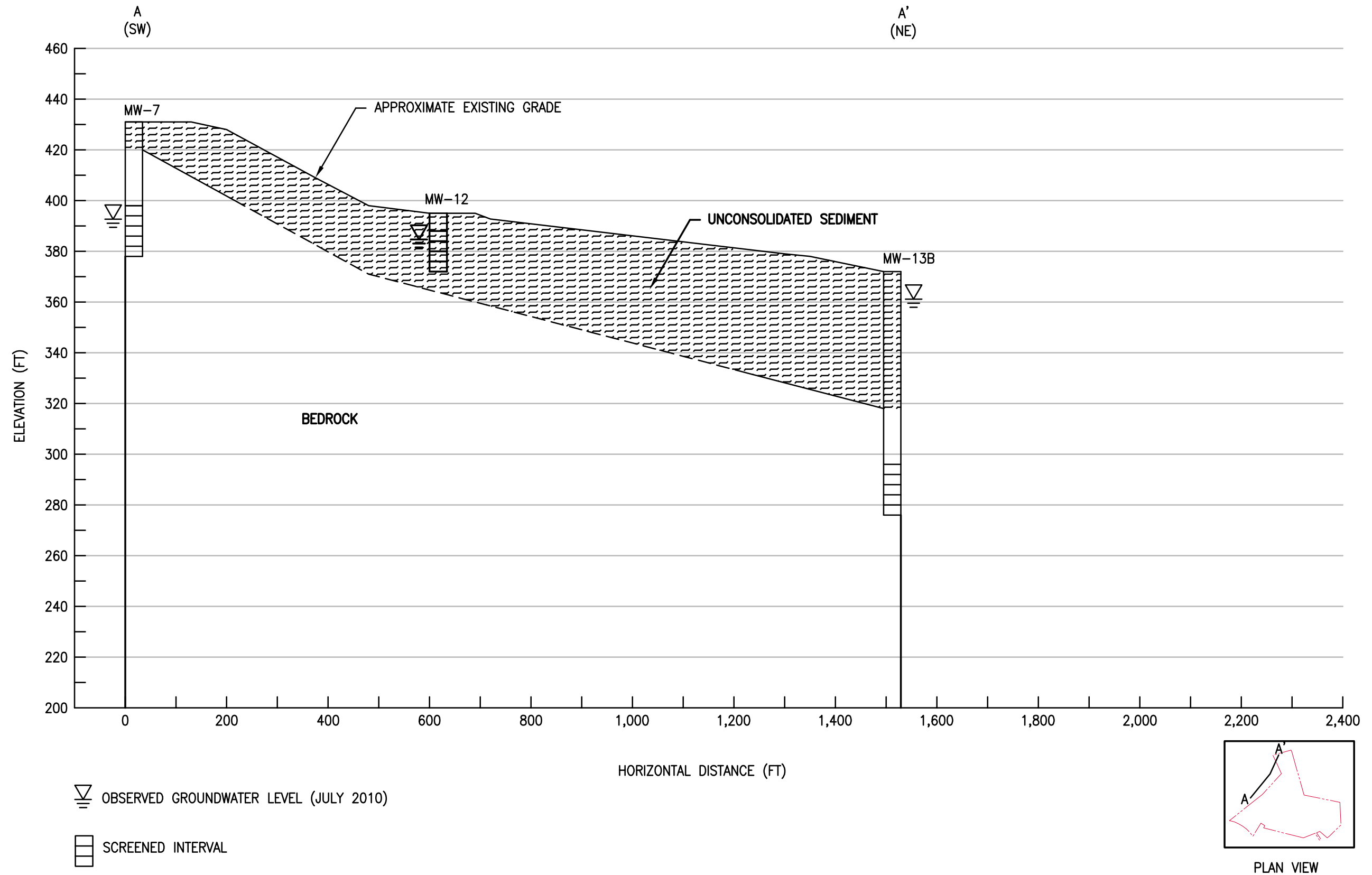


Gude Landfill
 Montgomery County, Maryland

Figure 2-1. Site Location Map

Sources:
 - EDR, 2009

FILE PATH: Q:\PROJECTS\6219608 GUDE PHASE 1\GROUNDWATER\SECTION A-A'_RMC.DWG [LAYOUT] 11/18/10

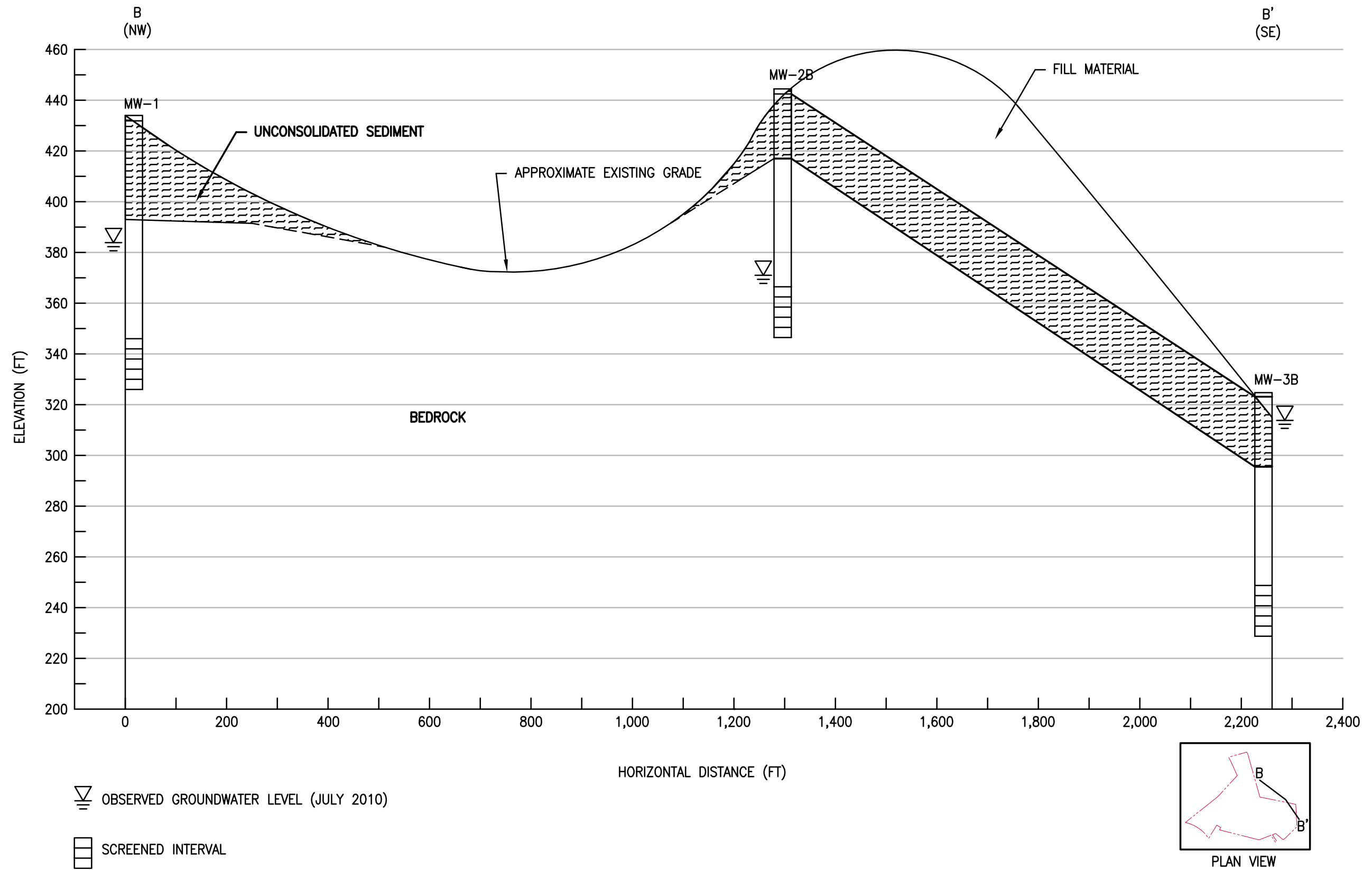


GUDE LANDFILL
MONTGOMERY COUNTY, MARYLAND

FIGURE 2-2
GEOLOGIC CROSS SECTION A-A'

DESIGNED BY -	DRAWN BY RMC	DATE OCT. 2010	PROJECT NO. 6219608
CHECKED BY -	PROJECT MGR. JK	DRAWING NO. -	FIGURE 2-2

FILE PATH: Q:\PROJECTS\6219608 GUDE PHASE 1\GROUNDWATER\SECTION B-B'_RMC.DWG [LAYOUT] 11/18/10

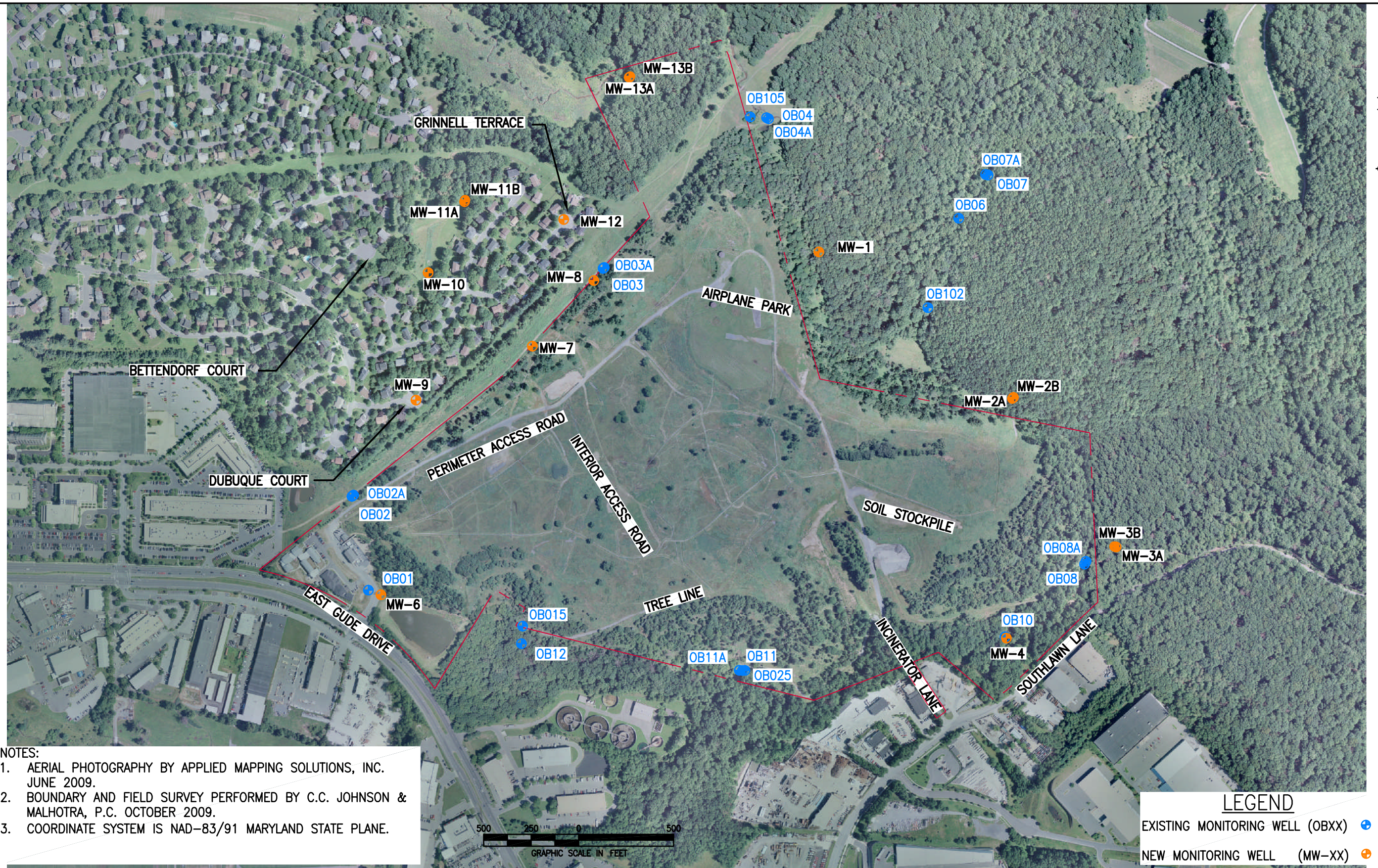


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FIGURE 2-3
GEOLOGIC CROSS SECTION B-B'

DESIGNED BY -	DRAWN BY RMC	DATE OCT. 2010	PROJECT NO. 62196.08
CHECKED BY -	PROJECT MGR. JK	DRAWING NO. -	FIGURE 2-3

FILE PATH: Q:\PROJECTS\6219608 GUID PHASE 1\GROUNDWATER\GWFIGURE FINAL.DWG [FIG 4-1] 11/4/10



- NOTES:
1. AERIAL PHOTOGRAPHY BY APPLIED MAPPING SOLUTIONS, INC. JUNE 2009.
 2. BOUNDARY AND FIELD SURVEY PERFORMED BY C.C. JOHNSON & MALHOTRA, P.C. OCTOBER 2009.
 3. COORDINATE SYSTEM IS NAD-83/91 MARYLAND STATE PLANE.

LEGEND	
EXISTING MONITORING WELL (OBXX)	●
NEW MONITORING WELL (MW-XX)	●

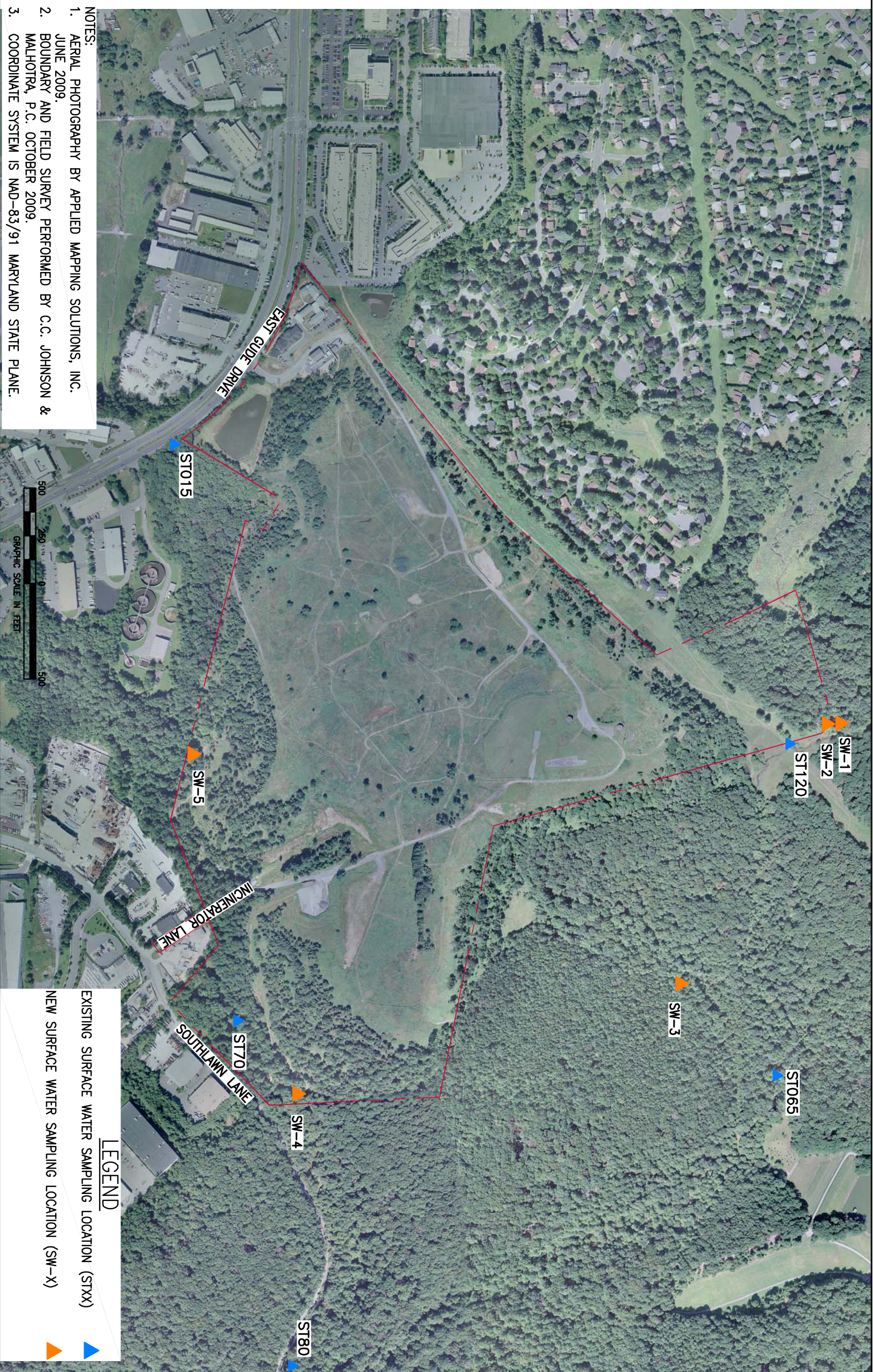


GUDE LANDFILL
MONTGOMERY COUNTY, MARYLAND

FIGURE 3-1
GROUNDWATER MONITORING WELL LOCATION MAP

DESIGNED BY PL	DRAWN BY JP	DATE OCT. 2010	PROJECT NO. 62196.08
CHECKED BY BR	PROJECT MGR. JK	DRAWING NO. -	FIGURE 3-1

- NOTES:
1. AERIAL PHOTOGRAPHY BY APPLIED MAPPING SOLUTIONS, INC. JUNE 2009.
 2. BOUNDARY AND FIELD SURVEY PERFORMED BY C.C. JOHNSON & MALHOTRA, P.C. OCTOBER 2009.
 3. COORDINATE SYSTEM IS NAD-83/91 MARYLAND STATE PLANE.



LEGEND

EXISTING SURFACE WATER SAMPLING LOCATION (STXX) ▲

NEW SURFACE WATER SAMPLING LOCATION (SW-X) ▲



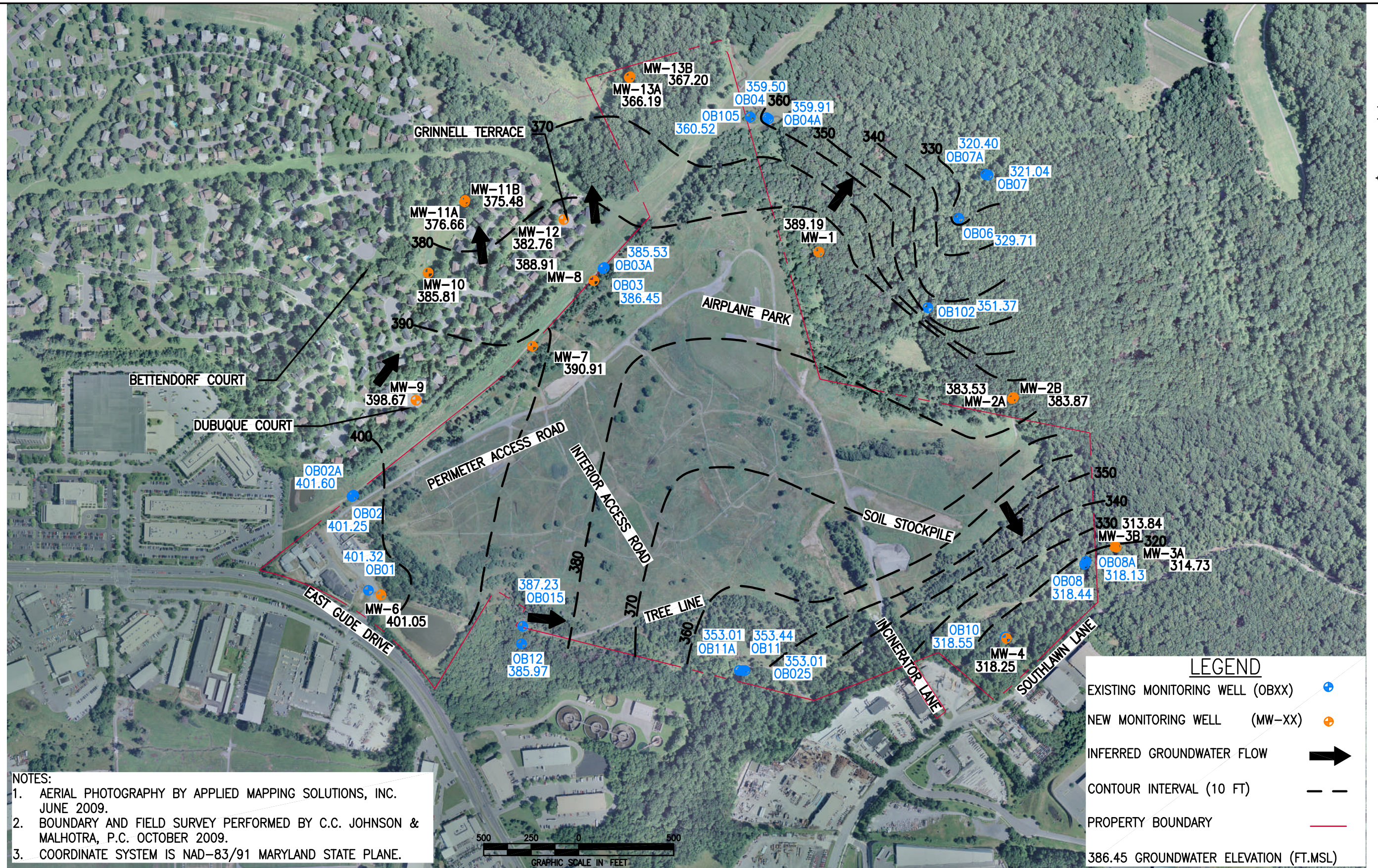
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GUDE LANDFILL
MONTGOMERY COUNTY, MARYLAND

FIGURE 3-2
SURFACE WATER SAMPLING LOCATION MAP

DESIGNED BY	PL	DRAWN BY	JP	DATE	OCT. 2010	PROJECT NO.	62196:08
CHECKED BY	BR	PROJECT MGR.	JK	DRAWING NO.	-	FIGURE	3-2

FILE PATH: Q:\PROJECTS\6219608 GUDE PHASE 1\GROUNDWATER\GWFIGURE CONTOURS_DWG [FIG 4-1] 11/18/10



- NOTES:
1. AERIAL PHOTOGRAPHY BY APPLIED MAPPING SOLUTIONS, INC. JUNE 2009.
 2. BOUNDARY AND FIELD SURVEY PERFORMED BY C.C. JOHNSON & MALHOTRA, P.C. OCTOBER 2009.
 3. COORDINATE SYSTEM IS NAD-83/91 MARYLAND STATE PLANE.

LEGEND

- EXISTING MONITORING WELL (OBXX) +
- NEW MONITORING WELL (MW-XX) +
- INFERRED GROUNDWATER FLOW ➔
- CONTOUR INTERVAL (10 FT)
- PROPERTY BOUNDARY

386.45 GROUNDWATER ELEVATION (FT.MSL)

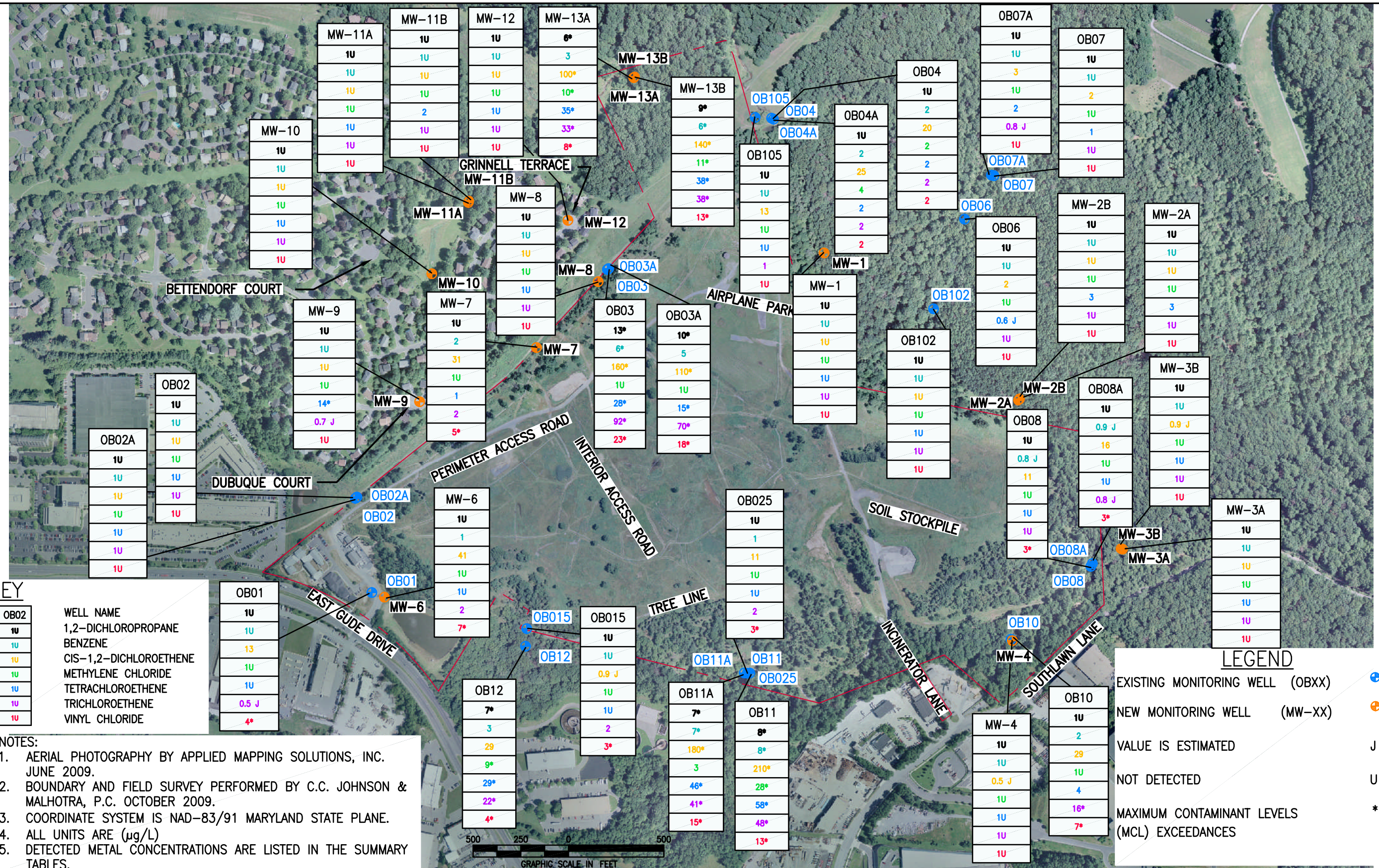


GUDE LANDFILL
MONTGOMERY COUNTY, MARYLAND

FIGURE 5-1
INFERRED GROUNDWATER FLOW MAP
DATA DATES: JULY 26-AUGUST 2, 2010

DESIGNED BY PL	DRAWN BY JP	DATE OCT. 2010	PROJECT NO. 62196.08
CHECKED BY BR	PROJECT MGR. JK	DRAWING NO.	FIGURE 5-1

FILE PATH: Q:\PROJECTS\6219608 GUDE PHASE 1\GROUNDWATER\TAG MAP.DWG [FIG 4-1] 11/18/10



KEY

OB02	WELL NAME
1U	1,2-DICHLOROPROPANE
1U	BENZENE
1U	CIS-1,2-DICHLOROETHENE
1U	METHYLENE CHLORIDE
1U	TETRACHLOROETHENE
1U	TRICHLOROETHENE
1U	VINYL CHLORIDE

OB01	1U
1U	13
1U	1U
1U	1U
1U	0.5 J
1U	4*

NOTES:

1. AERIAL PHOTOGRAPHY BY APPLIED MAPPING SOLUTIONS, INC. JUNE 2009.
2. BOUNDARY AND FIELD SURVEY PERFORMED BY C.C. JOHNSON & MALHOTRA, P.C. OCTOBER 2009.
3. COORDINATE SYSTEM IS NAD-83/91 MARYLAND STATE PLANE.
4. ALL UNITS ARE (µg/L)
5. DETECTED METAL CONCENTRATIONS ARE LISTED IN THE SUMMARY TABLES.

LEGEND

- EXISTING MONITORING WELL (OBXX)
- NEW MONITORING WELL (MW-XX)
- VALUE IS ESTIMATED
- NOT DETECTED
- MAXIMUM CONTAMINANT LEVELS (MCL) EXCEEDANCES

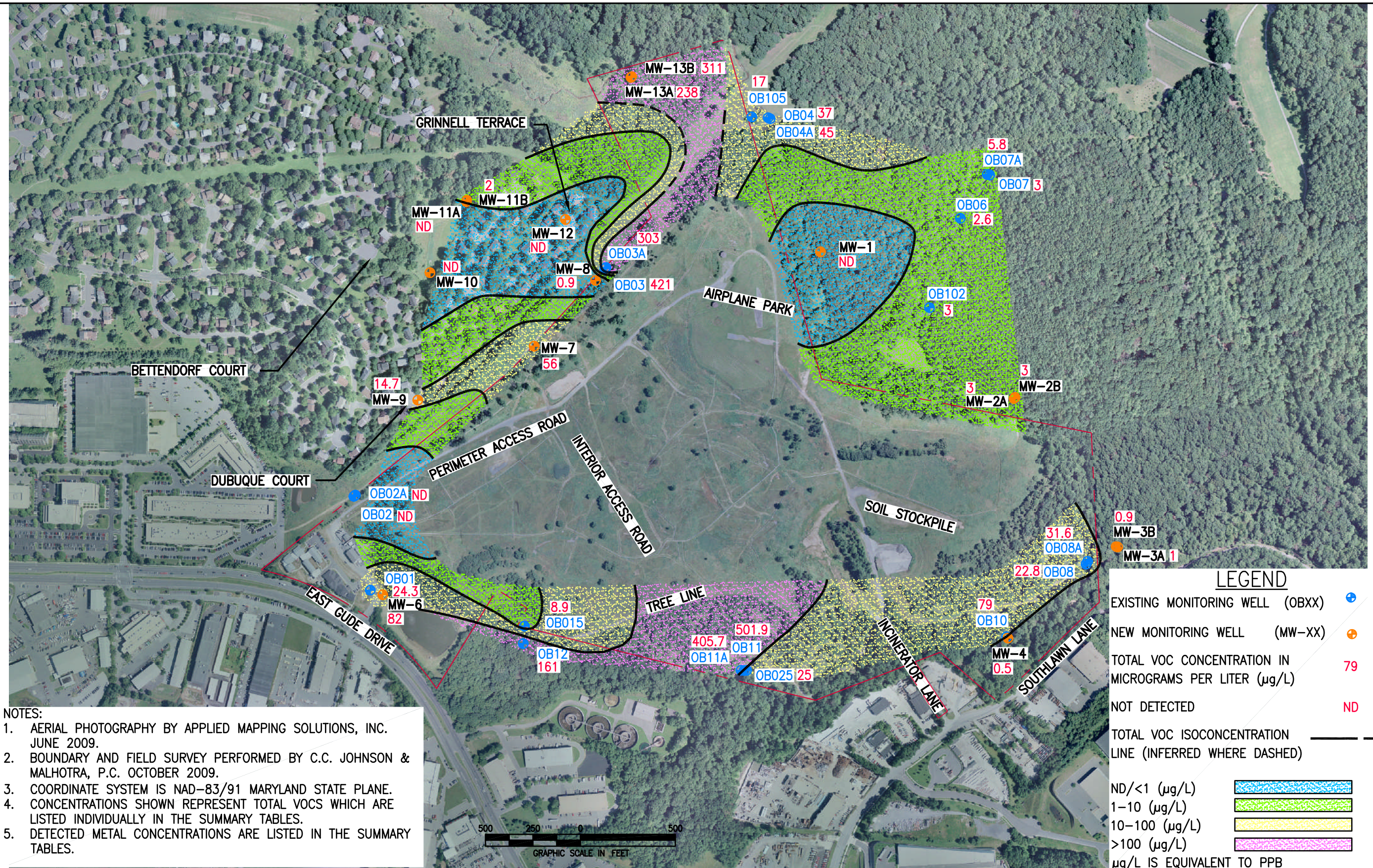


GUDE LANDFILL
MONTGOMERY COUNTY, MARYLAND

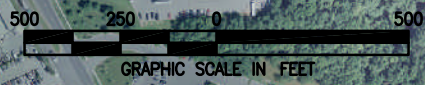
FIGURE 5-2
REPORTED CONCENTRATIONS OF CONSTITUENTS OF CONCERN IN
MONITORING WELLS, JULY 26 - AUGUST 2, 2010

DESIGNED BY PL	DRAWN BY JP	DATE OCT. 2010	PROJECT NO. 62196.08
CHECKED BY BR	PROJECT MGR. JK	DRAWING NO. -	FIGURE 5-2

FILE PATH: Q:\PROJECTS\6219608 GUDE PHASE 1\GROUNDWATER\ISO MAP 2.DWG [FIG 4-1] 11/18/10



- NOTES:
1. AERIAL PHOTOGRAPHY BY APPLIED MAPPING SOLUTIONS, INC. JUNE 2009.
 2. BOUNDARY AND FIELD SURVEY PERFORMED BY C.C. JOHNSON & MALHOTRA, P.C. OCTOBER 2009.
 3. COORDINATE SYSTEM IS NAD-83/91 MARYLAND STATE PLANE.
 4. CONCENTRATIONS SHOWN REPRESENT TOTAL VOCs WHICH ARE LISTED INDIVIDUALLY IN THE SUMMARY TABLES.
 5. DETECTED METAL CONCENTRATIONS ARE LISTED IN THE SUMMARY TABLES.



LEGEND

- EXISTING MONITORING WELL (OBXX) +
- NEW MONITORING WELL (MW-XX) +
- TOTAL VOC CONCENTRATION IN MICROGRAMS PER LITER (µg/L) 79
- NOT DETECTED ND
- TOTAL VOC ISOCONCENTRATION LINE (INFERRED WHERE DASHED)

ND/<1 (µg/L)

1-10 (µg/L)

10-100 (µg/L)

>100 (µg/L)

µg/L IS EQUIVALENT TO PPB



GUDE LANDFILL
MONTGOMERY COUNTY, MARYLAND

FIGURE 5-3
LANDFILL PERIMETER
TOTAL VOLATILE ORGANIC COMPOUND (VOC)
CONCENTRATION MAP, JULY 26-AUGUST 2, 2010

DESIGNED BY PL	DRAWN BY JP	DATE OCT. 2010	PROJECT NO. 62196.08
CHECKED BY BR	PROJECT MGR. JK	DRAWING NO. -	FIGURE 5-3

FILE PATH: Q:\PROJECTS\6219608 GUDE PHASE 1\GROUNDWATER\FIG 4-1_4-2_4-3 GWFIGURE.DWG [FIG 4-3] 11/2/10



NOTES:

1. AERIAL PHOTOGRAPHY BY APPLIED MAPPING SOLUTIONS, INC. JUNE 2009.
2. BOUNDARY AND FIELD SURVEY PERFORMED BY C.C. JOHNSON & MALHOTRA, P.C. OCTOBER 2009.
3. COORDINATE SYSTEM IS NAD-83/91 MARYLAND STATE PLANE.



GUDE LANDFILL
MONTGOMERY COUNTY, MARYLAND

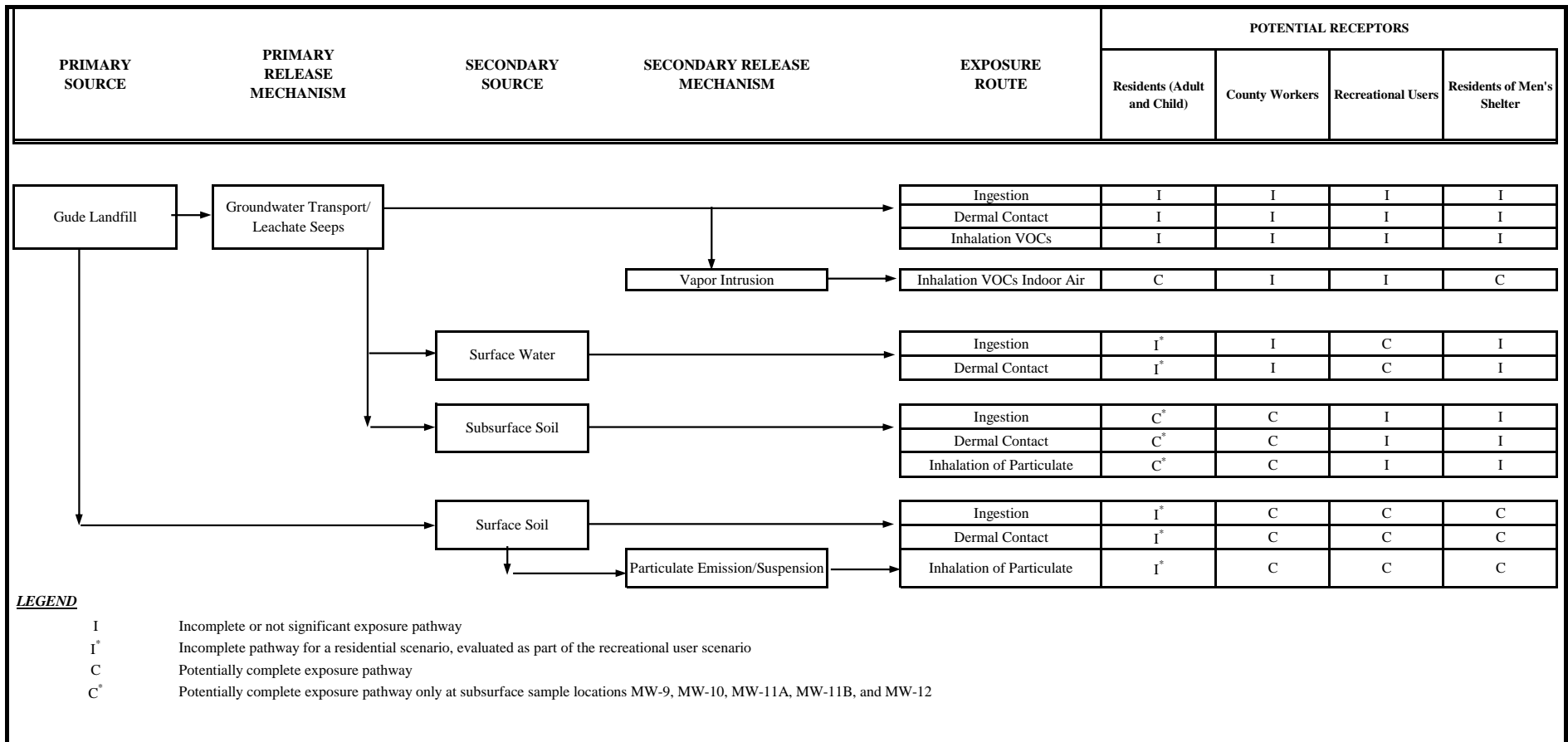
FIGURE 5-4
SURFACE SOIL SAMPLE LOCATION MAP

DESIGNED BY PL	DRAWN BY JP	DATE OCT. 2010	PROJECT NO. 62196.08
CHECKED BY BR	PROJECT MGR. JK	DRAWING NO. -	FIGURE 5-4

**FIGURE 6-1
HUMAN HEALTH CONCEPTUAL SITE MODEL
GUDE LANDFILL**

Summary: The risk evaluation determined no potential concerns for human contact with complete exposure pathways. Only complete exposure pathways are evaluated in the risk evaluation. A complete exposure pathway requires the following four components: a source of chemicals, a transport/release mechanism for chemicals, a point of potential human contact, and a route of human exposure. Potential risk to humans from chemicals requires a complete exposure pathway. Incomplete exposure pathways do result in a risk to human receptors.

References: EPA. 1989. *Risk Assessment Guidance for Superfund, Volume 1 Human Health Evaluation Manual (Part A)*. EPA/540/1-89/002, December.
 EPA. 2010. *Regional Screening Levels, User's Guide*. May. Available at http://www.epa.gov/reg3hwmd/risk/human/rb-concentration_table/usersguide.htm.
 MDE. 2008. *Cleanup Standards for Soil and Groundwater*. Interim Final Guidance (Update 2.1). June.



**FIGURE 6-2
ECOLOGICAL CONCEPTUAL SITE MODEL
GUDE LANDFILL**

Summary: The risk evaluation determined no potential concerns for ecological receptors contact with complete exposure pathways. Only complete exposure pathways are evaluated in the risk evaluation. A complete exposure pathway requires the following four components: a source of chemicals, a transport/release mechanism for chemicals, a point for potential ecological contact, and a route of ecological exposure. Potential risk to ecological receptors from chemicals requires a complete exposure pathway. Incomplete exposure pathways do result in a risk to ecological receptors.

References: EPA. 1998. *Guidelines for Ecological Risk Assessment*. EPA/630/R-95/002F. April.
EPA. 2005. *Guidance for Developing Ecological Soil Screening Levels*. OSWER Directive 9285.7-55. Revised February.

