Waterloo Park and Moody Amphitheater – Austin, Texas, U.S.A. Essay by Sarah Forthuber

Waterloo Park was remodeled in 2021 by a design team including Thomas Phifer and Partners, Michael Van Valkenburgh Associates, and Guy Nordenson and Associates, along with the addition of the Moody Amphitheater. This park resides along Trinity Street, settled between the state Capitol building and Austin's beloved Waller Creek³.

The Moody Amphitheater is one of the focal points of the park, consisting of a 20,000 square foot canopy, and a neighboring open green space than holds a 5,000-person audience. The canopy remains within the 30-foot height limit due to its proximity to the capitol corridor⁴. The canopy is an intricate compilation of steel and glass elements, which create a denser shading toward the center. The canopy includes 15 layers of stacked steel truss elements, I-beams, and over 2,000 nonstructural members, most of which are aluminum, all crisscrossing each other to create heavier shading¹. The columns supporting the square grid bays within the canopy are spaced irregularly with a 60 foot by 40-foot column free zone in the center to create a space for performers⁴. This open center area includes more robust support systems to accommodate the heavy and constantly changing light and audio equipment performers move in and out of the space. The structural support of the canopy was also carefully designed to suspend temporary sets and curtains⁴. Depending on these varying loads through the span of the canopy, the columns, which were fabricated from custom rectangular sections of steel plate, are either solid or hollow, providing enough stability to account for any lateral loads as well¹. These columns sit on top of the castin-place concrete stage, which houses a one-story support facility underneath it, including back-of-house, VIP areas, mechanical systems, and concessions¹.

Much of the park consists of green spaces and concrete pathways. One of the major spaces is the "flying lawn," which includes a wide-open bean shaped green space that cantilevers off a concrete structure that borders Waller Creek, following the tunnel designed to divert the overflow of water⁴. The cantilever more so acts to hide the otherwise unattractive wall. Additionally, the lawn areas of the original park were expanded to make room for the added concessions and restrooms⁴. The overall space being firstly a park, Waterloo was carefully designed to conceal the intricately engineered components and highlight the natural greenery and creek⁴. For example, the 50,000-gallon water storage tank was placed at the base of the amphitheater, which connects to the irrigation system throughout the park⁴. Additionally, a green roof was installed above the concrete interior space integrated beneath the amphitheater and park, concealing the concessions underneath¹.

The Waterloo Park Project was part of the city's long-time efforts to restore Waller Creek. Part of the Waterloo Park Project included Sector 9 of the creek, which involved a mile-long flood diversion tunnel to combat the 15-foot surges of water overflow that often occur in the creek². This project involved carefully built block walls, creek stabilization, creek contouring, and rehabilitation of the natural landscape².

Sources for this paper:

- ¹ <u>https://www.nordenson.com/projects/waterloo-park-performance-pavilion</u>
- ² https://www.dpr.com/projects/waterloo-park-amphitheater-sector-9
- ³ https://www.archpaper.com/2021/11/austin-waterloo-park-michael-van-valkenburgh-associates-crit/
- ⁴ https://www.architecturalrecord.com/articles/15387-moody-amphitheater-and-waterloo-greenway



