

# Daylight Cleaning

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While daylight cleaning has had some longstanding proponents—hospitals, schools, hotels and casinos, for instance—the move to bring janitorial services into the daytime has gained momentum in the past few years, with corporations and service providers among those joining the ranks.

The reasons for the growing trend—which may include vacuuming reception areas at 7 a.m., disinfecting restrooms an hour later, emptying trash cans and recycling receptacles mid-morning and mid-afternoon a few times a week—are multifold. Daylight cleaning can positively impact office workers and service providers, the environment and the bottom line.

Typically for many organizations, cleaning has involved one crew that starts to clean at 5 p.m. (night shift cleaning) or two to three crews cleaning during evenings and nights (mixed cleaning).

In daylight cleaning, internal and/or contract housekeeping personnel may start their shifts before, or at the same time as, other company employees start their day, working Monday to Friday on routine tasks. The efforts may also include one day shift or two shorter day shifts, typically from 6 a.m. to noon and noon to 6 p.m., noted lan Greig, CEO of Daniels Associates.<sup>1</sup>

## At Armstrong

Armstrong World Industries, Inc., long a leader in sustainability practices, implemented daylight cleaning at its headquarters outside Lancaster, Pennsylvania five years ago. The manufacturer of bio-flooring, linoleum flooring and FloorScore®-certified products was an early adopter of the cleaning trend.

James Baker, director of Facilities Management for the 26-building campus, said deregulation of utility provider PPL Electric in 2010 spurred Armstrong to further explore the daylight cleaning option. This became more important as deregulation helped drive up the company's 1-million square foot headquarters' electric rates by 80 percent.

"We were always focused on energy conservation," Baker said of Armstrong, a global leader in the design and manufacture of floors and ceiling systems with 40 plants in eight countries. Armstrong personnel discussed moving to daylight cleaning when they certified their headquarters as LEED® Platinum in 2007, but recognized there were challenges that would have to be dealt with, such as noise and safety.

"When rates increased, we determined we could save around \$3,000 a week if we changed our housekeeping habits. That was close to \$150,000 a year," Baker said. "That got our attention."

Armstrong collaborated with its longtime cleaning service, ABM Industries Inc. of Spring Grove, Pennsylvania, on a housekeeping shift from 5 p.m. to midnight to daylight cleaning. Prior to implementation, Armstrong managers met with ABM personnel, including subject matter experts, and solicited feedback from their own employees. ABM already had implemented daylight cleaning programs for some of its major clients, including SEPTA, Colonial Penn Insurance, Bayer, Bechtel Power Corp. and State Farm Insurance.

For Baker, the move to daylight cleaning was such a milestone that he can remember the date of the switch without missing a beat: June 7, 2010.

Armstrong is not alone in the daylight cleaning arena.

Gene Woodard, director of Building Services at the University of Washington (UW), Seattle, said his university started transitioning to daylight cleaning in 1997 and virtually completed the process in 2010.

In making the move, UW asked for volunteers to switch from the swing shift to daytime positions. This continued from 1997 to 2010. Through attrition, all but 50 people out of the 270-member staff made the move to a 5 a.m. to 1:30 p.m shift. In 2010, thanks to customer satisfaction, improved productivity and higher-quality cleaning in the buildings on daytime cleaning schedules, UW mandated the move of the last remaining buildings and staff to daytime schedules. (Three



carpet cleaners and about a half dozen custodians remain on a swing shift, working 4:30 p.m. to 1 a.m., with the custodians locking campus buildings.)

Energy conservation was part of the drive behind the change, but not all of it. "I wanted a better quality of life for my staff," Woodard said of the impetus behind the move. "I wanted staff to be more connected with the campus community." <sup>2</sup>

As shown in Figure 1, UW was able to document the non-cost benefits of daylight cleaning including reduced employee absenteeism.

Figure 1: Daytime Cleaning Yields Employee Related Benefits for The University of Washington, Seattle

Metric	Night Shift Cleaning (1997)	Daytime Cleaning (2012)
Production rates per worker 7 hr. shift	20,000-24,000	36,000-42,000
Worker fatigue	Lower rates of production	High rate of production
Full-time equivalent employee count	315	282
Worker absenteeism	17-20%	11-12%
Worker transportation	98% of 315 workers drove their own car to work	40% of 282 workers van pool to work

Insurance giant State Farm has had an "outstanding experience" in moving some of its buildings to daylight cleaning and saved 10 percent on cleaning costs, according to Steve Spencer, a facilities specialist who manages about 1,500 of State Farm's buildings.<sup>1</sup>

Fluor Corporation, a global engineering construction company, switched three of its facilities to a daylight schedule, turning off lights at 9 p.m. instead of 2:30 a.m., cutting 777,300 kWh annually and trimming \$70,000, according to John Sorich, director of Office Services for the company.<sup>3</sup>

While cleaning consultant Steve Ashkin acknowledges that daylight cleaning won't work everywhere, he noted, "Especially for buildings that are occupied from just 8 a.m. to 5 p.m., we think it's a real opportunity for many of them."

## **The Benefits**

Daylight cleaning has a broad range of benefits. According to International Facility Management Association (IFMA) Foundation's Global Green Cleaning Guide, those benefits include lowering costs, reducing nighttime energy loads, helping the environment and greater building security.

Vincent F. Elliott, founder, president and CEO of Elliott Affiliates Ltd. of Hunt Valley, Maryland, and a leading authority on topics related

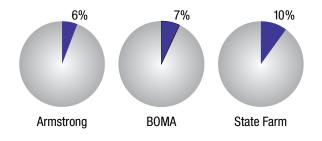
to janitorial outsourcing and ongoing management, noted, "...we conclude that on average, day shift cleaning produces higher cleanliness quality, greater customer satisfaction and higher productivity than night shift or mixed shift alternatives." <sup>5</sup>

#### Among the benefits are:

 Energy Cost Savings — When companies use night shift or mixed-use cleaning, they must leave lights on for extended hours. Heating and air conditioning remain on. Elevators run. With a daylight cleaning approach, that can often be cut in half.

According to BOMA (Building Owners and Managers Association), janitorial services account for almost 25 percent of weekly lighting use, or about 7 percent of total energy use in a building.<sup>6</sup>

Figure 2: Daylight Cleaning Energy Saving Experience by Select Organizations



#### (See Figure 2.)

Experts indicate that firms can expect to save 4 to 15 percent in energy costs annually thanks to daylight cleaning. (See Figure 3.) Armstrong's headquarters has realized a savings of 6 percent. (See Figure 2.)

The savings may be greatest in larger spaces. Anthony Trombetta, head of membership services for ISSA, The Worldwide Cleaning Industry Association, noted, "A lot of savings come from utilities and not having to turn things on at night. If you're in a 5,000-square-foot building, that might not make much of a difference. But for a 50,000- or 5-million-square-foot facility, turning on the heat and lights for a few extra hours really adds up."

- Lower Labor Costs The University of San Diego's Michael Tran said that firms can reduce cleaning labor costs by as much as 10 to 20 percent "by combining cleaning duties, such as those of day porters." Fluor Corporation, for instance, decreased staff thanks to an overlap of day porters and janitorial crew and saved an extra \$60,000 per year, according to buildings.com. Armstrong cut cleaning labor costs by 10 to 14 percent.
- Environmental Benefits A Local 26 SEIU/BlueGreen Alliance report stated, "...the quickest, easiest, and cheapest method to fight global warming is to reduce energy waste in large buildings. Commercial and residential buildings in the U.S. account for about 40 percent of national energy consumption, 70 percent of



Figure 3: Benefits of Daylight Cleaning



electricity consumption, and 38 percent of global warming pollution—the largest share among all sectors of the economy, and far exceeding all modes of transportation." <sup>9</sup>

- Safety, Health, Security The Local 26 SEIU/BlueGreen Alliance report also said that daylight cleaning provides a safer and healthier environment, with daylight workers having lower rates of illness and injury than nighttime workers. Shift workers are more likely to suffer from hearing loss, heart disease, stress and stroke. Additionally, with daylight cleaning in place, corporate managers do not have to issue keys to night staff, and sensitive materials are more secure.
- Better Employee Retention and Greater Job Satisfaction While some housekeeping personnel prefer evening and night hours because they work in the field as a second job, for others the switch to daylight cleaning offers more time to spend with family and friends.
- Increased Awareness, Respect and Communication Cleaning staff traditionally have been more likely to do their work when building occupants were out of the building. Daylight cleaning increases the odds of cleaning staff and office staff interacting and getting to know each other better. "Day-cleaning proponents claim subtle but valuable benefits from having building employees develop more of a cooperative relationship with their cleaners, who as night workers are faceless," said Ronald Kovach.<sup>10</sup>

Cleaning consultant Ashkin, on the same site, said that many tenants like having housekeeping personnel in the office during the day. "They see a custodian there, they make the mental connection that, yes, somebody is cleaning every day and it actually makes them feel that the building is cleaner, even though the same level of cleaning was taking place previously." <sup>10</sup>

 Results – Research indicated that daylight cleaning also provides good results. Cleaning consultant Elliott Affiliates' 2010 report benchmarking various cleaning strategies showed that, on average, day shift cleaning delivers marginally greater cleanliness quality and greater client satisfaction and it delivers substantially greater productivity than night shift or mixed-shift cleaning. (The firm also notes that it is less costly than mixed-shift cleaning and more costly than night cleaning.)<sup>5</sup>

For Armstrong, daylight cleaning also contributed to it recently being awarded the coveted LEED® Platinum rating for an existing building from the U.S. Green Building Council for its headquarters.

## The Challenges

As with so many changes, with benefits also come challenges. That can be true of daylight cleaning as well, but those who have implemented or researched the approach report the challenges can be addressed with thoughtfulness and discussion. According to the University of San Diego's Tran and others, those challenges may be wide ranging—tenant buy-in, productivity issues, distractions and safety.

- Language and Cultural Differences Armstrong's Baker said that some language and cultural differences had to be considered when the flooring giant contemplated daylight cleaning. Many of ABM's housekeeping personnel do not speak English as their first language. They also were reluctant to knock on employees' doors to gain entrance to their offices. Baker said that with communication and training, Armstrong and ABM employees developed relationships that had not existed before. Armstrong staff started taking better care of their environments once they better knew the people caring for them. "Now that they got to meet 'Shirley,' they developed a relationship," he said.
- Safety Safety also was a major concern, one that the Armstrong/ABM team addressed in part with signage indicating, among other things, to use caution around equipment cords.
- Noise To address noise concerns, Armstrong replaced corridor carpet with resilient flooring that could be cleaned with a battery-powered machine. This not only reduced noise and cleaning time, but also eliminated tripping hazards from vacuum cords.
- Impact on Office Work Some employees do not want the interruption of cleaning while they are in their offices, and may wave housekeeping off. Greig, on the facilitiesnet.com site, suggests cleaning time and the subsequent break in office work may be brief—say as short as 30 seconds—and those with objections may have their offices scheduled for cleaning early in the morning. Some people believe cleaning during the day diminishes the image of a firm, especially with clients and other visitors. For those individuals, daylight cleaning may also be planned for less-busy or less-disruptive times.

## **Critical to Daylight Cleaning**

Perhaps the two most important concerns related to introducing daylight cleaning are communication and training. Numerous experts in the cleaning field and facilities personnel who have worked on developing daylight cleaning for their organizations assert that both will help ensure success.



UW's Woodard said hands-on training on cleaning procedures is important. However, just as important is training on customer service and communications so that staff has the confidence to do their jobs well. He noted his team handles different buildings with different approaches. In one building, nine custodians may all vacuum early in the shift, then go on to perform other tasks. In another building, staff may use a team cleaning approach, and in other smaller buildings traditional zone cleaning is employed. "There's not one system that works for each building," Woodard said. "You need to be flexible and you need to understand the flow of the activities, the traffic patterns. It's a different challenge from what you have in swing shifts."

On its website, Lowe's ProServices noted, "The more you find out about the habits of the workforce, the smoother the transition will go. That includes finding out what parts of the buildings are conducive to day cleaning. Reach out to people — speak with parking lot employees to find out how many people work after hours. On the day of the change, post reminders in the lobby. Afterward, stay in touch with tenants to provide opportunity for feedback. If certain spaces can't be interrupted, there may be a way to work around them. Some companies cut costs by making a partial shift to daytime to accommodate occupants, and reserve vacuuming for before 8 a.m. or after 5 p.m."

At Armstrong, administrators used a multipronged approach to prepare staff for the changeover. Among those elements were a written overview and Q&A sent to all employees at the headquarters' campus. The memorandum educated employees on the planned changes and outlined the logistics and benefits of the initiative (energy usage reduction/cost savings through incorporating housekeeping during typical business hours, improved sustainability and lower  $\mathrm{CO}_2$  emissions, more effective housekeeping practices and improved relationships between housekeeping staff and Armstrong employees).

The Q&A, among other issues, outlined frequency of housekeeping services, dealing with special requests and security.

## **The Big Picture**

Daylight cleaning often, but not always, goes hand in hand with green cleaning. When Armstrong re-certified its headquarters as LEED® Platinum in 2014, the corporation incorporated daylight cleaning into its campus Green Cleaning Policy.

The Local 26 SEIU/BlueGreen Alliance noted, "reducing energy consumption in large commercial and residential buildings will not, in itself, make those buildings 'green.'" The two programs should go hand in hand. With green cleaning, cleaning products and practices that have lower environmental impacts and more positive indoor air quality impacts are used. According to the Local 26 SEIU/BlueGreen Alliance, green cleaning can "improve indoor air quality and reduce injuries to workers using cleaning products."

Armstrong's ABM service uses Green Seal-certified cleaning products that meet low volatile organic compound emission

standards, microfiber cleaning towels and HEPA vacuum cleaners, while also providing ongoing housekeeping training to minimize indoor air quality issues.

While Armstrong has been a leader in both daylight and green cleaning, the international corporation is not alone in integrating both as integral components of housekeeping services. More and more organizations are adopting both approaches, and those approaches are expected to foster broad improvements in the environment, finances, lifestyles and health.

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