

Slope Applications: 2H:1V up to Near Vertical (85°)



scan here to
access our
installation
video library

RECOMMENDED TOOLS & MATERIALS

Tools and materials will vary for each project. Large projects with easy access allow for machinery such as an excavator or skid-steer are ideal, while small or hard to access sites, may require more hand labor. Regardless of your project site you will need the following tools:

- Marking Paint
- Hard Rake(s)
- Tape Measure
- Hand Tamper
- Level or Transit
- Vibratory Compactor
- Shovels (flat & spaded)
- Grub Ax
- Chalk Line

GETTING STARTED

The following instructions are for typical installations. Review the project specific plan set or construction details for actual requirements. If you have questions or need more guidance, contact the Envirolok Team at 608-226-2565 or ecosolutions@envirolok.com.

- A. In general, slopes greater than 3.5' tall require advanced reinforcement. Follow the Envirolok Design Flow Chart or Project Design to determine the type of additional reinforcement required (tie-back bags, geogrid layering, earth anchors).
- B. Fill the Envirolok bags. (Click [Here](#) for Filling Instructions)
- C. Mark the location of front of the Foundation Course or Toe.
- D. Locate site utilities prior to any excavation.

STEP 1: PREPARING THE SETTING TRENCH

A) Starting at the face of the toe location, **EXCAVATE A LEVEL TRENCH** to the designed width and depth. These measurements will vary depending on wall height and application. Review the project specific plan set or construction details for actual requirements.

Standard Pattern Foundation Course



Tie-Back Pattern Foundation Course



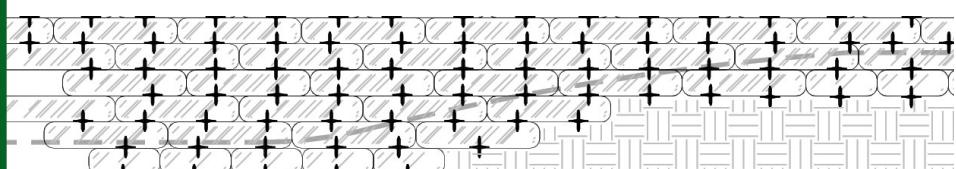
STEP 1: PREPARING THE SETTING TRENCH (CONT.)

B) Compact the Setting Trench.

Soil, gravel, fines, or sand can be used to level the trench as needed.

Notes:

- In heavy clay or wet soil conditions, an additional compacted aggregate foundation base may be required.
- If grade changes along the Foundation Course of the wall, create a stepped base trench at 5.5" to 6" high intervals to ensure proper embedment

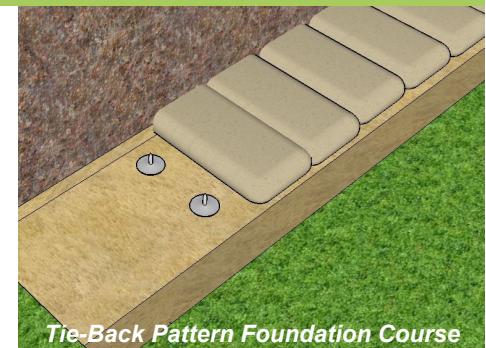
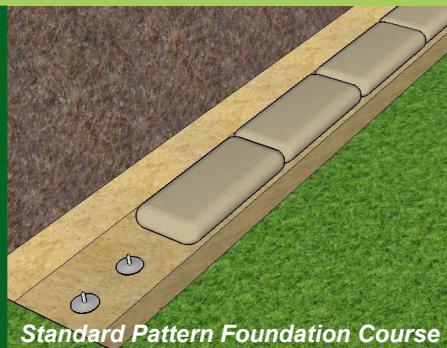


Step the Foundation Course at 5.5" to 6" depth intervals along contours to maintain a minimum of 1 course of embedded bags.

STEP 2: INSTALLING THE FOUNDATION COURSE

A) Set the Spikes.

When base conditions are suitable, spikes should be placed in the base material. Begin by placing 2 spikes at the starting location of the foundation course. Spikes should be centered in the desired bag location and placed 12"-15" apart as shown.



Note: Placing all the spikes prior to setting the bags is not generally recommended as spike location may need to be adjusted based on actual bag layout.

B) Install the first bag

by laying it over the 2 spikes. Wrap the snorkel under the bag to help control bag height and length.*



*When Foundation Course is installed in a tie-back pattern, place the bag with the snorkel facing inward.

C) Compact each bag

after it is set using a hand tamper.



Note: Compacting each bag after it is set provides better connection and uniformity.

D) Repeat steps A-C

until the foundation course is complete.

E) Backfill and compact material

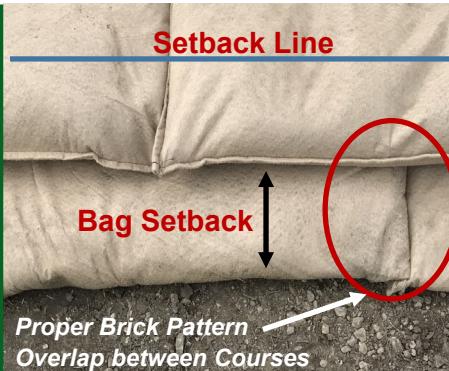
in any gaps in front of or behind the Foundation Course.

STEP 3: INSTALLING ADDITIONAL COURSES

The following steps are for gravity wall installations. For slopes >3.5' tall or more complex projects, consult with an engineer or the Envirolok Team for reinforcement recommendations. For more information on reinforcement techniques, click on the links below.

Geogrid Reinforcement

- A) Measure and mark the bag setback** with a chalk line or tape measure and marker. This will help as a guide when setting and ensure a more uniform setback.
- B) Note:** Mark the line 1" behind the desired setback, as the bag "widens" when compacted.



Anchor Reinforcement



- B) Place 2 spikes** at the starting location of the next course. Spikes should be centered in the desired bag location and placed 12"-15" apart.



- C) Shake the bag** to settle the contents and wrap the snorkel and zip tie under the bag. This will help control the bag height and length. **Note:** A tighter wrap may increase bag height and decrease bag length.



- D) Install the first bag** over the spikes. Place the bag with the seam facing inward. Remember to place the face of the bag approximately 1" behind the desired bag setback.



- E) Compact each bag** with a hand tamper as each bag is set.



Plant plugs, live stakes, or bare root plants can be installed during installation:

1. Place 2 to 3 plants per bag so that the root node or soil level will be even with the face of the bag above.
2. Sprinkle a handful of loose soil around the roots.
3. Install the next course of Envirolok Units above.

STEP 4: BACKFILL

A) Place and compact backfill

after each course is installed. **Do Not use clear gravel** for backfill as it will limit growth of vegetation. See Envirolok specifications or consult the Envirolok Team to determine appropriate backfill material.



REPEAT STEPS 3 & 4

Repeat the above steps 3 & 4 until all courses are complete. Be sure to install bags tightly together so there are no gaps between bags.

STEP 5: INSTALL THE COPING COURSE



A) For the best vegetative results, **place the top course or “Coping Course” in a Tie-Back pattern** with the back of the bag angled downward.

B) Follow steps 3 & 4 for instructions for spike and bag placement, compacting, and backfill. **Do Not Place** spikes on top of the Coping Course

C) Place 1-2" of topsoil over the top of the Coping Course prior to planting or seeding.

STEP 6: CLEAN UP & PREP FOR VEGETATION

Here is a quick checklist for the final steps in completing the Envirolok installation and getting ready for vegetation.

- Tuck any exposed snorkels or zip ties between bags.
- Check the wall and surrounding area for encroaching weeds and remove weeds as needed.
- Trim exposed geogrid from layering or anchor wrapping.
- Redirect surface flow away from wall until vegetation is established.
- Identify nearby water sources for irrigation or watering.



Need Help? Contact the Envirolok Team at
608.226.2565
or
ecosolutions@envirolok.com