

## GEOTECHNICAL ENGINEERING RECOMMENDATIONS

### General

Specific loading data for the proposed structures were not available at the time this report was written. For purposes of this geotechnical engineering evaluation, we have assumed the building to be a one-story, steel-framed structure with masonry block walls. Based on conversations with Hannaford Bros., and other projects involving similar structures, the following loading data have been assumed:

### Typical Maximum Column Loads

Interior	250 kips
Exterior	150 kips
Corner	75 kips
Column Spacing	Approximately 30 ft. to 65 ft. on center
Masonry Bearing Walls	7.5 kips per lin. ft.
Floor Load	150 lbs. per sq. ft.

The finished floor grade in the building is El. 75.0.

### Site Filling Options

Much of the proposed supermarket building will require filling to raise the grade to finish floor elevation. Most of the building site is also underlain by 5 to 10 ft. of fill, with a greater thickness of fill in limited areas. The existing fill within the building limits consists primarily of silts and clays, with varying amounts of sand, gravel and construction debris, and limited amounts of sand and gravel fill. We do not believe that the fill materials, in their present condition, are suitable for support of the proposed food store. We believe that there are a number of options that can be assessed relative to reusing the fill material that is present at the site.

The options that we evaluated include:

- Option 1: Remove the fill within the building limits and segregate the material (granular, cohesive, construction debris, organic) in onsite stockpiles. Reuse suitable material within the building limits; placed in lifts and compacted. Place and compact suitable fill to design roadway, floor subgrade levels. Use unsuitable material in non-critical site fill areas.