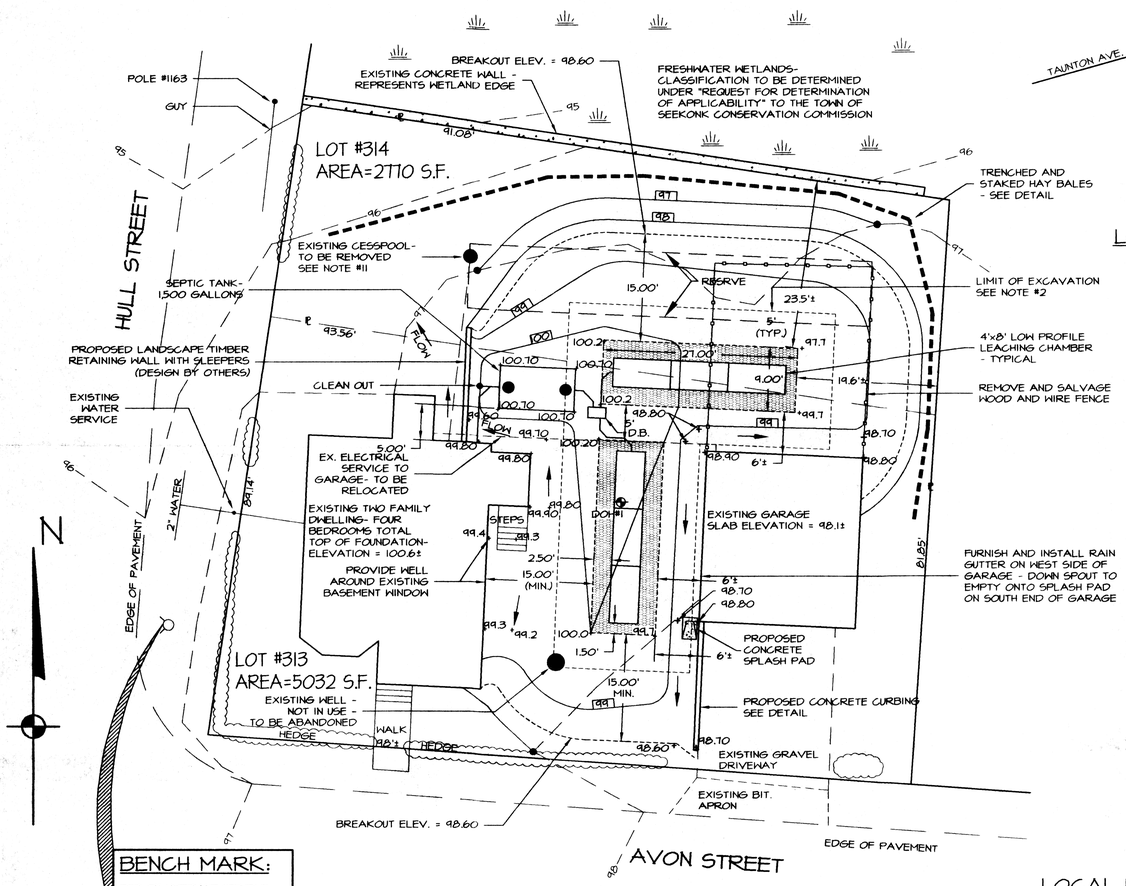
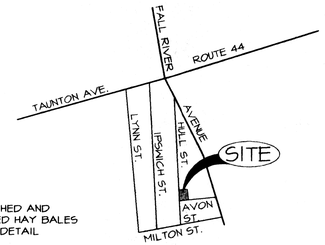


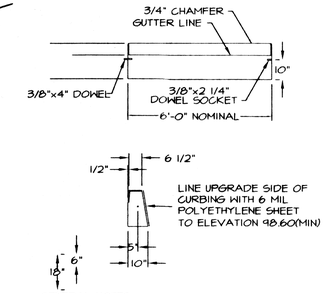
SITE PLAN

SCALE 1" = 10'



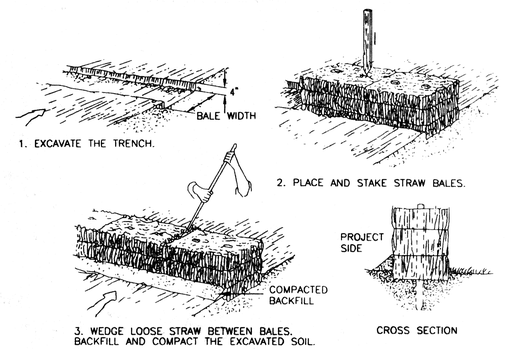
LOCUS MAP

NOT TO SCALE



GENERAL NOTES:
1. EXPOSED SURFACES TO HAVE A SPONGE FLOAT FINISH
2. CEMENT CONCRETE CLASS "B" A/E (MINIMUM STANDARD).

PRECAST CONCRETE CURB DETAIL



HAY BALE DETAIL

NOTES:

1.) ALL WORK SHALL CONFORM TO THE 310 CMR 15.00 STATE ENVIRONMENTAL CODE - TITLE 5 AND THE RULES AND REGULATIONS OF THE SEEKONK BOARD OF HEALTH.
2.) STRIP ALL TOPSOIL, SUBSOIL, EXISTING SEWAGE DISPOSAL SYSTEM AND UNSUITABLE MATERIAL, TREE ROOTS AND STUMPS AND ANY OTHER IMPERVIOUS OR SPECIFIEDSOIL IN THE AREA OF THE SYSTEM AND 5 FEET BEYOND IN ALL DIRECTIONS, WHERE POSSIBLE. REPLACE WITH GRANULAR FILL MEETING THE LATEST SPECIFICATIONS OF 310 CMR 15.255(3).
3.) ALL PIPE TO BE 4" P. V. C. SCHEDULE 40 UNLESS OTHERWISE NOTED.
4.) PLACE 6" MINIMUM COMPACTED CRUSHED STONE UNDER SEPTIC TANK AND DISTRIBUTION BOX.
5.) IF CONDITIONS ENCOUNTERED DURING CONSTRUCTION VARY SUBSTANTIALLY FROM THOSE SHOWN ON THIS PLAN, NOTIFY CAPUTO AND WICK, LTD. BEFORE PROCEEDING WITH CONSTRUCTION.
6.) GARBAGE GRINDER IS NOT ALLOWED WITH THIS DESIGN. ANY EXISTING GARBAGE DISPOSALS ARE TO BE REMOVED.
7.) IT IS RECOMMENDED THAT THE SEPTIC TANK BE INSPECTED THICE A YEAR, AND BE CLEANED WHEN THE SOLIDS EQUAL ONE THIRD THE LIQUID DEPTH.
8.) BREAKOUT ELEVATION = 98.60. NO FINISHED GRADE BELOW 98.60 FOR 15 FEET (MINIMUM) FROM THE EDGE OF THE LEACHING AREA, EXCEPT WHERE NOTED.
9.) CONTRACTOR SHALL CONTACT "DIG-SAFE" PRIOR TO CONSTRUCTION. LOCATION OF UTILITIES ON THIS PLAN ARE FROM EXISTING INFORMATION, BUT ARE ONLY TO BE CONSIDERED APPROXIMATE.
10.) ALL STONE USED FOR CONSTRUCTION OF THE SOIL ABSORPTION SYSTEM MUST BE DOUBLE WASHED AS SPECIFIED BY 310 CMR 15.241. ACTUAL STONE MATERIAL MAY ALSO BE SUBJECT TO APPROVAL BY THE DESIGN ENGINEER AND/OR SEEKONK HEALTH AGENT.
11.) EXISTING CESSPOOL IS TO BE PUMPED OUT, RINSED WITH CLEAN WATER AND PUMPED OUT AGAIN. PUMPING MUST BE PERFORMED BY A STATE LICENSED SEPTIC HAULER AND THE CONTENTS OF THE TANK DISPOSED OF PROPERLY. AFTER PUMPING, REMOVE TOP TWO FEET OF THE STRUCTURE AND FILL TO GRADE WITHCLEAN, GRANULAR MATERIAL.
12.) ALL PORTIONS OF FOUNDATIONS THAT REQUIRE FILL, FOR BOTH DWELLING AND GARAGE, ARE TO BE WATERPROOFED PRIOR TO FILLING.
13.) THE STAKED HAY BALES SERVE AS THE PROJECT LIMIT. NO DEBRIS, SOILS, ETC. SHALL BE DEPOSITED IN FRESHWATER WETLANDS.

DESIGN DATA

DAILY SEWAGE FLOW
- EXISTING BEDROOMS = FOUR
- DAILY FLOW = 110 GAL./DAY/BEDROOM x 4 BEDROOMS = 440 GALLONS PER DAY

SEPTIC TANK REQUIREMENTS
- VOLUME = 2 x DAILY FLOW = 880 GALLONS
- MINIMUM SIZE = 1,500 GALLONS

LEACHING AREA REQUIREMENTS
- PERCOLATION RATE = 2 MINUTES PER INCH (ASSUMED)
- DESIGN FOR 5 MINUTES PER INCH - SOIL TEXTURE CLASS - 1
  - EFFLUENT LOADING RATE = 0.74 GALLONS PER SQUARE FOOT
  - SIDEWALL AREA = [(2'x2) + (9'x2)] x 0.751 x 2 = 108 SQUARE FEET
  - BOTTOM AREA = 2' x 9' x 2 = 486 SQUARE FEET
- TOTAL LEACHING AREA = 594 SQUARE FEET
- TOTAL LEACHING CAPACITY
  - = 594 S. F. x 0.74 GAL/DAY/S. F. = 440 GAL./DAY

DEEP OBSERVATION HOLE "1" LOG
ORIGINAL GRADE - 97.30

DEPTH	SOIL HORIZON	SOIL TEXTURE	SOIL COLOR	SOIL MOTTLING	OTHER
0 - 42"	FILL	-	-	@ 38" - MANY, COARSE, COMMON	-
42" - 144"	C1	COARSE LOAMY SAND	2.5 Y 4/2		GRAVELLY, LOOSE, SINGLE GRAIN

OBSERVED STANDING GROUNDWATER - 54"
FRIMPTER ADJUSTMENT - (-1.20)(SEE BELOW)*
REMOVE TO 3" INTO C1 HORIZON
PERCOLATION TEST - NONE(HIGH GROUNDWATER) - ASSUME 2 MINUTES/INCH
WITNESS: MR. CHENEVERT, SEEKONK BOARD OF HEALTH
TESTING PERFORMED BY: CAPUTO AND WICK LTD.
DATE OF SOIL TEST - MARCH 11, 1999

OBSERVED WEEPING GOUNDWATER - 48"
ESTIMATED HIGH GROUNDWATER - EL.=93.58

SIEVE ANALYSIS - SAND(0.5% SILT, NO CLAY)

LOCAL UPGRADES REQUIRED

1.) 15.405(1)(b) - LESS THAN REQUIRED STEBACK FROM CELLAR WALL AND SLAB FOUNDATION.
2.) 15.405(1)(f) - LESS THAN REQUIRED SETBACK TO BORDERING VEGETATED WETLAND - CLASSIFICATION OF WETLAND TO BE DETERMINED.

VARIANCES REQUIRED

1.) 15.104 PERCOLATION TESTING - NO PERCOLATION TEST PERFORMED (PERCOLATION RATE ASSUMED <2MPI)
2.) 15.212 DEPTH TO GROUNDWATER - LESS THAN REQUIRED SEPARATION TO ESTIMATED GROUNDWATER - 5 FEET REQUIRED (PERCOLATION RATE ASSUMED <2 MPI) - 3.71 FEET PROVIDED.
3.) 15.225 CONSTRUCTION IN FILL - IMPERVIOUS BARRIER - 10 FEET REQUIRED - 6± FEET PROVIDED
4.) 15.253 PITS, GALLERIES, OR CHAMBERS - SEPARATION DISTANCE - TWO TIME WIDTH (18 FEET) REQIRED - 5 FEET PROVIDED.
5.) 15.253 PITS, GALLERIES, OR CHAMBERS - INLET TO CHAMBER EVERY 20 FEET - ONE PROVIDED FOR 24 FEET.

FRIMPTER CALCULATIONS

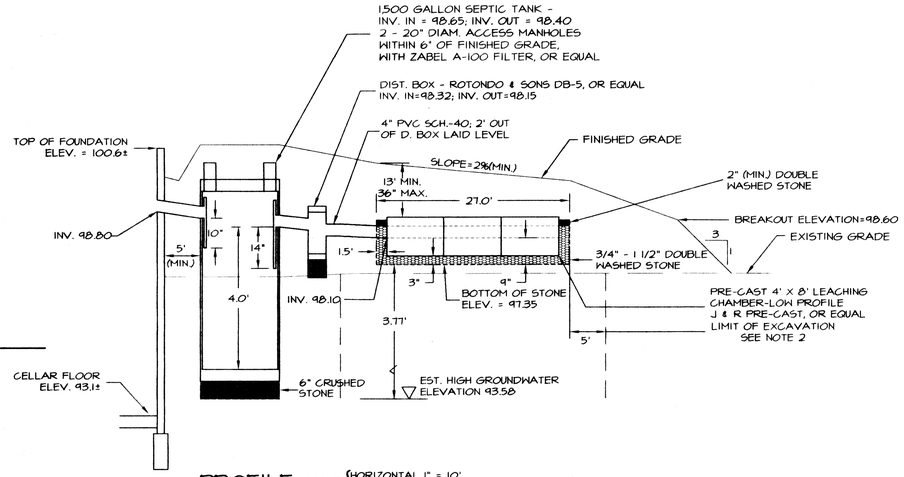
SITE OBERSVED GROUNDWATER = 4.0'
SITE WATER LEVEL RANGE = 3.7' (SAND-VALLEY)
OBSERVATION WELL CURRENT (MARCH 18, 1998) - 5.22'
OBSERVATION WELL MAXIMUM = 5.02'
OBSERVATION WELL RANGE = 2.60

SITE ADJUSTED GROUNDWATER = Sc - $\frac{Sr(OWc-OWmax)}{OWr}$

SITE ADJUSTED GROUNDWATER = 6.0' - $\frac{3.7'(5.22'-5.02')}{2.60'}$ = 3.72'

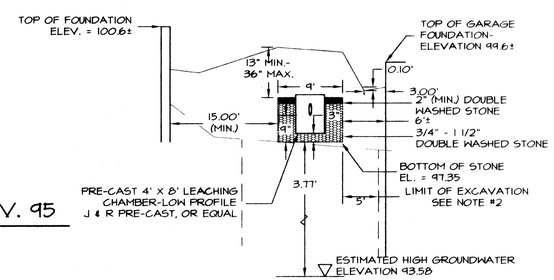
ESTIMATED HIGH GROUNDWATER = 97.30 - 3.72' = 93.58

I CERTIFY THAT I HAVE CONTACTED THE SEEKONK WATER DISTRICT FOR THE LOCATION OF THE EXISTING WATER SERVICE CURB STOP FOR PLAT 12, LOTS 313 AND 314 AND THAT IT IS SHOWN CORRECTLY. THE DIMENSION BETWEEN THE WATER SERVICE AND THE SEWAGE SYSTEM COMPONENTS COMPLIES WITH THE RULES AND REGULATIONS OF THE SEEKONK WATER DISTRICT.



ELEV. 95

PROFILE SCALES {HORIZONTAL 1" = 10' / VERTICAL 1" = 2'}



ELEV. 95

CROSS SECTION SCALES {HORIZONTAL 1" = 10' / VERTICAL 1" = 2'}

LEGEND

100	EXISTING CONTOUR
100	PROPOSED CONTOUR
MA. STD.	MASSACHUSETTS STANDARD
INV.	INVERT OF PIPE
P. V. C.	POLYVINYL CHLORIDE PIPE
S. D. R.	STANDARD DIMENSION RATIO
R. C. P.	REINFORCED CONCRETE PIPE
CONC.	CONCRETE (BIT. OR P. C.)
BIT.	BITUMINOUS
P. C.	PORTLAND CEMENT
TYP.	TYPICAL
F.G. 100±00	FINISHED SPOT GRADE
100±00	EXISTING SPOT GRADE
T. C.	TOP OF CURB
B. C.	BOTTOM OF CURB
℄	PROPERTY LINE
-x-CLF-x-	CHAIN LINK FENCE
ST	SEPTIC TANK
DB	DISTRIBUTION BOX
⊕	DEEP OBSERVATION HOLE

REPAIR

COMMONWEALTH OF MASSACHUSETTS — BRUCE W. WICK — No. 19811 — REGISTERED PROFESSIONAL ENGINEER

SEWAGE DISPOSAL SYSTEM
23 AVON STREET
PLAT 12, LOTS 313 & 314
SEEKONK, MASSACHUSETTS

CAPUTO AND WICK LTD.
1150 PAWTUCKET AVE.
RUMFORD, R.I. 02916
401-434-8880

DATE MAY, 1999

SHEET 1 OF 1