## City of Columbia

701 East Broadway, Columbia, Missouri 65201



Agenda Item Number: B 307-15

**Department Source**: Parks and Recreation

To: City Council

From: City Manager & Staff

Council Meeting Date: 10/19/2015

Re: Activity and Recreation Center Lighting Improvements

#### **Documents Included With This Agenda Item**

Council memo, Ordinance

Supporting documentation includes: None

### **Executive Summary**

The Parks & Recreation Department is requesting Council authorization to proceed with lighting improvements at the Activity and Recreation Center (ARC). Park staff is proposing to replace the existing natatorium lights, gymnasium lights and a variety of other lights in the facility with energy-efficient LED lighting. The lighting improvements will include a mixture of fixture replacement, retro-fitting existing fixtures, and bulb replacement. The LED lighting upgrades will improve the visibility in the facility, reduce the overall energy consumption, and lower utility costs at the ARC. The lighting improvement project will have a budget of \$89,050 and will be funded using 2014 budget surplus funds. The conversion of the existing lights to LED lighting will result in an estimated annual utility savings of approximately \$24,000 when the project is completed at the facility. The project is also eligible for \$11,950 in rebates from the Columbia Water and Light Department's Lighting Incentive Program. The project will be bid through the City's Purchasing Department and will be completed using a combination of contract and force account labor. Lighting improvements are scheduled to begin in November, with an anticipated completion date of late spring 2016.

#### Discussion

The Activity and Recreation Center (ARC) is located at 1701 West Ash Street and serves as the city's premier indoor recreation facility. Opened in 2002, the facility includes an indoor leisure pool, gymnasium, strength training equipment and weights, cardio equipment, and an indoor track. Multiple programs and classes are offered for members and visitors with a focus on group fitness classes, spin classes, water aerobics, swimming lessons and youth fitness classes. The ARC also serves as a warming and cooling center for the public.

In May 2015, ARC staff and park planning staff began discussions about possible improvements to the facility to reduce the overall utility usage and maintenance needs within the ARC. Staff focused on lighting, heating and air components, electrical controls for equipment and water usage. Working with a variety of vendors and city staff, it was determined that making lighting improvements throughout the facility would provide the biggest payback in terms of reducing utility usage and overall monetary expenses associated with utility costs.

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Utilizing 2014 budget surplus funds, park staff is proposing to convert existing lights throughout the facility to energy-efficient LED lighting. The areas of focus for the lighting improvements include the natatorium, gymnasium, and general lighting throughout the building. The lighting conversion in the natatorium and gymnasium provide the best opportunity for energy reduction and cost savings due to the size and quantity of lights, length of time in operation each day, and position of the lights in each area. The lights in these two areas of the ARC are hard to access for maintenance, so the lifespan of LED lighting will greatly reduce the time spent replacing bulbs by maintenance staff. Contract labor will be utilized to replace 39 Metal Halide fixtures in these two areas of the facility. The estimated reduction in electrical usage for each fixture will be from 1000 watts per Halide fixture to 250 watts per LED fixture. The remaining lights being proposed for replacement to LED bulbs include all light fixtures in the hallways of the building, maintenance rooms, and exterior can lights. ARC staff will complete the replacement or conversion of the 296 lights proposed in these areas. The replacement of these lights will include a variety of bulb replacements, retro-fitting existing lights, and replacement of entire lighting fixtures.

Park staff has worked closely with representatives from Columbia Water and Light to select the new LED lighting fixtures and develop a cost savings plan for the lighting improvements. The savings include rebates from the Water and Light Lighting Incentive Program totalling \$11,950, and it is estimated that the LED lighting improvements will result in an annual savings in utility costs of approximately \$24,000 at the facility.

The lighting improvements at the ARC will cost \$89,050 and are funded using 2014 budget surplus funds. The City Council approved the 2014 budget surplus projects as part of the FY2016 budget for the City of Columbia. The improvement project will be bid through the City's Purchasing Department and will be completed using a combination of contract and force account labor. The project is anticipated to start in November 2015 and be completed by late spring 2016.

## **Fiscal Impact**

Short-Term Impact: The total project cost for the lighting improvements is \$89,050 and will use 2014 budget surplus funds as the funding source. The project will also include \$11,950 in rebates from the Columbia Water and Light Department's Lighting Incentive Program for completing the conversion to LED lighting at the facility and reducing the total watts used at the facility. The rebate funds will be placed back in the project to complete additional lighting improvements at the facility.

Long-Term Impact: It is estimated that the conversion to LED lighting at the ARC will provide a cost savings of approximately \$24,000 each year in reduced utility expenses. The LED lights will also reduce daily, weekly and annual maintenance due to the low wattage use and longevity of the lights.

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Vision, Strategic & Comprehensive Plan Impac	Vision,	Strategic	&	Com	prehe	nsive	Plan	Impac
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Vision Impact: Parks, Recreation and Greenways

Strategic Plan Impact: Not Applicable

Comprehensive Plan Impact: Livable and Sustainable Communities

### **Suggested Council Action**

Approve the ordinance authorizing the project to proceed.

**Legislative History** 

None

Department Approve

City Manager Approved

Introduced by _		_	
First Reading	Second Reading		_
Ordinance No.	Council Bill No	B 307-15	

#### AN ORDINANCE

determining it is in the public interest to replace existing light fixtures in the natatorium, gymnasium, hallway, maintenance room and exterior areas of the Activity and Recreation Center (ARC) with energy efficient LED lighting; approving and adopting plans and specifications; determining that the work shall be done by contract; calling for bids through the Purchasing Division; determining that a portion of the project shall be done by city employees; providing for payment for the improvement; authorizing the City Manager to obtain, execute and record all documents necessary for the improvement; providing for compliance with the prevailing wage law and state-mandated construction safety training; and fixing the time when this ordinance shall become effective.

WHEREAS, the City Council adopted a resolution declaring the necessity of the replacement of existing light fixtures in the natatorium, gymnasium, hallway, maintenance room and exterior areas of the Activity and Recreation Center (ARC) with energy efficient LED lighting; and

WHEREAS, the notice of a public hearing on this project was published in a daily newspaper of general circulation in the city; and

WHEREAS, the City Council has held a public hearing on construction of the improvement.

NOW, THEREFORE, BE IT ORDAINED BY THE COUNCIL OF THE CITY OF COLUMBIA, MISSOURI, AS FOLLOWS:

SECTION 1. The Council finds that the replacement of existing light fixtures in the natatorium, gymnasium, hallway, maintenance room and exterior areas of the Activity and Recreation Center (ARC) with energy efficient LED lighting in the City of Columbia, Missouri, is necessary for the welfare and improvement of the city and that it is in the public interest that such improvements be made.

SECTION 2. The plans and specifications for this improvement, as prepared by the Director of Parks and Recreation, are hereby approved.

SECTION 3. A portion of the construction of the improvement shall be done by contract in accordance with the plans and specifications, the laws of the State of Missouri, and the Charter and Ordinances of the City of Columbia, Missouri.

SECTION 4. The Purchasing Agent is hereby authorized to call for bids and execute a contract for replacement of the metal halide fixtures in the natatorium and gymnasium at the Activity and Recreation Center (ARC) with energy efficient LED lighting. As deemed advisable by the City Manager, City employees shall be used to replace the hallway, maintenance room and exterior can lighting.

SECTION 5. Payment for this improvement shall be made from FY 2014 budget surplus funds and such other funds as may be lawfully appropriated. The project will be eligible for \$11,950.00 in rebates from City's Water and Light Department lighting incentive program.

SECTION 6. The City Manager is authorized to obtain, execute and have recorded all licenses, easements, deeds and any other conveyances or instruments necessary for the City to complete this improvement.

SECTION 7. The contract for the improvement shall provide that not less than the prevailing hourly rate of wages, as found by the Department of Labor and Industrial Relations of Missouri, shall be paid to all workers performing work under the contract. The contractor's bond shall guarantee the faithful performance of the prevailing hourly wage clause in the contract.

SECTION 8. The bid specifications and contract for the improvement shall provide that the contractor and any subcontractor shall provide a ten-hour Occupational Safety and Health Administration construction safety program (or a similar program approved by the Missouri Department of Labor and Industrial Relations) for all employees working on-site. All employees working on the site of the improvement are required to complete the safety program within 60 days of beginning work on the improvement project.

SECTION 9. This ordinance shall be in full force and effect from and after its passage.

PASSED this day of	, 2015.
ATTEST:	
City Clerk	Mayor and Presiding Officer
APPROVED AS TO FORM:	
City Counselor	