



U.S. Department of Energy  
Energy Efficiency and Renewable Energy

# U.S. Department of Energy Federal Energy Management Program

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**Newport Beach, CA**  
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# FEMP Mission— Lead by Example

***FEMP works to increase energy security and reduce the cost and environmental impact of government by***

- advancing energy efficiency and water conservation,
- promoting the use of renewable and distributed energy, and
- improving utility management decisions at Federal sites.



# Federal Energy Snapshot

- \$9.6 billion Federal annual energy bill
  - 500,000 facilities
    - Buildings: \$3.9 billion
    - Energy Intensive Operations: \$0.6 billion
    - Exempt Buildings: \$0.4 billion
  - Vehicles & Equipment: \$4.6 billion
- Spends \$200 billion annually on products and services.





# Federal Energy Management Goals

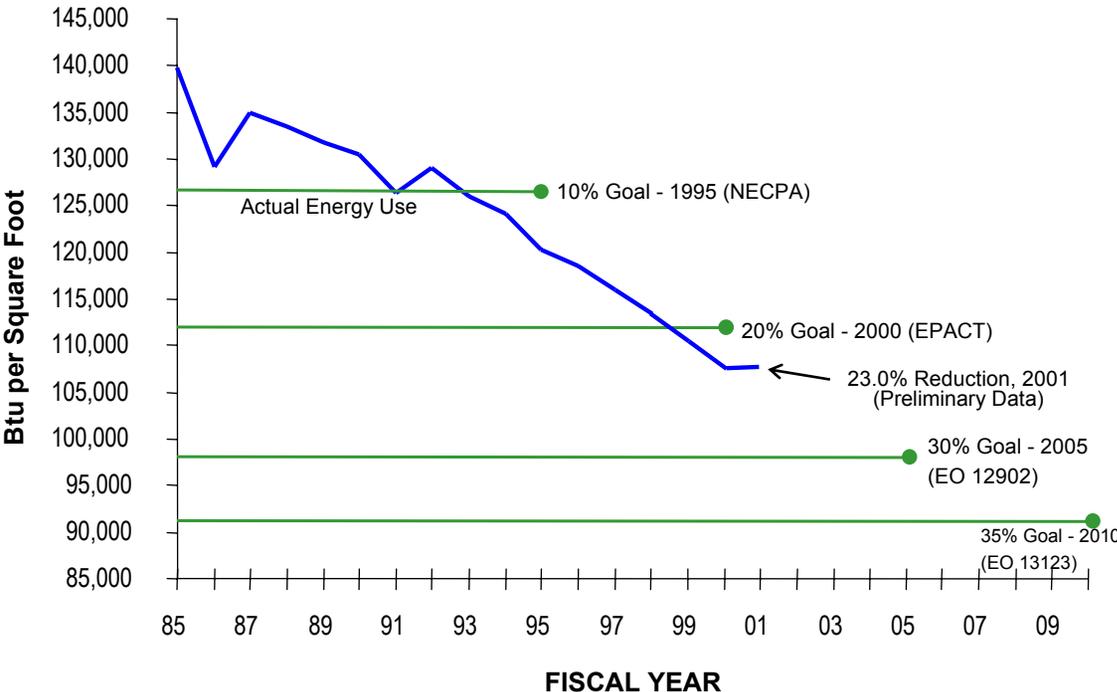
- Reduce energy consumption
  - Facility energy per square foot to be reduced by 30 percent in 2005 and 35 percent in 2010 relative to 1985
  - Industrial/laboratory energy to be reduced by 20 percent in 2005 and 25 percent in 2010 relative to 1990
- Expand use of renewable energy
  - 2.5% of Federal facility electricity consumption by 2005
  - 2,000 solar energy systems by 2000; 20,000 by 2010
- Implement best management practices for water conservation in 80% of Federal facilities by 2010
- Reduce greenhouse gas emissions 30 percent by 2010 compared to 1990



# Progress To Date

- Preliminary FY 2001 data indicates the Federal Government exceeded the FY 2000 goal by 3.0%

### Standard Building Energy Reduction Goals



- In real dollars, the Government spent \$1.4 billion less for energy in its buildings in FY 2001 compared to FY 1985.
- Approximately half of these savings are from energy improvements.
- 23.0% reduction is based on Btu per square foot



# Why DER? It Supports Multiple Goals

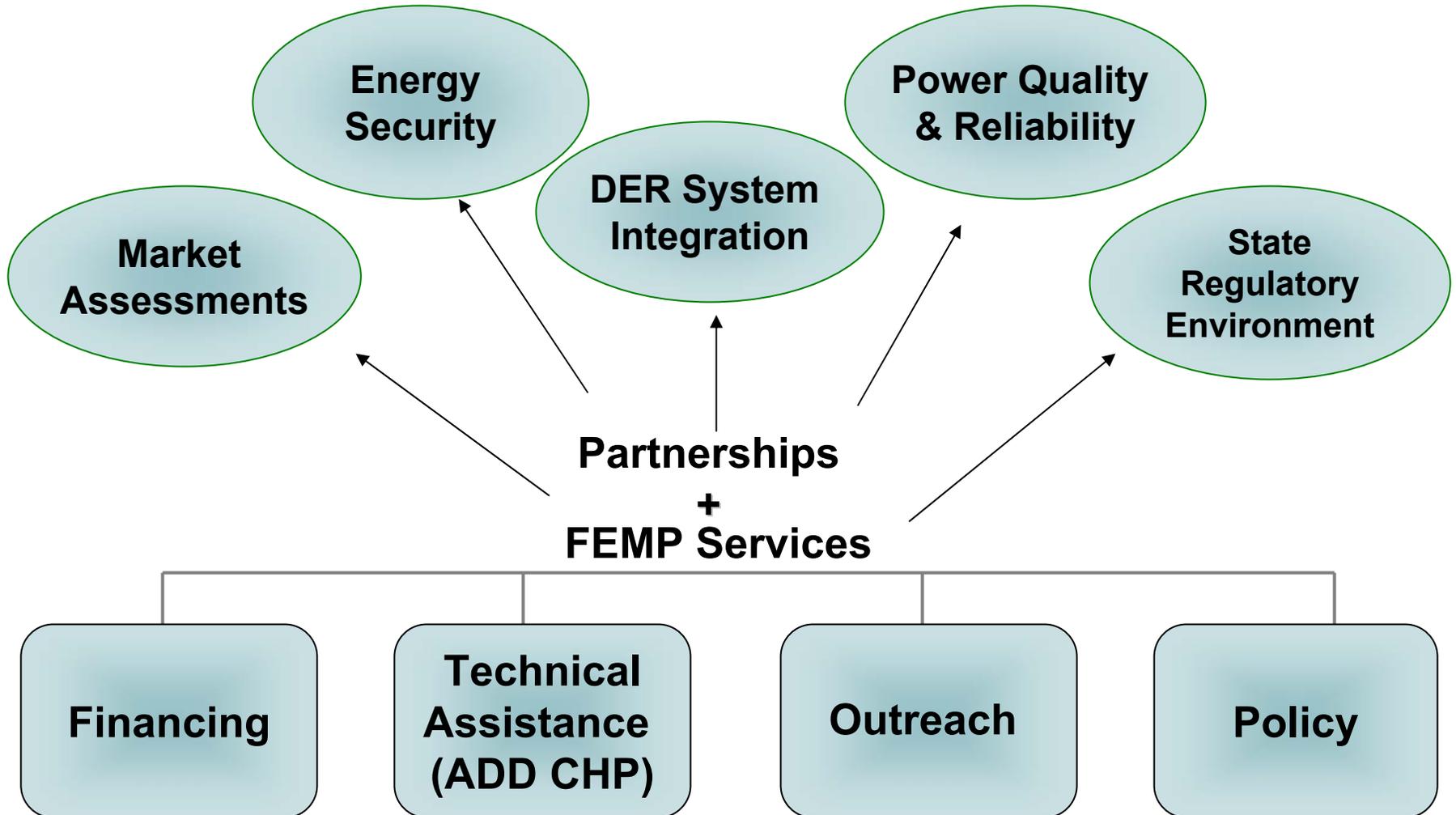
## *Distributed generation and combined heat and power systems*

- increase efficiency and reliability
- reduce costs & emissions
- lay foundation for physical infrastructure for clean technologies of tomorrow (hydrogen, fuel cells)



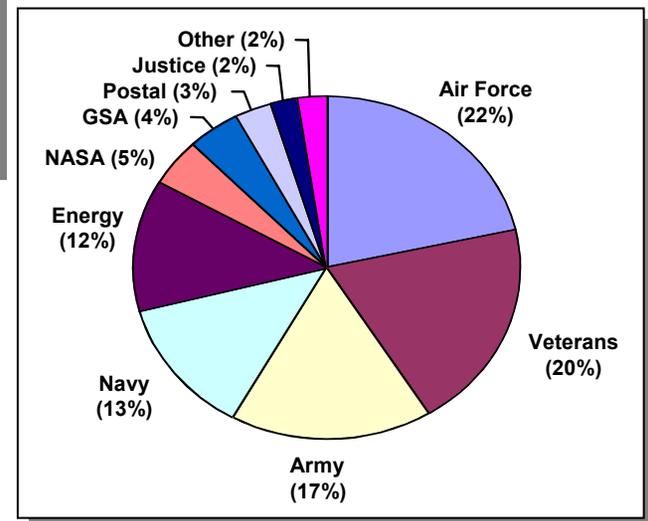
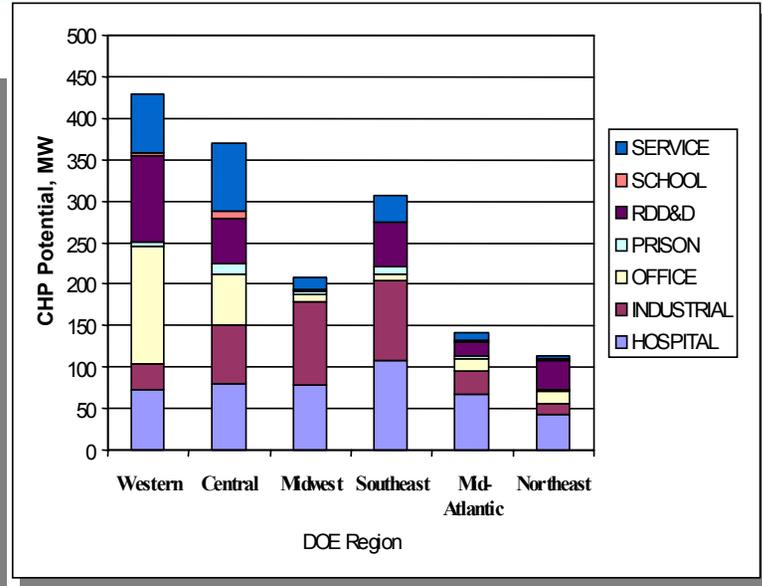
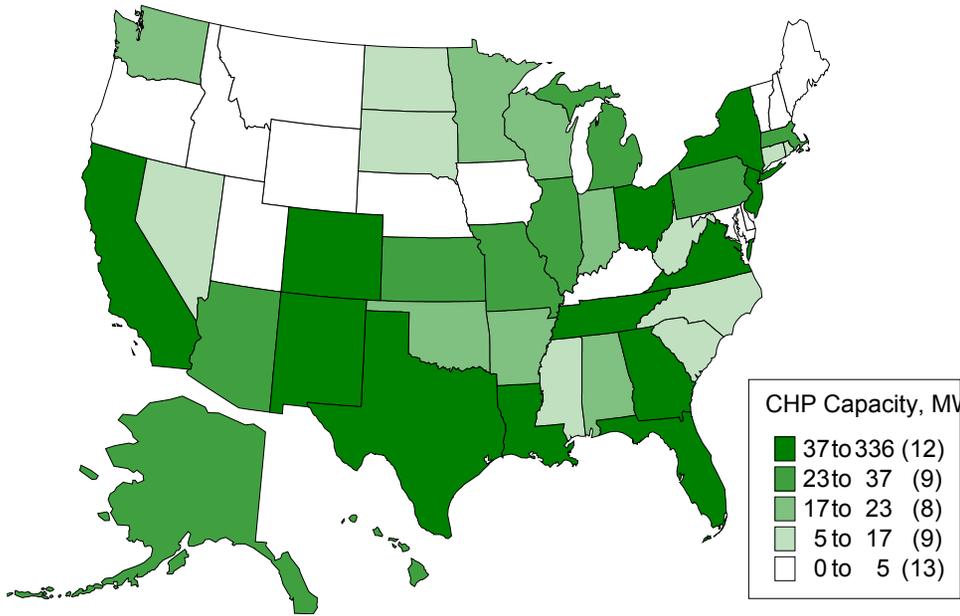


# FEMP Assistance





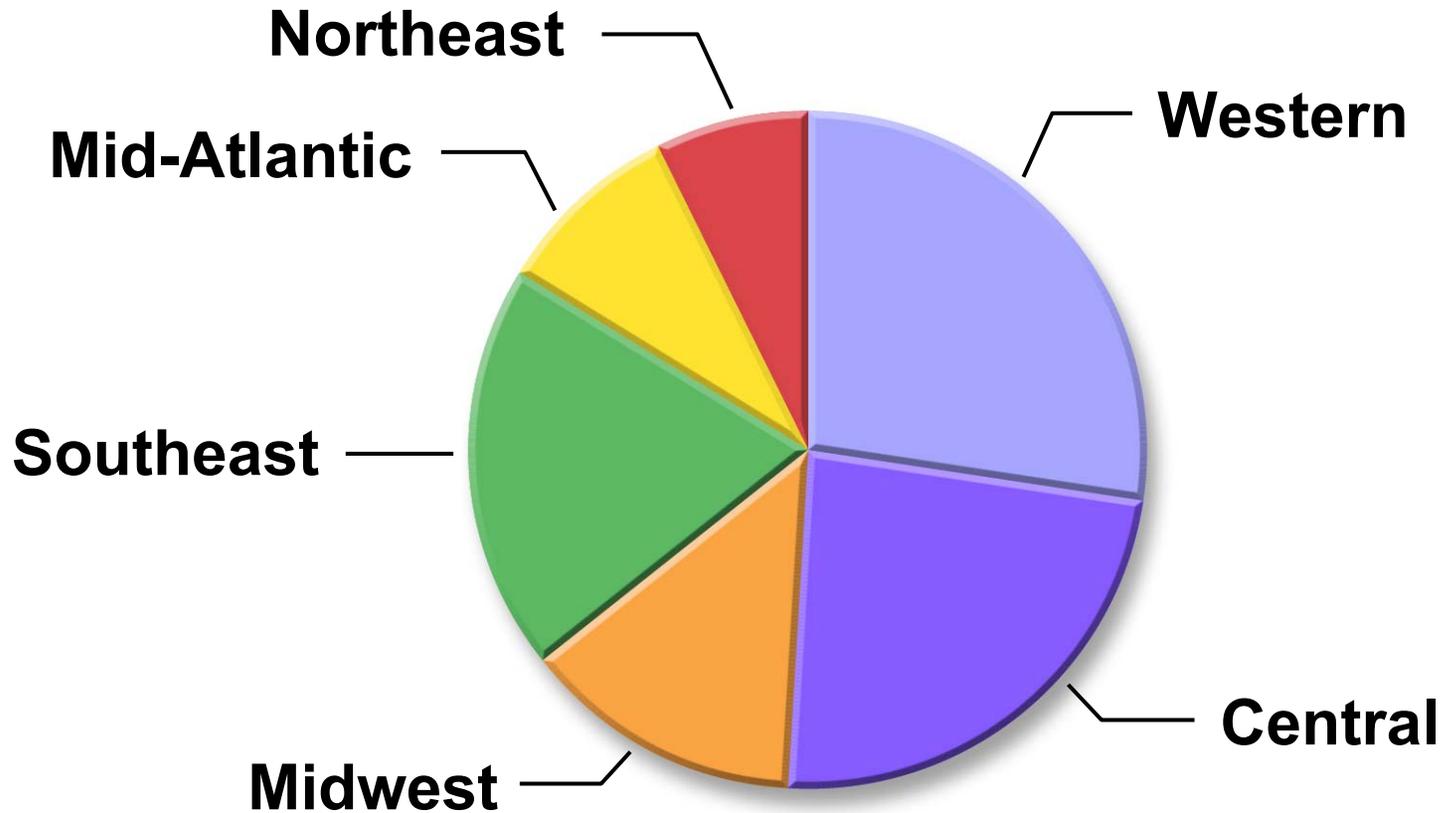
# CHP Market Assessment: Where DER is Advantageous





# Federal CHP Potential by Region

*More than Half in West*





# Financing

- **Energy Savings Performance Contracts (ESPCs)**
- **Utility Energy Service Contracts (UESCs)**
- **Enhanced Use Lease (EUL)**
- **Appropriations**

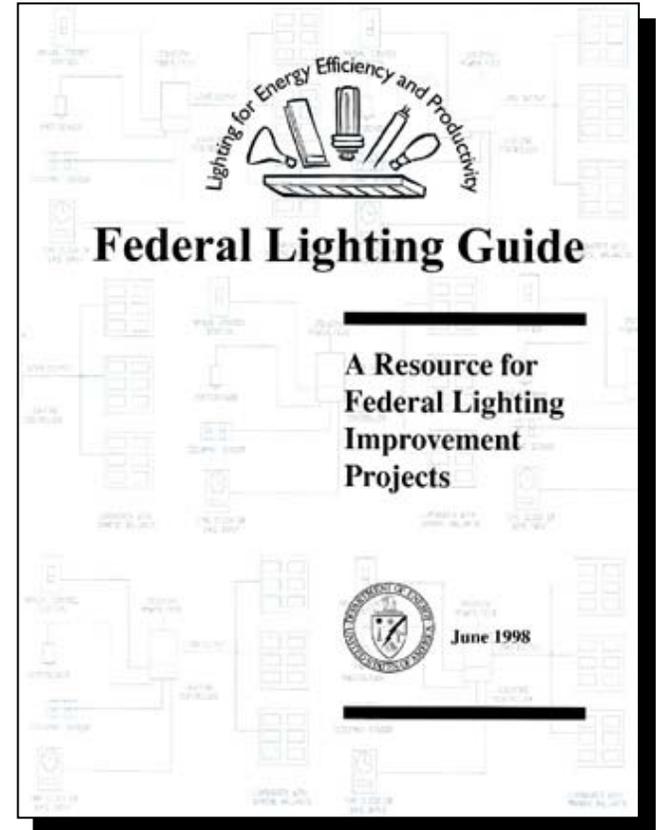




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# Technical Assistance

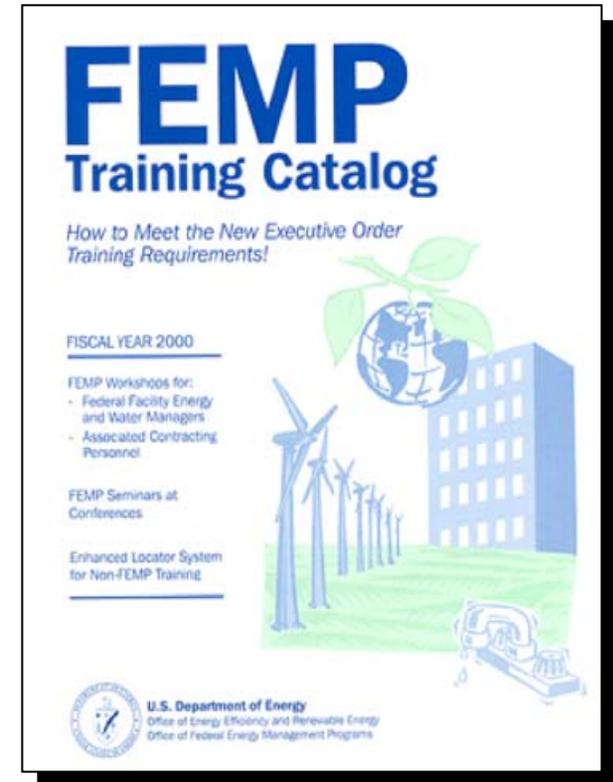
- **SAVEnergy Audits**
- **Design Assistance**
- **DER/CHP**
- **Renewable Energy/Green Power**
- **Labs21**
- **Industrial Facilities**
- **ALERT Audits**





# Technical Information Training

- **Software Tools**
- **Buying Energy Efficient Products**
- **New Technology Demonstration Program**
- **Federal Relighting Initiative**

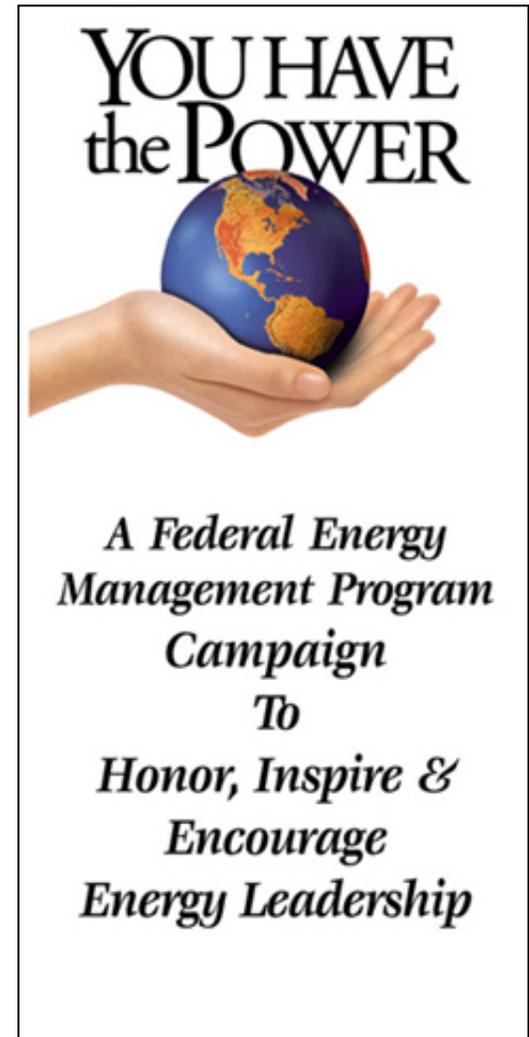




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# Outreach and Communications

- ***You Have The Power Campaign***
- ***FEMP Focus***
- **Energy 2003, FEMP's Annual Workshop & Exposition, August 17-21, Orlando, FL**  
**[www.energy2003.ee.doe.gov](http://www.energy2003.ee.doe.gov)**
- **Annual Energy Awards Programs**
- **[www.eren.doe.gov/femp](http://www.eren.doe.gov/femp)**
- **FEMP Help Desk: 800-363-3732**
- **DOE Regional Office FEMP Team**
- **DOE National Laboratory Liaisons**





# Useful FEMP Contacts

- Website:  
<http://www.eere.energy.gov/femp.html>
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