

**Kenneth Sullivan  
40 Howard Street  
Portsmouth, NH 03801**

Jon Wyckoff, Vice Chairman  
Historic District Commission  
1 Junkins Ave.  
Portsmouth, NH 03801

September 17, 2021

**RE: Request for HDC approval to replace 19 house windows at 40 Howard Street**

Dear Vice Chairman Wyckoff,

As detailed below, my home at 40 Howard Street has nineteen (19) wooden, double hung windows with aluminum storms that I seek HDC approval to replace with hi-quality Green Mountain Window Co. Milestone Series wooden (not clad) double-hung windows of like-size, with matching window panes, and without storm windows. The existing windows and aluminum storms were installed by a previous owner in or about 1985 (the “1985 windows”). Both the 1985 windows and their installation were of modest quality, and do not operate well. In addition, there is considerable wood rot in various of the windows, trim boards and sills, with at least two of the sills completely rotted away, as depicted in the following **Exhibit-1** photos.

**Exhibit-1** (two existing 1985 windows)



## **The windows to be replaced**

**Front of House.** As depicted in **Exhibit-2**, currently, the front of the house (North side) has nine 1985 windows. The four 1985 windows on the first floor are Brosco B-305 double hung windows, with 9 over 6 panes, and 8" x 10" lights ("1985 Brosco 9 over 6"). The five 1985 windows on the second floor are Brosco B-303 double hung windows, with 6 over 6 panes, and 8" x 10" lights ("1985 Brosco 6 over 6").

### **Exhibit-2**

Front (North side) of 40 Howard Street,  
with existing 1985 windows and aluminum storms



I request to replace all nine of these 1985 windows with like-size Green Mountain windows, as detailed below.



**The driveway side of the house.** As depicted in **Exhibit-3**, on the driveway side (West side) of the house there are three 1985 windows to the left of the downspout that I seek to replace. On the 1st floor is a 1985 Brosco 9 over 6. On the 2nd floor is a 1985 Brosco 6 over 6, and on the 3rd floor (attic) is a 1985 Brosco 4 over 2. I seek to replace these three 1985 windows only.

To the right of the Downspout are two newer Marvin wooden double hung windows that I installed in 2015 with HDC approval. I do **not** seek to replace these.

### **Exhibit-3**

Driveway side (West), with three 1985 windows (left of downspout), and two HDC-approved, 2015 Marvin windows (right of downspout).



**The house side opposite my driveway (East side).** This side has four 1985 windows, depicted here (partially obscured by vegetation) in the recent photo in **Exhibit-4**. The first floor has two 1985 Brosco 9 over 6 windows, and the second floor has two 1985 Brosco 6 over 6 windows. I seek to replace all four of these 1985 windows.

### **Exhibit-4**

Side opposite my driveway (East side), with four 1985 windows.  
Two 9 over 6 (1st floor), and two 6 over 6 (2nd floor)





**Rear of house (South).** The back of the house (South side) has six windows (plus French doors), as depicted in the recent photo in **Exhibit-5**. To the left of shed are two more of the newer Marvin wooden double hung windows that I installed in 2015 with HDC approval. I do **not** seek to replace these.

To the right of shed on the 3rd floor are two 1985, 2 over 2 Brosco casement windows, without storm windows. I do **not** seek to replace these.

To the right of shed there is a 1985 Brosco 6 over 6 window on both the 1st and 2nd floors. I seek to replace both of these. (Note: there is green plywood covering the first floor 1985 Brosco 6 over 6 window, which is temporarily removed for the designing & measuring of the replacement window).

### **Exhibit- 5    Rear of house (South)**



**Summary of existing 1985 windows I seek to replace:**

<b>Exhibit- 6    1985 Brosco 9 over 6 windows</b>	
<b>Number</b>	<b>Location</b>
4	Front of house (North), 1st floor
1	My driveway side of house (West), 1st floor
2	Side opposite my driveway (East), 1st floor
<b>Total: 7</b>	

<b>Exhibit- 7    1985 Brosco 6 over 6 windows</b>	
<b>Number</b>	<b>Location</b>
5	Front of house (North), 2nd floor
1	My driveway side of house (West), 2nd floor
2	Side opposite my driveway (East), 2nd floor
2	Rear of house (South), one each on 1st and 2nd floors
<b>Total: 11</b>	

<b>Exhibit- 8    1985 Brosco 4 over 2 window</b>	
<b>Number</b>	<b>Location</b>
1	My driveway side of house (West), 3rd floor
<b>Total: 1</b>	

**Total number of 1985 windows to be replaced: 19**



## The Green Mountain replacement window descriptions.

The replacement windows will be custom sized, energy efficient, Green Mountain Window Co. Milestone Series, Double Hung Windows: constructed of solid pine (not clad), with Lifespan Solid Select painted exterior, primed interior, Low E – Argon (or Krypton) filled glass, 4-9/16" jam, 5/8" SDL with grey spacer, oil rubbed hardware, 1 x 6 Lifespan select casing (see brochure section below), backband (ships loose), mahogany sill with historic sill nose, aluminum-framed half screen with charcoal fiberglass mesh screens (see data on schematic renderings below).

The window glass pane sizes for each custom-sized replacement Green Mountain window will match the respective, existing 1985 windows glass pane sizes. In addition, each Green Mountain replacement window will match the size of each respective, existing 1985 window, without any diminishment of window height or width.

Note that the 1985 Brosco 6 over 6 center window on the 2nd floor of the front of the house (North) is in a bathroom, and will be replaced with a Green Mountain window with tempered glass. Note also that the 1985 Brosco 4 over 2 window on the 3rd floor (attic) of my driveway side (West) will also be replaced with a Green Mountain window with tempered glass.

### Exhibit- 9 Green Mountain Milestone Series Energy Data Sheet

## Double Hung Windows: Classic and Milestone Series

When we say "Made in the Northeast for the Northeast" we mean that there is a Green Mountain window to suit the needs of everyone who wishes to increase their energy efficiency and look good doing it. To deliver on this promise Green Mountain Window and Door offers two quality product lines from which to choose.

### Milestone

Our high end Milestone line sets the standard for maximum thermal performance and adherence to traditional detail. Rated among or above the best in the industry for air infiltration, the Milestone window is second to none in preserving your interior climate and withstanding the outside elements. Defining aesthetic features such as a concealed block-and-tackle balance system and a hidden tilt-in latch system, authentic traditional details such as wide rails and narrow muntins, and a wide array of decorative options put this premium double hung window miles ahead of its competition.

### Classic

Our original Classic line stands out as one of the best values in the industry. Available with either wood or vinyl clad framing, the Classic double hung window line offers a number of advantages over other manufacturers' products. Mortised, tenoned, and pinned corner joints contribute to superior structural integrity; block-and-tackle tilt-in balances provide added durability and smooth operation. Add to the list a variety of traditional colonial features and options and you've got the perfect fit for the fiscally prudent Northeasterner who refuses to compromise on quality.

Green Mountain windows are manufactured using the finest materials and technologies available in the industry today. Our windows have been certified as thermally superior to most windows marketed in the Northeast. They will help lower heating and cooling costs, virtually eliminate moisture condensation, and protect furniture and carpeting from damaging UV rays. Our windows afford the convenience of a modern tilt-in sash with the traditional look of New England.

### Thermal Barrier Protection

All Green Mountain windows can be constructed with low-emissivity argon or krypton gas filled, insulating glass. Add to that a warm edge spacer system and you have a thermal barrier that keeps the inner surface of your window closer to the inside room temperature, thus keeping your home warmer in winter, cooler in summer.

### Energy Star Rated

With the appropriate glazing, Green Mountain windows exceed current industry "resistance to thermal transfer" standards for measuring thermal performance. Why? Because our windows are actually a source of energy. The U.S. Department of Energy has awarded Green Mountain Windows its ENERGY STAR Certification because our windows are so energy efficient. In a single day our high tech glass can contribute up to 2 1/2 times more heat into a home than it allows to escape. In fact, it is estimated that for every Green Mountain window installed vs. regular insulated glass, a savings of about 12.5 gallons of oil can be realized each heating season.

### NFRC Certified

The Green Mountain window has been tested by an independent laboratory and has been NFRC Certified. This gives you the security of knowing you are purchasing a tested, reliable product that surpasses most other windows on

### SELECT ENERGY DATA COMPARISONS

WINDOW	GLASS	ENERGY STAR RATED?	NFRC CERTIFIED?	RESIDENTIAL				PERFORMANCE RATING
				U-FACTOR	R-VALUE	SHGC	VT	
Milestone Wood	1/2" Low-E Krypton	YES	YES	.28	3.37	.29	.52	DP35*
Classic Wood	1/2" Low-E Krypton	YES	YES	.29	3.44	.29	.52	DP30
Classic Vinyl Clad	1 1/16" Low-E Argon	YES	YES	.30	3.00	.29	.52	DP30

\*DP40 option available

Schematics - Green Mountain Co. 9 over 6 light windows

Exhibit-10 (schematic of proposed Green Mountain 9 over 6 light windows)

Specifications For: Custom Size Milestone Double Hung,  
Frame = 28 7/8"x57 7/8"

Glass: 1/8" Low E Glass Exterior Lite, 1/4" Airspace Filled With Argon,  
1/8" Clear Interior Lite, Gray Edge Spacer Bar

Sash: Solid Pine Sash. Mortice, Tenon and Pinned Corners, Black Painted  
Exterior, Primed Interior. Non-tilting Top Sash

Frame: Pine. 4 9/16" Jamb, Custpm Color Painted Exterior, Primed Interior, 4/4x5  
Lifespan Casing (ships loose) with Backband, Mahogany Sill with Type B Historic  
Sill Nose

Divided Lights: 5/8" Simulated Divided Light with Black Spacer 9/6

Hardware: Oil Rubbed Bronze Sash Lock and 2 White Tilt Latches

Screen: Black Aluminum Half Screen with Charcoal Fiberglass Mesh

Quantity: Seven (7)

Approval:

1. Head Detail

2. Jamb Detail

3. Sill Detail

4. Muntin Detail

Order #:
Line #:
Date: 8-6-21
CAD: ARK

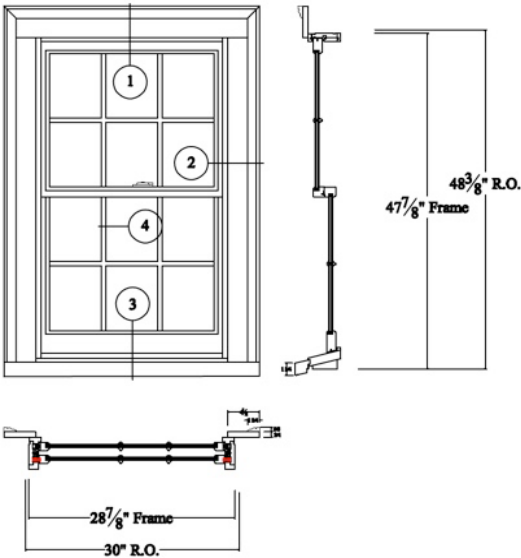
Typical 9/6, 40 Howard St, Portsmouth

**Green Mountain Window Company**  
92 Park Street Rutland, Vermont



Schematics - Green Mountain Co. 6 over 6 light windows

Exhibit-11 (schematic of proposed Green Mountain 6 over 6 light windows)



Specifications For: Custom Size Milestone Double Hung,  
Frame = 28 7/8"x47 7/8"

Glass: 1/8" Low E Glass Exterior Lite, 1/4" Airspace Filled With Argon,  
1/8" Clear Interior Lite, Gray Edge Spacer Bar

Sash: Solid Pine Sash. Mortice, Tenon and Pinned Corners, Black Painted  
Exterior, Primed Interior.

Frame: Pine. 4 9/16" Jamb, Custom Color Painted Exterior, Primed Interior, 4/4x5  
Lifespan Casing (ships loose) with Backband, Mahogany Sill with Type B Historic  
Sill Nose

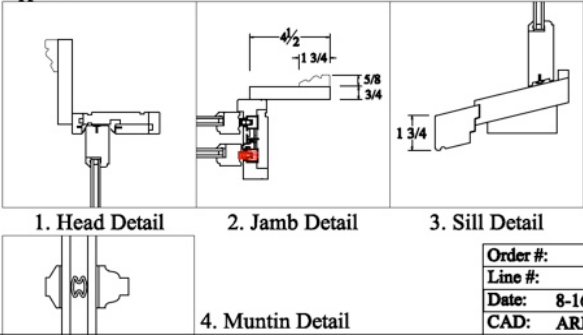
Divided Lights: 5/8" Simulated Divided Light with Black Spacer 6/6

Hardware: Oil Rubbed Bronze Sash Lock and 2 White Tilt Latches

Screen: Black Aluminum Half Screen with Charcoal Fiberglass Mesh

Quantity: Eight (8)

Approval:



Order #:
Line #:
Date: 8-16-21
CAD: ARK

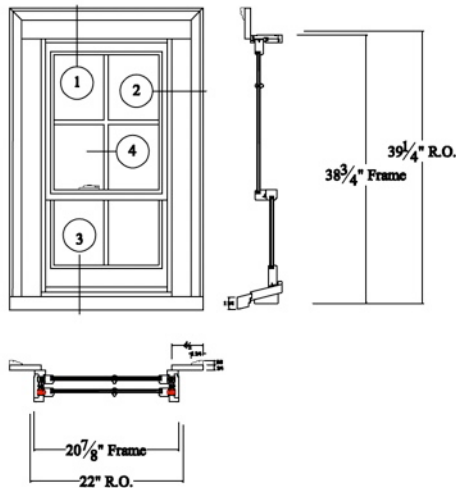
Typical 6/6, 40 Howard St, Portsmouth

Green Mountain Window Company  
92 Park Street Rutland, Vermont

## Schematics

Green Mountain Co. 4 over 2 light window (only 1, to replace existing, driveway side (West), 3rd story (attic) existing 1985 Brosco 4 over 2 window

### Exhibit-12 (schematic of proposed Green Mountain 4 over 2 light window)



Specifications For: Custom Size Milestone Double Hung,  
Frame = 20 7/8"x38 3/4"

Glass: 1/8" Low E Glass Exterior Lite, 1/4" Airspace Filled With Argon,  
1/8" Clear Interior Lite, Gray Edge Spacer Bar

Sash: Solid Pine Sash. Mortice, Tenon and Pinned Corners, Black Painted  
Exterior, Primed Interior. Non-tilting Top Sash

Frame: Pine. 4 9/16" Jamb, Custpm Color Painted Exterior, Primed Interior, 4/4x5  
Lifespan Casing (ships loose) with Backband, Mahogany Sill with Type B Historic  
Sill Nose

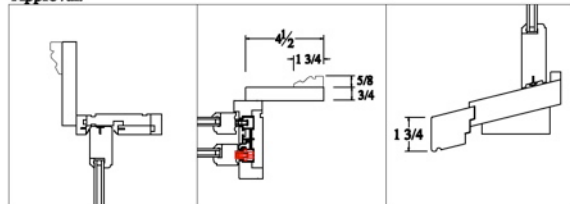
Divided Lights: 5/8" Simulated Divided Light with Black Spacer 4/2

Hardware: Oil Rubbed Bronze Sash Lock and 2 White Tilt Latches

Screen: Black Aluminum Half Screen with Charcoal Fiberglass Mesh

Quantity: One (1)

Approval:



1. Head Detail

2. Jamb Detail

3. Sill Detail

4. Muntin Detail

Order #:	
Line #:	
Date:	9-17-21
CAD:	ARK

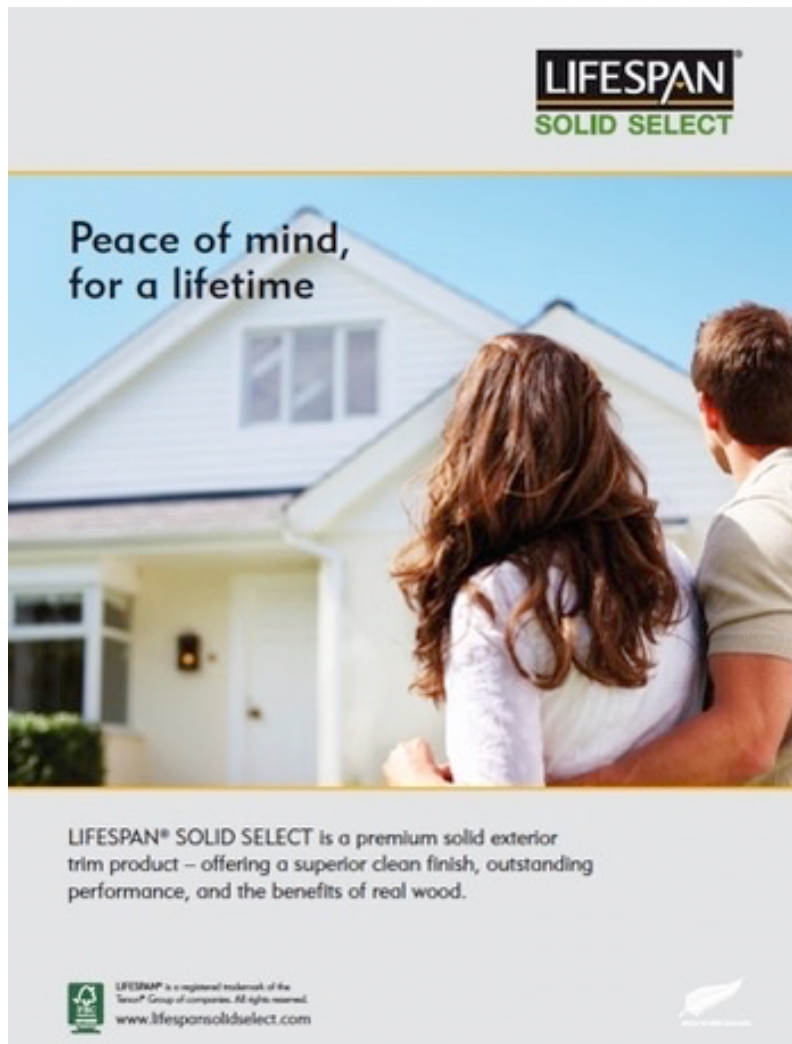
Typical 4/2, 40 Howard St, Portsmouth

**Green Mountain Window Company**

92 Park Street Rutland, Vermont



## Exhibit- 13 (Lifespan Solid Select)




**LIFESPAN<sup>®</sup>**  
**SOLID SELECT**

Peace of mind,  
for a lifetime

LIFESPAN<sup>®</sup> SOLID SELECT is a premium solid exterior trim product – offering a superior clean finish, outstanding performance, and the benefits of real wood.

 LIFESPAN<sup>®</sup> is a registered trademark of the  
Trex<sup>®</sup> Group of companies. All rights reserved.  
[www.lifespanselect.com](http://www.lifespanselect.com)



## Exhibit- 14 Green Mountain Co. information sheet



The advertisement features a green background with a yellow border. In the top left corner, there are red maple leaves. The main image shows a woman in a black t-shirt and safety glasses working on a window frame. To her left, there is an inset photo of a man in a black t-shirt with 'MADE IN VERMONT' on the back, working on a window. The text 'Tradition & Technology' is written in a cursive font. Below this, a paragraph describes the company's history and manufacturing process. At the bottom left is a logo of a window frame. To the right of the logo is the company name 'GREEN MOUNTAIN WINDOW & DOOR COMPANY'. On the far right, the company's address, phone, fax, and website are listed.

*Tradition  
&  
Technology*

Founded in 1993, the Green Mountain Window & Door™ Company integrates the latest technology with good old-fashioned Yankee craftsmanship. At our plant in Rutland, Vermont we tailor our product to your needs by controlling the entire manufacturing process. We manufacture our own high performance insulating glass. We apply primer and paint using the Cabot Factory Finish System in our paint department. And we hand assemble and sand each window in our production department. Additionally, we use SFI-certified pine and FSC-certified mahogany to help assure the longevity of our natural resources.

 GREEN MOUNTAIN  
WINDOW & DOOR  
COMPANY

92 Park Street  
Rutland, Vermont 05701  
Phone: 802.747.6915  
Fax: 802.747.7864  
[www.greenmountainwindow.com](http://www.greenmountainwindow.com)

Among other benefits, the proposed replacement of windows are intended to preserve the integrity of the District, maintain the special character of the District, complement and enhance the architectural and historic character, conserve and enhance property values, and are consistent with the special and defining character of surrounding properties, with compatibility of design with surrounding properties.

Respectfully submitted,

/s/ Kenneth C. Sullivan  
Owner, 40 Howard Street