



Project Description

128-room wood framed hotel in the downtown historic district

- 7-story luxury hotel
- 1-story covered parking garage with indoor entry to the hotel.
- More than 100,000 sq. ft.

Design Features:

- 2nd and 3rd floors design as PT slabs.
- Slab design to support a uniform perimeter load of 600 plf for brick support.
- 3rd level design as a podium slab.
- 9" thick PT slab.
- Unbonded PT quantities = 0.8 – 0.9 psf.
- Concrete compressive strength $F'c = 5000\text{psi}$.
- Designs based on loading provided on S0.0 and ACI 318-14



Louisville, KY.

CAPABILITIES

- **Post-Tensioning**

Developer:

O'Reilly Hospitality Management LLC

Architect:

BRP Architects

General Contractor:

Killian Construction Co.

Project completion:

2021

Industry

Hospitality

Project type:

NEW CONSTRUCTION

Full Project Description

The Cambria® Hotel Louisville Downtown-Whiskey Row is a seven-story luxury hotel located in the heart of Kentucky's Derby City. The 128-room hotel offers premium amenities, spacious suites, and unique, destination-inspired features. Located at Floyd and Market, this 111,438 sq. ft. low rise building also includes a swimming pool, parking garage, and rooftop bar that provides a marvelous view of this historic city.

Kline Engineering & Consulting designed the 2nd and 3rd levels as post-tensioned concrete floor slabs. The 3rd floor is a podium slab with drop caps to transfer the wood-frame loads from the levels above, while the 2nd floor is a thinner flat plate for ease of construction. The podium flooring system is well suited for mixed-use buildings due to the solid separation between the parking and residential areas, providing a barrier for both noise reduction and fire protection.

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