

FastFacts

About Basic Building Inspection

by Judith L. Kitchen

This is a procedure most owners can follow to inspect a property on a periodic basis. This inspection is different from the professional inspection of a building prior to purchase—it is the (at least) twice-yearly check of building systems and materials to identify any problems which need to be corrected, investigated further or assessed by a professional. Too often buildings are inspected only after there is an obvious problem—water damage to a plaster ceiling, for example.

You will want to inspect the building at different times of the year, during hot and cold months, and at times of low and high humidity. It is very important to check the roof and water drainage conditions during a hard rainstorm to see if the gutters and downspouts are properly sized and placed and working well. It is also important to observe the building and its features from different locations and angles.

First, develop a file of inspection materials. This includes results of previous inspections along with floor plan, roof and rough elevation sketches, in order to mark possible problem areas to check more frequently, and photographs. Don't rely on memory—mark any exterior problems on a drawing to check inside the building, and vice-versa. Gather your basic inspection equipment, including paper, pencil with eraser, binoculars, flashlight, measuring tape, knife, stepladder and camera. Probe wood, both structural and decorative, by using the knife. Sound wood will produce long splinters, while deteriorated wood will break off in short pieces across the grain. The camera will be used to record possible problems such as cracks and gaps in siding, masonry or plaster. Another photograph taken several months later will reveal whether the gap or crack is larger.

While you might note suspected structural, electrical or mechanical systems (heating, ventilating, air conditioning and plumbing) problems, these areas will normally require inspection and assessment by

a professional. Before starting, prepare a checklist of areas to investigate, and proceed in that order. It is recommended that all general inspections begin with the roof, because that is the place the rain and snow first hit the building.

EXTERIOR INSPECTION

Roof

Here you will need the binoculars, or if neighboring buildings are taller, you may be able to see your roof from their windows. Check for mold or moss and for discolored, missing, curled or out-of-position roofing. Check all flashing, particularly around chimneys and vents. Check the masonry at chimneys, particularly at the cap. Are valleys filled with debris? Note any problem areas on the roof sketch.

Drainage System

Check thoroughly to see whether the gutters handle the hard rain well. Do they slope to the downspouts properly? Does the water run freely, or are there clogs or leaks? Look for icicles or ice and snow buildup.

Exterior Walls

Check all surfaces for deterioration, cracks, bulges, damaged masonry, dampness, efflorescence (white powdery deposits), stains, vines and their residue, missing mortar, loose or deteriorated siding (perform the knife test), and paint failure, particularly under eaves, at downspouts, around openings and at the foundation. Mark problem areas on the elevation sketches so that you will know where to check on the interior to see if damage is present. Note the presence of plugs in the siding that indicate blown-in insulation. If your building has more than one layer of siding, you may need to remove a piece of the upper layer to check the early siding underneath, particularly if there is evidence of damage, either on the exterior or interior. Check the condition of decorative trim. Check porches and other projections or decorative features for any evidence of deterioration.

Windows and Doors

Carefully check all places where dissimilar materials meet, such as at windows and doors, for proper caulk and seals. Note any gaps (hairline cracks or larger) wide enough to admit water. Look at each lintel, hoodmold, jamb, sill and sash, noting deteriorated wood, masonry or metal, broken glass, missing glazing compound, failed caulk, poor weatherstripping or failed paint. Note the condition of storm sash and storm doors.

Foundation

Look carefully at all visible sections of the foundation, making sure to check behind any trees, shrubs or other plantings. Pay special attention to the areas surrounding downspouts. Look for missing or loose sections of masonry or mortar, cracks and shifts. Does the foundation appear to be wet? Is there standing water next to the foundation during and after a hard rain? Check carefully all porch foundations.

Site

Check to see that the ground or sidewalks and driveways slope away from, and therefore direct water away from, the foundation. Note any low spots. Note whether shrubs or trees brush or block sunlight from the foundation, walls or roof. Note the locations of wells or cisterns that may be leaking.

INTERIOR INSPECTION

Attic

Look for water stains, dry or wet, in every area of the attic, finished or not. Note whether there is adequate ventilation. Check the condition of any insulation and whether or not there is a vapor barrier on the heated side. Again, use the knife test to check the soundness of any questionable wood.

Interior Walls, Ceilings and Floors

Push on the plaster at exterior walls if you suspect it may be loose or damaged (look first for paint or wallpaper damage). Look especially under and around windows and doors. Check carefully every area where an exterior problem was observed. Open and close every window and door. Check to see if floors are generally level.

Basement and Crawl Space

You may want to spend quite a bit of time here. Feel basement walls for dampness and look for mold on wood or masonry surfaces. Inspect all wood structural members carefully, using the knife test repeatedly, if necessary. Look for evidence of insect attack. Look for pipe and duct wraps and insulation that may contain asbestos. As in the attic, check for adequate ventilation. A musty odor in the basement or crawl space indicates a high moisture level.

Mechanical and Electrical Systems

Be certain that your heating, ventilation and air conditioning systems have been serviced on a regular basis, and that all filters have been located and changed as needed. This is especially important to ensure that the systems are operating efficiently. Change the batteries in your smoke detectors every year. Use a tester, inexpensive and available at hardware and home improvement centers, to determine whether electrical outlets are properly grounded.

Following completion of your inspection, take the appropriate steps—further investigation by yourself or by a qualified professional; immediate repairs; or a recheck in a few days, weeks or months. Eventually, you will conduct these spot inspections as a natural part of living and working in the building, every time you drive by the building, every time you mow or rake, every time you go to the attic or retrieve something from the basement.

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This information is adapted from the *Building Inspection Guide*, part of the *Old-Building Owner's Manual* by Judith L. Kitchen, published by the Ohio Historical Society, now the Ohio History Connection. Visit ohiohistorystore.com for details. Information on building maintenance is also available on the National Park Service website at cr.nps.gov/hps/tps/.

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