# Appendix C: Target Catalog

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| **Functions** | **Metric** | **Target** | **Description** |
| Support Air Ducts and Equipment | Weight | ?? | Equipment supports itself |
| Monitor Humidity | Relative Humidity | 1% | Measure relative humidity within 1% of its true value |
| Increase and Decrease Humidity | Relative Humidity | 0-95% RH | Relative humidity is desired to reach any value in this range |
| Monitor Temperature Change | Temperature | 1°C | Measure temperature within 1°C of its true value |
| Add and Remove Heat | Temperature | 10°C ≤ T ≤ 55°C | Temperature is desired to reach any value in this range |
| Regulate Air Circulation | Volumetric Flow Rate | 1 m3/min | Air handling unit should be capable of providing this flow rate |
| Monitor Hot and Cold Spots | Sensors | 3 sensors | Measure temperature from at least 3 places in the control volume |
| Maintain Structural Stability | Deformation | ~ 5% | Chamber should not move or deform |
| Provide Clearance for Overhead Crane | Area | OSHA requires only 2” of clearance on the side and 3” above. | There should be no obstructions in the way of the crane |
| Display Information | Display temperature and Humidity | Yes, they are always displayed during testing | Temperature and humidity will be always shown |
| Allow Access from All Sides | Number of accessible Sides | 4 sides | Allow access to the compressor from the front, back, left, and top sides |
| Enable Efficient Exchange of Compressors | Ease of compressor removal and installation | Yes, the compressors were exchanged successfully | Enable installation of other compressors |
| Provide Clear View of the Compressor | Visibility | 360° visibility | Compressor is fully visible from 360° during the entire testing process |
| Adjust Temperature and Humidity Automatically | Automatic adjustment | No human action required to reach the desired conditions | Desired temperature and humidity are reached automatically by the system |
|  | Time | 1 minute | Allow cancellation of the process for emergencies within a reasonable timeframe |
|  | Total Transmittance | 90% ± 10% | There should not be significant condensation on the walls of the chamber to lower the transmittance of the wall |
|  | Time | 15 minutes | Design can be assembled and disassembled within a reasonable time |