HTE# 10-5-25157

Harnett County Department of Public Health

Improvement Permit

26292

A building permit cannot be issued with only an Improvement Permit

ISSUED TO: KEN DAWSON HOMES PROPERTY LOCATION: BEAVER CREEK DR

SUBDIVISION BENNETT PLACE LOT # 28

NEW ☒ REPAIR ☐ EXPANSION ☐

Type of Structure: SFD (38'x60')

Proposed Wastewater System Type: FILL SYSTEM

Projected Daily Flow: 480 GPD

Number of bedrooms: 4 Number of Occupants: 8 max

Basement ☐Yes ☒No

Pump Required: ☒Yes ☐ No ☐ May be required based on final location and elevations of facilities

Type of Water Supply: ☐ Community ☒ Public ☐ Well Distance from well 100 feet

Permit conditions: _____

Site Improvements required prior to Construction Authorization Issuance: _____

Permit valid for: ☒ Five years ☐ No expiration

Authorized State Agent: BENS Date: 10/15/10 SEE ATTACHED SITE SKETCH

The issuance of this permit by the Health Department in no way guarantees the issuance of other permits. The permit holder is responsible for checking with appropriate governing bodies in meeting their requirements. This site is subject to revocation if the site plan, plat, or the intended use changes. The Improvement Permit shall not be affected by a change in ownership of the site. This permit is subject to compliance with the provisions of the Laws and Rules for Sewage Treatment and Disposal and to conditions of this permit..

Construction Authorization

(Required for Building Permit)

The construction and installation requirements of Rules .1950, .1952, .1954, .1955, .1956, .1957, .1958. and .1959 are incorporated by references into this permit and shall be met. Systems shall be installed in accordance with the attached system layout.

ISSUED TO: KEN DAWSON HOMES PROPERTY LOCATION: BEAVER CREEK DR

SUBDIVISION BENNETT PLACE LOT # 28

Facility Type: SFD (38'x60') ☒ New ☐ Expansion ☐ Repair

Basement? ☐ Yes ☒ No Basement Fixtures? ☐ Yes ☒ No

Type of Wastewater System** FILL SYSTEM (Initial) Wastewater Flow: 480 GPD

(See note below, if applicable ☐) FILL SYSTEM (Repair)

Installation Requirements/Conditions

Septic Tank Size 1000 gallons

Pump Tank Size 1000 gallons

SEE ATTACHED FOR ALL SPECIFICATIONS

Number of trenches _____

Exact length of each trench _____ feet

Trenches shall be installed on contour at a

Maximum Trench Depth of: _____ inches

(Trench bottoms shall be level to +/-1/4" in all directions)

Trench Spacing: _____ Feet on Center

Soil Cover: _____ inches

(Maximum soil cover shall not exceed 36" above the trench bottom)

Pump Requirements: _____ ft. TDH vs. _____ GPM

_____ inches below pipe

Aggregate Depth: _____ inches above pipe

_____ inches total

Conditions: THIS PERMIT BASED ON A PROPOSAL FROM APPLICANTS SOIL CONSULTANT.

WATER LINES (INCLUDING IRRIGATION) MUST BE 10FT. FROM ANY PART OF SEPTIC SYSTEM OR REPAIR AREA.
NO UTILITIES ALLOWED IN INITIAL OR REPAIR DRAIN FIELD AREA.

**If applicable: *I understand the system type specified is different from the type specified on the application. I accept the specifications of this permit.*

Owner/Legal Representative Signature: _____ Date: _____

This Construction Authorization is subject to revocation if the site plan, plat, or the intended use changes. The Construction Authorization shall not be transferred when there is a change in ownership of the site. This Construction Authorization is subject to compliance with the provisions of the Laws and Rules for Sewage Treatment and Disposal and to the conditions of this permit. SEE ATTACHED SITE SKETCH

Authorized State Agent: BENS Date: 10/15/10

Construction Authorization Expiration Date: 10/15/15

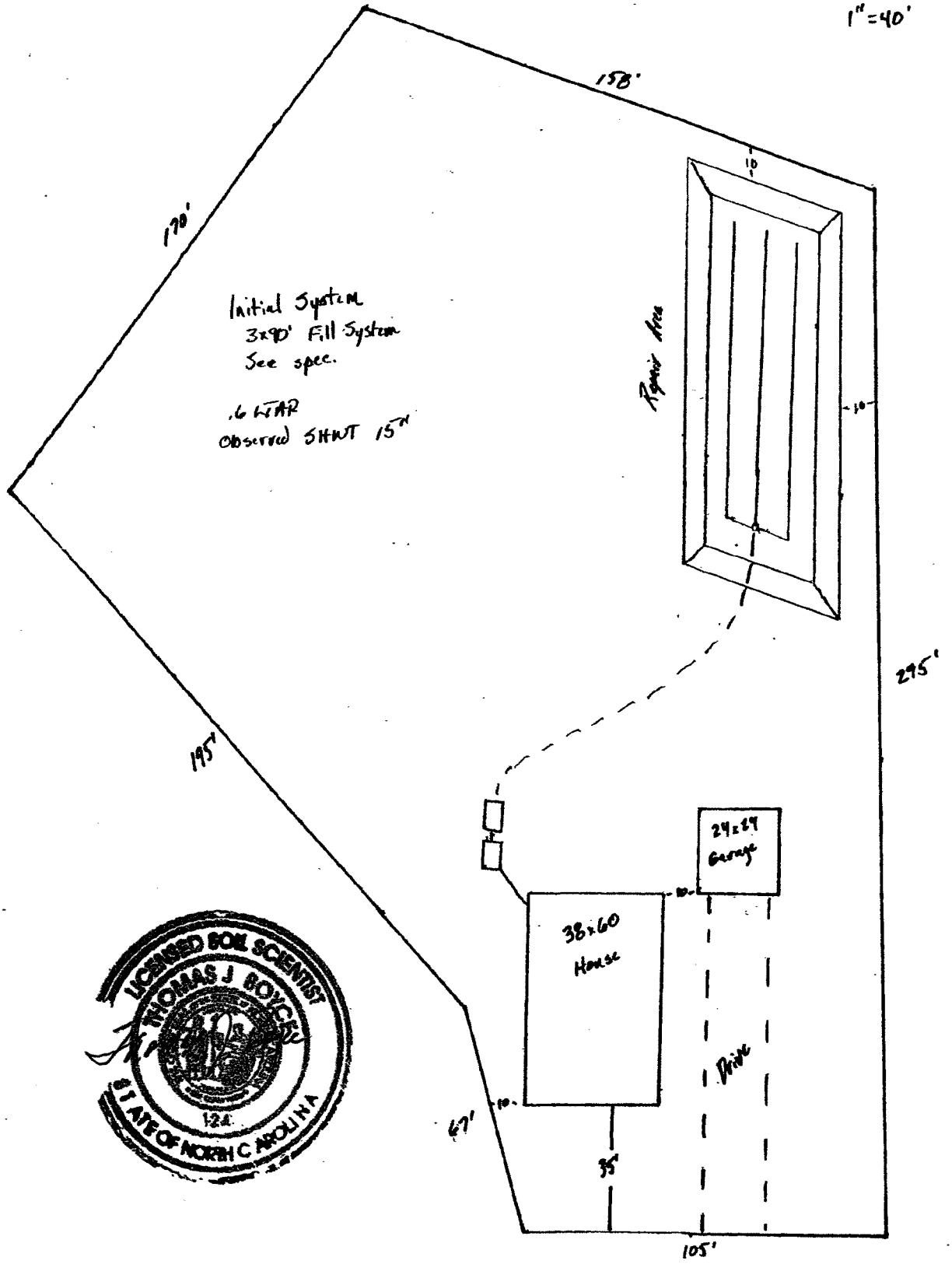
HTE# 10-5-25157 SHEET 1 of 5

PERMIT# 26242

REVISED 10/15/10

Ken Dawson Homes, Inc
Bennett Place Lot 28
60 Beaver Creek Drive

1"=40'



LICENSED SOIL SCIENTIST
THOMAS J BOYCE IV
124
STATE OF NORTH CAROLINA

SHEET 2 OF 5

Guideline For Design and Installation of Fill Systems with Conventional Trenches

Gravel Trench, Polystyrene, or Chamber

I. Trench and Fill Specifications

II	- Soil Texture Group	118 ft.	- Length of Fill
.6 gpd/sq. ft.	- Acceptance Rate	45 ft.	- Width of Fill
480 gpd	- Sewage Flow	5130 sq. ft.	- Total Fill Area
800 sq. ft	- Trench Bottom	15 in.	- Depth of Sand
3 ft.	- Trench Width	175 cu. yd.	- Volume of Sand
270 ft.	- Total Trench Length	6 in.	- Depth of Topsoil
3	- Number of Trenches	885 cu. yd.	- Volume of Topsoil
90 ft.	- Length of each Trench		

II. Site Preparation

1. Place flags at the 4 corners of the area to be filled designated on the improvement permit. Failure to place fill in the permitted area may result in the fill having to be moved or the permit revoked.

2. Do not work when the site is wet. Working on soil when wet can destroy soil structure making the site unsuitable for a Construction Authorization.

3. Remove all above ground vegetation and root mat from area to be filled without removing topsoil. Removal of soil can result in revocation of the permit.

4. Disk the area to be filled to a depth of 6 inches to break up root mat.

III. Placement Of Fill

1. Add 3 to 4 inches of approved sand fill to area and disk again to thoroughly mix the original soil and the fill. Approved sand fill is a sand or loamy sand.

2. Add more sand fill to achieve a uniform height of SD (see diagram) in the middle of the fill area.

3. The fill shall be tapered from the top edge of the fill to the ground surface 2 feet from the boundary of the fill area. The top edge of fill is located 5 feet from the proposed trenches.

4. Six (6) inches of finer textured fill shall be placed over the sand fill and extend to the boundary of the fill area. Finer texture is necessary to establish a vegetative cover which will prevent erosion of the fill. Fill used for cover shall be a sandy loam, loam, silt loam or sand clay loam texture. See CD dimension of diagram. Side slope shall be 1 to 4 except for site with Soil Texture Group 1 which can have a side slope of 1 to 3.

5. Contact Health Department for inspection of fill before constructing trenches. A Construction Authorization must be obtained before proceeding.

IV. Trench Construction

1. The outside edge of any trench shall be 5 feet from the top of the side slope of the fill.

2. This system is designed with _3_ trenches which are 90 ft. long and 3 ft. wide. Trenches must have a spacing of 9 ft. on centers.

3. Trench bottoms shall be no deeper than 18 inches below finished grade of the fill.

4. Trench bottoms shall be constructed level.

5. Distribution boxes shall be located 5 feet from the top edge of the fill.

6. Call the Health Department for inspection after the trenches are finished.

V. Landscaping

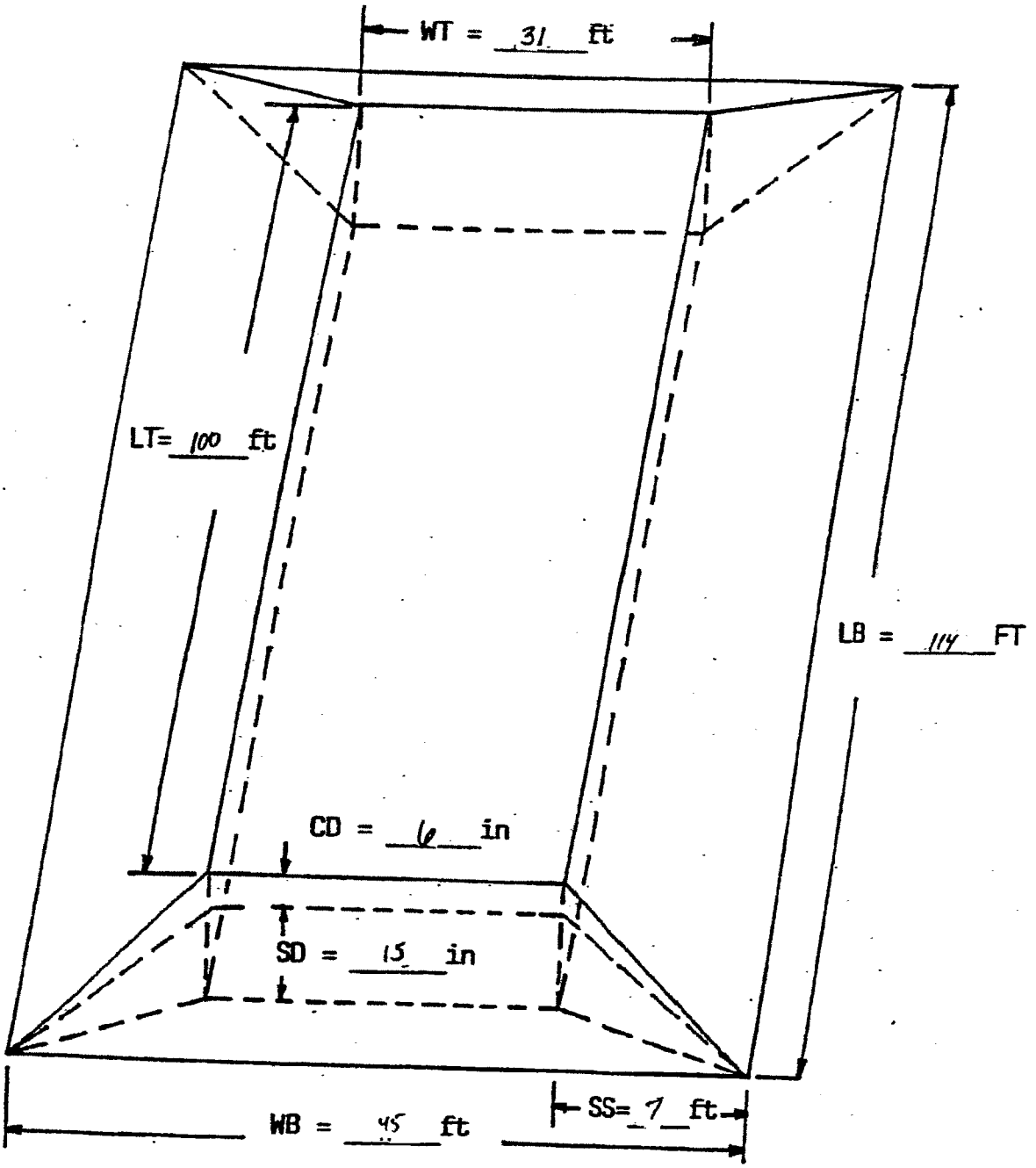
1. The fill must be shaped to shed surface water and shall be stabilized with grass or other suitable cover to prevent erosion.

2. Vegetation must be maintained after established. Grass must be mowed.

3. Additional fill beyond what has already been specified may be necessary to cover and landscape around the septic tank.

4. Call the Health Department for inspection after landscaping is complete. The Operation Permit allowing use of the system is issued at this time.

DIMENSIONS OF FILL SYSTEM



DEFINITIONS

WT - width of top
LT - length of top
WB - width of bottom
LB - length of bottom

SS - side slope
SD - sand depth
CD - cover depth

Calculation of Fill Volume

Total volume of fill (TVF)

TVF = [(LT + LB) /2 X (WT + WB) /2] X TFD

= [(100 FT. + 114 FT.) /2 X (31 FT. + 45 FT.) /2] X 1.75 FT.

= 7115.5 CU. FT.

(DIVIDE BY 27 CU. FT. TO OBTAIN CU. YDS.)

= 263.5 CU. YDS.

Total volume of sand (TVS)

TVS = [(LT + LB - 4) /2 X (WT + WB - 4) /2] X SD

= [(100 FT. + 114 FT. - 4) /2 X (31 FT. + 45 FT. - 4) /2] X 1.25 FT.

= 4718 CU. FT.

(DIVIDE BY 27 CU. FT. TO OBTAIN CU. YDS.)

= 175 CU. YDS.

Total volume of cover (TVC)

TVC = TVF - TVS

= 263.5 CU. YD. - 175 CU. YD.

= 88.5 CU. YD.

Key to abreviations:

LT = length of top
LB = length of bottom
WT = width of top
WB = width of bottom

TFD = total fill depth
= SD + CD
SD = sand depth
CD = cover depth