

Guide to damp, condensation, and mould

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Introduction

With the price of living increasing, we are all feeling the financial pressures, in particular the rising utility bills which have significantly grown this autumn/winter and worryingly are set to climb again in April 2023. With this daunting prospect, it is key that we all consider how we heat and ventilate our homes to ensure we save money but also manage our homes responsibly, to avoid any potential issues in the future. I have prepared some advice and tips below on potential defects which can cause damp but also how to heat and ventilate your home to avoid condensation problems to maintain healthy living conditions.

First, I will explain the different ways your home can develop a damp and condensation issues and then how we can manage these issues and conditions to prevent these problems occurring.

The three main types of damp and their causes:

1. Damp from the ground or below the house

This is normally a result of inadequate or defective ground drainage, defective damp proof courses (DPC), high ground levels above the DPC, blocked air bricks/vents to suspended ground floors (concrete and timber), blocked drains due to defective/broken pipes, gullies being filled with leaves and debris or misuse of drains etc. The result can enable water ingress into your home through the floor or the walls.

2. Penetrating damp

This is either water getting in from:

- i. The outside through windblown driven rain, damaged external envelope (brick, stone, render), failing window seals, broken slipped roof tiles, leaking gutters, blocked down pipes etc.
- ii. Internal leaks from leaking pipes, radiators, badly sealed baths or showers etc.

3. Condensation

This is often considered 'damp' but is very different, even though it can still result in mould developing on internal surfaces. Condensation is not a result of a structural or material failing but occurs when warm air collides with cold surfaces and condenses, turning the moisture which is naturally contained in the air from a gas into a liquid i.e., water. Condensation often forms on external walls and junctions to ceilings, on window and door reveals, stone mullions, on single glazed windows or in kitchen and bathrooms where the humidity is high. Condensation often increases during autumn and winter when external temperatures are lower, and houses become shut up with fewer windows and doors being opened resulting in reduced air changes. The cold external temperature also increases the number of cold surfaces which condensation will form. It is therefore important to keep a balance in your home of adequate heating and ventilation.

Good practice and advice

Below is some useful advice relating to the two forms of damp highlighted in the introduction and how to manage condensation within your home.

Damp

As 'custodians' you have a responsibility to take care of your home and to return the property back to the GDBF in a good condition for the enjoyment of future clergy families. Under the 'Repair of Benefice Buildings Measure 1972', it states occupants have a responsibility to 'take proper care' of the house and garden to use them in 'tenant-like manner' which includes such items as cleaning gutters and gullies, maintaining gardens etc.

As a Property Team we strive to provide the highest quality housing services for all occupants within the bounds of our resources and budgets. To help us achieve this, we ask all occupants report maintenance issues as early as possible. This is crucial when looking at damp issues as the cause often relates to a structural or material failing. When you identify defects please report them to the Property Team immediately on repairs@glosdioc.org.uk and the team will be able to make a judgement on how urgent the repair works are and arrange the required repairs. We do not want you to struggle on with maintenance issues no matter how small, as these small problems can soon escalate, which can become more costly and disruptive to you and your family.

As well as reporting repairs, there is also an expectation that occupants undertake everyday duties to ensure your homes do not develop unnecessary faults. Below lists some items all occupants are expected to upkeep and maintain regularly.

- 1. Keep ground levels, flower beds etc. against the house 150mm below damp proof course and keep air bricks clear.
- 2. Minimise vegetation growth by and on buildings. Plants, trees, bushes, and climbers can cause the following damage:
 - a. Roots penetrate drains causing blockages and leaks.
 - b. Roots can damage foundations which can result in structural issues and water ingress.
 - c. Plants can damage bricks, render and stone and mortar by growing into walls. They can also prevent walls from drying which can freeze in cold conditions, delaminating surfaces making them porous.
 - d. Plants grow into roof voids, lifting tiles allowing water ingress.
 - e. Vegetation can block gutters and downpipes leading to water ingress.
- 3. Always keep gullies for downpipes clear. This maybe a case of checking weekly in the autumn and winter months. It does only take a few seconds to clear each gully.
- 4. Dispose of food, fat, cooking oil, cafetiere or filter coffee deposits, paint etc. responsibly. Do not put down sinks or gullies as it will lead to blockages.
- 5. Clear gullies in drives, patios etc including and aco (channel drains) a couple of times a year.

- 6. Do not build structures against the houses e.g. sheds, log stores, coal bunkers, canopies etc. as rain can penetrate the walls of the property where the structure meets the house.
- 7. Inspect roof tiles visually from the ground after extreme weather e.g. high winds, snow etc. to check for loose or broken tiles or damaged guttering and downpipes.
- 8. Examine all grout and sealant to bathrooms, kitchen, utility and cloakroom wall and floor tiles including junctions with worktops and suites to check they are complete and watertight.

Condensation

As previously explained, condensation is a result of the moisture in the air meeting a cold surface and changing into water. Air contains water vapour in varying quantities; its capacity to do so is related to its temperature e.g., warm air holds more moisture than cold air. When moist air comes into contact with either colder air or a colder surface, the air is unable to retain the same amount of moisture and the water is released to form condensation.

Moisture in the air comes from a number of sources. For example, in a five person household there is about 10kg or 10 litres of water put into the air every day (that's without taking into account any heating). This includes:

- breathing (asleep), 0.3 kg
- breathing (awake), 0.85 kg
- cooking, 3 kg
- personal washing, 1 kg
- washing and drying clothes, 5.5 kg.

What can be done to reduce condensation?

There are a number of measures occupants can take to minimise condensation. They are as follows:

- 1. Ensure your heating is working and maintain a temperature between 15 17 degrees Celsius. Report any issues to the Property Team if controls or radiators are not working.
- 2. Ensure you are using the extractor fans provided. Do not isolate fans. Extractor fans should overrun by 15 minutes in bathrooms after the light is turned off to ventilate the room properly. Clean extractor fans with duster and vacuum cleaner regularly to ensure they work efficiently.
- 3. Use cooker extractor fans. Cooker extractors will require cleaning and filters changing in accordance with manufacturer's recommendations.
- 4. Put lids on saucepans to reduce steam in kitchens.
- 5. Open windows each day to help ventilate, not wide open so the house is cold, but a few inches to help ventilate and remove moisture. Bedroom windows should be opened for approx. 1 hour once you get up, as sleeping creates a lot of moisture which needs to be removed. Bathroom windows should also be opened after baths and showers.

- 6. Use trickle vents on windows if you have them as this helps maintain a subtle air change reducing the moisture in the air.
- 7. Dry clothes outdoors when possible. Use clothes airers in well-ventilated rooms. Do not dry clothes and towels on radiators or unventilated rooms. Tumble driers maybe used but must be ventilated in accordance with manufacturers recommendations.
- 8. Always wipe down surfaces when moisture settles to prevent mould forming.
- 9. Wipe windows down each morning internally including double glazed windows if condensation forms. Single glazed windows will need doing daily during autumn and winter months.
- 10. Allow air to circulate around furniture and cupboards. Keep furniture and boxes etc 3-4 inches away from walls particularly external walls. Try to minimise clutter in rooms especially near cold surfaces e.g., external walls.
- 11. Do not store belongings on top of wardrobes so they touch walls and ceilings. Items stored in bags will encourage mould to form on these surfaces.
- 12. Do not overfill wardrobes or airing cupboards so air cannot circulate. This can be an issue with built-in wardrobes on external walls.
- 13. Do not block air vents to walls, chimneys etc. as these are required to allow air changes which prevents condensation forming but is also required for appliances e.g., boilers, open fires and wood burners. Blocking vents could be dangerous.
- 14. Do not use bottled gas or paraffin heaters which produce lots of moisture.
- 15. Treat any mould already in your home immediately and reduce condensation to restrict new mould growth.
- 16. Wipe off mould growth immediately with a fungicidal wash as it kills and prevents the re-growth of mould, algae, fungi. This must be used in accordance with the manufacturer's instructions. If the surface requires decorating, ensure the surface is clean and decorate using an anti-mould or anti-condensation paint in accordance with manufacturer's recommendations.

NOTE: Dulux Odourless Anti-mould 5in1 matt paint comes in 141 different colours. It is anti-mould and alkali resistant; moisture and waterproof; washability and covers hair-line cracks, which provides all-round protection for interior walls.

Can I please ask that you apply this advice to ensure you maintain good living conditions in your home. Remember, mould is a generally a result of a material defect/repair or in many cases how the home is heated, ventilated and used.

For a comprehensive guide on Condensation and Mould Growth visit our website or go to the link below.

www.gatewayplc.co.uk/downloads/Condensation_and_Mould_Growth.pdf

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