

How to Inspect Commercial / Industrial Buildings.

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According to Ed Witzke, you too can be a building inspector aka Basic Building Inspector 101

1. Document everything, including visual observations and verbal conversations.
2. Obtain all site plans and surveys; architectural, structural, mechanical, plumbing, electrical and fire protection drawings as built, specifications, guarantees, and warranties; all service manuals, log books, checklists.
3. Review all building management documentation.
4. Obtain a list of all engineers, designers, consultants, trades people involved in the building
5. Review all obtainable documentation at City Hall in regards to the building.
6. Be careful that you as an appraiser, inspector, auditor, evaluator and/or consultant doing the work won't get sued. (If in doubt, consult with someone that knows). In life you will never know everything. Don't rely on realtors to do you research.
7. Don't forget to make use of your senses. What do you hear, smell, feel and taste when you look at a building?
8. Never use inspectors recommended by realtors. Why? Do you really think that a realtor is going to select an inspector that will work in your best interest? There is a difference between a thorough inspection and a superficial one.

Ed Witzke's factors affecting the viability of any commercial/industrial building.

1. Location, zoning, weather and seasonal conditions
2. Demographic, geographic, economic and current market conditions.
3. Occupant use and type of use during the day/night.
4. Land value and resale value.
5. Replacement cost of building and equipment
6. Simplicity of operation of building, simple payback.
7. Salvage value of material available when building is replaced.
8. Age and remaining useful life of the building materials, components and equipment.
9. Cost of maintaining the building and equipment. Maintenance requirements and equipment reliability.
10. Financial aspects (eg. Interest rates on borrowed money)
11. Total operational costs of the building and equipment.
12. Inflation rates (eg. Labor, maintenance, replacement costs)
13. Energy consuming systems and the cost of energy (eg fuel, hydro, etc)
14. Building age, size, type, shape, configuration, orientation (to wind, sunlight, rain, snow, etc), design and color of the building.

Ed Witzke's list of common problems encountered with any commercial/industrial building.

1. Wear and tear of floors, ceilings and elevators caused by occupants/client traffic.
2. Worn-out components due to occupant use and/or metal fatigue.
3. Chemical reactions (internal and external) between building materials and the environment. Certain substances and/or metals simply don't get along with each other. Result: weakening and possible destruction of the materials.
4. Corrosion/rust and abrasion.
5. Sources of static electricity which could affect sensitive electronic equipment.
6. Contaminated, polluted air due to air leakage and faulty ventilation systems.
7. Premature degradation of materials and equipment due to numerous reasons.
8. Moisture, dampness, water leakage and seepage into the structure from both above and below ground levels. Drainage and soil problems.
9. Overheating and /or over cooling of areas.
10. Noise and vibration in interior and exterior areas.
11. Structural failure, settlement, cracking, shifting, movement, wind and seismic stresses.
12. Roof deterioration and leakage.
13. Plumbing leaks and domestic water contamination (hard and soft water), electrolysis, galvanic or chemical reaction of no-compatible or different metals and /or materials, fire-sprinkle pipe leaks.
14. Electrical inadequacies, shorts, overload.
15. Design loads of structure.

Ed Witzke's Two Dozen (plus change) items you want to find in any commercial/industrial building.

1. Made of quality/durable materials.
2. Structural performance. Vermin free.
3. Water exclusion from the ground, roof and plumbing pipes.
4. Interior has daylight, views, non-conflicting traffic patterns.
5. Natural ventilation through the windows. Mechanical ventilation through fans.
6. Thermal performance: cool in summer, warm in winter.
7. Access (eg. Doors, windows, fire escape, child safety).
8. Chemical free building materials.
9. Health, safety, security, privacy, fire-safe environment.
10. Noise exclusion: interior and exterior.
11. Appearance: design of interior and exterior.
12. Maintenance-free and low operational costs. Easy access to everything in the building.
13. Good site, soil and drainage conditions.
14. Wind/rain exclusion.
15. Efficient design allows for expansibility, flexibility
16. Physical comfort and well being
17. Waste disposal.
18. Compatible zoning regulations – few restrictions on buildings
19. Multiple use of spaces
20. Aesthetic and emotional values.
21. Intercommunication systems/clocks.

22. Warning systems.
23. Lots of storage.
24. Adequate lighting.
25. Plenty of hot water.
26. Energy efficiency of all building and mechanical components, including heating.
27. Good-quality roof and drainage, and perimeter drainage.
28. Earthquake resistant.
29. Good location and resale value.