



August 15, 2013

Mr. Gordon Box, L.G.
GeoEnvironmental Project Manager
Geotechnical Engineering Unit
North Carolina Department of Transportation
1589 Mail Service Center
Raleigh, NC 27699-1589

**Subject: Excavation and UST Removal Activities
Parcel #015, Former Christian O. Simson Property
State Project R-4047
WBS Element: 34599.1.1
County: Haywood
Description: 28 Corley Rd
AMEC Project: 566774047**

Dear Mr. Box:

AMEC Environment & Infrastructure, Inc. of North Carolina (AMEC) is pleased to provide a summary of UST removal activities performed at the above-referenced Site on July 19, 2013. AMEC received a request for proposal from NCDOT dated June 5, 2013 for a UST Closure at the Site. AMEC submitted our Technical and Cost Proposal on June 26, 2013. This work was conducted in accordance with your notice to proceed dated July 9, 2013. One onsite heating oil UST was closed by removal from the Site and the excavation was backfilled to ground surface.

SITE LOCATION

Facility I.D.: N/A UST Incident Number: N/A
Site Name: R-4047 – Parcel #015 Former Christian O. Simson Property
Site Street Address: 28 Corley Rd
City/Town: Lake Junaluska Zip Code: 28785 County: Haywood
Description of Geographical Point: N/A
Location Method (GPS, Topographical Map, Other): Google Maps
Latitude: 35° 52' 61" N Longitude: 82° 95' 87" W

CONTACTS

Responsible Party:	NCDOT, Geotechnical Unit	
Contact Person:	Gordon Box, L.G.	
Address:	1589 Mail Service Center, Raleigh, NC,27699	Phone: (919)707-6859
Property Owner:	Former Christian O. Simson Property	
Address:	28 Corley Rd Lake Junaluska, NC,28785	Phone: Not available
Contact Person:	Simsons	
Primary Consultant:	AMEC	
Address:	2801 Yorkmont Road Suite 100 Charlotte, NC 28208	Phone: (704) 357-5516
Soil Removal Contractor:	A&D Environmental Services	
Address:	1915 Brentwood St High Point, NC	Phone: (336) 882-8000
Analytical Laboratory:	Pace Analytical	
Address:	9800 Kinsey Ave, Ste 100 Huntersville, NC 28078	Phone: (704) 875-9092
State Certificate No.:	12	

PHYSICAL SETTING AND BACKGROUND INFORMATION

The Christian O. Simson Parcel is located on the southeastern corner of the intersection of NC Hwy 209 (Crabtree Road) and Corley Road in Lake Junaluska, Haywood County, North Carolina, as shown in Figure 1. The properties surrounding Parcel #015 are commercial and residential.

The Christian O. Simson Property is located within the Biotite Gneiss group of the Blue Ridge Belt Physiographic Province of western North Carolina. The Biotite Gneiss group is migmatic, interlayered and gradational with biotite garnet gneiss and amphibolite.

One two-story building with a basement level occupies the Site. The proposed road widening will traverse the length of Parcel #015. Figure 2 presents the Site Location Map. A photo log for the Site is included in the Attachments. During reconnaissance, representatives from AMEC as well as the subcontractor, A&D Environmental, identified one UST with a deduced capacity of 450 gallons and an estimated 20 gallons of product. The UST was located approximately 5 feet from the front of the house on the west side and was expected to be one foot below ground surface (bgs).

UST REMOVAL AND SOIL SAMPLING ACTIVITIES

Prior to excavation activities, AMEC requested and received a utility walk-through from North Carolina One Call. The local Fire Marshal and NCDENR were also notified prior to field activities.

AMEC retained A&D Environmental Services (A&D) to perform evacuation of residual fluids from the UST, to excavate and properly dispose the UST, and to potentially excavate and properly dispose of potentially affected soils from contaminant release. AMEC provided oversight and direction during excavation and removal activities, which were performed on the 19th of July 2013.

UST closure commenced with fluids removal from the UST using a vacuum truck. The UST was then pressure washed to render the UST inert. A total of 20 gallons of a mixture of water- and heating oil were evacuated from the UST. The lower explosive limit (LEL) within the tank was then checked with a Photo Ionization Detector (PID) to verify safe conditions for removal. UST-1 appeared rusted and pitted, but showed no areas of complete deterioration. Once excavated, UST-1 was measured to have a diameter of 4 feet and a length of 6 feet with a capacity of 600 gallons. The disposal certificates are included in the attachments following this letter.

During the removal of heating oil UST-1 no evidence of total petroleum hydrocarbon release was observed. Table 1 presents the field monitoring results. Soil sampling was; therefore, not necessary for this unregulated tank. Native soil was encountered during sampling activities, which predominantly consisted of orange, clayey silt. An excavation log is included in the attachments following this letter.

A&D then backfilled the exposed tank bed from UST-1

CONCLUSIONS

The following conclusions are derived from Site conditions and sample screening results from field activities conducted in July 2013.

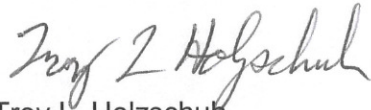
- Heating oil UST-1 was closed by removal on July 19, 2013 from 28 Corley Road in Lake Junaluska, Haywood County.
- A total of 20 gallons of a mixture of water and oil were evacuated from the UST.
- Photo Ionization Detector readings suggested that the soils below and next to the storage tank did not have any impact from volatile organic compounds from the UST.
- The 600 gallon UST was safely removed from the Site and disposed of properly. The excavation area was backfilled to ground surface.

Mr. Gordon Box
Parcel #15, Lake Junaluska, Haywood County, NC
August 15, 2013

Should you have any questions or need further information please contact us as (704) 357-8600.

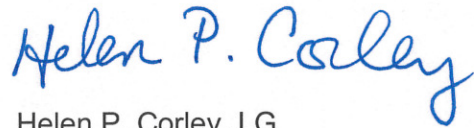
Best Regards,

AMEC Environment & Infrastructure, Inc. of North Carolina



Troy L. Holzschuh

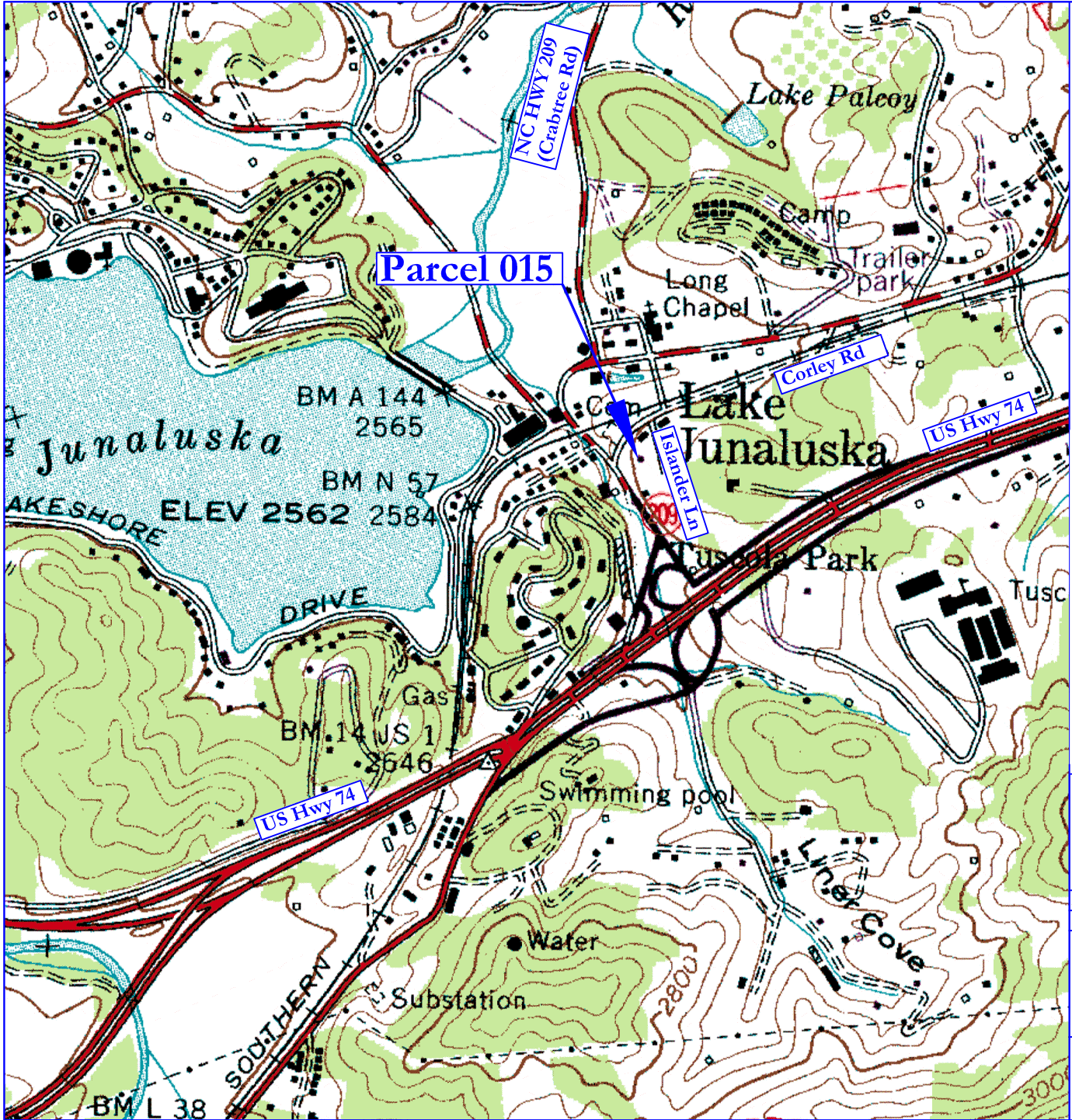
Engineer Science Professional



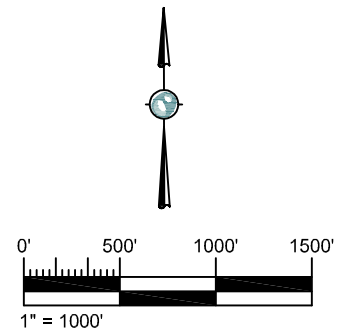
Helen P. Corley, LG

NCDOT Program Manager





Not to Scale



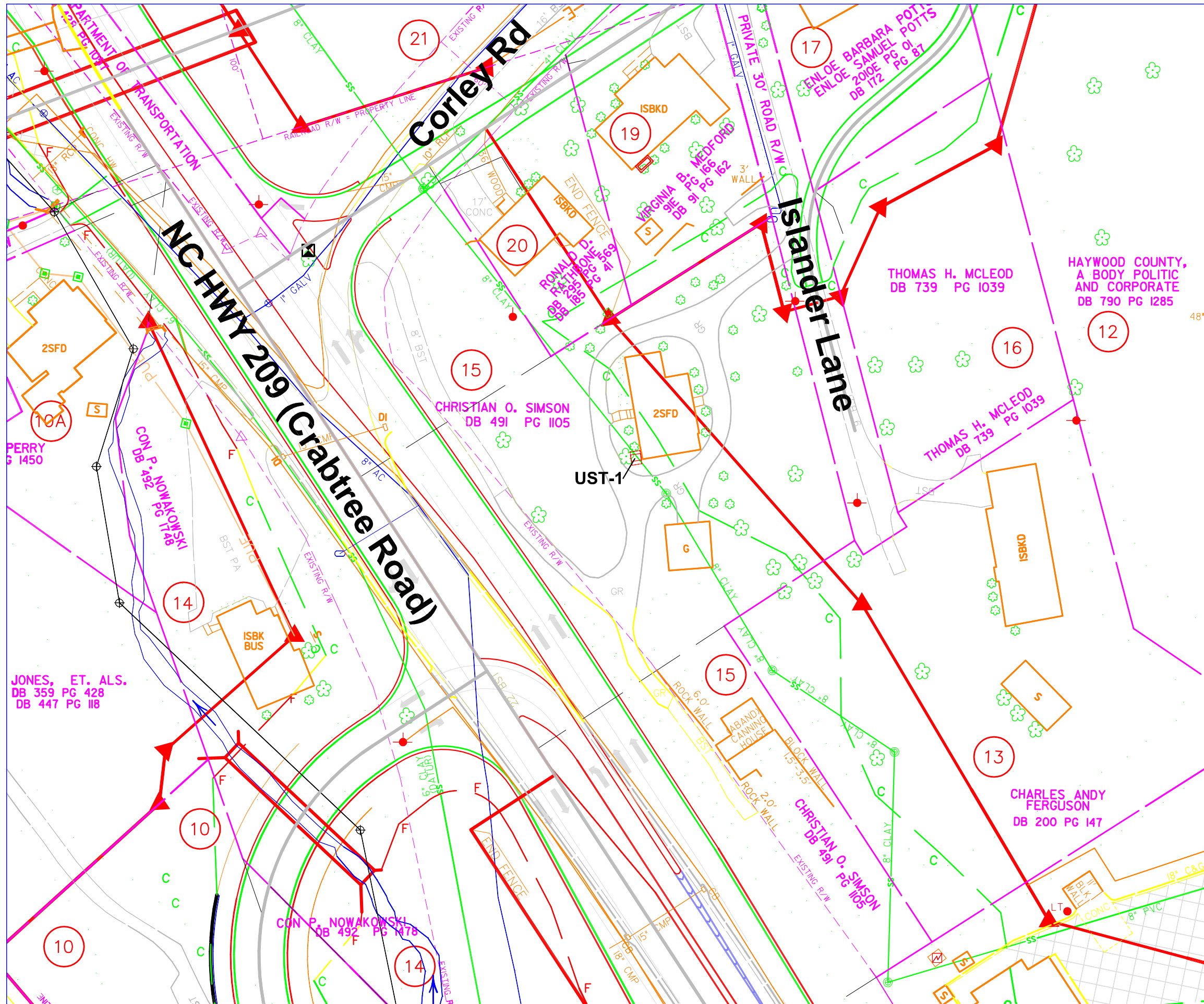
7.5 Minute Quadrangle
North Carolina, 1983
Photorevised 1993

Figure 1
Site Vicinity Map
Parcel 015









DRAWING NAME: J:\NCDOT\Haywood\FIG1	DATE: 8/15/13
SCALE: 1 INCH = 1,000 FEET	DR TLH CHK HPC REV

PREPARED FOR:
NC Department of Transportation
Geotechnical Unit
WBS Element: 34599.1.1
TIP# R-4047

Prepared By: amec Environment and Infrastructure, INC. 2801 Yorkmont Road, Suite 100 Charlotte, NC, 28208 (704) 357-6600	Figure: <i>Figure 1</i>
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LEGEND

-  Proposed Right of Way
-  Existing Property Line
-  Existing Right of Way
-  Cut Line
-  Fill Line
-  Excavation
-  Known UST
-  Utility Easement

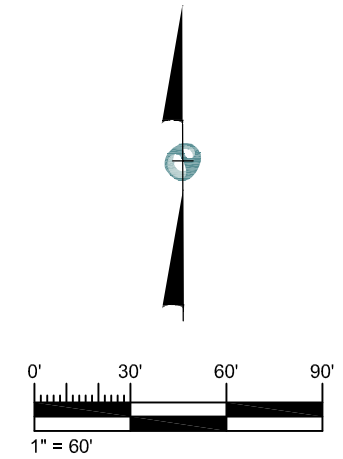


Figure 2
Parcel # 015 Former Christian O. Simson Property
(28 Corley Road)
Site Map

NC Department of Transportation
Geotechnical Unit
WBS Element: 34599.1.1
TIP# R-4047

Table 1
PID Field Screening
Parcel 015
28 Corley Rd, Lake Junaluska, North Carolina

SAMPLE ID	Sample Date	Comments	Sample Depth (feet bgs)	Field Screening (ppm)
P-1	7/19/2013	Composite Grab East Sidewall	1	0
P-2	7/19/2013	Composite Grab Over UST-1	2	0
P-3	7/19/2013	Composite Grab Over UST-1	3	0
P-4	7/19/2013	Composite Grab East Sidewall	5	0
P-5	7/19/2013	Composite Grab East Sidewall	7	0
P-6	7/19/2013	Composite Grab West Sidewall	7	0
P-7	7/19/2013	Composite Grab North Sidewall	7	0
P-8	7/19/2013	Composite Grab South Sidewall	5	0
P-9	7/19/2013	Composite Grab South Sidewall	7	0
P-10	7/19/2013	Composite Grab Floor	7	0
Notes: PPM = Parts Per Million				



Photo 1

Site prior to excavation activities .



Photo 2

Vac truck evacuating the UST.



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PHOTOGRAPHIC LOG

UST Closure Activities
Parcel 015,28 Corley Rd, Lake Junaluska, NC



Photo 3

A&D Personnel Pressure Washing the UST to render the UST inert.



Photo 4

Back hoe Excavator uncovering the UST



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PHOTOGRAPHIC LOG

UST Closure Activities
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Photo 5

UST after being excavated. The UST was crushed during removal due to the tree roots that were around the tank.



Photo 6

Site upon completion of excavation activities.



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PHOTOGRAPHIC LOG

UST Closure Activities
Parcel 015,28 Corley Rd, Lake Junaluska, NC



A&D Environmental Services

Bill of Lading / Material Manifest

A&D Job No. 13774	Generator ID Number	Page 1 of	Emergency Response Phone 800-434-7750	Tracking Number 07199					
Generator's Name and Mailing Address AMEC 28 Carley Rd Waynesville, NC			Generator's site address (if different from mailing address)						
Transporter 1 <input type="checkbox"/> 2 <input type="checkbox"/>	Company Name A&D Environmental Services, Inc.			US EPA ID No: NCD98623222					
Transporter 1 <input checked="" type="checkbox"/> 2 <input type="checkbox"/>	Company Name A&D Environmental Services (SC), LLC			US EPA ID No: SCD987598331					
Designated Facility A&D Environmental Services, Inc. ● 2718 Uwharrie Road Archdale, NC 27263 336-434-7750 NCD986232221	Designated Facility A&D Environmental Services, Inc. 3149 Lear Drive Burlington, NC 27215 336-229-0058 NCR000138628	Designated Facility A&D Environmental Services (SC), LLC 1915 Brentwood Street High Point, NC 27260 336-882-8000 NCR000002501	Designated Facility A&D Environmental Services (SC), LLC 1741 Calks Ferry Road Lexington, SC 29073 803-957-9175 SCD987598331	Designated Facility A&D Environmental Services (SC), LLC 305-B South Main Street Mauldin, SC 29662 803-967-3500 SCR000765677 <i>25 Service Day Rd</i>					
HM	Hazardous Materials Shipping Name and Description (if applicable)		No.	Type	QTY	Wt/Vol	Profile Number		
	<i>non hazardous non regulated liquids PCW</i>		<i>001</i>	<i>TT</i>	<i>395</i>	<i>g</i>			
Petroleum Products for Recycle									
X	NA1993, Diesel fuel, 3, III	ERG# 128							
X	NA1993, Fuel oil (No. 1,2,4,5 or 6), 3, III	ERG# 128							
X	UN1203, Gasoline, 3, II	ERG# 128							
X	NA1270, Petroleum Oil, 3, III	ERG# 128							
Universal Waste Lamps, Batteries, Ballasts, and Electronics for Recycle									
HM	No.	Type	Est. Wt.	Count	Shipping Name and Description (if applicable)		Common Name	Discrepancy	
X					RQ, UN2809, Mercury contained in manufactured articles, 8, III ERG# 172		Mercury Containing Articles		
X					RQ, UN2809, Mercury, 8, III ERG# 172		Mercury		
X					RQ, UN3432, Polychlorinated biphenyls, solid, 9, II ERG# 171		TSCA Exempt PCB Lamp Ballasts		
X					UN2800, Batteries, wet, nonspillable, 8, III ERG# 154		Sealed Lead Acid Batteries		
X					UN2794, Batteries, wet, filled with acid, 8, III ERG# 154		Lead Acid Batteries		
X					UN2795, Batteries, wet, filled with alkali, 8, III ERG# 154		Wet NiCad Batteries		
X					UN3090, Lithium batteries, 9, II ERG# 138		Lithium Batteries		
X					UN3028, Batteries, dry, containing potassium hydroxide solid, 8, III ERG# 154		Alkaline Batteries		
X					UN3028, Batteries, dry, containing potassium hydroxide solid, 8, III ERG# 154		NiCad Batteries		
					Universal Waste Lamps (Not DOT-Regulated per 49 CFR 173.164(e))		Fluorescent lamps 4' or <		
					Universal Waste Lamps (Not DOT-Regulated per 49 CFR 173.164(e))		Fluorescent lamps 4' or >		
					Universal Waste Lamps (Not DOT-Regulated per 49 CFR 173.164(e))		Circular/U-tube lamps		
					Universal Waste Lamps (Not DOT-Regulated per 49 CFR 173.164(e))		Compact Lamps		
					Universal Waste Lamps (Not DOT-Regulated per 49 CFR 173.164(e))		Shattershield		
					Universal Waste Lamps (Not DOT-Regulated per 49 CFR 173.164(e))		HID/MV/LV Lamps		
					Universal Waste Lamps (Not DOT-Regulated per 49 CFR 173.164(e))		Incandescent Lamps		
					Non-PCB Light Ballasts for Recycle (Not DOT-Regulated)		Non-PCB Light Ballasts		
					Electronic Equipment for Recycle (Not DOT-Regulated)		Electronics		
Generator's Certification: This is to certify that the above-named materials are properly classified, described, packaged, marked, and labeled, and are in proper condition for transportation according to the applicable regulations of the Department of Transportation. I further certify that none of the materials described above are a hazardous waste as defined by EPA 40CFR Part 261 or any applicable state law, and unless specifically identified above the materials contain less than 1,000 ppm total halogens and do not contain quantifiable levels (2ppm) of PCBs as defined by EPA 40 CFR Parts 279 and 761.									
Generator's/Officer's Printed/Typed Name Troy L Holzschuh of AMEC For NCDOT					Signature <i>Troy L Holzschuh</i>		Month 7	Day 19	Year 13
Transporter 1 Printed/Typed Name Shane P. Florian					Signature <i>Shane P. Florian</i>		Month 7	Day 19	Year 13
Transporter 2 Printed/Typed Name					Signature		Month	Day	Year
Discrepancy Indication / Additional Information:							Month	Day	Year
Designated Facility Certification: I hereby acknowledge receipt of the materials covered by this manifest except for any discrepancy indicated above.									
Printed/Typed Name Shane P. Florian					Signature <i>Shane P. Florian</i>		Month 7	Day 19	Year 13

DESIGNATED FACILITY TO GENERATOR



A&D Environmental Services

Bill of Lading / Material Manifest

A&D Job No: <i>13974</i>	Generator ID Number	Page 1 of	Emergency Response Phone 800-434-7780	Tracking Number 04163
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Generator's Name and Mailing Address <i>13974</i>	Generator's site address (if different from mailing address)
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Transporter 1 <input type="checkbox"/> 2 <input type="checkbox"/> Company Name A&D Environmental Services, Inc.	US EPA ID No: NC000032321
---	----------------------------------

Transporter 1 <input checked="" type="checkbox"/> 2 <input type="checkbox"/> Company Name A&D Environmental Services (SC), LLC	US EPA ID No: SC000780031
--	----------------------------------

Designated Facility A&D Environmental Services, Inc. 2718 Unklesville Road Archdale, NC 27263 336-434-7780 NC000032321	Designated Facility A&D Environmental Services, Inc. 3149 Lear Drive Burlington, NC 27315 336-329-0000 NCR000130000	Designated Facility A&D Environmental Services (SC), LLC 1918 Brentwood Street High Point, NC 27280 336-862-0000 NCR000002001	Designated Facility A&D Environmental Services (SC), LLC 1741 Calks Ferry Road Lexington, SC 29073 803-567-0175 SC000780031	Designated Facility A&D Environmental Services (SC), LLC 304 S South Main Street Mauldin, SC 29652 803-567-3300 SC000780031
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HM	Hazardous Materials Shipping Name and Description (if applicable)	No.	Type	QTY	Wt/Vol	Profile Number
	Fuel oil TANK 1000 G	001	DT	1	1000lb	
	Fuel oil TANK 600G	002	DT	1	600lb	
	<i>13974</i>					

X	Petroleum Products for Recycle	No.	Type	QTY	Wt/Vol	Profile Number
	NA1895, Diesel fuel, 3, III					ERG# 125
	NA1993, Fuel oil (No. 1, 2, 4, 5 or 6), 3, III					ERG# 125
	UN1203, Gasoline, 3, II					ERG# 125
	NA1270, Petroleum Oil, 3, III					ERG# 125

HM	No.	Type	Est. Wt.	Count	Shipping Name and Description (if applicable)	Generation Name	Discrepancy
X					RQ, UN2808, Mercury contained in manufactured articles, 8, III	ERG# 172	Mercury Containing Articles
X					RQ, UN2806, Mercury, 8, III	ERG# 172	Mercury
X					RQ, UNS1432, Polychlorinated biphenyls, solid, 6, II	ERG# 171	TSCA Exempt PCB Lamp Ballasts
X					UN2800, Batteries, wet, nonspillable, 8, III	ERG# 154	Sealed Lead Acid Batteries
X					UN2794, Batteries, wet, filled with acid, 8, III	ERG# 154	Lead Acid Batteries
X					UN2795, Batteries, wet, filled with alkali, 8, III	ERG# 154	Wet NiCad Batteries
X					UN3080, Lithium batteries, 8, II	ERG# 138	Lithium Batteries
X					UN3028, Batteries, dry, containing potassium hydroxide solid, 8, III	ERG# 154	Alkaline Batteries
X					UN3029, Batteries, dry, containing potassium hydroxide solid, 8, III	ERG# 154	NiCad Batteries
					Universal Waste Lamps (Not DOT-Regulated per 49 CFR 173.164(e))		Fluorescent lamps 4' or <
					Universal Waste Lamps (Not DOT-Regulated per 49 CFR 173.164(e))		Fluorescent lamps 4' or >
					Universal Waste Lamps (Not DOT-Regulated per 49 CFR 173.164(e))		Circular/U-tube lamps
					Universal Waste Lamps (Not DOT-Regulated per 49 CFR 173.164(e))		Compact Lamps
					Universal Waste Lamps (Not DOT-Regulated per 49 CFR 173.164(e))		Shatterfield
					Universal Waste Lamps (Not DOT-Regulated per 49 CFR 173.164(e))		HID/MVUV Lamps
					Universal Waste Lamps (Not DOT-Regulated per 49 CFR 173.164(e))		Incandescent Lamps
					Non-PCB Light Ballasts for Recycle (Not DOT-Regulated)		Non-PCB Light Ballasts
					Electronic Equipment for Recycle (Not DOT-Regulated)		Electronics

Generator's Certification: This is to certify that the above-named materials are properly classified, described, packaged, marked, and labeled, and are in proper condition for transportation according to the applicable regulations of the Department of Transportation. I further certify that none of the materials described above are a hazardous waste as defined by EPA 40CFR Part 261 or any applicable state law, and unless specifically identified above the materials contain less than 1,000 ppm total halogens and do not contain quantifiable levels (ppm) of PCBs as defined by EPA 40 CFR Parts 279 and 761.

Generator's/Owner's Printed/Typed Name <i>Ashley Johnson</i>	Signature <i>Ashley Johnson</i>	Month <i>7</i>	Day <i>19</i>	Year <i>13</i>
Transporter 1 Printed/Typed Name <i>W. S. Hallman</i>	Signature <i>W. S. Hallman</i>	Month <i>7</i>	Day <i>19</i>	Year <i>13</i>
Transporter 2 Printed/Typed Name	Signature	Month	Day	Year

Discrepancy Indication / Additional Information:

Designated Facility Certification: I hereby acknowledge receipt of the materials covered by this manifest except for any discrepancy indicated above.	Printed/Typed Name <i>Bill Atkins</i>	Signature <i>WGA</i>	Month <i>7</i>	Day <i>20</i>	Year <i>13</i>
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GENERATOR'S/SHIPPER'S INITIAL COPY