

Certified Mail Receipt 7001 0320 0004 2633 4344

ARCADIS U.S., Inc.
430 First Avenue North
Suite 720
Minneapolis
Minnesota 55401
Tel 612.339.9434
Fax 612.336.4538
www.arcadis-us.com

Ms. Shanna Schmidt and Ms. Stacey Hendry-Van Patten Minnesota Pollution Control Agency 520 Lafayette Road North St. Paul, Minnesota 55155-4194

ENVIRONMENT

Subject:

Initial Receptor Survey
Ford Twin Cities Assembly Plant, St. Paul, Minnesota
MPCA VIC Project Number VP23530
MPCA PBP Project Number PB3682

Dear Ms. Schmidt and Ms. Hendry-Van Patten:

This letter report summarizes the results of the initial receptor survey completed by ARCADIS in May, 2010 on behalf of Ford Motor Company (Ford) at the Twin Cities Assembly Plant (TCAP) in St. Paul, Minnesota (Figure 1). The receptor survey at the TCAP was conducted in accordance with the requirements of the Minnesota Pollution Control Agency (MPCA) Guidance Document 4-02, *Potential Receptor Surveys and Risk Evaluation Procedures at Petroleum Release Sites* (September 2008) and MPCA Guidance Document 4-18, *Public Water Supply Risk Assessment at Petroleum Remediation Sites* (Document 4-18 April 2005). The receptor survey was completed to assess the potential of groundwater, vapor, and surface-water receptors near the Site. Soil gas, utility vapor sampling, and risk evaluations will be completed in the future.

Date:

July 18, 2011

Contact: Rob Ellis

Phone:

248.994.2252

Email

rob.ellis@arcadis-us.com

Our ref:

DE000373.0001

### **Site Location**

The TCAP is located at 966 South Mississippi River Boulevard in St. Paul, Ramsey County, Minnesota at the approximate easting coordinate 484562.5 meters (m) and northing coordinate 4973822.5 m. The TCAP is located in a mixed industrial-, commercial-, and residential-use area on the eastern shore of the Mississippi River, along the east side of South Mississippi River Boulevard, south of Ford Parkway and west of South Cleveland Avenue, in St. Paul, Minnesota.

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Ms. Shanna Schimdt and Ms. Stacey Hendy-Van Patten July 15, 2011

## **Receptor Survey**

Water Well Receptor Survey

A walking receptor survey was completed on May 24, 2010 to identify properties within 500 feet of the Site. The survey consisted of obtaining property addresses and observations from public property (i.e. road or sidewalk) if any water supply wells are present on the property.

ARCADIS generated a questionnaire that was mailed to each property owner within 500 feet of the Site. The questionnaire asked them to identify if they have any wells, sumps, or basements on their property and if so, what the wells are used for. All property owners were given one month to reply to the survey, and the survey stated that if no response was received that no well, basement, or sump will be assumed on the property. A summary of addresses the survey was mailed to is presented in Table 1.

ARCADIS also contacted the City of St. Paul Utility Department to determine where the city acquires their water supply from and requested a map of all existing subsurface utilities within a mile of the Site. A source water assessment was also conducted utilizing the MDH online source water assessment tool. The data was used to determine if the Site was located in a Drinking Water Supply Management Area (DWSMA). The Site is not located in the DWSMA. St. Paul water is from the Mississippi River, which is pumped through a chain of lakes, including Charles, Pleasant, Sucker, and Vadnais before it reaches a treatment plant. A small portion of the water is received from a select few wells in Vadnais Heights. Water intake from the Mississippi River at the St. Paul Water Works is 13.5 miles upstream (north) of the Ford Plant.

A total of 270 initial receptor survey letters were sent to property owners within 500 feet of the Site, 104 letters were returned (Appendix B), and one response received via phone. Of the 105 responses, two of the properties indicated wells existed on the premises. One well is located at 2218 West Pinehurst Avenue, and the other at 745 Mt. Curve Blvd. The 745 Mt. Curve Blvd well is noted to have been abandoned, and neither of the wells were identified during the walking survey. A response of unknown or with a "?" were interpreted as not having a well on the premises.

The location and use of the well located at 2218 West Pinehurst is unknown to the home owner and was not visible during the walking survey. Since this address is connected to city water, it is unlikely the well is used as a potable water source.

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Additionally, ARCADIS completed an online well search via the Minnesota Department of Health (MDH) online County Well Index (CWI), and searched for wells within 0.5 miles of the Site. Neither of the wells stated above from the receptor survey were found in the MDH CWI. Figure 2 present the locations of all wells located within 0.5 mile of the Site and well details are presented in Table 2. MDH well and boring records for all of the wells located within 0.5 miles of the Site are included in Appendix A.

Forty-one wells were identified from the CWI within 0.5 mile of the Site. Of the 41 wells identified, one well is for domestic use (as stated on the MDH boring and well record), three wells are for commercial or air conditioning, 30 wells are for monitoring, and 7 wells are labeled for elevator use. One domestic well is on the west side of the river across from the Ford Plant. The well location for well unique # 223849 on Figure 2 is an approximate location based on the Township, Range, and Section sub-sections were not provided).

Vapor Receptor Survey

Based on the utility map provided to ARCADIS from the City of St. Paul, potential nearby vapor receptors were identified within 500 feet of the Site. Receptors include storm water lines and catch basins, sanitary sewer lines, and water mains. See Figures 3 through 7 for all subsurface utilities identified near the Site.

Surface Water Receptor Survey

ARCADIS identified all surface water bodies within 0.25 mile of the Site, and obtained the information from the Capital Region watershed District, USGS topographical maps, and a walking survey.

The walking survey was conducted on May 24, 2010 by observing from public property and confirming wetland and surface water locations. Surface water located within 0.25 mile of the Site is the Mississippi River, Hidden Falls (storm water discharge), and a small holding pond (Figure 5) for and next to the water treatment plant on Ford property.

#### Conclusion

An initial receptor survey was completed identifying 42 wells within 0.5 mile of the Site. Since the TCAP is on the Mississippi River, all wells, other than on Site monitoring wells are up gradient or side gradient and there are several wells across

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on the west side of the Mississippi River. Several catch basins and manholes were identified on and off Site for future vapor receptor surveying. Two surface water bodies were also identified within 0.25 mile of the Site.

We appreciate your assistance with this project. If you have questions or need additional information, please call Rob Ellis of ARCADIS at your convenience.

Sincerely,

ARCADIS U.S., Inc.

Robert J. Ellis Project Manager Trika Nelson-Kalmes Staff Scientist

Copies:

Ms. Barbara Rusinowski, Ford Motor Company, Dearborn, Michigan Mr. John Meyers, Ford, Twin Cities Assembly Plant, St. Paul, Minnesota



**Tables** 



Table 1. Receptor Survey Properties Located Within 500 Feet of the Ford Plant Twin Cities Assembly Plant, St. Paul, Minnesota

House #	Street Address								
No well on Property, Connected to City Water, Responded to Survey									
2185	Ford Pkwy								
16	Inner Dr								
17	Inner Dr								
18	Inner Dr								
21	Inner Dr								
22	Inner Dr								
23	Inner Dr								
25	Inner Dr								
26	Inner Dr								
27	Inner Dr								
31	Inner Dr								
32	Inner Dr								
33	Inner Dr								
34	Inner Dr								
36	Inner Dr								
37	Inner Dr								
38	Inner Dr								
39	Inner Dr								
40	Inner Dr								
41	Inner Dr								
42	Inner Dr								
43	Inner Dr								
44	Inner Dr								
45	Inner Dr								
46	Inner Dr								
47	Inner Dr								
49	Inner Dr								
50	Inner Dr								
51	Inner Dr								
52	Inner Dr								
56	Inner Dr								
57	Inner Dr								
60	Inner Dr								
61	Inner Dr								
813	Cleveland Ave S								
815	Cleveland Ave S								
869	Cleveland Ave S								
881	Cleveland Ave S								
885	Cleveland Ave S								
887	Cleveland Ave S								
2065	Village Ln								
2071	Village Ln								



Table 1. Receptor Survey Properties Located Within 500 Feet of the Ford Plant Twin Cities Assembly Plant, St. Paul, Minnesota

House #	Street Address
No well o	n Property, Connected to City Water, Responded to Survey
2075	Village Ln
2081	Village Ln
2085	Village Ln
2087	Village Ln
2089	Village Ln
2091	Village Ln
2095	Village Ln
2097	Village Ln
2105	Village Ln
2109	Village Ln
2119	Village Ln
880	Cleveland Ave S
2049	W Montreal Ave
2052	W Montreal Ave
1045	Cleveland Ave S
1041	Colby St
1025	Colby St
1025	S Finn St
1038	S Finn St
1025	S Bowdoin St
1026	S Bowdoin St
1031	S Bowdoin St
1032	S Bowdoin St
1037	S Bowdoin St
1043	S Bowdoin St
1049	S Bowdoin St
1055	S Bowdoin St
1061	S Bowdoin St
1068	S Bowdoin St
2231	W Pinehurst Ave
2221	W Pinehurst Ave
2225	W Pinehurst Ave
2214	W Pinehurst Ave
2215	W Pinehurst Ave
2204	W Pinehurst Ave
2190	W Pinehurst Ave
2187	W Pinehurst Ave
2181	W Pinehurst Ave
2167	W Pinehurst Ave
2159	W Pinehurst Ave
2155	W Pinehurst Ave
2146	W Pinehurst Ave



Inner Dr

Inner Dr

Inner Dr

Inner Dr Village Ln

Cleveland Ave S

Cleveland Ave S

Cleveland Ave S

Cleveland Ave S

62

63

64 65

2030 899

890

896

908

House #

#### Table 1. Receptor Survey Properties Located Within 500 Feet of the Ford Plant Twin Cities Assembly Plant, St. Paul, Minnesota

No well	on Property, Connected to City Water, Responded to Survey
2151	W Pinehurst Ave
2142	W Pinehurst Ave
2134	W Pinehurst Ave
2131	W Pinehurst Ave
2124	W Pinehurst Ave
946	Cleveland Ave S
2046	W Montreal Ave
2048	W Montreal Ave
2050	W Montreal Ave
2054	W Montreal Ave
968	Cleveland Ave S
994	Cleveland Ave S
996	Cleveland Ave S
1002	Cleveland Ave S
5	Villard Ct
6	Villard Ct
2041	Villard Ave
2118	Ford Pkwy
2140	Ford Pkwy
2163	Ford Pkwy
2191	Ford Pkwy
745	Mt Curve Blvd
755	Mt Curve Blvd
770	Mt Curve Blvd
Well on	Property, Connected to City Water, Responded to Survey
2218	W Pinehurst Ave
Connec	ted to City Water, Didn't Respond to Survey
750	Mississippi River Blvd
2277	Ford Pkwy
2269	Ford Pkwy
2239	Ford Pkwy
2221	Ford Pkwy
2191	Ford Pkwy

**Street Address** 



Table 1. Receptor Survey Properties Located Within 500 Feet of the Ford Plant Twin Cities Assembly Plant, St. Paul, Minnesota

House #	Street Address								
Connected to City Water, Didn't Respond to Survey									
924	Cleveland Ave S								
2047	W Saunders Ave								
859	St. Paul Ave								
869	St. Paul Ave								
877	St. Paul Ave								
885	St. Paul Ave								
897	St. Paul Ave								
2040	W Saunders Ave								
901	St. Paul Ave								
919	St. Paul Ave								
931	St. Paul Ave								
2023	W Montreal Ave								
2025	W Montreal Ave								
2031	W Montreal Ave								
2033	W Montreal Ave								
2035	W Montreal Ave								
2037	W Montreal Ave								
2039	W Montreal Ave								
2041	W Montreal Ave								
2043	W Montreal Ave								
2045	W Montreal Ave								
2047	W Montreal Ave								
1025	Cleveland Ave S								
1031	Colby St								
1019	Colby St								
1020	Colby St								
1019	S Finn St								
1020	S Finn St								
1019	S Bowdoin St								
1020	S Bowdoin St								
1025	S Bowdoin St								
1044	S Bowdoin St								
1050	S Bowdoin St								
1056	S Bowdoin St								
1062	S Bowdoin St								
1067	S Bowdoin St								
1073	S Bowdoin St								
1074	S Bowdoin St								
2235	W Pinehurst Ave								
2236	W Pinehurst Ave								
2232	W Pinehurst Ave								
2226	W Pinehurst Ave								
2221	W Pinehurst Ave								
2212	W Pinehurst Ave								



Table 1. Receptor Survey Properties Located Within 500 Feet of the Ford Plant Twin Cities Assembly Plant, St. Paul, Minnesota

House	<b>‡</b>	Street Address
Connect	ed to City Water, Didn't Respor	d to Survey
2209	W Pinehurst Ave	
2208	W Pinehurst Ave	
2199	W Pinehurst Ave	
2194	W Pinehurst Ave	
2186	W Pinehurst Ave	
2180	W Pinehurst Ave	
2175	W Pinehurst Ave	
2174	W Pinehurst Ave	
2170	W Pinehurst Ave	
2171	W Pinehurst Ave	
2162	W Pinehurst Ave	
2166	W Pinehurst Ave	
2163	W Pinehurst Ave	
2154	W Pinehurst Ave	
2150	W Pinehurst Ave	
2147	W Pinehurst Ave	
2143	W Pinehurst Ave	
2136	W Pinehurst Ave	
2139	W Pinehurst Ave	
2135	W Pinehurst Ave	
2130	W Pinehurst Ave	
2114	W Pinehurst Ave	
2200	W Pinehurst Ave	
2191	W Pinehurst Ave	
2052	W Saunders Ave	
2054	W Saunders Ave	
2056	W Saunders Ave	
2058	W Saunders Ave	
930	Cleveland Ave S	
932	Cleveland Ave S	
934	Cleveland Ave S	
936	Cleveland Ave S	
938	Cleveland Ave S	
940	Cleveland Ave S	
942	Cleveland Ave S	
948	Cleveland Ave S	
950	Cleveland Ave S	
952	Cleveland Ave S	
954	Cleveland Ave S	
956	Cleveland Ave S	
958	Cleveland Ave S	
2057	W Montreal Ave	
2055	W Montreal Ave	
2053	W Montreal Ave	



Table 1. Receptor Survey Properties Located Within 500 Feet of the Ford Plant Twin Cities Assembly Plant, St. Paul, Minnesota

House #	Street Address							
Connected to City Water, Didn't Respond to Survey								
2051	W Montreal Ave							
2020	W Montreal Ave							
2026	W Montreal Ave							
2028	W Montreal Ave							
2032	W Montreal Ave							
2034	W Montreal Ave							
2036	W Montreal Ave							
2038	W Montreal Ave							
2040	W Montreal Ave							
2042	W Montreal Ave							
2044	W Montreal Ave W Montreal Ave							
2052								
970 974	Cleveland Ave S Cleveland Ave S							
974 976	Cleveland Ave S							
978	Cleveland Ave S							
988	Cleveland Ave S							
990	Cleveland Ave S							
1000	Cleveland Ave S							
2052	Yorkshire Ave							
2053	Yorkshire Ave							
2047	Yorkshire Ave							
2048	Yorkshire Ave							
2040	Yorkshire Ave							
2037	Yorkshire Ave							
2028	Yorkshire Ave							
2031	Yorkshire Ave							
2034	Yorkshire Ave							
4	Villard Ct							
7	Villard Ct							
1036	Cleveland Ave S							
1038	Cleveland Ave S							
1040	Cleveland Ave S							
1042	Cleveland Ave S							
1034	Cleveland Ave S							
	ed to City Water, Didn't Respond to Survey							
2100	Ford Pkwy							
2112A	Ford Pkwy							
2110	Ford Pkwy							
2110	Ford Pkwy							
2112	Ford Pkwy							
2114	Ford Pkwy							
2116	Ford Pkwy							



Table 1. Receptor Survey Properties Located Within 500 Feet of the Ford Plant Twin Cities Assembly Plant, St. Paul, Minnesota

House	¥	Street Address						
Connected to City Water, Didn't Respond to Survey								
2120	Ford Pkwy							
2128	Ford Pkwy							
2144	Ford Pkwy							
2142	Ford Pkwy							
2136A	Ford Pkwy							
2136B	Ford Pkwy							
2134	Ford Pkwy							
2132	Ford Pkwy							
2130	Ford Pkwy							
2155	Ford Pkwy							
2145	Ford Pkwy							
2111	Ford Pkwy							
2221	Ford Pkwy							
749	Mt Curve Blvd							
751	Mt Curve Blvd							
752	Mt Curve Blvd							
760	Mt Curve Blvd							

### Notes:

All properties in survey area were confirmed to be on city water from the City of St. Paul.



Table 2. Receptor Survey Wells with 0.5 Mile Radius from the Ford Plant Twin Cities Assembly Plant, St. Paul, Minnesota

Unique Well Number	Date Installed	Total Depth (ft bgs)	Casing Diameter & Length (ft bgs)	Screen Length (feet)	Geologic Material Screened Across (ft bgs)	Well Use	Direction From Plant
200435	8/1/1959	458	10 inch to 258	200	Prarie Du Chien-Jordan	Commercial	North
223849	11/21/1967	230	4 inch to 115	Open Hole 115-230	Sandstone	Domestic	Southwest
233274	1/1/1953	441	15 inch to 251	Open Hole from 190-251	Sandrock	Commercial	On Property
251257	N/A	459	8 inch to 266	Open Hole from 266-458	Sandstone	Air Conditioning	East
487652	5/6/1991	10	10 inch to 5	2	Gravel / Shale	MW	On Property
487653	5/6/1991	6	8 inch to 5	2	Silty Sand / Shale	MW	On Property
487654	5/6/1991	6	9 inch to 5	2	Gravel / Shale	MW	On Property
553802	3/1/1995	22	16 inch to 21	-	Shale	Elevator	North
553803	1/31/1900	31	14 inch to 31	-	Limestone	Elevator	North
563078	4/18/1996	14	2 inch to 14	10	Shale / Limestone	MW	East
578611	4/30/1996	36	4 inch to 25	Open Hole from 25-36	Limestone	MW	Southwest
578612	4/30/1996	32	4 inch to 23	Open Hole from 23-32	Limestone	MW	Southwest
578613	4/30/1996	31	4 inch to 22.9	Open Hole from 22.9-31	Limestone	MW	Southwest
582992	8/28/1996	108	2 inch to 88	15	St. Peter	MW	South
592310	12/17/1996	39	2 inch to 26	10	Sand / Limestone	MW	Southwest
592311	12/18/1996	38	2 inch to 22.5	10	Sand / Limestone	MW	Southwest
592312	12/19/1996	35	2 inch to 22.5	10	Sand, Gravel / Limestone	MW	Southwest
594122	3/5/1997	40	2 inch to 28.5	10	Sand / Limestone	MW	Southwest
602126	4/14/1998	40	16 inch to 40	-	Shale	Elevator	On Property
602127	11/20/1998	40	16 inch to 39	-	Sandstone	Elevator	On Property
609761	4/15/1998	20	-	-	Limestone	Elevator	On Property
625005	2/21/2000	10	2 inch to 4.6	5	Limestone	MW	West
625006	2/20/2000	38	2 inch to 17.5	20	Limestone	MW	West
625007	2/27/2000	8	2 inch to 5.5	2.5	Sand and Sandy clay	MW	West
625008	2/21/2000	37	2 inch to 15	20	Limestone	MW	West
625009	2/22/2000	8	2 inch to 5.2	2.5	Sand and Gravel / Limestone	MW	West
625010	2/22/2000	35	2 inch to 13	20	Limestone	MW	West
643465	3/16/2000	34	2 inch to 34	10	Sand	MW	Southwest
663722	8/30/2001	28	16 inch to 28	-	Sand	Elevator	East

See Notes on Page 2.



Table 2. Receptor Survey Wells with 0.5 Mile Radius from the Ford Plant Twin Cities Assembly Plant, St. Paul, Minnesota

Unique Well Number	Date Installed	Total Depth (ft bgs)	Casing Diameter & Length (ft bgs)	Screen Length (feet)	Geologic Material Screened Across (ft bgs)	Well Use	Direction From Plant
673159	11/30/2001	37	20 inch to 37	<u>-</u>	Shale	Elevator	East
726112	7/13/2005	26	20 inch to 24	-	Sand	Elevator	East
751320	6/13/2007	185	2 inch to 180	10	Bedrock	MW	On Property
751330	7/4/2007	43	2 inch to 30	10	Limestone / Shale	MW	On Property
751331	7/4/2007	43	2 inch to 30	10	Limestone	MW	On Property
751332	11/7/2007	151	2 inch to 141	10	Sandstone	MW	East
751333	7/11/2007	40	2 inch to 30	10	Limestone	MW	On Property
751334	7/11/2007	61	2 inch to 50	10	Limestone / Shale	MW	On Property
751335	7/11/2007	95	2 inch to 79	10	Limestone	MW	South
751336	7/11/2007	48	2 inch to 35	10	Limestone / Shale	MW	South
751337	7/11/2007	42	2 inch to 29	10	Limestone	MW	On Property
751338	7/11/2007	45	2 inch to 35	10	Fill / Sandstone	MW	South
751339	7/11/2007	29	2 inch to 19	10	Fill / Shale / Sandstone	MW	On Property
756581	7/19/2007	55	2 inch to 44	10	Sandstone	MW	On Property
756582	7/20/2007	40	2 inch to 30	10	Limestone	MW	On Property

Notes:

ft bgs Feet below ground surface.

MW Monitoring well.

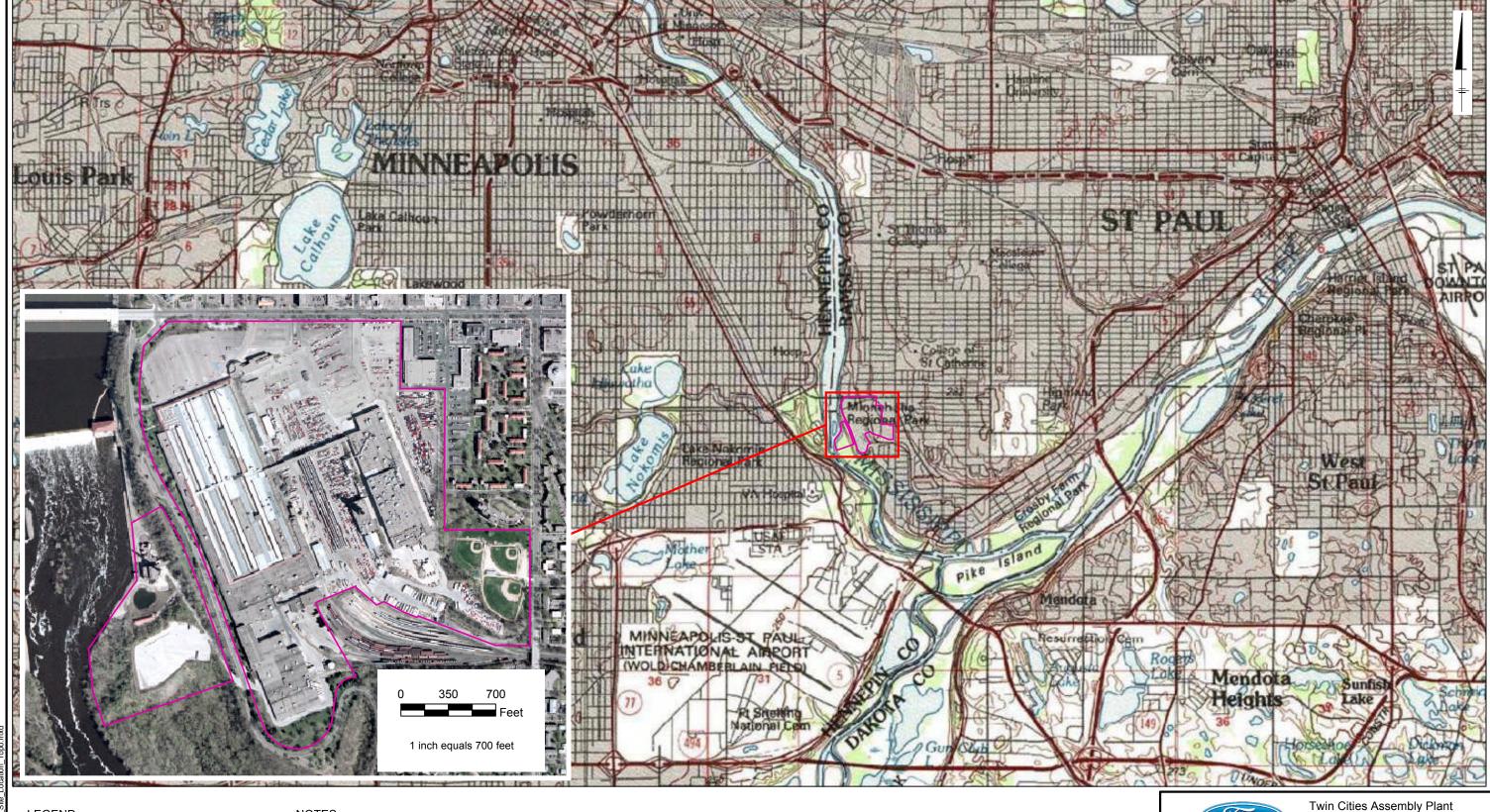
N/A Data not available.

Not applicable.

A well was noted from a receptor survey response at 2218 Pinehurst Ave, but no Minnesota Department of Health record could be found.



Figures



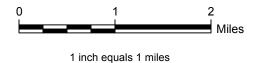
LEGEND:

Ford Property Boundary

NOTES:

Imagery Source: United States Geological Survey High Resolution Orthoimagery for the Minneapolis-St. Paul, Minnesota Urban Area

Topographic Map Source: © 2007 National Geographic Society



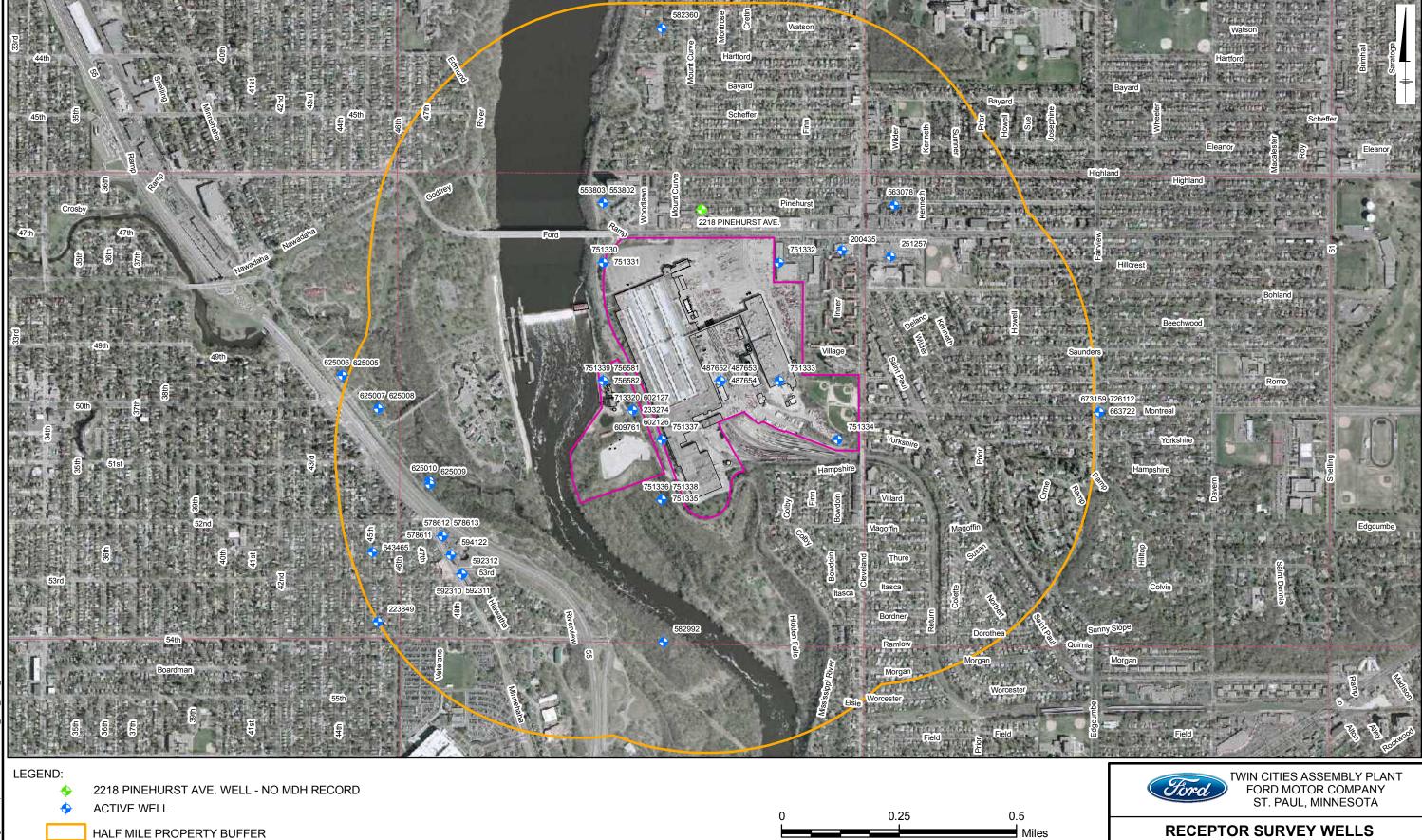


Twin Cities Assembly Plant Ford Motor Company St. Paul, Minnesota

**Site Location / Property Layout** 



**FIGURE** 



PLS SECTION LINE

FORD PROPERTY BOUNDARY

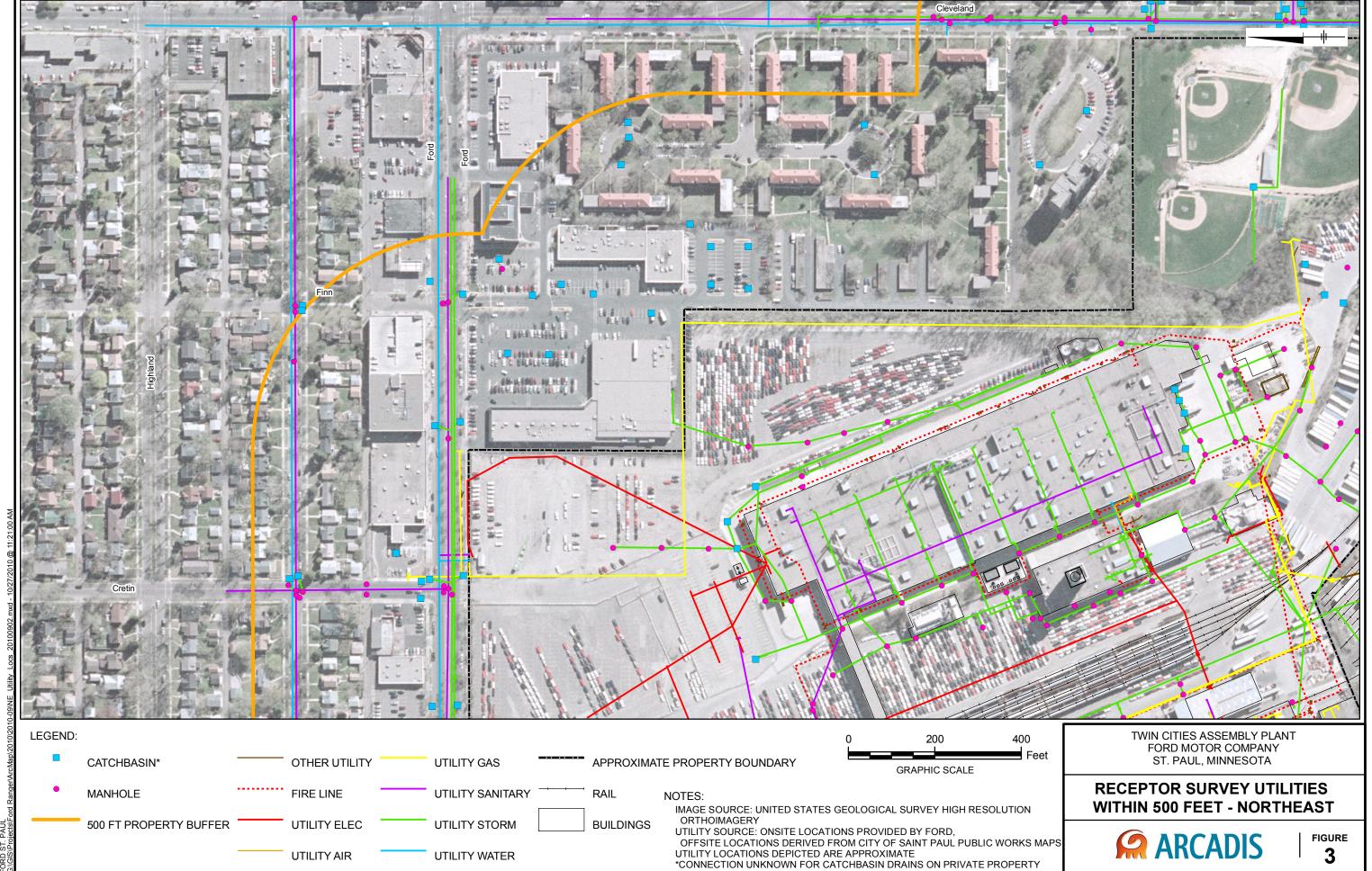
MDH - MINNESOTA DEPARTMENT OF HEALTH

NOTES:

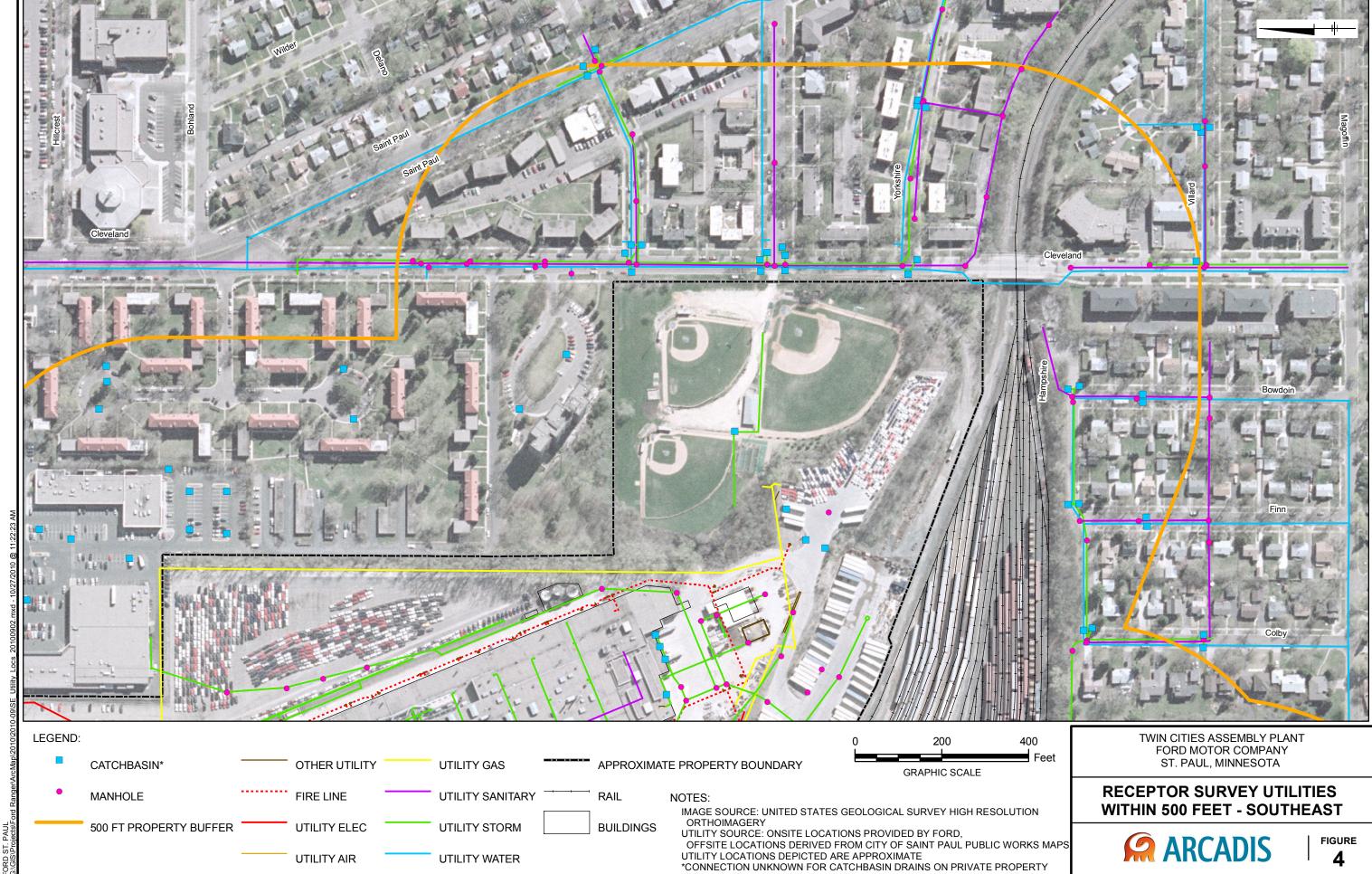
IMAGE SOURCE: UNITED STATES GEOLOGICAL SURVEY HIGH RESOLUTION ORTHOIMAGERY

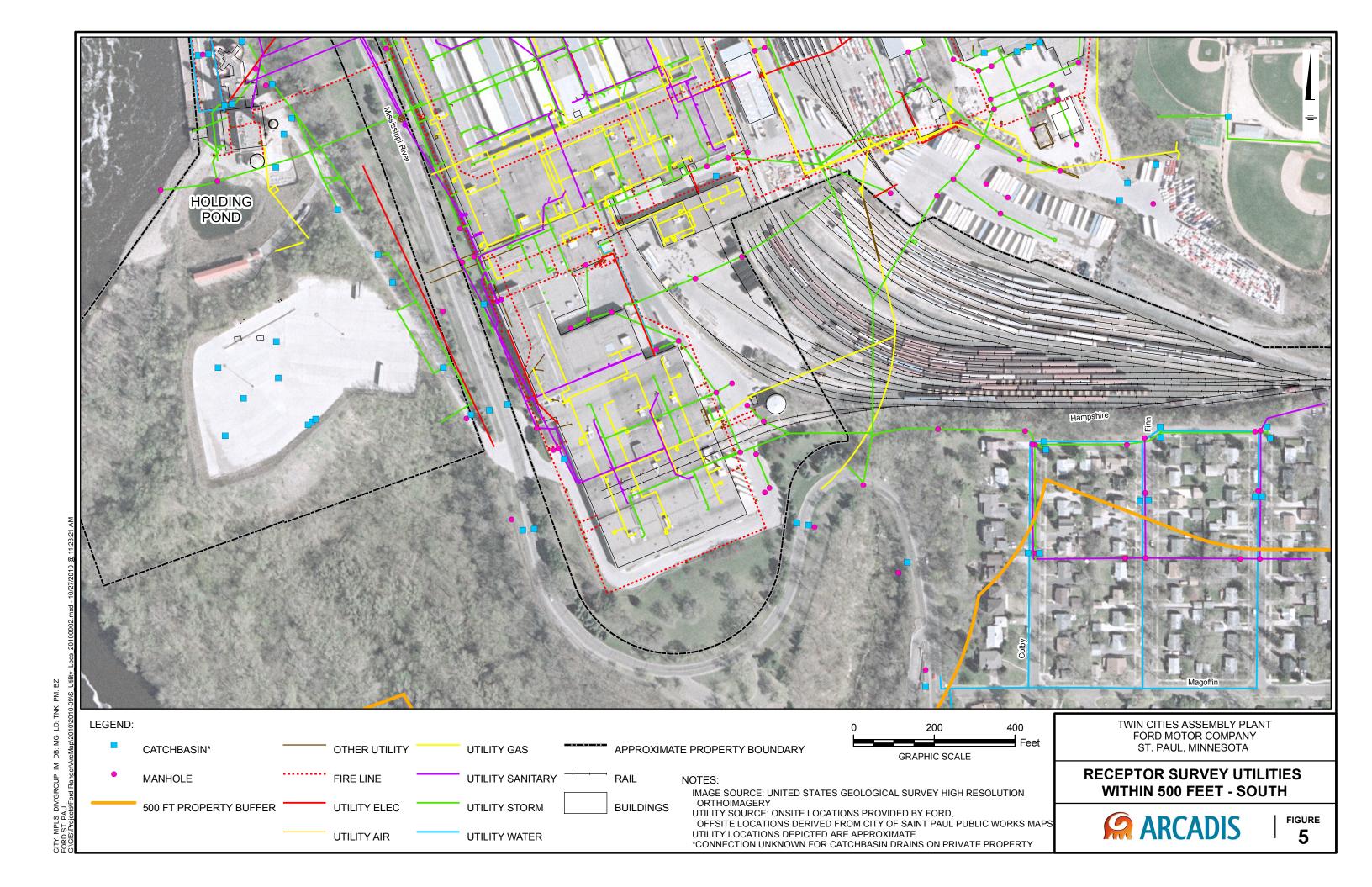
**RECEPTOR SURVEY WELLS WITHIN 0.5 MILE RADIUS** 





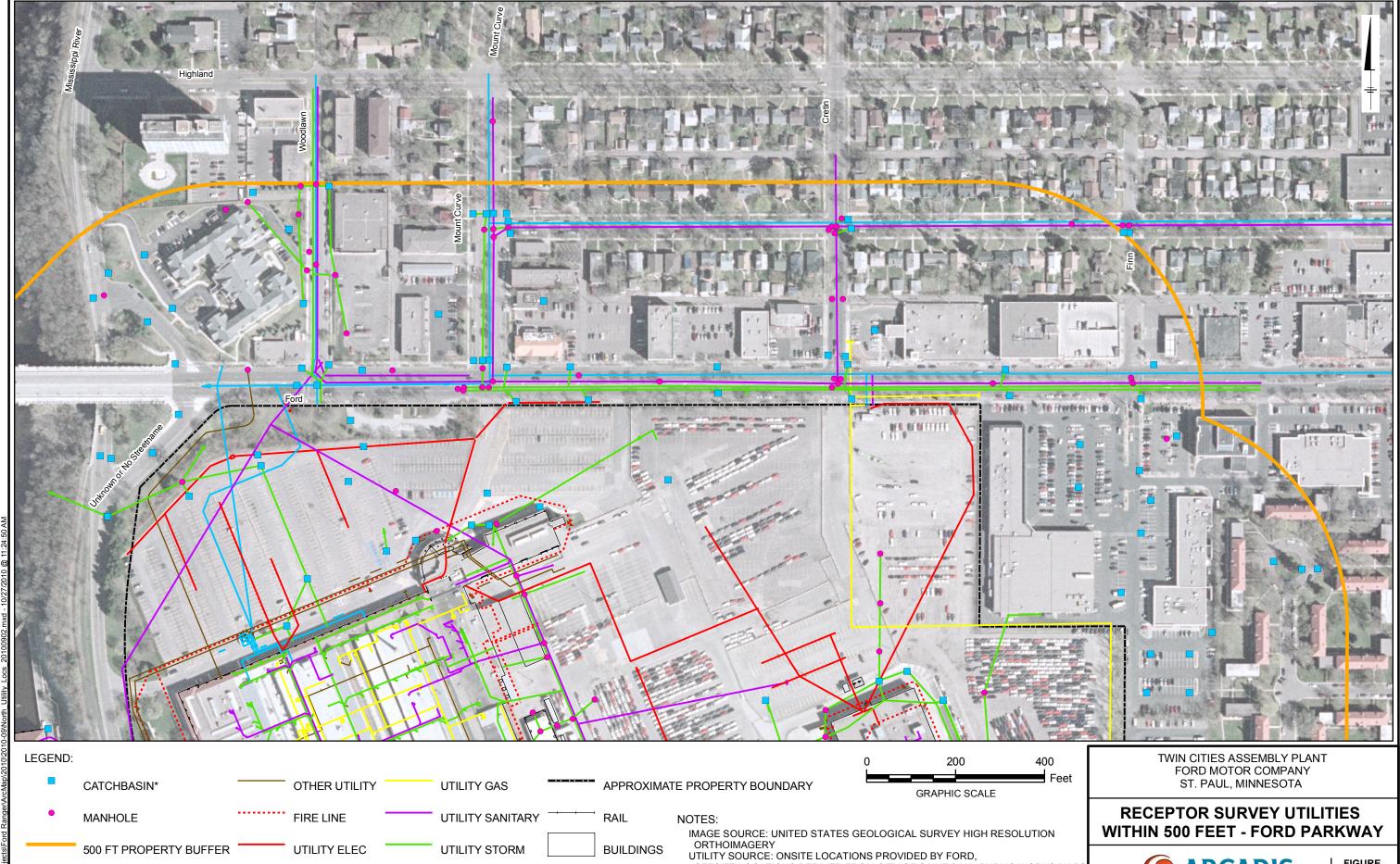
CITY: MPLS DIV/GROUP: IM DB: MG LD: TNK PM: BZ







CITY: MPLS DIV/GROUP: IM DB: MG LD: TNK PM: BZ



500 FT PROPERTY BUFFER

UTILITY ELEC

UTILITY AIR

**UTILITY STORM** 

**UTILITY WATER** 

BUILDINGS

OFFSITE LOCATIONS DERIVED FROM CITY OF SAINT PAUL PUBLIC WORKS MAPS

\*CONNECTION UNKNOWN FOR CATCHBASIN DRAINS ON PRIVATE PROPERTY

UTILITY LOCATIONS DEPICTED ARE APPROXIMATE

**ARCADIS** 



## Appendix A

Well & Boring Records

Minnesota Unique Well No.		MINNESOTA DEPARTMENT OF HEALTH WELL AND RODING Entry Date 08/14/1991				
<b>200435</b>	County Ramse Quad St Pau Quad ID 103B	ey Il West		WELL AND B	D Re	date Date 10/16/2008 ceived Date
Well Name POWERS-HIGHLAND PAR Township Range Dir Section Subsect		857 ft.		Minnesota Statutes C Well Depth 458 ft.	Depth Completed 458 ft.	Date Well Completed 08/00/1959
28 23 W 17 AADABO	Elevation Meth	7.5 minut od topograp (+/- 5 fee	hic map	Drilling Method		
Well Address CLEVELAND/FORD PK ST PAUL MN				Drilling Fluid Use Commercial	Well Hydrofracture From Ft. to Ft.	d? Yes No
Geological Material	Color Hai	0	3		Information Drive Sh	noe? Yes
SOAPSTONE PLATTEVILLE LIMEROCK ST. PETER SANDROCK SHAKOPEE JORDAN ST. LAWRENCE SHALE		3 50 91 242 371 454	50 91 242 371 454 458	Casing Diameter  16 in. to 6 ft.  10 in. to 258 ft.	Weight lbs./fi	
on Diviniance of the				Open Hole from ft. to Screen Make Type		
				Diameter Slo	ot/Gauze L	ength Set Between
				Static Water Level 126.9 ft. from Land surface	ce Date Measured	04/24/1991
				PUMPING LEVEL (below I 148 ft. after hrs. pumpir		
				Well Head Completion Pitless adapter manufacture Casing Protection At-grade (Environmer	12 in. above gra	
<b>REMARKS</b> CASING: 016 TO 0006;010 TO 0258.				Grouting Information W		Yes No
Located by: Minnesota Geological M Survey (C Unique Number Verification: N/A	igitizing Table)		er			
System: UTM - Nad83, Zone15, Meters	485139 <b>Y:</b> 49737	91		Nearest Known Source of _feetdirectiontype Well disinfected upon com		No
					led Date Installed IBANKS-MORSE	Model number <u>AZB 1336</u> Type <u>Turbine</u> Material
						in use and not sealed well(s)?
First Radrock Decerate				Variance Was a variance well Contractor Certificat		H for this well? Yes N
	Aquifer Prairie Du C			Keys Well Co.	me Lie	Or Reg. No. Name of Driller

200435

Printed 5/27/2010 HE-01205-07

**County Well Index Online Report** 

Minnesota Unique Well No.

223849

County Quad Quad ID Hennepin St Paul West 103B

# MINNESOTA DEPARTMENT OF HEALTH WELL AND BORING RECORD

Minnesota Statutes Chapter 1031

Entry Date Update Date Received Date 08/24/1991 06/28/2000

Well Name DONALD NITZ	Wall Davids Davids Completed Date Wall Completed				
Township Range Dir Section Subsections Elevation 830 ft.	Well Depth Depth Completed Date Well Completed				
7.5 minute tonographic r	230 ft. 230 ft. 11/21/1967				
28 23 W 18 DDDDBC Elevation Method (+/- 5 feet)	Drilling Method				
Well Address 5337 45TH AV S MINNEAPOLIS MN	Drilling Fluid Well Hydrofractured? Yes No From Ft. to Ft.				
	Use Domestic				
Geological Material Color Hardness From To	Casing Type Joint No Information Drive Shoe? Yes No Above/Below 0 ft.				
CLAY YELLOW 0 63 CLAY BLUE 63 11	Casing Diameter Weight Hole Diameter				
LIME & SHALE 112 13 SANDROCK 130 23					
	Open Hole from 115 ft. to 230 ft.				
	Screen NO Make Type				
	Diameter Slot/Gauze Length Set Between				
	Static Water Level 115 ft. from Land surface Date Measured 11/21/1967				
	PUMPING LEVEL (below land surface)				
	ft. after hrs. pumping g.p.m.				
	Well Head Completion Pitless adapter manufacturer Model Casing Protection 12 in. above grade				
	At-grade (Environmental Wells and Borings ONLY)				
NO REMARKS  Located by: Minnesota Geological Survey  Method: Digitized - scale 1:24,000 or larger (Digitizing Table)	Grouting Information Well Grouted? Yes No				
Unique Number Verification: Address verification Input Date: 01/01/1990	Nearest Known Source of Contamination				
System: UTM - Nad83, Zone15, Meters X: 483548 Y: 4972519	feetdirectiontype				
	Well disinfected upon completion? Yes No  Pump Not Installed Date Installed  Manufacturer's name Model number HP Volts  Length of drop Pipe _ft. Capacity _g.p.m Type Material				
	Abandoned Wells Does property have any not in use and not sealed well(s)? Yes No				
	Variance Was a variance granted from the MDH for this well?				
	Well Contractor Certification				
First Bedrock St.Peter Aquifer St.Peter	Dependable Well Co. 27143				
Last Strat St. Peter Depth to Bedrock 130 ft.	License Business Name Lic. Or Reg. No. Name of Driller				
County Well Index Online Report	223849 Printed 8/9/2010 HE-01205-07				

Minnesota Uni		County Quad Quad ID	Ramsey St Paul West 103B			MINNESOTA DEPARTME WELL AND B RECOR Minnesota Statutes C	ORING D Chapter 1031	Entry Date Update Date Received Date	08/14/1991 06/03/2004
Well Name CUT P	RICE STORE					Well Depth	Depth Comple	eted Da	te Well Completed
Township Range				ft.		441 ft.	441 ft.		195301
28 23	W 17	Elevati	on Method			Drilling Method			
Well Address ST PAUL MN						Drilling Fluid	Well Hydrofrac		☐ No
011710211111						Use			
Geological Mat PIT SOAPSTONE LIMEROCK	terial	Color	Hardness	From 0 15 61	<b>To</b> 15 61 96	Casing Type Joint No No Above/Below ft. Casing Diameter	Information Drive		es
SOAPSTONE SANDROCK				96 101	101 190	16 in. to 20 ft.	lbs./f	t. 12 in.	to 170 ft.
SANDROCK &	SHALE			190	256	15 in. to 251 ft.	lbs./f	t.	
SHAKOPEE				256 380	380 441	Open Hole from ft. to	ft.		
SANDROCK				300	441	Screen Make Typ	е		
						Diameter SI	ot/Gauze	Length :	Set Between
						Static Water Level	Data Massacra	1 105001	
						PUMPING LEVEL (below 117 ft. after 2 hrs. pump	land surface)	195301	
						117 It. aitel 2 1113. pulli	oning ooo g.p.m.		
						Well Head Completion Pitless adapter manufacture	er Model		
						Casing Protection	12 in. abov	e grade	
						At-grade (Environme	ntal Wells and Bo	rings ONLY)	
REMARKS DEPTH OF HOLE	FROM TOP OF P	IPE IS 426' 2".				Grouting Information W		Yes No	
						Nearest Known Source of _feetdirectiontype			
						Well disinfected upon com	pletion?	Yes No	
						Pump Not Instal Manufacturer's name JOH Length of drop Pipe ft.		del number <u>93684</u>	0 HP <u>30</u> Volts <u>220</u> ine Material
						Abandoned Wells Does p	property have any	not in use and not	sealed well(s)?
						Yes No			
						Variance Was a variance		MDH for this well?	Yes No
First Dodes de						Well Contractor Certificat	tion		
First Bedrock		Aquifer				Linner Dunings No		Lie Or Don Ma	Name of Driller
Last Strat		Depth to Bedr	ock ft.			License Business Na	ane	Lic. Or Reg. No.	Name of Diller

233274

**County Well Index Online Report** 

Printed 5/27/2010

HE-01205-07

Minnesota Unique Well No.

251257

County Quad Quad ID Ramsey St Paul East 103A

# MINNESOTA DEPARTMENT OF HEALTH WELL AND BORING RECORD

Minnesota Statutes Chapter 1031

Entry Date Update Date Received Date 02/21/1997 02/21/1997

Well Name HIGHLAND DRUG					Well Depth		Depth Completed	Date Wel	I Completed
Township Range Dir Section Subsections Elevat	Township Range Dir Section Subsections Elevation 864 ft. 7.5 minute topographic ma				459 ft. 458 ft.				
28 23 W 16 BBCBDA Elevat	ion Method	/.5 minute (+/- 5 feet)		пс тар	Drilling Method				
Well Address FORD PK ST PAUL MN					Drilling Fluid Use Air Conditioning		Well Hydrofractured?	Yes No	
L			_	_					
<b>Geological Material</b>   BASEMENT   DECORAH SHALE	Color H	ardness	<b>From</b> 0 12	<b>To</b> 12 64	Casing Type Steel (b No Above/Below 0 ft		w carbon) Joint No Inform		
PLATTEVILLE LIMESTONE			64	90	Casing Diameter		Weight	Hole Diame	eter
GLENWOOD SHALE   ST. PETER SANDSTONE   PRAIRIE DU CHIEN GROUP			90 97 259	97 259 380	8 in. to 266 f	ft.	lbs./ft.		
JORDAN SANDSTONE			380	459	Open Hole from 266	ft. to	458 ft.		
					Screen NO Make				
					Diameter	Slo	t/Gauze Leng	gth Set Be	tween
					Static Water Level	uface Da	ate Measured 02/21/1997		
					PUMPING LEVEL (below land surface) ft. after hrs. pumping g.p.m.				
					π. aπer nrs. pump	oing g.p	ı.m.		
					Well Head Completion Pitless adapter manufa	acturer	Model		
					Casing Protection		12 in. above grade		
REMARKS				_	At-grade (Enviror	nmental V	Wells and Borings ONLY)		
GAMMA LOGGED 2-21-1997.					Grouting Information	Well G	routed? Yes	No	
	Method: Did	gitization (Scree	en) - Map						
Located by: Minnesota Geological Survey	(1:24,000)		.,						
Unique Number Verification: Information from owner	Input Date:	03/08/2002			Nearest Known Source	ce of Cor	ntamination		
System: UTM - Nad83, Zone15, Meters	X: 485306	<b>Y</b> : 4973770			_feet _direction _t		, and the same of		
					Well disinfected upon	completio	on? Yes N	No	
					Pump Not Ir		Date Installed		
					Manufacturer's name Length of drop Pipe		del numberHP <u>0</u> Vo acity_g.p.m Type Ma	olts aterial	
							erty have any not in use and		Yes
					No				
							ted from the MDH for this we	ell? Yes	No
Borehole Geophysics Yes					Well Contractor Certi			1100	
First Bedrock Decorah	Aquifer Mul				Minnesota Geo	_		MGS Or Reg. No.	Name of Driller
Last Strat Jordan	Depth to Bed				License Bus		ine Lic. C		
County Well Index Online Report				251257	7			Printed 8/9/2010 HE-01205-07	

Minnesota Unique Well No.  County Ramsey Quad	MINNESOTA DEPARTMEN WELL AND BO	/ 0.07/0.00
407032 Quad ID	RECORI Minnesota Statutes Ch	Received Date
Well Name	Well Depth	Depth Completed Date Well Completed
Township Range Dir Section Subsections Elevation ft.	10 ft.	5 ft. 05/06/1991
28 23 W 17 ACD Elevation Method	Drilling Method Hollow Ster	m Auger
Well Address 966 MISSISSIPPI RIVER BL S ST PAUL MN 55116	**	Well Hydrofractured? Yes No From Ft. to Ft.
	Use Monitor well	
Geological MaterialColorHardnessFrom ToCONCRETE01CL-LEAN CLAY FIRM12	Casing Type Stainless Stee No Above/Below 3 ft.	el Joint Unknown Drive Shoe? Yes
SP-POORLY GRADED SAND LOOSE BROWN 1 1 1 GC-GRAVEL MEDIUM DENSE GREEN 2 4 SHALE LT. GRN 4 10	Casing Diameter 2 in. to 3 ft.	Weight Hole Diameter  Ibs./ft. 10 in. to 5 ft.
	Open Hole from ft. to	ft
	Screen YES Make JOH	
	Diameter Slot/G 2 10	Sauze Length Set Between 2 3 ft. and 5 ft.
	Static Water Level 2 ft. from Land surface D	
	PUMPING LEVEL (below late ft. after hrs. pumping	
	Well Head Completion Pitless adapter manufacturer Casing Protection	***
NO REMARKS	Grouting Information Wel	oll Grouted? Yes No
	Grout Material: Neat C	Cement from 0 to 2 ft.
	Grout Material: Renton	
	Nearest Known Source of C _feet _direction _type Well disinfected upon compl	
		ed Date Installed Model number HP _ Volts Capacity _g.p.m Type Material
	,	roperty have any not in use and not sealed well(s)?
	Yes No	
		ranted from the MDH for this well? Yes No
First Bedrock	Well Contractor Certification	on M0059
Aquifer Last Strat Depth to Bedrock ft.	<u>Braun Eng Testing</u> License Business Nam	
County Well Index Online Report	487652	Printed 5/27/2010 HE-01205-07

Minnesota Unique Well No.  County Ramsey Quad Quad ID	WELL AND BORING Entry Date 12/27/2002 Update Date 03/31/2008 Received Date
	Minnesota Statutes Chapter 1031
Well Name MW-5, FORD MOTOR CO.	Well Depth Depth Completed Date Well Completed
Township Range Dir Section Subsections Elevation ft, 28 23 W 17 ACD Elevation Method	6 ft. 5 ft. 05/06/1991
28 23 W 17 ACD Elevation Method	Drilling Method Hollow Stem Auger
Well Address 966 MISSISSIPPI RIVER BL S ST PAUL MN 55116	Drilling Fluid Well Hydrofractured? Yes No From Ft. to Ft.
	Use Monitor well
Geological MaterialColorHardnessFrom TourismCONCRETE01BITUMINOUS AGGREGATE12	Casing Type Steel (black or low carbon) Joint Unknown Drive Shoe?   ✓ No Above/Below 3 ft.
SM-SILTY SAND MED-DENSE BROWN 2 4	
SHALE LT. BRN 4 6	Casing Diameter Weight Hole Diameter  2 in. to 2.5 ft.   lbs./ft. 8 in. to 5 ft.
	Open Hole from ft. to ft.
	Screen YES Make JOHNSON Type stainless steel
	Diameter Slot/Gauze Length Set Between 2 10 2 2.5 ft. and 4.5 ft.
	Static Water Level ft. from Date Measured
	PUMPING LEVEL (below land surface) ft. after hrs. pumping g.p.m.
	Well Head Completion Pitless adapter manufacturer Model Casing Protection 12 in. above grade At-grade (Environmental Wells and Borings ONLY)
REMARKS MW-5	Grouting Information Well Grouted? ✓ Yes No
MONITORING WELL CONVERTED FROM ABOVE GRADE TO AT GRADE	
COMPLETION BY BRAUN INTERTEC CORP. 11/23/93	Grout Material: Neat Cement from 0 to 1.5 ft.
#M0109	Grout Material: Bentonite from 1.5 to 2 ft.
	Nearest Known Source of Contamination
	_feet _direction _type
	Well disinfected upon completion? Yes No
	Pump
	Abandoned Wells Does property have any not in use and not sealed well(s)?
	Yes No
	Variance Was a variance granted from the MDH for this well? Yes No
First Bedrock	Well Contractor Certification
Last Strat Depth to Bedrock ft.	Braun Eng Testing M0059  License Business Name Lic. Or Reg. No. Name of Driller
County Well Index Online Report	487653 Printed 5/27/2010 HE-01205-07

Minnesota Unique Well No.  County Ramsey Quad Quad ID	MINNESOTA DEPARTMENT OF HEALTH  WELL AND BORING  RECORD  Minnesota Statutes Chapter 1031  Entry Date Update Date Received Date						
Well Name MW-6, FORD MOTOR CO.	Well Depth Depth Completed Date Well Completed						
Township Range Dir Section Subsections Elevation ft.  28 23 W 17 ACD Elevation Method	6 ft. 5 ft. 05/06/1991						
	Drilling Method Hollow Stem Auger						
Well Address 966 MISSISSIPPI RIVER BL S ST PAUL MN 55116	Drilling Fluid Well Hydrofractured? Yes No From Ft. to Ft.						
	Use Monitor well						
Geological Material Color Hardness From To CONCRETE 0 1 GM-GRAVEL MEDIUM DENSE 1 1 1 1	Casing Type Steel (black or low carbon) Joint Unknown Drive Shoe?						
GC-GRAVEL 1 4 SHALE 4 6	Casing Diameter Weight Hole Diameter 2 in. to 3 ft.   lbs./ft. 9 in. to 5 ft.						
	Open Hole from ft. to ft.						
	Screen YES Make JOHNSON Type stainless steel  Diameter Slot/Gauze Length Set Between 2 10 2 3 ft. and 5 ft.						
	Static Water Level ft, from Date Measured						
	PUMPING LEVEL (below land surface) ft. after hrs. pumping g.p.m.						
	Well Head Completion Pitless adapter manufacturer Model						
	Casing Protection 12 in, above grade						
REMARKS	At-grade (Environmental Wells and Borings ONLY)						
MW-6	Grouting Information Well Grouted? Yes No						
MONITORING WELL CONVERTED FROM ABOVE GRADE TO AT GRADE COMPLETION	Grout Material: Neat Cement from 0 to 1.5 ft.						
BY BRAUN INTERTEC CORP. 11/23/93 #M0109	Crout Material. Neat Oction						
1110100	Grout Material: Bentonite from 1.5 to 2.5 π.						
	Nearest Known Source of Contamination						
	_feet _direction _type  Well disinfected upon completion?  Yes  No						
	Pump     Not Installed     Not Installed       Manufacturer's name     Model number     HP     Volts       Length of drop Pipe     ft.     Capacity     g.p.m     Type     Material						
	Abandoned Wells Does property have any not in use and not sealed well(s)?						
	Yes No						
	Variance Was a variance granted from the MDH for this well? Yes No						
Plant Budanala	Well Contractor Certification						
First Bedrock Aquifer Last Strat Depth to Bedrock ft.	Braun Eng Testing M0059  License Business Name Lic. Or Reg. No. Name of Driller						
County Well Index Online Report	487654 Printed 5/27/2010 HE-01205-07						

553802	County Quad Quad ID	Ramsey St Paul West 103B			WELL AND B RECOR Minnesota Statutes Co	ORING Entry Da Update D Received	Date 05/09/2007
Well Name SCHUSTER, TONY					Well Depth	Depth Completed	Date Well Completed
Township Range Dir Section Subse			ft.		22 ft.	21 ft.	03/01/1995
28 23 W 17 BAA	Elevat	ion Method			Drilling Method Cable Too		
Well Address 750 MISSISSIPPI RIVER BL SAINT PAUL MN					Drilling Fluid 	Well Hydrofractured?	Yes No
G/					Use Elevator		
Geological Material LIMESTONE CLAY	Color GRAY GRAY	Hardness HARD MEDIUM	<b>From</b> 0 0	<b>To</b> 22 6	Casing Type Steel (black of Yes No Above/Below		led Drive Shoe?
SHALE	GRAY	HARD	6	9	Casing Diameter	Weight	Hole Diameter
					20 in. to 10 ft.	52.73 lbs./ft. 62.58 lbs./ft.	20 in. to 22 ft.
					16 in, to 21 ft.  Open Hole from ft. to	ft.	
					Screen Make Type		
					Diameter Sid	ot/Gauze Lengt	h Set Between
					Static Water Level	1	
					ft. from Date Measured PUMPING LEVEL (below la	and surface)	
					ft. after hrs. pumping	g.p.m.	
					Well Head Completion Pitless adapter manufacture	r Model	
					Casing Protection	12 in. above grade	
					At-grade (Environmen	tal Wells and Borings ONL	()
REMARKS PIT IS 4' BELOW GRADE.					Grouting Information We	ell Grouted? Yes	No
					Grout Material: Neat (	Dement from 0	to 22 ft. 16 bags
					Nearest Known Source offeetdirectiontype		
					Well disinfected upon comp		] No
					Pump Not Installe	ed Date Installed	
					Manufacturer's name Length of drop Pipe _ft. (	Model number HP _ Capacity _g.p.m Type	Volts Material
					Abandoned Wells Does pr	roperty have any not in use	and not sealed well(s)?
					Yes No		
					Variance Was a variance of		is well? Yes No
First Bedrock					Well Contractor Certificati Midwest Drilling	ion L0002	STANGRET, J.
,	Aquifer Depth to Bed	rock ft.			License Business Nar		
County Well Index	x Onlin	e Report	t		553802		Printed 5/27/2010 HE-01205-07

Minnesota Unique Well No.	County	Ramsey			MINNESOTA DEPARTMENT WELL AND B		Entry Date	06/18/1996
553803	Quad Quad ID	St Paul West 103B			RECORD Update Date 05/09/2			
				_	Minnesota Statutes Ci			
Well Name SCHUSTER, TONY					Well Depth	Depth Comple	eted Dat	e Well Completed
Township Range Dir Section Subsection Subsec		ion ion Method	ft.		31 ft.	30 ft.		05/19/1995
				_	Drilling Method Cable Too			
Well Address 750 MISSISSIPPI RIVER BL SAINT PAUL MN					Drilling Fluid	Well Hydrofrac From Ft. to Ft.		∟ No
					Use Elevator			
Geological Material SHALE LIMESTONE	Color GRAY GRAY	Hardness MEDIUM HARD	0	<b>To</b> 10 31	Casing Type Steel (black of Yes No Above/Below		oint Welded Driv	e Shoe?
					Casing Diameter	Weight	Hole	Diameter
					20 in. to 3 ft.	52.73 lbs	s./ft. 20	in. to 31 ft.
					14 in. to 30 ft.	54.57 lbs	s./ft, in.	to ft.
					Open Hole from ft. to Screen Make Type	ft.		
					,,	ot/Gauze	Length S	et Between
					Static Water Level ft. from Date Measured	1		
					PUMPING LEVEL (below la	and surface)		
					Well Head Completion			
					Pitless adapter manufacture  Casing Protection	r Model  12 in. above	grado	
					At-grade (Environmen	_	•	
REMARKS					Grouting Information We		Yes No	
PIT IS 10' BELOW GRADE.					Grouting information we	sii Grouted: 💽	163 [] 140	
					Grout Material: Neat (	Cement	from 0 to 31	ft. 32 bags
								-
					Nearest Known Source of feetdirectiontype	Contamination		
					Well disinfected upon comp	oletion?	Yes No	
					Pump Not Installe	ed Date Installed	1	
					Manufacturer's name Length of drop Pipe _ft. (	Model number _ Capacity q.p.m	_ HP _ Volts Type Materia	
					Abandoned Wells Does pr			
					Yes No			
					Variance Was a variance g		ADH for this well?	Yes No
First Bedrock					Well Contractor Certificati	ion	1,0003	STANGRET, B.
, A	Aquifer Depth to Bedr	rock ft.			<u>Midwest Drilling</u> License Business Nar	ne L	<u>L0002</u> ic. Or Reg. No.	Name of Driller
County Well Index	•		;		553803			Printed 5/27/2010 HE-01205-07

Minnesota Unique Well No.

563078

Ramsey

County

Quad ID

Quad

MINNESOTA DEPARTMENT OF HEALTH
WELL AND BORING RECORD

Minnesota Statutes Chapter 1031

Entry Date Update Date Received Date 03/31/2008 04/07/2008 06/07/1996

Well Name MW-4 VALVOLINE CO.				Well Depth	Depth Completed	Date Well Completed		
Township Range Dir Section Subsections 28 23 W 16 BBB	Elevation Elevation Method	ft.		14 ft.	14 ft.	04/18/1996		
	FIGABLION METUO	4		Drilling Method Auger (non-sp				
Well Address 726 CLEVELAND AV S ST PAUL MN				Drilling Fluid 	Well Hydrofractured? From Ft. to Ft.	Yes No		
				Use Monitor well				
Geological Material TOPSOIL SAND, GRAVEL	Color BLACK BROWN	Hardness SOFT SOFT	<b>To</b> 1 9	Casing Type Plastic Joint N ft.				
SHALE, LIMESTONE CHUNKS	GREEN	HARD	14	Casing Diameter		lole Diameter		
				2 in. to 4 ft.	lbs./ft.	8 in. to 14 ft.		
				Open Hole from ft. to ft				
				Screen YES Make TIMCC	Type plastic			
				Diameter Slot/G 2 10		at Between 4 ft. and 14 ft.		
				Static Water Level				
				11.2 ft. from Land surface [				
				PUMPING LEVEL (below land ft. after hrs. pumping g.p.	surface) o.m.			
				Well Head Completion Pitless adapter manufacturer	Model			
				Casing Protection Y	12 in. above grade			
.1				At-grade (Environmental	Wells and Borings ONLY)			
NO RE	MARKS			Grouting Information Well Grouted?  Yes  No				
				Grout Material: Bentonite from 1 to 3 ft.				
				Negroot Known Course of Co	ntamination			
				Nearest Known Source of Contamination _feet _direction _type				
				Well disinfected upon completion? Yes V No				
				Pump Not Installed Date Installed				
				Manufacturer's name Mo Length of drop Pipe _ft. Cap	odel number HP Volts pacity _g.p.m Type Mate	rial		
				Abandoned Wells Does propo	- VI			
				Variance Was a variance gran	nted from the MDH for this well	Yes No		
First Padagab				Well Contractor Certification		AICANTS T		
First Bedrock Aquifer Last Strat Deoth to				Stevens Well Co. License Business Nam	<u>27194</u> ne Lic. Or Reg			
County Well Index Onlin	ne Repor	rt		563078		Printed 10/14/2010 HE-01205-07		

Minnesota Unique Well No. 04/14/2009 **Entry Date** County Hennepin WELL AND BORING 578611 Update Date 04/14/2009 Quad RECORD **Received Date Quad ID** Minnesota Statutes Chapter 1031 Well Depth Depth Completed **Date Well Completed** Well Name MW-1 04/30/1996 Township Range Dir Section Subsections Elevation ft. 36 ft. 36 ft. 23 W 17 CCB Elevation Method Drilling Method Multiple methods used Well Address **Drilling Fluid** Well Hydrofractured? 5247 MINNEHAHA AV From Ft. to Ft. MINNEAPOLIS MN Use Monitor well Casing Type Steel (black or low carbon) Joint No Information Drive Shoe? Geological Material Hardness From To Color GRASS, SANDY SILTY CLAY **BROWN** Yes Mo Above/Below BROWN MEDIUM 9 SAND BROWN MEDIUM SAND/CLAY 9 11 Hole Diameter Weight **Casing Diameter** SAND BROWN MEDIUM 11 14 MEDIUM-COARSE GRAVELY SAND **BROWN** 19 19.25 in. to 36 ft. lbs./ft. 4 in. to 25 ft. **BROWN** 19 21 GRAVELY SAND, WET 21 LIMESTONE Open Hole from 25 ft. to 36 ft. Screen NO Make Type Slot/Gauze Set Between Diameter Length Static Water Level 22.3 ft. from Land surface Date Measured 04/30/1996 PUMPING LEVEL (below land surface) ft. after hrs. pumping g.p.m. Well Head Completion Model Pitless adapter manufacturer ✓ Casing Protection Y ✓ 12 in. above grade At-grade (Environmental Wells and Borings ONLY) ✓ Yes Grouting Information Well Grouted? NO REMARKS from to 25 ft. Grout Material: Neat Cement **Nearest Known Source of Contamination** feet \_direction \_type Well disinfected upon completion? Pump Not Installed Date Installed Model number \_ Manufacturer's name Length of drop Pipe ft. Capacity g.p.m Type Material Abandoned Wells Does property have any not in use and not sealed well(s)? **✓** No Variance Was a variance granted from the MDH for this well? Yes Well Contractor Certification HERRBOLDT, N. First Bedrock Thein Well Co. 34050 Aquifer Name of Driller **Last Strat** License Business Name Lic. Or Reg. No. Depth to Bedrock ft.

578611

MINNESOTA DEPARTMENT OF HEALTH

Printed 5/27/2010

HE-01205-07

County Well Index Online Report

Minnesota Unique Well No. 578612	County H Quad Quad ID	Hennepin			MINNESOTA DEPARTMEI WELL AND B RECORI Minnesota Statutes CI	ORING D	Entry Date Update Date Received Date	04/15/2009 04/15/2009
Well Name MW-2					Well Depth	Depth Complet	ted Date	Well Completed
Township Range Dir Section Subs		ft.			32 ft.	32 ft.		04/30/1996
28 23 W 17 CCB	Elevation	Method			Drilling Method Auger (non	n-specified)		
<b>Well Address</b> 5247 MINNEHAHA AV MINNEAPOLIS MN					Drilling Fluid	Well Hydrofracti From Ft. to Ft.	ured? Yes	No
Coolerinal Material	Calaa	Usadasas	F	т.	Use Monitor well			Di alua 🗔
Geological Material GRASS SAND DEBRIS	Color BROWN	Hardness	0	<b>To</b> 4	Casing Type Steel (black of Yes  Mo Above/Below	·	oint No Information	Drive Snoe?
SAND FINE SAND	BROWN BROWN	MEDIUM MEDIUM		9 14		Weight	Hole Diame	otor
SAND WET SAND ROCK LIMESTONE	BROWN	MEDIUM	14 19 20	19 20 32	Casing Diameter 4 in. to 23 ft.	lbs./ft.		o 32 ft.
						32 ft.		
					Screen NO Make Ty	ype		
					Diameter Slo	ot/Gauze	Length S	et Between
					Static Water Level	B	0.1/0.0/1.000	
					18.8 ft. from Land surface Date Measured 04/30/1996  PUMPING LEVEL (below land surface)			
					ft. after hrs. pumping g.p.m.			
					Well Head Completion Pitless adapter manufacture			
					Casing Protection Y			
			_	_	At-grade (Environmen			
N	O REMARKS				Grouting Information We	ell Grouted?	Yes No	
					Grout Material: Neat 0	Dement	from t	o 23 ft.
					Nearest Known Source of Contamination _feet _directiontype			
					Well disinfected upon completion?			
					Pump Not Installe Manufacturer's name Length of drop Pipe _ft. (	ed Date Installed Model number	_ HP _ Volts Type _ Material	
					Abandoned Wells Does property have any not in use and not sealed well(s)?  Yes   No			
					Variance Was a variance g		DH for this well?	Yes V No
First Bedrock					Well Contractor Certificati Thein Well Co.	on	34050	HERRBOLDT, N.
Last Strat	Aquifer Depth to Bedrock	c ft.			License Business Nam	ne Lic.	Or Reg. No.	Name of Driller
County Well Inde	•				578612			Printed 5/27/2010 HE-01205-07

Minnesota Unique Well No. 578613			WELL AND BORING Entry Date 04/16/2009 Update Date 04/16/2009						
370013	Quad Quad ID				RECORI Minnesota Statutes Ci	The second secon	Received Date		
Well Name MW-3					Well Depth	Depth Complet	ted Date	Well Completed	
Township Range Dir Section Subsec	tions Elevation	ft,			31 ft.	31 ft.		04/30/1996	
28 23 W 17 CCB	Elevation Met	hod			Drilling Method Multiple me	ethods used			
Well Address					Drilling Fluid	Well Hydrofractu	ured? Yes	No	
5247 MINNEHAHA AV MINNEAPOLIS MN					**	From Ft. to Ft.			
					Use Monitor well				
Geological Material CONCRETE GRAVELY CLAY	Color BROWN	Hardness	-	4	Casing Type Steel (black of		int No Information	Drive Shoe?	
SAND SAND GRAVELY		MEDIUM MEDIUM		11 14	Yes V No Above/Below				
MEDIUM-COARSE SAND	BROWN	III LB I GIII	14	19	Casing Diameter	Weight	Hole Diam		
WET GRAVELY SAND ROCK LIMESTONE				21 31	4 in. to 22.9 ft.	lbs./ft.	10.25 in.	to 31 ft.	
					Open Hole from 22.9 ft.	to 31 ft.			
						уре			
					Diameter Slo	ot/Gauze	Length S	et Between	
					Static Water Level 16.2 ft. from Land surface	Date Measured	04/30/1996		
					PUMPING LEVEL (below la	and surface)	0 11001 1000		
					ft. after hrs. pumping	g.p.m.			
					Well Head Completion				
					Pitless adapter manufacture				
					Casing Protection	12 in. above			
					At-grade (Environmen				
NO	REMARKS				Grouting Information We	ell Grouted?	Yes No		
					Grout Material: Neat 0	Cement	from to	22.9 ft.	
					Name of King Co.	Oantami-atlas			
					Nearest Known Source of Contamination _feet _direction _type				
					Well disinfected upon completion? Yes Vo				
					Pump Not Installed Date Installed				
I					Manufacturer's name Model number HP _ Volts				
				-	Length of drop Pipe _ft. (		Type Materia	[]	
					Abandoned Wells Does property have any not in use and not sealed well(s)?				
					Yes 🗹 No				
					Variance Was a variance of		DH for this well?	Yes You	
First Bedrock					Well Contractor Certificati Thein Well Co.	ΙΟΠ	34050	HERRBOLDT, N.	
P	\quifer Depth to Bedrock f	t.			License Business Nam	ne Lic.	Or Reg. No.	Name of Driller	
County Well Index Online Report					578613			Printed 5/27/2010 HE-01205-07	

Minnesota Unique Well No.		0			MINNESOTA DEPARTME		Fata Data	
582992	County Quad	Hennepin St Paul West			WELL AND B		Entry Date Update Date	04/27/2010
	Quad ID	103B			Minnesota Statutes 0		Received Date	
Well Name MW-2B					Well Depth	Depth Comple	eted Date	e Well Completed
Township Range Dir Section Subse	ctions Elevatio	on	780 ft.		108 ft.	98 ft.		08/28/1996
28 23 W 17 DCCD0	CC Elevation	on Method	7.5 minute topographi (+/- 5 feet)	ic map	Drilling Method Auger (no	n-specified)		
Well Address 54TH ST MINNEAPOLIS MN					Drilling Fluid	Well Hydrofract From Ft. to Ft.		No
					Use Monitor well			
Geological Material TOPSOIL	Cole	or Hardness	From 0	<b>To</b> 3	Casing Type Steel (black	or low carbon) Jo	oint Threaded Dr	ive Shoe?
WEATHERED BEDROCK		HARD	3 5	5 18	Yes 🗹 No Above/Belo	w ft.		
PLATTEVILLE FORMATION GLEN FORMATION		HARD HARD	18	22	Casing Diameter	Weight	Hole Dia	meter
ST. PETER		HARD	22	108	2 in. to 88 ft.	lbs./ft.	. 7.62 in	. to 5 ft.
							4 in. to	6 ft.
					Open Hole from ft. to			
					Screen YES Make JC	HNSON Type	stainless steel	
					Diameter Slot/6 2 10	Gauze Leng 15	th Set Betwe 83 ft.	<b>en</b> and 98 ft.
					Static Water Level 88 ft. from Land surface	Data Magaurad	00/20/1006	
					PUMPING LEVEL (below		06/26/1990	
					Well Head Completion Pitless adapter manufacture ✓ Casing Protection Y	er Model  12 in. abo	ve grade	
					At-grade (Environme	ntal Wells and Bor	ings ONLY)	
NO	REMARK	S			Grouting Information W	'ell Grouted?	Yes No	
			<i>(</i> 2 ) .		Grout Material: Neat	Cement	from t	o 77 ft.
Located by: Minnesota Geological S		hod: Digitization 4,000)	(Screen) - N	лар				
Unique Number Verification: Info/G data source	iPS from Inpu	ut Date: 04/27/20	10		Nearest Known Source of	Contamination		
System: UTM - Nad83, Zone15, Met	ers X: 4	184527 <b>Y</b> : 4972	450		feetdirectiontype Well disinfected upon com	pletion?	Yes 🔽 No	
					Pump Not Instal Manufacturer's name Length of drop Pipe _ft.	led Date Installed Model number _ Capacity _g.p.m		 
					Abandoned Wells Does p	property have any r	not in use and not s	ealed well(s)?
					Variance Was a variance	granted from the N	IDH for this well?	Yes 🗹 No
					Well Contractor Certificat			
First Bedrock	Aquifer				W.t.d. Environment		27653	EINUM, J.
	Depth to Bedro	ock ft.			License Business Na	me L	ic. Or Reg. No.	Name of Driller
County Well Index	c Online	e Report			582992			Printed 5/27/2010 HE-01205-07

Minnesota Unique Well No.  County Quad Quad ID  Hennepin	WELL AND BORING RECORD  Minnesota Statutes Chapter 1031  Entry Date Update Date Received Date  04/16/2009  04/16/2009
Well Name MW-1	Well Depth Depth Completed Date Well Completed
Township Range Dir Section Subsections Elevation ft.	39 ft. 36 ft. 12/17/1996
28 23 W 17 CCD Elevation Method	Drilling Method Auger (non-specified)
Well Address 5371 MINNEHAHA AV MINNEAPOLIS MN	Drilling Fluid  Well Hydrofractured? Yes No From Ft. to Ft.  Use Monitor well
Geological Material Color HardnessFromTo LOOSE SAND/SILTY CLAY BROWN SOFT 0 2 LOOSE SAND BROWN 2 13	Casing Type Steel (black or low carbon) Joint Threaded Drive Shoe?
SILTY CLAY BRN/GRYSOFT 13 23 LOOSE SAND, FINE- MEDIUM BROWN 23 27	Casing Diameter Weight Hole Diameter
MED DENSE-LOOSE COARSE SAND BROWN 27 34	2 in. to 26 ft. 3.65 lbs./ft. 10 in. to 34 ft.
LIMESTONE GRAY 34 39	6 in. to 39 ft.
	Open Hole         from ft.         to ft.           Screen YES         Make         Type plastic
	Diameter Slot/Gauze Length Set Between 2 10 10 26 ft. and 36 ft.
	Static Water Level
	29.5 ft. from Land surface Date Measured 12/17/1996  PUMPING LEVEL (below land surface)
	ft. after hrs. pumping g.p.m.
	Well Head Completion Pitless adapter manufacturer Model
	Casing Protection Y 12 in. above grade
	At-grade (Environmental Wells and Borings ONLY)
NO REMARKS	Grouting Information Well Grouted?  Yes  No
	Grout Material: Neat Cement from to 24 ft. 5 bags
	Nearest Known Source of Contamination
	_feet _direction _type  Well disinfected upon completion?  Yes  No
	Trois distinction apply completion.
	Pump Not Installed Date Installed  Manufacturer's name Model number HP Volts  Length of drop Pipe _ft. Capacity _g.p.m Type Material
	Abandoned Wells Does property have any not in use and not sealed well(s)? ☐ Yes ☑ No
	Variance Was a variance granted from the MDH for this well?
	Well Contractor Certification
First Bedrock Aquifer	Bergerson-Caswell 27058 HOLMEN, G.
Last Strat Depth to Bedrock ft.	License Business Name Lic. Or Reg. No. Name of Driller
County Well Index Online Report	<b>592310</b> Printed 5/27/2010 HE-01205-07

Minnesota Unique Well No.  592311  County Quad Quad ID  Hennepin	MINNESOTA DEPARTMENT OF HEALTH  WELL AND BORING  RECORD  Minnesota Statutes Chapter 1031  Entry Date Update Date O4/16/2009 Received Date
Well Name MW-2	Well Depth Depth Completed Date Well Completed
Township Range Dir Section Subsections Elevation ft.	38 ft. 32.5 ft. 12/18/1996
28 23 W 17 CCD Elevation Method	Drilling Method Multiple methods used
Well Address 5371 MINNEHAHA AV MINNEAPOLIS MN	Drilling Fluid Well Hydrofractured? Yes No From Ft. to Ft.
Geological Material Color Hardness From To	Use Monitor well  Casing Type Steel (black or low carbon) Joint Threaded Drive Shoe?
LOOSE FINE SAND BROWN 0 9 SILTY CLAY GRAY SOFT 9 18	Yes 🗹 No Above/Below ft.
MED. DENSE-LOOSE SAND W/GRAVEL BROWN MEDIUM 18 29 LIMESTONE GRAY 29 38	Casing Diameter Weight Hole Diameter
	2 in. to 22.5 ft. 3.65 lbs./ft. 10 in. to 29 ft. 6 in. to 38 ft.
	Open Hole from ft. to ft.
	Screen YES Make Type plastic
	Diameter Slot/Gauze Length Set Between 2 10 10 22.5 ft. and 32.5 ft.
	Static Water Level 25.2 ft. from Land surface Date Measured 12/18/1996
	PUMPING LEVEL (below land surface) ft. after hrs. pumping g.p.m.
	Well Head Completion Pitless adapter manufacturer Model
	Casing Protection Y 12 in. above grade
	At-grade (Environmental Wells and Borings ONLY)
NO REMARKS	Grouting Information Well Grouted? Yes No
	Grout Material: Neat Cement from to 20.5 ft. 5 bags
	Nearest Known Source of Contaminationfeetdirectiontype
	Well disinfected upon completion? Yes You No
	Pump Not Installed Date Installed
	Manufacturer's name Model number HP Volts  Length of drop Pipe ft. Capacity _g.p.m Type Material
	Abandoned Wells Does property have any not in use and not sealed well(s)?   Yes ✓ No
	Variance Was a variance granted from the MDH for this well?
Fire Parkers	Well Contractor Certification
First Bedrock Aquifer Last Strat Depth to Bedrock ft.	Bergerson-Caswell 27058 HOLMEN, G.  License Business Name Lic. Or Reg. No. Name of Driller
County Well Index Online Report	<b>592311</b> Printed 5/27/2010 HE-01205-07

592312 County Hennepin Quad ID	WELL AND BORING RECORD  Minnesota Statutes Chapter 103I  Entry Date Update Date Update Date Received Date
Well Name MW-3	Well Depth Depth Completed Date Well Completed
Township Range Dir Section Subsections Elevation ft.	35 ft. 32.5 ft. 12/19/1996
28 23 W 17 CCD Elevation Method	Drilling Method Multiple methods used
Well Address 5371 MINNEHAHA AV MINNEAPOLIS MN	Drilling Fluid Well Hydrofractured? Yes No From Ft. to Ft.
	Use Monitor well
Geological Material         Color         Hardness         From To           LOOSE FINE SAND         BROWN         0         13           LOOSE SILTY SAND         GRAY         13         18	Casing Type Steel (black or low carbon) Joint Threaded Drive Shoe? ☐ Yes ☑ No Above/Below ft.
LOOSE TO MED. DENSE SAND BROWN MEDIUM 18 28 DENSE SAND/GRAVEL BROWN 28 29	Casing Diameter Weight Hole Diameter
LIMESTONE GRAY 29 35	2 in. to 22.5 ft. 3.65 lbs./ft. 10 in. to 29 ft.
	6 in. to 35 ft.
	Open Hole from ft. to ft.
	Screen YES Make Type plastic
	Diameter Slot/Gauze Length Set Between 2 10 10 22.5 ft. and 32,5 ft.
	Static Water Level
	25.5 ft. from Land surface Date Measured 12/19/1996  PUMPING LEVEL (below land surface)
	ft. after hrs. pumping g.p.m.
	Well Head Completion Pitless adapter manufacturer Model  ✓ Casing Protection Y ✓ 12 in. above grade  At-grade (Environmental Wells and Borings ONLY)
NO REMARKS	Grouting Information Well Grouted? ✓ Yes No
	Grout Material: Neat Cement from to 20.5 ft. 5 bags
	Nearest Known Source of Contamination
	feetdirectiontype  Well disinfected upon completion?
	Well disinfected upon completion? Yes Y No
	Pump       Not Installed         Manufacturer's name       Model number HP Volts         Length of drop Pipe _ft.       Capacity _g.p.m Type Material
	Abandoned Wells Does property have any not in use and not sealed well(s)?
	Yes ☑ No
	Variance Was a variance granted from the MDH for this well? Yes V
	Well Contractor Certification
First Bedrock Aquifer	Bergerson-Caswell 27058 HOLMEN, G.
Last Strat Depth to Bedrock ft.	License Business Name Lic. Or Reg. No. Name of Driller
County Well Index Online Report	<b>592312</b> Printed 5/27/2010 HE-01205-07

Minnesota Unique Well No.	. O	Hanania				MINNESOTA DEPARTME		Entry Date		
594122	County Quad	Hennepin				WELL AND B		Update Date	04/16/200	09
UJTILL	Quad ID					RECOR		Received Date		
					Т	Minnesota Statutes C Well Depth	Depth Compl	eted Dat	e Well Complete	ed ed
Well Name MW-4 Township Range Dir Section Subse	ctions Flevat	ion	ft.		-	·	38.5 ft.	cica bai	03/05/1997	-
28 23 W 17 CDC		ion Method	14.		ŀ	40 ft.				
				_	+	Drilling Method Auger (no				_
Well Address 5271 MINNEHAHA AV					-1	Drilling Fluid	Well Hydrofrac		No	
MINNEAPOLIS MN 55417					ŀ	Use Monitor well	From Ft. to Ft			_
					. ŀ					
Geological Material LOOSE FINE SAND		Color BROWN	Hardness	0 1	121	Casing Type Steel (black		Joint Threaded Di	rive Shoe?	7
LOOSE FINE SILTY SAND		<b>BROWN</b>				Yes Mo Above/Belo	w ft.			
LOOSE FINE SAND LOOSE FINE SAND		BROWN GRAY			16 18	Casing Diameter	Weight	Hole	e Diameter	
LOOSE FINE SILTY SAND		GRAY		18 2	20	2 in. to 28.5 ft.	3.65 lb	os./ft. 8	in. to 38 ft.	
FIRM SILTY CLAY   LOOSE-MED. DENSE FINE-M	IED SAND	GRAY BROWN			22 32			4	in. to 40 ft.	
MED. DENSE COARSE SAND		BROWN		32 3	34	Open Hole from ft. to	ft.			
BEDROCK LIMESTONE		WHT/GRY		34 4	<sup>40</sup>	Screen YES Make	Type plastic			
					-1	Diameter Slot/Ga	auze Lengti	h Set Between	1	
					-1	2 10	10		and 38.5 ft.	
					-					
					1					
					ſ	Static Water Level	85 p. 14	1 00/05/4007		
					ŀ	31.5 ft. from Land surface PUMPING LEVEL (below		10 03/05/1997		
					ı	ft. after hrs. pumping				
						Well Head Completion				
					-	Pitless adapter manufacture	er Model			
					١	Casing Protection Y	✓ 12 in. abo	ove grade		
					١	At-grade (Environme				
					┥		-	5 5		
	REMAR	KS			١	Grouting Information W	/ell Grouted?	Yes No		
					١					
					١	Grout Material: Neat	Cement	from to 24.5	i ft. 10	bags
					١					
					١					
					Ì	Nearest Known Source of				
					١	feetdirectiontype				
					١	Well disinfected upon com	pletion?	Yes 🛂 No		
					١	Pump Not instal	lled Date Installe			
					١	Manufacturer's name Length of drop Pipe _ft.	Model number		al	
					$\dashv$					
						Abandoned Wells Does p	oropeπy nave any	not in use and not	sealed well(s)?	
						Yes 🛂 No				
						Variance Was a variance	granted from the	MDH for this well?	Yes	<b>✓</b> No
					1	Well Contractor Certificat	tion			
First Bedrock	Aquifer					Bergerson-Caswe	_	27058	HOLMEN	
	Depth to Bed	rock ft.				License Business Na	ame	Lic. Or Reg. No.	Name of D	)riller

594122

Printed 5/27/2010 HE-01205-07

**County Well Index Online Report** 

Minnesota Unique Well No.	1 Onumber	l lannania			MINNESOTA DEPARTMENT OF HEALTH  WELL AND RODING Entry Date 11/20/1998
602126	County Quad	Hennepin St Paul West			Update Date 09/08/2006
	Quad ID	103B			RECORD Received Date Minnesota Statutes Chapter 103I
Well Name VETERANS HOME-MPL	8				Well Depth Depth Completed Date Well Completed
Township Range Dir Section Subs		n ft.			40 ft. 39 ft. 04/14/1998
28 23 W 17	Elevation	n Method			Drilling Method Cable Tool
Well Address					Drilling Fluid Well Hydrofractured? Yes No
5101 MINNEHAHA AV S MINNEAPOLIS MN 55417					From Ft. to Ft.
					Use Elevator
Geological Material SHALE LIMESTONE LIMESTONE	Color BLU/GRY GRAY	<b>Hardness</b> HARD HARD	<b>From</b> 0 20	<b>To</b> 20 35	Casing Type Mixed Completion Joint Welded Drive Shoe?   Yes   No Above/Below ft.
SANDSTONE - SHALE	GRAY	HARD	35	40	Casing Diameter Weight Hole Diameter
					24 in. to 11 ft. 63,41 lbs./ft.
					16 in. to 40 ft. 15.6 lbs./ft.
					Open Hole from ft. to ft.
					Screen Make Type
					Diameter Slot/Gauze Length Set Between
					Static Water Level
					6 ft. from Land surface Date Measured 04/14/1998
					PUMPING LEVEL (below land surface) ft. after hrs. pumping g.p.m.
					Well Head Completion
					Pitless adapter manufacturer Model
					Casing Protection 12 in. above grade
					At-grade (Environmental Wells and Borings ONLY)
REMARKS PIT FLOOR 6' BELOW GRADE					Grouting Information Well Grouted?  Yes  No
					Grout Material: Neat Cement from to 40 ft. 30 bags
					Grout Waterial. Near cerifori
					Nearest Known Source of Contaminationfeetdirectiontype
					Well disinfected upon completion? Yes No
					Pump Not Installed Date Installed
_					Manufacturer's name Model number HP Volts Length of drop Pipe _ft. Capacity _g.p.m Type Material
					Abandoned Wells Does property have any not in use and not sealed well(s)?
					Yes No
					Variance Was a variance granted from the MDH for this well? Yes No
Flori Parkersk					Well Contractor Certification
First Bedrock	Aquifer	4			Midwest Drilling L0004 FULTON, W.  License Business Name Lic. Or Reg. No. Name of Driller
Last Strat	Depth to Bedro			_	
<b>County Well Inde</b>	x Online	Report			602126 Printed 5/27/2010

**County Well Index Online Report** 

Minnesota Unique Well No.					MINNESOTA DEPARTME		Entry Data	11/20/1998
602127	County Quad	Hennepin Hopkins			WELL AND B		Entry Date Update Date	09/08/2006
002121	Quad ID	104B			RECOR		Received Date	
			_		Minnesota Statutes ( Well Depth	Depth Compl	eted Date	Well Completed
Well Name VETERANS HOMES-M Township Range Dir Section Subs		on ft.			·	40 ft.	eicu baic	03/30/1998
28 23 W 17		on Method			40 ft.			00/00/1000
			_	_	Drilling Method Cable Too			
Well Address 5101 MINNEHAHA AV S					Drilling Fluid	Well Hydrofrac		☐ No
MINNEAPOLIS MN 55417					Use Elevator	From Ft. to Ft		
Geological Material CLAY	<b>Color</b> GRAY	Hardness SOFT	From 0	<b>To</b> 3	Casing Type Mixed Comp	pletion <b>Joint</b> We	elded Drive Shoe?	✓ Yes
LIMEROCK - SHALE	BLU/GRY GRAY	HARD HARD	3 20	20 34	Casing Diameter	Weight	Но	le Diameter
LIMESTONE SANDSTONE	GRAY	MEDIUM	34	40	20 in. to 13 ft.	52.73	lhs./ft.	
				l l		62.58		
					16 in. to 39 ft.  Open Hole from ft. to			
					Screen Make Typ			
					Diameter SI	ot/Gauze	Length Se	et Between
					Diameter Si	OuGauze	Length 3	st Detween
					Static Water Level			
					6 ft. from Land surface PUMPING LEVEL (below		03/30/1998	
					ft. after hrs. pumping			
					Well Head Completion			
					Pitless adapter manufactur	rer Model		
					Casing Protection	12 in. abov	e grade	
					At-grade (Environme	ental Wells and Bo	rings ONLY)	
REMARKS			_				Yes No	
PIT FLOOR 6' BELOW STREET					Grouting Information W	vell Grouteu?	Y TES LINU	
							from to 20	# 00 1
					Grout Material: Neat	Cement	from to 39	ft. 30 bags
					Nearest Known Source offeetdirectiontype			
					Well disinfected upon com	npletion?	Yes No	
					Pump Not Insta	lled Date Installe	d	
					Manufacturer's name	Model number	HP _ Volts	
				-	Length of drop Pipe _ft.  Abandoned Wells Does			
						property nave any	not in use and not s	oalou won(o):
					Yes No			
					Variance Was a variance		MDH for this well?	Yes No
					Well Contractor Certifica		1.0004	EU TON W
First Bedrock	Aquiter				Midwest Drilling		L0004	FULTON, W.
Last Strat	Depth to Bedr	ock ft.			License Business Na	ame	Lic. Or Reg. No.	Name of Driller

602127

Printed 5/27/2010

HE-01205-07

Minnesota Unique Well No.					MINNESOTA DEPARTME			44/00/4000
609761	County Quad	Ramsey			WELL AND B		Entry Date Update Date	11/20/1998 06/23/2004
003701	Quad ID				RECOR		Received Date	
				_	Minnesota Statutes C	Depth Comp	lated Do	te Well Completed
Well Name DEPT OF ADMINISTRA		on ft.			Well Depth	18 ft.	ieleu Da	04/15/1998
Township Range Dir Section Subs 28 23 W 17		on Method			20 ft.			04/15/1990
				_	Drilling Method Cable Too			
Well Address 966 MISSISSIPPI BL S ST PAUL MN 55116					Drilling Fluid 	Well Hydrofrac From Ft. to F	ctured?	No
					Use Elevator			
Geological Material CLAY SHALE	Color BROWN BLU/GRY	Hardness SOFT MEDIUM	From 0 9	<b>To</b> 9 12	Casing Type Steel (black of Yes No Above/Below		Joint Welded Dri	ve Shoe?
LIMESTONE	GRAY	HARD	12	20			1	lole Diameter
					Casing Diameter	Weight		iole Diameter
					20 in. to 12 ft.	42.05		
					16 in. to 18 ft.	62.58	lbs./ft.	
					Open Hole from ft. to Screen Make Type	ft.		
					Screen make Type	•		
					Diameter Slo	ot/Gauze	Length	Set Between
					Static Water Level			
					ft. from Date Measured PUMPING LEVEL (below la			
						g.p.m.		
					Well Head Completion			
					Pitless adapter manufacture	r Model		
					Casing Protection	12 in. abov	ve grade	
					At-grade (Environmen	ital Wells and Bo	rings ONLY)	
REMARKS					Grouting Information We			
PIT IS 4' BELOW STREET.					Grouting information We	all Grouten? 1	res i No	
							f 0 t-	20.6
					Grout Material: Neat (	Cement	from 0 to	20 ft. 14
					Nearest Known Source of _feetdirectiontype	Contamination		
					Well disinfected upon comp	alotion?	Yes . No	
					Pump 1 Not Installe Manufacturer's name	ed Date Installe Model number	d HP_ Volts	
					Length of drop Pipe _ft. (			al
					Abandoned Wells Does p		1979	sealed well(s)?
						41 - 5m		
					Variance Was a variance g		MDH for this well?	Yes No
First Bedrock					Well Contractor Certificati	ion	L0004	FULTON, W.
Last Strat	Aquifer	ok #			Midwest Drilling License Business Nar	me	Lic. Or Reg. No.	Name of Driller
	Depth to Bedro			_	<u> </u>			
County Well Inde	x Online	Report			609761			Printed 10/14/2010 HE-01205-07

625005

County Quad Quad ID Hennepin St Paul West 103B

### MINNESOTA DEPARTMENT OF HEALTH WELL AND BORING RECORD

Minnesota Statutes Chapter 1031

Entry Date Update Date Received Date

Well Name MINNEHAHA FALLS PARK	Well Depth Depth Completed Date Well Completed
Township Range Dir Section Subsections Elevation 797 ft.	10 ft. 10 ft. 02/21/2000
Calc from DEM (USGS 7.5	10 16:
min or equiv.)	Drilling Method Auger (non-specified)
Well Address 4901 MINNEHAHA AV	Drilling Fluid Well Hydrofractured? Yes No
MINNEAPOLIS MN	From Ft. to Ft.
	Use Monitor well
Geological Material Color Hardness From To TOPSOIL BLACK 0 1	Casing Type Steel (black or low carbon) Joint Threaded Drive Shoe?
MED SAND & GRAVEL DENSE BROWN MEDIUM 1 7	No Above/Below ft.  Cooling Diameter  Weight Hole Diameter
GRAVEL & SAND EXTREMELY DENSE BROWN 7 9 WEATHERED LIMESTONE BUFF HARD 9 10	Casing Diameter
EOB 10	2 in. to 4.6 ft. lbs./ft. 8 in. to 9.6 ft.
	Open Hole from ft. to ft.
	Screen YES Make US FILTER Type plastic
	Diameter Slot/Gauze Length Set Between 2 10 5 4.6 ft. and 9.6 ft.
	2 10 3 4.0 ii. and 5.0 ii.
	Static Water Level
	ft. from Date Measured
	PUMPING LEVEL (below land surface) ft. after hrs. pumping g.p.m.
	Well Head Completion
	Pitless adapter manufacturer Model
	Casing Protection Y 12 in. above grade
	At-grade (Environmental Wells and Borings ONLY)
REMARKS OWNER'S ADDIT'L MAILING INFO: 200 GRAIN EXCHANGE.	Grouting Information Well Grouted?  Yes  No
STS PROJECT #D10280 MW3A	Grout Material: Neat Cement from 0 to 4 ft. 2 bags
CASING: 6" PROTOP	Grout Material: Neat Cement from 0 to 4 tt. 2 bags
SEE MAP	
Located by: Minnesota Department of Health Method: GPS SA Off (averaged)	Nearest Known Source of Contamination
Unique Number Verification: N/A Input Date: 05/03/2005	feetdirectiontype Well disinfected upon completion? Yes ✓ No
System: UTM - Nad83, Zone15, Meters X: 483427 Y: 4973362	
	Pump
	Manufacturer's name Model number HP Volts  Length of drop Pipe ft. Capacity g.p.m Type Material
	Abandoned Wells Does property have any not in use and not sealed well(s)? Yes Vo
	Variance Was a variance granted from the MDH for this well? Yes V No
	Well Contractor Certification
First Bedrock Aquifer	STS Consultants, Ltd. M0150 DAVIS, G.  License Business Name Lic. Or Reg. No. Name of Driller
Last Strat Depth to Bedrock ft.	
County Well Index Online Report	625005 Printed 8/9/2010 HE-01205-07

625006

County Quad Quad ID Hennepin St Paul West 103B

### MINNESOTA DEPARTMENT OF HEALTH WELL AND BORING RECORD

Minnesota Statutes Chapter 1031

Entry Date Update Date Received Date

Well Name MINNEHAHA FALLS PARK	Well Depth Depth Completed Date Well Completed					
Township Range Dir Section Subsections Elevation 797 ft.	00/00/0000					
Calc from DEM (USGS 7.5	30 It.					
min or equiv.)	Drilling Method Auger (non-specified)					
Well Address 4901 MINNEHAHA AV	Drilling Fluid Well Hydrofractured? Yes V No					
MINNEAPOLIS MN	From Ft. to Ft.					
	Use Monitor well					
Geological Material Color Hardness From To TOPSOIL BLACK 0 1	Casing Type Steel (black or low carbon) Joint Threaded Drive Shoe? Yes					
MEDIUM SAND DENSE BROWN MEDIUM 1 7 GRAVELLY SAND EXTREMELY DENSE BROWN 7 9	Casing Diameter Weight Hole Diameter					
WEATHERED LIMESTONE BUFF HARD 9 11	2 in. to 17.5 ft. 3.65 lbs./ft. 8 in. to 10.8 ft.					
PLATTEVILLE LIMESTONE GRAY HARD 11 37 GLENWOOD SHALE GREEN SOFT 37 38	6 in. to 38 ft.					
EOB 38	Open Hole from ft. to ft.					
	Screen YES Make US FILTER (WIRE WO Type stainless steel					
	Diameter Slot/Gauze Length Set Between					
	2 10 20 17.5 ft. and 37 ft.					
	Static Water Level					
	ft. from Date Measured					
	PUMPING LEVEL (below land surface) ft. after hrs. pumping g.p.m.					
	Well Head Completion					
	Pitless adapter manufacturer Model					
	Casing Protection Y 12 in. above grade					
	At-grade (Environmental Wells and Borings ONLY)					
REMARKS	Grouting Information Well Grouted?					
OWNER'S ADDIT'L LOCATION INFO: 200 GRAIN EXCHANGE. STS PROJECT # D10280						
MW3B	Grout Material: Neat Cement from 0 to 14.5 ft. 7 bags					
SEE MAP CASING: 6" PROTOP	Grout Material. Neat Cement					
onding, of the for						
	Nearest Known Source of Contamination					
Located by: Minnesota Department of Health Method: GPS SA Off (averaged)	_feet _direction _type					
Unique Number Verification:         N/A         Input Date:         05/03/2005           System:         UTM - Nad83. Zone15. Meters         X: 483426         Y: 4973364	Well disinfected upon completion? Yes 🗹 No					
System: UTM - Nad83, Zone15, Meters X: 483426 Y: 4973364	Pump Not Installed Date Installed					
	Manufacturer's name Model number HP Volts					
	Length of drop Pipe tt. Capacity g.p.m Type Material					
	Abandoned Wells Does property have any not in use and not sealed well(s)?					
	No.					
	Variance Was a variance granted from the MDH for this well? Yes V No					
First Podrook	Well Contractor Certification STS Consultants, Ltd. M0150 DAVIS, G.					
First Bedrock Aquifer	License Business Name Lic. Or Reg. No. Name of Driller					
Last Strat Depth to Bedrock ft.						
County Well Index Online Report	625006 Printed 8/9/2010 HE-01205-07					
	HE-01205-07					

625007

County Quad Quad ID Hennepin St Paul West 103B

# MINNESOTA DEPARTMENT OF HEALTH WELL AND BORING RECORD

Minnesota Statutes Chapter 1031

Entry Date Update Date Received Date

Well Address 5001 MINNEHAHA AV MINNEAPOLIS MN  Geological Material  Color Hardness From To	Well Depth Depth Completed  8 ft. 8 ft. 02/27/2000  Drilling Method Auger (non-specified)  Drilling Fluid Well Hydrofractured? Yes No From Ft. to Ft.  Use Monitor well  Casing Type Steel (black or low carbon) Joint Threaded Drive Shoe? Yes low Above/Below ft.  Casing Diameter Weight Hole Diameter
28 23 W 18 DAAA Elevation Method Calc from DEM (USGS 7.5 min or equiv.)  Well Address 5001 MINNEHAHA AV MINNEAPOLIS MN  Geological Material Color Hardness From To	Drilling Method Auger (non-specified)  Drilling Fluid  Well Hydrofractured? Yes V No From Ft. to Ft.  Use Monitor well  Casing Type Steel (black or low carbon) Joint Threaded Drive Shoe? Yes Io Above/Below ft.
Well Address 5001 MINNEHAHA AV MINNEAPOLIS MN  Geological Material  Color Hardness From To	Drilling Fluid  Well Hydrofractured? Yes No From Ft. to Ft.  Use Monitor well  Casing Type Steel (black or low carbon) Joint Threaded Drive Shoe? Yes low Above/Below ft.
5001 MINNEHAHA AV MINNEAPOLIS MN  Geological Material Color Hardness From To	From Ft. to Ft.  Use Monitor well  Casing Type Steel (black or low carbon) Joint Threaded Drive Shoe? Yes lo Above/Below ft.
MINNEAPOLIS MN  Geological Material  Color Hardness From To Co	From Ft. to Ft.  Use Monitor well  Casing Type Steel (black or low carbon) Joint Threaded Drive Shoe? Yes lo Above/Below ft.
Geological Material Color Hardness From To	Use Monitor well  Casing Type Steel (black or low carbon) Joint Threaded Drive Shoe? Yes Io Above/Below ft.
Geological Material Color Hardness From To	lo Above/Below ft.
TOPSOIL BLACK 0 1 No	
FINE TO MED SAND, TRACE GRAVEL DEN BROWN MEDIUM 1 7	Casing Diameter
SANDY CLAY DENSE GRY/BRN MEDIUM 7 8 6 8 8	2 in to 5.5 ft lbs./ft. 8 in. to 8 ft.
LIMESTONE HARD 8 8	2 in, to 5.5 ft. lbs./ft. 8 in. to 8 π.
	Open Hole from ft. to ft.
[8	Screen YES Make US FILTER Type plastic
	Diameter Slot/Gauze Length Set Between
	2 10 2.5 5.5 ft. and 8 ft.
I	Static Water Level ft. from Date Measured
<b>-</b>	PUMPING LEVEL (below land surface)
	ft. after hrs. pumping g.p.m.
	Well Head Completion
	Pitless adapter manufacturer Model
	✓ Casing Protection Y ✓ 12 in. above grade
	At-grade (Environmental Wells and Borings ONLY)
REMARKS	
STS PROJECT # D10280	Grouting Information Well Grouted? Yes No
MW4A CASING: 6" PROTOP	4 47 6
SEE MAP	Grout Material: Other from 0 to 4.7 ft. 2 bags
Located by: Minnesota Department of Health Method: GPS SA Off (averaged)	Nearest Known Source of Contamination
	_feet _direction _type
	Well disinfected upon completion? Yes V No
	Pump Not installed Date Installed
	Manufacturer's name Model number HP _ Volts
	Length of drop Pipe_ft. Capacity_g.p.m Type Material
I I I	Abandoned Wells Does property have any not in use and not sealed well(s)? Yes V
[ ·	Variance Was a variance granted from the MDH for this well? Yes V No
	Well Contractor Certification
First Bedrock Aquifer	STS Consultants, Ltd. M0150 DAVIS, G.
Last Strat Depth to Bedrock ft.	License Business Name Lic. Or Reg. No. Name of Driller
County Well Index Online Report	625007 Printed 8/9/2010 HE-01205-07

625008

County Quad Quad ID Hennepin St Paul West 103B

# MINNESOTA DEPARTMENT OF HEALTH WELL AND BORING RECORD

Minnesota Statutes Chapter 1031

Entry Date Update Date Received Date

Well Name MINNEHAHA FALLS PARK	Well Depth Depth Completed Date Well Completed				
Township Range Dir Section Subsections Elevation 790 ft.	37 ft. 35 ft. 02/21/2000				
28 23 W 18 DAAA Elevation Method Calc from DEM (USGS 7.5 min or equiv.)	Drilling Method Auger (non-specified)				
Well Address 5001 MINNEHAHA AV MINNEAPOLIS MN	Drilling Fluid Well Hydrofractured? Yes No From Ft. to Ft.  Use Monitor well				
Geological Material Color Hardness From To CLAYEY SAND BLACK 0 2	Casing Type Steel (black or low carbon) Joint Threaded Drive Shoe?				
SAND, TRACE GRAVEL LOOSE BROWN 2 7 SANDY CLAY EXTREMELY DENSE DARK BROWN 7 8 PLATTEVILLE LIMESTONE HARD 8 36 GLENWOOD SHALE GREEN SOFT 36 37 EOB 37	Casing Diameter  Weight  Hole Diameter  2 in. to 15 ft,   lbs./ft.   8 in. to 8 ft.   6 in. to 37 ft.				
	Open Hole from ft. to ft.				
	Screen YES Make US FILTER (WIRE WO Type stainless steel				
	Diameter Slot/Gauze Length Set Between 2 10 20 15 ft. and 35 ft.				
	Static Water Level ft. from Date Measured				
	PUMPING LEVEL (below land surface)				
	ft. after hrs. pumping g.p.m.				
	Well Head Completion Pitless adapter manufacturer Model				
	Casing Protection Y 12 in. above grade				
	At-grade (Environmental Wells and Borings ONLY)				
REMARKS	Grouting Information Well Grouted? Yes No				
OWNER'S ADDIT'L LOCATION INFO: 200 GRAIN EXCHANGE. STS PROJECT # D10280 MW4B CASING: 6" PROTOP SEE MAP	Grout Material: Neat Cement from 0 to 12.4 ft. 5 bags				
Located by: Minnesota Department of Health Method: GPS SA Off (averaged)	Nearest Known Source of Contamination _feet _directiontype				
Unique Number Verification: N/A Input Date: 05/03/2005	Well disinfected upon completion? Yes V No				
System: UTM - Nad83, Zone15, Meters X: 483549 Y: 4973249	Pump Not Installed Date Installed  Manufacturer's name Model number HP Volts  Length of drop Pipe ft. Capacity g.p.m Type Material				
	Abandoned Wells Does property have any not in use and not sealed well(s)?				
	Variance Was a variance granted from the MDH for this well? Yes Vo				
	Well Contractor Certification				
First Bedrock Aquifer	STS Consultants, Ltd. M0150 DAVIS, G.				
Last Strat Depth to Bedrock ft.	License Business Name Lic. Or Reg. No. Name of Driller				
County Well Index Online Report	625008 Printed 8/9/2010 HE-01205-07				

Minnesota Unique Well No.	MINNESOTA DEPARTMENT OF HEALTH WELL AND ROBING Entry Date 08/24/2000
625009 County Hennepin Quad St Paul West	Update Date 04/23/2009
Quad ID 103B	RECORD Received Date Minnesota Statutes Chapter 103I
Well Name MINNEHAHA FALLS PARK, MW-5A	Well Depth Depth Completed Date Well Completed
Township Range Dir Section Subsections Elevation 770 ft.	8 ft. 8 ft. 02/22/2000
Calc from DEM 28 23 W 17 CBCA Elevation Method (USGS 7.5 min	Drilling Method Auger (non-specified)
or equiv.)	- Thinking means of Aller Annual Promoter
Well Address 5101 MINNEHAHA AV MINNEAPOLIS MN	Drilling Fluid Well Hydrofractured? Yes V No
MINICE WAY	Use Monitor well
Geological Material Color Hardness From To SILTY SAND BLACK 0 2 FINE SAND, TRACE GRAVEL, DENSE BROWN MEDIUM 2 5	Casing Type Steel (black or low carbon) Joint Threaded Drive Shoe?
FINE TO MED SAND & GRAVEL LOOSE BROWN 5 6 LIMESTONE HARD 6 8	Casing Diameter Weight Hole Diameter
EOB 8	2 in. to 5.2 ft. lbs./ft. 8 in. to 8 ft.
ľ	Open Hole from ft. to ft.
l	Screen YES Make US FILTER Type plastic
	Diameter Slot/Gauze Length Set Between 2 10 2.5 5.2 ft. and 7.7 ft.
	Static Water Level 5.3 ft. from Land surface Date Measured 02/22/2000
	PUMPING LEVEL (below land surface) ft. after hrs. pumping g.p.m.
	Well Head Completion Pitless adapter manufacturer Model
	Casing Protection Y 12 in. above grade
	At-grade (Environmental Wells and Borings ONLY)
REMARKS SEE MAP	Grouting Information Well Grouted? Yes No
OWNER'S ADDIT'L LOCATION INFO: 200 GRAIN EXCHANGE.	
STS PROJECT # D10280 MW5A	Grout Material: Other from 0 to 4.5 ft. 2 bags
CASING: 6" PROTOP	
Located by: Minnesota Department of Method: Digitization (Screen) - Map	Nearest Known Source of Contamination feet direction _type
Health (1:24,000)	Well disinfected upon completion? Yes V No
Unique Number Verification: N/A Input Date: 05/03/2005	The desired applications and the second applications are second applications.
System: UTM - Nad83, Zone15, Meters X: 483726 Y: 4972991	Pump     Not Installed     Date Installed       Manufacturer's name     Model number     HP     Volts       Length of drop Pipe     ft.     Capacity     g.p.m     Type     Material
	Abandoned Wells Does property have any not in use and not sealed well(s)?
	Yes 🗸 No
	Variance Was a variance granted from the MDH for this well? Yes V
	Well Contractor Certification
First Bedrock Aquifer	STS Consultants, Ltd. M0150 DAVIS, G.
Last Strat Depth to Bedrock ft.	License Business Name Lic. Or Reg. No. Name of Driller
County Well Index Online Report	625009 Printed 5/27/2010

Minnesota Unique Well No.	MINNESOTA DEPARTMENT OF HEALTH  MELL AND BODING Entry Date 08/24/2000			
625010 County Hennepin Quad St Paul West Quad ID 103B	WELL AND BORING         Entry Date Update Date         08/24/2000 05/20/2005           RECORD         Received Date			
Well Name MINNEHAHA FALLS PARK	Well Depth Depth Completed Date Well Completed			
Township Range Dir Section Subsections Elevation 770 ft.  Calc from DEM	35 ft. 33 ft. 02/22/2000			
28 23 W 17 CBCA Elevation Method (USGS 7.5 min or equiv.)	Drilling Method Auger (non-specified)			
Well Address 5101 MINNEHAHA AV MINNEAPOLIS MN	Drilling Fluid Well Hydrofractured? ☐ Yes ✓ No From Ft. to Ft.			
	Use Monitor well			
Geological Material Color Hardness From To TOPSOIL BLACK 0 2 SAND AND GRAVEL DENSE BROWN MEDIUM 2 6	Casing Type Steel (black or low carbon) Joint Threaded Drive Shoe?			
PLATTEVILLE LIMESTONE GRAY HARD 6 35 GLENWOOD SHALE 35 EOB 35	Casing Diameter Weight Hole Diameter  2 in to 13 ft    bs./ft. 8 in. to 6.5 ft.			
EOB	2 in. to 13 ft. lbs./rt. 8 in. to 6.5 τε. 6 in. to 35 ft.			
	Open Hole from ft. to ft.			
	Screen YES Make US FILTER (WIRE W Type stainless steel			
	Diameter Slot/Gauze Length Set Between 2 10 20 13 ft. and 33 ft.			
	Static Water Level 5.3 ft. from Land surface Date Measured 02/22/2000			
	PUMPING LEVEL (below land surface) ft. after hrs. pumping g.p.m.			
	Well Head Completion Pitless adapter manufacturer Model			
	Casing Protection Y 12 in. above grade			
	At-grade (Environmental Wells and Borings ONLY)			
REMARKS OWNER'S ADDIT'L LOCATION INFO: 200 GRAIN EXCHANGE STS PROJECT # D10280	Grouting Information Well Grouted?  Yes  No			
MW5B SEE MAP CASING: 6" PROTOP	Grout Material: Neat Cement from 0 to 11.5 ft. 5 bags			
Located by: Minnesota Department of Health Method: GPS SA Off (averaged)	Nearest Known Source of Contamination _feetdirectiontype			
Unique Number Verification: N/A Input Date: 05/03/2005	Well disinfected upon completion?			
System: UTM - Nad83, Zone15, Meters X: 483724 Y: 4973001	Pump Not Installed Date Installed  Manufacturer's name Model number HP Volts  Length of drop Pipe _ft. Capacity _g.p.m Type Material			
	Abandoned Wells Does property have any not in use and not sealed well(s)?			
	Yes V No			
	Variance Was a variance granted from the MDH for this well? Yes Vo			
	Well Contractor Certification			
First Bedrock Aquifer	STS Consultants, Ltd. M0150 DAVIS, G.			
Last Strat Depth to Bedrock ft.	License Business Name Lic. Or Reg. No. Name of Driller			

625010

Printed 5/27/2010

**County Well Index Online Report** 

643465

County Quad Quad ID Hennepin

# MINNESOTA DEPARTMENT OF HEALTH WELL AND BORING RECORD

Minnesota Statutes Chapter 1031

Entry Date Update Date Received Date 04/26/2001 03/11/2005

Well Name CITY OF MINNEAPOLIS					Well Depth	Depth Completed	Date Well Completed
Township Range Dir Section Subsect					34 ft.	34 ft.	03/16/2000
28 23 W 18 DDA	Elevation	Method			Drilling Method Auger (non-s	pecified)	
Well Address 5201 45TH ST MINNEAPOLIS MN					Drilling Fluid	Well Hydrofractured?	Yes 🗹 No
			_	_	Use Monitor well		
Geological Material CLAY SANDY CLAY	Color BROWN BROWN	<b>Hardness</b> MEDIUM MEDIUM	From 0 15	<b>To</b> 15 17	Casing Type Plastic Joint I ft.		
SANDY CLAY	GRAY	MEDIUM	17	20 22	Casing Diameter	Weight	Hole Diameter
SANDY CLAY SAND LIMESTONE	BROWN BROWN BROWN	HARD MEDIUM HARD	20 22 34	34	2 in. to 34 ft.	0.69 lbs./ft.	4.3 in. to 34 ft.
					Open Hole from ft. to f		
					Screen YES Make TIMCO	O Type plastic	
					Diameter Slot/G 2 10		<b>t Between</b> 14 ft, and 34 ft.
					Static Water Level 29 ft. from Land surface Di	oto Magaured 03/18/2000	
					PUMPING LEVEL (below land		
					ft. after hrs. pumping g.	p.m	
					Well Head Completion		
					Pitless adapter manufacturer  Casing Protection Y	Model  12 in. above grade	
					l — ·	-	
REMARKS				_	-	Wells and Borings ONLY)	
MW#4 / KELTON BARR					Grouting Information Well (	Grouted? Yes N	lo
					O A Marka dala Na ad Oa	t from 0	to 20 ft. 4 bags
					Grout Material: Neat Ce Grout Material: Bentonit	o	0 to 22 ft. 1 bags
					Grout Material. Bentonit	e	bags
					Nearest Known Source of Co	ontamination	
					feetdirectiontype Well disinfected upon complet	tion? Yes 🗸 No	
						Date Installed lodel number HP _ Volts	
					Length of drop Pipe _ft. Ca		erial
					Abandoned Wells Does prop No	perty have any not in use and n	ot sealed well(s)? Yes
						nted from the MDH for this well	1? Yes 🗹 No
Sind Budgest					Well Contractor Certification		E MIEDED A
	Aquifer	L 4			<u>Thein Well Co.</u> License Business Nar	<u>3462</u> ne Lic. Or Re	
County Well Index C	Online Ro				643465		Printed 8/9/2010 HE-01205-07

663722 County Quad Quad ID

Ramsey

### MINNESOTA DEPARTMENT OF HEALTH WELL AND BORING RECORD

Minnesota Statutes Chapter 1031

Entry Date Update Date Received Date 06/17/2002 03/11/2005

Well Name GLORIA DEI LUTHERAN CHUR			Well Depth	Depth Completed	Date Well Completed
Township Range Dir Section Subsections Elevation	ft.		28 ft.	26 ft.	08/30/2001
28 23 W 16 Elevation Method			Drilling Method Cable Tool		
Well Address 700 SNELLING AV S ST PAUL MN 55116			Drilling Fluid Use Elevator	Well Hydrofractured? Yes	No No
Geological Material Color Hardness SAND TAN MEDIUM	From 0	<b>To</b> 28		ow carbon) Joint Welded Drive	Shoe? 🗸 Yes 🗌
			Casing Diameter	Weight	Hole Diameter
			16 in. to 28 ft.	62.58 lbs./ft.	
			Open Hole from ft. to ft	L.	
			Screen Make Type		
			Diameter Slo	ot/Gauze Length	Set Between
			Static Water Level ft. from Date Measured		
			PUMPING LEVEL (below land ft. after hrs. pumping g.		
			Well Head Completion Pitless adapter manufacturer	Model	
			Casing Protection	_	
			At-grade (Environmental	Wells and Borings ONLY)	
REMARKS PIT 8' BELOW GRADE			Grouting Information Well 0	Grouted? Yes No	
			Grout Material: Neat Ce	ment from 26 to	28 ft. 2 bags
			Nearest Known Source of Co	ontamination	
			Well disinfected upon complet	ion? Yes No	
				Date Installed	
			Manufacturer's name M Length of drop Pipe _ft. Ca	odel number HP Volts pacity _g.p.m	
			<b>Abandoned Wells</b> Does prop No	erty have any not in use and not se	aled well(s)?
				nted from the MDH for this well?	Yes No
First Bedrock			Well Contractor Certification  Midwest Drilling	L0004	BREDESON, S.
Last Strat Aquifer  Depth to Bedrock ft.			License Business Nam		
County Well Index Online Report			663722		Printed 8/9/2010 HE-01205-07

673159

County Quad

Quad ID

Ramsey

#### MINNESOTA DEPARTMENT OF HEALTH **WELL AND BORING RECORD**

Minnesota Statutes Chapter 1031

Entry Date Update Date Received Date 03/08/2002 03/11/2005

Well Name MENDOTA HOMES INC					Well Depth	Depth Completed	Date Well Completed
Township Range Dir Section Sub			t.		37 ft.	35 ft.	11/30/2001
28 23 W 16	Elevation	n Method			Drilling Method Cable Tool		
<b>Well Address</b> 1941 FORD PK ST PAUL MN					Drilling Fluid Use Elevator	Well Hydrofractured?	Yes 🗌 No
Geological Material SAND CLAY/GRAVEL	Color BROWN BROWN	<b>Hardness</b> SOFT MEDIUM	From 0 3	<b>To</b> 3 15	Casing Type Steel (black or l No Above/Below ft.	ow carbon) Joint Welded Driv	ve Shoe? Yes
SHALE	GRAY	HARD	15	37	Casing Diameter 20 in. to 37 ft.	Weight 78.6 lbs./ft.	Hole Diameter
					Open Hole from ft. to f Screen Make Type	L	
					National Control of the Control of t	ot/Gauze Length	Set Between
					Static Water Level ft. from Date Measured		
					PUMPING LEVEL (below land ft. after hrs. pumping g.	d surface)	
						patti.	
					Well Head Completion Pitless adapter manufacturer	Model	
					Casing Protection	12 in. above grade	
					At-grade (Environmental	Wells and Borings ONLY)	
REMARKS PIT 4' BELOW GRADE					Grouting Information Well (	Grouted? ✓ Yes ☐ No	
					Grout Material: Neat Ce	ment from 35	to 37 ft. 3 bags
					Nearest Known Source of Co	ontamination	
					Well disinfected upon complet	tion? Yes No	
						Date Installed lodel number HP Volts pacity _g.p.m Type Materi	al
					Abandoned Wells Does prop No	perty have any not in use and not	sealed well(s)? Yes
					Variance Was a variance gra	nted from the MDH for this well?	Yes No
First Bedrock					Well Contractor Certification  Midwest Drilling	1 L0004	VOLKENANT, J.
Last Strat	Aquifer Depth to Bedroo	ck ft.			License Business Nam		
County Well Index					673159		Printed 8/9/2010 HE-01205-07

726112

County Quad Quad ID

Ramsey

# MINNESOTA DEPARTMENT OF HEALTH WELL AND BORING RECORD

Minnesota Statutes Chapter 1031

Entry Date Update Date Received Date 06/16/2006 06/20/2006 01/18/2006

Well Name MESSIAH EPISCOPAL CHU	JBCH				Well Depth	Depth Completed	Date Well Completed
Township Range Dir Section Subse		n 1	t.		26 ft.	24 ft.	07/13/2005
28 23 W 16	Elevation	n Method			Drilling Method Cable Tool		
<b>Well Address</b> 1631 FORD PK ST PAUL MN					Drilling Fluid Use Elevator	Well Hydrofractured?	s No
	0-1	Hande	F	т-		1 \ 1-1 \ 11   1 = 1	Obered Maria
Geological Material SAND	<b>Color</b> BROWN	<b>Hardness</b> SOFT	<b>From</b> 0	<b>To</b> 26	Casing Type Steel (black or line) No Above/Below ft.	ow carbon) Joint Welded Drive	Shoe? Yes Yes
					Casing Diameter	Weight	Hole Diameter
					20 in. to 24 ft.	78.6 lbs./ft.	
					Open Hole from ft. to f	t.	
					Screen Make Type	W.	
					Diameter Sid	ot/Gauze Length	Set Between
					Static Water Level 0 ft. from Land surface Date	to Measured 07/13/2005	
					PUMPING LEVEL (below land	d surface)	
					ft, after hrs. pumping g.	p.m.	
					Well Head Completion Pitless adapter manufacturer	Model	
					Casing Protection	12 in. above grade	
						Wells and Borings ONLY)	
REMARKS					Grouting Information Well (		
PIT 4' BELOW GRADE					drouting information with	CITOLOGY. E. 100 E. 110	
					Grout Material: Neat Ce	ment from 24 to	o 26 ft. 3 bags
					Nearest Known Source of Co	ontamination	
					_feet _direction _type		
					Well disinfected upon complet	tion? Yes No	
						Date Installed	
					Manufacturer's name M Length of drop Pipe_ft. Ca	lodel number HP Volts pacity _g.p.m Type Material	
					Abandoned Wells Does prop No	perty have any not in use and not se	ealed well(s)?
						nted from the MDH for this well?	Yes No
First Bedrock					Well Contractor Certification	L0004	STANGRET, S
Last Strat	Aquifer Depth to Bedroc	k ft			Midwest Drilling License Business Nan		
County Well Index					726112		Printed 8/9/2010 HE-01205-07

Minnesota Unique Well No.	T 0t	Mandaga			MINNESOTA DEPARTME		10/16/2008
751320	County Quad	Morrison			WELL AND B	Undate Date	10/16/2008
701020	Quad ID				RECOR		08/20/2007
III II					Minnesota Statutes C		ate Well Completed
Weil Name MORRISON COUNTY Township Range Dir Section Subs	sections Flevat	ion	ft.		1850 ft.	180 ft.	06/13/2007
40 32 W 23 CBD		ion Method				100 111	
Well Address					Drilling Method Other		
17508 IRIS RD LITTLE FALLS MN 56345					Drilling Fluid 	Well Hydrofractured? Ye	s I No
LITTLE FALLS WIN 30343					Use Monitor well		
Geological Material	Color	Hardness	From	To	Casing Type Steel (black	or low carbon) Joint Threaded	Drive Shoe?
TOP SOIL SILTY SAND	BLACK BROWN	SOFT MEDIUM	0 2	2 75	Yes V No Above/Below		
MED SAND	BROWN	MEDIUM	75	108			Piameter
BEDROCK	GRAY	HARD	108	185	Casing Diameter	lbs./ft. 6 in.	
					2 in. to 170 ft.	108./10. 0 111.	to 165 it.
					Open Hole from ft. to	ft.	
					Screen YES Make JOI	HNSON Type stainless steel	
					Diameter Slot/Ga	auze Length Set Betwe	en
					2 10	10 170 ft.	and 180 ft.
					Static Water Level 172 ft. from Land surface	Date Measured 06/13/2007	
					PUMPING LEVEL (below la	and surface)	
					ft. after hrs. pumping	g.p.m.	
					Well Head Completion		
					Pitless adapter manufacture		
					Casing Protection Y	12 in. above grade	
					At-grade (Environmer	ntal Wells and Borings ONLY)	
REMARKS 3411-0168					Grouting Information We	ell Grouted? 🔽 Yes 🔲 N	0
MW-28							
					Grout Material: Neat (	Cement from to 16	33 ft. 25 bags
					Nearest Known Source of	Contamination	
					feetdirectiontype		
					Well disinfected upon comp		
						ed Date Installed	
					Manufacturer's name Length of drop Pipe _ft.	Model number HP _ Volts Capacity _g.p.m Type Mate	rial
						roperty have any not in use and no	ot sealed well(s)?
					Yes V No		
					100 1 110	granted from the MDH for this well	?   Yes   No
					Well Contractor Certificat		; 1 165 1. INU
First Bedrock	Aquifer				Boart Longyear	2022	BIERMAIER, M
Last Strat	Depth to Bed	rock ft.			License Business Na	me Lic. Or Reg. No.	Name of Driller
County Well Inde	ex Onlin	e Repor	t		751320		Printed 10/14/2010 HE-01205-07

Minnesota Unique Well No.	7.0			MINNESOTA DEPARTMENT OF HEALTH  WELL AND RODING Entry Date 07/30/2008
751330	County	Ramsey		Undate Date 08/01/2008
751550	Quad ID			RECORD Received Date 08/20/2007
				Minnesota Statutes Chapter 103I  Well Depth Depth Completed Date Well Completed
Well Name FORD MOTOR CO.	antiona Flavor		4	07/04/0007
Township Range Dir Section Subs 28 23 W 17 BAD		tion tion Method	ft.	43 11.
	Lictur	non moniou		Drilling Method Vibracore/rotasonic
Well Address 966 MISSISSIPPI BL S				Drilling Fluid Well Hydrofractured? ☐ Yes ✔ No
MN				From Ft. to Ft.
				Use Monitor well
Geological Material	Color BLACK	Hardness SOFT	From To	Casing Type Steel (black or low carbon) Joint Threaded Drive Shoe?
FILL SHALE	GRAY	HARD	8 16	
LIMESTONE SHALE	WHITE GRAY	HARD HARD	16 38 38 43	
SHALE	GIVAT	HAND	30 40	2 in. to 30 ft. lbs./ft. 6 in. to 43 ft.
				Open Hole from ft. to ft.
				Screen YES Make JOHNSON Type stainless steel
				Diameter Slot/Gauze Length Set Between
				2 10 10 30 ft. and 40 ft.
				Static Water Level
				31 ft. from Land surface Date Measured 07/04/2007 PUMPING LEVEL (below land surface)
				ft. after hrs. pumping g.p.m.
				Well Head Completion
				Pitless adapter manufacturer Model
				Casing Protection Y 12 in. above grade
				At-grade (Environmental Wells and Borings ONLY)
REMARKS				
AMW-2				Grouting Information Well Grouted? Yes No
3411-0171				6 4 00 6
				Grout Material: Neat Cement from to 26 ft, 4 bags
				Nearest Known Source of Contaminationfeetdirectiontype
				Well disinfected upon completion? Yes V No
				Well distributed upon completion:
				Pump  Not Installed .Date Installed  Manufacturer's name  Model number  HP  Volts
				Length of drop Pipe _ft. Capacity _g.p.m Type Material
				Abandoned Wells Does property have any not in use and not sealed well(s)?
				Yes 🗹 No
				Variance Was a variance granted from the MDH for this well? ☐ Yes ✓ No
				Well Contractor Certification
First Bedrock	Aquifer			Boart Longyear 2022 DOUCETTE, J.
Last Strat	Depth to Bed	irock ft.		License Business Name Lic. Or Reg. No. Name of Driller
County Well Inde			rt	751330 Printed 5/27/2010

751331	County Quad Quad ID	Ramsey			WELL AND B RECOR Minnesota Statutes C	ORING D	Entry Date Update Date Received Date	08/01/2008 06/24/2009 08/20/2007
Well Name FORD MOTOR CO.					Well Depth	Depth Compl	eted Date	Well Completed
Township Range Dir Section S			ft.		43 ft.	40 ft.		07/04/2007
28 23 W 17 B	AD <b>Elevat</b>	ion Method			Drilling Method Vibracore/	rotasonic		
Well Address 966 MISSISSIPPI RD S ST PAUL MN 55116					Drilling Fluid	Well Hydrofrac From Ft. to Ft		✓ No
3117132 MIT 33113					Use Monitor well			
Geological Material	Color	Hardness	From	То	Casing Type Steel (black	or low carbon) J	loint Solvent Welde	d Drive Shoe?
FILL SHALE	BLACK GRAY	SOFT HARD	0 4	4 14	Yes 🗹 No Above/Belov	w ft.		
LIMESTONE SHALE	WHITE GRAY	HARD HARD	14 40	40 43	Casing Diameter	Weight	Hole Dia	ameter
STALL	OIAI	HAILO	40	40	2 in. to 30 ft.	lbs./1	ft. 6 in. to	o 43 ft.
					Open Hole from ft. to	ft.		
					Screen YES Make JO	HNSON Type	stainless steel	
					Diameter Slot/G 2 10	auze Leng 10	gth Set Betwe 30 ft. :	<b>en</b> and 40 ft.
					Static Water Level			
					31 ft. from Land surface		07/04/2007	
					PUMPING LEVEL (below I ft. after hrs. pumping			
					Well Head Completion Pitless adapter manufacture Casing Protection  At-grade (Environment	12 in. abov	-	
REMARKS					Grouting Information W	ell Grouted?	Yes No	
AMW-6 3411-0171					Grout Material: Neat		from to 26	ft. 4 bags
					Nearest Known Source of			
					feetdirectiontype  Well disinfected upon com	F-1	Yes 🔽 No	
					Pump Not Instal  Manufacturer's name  Length of drop Pipe _ft.	led Date installe Model number Capacity _g.p.m	HP _ Volts	I
					Abandoned Wells Does p	property have any	not in use and not s	sealed well(s)?
					Yes 🗹 No			
					Variance Was a variance		MDH for this well?	Yes V No
First Badraals					Well Contractor Certificat	tion	2022	DOUCETTE, J.
First Bedrock  Last Strat	Aquifer	leank #			Boart Longyear License Business Na	ıme	<u>2022</u> Lic. Or Reg. No.	Name of Driller
	Depth to Bed					1	and or riogration	
County Well In	dex Onlir	ne Repor	t		751331			Printed 5/27/2010 HE-01205-07

HE-01205-07

Minnesota Unique Well No.	County R	amsey		MINNESOTA DEPARTMENT OF HEALTH  WELL AND BODING Entry Date 08/01/2008					
751332	Quad	amsey		Update Date 08/01/2008					
101002	Quad ID			RECORD Received Date 08/20/2007 Minnesota Statutes Chapter 1031					
Well Name FORD MOTOR CO.				Well Depth Depth Completed Date Well Completed					
Township Range Dir Section Subse	ections Elevation	ft.		151 ft. 151 ft. 11/07/2007					
28 23 W 17 AAC	Elevation N	Method		Drilling Method Vibracore/rotasonic					
Well Address				Drilling Fluid Well Hydrofractured? Yes V No					
966 MISSISSIPPI BL S				well hydrotractured? Yes Vivo					
ST PAUL MN 55116				Use Monitor well					
Geological Material	Color Har	rdness From	To	Casing Type Steel (black or low carbon) Joint Threaded Drive Shoe?					
SHALE	GRAY HAI		16	Yes ✓ No Above/Below ft.					
LIMESTONE SHALE	GRAY HAI GRAY HAI		40 45						
SANDSTONE	GRAY HAI	RD 45	151	Casing Diameter Weight Hole Diameter					
				2 in. to 141 ft. lbs./ft. 6 in. to 151 ft.					
				Open Hole from ft. to ft.  Screen YES Make JOHNSON Type stainless steel					
				Screen TES Make SOFINSON Type Statilless Steel					
				Diameter Slot/Gauze Length Set Between 2 10 10 141 ft. and 151 ft.					
				2 10 10 141 11 and 101 11.					
				Static Water Level					
				100 ft. from Land surface Date Measured 11/07/2007					
				PUMPING LEVEL (below land surface)					
				ft. after hrs. pumping g.p.m.					
				Well Head Completion					
				Pitless adapter manufacturer Model					
				Casing Protection 12 in. above grade					
				At-grade (Environmental Wells and Borings ONLY)					
REMARKS AMW-3B				Grouting Information Well Grouted?  Yes No					
3411-0171									
				Grout Material: Neat Cement from to 137 ft. 12 bags					
				Nearest Known Source of Contamination					
				_feet _direction _type					
				Well disinfected upon completion? Yes No					
				Pump Not Installed Date Installed					
				Manufacturer's name Model number HP_ Volts					
				Length of drop Pipe_ft. Capacity_g.p.m Type Material					
				Abandoned Wells Does property have any not in use and not sealed well(s)?					
				Yes 🗸 No					
				Variance Was a variance granted from the MDH for this well?					
				Well Contractor Certification					
First Bedrock	Aquifer			Boart Longyear 2022 DOUCETTE, J.					
Last Strat	Depth to Bedrock	ft		License Business Name Lic. Or Reg. No. Name of Driller					
County Well Inde	x Online	Report		<b>751332</b> Printed 5/27/2010					

Minnesota Unique Well No.	County	Rameov			MINNESOTA DEPARTMEN		Entry Date	08/01/2008	
751333	County Quad	Ramsey			WELL AND B		Update Date	06/24/2009	
701000	Quad ID				RECORI		Received Date	08/20/2007	
W II N FORD MOTOR OF				Т	Minnesota Statutes Cl	Depth Comple	eted Date	Well Completed	
Well Name FORD MOTOR CO.  Township Range Dir Section Subse	ctions Flevati	ion 1	ft.		40 ft.	40 ft. 07/11/2007			
28 23 W 17 ADC		ion Method		ŀ	Drilling Method Vibracore/				
Well Address				+				.al.,	
966 MISSISSIPPI BL S				- 1	Drilling Fluid 	Well Hydrofrac From Ft. to Ft.		<b>✓</b> No	
ST PAUL MN 55116				t	Use Monitor well				
Geological Material	Color	Hardness		ro [	Casing Type Steel (black of	or low carbon) J	oint Threaded Driv	re Shoe?	
SHALE LIMESTONE	GRAY GRAY	HARD HARD		16	res V No Above/Below				
SHALE	GRAY	HARD		10	Casing Diameter	Weight	Hole Dias	meter	
				- 1	2 in. to 30 ft.	lbs./f		40 ft.	
				- 1	2 111. 10 50 11.				
				ŀ	Open Hole from ft. to	ft.			
				ı	Screen YES Make JOH	HNSON Type	stainless steel		
				- 1	Diameter Slot/G		th Set Betwee		
				- 1	2 10	10	30 ft. a	nd 40 ft.	
				ŀ	Static Water Level				
				L	18 ft. from Land surface		07/11/2007		
				- [	PUMPING LEVEL (below le ft. after hrs. pumping				
				ŀ	W 31 537	g.p.m.			
				- 1	Well Head Completion Pitless adapter manufacture	r Model			
				- 1	Casing Protection	12 in. abov	e grade		
				- 1	At-grade (Environmen		•		
REMARKS				$\dashv$					
AMW-3A				- 1	Grouting Information We	ell Grouted?	Yes No		
3411-0171				- 1			f t- 00		
					Grout Material: Neat (	Cement	from to 26	tt. 4 bags	
				I	Nearest Known Source of	Contamination			
					feetdirectiontype	Comanination			
					Well disinfected upon comp	oletion?	Yes 🔽 No		
				Ì	Pump Not Install	ed Date Installe	d		
					Manufacturer's name	Model number_			
				$\dashv$	Length of drop Pipe _ft. (		Type Material	-l-d	
					Abandoned Wells Does p	roperty have any	not in use and not se	ealed well(s)? []	
				1	Yes 🗹 No				
					Variance Was a variance g		MDH for this well?	Yes 🛂 No	
Eliza Bardinata					Well Contractor Certificat	ion	0000	DOLLOGITE	
	Aquifer	and the			<u>Boart Longyear</u> License Business Nai	ma I	2022 Lic. Or Reg. No.	DOUCETTE, J.  Name of Driller	
	Depth to Bed			-		ine t	Lo. Of Fieg. No.		
County Well Inde	x Onlin	e Report			751333			Printed 5/27/2010 HE-01205-07	

Minnesota Unique Well No. 751334	County Quad Quad ID	Ramsey			MINNESOTA DEPARTMENT OF HEALTH   WELL AND BORING   Entry Date   08/01/2008   06/23/2009   Color   Co				
Well Name FORD MOTOR CO.					Well Depth	Depth Completed	Date Well	Completed	
Township Range Dir Section Subse	ctions Elevat	tion	ft.		61 ft.	60 ft.	07/11	/2007	
28 23 W 17 DAA	Elevat	tion Method			Drilling Method Vibracore/	rotasonic			
Well Address					Drilling Fluid	Well Hydrofractured?	Yes 🗸	No	
966 MISSISSIPPI BL S					e)	From Ft. to Ft.	L tes 🖭 i	40	
ST PAUL MN					Use Monitor well				
Geological Material SAHLE	<b>Color</b> GRAY	Hardness HARD	From 0	<b>To</b> 26	Casing Type Steel (black of		hreaded Drive Sh	oe?	
LIMESTONE SHALE	GRAY GRAY	HARD HARD	26 59	59 61	Yes Mo Above/Below				
J. W. L.	2				Casing Diameter 2 in. to 50 ft.	Weight lbs./ft	Hole Diamete		
					Open Hole from ft. to				
					Screen YES Make JOH	HNSON Type stainle	ess steel		
					Diameter Slot/G 2 10	auze Length 9 10	Set Between 50 ft. and	60 ft.	
					Static Water Level				
					38.9 ft. from Land surface	Date Measured 07/1	11/2007		
					PUMPING LEVEL (below la ft. after hrs. pumping	g.p.m.			
					Well Head Completion Pitless adapter manufacture Casing Protection  At-grade (Environmen	12 in. above grade			
REMARKS AMW-4					Grouting Information We	ell Grouted? Yes	s No		
3411-0171					Grout Material: Neat (		m to 46 ft.	5 bags	
					Nearest Known Source of _feetdirectiontype				
					Well disinfected upon comp	F***	✓ No		
					Pump Not Installe Manufacturer's name Length of drop Pipe_ft. (		o_ Volts pe Material		
					Abandoned Wells Does p	roperty have any not in u	use and not sealed	well(s)?	
					Yes No				
					Variance Was a variance g	granted from the MDH fo	or this well?	Yes 🗹 No	
					Well Contractor Certificati				
	Aquifer						-	OUCETTE, J.	
Last Strat	Depth to Bed	rock ft.		_	License Business Nar	ne Lic. Or	Reg. No. N	lame of Driller	
County Well Inde	x Onlin	ne Repor	t		751334		Prin	ted 5/27/2010 HE-01205-07	

Minnesota Unique Well No.		Б.			MINNESOTA DEPARTMEN		nr Data	08/01/2008
751335	County Quad	Ramsey			WELL AND BO	Und	ry Date late Date	06/23/2009
701000	Quad ID				RECORI	D Rec	eived Date	08/20/2007
				-	Minnesota Statutes Ch		Date	Well Completed
Well Name FORD MOTOR CO.					Well Depth	Depth Completed		Well Completed
Township Range Dir Section Subse		ion ion Method	ft.		95 ft.	89 ft.		07/11/2007
	Fievati	on method		_	Drilling Method Vibracore/	rotasonic		
Well Address 966 MISSISSIPPI BL S					Drilling Fluid	Well Hydrofractured	i? Yes	✓ No
ST PAUL MN					-	From Ft. to Ft.		
					Use Monitor well			p—3
Geological Material	Color BLACK	Hardness SOFT	From 0	<b>To</b> 3	Casing Type Steel (black of	or low carbon) Joint	Threaded Driv	e Shoe?
FILL SHALE	GRAY	HARD	3	28	Yes 🗹 No Above/Below	v ft.		
LIMESTONE	GRAY	HARD HARD	28 90	90 95	Casing Diameter	Weight	Hole Dia	meter
SHALE	GRAY	HARD	90	90	2 in. to 79 ft.	lbs./ft.	6 in. to	95 ft.
					2 111.10 70 11.			
					Open Hole from ft. to	ft.		
					Screen YES Make JOH		nless steel	
					Diameter Slot/G	auze length	Set Betwee	
					2 10	10		nd 89 ft.
					Static Water Level	NERONO WY DOVOTOWA		
					77 ft. from Land surface PUMPING LEVEL (below la	Date Measured 07/	11/2007	
					ft. after hrs. pumping			
					Wall blood Completion			
					Well Head Completion Pitless adapter manufacture	r Model		
					Casing Protection	12 in. above gra	de	
					At-grade (Environmen			
REMARKS								
AMW-9					Grouting Information We	ell Grouted?	es No	
3411-0171								
					Grout Material: Neat 0	Cement fr	om to 75	ft. 8 bags
					Nearest Known Source of	Contamination		
					_feet _direction _type		(31	
					Well disinfected upon comp	oletion? Yes	₩ No	
					·	ed Date Installed		
					Manufacturer's name Length of drop Pipe _ft. (		HP_ Volts Type Material	
							***	polod woll/s)?
					Abandoned Wells Does po	roperty nave any not i	n use and not se	aled well(s)?
					Yes 🗹 No			
					Variance Was a variance g	granted from the MDH	for this well?	Yes 🗸 No
					Well Contractor Certificati			
	Aquifer				Boart Longyear		2022	DOUCETTE, J.
Last Strat	Depth to Bedr	rock ft.			License Business Nar	me Lic. C	or Reg. No.	Name of Driller
County Well Inde	x Onlin	e Report			751335			Printed 5/27/2010 HE-01205-07

Well Depth	Minnesota Unique Well No. 751336	County Quad Quad ID	Ramsey			MINNESOTA DEPARTMEN WELL AND BO RECORI Minnesota Statutes Co	ORING Entry I Update D Receiv	
## Well Address of Machine   Property   Pro								
Well Address 966 MSSISSIPPI BL S ST PAUL MN SST 16  Geological Material GRAVEL GRAVEL GRAY HARD 0 25 STALLE GRAY HARD 25 GRAY HARD 25 STALE GRAY HARD 25 GRAY HA				π.				07/11/2007
966 MISSISSIPPI BLS ST PAUL MN 55116  Geological Material GRAV BLACK MEDIUM GRAVEL GRAV HARD 6 28 LIMESTONE GRAV HARD 41 SHALE GRAY HARD 41 GRAY HA						Drilling Method Vibracore/	rotasonic	
Geological Material GRAVEL GRAV HARD 6 5 8 8 9 No Above/Below ft.  Casing Type State (black or low carbon) Joint Threaded Drive Shoe?  GRAV HARD 28 41 41 41 41 41 41 41 41 41 41 41 41 41	966 MISSISSIPPI BL S					**		Yes V No
SRAVEL SHALE GRAY HARD 28 41 41 42 4								
SHALE  GRAY HARD  41 48  Casing Diameter 2 in. to 35 ft. ibs./ft. 6 in. to 48 ft.  Open Hole from ft. to ft.  Screen YES Make JOHNSON Type stainless steel  Diameter Slot/Gauze Length Set Between 2 10 10 35 ft. and 45 ft.  Static Water Level 36.6 ft. from Land surface Date Measured 07/11/2007  PUMPRIG LEVEL (below land surface) ft. after his pumping g.p.m.  Well Head Completion Pilless adapter manufacturer Model Casing Protection 12 in. above grade  Vi Atgrade (Environmental Wells and Borings ONLY)  Grout Material: Neat Cernent from to 31 ft. 3 bags  Nearest Known Source of Contamination Seet direction 1/ppe Well disinfected upon completion? Yes No  Nearest Known Source of Contamination Seet direction 1/ppe Well disinfected upon completion? No No  Nearest Known Source of Contamination Seet direction 1/ppe Well disinfected upon completion? No No  Nearest Known Source of Contamination Seet direction 1/ppe Well disinfected upon completion? No No  No No No No No No No No No No No No No N	GRAVEL SHALE	BLACK GRAY	MEDIUM HARD	0 6	6 28			readed Drive Shoe?
Screen YES Make JOHNSON Type stainless steel  Diameter Slot/Gauze Length Set Between 2 10 10 35 ft. and 45 ft.  Static Water Level 36.6 ft. from Land surface Date Measured 07/11/2007  PUMPING LEVEL (below land surface) 10 10 35 ft. and 45 ft.  Static Water Level 36.6 ft. from Land surface Date Measured 07/11/2007  PUMPING LEVEL (below land surface) 1 2 in. above grade							_	
Diameter Slot/Gauze Length Set Between 2 10 35 ft. and 45 ft.  Static Water Level 36.6 ft. from Land surface Date Measured 07/11/2007  PUMPING LEVEL (below land surface) ft. after his. pumping 9.p.m.  Well Head Completion							THE RESERVE THE PERSON NAMED IN COLUMN TWO IS NOT THE PERSON NAMED IN COLUMN TWO IS NAMED IN COLU	
36.6 ft. from Land surface: Date Measured 07/11/2007 PUMPING LEVEL (below land surface) ft. after hrs. pumping g.p.m.  Well Head Completion Pitless adapter manufacturer Model Casing Protection 12 in. above grade At-grade (Environmental Wells and Borings ONLY)  Grouting Information Well Grouted? Yes No  Remarks AMW-8 3411-0171  Grout Material: Neat Cement from to 31 ft. 3 bags  Nearest Known Source of Contamination feet _direction _ype Well disinfected upon completion? Yes No  Pump _ Not Installed Date Installed Manufacturer's name Model number _ HP Voits Length of drop Pipe ft. Capacity g.p.m Type Material  Abandoned Wells Does property have any not in use and not sealed well(s)? Yes No  Variance Was a variance granted from the MDH for this well? Yes No  Well Contractor Certification Seart Longyear 2022 DOUCETTE, J. License Business Name						Diameter Slot/G	auze Length S	et Between
PUMPING LEVEL (below land surface) ft. after hrs. pumping g.p.m.    Well Grout Material: Neat Cement   from to 31 ft. 3 bags								110007
## At grade (Environmental Wells and Borings ONLY)  ### At grade (Environmental Wells								1/2007
Pitless adapter manufacturer Model    Casing Protection   12 in. above grade     At-grade (Environmental Wells and Borings ONLY)								
AWW-8 3411-0171  Grout Material: Neat Cement from to 31 ft. 3 bags    Nearest Known Source of Contamination   feet _ direction _ type   Well disinfected upon completion?						Pitless adapter manufacture  Casing Protection	12 in. above grade	ILY)
Grout Material: Neat Cement from to 31 ft. 3 bags    Nearest Known Source of Contamination	AMW-8					Grouting Information We	ell Grouted? Yes	No
Teet _direction _type	3411-0171					Grout Material: Neat C	Cement from	n to 31 ft. 3 bags
Well disinfected upon completion?								
Pump Not Installed Date Installed Manufacturer's name Length of drop Pipe ft. Capacity g.p.m Type Material  Abandoned Wells Does property have any not in use and not sealed well(s)?  Yes No  Variance Was a variance granted from the MDH for this well? Yes No  Well Contractor Certification  Boart Longyear 2022 DOUCETTE, J.  License Business Name Lic. Or Reg. No. Name of Driller  751336  Printed 5/27/2010							F-1 1	<b>∀</b> No
Manufacturer's name Length of drop Pipe_ft. Capacity_g.p.m Type Material  Abandoned Wells Does property have any not in use and not sealed well(s)?  Yes V No  Variance Was a variance granted from the MDH for this well? Yes No  Well Contractor Certification  Boart Longyear 2022 DOUCETTE, J.  Last Strat Depth to Bedrock ft.  Tounty Well Index Online Report  Model number HP Volts  Length of drop Pipe_ft. Capacity_g.p.m Type Material  Abandoned Wells Does property have any not in use and not sealed well(s)?  Yes V No  Variance Was a variance granted from the MDH for this well? Yes V No  Well Contractor Certification  Boart Longyear 2022 DOUCETTE, J.  License Business Name Lic. Or Reg. No. Name of Driller							NO.10(1).	
Yes No  Variance Was a variance granted from the MDH for this well? Yes No  Well Contractor Certification  Boart Longyear 2022 DOUCETTE, J.  Last Strat Depth to Bedrock ft. License Business Name Lic. Or Reg. No. Name of Driller  751336  Printed 5/27/2010						Manufacturer's name	Model number HP	
Variance Was a variance granted from the MDH for this well?						Abandoned Wells Does pr	roperty have any not in us	se and not sealed well(s)?
Well Contractor Certification  First Bedrock Last Strat Depth to Bedrock ft.  Boart Longyear License Business Name Lic. Or Reg. No. Name of Driller  751336 Printed 5/27/2010						Yes 🗹 No		
First Bedrock Last Strat  Aquifer Depth to Bedrock ft.  Boart Longyear License Business Name Lic. Or Reg. No. Name of Driller  751336  Printed 5/27/2010						Variance Was a variance g	granted from the MDH for	this well? Yes Vo
Last Strat  Depth to Bedrock ft.  License Business Name  Lic. Or Reg. No.  Name of Driller  751336  Printed 5/27/2010	m = . m . 1 = .							
County Well Index Online Report 751336 Printed 5/27/2010		•				- "		
	-			t			Liu. Of H	

Minnesota Unique Well No. 751337	County Quad Quad ID	Ramsey			MINNESOTA DEPARTMEN WELL AND BO RECORI	ORING Entry Upda D Rece	ate Date (	08/01/2008 08/01/2008 08/20/2007
				-	Minnesota Statutes Cl Well Depth	Depth Completed	Date Well C	Completed
Well Name FORD MOTOR CO.  Township Range Dir Section Subs	nactions Elevati	ion	ft.			39 ft.	07/11/	
28 23 W 17 DBB		ion Method	11.		42 ft.		0/////	2007
				_	Drilling Method Vibracore/	rotasonic		
Well Address 966 MISSISSIPPI BL S ST PAUL MN 55116					Drilling Fluid	Well Hydrofractured From Ft. to Ft.	? Yes 🗹 N	0
					Use Monitor well			
Geological Material FILL SHALE	<b>Color</b> BLACK GRAY	<b>Hardness</b> MEDIUM HARD	<b>From</b> 0 8	<b>To</b> 8 17	Casing Type Steel (black of Yes No Above/Below		Threaded Drive Sho	e? 📙
LIMESTONE SHALE	GRAY GRAY	HARD HARD	17 39	39 42	Casing Diameter 2 in, to 29 ft.	Weight lbs./ft.	Hole Diamete 6 in. to 42	
					Open Hole from ft. to Screen YES Make JOH	ft. HNSON Type stain	less steel	
					Diameter Slot/G			0 ft.
					Static Water Level			
					21 ft. from Land surface	Date Measured 07/1	1/2007	
					PUMPING LEVEL (below la ft. after hrs. pumping	and surface) g.p.m.		
					Well Head Completion Pitless adapter manufacture Casing Protection Y	r Model  12 in. above gra	ade	
					At-grade (Environmen	ital Wells and Borings (	ONLY)	
REMARKS AMW-1 3411-0171					Grouting Information We	ell Grouted? Ye	es No	
					Grout Material: Neat 0	Cement fro	om to 23 ft.	2 bags
					Nearest Known Source offeetdirectiontype			
					Well disinfected upon comp		<b>✓</b> No	
					Pump Not Installe Manufacturer's name Length of drop Pipe _ft. 0		P_ Volts ype Material	
					Abandoned Wells Does pr			/ell(s)?
					Yes 🗹 No			ANY
					Variance Was a variance g		for this well?	Yes 🔽 No
First Bedrock					Well Contractor Certificati		2022 <u>D</u> O	DUCETTE, J.
Last Strat	Aquifer Depth to Bedi	rock ft.			<u>Boart Longyear</u> License Business Nar			ame of Driller
County Well Inde			t		751337		Print	ed 5/27/2010 HE-01205-07

Minnesota Unique Well No. 751338	County Quad Quad ID	Ramsey			MINNESOTA DEPARTMEI WELL AND B RECORI Minnesota Statutes Co	ORING Entry Upda D Rece	Date 08/01/2008 tte Date 06/23/2009 ived Date 08/20/2007
Well Name FORD MOTOR CO.					Well Depth	Depth Completed	Date Well Completed
Township Range Dir Section Subse			ft.		45 <b>ft.</b>	45 ft.	07/11/2007
28 23 W 17 DBC	Elevat	ion Method			Drilling Method Vibracore/	rotasonic	
Well Address 966 MISSISSIPPI BL S ST PAUL MN 55116					Drilling Fluid Use Monitor well	Well Hydrofractured? From Ft. to Ft.	Yes V No
Geological Material FILL	Color	<b>Hardness</b> HARD	From 0	<b>To</b> 37	Casing Type Steel (black o	or low carbon) Joint T	hreaded Drive Shoe?
SANDSTONE	GRAY	HARD	37	45	Yes Vo Above/Below	v ft.	
					Casing Diameter 2 in. to 35 ft.	Weight lbs./ft.	Hole Diameter 6 in. to 45 ft.
					Open Hole from ft. to	ft.	
					Screen YES Make JOH Diameter Slot/G 2 10	A ENWIN	Set Between 35 ft. and 45 ft.
					Static Water Level	D 1 11	44/0007
					PUMPING LEVEL (below la ft. after hrs. pumping		11/2007
					Well Head Completion Pitless adapter manufacture Casing Protection At-grade (Environmen	r Model 12 in. above gradetal Wells and Borings C	
<b>REMARKS</b> AMW-07					Grouting Information We	ell Grouted?	No No
3411-0171					Grout Material: Neat 0	Cement fro	m to 30 ft. 4 bags
					Nearest Known Source offeetdirectiontype		<b>✓</b> No
					Well disinfected upon comp	ed Date Installed	No
					Manufacturer's name Length of drop Pipe _ft. (	Model number HF	P_ Volts pe Material
					Abandoned Wells Does po	roperty have any not in u	use and not sealed well(s)?
					Variance Was a variance g	ranted from the MDH fo	or this well? Yes Vo
	Aquifer Depth to Bedr	rock ft.			Well Contractor Certificati Boart Longyear License Business Nar	on 20	DOUCETTE, J. Reg. No. Name of Driller
County Well Index	x Onlin	e Repor	t		751338		Printed 5/27/2010 HE-01205-07

Minnesota Unique Well No.  County Ramsey					MINNESOTA DEPARTMEI WELL AND B		Date 08/01/2008
751339	Quad ID				RECOR	Upda	te Date 06/23/2009 ived Date 08/20/2007
					Minnesota Statutes Co		
Well Name FORD MOTOR CO.					Well Depth	Depth Completed	Date Well Completed
Township Range Dir Section Subs			ft.		29 ft.	29 ft.	07/11/2007
28 23 W 17 BDD	Elevati	on Method			Drilling Method Vibracore/	rotasonic	
Well Address 966 MISSISSIPPI BL S ST PAUL MN 55116					Drilling Fluid 	Well Hydrofractured? From Ft. to Ft.	Yes 🗹 No
					Use Monitor well		
Geological Material FILL SHALE	<b>Color</b> BLACK GRAY	<b>Hardness</b> MEDIUM HARD	<b>From</b> 0 20	<b>To</b> 20 23	Casing Type Steel (black of Yes No Above/Below		hreaded Drive Shoe?
SANDSTONE	GRAY	HARD	23	29	Casing Diameter 2 in. to 19 ft.	Weight	Hole Diameter 6 in. to 29 ft.
					2 111. 10 19 11.		
					transfer to the second second second	ft.	
					Screen YES Make JOH	0.25550	
					Diameter Slot/G 2 10	auze Length : 10	Set Between 19 ft. and 29 ft.
					Static Water Level 29 ft. from Land surface	Date Measured 07/11	/2007
					PUMPING LEVEL (below la ft. after hrs. pumping		
					Well Head Completion Pitless adapter manufacture	r Model	
					Casing Protection Y	12 in. above grad	de
						tal Wells and Borings O	
REMARKS AMW-5					Grouting Information We	ell Grouted? Yes	s No
3411-0171							
					Grout Material: Neat (	Dement from	m to 15 ft. 2 bags
					Nearest Known Source of	Contamination	
					feetdirectiontype Well disinfected upon comp	oletion? Yes	<b>✓</b> No
						ed Date Installed	
			=		Manufacturer's name  Length of drop Pipe_ft. (	Model number HP	P_ Volts pe Material
					Abandoned Wells Does pr	roperty have any not in u	use and not sealed well(s)?
					Yes 🛂 No		
					Variance Was a variance g		or this well? Yes Vo No
First Bedrock					Well Contractor Certificati		מסוופרדד ו
Last Strat	Aquifer Depth to Bedr	ock ft.			<u>Boart Longyear</u> License Business Nar		DOUCETTE, J.  Reg. No.  Name of Driller
County Well Index Online Report			751339		Printed 5/27/2010 HE-01205-07		

Minnesota Unique Well No.  County Ramsey				MINNESOTA DEPARTME WELL AND B	ORING Entry	y Date 08/01/2		
756581	Quad Quad ID				RECOR	D Rece	ate Date 06/17/2 pived Date 08/20/2	
Well Name FORD MOTOR CO. Township Range Dir Section Sub 28 23 W 17 BDD		on f	ft.		Minnesota Statutes C Well Depth 55 ft.  Drilling Method Vibracore/	Depth Completed 54 ft.	Date Well Compl 07/19/2007	eted
Well Address				_	Drilling Fluid		? Yes 🗸 No	-
966 MISSISSIPPI BL ST PAUL MN 55116					es:	Well Hydrofractured From Ft. to Ft.	? Yes [₹] NO	
OTT NOE WIN OUT IS					Use Monitor well			
Geological Material FILL SAND & CLAY	Color BROWN BROWN	Hardness MEDIUM MEDIUM	<b>From</b> 0 10	<b>To</b> 10 25	Casing Type Steel (black Yes No Above/Belov		Threaded Drive Shoe?	
SANDSTONE	TAN	HARD	25	55	Casing Diameter 2 in. to 44 ft.	<b>Weight</b> lbs./ft.	Hole Diameter 6 in. to 55 ft.	
					Open Hole from ft. to Screen YES Make JO	ft. HNSON <b>Type</b> stainl	acc staal	
					Diameter Slot/G 2 10	•	Set Between 44 ft. and 54 f	t.
					0. // ///			
					Static Water Level 39 ft. from Land surface	Date Measured 07/19	9/2007	
					PUMPING LEVEL (below in ft. after hrs. pumping			
					Well Head Completion Pitless adapter manufacture  ✓ Casing Protection Y  At-grade (Environmer	er Model  12 in. above grantal Wells and Borings C		
<b>REMARKS</b> MW-5, 3411-0171					Grouting Information W	ell Grouted? Ye	s No	
					Grout Material: Neat (	Cement fro	om to 37 ft. 4	bags
					Nearest Known Source of _feetdirectiontype			
					Well disinfected upon comp	(==1	<b>✓</b> No	
					Pump Not Install Manufacturer's name Length of drop Pipe ft.		P_ Volts pe Material	
					Abandoned Wells Does p		use and not sealed well(s)?	
					Variance Was a variance ç	granted from the MDH f	or this well? Yes	<b>✓</b> No
First Bedrock Last Strat	Aquifer Depth to Bedr	ock ft.			Well Contractor Certificat Boart Longyear License Business Na	2	2022 DUSHE Reg. No. Name of	
County Well Inde					756581		Printed 5/: HE-	27/2010 01205-07

Minnesota Unique Well No. 756582	County Quad Quad ID	Ramsey			MINNESOTA DEPARTMEI WELL AND B RECOR Minnesota Statutes C	ORING Entry D Update Receive	Date 06/17/2009
Well Name FORD MOTOR CO.					Well Depth	Depth Completed	Date Well Completed
Township Range Dir Section Subse			t.		40 ft.	40 ft.	07/20/2007
28 23 W 17 BDD	Elevatio	on Method			Drilling Method Vibracore/	rotasonic	
Well Address 966 MISSISSIPPI RIVER BL ST PAUL MN 55116					Drilling Fluid	Well Hydrofractured? From Ft. to Ft.	Yes V No
_			_		Use Monitor well		
Geological Material FILL SILTY SAND	Color BLACK BROWN	Hardness HARD HARD	<b>From</b> 0 6	<b>To</b> 6 20 40	Casing Type Steel (black of Yes No Above/Below		eaded Drive Shoe?
LIMESTONE	GRAY	HARD	20	40	Casing Diameter 2 in. to 30 ft.	<b>Weight</b> lbs./ft.	Hole Diameter 6 in. to 40 ft.
					Open Hole from ft. to	ft.	
					Screen YES Make JOH Diameter Slot/G 2 10	auze Length Se	e <b>t Between</b> 30 ft. and 40 ft.
					Static Water Level		
					31 ft. from Land surface		007
					PUMPING LEVEL (below la ft. after hrs. pumping		
					Well Head Completion Pitless adapter manufacture Casing Protection Y At-grade (Environmen	or Model  ✓ 12 in. above grade  atal Wells and Borings ONI	
REMARKS					Grouting Information We		No
MW-10 3411-0171					Grout Material: Neat 0	Cement from	
					Nearest Known Source of _feet _direction _type		
					Well disinfected upon comp	2200 885 F	No
						ed Date Installed  Model number HP _	Volts · Material
					Abandoned Wells Does pr	roperty have any not in use	e and not sealed well(s)?
					Variance Was a variance g	aranted from the MDH for t	his well? Yes Vo
					Well Contractor Certificati	CINCI I COM	100 - 100
First Bedrock	Aquifer				Boart Longyear	202	<u>DUSHER, D.</u>
	Depth to Bedro	ck ft.			License Business Nar	ne Lic. Or Re	eg. No. Name of Driller
County Well Inde	x Online	Report			756582		Printed 5/27/2010 HE-01205-07



### Appendix B

Well Receptor Surveys

### **ARCADIS**

#### **Well Receptor Survey**

Current Resident 2221 W Pinehurst Ave St. Paul, MN 55116

Homeowner?	Yes	No 🗌			
Tenant?	Yes	No 💢			
Connected to P	ublic Water Supp	oly? Yes	No 🗌		
If so, when?					
Number of Wells	s Present at Res	idence	In Use	or Abandor	ned
If in use, where	are they located	?			
lf abandoned, w	/hen?				
Well Use	(e.g., domestic,	industrial, municipa	I, monitoring, lawn/ga	ardening, irrigation	1)
Do you have a d	copy of the well o	construction report?		Yes 🗌	No 🔀
Do you have a d	copy of the well a	bandonment report	?	Yes 🗌	No 🛕
Would you allow	v us to collect a s	ample from your we	ell?	Yes 🗌	No 🗌
Basement Prese	ent?			Yes 🂢	No 🗌
Sump Present?				Yes X	No 🗌
Possible Petrole	eum sources exis	et on property?	Don't know	Yes 🗌	No 🗌
		-			
Comments	Connec	ted to city	. Water Su	pply-no	
(include property	v use: residentia	business industria	al farmstead)		

### **ARCADIS**

### Well Receptor Survey

Current Resident 1025 S Bowdoin St St. Paul, MN 55116

	Carried Contract				
Homeowner?	Yes	No 🗌			
Tenant?	Yes 🗵	No 🔲	/		
Connected to F	Public Water Su	upply? Yes	□ No □		
If so, when?	_(91	1			$\mathcal{A}$
Number of Wel	lls Present at R	esidence	In Use	or Aband	oned
If in use, where	e are they locate	ed?			
If abandoned, v	when?				
Well Use	/ day	S- 1-1-1-1-1			
	(e.g., domest	ic, industrial, mu	nicipal, monitoring, lav	wn/gardening, irrigati	on)
Do you have a	copy of the we	ll construction re	port?	Yes	No.
Do you have a	copy of the we	ll abandonment i	report?	Yes 🗌	No D
Would you allo	w us to collect	a sample from yo	our well?	Yes 🗌	No □
Basement Pres	sent?			Yes 🖊	No 🗌
Sump Present1	?			Yes 🖊	No 🗆
Possible Petrol	leum sources e	xist on property?	•	Yes 🗌	No YNKN
If so, where?					
Comments					
Commonio					
(include proper	ty use: residen	tial, business, inc	dustrial, farmstead)		

#### **Well Receptor Survey**

Building Manager Highland Park Townhomes 2052 W Montreal Ave St. Paul, MN 55116  Cuthon he	mana	ger
Homeowner? Yes No 🗆		
Tenant? Yes No No		
Connected to Public Water Supply? Yes No I		
Number of Wells Present at Residence In Use	or Abandon	ed
If in use, where are they located?		
If abandoned, when?		
Well Use (e.g., domestic, industrial, municipal, monitoring, lawn/gar	dening, irrigation	)
Do you have a copy of the well construction report?	Yes 🗌	No D
Do you have a copy of the well abandonment report?	Yes 🗌 🔾	No DK
Would you allow us to collect a sample from your well?	Yes 🗌 🐪	No 🗌
Basement Present?	Yes	No 🗌
Sump Present?	Yes 🗍	
Possible Petroleum sources exist on property?	Yes 🗆 🗇	,No □
If so, where?		
comments These are townho	mes	and

(include property use: residential, business, industrial, farmstead)

### **ARCADIS**

### Well Receptor Survey

Current Resident 2146 W Pinehurst Ave St. Paul, MN 55116

Homeowner?	Yes.	No 🗌							
Tenant?	Yes 🗌	No 🗌							
Connected to Public Water Supply? Yes No									
If so, when?									
Number of Well	s Present at Res	idence	In Use	or Abandor	ned				
If in use, where	are they located	?							
If abandoned, w	/hen?								
Well Use (e.g., domestic, industrial, municipal, monitoring, lawn/gardening, irrigation)									
Do you have a	Do you have a copy of the well construction report?  Yes  No								
Do you have a	copy of the well a	abandonment report?		Yes	No.				
Would you allow	v us to collect a s	sample from your well?	•	Yes	No 🗌				
Basement Prese	ent?			Yes	No 🗌				
Sump Present?	V			Yes 🖯	No 🗌				
Possible Petrole	eum sources exis	st on property?		Yes 🗌	No 🛘				
If so, where?									
Comments Residential									
(include property use: residential, business, industrial, farmstead)									

United Auto Workers Local 879 2191 Ford Pkwy St. Paul, MN 55116

Homeowner? Yes ☐	No 🗌			
Tenant? Yes □	No 🗌			
Connected to Public Water Sup		No 🗆	J ar of	
If so, when? WSWL		2 that	J amore of	U
Number of Wells Present at Res	sidence/\)\(\)\(\)	In Use	or Abandor	ned
If in use, where are they located	]?			
If abandoned, when?				
Well Use (e.g., domestic,	, industrial, municipal,	monitoring, lawn/g	gardening, irrigation	1)
Do you have a copy of the well o	construction report?		Yes	No 🗶
Do you have a copy of the well a	abandonment report?		Yes 🗌	No No
Would you allow us to collect a s	sample from your well	?	Yes 📉	No 🗌
Basement Present?			Yes X	No 🗌
Sump Present?			Yes 🗌 WNS	Mr. [
Possible Petroleum sources exis	st on property?		Yes 🗆 when	DIMPAGE
If so, where?		-		
comments <u>J spo</u> Secretary & h under bailding	ke with 1 e told me	retiree/f there is	ormer fr	nancial running
(include property use: residentia		farmstead)	11	0

#### Well Receptor Survey

Building Manager Highland Park Townhomes 994 Cleveland Ave S St. Paul, MN 55116

Homeowner?	Yes 🂢	No 🗌					
Tenant?	Yes 🗌	No 💢					
Connected to P	ublic Water Sup	ply? Yes 💢	No 🗌				
If so, when?	unknow	5					
Number of Wells Present at Residence In Use or Abandoned							
If in use, where	are they located	?NA					
If abandoned, v	vhen?_NA						
Well Use	NA	industrial, municipal					
	(e.g., domestic,	industrial, municipal	, monitoring, lawn	gardening, irrigati	ion)		
Do you have a	copy of the well o	construction report?		Yes 🗌	No 💢		
Do you have a	copy of the well a	abandonment report?	•	Yes 🗌	No 🔀		
Would you allow	v us to collect a s	sample from your we	II? NA	Yes 🗌	No 🗌		
Basement Pres	ent?			Yes 🔀	No 🗌		
Sump Present?				Yes 🗌	No 🔀		
Possible Petrole	eum sources exis	st on property?		Yes 🗌	No 🗫		
If so, where?	NA						
<del></del>							
Comments			10-21-11-1-1				
(include propert	y use: residentia	I, business, industria	, farmstead)				

#### Well Receptor Survey

Building Manager 755 Mt Curve Blvd St. Paul, MN 55116

Homeowner? Yes ☒ No ☐				
Tenant? Yes ☐ No 💢				
Connected to Public Water Supply? Yes	es 🕅 No 🗀			
If so, when?	In as we	B more		
Number of Wells Present at Residence	O as far as we	or Abandor	ned	
If in use, where are they located?				
If abandoned, when?				
Well Use (e.g., domestic, industrial, r	municipal, monitoring, lawn/ga	ardening, irrigation	1)	
Do you have a copy of the well construction	report?	Yes	No 🗌	NA
Do you have a copy of the well abandonme	nt report?	Yes 🗌	No 🗌	NA
Would you allow us to collect a sample from		nYes □	No 🗌	NA
Basement Present? Building i	waist high	Yes 🗌	No 🗌	
Sump Present?	waist high	Yes 🗌	No 💢	
Possible Petroleum sources exist on proper	ty?	Yes 🗌	No 📈	
If so, where?		-	/	
Comments				
(include property use: residential, business,	industrial, farmstead)			

#### Well Receptor Survey

Current Resident 2181 W Pinehurst Ave St. Paul, MN 55116

Homeowner? Yes No □			
Tenant? Yes No			
Connected to Public Water Supply? Yes No   If so, when?  1900  No			
Number of Wells Present at ResidenceIn Use	or Abando	ned	
If in use, where are they located?			
If abandoned, when?			
Well Use (e.g., domestic, industrial, municipal, monitoring, law	n/gardening, irrigatio	on)	
Do you have a copy of the well construction report?	Yes 🗌	No 🗌	NH
Do you have a copy of the well abandonment report?	Yes 🗌	No 🗌	
Would you allow us to collect a sample from your well?	Yes 🗌	No 🗌	
Basement Present?	Yes 🗌	No 🏋	
Sump Present?	Yes 🗌	No ∕⁄	
Possible Petroleum sources exist on property?	Yes 🗌	No 🔀	
If so, where?			$\overline{}$
Comments			
(include property use: residential, business, industrial, farmstead)			



Current Resident 2231 W Pinehurst Ave St. Paul, MN 55116

Homeowner?	Yes 🗵	No 🗌			
Tenant?	Yes 🗌	No ⊠′			
Connected to P	Public Water Sup	pply? Yes 🛚	No □		
If so, when?					
Number of Well	ls Present at Re	sidence	In Use	or Aband	oned
If in use, where	are they located	d?			
If abandoned, v	vhen?				
Well Use					
	(e.g., domestic	, industrial, munic	ipal, monitoring, law	n/gardening, irrigat	ion)
Do you have a	copy of the well	construction repo	rt?	Yes 🗌	No 🗌 MA
Do you have a	copy of the well	abandonment rep	oort?	Yes	NO   NA
Would you allow	w us to collect a	sample from your	well?	Yes	No 🗌 NIA
Basement Pres	ent?			Yes 🏻	No 🗌
Sump Present?				Yes 🔀	No 🗌
Possible Petrole	eum sources exi	ist on property?		Yes □	No ⊠
If so, where?					
Comments					



Current Resident 2124 W Pinehurst Ave St. Paul, MN 55116

Homeowner?	Yes	No 🗆				
Tenant?	Yes	No X	/			
Connected to Pu	ıblic Water Supr	oly? Yes	Į No			
If so, when?		$\sim$				
Number of Wells	Present at Res	idence	In Use		or Abandone	d
If in use, where a	are they located	?				
If abandoned, wl	hen?					
Well Use	(e.g., domestic,	industrial, munic	cipal, monitori	ng, lawn/garde	ning, irrigation)	
Do you have a c	opy of the well o	construction repo	ort?	Ye	es 🗌	No 🗌
Do you have a c	opy of the well a	abandonment re	port?	Ye	es 🗌	No 🗌
Would you allow	us to collect a s	sample from you	r well?	Ye	es 🗌	No 🗌
Basement Prese	ent?			Ye	es 🗌	No 🗌
Sump Present?				Y	es 🗌	No 🗌
Possible Petrole	um sources exis	st on property?		Y	es 🗌	No 🗌
If so, where?						
			-			
Comments						
(include property	/ use: residentia	l, business, indu	strial, farmste	ead)		

# JUL 16 2010

#### **Well Receptor Survey**

Mark L. Malterud Denistry 770 Mt Curve Blvd St. Paul, MN 55116

Building owner Homeowner Yes XI N	o []			
	• <u> </u>		, Al	
Connected to Public Water Supply?		No 🗌		
If so, when?				
Number of Wells Present at Reside	nce	n Use	or Aband	loned
If in use, where are they located?				
If abandoned, when?				
Well Use (e.g., domestic, inc	łustrial, municipal, m	onitoring, lawn/gard	dening, irrigat	ion)
Do you have a copy of the well con-	struction report?		Yes 🗌	No 🖾
Do you have a copy of the well aba	ndonment report?		Yes 🗌	No 🔯
Would you allow us to collect a san	nple from your well?		Yes 🗌	No Done nece
Basement Present?			Yes 🖊	No 🔲
Sump Present?			Yes 🗌	No 💢
Possible Petroleum sources exist o	n property?		Yes 🗌	No ⊠
If so, where?			*	7 1
Comments <u>Business</u> Property 5 its or  an old wet lan  (include property use: residential, b	aruperty do avea. As usiness, industrial, fa	Jenfal wet from we armstead) 5 yst	em + 1	- a waste pur vent throng
		6.0	10 100	7 water was
		peron		Buildness

Building Manager Highland Park Townhomes 2046 W Montreal Ave St. Paul, MN 55116

Homeowner?	Yes 💢	No 🗌			
Tenant?	Yes X	No 🗀			
Connected to Pu	ıblic Water Supp	ly? Yes 🗹	No 🗔		
f so, when?					
Number of Wells	Present at Res	idenceO	In Use	or Abandon	ed
f in use, where a	are they located	?			
f abandoned, wl	hen?				
Well Use	(e.g., domestic,	industrial, municipal,	monitoring, lawn/ga	dening, irrigation	)
Do you have a c	opy of the well c	onstruction report?		Yes	No 🗌
Oo you have a c	opy of the well a	bandonment report?		Yes	No 🗌
Would you allow	us to collect a s	ample from your well	?	Yes 🗌	No 🗌
Basement Prese	ent?			Yes 🗹	No 🗌
Sump Present?				Yes	No 🔀
Possible Petrole	um sources exis	t on property?		Yes	No 🗌
f so, where?				· · · · · · · · · · · · · · · · · · ·	
Comments	hesiden	List			

#### **Well Receptor Survey**

Current Resident 2159 W Pinehurst Ave St. Paul, MN 55116

Homeowner?	Yes 🔯	No 🗌				
Tenant?	Yes 🗌	No 🏋				
Connected to P	ublic Water Supp	oly? Yes Д⊄	No 🗌			
If so, when?	77	,				
Number of Well	s Present at Res	sidence	In Use	or Aband	oned	
If in use, where	are they located	?				
If abandoned, w	/hen?					
Well Use	(e.g., domestic,	industrial, municipal, r	nonitoring, lawn/	gardening, irrigati	on)	
Do you have a	copy of the well o	construction report?	NA	Yes 🗌	No 🗌	
Do you have a	copy of the well a	abandonment report?	NA	Yes 🗌	No 🗌	
Would you allow	v us to collect a s	sample from your well?	NA	Yes 🗌	No 🗌	
Basement Prese	ent?			Yes 🗵	No 🗌	
Sump Present?				Yes 🔀	No 🗌	
Possible Petroleum sources exist on property?						
If so, where?						
(E. 1 )						
Comments						
		<del></del>				
(include propert	y use: residentia	l, business, industrial,	farmstead)			

#### **Well Receptor Survey**

Lavish 2140 Ford Pkwy St. Paul, MN 55116

Homeowner? Yes No No		
Tenant? Yes ☑ No ☐		
Connected to Public Water Supply? Yes No		
If so, when?	つ	$\supset$
Number of Wells Present at ResidenceIn Use	or Abandor	ned
If in use, where are they located?		
If abandoned, when?		
Well Use (e.g., domestic, industrial, municipal, monitoring, la	awn/gardening, irrigation	1)
Do you have a copy of the well construction report?	Yes 🗌	No-E
Do you have a copy of the well abandonment report?	Yes 🗌	No.
Would you allow us to collect a sample from your well?	Yes 🖯	No 🗌
Basement Present?	Yes 🗌	No.
Sump Present?	Yes	No 📗
Possible Petroleum sources exist on property?	Yes 🗌	No 🗌
If so, where?		
Comments I have only been Than 2 years - not sure	Nove 1+55	
(include property use: residential, business, industrial, farmstead)		

JUL 1 3 2010

## **ARCADIS**

#### **Well Receptor Survey**

Current Resident 2155 W Pinehurst Ave St. Paul, MN 55116

Homeowner?	Yes 💢	No 🗌			
Tenant?	Yes 🗌	No 썹			
Connected to P	ublic Water Sup	ply? Yes 🗓	No 🗌		
If so, when?	1.				
Number of Well	s Present at Res	sidence	In Use	or Aband	doned
If in use, where	are they located	1?			
If abandoned, v	vhen?				
Well Use	(e.g., domestic	, industrial, munici	pal, monitoring, lawn	/gardening, irrigat	tion)
Do you have a	copy of the well	construction report	?	Yes 🗌	No 🗌
Do you have a	copy of the well a	abandonment repo	ort?	Yes 🗌	No 🗌
Would you allow	v us to collect a	sample from your	well?	Yes 🗌	No 🗌
Basement Pres	ent?			Yes 💢	No 🗌
Sump Present?				Yes 🗌	No 💢
Possible Petrole	eum sources exi	st on property?		Yes 🗌	No 🗌
If so, where?	<del></del>				
Comments  2 do 1	2 ds a	at hau	e This I	nforma of were	fin.



Current Resident 1026 S Bowdoin St St. Paul, MN 55116

Homeowner?	Yes X	No 🗌			
Tenant?	Yes	No 🗌			
Connected to P	ublic Water Sup	oly? Yes 🗓	No 🗔		
If so, when?					
Number of Well	ls Present at Res	idence	In Use	_ or Abando	ned $\phi$
If in use, where	are they located	?			162
If abandoned, v	vhen?				
Well Use	(e.g., domestic,	industrial, municipal,	monitoring, lawn/g	ardening, irrigatio	on)
Do you have a	copy of the well o	construction report?		Yes 🗌	No 🗋
Do you have a	copy of the well a	abandonment report?		Yes 🗌	No 🗌
Would you allov	w us to collect a	sample from your well	?	Yes 🗌	No 🗌
Basement Pres	ent?			Yes 🔽	No 🗌
Sump Present?				Yes 🖳	No 🗌
Possible Petrol	eum sources exi	st on property?		Yes 🗌	No 🔽
If so, where?	*				
Comments	-				
unclude prober	iv inse: residentia	business industrial	tarmeteadt		



#### Well Receptor Survey

Weight Watchers 2118 Ford Pkwy St. Paul, MN 55116

Homeowner?	Yes 🗌	No 🔼					
Tenant?	Yes 🗓	No 🗌					
Connected to Pu	,		No 🗌				
If so, when?	- Planty 90	5 (.			2		
Number of Wells	Present at Res	idenceO	In Use	or Abandon	ed		
If in use, where a	are they located?	,					
If abandoned, w	hen?	-24 Y					
Well Use							
	(e.g., domestic,	industrial, municipal,	monitoring, lawn/ga	rdening, irrigation	)		
Do you have a c	Do you have a copy of the well construction report?  Yes □  No ★						
Do you have a c	opy of the well a	bandonment report?		Yes 🗌	No 🗹		
Would you allow	us to collect as	ample from your well	?	Yes 🗹	No 🗌		
Basement Prese	ent?			Yes 🗌	No 🗹		
Sump Present?				Yes 🗌	No 🗹		
Possible Petrole	um sources exis	t on property?		Yes 🗌	No □ 7		
If so, where?							
Comments <u>business</u>							
***							
(include property	y use: residential	, business, industrial,	farmstead)				



#### **Well Receptor Survey**

Current Resident 5 Villard Ct St. Paul, MN 55116

Homeowner?	Yes	No 🗌				
Tenant?	Yes	No 🗌				
Connected to P	oublic Water Sup	ply? Yes	No □			
If so, when?	Since a	se've live	No D O here for 2	4 years		
Number of Well	ls Present at Res	sidence	In Use	or Aband	oned	
If in use, where	are they located	!?				
If abandoned, v	vhen?					
Well Use	(e.g., domestic	industrial, mur	nicipal, monitoring, lav	vn/gardening, irrigati	on)	
Do you have a	copy of the well	construction rep	port?	Yes	No .⊠	
Do you have a	copy of the well a	abandonment r	eport?	Yes	No 🛛	
Would you allow	w us to collect a	sample from yo	our well? Don't the	Yes 🏻	No 🗌	
Basement Pres	ent?		if you longer	Yes 🖾	No 🗌	al-me to
Sump Present?	•		differences.	yon are mou	No A	come code
Possible Petrole	eum sources exi	st on property?	***************************************	Yes 🛮 💈	No 🔼	any Sanya
of Villand + clevels of the former 20 years						
Comments	acon	ing to	ou reight	no there	were,	rever
- any	wellson	these	groperties.	in the con	A. J	ley
are o	region	when	ls.			
(include propert	ty use: residentia	al, business, inc	lustrial, farmstead)			



Building Manager 2049 W Montreal Ave St. Paul, MN 55116

Homeowner?	Yes	No 🗌						
Tenant?	Yes	No X						
Connected to P	ublic Water Sup <sub>l</sub>	oly? Yes	s <b>IX</b>	No 🗌				
If so, when?	-		`					
Number of Well	s Present at Res	idence	) lr	n Use	or Aband	loned		
If in use, where	are they located	?						
If abandoned, w	/hen?							
Well Use	(e.g., domestic,	industrial, m	unicipal, mo	onitoring, lawn/g	ardening, irrigat	ion)		
Do you have a	copy of the well o	construction r	eport?		Yes 🗌	N9XQ		
Do you have a	copy of the well a	abandonmen	t report?		Yes 🗌	No D		
Would you allow	v us to collect a	sample from	your well?		Yes 🗌	No 🔁		
Basement Pres	ent?				Yes	No 🗌		
Sump Present?					Yes 🗌	No 🏹	_	h (0
Possible Petrole	eum sources exis	st on property	/?		Yes 🗌	No 🗆	?	re de
If so, where?								•
Comments	Reside	nhal						; ;
(include propert	y use: residentia	l, business, i	ndustrial, fa	ırmstead)		· · · · · · · · · · · · · · · · · · ·		,

#### Anderson, Louise

From:

Nelson-Kalmes, Trika

Sent:

Friday, July 09, 2010 8:49 AM

To:

Anderson, Louise Zinda, Bryan

Cc: Subject:

RE: Receptor Survey Responses

Lou:

Can you start filing in the spreadsheet with the responses from the surveys. See link below. I think it is straight forward, but let me know if you want to run through a few together. Please bill your time MN000613.0002.0001

<u>G:\PROJECTS\Ford-St.Paul\Working\Receptor Survey\Address Datasheet.xlsx</u> (database tab) Please make sure you put the residents name in the spreadsheet. If columns don't exist, go ahead and add them.

I had a verbal call from Lynne Lee at 1068 Bowdoin St. She is connected to city water, and has no well or sump on her property. She does have a basement. Please be sure to add her. Thanks, Trika

From: Anderson, Louise

Sent: Tuesday, July 06, 2010 12:33 PM

To: Nelson-Kalmes, Trika

Subject: Receptor Survey Responses

I have started a file to accumulate all the survey responses. Help yourself to the documents anytime you want ... ft desk.

Louise Anderson | Administrator | louise.anderson@arcadis-us.com

ARCADIS U.S., Inc. | 430 First Avenue North, Suite 720| Minneapolis, MN, 55401 T. 612.339.9434 | F. 612.336.4538 <a href="https://www.arcadis-us.com">www.arcadis-us.com</a>

ARCADIS, Imagine the result

Please consider the environment before printing this email.





#### Well Receptor Survey

TCF Bank 2163 Ford Pkwy St. Paul, MN 55116

Homeowner?	Yes	No X			
Tenant?	Yes	No 🗆			
Connected to P	ublic Water Supp		No 🗔		
If so, when?	19/05	New Box	of oppred	Wos	
Number of Wells	s Present at Res	idence	In Use	or Abandor	ned
If in use, where	are they located	?			
If abandoned, w	hen?		-15.00		
Well Use	(a.g. damastic	industrial municipal	manufacture to the		·
	(e.g., domestic,	industrial, municipal	, monitoring, lawn/ga	rdening, irrigatior	1)
Do you have a c	copy of the well o	onstruction report?		Yes 🗆 🏑 🛝	No 🗌
Do you have a d	copy of the well a	bandonment report?		Yes DIN	No 🗌
Would you allow	us to collect a s	ample from your we	1?	Yes 🗌 🗸	No 🗌
Basement Prese	ent?			Yes 🗌	No.
Sump Present?				Yes 🗌	No 🔀
Possible Petrole	eum sources exis	t on property?		Yes 🗀	No 🔀
If so, where?		····			
Comments					***************************************
(include property	/ use: residential	, business, industria	, farmstead)		



Current Resident 2151 W Pinehurst Ave St. Paul, MN 55116

Homeowner?	Yes 🔼	No 🗌						
Tenant?	Yes 🗌	No 🗵						
Connected to P	Connected to Public Water Supply? Yes No 🗌							
If so, when?	always	50.1						
Number of Well	s Present at Res	sidence	In Use	or Abandon	ed			
If in use, where	are they located	?						
If abandoned, w	/hen?							
Well Use	(e.g. domestic	industrial, municipal,	monitoring lown/gg	rdoning irrigation	1			
	(e.g., domestic,	muusmai, municipai,	monitoring, lawn/ga	rdening, imgation	)			
Do you have a	copy of the well o	construction report?		Yes	No 🗌			
Do you have a	copy of the well a	abandonment report?		Yes	No 🗌			
Would you allow	v us to collect a	sample from your wel	l?	Yes 🗌	No 🗌			
Basement Pres	ent?			Yes	No 🗌			
Sump Present?	ı			Yes 🔲 🦳	No 🗌			
Possible Petrole	eum sources exis	st on property?		Yes 🗌	No			
If so, where?	If so, where?							
Comments								

Current Resident 1032 S Bowdoin St St. Paul, MN 55116

Homeowner?	Yes 💢	No 🗌			
Tenant?	Yes 🗌	No ∰			
Connected to Po	ublic Water Supp	oly? Yes 🛱	No 🗌	. 411	
If so, when?	I will gue	ss 1959, when	1 the house u	Jas 6VIH	
			In Use		ned
If in use, where	are they located	?			
If abandoned, w	hen?				
Well Use	(e.g., domestic,	industrial, municipa	l, monitoring, lawn/ga	rdening, irrigation	n)
Do you have a c	copy of the well c	onstruction report?		Yes 🗌	No 🗌
Do you have a c	copy of the well a	bandonment report	?	Yes 🗌	No 🗌
Would you allow	us to collect a s	ample from your we	ell?	Yes 🗌	No 🗌
Basement Prese	ent?			Yes 🛱	No 🗆
Sump Present?				Yes	No de ("Beaver" system is used)
Possible Petrole	um sources exis	t on property?		Yes 🕅	No 🗆
f so, where? just lawnmower in garage, and gas for lawnmower.  I do change oil for car, but & bring oil to county recycling site and always have.  Comments					



Current Resident 1061 S Bowdoin St St. Paul, MN 55116

Homeowner?	Yes 🛛	No 🗌			
Tenant?	Yes	No 🛛			
Connected to P	ublic Water Supp	oly? Yes ⊠	No 🗌		
If so, when?	1954				
Number of Well	s Present at Res	idenceO	In Use	or Abandon	ed
If in use, where	are they located	?			
if abandoned, w	vhen?				
Well Use	(e.g., domestic,	industrial, municipal,	monitoring, lawn/ga	rdening, irrigation	)
Do you have a	copy of the well o	construction report?		Yes 🗌	No 🗹
Do you have a	copy of the well a	abandonment report?		Yes 🗌	No 🗹
Would you allow	v us to collect a s	sample from your wel	l?	Yes	No 🗌
Basement Pres	ent?			Yes 🛛	No 🗌
Sump Present?				Yes	No 🏻
Possible Petrole	eum sources exis	st on property?		Yes 🗌	No 🛮
If so, where?					
Comments	RESIDENTI	9 <i>L</i>			

#### **Well Receptor Survey**

Current Resident 1049 S Bowdoin St St. Paul, MN 55116

Homeowner? Yes ☑ No ☐						
Tenant? Yes ☐ No ☑						
Connected to Public Water Supply? Yes ☑ No ☐						
If so, when?						
Number of Wells Present at Residence In Use	or Abandon	ed				
If in use, where are they located?						
If abandoned, when?						
Well Use (e.g., domestic, industrial, municipal, monitoring, lawn/ga	rdening, irrigation	)				
Do you have a copy of the well construction report?	Yes 🗌	No 🗌				
Do you have a copy of the well abandonment report?	Yes	No 🗌				
Would you allow us to collect a sample from your well?	Yes	No 🗌				
Basement Present?	Yes 🔽	No 🗌				
Sump Present?	Yes 🗌	No 🖳				
Possible Petroleum sources exist on property?	Yes	No 🗌				
If so, where?						
Comments Purchased house in 1985. Don't know about anything prior to 1985.						

#### Well Receptor Survey

Building Manager Highland Park Townhomes 2054 W Montreal Ave St. Paul, MN 55116

Homeowner?	Yes	No 🗌						
Tenant?	Yes	No X						
Connected to P	ublic Water Sup	ply? Yes	No 🗌		already			
If so, when?	Not sune.	I bought my	place in 21	os and it was	Connected.			
Number of Wells Present at Residence Ø In Use or Abandoned								
If in use, where	are they located	1?						
lf abandoned, w	/hen?							
Weil Use								
Do you have a c		construction report		Yes	No 🔀			
Do you have a c	copy of the well	abandonment repo	rt?	Yes	No A			
Would you allow	v us to collect a	sample from your v	vell?	Yes 🔀	No 🗌			
Basement Prese	ent?			Yes	No 🗌			
Sump Present?				Yes	No X			
Possible Petrole	eum sources exi	st on property?		Yes 🗌	No X			
If so, where?								
Comments								

Current Resident 1025 S Finn St St. Paul, MN 55116

Homeowner?	Yes	No 🗌			
Tenant?	Yes 🗌	No 🗵			
Connected to P	Public Water Sup	oply? Yes	No 🗌		
		•	IN 190	54	
Number of Well	ls Present at Re	esidence	In Use	or Abando	oned <u>UNKNOWN</u>
lf in use, where	are they located	d?			
lf abandoned, w	vhen? <i>[/_]</i> /	VKNOWN			
Well Use	(e.g., domestic	c, industrial, municipa	al, monitoring, lawn/g	ardening, irrigatio	on)
Do you have a	copy of the well	construction report?		Yes	No 💢
Do you have a	copy of the well	abandonment report	?	Yes 🗌	No 💢
Would you allov	w us to collect a	sample from your w	ell?	Yes 🔽	No 🗌
Basement Pres	ent?			Yes	No 🗌
Sump Present?	•			Yes 🗌	No 🗵
Possible Petrole	eum sources ex	ist on property?		Yes	No 🗌
If so, where?	UNKN	onn		11-11-2	
Comments					
(include propert	ty use: esidenti	al husiness industri	al formatood)		

Building Manager Highland Park Townhomes 1002 Cleveland Ave S St. Paul, MN 55116

Homeowner?	Yes 🗷	No 🗌						
Tenant?	Yes 🗌	No 🗌						
Connected to P	ublic Water Sup <sub>l</sub>	oly? Yes 🔀	No 🗌					
If so, when?	6-28-06-	my acte of e	wwwship					
Number of Well	Number of Wells Present at Residence O Korwa In Use or Abandoned							
If in use, where	are they located	?						
If abandoned, w	/hen?							
Well Use								
	(e.g., domestic,	industrial, municipal,	monitoring, lawn/ga	rdening, irrigatior	۱)			
Do you have a d	copy of the well o	construction report?		Yes 🗌	No 💹			
Do you have a c	copy of the well a	abandonment report?		Yes 🗌	No 🔀			
Would you allow	v us to collect a	sample from your well	?	Yes 🗌	No.			
Basement Prese	ent?			Yes 🔀	No 🗌			
Sump Present?				Yes	No X			
Possible Petrole	eum sources exis	st on property?		Yes 🗌	No 🔽			
If so, where?								
Comments  Tunew	Contac Hive /	+ Wighla	nd Park 651-739-	1 THA, 1 5544	dvaried			

#### **Well Receptor Survey**

TERRI CAVANAUGH Current Resident 2134 W Pinehurst Ave St. Paul, MN 55116

Homeowner? Yes X No □								
Tenant? Yes ☐ No 💢								
Connected to Public Water Supply? Yes No No								
If so, when? <u>Oct. 18</u> , 1937								
Number of Wells Present at Residence In Use or Abandoned								
If in use, where are they located?								
If abandoned, when?								
Well Use  (e.g., domestic, industrial, municipal, monitoring, lawn/gardening, irrigation)	Well Use							
Do you have a copy of the well construction report?  Yes No								
Do you have a copy of the well abandonment report?  Yes  No								
Would you allow us to collect a sample from your well? Yes ☐ No ☐								
Basement Present? Yes ☒ No ☐								
Sump Present? Yes ☑ No □								
Possible Petroleum sources exist on property?  Yes  No   No								
If so, where?								
Comments								

#### Well Receptor Survey

Current Resident 2225 W Pinehurst Ave St. Paul, MN 55116

Homeowner?	Yes 🛮	No 🗌			
Tenant?	Yes 🗌	No 🗌			
Connected to P	ublic Water Supp	oly? Yes 🛚	No 🗌		
If so, when?	?				
Number of Wells Present at Residence In Use or Abandoned					
If in use, where	are they located	?			
If abandoned, w	/hen?	<del></del> .			
Well Use	(e.g., domestic,	industrial, municipal,	monitoring, lawn/g	ardening, irrigatior	1)
Do you have a copy of the well construction report?  Yes □ No □				No 🖸	
Do you have a	copy of the well a	bandonment report?		Yes	No 🔽
Would you allow	v us to collect a s	ample from your well	?	Yes 🔽	No 🗌
Basement Pres	ent?			Yes \subset	No 🗌
Sump Present?				Yes 🗓	No 🗌
Possible Petrole	eum sources exis	st on property?		Yes 🗌	No 🗌
If so, where?					
Comments					
(include property use: residential, business, industrial, farmstead)					

#### Well Receptor Survey

Current Resident 1038 S Finn St St. Paul, MN 55116

Homeowner?	Yes 🗗	No 🗌			
Tenant?	Yes 🗌	No 🗹			
Connected to Pr	ublic Water Supp	oly? Yes	No 🗌		
If so, when?	1954				
Number of Wells Present at ResidenceO In Use or Abandoned					
If in use, where	are they located	?			
If abandoned, w	hen?				
Well Use	To an alama and a	Seeding ( )		<del></del>	
	(e.g., domestic,	industrial, municipa	l, monitoring, lawn/ga	rdening, irrigation	1)
Do you have a copy of the well construction report?				No 🗌	
Do you have a copy of the well abandonment report?  Yes  No				No 🗌	
Would you allow	us to collect a s	sample from your we	ell?	Yes 🗌	No 🗌
Basement Prese	ent?			Yes 🗗	No 🗌
Sump Present?				Yes 🗌	No 🗗
Possible Petrole	eum sources exis	st on property?		Yes 🗌	No 🕡
If so, where?					
Comments	_				
<del></del>					
(include property	y use: residentia	I, business, industria	al, farmstead)		

# $\sqrt{}$

## **ARCADIS**

#### Well Receptor Survey

Building Manager Highland Terrace Apts 1045 Cleveland Ave S St. Paul, MN 55116

Homeowner? Yes \( \square\) No \( \square\)		
Tenant? Yes ☐ No		
Connected to Public Water Supply? Yes No		
If so, when? 1960±		
Number of Wells Present at Residence Sauce In Use - 0 -	or Abando	ned <u>sure</u>
If in use, where are they located?		
If abandoned, when?		
Well Use (e.g., domestic, industrial, municipal, monitoring, lawn/ga	ardening, irrigatio	n)
Do you have a copy of the well construction report?	Yes	No 🖊
Do you have a copy of the well abandonment report?	Yes	No 📈
Would you allow us to collect a sample from your well?	Yes 🗌	No 🗌
Basement Present?	Yes 🖊	No 🗌
Sump Present?	Yes	No 🖊
Possible Petroleum sources exist on property?	Yes □	No 🗌
f so, where?		
Comments 3 multi family Apartm	ent bla	195
(include property use: residential, business, industrial, farmstead)		· · · · · · · · · · · · · · · · · · ·



#### Well Receptor Survey

Current Resident 2215 W Pinehurst Ave St. Paul, MN 55116

Homeowner?	Yes X	No 🗀				
Tenant?	Yes 🗌	No A				
Connected to P	ublic Water Sup	ply? Yes	No 🗌			
If so, when?	1946	** 102 **1				
Number of Wells Present at Residence In Use or Abandoned						
If in use, where	are they located	1?				
If abandoned, w	hen?					
Well Use						
	(e.g., domestic	, industrial, municipal	, monitoring, lawn/g	ardening, irrigation	)	
Do you have a copy of the well construction report?				No A		
Do you have a	copy of the well	abandonment report?		Yes 🗌	No 🔁	
Would you allow	v us to collect a	sample from your we	ll?	Yes	No.X	
Basement Pres	ent?			Yes X	No 🗌	
Sump Present?		·		Yes	No A	
Possible Petrole	eum sources exi	st on property?		Yes 🗌	No.	
If so, where?						
Comments						
(include propert	y use: residentia	al, business, industria	l, farmstead)			

Current Resident 1041 Colby St St. Paul, MN 55116

	/			
Homeowner? Yes [	No □			
Tenant? Yes [	No □			
Connected to Public W	/ater Supply? Yes	□ No □		
If so, when?				
Number of Wells Prese	ent at Residence	In Use	or Abando	ned
If in use, where are the	ey located?			
If abandoned, when?_				
Well Use (e.g.,	domestic, industrial, mur	nicipal, monitoring, lawn/g	ardening, irrigatio	on)
Do you have a copy of	the well construction rep	port?	Yes 🗌	No 🗌
Do you have a copy of	the well abandonment re	eport?	Yes 🗌	No 🗌
Would you allow us to	collect a sample from yo	our well?	Yes	No 🗌
Basement Present?			Yes	No 🗌
Sump Present?			Yes	No 🗌
Possible Petroleum so	urces exist on property?		Yes 🗌	No 🔣
If so, where?			·//	
Comments				

#### Well Receptor Survey

Current Resident 1025 Colby St St. Paul, MN 55116

Homeowner?	∕es 🔀′	No 🗌			
Tenant?	∕es □	No 🔯			
Connected to Pub	olic Water Supp	ly? Yes ⊠	No 🗌		
If so, when?	<u></u> :				
Number of Wells	Present at Resi	idence	In Use	or Abandor	ned
f in use, where a	re they located?				
f abandoned, wh	en?				
Well Use		<u> </u>	<del></del>		
(	e.g., domestic,	industrial, municipal, n	nonitoring, lawn/gar	dening, irrigatior	1)
Do you have a copy of the well construction report?  Yes  No				No 🔀	
Oo you have a co	py of the well a	bandonment report?		Yes 🗌	No 💢
Nould you allow เ	us to collect a s	ample from your well?		Yes 🗆 🤈	No 🗌
Basement Preser	nt?			Yes 🔀	No 🗌
Sump Present?				Yes 🗌	No X
Possible Petroleu	m sources exis	t on property?		Yes	No 🔀
f so, where?					
Comments _	X	10,			
include property	use: residential	husiness industrial t	formatood)		

#### **Well Receptor Survey**

Building Manager Highland Park Townhomes 2048 W Montreal Ave St. Paul, MN 55116

Homeowner?	Yes 🔀	No 🗌					
Tenant?	Yes 🔀	No 🗌					
Connected to P	ublic Water S	upply? Ye	s 💢 a	No 🗌			
If so, when?	3/25/1	Þ					
Number of Well	s Present at I	Residence	0	In Use	or Aband	loned	
If in use, where	are they loca	ted?					
If abandoned, v	vhen?						
Well Use	/o.g. domos	tio industrial n		monitoring la	awn/gardening, irrigat	ion)	
	(e.g., domes	aic, muusinai, n	iunicipai	, monitoring, ia	awn/gardening, imgat	ion)	
Do you have a copy of the well construction report?  Yes □  No ☒							
Do you have a	copy of the w	ell abandonmer	nt report?	?	Yes 🗌	No [∑	
Would you allow	w us to collect	a sample from	your we	ll?	Yes □	No 🗌	nja
Basement Pres	ent?				Yes 🔀	No 🗌	
Sump Present?					Yes	No 🏻	
Possible Petrolo	eum sources	exist on proper	ty?		Yes 🗌	No 🔯	
If so, where?							
Comments							
(include proper	ty use: reside	ntial business,	industria	ıl, farmstead)			

#### Well Receptor Survey

Current Resident 6 Villard Ct St. Paul, MN 55116

Homeowner? Yes ☒ No ☐		
Tenant? Yes ☐ No ☑		
Connected to Public Water Supply? Yes ☑ No □		
If so, when? 1956		
Number of Wells Present at Residence In Use	or Abando	oned
If in use, where are they located?		
If abandoned, when?		
Well Use (e.g., domestic, industrial, municipal, monitoring, law	wn/gardening, irrigatio	on)
Do you have a copy of the well construction report?	Yes □	No 🔽
Do you have a copy of the well abandonment report?	Yes 🗍	No 檱
Would you allow us to collect a sample from your well?	Yes □	No 🗔
Basement Present?	Yes □	No 🗌
Sump Present?	Yes 🗌	No 🗌
Possible Petroleum sources exist on property?	Yes □	No 🖊
If so, where?		
Comments		
(include property use: residential) business, industrial, farmstead)	tore	=
Basement single 50 atacles garage		



Building Manager Highland Park Townhomes 2050 W Montreal Ave St. Paul, MN 55116

Homeowner? Yes	5 <u>1</u>	No 📙				
Tenant? Yes	s 🗆	No 🗌				
Connected to Public Water Supply? Yes 📈 No 🗌						
If so, when?						
Number of Wells Pre	esent at Resid	lence	In Use	or Abandon	ed	
If in use, where are t	they located?					
If abandoned, when	?					
Well Use	<del></del>					
(e.g	3., domestic, i	ndustrial, municipal, n	nonitoring, lawn/gar	dening, irrigation	)	
Do you have a copy	of the well co	nstruction report?		Yes 🗌	No 🗌	
Do you have a copy	of the well ab	andonment report?		Yes	No 🗌	
Would you allow us	to collect a sa	mple from your well?		Yes	No 🗌	
Basement Present?				Yes	No 🗌	
Sump Present?				Yes 🗌	No 🗌	
Possible Petroleum	sources exist	on property?		Yes 🗌	No 🗌	
If so, where?						
Comments We own a tonuhome & do not pay our water						
10111- It 15	paid by	l our mana	gement col	npany.		





Current Resident 2204 W Pinehurst Ave St. Paul, MN 55116

Homeowner? Ye	es 🎏	No 🗌			
Tenant? Ye	es 🗌	No 🗌			
Connected to Publi	ic Water Suppl	ly? Yes 💢	No 🗌		
If so, when?	MA				
Number of Wells Pr	resent at Resid	dence	In Use	or Abandon	ed
If in use, where are	they located?				
If abandoned, wher	n?	_			
Well Use				4	
(e.	.g., domestic, i	industriai, municipai,	monitoring, lawn/ga	dening, irrigation	)
Do you have a copy	y of the well co	onstruction report?		Yes 🗌	No 🔲
Do you have a copy	y of the well at	bandonment report?		Yes 🗌	No 🔲 -
Would you allow us	s to collect a sa	ample from your wel	l?	Ye <del>s 🗍</del> —	No 🔲 -
Basement Present?	?			Yes 🌠	No 🗌
Sump Present?				Yes 🖒	No 🗌
Possible Petroleum	n sources exist	t on property?		Yes	No 🔀
If so, where?					
Comments	Ā	Posidenti	al		
(include property us	se: residential,	, business, industrial	, farmstead)		

## JUL - 6 2010

#### Well Receptor Survey

**Current Resident** 2142 W Pinehurst Ave St. Paul, MN 55116

Homeowner?	Yes 🔀	No 🗌			
Tenant?	Yes 🗌	No 🗆			
Connected to P	<sup>o</sup> ublic Water Sup	ply? Yes 🗵	No 🗌		
If so, when?	7 Don't	EKnow			
Number of Well	ls Present at Res	sidenceIn	Use	or Abandor	ned
If in use, where	are they located	2) No mform	ation p	rovidos	)
If abandoned, w	vhen?	when I	Durcha	sed the	Lorse
Well Use	House L	built 1947.			
	(e.g., domestic,	, industrial, municipal, mo	nitoring, lawn/ga	ırdening, irrigatior	1)
Do you have a	copy of the well o	construction report?		Yes 🗌	No 🖸
Do you have a	copy of the well a	abandonment report?		Yes 🗌	No 🖳
Would you allow	w us to collect a	sample from your well?	a	Yes 🔟	No 🗌
Basement Pres	ent?			Yes 🖳	No 🗌
Sump Present?	1		<b>\</b>	Yes 🔟	No 🗌
Possible Petrole	eum sources exi	st on property? Dox 't	- Icnon	Yes 🗌	No 🗌
If so, where?					
Permittee and the second					
Comments	I don't	know of	there i	sain	rell
in prichase of house.					
(include propert	tv use: residentia	al, business, industrial, fai	mstead)		



Building Manager Highland Park Townhomes 996 Cleveland Ave S St. Paul, MN 55116

Homeowner?	Yes 🗵	No 🗌					
Tenant?	Yes 🗌	No. 🔀					
Connected to P	ublic Water Supp	oly? Yes 🏹	No 🗌				
If so, when?	unknown						
Number of Wells Present at Residence In Use or Abandoned							
If in use, where	are they located	?					
If abandoned, v	vhen?						
Well Use	-	·—					
	(e.g., domestic,	industrial, municipal,	monitoring, lawn/ga	rdening, irrigatior	1)		
Do you have a	copy of the well o	construction report?		Yes	No 🔀		
Do you have a	copy of the well a	abandonment report?		Yes	No 🕅		
Would you allow	v us to collect a s	ample from your well	?	Yes 🔀	No 🗌		
Basement Pres	ent?			Yes	No 🗌		
Sump Present?				Yes 🗌	No 🔀		
Possible Petroleum sources exist on property?  Yes  No  No							
If so, where?							
	<u> </u>	AT-0.01					
Comments							
(include propert	y use: residentia	, business, industrial,	farmstead)				



Current Resident 2167 W Pinehurst Ave St. Paul, MN 55116

Homeowner?	Yes 🔽	No 🗌				
Tenant?	Yes 🗌	No 🔃				
Connected to F	Public Water Sup	ply? Yes 🔯	No 🗌			
If so, when?	unknow	1				
Number of Wel	ls Present at Res	sidence	In Use	or Abandor	ned	
		?				
If abandoned, v	vhen?					
Well Use	(e.g., domestic,	industrial, municipal, n	nonitoring, lawn/ga	rdening, irrigation	1)	
Do you have a	copy of the well	construction report?		Yes	No 🗌	
Do you have a copy of the well abandonment report? Yes ☐ No ☐					No 🗌	
Would you allow	w us to collect a:	sample from your well?		Yes 🗌	No 🗌	
Basement Pres	ent?			Yes 🕒	No 🗌	
Sump Present?				Yes 🗌	No 🖳	
Possible Petrol	eum sources exi	st on property?		Yes 🗌	No 📴	
If so, where?						
<del></del>				<del></del>		
Comments						
(include propert	y use: residentia	ıl, business, industrial, f	farmstead)		-	



Current Resident 2186 W Pinehurst Ave St. Paul, MN 55116

Homeowner?	Yes 🗹	No 🗌			
Tenant?	Yes 🗌	No 🗌			(46)
Connected to P	ublic Water Sup	oly? Yes 🗌	No 🗌		
If so, when?					
Number of Well	s Present at Res	idence	In Use	_ or Abando	ned
If in use, where	are they located	?			
If abandoned, w	vhen?				
Well Use					
	(e.g., domestic,	industrial, munici	pal, monitoring, lawn/g	ardening, irrigatio	n)
Do you have a	copy of the well o	construction repor	t?	Yes 🗌	No 🗌
Do you have a	copy of the well a	abandonment repo	ort?	Yes	No 🗌
Would you allov	v us to collect a s	sample from your	well?	Yes 🗌	No 🗌
Basement Pres	ent?			Yes 🔽	No 🗌
Sump Present?			20	Yes 🗌	No 🕡
Possible Petrole	eum sources exis	st on property?	?"	Yes 🗌	No 🗌
If so, where?					
Comments	No	well			

(include property use: residential, business, industrial, farmstead)



Current Resident 1055 S Bowdoin St St. Paul, MN 55116

Homeowner?	Yes 📉	No 🗌					
Tenant?	Yes 🗌	No 🔀					
Connected to Public Water Supply? Yes \( \) No □							
If so, when?	-						
Number of Wells	s Present at Res	idence	In Use	or Abandon	ed		
If in use, where	are they located?	?					
If abandoned, w	hen?						
Well Use	(e.g., domestic,	industrial, municipal,	monitoring, lawn/ga	rdening, irrigatior	)		
Do you have a c	copy of the well c	onstruction report?		Yes 🔲	No 🗌		
Do you have a c	opy of the well a	bandonment report?		Yes 🗌	No 🗌		
Would you allow	us to collect as	ample from your well	?	Yes	No 🗌		
Basement Prese	ent?			Yes 🔼	No 🗌		
Sump Present?				Yes 🗌	No 🔼		
Possible Petrole	Possible Petroleum sources exist on property?						
If so, where?							
Comments							
(include property	y use: residential	, business, industrial,	farmstead)				



#### Well Receptor Survey

Current Resident 2187 W Pinehurst Ave St. Paul, MN 55116

Homeowner?	Yes 🕡	No 🗌			
Tenant?	Yes 🖸	No 🗌			
Connected to P	ublic Water Sup	ply? Yes	No 🗌		
If so, when?					
Number of Well	s Present at Res	sidence	In Use	or Abando	ned
If in use, where	are they located	?			
If abandoned, w	/hen?		N		
Well Use	(e.g., domestic,	industrial, municipal,	monitoring, lawn/g	ardening, irrigatio	n)
Do you have a	copy of the well o	construction report?		Yes 🗌	No 🗹
Do you have a	copy of the well a	abandonment report?		Yes	No 🖸
Would you allow	v us to collect a s	sample from your well	?	Yes 🗌	No 🗆 (NA
Basement Prese	ent?			Yes 🔽	No 🗌
Sump Present?				Yes 🖸	No 🗌
Possible Petrole	eum sources exis	st on property?		Yes 🗌	No 🔽
If so, where?	//				
Comments					
(include property	y use: residentia	I, business, industrial,	farmstead)		



## Well Receptor Survey

Building Manager 946 Cleveland Ave S St. Paul, MN 55116

Homeowner? Yes 🔼 No 🗌		
Tenant? Yes ☐ No ☐		
Connected to Public Water Supply? Yes 🗡 No 🗌		
f so, when?		$\sim$
Number of Wells Present at Residence In Use	or Abandor	ned
f in use, where are they located?		
f abandoned, when? Wo wells known		
Well Use (e.g., domestic, industrial, municipal, monitoring, lawn/ga	ardening, irrigation	1)
Do you have a copy of the well construction report?	Yes	No 🗓
Do you have a copy of the well abandonment report?	Yes 🗌	No 🗓
Nould you allow us to collect a sample from your well?	Yes 🖅	No 🗓
Basement Present?	Yes 🗵	No 🗌
Sump Present?	Yes 🗗	No 🗌
Possible Petroleum sources exist on property?	Yes 🗌	No 🖾
f so, where?		
Comments Residential		
include property use: residential, business, industrial, farmstead)		

# 1

# **ARCADIS**

#### **Well Receptor Survey**

Current Resident 1031 S Bowdoin St St. Paul, MN 55116

Homeowner?	Yes D	No 🗌						
Tenant?	Yes	No 🛂						
Connected to P	Connected to Public Water Supply? Yes ☑ No □							
If so, when?	1954							
Number of Well	s Present at Res	idence	In Use	or Abandon	ed			
If in use, where	are they located	?	,					
If abandoned, w	/hen?							
Well Use					<del></del>			
	(e.g., domestic,	industrial, municipal,	monitoring, lawn/ga	irdening, irrigation	)			
Do you have a	copy of the well o	construction report?		Yes	No 🗌			
Do you have a	copy of the well a	abandonment report?		Yes 🗌	No 🗌			
Would you allow	v us to collect a s	sample from your wel	l?	Yes 🗌	No 🗌			
Basement Pres	ent?			Yes 👿	No 🗌			
Sump Present?	Draon tile	System		Yes 🖸	No 🗌			
Possible Petrole	eum sources exis	st on property?		Yes 🗌	No 🍱			
If so, where?	If so, where?							
Comments								
(include propert	y use: residentia	l, business, industrial	, farmstead)					

## Well Receptor Survey

Current Resident 745 Mt Curve Blvd St. Paul, MN 55116

Homeowner?	Yes N	No 🗆				
Homeowner?	res M	No 🗌				
Tenant?	Yes	No 🗔				
Connected to Pr	ublic Water Supp	oly? Yes	No 🗀			
If so, when?						
Number of Wells	s Present at Res	idence	In Use	or Abandon	ed	
If in use, where	are they located	?				
If abandoned, w	hen?					
Well Use	domestic					
	(e.g., domestic,	industrial, municipal,	monitoring, lawn/ga	rdening, irrigation	)	
Do you have a c	copy of the well c	onstruction report?		Yes	No 🔽	
Do you have a copy of the well abandonment report?				No 🕡		
Would you allow	us to collect a s	ample from your well	?	Yes 🗌	No 🗌	
Basement Prese	ent?			Yes 🔽	No 🗌	
Sump Present?				Yes 🔟	No 🗌	
Possible Petrole	eum sources exis	t on property?		Yes 🗌	No 🕡	
If so, where?						
Comments			1			
(include propert	y use: residential	, business, industrial,	farmstead)			

Tires Plus 2185 Ford Pkwy St. Paul, MN 55116

Homeowner? Yes No No		
Tenant? Yes ☐ No ☐		
Connected to Public Water Supply? Yes No		
If so, when?		
Number of Wells Present at Residence In Use	or Abandoi	ned
If in use, where are they located?		
If abandoned, when?		
Well Use (e.g., domestic, industrial, municipal, monitoring, lawn	/gardening, irrigation	n)
Do you have a copy of the well construction report?	Yes	No 🗌
Do you have a copy of the well abandonment report?	Yes	No 🗌
Would you allow us to collect a sample from your well?	Yes	No 🗌
Basement Present?	Yes	No 🔀
Sump Present?	Yes 🗌	No 🗌
Possible Petroleum sources exist on property?	Yes 🗌	No 🗌
If so, where?		
Comments No wells lues	>	
(include property use: residential, business, industrial, farmstead)		

#### **Well Receptor Survey**

Current Resident 2190 W Pinehurst Ave St. Paul, MN 55116

Homeowner? Yes No 🗆								
Tenant? Yes ☐ No Û								
Connected to Public Water Supply? Yes No								
If so, when?								
Number of Wells Present at Residence In Use	or Abandor	ned						
If in use, where are they located?								
If abandoned, when?								
Well Use								
(e.g., domestic, industrial, municipal, monitoring, lawn/ga	rdening, irrigatior	۱)						
Do you have a copy of the well construction report?	Yes	No 🗌						
Do you have a copy of the well abandonment report? N	Yes 🗌	No 🗌						
Would you allow us to collect a sample from your well?	Yes 🗌	No 🗌						
Basement Present?	Yes 🖾	No 🗌						
Sump Present?	Yes 🗌	No X						
Possible Petroleum sources exist on property? White June	Yes 🗌	No 🗆						
If so, where?								
Comments								
(include property use: residential, business, industrial, farmstead)								

#### **Well Receptor Survey**

Current Resident 2218 W Pinehurst Ave St. Paul, MN 55116

Homeowner?	Yes 🔀	No 🗌						
Tenant?	Yes 🗌	No 📓						
Connected to P	ublic Water Supp	oly?	Yes 🗽	No 🗌				
If so, when?	_STPW		<del>ر</del> ت					
Number of Wells	Number of Wells Present at Residence In Use or Abandoned							
If in use, where	are they located	?	N7	A				
If abandoned, w	hen?							
Well Use			NA					
	(e.g., domestic,	industria	l, municipal,	monitoring, la	awn/gardeni	ng, irrig	gation)	
Do you have a	copy of the well o	onstructi	on report?		Yes	; 🗆	· N	o 🕽
Do you have a	copy of the well a	bandonn	nent report?		Yes	; 🔲	N	• <b>A</b>
Would you allow	v us to collect a s	ample fro	om your well	?	Yes	; <b></b>	N	• 🖎
Basement Prese	ent?				Yes	; <u> </u>	N	· 🖳
Sump Present?					Yes	; 🔲	N	۰ 🗓
Possible Petrole	eum sources exis	t on prop	erty?		Yes	; 🔲	N	•
If so, where?								
Comments	<u> </u>							
								_=
(include property	y use: residential	l, busines	s, industrial,	farmstead)	= 0 0			

## Well Receptor Survey

Current Resident 2041 Villard Ave St. Paul, MN 55116

Homeowner? Yes No			
Tenant? Yes □ No □			
Connected to Public Water Supply? Yes	No 🗔		
If so, when?			
Number of Wells Present at Residence	n Use	or Abandon	ed
If in use, where are they located?			
If abandoned, when?	A		
Well Use (e.g., domestic, industrial, municipal, m	onitoring, lawn/ga	 rdenina, irrigatior	n)
Do you have a copy of the well construction report?	10/1	Yes 🗌	No 🗆
Do you have a copy of the well abandonment report?	) ///	Yes	No 🗌
Would you allow us to collect a sample from your well?	/ '	Yes 🗌	No 🗆
Basement Present?		Yes 🔲	No 🗌
Sump Present?		Yes	No 🗆
Possible Petroleum sources exist on property?		Yes 🗌	No 🗓
If so, where?			
Comments			
(include property use: residential, business, industrial, fa	armstead)		



## Well Receptor Survey

Current Resident 1043 S Bowdoin St St. Paul, MN 55116

Homeowner? Yes No 🗆							
Tenant? Yes ☐ No ☐		city water					
Connected to Public Water Supply? Yes No 🗆	_ uses	(19					
If so, when?							
	or Aba	ndoned					
If in use, where are they located?							
If abandoned, when?							
Well Use (e.g., domestic, industrial, municipal, monitoring, lawn/gardening, irrigation)							
Do you have a copy of the well construction report?	Yes 🗌	No D					
Do you have a copy of the well abandonment report?  Yes □  No ☑							
Would you allow us to collect a sample from your well?	Yes 🗌	No 🖂					
Basement Present?	Yes	No 🗌					
Sump Present?	Yes 🗌	No.					
Possible Petroleum sources exist on property?	Yes 🗌	No A					
If so, where?							
Comments							
(include property use: residential, business, industrial, farmstead)							

Current Resident 2131 W Pinehurst Ave St. Paul, MN 55116

Homeowner?	Yes	No 🗌				
Tenant?	Yes 🗡	No 🗌				
Connected to P	ublic Water Sup	oly? Yo	es 🔀	No 🗌		
If so, when?						
Number of Wells Present at Residence In Use or Abandoned					oned	
If in use, where	are they located	?				
If abandoned, w	hen?					
Well Use (e.g., domestic, industrial, municipal, monitoring, lawn/gardening, irrigation)						
Do you have a copy of the well construction report?						
Do you have a copy of the well abandonment report?  Yes  No  No						No 🗌
Would you allow us to collect a sample from your well?				Yes 🗌	No 🗌	
Basement Present?					Yes 🗹	No 🗌
Sump Present?				Yes 🛮	No 🗌	
Possible Petroleum sources exist on property?				Yes	No 🗌	
If so, where?						
Comments						
(include property	y use: residentia	I, business,	industrial,	farmstead)		

Current Resident 2214 W Pinehurst Ave St. Paul, MN 55116

Homeowner? Yes ♥ No □					
Tenant? Yes ☐ No No					
Connected to Public Water Supply? Yes No					
If so, when? 2005					
Number of Wells Present at Residence In Use or Abandoned					
If in use, where are they located?N_A					
If abandoned, when? NA					
Well Use (e.g., domestic, industrial, municipal, monitoring, law	vn/gardening, irrigatio	on)	n		
Do you have a copy of the well construction report?	Yes	No 💢			
Do you have a copy of the well abandonment report?	Yes	No 🖄			
Would you allow us to collect a sample from your well?	Yes	No 🗌	N/A-N		
Basement Present?	Yes 💢	No 🗌	wen		
Sump Present?	Yes 🔀	No 🗌			
Possible Petroleum sources exist on property?	Yes 🗌	No 🐧			
If so, where?					
Comments <u>Regidential</u>					
(include property use: residential, business, industrial, farmstead)					



Current Resident 1037 S Bowdoin St St. Paul, MN 55116

Homeowner? Yes No 🗆						
Tenant? Yes ☑ No □						
Connected to Public Water Supply? Yes ☑ No ☐						
If so, when?						
Number of Wells Present at Residence In Use or Abandoned						
If in use, where are they located?						
If abandoned, when?						
Well Use (e.g., domestic, industrial, municipal, monitoring, lawn/gardening, irrigation)						
Do you have a copy of the well construction report?	Yes	No 🗌				
Do you have a copy of the well abandonment report?						
Would you allow us to collect a sample from your well?	Yes 🗌	No 🗌				
Basement Present?	Yes 🖺	No 🗌				
Sump Present?	Yes 🗹	No 🗌				
Possible Petroleum sources exist on property?	Yes 🗌	No 🗌				
If so, where?						
Comments						
(include property use: residential, business, industrial, farmstead)		-				

## **Well Receptor Survey**

Building Manager Amy Salmela Highland Park Townhomes 968 Cleveland Ave S St. Paul, MN 55116

Homeowner?	Yes 🔼	No □ (	168-978	Clevele	tours land	and in	BIVING OR	my owner
Tenant?	Yes 🔼	No 🗆	encom (n	loppl	(DWVCVQVV	۱ روپ		
Connected to P	Public Water Sup	pply? Ye	es 🛛	No 🗌				
If so, when?	unknown							
Number of Well	ls Present at Re	sidence <u>k</u>	. Now In	Use	0	r Abando	ned wh	more~
If in use, where	are they located	d?						
lf abandoned, w	vhen? Mkno	un						
Well Use	(e.g., domestic	, industrial, r	nunicipal, mo	nitoring,	lawn/gardenin	g, irrigatio	n)	
Do you have a	copy of the well	construction	report?		Yes		No 🔣	
Do you have a copy of the well abandonment report?				Yes		No 🗵		
Would you allov	w us to collect a	sample from	your well?		Yes		No 🗌	
Basement Pres	ent?				Yes	<b>Z</b>	No 🗌	
Sump Present?					Yes		No 🗵	
	eum sources ex	ist on proper	ty?		Yes		No 🗌	unknown, but likely ko
If so, where?								
	Should yer The Higher Soct we	end Par	k Tornh	one (	endomini	um A	rssociati	ian,
(include propert	ty use: residentia	al, business,	industrial, far	rmstead)			hus	

Well Receptor Survey			
Building Manager Highland Village Apts —> entire property  17 Inner Dr St. Paul, MN 55116	063-2	LII9 Ville	cland .) age l
Homeowner? Yes A No - Proporty Owne	-(Apar	tment)	
Tenant? Yes No No	V		
Connected to Public Water Supply? Yes No			
If so, when?			
Number of Wells Present at Residence In Use	_ or Abar	ndoned	
If in use, where are they located?			
f abandoned, when?			
Well Use (e.g., domestic, industrial, municipal, monitoring, lawn/g	ardening, irrig	ation)	
Do you have a copy of the well construction report?	Yes	No 🗌	
Do you have a copy of the well abandonment report?	Yes 🗌	No 🗌	
Would you allow us to collect a sample from your well?	Yes 🗌	No 🗌	
Basement Present?	Yes 🔽	No 🗌	
Sump Present?	Yes	No 🗌	
Possible Petroleum sources exist on property? (oil tank use for where?	ØYes ⊠	No 🗌	
	)		
13 1,000 gallon tanto	5 67	propert	_
Comments			

(include property use: residential, business, industrial, farmstead)