

COMMONWEALTH OF PENNSYLVANIA
GOVERNOR'S OFFICE
EXECUTIVE ORDER

Subject: Energy Management and Conservation in Commonwealth Facilities		Number: 2004-12
Date: December 15, 2004	By Direction of: Edward G. Rendell Edward G. Rendell, Governor	

- WHEREAS, the cost of energy continues to rise and traditional sources of non-renewable energy continue to be depleted at a rapid pace; and
- WHEREAS, the Commonwealth is a leading consumer of energy throughout Pennsylvania; and
- WHEREAS, the Commonwealth must demonstrate leadership in the conservation of energy by reducing the amount of energy we consume in our own facilities; and
- WHEREAS, the Department of General Services has the primary responsibility for the operation of Commonwealth-owned buildings in Harrisburg and is the primary operational agency of the Commonwealth; and
- WHEREAS, the Department of Environmental Protection has substantial expertise in the conservation of energy and effective energy management techniques; and
- WHEREAS, the Executive Agencies of the Commonwealth are primarily responsible for energy management and conservation in the buildings they occupy; and
- WHEREAS, all Executive Agencies must work together to conserve energy and reduce energy usage; and
- WHEREAS, the Commonwealth currently lacks a unified approach to energy management and conservation in Commonwealth facilities; and
- WHEREAS, maximum efficiency in energy management and conservation is best achieved through the implementation of a centralized energy strategy coordinated through a single agency.

NOW, THEREFORE, I, Edward G. Rendell, Governor of the Commonwealth of Pennsylvania, by virtue of the authority vested in me by the Constitution of the Commonwealth of Pennsylvania and other laws, do hereby issue the following *Executive Order*.

1. Responsibilities.

a. The Department of General Services shall act as the centralized coordinator of the Commonwealth's energy management and conservation measures in Commonwealth facilities for the Executive Agencies. In this role, General Services shall:

(1) Work with all agencies of the Commonwealth on effective methods to include energy conservation as part of any new construction project or renovation project, by way of Green Building Practices or otherwise, and work collectively to track and monitor the results of such energy conservation methods.

(2) Apply Life Cycle Cost Analysis to the selection of energy sources, systems, and controls for all new construction projects and renovation projects.

(3) Implement programs to train appropriate personnel in Life Cycle Cost Analysis.

(4) Act as the centralized authority for all Energy Service Company (ESCO) Projects implemented by the Executive Agencies. In this role, General Services shall:

(a) act as the approving authority for all ESCO Projects requested by the Executive Agencies;

(b) develop standard procedures by which ESCO Projects may be awarded;

(c) develop a comprehensive approach to ESCO Projects applicable to all Executive Agencies;

(d) provide advisory services and guidance to the Executive Agencies for the conception and implementation of ESCO Projects; and

(e) seek to develop and implement a single financing source for all ESCO Projects.

(5) Develop procedures to reduce energy use in all leased facilities, including the possible centralized purchasing of energy for Commonwealth leases and including energy conservation measures in lease specifications.

(6) Procure Energy Star® and other energy efficient products where economical and consistent with Life Cycle Cost Analysis.

(7) Research new and innovative methods of energy conservation.

(8) Benchmark best practices for energy conservation technologies with other public and private sector organizations.

b. The Department of General Services and all other Executive Agencies shall:

(1) Develop no-cost or low-cost energy conservation measures for all Commonwealth-owned and leased buildings. Such measures should include, at a minimum, the following:

- (a)** the reduction of energy use during Peak Demand Periods;
- (b)** measures to ensure that lighting systems are turned off during non-operating hours;
- (c)** conversion to more energy efficient lighting systems and bulbs as existing systems and bulbs reach the end of their life cycles;
- (d)** maximum use of natural lighting whenever possible and consistent with temperature control;
- (e)** measures to ensure that HVAC systems operate at reduced levels during non-operating hours;
- (f)** measures to ensure that all equipment powered by electricity, including computer equipment, is turned off when not in use and that personal computers go into "sleep" mode after five minutes of inactivity;
- (g)** temperature reduction for hot-water heaters in all facilities except where operational needs require a specific water temperature;
- (h)** the removal of lighting from all vending machines in lighted areas;
- (i)** the removal or reduction of all other non-essential lighting;
- (j)** maximum use of task lighting;
- (k)** the setting of refrigerators to the highest possible temperature;
- (l)** the prohibition of personal space heaters except in areas where central HVAC systems cannot provide adequate heat under objective standards;
- (m)** insulation of all hot water or steam pipes and hot water heaters;
- (n)** replacement of conventional light switches with motion-sensor switches;
- (o)** replacement of incandescent lights in exit signs with LED fixtures;
- (p)** maximum use of more energy efficient office equipment and turning off personal computers, printers, and other office equipment during non-business hours;
- (q)** frequent cleaning of light fixtures;

ment of filters;

- (r) frequent cleaning and maintenance of HVAC systems and routine replacement of filters;

- (s) improved insulation of windows, doors, walls, roofs, floors, and sealing of ductwork;

- (t) the closing of all windows during heating and cooling periods.

(2) Develop additional energy conservation methods based upon their individual operational missions.

(3) Designate facilities managers with primary responsibility to ensure that energy conservation measures are developed and complied with.

(4) Engage janitorial crews and security forces in the implementation of energy conservation measures.

(5) Continue to explore the use of ESCO Projects, Energy Star® products, Green Building Practices, and other similar energy conservation measures and implement such programs where appropriate.

(6) Explore re-commissioning or other adjusting of HVAC systems to ensure maximum efficiency.

(7) Develop a long-range energy use and conservation plan for each Executive Agency.

(8) Develop programs to educate and train employees in energy conservation methods.

c. Executive Agencies shall within 180 days of the date of this order, file a report with the Department of General Services setting forth all measures taken to implement the requirements of this order.

d. The Department of Environmental Protection shall:

(1) Provide advice and assistance to General Services and Executive Agencies in developing the energy management and conservation requirement of this order.

(2) On a continuing basis, develop and recommend additional no-cost or low-cost energy conservation measures to be implemented by General Services and the Executive Agencies.

(3) Develop long-range energy management and conservation methods to be applied in Commonwealth facilities.

e. The Office of Administration shall ensure that specific energy management responsibilities are incorporated into relevant job descriptions in all Executive Agencies.

2. Cooperation Among Executive Agencies and independent agencies. The Department of General Services may request and receive from any Executive Agency such cooperation, information, and data needed to properly implement the intent of this order. Independent agencies not directly under the Governor's jurisdiction are also encouraged to participate in the provisions of this order.

3. Definitions. As used in this order, these terms shall have the following meanings:

a. Energy Star® Products. Those products that have been designated as such by the U. S. Environmental Protection Agency or the U. S. Department of Energy and therefore use less energy, save money, and help protect the environment.

b. Energy Service Company (ESCO) Project. A guaranteed energy savings contract, as defined in *73 P. S. §§ 1646.1 – 1646.7*, providing for the acquisition of comprehensive capital energy improvements and services provided by qualified Energy Service Companies where the energy and cost savings achieved by the installed energy project cover all project costs, including financing, over a specified contract term.

c. Executive Agencies. Those agencies as defined in *62 Pa. C. S. § 103*.

d. Green Building Practices. Techniques that promote construction of buildings that are healthier for both the environment and the occupants through a variety of methods, including energy and water conservation, environmentally sensitive site planning, the use of resource efficient building materials, and superior indoor environmental quality.

e. Life-Cycle Cost Analysis. A methodology for calculating the whole cost of a system from inception to disposal.

f. Peak Demand Periods. The times during a given day when energy use is at its highest and costs are greatest, particularly afternoons on hot days.

4. Effective Date. This order shall take effect immediately.

5. Termination Date. This order shall remain in effect unless revised or rescinded by the Governor.