

IAQ by Gord Cooke

IAQ and Energy Efficiency



Many HVAC contractors may recall that “air-to-air heat exchangers” or heat exchangers first residential applications were in the early days of the R-2000 and Super Good Sense Energy Program homes some 20-25 years ago. Very clearly these early mammoth HRVs were tied to the energy crunch of the late 1970s and the tighter, better insulated homes that were built in response to high energy costs. We have learned a lot since then. Things like tight construction is good for energy efficiency and enables better control over indoor air quality. As well in the meantime, the way our customers want to use their homes has changed, they don’t open windows as much, they stay inside more and their expectations for healthy indoor environments has increased. So since the last energy crisis, we have seen HRVs and ERVs being marketed as much for their air quality and lifestyle benefits as for their energy savings advantage.

Now we have arrived at a perfect opportunity, the cost of energy has never been higher, ventilation technology has never been better and more cost effective to install than ever and homeowners concerns for health continues to motivate significant purchases. Add to this there are government endorsed programs and incentives along with building industry green programs that are promoting energy efficient ventilation on our behalf. In the Natural Resources Canada ecoENERGY Retrofit program, there is even a \$300 grant available for people installing an HRV or ERV in an existing home. For more information on this program, please contact your local representative.

Let’s add one final incentive. Interest rates are near all time lows, so low that investments in energy efficiency provide higher rates of return than most other investments. A \$2000 HRV purchase would save, in all markets and in all climate zones in Canada and most of the US, approximately \$150 - \$300 per year in energy. That’s an ROI of 7.5% to 15% (without applying incentives). That’s a better investment then leaving \$2000 in the bank. HVAC contractors should use this same important investment equation for every energy efficient product you offer, but certainly use it to help your clients improve the health of their homes and fund it through energy savings.

Gord Cooke
Special Contributor