Top of Wall Treatments
Shea Top Units

The tops of Shea walls are usually either capped using Shea “Series 50” cap units or finished with top block units. Other treatments typically involve special construction, such as forming and pouring a concrete parapet or attaching specialty, precast components.

Capping a wall is a fairly straightforward process. However, radius walls require cutting of the cap units to avoid creating triangular wedges at the front or back of the wall, depending on whether it is an “inside” or “outside” radius.

Using the Shea “Series 50” top blocks to finish off a wall provides the ability to fill units with a landscape rock or plant material to within 4” of the wall face. When stepping up or down at the top of a wall using top blocks, the “top corner block” is used to make this transition. A top corner block can be laid with either the 2’ or the 4’ face as the return side. Usually the wall layout elevation plan prepared by the design engineer will indicate the proper unit location or type. In the absence of such a plan, the left and right top corner units designate which side the 2’ return dimension is located as you face the finished wall. This is referred to as “standard” placement.

If it is desired that the 4’ face returns back into the retained soil, then a left corner top block will actually return (with respect to the wall face) on its right side and visa-versa for a right corner top block. This is referred to as “alternate” placement.

When the standard placement (4’ face, 2’ return) is used, it will be necessary for block stability to add a concrete shim beneath the portion of the top corner block that bears on part of another top block located beneath. This shim is usually made or cut, if necessary, from a standard concrete masonry unit (CMU). Gluing this shim in place will resist movement during the backfilling process.

This procedure will not be necessary when top corner blocks are placed in the wall with the 2’ face outward and the 4’ face used as the return. In this scenario, the block should be resting entirely on ½ of a full unit. In order for the unit to lay flat and level, a section (approx. 7”) of the tongue on the lower unit must be removed.
**Cap Units**

Shea Cap Units are rectangular in shape and are available in two shapes, a regular cap that has a groove along the entire bottom of the unit and an end cap where the groove terminates 4" from one end to provide a finished appearance on one end. These caps are placed with a scissors clamp and are intended primarily for straight walls. If cap units are to be used atop curved wall sections they will need to be cut to provide a continuous finished appearance.
**Full-High Cap Units**
Shea Full-High Cap Units can be used when some freeboard above top grade is expected at the top of a wall. This solution can be useful when the wall involves numerous step-ups at the top of the finished wall and a finished appearance is desired for all exposed block above grade.

**Back Side of Wall**

**Steps**
There are numerous configurations that incorporate steps into a retaining wall. The most common is where the steps begin at the base of the wall and go up through the wall to the top grade. Other step configurations, such as steps protruding from a wall or running parallel up along the wall face can also be designed and would be built using the same general procedures.

**Walls Adjacent to Steps are Stacked Vertical (0° Batter).**

**Step Units are double-stacked for increased stability and resistance to settlement.**

**Remove 1" from back of tongue to allow units to be stacked without batter.**