

Replacement System Variance Request

LIMITATIONS OF THE REPLACEMENT SYSTEM VARIANCE REQUEST

This form shall be attached to an Application for the proposed replacement system which is in noncompliance with the Rules. The LPI shall review the Replacement System Variance Request and Application and may approve the Request if all of the following requirements with LPI approval limitations can be met.

1. The replacement system is correcting a malfunction or an unlicensed wastewater discharge system.
2. A replacement system cannot be designed and installed in total compliance with the Rules.
3. The design flow is less than 500 GPD.
4. There will be no change in use of the structure.
5. The replacement system does not conflict with Seasonal Conversion Permit (30 MRSA § 3223) or with Mandatory Shoreland Zoning (12 MRSA § 4811).
6. The replacement system is determined by the Site Evaluator and LPI to be the most practical method to treat and dispose of the wastewater.

GENERAL INFORMATION

Handwritten: Town of Augusta

Town of Augusta

Town Code

Permit No. E

Date Permit Issued 9/5/95
month/day/yr.

Property Owner's Name: ED & KELLY ALLEN

Tel. No. 582-7826

System's Location: LAMBERT AVE
Street

AUGUSTA
Town

MAINE 04330
Zip

Property Owner's Address:
(if different from above) 113 CENTRAL ST
Street

GARDINER
Town

ME 04345
State Zip

Specific Instructions to the:

LPI: If any of the variances exceed your approval authority and/or do not meet all of the requirements listed under the Limitations Section above, then you are to send this Replacement System Variance Request, along with the Application, to the Department for review and approval consideration before Issuing a Permit. (See reverse side for Comments Section and your signature)

Site Evaluator: If after completing the Application, you find that a variance for the proposed replacement system is needed, then complete the Replacement Variance Request with your signature on reverse side of form.

Property Owner: It has been determined by the Site Evaluator that a variance to the Rules is required for the proposed replacement system. This variance request is due to physical limitations of the site and/or soil conditions. Both the Site Evaluator and the LPI have considered the site/soil restrictions and have concluded that a replacement system in total compliance with the Rules is not possible.

The Owner shall sign this statement. Therefore, having read both this Replacement Variance Request and the attached Application, I understand that the proposed system is not in total compliance with the Rules and hereby release all those concerned with this Variance, provided they have performed their duties in a reasonable and proper manner.

Kelly S. Allen
Property Owner's Signature

8.31.95

Variance Category	Variance Requested	Limit of LPI's Approval Authority		Variance Requested to:	
Soils Soil Profile Soil Condition from HHE-200	Ground Water Table	to 6"		_____	inches
	Restrictive Layer	to 6"		_____	inches
	Bedrock	to 10"		_____	inches
Setback Distances (in feet)	From:	Treatment Tank	Disposal Area	Treatment Tank	Disposal Area
Potable Water Supplies	1. Well: > 2000 gal/day	100a	300a	_____	_____
	2. Well: < 2000 gal/day				
	a. Neighbor's	100b	100b		
b. Property Owner's	50'	50'-60'	50'	65'	
3. Water Supply Line	See Note 'a'				
Waterbodies	1. Perennial	60'	60'	_____	_____
	2. Intermittent	25'	25'	_____	_____
	3. Manmade drainage ditch	15'	15'	_____	_____
Downhill Slope	Greater than 3:1 (33%)	5'	10'	_____	_____
Buildings	1. With basement	See Note 'a'	15'	_____	_____
	2. Without basement		10'	_____	_____
Property Line		5'	5'	_____	5'

Other Specify: _____

Footnotes:
 a. This setback distance cannot be reduced by variance. See Table 6-2.
 b. A variance to reduce the 100 foot setback distance to a minimum of 80 feet may be granted only with the neighbor's written permission.
 c. Sufficient distance shall be maintained to assure that the toe of the fill does not extend to the 3:1 slope.

Stephen C. Smith
 Site Evaluator's Signature

8-28-95
 Date

LPI Statement

I, May R. Lulka, LPI for the Town of Angosta, have conducted an on-site inspection for the proposed replacement system and have determined, to the best of my knowledge, that it cannot be installed in total compliance with the Rules, applicable Municipal Ordinances, or the Local Shoreland Zoning Ordinance. As a result of my review of the Replacement System Variance Request, the Application, and my on-site investigation, I (check and complete either a or b):

a. (approve, do not approve) the variance request based on my authority to grant this variance. Note: If the LPI does not give his approval, he shall list his reasons for denial in Comments Section below and return to the applicant.

or:

b. find that one or more of the requested Variances exceeds my approval authority as LPI. I (recommend, do not recommend) the Department's approval of the variances. Note: If the LPI does not recommend the Department's approval, he shall state his reasons in Comments Section below as to why the proposed replacement system is not being recommended.

Comments: _____

May R. Lulka
 LPI's Signature

7/5/95
 Date

FOR USE BY THE DEPARTMENT ONLY:
 The Department has reviewed the variance(s) and (does, does not) give its approval. Any additional requirements, recommendations, or reasons for the Variance denial, are given in the attached letter.

 Signature of the Department

 Date

SUBSURFACE WASTEWATER DISPOSAL SYSTEM APPLICATION

m 7 L 107
 Department of Human Services
 Division of Health Engineering
 (207)289-3826

PROPERTY ADDRESS

Town Or Plantation: AUGUSTA

Street vision Lot #: LAMBERT AVE

PROPERTY OWNERS NAME

Last: ALLEN First: ED & KELLY

Applicant Name: SAME

Mailing Address of Owner/Applicant (If Different): RT 7 BOX 580 AUGUSTA ME 04330

AUGUSTA 3313 TOWN COPY

Date Permit Issued: 8-13-95 \$ 160.00 FEE # Double Fee Charged

Steve R. Smith Local Plumbing Inspector Signature L.P.I. # 850

Owner/Applicant Statement

I certify that the information submitted is correct to the best of my knowledge and understand that any falsification is reason for the Local Plumbing Inspector to deny a Permit.

Kelley S. Allen Signature of Owner/Applicant 8-31-95 Date

Caution: Inspection Required

I have inspected the installation authorized above and found it to be in compliance with the Subsurface Wastewater Disposal Rules.

Steve R. Smith Local Plumbing Inspector Signature 11/13/95 Date/Approved

PERMIT INFORMATION

<p>THIS APPLICATION IS FOR:</p> <ol style="list-style-type: none"> <input type="checkbox"/> NEW SYSTEM <input checked="" type="checkbox"/> REPLACEMENT SYSTEM <input type="checkbox"/> EXPANDED SYSTEM <input type="checkbox"/> EXPERIMENTAL SYSTEM <p>SEASONAL CONVERSION to be completed by the LPI</p> <ol style="list-style-type: none"> <input type="checkbox"/> SYSTEM COMPLIES WITH RULES <input type="checkbox"/> CONNECTED TO SANITARY SEWER <input type="checkbox"/> SYSTEM INSTALLED - P# <input type="checkbox"/> SYSTEM DESIGN RECORDED AND ATTACHED <p>IF REPLACEMENT SYSTEM: YEAR FAILING SYSTEM INSTALLED <u>?</u></p> <p>THE FAILING SYSTEM IS:</p> <ol style="list-style-type: none"> <input checked="" type="checkbox"/> BED <input type="checkbox"/> CHAMBER <input type="checkbox"/> TRENCH <input type="checkbox"/> OTHER: _____ <p>SIZE OF PROPERTY <u>1/2 AC ±</u> ZONING _____</p>	<p>THIS APPLICATION REQUIRES:</p> <ol style="list-style-type: none"> <input type="checkbox"/> NO RULE VARIANCE <input type="checkbox"/> NEW SYSTEM VARIANCE Attach New System Variance Form <input checked="" type="checkbox"/> REPLACEMENT SYSTEM VARIANCE Attach Replacement System Variance Form <ol style="list-style-type: none"> <input type="checkbox"/> Requiring Local Plumbing Inspector Approval <input type="checkbox"/> Requires State and Local Plumbing Inspector Approval <input type="checkbox"/> MINIMUM LOT SIZE VARIANCE <p>DISPOSAL SYSTEM TO SERVE:</p> <ol style="list-style-type: none"> <input checked="" type="checkbox"/> SINGLE FAMILY DWELLING <input type="checkbox"/> MODULAR OR MOBILE HOME <input type="checkbox"/> MULTIPLE FAMILY DWELLING <input type="checkbox"/> OTHER _____ SPECIFY _____ 	<p>INSTALLATION IS:</p> <p>COMPLETE SYSTEM</p> <ol style="list-style-type: none"> <input checked="" type="checkbox"/> NON-ENGINEERED SYSTEM <input type="checkbox"/> PRIMITIVE SYSTEM (Includes Alternative Toilet) <input type="checkbox"/> ENGINEERED (+ 2000 gpd) <p>INDIVIDUALLY INSTALLED COMPONENTS:</p> <ol style="list-style-type: none"> <input type="checkbox"/> TREATMENT TANK (ONLY) <input type="checkbox"/> HOLDING TANK _____ GAL <input type="checkbox"/> ALTERNATIVE TOILET (ONLY) <input type="checkbox"/> NON-ENGINEERED DISPOSAL AREA (ONLY) <input type="checkbox"/> ENGINEERED DISPOSAL AREA (ONLY) <input type="checkbox"/> SEPARATED LAUNDRY SYSTEM <p>TYPE OF WATER SUPPLY</p> <p><u>DRILLED WELL</u></p>
--	---	---

DESIGN DETAILS (SYSTEM LAYOUT SHOWN ON PAGE 3)

<p>TREATMENT TANK</p> <ol style="list-style-type: none"> <input checked="" type="checkbox"/> SEPTIC: <input checked="" type="checkbox"/> Regular <input type="checkbox"/> Low Profile <input type="checkbox"/> AEROBIC <p>SIZE: <u>1000</u> GALS.</p>	<p>WATER CONSERVATION</p> <ol style="list-style-type: none"> <input checked="" type="checkbox"/> NONE <input type="checkbox"/> LOW VOLUME TOILET <input type="checkbox"/> SEPARATED LAUNDRY SYSTEM <input type="checkbox"/> ALTERNATIVE TOILET <p>SPECIFY: _____</p>	<p>PUMPING</p> <ol style="list-style-type: none"> <input type="checkbox"/> NOT REQUIRED <input checked="" type="checkbox"/> MAY BE REQUIRED (DEPENDING ON TREATMENT TANK LOCATION AND ELEVATION) <input type="checkbox"/> REQUIRED <p>DOSE: <u>50 To 75</u> GALS.</p>	<p>CRITERIA USED FOR DESIGN FLOW (BEDROOMS, SEATING, EMPLOYEES, WATER RECORDS, ETC.)</p> <p><u>(3) BEDROOM</u> <u>SINGLE FAMILY</u> <u>(318)(3.3) = 1050</u> <u>GPD</u></p> <p><u>50 / 1050 = 21</u> <u>INFLTRATORS</u></p> <p>DESIGN FLOW: <u>318</u> (GALLONS/DAY)</p>			
<p>SOIL CONDITIONS USED FOR DESIGN PURPOSES</p> <table border="1" style="width: 100%; border-collapse: collapse;"> <tr> <th>PROFILE</th> <th>CONDITION</th> </tr> <tr> <td style="text-align: center;"><u>3</u></td> <td style="text-align: center;"><u>C</u></td> </tr> </table> <p>DEPTH TO LIMITING FACTOR: <u>24</u></p>	PROFILE	CONDITION		<u>3</u>	<u>C</u>	<p>SIZE RATINGS USED FOR DESIGN PURPOSES</p> <ol style="list-style-type: none"> <input type="checkbox"/> SMALL <input type="checkbox"/> MEDIUM <input checked="" type="checkbox"/> MEDIUM-LARGE <input type="checkbox"/> LARGE <input type="checkbox"/> EXTRA LARGE
PROFILE	CONDITION					
<u>3</u>	<u>C</u>					

SITE EVALUATOR STATEMENT

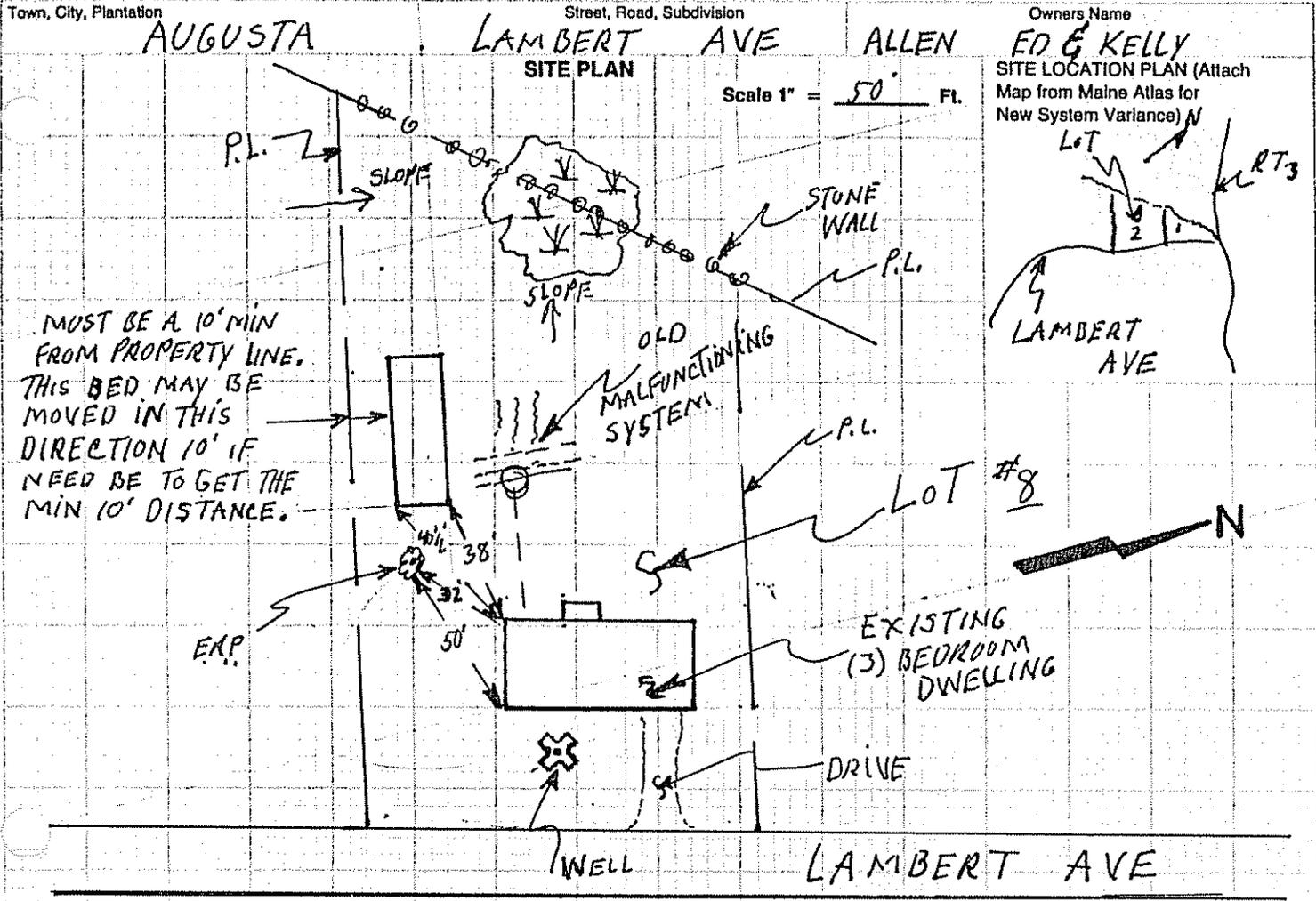
On 8-10-95 (date) I conducted a site evaluation for this project and certify that the data reported is accurate. The system I propose is in accordance with the Subsurface Wastewater Disposal Rules.

Stephen C. Smith Site Evaluator Signature 253 SE# 8-28-95 Date

STEPHEN C. SMITH TEL 549-7992
 (Local Plumbing Inspector's Signature if permit is for Seasonal Conversion.)

SUBSURFACE WASTEWATER DISPOSAL SYSTEM APPLICATION

Department of Human Services
Division of Health Engineering



SOIL DESCRIPTION AND CLASSIFICATION				(Location of Observation Holes Shown Above)			
Observation Hole <u>TB#1</u> Test Pit <input checked="" type="checkbox"/> Boring <input checked="" type="checkbox"/>				Observation Hole _____ Test Pit <input type="checkbox"/> Boring <input type="checkbox"/>			
" Depth of Organic Horizon Above Mineral Soil				" Depth of Organic Horizon Above Mineral Soil			
Texture	Consistency	Color	Mottling	Texture	Consistency	Color	Mottling
0	SANDY LOAM	FRIABLE	DARK BROWN	0			
5	LOAMY SAND		RED BROWN	5			
10			YELLOW BROWN	10			
15				15			
20				20			
25				25			
30	LOAMY SAND	FIRM	OLIVE FAINT	30			
35				35			
40				40			
45				45			
50				50			
Soil Profile	Classification Condition	Slope %	Limiting Factor	Soil Profile	Classification Condition	Slope %	Limiting Factor
3	B	0% to 5%	24"				
<input type="checkbox"/> Ground Water <input checked="" type="checkbox"/> Restrictive Layer <input type="checkbox"/> Bedrock				<input type="checkbox"/> Ground Water <input type="checkbox"/> Restrictive Layer <input type="checkbox"/> Bedrock			

Stephen C. Smith
Site Evaluator Signature

253
SE#

8-28-25
Date

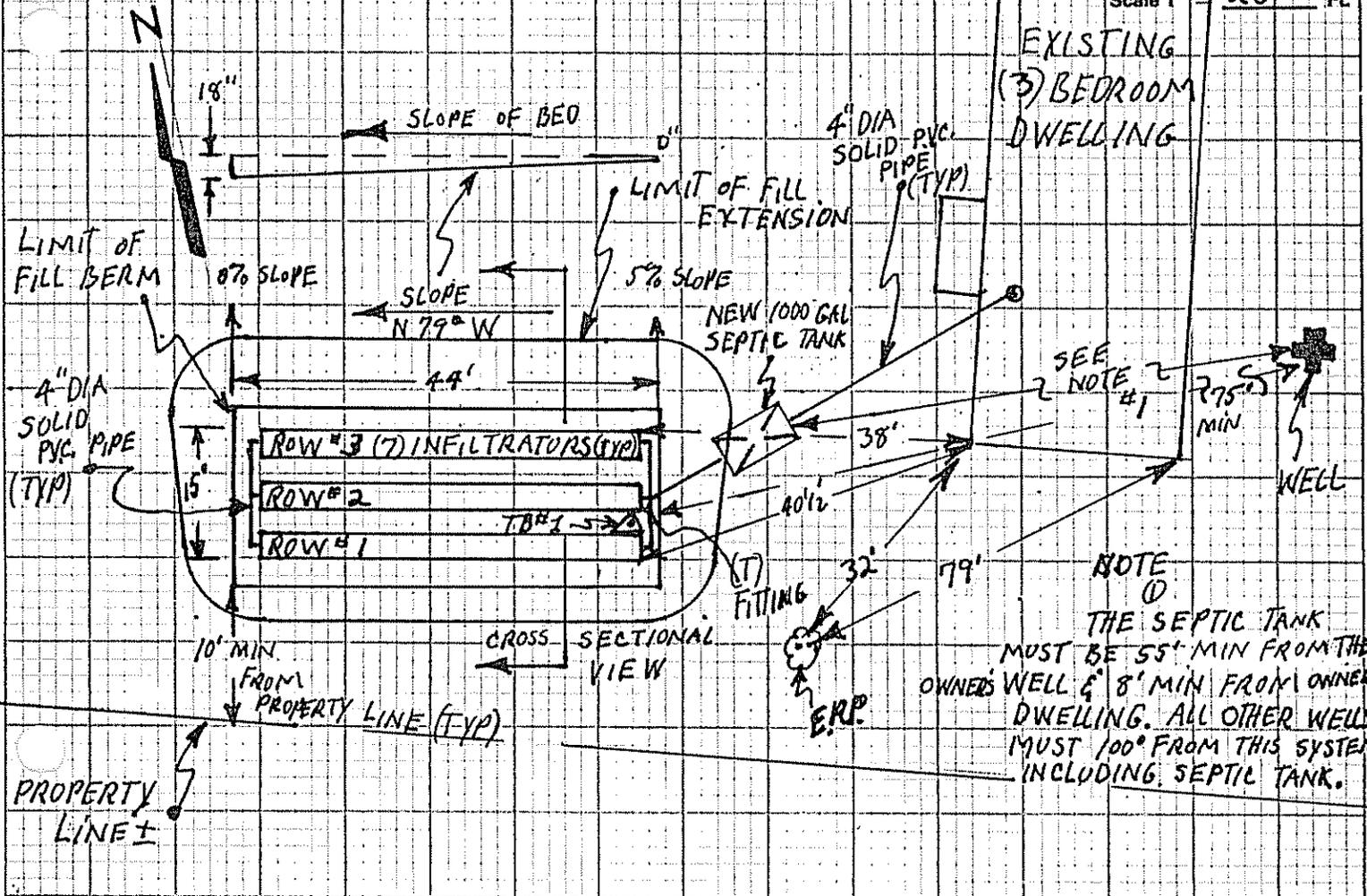
SUBSURFACE WASTEWATER DISPOSAL SYSTEM APPLICATION

Department of Human Services
Division of Health Engineering

Town, City, Plantation: **AUGUSTA** Street, Road, Subdivision: **LAMBERT AVE** Owners Name: **ALLEN ED & KELLY**

SUBSURFACE WASTEWATER DISPOSAL PLAN

Scale 1" = 20' FL



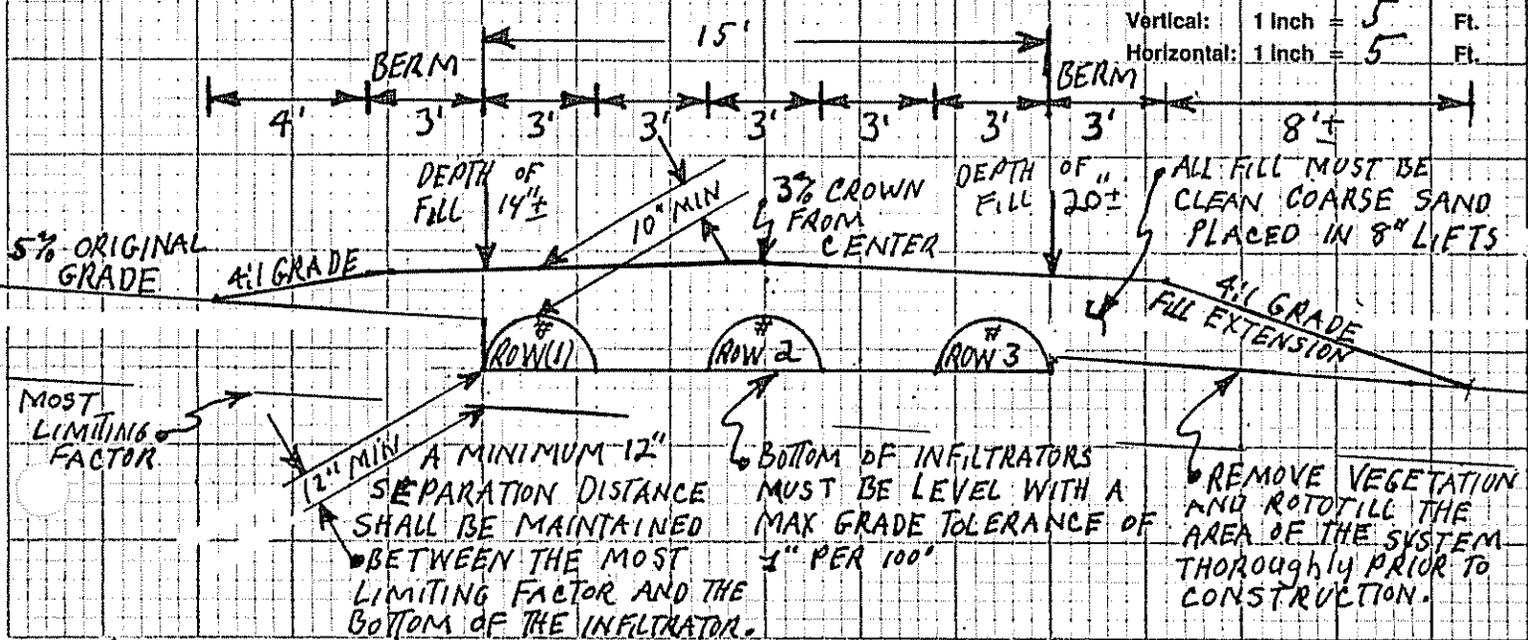
FILL REQUIREMENTS
Depth of Fill (Upslope) $14 \pm$ "
Depth of Fill (Downslope) $20 \pm$ "

CONSTRUCTION ELEVATIONS
Reference Elevation is 0 "
Bottom of Disposal Area Rows (1)(2)(3) = -71 "
Top of Distribution Lines or Chambers = -55 "

ELEVATION REFERENCE POINT LOCATION & DESCRIPTION
THE ER.P IS A NAIL IN A TREE SOUTHEAST OF THE SYSTEM

DISPOSAL AREA CROSS SECTION

Scale:
Vertical: 1 Inch = 5 Ft.
Horizontal: 1 Inch = 5 Ft.



Stephan C Smith
Site Evaluator Signature

253
SE#

8-28-95
Date

AGREEMENT BETWEEN OWNER & SITE EVALUATOR

By receiving and accepting this application for a plumbing permit said owner is agreeing to become bound by the conditions as outlined hereinafter. If said owner does not agree to the terms of this agreement then he/she shall return all original documents to Stephen Smith site evaluator, RFD #1 Box 1170 Whitefield, ME 04353 within two weeks for a refund of fees paid. If this application is being processed by an appointed representative of the owner (applicant), it is the responsibility of said applicant to fully inform the Owner of the conditions of this Agreement.

This application is provided without warranty of any kind either expressed or implied. The proposed leaching system is based on the current guidelines of the Maine State Plumbing Code for Subsurface Sewage Disposal and the site conditions observed at the time of the site evaluation only. The owner assumes full responsibility for the proper installation of the system understanding that this application is in no way to be construed as a guarantee of the system's performance. Any and all corrections of any nuisance or other operating problems is the responsibility solely of the Owner.

The Owner or his/her representative has supplied information regarding well locations, property lines, local zoning, lot size, intermittent stream classification and facility size and type with which this application and system design has been based. The Owner agrees that any omissions or inaccuracies of this information (or changes to that information subsequent to the site evaluation) nullifies this design. Any loss, damage, liability or costs that arise due to omissions or inaccuracies shall be borne exclusively by the Owner. The applicant and/or the Owner has reviewed the site plan (page 2) herein and guarantees that all wells within 125ft of the proposed system are as depicted, all large capacity wells producing more than 2000 GPD within 300 ft of the proposed leaching area are as depicted, and property lines are as indicated and those not shown on the plan are at least 50 ft from the proposed leaching area. For residential designs bedrooms are to be occupied by no more than two individuals per bedroom.

This design is based on current Maine State Plumbing Code guidelines only. The Owner/applicant is responsible to inform the evaluator if more stringent regulations exist for this particular site which would nullify this design. The owner assumes all liabilities which may result from a failure to supply such pertinent information to the site evaluator.

The Owner also understands that this form is an application for a plumbing permit only. This application in no way, in and of itself grants, indicates or assumes final approval for the installation of this system or the potential development of this property. The Owner shall process this application and obtain all applicable permits and approvals from local, state or federal agencies, boards, and or departments prior to making any such assumptions. The Owner shall maintain all such permits until such time installation occurs. Any damages that may result from not doing so shall be borne solely by the Owner. The Owner is advised to have qualified personnel perform "Wetlands Delineation" work to see what if any effects recent changes to these laws per the Maine Dept Of Environmental Protection (DEP) may have on the installation of this system and the development of the property.

CONTRACTOR'S RESPONSIBILITIES

It is the responsibility of the Owner to employ a Contractor who is completely knowledgeable with all aspects of the Maine State Subsurface Wastewater Disposal Rules regarding septic system construction materials and methods. Any loss, damage, liability, or cost for corrective work which arises from any substitution or departure from said requirements, or the design presented herein, shall be borne exclusively by the Owner and/or Contractor.

8.31.95

Date of Acceptance

Kelley S. Allen

Owner/Applicant Signature

OWNER'S/APPLICANT'S RESPONSIBILITIES

If this application is being processed by an applicant other than the property owner, then it is the responsibility of said applicant to have fully informed the owner of the following responsibilities prior to the processing of this application.

The Owner, or his/her assigned representative, has supplied information regarding well locations, property lines, local zoning, lot size, and facility size and type with which this design has been based. The Owner agrees that any omissions or inaccuracies of this information (or changes to that information subsequent to the site evaluation) nullifies this design. Any loss, damage, liability or costs that arise due to omissions or inaccuracies shall be borne exclusively by the Owner. The applicant and/or the Owner has reviewed the site plan (page 2) herein and guarantees that all wells within 125 ft. of the proposed system are as depicted. Property lines which are not shown on the plan are at least 50 ft. from the proposed leaching area.

This design is based on current Maine State Plumbing Code requirements only. The owner/applicant is responsible to inform the evaluator if more stringent regulations exist for this particular site which would nullify this design. The owner assumes all liabilities which may result from a failure to supply such pertinent information to the site evaluator.

The Owner is also responsible for obtaining any and all permits which are required to perform this work.

CONTRACTOR'S RESPONSIBILITIES

It is the responsibility of the Contractor to be completely knowledgeable with all aspects of the Maine State Subsurface Wastewater Disposal Rules regarding septic system construction materials and methods. Any loss, damage, liability, or cost for corrective work which arises from any substitution or departure from said requirements, or the design presented herein, shall be borne exclusively by the contractor. If the contractor elects to depart from the said rules, he does so at his own risk and takes full responsibility for any corrective measures necessary if the system should fail to operate properly or other liabilities that might arise.

SUBSURFACE WASTEWATER DISPOSAL SYSTEM APPLICATION
CONSTRUCTION NOTES

Attachment to Form MHE-200

The items checked should be incorporated into the construction plans for the subsurface wastewater disposal system. Items listed as "Required Action" are deemed necessary for proper system installation; items listed as "Recommended Action" are not essential, but will aid in the efficient functioning and life of the system.

All construction shall conform with "State of Maine Subsurface Wastewater Disposal Rules, Chapter 241" as adopted and revised according to the provisions of 22MRSAS42.

The applicability of this design must be reevaluated when the location of structures are substantially different than those shown on the site plan or when other structures, additions, or appurtenances (i.e., swimming pools) are considered.

Lots not meeting the requirements of the "Minimum Lot Size Rule" but recorded prior to its effective date require a "Minimum Lot Size Waiver" as issued by the Department of Human Services, Division of Health Engineering.

ACTIONS

(All Items Nos. 1 - 19 are required unless otherwise designated)

1. The L.P.I. shall inform the owner and designer of any local ordinance exceeding the rules (Chapter 241), prior to issuing a permit, so that the application may be properly amended to conform to such ordinances.
2. Any well shall be located a minimum of 100' from the subsurface disposal system which includes the septic tank.
3. Property lines shown are as provided by the owner or agent and no guarantee of accuracy is implied. Actual property line locations must be confirmed by survey.
4. All fill material shall be medium to coarse sandy loam or loamy sand in texture, free of stones, wood or other debris, and with sufficient fines for adequate compaction. All fill placed in 8 inch lifts and compacted as placed.
5. Seed and mulch the surface of all fill and cover material, as well as other areas of disturbed soil, to prevent erosion.
6. Cut all vegetative growth down to ground level, rake away organic material, and rototill the area of the disposal system, including fill extensions, thoroughly prior to construction.
7. Fill slopes must be 4:1, or 25°.
8. A minimum of 8' of separation must be maintained between the septic tank and the home.

9. Force mains, pump stations, septic tank, and/or gravity lines subject to freezing shall be adequately insulated.
10. All construction shall conform with Section 11-D "State of Maine--Subsurface Wastewater Disposal Rules--Chapter 241" and all other pertinent sections.
11. Systems put into service prior to establishing proper cover shall be provided with adequate erosion control to prevent damage to the system.
12. Provide low profile septic tank when determined as necessary in the field.
13. The bottom of the disposal area and distribution line shall be level with a maximum grade tolerance of 1 inch per 100 feet.
14. Under no circumstances should septic tank additives of any type be used on your system. IF additives are used, severe and permanent and irreversible damage may result.
15. A minimum of 10" of fill or cover material must be placed over the chamber units.
16. A minimum of 12" of separation must be maintained between the bottom of the disposal system and the limiting factor in the soil.
17. A diversion ditch, of sufficient depth to prevent surface runoff from entering or passing over the disposal system, shall be constructed on the uphill side of the disposal area.
 Required Recommended Not Required
18. Low volume toilets of 1- to 1½-gallon flushing capacity are
 Required Recommended Not Required
19. Septic tank to be tested for water tightness in presence of L.P.I.
 Required

Stephen C. Smith

253

8-28-95

This design requires installation of the following checked items. See attached information about checked items where applicable.

- Trench Disposal Area.....No. of ft. required _____
 (Practical on well-drained sites) The distribution line shall be installed to uniformly distribute wastewater throughout the entire trench length using one of the following distribution methods:
1. Perforated distribution pipe installed and aligned so that the holes are located in the lower half of the pipe.
 2. Small diameter pressure pipe in a pressure distribution system.
 3. A minimum of 12 inches of stone shall be used on the bottom of the trench. The distribution line shall be installed within the stone.
 4. The stone shall be completely covered with one of the following materials:
 - a. A minimum 2 inch layer of compressed hay.
 - b. One layer of an approved non-woven filter fabric.
 - c. One inch of fiberglass insulation.
 5. Clean backfill, 8-12 inches in depth, shall be carefully placed over the hay layer or approved substitute.
 6. No portion of any trench disposal area shall be located under a paved area or any driveway or roadway.

- Bed Disposal Area.....(L) _____ (W) _____ Required _____
1. The finish grade of the backfill over the disposal area shall be crowned from the center of the disposal area at a 3° slope and extend 3 ft. beyond the edge of the disposal area. At that point the fill shall be sloped at a uniform grade of no greater than 25° [4:1] to the original ground. All stone used in disposal areas shall be clean and conform to one of the size ratings from Table 11-2.

Table 11-2

STONE SIZE RATINGS
 Percent Passing Sieve Size

Stone Rating	3	2-1/2	2	1-1/2	1	3/4	1/2	1/3
2-1/2	100	90/100	50/100	0/35	0/10	0/8	0/5	0/3
2	100	100	90/100	50/100	0/35	0/8	0/5	0/3
1-1/2	100	100	100	90/100	60/100	0/35	0/8	0/3
1	100	100	100	100	90/100	70/100	0/35	0/3
3/4	100	100	100	100	100	80/100	0/35	0/3

2. The distribution system shall be designed to uniformly distribute wastewater throughout the entire bed disposal area using one of the following distribution methods:

a. Perforated distribution pipe installed and aligned so that the holes are located in the lower half of the pipe and meet the materials standards listed in Table 0-1.

b. Small diameter pressure pipe in a pressure distribution system.

3. Distribution lines shall be installed a maximum of 5 feet from the bed's stone edge and equally spaced with a maximum separation distance between lines of 5 feet.

Bed Disposal Area (continued)

4. A minimum of 12 inches of stone as specified in Section 11.D.4 shall be used on the bottom of the bed disposal area. The distribution system shall be installed totally within the stone.
5. The stone shall be completely covered with one of the following materials:
 - a. A minimum 2 inch layer of compressed hay.
 - b. One layer of an approved non-woven filter fabric.
 - c. One inch of fiberglass insulation.
6. Clean backfill, 8-12 inches in depth, shall be carefully placed over the hay layer or approved substitute.
7. No portion of any bed disposal area shall be located under a paved area or any driveway or roadway.



Infiltrator Chamber Units.....No. of Units Required 21

1. When pumping to an infiltrator system with serial distribution, pump into the end of the uphill row, using a 90 degree elbow or a tee to direct the flow to the splash plate.
2. Only those chambers listed in Appendix D or having the Department's written approval shall be installed.
3. Only 11-20 rated chambers shall be installed under driveways or parking areas.
4. Chambers shall be vented per manufacturer's specifications.
5. Allowance for use of sidewall shall be as specified in Appendix D of H.S.P.C.
- ~~6. Chamber units are designed for serial distribution. Required~~



Concrete Chamber Units.....No. of Units Required _____

1. Only those chambers listed in Appendix C or having the Department's written approval shall be installed.
2. Only 11-20 rated chambers shall be installed under driveways or parking areas.
3. Chambers shall be vented per manufacturer's specifications.
4. Allowance for use of sidewall shall be as specified in Appendix D of H.S.P.C.
5. Chamber units are designed for serial distribution. Required



Peat Disposal Area

1. The distribution system shall consist of 4 inch diameter perforated pipe meeting the material standards listed in H.S.P.C. in Table 8-1.
2. The distribution lines shall be installed a maximum of 2.5 feet from the disposal area edge, equally spaced with a maximum separation distance between lines of 2.5 feet, and installed in a discontinuous eight inch layer of stone as specified in Section 11.D.4.
3. A minimum of 6 inches of clean coarse sand or stone as specified in Section 11.D.4 shall be placed at the bottom of the disposal area.
4. The peat shall be air-dried milled Sphagnum of low to moderate decomposition (112-115 on the von Post scale) with a moisture content of 40 to 60 percent.
5. The peat shall be placed in 6 to 10 inch layers and hand raked. The in place bulk density shall be 6.2 to 9.4 pounds/cubic foot.
6. There shall be a minimum of 24 inches of peat below the bottom of the distribution lines and a minimum of 8 inches of peat above the top of the distribution lines.
7. The surface of the distribution area shall be crowned at a slope of 3 percent and seeded with grass.

Peat Disposal Area (continued)

8. The minimum width of the disposal area shall be 12.5 feet; the maximum width shall be 20 feet.

9. The maximum length of the disposal area shall be 60 feet.

10. No portion of any peat disposal area shall be located under a paved area or any driveway or roadway.

Separated Laundry Disposal Area

Primitive Disposal System

Holding Tank

1. CONSTRUCTION - Holding tanks shall be constructed of the same materials and to the same structural specifications as specified in Section 9.B.1. They shall be constructed to assure water tightness and shall have a minimum of an 18" diameter cleanout cover and a 13"x17" inspection cover.

2. INSTALLATION - The holding tank shall be water tight and vented through the vent stack of the building served unless deemed impractical by the LPL; then the tank shall be separately vented. The invert of the inlet to a holding tank shall be above the maximum high groundwater table.

3. ALARM PROVISIONS - An alarm device shall be provided on a holding tank. This device shall be located and adjusted to assure the tank is pumped before full.

4. NUMBER AND SIZE - A holding tank shall have a minimum capacity of 1500 gallons. If more than one holding tank is installed, they shall be installed in series.

5. SETBACKS - Holding tanks shall meet all setback requirements of treatment tanks.

6. The owner of any holding tank installation approved after August 1, 1987, shall on an annual basis provide the municipal officers or LURC with copies of their pumping records.

Curtain Drains - See attached detail

Diversion Ditch

Pump Stations

1. Pump stations shall be housed in 3-foot/4-foot diameter tiles with risers and shall be installed watertight to prevent infiltration of ground and/or surface water.

2. Force mains and pressure lines should be flushed of any foreign material and pumps should be checked for proper on/off cycle before being put into service.

3. Pump stations must have alarm device.

Grinder Pump

When using grinder pump with septic tank:

a. Pump directly to distribution box with baffle;

b. Ensure that the velocity of effluent entering tank does not agitate the tank;

c. Ensure that the dosage rate of pump is not in larger amounts than tank can handle without raising water level.

Other _____

ATTACHMENT TO FORM HNE-200

ADDITIONAL INFORMATION ABOUT YOUR SEPTIC SYSTEM

- I. You should have your septic tank pumped out and checked every two years or more often to prolong the life of your system.
- II. If you plan to install a garbage disposal in your home you should have the next available size septic tank installed. An alternative to this is the installation of a Zabel Industries, Inc., Multi-purpose Filter, Model #A100 or equivalent on the outlet end of the septic tank.
- III. Water softeners should drain to a separate grey water disposal system.
- IV. Your septic tank must be installed level and all joints, inspection covers, etc., must be water tight. The same is necessary for a pump tank if your system requires one.
- V. The outlet invert elevation should be equal to or higher than the finish grade of the septic field to avoid flooding of the tank and solids entering the field.
- VI. Your system is designed to handle laundry waste water provided a separated laundry system is not indicated on Page 1 of your HNE-200 form and the total daily design flow shown on Page 1 is not exceeded. If a low water toilet is required it must use less than 1.5 gallons per flush.
- VII. Building Drain and Sewer
 - A. Approved Materials, Size, Grading, Support, and Protection
 1. Joining methods and materials shall be as prescribed in 10-144A CMR 23B.9 (Internal Plumbing Rules).
 2. The minimum size of a pressure building sewer shall be 2 inches in diameter.
 3. A building sewer shall be installed in practical alignment with a uniform slope of not less than 1/4 inch/foot. Where it is not practical to obtain a slope of 1/4 inch/foot a building sewer, 4 inches or larger, may have a slope of not less than 1/8 inch/foot but only with the LPI's approval.
 4. A building sewer shall be laid on a firm bed throughout its entire length and adequately protected to prevent freezing.
 5. No cleanout shall be required for a building sewer which is less than 10 feet provided that the building drain has a cleanout.
 6. Every change in alignment greater than 45 degrees in a building sewer shall be served by a cleanout, except that no cleanout shall be required for a long sweep 90°. When a building sewer is installed under a building the cleanout requirements in 10-144A CMR 23B.12, shall apply.
 7. Each cleanout shall be installed so that it opens in a direction opposite to the flow or at right angles thereto, except in the case of "eye" branch and end-of-line cleanout which shall be installed perpendicular to and above the pipe.
 8. Cleanouts installed under concrete or asphalt pavement shall be made accessible by yard boxes, or extend flush to the pavement with approved materials and be protected.
 9. Building sewer cleanouts shall be installed at intervals not to exceed 100 foot straight runs.

I. Building Drain and Sewer (continued)

B. Building Sewer and Water Pipes

1. A building sewer or drain shall not be placed in the same trench with a water service pipe unless the water pipe rests on a solid shelf at one side of the common trench and the water pipe invert is at least 12 inches above the top of the building sewer or drain. See Figure U-1.
2. Pump and gravity lines installed in exposed areas with little snow cover shall be protected against freezing.

C. Installation of Treatment Tanks

1. Two tanks may be connected in series. The volume of the first tank shall be equal to or greater than the volume of the second tank.
2. When installing a treatment tank in soils with a high seasonal ground water table, precautions shall be taken to prevent floatation and ground water infiltration.
3. A treatment tank shall be installed to ensure it is water tight and the invert of the outlet shall be above the seasonal high groundwater level.
4. When a treatment tank is installed under a driveway, parking lot, in a heavy saturated soil, or other areas subject to heavy loads, the tank shall be capable of withstanding an H-20 wheel load.
5. Recommendation: A riser with cover should extend above the treatment tank to within 6 inches of the finished grade. The riser can extend to the ground surface if the cover is properly sealed to prevent the escape of odor and accidental entry.

VIII. Wastewater Application Details

A. Effluent Line

1. Wastewater from a treatment tank shall be discharged to a disposal area by one of the following methods:
 - a. Gravity--a watertight pipe with a minimum 4-inch diameter and installed with a minimum pitch of 1/16 inch per foot.
 - b. Pressure--a watertight pipe with a minimum 1-1/4 inch diameter.

B. Distribution and Diversion Boxes

1. Distribution and diversion boxes shall be constructed of the same materials permitted for treatment tanks in Section 9.D.
2. When dosing, an inlet baffle shall be installed.
3. The invert of all outlets of a distribution or diversion box shall be at the same level and approximately 2 inches lower than the invert of the inlet pipe.
4. Distribution and diversion boxes when installed shall be protected to prevent the entrance of surface and ground waters.

C. Dosing

1. A system may be dosed with either a siphon or pump.
2. A siphon or pump shall be watertight, readily accessible, and of sufficient capacity to distribute wastewater throughout the entire disposal area.
3. A siphon or pump chamber shall be constructed of the same materials as permitted for treatment tanks.
4. A siphon or pump chamber shall be equipped with an audible high level