

Cecil T. Lobo ASCE Student Chapter of Rose-Hulman Institute of Technology

Rose Civils have really been busy lately! We have some comments on the Great Lakes Regional Conference, the wheelchair ramp construction, the Hilton Hotel field trip, and a few words about how the Explore Engineering Hot Air Balloon launch turned out.

-Justin Perry

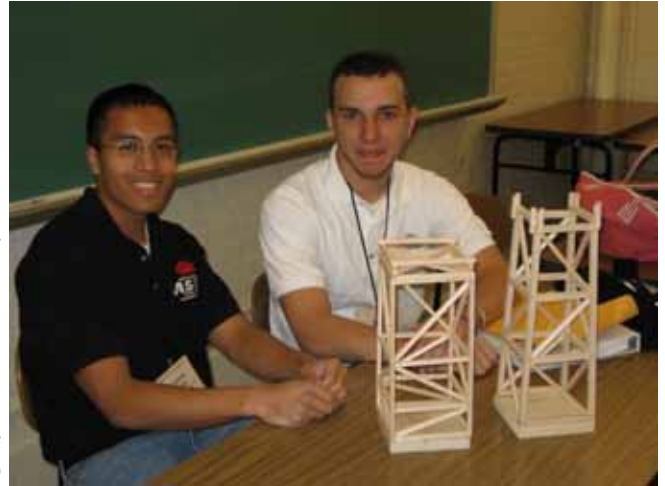
Another Regional Conference Has Come and Gone...

—Tim Sliwinski

This past April 27th and April 28th, the Cecil T. Lobo Student Chapter of ASCE had a group of Civil Engineering students attend and compete in the ASCE Great Lakes Regional Conference, hosted at Purdue University.

We had students participating in the concrete frisbee, the balsa building, and the technical paper competitions. Other competitions held at the conference included the concrete canoe and the steel bridge. We did not compete in the concrete canoe or the steel bridge this year but we plan to compete in the concrete canoe next year. If you are interested in joining – please contact Liz Ridgway: ridgwaej@rose-hulman.edu

Although none of our competitors placed, we all had a good time up at Purdue. ASCE student chapter members Sebastian Mendes, Sarah Hoch, Michael Krantz, and Matt Trowbridge competed in the Balsa Building competition. Chris Armstrong, Derek Davidson, Matt Mead, and Rachel Howser competed in the Concrete Frisbee competition. In our final competition of the weekend, Rachel Howser presented during the technical paper competition on the topic of “Eminent Domain and the Engineer’s Ethical Responsibilities.”



As for other schools, UW Madison took first in the concrete canoe and steel bridge, University of Illinois at Urbana Champaign took first in the technical paper, MSOE won the concrete frisbee, and Valparaiso University won the balsa tower.

This year was a little different from previous years for Rose-Hulman. This is because we are planning to host the conference on our campus the spring of either 2009 or 2010, and therefore had our eyes out for ideas and information pertaining to hosting. We learned a lot from visiting this conference that could aid us when it is our turn to host.

**Contact ASCE officers if you would like to compete in future years.

**ASCE Community Service Project:
14th and Chestnut Community Center Wheelchair Ramp
—Cole Perry**

The ASCE student chapter recently finished building a wheelchair ramp for the 14th and Chestnut Community Center as a community service project. The ramp consisted of 39 feet of sloped ramp along with 3 landings, and is the largest ramp our ASCE chapter has built to date. The ramp will make it possible for the community center to move their food pantry into the new home they have recently purchased. Funding and a few workers were provided by Thrivent Financial, a local service organization. This was a great opportunity to get involved with ASCE and the community. Thanks to all of those who attended and made this project a huge success!



Hot Air Balloon Launch Helps Local Kids Explore Engineering

—Alex McLean

This activity does not involve practical engineering skills like structures, soils, and hydraulics. We direct this activity towards helping children learn problem solving skills and creative thinking, skills essential to the engineering discipline. The amount of time to heat the balloons to allow them to fly is relatively short, so if something goes wrong, they must work quickly to fix it. They also must fix the balloon using as little as material as possible to allow them to fly. The children definitely picked up on this and fixed their balloons using a variety of papers, glues, and tapes. The purpose of this experiment was to teach children applications of engineering in a fun and creative atmosphere which



we accomplished.

Five students and one faculty member from the Cecil T. Lobo Student Chapter helped the construction and launching of tissue paper hot air balloons built by elementary students 3rd-6th grades. The balloons were constructed of single layered walls made from tissue paper fashioned into 10 similar templates that were connected with tape and glue sticks. The only other raw material was a wire ring in the bottom portion of the balloon to allow for a sturdy holding point during inflation and to act as the inflation opening. Due to the magnitude of the project we split the activity into three sessions on April 10th, 17th, and 24th. Fifteen groups of three to four elementary students worked for two hours on two consecutive Tuesdays to build the tissue balloons. The 3rd week was for the launching of the balloons using three single burner propane camp stoves and aluminum chimney stands.



This year's launch had great weather, which with the limited wind kept the balloons from straying too far and allowed some teams to launch their balloons multiple times. Many of the balloons reached between 60 and 100 feet in the air and ranged up to a couple hundred yards. Some of the kids brought back balloons in pieces and with the help of students and parents were able to piece them back together for several more launches. Another great thing about this year, were the three launching stations which allowed for more teams to launch in sequence and made for some exciting air races! Overall the kids had a blast being able to launch multiple times and tackle the obstacles presented on the day of the launch.



Terre Haute Hilton Garden Inn Tour

—Maritza Gonzalez

On Wednesday, April 25, six civil engineering students and Dr. McKinney visited the construction site in downtown Terre Haute where a brand new Hilton Hotel is being built. This project consists of a 6-floor building that will contain 109 guest rooms, four of which will be suites.

The head project manager Kieran Tierney as well as the construction manager led the students through all 6 floors of the building, which still had a little way to go before reaching completion. They explained the different aspects of the construction design, going into detail about the placement and amount of rebar and concrete in the walls, floors, and ceilings.

This new hotel is being built to hold tremendous amounts of pressure, as per design requirements. The Hilton will provide many luxuries for its future guests, and there is no doubt that this will be a popular location for many future visitors of Terre Haute.

Lucas Oil Stadium Facts

The Lucas Oil Stadium will be the new home for the Indianapolis Colts, taking the place of the RCA Dome.

The Colts' old home field, the RCA Dome, will be demolished to allow the Indiana Convention Center to expand.

The Lucas Oil Stadium will have the world's first sideline-to-sideline retractable roof. All other stadiums with retractable roofs open from end zone to end zone.

The super-trusses that support the retractable roof were brought in from Luxembourg.

The 11-mile urban stream known as Pogue's Run, which flows through an encased concrete tube through Downtown, runs under the southeast corner of the stadium. The stream empties into the White River.

Limestone from Bedford, Indiana, will be used to accent the exterior of the north entrance, which will have movable glass panels for a direct view of downtown Indianapolis.

Upcoming Events

- May 18: Spring Picnic

Did we forget something? Please contact an ASCE officer to contribute items to include on our calendar.

To Expose Students and the Community to Civil Engineering through Service and Education

5500 Wabash Avenue, CM 59
Terre Haute, Indiana 47803
Phone: 812-877-8352
Fax: 812-877-8440



We're on the Web

<http://www.rose-hulman.edu/ce/asce/index.htm>