1.5	2-3-3	21		
			SPT-8	17.5 - 19.0	1.5	1-2-3	23		
369.1'	20.0'	FLY ASH, gray, wet, very loose		SPT-9	20.0 - 21.5	1.5	1-1-0	33	
			SPT-10	22.5 - 24.0	1.5	0-0-1	36	Began using drilling fluid at 22.0 feet	
			SPT-11	25.0 - 26.5	1.5	0-0-1	47		
			SPT-12	27.5 - 29.0	1.5	WOR	42	Boring backfilled with bentonite grout from 0.0 ft to 31.5 ft	
357.6'	31.5'		SPT-13	30.0 - 31.5	1.5	WOH	31		

 No Refusal /
Bottom of Hole

 WOH=Weight of Hammer,
WOR=Weight of Rods

Project No.	175559008	Location	See Attached Layout	
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-B-11	Total Depth 31.5 ft
Location	Humphreys County, Tennessee	Surface Elevation	389.6 ft. (NGVD29)	
Project Type	Geotechnical Exploration	Date Started	2/26/09	Completed 2/26/09
Supervisor	N. Puckett Driller J. Felts	Depth to Water	30.0 ft	Date/Time 2/26/09
Logged By	N. Puckett	Automatic Hammer	<input checked="" type="checkbox"/>	Safety Hammer <input type="checkbox"/> Other <input type="checkbox"/>

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth	
389.6'	0.0'	Top of Hole							
389.2'	0.4'	BOTTOM ASH		SPT-1	0.0 - 1.5	1.5	8-9-8	14	Boring advanced using 4 1/4" Hollow Stem Augers
		LEAN CLAY with Gravel, brown, moist, very stiff to very soft, with ash in the upper 3'		SPT-2	2.5 - 4.0	1.5	6-9-9	14	
				SPT-3	5.0 - 6.5	1.4	3-3-3	20	
				SPT-4	7.5 - 9.0	1.5	2-4-3	20	
				SPT-5	10.0 - 11.5	1.3	2-2-3	21	
				SPT-6	12.5 - 14.0	1.5	1-2-4	21	
				SPT-7	15.0 - 16.5	1.5	1-2-2	25	
				SPT-8	17.5 - 19.0	1.5	WOH	24	
				SPT-9	20.0 - 21.5	1.5	1-1-1	24	
				SPT-10	22.5 - 24.0	1.5	0-1-1	23	
364.6'	25.0'	FLY ASH, gray and black, wet, very loose		SPT-11	25.0 - 26.5	0.6	2-2-1	30	Began using drilling fluid at 30.0 feet Boring backfilled with bentonite grout from 0.0 ft to 31.5 ft
				SPT-12	27.5 - 29.0	1.0	WOH	33	
358.1'	31.5'			SPT-13	30.0 - 31.5	1.3	WOH	30	

 No Refusal /
Bottom of Hole

WOH=Weight of Hammer

Project No.	175559008	Location	See Attached Layout		
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-B-12	Total Depth	0.0 ft
Location	Humphreys County, Tennessee	Surface Elevation	----		
Project Type	Geotechnical Exploration	Date Started	2/26/09	Completed	2/26/09
Supervisor	N. Puckett	Driller	J. Felts	Depth to Water	N/A
Logged By	N. Puckett	Automatic Hammer	<input checked="" type="checkbox"/>	Safety Hammer	<input type="checkbox"/>
		Other	<input type="checkbox"/>		

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth	
'	0.0'	Top of Hole							
'	0.0'	Boring was not drilled.							
		No Refusal /							
		Bottom of Hole							

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Project No.	175559008	Location	See Attached Layout	
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-B-13	Total Depth 31.5 ft
Location	Humphreys County, Tennessee	Surface Elevation	390.1 ft. (NGVD29)	
Project Type	Geotechnical Exploration	Date Started	2/26/09	Completed 2/26/09
Supervisor	N. Puckett Driller J. Felts	Depth to Water	4.0 ft	Date/Time 2/26/09
Logged By	N. Puckett	Automatic Hammer	<input checked="" type="checkbox"/>	Safety Hammer <input type="checkbox"/> Other <input type="checkbox"/>

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth	
390.1'	0.0'	Top of Hole							
		BOTTOM ASH, black, moist to wet, very loose to medium dense		SPT-1	0.0 - 1.5	1.4	3-8-8	23	Boring advanced using 4 1/4" Hollow Stem Augers Began using drilling fluid at 4.0 feet
			SPT-2	2.5 - 4.0	1.4	3-4-5	19		
			SPT-3	5.0 - 6.5	1.0	2-2-2	21		
			SPT-4	7.5 - 9.0	1.0	2-2-2	22		
			SPT-5	10.0 - 11.5	0.2	1-0-0	36		
			SPT-6	12.5 - 14.0	0.0	WOH	15		
			SPT-7	15.0 - 16.5	0.3	WOH	25		
			SPT-8	17.5 - 19.0	0.0	WOH	--		
			SPT-9	20.0 - 21.5	0.0	WOH	--		
367.6'	22.5'								
		FLY ASH, gray and black, wet, very loose		SPT-10	22.5 - 24.0	1.3	WOH	43	
365.1'	25.0'								
		BOTTOM ASH, black, wet, very loose		SPT-11	25.0 - 26.5	1.0	2-2-1	29	
			SPT-12	27.5 - 29.0	0.3	2-2-1	27	Boring backfilled with bentonite grout from 0.0 ft to 31.5 ft	
			SPT-13	30.0 - 31.5	0.8	1-1-1	30		
358.6'	31.5'								

 No Refusal /
Bottom of Hole

WOH=Weight of Hammer



Project No.	175559008	Location	See Attached Layout		
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-B-14	Total Depth	21.5 ft
Location	Humphreys County, Tennessee	Surface Elevation	367.3 ft. (NGVD29)		
Project Type	Geotechnical Exploration	Date Started	3/12/09	Completed	3/12/09
Supervisor	N. Puckett	Driller	J. Felts	Depth to Water	16.0 ft
Logged By	N. Puckett	Automatic Hammer	<input checked="" type="checkbox"/>	Safety Hammer	<input type="checkbox"/>
		Other	<input type="checkbox"/>		

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth	
367.3'	0.0'	Top of Hole							
367.0'	0.3'	TOPSOIL		SPT-1	0.0 - 1.5	1.3	1-4-7	18	Boring advanced using 3 1/4" Hollow Stem Augers
		LEAN CLAY, brown and gray, moist to wet, stiff to medium stiff, silt content increasing with depth		SPT-2	2.5 - 4.0	1.1	4-4-6	22	
			SPT-3	5.0 - 6.5	1.3	2-3-6	20		
			SPT-4	7.5 - 9.0	1.2	3-4-7	21		
			SPT-5	10.0 - 11.5	1.3	3-4-6	24		
			SPT-6	12.5 - 14.0	1.1	2-5-6	24		
			SPT-7	15.0 - 16.5	1.5	1-3-3	26		
			SPT-8	17.5 - 19.0	1.5	2-3-4	26		
			SPT-9	20.0 - 21.5	1.4	2-4-5	24		

No Refusal /
Bottom of Hole

Project No.	175559008	Location	See Attached Layout	
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-B-15	Total Depth 21.5 ft
Location	Humphreys County, Tennessee	Surface Elevation	378.9 ft. (NGVD29)	
Project Type	Geotechnical Exploration	Date Started	3/16/09	Completed 3/16/09
Supervisor	N. Puckett Driller J. Felts	Depth to Water	N/A	Date/Time N/A
Logged By	N. Puckett	Automatic Hammer	<input checked="" type="checkbox"/>	Safety Hammer <input type="checkbox"/> Other <input type="checkbox"/>

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth	
378.9'	0.0'	Top of Hole							
		POORLY GRADED GRAVEL							Boring advanced using 4 1/4" Hollow Stem Augers
374.9'	4.0'	LEAN CLAY, brown and gray, moist, stiff and very stiff							
			SPT-1	5.0 - 6.5	1.0	2-5-9	19		
			SPT-2	6.5 - 8.0	1.4	6-7-9	20		
			SPT-3	8.0 - 9.5	1.0	5-5-8	20		
			SPT-4	9.5 - 11.0	1.0	5-5-6	23		
			SPT-5	11.0 - 12.5	1.3	6-7-8	20		
			SPT-6	12.5 - 14.0	0.9	10-7-8	20		
			SPT-7	14.0 - 15.5	0.3	7-4-4	20		
			SPT-8	15.5 - 17.0	1.3	0-3-5	22		
			SPT-9	17.5 - 19.0	1.3	2-4-6	21		Boring backfilled with bentonite grout from 0.0 ft to 21.5 ft
357.4'	21.5'	SPT-10	20.0 - 21.5	1.4	2-4-4	23			

No Refusal /
Bottom of Hole

Project No.	175559008	Location	See Attached Layout	
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-B-16	Total Depth 31.5 ft
Location	Humphreys County, Tennessee	Surface Elevation	389.6 ft. (NGVD29)	
Project Type	Geotechnical Exploration	Date Started	4/8/09	Completed 4/8/09
Supervisor	N. Puckett	Driller	J. Wethington	Depth to Water N/A
Logged By	N. Puckett	Automatic Hammer	<input checked="" type="checkbox"/>	Safety Hammer <input type="checkbox"/> Other <input type="checkbox"/>

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks	
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth		
389.6'	0.0'	Top of Hole								
389.3'	0.3'	TOPSOIL/GRAVEL		SPT-1	0.0 - 1.5	0.5	5-5-6	17	Boring advanced using 3 1/4" Hollow Stem Augers	
		LEAN CLAY, tan and gray, moist to wet, very stiff to soft, occasional gravel, gray silt lenses throughout		SPT-2	2.5 - 4.0	1.1	2-3-3	22		
			SPT-3	5.0 - 6.5	1.4	2-8-11	17			
			SPT-4	7.5 - 9.0	1.5	4-6-7	22			
			SPT-5	10.0 - 11.5	1.4	2-4-5	20			
			SPT-6	12.5 - 14.0	1.3	2-4-5	18			
			SPT-7	15.0 - 16.5	1.5	3-6-6	21			
			SPT-8	17.5 - 19.0	0.6	2-3-3	17			
			SPT-9	20.0 - 21.5	0.9	2-2-3	21			
			SPT-10	22.5 - 24.0	1.5	2-2-3	22			
			SPT-11	25.0 - 26.5	1.1	2-2-2	24			
			-distinct odor from 27.5' to 29'	SPT-12	27.5 - 29.0	1.4	1-2-3	22		Boring backfilled with bentonite grout from 0.0 ft to 31.5 ft
358.1'	31.5'			SPT-13	30.0 - 31.5	1.0	2-2-2	22		

No Refusal /
Bottom of Hole

Project No.	175559008	Location	See Attached Layout	
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-B-17	Total Depth 31.5 ft
Location	Humphreys County, Tennessee	Surface Elevation	389.1 ft. (NGVD29)	
Project Type	Geotechnical Exploration	Date Started	4/7/09	Completed 4/7/09
Supervisor	N. Puckett	Driller	J. Wethington	Depth to Water N/A
Logged By	N. Puckett	Automatic Hammer	<input checked="" type="checkbox"/>	Safety Hammer <input type="checkbox"/> Other <input type="checkbox"/>

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth	
389.1'	0.0'	Top of Hole							
388.8'	0.3'	TOPSOIL		SPT-1	0.0 - 1.5	0.6	4-5-7	22	Boring advanced using 3 1/4" Hollow Stem Augers
		LEAN CLAY, tan and gray, moist to wet, stiff to soft, occasional gravel, silt lenses throughout		SPT-2	2.5 - 4.0	1.0	3-3-4	15	
			SPT-3	5.0 - 6.5	1.3	4-8-9	16		
			SPT-4	7.5 - 9.0	1.5	2-4-7	19		
			SPT-5	10.0 - 11.5	1.1	2-3-4	21		
			SPT-6	12.5 - 14.0	1.4	3-3-4	23		
			SPT-7	15.0 - 16.5	1.1	3-3-4	21		
			SPT-8	17.5 - 19.0	1.3	1-2-2	22		
			SPT-9	20.0 - 21.5	1.4	1-4-5	22		
			SPT-10	22.5 - 24.0	1.2	1-1-2	22		
			SPT-11	25.0 - 26.5	1.2	3-5-6	17		
			SPT-12	27.5 - 29.0	1.5	2-4-5	19		
357.6'	31.5'		SPT-13	30.0 - 31.5	0.6	1-1-2	22	Boring backfilled with bentonite grout from 0.0 ft to 31.5 ft	

No Refusal /
Bottom of Hole

Project No.	175559008	Location	See Attached Layout		
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-B-18	Total Depth	31.5 ft
Location	Humphreys County, Tennessee	Surface Elevation	391.0 ft. (NGVD29)		
Project Type	Geotechnical Exploration	Date Started	4/7/09	Completed	4/7/09
Supervisor	N. Puckett	Driller	J. Wethington	Depth to Water	N/A
Logged By	N. Puckett	Automatic Hammer	<input checked="" type="checkbox"/>	Safety Hammer	<input type="checkbox"/>
		Other	<input type="checkbox"/>		

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth	
391.0'	0.0'	Top of Hole							
390.8'	0.2'	TOPSOIL/GRAVEL		SPT-1	0.0 - 1.5	0.3	4-5-6	--	Boring advanced using 3 1/4" Hollow Stem Augers
		LEAN CLAY, tan and gray, moist to wet, very stiff to very soft, gray silt lenses throughout, occasional small rocks		SPT-2	2.5 - 4.0	0.8	1-2-3	21	
			SPT-3	5.0 - 6.5	1.5	3-5-6	21		
			SPT-4	7.5 - 9.0	1.2	3-8-9	17		
			SPT-5	10.0 - 11.5	0.6	1-2-2	21		
			SPT-6	12.5 - 14.0	0.6	3-3-3	19		
			SPT-7	15.0 - 16.5	0.6	2-4-8	19		
			-distinct odor from 17.5'-19'	SPT-8	17.5 - 19.0	0.9	2-2-2	20	
			SPT-9	20.0 - 21.5	1.0	2-3-3	25		
			SPT-10	22.5 - 24.0	1.2	1-1-1	27		
			SPT-11	25.0 - 26.5	1.2	1-3-5	20		
			SPT-12	27.5 - 29.0	1.2	1-2-3	21		
359.5'	31.5'		-small amount of gravel from 30'-31.5'	SPT-13	30.0 - 31.5	0.8	1-2-2	22	
		No Refusal / Bottom of Hole							

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Project No.	175559008	Location	See Attached Layout		
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-B-19	Total Depth	31.5 ft
Location	Humphreys County, Tennessee	Surface Elevation	388.3 ft. (NGVD29)		
Project Type	Geotechnical Exploration	Date Started	4/8/09	Completed	4/8/09
Supervisor	N. Puckett	Driller	Tim Caudill	Depth to Water	18.0 ft
Logged By	N. Puckett	Automatic Hammer	<input checked="" type="checkbox"/>	Safety Hammer	<input type="checkbox"/>
		Other	<input type="checkbox"/>		

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth	
388.3'	0.0'	Top of Hole							
387.4'	0.9'	TOPSOIL		SPT-1	0.0 - 1.5	1.4	5-9-9	4	Boring advanced using 4 1/4" Hollow Stem Augers
		LEAN CLAY, brown and gray, moist, very stiff to stiff		SPT-2	2.5 - 4.0	0.5	8-7-11	11	
			SPT-3	5.0 - 6.5	1.3	4-4-7	18		
			SPT-4	7.5 - 9.0	1.4	4-6-8	19		
			-rock in spoon at 10'	SPT-5	10.0 - 11.5	0.0	5-10-10	--	
			SPT-6	12.5 - 14.0	1.2	5-5-6	19		
373.3'	15.0'	BOTTOM ASH, black, moist to wet, loose to medium dense		SPT-7	15.0 - 16.5	1.4	19-16-14	12	Began using drilling fluid at 18.0 feet
				SPT-8	17.5 - 19.0	1.3	6-12-16	11	
				SPT-9	20.0 - 21.5	1.5	5-6-6	15	
				SPT-10	22.5 - 24.0	1.5	10-7-11	12	
				SPT-11	25.0 - 26.5	0.4	5-2-2	19	
359.8'	28.5'			SPT-12	27.5 - 29.0	1.1	1-2-2	26	Boring backfilled with bentonite grout from 0.0 ft to 31.5 ft
		LEAN CLAY, brown and gray, moist, stiff, with small rocks		SPT-13	30.0 - 31.5	1.2	3-5-10	22	

No Refusal /
Bottom of Hole

Project No.	<u>175559008</u>	Location	<u>See Attached Layout</u>		
Project Name	<u>Johnsonville Fossil Plant -- TVA</u>	Boring No.	STN-B-20	Total Depth	<u>31.5 ft</u>
Location	<u>Humphreys County, Tennessee</u>	Surface Elevation	<u>388.9 ft. (NGVD29)</u>		
Project Type	<u>Geotechnical Exploration</u>	Date Started	<u>4/8/09</u>	Completed	<u>4/8/09</u>
Supervisor	<u>N. Puckett</u> Driller <u>Tim Caudill</u>	Depth to Water	<u>18.0 ft</u>	Date/Time	<u>4/8/09</u>
Logged By	<u>N. Puckett</u>	Automatic Hammer	<input checked="" type="checkbox"/>	Safety Hammer	<input type="checkbox"/>
		Other	<input type="checkbox"/>		

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks	
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth		
388.9'	0.0'	Top of Hole								
387.8'	1.1'	POORLY GRADED GRAVEL		SPT-1	0.0 - 1.5	0.9	6-5-10	5	Boring advanced using 4 1/4" Hollow Stem Augers	
		LEAN CLAY, brown and gray, moist, stiff to medium stiff		SPT-2	2.5 - 4.0	1.3	6-6-8	17		
			SPT-3	5.0 - 6.5	1.3	3-6-6	16			
			SPT-4	7.5 - 9.0	1.3	5-7-8	21			
378.9'	10.0'			SPT-5	10.0 - 11.5	1.0	3-2-4	20	Began using drilling fluid at 18.0 feet	
		FAT CLAY, brown, moist, medium stiff, trace organics from 12.5' to 14'		SPT-6	12.5 - 14.0	1.2	2-3-5	18		
			SPT-7	15.0 - 16.5	1.5	5-19-19	21			
		BOTTOM ASH, black, moist to wet, very loose to dense, coarse grained		SPT-8	17.5 - 19.0	1.2	4-13-22	8		
			SPT-9	20.0 - 21.5	1.5	6-7-6	14			
			SPT-10	22.5 - 24.0	1.3	3-4-3	17			
			SPT-11	25.0 - 26.5	1.3	2-2-1	18			
360.9'	28.0'			SPT-12	27.5 - 29.0	1.5	2-5-9	25		Boring backfilled with bentonite grout from 0.0 ft to 31.5 ft
		LEAN CLAY, brown and gray, moist, stiff, with small rocks		SPT-13	30.0 - 31.5	1.2	2-6-7	19		

No Refusal /
Bottom of Hole

Project No.	175559008	Location	See Attached Layout		
Project Name	Johnsonville Fossil Plant -- TVA	Boring No.	STN-B-21	Total Depth	31.5 ft
Location	Humphreys County, Tennessee	Surface Elevation	389.2 ft. (NGVD29)		
Project Type	Geotechnical Exploration	Date Started	4/8/09	Completed	4/8/09
Supervisor	N. Puckett	Driller	J. Wethington	Depth to Water	24.0 ft
Logged By	N. Puckett	Automatic Hammer	<input checked="" type="checkbox"/>	Safety Hammer	<input type="checkbox"/>
		Other	<input type="checkbox"/>		

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth	
389.2'	0.0'	Top of Hole							
387.2'	2.0'	POORLY GRADED GRAVEL		SPT-1	0.0 - 1.5	0.6	8-5-4	1	Boring advanced using 3 1/4" Hollow Stem Augers
		LEAN CLAY, brown and gray, moist, stiff, occasional gravel		SPT-2	2.5 - 4.0	1.0	4-5-9	19	
			SPT-3	5.0 - 6.5	0.7	4-6-8	16		
			SPT-4	7.5 - 9.0	1.1	3-5-7	19		
			SPT-5	10.0 - 11.5	1.2	3-4-5	17		
			SPT-6	12.5 - 14.0	1.2	3-3-6	17		
373.6'	15.6'		BOTTOM ASH, black, moist to wet, very loose to very dense		SPT-7	15.0 - 16.5	1.3	3-18-32	
		SPT-8		17.5 - 19.0	1.1	2-8-41	18		
		SPT-9		20.0 - 21.5	1.5	3-10-18	14		
		SPT-10		22.5 - 24.0	0.9	6-4-4	12		
364.2'	25.0'	LEAN CLAY, brown and gray, moist, very soft to very stiff, small rocks throughout			SPT-11	25.0 - 26.5	0.8	1-1-1	
			SPT-12	27.5 - 29.0	0.5	1-2-6	15	Boring backfilled with bentonite grout from 0.0 ft to 31.5 ft	
357.7'	31.5'		SPT-13	30.0 - 31.5	1.0	6-11-12	19		

No Refusal /
Bottom of Hole

Project Number	175559008	Location	N 601957 E 1410240	
Project Name	Johnsonville Fossil Plant - TVA	Boring No.	TP-1	Total Depth 2.8 ft
County	Humphreys County, TN	Surface Elevation	376.0 ft	
Project Type	Geotechnical Exploration	Date Started	4/1/09	Completed 4/1/09
Supervisor	R. Jackson* Driller N/A	Depth to Water	Dry	Date/Time 4/1/09
Logged By	Stephen Bickel	Depth to Water	N/A	Date/Time N/A

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth	
376.0'	0.0'	Top of Excavation							
		LEAN CLAY, moist to wet, medium, decayed roots at 2 feet							Test Pit conducted at depressed area on West Dike (Approx. 10 feet long by 7 feet wide by 1.5 feet deep). No throat observed at surface.
373.2'	2.8'								

No Refusal /
Bottom of Excavation

NOTES:
 - Bottom of test pit was probed at 8 randomly spaced locations to depths of about 3.5 feet. The probed material was soft and very moist. No seepage or voids were encountered.
 - Test pit excavated using a long-reach track hoe.
 - Surface elevation should be considered approximate.
 * - Trans Ash Supervisor

Project Number	175559008	Location	N 602390 E 1410395	
Project Name	Johnsonville Fossil Plant - TVA	Boring No.	TP-2	Total Depth 3.1 ft
County	Humphreys County, TN	Surface Elevation	376.0 ft	
Project Type	Geotechnical Exploration	Date Started	4/1/09	Completed 4/1/09
Supervisor	R. Jackson* Driller N/A	Depth to Water	Dry	Date/Time 4/1/09
Logged By	Stephen Bickel	Depth to Water	N/A	Date/Time N/A

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth	
376.0'	0.0'	Top of Excavation							
		LEAN CLAY, moist to wet, medium							Test Pit conducted at depressed area on West Dike (Approx. 10 feet long by 4 feet wide by 1.5 feet deep). No throat observed at surface.
372.9'	3.1'								

No Refusal /
Bottom of Excavation

NOTES:
 - Bottom of test pit was probed at 5 randomly spaced locations to depths of about 3.5 feet. The probed material was soft and very moist. No seepage or voids were encountered.
 - Test pit excavated using a long-reach track hoe.
 - Surface elevation should be considered approximate.
 * - Trans Ash Supervisor

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Project Number	175559008	Location	N 602721 E 1410510	
Project Name	Johnsonville Fossil Plant - TVA	Boring No.	TP-3	Total Depth 2.7 ft
County	Humphreys County, TN	Surface Elevation	376.0 ft	
Project Type	Geotechnical Exploration	Date Started	4/1/09	Completed 4/1/09
Supervisor	R. Jackson* Driller N/A	Depth to Water	Dry	Date/Time 4/1/09
Logged By	Stephen Bickel	Depth to Water	N/A	Date/Time N/A

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth	
376.0'	0.0'	Top of Excavation							
		LEAN CLAY, moist to wet, medium, decayed roots or branches at 1.5 feet							Test Pit conducted at depressed area on West Dike (Approx. 10 feet long by 5 feet wide by 1.5 feet deep). No throat observed at surface.
373.3'	2.7'								

No Refusal /
Bottom of Excavation

NOTES:
 - Bottom of test pit was probed at 6 randomly spaced locations to depths of about 3.5 feet. The probed material was soft and very moist. No seepage or voids were encountered.
 - Test pit excavated using a long-reach track hoe.
 - Surface elevation should be considered approximate.
 * - Trans Ash Supervisor

Project Number	175559008	Location	N 603004 E 1410606	
Project Name	Johnsonville Fossil Plant - TVA	Boring No.	TP-4	Total Depth 3.0 ft
County	Humphreys County, TN	Surface Elevation	376.0 ft	
Project Type	Geotechnical Exploration	Date Started	4/1/09	Completed 4/1/09
Supervisor	R. Jackson* Driller N/A	Depth to Water	Dry	Date/Time 4/1/09
Logged By	Stephen Bickel	Depth to Water	N/A	Date/Time N/A

Lithology		Description	Overburden	Sample #	Depth	Rec. Ft.	Blows	Mois.Cont. %	Remarks
Elevation	Depth		Rock Core	RQD	Run	Rec. Ft.	Rec. %	Run Depth	
376.0'	0.0'	Top of Excavation							
		LEAN CLAY, moist to wet, medium, some decayed tree roots just below ground surface to bottom of test pit							Test Pit conducted at depressed area on West Dike (Approx. 10 feet long by 8 feet wide by 1.5 feet deep). No throat observed at surface.
373.0'	3.0'								

No Refusal /
Bottom of Excavation

NOTES:
 - Bottom of test pit was probed at 9 randomly spaced locations to depths of about 3.5 feet. The probed material was soft and very moist. No seepage or voids were encountered.
 - Test pit excavated using a long-reach track hoe.
 - Surface elevation should be considered approximate.
 * - Trans Ash Supervisor