ORDINANCE NO. 1999-02-011

AN ORDINANCE APPROVING A STREET LIGHT ILLUMINATION PLAN FOR CERTAIN COLLECTOR AND ARTERIAL STREETS

WHEREAS, it is recognized that our present street lighting system has been created, added to, and modified over many years; and

WHEREAS, for over 20 years, the City Council and staff have been generally studying what further modifications and replacements of the street lighting system are desirable so that an overall plan could be designed to meet the needs of the City; and

WHEREAS, during this period, different City Councils and City staff have had opportunities to observe the performance, and acceptance by the public, of various street light designs and levels of illumination and types of illumination; and

WHEREAS, it has been noted that the citizens of Urbana are very concerned that the level of illumination and glare from street lights, while meeting the needs of safety, not be such that such illumination and glare interfere with the quality of life and ambiance of our residential neighborhoods; and

WHEREAS, during the months of September, 1998 and continuing on to the date hereof, the Public Works Department has had demonstration street lights installed in several areas of the City to allow the opportunity for the public and the City Council to observe the actual operation of several different designs and levels of illumination, which demonstration areas were formally reviewed in the field by the City Council on the 22nd day of September, 1998 and the 9th day of November, 1998; and

WHEREAS, to assist the City by providing information and advice, the City has retained the services of Burtness Engineering Services as a consultant; and

WHEREAS, although the City Council and City staff is familiar with the fact that Burtness Engineering Services has advised the City that the lighting design plan adopted herein does not present the foot candle illumination recommended by the Illuminating Engineering Society, this Council has determined that, due to the sensitivity of its citizens that the level of illumination and glare of street lights be no greater than is deemed necessary for the safety of the public, this Council expressly approves the plan and design of street lighting modifications as herein adopted and specifically finds that although Illuminating Engineering Society's standards recommendations are useful guides, the level of illumination is a matter over which reasonable persons can differ and it is the responsibility of this Council to determine the plan and design that is appropriate for the City of Urbana.

NOW THEREFORE, BE IT ORDAINED that this Council approves the installation of street lights in accordance with the plan of light levels per Exhibit "A" attached and directs that it be implemented as shall be further directed in the implementation of the Capital Improvement Plan adopted by this Council.

This ordinance is hereby passed by the affirmative vote, the "ayes" and "nays" being called, of a majority of the members of the City Council of the City of Urbana, Illinois, at a regular meeting of said City Council.

PASSED by the City Council this <u>lst</u> day of <u>March</u> , 1999.
AYES: Hayes, Huth, Kearns, Patt, Taylor, Whelan, Wyman
NAYS:
ABSTAINED:
Phyllis D. Clark, City Clerk
Thymis B. Clark, City Clerk
APPROVED by the Mayor this & day of, 1999

Tod Satterthwaite, Mayor



Burtness Engineering Services

3004 Crossing Court, Champaign, IL 61822-6135 Phone 217-398-9800 ◆ Fax 217-398-9889

NOTICE OF DESIGN STANDARDS EXCEPTION AND INDEMNITY

CLIENT DATA:

Name:

City of Urbana

Agent:

William R. Gray

Address:

Director of Public Works

706 South Glover Avenue

T

Urbana, IL 61802

Phone:

217-384-2377

PROJECT DATA:

Project Name:

Residential Street Lighting Modernization Project, Phases 1, 2 & 3

City Section 97-00331-00-LT

Project Owner:

City of Urbana (hereinafter referred to as Owner)

Project Location:

Zones 2, 3B & 3A (as modified under Memorandum of Agreement dated 6/6/97)

shown on Series Lighting Replacement Priorities Location Map, Dated 2/21/97.

BES Project Nos.:

URB-72, -73, -74, -87, -88

MEMORANDA OF AGREEMENT DATA:

This Notice and Indemnity pertains to the following agreements between the Owner and Burtness Engineering Services (hereinafter referred to as BES):

- 1. Agreement for Zone 2, dated 3/28/97, revised 4/17/97 and signed by the Owner on 5/6/97.
- 2. Agreement for Zone 3B, dated 3/28/97, revised 4/23/97 and signed by the Owner on 5/6/97.
- 3. Agreement for Zone 3A, dated 6/6/97 and signed by the Owner on 6/18/97.

NOTICE OF EXCEPTION:

In performance of its duties under each of the foregoing Memoranda of Agreement, BES has furnished to the Owner the basis for a streetlighting design which provides proposed lighting levels for the arterial and collector streets identified on the attached Exhibit A. Pursuant to the **Design Standards** clause of each aforesaid agreement, the Owner hereby gives notice to BES that it takes exception to the lighting levels BES has proposed for the arterial and collector streets identified on Exhibit A dated January 14, 1999.

The Owner acknowledges that for the arterial and collector streets identified on Exhibit A, BES has recommended lighting levels that conform to standards promulgated by the Illuminating Engineering Society of North America (as published in <u>Lighting Handbook</u>, Eighth Edition (1993), at page 759, Figure 24-8, as well as in Table 2(b) of the "American National Standard Practice for Roadway Lighting" ANSI/IES, RP-8, 1983) and to standards promulgated by the Illinois Department of Transportation. Despite BES's recommendations, the Owner hereby gives notice to BES of its decision to require that lighting levels on the aforesaid streets meet the Owner's standard instead.

Accordingly, the Owner directs BES to provide plans and specifications that utilize the poles, luminaires and wattage of bulbs shown on Exhibit A for each street section and that space the poles and luminaires according to the target average spacing shown on Exhibit A for each street section.

The Owner acknowledges that its use of a target average spacing as a design criteria may result in actual spacings that are approximately within 90% to 110% of the target spacing. The Owner also acknowledges that its spacing, pole and luminaire requirements will result in the approximate lighting levels shown as target lighting levels on Exhibit A for each street section.

INDEMNITY:

The Owner hereby accepts all liability for its decision to take exception to the standards identified above and agrees to defend BES from and against any claims, suits or actions for death or injury to persons or damage to property brought against BES arising out of any alleged claim in connection with the design and installation of lights in accordance with the owner's standards rather than the recommendation of BES, whether or not suit is filed. Additionally, the City agrees to indemnify BES for any sums BES becomes obligated to pay as damages arising out of such circumstances.

The Owner's undertaking of full liability and indemnity hereunder is a business understanding between the parties and shall apply to all the different theories of recovery, including, but not limited to, breach of contract or warranty, tort (including negligence), strict or statutory liability, Worker's Compensation, or any other cause of action (for any legal, equitable, administrative, or other remedy) proximately caused by or proximately arising out of the Owner's decision.

WARRANTY OF AGENTS' AUTHORITY:

Each undersigned person hereby states that he is duly authorized to act as the Owner's agent as to all matters addressed in this NOTICE OF DESIGN STANDARDS EXCEPTION AND **INDEMNITY** and that the terms and conditions are understood by the agent and the Owner and herewith agreed to and accepted by the Owner. Each agent further warrants that the Owner has complied with all legal requirements necessary to bind the Owner to the terms and conditions hereof.

Date: 3-Z-99

By: William R. Gray, Director of Public Works, City of Urbana

By: Tal Latterthweste

Tod Satterthwaite, Mayor of the City of Urbana

Date: 3/2/99

Exhibit A Arterial and Collector Streets

Zone 2 (To be constructed with Zone 3A)

Street	Green	Race	Washington
From	Lincoln	California	W. Race
To	Race	Washington	Vine
Pole	Short Concrete	Short Concrete	Short Concrete
Height	11'	11'	11'
Configuration	Stagger	Stagger	Stagger
Lamp Type	Venture MP70/C/V/27K	Venture MP70/C/V/27K	Venture MP100/C/V/27K
Wattage	70W MH (Qty: 2)	70W MH	100W MH
Initial Lumens	5000 per lamp	5000	8100
Fixture	L72 (Qty: 2)	L72	L72
Target Light Level	0.46	0.20	0.38
Target Spacing	74'	87'	78'

Note: Two L72 fixtures per pole

Zone 3B

Cottage Grove Street Main From To Oregon Pole **Short Concrete** 11' Height Stagger Configuration Lamp Type Venture MP100/C/V/27K Wattage 100W MH Initial Lumens 8100 **Fixture** White Globe Target Light Level 0.20 **Target Spacing** 65'

Zone 3A

Street	Race	Race	lowa	Pennsylvania
From	Washington	Michigan	Race	Lincoln
То	Michigan	Pennsylvania	High School	Race
Pole	Short Concrete	Short Concrete	Short Concrete	Short Concrete
Height	11'	11'	11'	11'
Configuration	Stagger	Stagger	Stagger	Stagger
Lamp Type	Venture MP100/C/V/27K	Venture MP70/C/V/27K	Venture MP100/C/V/27K	Venture MP100/C/V/27K
Wattage	100W MH	70W MH	100W MH	100W MH
Initial Lumens	8100	5000	8100	8100
Fixture	L72	L72	L72	White Globe
Target Light Level	0.38	0.20	0.38	0.20
Target Spacing	78'	87'	78'	65'