

March 18, 2024

Town of Wareham Zoning Board of Appeals
c/o Kenneth Buckland, Director of Planning and Community
Development
54 Marion Road
Wareham, MA 02571

A&M Project #: 3236-03

Re: Woodland Cove
Notice of Project
Change/Insubstantial
Modification Request

Dear Mr. Buckland and members of the Wareham Zoning Board of Appeals,

Allen & Major Associates, Inc. (A&M) is in receipt of a request for a Notice of Project Change/Insubstantial Modification by Attorney Peter Freeman as dated March 18, 2024 accompanied by revised drainage calculations prepared by BSC Group dated March 15, 2024. It is A&M's understanding that the applicant, Dakota Partners, Inc. has submitted a request to the Building Commissioner for Certificates of Occupancy for three residential buildings and the Community Building in Phases 1 and 3 of the project subject a Comprehensive Permit under Chapter 40B. A&M further understands that the occupancy request was denied given improper grading at each of the buildings requested and that a remediation plan of action would be required prior to the Commissioner's action. A&M met onsite with the project applicant, their field superintendent, and engineer of record on March 13, 2024 to review the current conditions.

The observed conditions at each of the constructed buildings has observed grade sloping toward the foundation of the building in direct conflict with the Massachusetts State Building Code, Section 1803.3 which reads:

1803.3 Site Grading. *The ground immediately adjacent to the foundation shall be sloped away from the building at a slope of not less than one unit vertical in 20 units horizontal (5% slope) for a minimum distance of ten feet (3048 mm) measured perpendicular to the face of the wall or an alternate method of diverting water away from the foundation shall be used. The procedure used to establish the final ground level adjacent to the foundation shall account for potential settlement of the backfill.*

The Notice of Project Change request is accompanied by site plans prepared by BSC Group that provide for regrading at each of the foundations of the buildings to be in keeping with section 1803.3 of the Code. The plans depict the addition of grade sloping away from the foundation of each building a minimum of 10 feet with runoff then directed into a swale with a grading of not more than 2% laterally to a beehive grate on a drywell where it is recharged below ground.

A&M is in agreement with the design modifications put forth by BSC Group and the accompanying calculations, but do offer the following observations regarding the information:

1. The remedial grading will create "grade drops" at adjacent building sidewalks as part of the pedestrian circulation for the site. As discussed with the applicant during the site walk, appropriate accommodations for landscaping, fencing, or other visible detection means should be installed at the back of the sidewalk to prevent falls. The BSC plans do not depict these improvements.

2. Portions of the regrading will interfere with installed utilities (transformers, junction boxes, etc.). The plans do not provide direction on specific handling of transformer pads, patio, exposures, etc. The construction requirements of the applicable utility provider or other elements of the Building Code should be followed where not specifically identified on the plans.
3. Portions of the regrading work will affect the fire lane access (Grasspave) between the buildings. The applicant remains required to ensure that all fire roads are in compliance with NFPA 1 and 527 CMR 18 (the Massachusetts Amendments) and obtain final sign off from the Fire Department. Some of the regrading will require short retaining walls adjacent to fire roads. As discussed during the site walk, A&M recommended that visual markers be installed to alert the fire department of the wall during non-ideal conditions (rainfall, snow cover) that may hinder site access and obscure the walls. A&M notes that the fire access lanes per record plan were approved at 18 feet in width as opposed to the 20 feet noted under the NFPA code.
4. The regrading of the rear of Building B directs additional flow toward Building E and the proposed remedial drywells. The drainage paths, once constructed, should be reviewed to ensure that no runoff ponding occurs at Building E.
5. The TSS removal calculations provided in the drainage report indicate a water quality swale for Watershed P3-16. The revised plans do not depict the water quality swale or any construction details confirming the area at the clubhouse as meeting the Massachusetts Stormwater Handbook as a water quality swale and therefore gaining TSS removal credit which is required for the project. This information should be confirmed and provided. The driveway and parking field adjacent to the clubhouse sheet flows toward the grass with no runoff pretreatment for water quality, which is required.

During the site walk, it was discussed to utilize the lawn area as a depression to collect water in lieu of the as-constructed flat area that exists between Building D and the Community Building. This recommendation is in addition to the need for runoff pre-treatment.

6. As a reminder to the Zoning Board of Appeals, The Comprehensive Permit identifies several precedent conditions to receiving Certificates of Occupancy. It is unclear whether this information was provided to the Building Commissioner. A&M notes the requirements below and defers on completion.

Condition D.1: *Prior to the issuance of a certificate of occupancy for a specific Phase/portion of the Project, the Applicant shall:*

- a. *Submit engineer's interim certification of compliance with utilities plan and profiles for such Phase (as applicable) to the Building Commissioner.*
- b. *Provide a letter to the Board, signed by the Applicant's civil engineer, certifying that the Phase of the Project has been constructed in compliance with the Final Plans in all material respects.*
- c. *Obtain acceptance from the Onset Fire Department of testing of all fire protection systems, fire alarm systems, fire sprinkler systems, and local smoke alarms within the dwelling units of the Phase.*
- d. *Obtain a sewer connection sign-off from the Wareham Sewer Commission for the Phase.*

If you require any additional information, please feel free to contact me with any questions, comments or concerns.

Very Truly Yours,

ALLEN & MAJOR ASSOCIATES, INC.

Phil Cordeiro, P.E.
Branch Manager