GREEN BUILDING TOURS April 25, 2014

REATER U

44

Urban Land USI Institute



HIEB ALABAMA /DUNLAVY Houston, Texas

LEED-NC Retail v2009

18% Energy savings

54% Landscape water savings

83% Solar-reflective or shaded paving

LEED-NC Retail v2009 Certification awarded June 29, 2012	
Sustainable Sites	20/26
Water Efficiency	2/10
Energy & Atmosphere	6/35
Materials & Resources	6/14
Indoor Environmental Quality	9/15
Innovation in Design	4/6
Regional Priority	3/4

*Out of a possible 110 points



PROJECT PROFILE

HIEID ALABAMA/DUNLAVY Sustainable Community Relationships

PROJECT BACKGROUND

The H-E-B Alabama/Dunlavy supermarket, named Montrose Market, is situated in a park-like 7.7 acre urban site at 1701 W. Alabama St. in the arts district neighborhood of Montrose in Houston, Texas. Montrose Market "firsts" include being the first H-E-B store for which neighbors were invited to vote on building design options; the first H-E-B to have an outdoor market area and entertainment and dining patio; a location for H-E-B's first "Fork in the Road" food truck; and the first H-E-B to earn the Silver level of LEED for Retail green building certification (four other H-E-B stores have been awarded LEED certification).

GREEN DESIGN AS EXPRESSION OF COMMITMENT TO COMMUNITIES

H-E-B has integrated sustainable design and construction strategies into their new store standards for years, seeing their work to care for the environment as making them better neighbors, and helping them serve their customers and communities better. By being energy efficient and conserving natural resources, they not only respect the environment, they also create savings that are passed on to their customers in the form of everyday low prices.

STRATEGIES AND RESULTS

Tree shaded, heavily landscaped park areas with pedestrian walks and bench seating, made from existing unhealthy trees, are provided throughout the site. Existing and new native and adapted landscaping, watered by a high efficiency irrigation system, are designed to reduce landscape water use by 54% compared to a typical supermarket. Bicycle parking and "eVgo" electric vehicle charging stations are provided. The store is also convenient to several city bus stops. Tiers of deep roof overhangs create "Texas porch" store entry and outdoor entertainment and dining areas, shading large expanses of glass that visually connect the store interior and the tree-filled outdoor environment. Raised roof areas with horizontal window bands (light monitors) optimize the use of available daylight and minimize the need for daytime artificial lighting, while "low-e" glass, horizontal metal louvers, and interior rolldown shades reduce glare and heat gain through windows. Low-emitting interior building finishes also enhance the quality of the indoor environment by reducing building materials offgassing. The store is designed to use 18% less energy than a typical supermarket, through the use of highly reflective roofing; computer automated control of lighting, air conditioning and refrigeration systems; daylighting; water cooled refrigeration condenser, using air conditioning condensate water; refrigeration system waste heat to heat water; pull-down shades to close refrigerated display cases when the store is closed; doors on refrigerated beer display cases; and electrical peak load shedding, reducing electricity use at the electric utility's peak load times. Low flow restroom plumbing fixtures and water conserving kitchen equipment are designed to use 20% less indoor water than a conventional supermarket. In addition to collecting plastic shopping bags, cardboard, plastic stretch film, pharmacy stock bottles, used cooking oil, and meat trimmings for recycling, Montrose Market also works with a vendor to collect unsold produce no longer suitable for the food bank, for processing into compost. Montrose Market achieved exemplary levels of the following LEED credits: 83% of paving and sidewalks are solar-reflecting concrete or tree-shaded, reducing heat island effect; 38% recycled content building materials, such as steel, concrete, acoustical ceilings, insulation, and gypsum wall board; 38% of building materials originate from within 500 miles of the store, from communities such as Houston, Sugar Land, Seguin, San Antonio, and Fort Worth.

ABOUT H-E-B

H-E-B began in a small, family-owned store in the Texas Hill Country in 1905. Today H-E-B serves families all over Texas and Mexico in 155 communities, with more than 330 stores and 76,000 Partners (employees), making it one of the nation's largest independently owned food retailers.



Owner: H-E-B Architect: H-E-B Design & Construction (Design) Lake|Flato Architects (Exterior Design) Selser Schaefer Architects (Architect of Record) Landscape Architect and Contractor: McDugald-Steele **Design/Build Contractor:** Williams Development and Construction **Civil Engineer:** Bury+Partners Structural Engineer: SCA Consulting Engineers MEP Engineer: Kalmans Marshall Engineering Daylighting Design Engineer: ARUP Photography: Frank Ooms; Ray Briggs

Project Size: 80,000 sq ft



ABOUT LEED

The LEED Green Building Rating System is the national benchmark for the design, construction, and operations of high-performance green buildings. Visit the U.S.Green Building Council's Web site at <u>www.usgbc.org</u> to learn more about how you can make LEED work for you. Support the local chapter of USGBC by visiting <u>www.usgbctexasgulfcoast.org</u>