City of Columbia

701 East Broadway, Columbia, Missouri 65201



Agenda Item Number: <u>B 276-14</u> Department Source: Water & Light To: City Council From: City Manager & Staff Council Meeting Date: August 18, 2014 Re: Appropriation of funds for the construction of a Photo-Voltaic (PV) array at the West Ash pump station.

Documents Included With This Agenda Item

Council memo, Resolution/Ordinance Supporting documentation includes: None

Executive Summary

Staff has prepared for Council consideration an ordinance appropriating funds for the construction of a Photo-Voltaic (PV) Pilot Project at 1917 West Ash Street. The estimated cost for this improvement project is \$600,000 and partial funding for this project has been appropriated in the 2014 Capital Improvement Program under project EL0172. An appropriation of an additional \$500,000 is necessary for the design, materials and construction of this project.

Discussion

For the past six years the 1.25 acre field that is located behind the West Ash Pump Station at 1917 West Ash St. has been used as a solar electric production facility. It currently houses 11.7 Kilowatts of solar (PV) panels that directly convert sunlight into electricity through the Photo-Voltaic process. All of the existing panels have been supplied and installed by Dow Chemical through a cooperative demonstration arrangement with the city. The footprint occupied by the Dow panels is a relatively small portion of the field.

As part of the electric integrated resource planning process, staff proposed to explore further development of local solar energy and the staff implementation plan proposes to add enough panels to fill the remaining available space at that site. The expected incremental capacity addition would add an estimated 225 kilowatts to the existing site which could, in turn, produce 250- 300 megawatt hours of energy each year. The electricity produced would be directly connected to the electric distribution system. The new panels will be separated from and not have any effect on the existing panels.

The project will be completely within the grounds located at Bernadette Drive and Tiger Lane. Water & Light held an interested parties meeting on April 23, 2014 at the Parks and Recreation ARC, near the site. At this meeting, staff presented plans to those in attendance, had discussion with attendees, and received comments. Enhancing the development of solar energy in Columbia was generally accepted by the participants. At the Public Hearing held on May 19, 2014 City Council approved a



resolution declaring the necessity of the solar electric expansion project and a request for design/supply services was issued through the City's Purchasing Department. The estimated cost for this project is \$600,000 and partial funding for this project has been appropriated in the 2014 Capital Improvement Program under project EL0172. An appropriation of an additional \$500,000 is necessary for the design, materials and construction of this project.

Fiscal Impact

Short-Term Impact: The estimated cost for this project is \$600,000. Long-Term Impact: Annual Maintenance of \$2,000 to \$5,000 per year.

Vision, Strategic & Comprehensive Plan Impact

<u>Vision Impact</u>: Community Character <u>Strategic Plan Impact</u>: Infrastructure <u>Comprehensive Plan Impact</u>: Infrastructure, Livable & Sustainable Communities

Suggested Council Action

Staff recommends Council approval of an ordinance appropriating \$500,000 for the construction of a Photo-Voltaic (PV) Pilot Project at 1917 West Ash Street.

Legislative History

12/04/13 – Water & Light Advisory Board review and recommend for approval as part of the Staff Integrated Resource Implementation Plan.

12/16/13 – Council Work Session review of Water & Light Staff Integrated Resource Implementation Plan.

04/23/14 - Interested Parties meeting at the Parks and Recreation ARC.

05/19/14 - Public Hearing after which the City Council approved a resolution declaring the necessity of the solar electric expansion project and a request for design/supply services was issued through the City's Purchasing Department.

Department Approved

City Manager Approved

 Introduced by _____

 First Reading _____
 Second Reading _____

 Ordinance No. _____
 Council Bill No. _____
 B 276-14_____

AN ORDINANCE

appropriating funds for the solar photovoltaic (PV) pilot project behind the West Ash Pump Station located at 1917 West Ash Street; and fixing the time when this ordinance shall become effective.

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

SECTION 1. The sum of \$500,000.00 is hereby appropriated from the Retained Earnings Account No. 551-0000-351.01-00 to the Miscellaneous Contractual Account No. 551-7220-881.49-90 EL0172 for the solar photovoltaic (PV) pilot project behind the West Ash Pump Station located at 1917 West Ash Street.

SECTION 2. This ordinance shall be in full force and effect from and after its passage.

PASSED this ______ day of ______, 2014.

ATTEST:

City Clerk

Mayor and Presiding Officer

APPROVED AS TO FORM:

City Counselor

CERTIFICATION: I certify there are sufficient funds available in the Retained Earnings Account No. 551-0000-351.01-00 to cover the above appropriation.

Director of Finance