### IMPACT OF DESIGN SERIES, VOL. 1

# ASID HQ Office



**PROJECT TYPE:** Corporate office (Workplace)

LOCATION: Washington, D.C.

SIZE: 8,500 SF

**CASE BRIEF BY PERKINS+WILL** in collaboration with ASID



PERKINS + WILL



### CLIENT OVERVIEW

The American Society of Interior Designers (ASID) believes that design impacts lives, and collaborates with others to promote the value of interior design. ASID represents the industry through cross-functional and interdisciplinary relationships among designers of all specialties, and among design practitioners, students, manufacturers, and suppliers.

### DESIGN CHALLENGE

Create a living laboratory for the "Workplace of the Future," which becomes a model for innovative workplace design where collaboration, flexibility, sustainability, and occupant well-being are the primary design drivers. Additionally, to achieve LEED Platinum and WELL Platinum certification to receive third-party validation on the main goals of occupant well-being and sustainability.

### **DESIGN SOLUTION**

#### **KEY FEATURES:**

- Free address
- Workspace choice
- Active design
- Healthy materials
- Biophilic design
- Circadian lighting

### IMPACT OF DESIGN

- Collaborative work increased 9 percent
- Physical health and mental health scores improved
- Productivity increased 16 percent, yielding an estimated increase of \$694,000 financial impact to the Society's bottom line during the first year of occupancy (expected to yield a \$7M increase in financial impact during the total 10-year lease agreement, given a consistent improvement rate)
- Energy savings amount to \$7,636, 38.2 ton of coal not burned, and 72.9 ton of  $CO_2$  not emitted, during first 15 months of occupancy



### PROCESS

#### TIMELINE

- Programming and Visioning April 2015
- Schematic Design May 2015
- Design Development June/July 2015
- Construction Documents August – October 2015
- Construction November 2015 May 2016

### PROJECT

### PROJECT COSTS

- Construction cost: \$153/sf (includes costs covering building enhancements that were not shared by other tenants on the floor)
- Furniture cost: \$28/sf (includes discounting)

### **PROJECT TEAM**

- Architect/Designer: Perkins+Will
- Project Manager: Savills Studley
- Real Estate Broker: Savills Studley
- General Contractor: Rand\* Construction
- MEP Engineer: GHT Limited
- Acoustical Consultants: Cerami
- Lighting Consultants: Benya Burnett
- Biophilia Consultants: Terrapin Bright Green
- Commissioning Agent: Bios



## OVERVIEW

he American Society of Interior Designers (ASID) new corporate headquarters (HQ) office located in downtown Washington, D.C. is the first space in the world to achieve both Platinum Level Certification for the WELL Building Standard<sup>™</sup> (WELL<sup>™</sup>) under WELL v1 and Leadership in Energy and Environmental Design (LEED), under the LEED ID+C rating system – the highest recognition awarded by the U.S. Green Building Council (USGBC) and the International WELL Building Institute<sup>™</sup> (IWBI<sup>™</sup>). The 7,500 square foot office space (and 1,000 square foot Material ConneXion library), designed by Perkins+Will as a "Workplace for the Future," incorporates the most innovative health and wellness design features, and has sustainability as a central philosophy.

The new ASID HQ office is a free address environment providing many opportunities for collaboration and a variety of workspaces for employees to choose for their daily work needs. An abundance of daylight streaming from the entire north facade is accessible from all individual workstations and is accompanied by light fixtures to support circadian lighting. Along with access to nature through views from the windows, biophilic design was incorporated throughout the office to reduce stress and trigger elevated levels of cognitive and emotional performance in occupants. Air quality improved significantly compared to the office ASID had previously occupied, through the use of air ventilation and filtration strategies, and by being mindful during material selection. The new ASID HQ office design has begun to make a positive impact on the organization and its employees after 15 months of occupancy.



Designed by Perkins+Will as a "Workplace for the Future," the ASID HQ incorporates the most innovative health and wellness design features, and has sustainability as a central philosophy.

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## BACKGROUND

n 2012, ASID put out a request for proposals to design its new headquarters as a "Workplace for the Future." The award went to Perkins+Will and, with Savills Studley as the real estate broker, the journey began to acquire a new space.

ASID had previously occupied a three-story, singleoccupant building in Capitol Hill since 1977, with the most recent renovation completed in 1998. The building had an abundance of space, for the occupants, with some commenting that there were days when they did not encounter anyone. The high-partitioned cubicles afforded acoustical and visual privacy; however, did not support collaboration. Upon reviewing the financial costs for undergoing another renovation, the ASID National Board of Directors decided to sell the property and move to a new space. A request for proposals was sent out and Perkins+Will



was awarded the project in 2012. The property sold in 2014 before acquiring a new office space, leading ASID to temporarily occupy a co-working site for over a year before finally moving into its new headquarters office in downtown Washington, D.C. The new ASID HQ office is in a LEED-EBOM Gold-certified building, located in a lively mixed-use area with shopping, restaurants, entertainment, offices, hotels, and residential buildings, and within one half mile of two subway stations and at least ten bus lines. The ten-year lease provides six secure bicycle racks for ASID use, access to the building's fitness center, showers, changing rooms, and rooftop patio.

As an association representing the industry through cross-functional and interdisciplinary relationships among designers of all specialties, including workplace, healthcare, retail and hospitality, education, institutional, and residential, and among design practitioners, students, manufacturers, and suppliers, ASID leads conversations around topics that matter: from evidence-based and humancentric design, to social responsibility, well-being, and sustainability. Naturally, primary design drivers followed the ASID identity and their core values through collaboration, flexibility, sustainability, and occupant well-being, with project goals also extending to accommodate different workstyles, technology, resiliency, social responsibility, advocacy, and industry representation. Existing standards were referenced for design guidelines, with LEED Platinum and WELL Platinum certification specifically targeted to receive third-party validation on the main goals for the project.

### PROCESS

he design process for the ASID HQ office was truly an interdisciplinary and collaborative process among all stakeholders and project team members. The design team was engaged with the project from the very beginning, meeting several times with ASID during the early stages of the project to discuss project goals and expectations. Visioning and visual vocabulary sessions helped establish priorities and determine visual representations. An Innovation Charrette with ASID stakeholders and outside experts identified specific project goals and drivers.

The design team, ASID, and real estate broker met during building selection to ensure that the building met the design and wellness goals of the project. Once the space was acquired, the designers took the lead in engaging a team of consultants, including lighting, acoustics, biophilia, engineers, commissioning agents, building landlord, and general contractor to achieve all project goals. The designers also led charrettes for both the LEED and WELL standards, and once the project began construction, WELL goals and protocols were a standing topic during the weekly meetings to ensure that the entire design and construction team was aware of the project goals. ASID staff were also brought through the space at several key points during construction to educate them on the process. Once the space was acquired, the designers took the lead in engaging a team of consultants, including lighting, acoustics, biophilia, engineers, commissioning agents, building landlord, and general contractor to achieve all project goals.

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## DESIGN SOLUTION AND IMPACT



### COLLABORATION

The new office reduces the amount of square feet occupied by ASID by 60 percent from its original building. By examining work processes and behaviors, ASID chose to implement a free address environment with unassigned seating to enable employees to select from a variety of workspaces based on what best supports their specific tasks for the day. Spaces range from highly collaborative teaming environments to more intense, private, heads-down focused environments. All individual workstations are universal, equipped with sit/stand capabilities, and supported by ergonomic furniture and fixtures. Collaborative areas are flexible enough to support multiple functions or activities; for example, the main conference room can be transformed into a boardroom, classroom, lecture room, or social space for an event. Employees are able to reserve spaces through a room reservation system called Optix which displays space utilization data for users.

Collaborative work increased 9 percent after working in the new office for 15 months. Preferred method for communication among employees changed from emails to face-to-face interactions in the office.



### MATERIALS & FURNITURE

Materials and furniture specified for the project were rigorously evaluated to eliminate substances that could potentially contribute to negative health effects, where possible, in compliance with the Society's health and sustainability goals. Products with Health Product Declarations, DECLARE, or Cradle to Cradle Certification make up most of the material specifications, and all furniture on the project has one of those labels or is certified under the BIFMA Level standard. Material transparency in at least 50 percent (as measured by dollar value) of interior finishes and finish materials, furnishings (including workstations), and built-in furniture through material descriptions such as Health Product Declaration and DECLARE labels are compiled and made readily available to ASID employees.

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### AIR QUALITY

Codes and standards related to indoor air quality were met through strategies implemented in the HVAC system, materials, and specified furnishings. MERV 13 media filters are used in the ventilation system to filter outdoor air and MERV 8 media filters are used in the ventilation system to filter recirculated air. Ultraviolet lamps are employed on the cooling coils and drain pans of the mechanical system supplies. Carbon filters were added to the building air handling units to provide enhanced filtration of VOC's and large particulates.

Satisfaction with air quality is highest (110 percent increase).

 $CO_2$  levels during work hours are on average, 570 ppm (2.5 times less than measured in previous office).



\*Equivalent Melanopic Lux (EML) measures the biological effects of light on humans.



### LIGHTING

Located on the northwest corner of a multi-tenant floor, the office receives ample daylighting through the entire day. All workspaces have access to daylight and views to the outdoors. A circadian lighting system, designed to mimic the daily color temperature cycle of natural daylight, was designed to maximize the health benefits of exposure to natural light for occupants. Exposure to this daily dark/light cycle triggers a physiological process in humans known as Circadian Rhythm, which in turn influences a host of other physiological conditions, like alertness, blood pressure, metabolism, and reproduction. Research has linked disruption of the circadian cycle to health effects including fatigue, weight gain, elevated stress levels, and risk for breast and prostate cancer. Fixtures are lamped with color changing LED or with multiple cool (5000K in the morning/early afternoon) and warm (2700K in the late afternoon/evening) fluorescent lamps, and the lighting transition is managed through the Lutron Quantum Control system. Motorized automated shades on all exterior facades are connected to solar sensors located on window mullions which track the position and intensity of the sun and automatically adjust height of shades to reduce glare and heat gain as well as maximize benefits of natural davlight. All computer screens are oriented so that computer screens face within 20° perpendicular to the plane of the nearest window for low-glare. Light fixtures were specified with direct/indirect throw to bounce light off multiple surfaces, allowing for greater ambient light intensity.

All employees are exposed to daylighting during work hours. (17 percent were without access to windows, and 41 percent did not have windows in their peripheral view in the previous office).

81 percent of tested locations (workspaces) had more than 250 EML\* on an overcast day.



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### ACOUSTICS

Ceiling systems, acoustical panels, and a sound masking system contribute to the acoustical privacy in the office. The ASID customer service team has dedicated space to receive calls throughout the day and to ensure their privacy along with those working in the open office. This area has walls with higher NIC and acoustical panels for sound absorption. The plan of the office accounted for varying levels of acoustic privacy, with more interactive space, like the large conference room and café, located at the front of the space, and more acoustically isolated spaces, like huddle and meeting rooms, located at the opposite end.

*Sound levels reduced 50 percent (10dB difference).* 

Sound levels in the call center reduced to a quarter of the sound levels measured in the customer service team space in the previous office (20dB difference).



### **BIOPHILIC DESIGN**

Biophilic design strategies are employed throughout the space to reduce stress and trigger elevated levels of cognitive and emotional performance in occupants. Referencing the 14 patterns of biophilic design by Terrapin Bright Green, LLC, natural materials, dynamic architectural forms, and patterning that evokes natural sequences and spatial configurations the evoke feelings of mystery and refuge were all employed to resonate with occupants on a subconscious level and improve their experience in the space. Examples include: entry sequence designed like a curved path that gradually reveals views to the office suite (Pattern 13: Mystery); the pattern of the exposed structure of dragonfly wings embedded in the window film in the entry corridor is an abstract reference to natural fractal patterns (Pattern 10: Complexity + Order); exterior views to adjacent roof top gardens and the biodiversity among the plant species in the space (Pattern 1: Visual Connection to Nature); and uninterrupted access to the northern and western exterior façade provides exposure to daylight from multiple angles (Pattern 6: Dynamic + Diffuse Light).



### WATER, FOOD, FITNESS

Water filtration systems are in place for drinking water, sink water, and cleaning (dishwasher) water. ASID promotes drinking water and provides healthy snacks and nutritional information to encourage healthy behaviors. Plates and glasses are in small serving sizes to promote healthy portions. Active design strategies are implemented around the office, including sit/ stand workstations, centralized layout with copy/ mail room located in the center, and trash bins located only in the café and copy/mail room to encourage physical activity. ASID hosts internal employee challenges that encourage healthy eating behaviors, water consumption, and physical activity in the space through friendly competition.





### **BUILDING PERFORMANCE**

The tenant space and its HVAC systems exceed ASHRAE/IESNA 90.1 - 2007 levels of energy efficiency. Connected lighting power density is 21 percent below lighting power allowance according to ASHRAE/IESNA Standard 90.1-2007. Daylight responsive controls are installed in over 50 percent of the connected lighting load. Occupancy sensors are installed for over 75 percent of the connected lighting load. Daylight sensing photocells dim lighting during time periods where daylight harvesting is possible. Appropriate zoning and controls are implemented in the HVAC design including separate control zones for each exposure, separately zoned interior spaces, private offices, and special occupancies with active controls capable of sensing space use and modulating the HVAC system in response. Motorized automated shades on all exterior facades are connected to solar sensors located on window mullions which track the position and intensity of the sun and automatically adjust the height of shades to reduce glare and heat gain as well as maximize benefits of natural daylight. New equipment and appliances in the space are Energy Star rated. Ongoing accountability and optimization of energy is provided through the installation of meters documenting electricity usage. The system monitors lighting load, HVAC load, computer equipment, and general purpose electricity. 100 percent of the tenant's energy requirements are offset by renewable energy through Green e-certificates.

Energy savings amount to \$7,636, 38.2 ton of coal not burned, and 72.9 ton of  $CO_2$  not emitted, during first 15 months of occupancy.

Measures from water efficient fixtures in spaces utilized by ASID (including restrooms shared with other tenants) equate to a total wastewater reduction of 41 percent.



### ABOUT ASID

The American Society of Interior Designers believes that design transforms lives. ASID serves the full range of the interior design profession and practice through the Society's programs, networks, and advocacy. We thrive on the strength of crossfunctional and interdisciplinary relationships among designers of all specialties, including workplace, healthcare, retail and hospitality, education, institutional, and residential. We lead interior designers in shared conversations around topics that matter: from evidence-based and humancentric design to social responsibility, well-being, and sustainability. We showcase the impact of design on the human experience and the value interior designers provide.

ASID was founded over 40 years ago when two organizations became one, but its legacy dates back to the early 1930s. As we celebrate nearly 85 years of industry leadership, we are leading the future of interior design, continuing to integrate the advantages of local connections with national reach, of small firms with big, and of the places we live with the places we work, play, and heal. Learn more at <u>asid.org</u>.

### ABOUT PERKINS+WILL

Perkins+Will is an interdisciplinary, research-based architecture and design firm established in 1935 and founded on the belief that design has the power to transform lives and enhance communities. Each of the firm's 24 offices focuses on local, regional, and global work in a variety of practice areas. With hundreds of award-winning projects annually, Perkins+Will is highly ranked among top global design firms. Perkins+Will is recognized as one of the industry's preeminent sustainable design firms due to its innovative research, design tools, and expertise. The firm's 1,800 professionals are thought leaders in developing 21st century solutions to inspire the creation of spaces in which clients and their communities work heal. live. and learn. Social responsibility is a fundamental aspect of Perkins+Will's culture and every year the company donates 1% of its design services to pro bono initiatives. In 2015, Fast Company ranked Perkins+Will among "The World's Top 10 Most Innovative Companies in Architecture."

Located in the heart of the nation's capital, the Washington, DC office is a diverse practice delivering thoughtful, transformative, clientfocused solutions. As a leader in the marketplace, our client roster includes institutional, corporate, government and individual leaders who are on the forefront of building and shaping our region.

For more information, visit <u>www.perkinswill.com</u>.