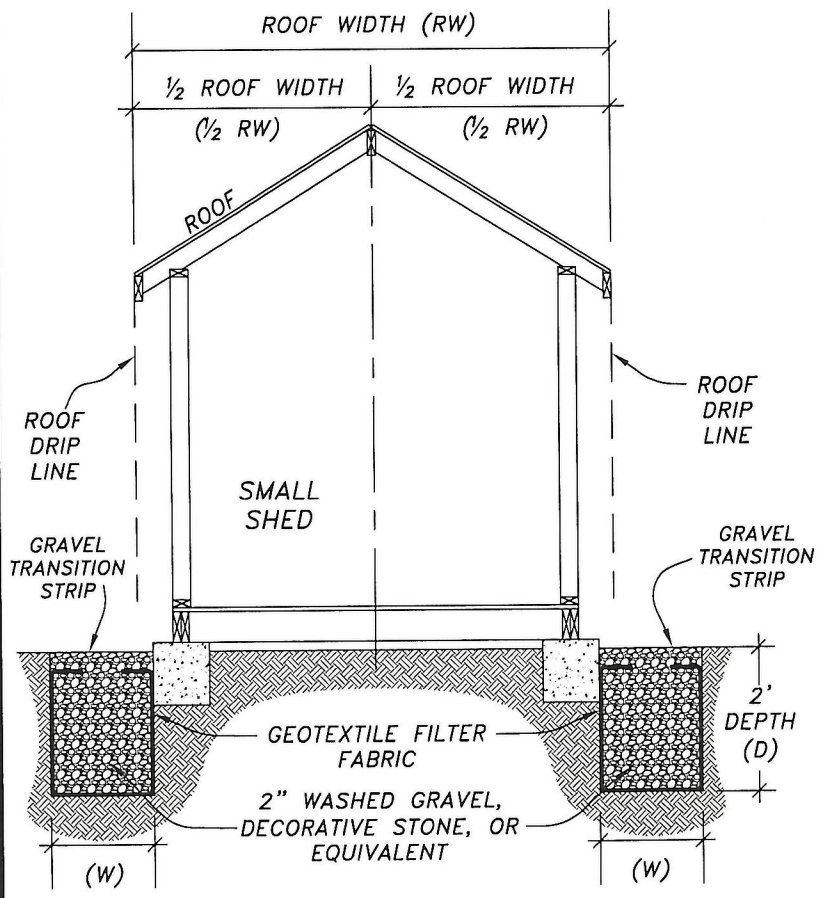


PLAN VIEW



CROSS SECTION A-A

NOT TO SCALE

GRAVEL TRANSITION STRIP DIAPHRAGM DESIGN

SITE DETAILS

- a. ROOF LENGTH (RL) _____ (FT)
- b. ROOF WIDTH (RW) _____ (FT)
- c. RAINFALL VOLUME TO BE TREATED

* $P_E = 0.083$ FT

$ESD_V = P_E \times RL \times \frac{1}{2} RW =$ _____ (FT³)

WIDTH OF TRENCH

- d. STANDARD DEPTH (D) 2 (FT)
 - e. REQUIRED WIDTH (W)
- $ESD_V / (0.40 \times D \times RL) =$ _____ (FT)

EXAMPLE

- a. RL = 20 FT
 - b. RW = 25 FT
 - c. $ESD_V = (0.083 \times 20 \times 12.5) = 20.75$ FT³
 - d. D = 2 FT (STANDARD)
 - e. $W = 20.75 / (0.40 \times 2 \times 20) = 1.3$ FT
- ** USE 1 FT 6 IN**

NOTES / CONDITIONS:

1. INSTALL GRAVEL TRANSITION STRIP ALONG FULL ROOF LENGTH UNDER THE ROOF DRIP LINE.
2. EACH GRAVEL TRANSITION STRIP TREATS 1/2 OF THE ROOF.
3. DO NOT ALTER OR INTERFERE WITH GRAVEL TRANSITION STRIP.
4. * $P_E = 0.083$ FT, IS EQUIVALENT TO 1 INCH OF RAINFALL.
5. ** ROUNDUP COMPUTED WIDTH TO NEAREST 1/4 FT (I.E. 3 INCHES).

CHARLES COUNTY GOVERNMENT

DEPARTMENT OF PLANNING & GROWTH MANAGEMENT

APPROVED:

[Signature] 4/15/2022
CHIEF OF INFRASTRUCTURE MANAGEMENT DATE

STORMWATER ENGINEER

11/14/2022
DATE

STANDARD DETAIL

SMALL SHED

STORMWATER
MANAGEMENT
DESIGN

REVISIONS:

SWM

2.00