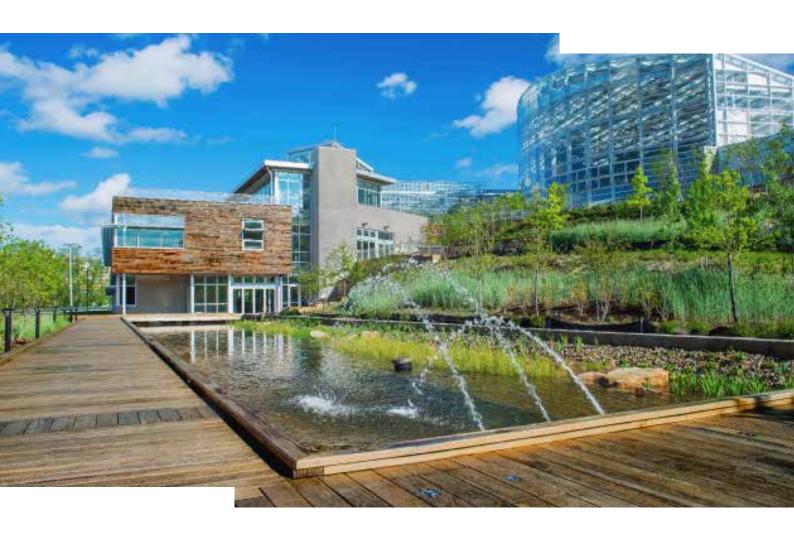
Living Building Challenge® & the WELL Building Standard®

Approaches for projects seeking a dual rating







Document Information



If you have any questions regarding this document, please send inquiries to:

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Contact for Enquiries

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Partnering to deliver healthy and restorative buildings

The International Living Future Institute (ILFI) and the International WELL Building Institute (IWBI), have agreed to work collaboratively to promote the design, construction and operations of healthy and restorative buildings. The two organizations will work together to identify opportunities to align the two rating systems, coordinate events and education offerings, and promote building practices that significantly raise the standard of what buildings should be.







About the Living Building Challenge®

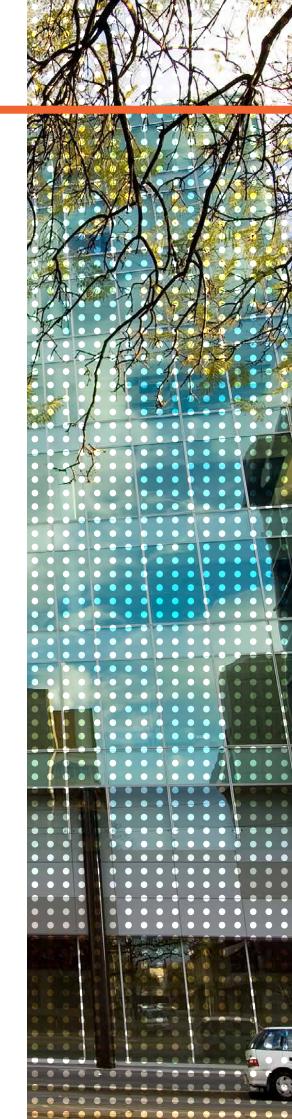
The Living Building Challenge is the built environment's most ambitious holistic performance standard. The program was launched in 2006 and is administered by the International Living Future Institute, a non-profit organization offering green building and infrastructure solutions at every scale—from small renovations to whole cities. The mission of the Institute is to lead and support the transformation toward communities that are socially just, culturally rich and ecologically restorative.

The Living Building Challenge is a green building certification program and sustainable design framework that has reframed the conversation to visualize the ideal for the built environment. It uses the metaphor of a flower because the ideal built environment should function as cleanly and efficiently as a flower. The framework is structured around seven Petals: Place, Water, Energy, Health + Happiness, Materials, Equity, and Beauty.

Certification is based on actual performance, rather than modeled or anticipated outcomes. Therefore, projects must be operational for at least twelve consecutive months prior to evaluation.

Projects earn Living Certification by achieving all Imperatives assigned to a Typology (either Building, Renovation, or Landscape + Infrastructure), and Petal Certification by satisfying the requirements of at least three Petals (at least one of which must be either Water, Energy or Materials). Zero Energy Certification requires projects use on-site renewables to meet 100 percent of their energy needs.

Learn about our other initiatives and programs on our website: living-future.org







About the WELL Building Standard ™

The WELL Building Standard™ (WELL) is the first building standard to focus exclusively on the health and wellness of the people in buildings. WELL is a performance-based system for measuring and certifying features of buildings that impact human health and well-being through seven concepts: air, water, nourishment, light, fitness, comfort and mind. It marries best practices in design and construction with evidence-based medical and scientific research – harnessing buildings and communities as vehicles to support human health and well-being.

Since we spend about 90% of our time indoors, the buildings where we live, work, learn and relax have a profound effect on our well-being: how we feel, what we eat, and how we sleep at night. WELL is grounded in a body of research that explores this connection between buildings and people. Each WELL feature is designed to address issues that impact the health, comfort or knowledge of people in buildings through design, operations and behavior.







Purpose of this document

IWBI and ILFI recognize the complementary nature of addressing holistic environmental and social impacts within the built-environment while specifically addressing health and well-being at the organizational and occupant level. Both organizations understand the value of multiple certifications for projects addressing broad sustainability issues and strive to support those efforts.

This document provides assistance for those project teams seeking to obtain both a Living Building Challenge certification and a WELL Certified™. Unless noted otherwise, this document refers to the Living Building Challenge 3.1 and WELL Building Standard v1.

To simplify the process for projects pursuing both programs, ILFI and IWBI have developed the following document to show how Living Building Challenge can assist in meeting WELL features, and to show how WELL features can assist in meeting the Living Building Challenge.







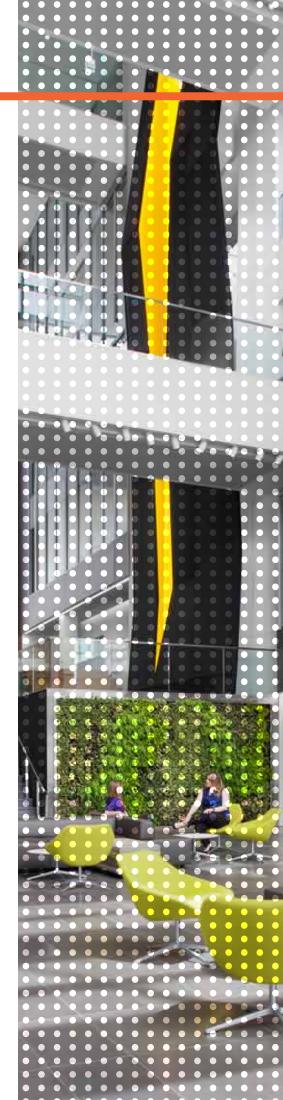
How to read this document

This document outlines how Living Building Challenge imperatives may contribute to achieving WELL features. Conversely, the document indicates which WELL features may contribute to achieving Living Building Challenge imperatives.

IWBI has evaluated this mapping and provided rulings of equivalency for entire WELL features or parts that are satisfied by the Living Building Challenge Imperatives. ILFI has provided similar rulings for which Living Building Challenge Imperatives can be completely or partially satisfied by fulfilling WELL features or parts of features. This analysis was based on Living Building Challenge 3.1 (May 2016) and the WELL Building Standard v1 (Q2 2017).

The document outlines a level of equivalence for each LBC Imperative and WELL feature. Each level is assigned an icon as follows:

| Equivalence Icons | | | |
|---------------------------------|--|--|--|
| Complete Partial Not Equivalent | | | |
| / | | | |



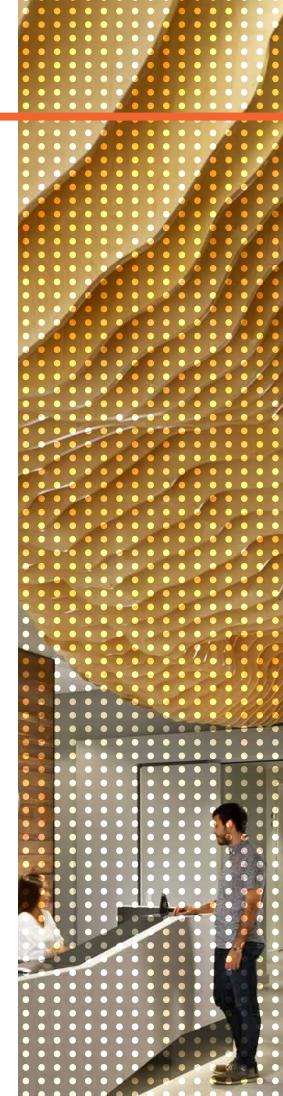




The icons indicate the following:

- Complete: The entire feature or Imperative has been evaluated and deemed satisfactory to achieve the intent of the WELL feature or LBC imperative indicated. The awarded feature or imperative can be used as verification that the requirement has been satisfied.
- Partial: The Imperatives share a similar outcome, though requirements of one are not completely met by the other and it is likely that additional steps will be needed. For example, an awarded feature satisfies a portion of an Imperative's requirements, but additional compliance strategies and documentation are needed.
- Not Equivalent: The Imperative or feature is currently not addressed in one of the programs, or there are similarities of intent but the requirements or focus are sufficiently disparate to resist direct comparison. Some such Imperatives, however, may be recognized under the WELL Innovation category.

Typically, Living Building Challenge Imperatives are broader, and WELL features are more specific in their focus; therefore it can take several WELL features to meet one LBC Imperative, and one Imperative may contribute towards multiple features. Due to this difference, in Table 1: WELL Building Standard to Living Building Challenge, ILBI has listed which WELL features are met by LBC Imperatives. In Table 2: Living Building Challenge to WELL Building Standard, on the other hand, ILFI has listed which additional actions are needed beyond the relevant WELL features and parts. The resulting alignments are shown in the tables below.







How to apply equivalent outcomes to your project

IWBI and ILFI have agreed upon the equivalent outcomes identified in this document. The tables on the following pages detail LBC imperatives deemed equivalent to WELL features, and vice versa. Please note that there are different levels of equivalency defined under the 'How to read this document' section.

In order to streamline the certification process, reduced documentation may be submitted where outcomes have already been verified in the alternate rating program. Project teams are required to demonstrate that outcomes being applied have been verified with appropriate supporting evidence.

Claiming Living Building Challenge in WELL Building Standard

Where a project has achieved, or is pursuing Living Building Challenge Certification and seeks to apply these efforts to achieve a WELL feature, the project should submit the following during WELL documentation review:

- Short report identifying which LBC imperative are being used to claim WELL features, in line with the guidance provided in this document.
 - If already awarded, proof of awarded LBC imperative/ petal may be submitted in lieu of the ascribed WELL verification method in appendix D of the WELL Building Standard.
 - If a project is pursuing LBC and WELL Certification in parallel, the project may indicate that final proof of award will be submitted post project performance verification. In this case the feature will stay as pending until proof of award is submitted.

Projects using a more recent version of the WELL Building Standard can still use the crosswalk without modifications.







Claiming WELL Building Standard in Living Building Challenge

Where a project has achieved WELL Certification and seeks to apply these efforts to achieve a Living Building Challenge Living, Petal or Zero Energy Certification, the project should submit the following during the Living Building Challenge Audit:

- Short report identifying which WELL features are being used to claim Living Building Challenge imperatives, in line with the guidance provided in this document; and
- Supporting evidence for each Living Building Challenge Imperative or part using WELL equivalency
 - Features that are "Complete:" fulfilment of LBC
 Imperatives may provide proof of awarded WELL
 feature or part(s) in lieu of the Living Building
 Challenge documentation for those Imperatives.
 - Features that are "Partial:" fulfilment of LBC Imperatives must provide proof of awarded WELL feature or part(s) as well as documentation of the fulfilment of all listed additional requirements.







Table 1: WELL Building Standard to Living Building Challenge

This table provides an overview of the alignment between WELL Building Standard features and the Living Building Challenge Imperatives. Look for a WELL feature or feature part(s) on the left to see which LBC Imperatives will contribute to compliance.



| Feature No. | WELL Feature Name | Feature Part | LBC Imperative | Equivalence |
|----------------|-----------------------------|--|-----------------------------------|-------------|
| | Air quality standards | Standards for Volatile Substances | 08 - Healthy interior environment | Part 1 & 2 |
| 01 | | Standards for Particulate Matter and Inorganic Gases | | ✓ |
| | | Radon | | _ |
| 00 | 0 | Indoor Smoking Ban | 08 - Healthy interior | All parts |
| 02 | Smoking ban | Outdoor Smoking Ban | environment | p s |
| | | Ventilation Design | | _ |
| 03 | Ventilation effectiveness | Demand Control Ventilation | 08 - Healthy interior environment | ✓ |
| | | System Balancing | | _ |
| | VOC reduction | Interior Paints and Coatings | | |
| | | Interior Adhesives and Sealants | 08 - Healthy interior environment | All parts |
| 04 | | Flooring | | ✓ / |
| | | Insulation | | |
| | | Furniture and Furnishings | | |
| 08 | Healthy Entrance | Permanent entryway walk- off systems | 08 - Healthy interior | All parts |
| | | Entryway air seal | environment | ✓ |
| 09 | Cleaning protocol | Cleaning Plan for Occupied Spaces | 08 - Healthy interior environment | _ |
| | | Asbestos and Lead Restriction | 08 - Healthy interior environment | _ |
| 11 | | Lead Abatement | | _ |
| | Fundamental material safety | Asbestos Abatement | | _ |
| | aconar oaroty | Polychlorinated Biphenyls Abatement | | _ |
| | | Mercury Limitation | | _ |





Table 1: WELL Building Standard to Living Building Challenge



| 17 | Direct source ventilation | Pollution Isolation and Exhaust | 08 - Healthy interior environment | Part 1b |
|----|------------------------------|---|---|--------------|
| | | Full Control | 07 - Civilized environment | _ |
| 19 | Operable win- | Outdoor Air Measurement | | _ |
| | dóws | Window Operation Mea- surement | | _ |
| | | Appliance and heater combustion ban | | Part 1&2 |
| 24 | Combustion minimization | Low-emission combustion sources | 06 - Net positive energy | ✓ |
| | | Engine exhaust reduction | | _ |
| | | Perfluorinated compound limitation | | |
| | | Flame retardant limitation | | |
| 25 | Toxic material reduction | Phthalate (plasticizers) limitation | 10 - Red list | All parts |
| | | Isocyanate – based poly- urethane limitation | | Ť |
| | | Urea – formaldehyde restriction | | |
| 26 | Enhanced material safety | Precautionary material selection | 10 - Red list | ✓ |
| | Food | Gardening space | 02 - Urban agriculture | All parts |
| 51 | production | Planting support | | 7 iii pai to |
| | | Stair-accessibility | | _ |
| 64 | Interior fitness circulation | Stair promotion | 04 - Human-powered living | _ |
| | | Facilitative aesthetics | | _ |
| 65 | Activity incentive program | Activity incentives programs | 04 - Human-powered living | _ |
| | | Pedestrian Amenities | | _ |
| 67 | Exterior active design | Pedestrian Promotion | 04 - Human-powered living | _ |
| | design | Neighborhood Connectivity | 9 | ✓ |
| 69 | Active | Bicycle Storage and Support | 04 - Human-powered living | _ |
| 09 | transportation support | Post Commute and Work- out Facilities | | _ |
| 72 | Accessible design | Accessibility and usability | 16 - Universal access to nature and place | ✓ |



Table 1: WELL Building Standard to Living Building Challenge

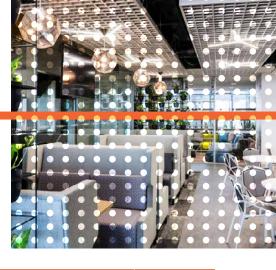


| 87 | Beauty and Design I | Beauty and mindful design | 19 - Beauty and spirit | ✓ |
|-----------------------|-----------------------------|------------------------------------|----------------------------|-----------|
| 88 Biophil Qualita | | Nature incorporation | 09 - Biophilic environment | |
| | Biophilia I - | Pattern incorporation | | All parts |
| | Qualitative | Nature interaction | | ~ |
| 97 | Material transparency | Material information | 12 - Responsible industry | All parts |
| | | Accessible information | 12 - Nesponsible illaustry | ✓ |
| 98 | Organizational transparency | Transparency program participation | 18 - JUST organizations | ~ |



Table 2: Living Building Challenge to WELL Building Standard

This table provides an overview of the alignment between Living Building Challenge Imperatives and WELL Building Standard features. Look for an Imperative on the left to see which WELL feature, or feature part will contribute to compliance.



| L | .BC Imperative | | | |
|-----|---------------------------------|---|--|-----------|
| No. | Name | WELL features | Additional requirements | Alignment |
| 1 | Limits to Growth | Not addressed | | _ |
| 2 | Urban Agriculture | 51 - Food production – Part 1 | Area of food production must meet LBC requirements based on project FAR Food production areas (on or off-site) must meet the requirements of other targeted Imperatives (e.g. Red List) | <u> </u> |
| 3 | Habitat Exchange | Not addressed | | _ |
| | | 64 - Interior fitness circulation | Provision of awnings for pedestrian routes & cover over bike racks Advocacy in the community through letters, to facilitate the uptake of human powered transportation. Compliance with subsidy requirements | |
| 4 | Human-powered Living | 65 - Activity incentive programs | Compliance with subsidy requirements Compliance with electric vehicle requirements. Demonstrate that density of the site was not lowered. Bike for 15% of the occupants | A |
| | | 69 - Active transportation support | | |
| 5 | Net Positive Water | Not addressed | | _ |
| 6 | Net Positive Energy | 24 - Combustion minimization – Part 1 | Team should start with the I-06 requirements Avoid Combustion in the project, unless addressed under a current LBC Exception Supply 105% of energy needs thought on-site renewables on a net annual basis Provide on-site energy storage for resilience | A |
| 7 | Civilized Environment | 19 - Operable windows – Parts 1 & 2 61 – Right to Light | A maximum distance of 9m to all staffed workstations. | <u> </u> |
| 8 | Healthy Interior Environment | 01 - Air quality standards 02 - Smoking ban 03 - Ventilation effectiveness - Parts 1 & 2 04 - VOC reduction 08 - Healthy entrance 09 - Cleaning protocol 17 - Direct source ventilation | Test indoor air quality both before, and between three and twelve months after occupancy Ban smoking on the property Comply with CDPH requirement for all eligible products besides paints, coatings, adhesives and sealants, or meet an existing exception | <u> </u> |



Table 2: Living Building Challenge to WELL Building Standard



| 9 | Biophilic Environment | 88 - Biophilia I - Qualitative | Hold an eight hour Biophilic exploration with critical team members Include one additional biophilic feature in the project | A |
|----|---------------------------------------|--|--|----------|
| 10 | Red List | 11 - Fundamental materialsafety25 - Toxic material reduction26 - Enhanced material safety | Team should start with the I-10 requirements. Screen C2C Gold & Platinum certified products for formaldehyde Comply with the requirements in Imperative 10 related to chemicals not addressed by Features 11, 25 and 26. Screen all HPDs against the Red List | <u> </u> |
| 11 | Embodied Carbon Footprint | Not addressed | | _ |
| 12 | Responsible Industry | 97 - Material transparency | Meet the FSC and advocacy requirement of Imperative 12 | _ |
| 13 | Living Economy Sourcing | Not addressed | | _ |
| 14 | Net Positive Waste | Not addressed | | _ |
| 15 | Human Scale + Human Places | 67 - Exterior active design | Design to the parameters established for Surface Cover, Signage and Proportion | _ |
| 16 | Universal Access to Nature & Place | 72 - Accessible design | External aspects of the project are open to the public The project has not blocked adjacent property access to sunlight The project has not blocked community access to fresh air or water. | A |
| 17 | Equitable Investment | 96 – Altruism – Part 2 | All matches to employee donations can be attributed towards the I17 total requirement. Funds directly contribut- ed by employees do not contribute to compliance. | <u> </u> |
| 18 | JUST Organizations | 98 - Organizational transparency –Part 1a | Send out Just program literature to ten project consultants, sub-consultants or product suppliers. | _ |
| 19 | Beauty & Spirit | 87 - Beauty and design I | - | / |
| 20 | Inspiration & Education | Not addressed | | _ |

