



Repair and Maintenance of Heritage Buildings Fact Sheet

This fact sheet provides owners and carers of heritage places with information on conservation issues from the content of the Workshop - Repair and Maintenance of Heritage Buildings organized by the City of Vincent in 2012/13, which is supported through the funding from the Australian Government's Your Community Heritage Program.

Disasters in building conservation tells you ten common mistakes in repairing and caring for old buildings that can cause more problems.

Disasters in building conservation — ten things not to do!

1. Don't sandblast masonry/timber

Sandblasting will remove the outer surfaces of bricks, stones and timber surfaces that may be critical to their durability. There are forms of gritblasting or air-abrasive blasting that are acceptable for use on old walls which generally use very low pressures. Unless it is falling off in sheets, paint should generally be removed by chemical stripping.

2. Don't replace timber floor with poured-on-fill concrete

The concrete and its associated damp-proof membrane prevent evaporation, and the soil moisture rising beneath the building becomes focused on the walls. Rising damp problems are almost guaranteed. External concrete paving against old walls will compound the problem.

3. Don't install a damp-proof course without also taking the salt out

Rising damp carries soluble salts up into walls. Successful treatment of rising damp (salt damp) requires dealing with the salt and the damp. Sacrificial mortars and plasters are used to manage salt attack and to prevent it damaging adjacent masonry. Salts can be extracted by captive-head washing and absorbent poultices.

4. Don't repoint lime mortar joints with cement

Mortars should always be weaker than the surrounding bricks or stones, so that any structural cracking occurs through the joints, rather than the masonry units. Lime mortars should always be repaired with lime, rather than with cement which is too strong and too impermeable.

5. Don't seal walls with water repellents or modern impervious paints

Masonry walls 'breathe' as the air in their pores expands and contracts with changes in temperature. Attempts to 'seal' or 'protect' walls with water repellent coatings or modern impervious paints risk trapping moisture behind the coatings, which may lead to damage to the masonry.

6. Don't mulch walls and block underfloor ventilation

Keep garden beds and plantings a minimum of 300 mm from walls and unblock air vents which are designed to allow ventilation so that the humidity of the underfloor spaces is kept reasonably low.

7. Don't mix dissimilar metals on the roof drainage system

Mixing metals on a roof risks causing galvanic corrosion, even though the metals may not be in direct contact. For example, if a copper roof has galvanised (i.e. zinc-coated) steel gutters, water flowing over the more noble copper will lead to rapid corrosion of the zinc coating and then the steel of the gutters. Roofs and their drainage systems should preferably be made of a single metal type throughout.

8. Don't coat valuable timber floors with polyurethane

Valuable old timber floors should never be coated with hard modern finishes like polyurethanes. Instead, where bare boards are not acceptable, alternative finishes should be considered. These might include oils such as tung oil.



9. Don't remove complete elements just because they're a bit damaged

Where they should be fixed, repair only the section that is damaged. For example, for an area of failed plaster on a wall, don't replace the plaster from the whole wall. Patch repair only the area that really needs it. If done well, the new patch will help stabilise the rest of the plaster.

Local Case Studies

Heritage Consultant David Young has visited some heritage listed houses along Ruth Street in Perth and advised that some damp problems can be solved by simple housekeeping, such as removing the concrete floor from the light well as concrete prevents evaporation. And others may not be rising damp issues, but simply falling damp associated with roof drainage and window detailing.

10. Don't forget routine maintenance of roofs, gutters and drains

Regular inspections should be made of roofs, flashings, gutters, downpipes and drains. Get inside the roof space to check for leaks after heavy rains.

**The above information is provided by Heritage Consultant David Young.*



Further reading

Young, David, 2008. Salt attack and rising damp: a guide to salt damp in historic and older buildings. Heritage Council of NSW, South Australian Department for Environment and Heritage, Adelaide City Council, Heritage Victoria, Melbourne. (available online).

English Heritage. 2012. Practical building conservation. Ashgate Publishing, Farnham, UK.

NSW Heritage Office. 1998. The Maintenance of heritage assets: a practical guide. 2nd edn, NSW Heritage Office.

Weaver, M.E. with Matero F.M. 1997. Conserving buildings: a manual of techniques and materials. Rev.edn, Wiley, New York.

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