

**Industry Leaders:  
Intertech Flooring**

Intertech Flooring ([www.intertechflooring.com](http://www.intertechflooring.com)) is one of the country's leading providers of commercial flooring products, installation, maintenance and design consultation services to clients throughout Texas and the Southwest. The company was established in 1988 in Austin, and opened a San Antonio location in 1992, and is opening a location in the Rio Grande Valley this summer. Floor Covering Weekly ranked Intertech Flooring 18th in its 2006 Top 25 Contractors nationwide listing, based on 2005 total sales volume of \$20 million. Intertech's 2006 sales totaled \$25,875,000.

CASE STUDY

## Dell Children's Medical Center, Austin

**The Project: First-Ever LEED Platinum Hospital**

The \$200 million Dell Children's Medical Center opened in summer 2007 in Austin, on track to be the first LEED Platinum health care facility in the country and one of only a handful worldwide. Helping the hospital achieve the highest green building designation possible were green flooring experts Intertech Flooring.

"Every aspect of this project was approached with sustainable building concepts in mind, literally from the ground up," said Intertech Flooring CEO Bill Imhoff. "Intertech already had extensive green building project experience, and this project gave us an opportunity to leverage and further expand that knowledge."

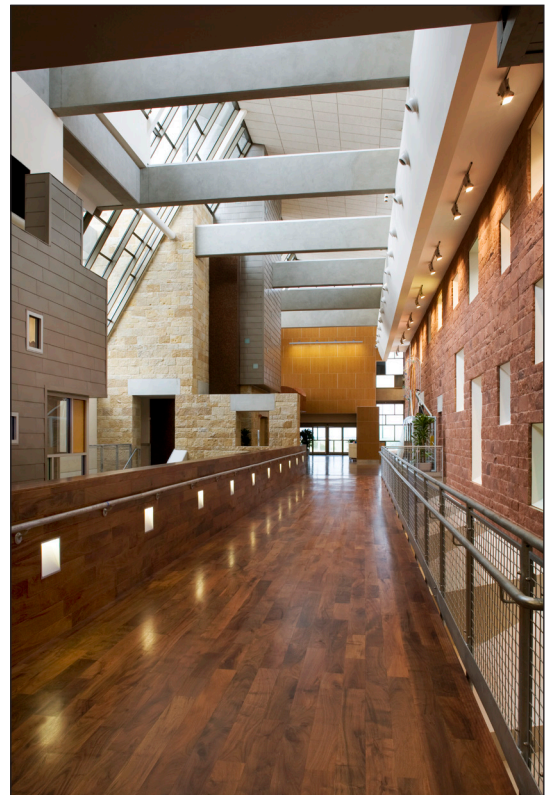
**Innovative Techniques**

Sustainable building practices were implemented in this project from the foundation up. One goal was reducing cement use, which creates carbon dioxide and contributes to greenhouse effect. 41,000 cubic yards of fly ash were substituted for cement used in the foundation and walls. Built on Austin's former Mueller Airport grounds, the 475,000 square-foot facility used 47,000 tons of recycled runway materials to build the parking garage and surface lots.

"The fly ash used in the concrete mix actually made for a more challenging installation as its chemical makeup required greater care to achieve a good bond on the flooring installed," said Imhoff. "Intertech worked with each product manufacturer to assure proper application, as it was critical to make sure that every aspect of the installation met our high standards and exceeded the owner's expectations. We even issued a five-year warranty with this installation."

**Sustainable Product Choices**

Intertech helped the hospital earn additional LEED points by choosing flooring adhesives with very low or zero volatile organic content. For most areas, Intertech installed a natural linoleum floor applied with green label adhesives. In carpeted areas, Intertech installed carpet constructed with recycled content. In addition to the recycled content in the carpets used on this project, all carpets used were constructed in a manner to facilitate full circle recycling in the future.



Intertech Flooring installed more than 50 different flooring products on the Dell Children's project. Green-friendly products included natural linoleum with low- or no-VOC adhesives, raised access flooring with underfloor air, and carpeting made with recycled content.



Complex flooring designs highlight every area of the hospital. Above, colorful designs in the children's physical therapy center achieve a happy, energetic tone. Below, colorful numbers in the flooring near elevators act as wayfinding tools. At bottom, rubber tiles were installed with heat-welded seams in the rehab pool area.

In the administrative areas, raised access flooring was installed with underfloor air delivery for more efficient air circulation that requires less power than traditional systems. "Intertech has provided raised flooring since 1991, integrating an underfloor plenum or chase for electrical, voice/data and air supply creating significantly less expensive and quicker moves for high churn facilities," said Imhoff. "We have also cross-trained our installation crews to provide installation services for all floor covering and raised flooring applications. This provides for a smoother construction and renovation process for our customers."

### **Complex, Creative Installation**

Dell Children's houses a three-acre multilevel healing garden with labyrinth, human sundial, reflecting pond and bridge; a four-story waterfall; and five self-contained ecosystems, each corresponding to a distinct area of the 46-county service region.

"We were honored to be a part of this truly leading-edge project," said Imhoff. "It not only sets the bar for sustainable building techniques, but considering the sheer size, floor design work, number of different products and installation schedule, this is one of the most complex installations in the nation if not the world."

The project encompassed more than 50 different flooring products and, to complicate the installation further, there were 176,000-plus lineal feet of seams in patterns and insets in the linoleum --all hand cut, minimizing material breaks in the patterns found due to the bed size requirements on the jet or water cut methods. All wet areas of the facility were heat welded.

The hospital anticipates the LEED certification process could take from six to nine months to finalize, once all documentation is submitted.