City of Lancaster, Ohio
Division of Water
Miller Park Wellhead Protection Program
Historical Groundwater Quality Data

PARAMETERS	Units	MCL/SMCL/ ACTION LEVEL	MW-3																
			Oct-95	Jan-96	Apr-96	Jul-96	Feb-97	Apr-97	Jul-97	Oct-97	Jun-98	Dec-98	Jul-99	Apr-00	Nov-00	May-01	Oct-01	May-02	Nov-02
INORGANICS																			
ALUMINUM	mg/L	50 to 200 (S)	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	NA	NA	NA	NA
ANTIMONY	ug/L	6.0	ND	ND	ND	ND	5.5	4.4	ND	8.3	ND	ND	ND	ND	6.0	ND	ND	ND	ND
ARSENIC	ug/L	10.0	ND	ND	17.0	15.7	24.0	28.0	1.9	21.0	19.0	23.0	26.0	17.6	24.0	19.0	24.0	12.9	15.0
BARIUM	ug/L	2000	320	730	310	290	290	300	264	230	293	314	329	341	397	359	406	NA	NA
BERYLLIUM	ug/L	4.0	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND
CADMIUM	ug/L	5.0	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND
CALCIUM	mg/L	--	77.0	140.0	92.0	88.0	88.0	88.0	92.0	77.0	74.0	93.0	97.0	90.7	91.0	97.0	91.0	87.4	87.7
CHROMIUM	ug/L	100.0	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND
COBALT	ug/L	--	ND	ND	<20.0	<50.0	<100.0	<100.0	<50.0	<50.0	<50.0	<50.0	<50.0	<50.0	<10.0	<10.0	<20.0	<50.0	<50
COPPER	ug/L	1000 (S) / 1300 (A)	<10.0	<10.0	<10.1	<10.2	<10.3	<10.4	<10.5	<10.6	29.0	18.0	ND	ND	ND	NA	NA	NA	NA
CYANIDE	mg/L	0.2	ND	NA	NA	NA	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND
IRON	ug/L	300 (S)	40	2400	590	680	690	940	2260	1000	1200	920	1300	1690	2440	3260	1370	2760	2790
LEAD	ug/L	15 (A)	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND
MAGNESIUM	mg/L	--	22.0	38.0	25.0	25.0	24.0	24.0	26.0	23.0	23.0	25.0	25.0	25.0	24.0	25.0	26.0	27.4	24.7
MANGANESE	ug/L	50 (S)	140	58	360	320	400	400	410	340	536	608	781	794	770	<10.0	520	402	345
MERCURY	ug/L	2.0	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND
NICKEL	ug/L	--	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND
POTASSIUM	mg/L	--	1.2	2.7	1.0	< 5	1.0	11.0	0.9	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
SELENIUM	ug/L	50.0	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND
SILVER	ug/L	100 (S)	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND
SODIUM	mg/L	--	9.4	27.0	8.3	9.1	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
SULFIDE	mg/L	--	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	2.0	5.0	3.0	ND	ND
THALLIUM	ug/L	2.0	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND
TIN	ug/L	--	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	ND	ND	ND	ND	ND
VANADIUM	mg/L	--	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND
ZINC	ug/L	5000 (S)	40	20	100	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND
VOLATILE ORGANICS VOC'S																			
Method 8260	Varies	Varies	ND	D^1	ND	D^2	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND
			D^1 - Cabon Disulfate (24ug/l), D^2 - Carbon Disulfate (1 ug/l), D^3 - Acetone(22.8 ug/l)																
FIELD PARAMETERS																			
STATIC WATER LEVEL	* from reference point																		
TEMPERATURE	°C	--	15.6	16.7	12.8	18.3	13.3	13.3	15.0	15.0	15.0	15.0	NM	14.4	9.8	15.5	14.9	16.0	14.9
pH	S.U.	6.5-8.5 (S)	7.40	7.20	7.70	8.20	7.60	7.80	7.40	7.70	7.40	7.80	7.80	7.90	7.40	6.70	7.40	7.60	7.47
CONDUCTIVITY	umhos/cm	--	422	411	492	470	640	670	620	600	540	650	600	670	696	630	640	590	595

PARAMETERS	MW-3																				
	May-03	Nov-03	May-04	Oct-04	May-05	Nov-05	Apr-06	Oct-06	May-07	Nov-07	Jun-08	Nov-08	Jul-09	Apr-15	Aprl-16	Oct-16	Apr-17	Oct-17	Apr-18	Oct-18	Apr-19
INORGANICS																					
ALUMINUM	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	ND	ND	ND	ND	ND	ND	ND	ND
ANTIMONY	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	0.88	ND	ND	ND	ND	ND	ND	ND
ARSENIC	14.7	17.4	18.1	17.3	17.6	17.4	18.8	20.3	20.3	17.3	21.5	26.3	19.6	9	15	8	39	30	22	25	14
BARIUM	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	245	228	198	279	235	220	217	194
BERYLLIUM	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND
CADMIUM	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND
CALCIUM	93.2	98.7	91.0	87.1	98.3	89.6	92.4	95.5	97.1	85.9	93.6	96.8	96.9	107.0	97.4	99.2	83.6	91.1	92.0	94.0	90.1
CHROMIUM	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND
COBALT	<50	<50	<50	<50	<50	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	ND	ND	ND	ND	ND	ND	ND	ND
COPPER	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	ND	ND	ND	ND	ND	ND	ND	ND
CYANIDE	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	0.124	ND
IRON	2930	1990	1750	2470	2770	1980	2920	2760	2500	991	2600	2350	2790	ND	ND	ND	ND	ND	ND	ND	ND
LEAD	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND
MAGNESIUM	25.3	25.7	24.9	25.3	26.1	25.3	25.6	27.3	26.5	23.9	25.8	26.9	26.7	24.7	28.4	29.0	22.7	24.6	25.0	26.2	24.4
MANGANESE	335	277	416	276	279	318	307	289	285	221	269	254	251	182	233	191	195	229	214	227	180
MERCURY	ND	0.3	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND
NICKEL	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND
POTASSIUM	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	ND	ND	ND	ND	ND	ND	ND	ND
SELENIUM	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND
SILVER	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND
SODIUM	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	11.5	6.9	10.6	25.2	10.5	10.0	8.3	12.6
SULFIDE	ND	ND	ND	ND	ND	ND	1.6	ND	1.2	ND	1.9	20.0	ND	ND	0.83	0.34	6.44	9.08	1.33	0.68	0.25
THALLIUM	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND
TIN	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND
VANADIUM	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND
ZINC	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND
VOLATILE ORGANICS VOC'S																					
Method 8260	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	D^3	ND	ND	ND	ND
FIELD PARAMETERS																					
STATIC WATER LEVEL														33.60	NM	37.26	41.50	42.05	32.24	33.77	37.45
TEMPERATURE	15.2	14.3	15.9	15.3	15.6	15.5	15.6	15.4	15.4	14.7	16.0	15.6	17.4	17.2	16.4	21.8	17.4	18.4	16.1	17.5	17.5
pH	7.34	7.46	6.87	7.44	7.51	7.51	7.42	7.42	7.42	7.47	7.49	7.36	7.50	7.49	7.41	7.47	7.37	7.40	7.48	7.12	6.89
CONDUCTIVITY	544	635	468	613	428	638	511	447	447	478	450	181	576	608	638	497	508	568	621	633	650

(S) = Secondary Maximum Contaminant Level

(A) = Action Level

(O) = Ohio EPA Primary Maximum Contaminant Level

D = DETECTED

ND = NOT DETECTED

NA = NOT ANALZED

NM = NOT MEASURED