



April 11, 2019
19544

Maureen O'Meara, Town Planner
Town of Cape Elizabeth
320 Ocean House Road
P.O. Box 6260
Cape Elizabeth, Maine 04107

**Subject: Ocean House Common, 326 Ocean House Road
Site Plan and Resource Protection Permit Review**

Dear Maureen:

We have received and reviewed a submission package dated March 29, 2019 for the subject project. The package included the following items:

- a March 29, 2019 letter from Robert Metcalf of Mitchell & Associates;
- a March 27, 2019 stormwater related letter from Stephen Bradstreet of Ransom Consulting, Inc.;
- a March 21, 2019 traffic related letter from Randy Dunton at Gorrill-Palmer;
- a March 29, 2019 architectural related letter from Matt Provencal of Mark Mueller Architects;
- eight, 11-inch by 17-inch March 29, 2019 architectural building floor plans, elevations, and perspective view exhibits labeled A-1, A-2, A-3, A-4, A-5, A-6, A-7, and A-7.1 as prepared by Mark Mueller Architects;
- a sixteen (16) drawing plan set dated March 29, 2019 as prepared by Mitchell & Associates;
- and, included with the 16 drawings, a March 26, 2019 Boundary & Topographic Survey as prepared by Owen Haskell, Inc.

The responses and revisions have addressed many of our previous comments. Based on our review of the submitted material and the project's conformance to the technical requirements of Section 19-9 Site Plan, Section 19-8-3 and Resource Protection Permit; we offer the following comments:

1. The applicant is requesting a review of a multi-use Village Green-style development on a 4.1-acre entirely wooded parcel within the Town Center. The first phase of the project will consist of a dental office space and two, 2-bedroom residential units in a 3,572 square foot (SF) building with utility and stormwater infrastructure improvements. Proposed parking spaces now totaling 20 spaces will be provided along a new access drive looping through the site to connect from Ocean House Drive to the rear parking lot on the adjacent Town Hall property to allow for the development to link traffic flow to Shore Road. A 20,000 SF public common area will be established adjacent to Ocean House Road to create a Village Green.

Subsequent phases will include three more buildings with uses that will likely include a restaurant, retail businesses, and additional residential spaces. Utility extensions from the Phase 1 utility infrastructure will be constructed to meet the needs of the future tenants as the buildings are constructed.

2. The proposed development will impact entire 3,565 SF of a wetland pocket near the center of the lot. The boundary of the wetland has been better defined on the plans, but the area proposed to be impacted should be added to the plans.
3. The new development will require that a letter of sanitary sewer capacity be received by the Town Engineer in order to confirm that the Town's collection and treatment system has capacity to receive and properly treat the additional sanitary sewer flow from this new development. The applicant's designer should provide an estimated daily flow to be generated from the development based on the rates from the Maine Subsurface Wastewater Disposal Rules and request a capacity determination.
4. The Existing Conditions Plan (L1) should be sealed by the appropriate professional.
5. The design team met with the Public Works Director to review the proposed connection to the Town's drainage structure in Ocean House Road at the Jordan Way intersection. The project engineer has noted that the replacement of the drainage manhole structure is needed to allow for the new connection to be accomplished. A Precast Concrete Catch Basin Detail appears to reflect this change; however if so, the title of the detail should be changed to Precast Drainage Manhole Detail and the plans should note this replacement along with ancillary/reference notes to clearly indicate the necessary steps to be taken to accommodate the new site storm drainage connection.
6. Likewise, the plans should include a detail of the sanitary sewer pipe connection to the Town's sanitary manhole in Ocean House Road. The designer should also indicate the orientation of the extension stub pipe to serve the future buildings from Sanitary Manhole #2. The designer may also want to consider the digging of a test pit early in the construction process to determine the elevation of the water line in Ocean House Road as a means to verify no potential conflicts with the proposed utility crossings.
7. The designer should review the roadway profile depicted on the Road Profile drawing (L7). There appears to be several items which need to be addressed:
 - The match points and their corresponding station locations should be indicated for the pavement connections to Ocean House Road and the Town Hall parking lot;
 - Several PCs and PTs appear to be incorrectly shown at points that are within tangent sections of the road and/or are not at the beginning or at the ending points of the vertical curve;
 - the short vertical curve sections with compound curvature points provide for very flat sections along the profile;
 - and a vertical curve should be added at the end of the roadway connection to the Town Hall parking lot so that there is not an abrupt transition from the 7% grade to the much flatter parking lot grade.
8. There have been several changes to the details shown on the Site Details drawings (L8 and L9) that have addressed our earlier comments. Items that require further clarifications include the following:

- On the Bituminous Sidewalk detail on drawing L8, we incorrectly commented that the pavement layer should be a 9mm mix when it should have been a 9.5mm fine mix. Likewise, there are pavement material callouts for a 12.5mm mix when it should be a 12mm mix. We apologize for the confusion on the 9.5mm mix size.
 - It is not clear as to the depths of the concrete footing for the Bench Detail on drawing L8. Ideally, the footings and the crushed gravel under the footings should extend below frost grade.
 - On drawing L9, there is a Drip Strip Detail which depicts what would be installed alongside buildings to treat runoff coming off the building roofs. This detail should be coordinated with the Stormwater Management Plan to ensure that it is constructed to meet Maine Department of Environmental Protection (DEP) standards and identify whether or not an underdrain relief pipe will be included.
 - The surface for the dumpster pad enclosure should be called out on the plans and a detail added to the plans if that particular surface treatment has not already been shown on the plans.
9. The plans indicate a proposed tree line which provides for clearing in the areas of the future buildings. This approach would allow the future building construction to proceed without the need to remove any additional trees. The plans should indicate the interim surface treatment that is proposed for these cleared areas after the removal of the trees and before the construction of the future buildings.

Stormwater Comments:

10. The previous submission package included a Stormwater Management Plan narrative exhibit which detailed the proposed improvements and the inclusion of stormwater quality treatment methods and water quantity measures before stormwater is discharged to the Town's enclosed drainage system at the intersection of Jordan Way and Ocean House Road. The proposed stormwater treatment methods include building drip edges, wooded buffers, two underdrained filter swales, and two Focal Points systems which treat runoff prior to discharge into a depressed detention basin area. The outflow from the detention basin would then be controlled by an outlet control structure before being discharged to the Town's public stormwater system.

We understand that in response to the proposed stormwater management plan, there were discussions at the last Planning Board meeting that focused on concerns with an open detention basin not being appropriate to be placed in the Town Center near a Village Green. We also understand that the removal of the open detention area would allow for the Village Green footprint to be expanded substantially to become more of a focal presence and enhanced community asset.

Options have been suggested to provide alternatives to the on-site storage characteristics of the open detention basin and means to possibly reduce the measures being taken to provide water quality treatment of the site's runoff prior to discharge into the Town's municipal storm drainage system. The project team has evaluated and dismissed several of these alternative approaches

partly due to the fact that the ultimate buildout of the site would trigger a Maine DEP Stormwater permit as the impervious surfaces would exceed one-acre in total.

The project team, the Town Planner, and I met with DEP representatives on April 1st to discuss the ramifications of the DEP's influence on the project development. The following conclusions were established from that meeting:

- The DEP does not require that the quantity of runoff be reduced from a site to below the estimated pre-development peak runoff rates in situations where the municipalities will accept stormwater into their public stormwater system.
 - Stormwater Law permit approvals from the DEP must meet the DEP's standards for water quality.
 - Runoff from the Town Hall's rear parking lot would require water quality treatment if this stormwater is collected and redirected to convey into the Town's Ocean House Road/Jordan Way storm drainage system which ultimately discharges into the Spurwink Marsh.
 - There are multiple options available to applicants within which water quality treatment standards can be met.
11. The DEP meeting provided both the project team and the Town staff parameters within which to develop future steps to further the progression of this project. The design team should focus their attention on effective water quality treatment approaches and the Town staff should evaluate the Town drainage system's capacity to evaluate its ability to accept the project's stormwater flow into the municipal system. Both of these efforts will require additional analysis.

The project engineer, Steve Bradstreet of Ransom Consulting, has provided Sebago Technics with projected 25-year storm event peak runoff rates from the developed site without considering the attenuation effects of the originally designed detention basin or the reduction of flow rate anticipated through the water quality treatment devices. These estimated values indicate a 25-year Storm peak stormwater discharge of 3.05 cubic feet per second (cfs) from the proposed Phase 1 development and 5.55 cfs for the full buildout condition.

These values represent rates which can not be readily accepted into the Town's municipal storm without further capacity analysis which the Town has requested that Sebago Technics provide. While this analysis will take some time to develop, the project team can further analyze both efforts to more effectively treat the runoff from the site and the actual reduction of the peak rate of runoff that can be anticipated by utilizing the water quality treatment devices.

12. Stormwater underdrained infiltration swales have been proposed to be installed on the south side of the Town's parking lot behind Town Hall. We have discussed with the designer the need to shift the infiltration swales further away from the Town Hall parking lot pavement to allow for the need to store snow adjacent to the parking lot. In keeping with the DEP requirements, the underdrained swales would need to include forebays as well. Also, observation risers acting as cleanouts would need to be included in the design. In conversations with the Public Works Director, the Town would be willing to undertake the maintenance responsibilities of these features. In order to do so, the Town should receive an easement from the applicant to discharge

flow onto the adjoining property and into that property's stormwater management system as well as retain rights to access and maintain these swales if the swales are shifted onto the project site.

13. The project engineer has expressed a willingness to implement our previous suggestion to install a level spreader or a rock berm behind the Phase 1 building at the point where flow from Subcatchment 3 enters into Subcatchment 4. This measure would allow runoff to redistribute into sheet flow and further take advantage of the wooded buffer areas to slow and absorb runoff prior to discharge off-site.
14. The Pre-Development Plan (D1) and the Post-Development Plan (D2) drawings should be sealed by the appropriate professional.

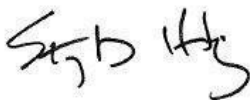
Traffic Impact:

15. The recent plan indicates acceptable sight distances at the Ocean House Road intersection.
16. We agree that the effect of the traffic impact from this project after the first phase will be minimal and that the proposed access locations on Ocean House Road and Shore Road are appropriate. Subsequent studies should be conducted once the actual uses of the property are clearly defined in future buildout scenarios to ensure that the project does not trigger a Maine Department of Transportation Traffic Movement Permit (TMP) from the MDOT and confirm that the current study's initial conclusion of no significant impacts is still valid.

We trust that these comments will assist the Board during their deliberations on this project. Should there be any questions or comments regarding our review, please do not hesitate to contact us.

Sincerely,

SEBAGO TECHNICS, INC.



Stephen D. Harding, P.E.
Town Engineer

SDH:sdh

cc: Bob Metcalf, Mitchell & Associates
Steve Bradstreet, Ransom Environmental
Bob Malley, Public Works Director