

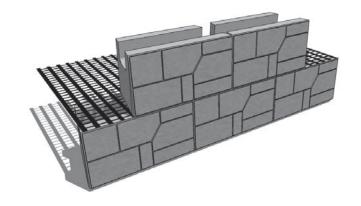
# Geogrid Wall





#### Where gridlock is a good thing...

Creating a StoneLedge reinforced wall system, involves the use of geogrids for reinforcement. StoneLedge walls 3.5ft (1.07m) and higher will require reinforcements to withstand the active pressures that may be behind and on top of the wall. Parking lots, roadways, or positive slopes above walls for example, require the use of reinforcement to help resist the increased pressure behind the wall. Geogrid used with the appropriate lengths, layers, and compacted backfill materials will resist these active forces above and behind the wall.





#### **MAGNUMSTONE**

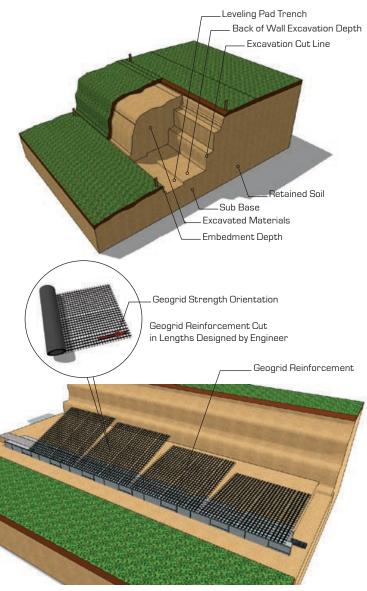
## Geogrid Wall

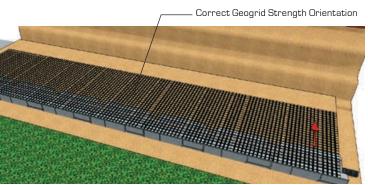
### > > STEP 1 PLANNING

- · Excavate and prepare **Sub Base Leveling Trench** 6" below first course
  - **Leveling Pad Trench** is approximately 3.5' to 4' wide
- · Normal wall **Burial Depth** or **Embedment Depth** is 6" to 12" or one block (for more information refer to design manual)
- · Excavate cut line to a 2 to 1 slope or greater
- Back of wall excavation depth into the bank at the base of the wall should be from the face of wall to the designed length of **Geogrid**

### > > STEP 2 CUT GEOGRID

- · Cut **Geogrid Reinforcement** to the length specified in the design
- Geogrids are manufactured in two directions Uni-axial or Bi-axial. Uni-axial grid has one direction of strength and that direction has to be oriented perpendicularly to the face of the wall during installation. Bi-axial grid can be laid in two directions, perpendicular and lengthwise to the face of wall (ensure that the lengthwise direction is still in accordance to the length specified by the Engineer's design)
  - · Correct geogrid orientation, strength and length is crucial to the success of the wall project
- · Each **Geogrid** length should be laid parallel and adjacent to each other but never overlapping







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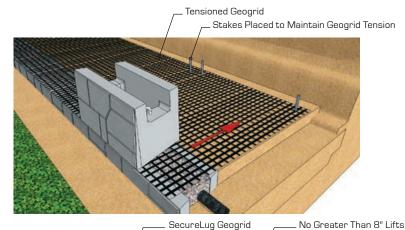
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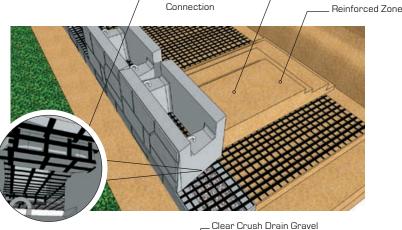
#### > > STEP 3

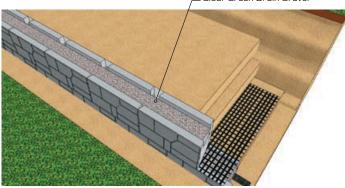
- · Place the **Geogrid** as far forward on the **MagnumStone**™ units as possible without revealing it on the face
- Place the next course of MagnumStone™ units on top of the lower units and Geogrid at a half bond to the lower units
- The two SecureLugs will fit securely into the hollow cores of the two units below and lock the Geogrid into the gravel core
- The gravel in the lower units will be recessed 2" or more to allow for the **SecureLugs** connection
  - · Complete the installation of units on the **Geogrid Reinforced** courses
- Make sure each unit is installed against the unit next to it leaving no gaps between unit joints
- · Use stakes or backfill materials to maintain the tension of the **Geogrid** during backfilling
  - · Do not drive equipment directly on top of **Geogrid**

### > > STEP 4 REINFORCED BACKFILL

- Backfill the Reinforced Zone by placing materials from the back of the wall towards the end of the Geogrid
- · Install drainage gravel in the cores after placing and compacting backfill materials
- · Install and compact backfill materials in Lifts no greater than 8" until wall is complete







Geogrid Elevations Set to Engineer Design

