

October 31, 2024

Via E-mail (dchandler@westorange.org)

Zoning Board of Adjustment
Township of West Orange
66 Main Street
West Orange, New Jersey 07052

Attn.: Diana L. Chandler – Zoning Board Secretary

**RE: ENGINEERING REVIEW FOR FRIEDMAN SINGLE-FAMILY RESIDENTIAL DWELLING.
WEST ORANGE ZONING BOARD OF ADJUSTMENTS APPLICATION No. ZB 24-13
10 RIDGE ROAD (BLOCK 80.03, LOT 10)
TOWNSHIP OF WEST ORANGE, ESSEX COUNTY, NEW JERSEY
MATRIX No. 23-1345-005**

Ms. Chandler,

As requested, Matrix New World Engineering, Land Surveying and Landscape Architecture, PC (Matrix) has reviewed the Zoning Board of Adjustment application and supporting documentation for the above-referenced site. Matrix has prepared a technical engineering review of the proposed improvements at the subject. It shall be noted that our review of the project is limited to site / civil engineering only. Matrix defers all planning matters, including but not limited to, bulk and/or use variances, conformance with the master plan and ordinances, etc.

As provided by your office, Matrix has received and reviewed the following documents for this project:

- 10 Ridge Road Public Utilities List;
- Property Buffer Report (200-foot owner list) for Block 80.03, Lot 10, prepared by the Office of the Tax Assessor, Township of West Orange, dated July 2, 2024;
- Proof of Payment for Soil Permit Removal Application Fee from Dynamic Engineering Consultants, PC, dated July 8, 2024;
- Signed but unsealed Soil Movement Permitting Plan, prepared by Dynamic Engineering Consultants, PC, dated June 27, 2024;
- Township of West Orange Application Form for Planning Board or Zoning Board of Adjustment, dated July 8, 2024;
- Township of West Orange Soil Removal Permit Approval Submission Letter for Planning Board, prepared by Dynamic Engineering Consultants, PC, dated July 10, 2024;
- Soil Erosion and Sediment Control Plan Certification Letter, Application and Start Notice prepared by Hudson-Essex-Passaic Soil Conservation District, dated July 15, 2024;
- Verification of Taxes and Sewer Charges Paid, Block 80.03, Lot 10, 10 Ridge Road, prepared by the Office of the Tax Collector, dated July 23, 2024;
- W-9 for Aaron Friedman, received by West Orange Planning Department on July 10, 2024;

- Signed but unsealed property survey drawing for Block 80.03, Lots 10 & 21, entitled “ALTA/NSPS Land Title Survey,” prepared by Dynamic Survey, LLC, dated May 11, 2022 and
- Signed but unsealed set of engineering drawings, prepared by Dynamic Engineering Consultants, PC, dated March 5, 2024, including the following sheets:
 - Plot & Grading Plan (Sheet 1)
 - Drainage and Utility Plan (Sheet 2)
 - Demolition, Steep Slope and Tree Removal Plan (Sheet 3)
 - Soil Erosion and Sediment Control Plan (Sheet 4)
 - Soil Erosion & Sediment Control Notes & Details (Sheet 5)
 - Construction Details (Sheet 6)

PROJECT DESCRIPTION

Matrix understands that the Owner and Applicant for this application is Aaron Friedman, mailing address: 139 Tennyson Drive, Short Hills, New Jersey. As per the Township's Zoning Map (last revised 2020), the subject parcel (Block 80.03, Lot 10) is located in the 'R-1' (Residential) zoning district along Ridge Road, approximately 300 feet from the intersection of Ridge Road and Mount Pleasant Avenue and across the street from the Brookdale West Orange Senior Living facility (located in the R-2 District). The subject property is approximately 5.77 acres and is presently undeveloped, wooded land. Matrix further understands that the Applicant intends to construct a two-and-a-half story single-family residence with an attached garage, as well as an 800 square foot (SF) outdoor swimming pool and 1,300 SF pickleball court. Below is a summary of the proposed property improvements:

Approximately 42,241 SF (0.97 acres) of the subject property will be disturbed to accommodate the proposed single-family residence, accessory uses (i.e., swimming pool and pickleball court), driveway and utility improvements. According to the engineering drawings, a total of 148 existing trees (60 trees with diameters between 4 and 6 inches, and 88 trees with diameters of greater than 6 inches) will be removed throughout the proposed disturbance area and a total of 28 trees will be installed along the proposed driveway. Portions of the property, mainly along the perimeter, contain steep slopes equal to or greater than 10%. According to the engineering drawings (see Sheet 3, Demolition, Steep Slope and Tree Removal Plan), disturbances in steep slope areas will conform with all maximum disturbance areas for steep slopes as provided in Ordinance §25-28.8.

1. General

- 1.1. Architectural drawings were not provided as part of the submission materials. As such, we are unable to ensure that the proposed building complies with the residential building design criteria specified in Ordinance §25-9.7(b). The Applicant shall provide architectural drawings for further review.

2. Demolition

- 2.1. The Applicant shall provide testimony regarding the intention to obtain a Tree Removal Permit pursuant to Ordinance §25-27.
- 2.2. Sheet 3 of 6, “Demolition, Steep Slope and Tree Removal Plan” shows there are slopes of greater than 15% in the area of the proposed driveway access to the site. If the Applicant is proposing to remove trees within this area, an exemption may be required per Ordinance section §25-27.4. The Applicant shall provide testimony.

3. Plot & Grading Plan

- 3.1. The Applicant shall provide testimony regarding the existing site conditions, proposed improvements, and conformance with applicable ordinances and regulations.

- 3.2. Curb cut, driveway access and driveway widths are not provided on the engineering drawings. The site plan shall be revised to include these widths to ensure adequate access from Ridge Road and adequate maneuvering within the subject property.
- 3.3. The Applicant shall obtain a Road Opening Permit in accordance with Ordinance §20-1. In addition, the Applicant shall revise the site plans to include details for the restoration of Ridge Road.
- 3.4. The plan shows a proposed concrete retaining wall that is approximately 5-feet tall at the highest point. The Applicant shall revise the plan to include a detail of the retaining wall, and it should be signed and sealed by a structural engineer.
- 3.5. The plan calls for “standard duty asphalt pavement” for the proposed driveway. The Applicant shall revise the plan to include a detail for the pavement.

4. Drainage and Utility Plan

- 4.1. The plan shows a proposed septic field but does not include any details for the design of the system. The Applicant shall confirm that the proposed sanitary system complies with Ordinance §24-13.2 standards for single family dwelling subsurface sewage disposal systems.
- 4.2. The Applicant shall provide testimony regarding the need to construct any above- or below-grade improvements for utility services.
- 4.3. The plan shows a proposed underground detention basin with an outlet control structure. The Applicant shall provide a stormwater report with runoff calculations and drainage area mapping for review.
- 4.4. It appears that there is offsite drainage that runs onto Lot 10 via 15” HDPE pipe that discharges to a “Channel” and then to a headwall on Lot 21. The Applicant shall provide testimony as to any easements or agreements that are proposed or in place to allow for the offsite drainage to continue to flow through the site. If there are any easements, the plan shall be revised to reflect any that are existing or proposed.

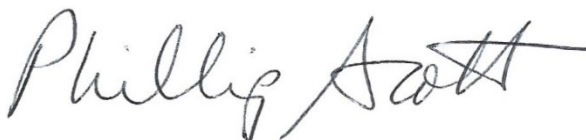
5. Soil Erosion & Sediment Control

- 5.1. The Applicant has obtained a soil erosion and sediment control permit from the Hudson-Essex-Passaic Soil Conservation District dated July 15, 2024. Matrix has reviewed the permit as well as the plans and agrees with the issuance of the certification by the soil conservation district.

We thank you for the opportunity to be of service to the Township of West Orange Zoning Board of Adjustment. Please feel free to contact me directly with any questions or comments at (973) 295-3279 or via e-mail at pscott@mnwe.com.

Sincerely,

MATRIX NEW WORLD ENGINEERING



Phillip Scott, P.E., C.M.E.
Director of Urban Engineering and Development

EJ:PS
Enclosures

Cc: Dennis Petrocelli, PG – Vice President, Matrix

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