Ventilate TRIGHT

In theory, ventilating a dwelling should be as simple as opening the windows wide each day, but in real life, and particularly in rental properties, the situation is far more complicated, writes Louise Richardson.

IT'S THAT TIME OF YEAR AGAIN AND

a cold wind is rattling around outside. Inside Kiwi homes, as we ramp up heating to keep warm, windows may soon be covered with tiny drops of condensation.

Before long if the source of this moisture isn't taken care of, the warm air holds in the moisture, at which point clothes in wardrobes - and curtains and blinds, may become mildewed or mouldy. Additionally, as the spores hang in the air, tenants' health can become compromised.

Ironically, the problem can be worse in an airtight modern home, rather than in a draughty old bungalow or villa, because of cracks in windows and doors in older homes creating natural ventilation.

The good news is that a number of options are available for curbing – and even preventing dampness from taking hold in your rental. By doing so, you'll have happy, healthy tenants. Here's a broad summary of what's tried and true, and a look at what's new.

WET AND WINTRY

Inside the home, everyday activities that we take for granted in summer can become a problem when the weather is not so good.

Pots of boiling food on stoves without tight lids are a major source of condensation and short of imploring tenants to open windows and doors while preparing meals, the most straight-forward step to take here is installing a range hood or ceiling fan in the kitchen and ask them to use it.

Similarly, bathrooms can soon become wet and weepy but again, an extractor fan on an automatic timer can often alleviate the problem sufficiently;

anti-mould paint on the walls and ceilings is another good idea. A showerdome can be very effective too: stopping wet air meeting dry air.

Dehumidifiers have become significantly cheaper to buy - and relatively more efficient to run than before, but it's important to note that they can still cost around \$2.50 a day in terms of power, which soon adds up for tenants. They're good for occasional use, but it isn't wise to rely on tenants to use them in the place of ventilation.

DRY CLOTHES OUTSIDE

It's easy to say, but tenants should be

strongly discouraged from drying washing on racks inside

Yet, of course, this is hard to enforce. If your investment property doesn't already have a clothes line, install one now in the sunniest spot outside - preferably in a spot which gets a good breeze.

there may be at least some times when covered deck or veranda.

A POWERFUL EXTRACTOR FAN INSTALLED IN THE BATHROOM SET **ON AN AUTOMATIC TIMER** WHICH IS ACTIVATED WHEN THE BATHROOM LIGHT IS SWITCHED ON. **IS AN EFFECTIVE WAY OF ENSURING MOISTURE IS REMOVED.**

Even on the grimmest days of winter drying outside is possible - even if it's on a

Common causes of dampness

Each of us generates around 1 – 2 litres of moisture per day. There are many other causes of dampness in homes, too:

- Breathing
- Sweating.
- Cooking.
- Showering/bathing.
- Washing clothes.
- Clothes dryer (if it isn't vented to the outside).
- Unflued gas heater.
- Kitchen dishes.
- Indoor plants.

VENTILATION SYSTEMS

A number of ventilation products and systems are on the market, designed to take alleviating dampness to a whole new level.

have a clothesline, install one in a sunny

drying their clothes inside the house.

Balanced pressure or heat exchange products take the warm, damp air from inside the house using fans, then put it through a heat exchange fan system that's bringing dry air in from the outside. The house should be airtight for optimum performance.

Positive pressure systems work a bit differently, taking air from the roof cavity of the property with a fan to distribute dry, filtered air – through ducts – into rooms below.

It can be good in summer when the air is warm anyway, but in some parts of New Zealand it gets too cold in winter for this approach to work well and a heater might be necessary.

This system won't work well in a draughty home and because dirty air can be pumped back into a dwelling again and again, EECA recommends sourcing air supply from outside the house.

INNOVATION

Unovent's John Wadsworth is passionate about ventilation. So passionate, in fact, that the former automation control engineer invented his own ventilation moisture and reduction system and he continues to fine tune it, noting the many variables that can affect its success.

Basically, Unovent's a system with a number of individual ductless outlets, powered by a 12-



Hot Tip For Tenants

If tenants are disinclined to open windows in your rental – often citing an understandable fear of burglary, window locks can give them the confidence to do so. These locks are relatively easy to install and even on the shortest setting a surprising amount of air circulation will occur.

volt system, each with its own fan and a washable filter. They are connected together by light-weight cabling, pulling dry air from the roof cavity and mixing it with damp air from below by pressurising the room, which reduces moisture content.

It's considerably cheaper (Wadsworth estimates it's approximately 75% less), than most of the other systems on the market and can be installed in just a few hours by a competent DIY fan – or by a tradesperson. It's quiet, easy to maintain and inexpensive to run.

A nifty new addition to the product – the Unobrain – switches off the system in winter if the air in the cavity is too cold, in summer if it's too hot and at any time of year when the weather is wet for a significant length of time. Usually it will only be off for a few hours.

Auckland landlord Geoff Thompson installed Wadsworth's system into several rentals so far and is pleased with the results.

"I use other systems too and I firmly believe that ventilating a property brings long-term rewards," Thompson says.

"Modern lifestyles have contributed to this need. People lock up and leave in a hurry, or they do things like having mattresses on the floor. Realistically you just can't make them open windows. It's frustrating but it's true."

