## FEDERAL UTILITY PARTNERSHIP WORKING GROUP SEMINAR

April 12-13, 2017 Savannah, Georgia

## Demonstration Projects and UESCs

Environmental Security Technology Certification Program (ESTCP)

Hosted by:





## Outline

- Overview of ESTCP
- Integrating Demonstration Projects w/UESCs



## **About ESTCP**

- Established in 1995 to:
  - Improve DoD's environmental performance
  - Reduce costs
  - Enhance and sustain mission capabilities
- Demonstration & validation focus
- Promote Implementation
- Energy & Water is one of five ESTCP Program **Areas**

Energy & Water

**Environmental** Restoration

Resource **Conservation &** Climate Change

**Platforms** 

Weapons Systems &



Munitions Response

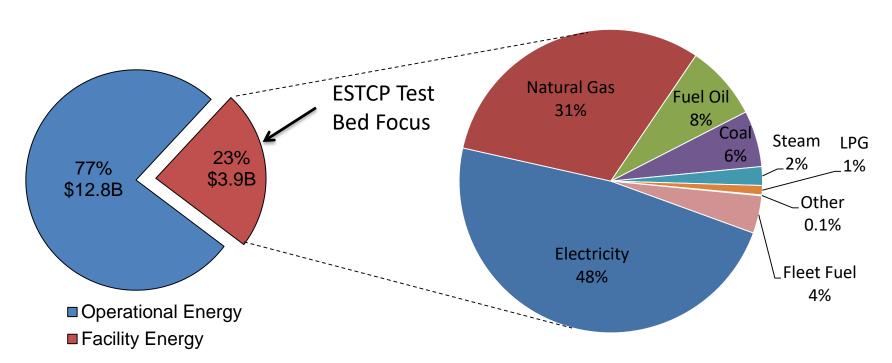




## DoD Energy Use – ESTCP Focus

DoD Facility & Operational Energy Cost: \$16.7B (FY15)

Military Installation Energy Consumption





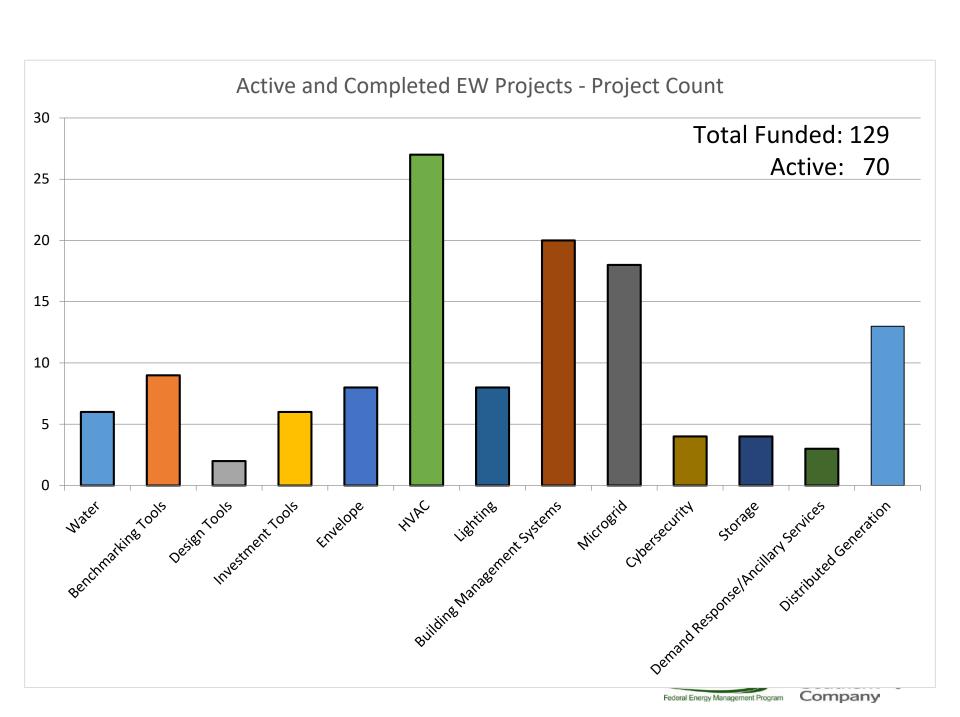


## **Energy and Water**

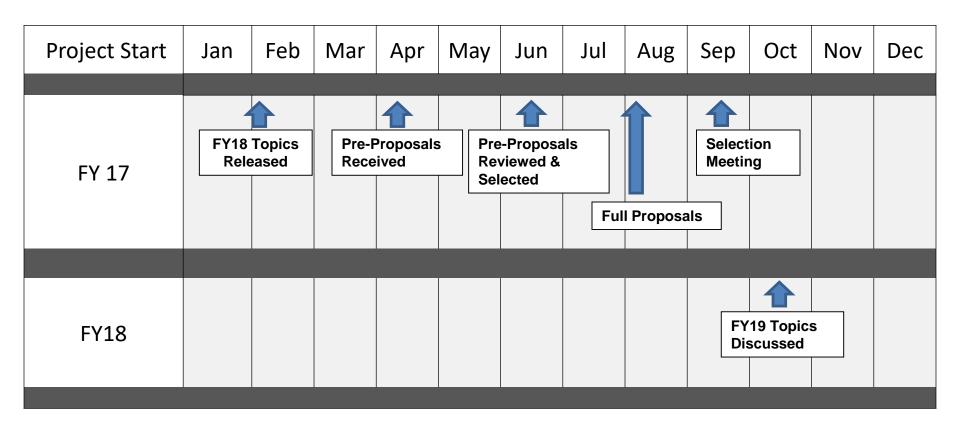
- Smart and secure installation energy management
  - Microgrids
  - Energy storage
  - Ancillary service markets
- Efficient integrated buildings and components
  - Design, retrofit, operate
  - Enterprise optimized investment
  - Advanced components
  - Intelligent building management
  - Non-invasive energy audits
- Distributed generation
  - Cost effective
  - On-site
  - Emphasis on renewables







## **Annual Solicitation Cycle**





### **Demonstration Process**

**Demonstration Site** 



Formal Demonstration Plan



**Approval** 

#### Demonstration

• Baseline, Installation, Data acquisition



#### Reporting

• Final Report, Cost & Performance Report

## Disposition of Equipment

- Remove and replace to pre-demonstration condition
- Abandon in place
- ★ Transfer property to installation for ongoing operation



## Benefits of Integration with UESCs

- Continued operations of Installed technology.
- Efficient project execution.
- Utilities/ESCOs gain experience with new technology.
- Accelerated deployment of new technology.





# Energy Efficiency Technology Demonstrations Integrated with Utility Energy Service Contracts – BAA Only

- Demonstrate innovative technologies and approaches to improve the energy and water efficiency of buildings on military installations.
- Demonstrations must be coordinated and integrated with utility energy services contracts (UESCs) in development at military installations to leverage common efforts.
- Demonstrations should be of technologies that would not otherwise be included in the UESC due to a lack of cost and performance data or related concerns.
- Project leads must be utilities that serve the military installation where the UESC and demonstration project will be performed.
- Demonstrations with the following characteristics are preferable:
  - High likelihood of adoption in future UESC projects within one year of conclusion of demonstration
  - High calculable energy and cost savings
  - Potential for high savings-to-investment ratio and short simple payback
  - Minimal additional technology development required for deployment after the demonstration
  - Cost sharing





## **FY18 Solicitation Summary**

- Lots of interest.
- Good ideas for project integration.
- Continue to learn though evaluation/selection process.
- Intend to include UESC topic in future solicitations.





## **Contact Info**

Tim Tetreault

ESTCP Energy and Water Program Manager

Timothy.j.Tetreault.civ@mail.mil

571-372-6397



