HENRY M. HIRATA
DIRECTOR

COUNTY OF SAN JOAQUIN
DEPARTMENT OF PUBLIC WORKS

P.O. BOX 1810 - 1810 E. HAZELTON AVENUE
STOCKTON, CALIFORNIA 95201
(209) 468-3000

ENCROACHMENT PERMIT

E.P. No. 95-189-SW

6-21-95
(Date Issued)

9-26-95
(Expiration Date)

11005
(Job No.)

To: ADVANCED GEO ENVIRONMENTAL INC.
OF NORTHENRN CALIFORNIA
1803 W. MARCH LANE, STE. A
STOCKTON, CA 95207-6414

Encroachment type: SOIL & WATER SAMPLE

Location: W/S HANSEN RD., ½ MILE
N/O VON SOSTEN RD.

In compliance with your request of 6-20, 19 95, permission is hereby granted to do work in County right of way as shown on attached application and subject to all the terms, conditions and restrictions written below or printed as general or special provisions on any part of this form. See reverse side and attached sheet, if any.

Trench excavations for service connections will not be permitted within ten feet (10') of pavement centerline unless otherwise approved by the Director. Surface of trench patches shall match in kind and be smooth and even with that of abutting surface. Special attention shall be given to depth of utilities through roadside area in anticipation of future drainage facilities, road profile and/or frontage development. All underground utility facilities are to be established and accurately dimensioned on sketches from surveyed centerline of road right of way, not from right of way (border) lines.

The Department of Public Works, Field Inspection Section shall receive a notice at least forty-eight (48) hours prior to beginning any work within the County right of way. All work performed under this permit shall conform to the rules and regulations pertaining to safety established by the California Division of Industrial Safety and Cal-OSHA.

The jobsite shall be kept in a safe condition at all times by the daily removal of any excess dirt or debris which might be a hazard to either pedestrian or automobile traffic. All necessary traffic convenience and warning devices and personnel shall be provided, placed and maintained by and at the sole expense of the Permittee in accordance with the latest edition of the CALTRANS Manual of Traffic Control.

After completion of the work permitted herein, all debris, lumber, barricades, or any excess material shall be removed and the jobsite left in a neat workmanlike manner. Immediately following completion of construction permitted herein, Permittee shall fill out and mail notice of completion provided by Grantor.

Est. Permit Fee: $ 90.00

FORMS: SS/WW,R-29

HENRY M. HIRATA, Director
Department of Public Works

By _____
Permit Section

WHITE - Permittee
GOLDENROD - PWD Central File
YELLOW - Field Inspection
PINK - Permit Section

GENERAL PROVISIONS

1. This permit is issued under and subject to all laws and ordinances of agencies governing the encroachment herein permitted. See the following references:

STREETS AND HIGHWAYS CODE

1. Division 1, Chapter 3
2. Division 2, Chapter 2, Section 942
3. Division 2, Chapter 4, Section 1126
4. Division 2, Chapter 6

SAN JOAQUIN COUNTY ORDINANCES NUMBERED: 324, 441, 648, 662, 672, 695, 700, 860 and 892.

2. It is understood and agreed by the Permittee that the doing of any work under this permit shall constitute an acceptance of all the provisions contained herein and failure on the permittee's part to comply with any provision will be cause for revocation of this permit. Except as otherwise provided for public agencies and franchise holders, this permit is revocable on five days' notice.

3. All work shall be done subject to the supervision of and to the satisfaction of the grantor. The Permittee shall at all times during the progress of the work keep the County Highway in as neat and clean a condition as is possible and upon completion of the work granted herein, shall leave the County Highway in a thoroughly neat, clean and usable condition.

4. The Permittee agrees by the acceptance of this permit to properly maintain any encroachment structure placed by the Permittee on any part of the County Highway and to immediately repair any injury to any portion of the highway, which occurs as a result of the maintenance of the said encroachment structure, until such time as the Permittee may be relieved of the responsibility of such maintenance of the encroachment structure by the County Department of Public Works.

5. The Permittee also agrees by the acceptance of this permit to make, at its own expense, such repairs as may be deemed necessary by the County Director of Public Works or his representative.

6. It is further agreed by the Permittee that whenever construction, reconstruction or maintenance work upon the highway may require, the installation provided for herein shall, upon request of the County Department of Public Works, be immediately moved by and at the sole expense of the Permittee.

7. No material used for fill or backfill in the construction of the encroachment shall be borrowed or taken from within the County right of way.

8. All work shall be planned and carried out so that there will be as little inconvenience as possible to the traveling public. No material shall be stacked within eight feet (8') of the edge of the pavement or traveled way unless otherwise provided herein. Adequate provision shall be made for the protection of the traveling public. Barricades shall be placed, with approved signs and lights at night, and flagmen shall be employed, all as may be required by the particular work in progress.

9. The Permittee, by the acceptance of this permit, shall assume full responsibility for all liability for personal injury or damage to property which may arise out of the work herein permitted or which may arise out of the failure of the part of the Permittee to do the work provided for under this permit. In the event any claim of such liability is made against the County of San Joaquin or any department, official or employee thereof, the Permittee shall defend, indemnify, and hold them and each of them harmless for such claim.

10. All backfill material is to be moistened as necessary and thoroughly compacted with mechanical means. If required by the County Director of Public Works, such backfill shall consist of gravel or crushed rock. The Permittee shall maintain the surface over structures placed hereunder as may be necessary to insure the return of the roadway to a completely stable condition and until relieved of such responsibility by the County Department of Public Works. Wherever a gravel, crushed rock or asphalt surfacing is cut or damaged in the work of placing an encroachment structure, such material shall either be separately stored and replaced in the roadway as nearly as possible in its original state or shall be replaced in kind, and the roadway shall be left in at least as good a condition as it was before the commencement of operations of placing the encroachment structure.

11. Whenever necessary to secure permission from abutting property owners, such abuthority must be secured by the Permittee prior to starting work.

12. The future safety and convenience of the traveling public shall be given every consideration in the location and type of construction.

EP 95-189

APPLICATION FOR ENCROACHMENT PERMIT

PLEASE PRINT:

Date 6-21-95

To: San Joaquin County Highway Department.

Advanced GeoEnvironmental, Inc.
(Applicant Name)

1803 W. MARCH LN #A
(Mailing Address)

STOCKTON CA 95207
(City, State Zip Code)

209 956-0264
(Area Code - Telephone Number)

OFFICE USE ONLY

JOB # 110065 REF# _____
APN ___ - ___ - ___ CRV# 107906
EXP. DATE 10/1/95
VALID 6/26/95 TO 9/26/95 **DRIVEWAYS:**
STREET Hansen Rd. * _____
AREA Tracy QUAD SW * _____
TYPE Soil & water sample * _____
FORMS SS/WW; R-29
NOTE _____

Sketch (Detailed plans may be submitted)

SEE ATTACHED WORK PLAN

The undersigned hereby applies for permission to excavate, construct and / or otherwise encroach on County Highway Right-of-Way on the WEST side of HANSEN ROAD approximately 1/4 feet (mile) North of Von Sosten RD, Tracy, by performing the following work: (description of work): Installation of (2) Geoprobe penetrations within Hansen Road

Work will commence on or about 6-26-95 for approximately 1 days.

I the undersigned certify that I am the owner of the respective property, or am qualified to represent the owner and agree to do the work described above in accordance with the rules, regulations of San Joaquin County and subject to inspection and approval.

[signature] DIRECTOR OF OPERATIONS 6-21-95

SIGNATURE OF APPLICANT - TITLE DATE

Margaret Lagorio
ST PHS-EHD
468-3449

INTERIM WORK PLAN

Lammersville School District - 16555 W. Von Sosten Road, Tracy, California
June 1995

AGE-NC-95-0125

Prepared for

Mr. Ken Olds
LAMMERSVILLE SCHOOL DISTRICT

By

Advanced GeoEnvironmental, Inc.

Corporate Office:
3315 E. Miraloma Avenue, Suite 117
Anaheim, California 92806
Phone (714) 996-5151 • Fax (714) 996-5182

Fresno Office:
2910 E. Heaton Avenue
Fresno, California 93716
Phone (209) 498-8554 • Fax (209) 498-0903

Subsidiary:
Advanced GeoEnvironmental, Inc.
of Northern California

1803 W. March Lane, Suite A
Stockton, California 95207
Phone (209) 956-0264 • Fax (209) 956-0700

INTERIM WORK PLAN
June 1995
Lammersville Elementary School
16555 W. Von Sosten Road
Tracy, California

1.0. INTRODUCTION

In accordance with a request from Mr. Kenneth Olds of the Lammersville School District (LSD), Advanced GeoEnvironmental, Inc. (AGE) has prepared this Interim Work Plan for the installation of four Geoprobe penetrations at 16555 W. Von Sosten Road in Tracy, California (the site). The proposed scope of work is intended to complete the assessment of hydrocarbon impacted soil and ground water at the site. The location of the site is illustrated in Figure 1. A plan of the site is illustrated in Figure 2.

2.0. BACKGROUND

2.1. SITE DESCRIPTION

The site is located at the northwest corner of the intersection of Von Sosten Road and Hansen Road in a rural area northwest of Tracy, California. The property is approximately 10 acres in size and is occupied by Lammersville Elementary School. A maintenance garage and house are located near the northeast corner of the site. Two underground storage tanks (USTs) used to fuel school vehicles, were formerly located near the maintenance garage. The Lammersville Elementary School yard is located to the west and south of the project area.

2.2. REMOVAL OF UNDERGROUND STORAGE TANKS

One 550-gallon regular gasoline underground storage tank (UST) was removed from the site in December 1986. Soil samples collected from beneath the gasoline tank indicated that an unauthorized release of hydrocarbons may have occurred.

One 2,000-gallon diesel UST was removed in March 1989. According to LSD, samples collected from beneath the diesel tank did not indicate the presence of petroleum hydrocarbons. However the San Joaquin County Public Health Services - Environmental Health Division (PHS-EHD) required groundwater samples of the area to determine if an unauthorized release of diesel had occurred.

2.3. GROUND WATER MONITORING WELL INSTALLATION

In 1987, LSD initiated an assessment of the impacted soil and groundwater. Between 1987 and 1992, a total of 10 ground water monitoring wells were installed at the site. No petroleum hydrocarbons

were detected in soil samples collected during the installation of the monitoring wells. However, organic vapors were detected in soil samples from MW-6 and MW-7. No investigation of soil in the vicinity of the tank pit or northwest of MW-2 has been undertaken.

2.4. GROUND WATER MONITORING

Ground water samples have been collected at the site on eight occasions since June 1987. Petroleum hydrocarbons were detected intermittently at the site. The depth to groundwater at the site was approximately 8 feet below surface grade during the last sampling event (January 1992). Groundwater flow direction at the site has historically been to the north at a gradient of approximately 0.01 ft/ft.

During the most recent sampling in October and November 1994, low concentrations of toluene detected in 9 of 10 wells. TPH-g was detected only in well MW-2. Laboratory results of ground water samples from the fourth quarter of 1995 are included in Table 1:

TABLE 1
ANALYTICAL RESULTS OF GROUND WATER SAMPLES
LAMMERSVILLE SCHOOL DISTRICT
13 October and 23 November 1994
(µg/L)

Well ID	Date	TPH as Gasoline	Benzene	Toluene	Ethyl-benzene	Xylene
MW-1	10-13-94	ND	2.1	0.52	1.5	1.4
MW-2	11-23-94	150	1.9	0.95	ND	3.7
MW-3	11-23-94	ND	ND	0.93	ND	ND
MW-4	11-23-94	ND	ND	0.78	ND	ND
MW-5	10-13-94	ND	ND	ND	ND	ND
MW-6	10-13-94	ND	ND	0.87	ND	ND
MW-7	10-13-94	ND	ND	1.1	ND	ND
MW-8	11-23-94	ND	ND	0.54	ND	ND
MW-9	10-13-94	ND	ND	0.63	ND	ND
MW-10	10-13-94	ND	ND	0.89	ND	ND

µg/L = parts per billion (ppb) ND = None Detected

2.5. GROUND WATER DEPTH AND FLOW DIRECTION

Based upon data collected during the October/November 1994 monitoring, ground water depth at the site is approximately 8 feet. The flow direction is northerly.

3.0. SCOPE OF WORK

AGE proposes to advance four (4) borings at the site to complete assessment of impacted soil and ground water. The borings will be advanced by "direct push" technology using a Geoprobe. Soil samples will be collected at five-foot intervals in each penetration. Grab ground water samples will also be collected from two of the penetrations.

One penetration will be placed west of MW-6. A second penetration will be placed approximately 20 feet north of the former dispenser island. A third penetrations will be placed within the former UST area. The fourth penetration will be placed between MW-1 and MW-8 in Hansen Road. Approximate locations of the penetrations are illustrated on Figure 2. Each monitoring well at the site will also be sampled during this investigation.

4.0. PROCEDURES

4.1. COLLECTION OF SOIL AND GROUND WATER GRAB SAMPLES

For the collection of soil and ground water samples, the following procedures will be performed:

1) Notify the PHS-EHD 48 hours prior to commencement of any work.

2) Install three probings, using van-mounted, 1.125-inch diameter probe rods to depths of approximately 40 feet. The boring locations are depicted on Figure 2.

3) Decontaminate sampling equipment in an alconox solution and rinse twice with water prior to each sampling run.

4) Obtain discrete soil samples at five-foot intervals, using a Geoprobe soil sampler assembly loaded with pre-cleaned 1.125-inch by 6-inch brass sleeves.

5) Preserve soil in the lead brass sleeve by covering both ends with aluminum foil or Teflon sheets, capping, and sealing with tape.

6) Store the samples under ice and transport the samples in a chilled container to a State certified laboratory for analysis.

7) Screen soil duplicates for the presence of volatile organics using a photo-ionization detector (PID) pre-calibrated to isobutylene.

8) Log borings in accordance with the Unified Soil Classification System.

9) Collect grab ground water samples from selected borings. Ground water samples will be collected using a peristaltic pump. Samples will be collected in 40-ml VOA vials and 1-liter amber bottles.

10) Selected soil and ground water samples will be analyzed for TPH (gasoline and diesel) and BTE&X in accordance with EPA methods 5030/8015m and 8020, respectively.

11) Backfill each probing using a concrete-bentonite slurry in the entire depth of the probing.

4.2. QUARTERLY GROUND WATER MONITORING

Ground water samples will be collected from all wells at the site. The following procedures will be performed:

1) Ground water depth measurements. The depth to ground water will be measured in each well relative to the top of the well casing. Measurements will be made to the nearest 0.01 inch.

2) Each well will be purged of standing water to stabilize ground water parameters (pH, temperature, conductivity). A minimum of three well volumes will be removed from each well. Stabilization measurements will be collected at 1-gallon intervals. Wells will be purged using a submersible pump or PVC bailers.

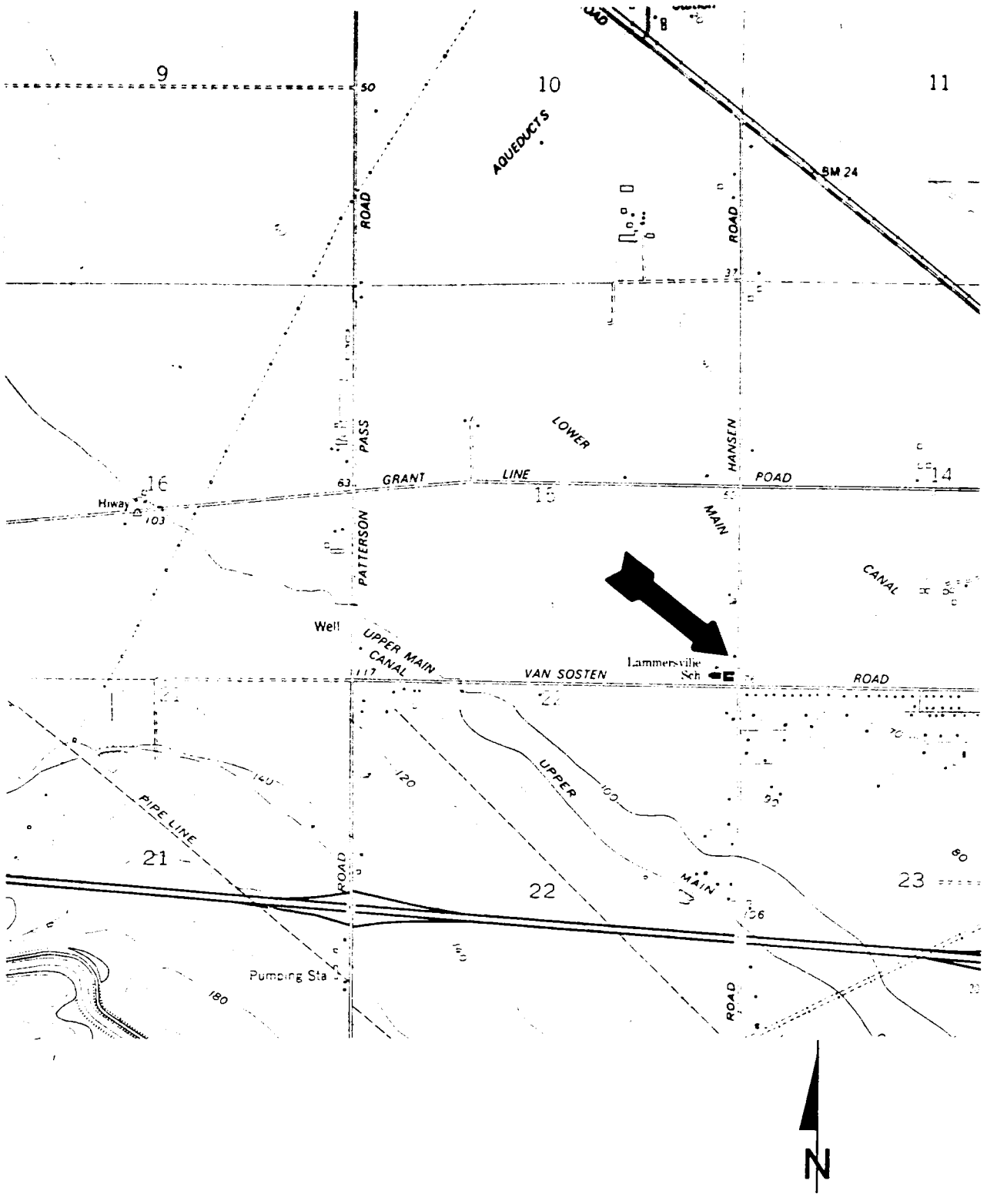
3) Collection of one (1) ground water sample from each well. Samples will be collected using disposable plastic bailers and will be transferred to 40-ml VOA vials and 1-liter amber bottles.

4) Transmission of ground water samples to a State-certified laboratory for analysis. Samples will be transported under chain-of-custody procedure.

5) Samples will be analyzed for TPH-g, TPH-d and BTE&X in accordance with approved EPA methods.

4.3. REPORTING

A report detailing the results of the investigation will be prepared. The report will be in a format acceptable to the PHS-EHD and Central Valley Regional Water Quality Control Board. The report will be reviewed and signed by a California Registered Geologist.



LOCATION MAP

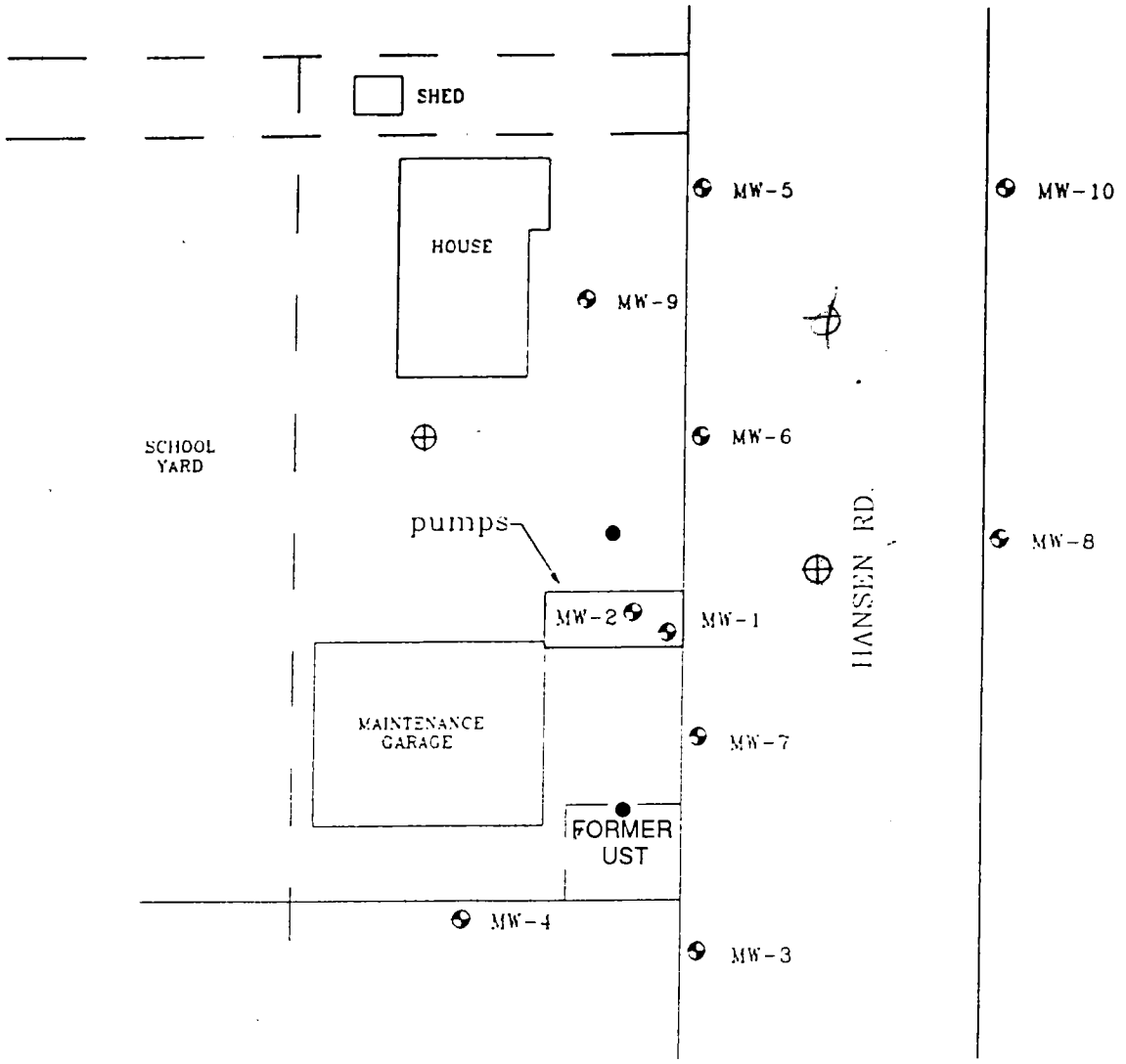
LAMMERSVILLE SCHOOL DISTRICT

Clifton Court and Midway - 7.5 Minute Quadrangles

U.S.G.S. Topographic Series

Advanced GeoEnvironmental, Inc.
of Northern California

Project No.:95-0125	File:	Figure: 1
Date: 15 JUNE 1995	Drawn By: REM	



EXPLANATION

- APPROXIMATE LOCATION OF MONITORING WELLS
- PROPOSED HYDROPUNCH LOCATION
- PROPOSED SOIL BORING LOCATION

N

0 40 80

Approximate Scale 1" = 40'

SITE PLAN

LAMMERSVILLE SCHOOL DISTRICT
16555 W. VON SOSTEN ROAD
TRACY, CALIFORNIA

Advanced GeoEnvironmental, Inc.
of Northern California

Project No.: 0125	File: FIG 2	Figure: 2
Date: 15 JUNE 1995	Drawn By: REM	