

Typical Building Assessment Elements

The following list denotes typical assessed elements during a facility condition assessment.

Site Features

- Type/Material
- Age
- Approximate Quantity (Area/Length)
- Condition
- Previous Repairs

Structural Systems

- Foundation Type
- Foundation Wall Type
- Waterproofing Methods
- Grade Slab/Structural Slab Construction
- Roof Framing/Support System
- Condition
- Previous Repairs

Roof Systems

- Roof Type
- Age
- Surface Material
- Slope
- Warranty
- Leak History
- Roof Area
- Flashing Details
- Parapet Wall/Coping
- Drainage (Inc. # Drains)
- Gutters & Downspouts
- Condition
- Previous Repairs

Building Exterior Elements

- Exterior Wall Type
- Window Type
- Glazing Type
- Window Quantity/Area
- Window Sealants Type
- Leaks
- Condition
- Previous Repairs

Interior Finishes & Appliances

- Floor Finish Type
- Wall Finish Type
- Ceiling Finish Type
- Lighting Type
- Finish Surface Area (Quantities)
- Door Type (Inc. Hardware)
- Major Kitchen Appliances
- Major Components
(i.e. pools, spas, fountains, etc)
- Condition
- Previous Repairs

Fire and Life Safety

Means of Egress & Life Safety

- # Exits/Floor
- Exit Remoteness
- Exit Lights
- Emergency Lights
- Battery Back-up
- Stairs (Width, Doors & Fire Resistance)
- Fire Door Rating
- Signage
- Penetrations
- Maintenance of Egress Areas (Obstructions)

Emergency Power System

- System Type
- Emergency Power Generator
- Generator Load Bank Tests
- UPS System
- Age of Systems
- Condition
- Previous Repairs

Fire Alarm System

- System Type
- Annunciator Panel Manufacturer & Location
- Pull Station Location and Type
- Strobes/Bells Location and Type
- Fire Extinguishers Location and Type
- Age of Systems
- Previous Fire Alarm Test Results
- Condition
- Previous Repairs

Automatic Fire Suppression System

- Sprinkler System Type
- Sprinklered Locations
- Fire Pump Type and Suitability
- Age of System
- Condition
- Previous Repairs

Standpipe System

- Wet-pipe Standpipes
- Valves & Connections
- Street Level Connections
- Fire Pump Type and Suitability
- Age of Systems
- Condition
- Previous Repairs

Smoke Management Systems

- Type of System
- Smoke Detectors Type and Location
- Stairwell Pressurization Fans

Mechanical Systems

Common Elements (for all types of equipment):

- Manufacturer
- Model No
- Age of Systems
- Condition
- Previous Repairs

Heating Systems

- Heating Source (Steam/Hot Water/Direct Gas-Fired/Electric)
- Boiler Type (Fuel-Oil/Nat. Gas/Electric)
- Boiler Product (Steam/Hot Water)
- Boiler Capacity
- Boiler Type:
(Fire Tube/Water Tube/Cast Iron/Other)
- Boiler Feed Water System
- Water Treatment
- Condensate Return System
- Heat Exchangers

Heating Water Pumps

- Type
- Motor HP

Heating Water Piping

- Material (Black Steel/Copper)
- Insulation
- Risers (# of Risers & Size)

Cooling and Ventilation Systems

Condenser Water System

- Cooling Tower Type
- Nominal Capacity
- Equipment Served
- Piping Type
- Insulation
- Water Treatment

Pumps (Condenser & Chilled Water)

- Type
- Motor HP

Chilled Water System

- Chiller Type
- Nominal Capacity
- Refrigerant
- Expansion Tank
- Heat Exchanger

Chilled Water Piping

- Material (Black Steel/Copper)
- Insulation
- Risers (# of Risers & Size)

Air Handling Units

- Typical Capacity
- Motor HP
- Coils (Chilled Water/Heating Water/Steam/Other)
- Drain Pans
- Casing
- Outside Air (Central/Per AHU/Other)
- System Type (Constant Volume/VAV/FPMB/Multi-zone)
- Self-Contained/Split System
- Ducts (Metal/Other)
- Insulation

Heat Pumps

- Air/Water Cooled
- Capacities

Fan Coil & Induction Units

- Capacities
- Type (2-Pipe/4-Pipe/Other)
- Controls
- Drain Pans

Fans

- Capacities
- Motor HP

Exhausts

- Capacities
- Motor HP

Electrical Systems

Service Entrance

- Utility Company
- Transformer (Vault, Pad Mounted, Pole Mounted)
- Transformer ownership
- Service Characteristics (Voltage, Phase, Watts)
- Service Conductors (Busway, Underground Ducts, Aerial Drop, Copper, Aluminum, Concrete Encased, Other)
- Meter Ownership

Main Electrical Room

- NEC Clearances
- Fire Protection
- Storage/Piping in Room

Main Switchgear

- Bus & Mains Rating
- GFI Protection
- # of Distribution Sections
- # of Feeder Devices
- Feeder Breakers/Switches

Motor Control Center

- # of Sections
- # of Devices
- Bus Rating
- Type of Protective Devices (Circuit Breakers / MCP's/Fusible Switches)
- Type of Starters (Magnetic / VFD)

Distribution Panels

- Bus Ratings
- Feeder Devices (Breakers / Switches)
- # of Feeder Devices
- Types of Loads Served

Panelboards

- Overcurrent Devices (Circuit Breakers / Fusible Switches / Plug Fuses)
- # Devices
- Bus Rating

Transformers

- Type
- Ratings (Voltage, Phase, Watts)

Power Distribution

- Conduit
- Conductors (Copper / Aluminum)
- Insulation (Thermoplastic / Rubber / Cloth / Other)
- Busway (Feeder / Plug-In)

Emergency Power Systems

- Generator Type & Fuel Source (Diesel / Nat. Gas / Gasoline)
- Characteristics (Voltage, Rating)
- Tank Capacity

Security Systems

- Cameras
- Monitors
- Sequencers
- Recording Capabilities
- Electric Door Locks
- Card Readers/Keypads
- Internal Communications

Lighting Protection System

- Material (Copper / Aluminum)

Plumbing Systems

Domestic Cold Water

- Incoming Water Pipe Size & Material
- Insulation
- Booster Pumps
- Motor HP
- Controls
- Capacity
- Distribution Piping Material

Domestic Hot Water

- Water Heater (Central/Distributed)
- Fuel (Steam/Nat. Gas/Electric/Other)
- Style (Instantaneous/Remote Storage/Self-Storage)
- Heating Capacity
- Tank Capacity
- Circulating Pumps
- Motor HP
- Hot Water Piping Material

Storm Drainage

- Roof Drains
- Overflow Drains
- # of Risers
- Piping Material
- Sump Pumps
- Motor HP

Sanitary Drainage

- # of Risers:
- Piping Material
- Ejector Pumps
- Motor HP

Vertical & Horizontal Transportation

- Speed
- Capacity
- Type
- Manufacturer
- Age
- Machine Room Characteristics & Equipment
- Hoistway Characteristics & Equipment
- Car Characteristics & Equipment