

**NC Department of Insurance  
Office of the State Fire Marshal - Engineering Division  
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**Maximum Foundation Wall Height Without Unbalanced Backfill**

**Code:** 2018 Residential Code

**Date:** April 10, 2019

**Section:** R404.1.2.1

**Question:**

What is the maximum masonry foundation wall height for a wall that does not have unbalanced fill?

**Answer:**

Section R404.1.2.1 references Section R606. Section R606.6.4 references Table R606.6.4 for the maximum wall height to thickness ratio. Foundation walls would be load bearing; so, according to the table the maximum height for solid grouted walls would be 20:1 and for hollow masonry 18:1. The wall above must be anchored to the foundation wall in accordance with Section R403.1.6.

**Keywords:**

brick, block, concrete block, reinforcement, rebar, wire