PHASE I ENVIRONMENTAL SITE ASSESSMENT SOUTHSIDE TERRACE HOUSING DEVELOPMENT 30TH AND 'R' STREETS OMAHA, DOUGLAS COUNTY, NEBRASKA

Prepared for: Omaha Housing Authority & the Omaha Brownfields Coalition



Benesch Project No. 00120138.00 May 2016

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TABLE OF CONTENTS

1.0	SUMMARY	1
2.0	INTRODUCTION	2
	2.1 Purpose	2
	2.2 Scope of Services	2
	2.3 Significant Assumptions	2
	2.4 Limitations and Exceptions	2
	2.5 Special Terms and Conditions	3
	2.6 User Reliance	3
3.0	SITE DESCRIPTION	4
	3.1 Location and Legal Description	4
	3.2 Surrounding Area General Characteristics	4
	3.3 Current Use of the Property	4
	3.4 Description of Property Improvements	4
	3.5 Current Uses of the Adjoining Properties	5
4.0	USER PROVIDED INFORMATION	6
5.0	RECORDS REVIEW	7
	5.1 Standard Environmental Record Sources	7
	5.2 Additional Environmental Record Sources	10
	5.3 Physical Setting Sources	11
	5.4 Historical Use Information	13
6.0	SITE RECONNAISSANCE	18
	6.1 Methodology and Limiting Conditions	18
	6.2 General Site Setting	18
	6.3 Site Reconnaissance Observations	18
7.0	INTERVIEWS	22
8.0	FINDINGS	23
	8.1 Findings	
	8.2 Historical Summary	27
	8.3 Data Gap Analysis	28
9.0	OPINION	29
10.0	DEVIATIONS	
11.0	ADDITIONAL SERVICES	
12.0	REFERENCES	
13 0	OLIALIFICATIONS OF ENVIRONMENTAL PROFESSIONALS	33

TABLE OF CONTENTS (CONTINUED)

APPENDICES

Appendix A Figures

Site Location Map

Site Diagram

Appendix B Site Photographs

Appendix C Regulatory Records Documentation
Appendix D Historical Research Documentation

Appendix E Interview Documentation

Appendix F Other Supporting Documentation

Appendix G Qualifications of Environmental Professionals

1.0 SUMMARY

This Phase I Environmental Site Assessment (ESA) was conducted on behalf of the Omaha Brownfields Coalition (lead coalition partner Metropolitan Area Planning Agency [MAPA]) ("User") in conformance with the scope and limitations of ASTM Standard Practice E 1527-13. The Property ESA was conducted under the Brownfields Coalition Assessment Grant (Grant) awarded by the United States Environmental Protection Agency to the Omaha Brownfields Coalition (USEPA Cooperative Agreement Nos. BF-97727801 & BF-97727901, dated October 1, 2011). The Omaha Brownfields Coalition (Coalition) subsequently directed Alfred Benesch & Company (Benesch) to perform an ESA on the Southside Terrace Housing Development located at 30th & 'R' Streets in Omaha, Douglas County, Nebraska (the "Property").

The Property was developed prior to 1901 as residential properties. The Property was redeveloped in 1943 into the Southside Terrace housing development as it sits today, with the exception of a few buildings that have been removed. The surrounding area has historically been occupied by residential, commercial, and industrial properties, along with vacant/undeveloped parcels.

The Property is currently utilized as the Southside Terrace Housing Development. The Property contains fifty residential housing buildings with a total of 363 units, in addition to an office which includes a lower level woodshop and storage room, a two-story maintenance storage building, and a maintenance garage beneath one of the residential buildings that is used for storage of lawn equipment, and bagged sand and ice-melt. The Property is currently comprised of 3 parcels totaling 30.7 acres in size.

The area surrounding the Property is characterized primarily by residential and commercial properties along and across 30th Street to the west, residential, commercial, and industrial properties to the north across 'R' Street, industrial properties and vacant lots to the east across 28th Street, and baseball fields to the south across 'W' Street.

The Property is located within the Omaha Lead Site (OLS) boundaries which encompass a significant portion of Omaha. The Property was assessed and it was determined that clean up of the soils was not required, with the exception of one parcel on the Property along 28th Street just south of 'S' Street, which was subsequently cleaned up. As such, the OLS represents an HREC for the Property due to the area of lead impacted soils on the Property that were cleaned up.

Spill number 101188-TH-1005 is associated with removal of a 20,000 gallon fuel oil tank from the Property in October 1988. Based on review of the report, no corrosion, holes, or leaks were reported during removal of the tank, and no soils were observed to have been impacted. There are no concerns regarding this LUST listing for the Property; however, the historical presence of a petroleum UST and subsequent removal and NDEQ closure renders it an HREC for the Property. It is assumed that this tank was used to fuel the former boilers on site when they were in use.



2.0 INTRODUCTION

2.1 Purpose

The purpose of the Phase I ESA process is to identify, to the extent feasible, recognized environmental conditions (REC), historic recognized environmental conditions (HREC), and controlled recognized environmental conditions (CREC). in connection with the Property. The term recognized environmental condition shall mean the presence or likely presence of any hazardous substances or petroleum products on the Property under conditions that indicate an existing release, a past release, or a material threat of a release of any hazardous substances or petroleum products into structures on the Property or into the ground, groundwater, or surface water of the Property. The term HREC refers to a resolved or cleaned up site that has received closure from a regulatory agency. A CREC refers to sites that have been closed but are managed under activity and use limitations (e.g. complying with use restrictions, maintaining a protective barrier over known contamination). The term includes hazardous substances or petroleum products even under conditions in compliance with laws. The term is not intended to include *de minimis* conditions that generally would not be subject to an enforcement action if brought to the attention of the appropriate governmental agencies.

2.2 Scope of Services

The scope of services included a Phase I Environmental Site Assessment performed in general accordance with ASTM Standard E 1527-13.

2.3 Significant Assumptions

None.

2.4 Limitations and Exceptions

The following potential environmental issues are beyond the scope of ASTM Practice E 1527-13:

- Asbestos-containing materials,
- Radon,
- Lead-based paint,
- Lead in drinking water,
- Wetlands,
- Regulatory compliance,
- Cultural and historic resources,
- Industrial hygiene,
- Health and safety,
- Ecological resources,
- Endangered species,
- Indoor air quality,
- Biological agents, and
- Mold.



In the course of this assessment, Benesch has relied on information from outside parties, such as regulatory agencies and interview sources. Benesch has made no independent investigation as to the validity, completeness or accuracy of such information provided by third parties. Benesch does not express or imply any warranty regarding information provided by third party sources.

Performance of this practice is intended to reduce, but not eliminate, uncertainty regarding the potential for RECs in connection with the Property. The material in this report reflects our best judgment in light of information that was readily available at the time of preparation.

2.5 Special Terms and Conditions

None.

2.6 User Reliance

This report was prepared by Benesch at the request of and for the sole benefit and use of the "User"; Omaha Housing Authority and their assigns; the City of Omaha; and the Omaha Brownfields Coalition (lead coalition partner Metropolitan Area Planning Agency [MAPA]), subject to the limitations described in the report and in the contracting agreement between Benesch and the Omaha Brownfields Coalition.

Benesch acknowledges that this report will become a matter of public record and copies of this report will be available for review and reproduction through the MAPA website and/or the Freedom of Information Act (FOIA). Nevertheless, this report is intended for the exclusive use and reliance of the User in assessing environmental issues associated with the Property, and any use or reliance of this report by other parties is prohibited without the express written consent of the User and Benesch.

This report is complete only as an entire document and no section is intended to be used separately. Any unauthorized use a third party makes of this report, or any reliance on or decision made on the basis of it, is the responsibility of such third party. The User and Benesch are indemnified against any liability resulting from such third party use, reliance or decisions.



3.0 SITE DESCRIPTION

3.1 Location and Legal Description

The Property is located at 5317, 5501, and 5701 South 30th Street in Omaha, Douglas County, Nebraska. The Property is comprised of three parcels and in total encompasses approximately 30 acres. The Property is currently developed as a multi-family housing development and is occupied by fifty-one buildings including an office, storage building, and residential units.

A legal description of the Property is provided in Appendix D (Assessor). According to the *Omaha South, Nebraska-Iowa Quadrangle* USGS 7.5-minute topographic map dated 1994; the Property is located in the NE ¼ of Section 9, Township 14 North, Range 13 East of the 6th Principal Meridian, Douglas County, Nebraska.

A Site Location Map and Site Diagram depicting the Property are provided in Appendix A. Site Photographs are provided in Appendix B. Additional maps and figures are provided in Appendix D (Historical Research Documentation) and Appendix F (Other Supporting Documentation).

3.2 Surrounding Area General Characteristics

The area surrounding the Property is characterized primarily by residential and commercial properties along and across 30th Street to the west, residential, commercial, and industrial properties to the north across 'R' Street, industrial properties and vacant lots to the east across 28th Street, and baseball fields to the south across 'W' Street.

3.3 Current Use of the Property

The Property is currently utilized as the Southside Terrace Housing Development. The Property contains fifty residential housing buildings with a total of 363 units, in addition to an office which includes a lower level woodshop and storage room, a two-story maintenance storage building, and a maintenance garage beneath one of the residential buildings that is used for storage of lawn equipment, and bagged sand and ice-melt. The Property is currently comprised of 3 parcels totaling 30.7 acres in size.

3.4 Description of Property Improvements

The following table provides general descriptions of the Property improvements.



	PROPERTY IMPROVEMENTS
Size of Property parcel (approx.)	30.7-acres
Size of Property structure (approx.)	600-1,000 sq. ft.
Construction Date	1943
General Building Description	Brick construction with asphalt shingled roofs. Former tar roofs were covered with current pitched roof.
General Topography of Property	The Property slopes down gradient to the east and southeast.
Adjoining and/or Access/Egress Roads	Access to the Property is provided via drives and sidewalks from 30 th Street, 'R' Street, 28 th Street, and 'W' Street.
Paved or Concrete Areas (including parking)	Paved parking areas and sidewalks are located throughout the Property.
Landscaped, Unimproved and/or	Areas of grass (common areas/yards) are located between and surrounding
Undeveloped Areas	the buildings. An open grass field is located on the southeast corner of the Property.
Surface Water	None
Potable Water Source	Metropolitan Utilities District (MUD) is the service provider for the Property.
Sanitary Sewer Utility	The City of Omaha Department of Public Works (DPW) is the service provider for the Property.
Storm Sewer Utility	DPW is the service provider for the Property.
Electrical Utility	The Omaha Public Power District (OPPD) is the service provider for the Property.
Natural Gas Utility	MUD is the service provider for the Property.
Emergency Power	None.
Current Occupancy Status	No structures present.

Sources: Douglas County Assessor Property Records and site reconnaissance observations

3.5 Current Uses of the Adjoining Properties

The current uses of the parcels adjoining the Property are identified below.

North: 'R' Street followed by commercial, residential, and industrial parcels.

East: 28th Street followed by vacant/undeveloped and industrial parcels.

South: 'W' Street followed by baseball fields.

West: 30th Street followed by residential and commercial parcels. Residential and commercial

properties are also adjacent to the Property on the east side of 30^{th} Street between 'S' and 'T'

streets.



4.0 USER PROVIDED INFORMATION

In order to qualify for one of the Landowner Liability Protections (LLPs) offered by the Small Business Liability Relief and Brownfields Revitalization Act of 2001 (the "Brownfields Amendments"), the User must provide the following information (if available) to the Environmental Professional. Failure to provide this information could result in a determination that "All Appropriate Inquiry" is not complete. The following information was provided by the Omaha Housing Authority, with regard to the Property and adjoining parcels. A copy of the Phase I ESA User Questionnaires completed by the Omaha Housing Authority is provided in Appendix E.

- The User reported no environmental cleanup liens for the Property.
- The User reported no Activity and Use Limitations (AULs) for the Property.
- The User reported no specialized knowledge or experience related to the Property or nearby properties.
- The User reported no knowledge of any spills or other chemical releases that have taken place on the Property.
- The User reported that lead contaminated soil on the Property was cleaned up as part of the OLS.
- The User reported no obvious indicators regarding the presence or likely presence of contamination at the Property.

The User provided the following additional information to assist the Environmental Professional:

- The Phase I ESA is being performed for managing risk associated with the potential demolition of the Property structures and redevelopment of the Property.
- The site contact was identified as Ms. Denise Spencer, site manager for the Southside Terrace Housing Development, and Mr. Joe Wright, site foreman for the Southside Terrace Housing Development.
- No special terms and conditions were agreed upon by the Environmental Professional.



5.0 RECORDS REVIEW

5.1 Standard Environmental Record Sources

The regulatory agency database report discussed in this section, provided by Environmental Data Resources, Inc. (EDR) of Milford, Connecticut, was reviewed for information regarding reported releases of hazardous substances and petroleum products on or near the Property. Benesch also conducted a limited review of the unmapped or orphan listings within the database report, cross-referencing available address information and facility names, where feasible. Unmapped sites are listings that could not be plotted with confidence, but are potentially in the general area of the Property based on the partial street address, city, or zip code. Any unmapped site that was identified by Benesch as being within the approximate minimum search distance from the Property based on the site reconnaissance and/or cross-referencing to mapped listings has been included in the discussion in the following section. A copy of the EDR Radius Map Report is provided in Appendix C. The following is a summary of the findings of the database review.

SUMMARY OF FEDERAL, STATE AND TRIBAL DATABASE FINDINGS Approx. Minimum Property Total # Sites					
Regulatory Database	Search Distance	Listed?	Listed		
Federal National Priority (NPL)	1 mile	No	1		
Federal Delisted NPL	1 mile	No	0		
Federal Comprehensive Environmental Response,	½ mile	No	1		
Compensation, and Liability Information System (CERCLIS)					
Federal CERCLIS No Further Remedial Action Planned	½ mile	No	0		
(NFRAP)					
Federal Resource Conservation and Recovery Act (RCRA),	1 mile	No	0		
Corrective Action facilities (CORRACTS)					
Federal RCRIS non-CORRACTS Treatment, Storage, and	½ mile	No	1		
Disposal Facilities (TSD)					
Federal RCRA Generators	¼ mile	No	3		
Federal Institutional Control/Engineering Control Registry	½ mile	No	2		
Federal Emergency Response Notification System (ERNS)	½ mile	No	0		
list					
State and Tribal (equivalent) NPL	1 mile	No	0		
State and Tribal CERCLIS	½ mile	No	4		
State and Tribal Landfill or Solid Waste Disposal Sites	½ mile	No	0		
State and Tribal Leaking Underground and Aboveground	½ mile	Yes	38		
Storage Tanks (LUST/LAST) sites					
State and Tribal Registered Underground Storage Tanks	¼ mile	Yes	10		
(UST) and Aboveground Storage Tanks (AST)					
State and Tribal Institutional Control or Engineering	¼ mile	No	0		
Control Registry					
State and Tribal Voluntary Cleanup Site	½ mile	No	0		
Federal, State and Tribal Brownfield Sites	½ mile	No	15		
Former Manufactured Gas Plant (FMGP) Sites	1 mile	No	0		
US Historical Auto Station/Cleaners	¼ mile	No	19		



Federal Agency Database Listings

The Property is located within the Omaha Lead National Priority List (NPL) and CERCLIS project boundaries (aka Omaha Lead Site [OLS]) which encompass a significant portion of Omaha. In addition, one Federal Institutional and Engineering Control site is associated with the OLS.

The OLS listing on the NPL is resultant from airborne lead particulate contamination of near surface soils over a widespread area of north-central, south-central, and downtown Omaha as a result of historic lead smelting and recycling activities conducted at two former industrial facilities (Asarco and Gould Battery) which were located approximately 4 miles north-northeast of the Property. The area of the former Asarco facility was redeveloped circa 2000 into a city park (Lewis and Clark Landing) with regulatory oversight provided by the Nebraska Department of Environmental Quality (NDEQ) and the U.S. Environmental Protection Agency (USEPA). The area of the former Gould Battery facility was redeveloped as part the ConAgra corporate campus approximately 20 years ago with regulatory oversight provided by the NDEQ and USEPA.

According to the Omaha Lead Registry Lead Superfund website, the Property has been assessed and it was determined that clean up of the soils was not required, with the exception of one parcel on the Property along 28th Street just south of 'S' Street. This area of soils has been cleaned up. A map showing the area of cleaned up soils is included in Appendix F. **The OLS represents an HREC for the Property due to the area of soils on the Property that was cleaned up.**

There is one Federal RCRA non-CORRACTS TSD facility located within the relevant search radius of the Property. However, based on current regulatory status, distance, and/or estimated down or crossgradient location relative to the Property, this site does not represent a REC for the Property at this time.

There are three Federal RCRA Generator sites (one small quantity generator, two conditionally exempt small quantity generator sites) located within the relevant search radius of the Property. However, based on current regulatory status, distance, and/or estimated down or cross-gradient location relative to the Property, these sites do not represent a REC for the Property at this time.

State Agency Database Listings

The Property is listed as a leaking underground storage tank (LUST) site in the EDR report. There are two spill numbers associated with the Property (101188-TH-1005; 011587-TH-1150).

Spill number 101188-TH-1005 is associated with removal of a 20,000 gallon fuel oil tank from the Property in October 1988. Based on review of the report, no corrosion, holes, or leaks were reported during removal of the tank, and no soils were observed to have been impacted. There are no concerns regarding this LUST listing for the Property; however, the historical presence of a petroleum UST and subsequent removal and NDEQ closure renders it an HREC for the Property. It is unknown exactly where this tank was located, but the NDEQ Facilities Information website indicates that the tank was located at the approximate northwest corner of the Property (30th and 'R' Streets), which may have been listed arbitrarily. It is assumed that this tank was used to fuel the former boilers on site when they were



in use. The Property foreman, Mr. Joe Wright, was unaware of any petroleum tanks on the Property currently or historically.

Based on review of the EDR report, spill number 011587-TH-1150 is associated with a former heating oil tank on the Property; the facility status is listed as No Further Action (NFA). However, the NDEQ does not have record of this file; therefore, it is unknown whether a release actually occurred or if this is in regards to a clean tank removal. In addition, the location of this tank is unknown.

In addition, several sites located in the vicinity of the Property are listed in state/tribal databases in the EDR report.

There are four (4) State equivalent CERCLIS NE SHWS (State Superfund Program List) sites located within the relevant search radius of the Property. However, based on current regulatory status, distance, and/or estimated down or cross-gradient location relative to the Property, these sites do not represent a REC for the Property at this time.

There are thirty-two (32) leaking underground storage tank (LUST) sites, and six (6) leaking aboveground storage tank (LAST) sites located within the relevant search radius of the Property. The NDEQ has issued a 'No Further Action' (NFA) letter for five of the six LAST sites, and 25 of the 32 LUST sites. Based on current regulatory status, distance, and/or estimated down or cross-gradient location relative to the Property, none of the LUST or LUST sites represent a REC for the Property at this time.

There are ten (10) underground storage tank (UST) sites located within the relevant search radius of the Property. However, based on current regulatory status, distance, and/or estimated down or cross-gradient location relative to the Property, none of the UST sites represent a REC for the Property at this time.

Fifteen (15) NE Brownfield sites are located within the relevant search distances from the Property. Many of the listed sites on 'Q' Street are other sites that were previously assessed under the same Brownfields Coalition Assessment Grant that the Property is currently being assessed under. There were no RECs associated with these sites. Based on facility status, distance and/or estimated down or crossgradient location relative to the Property, these sites do not represent a REC for the Property at this time.

There are a total of 19 US Historical Auto Stations (7) and US Historical Cleaners (12) sites located within the relevant search distances from the Property. These are historical sites, that based on business name and/or category, may have been operated as a gas or service station. Several historical dry cleaners and one historical auto station previously located in the vicinity of the Property, are listed in the EDR report. However, based on the distance from the Property these listings do not represent a REC for the Property. Based on lack of regulatory data, distance, and/or estimated down or cross-gradient location relative to the Property, the remaining sites do not represent a REC for the Property at this time.



Orphan Summary Listings

The Property is listed in the Orphan Summary under the FINDS and ECHO databases. The listing of the Property in these databases is not considered significant at this time. Sites in the Orphan Summary of the EDR report have insufficient address information for an exact location to be mapped. Based on the limited information available, none of the remaining sites listed in the Orphan Summary appear to be located in the Property vicinity, and therefore, are not considered significant at this time.

5.2 Additional Environmental Record Sources

Douglas County Health Department

Benesch contacted Mr. Jon Ruff, Environmental Health Specialist with the Sanitary Engineering Section of the Douglas County Health Department (DCHD) for environmental records regarding the Property. According to Mr. Ruff, DCHD records did not contain any significant information for the Property.

Nebraska Department of Environmental Quality

Benesch performed a NDEQ file search for additional regulatory information, if any, regarding the Property and surrounding properties at http://deqims2.deq.state.ne.us/deqflex/DEQ.html. Review of DEQ records indicated that the site is listed in the Resource Conservation Recovery (RCR) database as a conditionally exempt small quantity generator (CESQG). Records indicate that a one time shipment of hazardous waste was made from the Property in 1986 and again in 1992 for shipment of DDT, and PCB containing material, respectively. No spills were reported for either waste. In addition, a compliance check was performed at the Property in 2010 by the EPA to confirm the generator status and to inspect facility processes and waste streams. Waste generated at the Property consisted of non-hazardous (i.e. paint) or exempt (i.e. cleaning supplies) materials. No violations were reported. The designation of the facility as a CESQG was confirmed. The designation of the Property as a CESQG was not indicated in the EDR report. The listing of the Property as a CESQG does not represent a REC for the Property at this time.

The Property was also listed in the LUST database in association with a 20,000 gallon fuel oil tank that was removed from the site in 1988. As previously discussed, review of NDEQ records indicated that a 20,000 gallon fuel oil tank (spill number 101188-TH-1005) was removed from the Property in October 1988. Based on review of the report, no corrosion, holes, or leaks were reported during removal of the tank, and no soils were observed to have been impacted. There are no concerns regarding this LUST listing for the Property; however, as mentioned previously, the historical presence of a petroleum UST and subsequent removal and NDEQ closure renders it an HREC for the Property. It is unknown exactly where this tank was located, but the NDEQ Facilities Information website indicates that the tank was located at the approximate northwest corner of the Property (30th and 'R' Streets), which may have been listed arbitrarily. It is assumed that this tank was used to fuel the former boilers on site when they were in use. The Property foreman, Mr. Joe Wright, was unaware of any petroleum tanks on the Property currently or historically.

No other NDEQ records were found for the Property or surrounding properties.



Nebraska Department of Natural Resources

Benesch obtained water well registration information for the Property from the Nebraska Department of Natural Resources (NDNR) website at http://dnrdata.dnr.ne.gov/wellscs. According to the NDNR information, no registered water wells are located at the Property. A copy of the NDNR water well registration information for the area of the Property is provided in Appendix F.

Omaha Public Power District

Benesch contacted Mr. Marty Wetenkamp, Supervisor of Environmental Health & Safety, Safety and Technical Training Division with the Omaha Public Power District (OPPD) for general information regarding OPPD owned and operated electrical transformers in the Property vicinity. OPPD acknowledges responsibility for cleanup of any potential contamination associated with their electrical transformers. OPPD records indicate that one reported spill involving a non- poly-chlorinated biphenyls (PCB) containing material occurred at the site (5614 S. 29th Ave, assumed from a pad mounted transformer) on February 10, 1992 in the amount of one pint. The cleanup occurred on the same date. This release is not considered a concern for the Property. No other spills of PCBs from electrical transformers on or in the immediate vicinity of the Property were reported. A copy of the PCB report from OPPD is provided in Appendix F.

State Fire Marshal

The Nebraska State Fire Marshal (SFM) UST database was reviewed for information regarding petroleum storage tanks located at the Property. The SFM database does not contain record of a registered tank for the Property address.

5.3 Physical Setting Sources

Topography

Based on a review of the USGS 7.5 Minute Series Topographic Map *Omaha South, Nebraska-Iowa Quadrangle* dated 2014, the Property is located an average of approximately 1,130 feet above mean sea level (msl) with elevation decreasing generally from west to east. No urban drainage ways are depicted in the vicinity of the Property. A copy of a portion of the USGS Map for the area of the Property is provided as Figure 1 in Appendix A.

Soils

The United States Department of Agriculture (USDA) Soil Conservation Service *Soil Survey of Douglas and Sarpy Counties, Nebraska,* classifies the soils in the vicinity of the Property as Monona silt loam, 3 to 7 percent slopes (MoC) and Monona silt loam, 11 to 17 percent slopes (MoE). Monona series soils are deep, well-drained, nearly level to very steep soils that formed in loess. Monona soils are fine textured and exhibit moderate permeability and high available water capacity.



Hydrology

Based on the topography of the area of the Property, local groundwater is estimated to flow to the east along the topographic gradient. Regionally groundwater flows to the east toward the Missouri River. Based on information contained in the EDR report and NDNR well information, Benesch estimates that shallow groundwater exists at depths greater than 20 feet below ground surface (bgs) at the Property. Estimated groundwater levels and/or flow direction(s) may vary due to seasonal fluctuations in precipitation, local usage demands, geology, underground structures, or dewatering operations.



5.4 Historical Use Information

The following table summarizes the findings of the research presented below pertaining to historical use of the Property and surrounding areas.

HISTORICAL USE SUMMARY					
Approximate	Identified His	storical Uses	Sa(a)	latamala/Camananta	
Time Period	Property	Surrounding Area	Source(s)	Intervals/Comments	
1943-Present	The Property is occupied by the Southside Terrace housing development.	Occupied by residential, commercial, industrial, and vacant/undeveloped parcels.	Aerial Photographs City Directories Sanborn® Maps Interviews	No significant data gaps.	
1926-1938	The Property is occupied by numerous residences and vacant lots throughout.	Appears to be mostly residential along 30 th and 'R' Streets, residential and vacant/undeveloped parcels along 28 th Street, and undeveloped lots along 'W' Street.	Aerial Photograph City Directories	No significant data gaps.	
1890-1901	The Property is depicted with numerous residences and vacant lots throughout, along with three churches and a school in 1901, and a school in 1890.	Thr Property is surrounded by industrial and residential properties.	Sanborn® Map	Data gap from 1901- 1926, assumed residential use. Property developed as residential prior to 1890.	

Aerial Photographs

Available aerial photographs of the Property and surrounding area ranged from 1938 to 2012. *The EDR Aerial Photo Decade Package* included aerial photographs dated 1938, 1949, 1952, 1969, 1970, 1979, 1982, 1988, 1993, 1999, 2002, 2006, 2007, 2009, 2010, and 2012. The following table provides descriptions and interpretations from the aerial photograph review.

AERIAL PHOTOGRAPH SUMMARY			
Year	Comments		
1988, 1993, 1999, 2002,	Property: The Property is depicted similar to current site observations.		
2006, 2007, 2009, 2010,	Surrounding Area: : The area surrounding the Property is depicted relatively similar to current		
2012	site observations. The processing facility further south is not depicted in 2006.		
1969, 1970, 1979, 1982	Property: The Property is depicted similar to current site observations. However, four additional buildings are depicted prior to 1979, including one in the far southeast corner of the Property that does not appear to be a housing unit.		
	Surrounding Area: The area to the north is depicted by residential and commercial/industrial properties. The area to the east is depicted by residential/commercial north of 'T' and undeveloped south of 'T' Street, with the exception of one buildings that is depicted in the northeast corner of the property south of 'T'. Baseball fields are depicted to the south in 1979., while Metro Comminity College is depicted further north. The cattle chute is not depicted. It is difficult to discern details in the 1982 photograph due to poor quality of the aerial.		



AERIAL PHOTOGRAPH SUMMARY (Cont'd)			
Year	Comments		
1949, 1952	Property: The Property is depicted similar to current site observations. However, four additional buildings are depicted, including one in the far southeast corner of the Property that does not appear to be a housing unit. Surrounding Area: Observations are similar to 1938 decription; however, the area to the north appears to have been partially redeveloped or undergoing redevelopment. The quality of the aerial makes it difficult to discern.		
1938	Property: The Property is depicted as residential properties and vacant lots with through streets. Surrounding Area: The area surrounding the Property is depicted by residential/commercial properties and vacant lots to the west, north, and east (north of 'T' Street); and undeveloped property to the east (south of 'T' Street) and south. What appears to be a cattle chute is depicted on the property to the east (south of 'T' Street), which leads to a processing facility further south. Buildings are depicted on the industrial parcels on the NW and NE corners of 29 th and 'R' Streets. Cattle stockyards are depicted further north and a processing facility further south.		

The review of aerial photographs did not identify features indicative of *recognized environmental conditions* at the Property or surrounding area. Copies of historical aerial photographs for the Property and vicinity are provided in Appendix D.

Historic Topographic Maps

Benesch reviewed available historical USGS Topographic Maps for the Property, including the *Omaha South, Nebraska-Iowa Quadrangle* dated 1956, 1969, 1975, 1984, 1994, and 2014. The Property is depicted as platted urban land. No streams or drainageways are depicted on or surrounding the Property. All maps depict topography consistent with the current topography at the site.

The review of historical USGS Maps did not identify features indicative of *recognized environmental* conditions at the Property and/or the immediate surrounding area. Copies of historical USGS Topographic maps for the Property are provided in Appendix D.

City Directories

Benesch reviewed historical city street directory information provided in *The EDR City Directory Abstract*. EDR generally researched *Polk City Directories* and Cole Information Services (or predecessor versions) for the area of the Property in approximate 5-year intervals dating from 1915 to 2013. The current addresses for the Property are 5317, 5501, and 5701 South 30th Street; however, various residential addresses were observed for the Property prior to development in 1943. The following table has Property and adjoining listings based on a review of the historical city directory information. Other than the Property, only addresses which were occupied by a commercial or industrial property are listed.



CITY DIRECTORIES SUMMARY				
Address	Listed Dates	City Directory Listing		
Property (5317, 5501, 5701 S. 30th Street; various addresses on 28th, 29th and 30th Streets prior to development)	1926-2013	Residential, vacant		
2914 'R' Street	2007-2013	Navarro Enterprises		
	1980-1995	Franklin Transfer		
	1926-1965	Residential (1970-vacant)		
2930-32 'R' Street	1941-1990	Parkvale Bakery		
3008 'R' Street	1946	Mt. Olive Baptist Church		
3009 'R' Street	2013	AMGEDH Foundation		
	1990-2001	Church, Daycare		
	1941-1985	Woodson Center Social Settlement House		
5516 S. 27 th Street	2001-2013	Zeitner & Sons, Mainliner Motor Express (2007-08)		
5716 S. 27 th Street	2001-07	Fisher/Sunshine Windown Cleaners		
	1990-1995	Comet Equipment		
5219 S. 29 th Street	1941-1970	Workmens Club		
5302 S. 30 th Street	1941-1970	S&W Market		
	2001	New Hope Apostolic Temple		
5318, 5330 S. 30 th Street	1941-2013	Bethel Baptist Church (5330- 1970)		
5401 S. 30 th Street	1941-1951	St. Nicholas Church		
5407 S. 30 th Street	1990-2013	Girls, Inc.		
	1970-1985	St. Nicholas Church		
5420 S. 30 th Street	1941-1951, 1970	Grocery Store		
5424 S. 30 th Street	2001	Bethel Baptist Church, Grocery Store		

Based on review of city directories, the Property was occupied by numerous single family residences prior to at least 1936, before the Property was redeveloped in 1943. Only one of the current Property addresses, 5317 S. 30th Street, was listed as a residence from 1941 through 1980, although it was listed as vacant in 1956, 1975, and 1980. The other two Property addresses were not listed in the city directories.

The review of city directories did not identify any addresses indicative of a *recognized environmental* condition for the Property. A copy of *The EDR City Directory Abstract* is provided in Appendix D.

Fire Insurance Maps

EDR provided Benesch with Sanborn® maps of the Property and vicinity for the years 1890, 1901, 1962 and 1964. The following are descriptions and interpretations from the review of historic fire insurance maps for the Property.



FIRE INSURANCE MAP SUMMARY			
Year	Comments		
1964	Property: The southwest corner of the Property is depicted with a heating plant (coal), while the Southside Terrace apartment buildings are depicted on the remaining Property. Only limited coverage available for the Property; 30 th Street not covered. Surrounding Area: JH Kritenbrinks Brick Yard is depicted southeast of the Property. Vacant property is depicted to the south, and residences along 28 th and 'R' Streets. Only limited coverage available for the surrounding area.		
1962	Property: The Southside Terrace apartment buildings are depicted on the Property. The residences depicted on the map appear to be a discrepancy, as the aerial photographs from 1952 do not depict them. Only limited coverage available for the Property; 30 th Street not covered. Surrounding Area: JH Kritenbrinks Brick Yard is depicted southeast of the Property. Vacant property is depicted to the south, and residences along 28 th and 'R' Streets. Only limited coverage available for the surrounding area.		
1901	Property: The Property is depicted with numerous scattered residences. A church and school is depicted on the SE corner of 29 th & 'S' Streets, a church on the SW corner of 29 th & 'S' Streets, and a church on the SE corner of 29 th & 'T' Streets. Only limited coverage available for the Property; 30 th Street and 'T' to 'W' Streets not covered. Surrounding Area: The South Omaha Brick Co. is depicted southeast of the Property, along with three residences. A commercial property, residences vacant lots are depicted along 28 th Street. Only limited coverage available for the surrounding area.		
1890	Property: The Property is depicted with numerous scattered residences. A hotel is depicted on the SE corner of 28 th & 'R' Streets, and a school on the SE corner of 29 th & 'S' Streets. Only limited coverage available for the Property; 30 th Street and 'T' to 'W' Streets not covered. Surrounding Area: Eggers & Bock brick yard is depicted southeast of the Property, across 28 th Street, north of 'W' Street. Scattered residences are depicted along 'R' Street and 28 th Street. Only limited coverage available for the surrounding area.		

The review of the Sanborn® maps provided by EDR for the Property and vicinity did not identify a recognized environmental condition for the Property. Please note that Sanborn® map coverage was not available and/or provided for portions of the Property and surrounding area as noted in the table. Copies of historical Sanborn® maps reviewed for the Property are provided in Appendix D.

County Assessor Property Tax Files

Benesch accessed real estate tax information for the Property on the Douglas County Assessor's website at http://douglasne.wgxtreme.com. Information about the Property parcels are listed provided below.

<u>Address</u>	Parcel ID	Parcel Size (Ac)	Structure Size (ft ²)	Const. Date
5317 S. 30 th St.	0424090002	NA	600-1000	1943
5501 S. 30 th St.	0414260000	NA	600-1000	1943
5701 S. 30 th St.	0414270002	NA	600-1000	1943

A copy of the Douglas County Assessor information is provided in Appendix F.

Douglas County Health Department Publications

Benesch reviewed the following publications issued by the Douglas County Health Department (DCHD) for information regarding historic landfills, if any, located in the vicinity of the Property:

Status of Dumps and Dumping in Omaha and Douglas County, dated August 1968; and



Report on DUMP SITES AND LANDFILLS within City and Three Mile Limit, dated December 23, 1963.

Prior to 1965, Douglas County did not operate a landfill and vendors generally used private, unregulated landfills for trash and waste disposal. A review of the DCHD historical landfill information indicates the nearest such landfill in the vicinity of the Property were located at 36th and 'Q' Streets, approximately 0.5 miles northwest of the Property. This former landfill does not represent a REC for the Property at this time. A copy of the DCHD landfill information is provided in Appendix D.

Land Title Records and Environmental Liens

The acquisition of recorded land title records was not conducted within the scope of services for this Phase I ESA. Benesch assumes any prospective buyers and sellers of the Property will arrange for title search services at an appropriate time, which would include a review and evaluation of environmental liens or AULs regarding the Property (activity and use limitations, e.g. restrictive or protective covenants regarding environmental issues), if any.

Prior Reports

No previous reports were provided to Benesch for review and inclusion in this ESA report.

Building Department Records

Historical building department records, if any, were not reviewed. In the opinion of the environmental professionals, no additional significant information is expected from this source.

Zoning/Land Use Records

Historical Zoning/Land Use Records were not reviewed. In the opinion of the environmental professionals, no additional significant information is expected from this source. However, based on review of other historical records, the Property has historically been occupied solely by residential parcels. According to information obtained from the Douglas County Assessor via http://douglasne.mapping-online.com, the Property parcels are currently zoned residential. The parcels to the west are zoned residential; to the north are zoned residential and industrial; and to the east and south industrial. A copy of the zoning map for the south Omaha vicinity is provided in Appendix F.

Other Historical Sources

No additional historical sources were reviewed.



6.0 SITE RECONNAISSANCE

6.1 Methodology and Limiting Conditions

Site reconnaissance methodology involved a walking and driving inspection of the Property and vicinity on March 25, 2016 by Brian Fettin and Zach Kresl of Benesch. Representative areas of the Property were accessed with observations noted. There were no conditions which limited observations (i.e. access issues, physical barriers, or weather); however, because all the buildings are relatively similar and there are numerous buildings on site, only a few were accessed, including sub-basements and boiler rooms, during the site reconnaissance to provide a representative sample of the entire Property. Photographic documentation of the site reconnaissance is provided in Appendix B.

6.2 General Site Setting

The Property consist of fifty-one buildings, which includes fifty multi-family residential buildings and a two-story maintenance storage garage. The Property also includes a main office on 30th Street, which is attached to one of the residential buildings. The office has a storage area, woodshop, and maintenance office on the lower level. There is also a maintenance garage beneath the residential units just south of the office along 30th Street. All of the residential buildings have a sub-basement, and there are 12 boiler rooms located in separate sub-basements. The Property generally slopes from east to west; however, the Property slopes to the northeast on the north half and to the southeast on the south half. The Property is bordered by 'R' Street on the north, 30th Street on the west, 'W' Street on the south, and 28th Street on the east. The site is accessible from all four bordering streets. The Property is located in a mixed use area generally characterized by residential and commercial properties to the west, residential and industrial properties to the north, vacant and industrial properties to the east, and baseball fields to the south. Refer to the site diagram in Appendix A.

6.3 Site Reconnaissance Observations

The objective of a site reconnaissance is to obtain information indicating the likelihood of identifying recognized environmental conditions in connection with the Property. The observations made during the site reconnaissance are identified in the following table and described in the following sections.



SITE CHARACTERISTICS			
Category	Site Feature	Observed	
	Emergency Generators		
	Elevators		
Site Operations, Processes	Air Compressors		
and Equipment	Hydraulic Lifts		
	Dry Cleaning		
	Photo Processing		
	Ventilation Hoods and/or Incinerators		
	Waste Water Treatment Systems		
	Heating and/or Cooling Systems	Х	
	Other Processes or Equipment		
Aboveground Chemical or	Aboveground Storage Tanks (ASTs)		
Waste Storage	Drums, Barrels and/or Containers > 5 gallons	Х	
	MSDS		
Underground Chemical or	Underground Storage Tanks (USTs)		
Waste Storage, Drainage or	Sumps, Cisterns, Catch Basins and/or Dry Wells	Х	
Collection Systems	Grease Traps		
	Septic Tanks and/or Leach Fields		
	Oil/Water Separators		
	Pipelines		
	Interior Floor Drains	Х	
Electrical Transformers	Transformers and/or Capacitors	Х	
and/or PCBs	Other Equipment		
	Stressed Vegetation		
	Stained Soil	Х	
	Stained Pavement	Х	
Releases or	Leachate and/or Waste Seeps		
Potential Releases	Trash, Debris, Waste Materials		
	Dumping or Disposal Areas		
	Construction/Demolition Debris		
	Surface Water Discoloration, Odor, Sheen and/or		
	Free Phase Product		
	Strong, Pungent or Noxious Odors		
	Exterior Pipe Discharges, Effluent Discharges		
Othor Notable Cite	Surface Water Bodies		
Other Notable Site	Quarries or Pits		
Features	Wells		



Heating and/or Cooling Systems

There were boiler rooms observed in two sub-basements at the Property. According to Mr. Wright, there are 12 boiler rooms located on-site. Pressure tanks, numerous boiler units, and piping was observed in these boiler rooms. According to Mr. Wright, the boilers were used to heat the buildings prior to switching over to electric heat in the 1970's. The boilers were fueled with heating oil. Oil staining was observed in one of the boiler rooms where it appeared that a former tank was located. The boilers and associated equipment did not represent a *recognized environmental condition* for the Property.

Drums, Barrels, and/or Containers >5 Gallons

Numerous 5-gallon buckets of paint were observed in the storage area in the office basement, on both floors of the maintenance building, and in one the sub-basements. Roof patch was also observed in the maintenance building. One 55-gallon drum of cedar oil, one 55-gallon drum of mineral spirits, and one 55-gallon drum of kerosene, in addition to a 40-gallon drum of hydraulic oil, all partially full, were observed on the first floor of the maintenance building. No spillage or leaks were observed from any of these containers. These containers do not represent a *recognized environmental condition* for the Property.

Sumps, Cisterns, Catch Basins and/or Dry Wells

A sump was observed in one of the sub-basement boiler rooms. The sump was full of water. The sump is not considered a concern.

Interior Floor Drains

Numerous floor drains were observed throughout the facility; in the maintenance storage building, the maintenance garage, and the storage area and woodshop in the office basement. No staining was observed around any of the the drains. Mr. Wright stated that the drain in the maintenance storage building are cleaned out once per year by a local contractor. The drains are not considered a concern.

Transformers and/or Capacitors

Numerous pad mounted transformers were observed throughout the Property. There were no concerns observed with any of the transformers. OPPD records indicate that a spill of non PCB containing material was cleaned up at the Property in 1992, as discussed in Section 5.2. No additional spills from transformers at the Property were reported. The presence of transformers on the Property are not considered a concern at this time.

Stained Soil/Pavement

Oil staining was observed in one of the boiler rooms where it is assumed that a fuel oil tank used to fuel the boilers was previously located. The oil staining also exhibited a slight odor. The staining appeared minimal and localized and was likely from overfilling of the tank or a leaking valve. It was difficult to determine if the ground surface was dirt, or if it was silt buildup from past flooding events. Mr. Wright



indicated that both concrete and earthen floors are present in the sub-basements. The piping on the walls was also coated with a black oily substance. According to Mr. Wright, there are 12 boiler rooms on the Property. Only two were observed during the site reconnaissance. It is unknown if fuel oil tanks were previously located in any of the other boiler rooms; however, Mr. Wright indicated that no other boiler rooms had a pit similar to this one. In addition, it is unknown if the NDEQ spill numbers listed for the Property are associated with the location of the oil staining/former tank. The oil staining appeared to be de minimis and is not considered a concern at this time.

Vapor Migration Screening

ASTM Standard E 1527-13 clarifies that the vapor pathway should be considered in the Phase I ESA because a vapor would be considered a release to the environment. No extensive vapor migration assessment was conducted as part of this assessment. Benesch relied on the regulatory agency database records review report provided by EDR, information from the NDEQ, historical information, site reconnaissance, and review of current site conditions to assess the potential for vapor migration on the Property. Based on the records review report, information from the NDEQ, historical information, and site reconnaissance, there is potential for vapor migration from the oil staining in the boiler room, discussed above. The extent of any soil and/or groundwater contamination beneath the Property, if any, is unknown; however, the staining appeared to be minimal and localized. Potential vapor migration into the units above the boiler rooms is possible at the Property anywhere where a leak from a petroleum tank may have occurred. The potential vapor migration is not considered a concern at this time.



7.0 INTERVIEWS

The following persons were contacted to obtain information regarding *recognized environmental* conditions in connection with the Property:

Role	Name	Title	Entity	Interview Type
User	Ms. Denise	Project Facilitator	OHA	E-mail/User Questionnaire
Representative	Parker			DParker@ohauthority.org
User	Mr. Joe	Maintenance	OHA	In person and e-mail interview
Representative	Wright	Foreman		JWright@ohauthority.org
Local Utility	Mr. Marty	Supervisor	Safety & Training	Benesch request and OPPD
	Wetenkamp	Environmental	Division, Omaha	response via letter and email
		Health & Safety	Public Power	mjwetenkamp@oppd.com
			District (OPPD)	
Local Government	Mr. Jon Ruff	Environmental	Douglas County	Electronic mail via
Agency		Health Specialist,	Health	jon.ruff@douglascounty-
		Sanitary	Department	<u>ne.gov</u>
		Engineering Dept.		Telephone 402.444.7485

Relevant interview information has been incorporated into the appropriate sections of this ESA report. A Record of Conversation form documenting the interview information and the User Questionnaire for the Property is provided in Appendix E.



8.0 FINDINGS

8.1 Findings

Site Reconnaissance

The Southside Terrace housing development is located at 30th & 'R' Streets. The Property generally slopes from east to west; however, the Property slopes to the northeast on the north half and to the southeast on the south half. The Property is bordered by 'R' Street on the north, 30th Street on the west, 'W' Street on the south, and 28th Street on the east. The site is accessible from all four bordering streets. The Property is located in a mixed use area generally characterized by residential and commercial properties to the west, residential and industrial properties to the north, vacant and industrial properties to the east, and baseball fields to the south. Refer to the site diagram in Appendix A.

The Property is occupied by fifty-one buildings, which includes fifty multi-family residential buildings and a two-story maintenance storage garage. The Property also includes a main office on 30th Street, which is attached to one of the residential buildings. The office has a storage area, woodshop, and maintenance office on the lower level. There is also a maintenance garage beneath the residential units just south of the office along 30th Street. There are 363 residential units at the Property, ranging from one to seven bedroom units. All of the residential buildings have a sub-basement, and there are 12 boiler rooms at the Property located in separate sub-basements. All structures are constructed of brick, with pitched asphalt shingle roofs. The pitched roofs were constructed over the original flat tarred roofs, according to Mr. Wright.

Only a few of the residential units and two of the sub-basements and boiler rooms were accessed during the site reconnaissance, as all units and basements are relatively similar. The residential units were typical layouts with a living room and kitchen on the main floor and bedrooms on the second floor, with tile floors throughout. No concerns were observed regarding the residential units that were accessed.

The two sub-basements that were accessed were primarily empty and were comprised of several rooms, including bathrooms. Each building has a sub-basement. These were accessed through flat storm cellar type doors located at the end of the buildings with steps leading down to the lower level. There were several 5-gallon buckets of paint stored in one along with various construction materials. The floors were concrete or tiled. According to Mr. Wright, the sub-basements were used for staging when remodels of the residential buildings were conducted in the past and that they were never used to house tenants, to his knowledge. One of the sub-basements had what appeared to be a stage, indicating that it may have been used for social events at one time. No concerns were observed regarding the sub-basements that were accessed.

The boiler rooms that were observed were accessed the same way as the sub-basements. There are 12 boiler rooms located throughout the Property. These were in use prior to outfitting the buildings with electric heat in the 1970's, and they were fueled by heating oil. Pressure tanks, numerous boiler units, and piping was observed in these boiler rooms. One of the boiler rooms had a lower level pit that appeared to have been previously occupied by a tank. This type of pit was not observed in the second boiler room, and according to Mr. Wright, none of the other boiler rooms contained a similar pit. There



were pipes located along the wall and coming out of the wall. Localized oil staining was observed on the ground along the wall, and the pipes were also covered in an oily substance. There was a faint odor observed. It was difficult to tell if the ground surface was dirt or concrete in the area of the pit, although there was dirt present, but it appeared that it may have been silt buildup from past flooding events.

The Property office was located on the corner of 30th & 'U' Avenue and consisted of a lobby and numerous offices throughout the main floor, while the basement housed the maintenance office, a woodshop, and storage area. The storage area and woodshop were used to store materials, parts, tools, and supplies. No concerns were observed regarding the main office or lower level.

The maintenance storage garage was located just east of the office and was comprised of two floors. The first floor was accessed through two overhead doors and was used to store several 1 gallon containers and 5-gallon buckets of paint, building materials, equipment, and tools. Three partially full 55-gallon drums; one kerosene, one mineral spirits, and one cedar oil; and one partially full 40-gallon drum of hydraulic oil were observed. Two small containers of gasoline were also observed. Numerous floor drains were observed. Only de minimis staining was observed. The second floor was used to store 1 gallon containers and 5-gallon buckets of paint, painting equipment and building materials. No concerns were observed regarding the maintenance garage.

A second maintenance garage was observed on the lower level beneath the residential building located just south of the office along 30th Street. This garage was used mainly to store mowing equipment and vehicles, bagged sand and salt, and various other pieces of equipment and tools. One small floor drain was observed. Only de minimis staining was observed. There were no concerns regarding the lower level maintenance garage.

The area surrounding the Property is characterized by commercial, residential, and industrial use properties to the north, vacant/undeveloped parcels and industrial properties to the east, vacant/undeveloped property to the south, and commercial and residential properties to the west.

Regulatory Records Review

The Property is located within the Omaha Lead National Priority List (NPL) and CERCLIS project boundaries (aka Omaha Lead Site [OLS]) which encompass a significant portion of east Omaha. In addition, one Federal Institutional and Engineering Control site is associated with the OLS.

The OLS listing on the NPL is resultant from airborne lead particulate contamination of near surface soils over a widespread area of north-central, south-central, and downtown Omaha as a result of historic lead smelting and recycling activities conducted at two former industrial facilities (Asarco and Gould Battery) which were located approximately 4 miles north-northeast of the Property. Both areas have since been redeveloped.

According to the Omaha Lead Registry Lead Superfund website, the Property has been assessed and it was determined that clean up of the soils was not required, with the exception of one parcel on the Property along 28th Street just south of 'S' Street. This area of soils has been cleaned up. A map showing



the area of cleaned up soils is included in Appendix F. The OLS represents an HREC for the Property due to the area of soils on the Property that was cleaned up.

There is one Federal RCRA non-CORRACTS TSD facility located within the relevant search radius of the Property. However, based on current regulatory status, distance, and/or estimated down or cross-gradient location relative to the Property, this site does not represent a REC for the Property at this time.

There are three Federal RCRA Generator sites (one small quantity generator, two conditionally exempt small quantity generator sites) located within the relevant search radius of the Property. However, based on current regulatory status, distance, and/or estimated down or cross-gradient location relative to the Property, these sites do not represent a REC for the Property at this time.

State Agency Database Listings

The Property is listed as a leaking underground storage tank (LUST) site in the EDR report. There are two spill numbers associated with the Property (101188-TH-1005; 011587-TH-1150).

Spill number 101188-TH-1005 is associated with removal of a 20,000 gallon fuel oil tank from the Property in October 1988. Based on review of the report, no corrosion, holes, or leaks were reported during removal of the tank, and no soils were observed to have been impacted. There are no concerns regarding this LUST listing for the Property; however, the historical presence of a petroleum UST and subsequent removal and NDEQ closure renders it an HREC for the Property. It is unknown exactly where this tank was located, but the NDEQ Facilities Information website indicates that the tank was located at the approximate northwest corner of the Property (30th and 'R' Streets), which may have been listed arbitrarily. It is assumed that this tank was used to fuel the former boilers on site when they were in use. The Property foreman, Mr. Joe Wright, was unaware of any petroleum tanks on the Property currently or historically.

Based on review of the EDR report, spill number 011587-TH-1150 is associated with a former heating oil tank on the Property; the facility status is listed as No Further Action (NFA). However, the NDEQ does not have record of this file; therefore, it is unknown whether a release actually occurred or if this is in regards to a clean tank removal. In addition, the location of this tank is unknown.

It is unknown if either of the spill numbers/tanks referred to above are associated with the boiler room where the stained soils were observed.

In addition, several sites located in the vicinity of the Property are listed in state/tribal databases in the EDR report.

There are four (4) State equivalent CERCLIS NE SHWS (State Superfund Program List) sites located within the relevant search radius of the Property. However, based on current regulatory status, distance, and/or estimated down or cross-gradient location relative to the Property, these sites do not represent a REC for the Property at this time.



There are thirty-two (32) leaking underground storage tank (LUST) sites, and six (6) leaking aboveground storage tank (LAST) sites located within the relevant search radius of the Property. The NDEQ has issued a 'No Further Action' (NFA) letter for five of the six LAST sites, and 25 of the 32 LUST sites. Based on current regulatory status, distance, and/or estimated down or cross-gradient location relative to the Property, none of the LUST or LUST sites represent a REC for the Property at this time.

There are ten (10) underground storage tank (UST) sites located within the relevant search radius of the Property. However, based on current regulatory status, distance, and/or estimated down or cross-gradient location relative to the Property, none of the UST sites represent a REC for the Property at this time.

Fifteen (15) NE Brownfield sites are located within the relevant search distances from the Property. Many of the listed sites on 'Q' Street are other sites that were previously assessed under the same Brownfields Coalition Assessment Grant that the Property is currently being assessed under. There were no RECs associated with these sites. Based on facility status, distance and/or estimated down or crossgradient location relative to the Property, these sites do not represent a REC for the Property at this time.

There are a total of 19 US Historical Auto Stations (7) and US Historical Cleaners (12) sites located within the relevant search distances from the Property. These are historical sites, that based on business name and/or category, may have been operated as a gas or service station. Several historical dry cleaners and one historical auto station previously located in the vicinity of the Property, are listed in the EDR report. However, based on the distance from the Property these listings do not represent a REC for the Property. Based on lack of regulatory data, distance, and/or estimated down or cross-gradient location relative to the Property, the remaining sites do not represent a REC for the Property at this time.

Orphan Summary Listings

The Property is listed in the Orphan Summary under the FINDS and ECHO databases. The listing of the Property in these databases is not considered significant at this time. Sites in the Orphan Summary of the EDR report have insufficient address information for an exact location to be mapped. Based on the limited information available, none of the remaining sites listed in the Orphan Summary appear to be located in the Property vicinity, and therefore, are not considered significant at this time.

Nebraska Department of Environmental Quality

Benesch performed a NDEQ file search for additional regulatory information, if any, regarding the Property and surrounding properties at http://deqims2.deq.state.ne.us/deqflex/DEQ.html. Review of DEQ records indicated that the site is listed in the Resource Conservation Recovery (RCR) database as a conditionally exempt small quantity generator (CESQG). Records indicate that a one time shipment of hazardous waste was made from the Property in 1986 and again in 1992 for shipment of DDT, and PCB containing material, respectively. No spills were reported for either waste. In addition, a compliance check was performed at the Property in 2010 by the EPA to confirm the generator status and to inspect facility processes and waste streams. Waste generated at the Property consisted of non-hazardous (i.e. paint) or exempt (i.e. cleaning supplies) materials. No violations were reported. The designation of the



facility as a CESQG was confirmed. The designation of the Property as a CESQG was not indicated in the EDR report. The listing of the Property as a CESQG does not represent a REC for the Property at this time.

Interviews

Relevant interview information has been incorporated into the appropriate sections of this ESA report and is summarized in Section 7.0. Denise Parker, Project Facilitator with the Omaha Housing Authority, completed a User Questionnaire for the Property. Ms. Parker stated that OHA is considering demolition of the Property and redeveloping the Property into multi-family housing. She indicated that she is unaware of any contamination or chemicals stored at the Property, and that lead in soil was remediated by the OLS, as previously discussed.

Mr. Joe Wright, Maintenance Foreman for the Property, stated that the Property was developed in 1943. He stated that there are 1-bedroom units through 7-bedroom units and that the sub-basements are used for storage or are empty and were previously used for staging during remodels. He stated that every building has a sub-basement which typically will run the entire length of the building. He indicated that there are 12 boiler rooms on the Property. All heat for the buildings are now electric/radiant heat. He indicated that all asbestos on piping in the sub-basements were abated many years ago after the boilers were taken out of use. He also stated that the drains in the maintenance storage building are cleaned out once a year by a local contractor. He was unaware of any petroleum tanks currently or historically located on the Property.

Benesch contacted Mr. Jon Ruff, Environmental Health Specialist with the Sanitary Engineering Section of the Douglas County Health Department (DCHD) for environmental records regarding the Property. According to Mr. Ruff, DCHD records did not contain any significant information for the Property.

Benesch contacted Mr. Marty Wetenkamp, Supervisor of Environmental Health & Safety, Safety and Technical Training Division with the Omaha Public Power District (OPPD) for general information regarding OPPD owned and operated electrical transformers in the Property vicinity. OPPD acknowledges responsibility for cleanup of any potential contamination associated with their electrical transformers. OPPD records indicate that one reported spill involving a non- poly-chlorinated biphenyls (PCB) containing material occurred at the site (5614 S. 29th Ave, assumed from a pad mounted transformer) on February 10, 1992 in the amount of one pint. The cleanup occurred on the same date. This release is not considered a concern for the Property. No other spills of PCBs from electrical transformers on or in the immediate vicinity of the Property were reported. A copy of the PCB report from OPPD is provided in Appendix F.

8.2 Historical Summary

The Property was developed prior to 1901 as residential properties. The Property was redeveloped in 1943 into the Southside Terrace housing development as it sits today, with the exception of a few buildings that have been removed. The surrounding area has historically been occupied by residential, commercial, and industrial properties, along with vacant/undeveloped parcels.



8.3 Data Gap Analysis

A data gap is a lack of or inability to obtain information by the environmental professional that could affect the ability of the environmental professional to identify conditions indicative of releases or threatened releases. The ASTM standard specifies that all obvious uses of the Property shall be identified back to first developed use or 1940, whichever is earlier; and that review of standard historical sources at intervals of less than five years is not required. Further, if the use of the Property appears unchanged over a period longer than five years, then it is not required to research the use during that period.

The history of the Property has been researched to 1890 (fire insurance map), 1956 (topographic map), 1915 (city directory), and 1938 (aerial photograph). Minor data gaps spanning more than five years exist. Based on review of historical records, the use of the Property has changed minimally since it has been developed. Initially, the Property was occupied by numerous residences, followed by redevelopment into the Southside Terrace housing development in 1943.

Although there are data gaps regarding the historic use of the Property, it is the opinion of the environmental professional that these data gaps are not significant and does not affect our ability to identify recognized environmental conditions in connection with the Property.



9.0 OPINION

Benesch performed a Phase I Environmental Site Assessment of the Property in general conformance with the scope and limitations of ASTM Practice E 1527-13. Any exceptions to, or deviations from, this practice are described in Sections 2.2 and 2.4 of this report. This assessment has revealed evidence of recognized environmental conditions (RECs) and historic recognized environmental conditions (HRECs) in connection with the Property as follows:

The Property is located within the Omaha Lead Site (OLS) boundaries which encompass a significant portion of Omaha. The Property was assessed and it was determined that clean up of the soils was not required, with the exception of one parcel on the Property along 28th Street just south of 'S' Street, which was subsequently cleaned up. As such, the OLS represents an HREC for the Property due to the area of lead impacted soils on the Property that were cleaned up.

Spill number 101188-TH-1005 is associated with removal of a 20,000 gallon fuel oil tank from the Property in October 1988. Based on review of the report, no corrosion, holes, or leaks were reported during removal of the tank, and no soils were observed to have been impacted. There are no concerns regarding this LUST listing for the Property; however, the historical presence of a petroleum UST and subsequent removal and NDEQ closure renders it an HREC for the Property. It is assumed that this tank was used to fuel the former boilers on site when they were in use.



10.0 DEVIATIONS

There were no significant deviations from ASTM Standard Practice E 1527-13 noted during the course of this assessment.



11.0 ADDITIONAL SERVICES

No additional services beyond the scope of ASTM Standard E 1527-13 were requested by the User for this assessment.



12.0 REFERENCES

ASTM International, Standard Practice for Environmental Site Assessments: Phase One Environmental Site Assessment Process, ASTM Designation E 1527-13, November 2013.

Douglas County Assessor, Property records, parcel maps, and a zoning map accessed via the internet website http://douglasne.mapping-online.com.

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13.0 QUALIFICATIONS OF ENVIRONMENTAL PROFESSIONALS

We declare that, to the best of our professional knowledge and belief, we meet the definition of Environmental Professional as defined in 40 CFR 312.10. We have the specific qualifications based on education, training, and experience to assess a property of the nature, history and setting of the subject Property. We have developed and performed the all appropriate inquiries in general conformance with the standards and practices set forth in 40 CFR Part 312. Resumes for the Benesch environmental professionals are provided in Appendix G.

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