

**CITY OF CEDAR SPRINGS
CITY COUNCIL
Kent County, Michigan**

Councilmember _____ supported by Councilmember _____, moved the adoption of the following ordinance:

ORDINANCE NO. 210

AN ORDINANCE TO AMEND Chapter 40- ZONING OF THE CITY CODE OF ORDINANCES

THE CITY OF CEDAR SPRINGS ORDAINS:

Section 1. Amendment to Modify Chapter 40-Zoning. That the Code of Ordinances of the City of Cedar Springs is amended to delete Section 40-513(c)(3), delete Section 40-520(b), delete Sec. 40-576(c)(2), to repeal Ordinance 157 and also to add a new article XI-Lighting Sec. 40-630 to Sec. 40-634 to read in its entirety as follows:

Delete:

Sec. 40-513(c)(3) All illumination shall be deflected away from adjoining residential districts and no source of illumination shall be more than 20 feet above the parking lot surface.

Sec. 40-520(b) Off-street parking areas shall be adequately lit to ensure security and safety, and shall meet the following requirements: (1) Light fixtures shall be no higher than 20 feet and shall be provided with light cutoff fixtures that direct light downward. Lighting shall not be attached to buildings or other structures that permit light to be directed horizontally. (2) Lighting shall illuminate only the parking lot or other areas approved for illumination by the planning commission.

Sec. 40-576(c)(2) All lighting shall be deflected away from adjacent streets and residential property. The source of illumination in all parking lots abutting a residential district shall not exceed a height of 16 feet above the parking lot surface.

Repeal:

Ordinance 157 which was adopted by the Cedar Springs City Council on or about January 14th, 2010

Add:

Article XI- Lighting

Sec.40-630 Scope

It is the purpose and intent of this article to establish regulations and standards which will reduce light pollution generated by residential, commercial and industrial lighting fixtures and devices, minimize light pollution which has a detrimental effect on the environment and the enjoyment of the night sky, reduce and minimize lighting and lighting practices which cause unnecessary illumination of adjacent properties, correct problems of glare and light trespass, reduce vehicular accidents, reduce crime and reduce energy use by promoting energy-efficient and sustainable lighting practices and luminaries.

Definitions:

The definitions included in this ordinance may be supplemented by reviewing definitions and standards as promulgated by the Illuminating Engineering Society of North America

ADA-the Americans with Disabilities Act

Average maintained illumination levels- the average of a number of points of foot candle calculations or foot candle readings in a given area

Color rendering index (CRI)- is a quantitative measure of the ability of a light source to reveal the colors of various objects faithfully in comparison with an ideal or natural light source as determined by the international standard color rendering index

Color temperature- is a measurement of a light's color, measured on the Kelvin scale

Footcandle-is equal to one lumen per square foot or approximately 10.764 lux.

Full Cutoff/Full Shield-a luminaire that permits zero intensity at or above horizontal (90° above nadir) and limited to a value not exceeding 10% of lamp lumens at or above 80°

Glare: light emitting from a luminaire at an intensity great enough to reduce a viewer's ability to see, and in extreme cases, causing momentary blindness

IESNA: Illuminating Engineering Society of North America. An organization that recommends standards for the lighting industry.

Light Fixture/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.

Light Pollution- The inappropriate or excessive use of artificial light – known as light pollution – can have serious environmental consequences for humans, wildlife, and our climate. Components of light pollution include:

Glare – excessive brightness that causes visual discomfort

Skyglow – brightening of the night sky over inhabited areas

Light trespass – light falling where it is not intended or needed

Clutter – bright, confusing and excessive groupings of light sources

Light Trespass: light falling where it is not desired, e.g. beyond property boundaries, toward the sky, etc.; light spillover.

*Lumen-*a unit of luminous flux in the International System of Units, that is equal to the amount of light given out through a solid angle by a source of one candela intensity radiating equally in all directions

Lux- is a unit of illuminance and luminous emittance, measuring luminous flux per unit area. It is equal to one lumen per square meter

*Semi-Cutoff/Semi-Shielded-*a luminaire that permits an intensity at or above 90° (horizontal) of no more than 5% of lamp lumens and no more than 20% at or above 80°

Uniformity ratios- A description of the smoothness of the lighting pattern or the degree of intensity of light and dark areas in the roadway or area to be lighted. Uniformity is usually expressed as a ratio such as max to min or average to min the lower the ratio the more uniform the lighting design

Sec. 40-631 Applicability

The requirements in this Article shall apply to any light source that is visible from any property line, or beyond, for the site from which the light is emanating. The Zoning Administrator may review any building or site to determine compliance with the requirements under this Article. Whenever a person is required to obtain a zoning permit, sign permit, building permit, electrical permit for outdoor lighting or signage, a special land use approval, subdivision approval or site plan approval from the City, the applicant shall submit sufficient information to enable the Zoning Administrator and/or Planning Commission to determine whether the proposed or existing lighting will comply with this Article. Lighting already in existence at the passage of this ordinance shall be considered legal non-conforming and may not be improved upon, enlarged, modified, replaced, retrofitted or fixed other than regular maintenance without then conforming to the requirements of the this ordinance. Existing lighting which causes off site glare or is a nuisance as determined by the zoning administrator shall be re-aimed or retrofitted to bring it within compliance of this ordinance immediately. In the event the zoning administrator determines that a nonconforming lighting fixture results in light glare or nuisance the responsible party shall shield, filter, redirect or replace the light with a less intense light source, or remove the light to eliminate the light trespass. Corrective action shall be taken immediately after the zoning administrator's determination.

Sec. 40-632 Site Plan Submittal Requirements

Site Plan Submittal Requirements.

The following information must be included for all site plan submissions and where site plan approval is not required, some or all of the items may be required at the discretion of the Zoning Administrator prior to lighting installation:

(a) Location of all exterior freestanding, building-mounted and canopy light fixtures on the site plan.

(b) Photometric grid overlaid on the proposed site plan indicating the overall light intensity throughout the site (in footcandles or other mutually agreed upon measurement), information related to the uniformity ratio and information regarding the minimum and maximum proposed horizontal and vertical illuminance and property line light trespass. All light intensity measurements to be done at grade (or other mutually agreed upon location).

(c) If façade or architectural lighting is proposed, a photometric layout of the building elevations showing light intensity of the building shall be provided.

(c) Specifications and details for the type of fixture being proposed including the total lumen output, type of lamp and method of shielding, fixture height, light correlated color temperature and color rendering index.

(e) Any other information deemed necessary by the Zoning Administrator to determine compliance with provisions of this Article.

Sec. 40-632-Exterior Lighting

A. General

- 1) All exterior light fixtures and luminaires shall be fully shielded and directed downward to prevent off-site glare. Fixed (not adjustable,) downward directed, high-efficiency lighting shoebox fixtures or recessed canopy fixtures or luminaires shall be used in an effort to maintain a unified lighting standard throughout the City and prevent "light pollution."
- 2) Exterior lighting shall be installed in such a manner that the light source will be sufficiently obscured to prevent glare on public roads, and light trespass across property lines in commercial or residential areas.
- 3) The Planning Commission may approve decorative light fixtures as an alternative to shielded fixtures when it can be proven that there will be no off-site glare or light trespass and the proposed fixtures are necessary to preserve the intended character of the site.
- 4) The intensity of light within a site shall not exceed ten (10) footcandles within any site or one half (0.5) footcandle at any property line, except where it abuts a service drive or other public right-of-way. Lighting abutting a residential district or use can be a maximum of three-tenths (0.3) footcandles at the property line. The only exception is for gas station canopy and automobile dealership lighting, where a maximum of twenty (20) footcandles is permitted within the site but the above standards shall apply to intensity at the property line.

- 5) The use of laser light source or other similar high intensity light for outdoor advertisement or entertainment is prohibited except where specifically permitted by other City ordinance.
- 6) Lighting shall be of a high efficiency design but shall not use sodium vapors.
- 7) Lighting shall have a correlated color temperature of 3000K or higher and a minimum color rendering index of 70.
- 8) Except where used for security purposes, all outdoor lighting fixtures, existing or hereafter installed and maintained upon private property within non-residential zoning districts shall be turned off or down between 11:00 p.m. and sunrise, except where such business continues after 11:00 p.m. but only for so long as such business continues with employees or customers present. Photosensors or timers shall be utilized to maintain this standard.
- 9) Security lighting shall utilize motion or infrared sensor operation unless otherwise required by state or federal law.
- 10) Parking lots, building entrances and exterior entrance stairways shall maintain the following lighting standards:

Types of activities and uses	Fast food restaurants, Gas stations, convenience stores, cultural/institutional facilities	Community shopping centers, hospital parking areas, educational facilities banks, other services	Local merchants, industrial employee parking, multi-family parking lots
Average maintained illumination levels	2.0-3.0 Footcandles	1.0-2.0 Footcandles	0.5-1.0 Footcandles
Uniformity ratios	3:1 average/minimum (0.66 f.c. minimum) 12:1 maximum/minimum	3:1 average/minimum (0.33 f.c. minimum) 12:1 maximum/minimum	4:1 average/minimum (0.125 f.c. minimum) 15:1 maximum/minimum

- 11) ADA accessible parking spots must maintain a minimum of 3 foot-candles of lighting. All exit doors shall provide exterior emergency lighting.
- 12) External sign lighting and façade or architectural lighting shall utilize fully shielded fixtures and shall face downward towards the ground. The Planning

Commission may permit sideways or upward facing sign or façade or architectural lighting only upon a finding on the record that the proposed lighting shall be fully confined to the sign or façade and shall not project into the sky or cause off site glare.

- 13) Flag or flagpole lighting may utilize upward facing lighting but that lighting shall be fully shielded or recessed and not be brighter than 2100 lumens.
- 14) Lighting shall not be of a flashing, moving or intermittent type.
- 15) All exterior lighting shall be properly maintained and remain in good working order.
- 16) Commercial or industrial parking lots which face a single family residential home or homes shall provide year round screening between its parking lot area and the single family residential homes to prevent customer and employee headlights from shining at or into the single family residential home.

B. Free Standing Pole Lighting

- 1) The maximum height of parking lot fixtures on free standing poles shall be twenty (20) feet, except that the Planning Commission may permit a maximum height of thirty (30) feet within commercial, industrial and office zoning districts and for institutional uses in residential districts when the poles are no closer than one hundred fifty (150) feet to a residential district or use.
- 2) Parking lot poles shall be located in parking lot islands or in the periphery parking lot area. Light poles shall not be placed within or between parking spaces except within a parking lot island.
- 3) Electrical lines shall run underground and not overhead.

C. Building-Mounted and Window Lighting

- 1) Luminous tube and exposed bulb fluorescent lighting is prohibited as an architectural detail on all buildings, e.g. along the roof line and eaves, around windows. etc. The Planning Commission may approve internally illuminated architectural bands when it can be shown that the treatment will enhance the appearance of the building or is necessary for security purposes.
- 2) Any light fixtures visible through a window must be shielded to prevent glare at the property line.
- 3) The internal illumination of building-mounted canopies is prohibited.
- 4) External illumination of signs, canopies and buildings is permitted provided a maximum of no more than 2100 lumen producing light fixture is utilized and the lighting fixture is shielded to direct all light at the intended target and to avoid producing glare or skyglow

D. Special Lighting Standards

The following are exempt from the general lighting standards but are subject to the special requirements listed below.

1. Sports field and pool lighting under the following conditions:
 - a) Lighting must be turned off within 15 minutes of the end of the final game and may not be in use later than 10:00 p.m.
 - b) Lighting must be fully or semi-shielded and directed to minimize skyglow and light spill onto adjacent properties.
 - c) All efforts possible must be made to minimize any negative impacts to surrounding uses.
2. Holiday decorations.
 - a) Lighting may only be used on a temporary basis as determined by the zoning administrator.
 - b) All efforts possible are made to minimize any negative impacts to surrounding uses.
3. Window displays without glare that do not blind or distract pedestrians or traffic except that they may not be of a flashing, moving or intermittent type.
5. Shielded pedestrian walkway lighting.
6. Single family residential lighting with no off-site glare and less than 2100 lumens
7. Municipal lights used for municipal purposes.

SEC. 40-633.- ENFORCEMENT

Any person who violates this chapter shall be responsible for a municipal civil infraction. A violation of any of the provisions herein is hereby declared to be a public nuisance per se, and may be abated by order of any court of competent jurisdiction. A separate offense shall be deemed committed upon each day during or when a violation occurs or continues.

SEC. 40-634. - APPEALS.

If any person shall be aggrieved by the action of the zoning administrator with regard to a lighting permit or zoning permit involving lighting; that person may appeal such action in writing to the Planning Commission. The appeal must be filed within ten days after the date of such action. The Planning Commission shall consider the appeal at its next regular meeting at which time all parties in interest shall be afforded the opportunity to

be heard. The Planning Commission shall thereafter affirm or reverse the action of the zoning administrator, stating its findings and the reasons for its action and a written copy of such findings, reasons, and action shall be given to the appellant. Any person may alternatively seek a variance through the Zoning Board of Appeals.

Section 2. Severability and Repealer. If any portion of this Ordinance shall be held to be unlawful, the remaining portions shall remain in full force and effect. All ordinances and parts of Ordinances in conflict herewith are hereby repealed.

Section 3. Effective Date. This ordinance shall take effect upon its publication in The Cedar Springs Post, a newspaper of general circulation in the City of Cedar Springs, consistent with state law and the City Charter.

YEAS: Councilmembers: _____

NAYS: Councilmembers: _____

ABSENT: Councilmembers: _____

ABSTAIN: Councilmembers: _____

Ordinance No. 210 declared adopted

Dated _____, 2018

Rebecca Johnson, City Clerk

CERTIFICATION

I certify that this is a true and complete copy of a resolution adopted by the City Council of the City of Cedar Springs at a Regular Meeting held _____, 2018 and that public notice of the meeting was given pursuant to and in compliance with Act 267 of the Public Acts of Michigan of 1976, as amended.

Dated: _____, 2018

Rebecca Johnson, City Clerk