



The Children's Museum of Indianapolis Intermodal Facility / Welcome Center Indianapolis, Indiana

In 2009 The Children's Museum of Indianapolis opened a new 39,000 square-foot Intermodal Facility, which includes a Welcome Center, a pedestrian bridge to their parking garage, and a relocation of a branch of the Indianapolis-Marion County Public Library. The Welcome Center became the new face of the Children's Museum. It houses ticketing and coat check facilities, visitor services, retail space, and a connection to the previous museum entrance. It also appears to be the victim of two curious dinosaurs.

The structural system of the \$16 million Intermodal Facility is primarily steel beam framing supporting elevated floors of composite slab on steel deck and steel deck roofs. The complex geometry of the floor plan defies a typical column spacing, but most bays range from 20 to 30 feet. The lateral forces due to wind and seismic loading are resisted by a combination of concentrically braced frames in the taller portion of the building and moment resisting frames in a single story area. The foundations are spread footings.

The prominent three-story, column-free Welcome Center "box" is created by three 94' span trusses that are each unique with curved bottom chords and varying slope top chords. To create the illusion that dinosaurs are lifting the roof and peeking inside, warped roof and ceiling shapes were required that created challenges of steel design and detailing.

In addition to the steel superstructure, the ground floor of Welcome Center is constructed of cast-in-place concrete wide-module framing to create a large basement under most of the building footprint. Due to budgetary restraints during the design phase, FRP provided bid documents for both a partial basement and an alternate full basement that was ultimately selected.

