

A G E N D A



Recommendation for Council Action (Purchasing)

Austin City Council

Item ID:

60259

Agenda Number

22.

Meeting Date:

August 11, 2016

Department:

Purchasing

Subject

Authorize negotiation and execution of a 36-month contract with DOOSAN GRIDTECH, to provide energy storage and control software implementation, economic modeling and analysis services, for a total contract amount not to exceed \$4,501,000.

Amount and Source of Funding

Funding in the amount of \$4,501,000 is available in the Fiscal Year 2015-2016 Capital Budget of Austin Energy.

Fiscal Note

A fiscal note is attached.

Purchasing Language:

Critical Business Need

Prior Council Action:

For More Information:

Gage Loots, Corporate Purchasing Manager, 512-322-6251

Boards and Commission Action:

July 18, 2016 – Recommended by the Electric Utility Commission on a 10-0 vote with Commissioner Ferchill absent.

July 19, 2016 – Recommended by the Resource Management Commission on a 7-0 vote with Commissioners Gill and Saum absent.

Related Items:

MBE / WBE:

This contract is exempt from the City Code Chapter 2-9C Minority Owned and Women Owned Business Enterprise Procurement Program; therefore, no subcontracting goals were established.

Additional Backup Information

This Recommendation for Council Action is related to the February 2016 \$4,300,000 cooperative agreement grant the City of Austin, acting as Austin Energy, received from the U.S. Department of Energy (DOE) under the DOE Sustainable and Holistic Integration of Energy Storage and Solar PV (SHINES) program. Austin Energy presented an [overview of the Austin SHINES project](#) to the Austin Energy Utility Oversight Committee in March 2016.

The goal of the SHINES project is to enable holistic design and widespread sustainable development of low-cost, flexible, and reliable solutions that have energy storage as one of the key components, for successful integration increasing levels of solar PV generation. Austin SHINES is a pilot project designed to demonstrate the capabilities of energy storage at the utility, commercial, and residential scale with solar PV integration.

The DOE application process required the compilation of a project team from the onset of the project's proposal. When Austin Energy initially developed its proposal, it planned to partner with 1Energy Services, LLC ("1Energy") as a key member of the Austin SHINES project and a named sub-recipient of the DOE award. However, on June 30, 2016, Doosan Heavy Industries & Construction acquired 1Energy Services from its employee owners, creating a new company called Doosan GridTech ("GridTech"). All 1Energy employees have joined GridTech. The posting language and subject of this Request for Council Action now reflect the name change from 1Energy Services, LLC to Doosan GridTech.

The requested contract will allow GridTech to provide the products and services necessary to complete several aspects of the Austin SHINES project, including:

- Development, deployment and demonstration work for a grid-scale Energy Storage System (SHINES ESS);
- Configuration, deployment and demonstration work for the Distributed Energy Resource Optimizer (DERO), an optimization controls platform for distributed energy resources, and the local energy storage system controller (1Energy Intelligent Controller or 1E-IC);
- Coordination with and support of other Austin SHINES project team members, related to communications design and testing and DERO integration, for the commercial and residential aspects of the project;
- Economic modeling and analysis; and
- Analysis and reporting associated with the DOE award.

The Austin SHINES project aims to establish a template for other utilities and regions to follow to cost-effectively maximize the penetration of distributed solar PV. In addition, the proposed contract work provided by GridTech will enable distribution utilities to mitigate potential negative impacts of high penetration levels of PV caused by the intermittency and variability of solar production, which causes stress to the grid. Specific objectives include the installation of approximately four megawatts (4 MW) of distributed storage, approximately 30 smart inverters, and other enabling technologies. All of these resources will be integrated and optimized at the utility level using an approach that allows a variety of management strategies, and drives development of enabling standards as well as technology innovation.

As explained in the attached memo, this purchase is a Critical Business Need in accordance with Senate Bill 7, as adopted by the City of Austin as Resolution No. 040610-02.