

September 2025

### What are the advantages of using LEED for airport facilities?

LEED-certified airport facilities are the triple bottom line in action, benefiting people, planet, and profit. LEED certification leads to healthier, more productive places, reduced stress on the environment, impressive savings through reduced utility costs, and enhanced building value. They are designed and operated to consume less water, less energy, fewer natural resources and are ultimately aimed to reduce the overall impact of the development on the local, regional, and global environment. Teams across the world are using LEED to ensure a more efficient, equitable, and sustainable future across all project types from airport terminals to fire stations to offices located at the airport. LEED is helping the transportation industry achieve ambitions sustainability goals while also helping airport projects generate significant savings on operating costs.

Airport terminal/concourse projects have different energy and water needs, higher footfalls, unique ventilation requirements, high equipment loads, and 24/7 operations that all make pursuing strong efficiency measures challenging. Recognizing the unique challenges that often exist for these airport terminal projects, USGBC and GBCI regularly work to support projects.

### How can airport facilities earn LEED certification?

Airport facilities can earn certification under different LEED rating systems at different stages of the building's lifecycle.

- LEED for Building Design and Construction (BD+C): New Construction and Major Renovation is usually the most appropriate rating type for buildings that are new construction or major renovation. At least 60% of the project's gross floor area must be <a href="complete">complete</a> by the time of certification and the project must include the entire building's gross floor area. For airport spaces, this may include areas dedicated to both administrative and support-related functions.
- LEED for Operations and Maintenance (O+M): Existing Building or Interiors can be applied to existing buildings or spaces that are fully operational and occupied for at least one year. The project may be undergoing improvement work or little to no construction and must also include the entire building's gross floor area in the project. Unless otherwise noted in the credit-specific requirements, this includes process-related operations and performance metrics.

### How many airport projects are registered and certified under LEED?

As of September 2025, there are 543 LEED-certified and registered projects with the airport space type, which was made available to projects in <u>LEED Online in 2018</u>. This represents 333 million square feet or 31 million square meters across the globe.

### What issues are unique to airport projects?

Airport terminal projects, because of items like the large number of occupants, baggage handling systems, security equipment, airplane plug loads have high equipment loads, different energy and

September 2025 <u>usgbc.org</u> Page 1 of 5

water needs, unique ventilation requirements, and programmatic relationships with other buildings that make pursuing strong efficiency measures challenging. Additionally, the standard space type projects like office buildings and maintenance buildings face unique barriers for site and location credits.

### How does LEED address the unique challenges of airport projects?

LEED v5 is the most current version of the rating system and is available for all commercial projects pursuing certification under New Construction, Core and Shell, Commercial Interiors and Existing Buildings. Many of the strategies developed for airports under previous versions of LEED, have been adapted for LEED v5 or can be found in the new Project Priorities and Innovation credit category. Credits in this category offer greater flexibility to address unique project contexts and priorities, including typology, culture, location, areas of innovation and individual performance objectives. Sector specific Project Priority credits are continuously being developed and will be released in the <a href="Project Priority Library">Project Priority Library</a> for use.

When developing the LEED v4 and LEED v4.1, certain prerequisites and credits were adapted in a way that supports the unique needs of airport projects. Incorporating feedback from our industry stakeholders, LEED has published industry-specific guidance in the form of LEED Interpretations, Alternative Compliance Paths (ACPs) and pilot credits.

The following may be of interest to airport projects. Many of them are designed to help projects with high process loads or high occupancy to meet the intent of the credits.

- Energy Jumpstart Pilot Credit is available for O&M projects with process loads of at least 60% and unable to meet the Minimum Energy Performance in LEED v4 O&M rating system.
- <u>LEED Interpretation 10493</u> allows LEED v4 and v4.1 BD+C projects using whole building energy simulation that can document more than 50% unregulated process load to use BD+C: Core & Shell energy performance improvement thresholds in lieu of the New Construction thresholds.
- Whole Project Water Use Reduction Pilot Credit allows LEED v4 BD+C projects to quantify water use with whole-building water balance modeling, like the compliance path for whole-building energy modeling. It also allows projects to include potentially significant water savings that previously went unrecognized, such as process water.

Additional LEED Interpretations for airports can be found in the <u>LEED Addenda database</u> by entering the term "airport" in the main search bar.

### How does the Arc-platform relate to airports?

The LEED v4.1 O+M rating system offers a unique performance-based pathway to certify your existing buildings and interior spaces. This new rating system uses <u>Arc</u>, a state-of-the-art platform designed to collect, manage, and benchmark your building across five performance categories: energy, water, waste, transportation, and human experience.

And what does this mean for airports? LEED v4.1 can be used to compare airport projects to other similar facilities pursuing high-performance measures from around the world. Facility managers and owners can continuously monitor the data and make informed decisions about how to optimize the building performance based on real-time data and analytics. This performance pathway can then be used to certify and recertify the project every 3 years. Learn more.

<u>LEED v5</u> <u>BD+C</u>, <u>ID+C</u> and <u>O+M</u> rating systems allow for all space types to certify utilizing the new <u>Arc</u>

September 2025 <u>usgbc.org</u> Page 2 of 5

<u>experience</u>, which offers fluidity and flexibility for users. All performance, certification and reporting will be delivered in one place.

### How can multiple buildings and structures in a campus setting earn LEED certification?

Airports often operate on a large scale with multiple buildings spread across a single site. All these buildings, people, and processes are interconnected with each other. To address this, the <u>LEED Campus Guidance</u> was introduced for projects that are on a shared site under the control of a single entity. Its application to LEED projects in the airport setting represents the complexity and commonality of buildings and infrastructure on a site.

LEED Campus Guidance is a useful tool for airports with multiple buildings, common utilities, and sitewide management policies. By utilizing LEED Campus Guidance, airport operators and project teams can benefit from an increase in the streamlined review process, and reduced certification fees under the Master Site approach, leading to a successful implementation of LEED projects.

### How can I use LEED to certify the entire airport?

Airports are leveraging the LEED for Cities and Communities Rating System to certify the performance for the entire airport. This certification program is revolutionizing the way airport communities are planned, developed, and operated to improve their overall sustainability and quality of life. The LEED framework encompasses social, economic, and environmental performance indicators and strategies with a clear, data-driven means of benchmarking and communicating progress.

#### What technical resources are available for airport projects pursuing LEED?

There are various resources available for airports pursuing LEED certification.

### *Industry Report:*

• LEED in Motion: Transportation

#### **Industry Articles:**

- 6 airport megaprojects taking flight in 2025
- An Introduction to LEED Airports: 4 facts to know about LEED-certified airports
- PEER Certified Airports in India take flight power resilience
- <u>USGBC+ LEED-certified airports help provide safe and sustainable travel</u>
- Atlanta airport LEED for Communities certification
- Teaming up on carbon with Costa Rica Green Building Council
- How Colombia's "Golden" airport achieved LEED Platinum
- Kansas City International Airport Showcases How LEED Serves Infrastructure Projects

### Where can I find more owner profiles and case studies on airports?

Salt Lake City (SLC)

 Salt Lake City International Airport has several LEED Gold certified projects already complete as part of the New SLC: <u>SLCIA Terminal Replacement Project</u>, <u>SLCIA North</u> <u>Concourse West</u>, <u>SLCIA South Concourse East</u>,

September 2025 <u>usgbc.org</u> Page 3 of 5

### Hamad International Airport (HIA)

• In Doha, Qatar the <u>HIA Central Concourse</u> includes "innovative measures of energy efficiency across the entire building, thus staying true to its commitment to improving environmental performance and effectively addressing climate change."

### El Dorado Airport (BOG)

First airport in the world obtains LEED Zero Energy Certification, El Dorado Airport

### Kansas City Airport (KCI)

• Kansas City International Airport new LEED Gold certification

### Istanbul Airport (IST)

- Istanbul Airport includes one of the largest individual LEED certified projects in the world.
- LEED commercial interior projects <u>Istanbul Y.H. THY A.O Main Lounge</u> and <u>Istanbul Y.H. THY</u> A.O Domestic Lounge

### Orlando International Airport (MCO)

• LEED v4 certified projects: <u>MCO South Airport APM & ITF</u> and <u>GOAA Maintenance</u> <u>Administration Building</u>

### San Francisco International Airport (SFO)

- ◆ LEED v4 BD+C: New Construction Platinum certified SFO Harvey Milk Term. 1 Boarding Area B
- Entire <u>San Francisco International Airport</u> certified using LEED for Cities and Communities framework

### Seattle-Tacoma International Airport (SEA)

• LEED certification achievements: <u>Sea-Tac Airport North Satellite</u>, and <u>Sea-Tac Airport Concourse D Holdroom</u>

### Hartsfield-Jackson Atlanta International Airport (ATL)

Atlanta airport LEED for Communities certification: HJAIA Airport LEED for Communities

### Denver International Airport (DEN)

• LEED projects at DEN:

### San Diego International Airport (SAN)

• LEED certified as existing building SAN facilities maintenance building

### Port Authority New York New Jersey

- LaGuardia Airport Terminal B is world's first Airport: Terminal/Concourse project to earn LEED v4 GOLD under the more stringent v4: <u>LGA Phase 1 : CCB+HH+CHRP</u>
- <u>Terminal 4</u> at New York's JFK International Airport LEED for Existing Buildings: Operations & Maintenance Gold certification

View non-confidential LEED registered and certified projects in the project directory by entering key terms like 'airport' in the search bar. This will show projects with such terms in their project title. You can also filter by region and rating system type to get more specific results.

Does USGBC offer any education for project teams wanting to learn more about airport facilities pursuing green building measures?

Yes! Check out the following sessions in the USGBC online course catalog.

- LEED and Airport Facilities Educational Resources
- <u>Launch & Maintain Successful Electrification Programs in Parking, Transportation, and Mobility Operations</u>
- Airports drive change resilience, decarbonization & wellness
- PEER Case Study Campuses
- <u>Launch & Maintain Successful Electrification Programs in Parking, Transportation, and Mobility</u> Operations

Who can I contact for more information about applying LEED at an airport?

For more information, contact us.