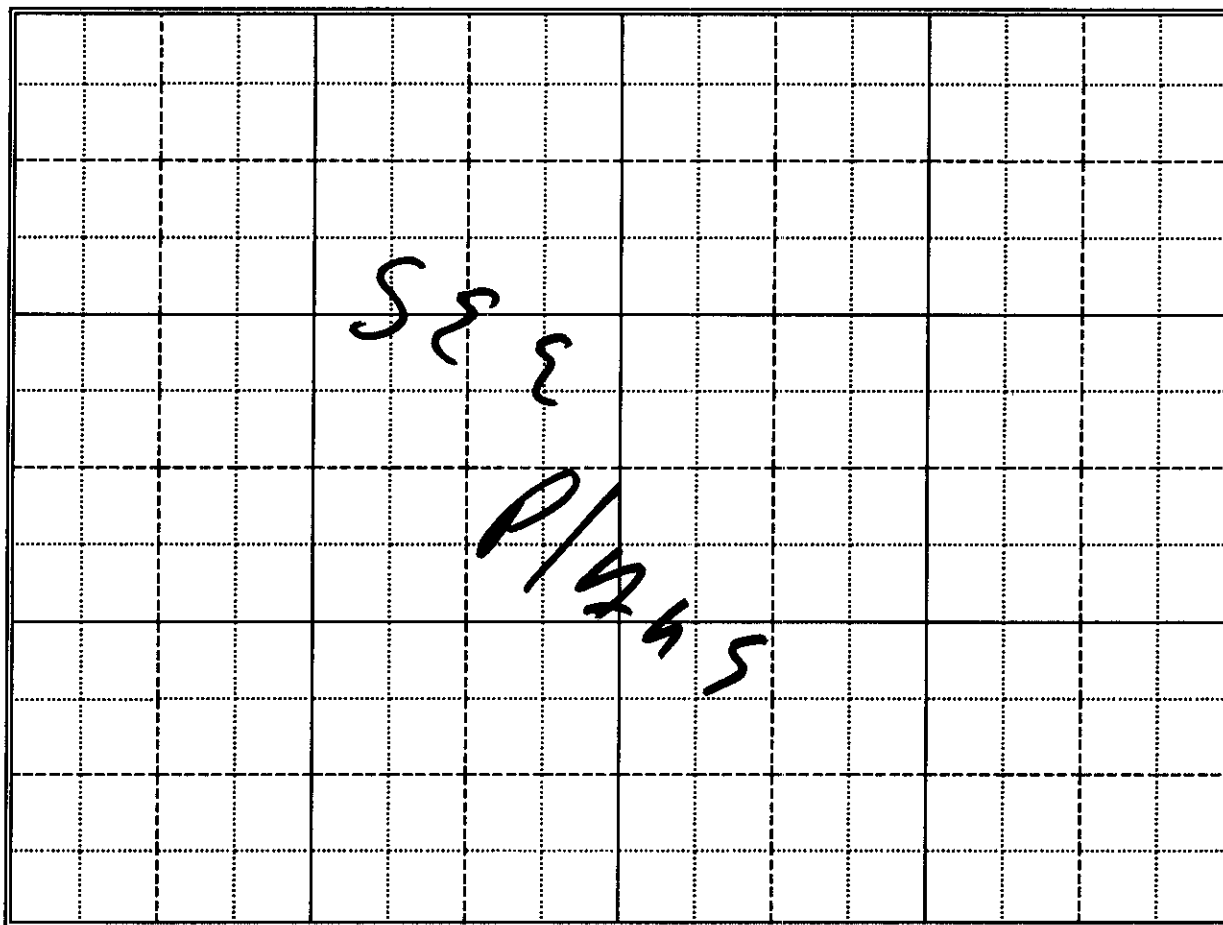


[illegible]

3. **Delivery System Diagram:** Indicate all major components and distances between components. Indicate weir size/ditch size/pipe i.d. as applicable.



Scale: 1" = _____

____ Copy of USGS Quadrangle Attached Showing location(s) of point(s) of diversion and place(s) of use (required).

____ Aerial Photo Attached (required for irrigation of 10+ acres)

____ Photo of Diversion and System Attached

4.

Well or Diversion Identification No.*	Motor Make	Hp	Motor Serial No.	Pump Make	Pump Serial No. or Discharge Size
	Franklin	3	Not Legible	Sub	2"

*Code to correspond with No. on map and aerial photo

D. FLOW MEASUREMENTS

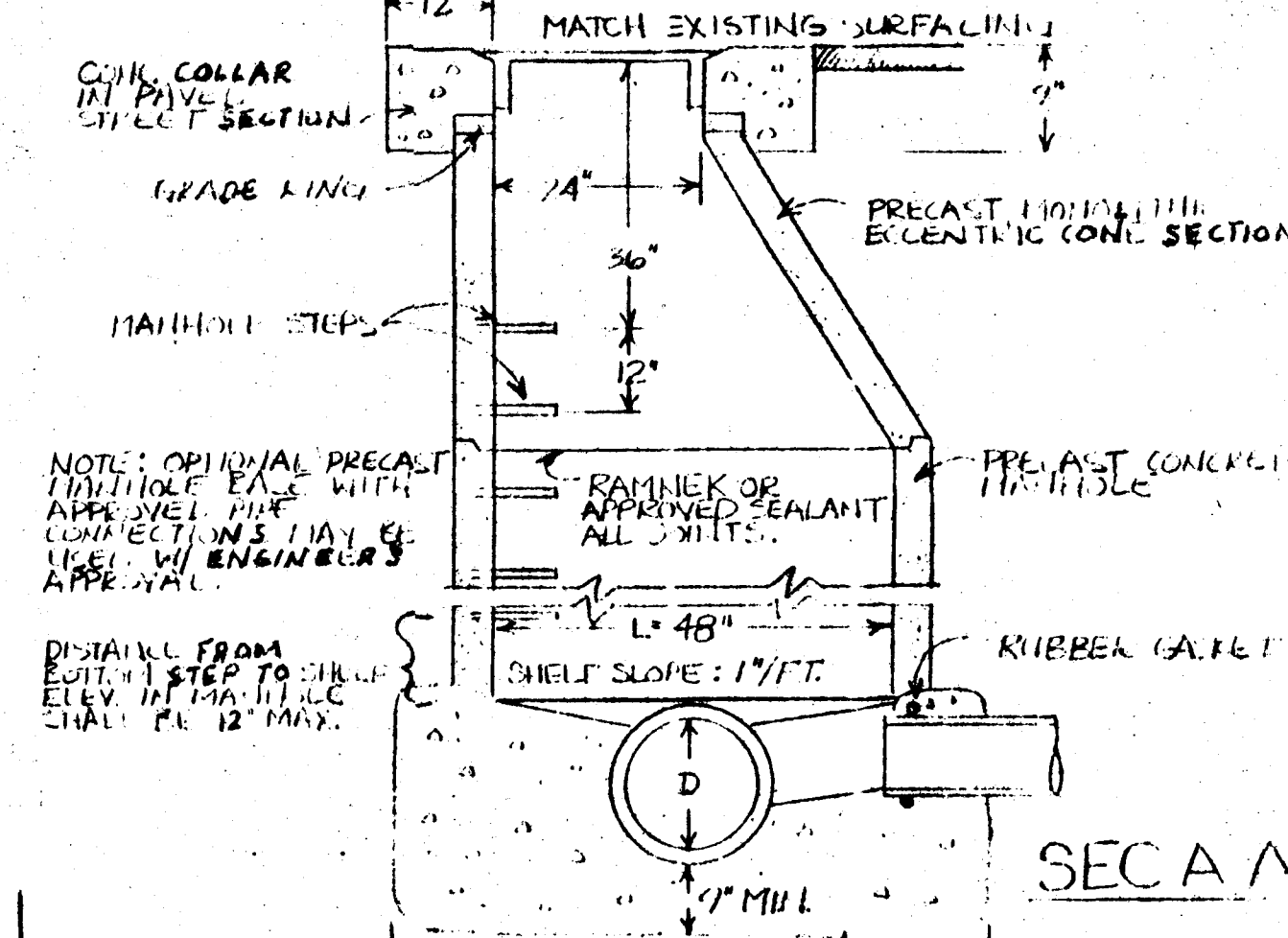
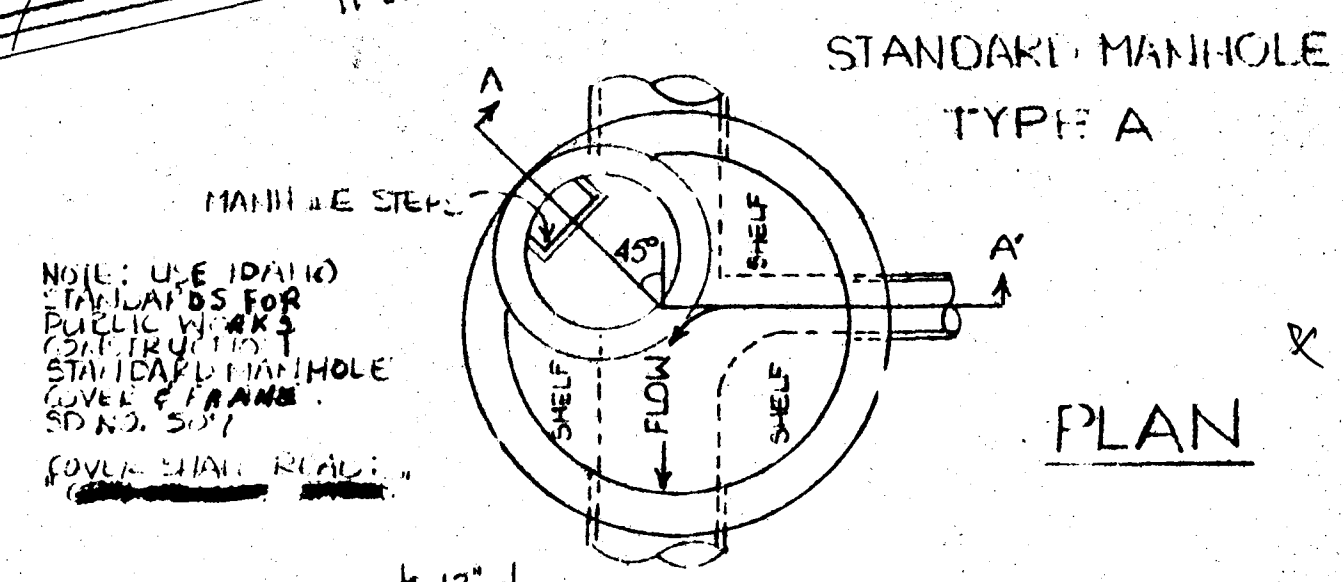
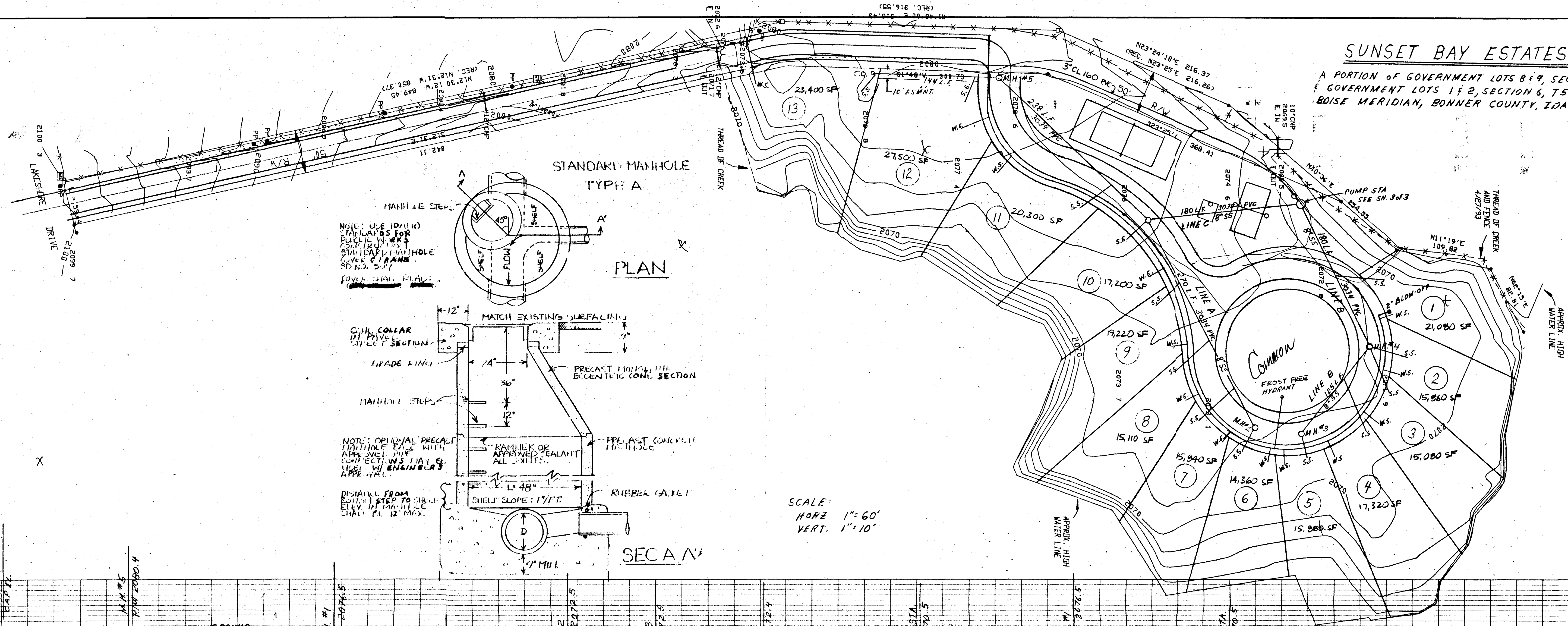
1.

Measurement Equipment	Type	Make	Model No.	Serial No.	Size	Calib. Date

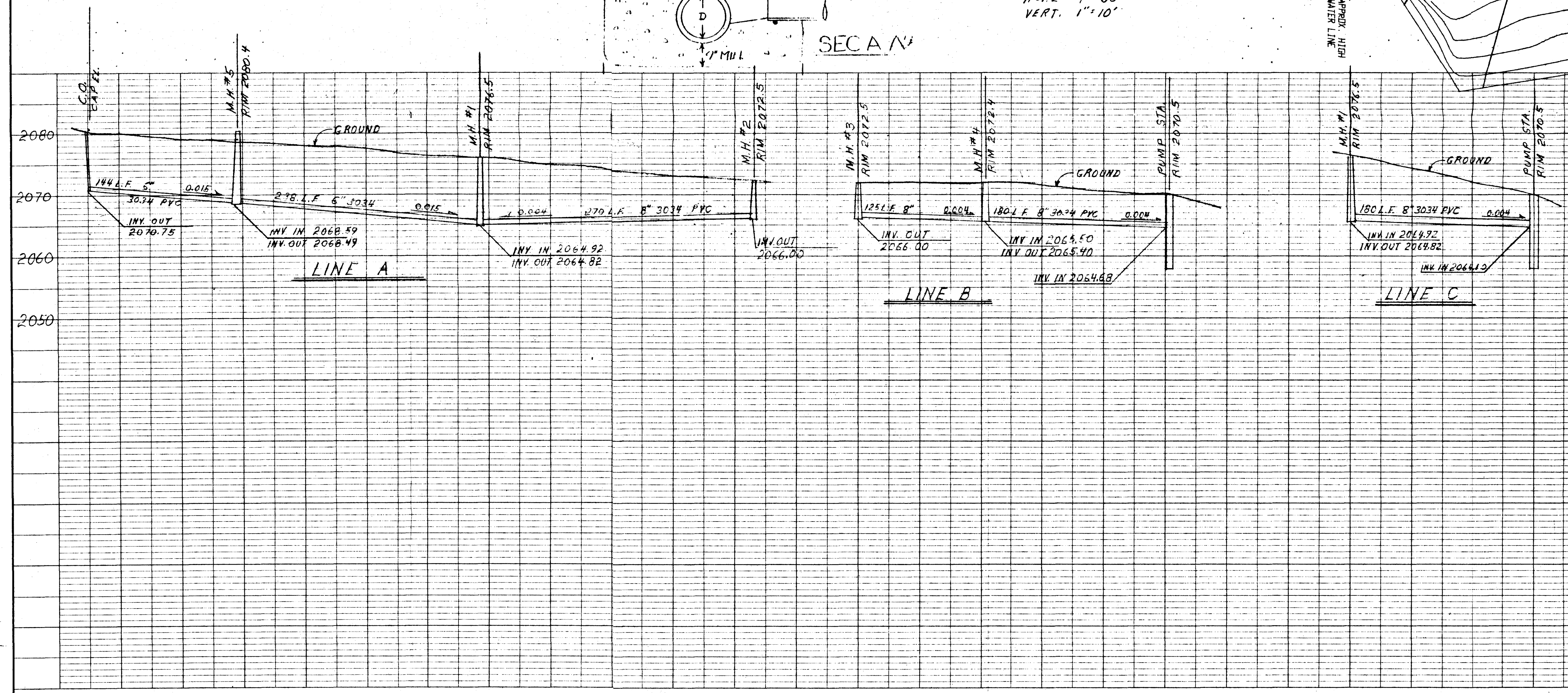
2. **Measurements:** _____

SUNSET BAY ESTATES

A PORTION OF GOVERNMENT LOTS 8 & 9, SECTION 31,
GOVERNMENT LOTS 1 & 2, SECTION 6, T56N, R2W
BOISE MERIDIAN, BONNER COUNTY, IDAHO



SCALE:
HORIZ. 1" = 60'
VERT. 1" = 10'



REV'D. MAY 5, 1994 JAH

[Signature]

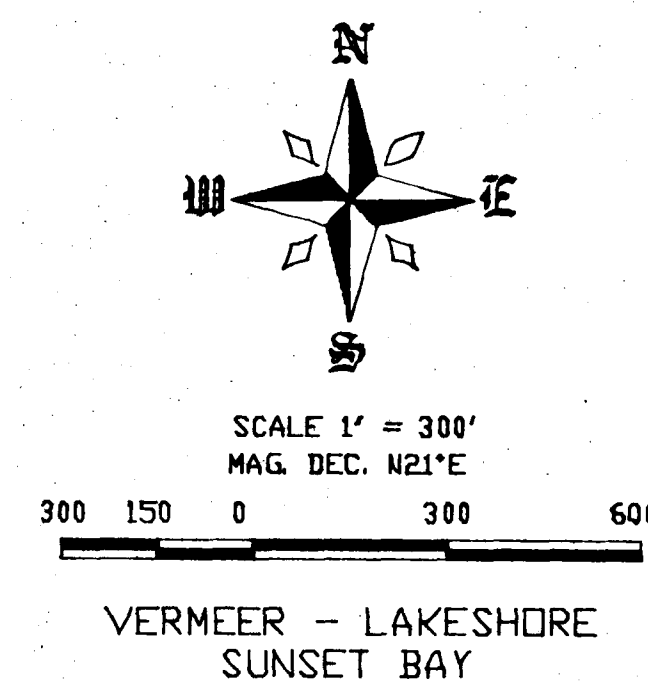
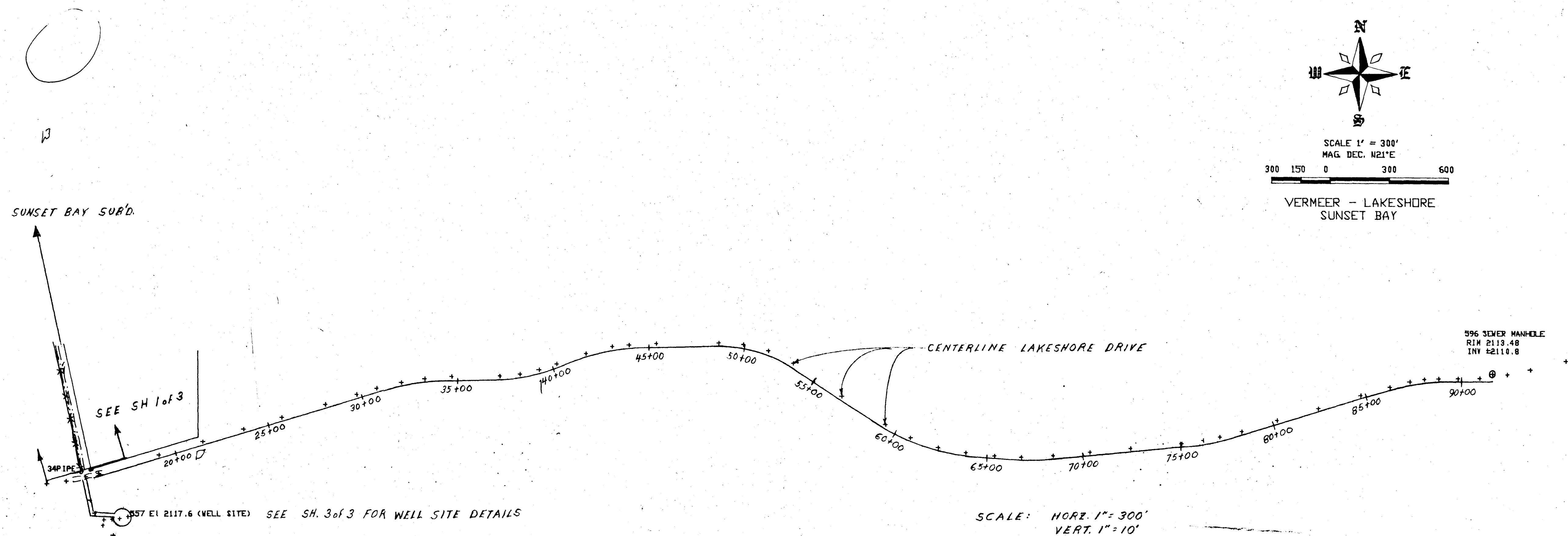
SUNSET BAY
WATER & SEWER

VERMEER ENGINEERING
102 S. FOURTH AVE.
SANDPOINT, ID. 83864

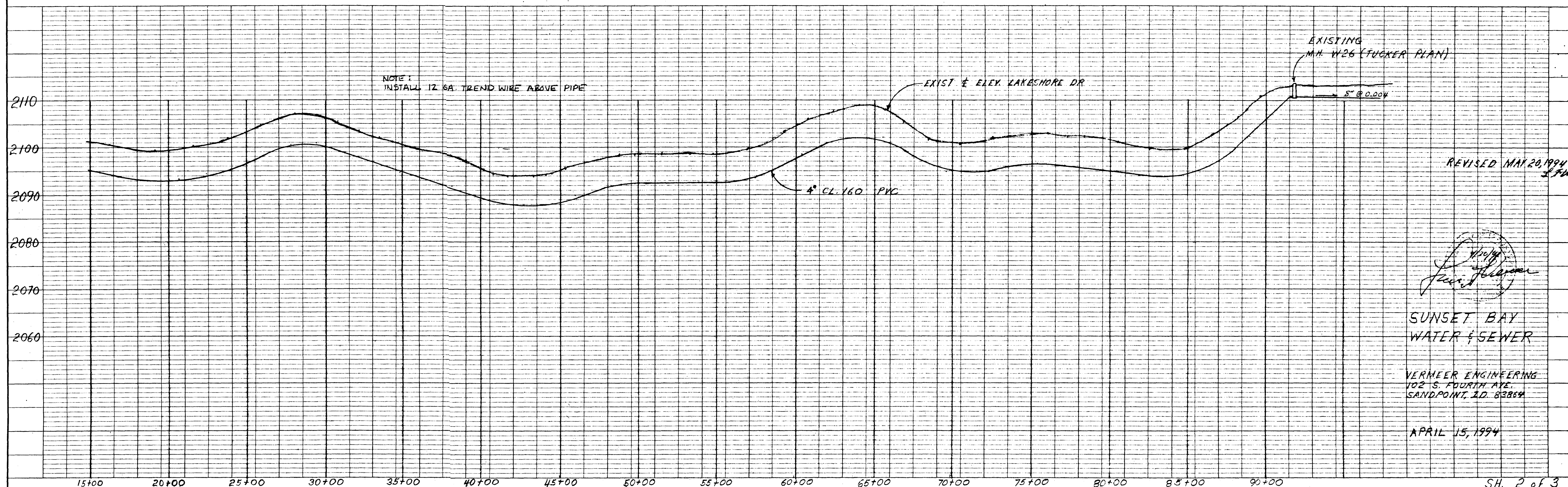
APRIL 5, 1994

PLAN	DATE
SURVEYED	
NOTED	
ALIGNED	
CHECKED	
BY	
NO.	

PROFILE	DATE
SURVEYED	
NOTED	
GRADES	
CHECKED	
BY	
NO.	



SCALE: HORIZ. 1" = 300'
VERT. 1" = 10'



REVISED MAY 20, 1994
JPH

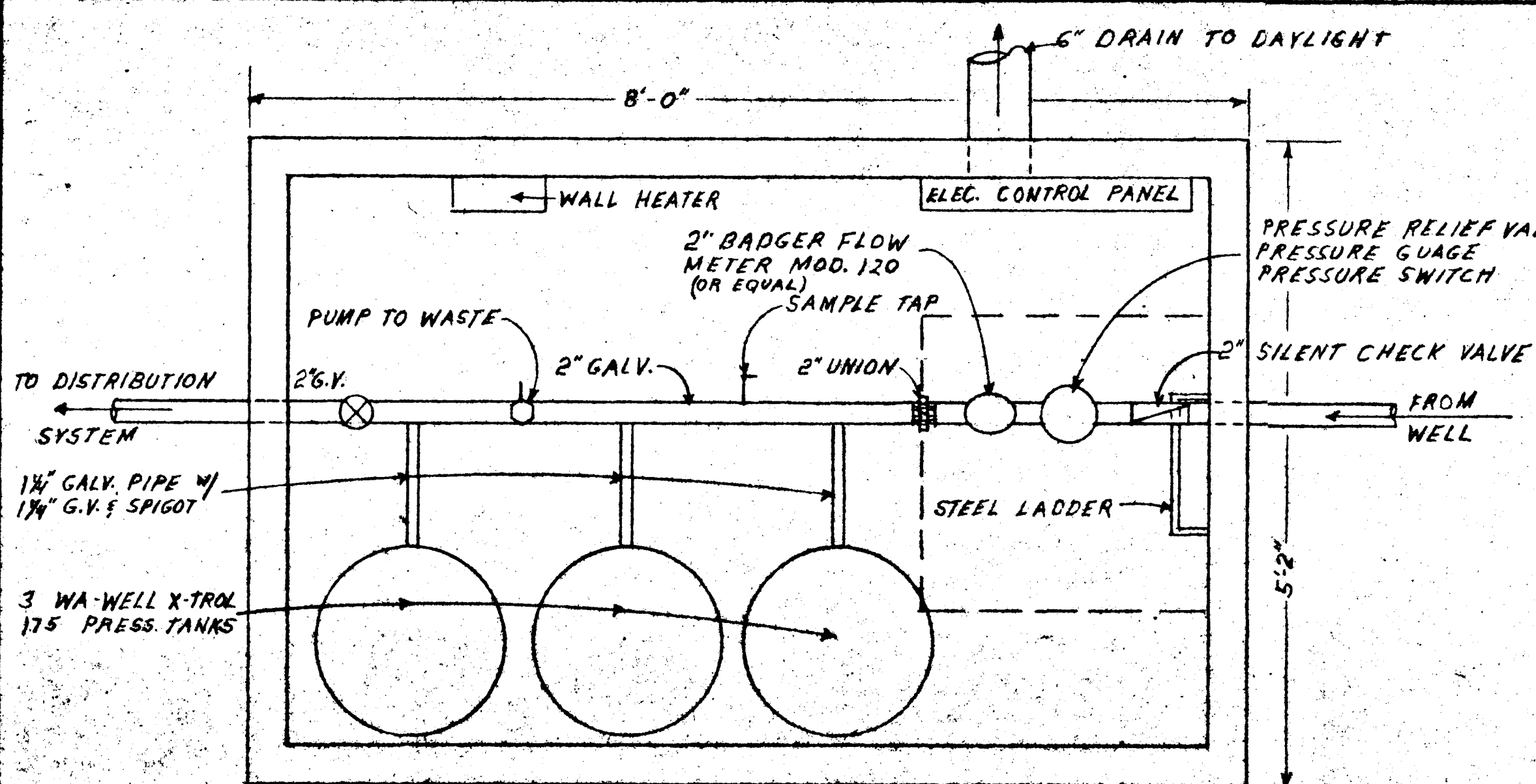
[Signature]

SUNSET BAY
WATER & SEWER

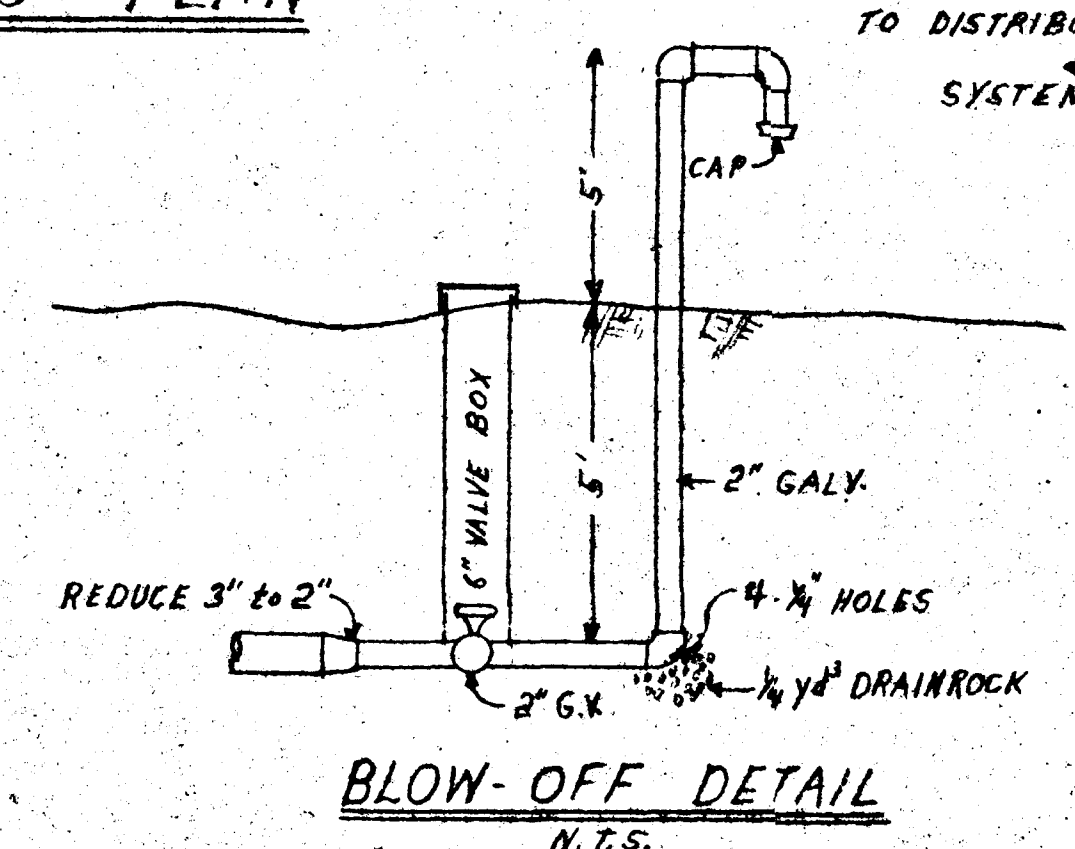
VERMEER ENGINEERING
102 S. FOURTH AVE.
SANDPOINT, ID. 83864

APRIL 15, 1994

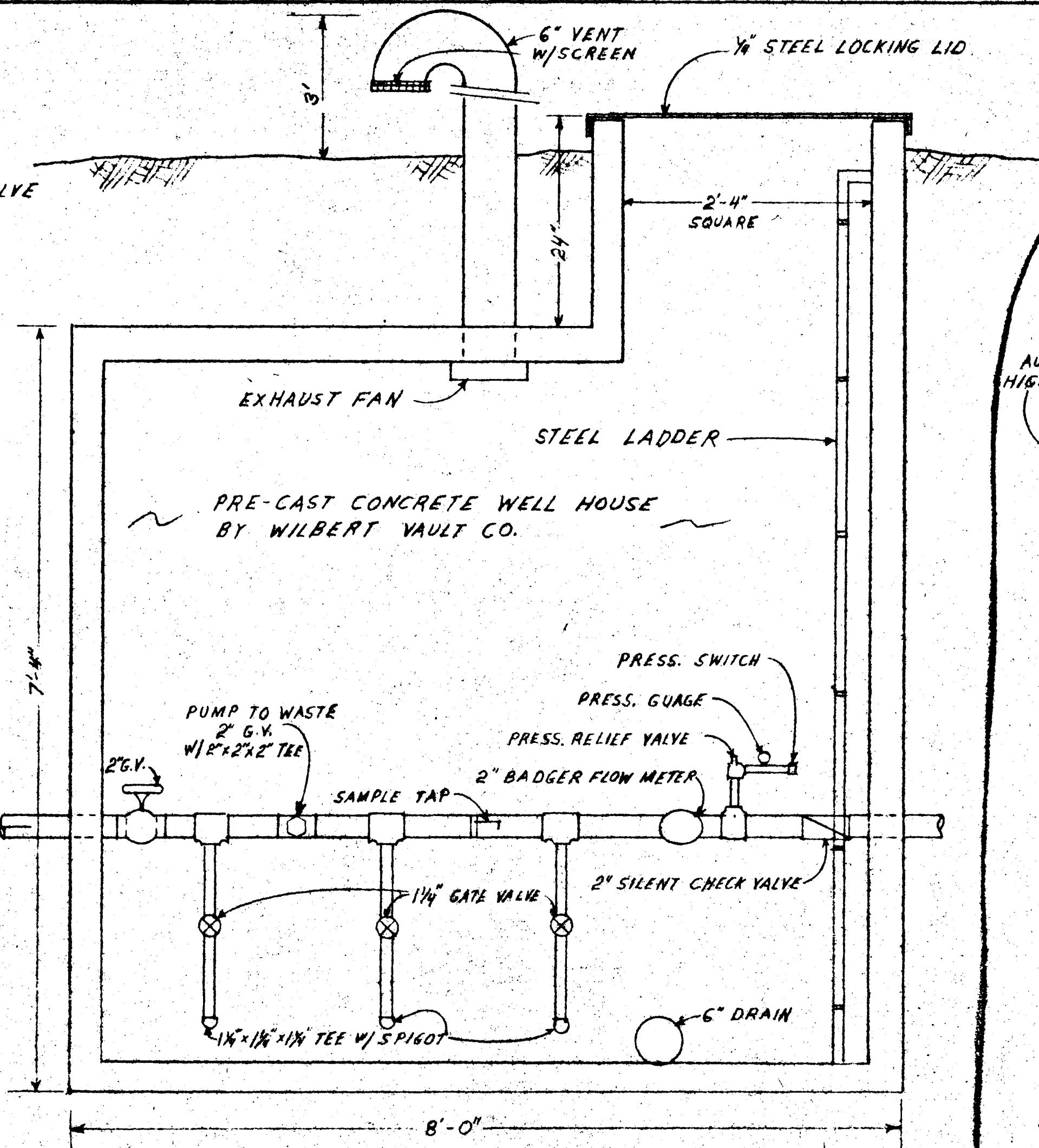
SH. 2 of 3



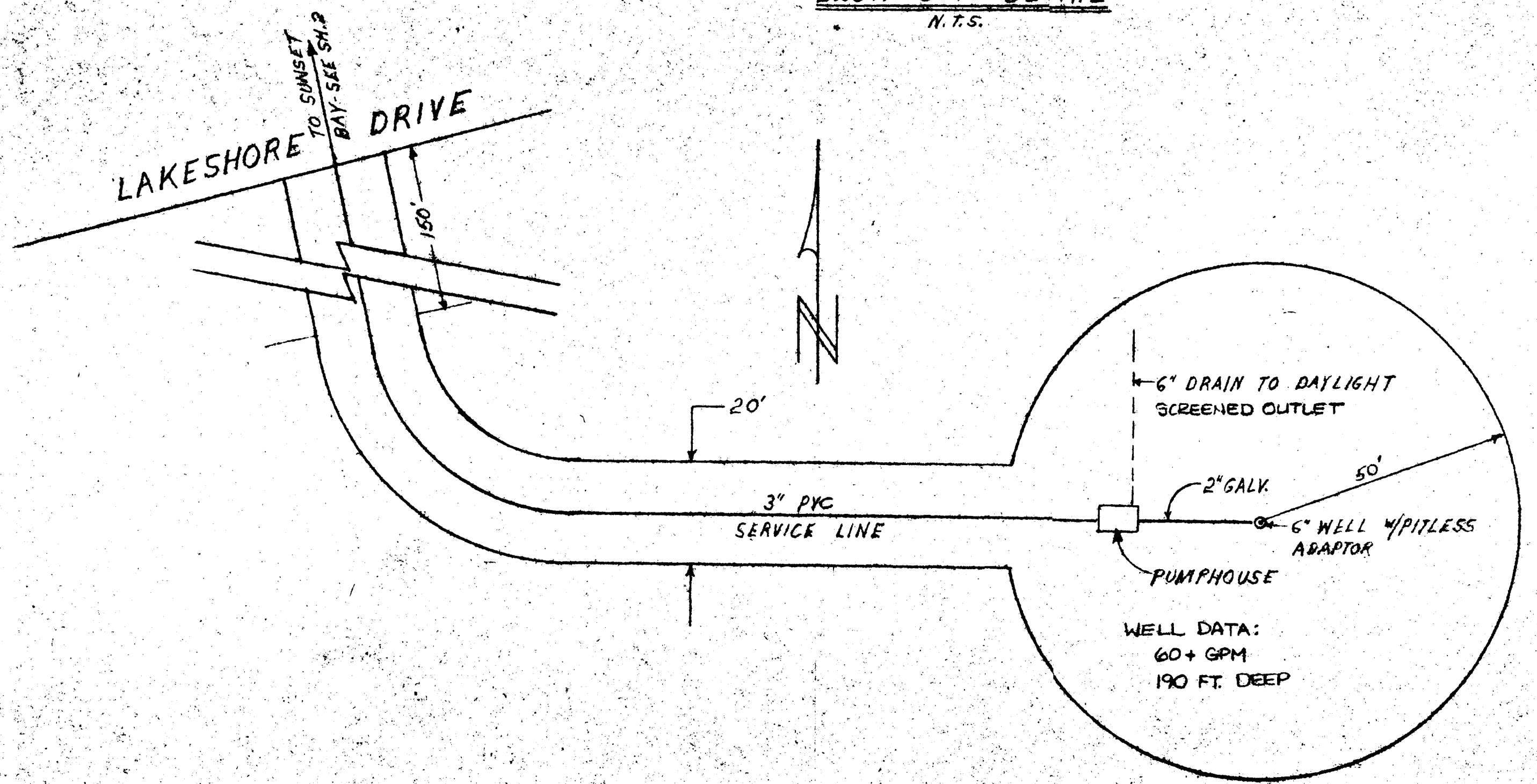
PUMPHOUSE PIPING PLAN
1" = 1'-0"



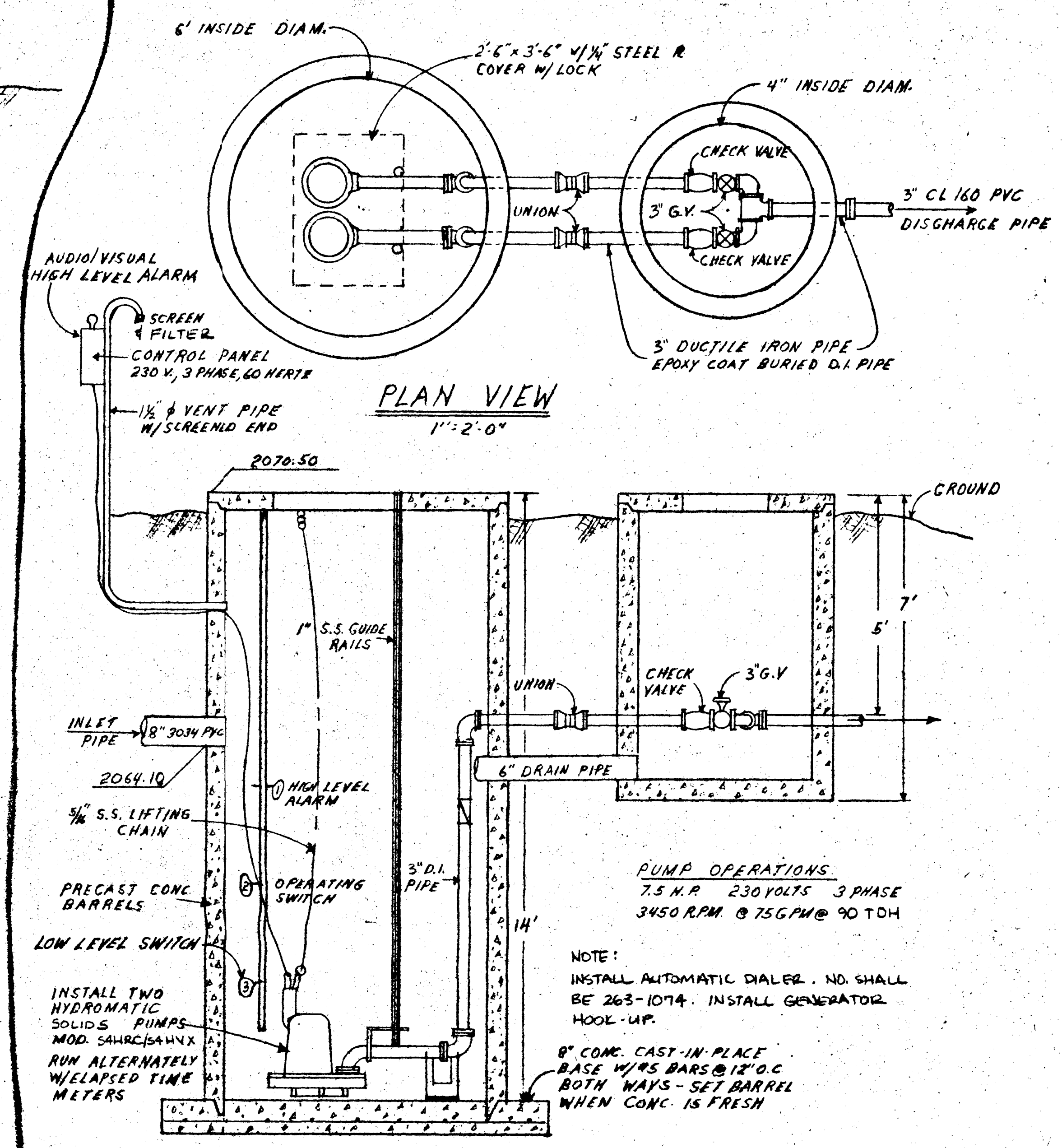
BLOW-OFF DETAIL
N.T.S.



ELEVATION VIEW
1" = 1'-0"



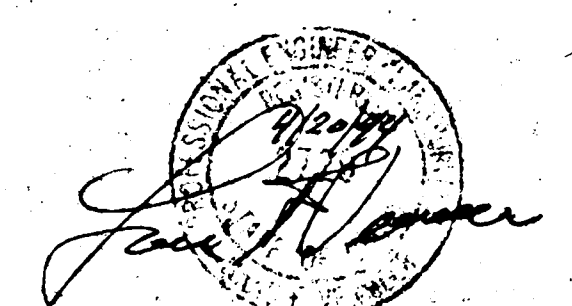
WELL SITE PLAN
1" = 20'



SEWER PUMP STATION
1" = 2'-0"

GENERAL NOTES

- 1) ALL CONSTRUCTION SHALL BE IN ACCORDANCE WITH IDAHO STANDARDS FOR PUBLIC WORKS CONSTRUCTION SECTIONS 300, 400 & 500.
- 2) ALL PRESSURE SEWER & WATER PIPE SHALL BE CL 160 PVC.
- 3) THE WATER DISTRIBUTION SYSTEM IS DESIGNED TO SERVE 13 LOTS IN SUNSET BAY ESTATES & ONE SITE NEAR WELL SITE.
- 4) THE SEWER SYSTEM WILL BE OWNED & MAINTAINED BY SOUTHSIDE WATER & SEWER DISTRICT.
- 5) INSTALL THRUST BLOCKS @ ALL CHANGES OF PIPE SIZE OR ALIGNMENT IN WATER & SEWER LINES.
- 6) THE ENGINEER SHALL INSPECT CONSTRUCTION AND PROVIDE AS-BUILT PLANS TO THE IDAHO DEPARTMENT OF HEALTH & WELFARE.



REVISED 6/10/94 L.H.

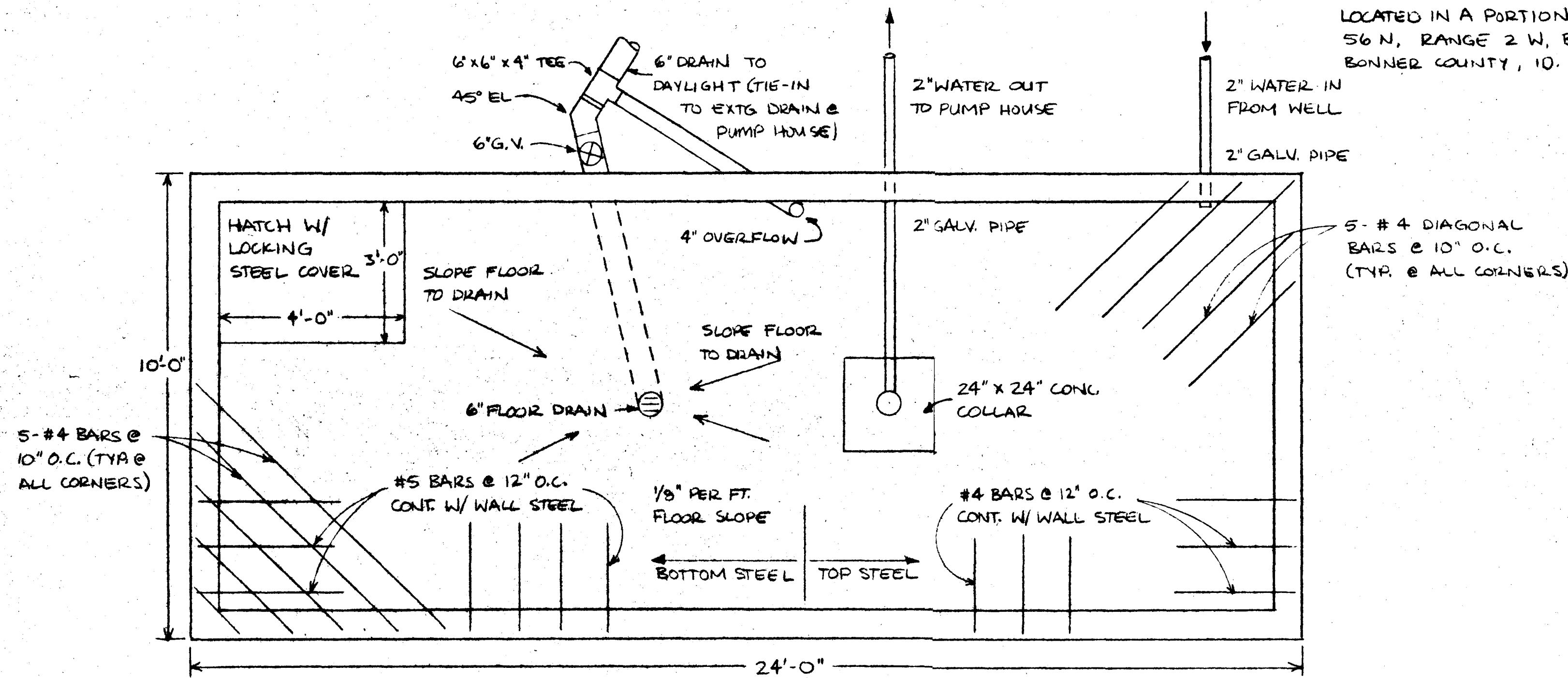
**SUNSET BAY ESTATES
WATER & SEWER PLANS**

VERMEER ENGINEERING
102 S. FOURTH AVE.
SANDPOINT, ID. 83864

APRIL 18, 1994

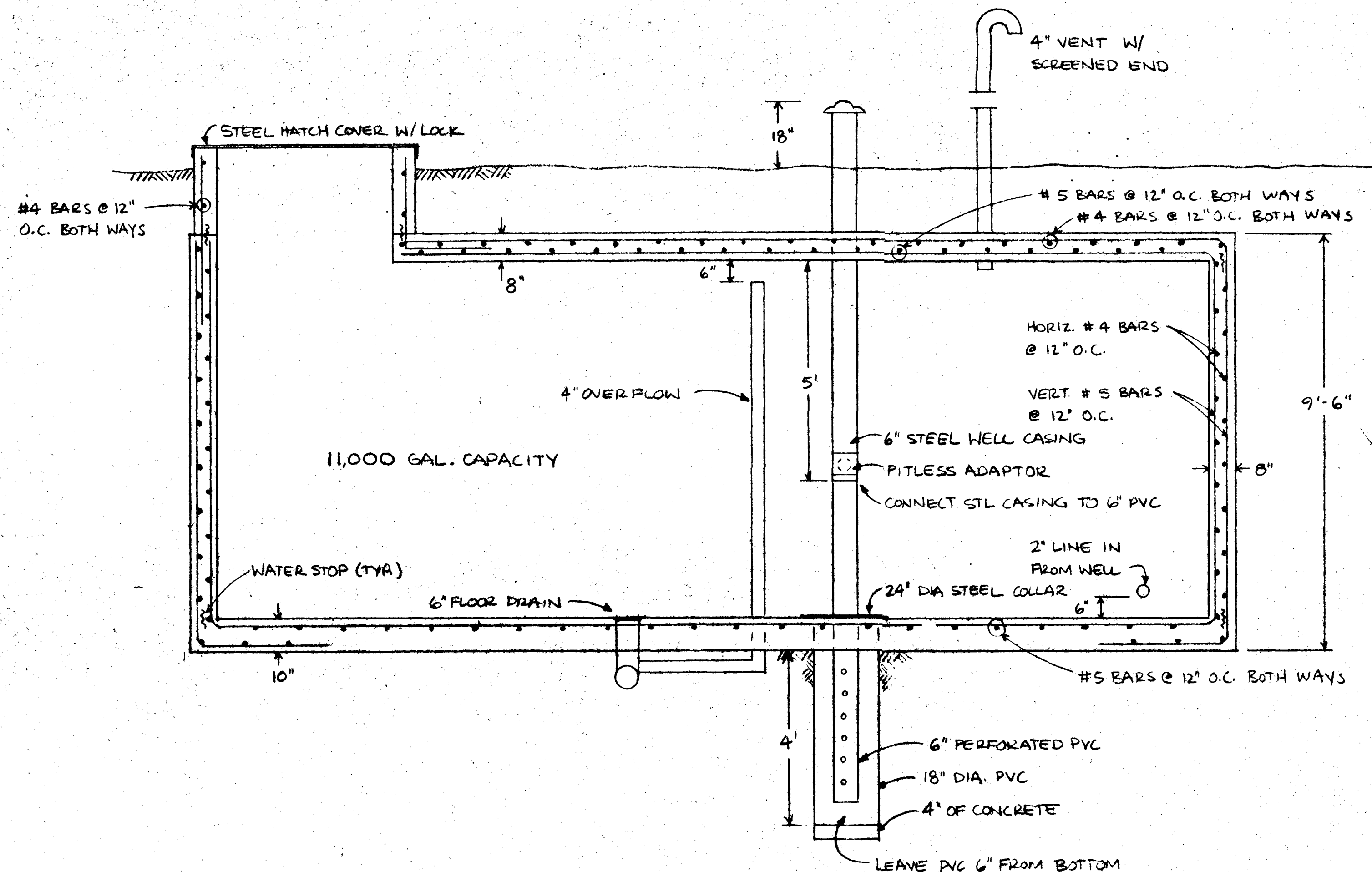
SUNSET BAY ESTATES RESERVOIR

LOCATED IN A PORTION OF SEC. 31, TOWNSHIP
56 N., RANGE 2 W., BOISE MERIDIAN,
BONNER COUNTY, ID.



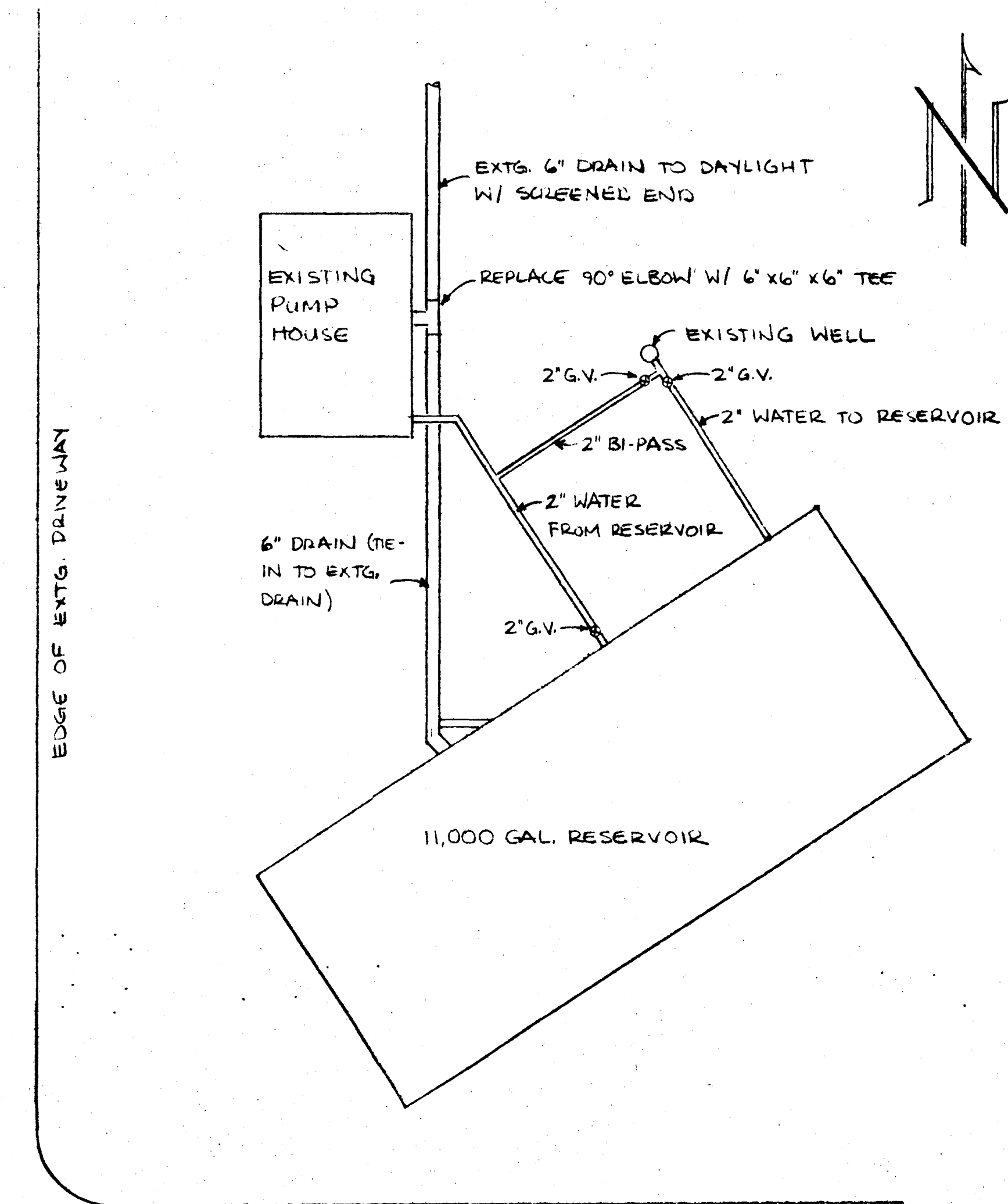
RESERVOIR DETAIL

1" = 2'



CROSS SECTION

1" = 2'

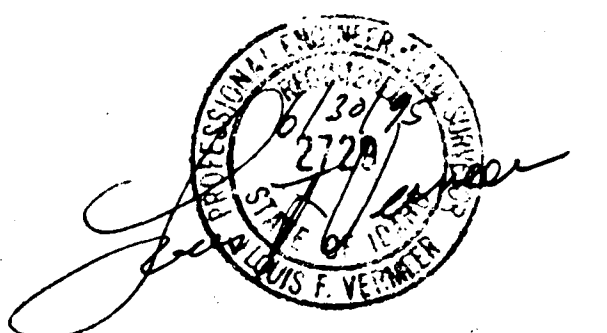


SITE PLAN

1" = 4'

GENERAL NOTES

1. ALL CONSTRUCTION SHALL BE IN ACCORDANCE WITH IDAHO STANDARDS FOR PUBLIC WORKS CONSTRUCTION SECTIONS 200, 300, & 400.
2. INSTALL CONTINUOUS "WATER STOP" AT ALL JOINTS AROUND RESERVOIR.
3. THE ENGINEER SHALL INSPECT CONSTRUCTION AND PROVIDE AS BUILT PLANS TO THE DEPT. OF HEALTH AND WELFARE.



SUNSET BAY ESTATES
RESERVOIR

VERMEER
ENGINEERING

102 S. Fourth Avenue, Sandpoint, Idaho 83864

JUNE 26, 1995

SHEET 1 OF 1

This image shows a single sheet of white paper with horizontal ruling lines. The lines are evenly spaced and run across the width of the page. There are no margins, text, or other markings on the paper.

Have conditions of permit approval been met? ✓ yes no

F. FLOW CALCULATIONS

Measured Method:

Flow Meter 23 gpm Additional Computation Sheets Attached

$$\frac{23 \times 1.33681}{60} = .05 \text{ cfs}$$

G. VOLUME CALCULATIONS

1. Volume Calculations for Irrigation:

$$V_{I.R.} = (\text{Acres Irrigated}) \times (\text{Irrigation Requirement}) = 6 \times 3 = 18$$

$$V_{D.R.} = [\text{Diversion Rate (cfs)}] \times (\text{Days in Irrigation Season}) \times 1.9835 = .05 \times 245 \times 1.9835 = 24.3$$

$$V = \text{Smaller of } V_{I.R.} \text{ and } V_{D.R.} = 18$$

2. Volume Calculations for Other Uses:

Lot size minus 3000 ft² + 1/4 acre common = IRR ACREAGE
 4.5 ACRE for 2 houses within 1/4 acre diversion other 2 use lake water for lawn & garden

H. RECOMMENDATIONS

1. Recommended Amounts

Beneficial Use	Period of Use		Rate of Diversion Q (cfs)	Annual Volume V (afa)
	From	To		
Irrigation	03-15	11-15	.05	18
Domestic	01-01	12-31	.05	10.2
Totals:			.05	28.2

2. Recommended Amendments

☐ Change P.D. as reflected above ☐ Add P.D. as reflected above ☐ None
☐ Change P.U. as reflected above ☐ Add P.U. as reflected above ☐ Other

I. AUTHENTICATION

Field Examiner's Name

Wayne Boldt

Date

12-13-99

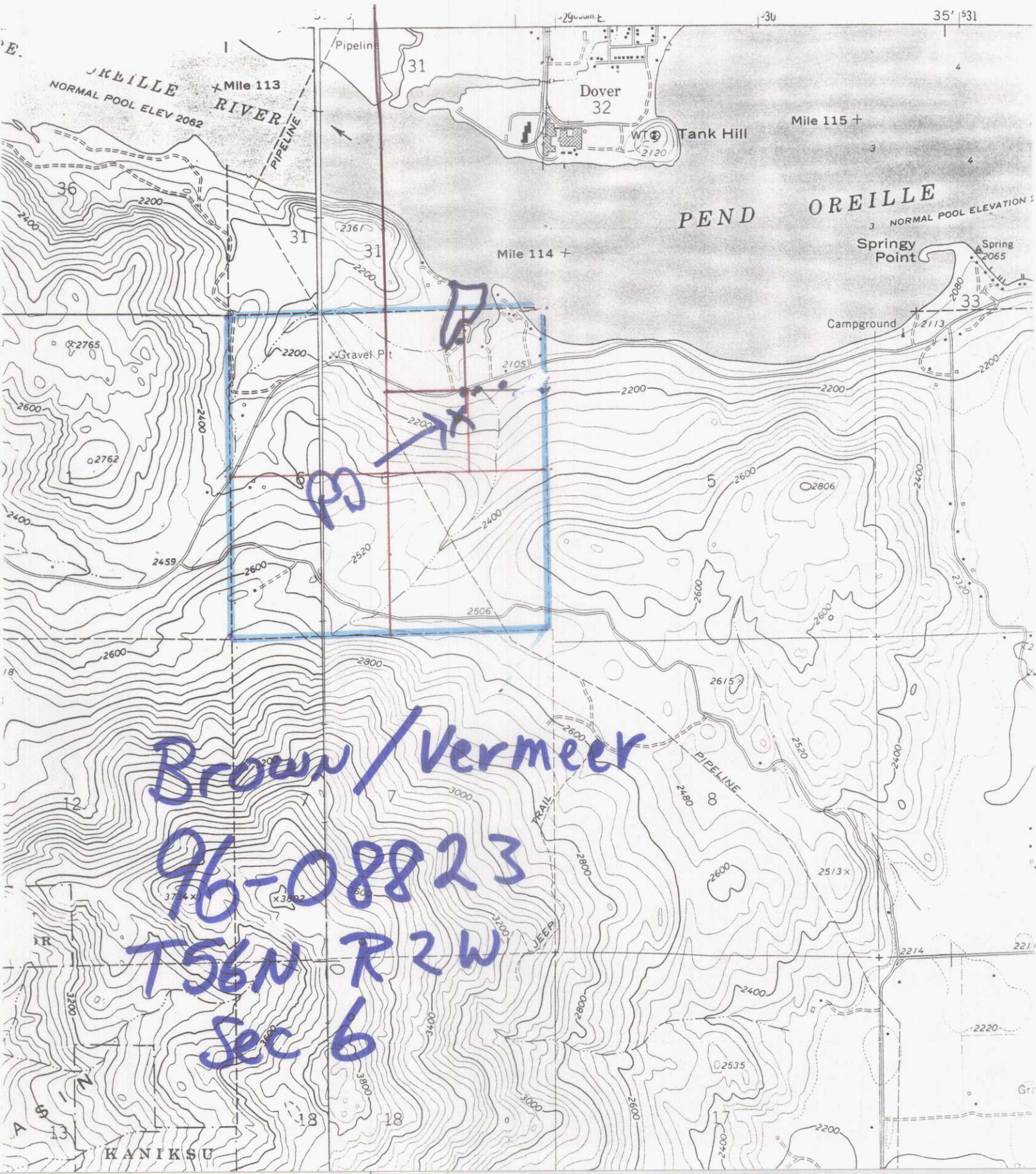
Reviewer

Date

SEAL

2680 / 1 SL
HAPPY FOGEL
1940

UNITED STATES
DEPARTMENT OF THE ARMY



Brown / Vermeer

96-08823

T56N R2W

Sec 6



pu



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96-08823



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