Facilities Checklist

Determining the suitability of an existing or proposed building for your business needs is often the responsibility of the operations people. We have put together a tool to assist you in that effort by listing the factors you should consider and some of the information you may want to gather to help make the evaluation. This list can be used for evaluating existing buildings or planning new ones.

It is important that you develop a full understanding of your requirements prior to undertaking the evaluation of a proposed new facility, either an existing one or new construction. By reviewing this checklist early in the process, you can build a preliminary specification for the facility. The specification should include the building and site requirements, as described later. It should be as complete as possible so you can provide the financial and real estate specialists with justification for your request.

We have grouped the checklist into categories that should help you approach the evaluation in a logical sequence of steps. The list does not provide answers to many of the questions you will have, it is intended to be sure the questions are asked. We may not cover all of the possible factors you may need to consider, but this should serve as a starting point. Some of these items will require evaluation by engineers, architects or other professionals.

Basic requirements: *What are your needs?*

**Basic building requirements:**

- How much space do you need?
  - Square footage, or cubic footage (remember that this number will vary depending on clear height in the building. For storage, the ability to go from three high racks to four high cuts the square footage requirement by 33%)
    - High bay area for storage
    - Low bay area suitable for dock operations, staging, picking, value added services, office or other operating areas
  - Exterior space
    - Parking for employees
    - Truck maneuvering and trailer spotting areas
    - Trailer storage, if required
    - Exterior storage for products that do not have to be inside the building
  - What is the potential for expansion?
- What clear height works best?
- How many dock doors do you need
  - What size
  - Tailgate and ramp
  - Dock height requirements (Trailers vs. vans, vs. parcel trucks)
- How much space do you need for:
  - Assembly, production or value added services
  - Offices
  - Break and locker rooms
  - Rest rooms (often based on code requirements)
  - Returned goods processing
  - Show rooms
  - Drivers lounge
  - Maintenance, janitorial, machine shop, etc.
- Are there any special building requirements specific to your business?
  - Temperature or humidity control for product requirements, such as foods or pharmaceuticals
  - Above normal floor loads, Etc.

**Preliminary: Are drawings available?**

- Can you get drawings of the building and site?
- Are they available as CAD files & what do they run on?
Is the location zoned for your intended application? If not, can you get the necessary variances?

**Site access**
- Is there good access to the highway network?
- Is there rail access if you need it?
- Can the access road handle the trucks and loads you will require?
- Are there overpasses that will limit the height of trucks?
- Will your trucks have to go through residential areas? Day? Night?

**Site conditions**
- Are there wetlands on the site? If so, can the proposed use fit the site without disturbing the wetlands?
- Does the soil have the load bearing capacity required for the application? This can have a long-term effect on the quality of the floors or the paved areas if heavy trucks use the site.
- Is there enough on-site room for staging trailers and waiting trucks or for trucks to maneuver?
- Is the water table too high for the proposed use?
- Will local codes require retention (or fire water reserve) basins for run-off? Is there an appropriate location for a basin?
- Do local codes require buffer zones, and if so, how wide, and will you need landscaping or tree plantings, fences or walls on the buffers?
- Are there ecological or environmental conditions that could impact the desired development?
  - Hazmat issues from prior uses
  - Landfill or loose fill from clean dumping or fill
  - Are there underground storage tanks? If so, have they been tested or decommissioned?

**Zoning considerations:** Review the local codes to determine:
- Type of use permitted and whether the community will allow the variances required.
- Allowable coverage
- Setback requirements
- Parking requirements (office and warehouse space have differing requirements)
  - Enough space for employee parking and truck maneuvering?
  - Can trucks or trailers be left on-site after hours?
- Is screening required for compactors, generators or other equipment?
- Is there room for future expansion?

**Utilities:** It is important that you develop a list of the utilities you will require and an estimate of the amount of demand you will generate.
- Electric
  - Is there sufficient amperage available to the site?
    - At what amperage and voltage? Most industrial applications require 3-phase 440 (or 480) volt service for conveyors, battery chargers, etc. Some areas can only provide 220 Volt, 2-phase. This can be accommodated, but often at additional cost for the equipment.
    - Average requirements
    - Peak requirements, such as occur when starting a conveyor or sortation system
  - If not, what is the cost to get it to the site and how much is the utility company willing to undertake to support development?
  - Does the service area have a history of brownouts or power failures?
  - Do you have critical services (i.e. computer operations or refrigeration) that require a back-up generator? Remember, if the lights go out, it’s not important that a conveyor system continues operating, but a freezer must be kept cold. In some cases, a generator is used to provide for peak power requirements.
Gas, or other heating source
- Are there adequate numbers of lines available for your needs? If you are planning a call center in the facility this is critical.
- Can you get T-1, DSL or other broadband service for access to intra-company and internet service that you might require

Phone service
- Are there adequate numbers of lines available for your needs? If you are planning a call center in the facility this is critical.
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Waste treatment
- Do you have any effluent that requires special treatment? Can the local authorities handle that effluent?
- Is there reasonable access to sanitary sewers? Can they handle the projected volume?
- If not, what facilities will you have to provide?
  - Waste water treatment?
  - Septic system?
  - Holding tanks?

Building Considerations
The questions listed below provide an outline of what to look for in a building. In the General section, the answers should be matched with the specifications you have developed. In the Building Condition section, the questions point to conditions that may require remediation. Expert advice from architects, engineers or other professionals may be required to determine the severity of any conditions and the possible cures. The effect on operations that might result from less than ideal conditions have to be evaluated, as well.

Providing more specific information about each of the conditions described cannot, unfortunately, fit into a short checklist such as this.

General
- What is the square footage?
  - Warehouse _____________________
  - Office _________________________
  - Processing areas _________________________
- What is the clear height?
- Are there any major obstructions limiting clear height? Can they be moved if required to meet your facility use plan?
  - Heaters
  - Sprinkler lines
  - Power distribution
  - Ceiling fans
- How many dock doors are there, and are they placed in a configuration you can use?
  - Are they equipped with:
    - Levelers
    - Truck restraints
    - Lights
    - Seals
  - Are they operable or do they need to be repaired, replaced or upgraded
  - What condition are the doors in?
  - Are the clear openings sufficient for the types of trucks you load and unload
  - Is there a drive in door (useful for small vans, delivery of equipment, etc.)
  - What is the condition of the paving outside the docks and is there a good “landing area” for parking trailers?
- Is there an area near the doors for:
  - Shipping/receiving clerical office
  - A drivers “lounge” to keep the drivers out of your warehouse
Are there any elevators in the building? If not, and if there are multiple floors in the building, you may need one to comply with ADA (Americans with Disabilities Act).
- When were they last inspected?
- Do they run smoothly and quietly?
- Is there a maintenance agreement for them?
- Is the capacity sufficient for your needs?

Building Condition

Walls
- Does daylight show through the walls at:
  - The roof/wall interface
  - Wall joints
  - Around openings (doors, windows etc.)
- Are there cracks in the wall that might indicate excessive settling
- If the walls are insulated, is the insulation intact?

Roof
- Are there puddles or water stains on the floor?
- Does the underside of the roof look rusted or show signs of leaks?
- When was the roof last maintained or replaced?
- What type of roof was installed and what guarantee period remains?
- Are there skylights, do they show signs of leakage, and can they be secured and alarmed?

Obstacles
- Are there overhead pipes, heaters, conduit, ducts or other hanging obstacles that will impact your use plan?
- Where are the sprinkler risers, power distribution panels, floor mounted heating/cooling equipment and are they in “bad locations? (Power panels usually require 3’ clearance for access.
- Are the obstacles protected against damage?

Floor
- Are there major cracks (large enough to insert a credit card)?
- Are the floor slabs even at the joints?
- Is there any sign of wear at the joints, indicating that there is a deteriorating condition?
- If you intend to use a very narrow aisle (VNA) rack configuration, have the floor flatness tested to see if it is compatible for use with VNA trucks.
- Does the surface show signs of dusting? (look for concrete dust, indicating that the surface is wearing)
- Has the floor been sealed or painted? If so, does it look like it needs to be redone prior to moving in?

Heating, Lighting, Plumbing

Heating, Ventilating, Air Conditioning
- Are there heating units in the warehouse?
  - Will the location(s) interfere with your operation?
  - How old are they and do they function properly?
  - Will they serve to provide conditions required for your operation?
- Are the offices air-conditioned? (This includes operational offices in the warehouse, such as receiving or supervisory)
  - Central or “window units”
  - If window units, do they vent outside, or into the warehouse? (Some building codes do not allow for venting other than outdoors and a new tenant may not be “grandfathered”)
  - Is there sufficient capacity for your anticipated needs, particularly if you are adding or reconfiguring offices?
Lighting
- What type of lighting is in place?
  - Fluorescent
  - Metal Halide (Blue-white light)
  - Sodium Vapor (Yellow light)
- Do all of the lights work?
- Are they wired with flexible connections so they can be easily relocated, within reason, or are they attached to conduit and boxes?
- Do they provide enough light for your type of operation or will you have to add more lights?

Plumbing
- Are there sufficient rest rooms for your requirements (this is often based on local building code but it’s often necessary to exceed the minimum for “morale” reasons), and are they in a good location? Is the ratio of male/female appropriate to your staffing?
- If you are considering relocation of plumbing, find out where the drain lines are. If they are not close to the building near the proposed location, it can be very expensive to run drains. Water supply lines are easier to run, if required.
- Do you require any process water in addition to sprinklers? Is there enough supply to the building? If there are any washing processes you require, can you tie into drains at the appropriate area?

Sprinkler Systems:
This topic requires its own section as it is very complex. You will need input from your insurance company and the local fire officials to properly evaluate your requirements. The issues listed below are a starting point. Once the local fire code official has agreed to your plans, get the terms of agreement in writing.
- What is the classification of the goods you will be storing and handling in the building?
- What sprinkler configurations are required based on the racking/stacking plan?
- Will the existing ceiling sprinklers be adequate? Are they ESFR (Early suppression, fast response) or conventional?
- If additional capacity is required, is there sufficient pressure and volume available to meet your needs?
- Will you require hose drops and is there provision for these in the existing system?
- Will you require a booster pump or water storage such as a pond or tank to meet your needs?