Perhaps as no other time in history are so many parking structures being heralded as architecturally significant. 2011 was the first time in memory that a parking garage (a parking garage!) was featured in Vanity Fair, and architecture and consumer publications are abuzz with news from all over the world of parking structures that add to their surrounding communities simply through beautiful design.

All of that, of course, makes it more challenging than ever to hold up specific structures as being the best of the best, but that’s exactly what the IPI Awards of Excellence competition does every year. This year is no different; winners were chosen from a large number of outstanding entries and stand as testament to creative, sustainable, outstanding design.

Since their inception in 1982, the Awards of Excellence have recognized excellence in hundreds of facilities and programs, spotlighting outstanding examples of parking design and operational creativity. This year’s winners were recognized at the 2012 IPI Conference & Expo in Phoenix, Ariz.

Award categories included architectural achievement; best design of parking facilities with fewer than and more than 800 spaces; best rehabilitation/restoration; innovation in parking operation or programs; and sustainable parking/transportation program or operations. This year, two new categories were added: best design/implementation of a surface parking lot, and sustainable parking and transportation (design) excellence. Winners were selected by IPI’s Awards of Excellence Committee, comprised of architects, parking corporations, and city, airport, and university officials.

The envelope please! Without further ado, we give you this year’s Awards of Excellence honorees.
CATEGORY I
Best design of a parking facility with fewer than 800 spaces.
Criteria include operational and functional design issues, architectural design elements, user amenities, innovative/ unusual or distinctive features, and cost.

INTERMODAL TRANSIT FACILITY, CITY OF HILLSBORO, ORE.

City of Hillsboro, Ore., Owner

Project Team:
LRS Architects, Inc.
Architect
WHPacific, Inc.
Civil Engineering & Landscape Architecture
Skanska USA Building
Design Build Contractor
Catena Consulting Engineers
Structural Engineer
Tuality Healthcare
Partner
Pacific University
Partner

Shared by hospital and university staff along with the public, the City of Hillsboro, Ore.’s Intermodal Transit Facility (ITF) incorporates sustainable features into a 260,000 square foot design that serves its different user groups beautifully.

The ITF provides free parking in the heart of a small suburban community; hospital and university staff park on the upper levels, while patients, daily commuters, and short-term parkers occupy the lower floors. The structure’s five stories also house retail space, an education center, and bicycle parking.

An innovative ground-floor bike station and 14 level II electric vehicle (EV) charging stations encourage community members to consider using alternative means of transportation. Energy-conserving LED light fixtures run off a 60kW rooftop solar array that generates enough power to run the facility on sunny days. A block-long pervious concrete alley conserves groundwater, and rainwater flows from parking levels into elegantly landscaped storm detention areas in the public plaza.

Truly an ITF, the facility was a joint project of the city, hospital, and university. It serves as a hub for commuters and nearby office workers, provides convenient access to the adjacent light rail commuter line and bus routes, and encourages residents to use alternative modes of transportation, alleviating congestion.
**Duke University Research Drive Parking Garage, Durham, N.C.**

**Duke University, Owner**

**Project Team:**
- **RATIO Architects**
  - Design Architect & Landscaping
- **Walker Parking Consultants**
  - Architect-of-Record, Parking Consultant & Structural Engineer
- **Lend Lease, Inc.**
  - Construction Manager & General Contractor
- **Stewart Engineering**
  - Design Consultant

Profiled in the May 2012 issue of *The Parking Professional*, the Research Drive Garage is the first single-use, stand-alone parking structure to be certified by the U.S. Green Building Council, where it earned 31 Leadership in Energy and Environmental Design (LEED®) points. The 1,900-space, seven-story facility provides parking for Duke students, faculty, visitors, and patients.

This structure’s intuitive, functional design provides an exterior express ramp and flat floor plates with great flow capacity, unobstructed internal views, and enhanced security. Some entry/exit locations, identified by green growing walls, are used by students, staff, and faculty who take advantage of Automatic Vehicle Identification (AVI). The second level is reserved for visitors using a pay-on-foot system and their own entry/exit. Space availability displays at the main entrance and on the ramps help navigate parkers to open spaces.

Architecturally, the garage blends well with the surrounding buildings and incorporates sustainable design with planted green walls and roof canopies. Mixing precast spandrel panels at the upper levels with terra cotta and stone on the lower levels provides a unique look to the property. Landscaped rain gardens offer both beauty and environmental benefits.

Open and bright stair and elevator towers are easily identified from their flat floor interiors, and the glass-backed elevators provide security on the exterior. Service lighting design was incorporated and concrete slabs’ undersides were painted white to provide light reflectivity. Beam sides and bottoms were painted to match the facility’s exterior facades and blend with the exterior architecture. The cast-in-place post-tensioned concrete structure contributes to the open feeling of the garage and provides a long service life with low maintenance.
CATEgORy III
Best design/implementation of a surface parking lot.
Criteria include operational and functional design issues, architectural design elements, greening and sustainability, and cost.

573 GERRARD STREET EAST, ZHONG HUA MEN ARCHWAY
TORONTO, ONTARIO, CANADA

Toronto Parking Authority, Owner

Project Team:
Louis K.C. Cheung Architect Inc.
Architect
Dale Cheung
Chief Designer, Chairman, Archway Organizing Committee
City of Toronto, Economic Development & Culture
Chinese Chamber of Commerce
Councillor Paula Fletcher, Ward 30 Toronto Danforth
The late Honorable Jack Layton, NDP Leader,
MP Toronto Danforth

If you woke up from a nap in front of this building, you might wonder if you’d accidentally drifted out of Canada. That’s because you’d be looking at Toronto’s only traditional Chinese archway. How’s that for unique?

Originally opened in August 1984, the 43-space Toronto Parking Authority (TPA) surface parking facility formerly known as Carpark #146 was redeveloped to include the Zhong Hua Men archway, which acts as a gateway to Toronto’s East Chinatown.

The archway was constructed to symbolize Chinese contributions to Canada, and includes a tribute to the 17,000 workers who built the transnational railway. Far from being a run-of-the-mill parking facility, it functions as a catalyst to raise cultural and economic awareness, and encourage the area’s development.
UNIVERSITY OF MINNESOTA'S BIKE CENTER AND RFID PROGRAM, MINNEAPOLIS, MINN.

University of Minnesota, Owner

Project Team:
Carlsen & Frank Architects
Architect
Transit for Livable Communities
The Hub Bicycle Co-op

A few parking spaces and an unused parking ramp transit lobby used for storage for 15 years were given new life as the centerpiece of the University of Minnesota's new bicycle program. With campus bike use at nearly 14 percent, the importance of bikes to the campus is undeniable.

The University Bike Center was constructed in a former transit waiting area of the university's Oak Street Parking Ramp. Built in 1975, the ramp offered 702,000 square feet of space and 2,174 parking spaces.

The new Bike Center opened in September 2011, in close proximity to 3,000 residence hall students and thousands of Academic Health Center employees. By repurposing existing space through renovation rather than building something new, the university was able to maximize space while meeting sustainability goals and maintaining its physical footprint.

The Bike Center offers many amenities that make bike commuting practical:
- Professional and do-it-yourself repair services.
- Retail store.
- Secure card-accessed 24-hour bike parking.
- Restrooms, showers, and clothing lockers.
- RFID benefits center.
- Electronic trip-planning kiosk.

The RFID solution consists of small tags affixed to registered users' bicycles. RFID receivers installed at strategic locations wirelessly read and transmit the tag information to a server that's accessible to users and university staff, allowing reliable verification of commuter trips that can then be tied to incentives (for example, transportation option enhancements and healthcare discounts).

Because of the ramp's centralized location and proximity to other alternative modes of transportation, the university expects to reap the benefits of reduced auto emissions and a healthier, more sustainable community.
CATEGORV

Best parking facility rehabilitation or restoration.
Criteria include planning/phasing design issues/administration; operational/architectural improvements; technical innovation; and cost.

CORCORAN PARKING GARAGE RESTORATION, DURHAM, N.C.
City of Durham, N.C., Owner

Project Team:
Walter P Moore
Engineer & Parking Consultant
Roughton Nickelson
De Luca Architects
Architect
Balfour Beatty Construction
Construction Manager
EDI
Baker Roofing Company/Baker Restoration

Located within the performing arts district of Durham, N.C., the Corcoran Parking Garage is a five-level, 1960s concrete garage that was renovated and re-imaged to better serve downtown venues. The process was anything but easy.

Engineers’ initial condition assessment revealed extensive concrete deterioration throughout the building, inadequate and confusing signage, water infiltration damage, and unsafe conditions that included lighting deficiencies and non-ADA compliance. The dilapidated garage was an eyesore in a flourishing downtown arts district.

Structural restoration work included widespread concrete and brick masonry façade repairs. A comprehensive waterproofing system enhanced long-term durability.

Parking operational improvements included uniform signage to improve wayfinding, accessibility upgrades for travel routes and stairwells, and LED light fixtures to improve public safety and appearance. The entire garage was also painted: each level was assigned a distinct color that was carried through to elevator lobbies to assist with level identification. Large, exterior fabric banners were installed at the top level of the garage that reflect seasonal art events happening downtown.
While that all sounds impressive already, the project had a sticky condition: due to high occupancy demands in the busy downtown district, the garage needed to remain in service throughout the restoration. Project engineers used a three-dimensional model to determine the optimal sequencing of level closures and scheduled the concrete demolition and repair work during off hours to minimize noise and vibration effects. They also implemented containment measures to minimize dust and abate hazardous materials.

Following restoration, the Corcoran Garage was able to double its previous parking rates.

Canopy Airport Parking serves Denver International Airport with 500 spaces of indoor valet parking, more than 1,000 spaces of covered self-park, and 2,700 spaces of open-air parking. The facility was created as a practical demonstration of the energy saving and environmentally responsible technologies that can be implemented in parking facilities, and is currently registered with the certification goal of LEED® Certified Gold.

Canopy was constructed using sustainable materials and processes, incorporating a number of technologies that were chosen because of their potential effect on energy consumption over the facility's life; they contribute to a low carbon footprint and energy efficiency, and help mitigate the carbon output of its customers.

The story here is about more than just construction, however. People were also brought into the equation, and employees have adopted a commitment to “People—Planet—Profit.”

- **People**: Provide quality service and facilities at an affordable price.
- **Planet**: Use the most sustainable products and systems available to ensure environmental responsibility.
- **Profit**: Preserve profitability.

Finally, Canopy is showcased to the community through its unique “Building that Teaches” program. In collaboration with the Alliance for a Sustainable Colorado, the facility hosts field trips and teaching seminars that illustrate sustainable building and management practices that don’t compromise on service or the bottom line.
GEICO GARAGE, ORLANDO, FLA.

The City of Orlando, Fla., Owner
Project Team:
C.T. Hsu + Associates P.A.
Architect
PCL Construction Services, Inc.
Design-Builder
Walker Parking Consultants
Parking Consultant & Engineer
Orlando Magic

What's the worst part of driving to a large event? If you said waiting to exit the parking garage, you are far from alone. The 1,876-space GEICO Garage has alleviated that with a structure that can be emptied in 30 minutes.

The operational system accommodates multiple forms of payment for event, permit, and hourly patrons and includes messaging to help users locate available parking. The user-friendly structure was designed with an emphasis on security, operator flexibility, and low maintenance.

The garage has eight levels, two entry/exits, and two intertwined express ramps that are located on one side to maximize flat bay parking adjacent to the destination. This creates clear pedestrian pathways and improves sight lines, user comfort, and wayfinding throughout the garage.

It goes beyond function, however, to become something of a work of art unto itself. The exterior is sheathed in perforated aluminum panels that echo the architecture of the nearby Events Center. By layering and changing textures, color, and scale, the façade acts as an animated skin and creates numerous framed vistas of the city. At night, movement inside the garage and the patterns of light shining through the façade further enhance this effect.

The streetscape includes colored paving and sidewalks, exterior lighting, tree grates, protective bollards, trash receptacles, pervious concrete, and landscaping that meets shade coverage requirements. The entry/exits are well defined and include international and variable messages.

Amenities and distinctive features include high efficiency lighting; a climate controlled pedestrian bridge; security and ticket collection; parking for 30 semi-trucks, buses, or media/broadcasting vehicles; a parking office; two data centers; broadcasting capabilities; a helicopter landing area; and an emergency generator. Additionally, the garage achieved LEED® Gold certification and was completed within budget.

2013 COMPETITION

Entries for the 2013 IPI Awards of Excellence will be accepted beginning September, 2012. Entries must be for facilities completed since January 1, 2010. The deadline for submitting entries is December 7, 2012. Entry packets and criteria information can be downloaded at www.parking.org/AOE.