

LEED BD+C v3.0 (2009) Referenced Standards (Red indicates revisions from v2.2)

Sustainable Sites

SSp1	Construction Activity Pollution Prevention	<ul style="list-style-type: none"> 2003 EPA Construction General Permit (www.cfpub.epa.gov/npdes/sotrmwater/cgp.cfm)
SSp2	Environmental Site Assessment (Schools)	<ul style="list-style-type: none"> ASTM E1527-05, Phase I Environmental Site Assessment ASTM E1903-97, Phase II Environmental Site Assessment
SSc1	Site Selection	<ul style="list-style-type: none"> Endangered Species Lists (U.S. Fish & Wildlife Service List of Threatened & Endangered Species) Federal Emergency Management Agency (FEMA) Definition of 100-Year Flood Endangered Species Lists (U.S. Fish & Wildlife Service List of Threatened & Endangered Species) Definition of Wetlands in the U.S. Code of Federal Regulations (40 CFR, Parts 230-233, 22)
SSc3	Brownfield Redevelopment	<ul style="list-style-type: none"> U.S. EPA Definition of Brownfields (EPA Sustainable Redevelopment of Brownfields Program) ASTM E1527-05, Phase I Environmental Site Assessment ASTM E1903-97, Phase II Environmental Site Assessment
SSc4.4	Alternative Transportation: Parking Capacity	<ul style="list-style-type: none"> Institute of Transportation Engineers, Parking Generation study, 2003
SSc7.1	Heat Island Effect: Nonroof	<ul style="list-style-type: none"> ASTM E408-71 (1996)e1, Standard Test Methods for Total Normal Emittance of Surfaces Using Inspection-Meter Techniques ASTM C1371-04a Standard Test Method for Determination of Emittance of Materials Near Room Temperature Using Portable Emissometers ASTM E903-96, Standard Test Method for Solar Absorptance, Reflectance, and Transmittance of Materials Using Integrated Spheres ASTM E1918-97, Standard Test Method for Measuring Solar Reflectance of Horizontal and Low-Sloped Surfaces in the Field ASTM C1549-04, Standard Test Method for Determination of Solar Reflectance Near Ambient Temperature Using a Portable Solar Reflectometer
SSc7.2	Heat Island Effect: Roof	<ul style="list-style-type: none"> ASTM Standard E1980-01—Standard Practice for Calculating Solar Reflectance Index of Horizontal and Low-Sloped Opaque Surfaces ASTM E408-71(1996)e1—Standard Test Methods for Total Normal Emittance of Surfaces Using Inspection-Meter Techniques ASTM E903-96—Standard Test Method for Solar Absorbance, Reflectance, and Transmittance of Materials Using Integrating Spheres ASTM E1918-97—Standard Test Method for Measuring Solar Reflectance of Horizontal and Low-Sloped Surfaces in the Field ASTM C1371-04—Standard Test Method for Determination of Emittance of Materials Near Room Temperature Using Portable Emissometers ASTM C1549-04—Standard Test Method for Determination of Solar Reflectance Near Ambient Temperature Using a Portable Solar Reflectometer

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SSc8	Light Pollution Reduction	<ul style="list-style-type: none"> ASHRAE/IESNA Standard 90.1-2007, Energy Standard for Buildings Except Low-Rise Residential Lighting, Section 9 (without amendments)
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Water Efficiency

WEp1	Water Use Reduction	<ul style="list-style-type: none"> The Energy Policy Act (EPAct) of 1992 (and as amended)
WEc2	Innovative Wastewater Technologies	<ul style="list-style-type: none"> The Energy Policy Act (EPAct) of 1995
WEc3	Water Use Reduction	<ul style="list-style-type: none"> International Association of Plumbing and Mechanical Officials Publication IAPMO/ANSI UPC 1-2006, Uniform Plumbing Code 2006, Section 402.0, Water-Conserving Fixtures and Fittings International Code Council, International Plumbing Code 2006, Section 604, Design of Building Water Distribution System

Energy & Atmosphere

EAp2	Minimum Energy Performance	<ul style="list-style-type: none"> ANSI/ASHRAE/IESNA 90.1-2007: Energy Standard for Buildings Except Low-Rise Residential California T-24-2005 is granted parallel equivalency to ANSI/ASHRAE/IESNA 90.1-2007 ASHRAE Advanced Energy Design Guide for Small Office Buildings 2004 ASHRAE Advanced Energy Design Guide for Small Warehouses and Self Storage Buildings 2008 ASHRAE Advanced Energy Design Guide for K-12 School Buildings New Building Institute, Advanced Buildings Core Performance Guide ENERGY STAR Program, Target Finder Rating Tool
EAc1	Optimize Energy Performance	<ul style="list-style-type: none"> ANSI/ASHRAE/IESNA 90.1-2007: Energy Standard for Buildings Except Low-Rise Residential, and Informative Appendix G, Performance Rating Method California T-24-2005 is granted parallel equivalency to ANSI/ASHRAE/IESNA 90.1-2007 ASHRAE Advanced Energy Design Guide for Small Office Buildings, 2006 ASHRAE Advanced Energy Design Guide for Retail Buildings 2006 ASHRAE Advanced Energy Design Guide for Small Warehouses and Self Storage Buildings 2008 ASHRAE Advanced Energy Design Guide for K-12 School Buildings New Buildings Institute, Advanced Buildings Core Performance Guide
EAc2	On-Site Renewable Energy	<ul style="list-style-type: none"> ANSI/ASHRAE/IESNA 90.1-2007: Energy Standard for Buildings Except Low-Rise Residential California T-24-2005 is granted parallel equivalency to ANSI/ASHRAE/IESNA 90.1-2007
EAc5	Measurement & Verification	<ul style="list-style-type: none"> International Performance Measurement & Verification Protocol (IPMVP) Volume III, EVO 30000.1-2006, Concepts and Options for Determining Energy Savings in New Construction, Jan 2006

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EAc6	Green Power	<ul style="list-style-type: none"> Center for Resource Solutions, Green-e Product Certification Requirements
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Materials & Resources

MRc4	Recycled Content	<ul style="list-style-type: none"> International Standard ISO 14021—1999 – Environmental Labels and Declarations – Self-Declared Environmental Claims (Type II Environmental Labeling)
MRc7	Certified Wood	<ul style="list-style-type: none"> Forest Stewardship Council's Principles and Criteria

Indoor Environmental Quality

EQp1	Minimum IAQ Performance	<ul style="list-style-type: none"> ANSI/ASHRAE Standard 62.1-2007: Ventilation for Acceptable Indoor Air Quality
EQp2	Environmental Tobacco Smoke (ETS) Control	<ul style="list-style-type: none"> ANSI/ASTM-E779-03, Standard Test Method for Determining Air Leakage Rate By Fan Pressurization Residential Manual for Compliance with California's 2001 Energy Efficiency Standards (For Low Rise Residential Buildings), Chapter 4
EQp3	Minimum Acoustical Performance (Schools)	<ul style="list-style-type: none"> ANSI/ASHRAE Standard S12-60-2002, Acoustical Performance Criteria, Design Requirements, and Guidelines for Schools ASHRAE Handbook, Chapter 47, Sound and Vibration Control, 2003 HVAC Applications
EQc1	Outdoor Air Delivery Monitoring	<ul style="list-style-type: none"> ANSI/ASHRAE Standard 62.1-2007: Ventilation for Acceptable Indoor Air Quality
EQc2	Increased Ventilation	<ul style="list-style-type: none"> ANSI/ASHRAE Standard 62.1-2007: Ventilation for Acceptable Indoor Air Quality CIBSE Applications Manual 10: 2005, Natural ventilation in non-domestic buildings
EQc3.1	Construction IAQ Management Plan: During Construction	<ul style="list-style-type: none"> SMACNA IAQ Guidelines for Occupied Buildings Under Construction, 2nd Edition, Chapter 3, November 2007 ANSI/ASHRAE Standard 52.2-1999: Method of Testing General Ventilation Air-Cleaning Devices for Removal Efficiency by Particle Size
EQc3.2	Construction IAQ Management Plan: Before Occupancy	<ul style="list-style-type: none"> US EPA Compendium of Methods for the Determination of Air Pollutants in Indoor Air
EQc4.1	Low-Emitting Materials: Adhesives & Sealants	<ul style="list-style-type: none"> South Coast Air Quality Management District (SCAQMD) Amendment to South Coast Rule #1168, VOC Limits, effective January 7, 2005 Green Seal Standard GS-36 (commercial adhesives), Effective October 19, 2000
EQc4.2	Low-Emitting Materials: Paints & Coatings	<ul style="list-style-type: none"> South Coast Air Quality Management District (SCAQMD) Rule 1113, Architectural Coatings Green Seal Standard GC-03 (anti-corrosive and anti-rust paints) Green Seal Standard GS-11 (commercial flat and non-flat paints)
EQc4.3	Low-Emitting Materials: Flooring Systems	<ul style="list-style-type: none"> Carpet and Rug Institute Green Label Plus Testing Program South Coast Air Quality Management District (SCAQMD) Rule #1168, VOC Limits South Coast Air Quality Management District (SCAQMD) Rule 1113, Architectural Coatings

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		<ul style="list-style-type: none"> • FloorScore Program • California Department of Health Services Standard Practices for the Testing of Volatile Organic Emissions from Various Sources Using Small-Scale Environmental Chambers, Including 2004 Addenda • State of California Standard 1350, Section 9, Standard Practice for the Testing of Volatile Organic Emissions from Various Sources Using Small-Scale Environmental Chambers, Testing Criteria
EQc4.4	Low-Emitting Materials: Composite Wood and Agrifiber Products	FOR SCHOOLS: <ul style="list-style-type: none"> • California Department of Health Services Standard Practices for the Testing of Volatile Organic Emissions from Various Sources Using Small-Scale Environmental Chambers, Including 2004 Addenda
EQc4.5	Low-Emitting Materials: Furniture and Furnishings (Schools)	<ul style="list-style-type: none"> • ANSI/BIFMA X7.1-2007 Standard for Formaldehyde and TVOC Emissions of Low-Emitting Office Furniture Systems and Seating • Environmental Technology Verification (ETV) Large Chamber Test Protocol for Measuring Emissions of VOCs and Aldehydes, Effective September 1999 • Greenguard Certification Program
EQc4.5	Low-Emitting Materials: Ceiling and Wall Systems (Schools)	<ul style="list-style-type: none"> • California Department of Health Services Standard Practices for the Testing of Volatile Organic Emissions from Various Sources Using Small-Scale Environmental Chambers, Including 2004 Addenda
EQc5	Indoor Chemical & Pollutant Source Control	<ul style="list-style-type: none"> • ANSI/ASHRAE 52.2-1999: Method of Testing General Ventilation Air-Cleaning Devices for Removal Efficiency by Particle Size
EQc6.2	Controllability of Systems: Thermal Comfort	<ul style="list-style-type: none"> • ANSI/ASHRAE Standard 62.1-2007: Ventilation for Acceptable Indoor Air Quality • ASHRAE Standard 55-2004: Thermal Comfort Conditions for Human Occupancy
EQc7.1	Thermal Comfort: Design	<ul style="list-style-type: none"> • ASHRAE Standard 55-2004, Thermal Comfort Conditions for Human Occupancy • Chartered Institute of Building Services (CIBSE) Applications Manual 10-2005, Natural Ventilation in Non-Domestic Buildings FOR SCHOOLS <ul style="list-style-type: none"> • ASHRAE HVAC Applications Handbook, 2003 Edition, Chapter 4, (Places of Assembly), Typical Natatorium Design Conditions
EQc7.2	Thermal Comfort: Verification	<ul style="list-style-type: none"> • ASHRAE Standard 55-2004, Thermal Comfort Conditions for Human Occupancy
EQc8.1	Daylight and Views: Daylight	<ul style="list-style-type: none"> • ASTM D1003-07e1, Standard Test Method for Haze and Luminous Transmittance of Transparent Plastics
EQc9	Enhanced Acoustical Performance (Schools)	<ul style="list-style-type: none"> • ANSI/ASHRAE Standard S12-60-2002, Acoustical Performance Criteria, design Requirements and Guidelines for Schools • ASHRAE Handbook, Chapter 47, Sound and Vibration Control, 2003 HVAC Applications
EQc10	Mold Prevention (Schools)	<ul style="list-style-type: none"> • Building Air Quality: A Guide for Building Owners and Facility Managers, EPA Reference Number 402-F-91-102, effective December 1991