

VESTA SP3

LEED 2009 Core and Shell

Attempted: 55, Denied: 1, Pending: 0, Awarded: 55 of 106 points

SUSTAINABLE SITES		17 OF 28
SSp1	Construction Activity Pollution Prevention	Y
SSc1	Site Selection	1 / 1
SSc2	Development Density and Community Connectivity	0 / 5
SSc3	Brownfield Redevelopment	0 / 1
SSc4.1	Alternative Transportation-Public Transportation Access	6 / 6
SSc4.2	Alternative Transportation-Bicycle Storage and Changing Room	2 / 2
SSc4.3	Alternative Transportation-Low-Emitting and Fuel-Efficient V	3 / 3
SSc4.4	Alternative Transportation-Parking Capacity	2 / 2
SSc5.1	Site Development-Protect or Restore Habitat	0 / 1
SSc5.2	Site Development-Maximize Open Space	0 / 1
SSc6.1	Stormwater Design-Quantity Control	0 / 1
SSc6.2	Stormwater Design-Quality Control	0 / 1
SSc7.1	Heat Island Effect, Non-Roof	0 / 1
SSc7.2	Heat Island Effect-Roof	1 / 1
SSc8	Light Pollution Reduction	1 / 1
SSc9	Tenant Design and Construction Guidelines	1 / 1

WATER EFFICIENCY		7 OF 10
WEp1	Water Use Reduction-20% Reduction	Y
WEc1	Water Efficient Landscaping	4 / 4
WEc2	Innovative Wastewater Technologies	0 / 2
WEc3	Water Use Reduction	3 / 4

ENERGY AND ATMOSPHERE		15 OF 37
EAp1	Fundamental Commissioning of the Building Energy Systems	Y
EAp2	Minimum Energy Performance	Y
EAp3	Fundamental Refrigerant Mgmt	Y
EAc1	Optimize Energy Performance	12 / 21
EAc2	On-Site Renewable Energy	0 / 4
EAc3	Enhanced Commissioning	0 / 2
EAc4	Enhanced Refrigerant Mgmt	2 / 2
EAc5.1	Measurement and Verification-Base Building	1 / 3
EAc5.2	Measurement and Verification-Tenant Submetering	0 / 3
EAc6	Green Power	0 / 2

MATERIALS AND RESOURCES		4 OF 13
MRp1	Storage and Collection of Recyclables	Y
MRC1	Building Reuse-Maintain Existing Walls, Floors and Roof	0 / 5
MRC2	Construction Waste Mgmt	0 / 2

MATERIALS AND RESOURCES		CONTINUED
MRC3	Materials Reuse	0 / 1
MRC4	Recycled Content	2 / 2
MRC5	Regional Materials	2 / 2
MRC6	Certified Wood	0 / 1

INDOOR ENVIRONMENTAL QUALITY		7 OF 12
IEQp1	Minimum IAQ Performance	Y
IEQp2	Environmental Tobacco Smoke (ETS) Control	Y
IEQc1	Outdoor Air Delivery Monitoring	0 / 1
IEQc2	Increased Ventilation	1 / 1
IEQc3	Construction IAQ Mgmt Plan-During Construction	1 / 1
IEQc4.1	Low-Emitting Materials-Adhesives and Sealants	1 / 1
IEQc4.2	Low-Emitting Materials-Paints and Coatings	1 / 1
IEQc4.3	Low-Emitting Materials-Flooring Systems	1 / 1
IEQc4.4	Low-Emitting Materials-Composite Wood and Agrifiber Products	1 / 1
IEQc5	Indoor Chemical and Pollutant Source Control	0 / 1
IEQc6	Controllability of Systems-Thermal Comfort	0 / 1
IEQc7	Thermal Comfort-Design	0 / 1
IEQc8.1	Daylight and Views-Daylight	1 / 1
IEQc8.2	Daylight and Views-Views	0 / 1

INNOVATION IN DESIGN		5 OF 6
IDc1.1	Innovation in Design	0 / 1
IDc1.1	Construction IAQ Mgmt Plan	1 / 1
IDc1.2	Innovation in Design	0 / 1
IDc1.2	Low-Emitting Materials	1 / 1
IDc1.3	MR Regional Materials Exp	1 / 1
IDc1.3	Innovation in Design	0 / 1
IDc1.4	Innovation in Design	0 / 1
IDc1.4	Innovation in Design	0 / 1
IDc1.5	Innovation - Green Cleaning policy/program	1 / 1
IDc1.5	Innovation in Design	0 / 1
IDc2	LEED® Accredited Professional	1 / 1

REGIONAL PRIORITY CREDITS		OF
TOTAL		55 OF 106

40-49 Points CERTIFIED 50-59 Points SILVER 60-79 Points GOLD 80+ Points PLATINUM



LEED Certification Review Report

This report contains the results of the technical review of an application for LEED® certification submitted for the specified project. LEED certification is an official recognition that a project complies with the requirements prescribed within the LEED rating systems as created and maintained by the U.S. Green Building Council® (USGBC®). The LEED certification program is administered by Green Business Certification Inc. (GBCI®).

VESTA SP3

Project ID 1000073942
Rating system & version LEED-CS v2009
Project registration date 07/11/2016



Certified (Silver)

CERTIFIED: 40-49, SILVER: 50-59, GOLD: 60-79, PLATINUM: 80+

LEED 2009 CORE AND SHELL

ATTEMPTED: 55, DENIED: 1, PENDING: 0, AWARDED: 55 OF 106 POINTS

SUSTAINABLE SITES 17 OF 28	
SSp1 Construction Activity Pollution Prevention	Y
SSc1 Site Selection	1 / 1
SSc2 Development Density and Community Connectivity	0 / 5
SSc3 Brownfield Redevelopment	0 / 1
SSc4.1 Alternative Transportation-Public Transportation Access	6 / 6
SSc4.2 Alternative Transportation-Bicycle Storage and Changing Room	2 / 2
SSc4.3 Alternative Transportation-Low-Emitting and Fuel-Efficient V	3 / 3
SSc4.4 Alternative Transportation-Parking Capacity	2 / 2
SSc5.1 Site Development-Protect or Restore Habitat	0 / 1
SSc5.2 Site Development-Maximize Open Space	0 / 1
SSc6.1 Stormwater Design-Quantity Control	0 / 1
SSc6.2 Stormwater Design-Quality Control	0 / 1
SSc7.1 Heat Island Effect, Non-Roof	0 / 1
SSc7.2 Heat Island Effect-Roof	1 / 1
SSc8 Light Pollution Reduction	1 / 1
SSc9 Tenant Design and Construction Guidelines	1 / 1

WATER EFFICIENCY 7 OF 10	
WEp1 Water Use Reduction-20% Reduction	Y
WEc1 Water Efficient Landscaping	4 / 4
WEc2 Innovative Wastewater Technologies	0 / 2
WEc3 Water Use Reduction	3 / 4

ENERGY AND ATMOSPHERE 15 OF 37	
EAp1 Fundamental Commissioning of the Building Energy Systems	Y
EAp2 Minimum Energy Performance	Y
EAp3 Fundamental Refrigerant Mgmt	Y
EAc1 Optimize Energy Performance	12 / 21
EAc2 On-Site Renewable Energy	0 / 4
EAc3 Enhanced Commissioning	0 / 2
EAc4 Enhanced Refrigerant Mgmt	2 / 2
EAc5.1 Measurement and Verification-Base Building	1 / 3
EAc5.2 Measurement and Verification-Tenant Submetering	0 / 3
EAc6 Green Power	0 / 2

MATERIALS AND RESOURCES 4 OF 13	
MRp1 Storage and Collection of Recyclables	Y
MRC1 Building Reuse-Maintain Existing Walls, Floors and Roof	0 / 5
MRC2 Construction Waste Mgmt	0 / 2

MATERIALS AND RESOURCES CONTINUED	
MRC3 Materials Reuse	0 / 1
MRC4 Recycled Content	2 / 2
MRC5 Regional Materials	2 / 2
MRC6 Certified Wood	0 / 1

INDOOR ENVIRONMENTAL QUALITY 7 OF 12	
IEQp1 Minimum IAQ Performance	Y
IEQp2 Environmental Tobacco Smoke (ETS) Control	Y
IEQc1 Outdoor Air Delivery Monitoring	0 / 1
IEQc2 Increased Ventilation	1 / 1
IEQc3 Construction IAQ Mgmt Plan-During Construction	1 / 1
IEQc4.1 Low-Emitting Materials-Adhesives and Sealants	1 / 1
IEQc4.2 Low-Emitting Materials-Paints and Coatings	1 / 1
IEQc4.3 Low-Emitting Materials-Flooring Systems	1 / 1
IEQc4.4 Low-Emitting Materials-Composite Wood and Agrifiber Products	1 / 1
IEQc5 Indoor Chemical and Pollutant Source Control	0 / 1
IEQc6 Controllability of Systems-Thermal Comfort	0 / 1
IEQc7 Thermal Comfort-Design	0 / 1
IEQc8.1 Daylight and Views-Daylight	1 / 1
IEQc8.2 Daylight and Views-Views	0 / 1

INNOVATION IN DESIGN 5 OF 6	
IDc1.1 Innovation in Design	0 / 1
IDc1.1 Construction IAQ Mgmt Plan	1 / 1
IDc1.2 Innovation in Design	0 / 1
IDc1.2 Low-Emitting Materials	1 / 1
IDc1.3 MR Regional Materials ExP	1 / 1
IDc1.3 Innovation in Design	0 / 1
IDc1.4 Innovation in Design	0 / 1
IDc1.4 Innovation in Design	0 / 1
IDc1.5 Innovation - Green Cleaning policy/program	1 / 1
IDc1.5 Innovation in Design	0 / 1
IDc2 LEED® Accredited Professional	1 / 1

REGIONAL PRIORITY CREDITS 0 OF	
TOTAL	55 OF 106

CREDIT DETAILS



Project Information Forms

Pif1: Minimum Program Requirements **Approved**

11/29/2017 DESIGN AND CONSTRUCTION PRELIMINARY REVIEW

The LEED Form states that the project complies with all Minimum Program Requirements. The project will comply with MPR 6: Must Commit to Sharing Whole-Building Energy and Water Usage Data via a third party data source. The project is located in Colon, Querétaro, Mexico.

Pif2: Project Summary Details **Approved**

11/29/2017 DESIGN AND CONSTRUCTION PRELIMINARY REVIEW

The LEED Form includes the required project summary details. There is one building in this LEED application with two stories above grade, no stories below grade, and 335,254 gross square feet.

Pif3: Occupant and Usage Data **Approved**

02/27/2018 DESIGN AND CONSTRUCTION FINAL REVIEW

The additional documentation indicates that the project includes 316,954.15 square feet of regularly occupied area.

It is noted that the regularly occupied area reported in this LEED Form (316,954.93 square feet) is inconsistent with the regularly occupied area included in the calculations for EQc8.1: Daylight and Views - Daylight (316,365.66 square feet). For future projects, ensure that the regularly occupied area has been reported consistently throughout the submittal. In this case, this issue has been addressed in EQc8.1. The documentation demonstrates compliance.

11/29/2017 DESIGN AND CONSTRUCTION PRELIMINARY REVIEW

The LEED Form includes the required occupant and usage data. The project consists primarily of Industrial Manufacturing spaces. The form states that the average users value is 346, the peak users value is 346, and the FTE value is 336. However, to demonstrate compliance, the following must be addressed.

TECHNICAL ADVICE

1. It is unclear whether the amount of regularly occupied spaces has been accurately determined and correctly reported in the documentation for this form. For example, EQc8.1: Daylight and Views - Daylight indicates that the project includes 310,893.74 square feet of regularly occupied space, whereas this form indicates that 100% of the gross floor area of the project (335,253.99 square feet) is regularly occupied space. Note that regularly occupied spaces are spaces where one or more individuals spend time (more than one hour per person per day on average) seated or standing as they work, study, or perform other focused activities inside the building and must be reported consistently throughout the submittal. Revise the form and Space Usage Table, as necessary, to ensure that the regularly occupied building areas have been reported accurately and consistently throughout the submittal.

It is noted that the non-default occupancy value reported for the office areas (134 FTE) is not at least as stringent as the LEED default occupancy value for the office space (44,233,27 square feet of office area is equal to 177 FTE occupants, based on the LEED default occupancy calculations). For future projects, ensure that the LEED default occupancy values have been used for space types that are addressed by the LEED defaults. Actual occupancy values may be used for space types that are addressed by the LEED defaults, as long as the actual occupancy values are more stringent than the LEED default occupancy, and estimated occupancy is not appropriate for space types that are addressed by the LEED defaults. In this case, this issue has been addressed in the related credits and prerequisites. Compliance is not affected by this issue.

Pif4: Schedule and Overview Documents **Approved**

03/27/2018 DESIGN AND CONSTRUCTION FINAL REVIEW

Additional documentation has been provided.

It is noted that the revised Tenant Sales and/or Lease Agreement (TSLA) excludes the maximum water usage rates for each plumbing fixture type, whereas detailed guidance regarding these potential future fixtures was included in the previous TSLA documentation. For future projects, if the future tenants may install plumbing fixtures, ensure that the TSLA includes the maximum permissible water usage rates for each plumbing fixture type. In this case, the documentation elsewhere in the submittal consistently indicates that the future tenants are not expected to install additional plumbing fixtures. The documentation demonstrates compliance.

11/30/2017 DESIGN AND CONSTRUCTION PRELIMINARY REVIEW

The LEED Form includes the design and construction schedule. The date of substantial completion is February 28, 2017. The required documents have been uploaded. However, to demonstrate compliance, the following must be addressed.

TECHNICAL ADVICE

1. It is unclear how the provided document complies with the Tenant Sales and/or Lease Agreement (TSLA) requirements, as it does not appear to be complete, nor does it appear to be legally binding. Provide a legally binding TSLA signed by the project Owner/developer and tenant(s) specifying the required performance measures in the anticipated tenant space(s). Alternatively, GBCI will accept a sample TSLA that specifies the required measures in the anticipated tenant space(s), along with a signed statement from the project Owner committing to incorporating the requirements outlined in the sample agreements into the final TSLA and stating that all tenants will be required to sign the agreements when they lease or purchase space in the building. Ensure that all optional fields in the TSLA document have been completed so that the terms of the contract have been clearly described.
2. It is unclear if the floor plans accurately reflect the Core and Shell scope of work, as interior partitions and furniture are shown in the office area. Provide revised plans that show the Core and Shell scope of work. Ensure that the feasible tenant layout is not included. A narrative may be provided to explain any special circumstances. Ensure that the floor plans have been provided consistently throughout the submittal.

Pif5: Building System Control

Approved

11/29/2017 DESIGN AND CONSTRUCTION PRELIMINARY REVIEW

The LEED Form indicates the division of work throughout the project and which parties control the building systems included in the project scope.



Sustainable Sites

SSp1: Construction Activity Pollution Prevention

Awarded

11/29/2017 DESIGN AND CONSTRUCTION PRELIMINARY REVIEW

The LEED Form states that the project has implemented an Erosion and Sedimentation Control (ESC) Plan that conforms to the 2003 EPA Construction General Permit (CGP).

SSc1: Site Selection

Awarded: 1

POSSIBLE POINTS: 1

ATTEMPTED: 1, DENIED: 0, PENDING: 0, AWARDED: 1

11/29/2017 DESIGN AND CONSTRUCTION PRELIMINARY REVIEW

The LEED Form has been provided stating that the project site does not meet any of the prohibited criteria. The form indicates that the project building is located outside the U.S., and documentation has been provided confirming that local equivalents have been used and are equivalent to the referenced standards.

SSc2: Development Density and Community Connectivity

Not Attempted

POSSIBLE POINTS: 5

SSc3: Brownfield Redevelopment

Not Attempted

POSSIBLE POINTS: 1

SSc4.1: Alternative Transportation-Public Transportation Access

Awarded: 6

POSSIBLE POINTS: 6

ATTEMPTED: 6, DENIED: 0, PENDING: 0, AWARDED: 6

11/29/2017 DESIGN AND CONSTRUCTION PRELIMINARY REVIEW

The LEED Form states that the project complies with Option 2: Bus Station Proximity and is located within a one-quarter-mile walking distance of one or more stops for two or more public, campus, or private bus lines usable by building occupants.

SSc4.2: Alternative Transportation-Bicycle Storage and Changing Rooms

Awarded: 2

POSSIBLE POINTS: 2

ATTEMPTED: 2, DENIED: 0, PENDING: 0, AWARDED: 2

11/29/2017 DESIGN AND CONSTRUCTION PRELIMINARY REVIEW

The LEED Form states that the project complies with Case 2: Commercial or Institutional Projects Larger Than 300,000 Square Feet. Bicycle storage facilities have been provided to serve at least 3% of the LEED project occupants for the space up to 300,000 square feet, then an additional 0.5% for the occupants for the space over 300,000 square feet, and shower facilities have been provided for at least 0.5% of the LEED project FTE occupants.

It is noted that it is unclear whether the peak occupancy value reported in Plf3: Occupant and Usage Data and included in the calculations for this credit (346) accurately represents the LEED project. Based on the information reported in Plf3, the estimated FTE occupancy for the office area (134) is not at least as stringent as the LEED default occupancy FTE value for the office area (177). When recalculated, considering the more stringent peak occupancy (389), the documentation confirms that bicycle storage facilities have been provided to serve at least 3% of the LEED project occupants and shower facilities have been provided for at least 0.5% of the LEED project FTE occupants. Compliance is not affected.

SSc4.3: Alternative Transportation-Low-Emitting and Fuel-Efficient Vehicles

Awarded: 3

POSSIBLE POINTS: 3

ATTEMPTED: 3, DENIED: 0, PENDING: 0, AWARDED: 3

03/23/2018 DESIGN AND CONSTRUCTION FINAL REVIEW

The additional documentation confirms that the project has provided preferred parking spaces for low-emitting and fuel-efficient vehicles for 5.41% of the total parking capacity.

12/03/2017 DESIGN AND CONSTRUCTION PRELIMINARY REVIEW

The LEED Form states that the project complies with Option 1: Preferred Parking and provides preferred parking spaces for low-emitting and fuel-efficient vehicles for 5.41% of the total parking capacity. However, to demonstrate compliance, the following must be addressed.

TECHNICAL ADVICE

1. Based on the provided photographs, it is unclear whether the reserved status of the preferred parking spaces for low-emitting and fuel-efficient vehicles has been clearly communicated to all building users. The photographs show that the preferred parking spaces are identified with a car symbol painted on the ground in green paint, and a brochure has been provided to confirm that the policy regarding the reserved parking spaces has been communicated to the project employees. Note that there is no standard symbol or abbreviation that has been accepted to fulfill this requirement, and it is not clear how the visitors would be informed of the reserved status of the preferred parking spaces. Therefore, the signage must include language (reserved for low-emitting and fuel-efficient vehicles) to convey the reserved status of the parking spaces to the building users. Provide revised signage details and any necessary documentation confirming that the proposed signage program communicates to the building occupants that the designated parking spaces have been reserved for the exclusive use of low-emitting and fuel-efficient vehicles.

SSc4.4: Alternative Transportation-Parking Capacity

Awarded: 2

POSSIBLE POINTS: 2

ATTEMPTED: 2, DENIED: 0, PENDING: 0, AWARDED: 2

11/29/2017 DESIGN AND CONSTRUCTION PRELIMINARY REVIEW

The LEED Form states that the project is non-residential and is pursuing Case 1 - Option 1: Minimum parking required by zoning is not exceeded.

SSc5.1: Site Development-Protect or Restore Habitat

Not Attempted

POSSIBLE POINTS: 1

SSc5.2: Site Development-Maximize Open Space

Not Attempted

POSSIBLE POINTS: 1

SSc6.1: Stormwater Design-Quantity Control

Not Attempted

POSSIBLE POINTS: 1

SSc6.2: Stormwater Design-Quality Control

Not Attempted

POSSIBLE POINTS: 1

SSc7.1: Heat Island Effect, Non-Roof

Not Attempted

POSSIBLE POINTS: 1

SSc7.2: Heat Island Effect-Roof

Awarded: 1

POSSIBLE POINTS: 1

ATTEMPTED: 1, DENIED: 0, PENDING: 0, AWARDED: 1

11/29/2017 DESIGN AND CONSTRUCTION PRELIMINARY REVIEW

The LEED Form states that the project complies with Option 1, and 100% of the weighted building roof surface has a Solar Reflectance Index (SRI) meeting the credit requirements.

SSc8: Light Pollution Reduction

Awarded: 1

POSSIBLE POINTS: 1

ATTEMPTED: 1, DENIED: 0, PENDING: 0, AWARDED: 1

02/27/2018 DESIGN AND CONSTRUCTION FINAL REVIEW

The additional documentation demonstrates compliance.

11/29/2017 DESIGN AND CONSTRUCTION PRELIMINARY REVIEW

The LEED Form states that the project meets the requirements using the LEED v4 credit substitution path SSc Light

Pollution Reduction. The documentation indicates that the project has met uplight and light trespass requirements using the backlight-uplight-glare (BUG) method (Option 1). However, to demonstrate compliance, the following must be addressed.

TECHNICAL ADVICE

1. It is not clear which backlight or glare ratings are applicable for the site lighting fixtures, as the distances from the LEED project boundary to each fixture have not been clearly shown in the provided documents. Additionally, based on the lighting plan in the narrative, it appears that some of the fixtures may be mounted within 0.5 mounting heights from the lighting boundary, yet it does not appear that the most stringent backlight and glare requirements have been considered for these fixtures when determining compliance. Provide a revised luminaire schedule that includes the mounting height and distance from the nearest lighting boundary for each of the site lighting fixtures.

SSc9: Tenant Design and Construction Guidelines **Awarded: 1**

POSSIBLE POINTS: 1

ATTEMPTED: 1, DENIED: 0, PENDING: 0, AWARDED: 1

11/29/2017 DESIGN AND CONSTRUCTION PRELIMINARY REVIEW

The LEED Form states that the project has developed Tenant Design and Construction Guidelines for the certifying project tenant spaces.



Water Efficiency

WEp1: Water Use Reduction-20% Reduction

Awarded

12/03/2017 DESIGN AND CONSTRUCTION PRELIMINARY REVIEW

The LEED Form states that the Core and Shell project scope includes performance improvements for the entire project building, including tenant occupied spaces, and the project has reduced potable water use by 36.93%.

It is noted that it is unclear whether the average occupancy value reported in Plf3: Occupant and Usage Data and included in the calculations for this prerequisite (346) accurately represents the LEED project. Based on the information reported in Plf3, the estimated FTE occupancy for the office area (134) is not at least as stringent as the LEED default occupancy FTE value for the office area (177). Additionally, based on the floor plans the calculations provided for this prerequisite, it appears that the occupants in the Misc. Nurse fixture group are not expected to use restrooms that contain urinals. For future projects, ensure that the the percent of males expected to use restrooms with urinals field in the Water Use Reduction Calculator has been adjusted appropriately. When recalculated, considering the more stringent peak occupancy (389) and considering that the Misc. Nurse occupants are not expected to use restrooms that contain urinals, the documentation demonstrates that the project has reduced potable water use by 37.77%. Compliance is not affected.

WEc1: Water Efficient Landscaping

Awarded: 4

POSSIBLE POINTS: 4

ATTEMPTED: 4, DENIED: 0, PENDING: 0, AWARDED: 4

02/27/2018 DESIGN AND CONSTRUCTION FINAL REVIEW

The additional documentation demonstrates compliance.

12/03/2017 DESIGN AND CONSTRUCTION PRELIMINARY REVIEW

The LEED Form states that the landscaping does not use permanent irrigation systems and that all temporary irrigation systems used for plant establishment will be removed within 18 months of installation. However, to demonstrate compliance, the following must be addressed.

TECHNICAL ADVICE

1. Provide a revised narrative explaining the temporary irrigation strategy for landscaping, including the length of time that plantings will be watered and how the installed irrigation system will be permanently disabled. Alternatively, provide a revised form and calculations to confirm that potable water use has been reduced by at least 50% beyond the baseline design.

WEc2: Innovative Wastewater Technologies

POSSIBLE POINTS: 2

Not Attempted

WEc3: Water Use Reduction

Awarded: 3

POSSIBLE POINTS: 4

ATTEMPTED: 3, DENIED: 0, PENDING: 0, AWARDED: 3

11/30/2017 DESIGN AND CONSTRUCTION PRELIMINARY REVIEW

The LEED Form states that the project has reduced potable water use by 36.95%. When WEp1: Water Use Reduction - 20% Reduction was recalculated based on the issues noted there, the project has reduced potable water use by 37.77%.



Energy and Atmosphere

EAp1: Fundamental Commissioning of the Building Energy Systems

Awarded

11/30/2017 DESIGN AND CONSTRUCTION PRELIMINARY REVIEW

The LEED Form states that the fundamental commissioning is complete.

EAp2: Minimum Energy Performance

Awarded

02/28/2018 DESIGN AND CONSTRUCTION FINAL REVIEW

The additional documentation states that the project has achieved an energy cost savings of 30.68%. The total predicted annual energy consumption for the project is 8,435,487 kBtu of electricity and 3,295,186 kBtu of natural gas.

It is noted that the equipment capacities (outdoor air volume) and efficiencies for some of the HVAC systems in the Proposed model still appear inconsistent with the equipment capacities in the actual design when comparing the Minimum Energy Performance Calculator to the provided mechanical schedules. For example, it appears that the input data screenshot indicates that the chiller efficiency has been modeled at 10.57 COP, but this efficiency is atypically high and appears to reflect the part-load efficiency (NPLV efficiency). Note that the actual full load capacity and full load efficiency for the chiller must be reflected in the Proposed design. In this case, the mechanical schedules indicate that the chillers (CWGU-01, 02, 03) must be modeled with an efficiency of 0.4995 kW/ton (7.04 COP). In another example, the Air-Side HVAC tab of the Minimum Energy Performance Calculator indicates that UE-49 and UE-50 were modeled a total outdoor air volume of 3,640 cfm, whereas the mechanical schedules indicate that these systems must be modeled with a total outdoor air volume of 4,488 cfm. Note that Table G3.1.10 in the Proposed building column requires that the Proposed model reflect all HVAC systems at actual equipment capacities and efficiencies. For future projects, ensure that the Proposed model reflects all HVAC systems at actual equipment capacities and efficiencies. In this case, this issue is not deemed sufficient to affect the energy cost savings. The documentation demonstrates compliance.

12/04/2017 DESIGN AND CONSTRUCTION PRELIMINARY REVIEW

The LEED Form states that the project complies with Option 1: Whole Building Energy Simulation and has achieved an energy cost savings of 33.1%. However, to demonstrate compliance, the following comments requiring a project response (marked as Mandatory) must be addressed for the Final Review. For the remaining review comments (marked as Optional), a project response is optional.

Note that the project was registered after April 8, 2016, and is therefore required to achieve a minimum of four points in EAc1: Optimize Energy Performance to achieve prerequisite compliance and qualify for LEED certification based on the following document (<http://www.usgbc.org/sites/default/files/LEED%202009%20Energy%20Performance%20Update%20-%20Summary%20of%20changes%20150925.pdf>).

Note that a methodology that may allow the project to achieve additional points under EAc1: Optimize Energy Performance was released August 30, 2011 titled "Revised points thresholds based on Owner-influenced energy percentage for LEED 2009 projects" (<http://new.usgbc.org/resources/cs-2009-eap2-c1-acp>). Although this methodology is not required, it can be attempted to achieve additional points. If using this methodology, separately meter the loads influenced by the developer, and provide the output documentation that shows the separation between loads influenced by the developer versus loads not influenced by the Owner/Developer (such as tenant lighting and tenant receptacles). Note that all HVAC energy is considered to be influenced by the Owner/Developer. If using this methodology, fill out and upload the spreadsheet to reflect the revised point thresholds for the project.

TECHNICAL ADVICE

REVIEW COMMENTS REQUIRING A PROJECT RESPONSE (Mandatory)

1. Provide the following:

a. A narrative response to each Preliminary Review comment below.

b. A narrative describing any additional changes made to the energy models between the Preliminary and Final Review phases not addressed by the responses to the review comments. The Mandatory comments are perceived to reduce the projected savings for the Proposed design. If the projected savings increase substantially in the Final submission, without implementing any optional comments that may improve performance, a narrative explanation for these results must be provided.

2. The Lighting tab indicates that credit has been taken for reduced interior lighting power in the future tenant spaces. In addition, Plf5: Building System Control indicates that the lighting fixtures and controls in the tenant buildouts will be installed by the Owner/Developer; however, supporting documentation in the form of lighting plans and lighting schedules have not been provided confirming the interior lighting power density being modeled in the future tenant spaces. Provide supporting documentation (i.e. lighting floor plans, lighting fixture schedules, and sample lighting calculations) confirming that the project includes a complete lighting design in all spaces, including the core spaces and the tenant spaces.

Alternatively, if taking any credit for energy measures that will be installed by the future tenants outside of the LEED project scope, a legally binding document (e.g., Tenant Sales and/or Lease Agreement) must be provided that is associated with the project and is signed by the Owner/Developer and tenant. The documentation must also explicitly state the performance requirements for the tenant work (i.e., the required installed lighting power density in the tenant spaces). Note that the project team may black out any portions of the Tenant Sales and/or Lease Agreement related to confidential information (such as lease prices, etc.); however, a signed copy of the document is required to take credit for any tenant improvements to be completed outside of the LEED scope of work. Alternatively, GBCI will accept a sample Tenant Sales and/or Lease Agreement that specifies the required measures in the anticipated tenant space(s), along with a signed statement from the Owner/Developer committing to incorporating the requirements outlined in the sample agreements into the final Tenant Sales and/or Lease Agreement and stating that all tenants will be required to sign the agreements when they lease or purchase space in the building.

3. The BPRM report indicates that the exterior wall constructions were modeled with an assembly U-value of 0.15 and that the fenestration SHGC north and SHGC non-north values were modeled as 0.20 in the Baseline model; however, Table G3.1.5(b) and (c) in the Baseline building column and Table 5.5-3 requires that the exterior wall constructions are modeled as steel-framed walls with an assembly U-value of 0.084 and that the fenestration SHGC value is modeled as 0.25. Revise the exterior wall constructions in the Baseline model to steel-framed walls with an assembly U-value of 0.084 and that the fenestration SHGC value is modeled as 0.25. In addition, provide a revised BPRM report reflecting the changes.

4. The Lighting tab indicates that the warehouse spaces have been reflected as manufacturing spaces and the receptacle loads are 16% of the total Baseline energy cost; however, the receptacle equipment power density appears low for this building type, which appears to include manufacturing equipment, and it is unclear how this value has been determined. Provide supporting documentation confirming the actual space usage for this project and describe the manufacturing processes that will take place in these spaces so as to justify the use of the of the Manufacturing-High Bay space category in Table 9.6.1. Note if the future usage of the speculative warehouse spaces is unclear, the Warehouse: Medium/Bulky Material Storage category LPD in Table 9.6.1 must be used.

5. The equipment capacities (fan volume, fan power, cooling capacity, heating capacity, outdoor air volume, etc.) and efficiencies for the HVAC systems in the Proposed model appear inconsistent with the equipment capacities in the actual design when comparing the Minimum Energy Performance Calculator to the provided mechanical schedules. For example, the Minimum Energy Performance Calculator indicates that the boiler capacity was modeled as 2,047.49 MBH; however, the mechanical schedules indicate that the boiler capacity must be modeled as 15,000 MBH (3 x 5,000 MBH). In another example, the Minimum Energy Performance Calculator indicates that the cooling capacities for AHU-01 through AHU-03 were modeled as 4,081 kBtu/h, 5,981 kBtu/h, and 5,115 kBtu/h, respectively; however, the mechanical schedules indicate that the cooling capacities for these systems must be modeled as 6,874 kBtu/h, 6,296 kBtu/h, and 5,356 kBtu/h, respectively. In addition, the mechanical schedules do not indicate the fan volume, fan power, and outdoor air volume for each system, and the total outdoor air volume reported in EQp1: Minimum Indoor Air Quality Performance (373,957 cfm) varies substantially from the total outdoor airflow reported in the Minimum Energy Performance Calculator (148,108 cfm); therefore, it is unclear if the fan volume, fan power, and outdoor air volume modeled in the Proposed case reflect the actual design. Note that Table G3.1.10 in the Proposed building column requires that the Proposed model reflect all HVAC systems at actual equipment capacities and efficiencies. Revise the Proposed model to reflect all HVAC systems at actual equipment capacities and efficiencies. In addition, update the Minimum Energy Performance Calculator, and provide screenshots for the input parameters for the equipment capacities and efficiencies in the Proposed model reflecting the changes. Furthermore, if the equipment capacities and efficiencies are based on updated mechanical schedules and/or HVAC submittal sheets, provide the updated mechanical schedules and/or HVAC submittal sheets.

6. The Minimum Energy Performance Calculator indicates that system type 6 and system type 7 are the only HVAC system types reflected in the Baseline model; however, it appears that the project includes spaces that may meet the requirements of exception (b) of Section G3.1.1 (e.g., IT rooms and kitchens), which may require an additional system type to be reflected in the Baseline model. Additional system types must be included in the Baseline model if an exception to Section G3.1.1 is met. If an exception to Section G3.1.1 is met, revise the Baseline model, as needed, to include the appropriate additional system types for these spaces. In addition, revise the Minimum Energy Performance Calculator and provide screenshots for the system input parameters for the additional system type reflecting the changes.

7. The Minimum Energy Performance Calculator indicates that the chiller efficiency was modeled as 5.59 COP in the Baseline case; however, the chiller efficiency must be modeled as 6.10 COP based on the chiller capacity, per Table 6.8.1C. Revise the Baseline model so that the chiller efficiency is modeled according to Table 6.8.1C. In addition, revise the Minimum Energy Performance Calculator and provide screenshots for the input parameters reflecting the changes.

8. The BPRM report indicates that energy cost rate for natural gas has been modeled at \$0.19 per therm in the Proposed and Baseline models; however, this rate appears atypically low for this project location. Revisit the utility rate inputs in the Proposed and Baseline models, and ensure that the virtual rates are consistent with the actual utility rates being used for this project, as outlined in Section G2.4. In addition, provide additional documentation to verify how the natural gas utility rate reflected in the energy models has been determined.

REVIEW COMMENTS THAT DO NOT REQUIRE A PROJECT RESPONSE, BUT MAY LEAD TO AN IMPROVED PERFORMANCE RATING IF ADDRESSED (Optional)

9. The Minimum Energy Performance Calculator indicate that 3 HVAC systems (system type 7) have been included in the Baseline model for the warehouse space; however, Section G3.1.1 requires that one HVAC system is modeled per floor for system types 5, 6, 7, and 8. Revise the Baseline model so one system is modeled for each floor. In addition, update the Minimum Energy Performance Calculator and provide screenshots for the system input parameters in the Baseline model reflecting the changes.

10. The Minimum Energy Performance Calculator indicates that the warehouse spaces were modeled with Demand Control Ventilation (DCV) in the Baseline model; however, it is unclear whether the spaces meet the requirements for DCV use under Section 6.4.3.9. Section 6.4.3.9 requires that DCV is included for spaces larger than 500 square feet and with a design occupancy for ventilation of greater than 40 people per 1,000 square feet of floor area and served by HVAC systems with one or more of the following: an airside economizer, automatic modulating control of the outdoor air damper or a design outdoor airflow greater than 3,000 cfm. Provide information verifying that the warehouse spaces modeled with DCV in the Baseline model meet the requirement of Section 6.4.3.9. If the spaces in the Baseline case do not meet these criteria, revise the Baseline model and revise the Minimum Energy Performance Calculator by excluding demand control ventilation.

11. The Minimum Energy Performance Calculator indicates that exhaust air energy recovery is included for the systems serving the warehouse spaces in the Baseline model; however, Section G3.1.2.10 requires that exhaust air energy recovery is only included for each HVAC systems with both a supply air capacity of 5,000 cfm or greater and have a minimum outdoor air supply of 70% or greater of the design supply air quantity. In this case, it appears that exhaust air energy recovery must not be included in the Baseline model. Revise the Baseline model so exhaust air energy recovery is excluded for each HVAC system that does not meet the requirements of Section G3.1.2.10. In addition, update the Minimum Energy Performance Calculator and provide screenshots of input parameters reflecting the changes.

REVIEW COMMENTS THAT DO NOT REQUIRE A PROJECT RESPONSE FOR THIS PROJECT, BUT SHOULD BE CONSIDERED AS EDUCATIONAL NOTES FOR FUTURE SUBMITTALS (Optional)

12. The fenestration SHGC value for the Proposed model in the Minimum Energy Performance Calculator is inconsistent with the modeled SHGC value, as indicated in the BPRM report. The BPRM report fenestration descriptions indicate that the fenestration shading coefficient (SC) value is 0.23 in the Proposed model, whereas the fenestration SHGC is modeled at 0.15 in the Proposed case. For future projects, note that the shading coefficient value and SHGC value are not interchangeable values. The shading coefficient value can be found by taking the SHGC value divided by 0.87. In this case, the shading coefficient value must be modeled at 0.20 for the fenestrations in the Proposed model.

EAp3: Fundamental Refrigerant Management

Awarded

02/27/2018 DESIGN AND CONSTRUCTION FINAL REVIEW

The requested clarifications for Plf4: Schedule and Overview Documents and the additional documentation demonstrate compliance.

11/30/2017 DESIGN AND CONSTRUCTION PRELIMINARY REVIEW

The LEED Form states that there are no CFC-based refrigerants serving the project building. Additionally, the Core and Shell project scope is limited, such that the submittal documentation has been based (either in whole or in part) on anticipated tenant work beyond the Core and Shell project scope. A Tenant Sales and/or Lease Agreement (TSLA) has been provided to document the performance requirements for the tenant work. However, to demonstrate compliance, the following must be addressed.

TECHNICAL ADVICE

1. Plf4: Schedule and Overview Documents is pending clarifications, as it is unclear how the provided document complies with the TSLA requirements. Provide the requested clarifications for Plf4 and resubmit this prerequisite. Ensure that the revised TSLA includes legally binding language specifying the required performance measures in the anticipated tenant space(s).

2. It appears as though not all mechanical cooling equipment serving the project building has been included in the form, as required. The floor plans provided within the documentation for Plf4 indicate that the project includes walk-in cooler/freezers that have not been listed in the form. Additionally, it is unclear whether this equipment is anticipated to be installed within the Core and Shell scope of work or installed by future tenants. Note that all equipment with one-half pound or more of refrigerant must be listed in the form. Provide a narrative to confirm whether the equipment will be within the Core and Shell scope of work or installed by future tenants. Provide a revised form, as necessary, to ensure that all of the equipment with at least one-half pound of refrigerant has been included.

EAc1: Optimize Energy Performance

POSSIBLE POINTS: 21

ATTEMPTED: 12, DENIED: 1, PENDING: 0, AWARDED: 12

Awarded:

12

02/28/2018 DESIGN AND CONSTRUCTION FINAL REVIEW

Additional documentation has been provided for EAp2: Minimum Energy Performance, claiming an energy cost savings of 30.68%.

12/04/2017 DESIGN AND CONSTRUCTION PRELIMINARY REVIEW

The LEED Form states that the project has achieved an energy cost savings of 33.1%. However, to demonstrate compliance, the following must be addressed.

TECHNICAL ADVICE

1. Refer to the comments within EAp2: Minimum Energy Performance and resubmit this credit.

EAc2: On-Site Renewable Energy
POSSIBLE POINTS: 4

**Not
Attempted**

EAc3: Enhanced Commissioning
POSSIBLE POINTS: 2

**Not
Attempted**

EAc4: Enhanced Refrigerant Management **Awarded: 2**

POSSIBLE POINTS: 2

ATTEMPTED: 2, DENIED: 0, PENDING: 0, AWARDED: 2

02/27/2018 DESIGN AND CONSTRUCTION FINAL REVIEW

The requested clarifications for Pf4: Schedule and Overview Documents and EAp3: Fundamental Refrigerant Management, as well as the additional documentation, demonstrate compliance.

12/03/2017 DESIGN AND CONSTRUCTION PRELIMINARY REVIEW

The LEED Form states that the project selected refrigerants and HVAC and R systems that minimize or eliminate the emission of compounds that contribute to ozone depletion and global climate change. Additionally, all fire suppression systems in the LEED project do not use ozone-depleting substances including CFCs, HCFCs, or halons. The refrigerant impact calculation indicates that the total refrigerant impact of the LEED project is 79.96 per ton, which is less than the maximum allowable value of 100. The form also states that the Core and Shell project scope is limited, such that the submittal documentation has been based (either in whole or in part) on anticipated tenant work beyond the Core and Shell project scope. A Tenant Sales and/or Lease Agreement (TSLA) has been provided to document the performance requirements for the tenant work. However, to demonstrate compliance, the following must be addressed.

TECHNICAL ADVICE

1. Pf4: Schedule and Overview Documents and EAp3: Fundamental Refrigerant Management are pending clarifications regarding the TSLA. Additionally, EAp3 is pending clarifications regarding the treatment of the walk-in cooler equipment shown in the Pf4 floor plans. Therefore, it is unclear whether all equipment with one-half pound or more of refrigerant anticipated to be installed in the project building has been included in this credit. Provide the requested clarifications for Pf4 and EAp3 and resubmit this credit. Provide a revised form, as necessary, to ensure that all equipment with one-half pound or more of refrigerant has been included. Ensure that the revised TSLA includes legally binding language specifying the required performance measures in the anticipated tenant space(s).
2. The value of refrigerant charge (Rc) reported (1.9 pounds per ton) is significantly lower than expected for the Variable Refrigerant Flow (VRF) HVAC and R system. VRF systems, including both factory refrigerant charge and field piping, are expected to have between three and six pounds of refrigerant per ton. This credit requires that the project team consider all refrigerant used to operate the HVAC and R system, not just the refrigerant within the outdoor units. Provide a narrative justifying the refrigerant charge claimed and submit appropriate supporting documentation. It is recommended that the project team submit documentation to verify that the refrigerant charge reported is appropriate for this combination of indoor units, outdoor units, and interconnecting piping.

**EAc5.1: Measurement and Verification-
Base Building** **Awarded: 1**

POSSIBLE POINTS: 3

ATTEMPTED: 1, DENIED: 0, PENDING: 0, AWARDED: 1

11/30/2017 DESIGN AND CONSTRUCTION PRELIMINARY REVIEW

The LEED Form states that the project complies with Option 3 and has committed to sharing whole-building energy and water data through a Third Party Data Source.

**EAc5.2: Measurement and Verification-
Tenant Submetering**
POSSIBLE POINTS: 3

**Not
Attempted**

EAc6: Green Power
POSSIBLE POINTS: 2

**Not
Attempted**



Materials and Resources

MRp1: Storage and Collection of Recyclables

Awarded

11/30/2017 **DESIGN AND CONSTRUCTION PRELIMINARY REVIEW**

The LEED Form states that the project has provided appropriately sized dedicated areas for the collection and storage of materials for recycling.

MRc1: Building Reuse-Maintain Existing Walls, Floors and Roof POSSIBLE POINTS: 5

Not Attempted

MRc2: Construction Waste Management POSSIBLE POINTS: 2

Not Attempted

MRc3: Materials Reuse POSSIBLE POINTS: 1

Not Attempted

MRc4: Recycled Content

Awarded: 2

POSSIBLE POINTS: 2

ATTEMPTED: 2, DENIED: 0, PENDING: 0, AWARDED: 2

12/04/2017 **DESIGN AND CONSTRUCTION PRELIMINARY REVIEW**

The LEED Form states that 25.03% of the total building materials content, by value, has been manufactured using recycled materials.

It is noted that it is unclear if all of the recycled content claimed for the glazing meets the ISO 14021 definition of recycled content, as the manufacturer's documentation appears to indicate that material reclaimed from the manufacturing process has been included in the recycled content value reported in the calculations. For future projects, note that waste that is crushed, re-melted, and put back into the same manufacturing process may not be considered recycled content. Additionally, the manufacturer's documentation for the insulation roof panel material includes a range of values, but the lowest amount in the range has not been used in the calculations and the specific product used has not been indicated. For future projects, ensure that the manufacturer's documentation for each product states the actual pre- and post-consumer recycled content values or report the lowest values in the range of values in the calculations. When recalculated, including the 5% pre-consumer recycled content for the glazing confirmed in the manufacturer's documentation and using the lowest recycled content values in the range presented for the insulation roof panel materials (14% post-consumer and 15% pre-consumer), the documentation demonstrates that 24.64% of the total building materials content, by value, has been manufactured using recycled materials. Compliance is not affected.

MRc5: Regional Materials

Awarded: 2

POSSIBLE POINTS: 2

ATTEMPTED: 2, DENIED: 0, PENDING: 0, AWARDED: 2

11/30/2017 **DESIGN AND CONSTRUCTION PRELIMINARY REVIEW**

The LEED Form states that 55.52% of the total building materials value includes materials and products that have been manufactured and extracted within 500 miles of the project site.

MRc6: Certified Wood POSSIBLE POINTS: 1

Not Attempted



Indoor Environmental Quality

IEQp1: Minimum Indoor Air Quality Performance

Awarded

02/28/2018 DESIGN AND CONSTRUCTION FINAL REVIEW

The additional documentation states that the breathing zone outdoor air intake ventilation rates for all occupied spaces meet the minimum established in ASHRAE Standard 62.1-2007.

It is noted that the total design outdoor air volume for VI-01 through VI-06 indicated in the ventilation calculations (8,805 cfm) has been revised to be significantly lower than the outdoor air volume indicated in the mechanical schedules provided for Plf4: Schedule and Overview Documents (13,140 cfm) for the purpose to match the outdoor air volume in the Proposed case reported in the Air-Side HVAC tab of the Minimum Energy Performance Calculator in EAp2: Minimum Energy Performance. For future projects, ensure that the outdoor air volume for each ventilation system in the actual design is reported in the ventilation calculations. In this case, the project has provided the minimum required amount of outside air, as prescribed by ASHRAE Standard 62.1-2007. The documentation demonstrates compliance.

12/04/2017 DESIGN AND CONSTRUCTION PRELIMINARY REVIEW

The LEED Form states that the project is mechanically ventilated and the ventilation systems have met the minimum requirements of ASHRAE Standard 62.1-2007. However, to demonstrate compliance, the following must be addressed.

TECHNICAL ADVICE

1. The mechanical schedules provided in Plf4: Schedule and Overview Documents do not indicate the outdoor air volume for each ventilation system in the actual design, and it is unclear if the design outdoor air volumes are greater than the minimum required outdoor air volume (Vot) for each system. Provide revised mechanical schedules to verify the outdoor air volume for each ventilation system in the actual design (i.e., AHU-1 through AHU-3 and VI-1 through VI-06). Ensure that the equipment nomenclature is consistent between the ventilation calculations and the mechanical schedules

REVIEW COMMENTS THAT DO NOT REQUIRE A PROJECT RESPONSE FOR THIS PROJECT, BUT SHOULD BE CONSIDERED AS EDUCATIONAL NOTES FOR FUTURE SUBMITTALS (Optional)

2. Ventilation calculations have been provided for each dedicated outdoor air system in the actual design, whereas the mechanical plans provided for Plf4 indicate that the dedicated outdoor air systems are directly ducted to heat pump systems, which distribute the outdoor air to each ventilation zone. In such a case, ventilation calculations must be provided for each heat pump system in the actual design. For single zone ventilations systems, ensure that the ventilation calculations are completed in accordance with Section 6.2.3, and for multiple zone ventilation systems, ensure that the ventilation calculations are completed in accordance with Section 6.2.5. Section 3 defines a ventilation zone as an occupied space or several occupied spaces, which share a similar occupancy category (as defined in Table 6-1), occupant density, zone air distribution effectiveness (Ez), and primary airflow per unit area. Furthermore, ensure that the distribution effectiveness (Ez) value is determined based on each heat pump system. Finally, ensure that the minimum required outdoor air volume (Vot) is determined for each dedicated outdoor air system based on the sum of the Vot values for the heat pump systems served by each respective system, as outlined in Section 6.2.4.

IEQp2: Environmental Tobacco Smoke (ETS) Control

Awarded

12/03/2017 DESIGN AND CONSTRUCTION PRELIMINARY REVIEW

The LEED Form states that smoking is prohibited within 25 feet of entries, outdoor air intakes, and operable windows. Additionally, smoking is prohibited within the building. The form further states that the Core and Shell project scope is limited, such that the submittal documentation has been based (either in whole or in part) on anticipated tenant work beyond the Core and Shell project scope. A Tenant Sales and/or Lease Agreement (TSLA) has been provided to document the performance requirements for the tenant work.

It is noted that Plf4: Schedule and Overview Documents is pending clarifications, as it is unclear how the provided document complies with the TSLA requirements, as it does not appear to be binding. In this case, the documentation confirms that a compliant signage program has been installed in the Core and Shell scope of work; therefore, the TSLA is not needed to confirm compliance. Compliance is not affected.

IEQc1: Outdoor Air Delivery Monitoring

POSSIBLE POINTS: 1

Not Attempted

IEQc2: Increased Ventilation

POSSIBLE POINTS: 1

ATTEMPTED: 1, DENIED: 0, PENDING: 0, AWARDED: 1

Awarded: 1

02/28/2018 DESIGN AND CONSTRUCTION FINAL REVIEW

The requested clarifications for EQp1: Minimum Indoor Air Quality Performance and the additional documentation demonstrate compliance.

12/04/2017 DESIGN AND CONSTRUCTION PRELIMINARY REVIEW

The LEED Form states that the project is mechanically ventilated and the breathing zone outdoor air ventilation rates to all occupied spaces have been increased by at least 30% above the minimum rates required by ASHRAE Standard 62.1-2007. However, to demonstrate compliance, the following must be addressed.

TECHNICAL ADVICE

1. Refer to the comments within EQp1: Minimum Indoor Air Quality Performance and resubmit this credit.

IEQc3: Construction IAQ Management Plan-During Construction **Awarded: 1**

POSSIBLE POINTS: 1

ATTEMPTED: 1, DENIED: 0, PENDING: 0, AWARDED: 1

11/30/2017 DESIGN AND CONSTRUCTION PRELIMINARY REVIEW

The LEED Form states that the project reduces air quality problems resulting from construction to promote the comfort and well-being of construction workers and building occupants.

IEQc4.1: Low-Emitting Materials-Adhesives and Sealants **Awarded: 1**

POSSIBLE POINTS: 1

ATTEMPTED: 1, DENIED: 0, PENDING: 0, AWARDED: 1

02/27/2018 DESIGN AND CONSTRUCTION FINAL REVIEW

The additional documentation demonstrates compliance.

11/30/2017 DESIGN AND CONSTRUCTION PRELIMINARY REVIEW

The LEED Form states that all adhesive and sealant products used on the inside of the weatherproofing system and applied on site have been included in the tables and comply with the VOC limits of the referenced standards for this credit. However, to demonstrate compliance, the following must be addressed.

TECHNICAL ADVICE

1. It is unclear whether all adhesives and sealants used on the inside of the weatherproofing system and applied on site have been included in the table, as only two products have been listed, whereas it appears that the project includes ductwork, plumbing, interior partitions, and other features which would require additional adhesives and sealants. Refer to the referenced standards of this credit and confirm whether the comprehensive list of adhesives and sealants, as defined by the referenced standards, used on the inside of the weatherproofing system and applied on site have been included in the table. The following are common products included in this credit: flooring adhesives, subfloor adhesives, drywall and panel adhesives, wall-base adhesives, multipurpose construction adhesives, structural glazing and wood adhesives, substrate adhesives, tile adhesives, contact adhesives, architectural sealants (including grouts, and polyurethane or plastic foams), duct sealants, plumbing adhesives and sealants, wall-covering adhesives, fiberglass panel adhesives, welding adhesives, and aerosol adhesives. Refer to the South Coast Air Quality Management District (SCAQMD) South Coast Rule 1168 (effective date of July 1, 2005 and rule amendment date of January 7, 2005) for the complete list and definitions. Consult SCAQMD and product manufacturers for assistance in properly classifying products. Revise the form, provide additional manufacturer's documentation, and include a narrative to explain any special circumstances, as necessary. Ensure that all applicable products have been included in the documentation.

IEQc4.2: Low-Emitting Materials-Paints and Coatings **Awarded: 1**

POSSIBLE POINTS: 1

ATTEMPTED: 1, DENIED: 0, PENDING: 0, AWARDED: 1

11/30/2017 DESIGN AND CONSTRUCTION PRELIMINARY REVIEW

The LEED Form states that all paint and coating products used on the inside of the weatherproofing system and applied on site have been included in the tables and comply with the VOC limits of the referenced standards for this credit.

IEQc4.3: Low-Emitting Materials-Flooring Systems **Awarded: 1**

POSSIBLE POINTS: 1

ATTEMPTED: 1, DENIED: 0, PENDING: 0, AWARDED: 1

11/30/2017 DESIGN AND CONSTRUCTION PRELIMINARY REVIEW

The LEED Form states that all interior flooring materials meet or exceed applicable criteria for the Carpet and Rug Institute, South Coast Air Quality Management District, the California Department of Health Standard, or FloorScore; the carpet adhesives used have a VOC level of less than 50 g/L; all floor finishes meet the requirements of SCAQMD Rule 1113; and all tile setting adhesives and grout meet SCAQMD Rule 1168.

It is noted that it does not appear that all interior flooring materials and finishes applied on site have been included, as required. EQc4.2: Low-Emitting Materials - Paints and Coatings includes a Euclid Chemical Company floor coating product which has not been included in this credit, as required. For future projects, ensure that all of the installed flooring materials and finishes in the project have been reported in this form. In this case, the documentation provided for EQc4.2 confirms that the aforementioned product meets the applicable criteria for the Carpet and Rug Institute, South Coast Air Quality Management District, or FloorScore, as required. Compliance is not affected.

IEQc4.4: Low-Emitting Materials-Composite Wood and Agrifiber Products

Awarded: 1

POSSIBLE POINTS: 1

ATTEMPTED: 1, DENIED: 0, PENDING: 0, AWARDED: 1

11/30/2017 DESIGN AND CONSTRUCTION PRELIMINARY REVIEW

The LEED Form states that all composite wood and agrifiber products used on the interior of the building and all laminating adhesives used to fabricate on-site and shop-applied composite wood and agrifiber assemblies contain no added urea-formaldehyde resins.

IEQc5: Indoor Chemical and Pollutant Source Control

Not Attempted

POSSIBLE POINTS: 1

IEQc6: Controllability of Systems-Thermal Comfort

Not Attempted

POSSIBLE POINTS: 1

IEQc7: Thermal Comfort-Design

Not Attempted

POSSIBLE POINTS: 1

IEQc8.1: Daylight and Views-Daylight

Awarded: 1

POSSIBLE POINTS: 1

ATTEMPTED: 1, DENIED: 0, PENDING: 0, AWARDED: 1

03/27/2018 DESIGN AND CONSTRUCTION FINAL REVIEW

The clarifications for Plf3: Occupant and Usage Data and the additional documentation indicate that the project has achieved the daylighting requirements in 85.43% of all regularly occupied spaces.

11/30/2017 DESIGN AND CONSTRUCTION PRELIMINARY REVIEW

The LEED Form states that the project has achieved the daylighting requirements in 88% of all regularly occupied spaces, via Option 1: Simulation. However, to demonstrate compliance, the following must be addressed.

TECHNICAL ADVICE

1. Plf3: Occupant and Usage Data is pending clarifications regarding the amount of regularly occupied space. Therefore, it is unclear whether all regularly occupied spaces have been considered for this credit, as required. Note that only support areas such as copy rooms, storage, mechanical rooms, laundry, and restrooms may be excluded from the regularly occupied square footage. Regularly occupied spaces are areas where one or more individuals spend time (more than one hour per person per day on average) seated or standing as they work, study, or perform other focused activities inside a building. Provide the requested clarifications regarding Plf3 and resubmit this credit. Revise this credit to ensure that the total amount of regularly occupied space has been reported accurately and consistently throughout the submittal.

IEQc8.2: Daylight and Views-Views

Not Attempted

POSSIBLE POINTS: 1



Innovation in Design

IDc1.1: Innovation in Design
POSSIBLE POINTS: 1

**Not
Attempted**

**IDc1.1: Construction Indoor Air Quality
Management Plan** **Awarded: 1**

POSSIBLE POINTS: 1

ATTEMPTED: 1, DENIED: 0, PENDING: 0, AWARDED: 1

02/27/2018 DESIGN AND CONSTRUCTION FINAL REVIEW

The requested clarifications for Plf4: Schedule and Overview Documents and the additional documentation demonstrate compliance.

12/04/2017 DESIGN AND CONSTRUCTION PRELIMINARY REVIEW

The LEED Form states that the project achieves exemplary performance for EQc3: Construction IAQ Management Plan - During Construction. The requirement for exemplary performance is to require and enforce a Construction Indoor Air Quality Management Plan for 100% of the tenant spaces. A draft Tenant Sales and/or Lease Agreement (TSLA) has been provided within the documentation for Plf4: Schedule and Overview Documents indicating that 100% of tenant spaces are required and enforced to conform to the Construction Indoor Air Quality Management Plan. However, to demonstrate compliance, the following must be addressed.

TECHNICAL ADVICE

1. Plf4 is pending clarifications, as it is unclear how the provided document complies with the TSLA requirements, as it does not appear to be binding. Additionally, the language related to the requirements for this credit outlined in the draft TSLA is not sufficient to confirm that the future tenants are required to implement a compliant Construction IAQ Management Plan. Provide the requested clarifications for Plf4 and resubmit this prerequisite. Ensure that the revised legally binding TSLA has been signed by the project Owner/developer and tenant(s) and specifies the required performance measures in the anticipated tenant space(s). Alternatively, the project may pursue a different Innovation in Design strategy for the Final Review.

IDc1.2: Innovation in Design
POSSIBLE POINTS: 1

**Not
Attempted**

IDc1.2: Low-Emitting Materials **Awarded: 1**

POSSIBLE POINTS: 1

ATTEMPTED: 1, DENIED: 0, PENDING: 0, AWARDED: 1

02/27/2018 DESIGN AND CONSTRUCTION FINAL REVIEW

The requested clarifications for Plf4: Schedule and Overview Documents and the additional documentation demonstrate compliance.

11/30/2017 DESIGN AND CONSTRUCTION PRELIMINARY REVIEW

The LEED Form states that the project achieves exemplary performance for EQc4: Low-Emitting Materials. The requirement for exemplary performance is to require and enforce compliance with the EQc4 suite of credits for 100% of the tenant spaces. A copy of the Tenant Sales and/or Lease Agreement has been provided demonstrating that 100% of tenant spaces are required to conform to the EQc4 requirements. However, to demonstrate compliance, the following must be addressed.

TECHNICAL ADVICE

1. Plf4: Schedule and Overview Documents is pending clarifications, as it is unclear how the provided document complies with the TSLA requirements, as it does not appear to be binding. Provide the requested clarifications for Plf4 and resubmit this prerequisite. Ensure that the revised legally binding TSLA has been signed by the project Owner/developer and tenant(s) and specifies the required performance measures in the anticipated tenant space(s). Alternatively, the project may pursue a different Innovation in Design strategy for the Final Review.

IDc1.3: MR Regional Materials Exp

Awarded: 1

POSSIBLE POINTS: 1

ATTEMPTED: 1, DENIED: 0, PENDING: 0, AWARDED: 1

11/30/2017 DESIGN AND CONSTRUCTION PRELIMINARY REVIEW

The LEED Form states that the project achieves exemplary performance for MRc5: Regional Materials. The requirement for

exemplary performance is 30%, and the project has demonstrated 55.52%.

IDc1.3: Innovation in Design
POSSIBLE POINTS: 1

**Not
Attempted**

IDc1.4: Innovation in Design
POSSIBLE POINTS: 1

**Not
Attempted**

IDc1.4: Innovation in Design
POSSIBLE POINTS: 1

**Not
Attempted**

**IDc1.5: Innovation - Green Cleaning
policy/program**

Awarded: 1

POSSIBLE POINTS: 1

ATTEMPTED: 1, DENIED: 0, PENDING: 0, AWARDED: 1

03/02/2018 DESIGN AND CONSTRUCTION FINAL REVIEW

The former proposal for a Transportation Management Plan has been replaced with a new strategy. The LEED Form has been submitted stating that the project has developed and implemented a Green Housekeeping program. To receive an Innovation in Design point, the project team must demonstrate compliance with LEED-EB O+M v2009 EQp3: Green Cleaning Policy. The Green Cleaning Policy and the Tenant Sales and/or Lease Agreement (TSLA) have been provided. The Green Cleaning Policy follows the LEED-EB O+M Policy Model and demonstrates the development of a comprehensive and quantitative green cleaning program which includes detailed information regarding staff training, cleaning processes and chemicals, and occupant feedback.

12/03/2017 DESIGN AND CONSTRUCTION PRELIMINARY REVIEW

The LEED Form states that the project team has developed and implemented a Transportation Management Plan, as specified in the LEED BD+C v2009 Reference Guide and based on LEED Interpretation 532 and related LEED Interpretations. The project has earned at least three SSc4 credits. However, to demonstrate compliance, the following must be addressed.

TECHNICAL ADVICE

1. Although the documentation provided within the base credit is sufficient to confirm the requirements of SSc4.1: Alternate Transportation - Public Transportation Access, the documentation is not sufficient to confirm that a Comprehensive Transportation Management Plan has been developed for the project. Note that a copy of the comprehensive Transportation Management Plan, including details and calculations or other evidence, must be provided to demonstrate a quantifiable reduction in personal automobile use. Provide a copy of the comprehensive Transportation Management Plan and resubmit this credit. Ensure that the Plan includes details and calculations or other evidence demonstrating a quantifiable reduction in personal automobile use, the list of transit strategies, official documentation for at least a five-year commitment to the programs, documentation for the number of employees that are initially provided program information, and documentation of the policies and procedures that ensure the same service for new employees. See the operations and Maintenance Considerations for SSc4.1 within the Reference Guide for possible strategies. Additionally, as this is a Core and Shell project, and as such the project team is not expected to have control over the implementation of the program in the tenant spaces, provide a copy of the Tenant Sales and/or Lease Agreement that includes the requirements of this credit and has been signed by the project Owner, as well as the future tenants (if known), to confirm that a legally-binding agreement is in place to ensure that the policy will be implemented in the tenant spaces. Alternatively, the project may attempt a different Innovation in Design credit for the Final Review.

Note that four exemplary performance points have been attempted for this LEED project and one exemplary performance point has been awarded. A maximum of three exemplary performance points may be awarded. See the Innovation in Design section of the Reference Guide, Path 2: Exemplary Performance for more information.

IDc1.5: Innovation in Design
POSSIBLE POINTS: 1

**Not
Attempted**

IDc2: LEED® Accredited Professional

Awarded: 1

POSSIBLE POINTS: 1

ATTEMPTED: 1, DENIED: 0, PENDING: 0, AWARDED: 1

11/30/2017 DESIGN AND CONSTRUCTION PRELIMINARY REVIEW

The LEED Form states that a LEED AP has been a participant on the project development team.



Regional priority

SSc2: Development Density and Community Connectivity

POSSIBLE POINTS:

SSc5.1: Site Development-Protect or Restore Habitat

POSSIBLE POINTS:

WEc2: Innovative Wastewater Technologies

POSSIBLE POINTS:

EAc2: On-Site Renewable Energy

POSSIBLE POINTS:

EAc3: Enhanced Commissioning

POSSIBLE POINTS:

EAc5.2: Measurement and Verification- Tenant Submetering

POSSIBLE POINTS:

TOTAL

106

55

1

0

55

REVIEW SUMMARY

Review			POINTS:			
	SUBMITTED	RETURNED	SUBMITTED	DENIED	PENDING	AWARDED
Design and Construction Preliminary	11/13/2017	12/04/2017	57	0	30	27
Credit	STATUS	TYPE	POINTS: ATTEMPTED	DENIED	PENDING	AWARDED
PIf1: Minimum Program Requirements	Approved		0	0	0	0
PIf2: Project Summary Details	Approved		0	0	0	0
PIf3: Occupant and Usage Data	Not Approved		0	0	0	0
PIf4: Schedule and Overview Documents	Not Approved		0	0	0	0
PIf5: Building System Control	Approved		0	0	0	0
SSp1: Construction Activity Pollution Prevention	Awarded	Construction	0	0	0	0
SSc1: Site Selection	Awarded	Design	1	0	0	1
SSc4.1: Alternative Transportation-Public Transportation Access	Awarded	Design	6	0	0	6
SSc4.2: Alternative Transportation-Bicycle Storage and Changing Rooms	Awarded	Design	2	0	0	2
SSc4.3: Alternative Transportation-Low-Emitting and Fuel-Efficient Vehicles	Pending	Design	3	0	3	0
SSc4.4: Alternative Transportation-Parking Capacity	Awarded	Design	2	0	0	2
SSc7.2: Heat Island Effect-Roof	Awarded	Design	1	0	0	1
SSc8: Light Pollution Reduction	Pending	Design	1	0	1	0
SSc9: Tenant Design and Construction Guidelines	Awarded	Design	1	0	0	1
WEp1: Water Use Reduction-20% Reduction	Awarded	Design	0	0	0	0
WEc1: Water Efficient Landscaping	Pending	Design	4	0	4	0
WEc3: Water Use Reduction	Awarded	Design	3	0	0	3
EAp1: Fundamental Commissioning of the Building Energy Systems	Awarded	Construction	0	0	0	0
EAp2: Minimum Energy Performance	Pending	Design	0	0	0	0
EAp3: Fundamental Refrigerant Management	Pending	Design	0	0	0	0
EAc1: Optimize Energy Performance	Pending	Design	13	0	13	0
EAc4: Enhanced Refrigerant Management	Pending	Design	2	0	2	0
EAc5.1: Measurement and Verification-Base Building	Awarded	Design	1	0	0	1
MRp1: Storage and Collection of Recyclables	Awarded	Design	0	0	0	0
MRC4: Recycled Content	Awarded	Construction	2	0	0	2
MRC5: Regional Materials	Awarded	Construction	2	0	0	2
IEQp1: Minimum Indoor Air Quality Performance	Pending	Design	0	0	0	0
IEQp2: Environmental Tobacco Smoke (ETS) Control	Awarded	Design	0	0	0	0
IEQc2: Increased Ventilation	Pending	Design	1	0	1	0
IEQc3: Construction IAQ Management Plan-During Construction	Awarded	Construction	1	0	0	1

IEQc4.1: Low-Emitting Materials-Adhesives and Sealants	Pending	Construction	1	0	1	0
IEQc4.2: Low-Emitting Materials-Paints and Coatings	Awarded	Construction	1	0	0	1
IEQc4.3: Low-Emitting Materials-Flooring Systems	Awarded	Construction	1	0	0	1
IEQc4.4: Low-Emitting Materials-Composite Wood and Agrifiber Products	Awarded	Construction	1	0	0	1
IEQc8.1: Daylight and Views-Daylight	Pending	Design	1	0	1	0
IDc1.1: Construction Indoor Air Quality Management Plan	Pending	Construction	1	0	1	0
IDc1.2: Low-Emitting Materials	Pending	Construction	1	0	1	0
IDc1.3: MR Regional Materials Exp	Awarded	Design	1	0	0	1
IDc1.5: Innovation - Green Cleaning policy/program	Pending	Design	1	0	1	0
IDc2: LEED® Accredited Professional	Awarded	Construction	1	0	0	1

Design and Construction Final

02/19/2018

03/27/2018

28

1

0

28

Credit	STATUS	TYPE	POINTS: ATTEMPTED	DENIED	PENDING	AWARDED
PIf3: Occupant and Usage Data	Approved		0	0	0	0
PIf4: Schedule and Overview Documents	Approved		0	0	0	0
SSc4.3: Alternative Transportation-Low-Emitting and Fuel-Efficient Vehicles	Awarded	Design	3	0	0	3
SSc8: Light Pollution Reduction	Awarded	Design	1	0	0	1
WEc1: Water Efficient Landscaping	Awarded	Design	4	0	0	4
EAp2: Minimum Energy Performance	Awarded	Design	0	0	0	0
EAp3: Fundamental Refrigerant Management	Awarded	Design	0	0	0	0
EAc1: Optimize Energy Performance	Awarded	Design	12	1	0	12
EAc4: Enhanced Refrigerant Management	Awarded	Design	2	0	0	2
IEQp1: Minimum Indoor Air Quality Performance	Awarded	Design	0	0	0	0
IEQc2: Increased Ventilation	Awarded	Design	1	0	0	1
IEQc4.1: Low-Emitting Materials-Adhesives and Sealants	Awarded	Construction	1	0	0	1
IEQc8.1: Daylight and Views-Daylight	Awarded	Design	1	0	0	1
IDc1.1: Construction Indoor Air Quality Management Plan	Awarded	Construction	1	0	0	1
IDc1.2: Low-Emitting Materials	Awarded	Construction	1	0	0	1
IDc1.5: Innovation - Green Cleaning policy/program	Awarded	Design	1	0	0	1