



Harmony Library Shines with ENERGY STAR® Lights

ENERGY STAR®
Residential
Light Fixture
Showcase

by Ian L. Todreas, The Cadmus Group, Inc.



“People like the warm color the lamps provide and they create a nice, cozy pool of light to read by. Many folks commented on how attractive they are, and I have seen people moving the lamps around on the tables to where they need them.”

Librarian, Karen Dornseif

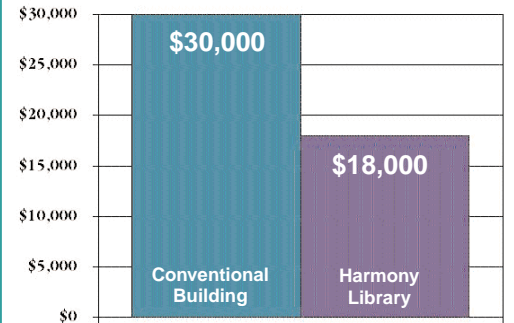
Fort Collins, CO—Harmony Library is a showcase for state-of-the-art, energy-efficient technologies and building design. Serving the community of Fort Collins and Front Range Community College, Harmony is projected to use about 40 percent less energy than a comparable new building in Fort Collins, saving nearly \$12,000 in annual operation costs. ENERGY STAR® labeled task lighting fixtures help Harmony Library use its resources for library services instead of electricity bills.

Harmony Library uses several approaches to task lighting. An important one is ENERGY STAR labeled table and floor fixtures, manufactured by the Adjustable Fixture Co. of Wisconsin. Besides meeting lighting needs efficiently, they create a sense of intimacy and add interest to the library.

Long Life Saves Money

ENERGY STAR labeled fixtures, such as those installed in Harmony Library, come with compact fluorescent light bulbs (CFLs) that typically last at least 10,000 hours (as opposed to most incandescent bulbs, which typically last about 500 hours). These long-life CFLs mean that less time and money are spent replacing burnt-out incandescent light bulbs. By using 26-watt CFLs in the ENERGY STAR fixtures, which provide the equivalent light of a 75-watt incandescent light bulb, the task lighting uses only one-third of the electricity compared to conventional lighting sources. This means lower electricity bills and fewer greenhouse gas emissions released into the atmosphere

Energy Efficient Harmony Library Saves on Annual Operating Costs



from generating electricity.

The “pin-based” CFLs fit into dedicated fixture sockets only and cannot be unscrewed and stolen. Vandalism and theft, which have prevented facility managers from using other long-life CFL products in the past, are greatly reduced with ENERGY STAR labeled fixtures.

Maximizing Light While Minimizing Lighting Costs

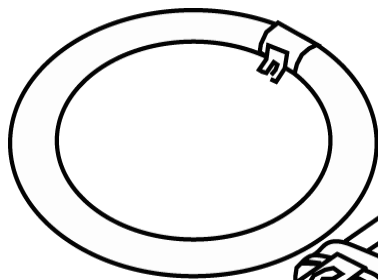
Lighting typically accounts for about one-third of a building’s electricity costs, so minimizing lighting costs while maximizing lighting quality were top priorities for the new library. Harmony’s carefully designed windows and celestories maximize natural light and minimize the need for electric lights. The natural light is complemented by well-designed electric lighting and efficient equipment.

An important part of the electric lighting strategy is providing the right amount of light where and when it’s needed. The library is bathed in a comfortable level of ambient light, which allows patrons to



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(continued)



Pin-based compact fluorescent light bulbs fit only dedicated sockets.

If every household in the United States switched to ENERGY STAR light fixtures, we could save 70 billion kilowatt-hours and prevent 100 billion pounds of carbon dioxide per year—equivalent to removing the pollution of 10 million cars!

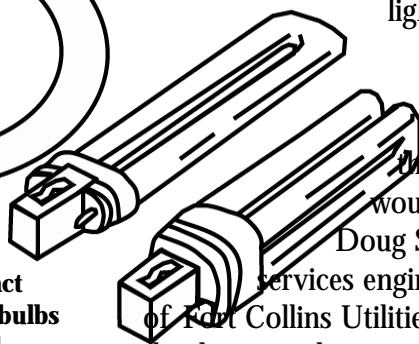
Source: Alliance to Save Energy

browse the stacks, find materials, and use computers. Task lighting provides additional illumination where it is needed: for example, at reference and circulation desks and in reading and study areas.

New Efficient Lamps Win Patrons' Endorsement

The public has responded positively to the library's lighting, especially the ENERGY STAR labeled desk fixtures.

"People like the warm color the lamps provide, and they create a nice cozy pool of light to read by," notes Karen Dornseif, one of the librarians who has monitored the use and performance of the lamps. "Many folks commented on how attractive they are, and I have seen people moving the lamps around on the tables to where they need them."

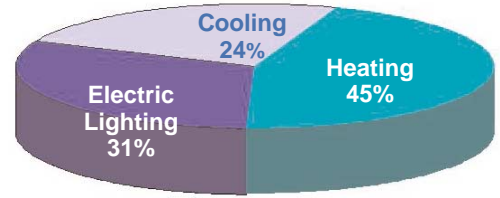


"Finding the right lighting that met all of the library's needs turned out to be more challenging than we thought it would be," says Doug Swartz, an energy services engineer with the City of Fort Collins Utilities, who has tracked the design and operation of the new building. The lamps had to be durable, attractive, low maintenance and, of course, as energy-efficient as possible. Adjustable Fixture Co.'s ENERGY STAR labeled desk and floor models met those criteria.

For the Harmony Library project, Adjustable Fixture Co. modified the fixture design to include an instant-on electronic ballast, a lamp that can be supplied by several manufacturers, and a built-in timer that switches lights off after two hours. This frees librarians from having to walk around turning off unused lights.

"Harmony Library demonstrates that the

Electric Lighting Represents Almost One-Third of Total Energy Costs



Source: www.light-power.org/hamonylib/lev1pages/frchallenges.htm

Data source: Lightforms, Boulder, CO.

ENERGY STAR labeled fixtures are not just for homes," notes Peter Banwell, Director of the United States Environmental Protection Agency's (EPA) ENERGY STAR residential light fixtures. "These work well in all kinds of municipal buildings, from libraries to city halls to fire and police stations."

For More Information

If you would like to know more about ENERGY STAR residential light fixtures, call the toll-free hotline 1-888-STAR-YES (1-888-782-7937); visit www.energystar.gov; or contact: Peter Banwell, ENERGY STAR Residential Light Fixtures U.S. EPA, 501 Third Street NW, 5th Floor, Washington, DC 20001, 202-564-9408, Banwell.Peter@epamail.epa.gov