

18 Henderson Road Woburn, MA 01801-5919 Tel: (781) 933-3711 Fax: (781) 287-1277 Email:lep@lindeneng.com

November 29, 2023

Town of Lynnfield Planning Board c/o Ms. Emilie Cademartori, Director of Planning and Conservation Town Hall, 55 Summer Street Lynnfield, MA 01940

Re: Review of Subdivision Modification Plan

109 Lowell Street, Vallis Way, Lynnfield, MA

Dear Planning Board Members:

As requested, our firm has reviewed the subdivision modification plans dated November 15, 2023, submitted by the Applicant for the above referenced subdivision. The proposed changes to the approved subdivision plans involve four aspects of the plan. Those items and our comments are as follows:

1. WATER LINE REVISIONS

The Modification Plans have been updated to reflect revisions requested and approved by the Lynnfield Center Water District ("LCWD") as mitigation for the removal of the looped water main to Smith Farm Trail. These revisions include the addition of several line gates on Lowell Street, an additional hydrant on Vallis Way, a new hydrant on Smith Farm Trail, replacement of water services within the Smith Farm Trail right-of-way, and installation of additional water main to the shared boundary with the Sagamore Golf Course.

With respect to this item, we have the following comments:

- a. Has the LCWD given written approval of the Modification Plan submitted? If so, written approval should be provided to the Planning Board prior to the public hearing on the Modification Plan. If not, the written approval should be obtained and submitted to the Planning Board prior to the public hearing on the Modification Plan.
- b. The offsite water work required by the LCWD as a condition of their approval of the plan as stated in the Applicant's Engineer's letter should be clearly stated on the plan and included in the Planning Board's approval of the plan.
- c. The Applicant's Engineer's letter states that the required work includes the installation of an additional water main to the shared boundary with the Sagamore Golf Course. The water stub extending off the cul-de-sac of Vallis Way appears to be the same as was shown on the approved subdivision plan. Please explain where the additional line is.
- d. We again suggest that strong consideration be given to adding an 8" line gate in the cul-desac after the hydrant tee and the last home water service line so that when the line is

Town of Lynnfield Planning Board, c/o Ms. Emilie Cademartori, Dir. of Planning and Conservation Re: Review of Subdivision Modification Plan, 109 Lowell Street, Vallis Way, Lynnfield, MA November 29, 2023, Page 2 of 3

extended into the adjacent Sagamore Springs property the Vallis Way water main would not have to be shut down.

2. MATERIAL WAIVER FOR DRAINAGE PIPING

Upon consultation with the Town Engineer and Contractor, the Applicant seeks to expand the material waiver for drainage piping to permit the use of HDPE drainage pipe within the Vallis Way right-of-way and on the entire project.

With respect to this item, we have the following comments:

- a. The requested waiver does not specify whether the pipe is single wall or double wall HDPE pipe and what type of pipe joints will be employed. We recommend that the waiver only be granted for the use of double wall HDPE pipe. We prefer water tight connectors but we would also accept the soil tight connectors.
- b. The waiver is stated as being for perforated HDPE pipe. It is not clearly stated as to whether the pipe is perforated all around the pipe or if not, are the perforations facing up or down. It is also not clear to us that the Town Engineer understood the pipe to be perforated. If perforated pipe is to be used we strongly recommend that clay dikes be installed in the drain trench every 75 feet maximum to prevent water scour from following the pipe trench and causing unintended settlement.

3. INSTALLATION OF NATURAL GAS

The Applicant would like to rescind the waiver they requested and the Planning Board granted under the original approval to allow for installation of natural gas in accordance with the Rules and Regulations in the location shown on the plan.

With respect to this waiver request we have the following comments:

- a. Has the gas company given written approval of the Modification Plan submitted? If so, written approval should be provided to the Planning Board prior to the public hearing on the Modification Plan. If not, the written approval should be obtained and submitted to the Planning Board prior to the public hearing on the Modification Plan.
- b. How does the new gas main in Vallis Way connect to the existing gas main in Lowell Street? The plan shows the existing gas main apparently ending on the east side of Vallis Way. Will there need to be an additional gas main installed in Lowell Street to accommodate the extension in Vallis Way. If so, this should be shown on the plan.

4. RETAINING WALL TYPE

Based upon previous submissions to the Board and discussions with the Planner, the Applicant has chosen to specify a Shea Redi-Rock retaining wall with ivy or other creeping

Town of Lynnfield Planning Board, c/o Ms. Emilie Cademartori, Dir. of Planning and Conservation Re: Review of Subdivision Modification Plan, 109 Lowell Street, Vallis Way, Lynnfield, MA November 29, 2023, Page 3 of 3

greenery above and landscaping in front of said wall. While again we have no major issues with this request we have the following comments:

With respect to this item, we have the following comments:

- a. The structural design of the retaining wall needs to be submitted for review and approval along with all of the information required in the Planning Board's approval of the subdivision.
- b. The plan needs to detail the setback of the wall from the curbing along with specifics of the landscaping in front of said wall (how many plants, what species, etc.) and the type and spacing of the ivy at the top of the wall.
- c. The plans do not reflect the actual limit of work line behind the wall or the required grading at the top of the wall that has been shown on the plans we have seen as part of the wall discussion. The Modification Plans need to reflect the actual location of the limit of work line and the clearing and grading required to construct the wall.

With respect to the modification filing in general we have the following comments:

- a. The plans should be labeled "MODIFICATION PLAN" rather than "DEFINITIVE PLAN".
- b. The plans should contain a note stating, "This Modification Plan replaces the approved Definitive Plan dated April 12, 2021, and last revised November 15, 2022, which plan is recorded at the Essex County Registry of Deeds, Southern District in Book 41377, Page 186, recorded on 12/29/2022".

If the Planning Board has any questions regarding our review or should you require any additional information, please do not hesitate to contact our firm.

Very truly yours,

LINDEN ENGINEERING PARTNERS, LLC

William A. Jones, Sr. Partner

Richard G. Cutts, P.E., President

Cc: Ms. Lisa DeMeo, P.E., Town Engineer

X:\Linden Engineering\Projects\Lynnfield MA - LPBD - 109 Lowell St - Vallis Way - LEPJOB#\Documents\Lynnfield MA - Planning Board - 109 Lowell Street - Vallis Way - Subdivision Peer Review - 09-02-2021.doc