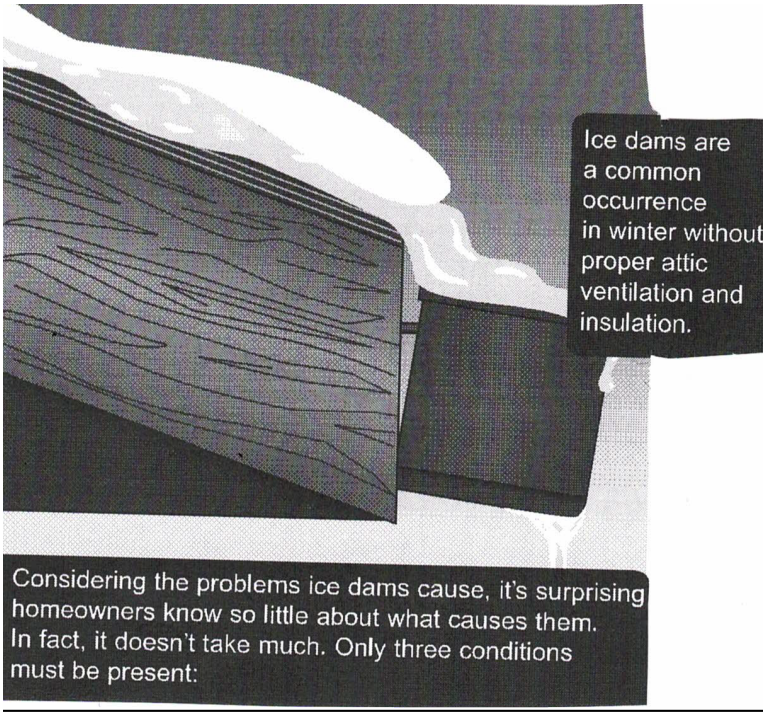
Ollie's Roofing Ltd.

WHAT CAUSES ICE DAMS



1. A heavy snowfall…enough to leave several inches of snow on your roof. The more snow left on a roof after a storm, the greater the chances an ice dam may form.

2. Continuously cold temperatures, heavy snow followed by several days of above freezing temperatures probably won't result in an ice dam. The air temperature must remain cold enough for water to freeze. When temperatures fall below freezing, conditions are especially favourable.

3. An under-ventilated and poorly insulated attic – factors that create what amounts to a 'hot and cold roof'. When those conditions are in place, here's what happens:

    - Heat escapes from the living quarters into the attic. The heat builds at the upper levels of the attic, eventually warming the roof deck. Once the deck is warm, snow on the roof

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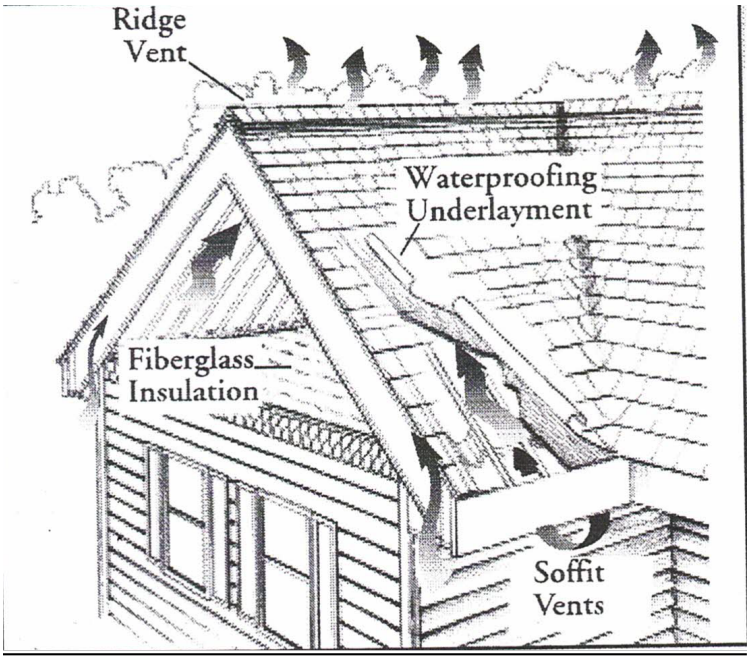
begins to melt. Obviously, if the sun breaks out following a snow storm, melting at the upper roof is accelerated.

- Water runs down the roof until it reaches the area over the eaves. Since this area of the roof remains cold, the runoff from the melting snow begins to freeze and the ice dam forms (along with a more easily seen symptom of the problem, icicles hanging from the gutters).

- As the dam builds, it begins to trap more snow melt, extending the height of the dam. The real problems begin when water begins to pool, backing up under the shingles. Once that happens, the damage can be extensive. In past winters, it's been reported that a homeowner had to drill holes in a kitchen ceiling to release water infiltrating from an ice dam. It was just one of countless similar incidents.

HOW TO ELIMINATE ICE DAMS IN TWO EASY STEPS



1. INSTALL ADEQUATE ATTIC VENTILATION – Because ice dams form when a roof has warm upper surfaces and cold lower surfaces, the solution is to equalize temperatures over the entire roof. Heating an entire roof is impractical (and extremely costly), so the most effective solution is to create a cold roof:

    - To do that, you need a well-designed attic ventilation system. It must supply air flow along the entire underside of the roof deck and it must have air intake vents evenly spaced along the eaves.

- The most efficient system uses ridge vents and an evenly distributed layout of soffit vents. Cold outside air is drawn into the soffit vents, then washed over the underside of the roof decking for the full length of the ridge. That's critical because this evenly distributed air flow minimizes variation in roof temperatures from peak to eave. As a result, snow melt is reduced which greatly reduces the possibility that ice dams can form.

2. INSTALL ADEQUATE ATTIC INSULATION – ATTIC INSULATION SERVES TWO PURPOSES

    - First, and most important, it minimizes heat loss from a home's living quarters. Since heat loss is a key factor contributing to the creation of ice dams, stopping it at its source is critical

    - Second, adequate attic insulation diminishes the energy impact of having cold air flowing through the attic.