

# Springbrook Hill Owners Association

## Secondary Heating Systems Policy

In mid-2017, the Association's Executive Board recently commissioned the Heating and Cooling Systems Review Committee. The mission of this group was to develop and recommend policies for Board to consider relating to these systems. The Committee focused on four topics:

- Second boilers for Garden units
- Replacement of the remaining old technology shared boilers.
- Replacement of failed air conditioning systems
- Secondary heating systems

### Role of secondary heating systems

Each Springbrook unit has hot water baseboard heat. The hot water is produced by a propane powered boiler which also provides domestic hot water. Several residents have inquired about supplementing the heat produced by this system with another source of heat. In making such requests unit owners are motivated by desires to have another source of heat to take advantage of differing fuel prices, to address the uneven distribution of heat within Units or to localize heat in a specific portion of the Unit while leaving other parts of the Unit cooler.

So long as the temperature in Units does not decline below 55°, the Board is open to Unit owners supplementing the existing heat source with others. (The 55° minimum is required to ensure pipes don't freeze and cause damage to adjacent units or Association property. Given the configuration of certain Units, the Property Manager may set a higher minimum because of extreme pipe freeze risks.)

### Criteria for secondary heat system acceptance

The Committee has evaluated 30 secondary heating options based on the following characteristics:

- Fuel type
- Fuel storage
- High temperature venting
- Exterior equipment
- Open flame
- Insurance risk

The Board has a duty to ensure any supplement or changes to current systems do not pose a safety, financial or aesthetic risk to the Association or other units. Based on this duty, the Committee has recommended and the Board has adopted the following policy with respect to supplemental heating options.

1. No approval required: Supplemental systems that are powered exclusively by household electrical current, are UL listed and do not require an external exhaust to operate can be used by Unit owners (and their lessees) without involvement of the Association or the Property Manager. See the attached spreadsheet for examples – this sheet is not exhaustive.
2. Property Manager Approval: Some Unit owners may choose to replace their air conditioning units with either portable units or various types of heat pumps. Some portable units and all heat pumps offer heating capability. Both do not present insurance risks to the Association. Though electrically powered, these units do require either a low temperature, external exhaust or exterior equipment to operate. The Board has decided these units are acceptable to the Association but has established parameters with respect to the location of the exhaust/exterior units – see the related Replace Air Conditioning document. The Board has delegated finalizing the location of the exterior elements of these systems to the Property Manager. See the attached spreadsheet for examples – this sheet is not exhaustive. External elements of systems other than heat pumps or portable units require Board approval.
3. Board Approval: Several options for secondary heat are complicated and require further study by the Association. The Board has made one policy decision with respect to this group of solutions – the Board will not approve roof mounted solar systems. Because installing roof mounted units and the associated connections require penetrations of the roof voids the roof warranty, the Board has decided such units are inappropriate for Springbrook Hill. Roof mounted units also negatively impacts the appearance of Springbrook’s buildings. See the attached spreadsheet for examples – this sheet is not exhaustive.
4. Unacceptable alternatives: In the interests of focusing Unit Owner attention of feasible options, the Board has determined certain alternatives are not acceptable to the Association. See the attached spreadsheet for examples – this sheet is not exhaustive. These rejected possibilities have most (or all) of the following characteristics:
  - a. Requires external storage of fuel
  - b. Requires a high-temperature external vent (chimney)
  - c. Requires an exterior component
  - d. Requires an open flame
  - e. Poses the risk of elevated insurance premiums for the Community.

**SECONDARY HEATING OPTIONS - updated Dec 3, 2107**

Type	Fuel	Storage	High Temp Vent	Exterior Portions	Open Flame	Insurance Risk	Notes
<b>Approval Not Required</b>							
Electric Baseboards	Electricity	none	No	No	No	No (UL Listed)	
Electric Space Heaters/Fireplaces	Electricity	none	No	No	No	No (UL Listed)	
Radiant systems - electric	Electricity	none	No	No	No	No	
<b>Property Manager Approval Required</b>							
Heat Pump - air to water	Electricity	none	No	Yes	No	No	
Heat Pump - ducted w/existing ductwork	Electricity	none	No	Yes	No	No	
Heat Pump - minisplit multi zone	Electricity	none	No	Yes	No	No	
Heat Pump - minisplit single zone	Electricity	none	No	Yes	No	No	
Portable Units	Electricity	none	No	Yes	No	No	
<b>Board Approval Required</b>							
Geothermal	Electricity	none	No	Yes	No	No	
Solar Heaters	Electricity	none	No	Yes	No	No	
Non-Roof Top Solar Panel (fuel source)	Electricity	none	No	Yes	No	No	
Radiant systems - gas	Propane	porch, outside, gas lines	Yes/No	Yes	Yes/No	Yes/No	
<b>Not Acceptable</b>							
Ethanol Heaters (non vented)	Ethanol	porch, garage, inside	No	No	No	Yes	
General Oil (Kerosene) Based systems	Kerosene	porch, garage	Yes	Yes	Yes	Yes	
Patio heaters - oil	Kerosene	porch, garage	Yes	Yes	Yes	Yes	
Toyo/Monitor/Direct Vent	Kerosene	porch, garage, outside	Yes	Yes	No	Yes	
Forced Hot Air - oil	Oil	porch, garage, outside	Yes	Yes	Yes/No	Yes	
General Oil Based systems	Oil	porch, garage, outside	Yes	Yes	Yes/No	Yes	
Radiant systems - oil	Oil	porch, garage, outside	Yes/No	Yes	Yes/No	Yes/No	
Fire pits/Fireplaces (exterior) - gas	Propane	porch, outside	Yes	Yes	Yes	Yes	
Fireplace - gas	Propane	porch, outside	Yes	Yes	Yes	Yes	
Forced Hot Air - gas	Propane	porch, outside	Yes	Yes	Yes/No	Yes	
Gas Appliances - vented	Propane	porch, outside	Yes	Yes	Yes/No	Yes	
Gas Appliances - non vented	Propane	porch, outside, gas lines	No	No	Yes	Yes	
General Gas based systems	Propane	porch, outside, gas lines	Yes	Yes	Yes/No	Yes	
Patio heaters - gas	Propane	porch, outside, gas lines	Yes	Yes	Yes	Yes	
Rinai/Monitor/Direct Vent	Propane	porch, outside, gas lines	Yes	Yes	Yes/No	Yes	
Fire pits/Fireplaces (exterior) - wood	Wood	porch, outside, garage, inside	Yes	Yes	Yes	Yes	
Fireplace - wood	Wood	porch, outside, garage, inside	Yes	Yes	Yes	Yes	
Wood/Pellet Stoves	Wood	porch, outside, garage, inside	Yes	Yes	Yes	Yes	