CITY OF GLENDALE, CALIFORNIA
REPORT TO THE CITY COUNCIL

AGENDA ITEM

Report: Amendment to the City's Existing Contract with OSIsoft, LLC, and Execute a New Professional Services Agreement with PowerRunner, LLC.

1. Motion authorizing the City Manager, or his designee, to execute Amendment No. 5 to the City's existing Software and License Agreement (Contract No. C105118B) with OSIsoft, LLC, to include the one-time installation and purchase of the PowerRunner Energy Platform software license in the amount of $90,000 including two years of support and maintenance in the amount of $15,880 for the first year, and $18,000 for the second year for a total not-to-exceed amount of $123,880, and authorizing further amendments thereafter, for the life of the software, if the funds for the continued maintenance, support, upgrades and licensing of the software are budgeted within the Glendale Water and Power Electric Work Revenue Fund and approved by City Council as part of the annual citywide budget process.

2. Motion authorizing the City Manager, or his designee, to execute a Professional Services Agreement with PowerRunner, LLC to implement and configure the PowerRunner Energy Platform software in an amount not to exceed $64,487.

COUNCIL ACTION

Item Type: Consent

Approved for **June 6, 2023** **calendar**

EXECUTIVE SUMMARY

The OSIsoft Process Information (PI) Historian has been a necessary software component of the GWP Utility Modernization and electric reliability and infrastructure program since 2011. In 2020, GWP expanded the program, under the terms of an Enterprise Program Agreement to have the ability to collect multiple data points from multiple sources and aggregate them under one system to provide real-time integrated analytics for day-to-day operations and monitoring of GWP's Field equipment, systems, and assets.

The PowerRunner Energy Platform (PREP) software is designed to integrate and work with the OSIsoft PI Historian software and provide scalable operational data solution with real-time situational awareness through Advanced Meter Infrastructure (AMI)-grid analytics. By combining AMI, Supervisory Control and Data Acquisition (SCADA),

Geographic Information System (GIS), and Customer Information System (CIS), data and running analytics on the PowerRunner platform, GWP will have near real time operational data which will allow the utility to ensure system reliability and assist the engineering team with current and historical analytics on feeder and transformer loads based on meter data.

COUNCIL PRIORITIES

Infrastructure: The PowerRunner Energy Platform software will integrate with the existing (PI) Historian software to assist the GWP Electrical Engineering Department in identifying potential issues with distribution feeders and transformers and assist GWP in monitoring and management mission critical systems by providing reliable power to all residential and commercial customers.

RECOMMENDATION

Authorize the City Manager to execute Amendment No. 5 to the existing Software and License Agreement with OSIsoft LLC to implement PowerRunner Energy Platform software and support for the remainder of the contract, for a total amount not to exceed $123,880, as well as a Professional Service Agreement with PowerRunner, LLC for software implementation and configuration services in the not-to-exceed amount of $64,487.

BACKGROUND

GWP received a grant from the Department of Energy (DOE) in 2009 to implement a Smart Grid Solution. One component of the grant was to demonstrate improvements in the electric system reliability through the application of new technologies and intelligent devise. As part of GWP's Smart Grid deployment, GWP implemented a PI Historian System. "A PI Historian System" is a data infrastructure and software suite for collecting, storing, and organizing operational data from plants, processes, and operational systems. The PI System delivers that data to users, including Electric and Water Operations; Power Dispatch; Engineering; Energy Trading; Customer Service; Maintenance, and Executive Management so they can analyze, visualize, and share it. Users retrieve data from the PI Server and can display it on real-time dashboards using PI System visualization and reporting tools. This facilitated GWP's ability to extend the life of expensive, long-lead-time equipment like substation transformers and underground cables. Customer outages will also be reduced by providing real-time and historical system visibility of distribution feeders.

The original implementation of the PI Historian System was only collecting SCADA data but was limited in its analytic capability due to a cap in number of integrations and data collecting points (tags). In May of 2020, GWP entered into an Enterprise Program Agreement (EPA) with OSIsoft, LLC granting GWP unlimited number of data source integration and tags. Since its implementation, GWP has integrated multiple data sources including AMI, SCADA, GIS, and CIS, with multiple data points. With the integration of the AMI electric meters, GWP is collecting and storing residential hourly and commercial 15-minute data on multiple meter data channels for all 92,000 electric meters including KWH, KW, Kvar, Volts, exceptions, and events, into the PI historian. Today's PI Historian environment consists of a full functioning production and test

environment, with multiple data archives, visual applications, notifications, analytics, and monitoring services and contains 933,000 individual AMI data tags and 5,000 SCADA tags. To extract the full benefit of hosting AMI, GIS, CIS and SCADA data under a centralized system, GWP needs the capability to perform highly resource-intensive analytics using tags across all PI data archives. Unfortunately, the existing PI Historian System does not support this feature. OSIsoft's solution is their partnership with PowerRunner, LLC.

ANALYSIS

PowerRunner, a leader in energy analytics software provider, partnered with OSIsoft to deliver a proven and scalable operational data solution to provide utilities with real-time situational awareness through AMI-grid analytics. PowerRunner on the PI System solution is designed as a fully integrated operational data solution with highly configurable analytics that enable business users to configure and reconfigure solutions to meet the changing requirements of an industry in transition. By combining AMI, GIS, CIS and SCADA data and running analytics on the PowerRunner Energy Platform (PREP), GWP will have near real-time operational data which will allow the utility to ensure system reliability.

GWP staff has researched and confirmed that PowerRunner is the only company which provides this software. PowerRunner is a proprietary software and provides a sole source affidavit. GWP is proposing a full implementation and the Statement of Work (SOW) includes design, installation, configuration, testing, data analysis, training, and documentation. PowerRunner on PI solution will provide GWP with an operational analytics platform with granular temporal and spatial analysis of AMI and SCADA data to create a bottom-up vs. top-down view of distribution system load, generation, and net-load across all metered and unmetered (virtual) system assets. It will include the following:

- Transformer Load Management Analysis - The aggregation of downstream meter net-load to all transformers in the Trial data set.
- Distribution load and generation aggregation by system asset - The aggregations of net load at any metered or unmetered point or asset across the distribution system.
- Distribution Energy Resource (DER), Electric Vehicle (EV) and customer program segmentation - Every aggregation can then be further segmented by additional attributes, such as rate class or program ID to analyze the growing impact of consumer behavior on the distribution system.
- Coincident and non-coincident peak analysis – Annual and seasonal analysis of each asset's contribution to the system peak (coincident) and each asset's unique peak-load analysis (non-coincident).

PowerRunner extends the value of PI by joining time-series data from AMI, SCADA and other operational data sources with commercial data such as customer attributes, rates and system network relationships to enable distribution grid analytics from the meter to the substation.

This implementation will change operations in GWP's Electrical Engineering Department. Electrical Engineers have been present in ongoing meetings, presentations, and

live demos of the product.

STAKEHOLDERS/OUTREACH

Not Applicable.

FISCAL IMPACT

The total not-to-exceed amount of the proposed amendment to the existing agreement with OSIsoft, LLC to purchase PowerRunner Energy Platform software license in the amount of $90,000 including two years of support and maintenance in the amount of $15,880 for the first year, and $18,000 for the second year for a total not-to-exceed amount of $123,880. The Professional Service Agreement with PowerRunner, LLC to assist in the implementation of the software is $64,487.

Funding associated with this amendment is available in the current Fiscal Year (FY) 22-23 budget and proposed funding associated with the professional services and support in FY 23-24 and future funding for the cost of continued maintenance, support, upgrades, and licensing for the life of the product will be requested as a part of the annual budget process.

License, professional services, and maintenance:

Existing Appropriation

OSIsoft, LLC for License and One-year Maintenance:

Amount	Accounting String	Funding Source
$ 105,880	GL: 43110-5820-GWP-4521-P0000	Electric Works Revenue Fund

PowerRunner, LLC for Professional Services:

Amount	Accounting String	Funding Source
$ 64,487	GL: 43110-5820-GWP-4521-P0000	Electric Works Revenue Fund

OSIsoft, LLC for the Second Year Maintenance:

Requested Appropriation

Funding for FY 23-24 is outlined below:

Amount	Accounting String	Funding Source
$ 18,000	GL: 43110-5820-GWP-4521-P0000	Electric Works Revenue Fund

ENVIRONMENTAL REVIEW

This item is considered a ministerial activity and is not a project for the purposes of California Environmental Quality Act (CEQA) and therefore is not subject to CEQA review.

CAMPAIGN DISCLOSURE

The names and business addresses of the members of the board of directors, the chairperson, CEO, COO, CFO, Subcontractors and any person or entity with more than 10% interest in the company proposed for contract in this Agenda Item Report are listed in Exhibit 1(OSIsoft, LLC) and Exhibit 2 (PowerRunner, LLC), in accordance with the City, in accordance with the City Campaign Finance Ordinance No. 5744.

ALTERNATIVES

Alternative 1: Approve the amendment to OSIsoft, LLC Contract to provide licensing and support for PowerRunner Software, and execute a Professional Services Agreement with PowerRunner, LLC for implementation and configuration services

.

Alternative 2: Do not authorize the herein recommended Amendment No. 5 with OSIsoft and PSA with PowerRunner which will cause GWP to not have the ability to run detailed grid analytics using meter data on their operations, critical systems, and assets.

Alternative 3: Consider any other alternative not currently proposed by staff.

ADMINISTRATIVE ACTION

Prepared by:
Scott Mellon, Assistant General Manager - Power Management
Michelle Nall, Utility Business Systems Support Administrator

Approved by:
Roubik R. Golanian, P.E., City Manager

EXHIBITS / ATTACHMENTS

Exhibit 1: Campaign Finance Disclosure Form for OSIsoft, LLC
Exhibit 2: Campaign Finance Disclosure Form for PowerRunner, LLC