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 October 4, 2021

Town of Wareham Board of Appeals

Memorial Town Hall

54 Marion Road

Wareham, MA 02571 Re: Site Plan Review for

 Reign Car Wash

 3005/3013 Cranberry Hwy.

 Response to VHB letter of

 Sept. 15, 2021

Attention: Nazih Elkallassi, Chairman

Dear Chairman Elkallassi:

 I have reviewed the above referenced letter and have looked at the revised plans filed with the Planning Office dated Sept. 16, 2021. A complete set of plans was not provided but a review was conducted of Sheets C2.01, Layout and Materials, C-301, Grading and Drainage, C6.01 Fire Dept. Turning Analysis and L1.01 Landscape plan.

 The comments below relate to the comment numbers of my review dated August 18, 2021 and which were carried forward in the VHB response of Sept. 15, 2021.

**Comment 2, Landscape Buffer**

 The Zoning Board will need to determine that a landscape buffer as required under Section 1042 of the Zoning By-Law can include a stormwater drainage area.

 The Landscape Plan, L1.01 shows three eastern red cedars as the only landscape features on the southerly lot buffer. On the easterly boundary and buffer one honey locust and a maple are the only proposed landscape features shown. Other trees exist along that boundary that may or may not be within the site limits.

 Loam and seed will be part of the buffer but revised stormwater details include a stone lined bottom to each of the infiltration areas. No wetlands plantings are proposed within these areas.

**Comment 3, Section 1061.1.**

 This section includes the words “lot perimeter” in the requirement for planting trees. The Board will need to find that this particular section of the Zoning By-Law does not apply to the project.

**Comment 4, Landscaped Islands**

 The Board will need to find that the project complies with Section 1062.3 of the By-Law.

**Comment 5, Review by Planning Board**

 The Planning Board has discussed this project to the best of my knowledge although no comments have been posted on the ZBA project website.

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Plan Sheet C3.01

**Comment 1, Construction Entrance.**

 The VHB response suggests that having the construction entrance on Cranberry Highway would not result in safety concerns any more than typical traffic. However, construction vehicles are either entering or leaving with heavy loads and with slow movement. With a controlled street entrance abutting the site and no traffic concerns to the rear of the project area, a construction entrance on Cranberry Highway, a busy road, is not necessary. It is recommended that the Board reject this temporary proposal.

**Comment 2, grading on Cranberry Highway.**

 The revised plan of Sept. 16 does not show any changes to the grading on Cranberry Highway at the proposed entrance. No additional spot grades are shown on the revised plan as indicated in the VHB response. Are the two bold grades shown existing or proposed and do they represent the 1-foot change in elevation of Cranberry Highway as has been stated?

**Comment 3, Flood Zone Requirements**

 The response indicates that flood proofing will be made part of the building design if required. This should be made a condition of approval should a Special Permit be authorized.

**Comment 4, Stormwater Controls**

 It is recommended that as condition of approva,l a copy of the transfer of title from OSJ to the applicant, as recorded in the Plymouth Registry of Deeds shows that the right to discharge stormwater will be allowed onto the remaining OSJ property and this should be filed with the Board prior to the receipt of a Building Permit. The same would apply to using the remaining OSJ property for access and regrading.

**Comment 5, Site Grades at rear of property**

 No revision to the site plan was done. The plan still shows that runoff from the abutting paved surfaces could enter the site unchecked.

**Comment 6, Off Site Grading and Landscaping**

 The response indicates that authorization from OSJ will be obtained as part of the negotiated agreement to allow for off-site changes. As with the flood zone requirements, it is recommended that this be included and submitted to the Board prior to obtaining a Building Permit.

**Comment 7, Escape Path, west side of building**

 The escape path has been made 20 feet wide but the requested 10-foot radii are shown as 5 feet. The 5-foot radii are acceptable assuming that fire apparatus will not need to traverse this portion of the site. Otherwise the 10-foot radius should apply.

 The letter from the Wareham Fire Prevention Division included in the materials does not make mention of the requested width of 20 feet but the revised plan should be reviewed by the Division. If not previously approved, the apparatus travel path which requires backing the apparatus up near the front of the building should be approved. It should also be noted that a new aerial tower device is in process of being delivered to the Wareham Fire Dept. The turning path of this new equipment should be checked and shown on the plan.

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**Detail Sheets 5.01 and 5.02** were not included in the set of revised plans listed on the Zoning Board website. No comments are made at this time with respect to changes that have been made.

**Comment 10, Bouyancy Calculation**

 It is highly recommended that this calculation be done and should be submitted to the Board for review and comment prior to filing for a Building Permit. If there are no changes to the plan that would result from the calculations the Board could find that no further action is needed. On the other hand, if changes are to be done the Board would then need to consider whether the change is minor, or of significant impact that would require a re-opening of the public hearing process.

**Lighting Plan**

A lighting plan was not included in the revised plan set that shows the intensity of lighting or spillover across the project area. Not comment can be made at this time.

**Stormwater Calculations**

 The stormwater design needs to conform to specific site conditions that have been supported by test pits that allow for open observation of soil coloration and mottling, two features that depict high ground water elevations.

 The response letter from VHB suggests that further site investigation for high ground water is excessive and unnecessary. While the DEP Stormwater Regulations may allow borings to determine soil type and water elevations it does not indicate that the use of borings will answer questions that may arise due to local conditions.

 Water encountered by borings only suggests where the ground water may be on that particular day and not necessarily where the historical high ground water actually is.

 Boring logs indicate water was encountered while drilling at depths from 3.5 feet to 5 feet and the ground elevation in each boring location was noted as “approximately 11 feet”.

 In this case, the approximations for ground surface elevation and the variations in ground water encountered are insufficient to conclude that ground water is at elevation 7 for design purposes.

 Test pits need to be done before the stormwater design can be recommended for approval.

**Other Response Comments**

 The VHB response rightly reports that some issues brought up by the review will require MassDOT approval.

 It is recommended that the Board include as part of any Special Permit vote, a condition that would require the submittal of a copy of the MassDOT permit that is approved for the site along with any conditions of the permit that require changes or adjustments to the site plan as presented to date. The submittal should go to the Board of Appeals in time for the Board’s review and prior to the issuance of a Building Permit.

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 The VHB report includes a statement that should MassDOT require a turn lane similar to that provided at Seth F. Tobey Road, it would consider what changes would have to be made at that time. The Board may wish to include this as a condition of approval in any Special Permit document is may issue.

 This concludes the review for the revised documents received. Please feel free to contact me if you have any questions.

Very truly yours,

Charles L. Rowley

Charles L. Rowley, PE, PLS

Cc ZBA members

 Ken Buckland, Wareham Town Planner

 Richard Swenson, Planning Board Chairman

 David Riquinha, Building Commissioner

 David Pichette, Conservation Agent

 Doug Troyer, Moriarty Troyer & Malloy, LLC

 Karen M. Crawford, VHB