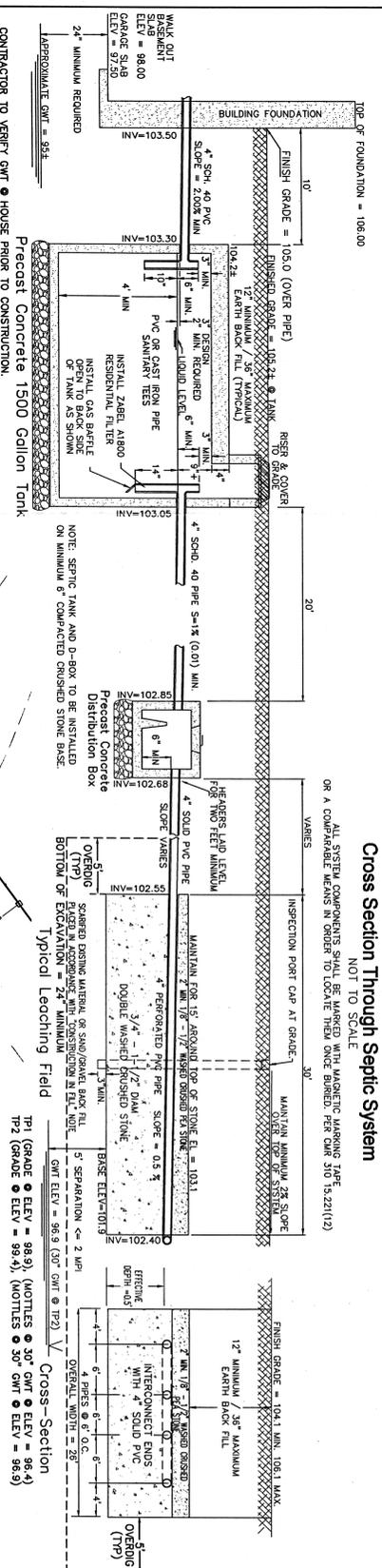
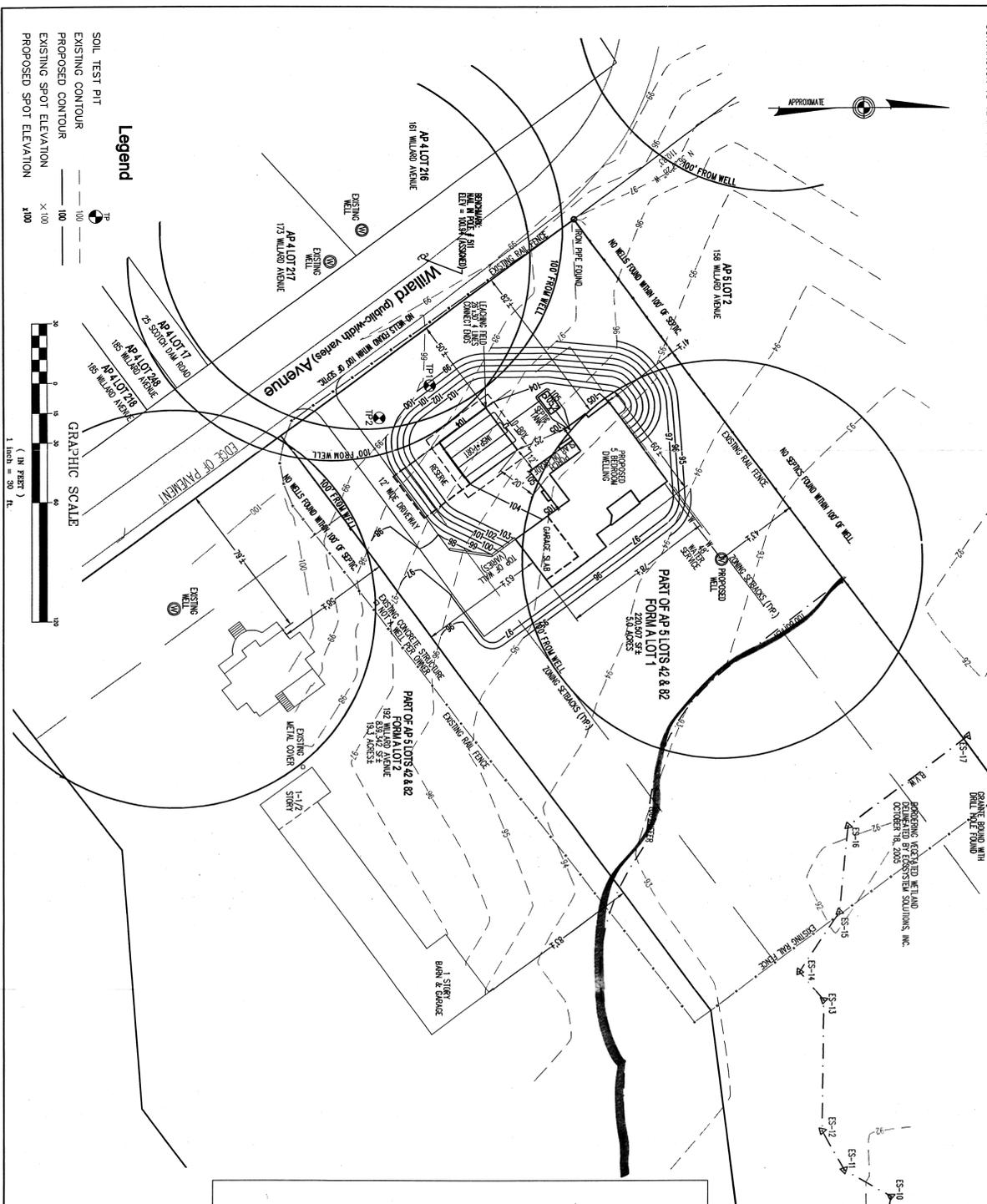


Location (not to scale) Map



Cross Section Through Septic System
NOT TO SCALE

Typical Leaching Field
p1 (GRADE = ELEV = 98.9), (NOTES = 30\"/>



Soil Evaluation & Perc Results

Bob Wilbur
150-100
150-100

Soil Evaluation & Perc Results

Depth (ft)	Soil Description	Moisture (%)	Specific Gravity	Unit Weight (pcf)	Void Ratio	Porosity (%)	Permeability (cm/sec)	Permeability (ft/day)
0-1	Topsoil	12	2.65	110	0.65	35	0.0001	0.0001
1-2	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001
2-3	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001
3-4	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001
4-5	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001
5-6	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001
6-7	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001
7-8	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001
8-9	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001
9-10	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001
10-11	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001
11-12	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001
12-13	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001
13-14	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001
14-15	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001
15-16	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001
16-17	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001
17-18	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001
18-19	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001
19-20	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001
20-21	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001
21-22	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001
22-23	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001
23-24	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001
24-25	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001
25-26	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001
26-27	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001
27-28	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001
28-29	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001
29-30	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001
30-31	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001
31-32	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001
32-33	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001
33-34	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001
34-35	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001
35-36	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001
36-37	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001
37-38	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001
38-39	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001
39-40	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001
40-41	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001
41-42	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001
42-43	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001
43-44	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001
44-45	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001
45-46	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001
46-47	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001
47-48	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001
48-49	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001
49-50	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001
50-51	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001
51-52	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001
52-53	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001
53-54	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001
54-55	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001
55-56	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001
56-57	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001
57-58	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001
58-59	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001
59-60	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001
60-61	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001
61-62	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001
62-63	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001
63-64	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001
64-65	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001
65-66	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001
66-67	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001
67-68	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001
68-69	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001
69-70	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001
70-71	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001
71-72	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001
72-73	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001
73-74	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001
74-75	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001
75-76	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001
76-77	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001
77-78	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001
78-79	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001
79-80	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001
80-81	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001
81-82	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001
82-83	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001
83-84	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001
84-85	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001
85-86	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001
86-87	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001
87-88	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001
88-89	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001
89-90	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001
90-91	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001
91-92	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001
92-93	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001
93-94	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001
94-95	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001
95-96	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001
96-97	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001
97-98	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001
98-99	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001
99-100	Light Clay	18	2.65	115	0.60	30	0.0001	0.0001

Notes & Specifications

THIS PLAN HAS BEEN PREPARED IN ACCORDANCE WITH THE RULES AND REGULATIONS OF 310 CMR 15.11E (1) OF THE COMMONWEALTH OF MASSACHUSETTS AND THOSE OF THE TOWN BOARD OF HEALTH.

THE REQUIRED INSPECTION SCHEDULE DURING THE PROCESS OF CONSTRUCTION SHALL BE ARRANGED BY THE CONTRACTOR WITH THE BOARD OF HEALTH & DESIGN ENGINEER PRIOR TO THE COMMENCEMENT OF CONSTRUCTION. CONTRACTOR SHALL BE RESPONSIBLE FOR THE DESIGN AND CONSTRUCTION OF THE SEPTIC SYSTEM. THE DESIGN SHALL BE MANUFACTURED BY POTTERDORFF & SON'S, INC. OR APPROVED EQUIVALENT.

ALL PIPING SHALL BE 4" DIA. SPOD. 40 NSF PVC, WITH ALL JOINTS SEALED WATER-TIGHT. ALL STORAGE TANKS SHALL BE 1500 GALLON CAPACITY. ALL STORAGE TANKS SHALL BE 48" DIA. SPOD. 40 NSF PVC, WITH ALL JOINTS SEALED WATER-TIGHT. THIS SYSTEM IS NOT DESIGNED TO ACCOMMODATE A CHANGE IN DISCHARGE OR OTHER LOADS.

THE PROPOSED SEPTIC SYSTEM IS NOT LOCATED WITHIN THE ZONE OF INFLUENCE OF ANY MUNICIPAL WELL NOR ARE THERE ANY PRIVATE WELLS LOCATED WITHIN 100 FEET (RADIAL) OF THE PROPOSED SYSTEM.

EXCAVATE ALL TOP SOIL AND ANY OTHER SOILS ENCOUNTERED DOWN INTO THE SAND LAYER. 24" MINIMUM AND FOR A HORIZONTAL DISTANCE OF 5' ON ALL SIDES OF THE PROPOSED SYSTEM. BACK FILL TO ELEVATION = 102.11 WITH SELECT ON-SITE OR IMPORTED SOIL MATERIAL CONSISTING OF CLEAN GRANULAR SAND, FREE OF ORGANICS OR OTHER MATERIALS THAT WOULD BE DETRIMENTAL TO THE SYSTEM. RECOMMENDATIONS OF THE DESIGN ENGINEER SHALL BE FOLLOWED.

ELEVATIONS SHOWN ON THIS PLAN ARE BASED ON AN ASSIGNED DATUM.

CONTRACTOR SHALL VERIFY EXISTING CONDITIONS AND NOTIFY THE ENGINEER OF ANY DISCREPANCIES PRIOR TO THE COMMENCEMENT OF CONSTRUCTION.

WATER TABLE FLUCTUATES ANNUALLY. NO WARRANTY OF A BRY BASEMENT IS EXPRESSED OR IMPLIED.

THE LOT DOES NOT LIE IN A FLOOD HAZARD ZONE.

THE LOT LIES IN AN OVERLAY DISTRICT FOR GROUNDWATER AQUIFER PROTECTION.

FRONT YARD SETBACK = 5' + 5' (STORY) = 10' (2 STORY)
REAR YARD SETBACK = 5' + 5' (STORY) = 10' (2 STORY)

Design Calculations

Average Daily Sewage Flow (gallons per day) = 550 GPD
Proposed 5 bedroom dwelling @ 110 GPD PER BEDROOM = 550 GPD

Septic Tank Sizing (gallons)

20% AVERAGE DAILY FLOW = 2.2 (550) = 1,100 GALLONS
5 BEDROOM HOME REQUIRES 1500 GALLON TANK (MINIMUM).

Leaching Area Calculation

SOIL CLASS I (SANDS, LOAMY SANDS)

PERC RATE IN TPZ WAS < 2 MPH
PERC RATE IN TPZ WAS < 2 MPH
DESIGN FOR 3 MPH PER TITLE V

Required Minimum Leaching Area:
REQUIRED AREA = 550 GPD / 0.74 GPD / SF = 744 SF MINIMUM
LEACHING FIELD BED AND RESERVE AREA 26' WIDE AND 30' LONG
DESIGN = 780 SF > REQUIRED = 744 SF OK

Septic System Design Plan
Part Of A.P. 5, Lots 42 & 82
Form A, Lot 1
Willard Avenue, Seekonk, MA 02771

PREPARED FOR
Douglas Harrington
366 North Willard Avenue, Seekonk, MA 02771

PROFESSIONAL ENGINEERS
AND LAND SURVEYORS
INSITE
Engineering Services, LLC
Seekonk, Massachusetts 02771
Phone: 508/535-4588
Fax: 508/535-4589

DESIGNED BY: MSF
CHECKED BY: SEA
APPROVED BY: PDC

RDA
170 Willard Ave

Date: May 14, 2007
Scale: 1" = 30'