

Ventilation options as part of retrofit



If you are renovating an old house – particularly one built before 1940 – and you have a suspended floor and solid brick build, you will need to include ventilation in the process.

Up until this point, the house has managed water vapour through constant air movement provided by a draughty building: fireplaces, suspended floors, leaky windows to name a few.

The Victorians and Edwardians dressed to manage the cold and the draughty house managed any vapour. Now, when we renovate, we close off those draughts and wonder why we have condensation and mould.

Ignore the lack of air movement and you'll have problems. Add in ventilation and all will be well.

Your options are:

Trickle vents – these are built into the window frames of many double or triple glazed units. They are small grills at the top of the window that allow air into the house. Depending on the size of your house and the level to which you have been able to remove draughts, these may be enough. Keep an eye on condensation levels - if the air is very still outside, there may not be enough movement to bring fresh air into the house. This can be accommodated by opening the windows.

Extractor fans – you can fit extractor fans to increase air flow. These will allow in fresh air and are generally fitted in bathrooms and kitchens where air flow is required. As they bring cold air into the house, it can be tempting to cover them over or close them off.

Single Room Heat Recovery ventilation units – these units work like an extractor fan, but have the added advantage that they retain the heat. All they need is an external wall.

Heat is exchanged from outgoing to incoming air in the pipe that sits in the wall. They can be individually set to specific humidity levels and manage the water vapour in the room without costing you heat. Very useful in retrofits of old houses. You can add in additional units if you don't have enough.

You can include filters that manage pollen, air pollutants and CO2.

Mechanical Ventilation Heat Recovery – this is a whole house system which provides the most effective humidity management. It also manages air quality, with specific filters for pollen, pollution and CO2.

The main unit sits in the loft with ducting that feeds each room in the house with fresh filtered air. They are heat recovery, exchanging heat from outgoing warm air to incoming cold air.

They are sometimes too large – in terms of ducting – to install into an old house. However this is changing as the tech improves, so always worth checking out as a first option.



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For more information about ventilation, check out this YouTube video.



