ORDINANCE NO. 2012-810

AN ORDINANCE, AMENDING ARTICLE XXXI, GENERAL PROVISIONS OF THE ZONING CODE OF UPPER MERION TOWNSHIP, AS AMENDED, BEING A PART OF CHAPTER 165 OF THE CODE OF THE TOWNSHIP OF UPPER MERION, AMENDING PROVISIONS REGULATING OUTDOOR LIGHTING.

The Board of Supervisors of the Township of Upper Merion hereby ordains:

Section 1. Section 165-215 & 216 of the Upper Merion Code shall be deleted in their entirety and replaced as follows:

OUTDOOR LIGHTING

A. Intent

- (1) To require and set standards for temporary and permanent outdoor lighting in places where public health, safety and welfare are potential concerns. The outdoor lighting ordinance shall protect drivers and pedestrians from the glare of non-vehicular light sources that shine into their eyes and thereby impair safe traverse, protect neighbors and the night sky from nuisance glare and stray light from poorly aimed, placed, applied, maintained or shielded light sources.
- (2) The enforcement of this section is intended to be primarily, but not solely, on a complaint basis.

B. Applicability.

- (1) The requirements herein apply to outdoor lighting for uses including the following: business, personal service, multi-family residential, commercial, industrial, public recreational and institutional, except subsections F and G which apply to all uses.
- (2) The Township may require lighting to be incorporated for other uses or locations, as deemed necessary.
- (3) The requirements contained herein apply to lighting in all above-mentioned uses as well as, but not limited to, sign, architectural, and landscape lighting.
- (4) The requirements herein do not apply to streetlights and traffic lights located in the public right-of-way and owned by Upper Merion Township.
- (5) Emergency lighting, as may be required by any public agency or utility company while engaged in the performance of their duties exempt from the requirements of this ordinance.

(6) Seasonal holiday lighting or illumination of the American and state flags shall be exempt from the requirements of this ordinance, providing that such lighting does not produce glare on roadways and neighboring residential properties.

C. Definitions.

- (1) Architectural Lighting A lighting arrangement primarily used to highlight a building, landscape feature, façade, or other feature, and is not used for pedestrian or vehicular traverse.
- (2) Footcandle- A unit of light intensity stated in lumens per square foot and measurable with an illuminance meter, a.k.a. footcandle or light meter.
- (3) IESNA-Illuminating Engineering Society of North America
- (4) IESNA Full Cut-Off- A lighting fixture standard whereby the fixture is shielded in such a manner that no light is emitted above a horizontal plane passing through the lowest point of the light emitting element, so that direct light emitted above the horizontal plane is eliminated.
- (5) Glare- The sensation produced by lighting that causes annoyance, discomfort or loss in visual performance and visibility to the eye.
- (6) Illuminance- The quantity of light measured in footcandles or lux.
- (7) Illumination Trespass- Light emitted by a luminaire or installation, which is cast beyond the boundaries of the property on which the lighting installation is sited.
- (8) Lumens- As used in the context of this Ordinance, the light-output rating of a lamp (light bulb) or light source.
- (9) Luminaires- a complete lighting unit.
- (10) Mounting height- The distance from the finished fade of the surface being illuminated to the optical center of the luminaire.
- (11) Outdoor Athletic Facility Lighting Fixture- A lighting fixture used to illuminate the air space and playing surface of a planned and engineered facility approved by the township in which organized athletic events are performed in an open air and outdoor field, court, rink, track, pool or other similar setting.

D. Plan Submission

(1) Lighting plans shall be submitted for review and approval of any installation of lighting in connection with a land development application for any use identified in subsection B of this section. Lighting Plans shall include the following:

- (a) A site plan, complete with all structures, parking spaces, building entrances, traffic areas (both vehicular and pedestrian), vegetation that might interfere with lighting, and adjacent use that might be adversely impacted by the lighting, containing a layout of all proposed fixtures by location and type.
- (b) Description of the proposed equipment shall be included, including fixture catalog cuts, photometrics, glare reduction devices, lamps, mounting heights.
- (c) When requested by appropriate officers or agents of the Township, applicant shall also submit a visual-impact plan that demonstrates appropriate steps have been taken to mitigate on-site and off-site glare, including but not limited to a plot plan with a matrix of the calculated footcandles with measurements ten (10) feet into the neighboring properties, including those on the opposite side of a public right-of-way or public roadway, at five (5) feet above ground.
- (2) Notification must be sent to the Township Planner before any post-approval alterations to lighting plans or intended substitutions for approved lighting equipment are made. Post-approval alterations or intended substitutions to the approved lighting plan must meet the requirements of the originally approved plan.

E. Design Standards

- 1. All lighting fixtures for off-street parking areas, off-street loading areas, driveways, and for safety of persons and property must meet IESNA Full Cutoff.
- 2. All fixtures for pedestrian areas and walkways must meet IESNA Full
- 3. Maximum height of light fixtures, including the mounting base, are as follows:
 - 1. Full-cutoff fixtures with 44,000 lumen lamps maximum, in parking lots: 20' AFG
 - 2. Full-cutoff fixtures with 115,000 lumen lamps maximum shall be permitted only in large (100 spaces or more) commercial, institutional and industrial parking lots except when the facility as adjacent to a residential district or use or an environmentally sensitive area: not less than 25' or more than 30' AFG.
 - 3. Mounting heights of 25' 30' shall not be permitted when located less than 100' from a residential district or use.
 - 4. Decorative, cutoff or fully shielded fixtures with 17,500 lumen lamps maximum, 16' AFG

- 5. Fully-shielded bollard fixtures with 6200 lumen lamps maximum, 42" AFG
- (b) Recreational Light fixtures shall comply with the standards and regulations set forth by subsection H of this section.

F. Performance Standards

- 1. All lighting shall be effectively shielded and shall be installed and/or aimed so as to shield nearby public or private properties from direct glare that may create a safety hazard.
- 2. Illumination trespass standards from one property to another shall be as follows:
 - a. In no case shall illumination exceed 0.5 footcandles, when measured, line of sight, at the property line of an aggrieved property of non-residential use;
 - b. In no case shall illumination exceed 0.3 footcandles, when measured, line of sight, at the property line of an aggrieved property of residential use, except between properties that share a lot line with no required setback, in which case shall not exceed 2 footcandles;
- 3. The use of floodlights and wall-mounted luminaries shall not be permitted to illuminate parking areas unless it can be proven to the satisfaction of the township the employment of no other means is possible.
- 4. Architectural Lighting, as defined by this ordinance, shall be aimed or directed so as to preclude light projection beyond the immediate object or objects intended to be illuminated. All such lighting shall be extinguished between the hours of 11 p.m. and 6 a.m.
- 5. Glare control shall be accomplished primarily through the proper selection and application of lighting equipment. Only after those means have been exhausted shall vegetation, fences, and similar screening methods be considered acceptable for reducing glare.
- 6. Under-canopy lighting for such applications as gas/service stations, hotel/theater marquees, fast-food/bank/drugstore drive-ups, shall be accomplished using flat-lens full-cutoff luminaries aimed straight down and shielded in such a manner that the lowest opaque edge of the luminaries shall be below the light source and its light-directing surfaces, at all lateral angles round the luminaries.

G. Enforcement and Compliance

- (1) The landowner is responsible if not compliant to the lighting plan approved by the Board of Supervisors. The Township may conduct a post-installation inspection to verify compliance of approved plan. After installation, the township, by way of an authorized enforcement officer, may require the landowner, at the landowner's expense, to make adjustments, remedial measures, or other means to comply with the approved lighting plan.
- (2) Notwithstanding the installation date or preexisting conditions of a lighting fixture or arrangement, if the Township determines that the standards set forth in subsection F are not met, the Township, by way of an authorized enforcement officer, may require the landowner, at the landowner's expense, to make adjustments, remedial measures, or other means to comply with the lighting standards.
- (3) Notwithstanding the above regulations of this section, if at any time the Township deems a lighting fixture or arrangement to be a potential safety hazard or nuisance, it may, at the landowner's expense, require the landowner to make adjustments, remedial measures, or other means to mitigate or prevent the potential hazard or nuisance. In determining a potential nuisance, the authorized officer of the Township must take the following into consideration:
 - (5) The measurement of the amount of illuminance, in footcandles, at the spot where the lighting fixture or arrangement is causing the potential nuisance.
 - (6) Whether the suspect lighting fixture or arrangement complies with the standards set for with subsection F.

H. Special Regulations for Outdoor Athletic Facilities

- (1) Proposed Outdoor Athletic Facility Lighting Fixtures as defined by this ordinance are permitted as a conditional use in any zoning district, subject to the condition that the applicant can demonstrate to the Board of Supervisors that the neighboring properties can be sufficiently protected from any adverse effects.
- (2) Whenever Outdoor Athletic Facility Lighting Fixtures are proposed, the Board of Supervisors may require additional screening and buffering requirements to protect the neighboring properties from glare.
- (3) Outdoor Athletic Facility Lighting Fixtures approved by the township are exempt from the design and performance restrictions of subsections E and F of this section.
- (4) Outdoor Athletic Facility Lighting Fixtures may only be turned on for official games or practices of a duly registered team in an organized

league recognized by the township, and only for the specific playing fields being used.

Outdoor Athletic Facility Lighting Fixtures shall be extinguished between (5)the hours of 11 p.m. and 6 a.m.

This Ordinance shall take effect and shall be enforced from and Section 2. after its approval as required by law.

ENACTED AND ORDAINED by the Board of Supervisors of the Township of Upper Merion on this 15th day of November , 2012.

BOARD OF SUPERVISORS Upper Merion Township

Chairperson

Ronald G. Wagenmann

Township Manager/Socretary/Treasurer

October 26, 2012 and

Advertised Proposed Ordinance in Times Herald: November 2, 2012

Proof of Publication Dated: November 6, 2012

Hearing Held: November 15, 2012

Ordinance Adopted: November 15, 2012 Ordinance Entered: November 15, 2012 as Township Ordinance No. 2012-810