### 3.1 General

Certain terms, abbreviations, and acronyms are defined in this section for the purposes of this standard. These definitions are applicable to all sections of this standard. Terms that are not defined shall have their ordinarily accepted meanings within the context in which they are used. Ordinarily accepted meanings shall be based on American standard English language usage as documented in an unabridged dictionary accepted by the *adopting authority*.

#### Informative Note

Throughout the standard, words that have definitions in this section are italicized.

#### 3.2 Definitions

Α

above-grade wall: see wall.

access hatch: see door.

*addition:* an extension or increase in *floor* area or height of a *building* outside of the *existing building envelope*.

adopting authority: the agency or agent that adopts this standard.

air economizer: see economizer, air.

air system balancing: see balancing, air system.

*alteration:* a replacement or addition to a *building* or its *systems* and *equipment*; routine maintenance, *repair*, and *service*, or a change in the *building*'s use classification or category shall not constitute an *alteration*.

annual fuel utilization efficiency (AFUE): an efficiency descriptor of the ratio of annual output energy to annual input energy as developed in accordance with the requirements of U.S. Department of Energy (DOE) 10 CFR Part 430.

attic and other roofs: see roof.

authority having jurisdiction: the agency or agent responsible for enforcing this standard.

**automatic:** self-acting, operating by its own mechanism when actuated by some nonmanual influence, such as a change in current strength, pressure, temperature, or mechanical configuration.

automatic control device: a device capable of automatically turning loads off and on without manual intervention.

В

**balancing, air system:** adjusting airflow rates through air distribution system devices, such as fans and diffusers, by manually adjusting the position of dampers, splitter vanes, extractors, etc., or by using automatic control devices, such as constant-air-volume or variable-air-volume (VAV) boxes.

**balancing, hydronic system:** adjusting water flow rates through hydronic distribution system devices, such as pumps and coils, by manually adjusting the position valves or by using automatic control devices, such as automatic flow control valves.

**ballast:** a device used in conjunction with an electric-discharge *lamp* to cause the *lamp* to start and operate under the proper circuit conditions of voltage, current, wave form, electrode heat, etc.

**baseline building design:** a computer representation of a hypothetical design based on the proposed design. This representation is used as the basis for calculating the *baseline building performance* for rating above-standard design or when using the *performance rating method* as an alternative path for minimum standard compliance in accordance with Section 4.2.1.1.

**baseline building performance:** the annual *energy* cost for a *building* design intended for use as a baseline for rating above-standard design or when using the *performance rating method* as an alternative path for minimum standard compliance in accordance with Section 4.2.1.1.

below-grade wall: see wall.

**boiler:** a self-contained, low-pressure appliance for supplying steam or hot water.

**modulating boiler:** a boiler that is capable of more than a single firing rate in response to a varying temperature or heating load.

packaged boiler: a boiler that is shipped complete with heating equipment, mechanical draft equipment, and automatic controls, and that is usually shipped in one or more sections. A packaged boiler includes factory-built boilers manufactured as a unit or system, disassembled for shipment, and reassembled at the site.

**boiler system:** one or more *boilers* and their *piping* and *controls* that work together to supply steam or hot water to heat output devices remote from the *boiler*.

**branch circuit:** the circuit conductors between the final *overcurrent* device protecting the circuit and the outlets; the final wiring run to the load.

**bubble point:** the refrigerant liquid saturation temperature at a specified pressure.

**budget building design:** a computer representation of a hypothetical design based on the actual *proposed design*. This representation is used as the basis for calculating the *energy cost budget*.

**building:** any structure used or intended for supporting or sheltering any use or occupancy.

**building entrance:** any doorway, set of *doors*, revolving *door*, vestibule, or other form of portal that is ordinarily used to gain access to the *building* or to exit from the *building* by its users and occupants. This does not include *doors* solely used to directly enter mechanical, electrical, and other *building* utility *service equipment* rooms.

**building envelope:** the exterior plus the semiexterior portions of a *building*. For the purposes of determining *building envelope* requirements, the classifications are defined as follows:

*exterior building envelope:* the elements of a *building* that separate *conditioned spaces* from the exterior.

**semiexterior building envelope:** the elements of a *building* that separate *conditioned space* from *unconditioned space* or that enclose *semiheated spaces* through which thermal *energy* may be transferred to or from the exterior, to or from *unconditioned spaces*, or to or from *conditioned spaces*.

**building envelope trade-off schedules and loads:** the schedules and internal loads<sup>1</sup>, by *building* area type, to be used in the *building envelope* trade-off option simulations described in <u>Appendix C</u>.

**building exit:** any doorway, set of *doors*, or other form of portal that is ordinarily used only for emergency egress or convenience exit.

<sup>1.</sup> Schedules and internal loads by building area type are at http://sspc901.ashraepcs.org/content.html.

**building grounds lighting:** lighting provided through a *building*'s electrical *service* for parking lot, site, roadway, pedestrian pathway, loading dock, or security applications.

**building material:** any element of the *building envelope*, other than air films and insulation, through which heat flows and that is included in the component *U-factor* calculations.

**building official:** the officer or other designated *authority having jurisdiction* charged with the administration and enforcement of this standard, or a duly authorized representative.

С

*C-factor:* see thermal conductance.

*circuit breaker:* a device designed to open and close a circuit by *nonautomatic* means and to open the circuit automatically at a predetermined *overcurrent* without damage to itself when properly applied within its rating.

class of construction: for the building envelope, a subcategory of roof, above-grade wall, below-grade wall, floor, slab-on-grade floor, opaque door, vertical fenestration, or skylight. (See roof, wall, floor, slab-on-grade floor, door, and fenestration.)

code official: see building official.

coefficient of performance (COP<sub>C</sub>)—cooling: the ratio of the rate of heat removal to the rate of energy input, in consistent units, for a complete refrigerating system or some specific portion of that system under designated operating conditions.

coefficient of performance (COP<sub>H</sub>), heat pump—heating: the ratio of the rate of heat delivered to the rate of energy input, in consistent units, for a complete heat pump system, including the compressor and, if applicable, auxiliary heat, under designated operating conditions.

*computer room:* a room whose primary function is to house *equipment* for the processing and storage of electronic data and that has a design electronic data *equipment* power density exceeding 20 W/ft<sup>2</sup> of conditioned *floor* area.

**computer room energy:** annual *energy* use of the data center, including all *IT equipment energy*, plus *energy* that supports the IT *equipment* and *computer room space*, calculated in accordance with industry-accepted standards defined as Total Annual *Energy* (see Informative Appendix E).

condensing unit: a factory-made assembly of refrigeration components designed to compress and liquefy a specific refrigerant. It consists of one or more refrigerant compressors, refrigerant condensers (air-cooled, evaporatively cooled, and/or water-cooled), condenser fans and motors (where used), and factory-supplied accessories.

conditioned floor area, gross: see floor area, gross.

conditioned space: see space.

conductance: see thermal conductance.

*construction:* the fabrication and erection of a new *building* or any addition to or *alteration* of an *existing building*.

*construction documents:* drawings and specifications used to construct a *building*, *building* systems, or portions thereof.

*continuous air barrier:* the combination of interconnected materials, assemblies, and sealed joints and components of the *building envelope* that minimize air leakage into or out of the *building envelope*.

continuous daylight dimming: method of automatic lighting control using daylight photosensors, where the lights are dimmed continuously, or using at least four preset levels with at least a five-second fade between levels, where the control turns the lights off when sufficient daylight is available.

*continuous insulation (c.i.):* insulation that is uncompressed and continuous across all structural members without thermal bridges other than fasteners and *service* openings. It is installed on the interior or exterior or is integral to any *opaque* surface of the *building envelope*.

control: to regulate the operation of equipment.

control device: a specialized device used to regulate the operation of equipment.

*cooldown:* reduction of *space* temperature down to occupied *set point* after a period of shutdown or setup.

cooled space: see space, conditioned space.

cooling degree-day, base (CDD): see degree-day.

*cooling design temperature:* the outdoor dry-bulb temperature equal to the temperature that is exceeded by 1% of the number of hours during a typical weather year.

*cooling design wet-bulb temperature:* the mean coincident outdoor wet-bulb temperature utilized in conjunction with the cooling design dry-bulb temperature, often used for the sizing of cooling *systems*.

*critical circuit:* the hydronic circuit that determines the minimum differential pressure that the pump must produce to satisfy the zone loads (e.g., the circuit with the most-open valve). The *critical circuit* is the one with the highest pressure drop required to satisfy its load. At part-load conditions, the *critical circuit* can change based on zone loads.

D

## daylight area:

daylight area under roof monitors: the daylight area under roof monitors is the combined daylight area under each roof monitor within each space. The daylight area under each roof monitor is the product of

- a. the width of the *vertical fenestration* above the ceiling level plus, on each side, the smallest of
  - 1. 2 ft,
  - 2. the distance to any 5 ft or higher vertical obstruction, or
  - 3. the distance to the edge of any primary sidelighted area

and

- b. the smaller of the following horizontal distances inward from the bottom edge of the *vertical fenestration* (see Figure 3.2-1):
  - 1. The monitor sill height (MSH) (the vertical distance from the *floor* to the bottom edge of the monitor glazing).
  - 2. The distance to the nearest face of any *opaque* vertical obstruction, where any part of the obstruction is farther away than the difference between the height of the obstruction and the monitor sill height (MSH OH).

daylight area under skylights: the daylight area under skylights is the combined daylight area under each skylight within a space. The daylight area under each skylight is bounded by the opening beneath the skylight and horizontally in each direction (see Figure 3.2-2), the smaller of

- a. 70% of the ceiling height  $(0.7 \times CH)$  or
- b. the distance to the nearest face of any *opaque* vertical obstruction, where any part of the obstruction is farther away than 70% of the distance between the top of the obstruction and the ceiling  $(0.7 \times [CH OH])$ , where CH = the height of the ceiling at the lowest edge of the *skylight* and OH = the height to the top of the obstruction).

*primary sidelighted area:* the total *primary sidelighted area* is the combined *primary sidelighted area* within each *space*. Each *primary sidelighted area* is directly adjacent to *vertical fenestration* below the ceiling (see Figure 3.2-3).