

ARTICLE 3.07 OUTDOOR LIGHTING

Sec. 3.07.001 Definitions

For the purposes of this article, terms used shall be defined as follows:

Area lighting. Light fixtures located on public or private property that are designed to light spaces including but not limited to parks, parking lots, and sales lots.

Axis of illumination. The midline of the beam emitted by a light fixture.

Candela (cd). A unit of measurement of luminous intensity equal to one lumen of light emitted over one steradian of solid angle, and approximately equal to one candlepower.

Candlepower. The luminous intensity of a light source measured in candelas.

Correlated color temperature. The absolute temperature, in Kelvins (K), of a blackbody whose chromaticity most nearly resembles that of the light source. CCT characterizes the color content, or spectrum (“warmness” or “coolness”), of a light source. Lamps with a CCT of less than 3200 K are pinkish and considered “warm.” Lamps with a CCT greater than 4000 K are bluish–white and considered “cool.”

Existing light fixtures. Those outdoor light fixtures already installed on the date this article is effective.

Floodlight. A light fixture having a wide beam.

Full cutoff. A shielded light fixture that emits no light at or above horizontal (90 degree above nadir).

Footcandle. The illuminance produced on a surface one foot from a uniform point source of one candela and equal to one lumen per square foot.

Fully shielded. A lighting fixture constructed in such a manner that all light emitted by the fixture, either directly from the lamp or a diffusing element, or indirectly by reflection or refraction from any part of the luminaire, is projected below the horizontal plane passing through the lowest part of a fixture. A fully shielded fixture is not necessarily full cutoff.

Glare. Light produced by sources in the field-of-view that is brighter than the brightness to which the eyes are adapted, causing reduced visibility by lowering contrast.

IESNA. The Illuminating Engineering Society of North America, a recognized authority on lighting best practices and standards.

Illuminance. The density of luminous flux incident on a surface measured in lux or footcandles.

Initial lumens. The number of lumens of light emitted by a light source according to as-manufactured specifications and not accounting for any diminution of light due to age or maintenance condition.

Light fixture. The assembly that holds or contains a lamp or bulb. It includes elements designed to give light output control, such as a reflector (mirror) or refractor (lens), the ballast, housing, and the attachment parts.

Light pollution. Any adverse effect of artificial light. An example of light pollution is sky glow caused by scattered light from unshielded or poorly aimed light fixtures.

Light trespass. Unwanted light falling on public or private property from any location external to that property.

Lumen. A unit of luminous flux emitted within a unit solid angle by a point source with a uniform luminous intensity of one candela. For the purposes of this regulation, the lumen output values shall be the initial lumens of a lamp. The lumen rating associated with a given lamp is generally indicated on its packaging or may be obtained from the manufacturer.

Luminaire. A complete lighting unit consisting of a lamp or lamps together with the parts designed to distribute the light, to position and protect the lamps and to connect the lamps to the power supply.

Nadir. The direction indicated by a line connecting any point on the surface of the Earth and the center of the Earth.

Outdoor lighting. Nighttime illumination of an outside area or object by any manmade device that is located outdoors and produces light.

Private lighting. Outdoor light fixtures located on property owned or controlled by individual persons, including but not limited to families, partnerships, corporations, and other entities engaged in the conduct of business or other nongovernmental activities.

Public lighting. Outdoor light fixtures located on property owned, leased, or controlled by the city or other governmental entity or entities, including but not limited to streets, highways, alleys, easements, parking lots, parks, playing fields, schools, institutions of higher learning, and meeting places, and all entities completely or partly funded by grants obtained by the city or its agents from federal, state or private sources.

Sag-lens or drop-lens. Any clear or prismatic refracting lens that extends below the lowest opaque portion of a light fixture.

Searchlight. Any light fixture having a narrow beam intended to be seen in the sky by an observer on the ground. Spotlight means a light fixture having a narrow beam.

Spotlight. A strong beam of light that can be directed to illuminate a small area.

Temporary outdoor lighting. Lighting for a specific unique purpose of an outside area or object by any manmade device that produces light for a period of less than 5 consecutive days.

Trespass lighting. Light emitted by a luminaire which falls outside the boundaries of the property on which the luminaire is sited.

Uplighting. The most commonly used technique to illuminate structures or parts of structures, trees, walls, waterfalls, fountains, and other outdoor objects. Light fixtures are ground-mounted and directed upwards, away from the viewer to prevent glare. Normally these fixtures are easily adjustable.

Wallpack. A type of floodlight mounted on the wall of a building or other structure.

Yard address light. Property owners' association or architectural control committee approved yard light that has on it the house address number clearly displayed for emergency personnel.

Sec. 3.07.002 Existing light fixtures

(a) To reduce glare, safety hazards for drivers and pedestrians, light trespass, and light pollution, all existing spotlights, floodlights, and wallpacks shall be adjusted in accordance with the following provisions:

- (1) For spotlights and floodlights mounted overhead on poles and used for area lighting, the axis of illumination shall be adjusted to an angle not more than 20 degrees from the vertical line between the fixture and the ground.

(2) For spotlights and floodlights mounted at or near ground level and used to light a building, billboard, or other structure, the axis of illumination shall be adjusted to minimize the amount of light escaping above, below, and to the sides of the illuminated object.

(3) Wallpacks shall be adjusted where possible to minimize the amount of light emitted above the horizontal.

(b) It is not the intent of this section to require an additional investment in order to comply with these provisions.

(c) Existing light fixtures, other than spotlights, floodlights, and wallpacks, already installed at the time this article is enacted may continue in service without adjustment or modification through the remainder of their useful lives but thereafter must be brought into compliance with this article.



Sec. 3.07.003 General outdoor lighting restrictions

(a) This section applies to all new private lighting installed after the date of adoption of this article, including replacements for existing fixtures.

(b) Lighting at public and private outdoor sports facilities, including but not limited to playing fields, arenas, tracks, and swimming pools, shall be shielded such that no light-emitting part of fixtures is visible from any other property; shall provide levels of illuminance consistent with the IESNA “Recommended Practice for Sports and Recreational Area Lighting,” (IESNA RP-6-01) or current successor recommendations; and shall not exceed a correlated color temperature of 4000 K. Sports lighting shall furthermore cease upon conclusion of scheduled events or 11:00 p.m. (whichever occurs first) except by special conditional use permit issued by the city. Installations of such lighting shall make use of timers to ensure that light is extinguished by the curfew hour or conclusion of scheduled events and may not inadvertently be caused to continue operating thereafter.

(c) Strobe lights on communication towers and other hazards to aerial navigation, that are required by the Federal Aviation Administration (FAA) during daytime hours and are permitted but not required to be operational at night, may not be used at night. Other lights used at night on such structures shall not be brighter than the minimum required by the FAA.

(d) All other outdoor lighting fixtures using lamps or bulbs having outputs greater than 1,800 initial lumens must be full cutoff fixtures.

(e) Sag-lens or drop lens fixtures are prohibited.

(f) In the interest of conserving energy and protecting the environment, mercury vapor fixtures are prohibited.

(g) Each flag to be lighted shall be lighted by one spotlight not exceeding 1,800 lumens and a correlated color temperature of 3200 K.

(h) The aggregate total outdoor lighting on any property in residential zones shall not exceed 10,000 lumens per acre.

(i) The aggregate total of outdoor lighting on any property in commercial zones shall not exceed 25,000 lumens per acre, unless approved by the city development services department (see [section 3.07.007](#)).

 **Sec. 3.07.004 Residential outdoor lighting restrictions**

The following restrictions are applicable to all private lighting within residential areas within the city limits:

- (1) For residences in zones 3 and 4 the following shall apply:
 - (A) Residential structures must have one but no more than one decorative yard address light (see definition) no less than 5 feet from the edge of the road or more than 15 feet from the front property line. Such light shall be a minimum of 4 feet in height, but shall not exceed 6-1/2 feet in height and shall be controlled by a light sensitive switch and have frosted glass blocking direct view of any light source.
 - (B) Yard address lights may not contain lamps exceeding 1,800 initial lumens and a correlated color temperature of 3200 K.
- (2) Each yard address light and light sensitive switch for same shall be kept in good working order and maintained by the owner. All glass should be kept in good condition blocking direct view of any light source.
- (3) Any yard address light that was neither recommended by a property owners' association within the city limits of the city, nor approved by the architectural control committee prior to its installation is prohibited.
- (4) No exterior lighting on a lot, other than yard address lights and other similar yard lights approved by the architectural control committee, shall be directed outside the boundaries of such lot or produce a glare visible from outside the boundaries of such lot except as otherwise.
- (5) Garage bay lighting shall not exceed 1,800 initial lamp lumens per fixture and a correlated color temperature of 3200 K.
- (6) Mercury vapor lamps are prohibited.
- (7) Nonworking yard lights shall be reported to the city development services department who will notify the homeowner, and if not corrected within 10 days, the city will repair the fixture or replace the light bulb(s) and charge the homeowner \$50.00, plus the cost of any materials for this service.
- (8) Architectural or landscape uplighting is prohibited unless approved by the governing architectural control committee and city development services department (see [section 3.07.008\(a\)\(7\)](#)).
- (9) All exterior lighting, other than yard address lights described in subsection (1)(A) above, and other similar yard lights approved by the architectural control committee, shall be shielded so that no light source is visible from any neighboring property.

 **Sec. 3.07.005 Municipal outdoor lighting restrictions**

- (a) It shall be the policy of the city to not provide street lighting along public rights-of-way unless specific and dire public safety considerations indicate otherwise.
- (b) All streetlights shall be full cutoff fixtures using lamps with a correlated color temperature not exceeding 3200 K, or of approved historical design, utilizing illumination levels specified in the IESNA “American National Standard Practice for Roadway Lighting” (IESNA RP-08-00) or current successor recommendations.

 **Sec. 3.07.006 Levels of illuminance required or permitted at specific facilities**

- (a) Maximum, average, and/or minimum levels of illuminance for different facilities are listed below in horizontal footcandles. Unless otherwise specified, minimum levels shall be the lowest consistent with safety. Lighting requirements are as follows:
- (1) Parking lots and parking areas: average 2.0 fc; minimum 0.5 fc.
 - (2) Points of structure entry/exit: maximum 5.0 fc.
 - (3) Service stations and other fueling facilities: maximum 10.0 fc in the area surrounding pump islands; parking areas and entry areas shall be lighted as required above; drop lens fixtures are prohibited, whether mounted under canopies or on poles. Canopy lighting shall be installed so as to be recessed into the canopy. Neither canopy nor overhead lighting shall trespass onto any other property.
 - (4) Sales lots where merchandise, including automobiles, are displayed at night: maximum 20.0 fc. Area lighting used to illuminate sales lots may not trespass onto any other property.
- (b) For locations and facilities not specified herein, the development services department shall set acceptable levels of illuminance upon request based on guidelines established by IESNA.
- (c) The use of searchlights and spotlights is prohibited for advertising, attracting attention to any event, and for any other use except for emergency purposes.

 **Sec. 3.07.007 Large outdoor lighting projects**

- (a) An outdoor lighting project reasonably expected to utilize more than 25,000 lumens per acre in the aggregate shall file a lighting plan with the city development services department. A lighting plan shall be filed at the same time as any other plans required by the city and shall specify the following:
- (1) Number and type of light fixtures to be used;
 - (2) Their output in lumens; and
 - (3) Photometric data from the manufacturer(s) showing the spatial distribution of the output of the proposed fixtures.

(b) The city development services department shall review the lighting plan taking into account factors including but not limited to levels of luminance, glare, safety hazards, light trespass, and light pollution. The city development services department shall approve or reject the plan within 30 days of submission, returning it to the applicant with an explanation for the decision. The applicant shall not undertake the outdoor lighting project until the lighting plan is approved. The decision of the city development services department may be appealed to the city council.

 **Sec. 3.07.008 Exceptions; amendments**

(a) This article shall not apply to the following:

(1) Decorative holiday lighting from the Friday following Thanksgiving through January 8 of the following year, so long as:

(A) The decorative lighting is not excessive or unsightly. A determination that decorative lighting is excessive or unsightly may be made by the city development services department. This determination may not be appealed.

(2) Lighting required by local, state or federal law to be installed on surface vehicles and aircraft;

(3) Airport lighting required by law;

(4) Temporary emergency lighting;

(5) Temporary outdoor lighting;

(6) Governmental facilities where compelling needs for safety and security are demonstrated; and

(7) Lighting for walkways, flower bed borders, etc., provided that such lighting does not exceed 100 initial lumens per fixture and a correlated color temperature of 3200 K. Lighting for trees provided such lighting does not exceed 600 initial lumens per fixture and a correlated color temperature of 3200 K. All other uplighting provided such lighting does not exceed 400 initial lumens per fixture and a correlated color temperature of 3200 K. Limits in [section 3.07.003\(h\)–\(i\)](#) still apply.

(b) This article may be amended from time to time as local conditions change, and as changes occur in the recommendations of nationally recognized organizations such as the Illuminating Engineering Society of North America and the International Dark-Sky Association.

(c) Nothing in this article shall be construed as limiting the right of any person or entity to pursue legal action against any other person or entity under any applicable law, including the doctrine of light trespass as a form of private nuisance.

(d) The city council shall have the power to grant variances in the application of the provisions of this article and to hear and adjudicate appeals from architectural control committees and city development services department decisions.



Sec. 3.07.009 Enforcement

- (a) Enforcement. The city shall have the power to administer and enforce the provisions of this article as may be required by governing law. Any person violating any provision of this article is subject to suit for injunctive relief as well as prosecution for criminal violations. Any violation of this article is hereby declared to be a nuisance.
- (b) Criminal prosecution. Any person violating any provision of this article shall, upon conviction, be fined a sum not exceeding five hundred dollars (\$500.00), except as may be otherwise expressly provided by state law. Each day that a provision of this article is violated shall constitute a separate offense. An offense under this article is a misdemeanor.
- (c) Civil remedies. Nothing in this article shall be construed as preempting or waiving the rights of third parties from instituting any action for remedies against site operators or permittees. Nothing in this article shall be construed as a waiver of the city's right to bring a civil action to enforce the provisions of this article and to seek remedies as allowed by law, including, but not limited to the following:
- (1) Injunctive relief to prevent specific conduct that violates this article or to require specific conduct that is necessary for compliance with this article;
 - (2) A civil penalty up to one thousand dollars (\$1,000.00) for each day a violation occurs, when it is shown that the defendant was actually notified of the provisions of this article and after receiving notice committed acts in violation of this article or failed to take action necessary for compliance with this article; and
 - (3) Other available relief.

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