

US-95 Thorncreek Road to Moscow Project No. DHP-NH-4110(156) Hazardous Materials Scan

The following is a summary of the hazardous materials scan conducted by North, Wind Inc. as part of the US-95 Thorncreek Road to Moscow Draft Environmental Impact Statement. This scan was completed using several resources including driving and walking the corridor, reviewing aerial photographs, searching the National Response Center Public Report Database (NRC 2005), the Idaho Department of Environmental Quality (DEQ) and Environmental Protection Agency (EPA) databases, the Idaho State Police Community and Drug Information website, contacting personnel at the Latah County Solid Waste Department, and interviewing DEQ and Idaho Transportation Department (ITD) representatives in Lewiston regarding previous spills or releases (Mann, pers. comm., 2005; Toddhunter, pers. com., 2005).

The area investigated starts approximately one half mile south of Thorncreek Road and extends north to Palouse River Road on the south edge of the City of Moscow in Latah County. The western limit of the area is bounded by the Washington State line and the eastern limit is just east of Paradise Ridge Road.

Latah County is located on the eastern edge of the Columbia River Plateau and the western slope of the Rocky Mountains. A fault, known as the Cottonwood Creek fault, runs from the eastern edge of the Paradise Ridge crescent in a southeasterly direction crossing both the Potlatch and Clearwater Rivers (Idaho Geologic Survey 2005).

Two basalt aquifer systems supply groundwater in the project area. The Grande Ronde and Wanapum aquifers are part of the Columbia River Basalt Group, created by thousands of feet of lava flows that cover most of eastern Washington. The general direction of water movement in the Grande Ronde Basalt is toward the Snake and Columbia Rivers. The Grande Ronde aquifer water levels have been steadily declining indicating very little recharge. The shallower Wanapum (Priest Rapids) aquifer responds to changes in precipitation and pumping, indicating the aquifer may be recharged from the surface (Palouse Water Conservation Network 2005).

The ITD Design Manual Section A6 states that hazardous materials and waste include all of the identified materials contained in the following regulations or requirements:

- U.S. EPA's Listed Wastes in *40 CFR, Part 261*
- U.S. EPA's Characteristic Waste as defined in *40 CFR, Part 261.21-24*
- A mixture of a solid waste/listed waste
- A material derived from a listed waste
- Materials listed as Hazardous Materials in *49 CFR, Parts 171 and 172*
- Asbestos in Structures in *40 CFR, Parts 61 and 763*
- Polychlorinated Biphenyls (PCBs) in *40 CFR, Part 761*
- Chlorinated Fluorocarbon Compounds (also known as alkanes) in *40 CFR, Part 762*
- Priority Pollutants List in *40 CFR, Part 122*
- Dioxins in *40 CFR, Part 775*

- List of hazardous substances in *40 CFR, Part 302*
- Appendix IX List in *40 CFR, Part 264*
- Extremely Hazardous Substances in *40 CFR, Part 355*

Prior to the field investigation a database search was conducted for the project area. The DEQ underground storage tank (UST) and leaky underground storage tank (LUST) database was reviewed (IDEQ 2005a, 2005b) as well as the EPA database for Comprehensive Environmental Response, Compensation, and Liability Act (CERCLA) Superfund sites and Resource Conservation and Recovery Act (RCRA) sites (USEPA 2005a, 2005b). Other items reviewed on the EPA database included water dischargers, hazardous waste sites, toxic releases, and air emissions sites. The Idaho State Police website for Region 2 was also accessed to identify known hazardous materials sites, such as methamphetamine (meth) labs or meth production by-products dump sites.

To identify potential occurrences of hazardous materials, a hazardous materials field scan was performed on the project area on March 1 and 2 in 2005. The area that was scanned started approximately one half mile south of Thorncreek Road and extended north to Palouse River Road. The west and east extents of the scan area were the Washington State line and just east of Paradise Ridge Road. Locations within the project area that potentially contained hazardous material were identified and marked on aerial photographs. The predominant hazardous materials observed were propane tanks and aboveground storage tanks (ASTs) for petroleum products (see Table 1). Due to the age of many of the existing structures, the historic use of lead-based paints, and the variety of asbestos containing products produced between the 1940s and the mid 1970s, there is the potential risk of lead-based paint and asbestos containing structures that may be demolished in association with the project.

Lead-based paint was determined to be a hazardous material in the early 1970s. In January 1971 the Lead-based Paint Poisoning Prevention Act was passed. The vast majority of homes built before 1950 contained substantial amounts of lead-based paint (Residential Lead-based Paint Hazard Reduction Act of 1992).

The Clean Air Act (CAA) of 1970 requires EPA to develop and enforce regulations to protect the general public from exposure to airborne contaminants that are known to be hazardous to human health. In accordance with Section 112 of the CAA, EPA established National Emission Standards for Hazardous Air Pollutants (NESHAP). Asbestos was one of the first hazardous air pollutants regulated under Section 112. On March 31, 1971, EPA identified asbestos as a hazardous pollutant, and on April 6, 1973, EPA promulgated the Asbestos NESHAP in 40 CFR Part 61, Subpart M (EPA 2005).

RESULTS

The National Response Center public database listed no toxic releases, water discharges, or hazardous waste sites for the project area. There were no sites listed for CERCLA or RCRA. DEQ and ITD had no recorded incidences of any spills or releases.

During the hazardous materials scan of the project area a total of 17 properties were found to contain ASTs assumed to contain petroleum products such as gasoline, heating oil, or diesel fuel (Table 1). The majority of the ASTs were approximately 200 to 500 gallons tanks. Four sites were observed to contain USTs (Table 1). One of these sites appeared on the DEQ UST list as containing five tanks (unleaded gasoline and diesel fuel). The other three sites were not listed by DEQ. Two of these sites were located on Thorncreek Road on the southern end of the project scan area. Old gas pumps were visible and may still be connected to USTs. The other site was located on US-95 and probably contains one tank used for diesel fuel. Thirty-four homes were observed to have an above-ground propane tank on the property (Table 1). These ranged in size from 200 gallon to 500 gallon tanks.

There was an abandoned tank observed along Jacksha Road in the borrow ditch. This tank was estimated to be a 1,000 gallon tank and is currently used to hold water from a spring. Four locations in the project scan area had 55 gallon drums on the property, contents unknown.

Three sites had numerous abandoned cars. One location on US-95 is currently used as an automotive repair shop. These sites have the potential for the presence of petroleum products, stained soils, and leaky car batteries. One business within the project area services air conditioners and is anticipated to have Freon and other gasses that pose a risk to the environment if not handled correctly. This location also included stacks of railroad ties that may be leaking creosol onto the soil.

There were two locations along US-95 within the project scan area that had meth lab related incidences (ISP 2005). Meth labs contain hazardous materials and it will be necessary to verify what level of cleanup has been completed prior to any impacts to the property (Denbleyder, pers. com., 2005). Because these locations are in a mobile home park, the structures may no longer be on the premises but the soils may be contaminated.

Latah County has a transfer station, a non-municipal solid waste landfill, a household hazardous waste facility, and a compost program. The location is on SH-8 about five miles east of Moscow, which is outside the project scan area. The County does not have any private solid waste sites. According to the Latah County Solid Waste Department there are no known problems with hazardous materials in this area (Bashaw, pers. comm. 2005).

RECOMMENDATIONS

The following is a list of recommendations to minimize potential impacts to the project by the hazardous materials sites. Contaminated containers and soils will need to be identified, removed, contained, and shipped to the appropriate receiving locations in accordance with EPA and DEQ guidelines.

- Propane tanks – portable; can be relocated; test soils for potential residue
- AST – portable; follow proper transport guidelines and test soils for petroleum contamination
- UST – removal more involved; follow DEQ guidelines for UST location closures which include, but are not limited to, soil testing for contamination and proper shipment of tanks and soils
- Drums – test the contents prior to removal from the site to ensure proper transport and disposal
- Abandoned tanks – test the contents prior to removal from the site to ensure proper transport and disposal
- Methamphetamine laboratory locations – verify that the structure currently at the address is the one listed in the police report; test soils for residue from methamphetamine production in case of contamination to provide for proper removal and disposal of the hazardous material



Typical propane tank for private home



Heating oil tank (AST)



Typical agricultural AST



Agricultural AST in field



Typical fuel pump (UST)



Area of various potential soil contaminants



Bulk fuel distribution



Various drums, unknown content

Table 1

Map Number	Property Owner	Business Name / Private Home	Road Name	Hazardous Material	Notes
1	Unknown	Private	1451 Thorncreek Rd.	Propane	1 - ~200 gal tank
2	Unknown	Thorncreek Ranch	1461 Thorncreek Rd.	Petroleum	Possible UST (old gas pump observed on property). There is no tank listed with DEQ.
3	Unknown	Thorncreek Ranch	Thorncreek Rd.	Petroleum	Old ASTs located in equipment storage area.
4	Unknown	Private	4347 Wolf Rd.	Petroleum	2 - ~200 gal ASTs
5	Clifford Wolf Farms 1010 Wolf Rd. Moscow	Private	1010 Wolf Rd.	Petroleum	1 - AST 3 - diesel & 1 - gas tank inside barn
6	Alan Hoffman 1511 Thorncreek Rd. Moscow	Private	Thorncreek Rd.	Petroleum	Multiple ASTs associated with farm use. Possible UST (old gas pump observed on property). There is no tank listed with DEQ.
7	Alan Hoffman 1511 Thorncreek Rd. Moscow	Private	Thorncreek Rd	Propane	1 - ~200 gal tank
8	Daniel and Dana Carter 1255 Broenneke Rd. Moscow	Private	1255 Broenneke Rd.	Propane	1 - ~200 gal tank

Map Number	Property Owner	Business Name / Private Home	Road Name	Hazardous Material	Notes
8a	David Weber 6782 SR 195 Uniontown, WA 99179	Weber Land Company	Broenneke Rd.	Petroleum	1 - AST across road in farmed field
9	Joyce Frei Family Trust 412 SE Walker Park Rd. Shelton, WA 98584	Private	Broenneke Rd.	Petroleum and Propane	2 - ASTs 1 - ~300 gal tank
10	Roy and Catherine Reisenauer 3460 Hwy 95 Moscow	Private	US 95	Propane	1 - ~200 gal tank
11	Wayne and Annette Olson 1161 Jacksha Rd. Moscow	Private	1161 Jacksha Rd.	Petroleum	1 - AST
12	Tom Redinger 1200 Jacksha Rd. Moscow	Private	1200 Jacksha Rd.	Propane	1 - ~200 gal propane tank by home.
12a	Donald Redinger 1029 Virginia Ave. Moscow	Private	Jacksha Rd.	Petroleum	1 - AST west side of road
13	Martin Deesten et al. 2805 Hwy 95 Moscow	Private	Jacksha Rd.	Propane	1 - ~200 gal tank

Map Number	Property Owner	Business Name / Private Home	Road Name	Hazardous Material	Notes
14	Martin Deesten et al. 2805 Hwy 95 S. Moscow	Private	Jacksha Rd.	Petroleum	1 - AST 1 - drum
15	Unknown	Private	US 95	Unknown	Methamphetamine Lab 2979 Hwy 95 Space #22
16	Unknown	Private	US 95	Unknown	Methamphetamine Lab 2979 Hwy 95 Space #25
17	Sherman Clyde 2940 Clyde Rd. Moscow	Private	2935 Clyde Rd.	Petroleum	1 - ASTs
18	Sherman Clyde 2940 Clyde Rd. Moscow	Private	2940 Clyde Rd.	Propane	1 - ~200 gal tank
19	Pearl Renfrew 2845 Hwy 95 S. Moscow	Private	2895 Clyde Rd.	Propane	1 - ~200 gal tank
20	Latah County Grain Growers P.O. Box 9086 Moscow	Primeland Corp. Cenex	US 95	Petroleum Unknown Contents	1 - UST Drums located adjacent to warehouse
21	Unknown	Boat Shop	2211 US 95	Petroleum	Removed UST (according to original ITD EA; not documented by DEQ)

Map Number	Property Owner	Business Name / Private Home	Road Name	Hazardous Material	Notes
22	George Alderman 1044 Martinson Rd. Moscow	Private	1044 Martinson	Petroleum	1 – AST Drums
23	Leonard and Sharon Hansen 1010 Eid Rd. Moscow	Private	1010 Eid Rd.	Propane	1 - ~200 gal tank
24	Unknown	Private	Unknown	Propane	1 - ~200 gal tank at house 2 - tanks; one next to mobile home and one next to large RV
25	John and Christie Thomas P.O. Box 9046 Moscow	Private	Eid Rd.	Propane	1 - ~200 gal tank
26	Unknown	Private	Eid Rd.	Propane	2 - ~200 gal tanks
27	Sean and Emily Dorigo 1081 Eid Rd. Moscow	Private	1081 Eid Rd	Unknown	1 - abandoned tank
28	Jerry and Kathleen Bliler 1111 Eid Rd. Moscow	Private	1111 Eid Rd.	Propane	1 - ~200 gal tank
29	Keith Smith and Mary Fauci 1117 Eid Rd. Moscow	Private	1117 Eid Rd.	Propane	1 - ~200 gal tank

Map Number	Property Owner	Business Name / Private Home	Road Name	Hazardous Material	Notes
30	Brian and Wendy Funke 1123 Eid Rd. Moscow	Private	1123 Eid Rd.	Propane	1 - ~200 gal tank
31	Unknown	Private	1143 Eid Rd.	Petroleum	1 - ~200 gal heating oil tank
32	Unknown	Private	Bleket Rd.	Propane Petroleum	Large piles of material and old vehicles, unable to determine types of hazards but potential is present.
33	Unknown	Private	Jensen Rd.	Propane	1 - ~200 gal tank
34	Unknown	Private	Jensen Rd.	Propane	1 - ~200 gal tank
35	Dave and Kim Sarff 1167 Zeitler Rd. Moscow	Private	1167 Zeitler Rd.	Petroleum Unknown	1 - AST Old, abandoned cars posing the potential for oil stained soils and leaky car batteries.
36	Kenneth Clyde 1175 Zeitler Rd. Moscow	Private	1175 Zeitler Rd.	Petroleum	1 - AST
37	Kenneth Clyde 1175 Zeitler Rd. Moscow	Private	1175 Zeitler Rd.	Propane	1 - ~200 gal tank
38	Larry Germer 1005 Zeitler Rd. Moscow	Private	1005 Zeitler Rd.	Propane	1 - ~200 gal tank

Map Number	Property Owner	Business Name / Private Home	Road Name	Hazardous Material	Notes
39	Lon and Cynthia Miller 1137 Paradise Ridge Rd. Moscow	Private	1137 Paradise Ridge Rd.	Propane	1 - ~200 gal tank
40	William Goesling 1141 Paradise Ridge Rd Moscow	Private	1141 Paradise Ridge Rd.	Propane	1 - ~200 gal tank
41	William and Catherine Gibson P.O. Box 3895 Moscow	Private	1153 Paradise Ridge Rd.	Propane	1 - ~200 gal tank
42	Paul and Juanita McDaniel 1160 Paradise Ridge Rd. Moscow	Private	1160 Paradise Ridge Rd.	Propane	1 - ~200 gal tank
43	Chyr Pyng and Linda Liou 1165 Paradise Ridge Rd. Moscow	Private	1165 Paradise Ridge Rd.	Propane	1 - ~200 gal tank
44	James McDonald	Private	Paradise Ridge Rd.	Propane	1 - ~200 gal tank
45	Kenneth Clyde 3080 Hwy 95 S. Moscow	Private	US 95	Propane	1 - ~200 gal tank
46	Ole Johnson, Jr. 2921 Cameron Rd Moscow	Johnson Trucking	US 95	Petroleum	UST and ASTs

Map Number	Property Owner	Business Name / Private Home	Road Name	Hazardous Material	Notes
47	Mr. Cabinet Mfg.	Cabinet Shop	US 95	Propane	1 - ~500 gal tank
48	Arnold T. Geffre 2860 Hwy 95 S. Moscow	Private	US 95	Propane	1 - ~200 gal tank
49	Unknown	Upholstery shop	US-95	Propane	1 - ~200 gal tank
50	Unknown-Plat 0176	Auto repair	US 95	Petroleum	Stained soils
50	Unknown-Plat 7350, 7405, 7439, and 7420	Private home	US 95	Propane	1 - ~200 gal tank
51	Unknown - Plat 7439	Business	US-95	Propane	1 - ~200 gal tank
52	Douglas Wasonkari	Gary's Heating and Air	US 95	Unknown Freon Creosol	~6 old drums, unknown contents Large pile of rail road ties possible creosol.
53	Douglas Wasonkari	Goodman's Oil	US 95	Petroleum	3 - Bulk Storage ASTs
54	Robert Mundy	Mundy's Machine & Welding	US 95	Propane	1 - ~200 gal tank
55	Richard Fleiger and Clyde Five LLC 3060 Hwy 95 S. Moscow	Private	US 95	Petroleum Products	1 - ~300 gal AST

REFERENCES

Bashaw, A., personal communication. March 25, 2005. Idaho Latah County Solid Waste Department, Administrator.

Denbleyker, D., personal communication. March 29, 2005. Idaho State Police Region 2 - Lewiston, Detective.

Idaho Department of Environmental Quality (IDEQ). 2005a. Underground Storage Tank Query. 2004. www.deq.state.id.us/maps/UST_data_table_020404.xls.

IDEQ. 2005b. Leaking Underground Storage Tank Query. 2004. www.deq.state.id.us/maps/LUST_Data_Table_020404.xls.

Idaho Geologic Survey. 2005. www.idahogeology.org/Services/GeologicMapping. Accessed 04/21/05

Idaho State Police (ISP). 2005. Community and Drug Information. www.isp.state.id.us/citizen/drug_community.html

Mann, H., personal communication. March 1, 2005. Idaho Department of Environmental Quality, Air Quality & Waste Manager.

National Response Center (NRC). 2005. Oil, chemical, radiological, and biological discharges online query system. www.nrc.uscg.mil/foiatxt.htm.

Palouse Conservation Network. 2005. www.pwcn.org/PWCN_brochure.pdf. Accessed 04/22/05.

Todhunter, M., personal communication. March 1, 2005. Idaho Transportation Department District 2 - Lewiston, Environmental Planner Senior.

United States Environmental Protection Agency (USEPA). 2005a. Superfund Information Systems, CERCLIS Database. <http://cfpub.epa.gov/supercpad/cursites/srchsites.cfm>.

USEPA. 2005b. Toxic Release and Resource Conservation and Recovery Act Query. <http://www.epa.gov/enviro>.