

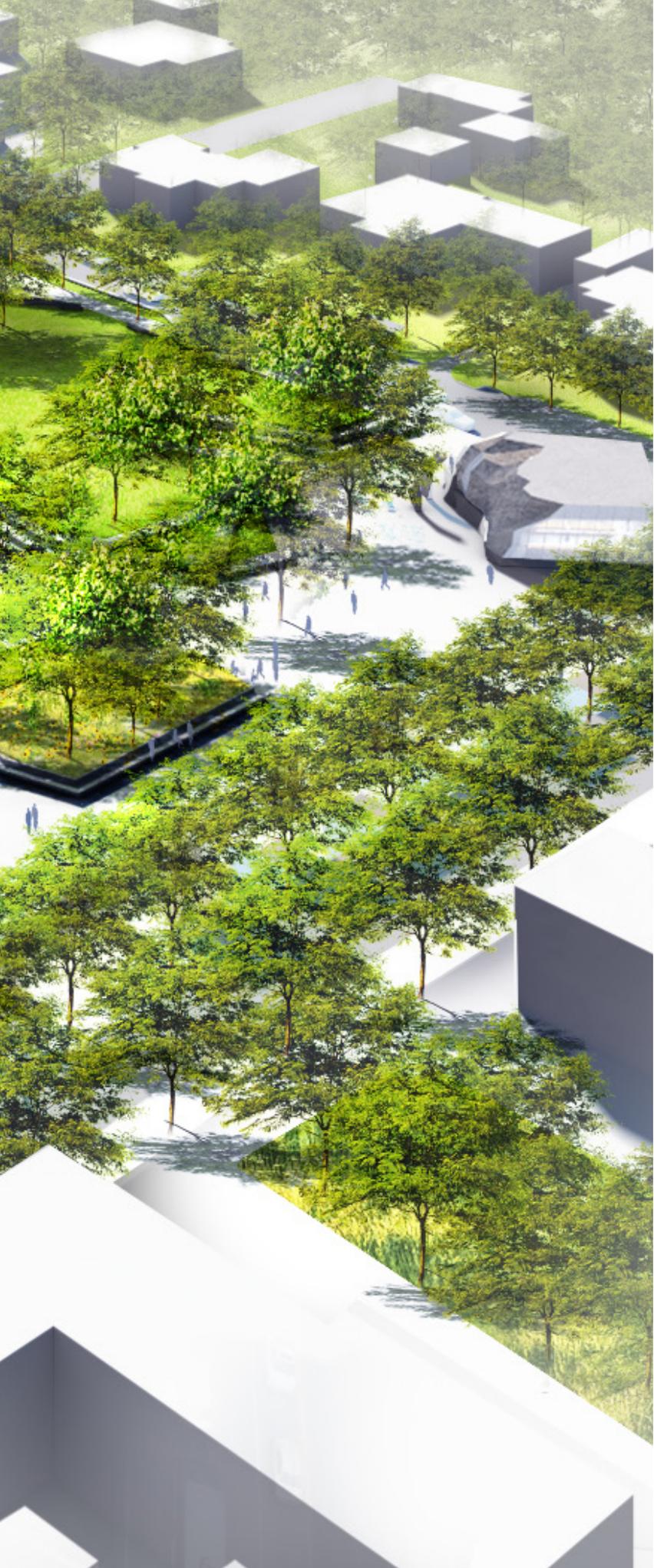
GRAND JUNCTION PLAZA

Schematic Design

LAND
COLLECTIVE

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The design for Grand Junction Plaza is a work in progress. Not all plans, diagrams, and imagery in this publication may reflect the latest design development. However, the intent of the design is present in this document. For the latest plan, see page 11.

GRAND JU

JUNCTION PLAZA

THE CIRCUIT

The conceptual approach to the design of Grand Junction Plaza was based on a circuit – a continuous loop that connects various elements - in this case, the citizens and visitors of Westfield. The circuit begins with a spark - a serendipitous connection between people which activates public space and helps elevate culture. The circuit links four key trails: Asa Bales, Grand Junction, Anna Kendall and the Midland Trace Trail.

LAND COLLECTIVE, in collaboration with the City of Westfield, has developed a design for Grand Junction Plaza – a 10.5-acre park in the heart of downtown Westfield, Indiana. The design was developed in collaboration with consultants HWKN Architects, Bruce Mau Design, Tillett Lighting Design, Flatland Resources, ETM Associates and Stantec. The park links iconic architecture and multiple trails to create a place of gathering and active events that will serve the City in all seasons.

The design of the park embodies LAND COLLECTIVE's approach to design, using an empathic understanding of public space to form socially-purposeful spaces. Grand Junction Plaza will be a destination for all and a place for serendipitous connections.

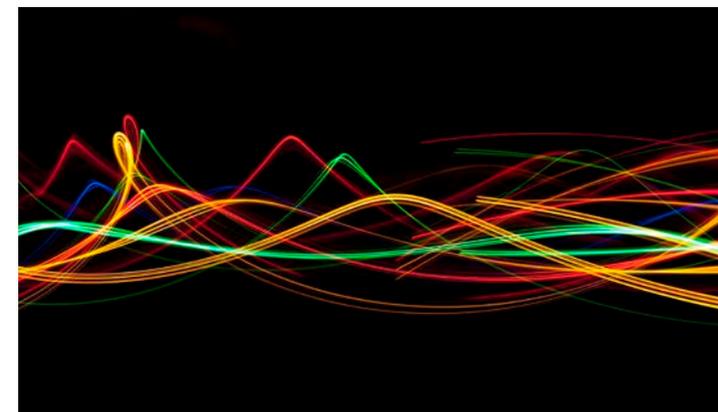
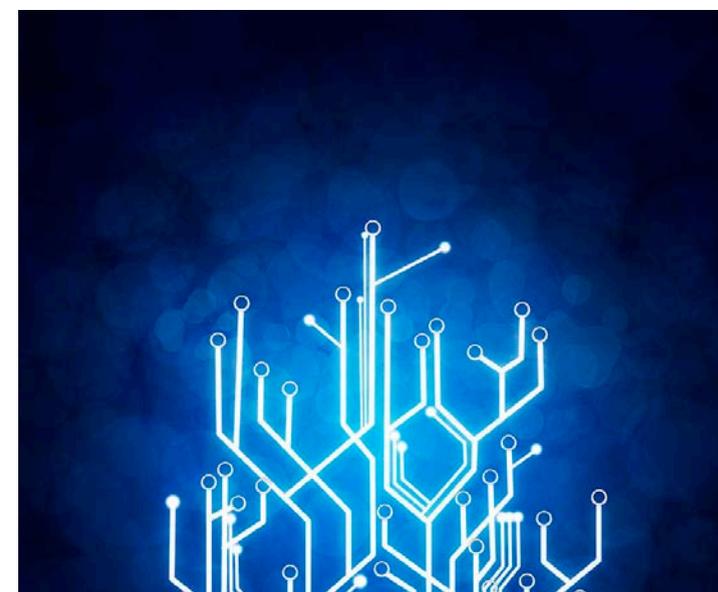
The architecture, by HWKN Architects, complements this new landscape and creates several distinct destinations for gathering. Conceptually, the pavilions fracture from a single form and are placed at each corner of the park. The faceted forms that result create pavilions with distinctive character, each with glass on two sides and opposing rock faces that adapt to the surrounding activity of the park. These pavilions are beacons in the landscape, acting as wayfinding and central hubs of activity. Site lighting creates a warm interior glow around the pavilions, rendering them as lanterns within the site. A cool-colored light will be used for the site lighting along the park's stream.

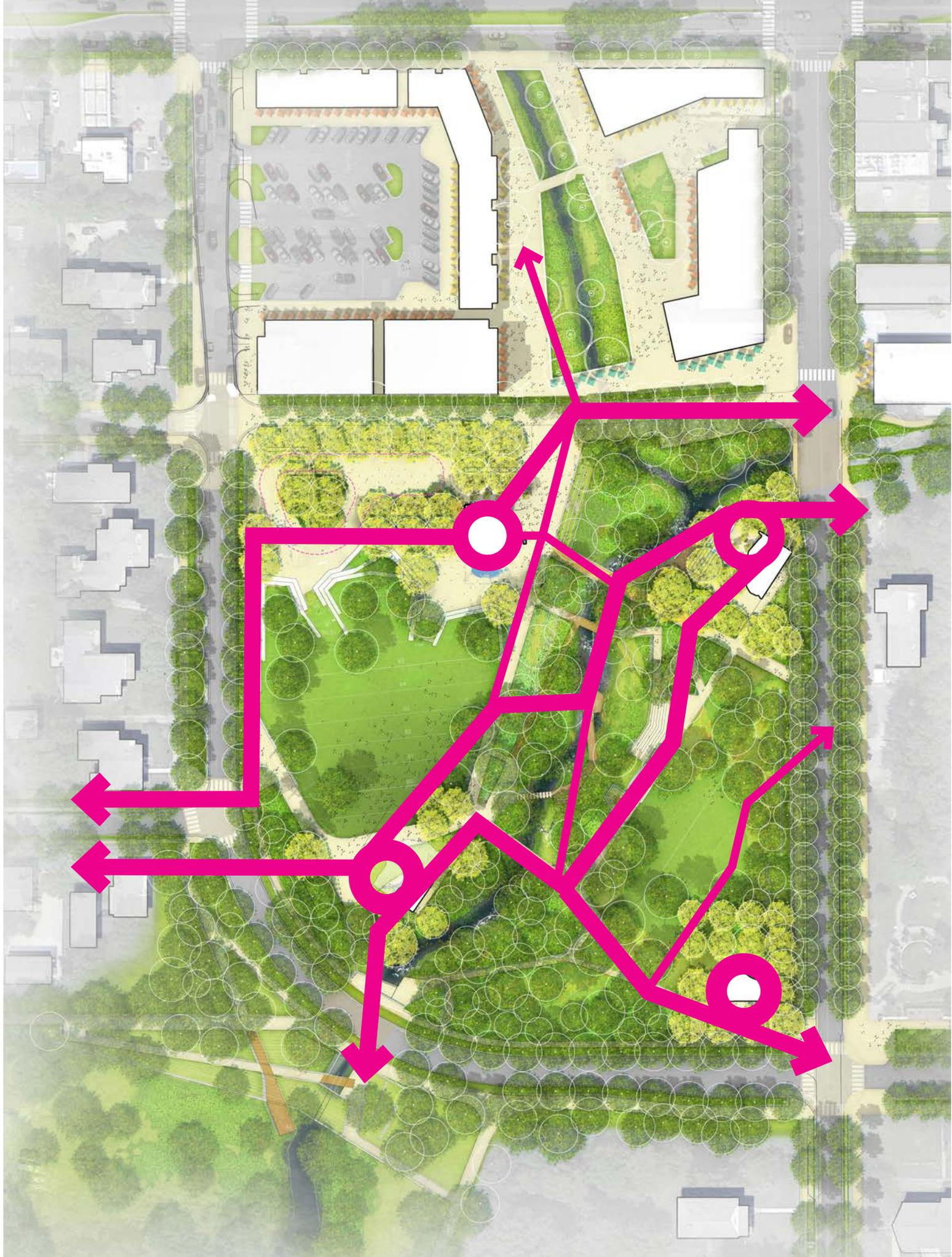
The core of the project is Jersey Plaza, along the north-facing side of the park. Jersey Street will become a center for festivals, seasonal events, and wintertime ice skating. A café pavilion with room for ice skate rental is framed by granite seat walls, allowing for casual gathering. In the summer months, a jet fountain activates the plaza and invites visitor interaction.

A great lawn spills out from Jersey Plaza, sloping towards a stage pavilion to the south. The structure is embedded within the grade of the landscape and accommodates storage, dressing rooms, and space for audio/visual equipment. East of Jersey Plaza and at the head of the stream is the Confluence, which contains a sit-down restaurant pavilion. An outdoor dining area overlooks the stream, and amphitheater seating allows for sweeping views of the riparian corridor.

A series of bridges and riparian walkways cross the Grassy Branch Creek, which bisects the site. By widening the stream profile, the new stream bed helps to mitigate erosion and sedimentation, and will create a wetland habitat to help cleanse and slow water flow.

To the south of the park at the head of multiple trails is the Trailhead Pavilion, which serves as a comfort pavilion for those enjoying use of trails. The eastern half of the park provides spaces to wander through meadows, grassy fields, and woodlands, including a productive orchard where people have access to healthy food and dappled shade. Grand Junction Plaza's design allows for flexibility and provides the City of Westfield with the opportunity to activate this park 24/7 and 365 days a year with a myriad of programming.





REGIONAL CONTEXT + CONNECTIONS

CENTER OF A NEW DOWNTOWN

Grand Junction Plaza is located at the intersection of several trail systems. The incoming trails are intertwined in this location and through activities of the park. This new activity will increase the character of the downtown, leading to a vibrant center for all of Westfield. Grand Park will become a key connection to bring visitors down into the heart of the city and activity at Westfield's new park.



- ANNA KENDALL TRAIL
- ASA BALES PARK TO MONON TRAIL
- MIDLAND TRACE TRAIL
- GRAND JUNCTION/NATALIE WHEELER TRAIL



GRAND PARK

MAIN STREET

HIGHWAY 31

UNION STREET

MAIN STREET

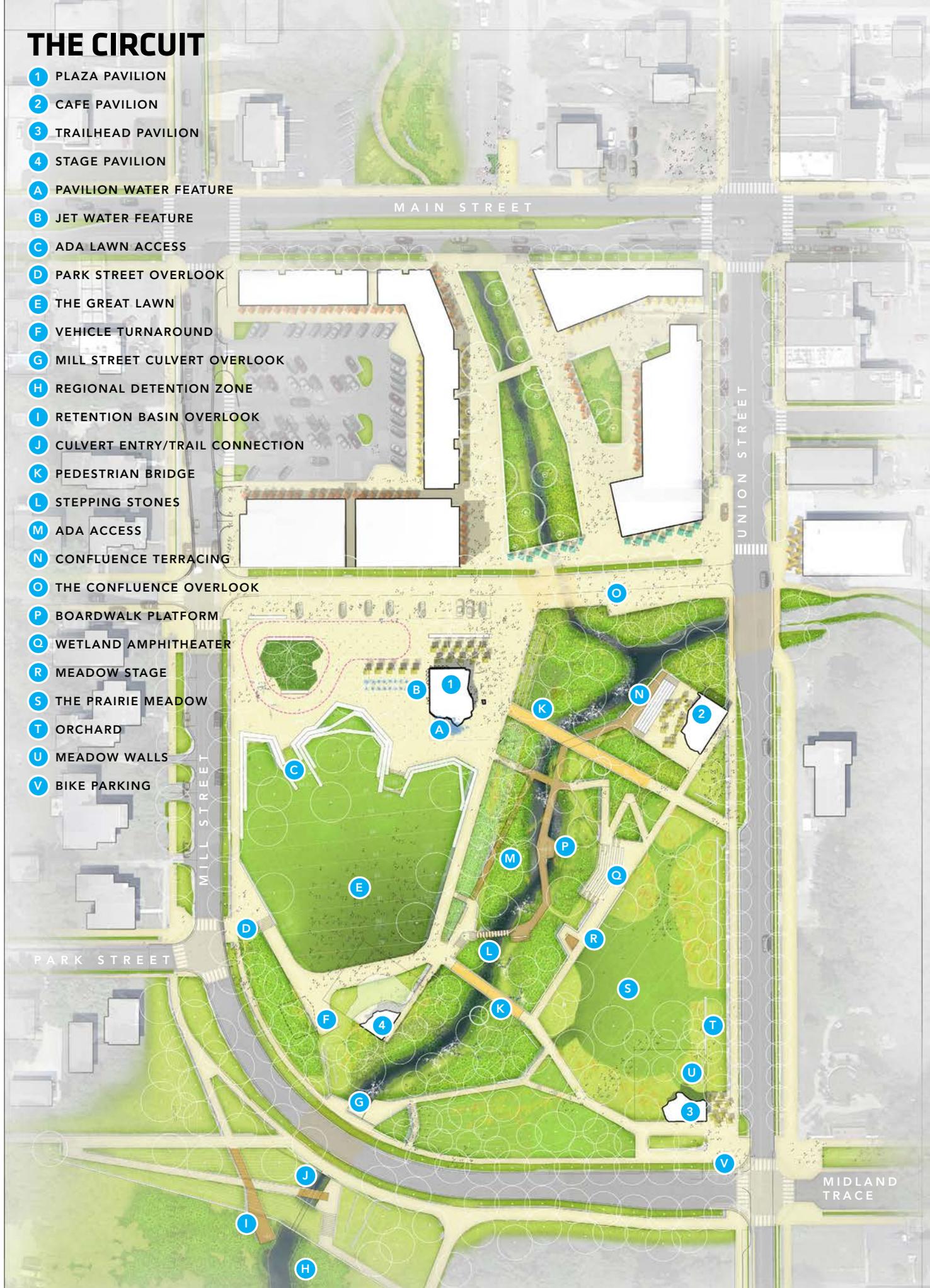
THE CIRCUIT

SITE PLAN

The current park design allows for several unique spaces across the site. Most of the activity will happen in Jersey Plaza, which will allow for changing programmatic needs from summer to winter. The Great Lawn becomes the focus for large flexible performances. As Grassy Branch Creek snakes through the site, it creates different pockets of play and wetlands for both children and adults to interact. The eastern side of the park is marked by the prairie meadow, which frames an open lawn. A culvert below the new Mill Street alignment will allow visitors to pass under the road to the regional detention basin and trails beyond. The southern portion of the park will become a prime lookout and transition zone to the Anna Kendall and Monon Trace Trails.

THE CIRCUIT

- 1 PLAZA PAVILION
- 2 CAFE PAVILION
- 3 TRAILHEAD PAVILION
- 4 STAGE PAVILION
- A PAVILION WATER FEATURE
- B JET WATER FEATURE
- C ADA LAWN ACCESS
- D PARK STREET OVERLOOK
- E THE GREAT LAWN
- F VEHICLE TURNAROUND
- G MILL STREET CULVERT OVERLOOK
- H REGIONAL DETENTION ZONE
- I RETENTION BASIN OVERLOOK
- J CULVERT ENTRY/TRAIL CONNECTION
- K PEDESTRIAN BRIDGE
- L STEPPING STONES
- M ADA ACCESS
- N CONFLUENCE TERRACING
- O THE CONFLUENCE OVERLOOK
- P BOARDWALK PLATFORM
- Q WETLAND AMPHITHEATER
- R MEADOW STAGE
- S THE PRAIRIE MEADOW
- T ORCHARD
- U MEADOW WALLS
- V BIKE PARKING



SITE FRAMEWORK

CIRCULATION

The park is laid out with a series of paths that connect the four main trails. Street traffic will be mitigated and slowed as vehicles travel on a speed table across Jersey Street. Vehicular access within the park is limited, prioritizing pedestrian access while only key paths allow for special vehicles into the park.

EVENT ZONES

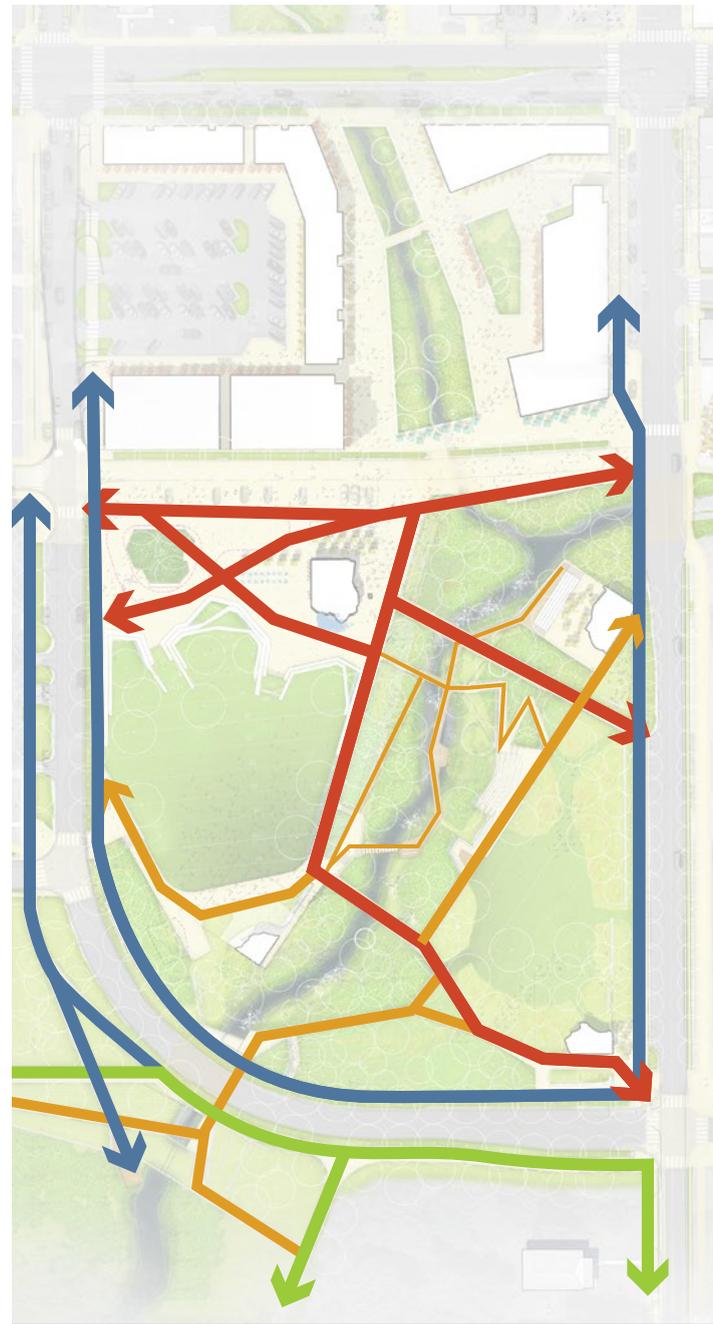
The Great Lawn is the main performance opportunity and provides space for large movie and concert events. Other smaller areas are envisioned in order to provide space for more intimate performances.

OVERLOOKS

The park will allow for several optimum overlooks that allow for a sweeping view into the park, and down the riparian corridor.

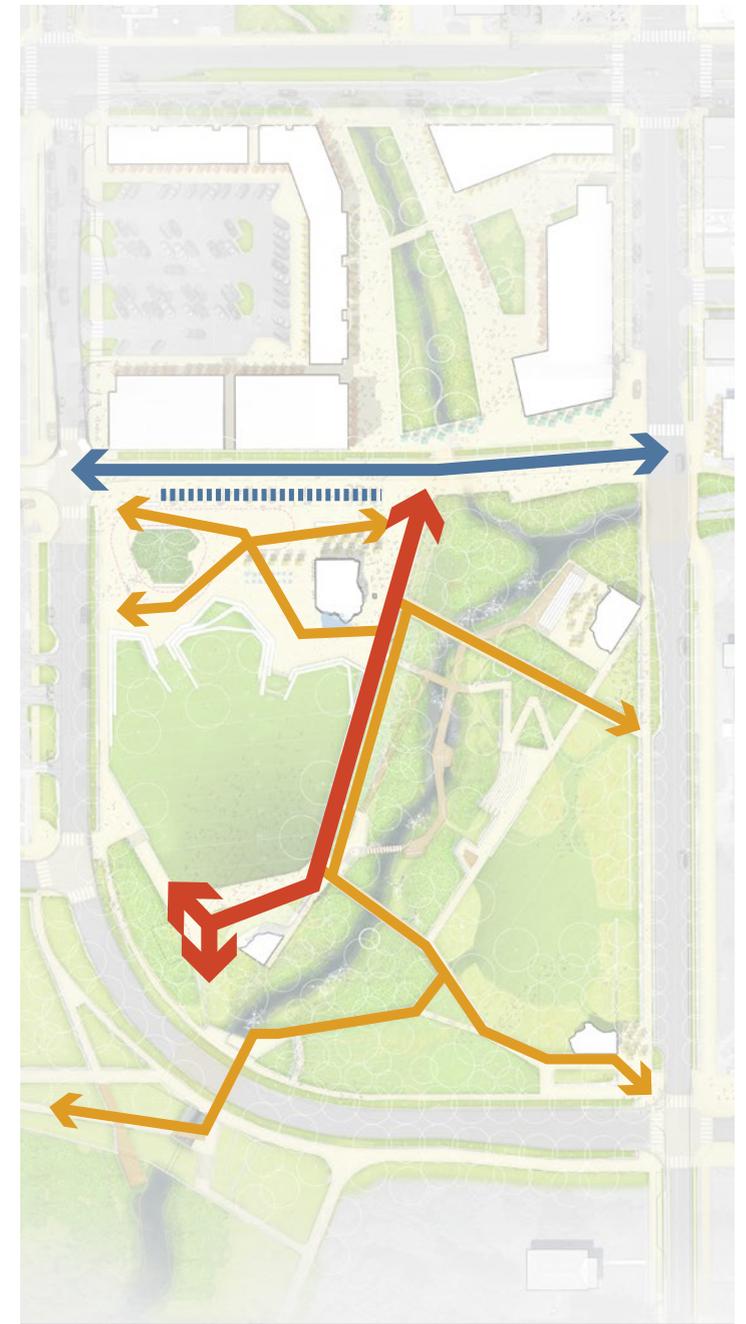
SEATING

The park incorporates several different built-in seating elements and amphitheater sites. Seating on the southern portion of Jersey Plaza will become a focus for programmed activity, especially when the ice rink opens in winter months. Along the riparian corridor, several platforms and amphitheater seating will allow people to relax by the river or take in a performance.



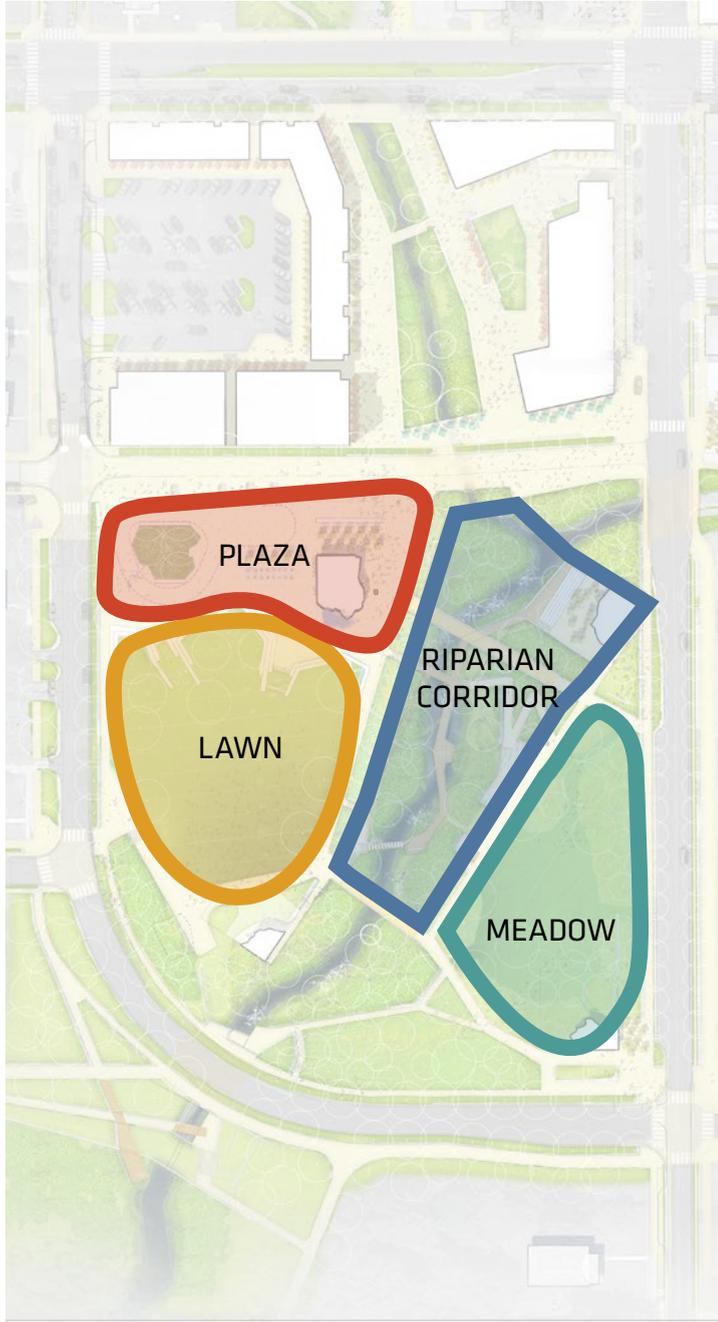
PEDESTRIAN CIRCULATION

- Trails
- Sidewalks
- Primary
- Secondary
- Tertiary



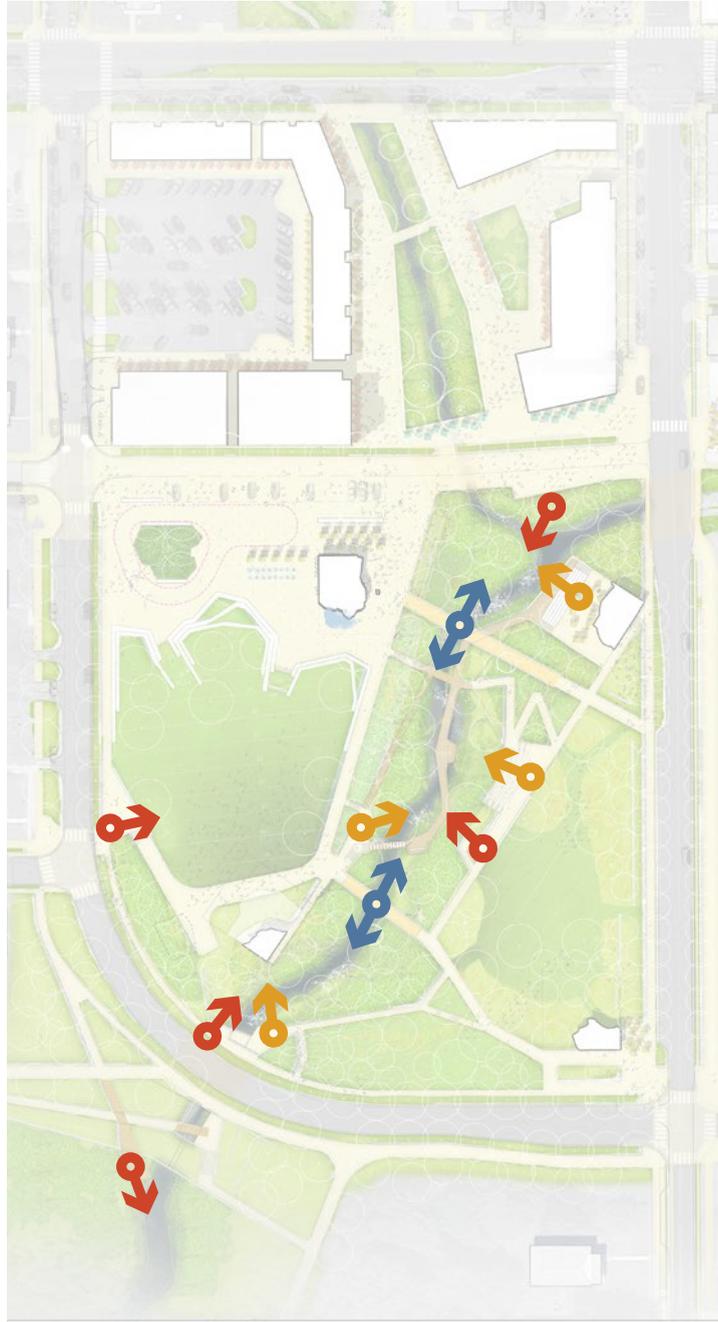
VEHICULAR CIRCULATION

- Street Traffic
- Event Vehicles
- Light Maintenance Vehicles
- Parking



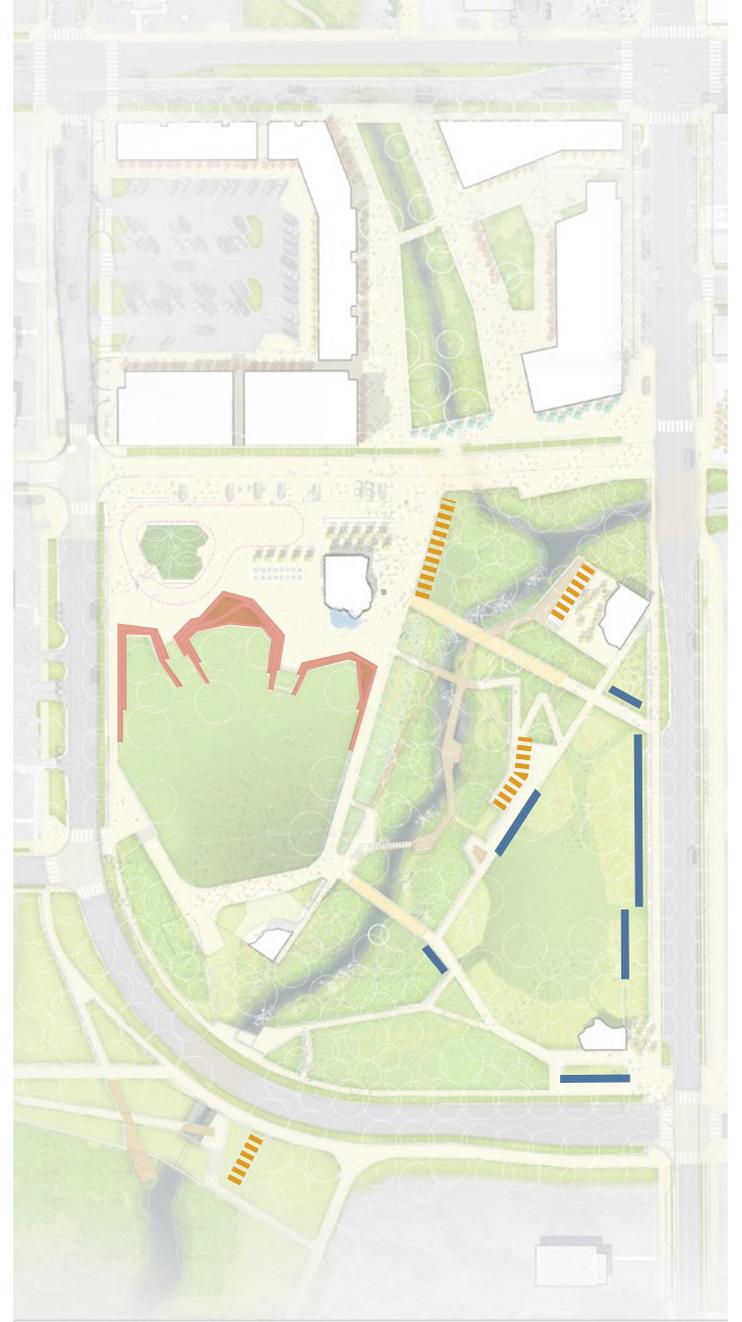
EVENT ZONES

- Plaza
- Lawn
- Riparian Corridor
- Meadow



OVERLOOKS

- Primary
- Secondary
- Bridge



SEATING

- Plaza Bluff Seating
- Built-in Seating
- Meadow Walls

PHASING DIAGRAM

PRIORITY OF CONSTRUCTION

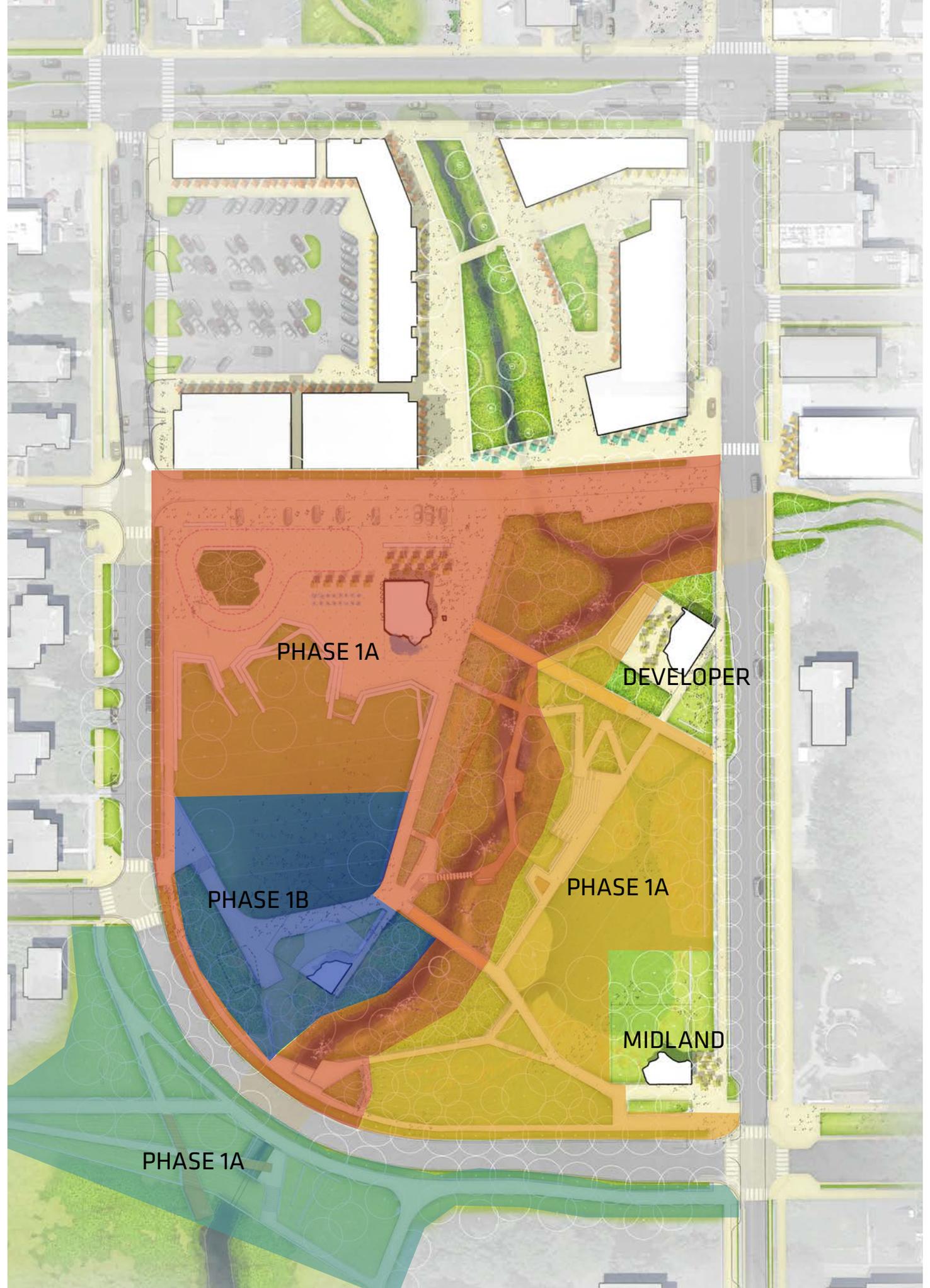
Jersey Plaza and the Great Lawn are key to the park's successful programming—this area would be completed in Phase 1A/1B.

Phase 1B would run concurrently with Phase 1A, and will allow for all utilities to be laid down, planning for the future construction of the Stage Pavilion (if undertaken, this will be a separate phase, due to funding constraints).

Phase 1A, the stream re-alignment, must be completed in order for any future construction. The realigned stream bed and profile will increase the health of Grassy Branch Creek and tie in with the City of Westfield's stormwater management goals.

DONOR OPPORTUNITIES

Fundraising for projects is a particular strength of LAND COLLECTIVE, and our firm's Principal, David Rubin. His infectious enthusiasm for projects has been proven to be an asset for clients. In the case of Eskenazi Health Hospital in downtown Indianapolis, he helped raise \$2.6 million in philanthropic funds. LAND COLLECTIVE considers clients as project partners, and we will work with the City of Westfield to achieve our collective vision - this is part of our ethos as an empathy-driven design firm.



DONOR OPPORTUNITIES

- 1 CAFE PAVILION
- 2 RESTAURANT PAVILION
- 3 TRAIL HEAD PAVILION
- 4 STAGE PAVILION
- 5 ICE SKATING RINK
- 6 THE GREAT LAWN
- 7 NORTHERN BRIDGE
- 8 SOUTHERN BRIDGE
- 9 CULVERT / TUNNEL
- 10 WETLAND AUDITORIUM
- 11 MEADOW STAGE
- 12 CAFE TERRACE / STEPS
- 13 DETENTION OVERLOOK
- 14 FOUNTAIN (PAVILION 1)
- 15 FOUNTAIN (JET)
- 16 JERSEY ST. OVERLOOK
- 17 MILL ST. OVERLOOK
- 18 THE GATHERING
- 19 PLAZA GARDEN
- 20 MEADOW LAWN
- 21 MEADOW ORCHARD
- 22 WETLAND PLANTINGS

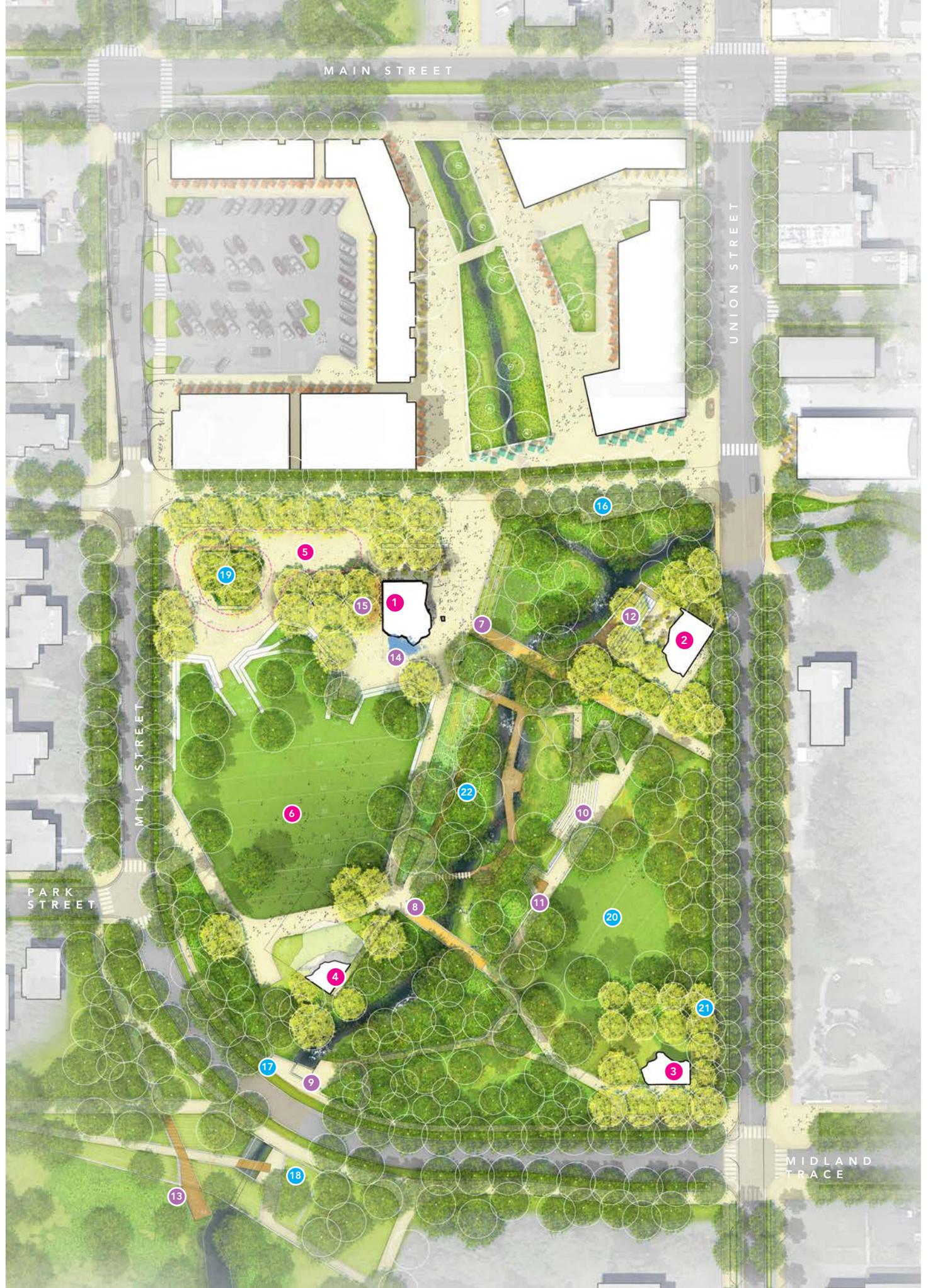
PLATINUM DONORS

GOLD DONORS

SILVER DONORS

GENERAL DONORS:

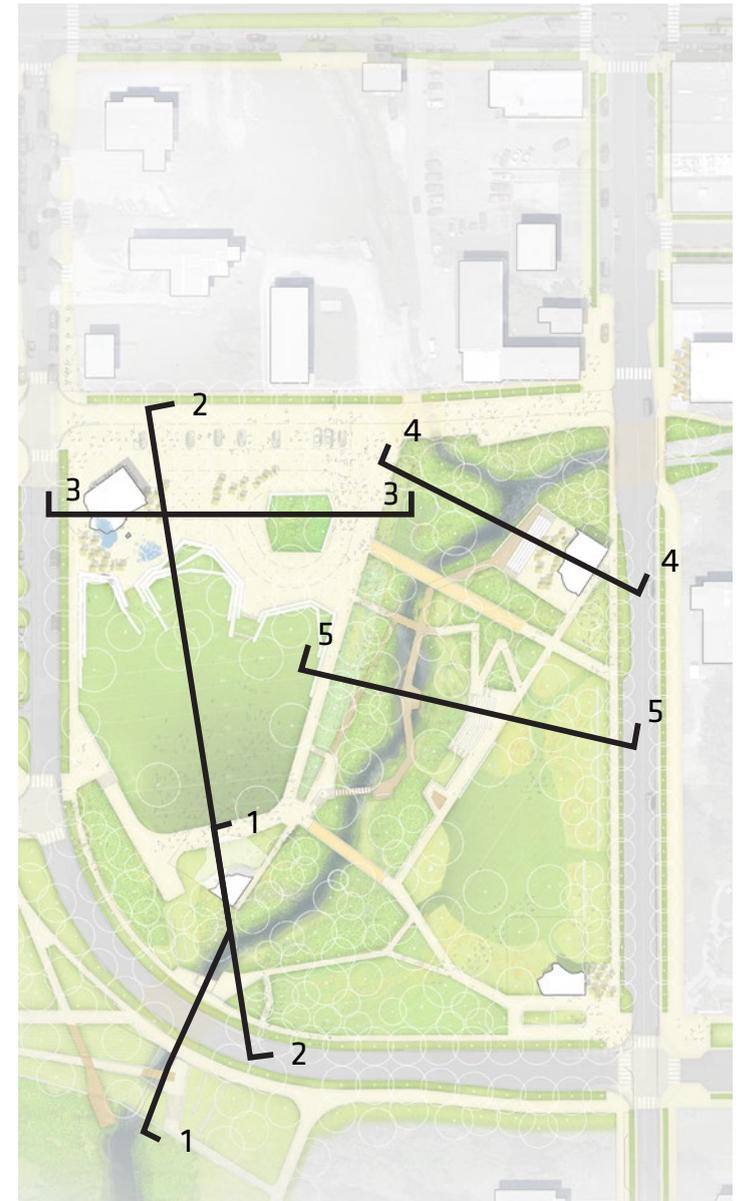
- PAVING
- LIGHTING
- PLANTINGS/ GARDENS
- BENCHES/ FURNISHINGS
- ART

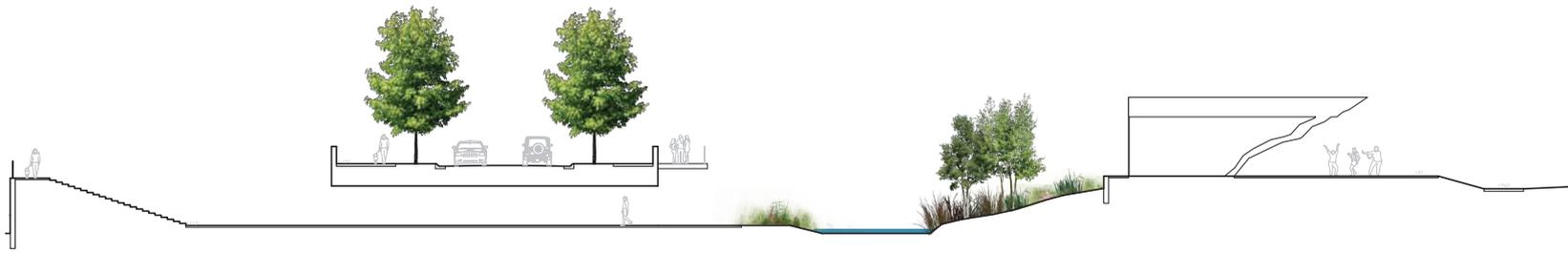


SITE SECTIONS

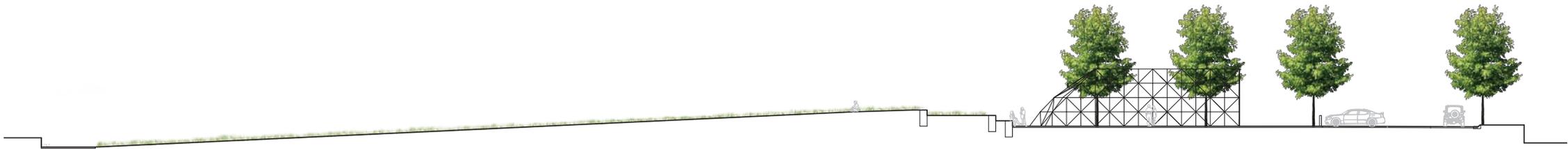
SECTIONAL CHANGE

Elevation change varies across the site, allowing for the ground to slope down to the river bed, creating opportunities for overlooks and gathering. At the same time, the site has been graded to be resilient during flooding events, especially 100-year flood events. The Great Lawn is sloped in order to produce an effective bowl shape for events, affording everyone optimum views of performances.

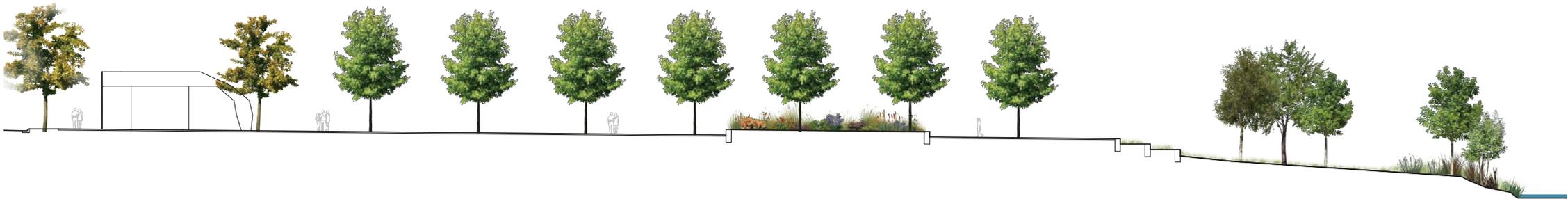




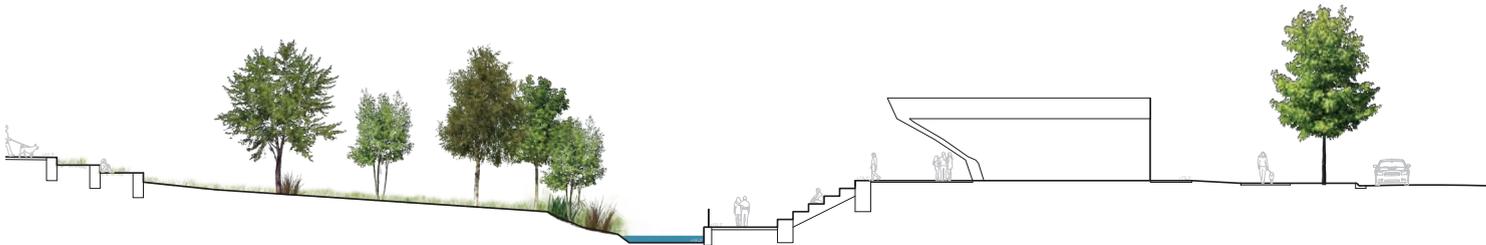
SECTION 1



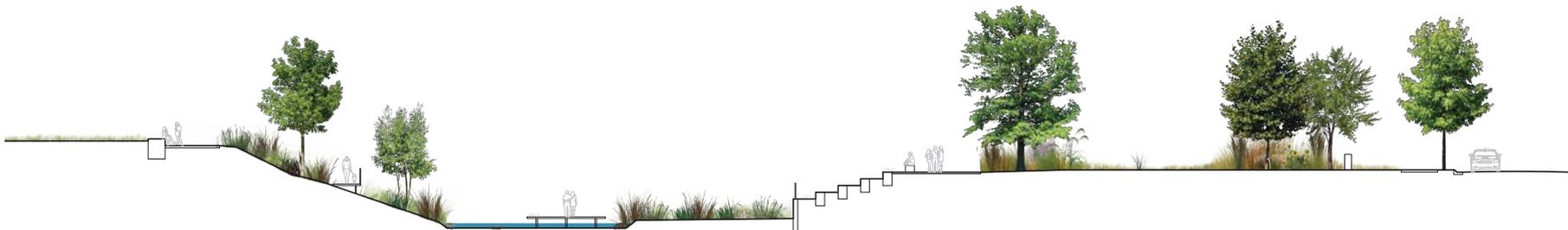
SECTION 2



SECTION 3



SECTION 4



SECTION 5

PARK DESIGN

JERSEY PLAZA



JERSEY PLAZA

Jersey Plaza is the urban edge of the park, and functions as a typical city plaza. The space is meant to be open and flexible, and draws people into the park to enjoy the best of what Grand Junction Plaza has to offer.

MATERIALS & ELEMENTS

The plaza will be predominantly hardscape, with precast concrete pavers to create an even field for events. At the ice rink zone, concrete paving will serve as the base, and will be the same color and texture as the precast pavers. Other materials will likely be a mix of wood for benches, weathered steel and stone site walls.

The planting in Jersey Plaza reflects the open nature of the place. Tree species will be tall and stately and pruned to higher elevations to keep clear sight lines.

The plaza will have an extremely urban feel with elements that reflect that notion. Bollards will likely occur between the traffic of Jersey Street and the pedestrian plaza. Grading of a speed table across Jersey Plaza will create a continuous surface, allowing the City flexibility to close the street for large events, such as the annual car show. A large planting bed and jet fountain will break up the large paved plaza, with additional smaller elements such as flexible cafe style seating and seat walls to create gathering places.



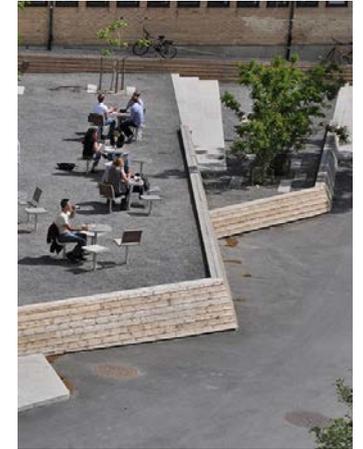
Precast Concrete Paving¹



Concrete Paving²



In-Ground Lighting³



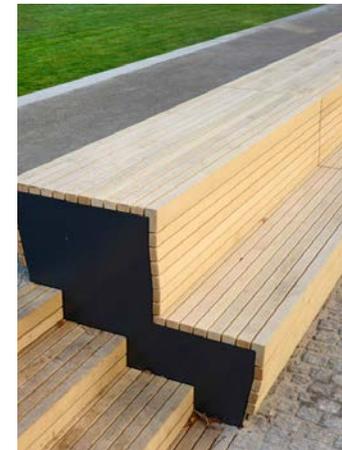
Terraced Seating⁴



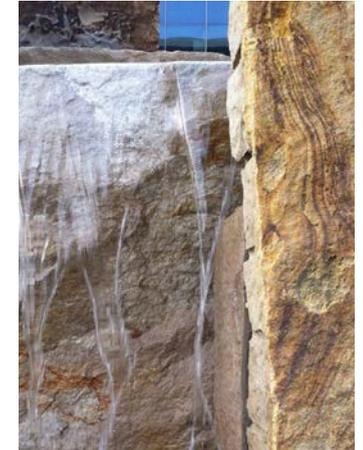
Raised Planters⁵



Moveable Seating⁶



Wood Benches⁷



Facade Fountain⁸

JERSEY PLAZA





THE CONFLUENCE



The Confluence is where the Grassy Branch Creek and its tributary meet, and serves a complementary program to Jersey Plaza. A sit-down restaurant, likely served by the same vendor as the pick-up cafe at Jersey Plaza, allows for a true dining experience within the park. An outdoor dining terrace garden at the rear of the restaurant is connected to a terraced seating overlooking the water.

MATERIALS & ELEMENTS

An area around the restaurant of linear pavers serves as a plaza for outdoor dining. A grid of catenary lights above communal seating provides a festive night environment, overlooking the stream. Paths and boardwalks along the stream connect to the other side of the park. The terraced seating is clad with black locust, a comfortable material to sit upon in both winter and summer months.

Pedestrian-grade wooden bridges of black locust and cable railings crisscross the corridor, providing a handsome palette and transparent views. These materials are durable in the face of flooding, and will be marine-grade to avoid corrosion over the years.

The restaurant is surrounded by native plantings and grasses, blending with the riparian corridor and lending a low-maintenance plant palette. Wetland planting along the riparian corridor will increase the ecological value of the stream, contributing to water cleansing and habitat creation.



Wood Seating⁹



Concrete Walls¹⁰



Communal Seating¹¹



Catenary Lighting¹²



Cable Railings¹³



Wetland Planting¹⁴

THE CONFLUENCE





TRAILHEAD MEADOW AND RIPARIAN CORRIDOR



The grasslands and prairies of Indiana serve as the inspiration for both the Great Lawn and the Meadow in the park. These typologies provide comfortable places to relax in the grass with friends.

MATERIALS & ELEMENTS

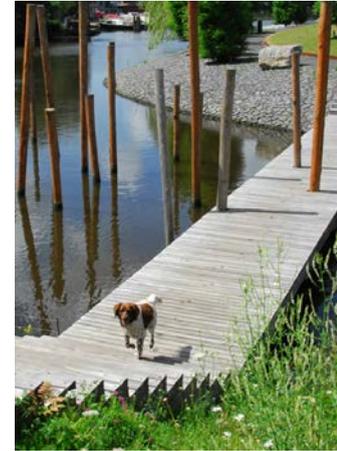
The paths through most of these areas will be linear pavers. Native grasses and wildflowers will frame an open lawn, suitable for play of casual gathering. The seat walls will be stone while the terraced seating areas and associated retaining walls will be primarily concrete.

The Lawn will be kept mostly clear of trees except on its periphery, while the meadows will have a mix of smaller sub-canopy trees with a few larger canopy trees to provide some shade. The trees selected for the orchard will likely be productive in nature, such as apple trees, to create an edible landscape that acts as a pedagogic element of the park.

The Trailhead Pavilion will be associated with elements that support trail users including bike parking and seating. This could also serve as a bikeshare location in the future, should the City choose to site one here.



Linear Paths¹⁵



Wood Decking¹⁶



Overlook¹⁷



Cable Railings¹⁸



Overlooks¹⁹



Meadow Fields and Walkways²⁰

STAGE PAVILION, GREAT LAWN AND SOUTH SITE



The area surrounding the Stage Pavilion acts as a connection point between the densely programmed Jersey Plaza and the southern trailheads. The Great Lawn slopes toward the stage to create a bowl-shaped area for performances, but subtle grading still allows for recreational use of the lawn.

MATERIALS & ELEMENTS

The Lawn area allows for large crowds or daily use by individuals. A series of stone seat walls, black locust wood and concrete pathways link the trails to one another in the southern side of the site. Creative lighting of the culvert walls to the south of the site with wall-wash fixtures creates a feeling of safety into the evening hours.

Native planting complements the meadow and riparian planting palette of the Confluence, creating a diverse and low-maintenance landscape.



Lawn²¹



Concrete Seats²²



Water Steps²³



Wood Paths²⁴



Wash lighting²⁵



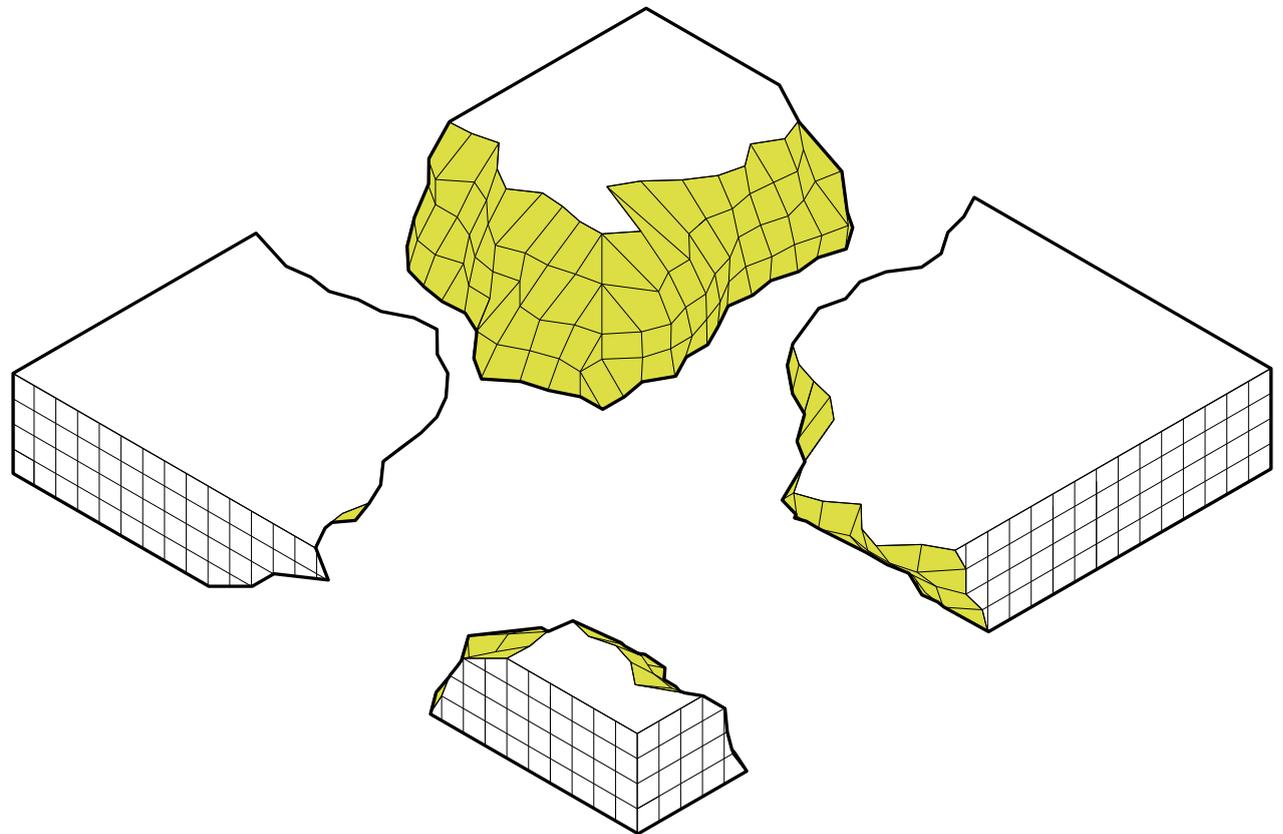
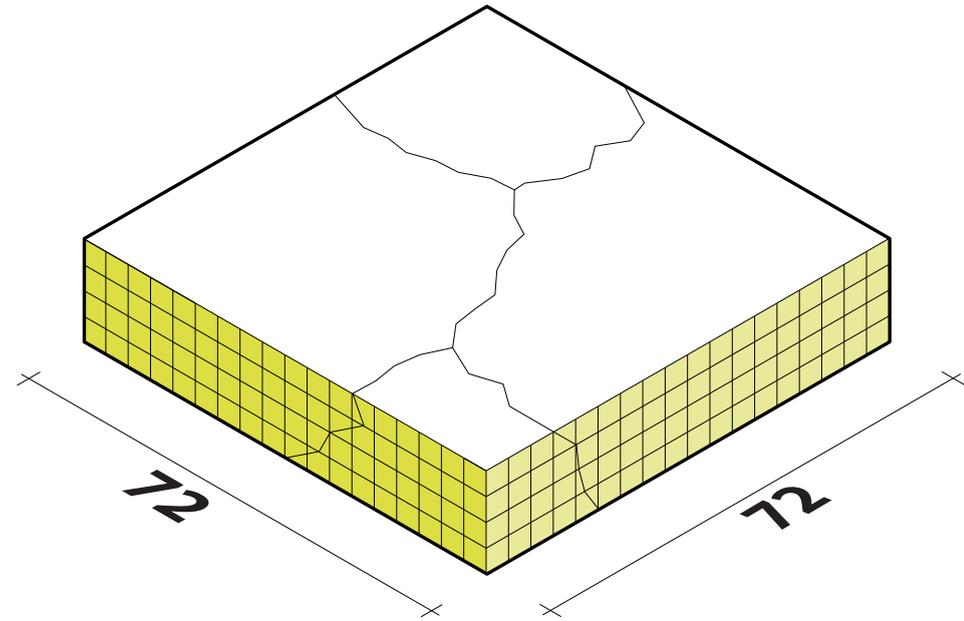
Trail Overlooks²⁶

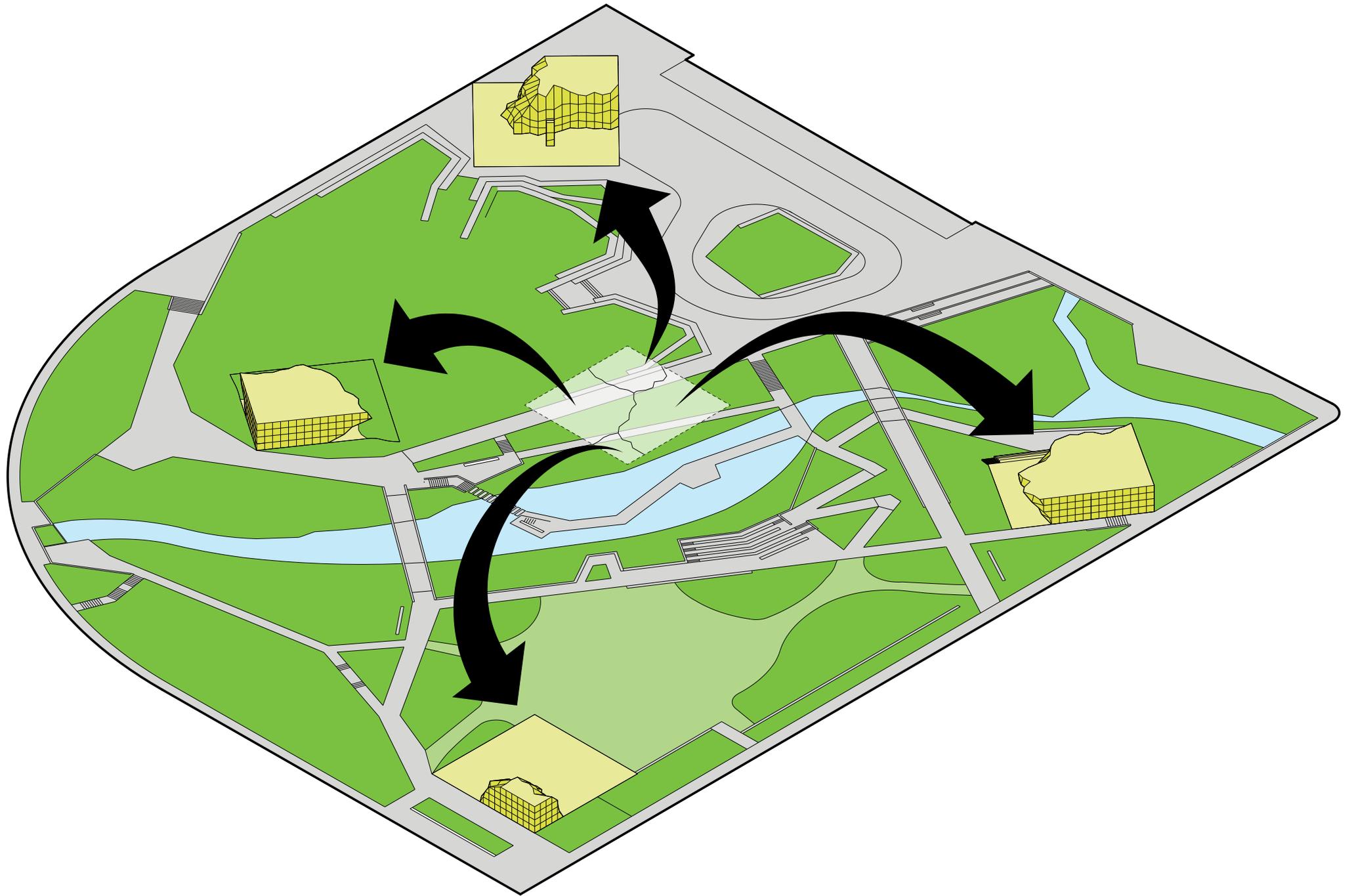
PAVILIONS

THE ROCK

Drawing inspiration from the Jeffersonian Grid which informs so much of the Midwest, HWKN has taken one perfect 72" x 72" square, extruded it into a block and burst it into 4 unique and beautifully imperfect pavilions, before scattering them across each corner of the park.

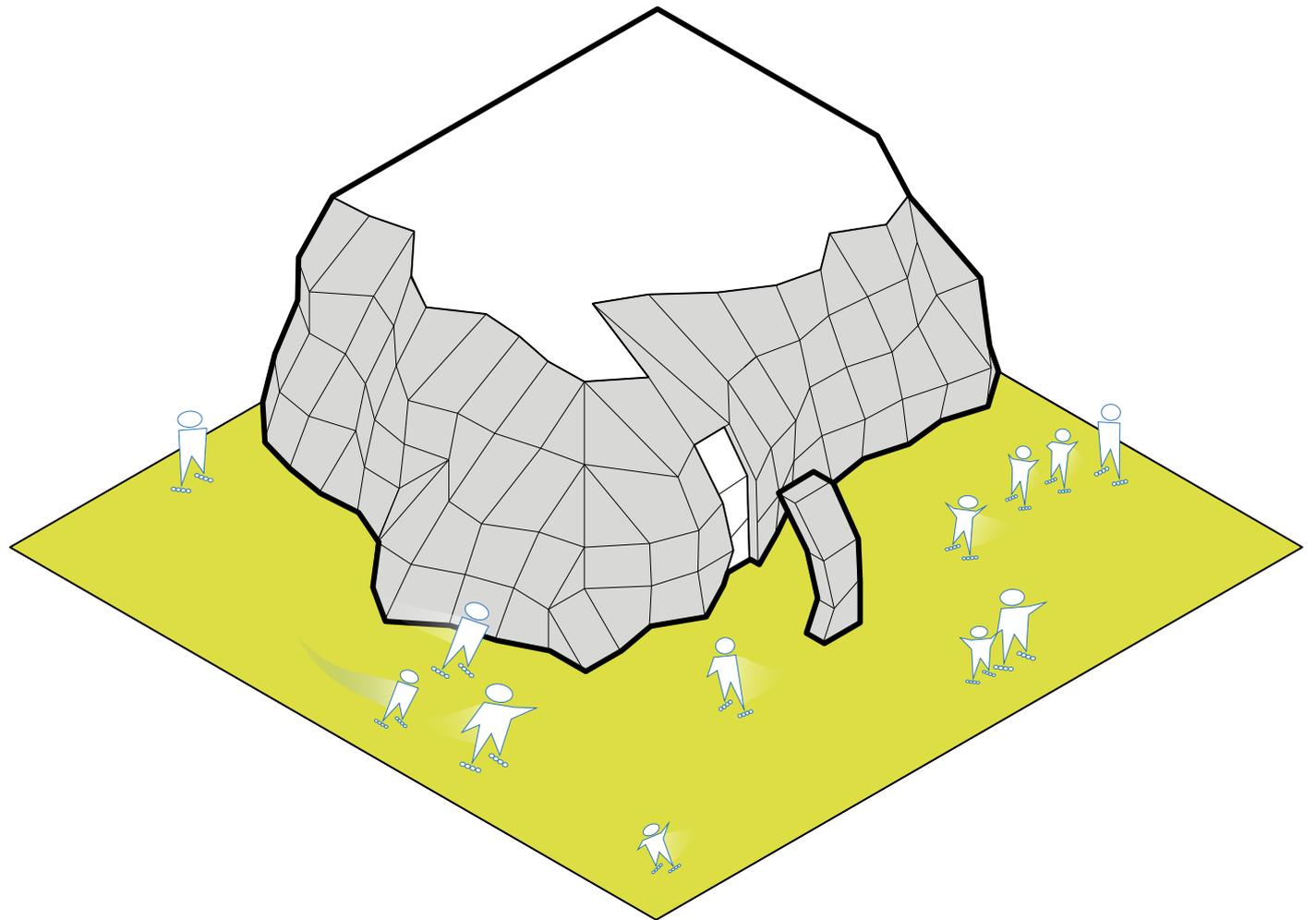
Each pavilion has been designed for specific programmatic needs—a café & ice skating rink, a restaurant, a visitors center and vendor kiosk, and an outdoor performance space.





CAFE PAVILION AT JERSEY PLAZA

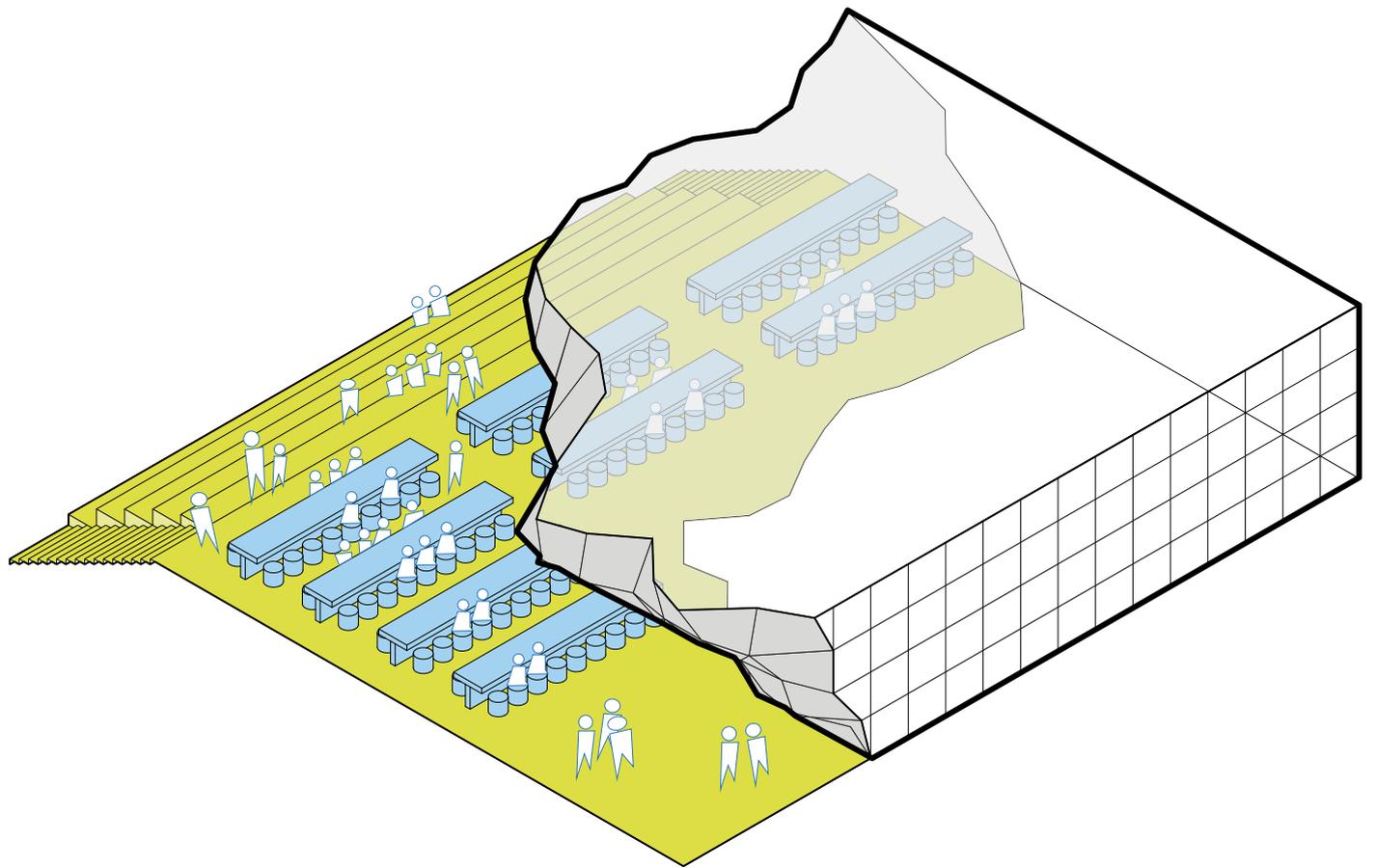
Combining a café, communal tables and support for an adjacent ice skating rink, the Jersey Plaza Pavilion is located on the North-West corner of Grand Junction Plaza. Additional programming includes storage facilities, MEP and fountain equipment. A key design feature is the Jersey Plaza Pavilion's façade, which is comprised of a series of frosted glass panels which are mechanically operated to be opened during the warmer months and closed through the winter.





RESTAURANT PAVILION AT THE CONFLUENCE

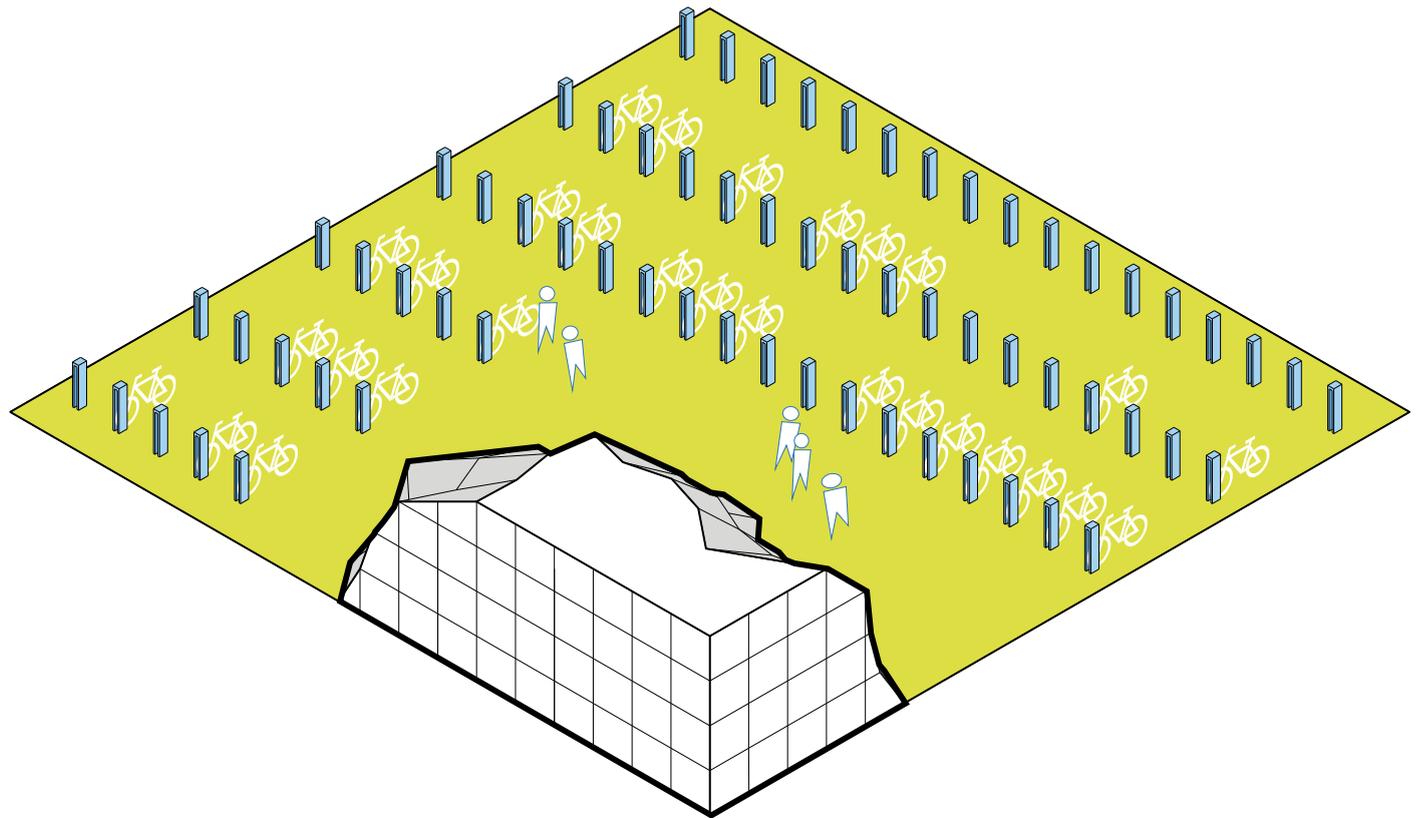
Located on the northeastern corner of the park where the two creeks meet, the Confluence Pavilion's cantilevered limestone form creates a dramatic architectural moment over the restaurant to provide a functional shade solution for the Pavilion's beer garden and stepped terrace.





TRAILHEAD PAVILION

The Trailhead Pavilion, located at the southern tip of the park, will greet visitors arriving from Indiana's regional trail system. The Pavilion will house many programs such as maintenance space, storage, the Park Ranger's office and public bathrooms. The multi-use space would also be a vendor kiosk, ideal for a bike sharing or summer chair rentals.



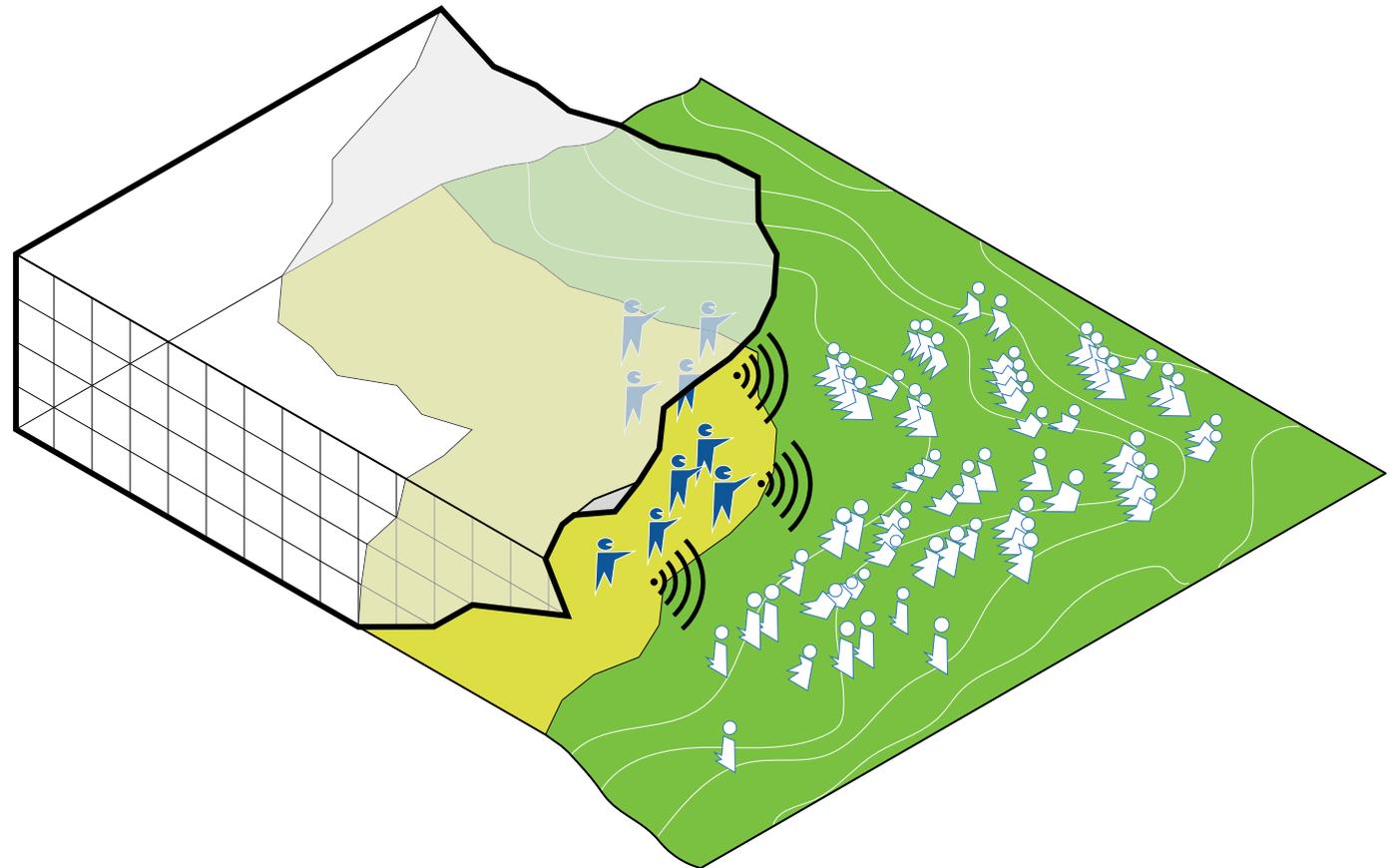
PAVILION 3



STAGE PAVILION AT THE GREAT LAWN

The Stage Pavilion located on the western side of the park has the potential to become the crown jewel of the park. Designed as a multi-purpose entertainment space, the Stage Pavilion serves as an amphitheater and site-specific performance stage primed for theatrical and musical performances for audiences gathering on the Great Lawn.

Concealed behind the stage are a series of back-of-house spaces including a green room, dressing rooms and an audio visual control room.





MATERIALS

The four pavilions celebrate Indiana's famed limestone. Recognized as the highest quality limestone produced in the United States, it has been used to build the Empire State Building, National Cathedral, and other nationally treasured buildings. Embraced as one of the structures' primary materials, HWKN will source the limestone from a local quarry and work with local stone masons to construct the monumental stone facades.



Eskenazi Fountain²⁷



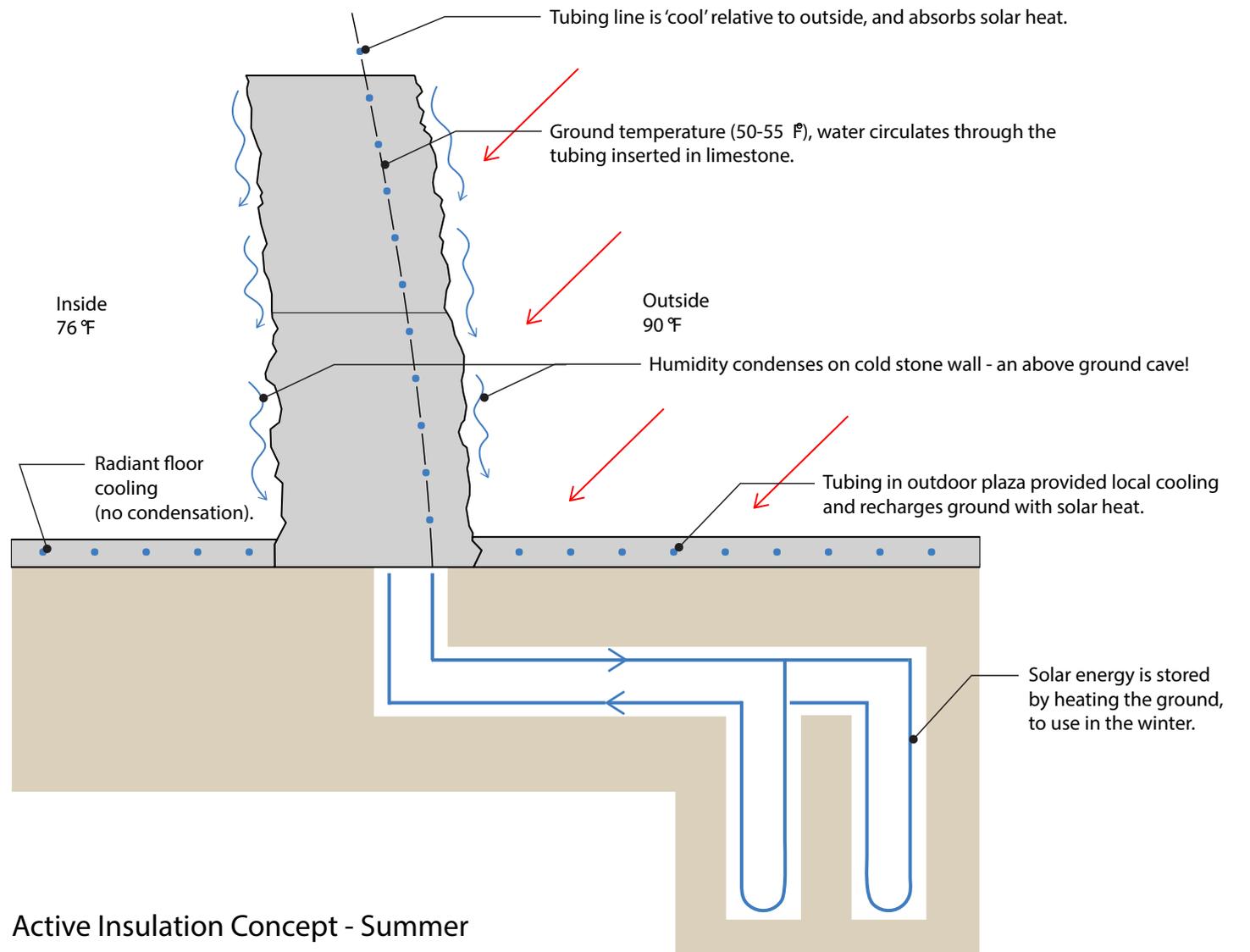
Indiana limestone facade²⁸



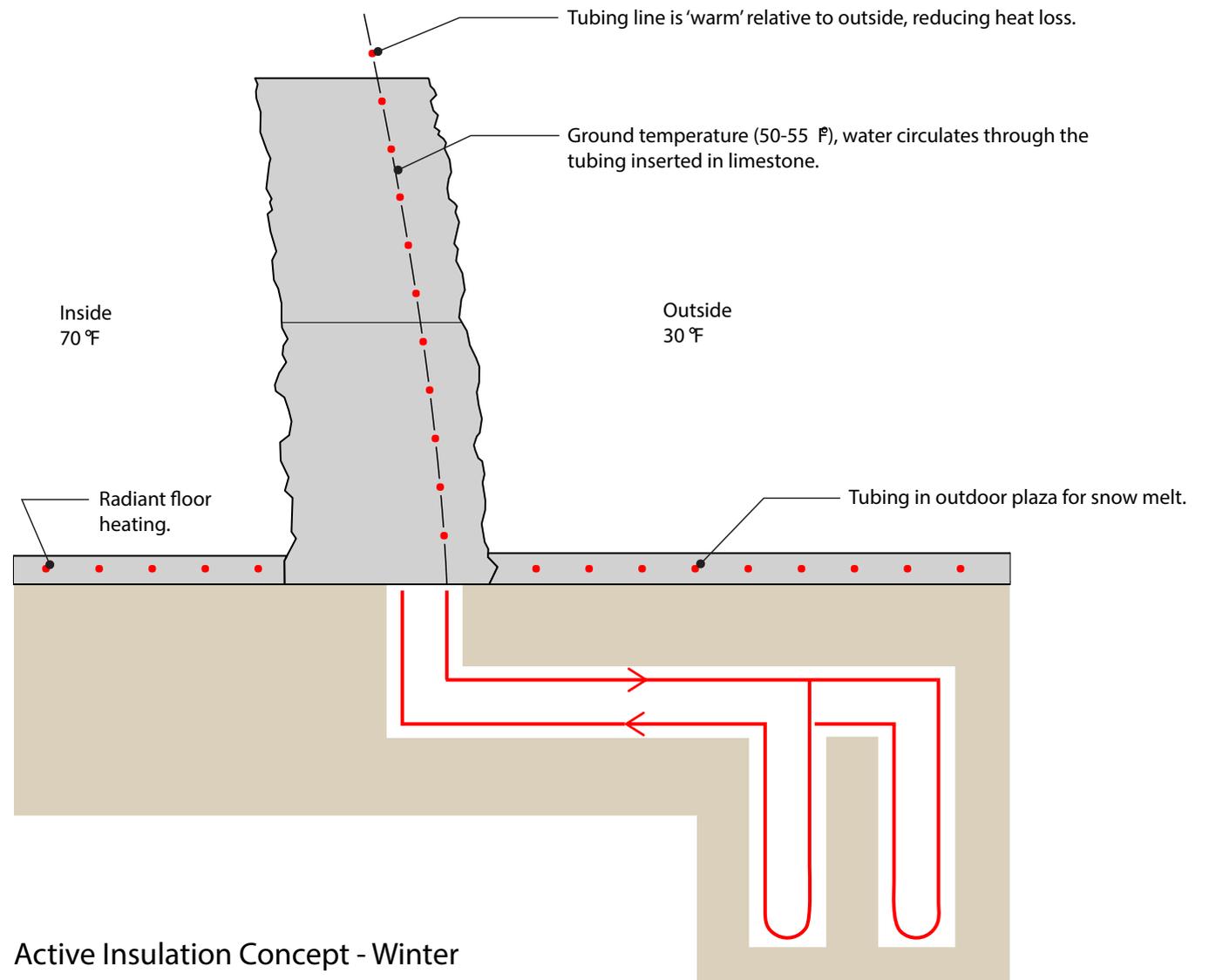
Glass facade & concrete floors²⁹

ACTIVE INSULATION

An 'active insulation' concept has been proposed in which groundwater is circulated throughout the limestone as an energy efficient form of insulation.



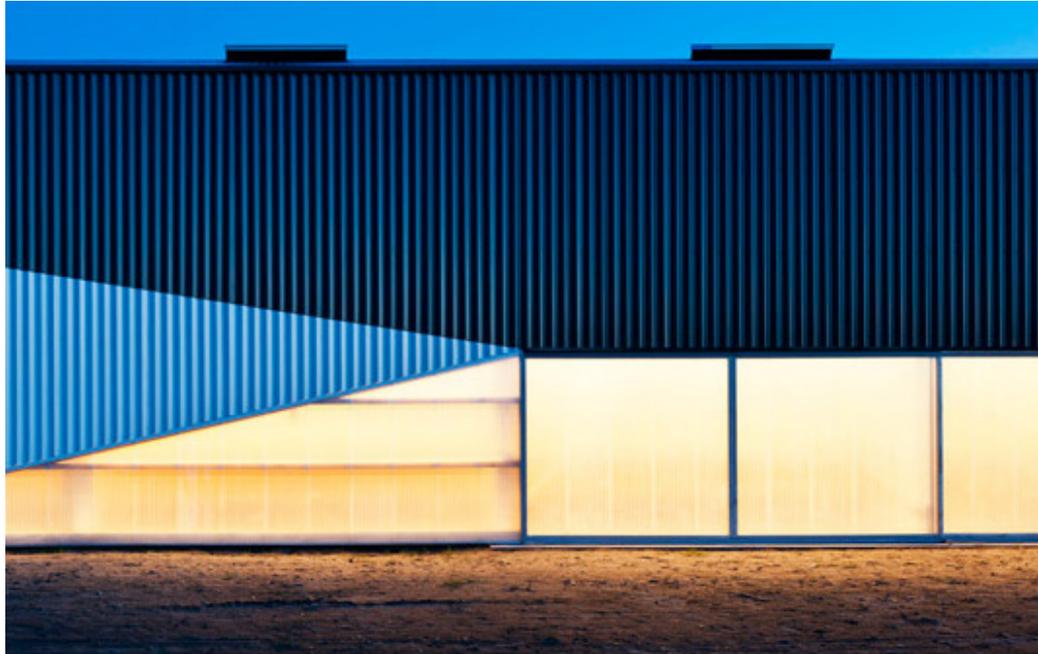
Active Insulation Concept - Summer



Active Insulation Concept - Winter

LIGHT

LIGHTING INSPIRATION



WARM LIGHTING FOR ARCHITECTURE & GATHERING PLACES³⁰



COOL LIGHTING FOR ELEMENTS OF THE LANDSCAPE³¹

POTENTIAL LIGHTING MOMENTS



BRIDGES + CULVERTS

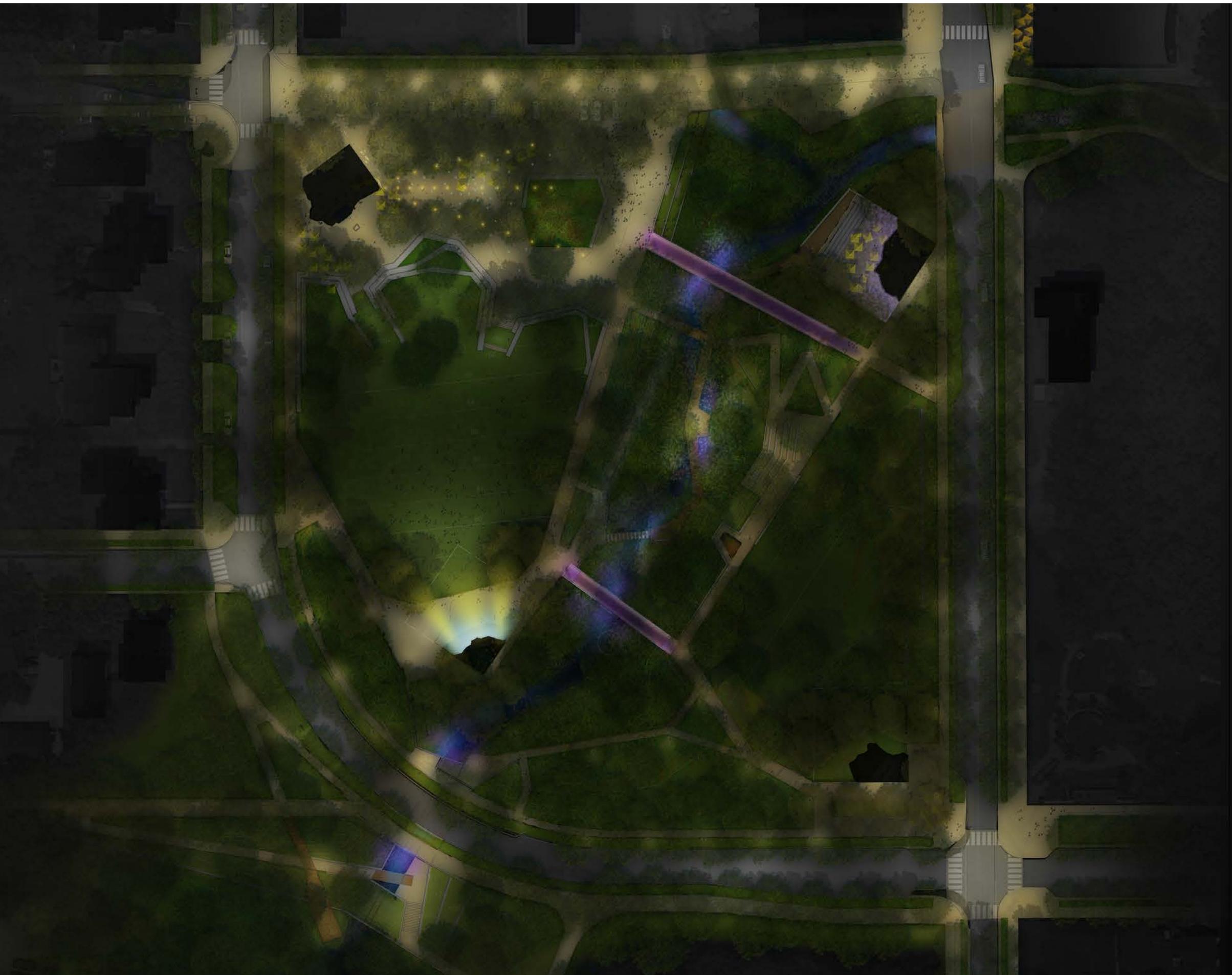


EDGE CONDITION

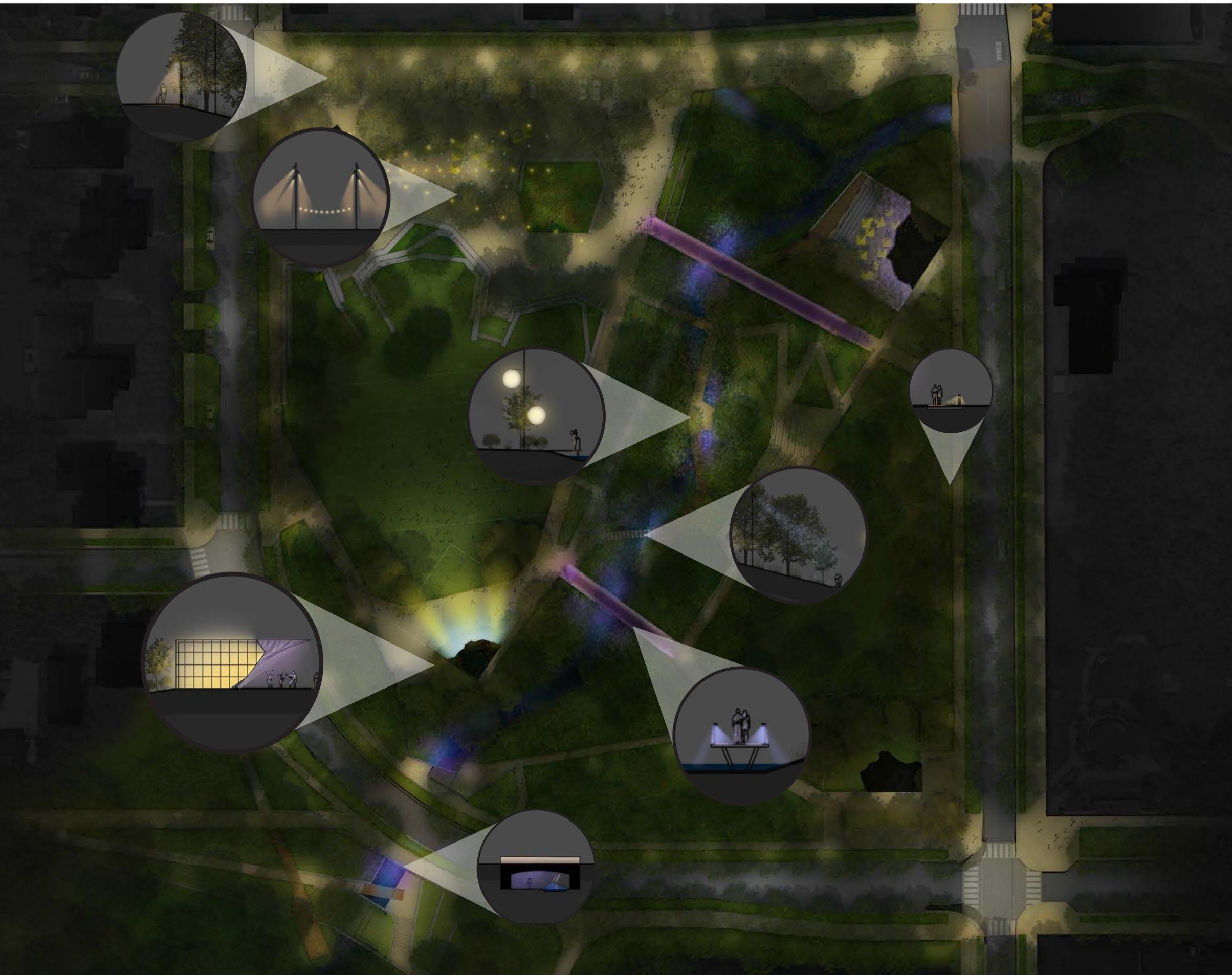


PAVILIONS

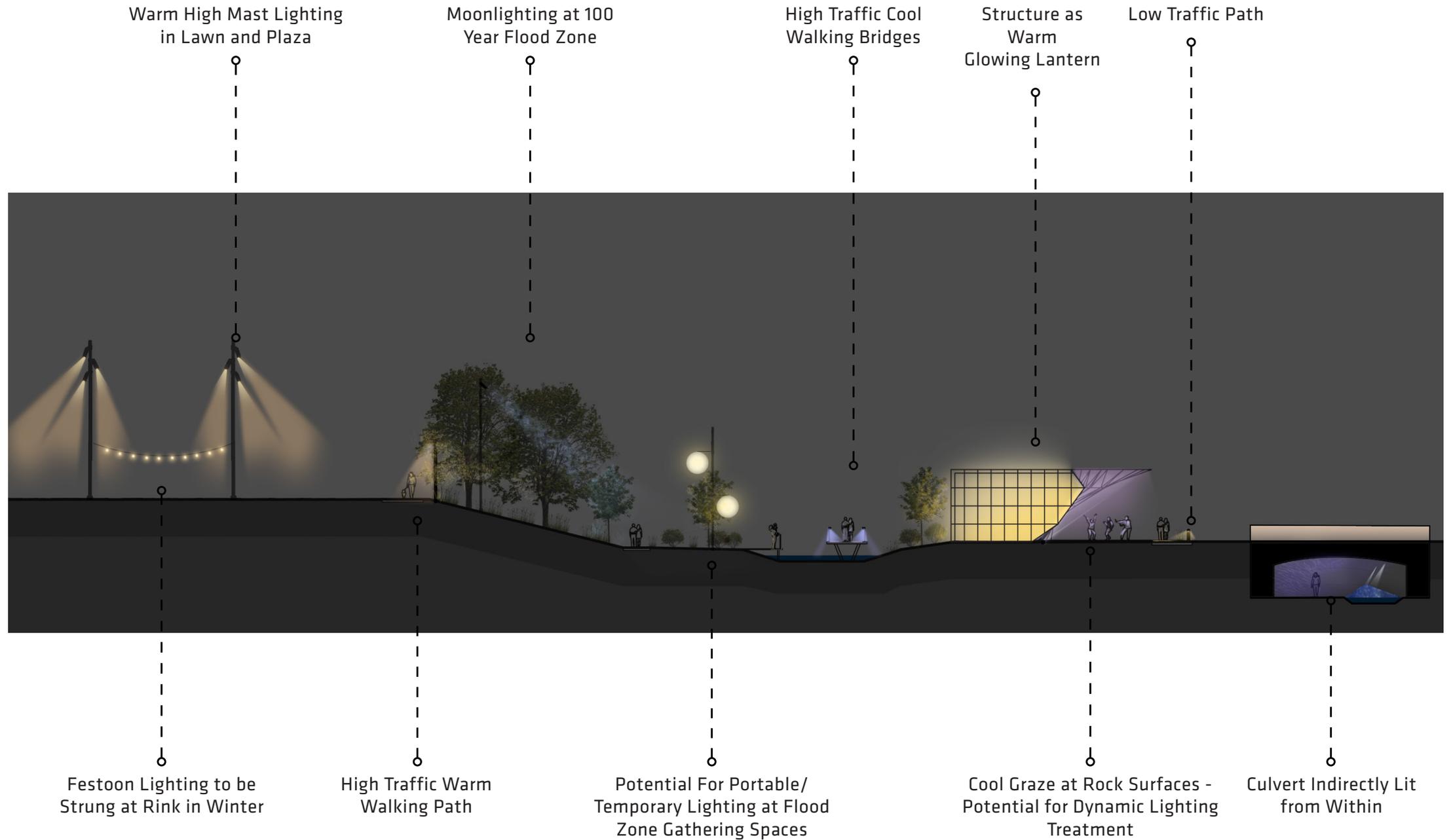
LIGHTING PLAN



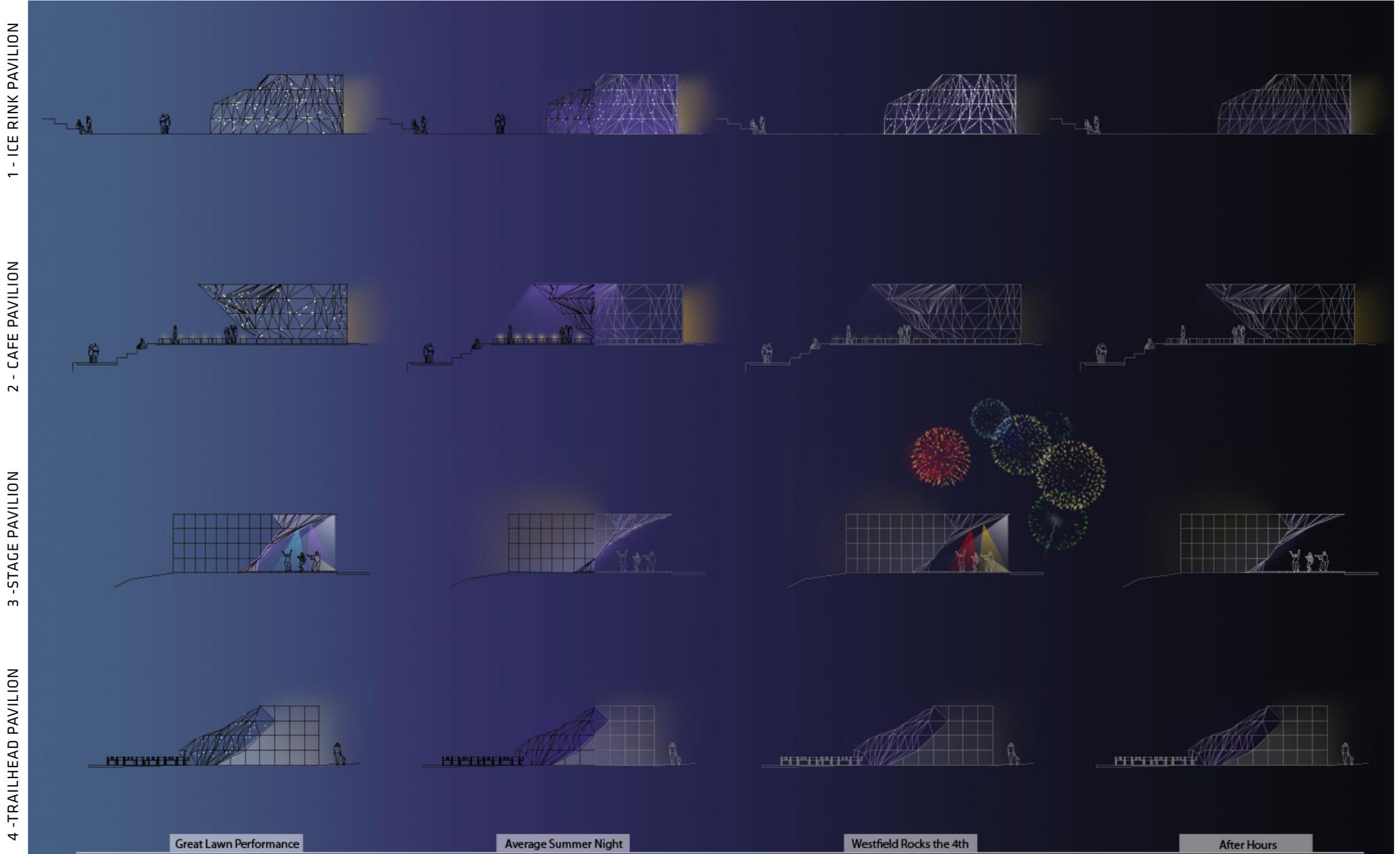
LIGHTING KIT OF PARTS - PLAN



LIGHTING KIT OF PARTS - ELEVATION



LIGHTING - PAVILIONS - SUMMER PROGRAMS



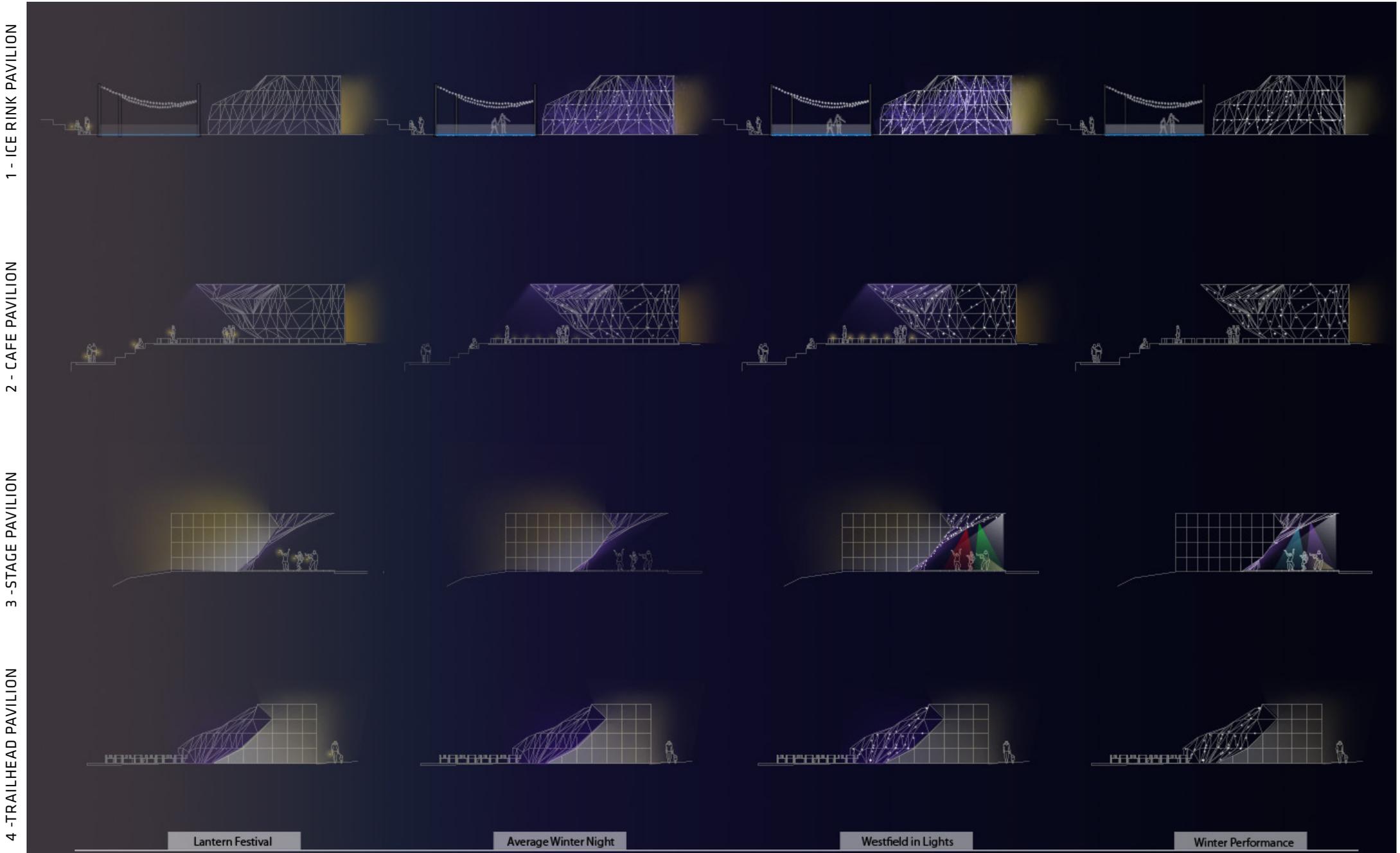
Focus at Stage Pavilion, sparkling pavilions surround spectators.

Cafe Pavilion and Stage Pavilion provide sparkle to be seen as guests dine at Cafe Pavilion and lounge in the Great Lawn.

Pavilions quiet during firework show with gentle sparkle and lavender glow allowing focus to be on the show in the sky.

Late night time setting, all pavilions dim to "sleep-mode" no sparkle.

LIGHTING - PAVILIONS - WINTER PROGRAMS



All pavilions glowing and sparkling as guests use lanterns as markers throughout the landscape.

All pavilions on with sparkle at Ice Rink Pavilion to provide visual destination through landscape.

Pavilions sparkle animating the entire park for the lighting of the tree celebration.

All pavilions sparkle in background as show is presented at Stage Pavilion.

KIT OF PARTS - SITE LIGHTING



HIGH MAST LIGHTING

Stages, Great Lawn, Ice Rink, Moonlighting in Flood Zones



PRIMARY PATHS

Shielded, high performance fixtures compliment landscape and allows Pavilions to stand out.



Portable Lighting

PORTABLE LIGHTING

For Flood Zones



SECONDARY PATHS

Smaller more private paths that allow users to view landscape without any light obstruction.

KIT OF PARTS - STRUCTURE

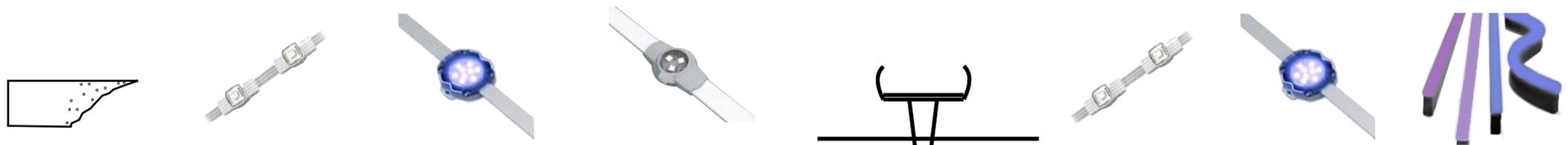


PAVILION LIGHTING

Dynamic lighting to be integrated into architecture with controllability.

CULVERT LIGHTING

Spot Lighting to accentuate caustic net.



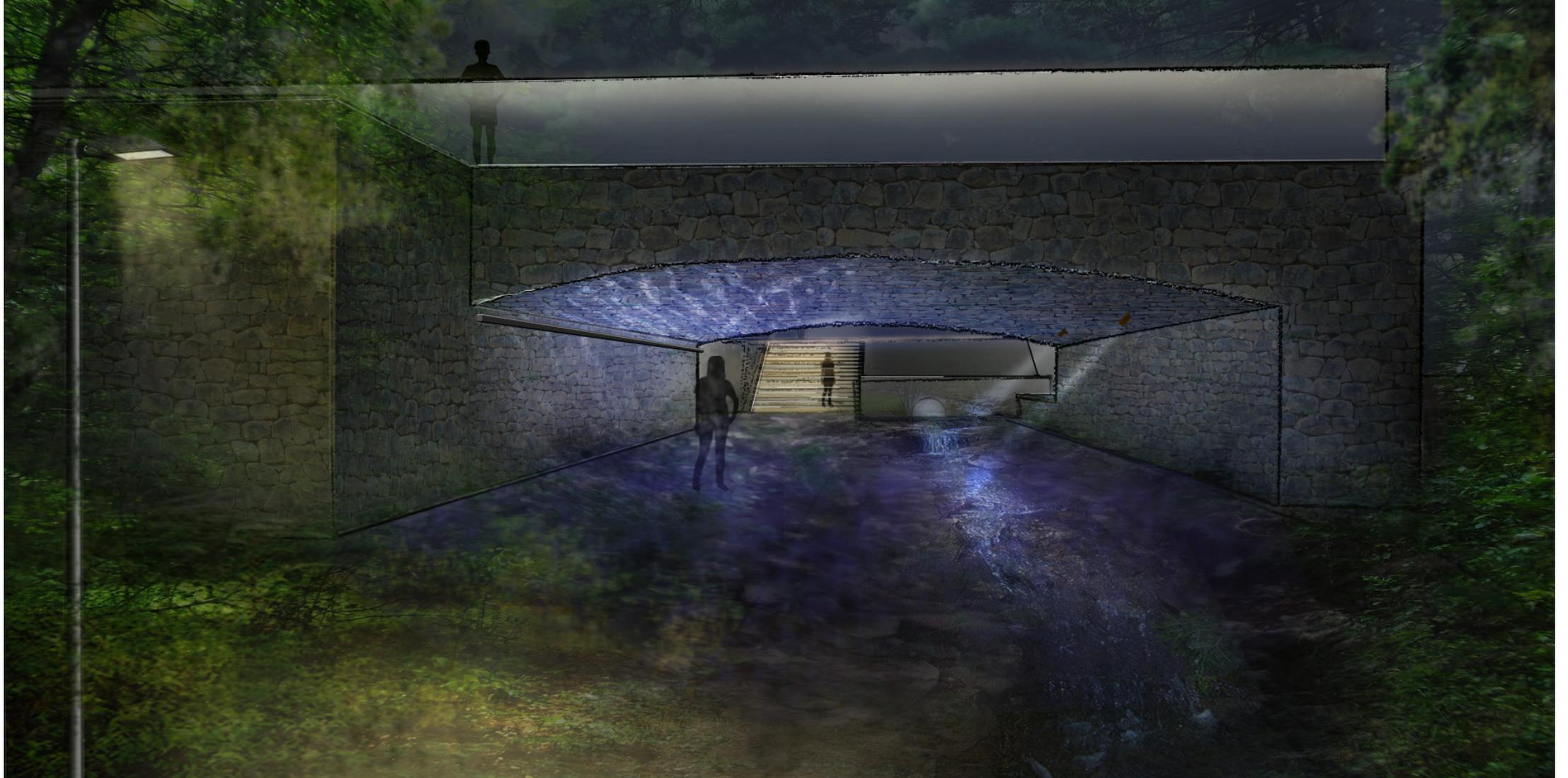
PAVILION LIGHTING

Dynamic lighting to be integrated into architecture with controllability.

BRIDGE LIGHTING

Lighting to create reflective image on water.

CULVERT LIGHTING AT MILL STREET



WATER & ICE

JERSEY PLAZA FOUNTAINS

FACADE FOUNTAIN (FOUNTAIN #1)

The Facade Fountain (Fountain #1) would be a decorative fountain incorporated into the Cafe Pavilion, and would consist of cascading water that would flow off the rock/simulated rock façade of Cafe Pavilion into a skim pool at its base.

JET FOUNTAIN (FOUNTAIN #2)

This fountain would be an interactive fountain consisting of approximately twelve (12) to fifteen (15) programmed ground jets with lighting.

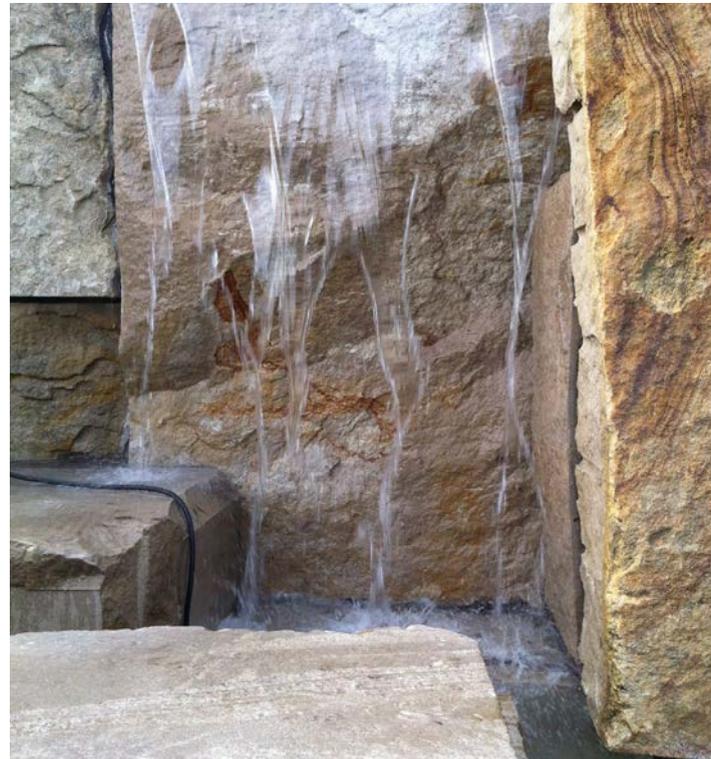
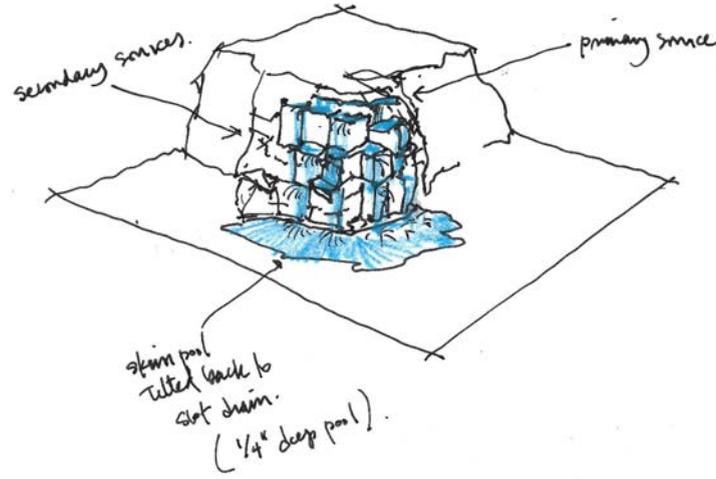
SEASONAL USE

Fountain use is intended to be seasonal, and can be adjusted depending upon weather conditions and Owner preference.

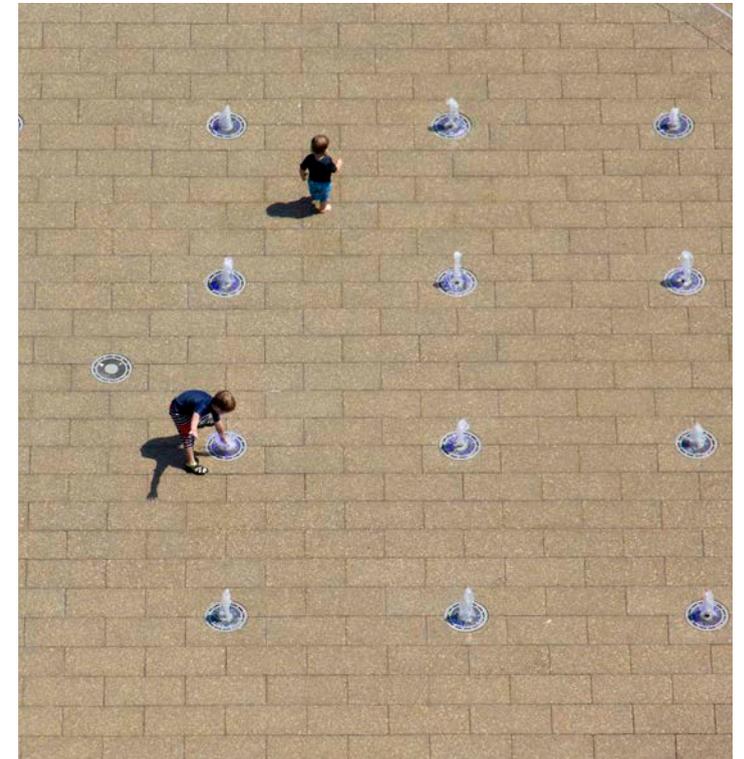
- Normal season: Owner selected. Can choose to extend a fountain season longer than what is typical for an outdoor pool. A reasonable season could be as long as from early-mid-May thru early-mid-October.
- Hours of operation: Owner selected. Can be programmed for any time of the day desired. For example, Fountain No. 1 could run 24/7 and Fountain No. 2 could run from 11:00 A.M. to dusk and adjusted for special park events.
- Standard Use: Fountain No. 1 is designed to be a decorative fountain but is recommended to be provided with a treatment system to provide a higher water quality and likely will have some incidental human contact to the fountain water. Fountain No. 2 is designed to be an interactive treated fountain with sprays selected to provide safe velocities (less than 20 feet/second) at point of discharge resulting in typical maximum spray heights of 6 to 7 feet.

CAFE PAVILION FACADE

Water effects are envisioned as being upwelling water at a series of locations and elevations and then cascading down rock, simulated rock or similar that forms a roof/wall façade on Pavilion 1. These effects would run continuously and then be supplemented with programmable additional sprays and/or increased



1 / Facade Fountain³²



2 / Jet Fountain³³

CAFE PAVILION FACADE FOUNTAIN (FOUNTAIN #1) DESCRIPTION

cascading water flows to create greater “strength” to provide an increased interest level. Lights would be installed (designed by fellow design team member Tillett Lighting) likely both on the rock façade and at the base of the rock façade to provide illumination during dusk and evening hours. Water flowing down the façade will create a shallow pool (of an inch or less) near the base with a linear drain along the base and adjacent hard surface sloping back toward the drain.

FOUNTAIN SURFACE

- Rock, simulated rock or similar material to be developed during design development between LAND COLLECTIVE, HWKN and Stantec. Bottom of element to be cantilevered back slightly for safety and to inhibit general public from climbing up the feature. Hard surface at bottom of feature will be slip resistant, sloped to drain, relatively water tight and designed to prevent collected pockets of water that could allow for unwanted biological growth. The collection area at the base of the fountain is envisioned to be on the order of 10'-15' out from the fountain façade surface. Hard surface beyond this immediate area would be designed to slope away from the fountain feature.

WATER FEATURE ELEMENTS

- Continuously flowing features to be supplied with water from small basins and up-flowing over straight weirs of varying lengths at different heights. Potential flow per linear foot of weir could be on the order of 10 to 50 Gallons per Minute (GPM).
- Fountain Feature System Flow: At this point, it is difficult to determine a specific flow amount until this concept is more fully flushed out. Could potentially be on the order of 1,000- 3,000 GPM total.
- Fountain Lights: Effect lighting likely to be provided throughout rock façade and at base, and would be low voltage/LED lights that are rated for swimming pool and/or meet regulatory requirements for safety purposes. Illumination to be either strictly white or programmable to be any

color, depending on Owner preference.

- Fountain Water Collection System: Linear drains installed at base of rock façade to collect spent fountain water and/or rainwater. The fountain drain piping system will be designed to collect water and return it to fountain-storage tank for treatment.
- Storage Tank: Reinforced, water tight concrete tank – potentially located in basement of building, adjacent to lower level fountain equipment room or as a stand-alone buried concrete tank between fountain and lower level equipment room. Access into the tank from the top via a hatch is required for maintenance purposes along with a way to vent the tank. Hatch and vent locations to be coordinated with other project elements to address visual as well as functional concerns. Size of the tank is dependent on its depth, amount of water flow, and other parameters but could be on the order of 175-250 square feet.
- Excess System Water Removal: As the drains at base of the fountain collect both spent fountain water and precipitations, additional measures are needed to allow excess water to be removed out of the system. Measures to be more fully discussed in design development but could include:
 - Gravity overflow or manual drainage from tank by gravity to a sewer or to a sump pump in the basement
 - Some type of water level controlled pump (either by a submersible pump located in storage tank or a flooded suction centrifugal pump in fountain equipment room) that pumps excess water from the system to nearby storm water piping. Capacity required is minimal – perhaps on the order of 100 GPM at 15' TDH, 1 HP depending on the roof collection area.
 - Redirecting of water directly to storm sewer during off-season

CONTROL DESCRIPTION

The fountain could be equipped with control system that would turn on/off the fountain each day (if desired by Owner) and control adjustable preset sequences of water features to potentially turn features on and off,

and operate at different heights, varying durations, etc. During dusk and evening operations the lights of the fountain to come on with any color and could be designed to be programmed for certain special events like the 4th of July, special city celebrations, etc.

FOUNTAIN MECHANICAL ROOM

Fountain Water Feature Pumping Systems: Flooded suction, centrifugal pump(s) equipped with variable frequency drive(s) (VFD'S) provided for groups of water features. Ahead of pump(s) are strainers with removable baskets that collect debris and are typically cleaned once a day to once every few days depending on site conditions. Pumps would likely be specified as Aurora, Grundfos (PACO) or similar. Number of pumps and design conditions to be determined as water feature details are established.

FOUNTAIN TREATMENT:

General:

- Due to the volume of water needed to operate this fountain as well as the potential for human contact with water off the fountain, a treatment system is strongly recommended where water is treated and reused, similar to a pool system, rather than a system utilizing a fresh water supply that is discharged directly to a drain, typically used for smaller fountains and/or splash pads. Treated water would be returned to the water storage tank. There are many different types of treatment equipment that could be used which can be discussed further as the project develops. The treatment system would run continuously except when shut off for short durations of maintenance, such as filter and pump strainer cleaning. The following are initial recommendations:

Recirculation Pump

- Pump is similar to the fountain-pumping water feature pump(s). Size will be determined once feature flow is established along with water storage tank size
- Pumps will be sized for a turnover rate of the storage tank on the order of 30 to 60 minutes.

Filtration:

- Regenerative media filter system such as Neptune Benson's Defender type filter. This type of filter provides extremely high quality water, removing smaller particulates than even a sand type filter is capable of capturing and can greatly assist in the removal of small organisms such as cryptosporidium.

Disinfection:

- A chlorine system is the most common type of treatment. For this project, a solid tablet chlorine system is recommended because of the savings it provides for install, it uses less footprint than other systems and has a relative easy operation compared with other options. A system such as Axiall Accu-Tab system is recommended. In addition, consideration may want to be given to provide an additional, higher level of treatment such as an UV system either initially or provisioned for so that it can be added in the future. Secondary disinfection (such as UV) is actually mandated in some states (including Indiana) for interactive water fountains. Use of an UV system does not eliminate the need for a disinfection system such as chlorine, as it does not leave a residual disinfectant product in the treated water; its use will reduce the amount of chlorine necessary and removes organisms that are not effectively treated by chlorine.
- A pH system will be necessary to further condition the water. A solid chlorine system is high in pH so a chemical with low pH is necessary. The exact chemical can be selected after further discussion with Owner and identifying readily available local chemicals. Typically, a low fuming muriatic acid or sodium bisulfate product is used. Typically such a system consists of a small plastic storage tank on the order of 100-200 gallons located within a secondary containment tank and supplied with a feed pump such as a Stenner positive displacement pump. An automated chemical controller is strongly recommended which continuously monitors system water quality and automatically adds chemicals as necessary. Manufacturers for the controller include

BECS, ProMinent and Chemtrol.

Water Make Up System:

- A makeup water system is recommended to automatically add water to the system as water is lost from evaporation, over spray beyond the fountain collection surface, etc. The system would be controlled by water level in the storage tank and a call for water would open a solenoid valve on the water supply line, allowing water to be fed into the storage tank until an acceptable level is reached.

Heating:

- Due to the relative little amount of water in the system, and how the water is treated and used over and over, the recirculation of water tends to warm it inherently. Therefore, a heater is not typical for a project of this type.

Location:

- Fountain equipment would be located in the basement of Pavilion 1.

Room Size:

- To be determined. Sizing will be based on final fountain size, water feature flow amounts, etc. Initial estimate of building space required, assuming the storage tank is constructed outside of the building is on the order of 400-700 square feet. Approximately 11'-12' high ceiling height is strongly recommended to maintain adequate head clearances in the room. The layout of the equipment is somewhat flexible and is relative to room length and width, so layout can be adjusted within reason to work with the function of the rest of the building. It is recommended that pH feed system components be located on the main floor of Pavilion 1 with an exterior only entrance—see discussion in following Fountain Chemical Room discussion.

Room Composition:

- Reinforced cast in place concrete walls which also serve as foundation for main level masonry walls.

Reinforced cast in place concrete ceiling which also serves a floor for main level of the building.

HVAC:

- Mechanical ventilation system required, rate dependent upon final room perimeters, chemical selections, local code requirements, etc. A ventilation rate on the order of ten air changes per hour is typical for the primary equipment room. While the fountain equipment is not used during the winter months, maintaining a room temperature above 40 to 50 degrees Fahrenheit all year will improve life of both equipment and the building. Typically, air conditioning of the space is not required.

Water Supply:

- Domestic water supply is required for the fountain as well as for eye wash stations (tempered recommended) at chemical feed equipment locations, mechanical rooms, and exterior located hose bibs for general maintenance and cleaning purposes.

Service/Access Requirements:

- Measures should be provided for both initial install and also eventual removal and replacement of all equipment. Typically, the largest equipment for treatment systems is the filter. For now, assume minimum clear width of stairs at 4' wide with enough room at top and bottom of stairs to maneuver longer length items.

FOUNTAIN CHEMICAL ROOM(S)

Location:

- Strong recommendation to locate fountain pH equipment in a separate small exterior access room above the fountain equipment room. pH chemicals can be highly corrosive and housing and isolating them in a separate room can greatly reduce impacts to the building and other equipment from corrosion. Room would typically be 25-40 square feet served by its own plastic corrosion resistant fan, provided with a FRP access door and all room components

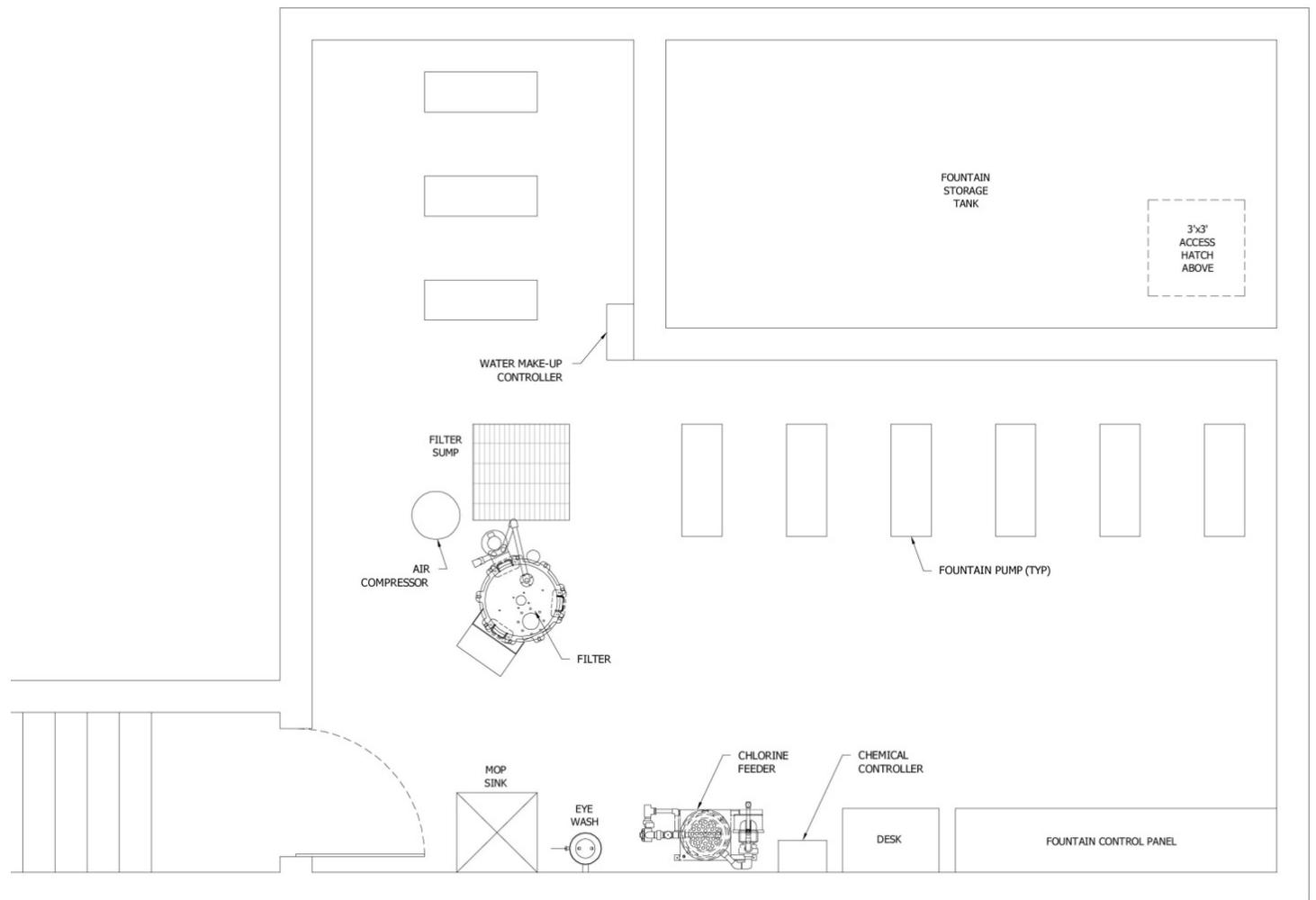
constructed with corrosion resistant materials. If a solid chlorine system is used for disinfection, the chlorine system equipment is typically located in the same main room as other fountain equipment. If gas chlorine is used, it must be located in a room similar to that recommended for pH. If liquid chlorine is used, it is recommended to be located in a room similar to that recommended for pH, but likely will need to be larger in size to provide an adequate amount of chemical storage.

FOUNTAIN PIPING

It is recommended that exterior piping be HDPE piping SDR 11. HDPE piping tends to perform better than PVC piping in exterior use and shallow bury applications with small sizes that have relatively little slope as it is more forgiving in the event of any frost heave and in the event that any water is left in the piping that could be subject to freezing. Larger buried piping could be either HDPE or Schedule 40 or 80 PVC. For interior piping, the recommendation is to use Schedule 80 PVC. Schedule 40 PVC provides adequate strength, but is white in color as opposed to the grey color of Schedule 80 which is more visually appealing in exposed locations.

SPECIAL CONSIDERATIONS

If the fountain is not considered interactive, permitting is not required by the State of Indiana as would be necessary for a pool or interactive fountain.



FOUNTAIN EQUIPMENT ROOM LAYOUT*

*Drawing NTS. Layout done as a typical room, and will be documented in the building footprint during DD.

JET FOUNTAIN (FOUNTAIN #2) DESCRIPTION

JET FOUNTAIN (FOUNTAIN NO. 2) OPERATIONAL PROGRAM

The Jet Fountain (Fountain No. 2) is a programmable fountain with approximately twelve (12) to fifteen (15) dancing water spray jets arranged on an approximate 5' grid spacing.

Fountain Surface

- To be determined. Typical options for fountain surfacing include 8" thick colored concrete, pavers, flame finish granite or other type of surfacing. Key elements for the fountain surfacing are to be slip resistant to prevent patrons from falling and to be relatively water tight. Edges of fountain pad shall slope inward to center drains and adjacent concrete around the pad is to slope away from the pad. Adequate room should be provided around the pad accounting for spray patterns and wind carried spray. Unless existing soils are free draining, it is recommended to provide approximately 3' depth of free draining granular fill beneath the fountain with a drain tile piping near the bottom of this granular materials. This will adequately remove any water that gets through the hard surface in this area and decrease the chance of frost heave that damages fountain components.

Fountain Area

- Quantity and location of sprays could approximately be 600 square feet not including a buffer of approximately 8'-10' in width around the main water area of fountain to take any overspray and also to serve as a pedestrian path. To be determined, based on final arrangement.

Fountain Type

- Jet Fountain with programmable below-grade surface water sprays and LED lighting.

Nozzle Type

- An adjustable controlled vertical column jet spray effect nozzle.



Jet Fountain at Canal Park / Washington, D.C.³⁴

Nozzle Spacing:

- Sprays spaced on an approximate 5' grid pattern

Spray Nozzle Information:

- Quantity: 12-15
- Max Flow Each: 15 GPM
- Max Height: 6-7 Feet
- For jet fountains, velocities are limited to a maximum of 20 feet/second (a fairly common industry rule of practice). Higher flows can cause ocular and soft tissue damage and other injuries. Owner can elect to use higher height sprays (will use an increased water flow and increased pressure requirements) for a "show mode experience" but measures such as on-site supervision/temporary barriers, etc. need to be provided to prevent patrons from going near nozzle discharge locations.

Fountain Feature System Flow:

- Variable with maximum flow of approximately 225 GPM with all sprays operating at full height.

Fountain Lights:

- LED lights (12V, 30 Watt) located at each jet nozzle. LED lights can be programmable for virtually any color. Lights may be located at a maximum distance of 400' from the control panel if there is a transformer pit provided between the control panel and the lights (200' is maximum distance without a transformer pit).

Housing:

- Below grade stainless steel niche (approximately 11" in diameter and 16" deep), embedded in concrete. Each jet housing includes a nozzle, control valve, LED light, slotted top drain cover, and connections for water supply, drainage and electrical. Housings can be supplied with winterizing covers for use during the fountain off-season.

Fountain Water Collection System:

- Each nozzle housing is equipped with slotted cover to accept spent fountain water and/or rainwater. Additional drains will also be provided toward the

center of the fountain pad to improve drainage from the pad. Under fountain drain piping system will be provided to collect water from housing and a return to the fountain storage tank for treatment.

Potential Manufacturer:

- Schematic design information based on equipment by Crystal Fountains from Toronto, Canada.

Storage Tank:

- Reinforced, water tight, concrete tank – could be located in basement of building, adjacent to lower level fountain equipment room or a stand-alone buried concrete tank between fountain and lower level equipment room. Access into the tank from the top via a hatch is required for maintenance purposes, along with a way to vent the tank. Hatch and vent locations to be coordinated with other project elements to address visual as well as functional concerns. Size of the tank is dependent on its depth, amount of water feature flow and other parameters but could be on the order of 125-175 square feet.

Excess System Water Removal:

- As the fountain drains collect both spent fountain water and precipitations, measures need to be provided to remove excess water from the system. Measures to be fully discussed in design development but could include:
 - Gravity overflow or drainage from tank
 - Some type of water level controlled pump (either by a submersible pump located in storage tank or a flooded suction centrifugal pump in fountain equipment room) that pumps excess water from the system to nearby storm water piping. Capacity required is minimal – on the order of 100 GPM at 15' TDH, 1 HP.
 - Redirecting of water directly to storm sewer during off-season
 - System could also be equipped with a rain sensor that, when activated, turns off fountain feature pumps and redirects

collected rain water directly to the storm sewer rather than flowing into the fountain water storage tank.

CONTROL DESCRIPTION:

- The fountain would be equipped with control system that would turn on/off the fountain each day and control adjustable preset sequences when the nozzles are tuned on and off and operate at different heights, duration, etc. Programming allows for an element of randomness and fun, to keep patrons guessing of what sprays will operate next. The jets would be separated into multiple zones. An individual pump supplies water flow for each zone, with each jet in the zone controlled to ramp the height up and down simultaneously. Each jet within a zone can be controlled to come on and off individually with a control valve in each individual niche. When an individual jet is off, flow to the jet is bypassed into the niche drain. During dusk and evening operations, the lights of the fountain turn on and can be programmed for special events like the 4th of July, special City celebrations, etc. Each light is individually programmed. A wind control system would be provided that can turn down the height of water sprays and even turn them off completely when adjustable preset wind conditions are encountered.

Fountain Mechanical Room

- Fountain Pumping Systems: Flooded suction, centrifugal pumps equipped with variable frequency drives (VFD'S) provided for multiple zones of spray nozzles. Ahead of pumps are strainers with removable baskets that remove debris that typically are cleaned once a day to once every few days, depending on site conditions. Pumps would likely be specified to be Aurora, Grundfos (PACO) or similar. The number of pumps and design conditions are to be established as water feature details are finalized but could be approximately:
 - Jet Nozzle Pumps: (3) 75 GPM @ 75' TDH. 5 HP (5 Nozzles Each)

JET FOUNTAIN (FOUNTAIN #2) DESCRIPTION

FOUNTAIN TREATMENT

General:

- Due to the volume of water needed to operate this fountain, a treatment system is strongly recommended where water is treated and reused, similar to a pool system rather than a system utilizing a fresh water supply that is discharged directly to a drain, like those used for smaller fountains and/or splash pads. Treated water would be returned to the water storage tank. There are many different types of treatment systems and equipment that could be used which can be discussed further as the project proceeds. The following are some initial recommendations
- The treatment system would run continuously except when it is turned off for short duration of maintenance, such as filter and pump strainer cleaning.

Recirculation Pump

- Pump would be similar to those used for the fountain pumping water feature pump(s). Size will be determined once feature is defined.
- Flow is established along with water storage tank size
- Pump would be sized to provide for turnover rate of the water storage tank for 30 minutes or less
- Potential size could be on the order of
- 200 GPM @ 80' TDH. 10 HP

Filtration:

- Regenerative media filter system such as Neptune Benson's Defender type filter. This type of filter provides extremely high quality water which removes much smaller particulate than a sand type filter is capable of and also greatly improves removal of small organisms such as cryptosporidium.

Disinfection:

- A chlorine system is the most common type of treatment. For this project, a solid tablet chlorine system is recommended for the savings it provides

for install, it uses less footprint than other systems and has a relatively easy operation compared with other options. A system such as Axiall Accu-Tab system is recommended. A secondary disinfection (such as UV) is required in Indiana for interactive water fountains. Use of an UV system does not eliminate the need for a disinfection system such as chlorine, as it does not leave a residual disinfectant product in the treated water; its use will reduce the amount of chlorine necessary and removes organisms that are not effectively treated by chlorine.

- A pH system will be necessary to further condition the water. A solid chlorine system is high in pH so a chemical with low pH is necessary. The exact chemical can be selected after further discussion with Owner and identifying readily available local chemicals. Typically a low fuming muriatic acid or sodium bisulfate product is used. Typically such a system consists of a small plastic storage tank on the order of 100-200 gallons located within a secondary containment tank and supplied with a feed pump such as a Stenner positive displacement pump. An automated chemical controller is strongly recommended which continuously monitors system water quality and automatically adds chemicals as necessary. Manufacturers for the controller include BECS, ProMinent and Chemtrol.

Water Make Up System:

- A makeup water system is recommended to automatically add water to the system as water is lost from evaporation, water spray being carried away by patrons, over spray beyond the fountain collection surface, etc. The system would be controlled by water level in the storage tank and a call for water would open a solenoid valve on the water supply line that would allow water to be fed into the storage tank until an acceptable level is reached.

Heating:

- Due to the relative little amount of water in the system, and the fact that water is treated and used

recirculated, water tends to warm inherently, so providing a heater is not typical for an installation of this type.

Location:

- Fountain equipment would be located in the basement of Pavilion 1.

Room Size:

- To be determined. Sizing will be based on final fountain sizing, water feature flow amounts, etc. Initial estimate of space required assuming storage tank is constructed outside of the building is on the order of 400 – 700 square feet. Approximately 11'-12' high ceiling height is strongly preferred to maintain adequate head clearances in the room. The layout of the equipment is somewhat flexible relative to the room dimensions, so layout can be adjusted within reason to work with the function of the rest of the building. It is recommended that pH feed system components be located on the main floor of Pavilion 1 with an exterior entrance – see discussion in following Fountain Chemical Room discussion. See enclosed for a preliminary sketch of one potential equipment room layout.
- Note the equipment for both fountains can be installed within the same room, provided enough space is provided to house equipment required for both fountains.

Room Composition:

- Reinforced cast in place concrete walls which also serve as foundation for main level masonry walls. Reinforced cast in place concrete ceiling which also serves a floor for main level of the building.

HVAC:

- Mechanical ventilation system required, rate dependent upon final room perimeters, chemical selections, local code requirements, etc. A ventilation rate on the order of ten air changes per hour is typical for the primary equipment room. While the fountain equipment is not used during the winter months—maintaining a room

temperature above 40 to 50 degrees Fahrenheit all year will improve life of both equipment and the building. Typically air conditioning of the space is not required.

Water Supply:

- Domestic water supply is required for water make up for the fountain as well as for eye wash stations (tempered recommended) at chemical feed equipment locations, mechanical rooms, and exterior located hose bibs for general maintenance and cleaning purposes.

Service/Access Requirements:

- Measures should be provided for both initial install and also eventual removal and replacement of all equipment. Typically the largest equipment for treatment systems is the filter. For now assume minimum clear width of stairs at 4' wide with enough room at top and bottom of stair to maneuver longer length items.

FOUNTAIN CHEMICAL ROOM(S)

Location:

- Strong recommendation to locate fountain pH equipment in a separate small exterior access room above the fountain equipment room. pH chemicals can be highly corrosive and housing and isolating them in a separate room can greatly reduce impacts to the building and other equipment from corrosion. Room would typically be 25-40 square feet served by its own plastic corrosion resistant fan, provided with a FRP access door and all room components constructed with corrosion resistant materials. If a solid chlorine system is used for disinfection, the system equipment is typically located in the same main room as other fountain equipment. If gas chlorine is used, it must be located in a room similar to that recommended for pH. If liquid chlorine is used it is recommended to be located in a room similar to that recommended for pH but may need to be bigger in size to provide an adequate amount of chemical storage.
- Note. Likely one common pH room will be usable for

both fountains, but may need to be slightly larger (but not as large as two separate rooms).

FOUNTAIN PIPING:

It is recommended that exterior piping be HDPE piping SDR 11. HDPE piping tends to perform better than PVC piping in exterior and shallow bury applications with small sizes that have relatively little slope as it is more forgiving in the event of any frost heave and in the event that any water is left in the piping that could be subject to freezing. Larger buried piping could be either HDPE or Schedule 40 or 80 PVC. For interior piping the recommendation is to use Schedule 80 PVC. Schedule 40 PVC provides adequate strength but is white in color as opposed to the grey color of Schedule 80 which is more visually appealing in exposed locations.

SPECIAL CONSIDERATIONS:

- The fountain will likely require approval and permitting from the State of Indiana.

JERSEY PLAZA ICE RINK

SKATE RINK USE

Normal skating season:

- November 15 thru March 15 each year (plus one to two additional weeks on each end to make and remove ice and equipment)

Skating types:

- Recreational skating, figure skating exhibitions, non-competitive activities such as hockey or broomball, although short-circuit racing is possible

Hours of operation:

- Owner selected. Refrigeration system runs continuously during the skating season so hours of operation are flexible to suit staffing availability and user interest. Major events should not be scheduled between 11:00 am and 4:00 PM due to possible softening of ice on warm sunny days.

DRY FLOOR USE

Normal season:

- April 1 thru October 31 each year

Dry floor uses:

- Walking, roller blading, skateboarding, public displays, shows, farmer's markets/flea markets, and music/artistic performances.

AMENITY OPTIONS:

Shade structure:

- No shade structures currently proposed. Installation of shade structure would allow ice season to be lengthened further into the fall and spring, and would reduce electrical use on sunny days throughout the season.

Skate rental, skate changing, and skate sharpening:

- All located in Cafe Pavilion

Concessions and rest rooms:

- In Cafe Pavilion

Perimeter circulation:

- Removable or permanent rubber skate flooring

required between the rink and the Cafe Pavilion, as well as any other location users will need to walk while wearing their skates

Observation area:

- Primary observation area is along the east side of the rink, although the rink is visible from the walkways on all sides

Sound system:

- Primarily low volume level for recreational skating background music and for announcements. Speakers mounted on lighting poles and building structure. Consider providing high power source for performance level sound system.

Lighting system:

- Uniformly spaced poles preferred, to produce uniform moderate light level below 10 foot-candles

Perimeter railing:

- 3'-6" height metal railing with curb is recommended around entire rink perimeter, including both sides of the skating trail

Ice resurfacers:

- Single full-size gasoline or propane powered ice resurfacers, Zamboni or Olympia brand. Heated portable garage enclosure is required at a location adjacent the rink. Space requirement approximately 375 SF with indoor snowmelt pit, 300 SF if the pit is located outdoors.

Snowmelt pit:

- Can be located outdoors, but preferred location is inside the resurfacers enclosure structure.

Refrigeration equipment room:

- Located in the basement level of the Cafe Pavilion. Space requirement approximately 600 SF, with minimum 12 ft. ceiling height. An underground or screened above-ground enclosure is required for the evaporative or air-cooled condenser.

JERSEY PLAZA ICE RINK



Dasher System / Canal Park: Washington, DC

PHYSICAL DESCRIPTION OF SKATING RINK

Rink size

- Free Skating Rink Area: Approx. 4,740 s.f.
- Skating Trail Area: Approx. 4,690 s.f.
- Total Rink Surface Area 9,430 s.f.
- Note: Skating trail is approximately 310 feet long (measured at center line) by 18 feet wide.

Rink surface elevation & slope

- Elevation: To be determined – similar to floor elevation of Cafe Pavilion
- Slope: TBD, adequate for surface drainage in non-ice periods, maximum slope of 1.5% is recommended

Rink slab

- Standard concrete, 4,000 PSI strength, decorative finish to be determined – options include tinting, exposed aggregate, decorative jointing, or stamped surface
- Refrigerated slab thickness: 6 inch, except dropped to 8" at expansion joints and 18" at header trenches

Refrigeration tubing

- Size: 1" I.D., at 3" spacing
- Type: Polyethylene, high density, with all fusion welded connections

Pipe spacers

- Steel pipe spacers at 3'-0" on center

Reinforcement

- No. 5 rebar at 1'-2" on center in both directions, plus wire mesh WWF6x6- W1.4 x W1.4 near surface of slab

Headers

- 4" and 6" polyethylene, fusion welded connections, located at approximate midpoint of each of the rink zones

Transmission mains

- 4" and 6" polyethylene, fusion welded connections, 3" extruded polystyrene insulation and PVC jackets
- All mains buried, with 8" to 24" cover

Temperature sensors

- Sensors at rink floor surface, return brine lines and within subsoil beneath the rink floor
- Digital temperature read outs in refrigeration equipment room

Insulation

- Two layers of 2" extruded polystyrene foam (4" total) below rink surfaces

Vapor barrier

- 6 mil polyethylene sheeting, taped joints, two layers under trail areas

Concrete sealer

- Clear solvent based siloxane penetrating sealer
- Matte finish
- Blocks pores to improve water repellency and alkali resistance

Foundation

- Well compacted granular material

Subsurface drainage

- Perforated corrugated polyethylene drain tile, 4" diameter. One tile on each side of the trail, plus additional tiles at 40 feet spacing in the free skating area

Surface drainage

- Minimal slopes will direct surface water to outside the perimeter edge of the rink where drainage system using trench drains or point drains will collect the water

Perimeter condition

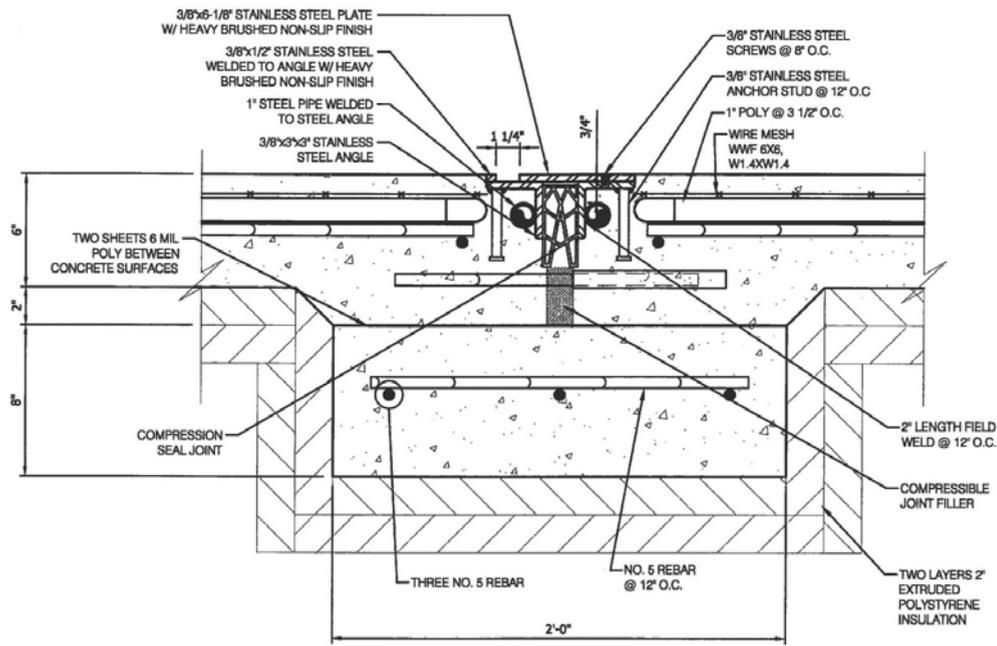
- Railing recommended at all edges to control access and to provide support for inexperienced skaters. Glass panels can be incorporated to reduce effect of wind on the ice sheet



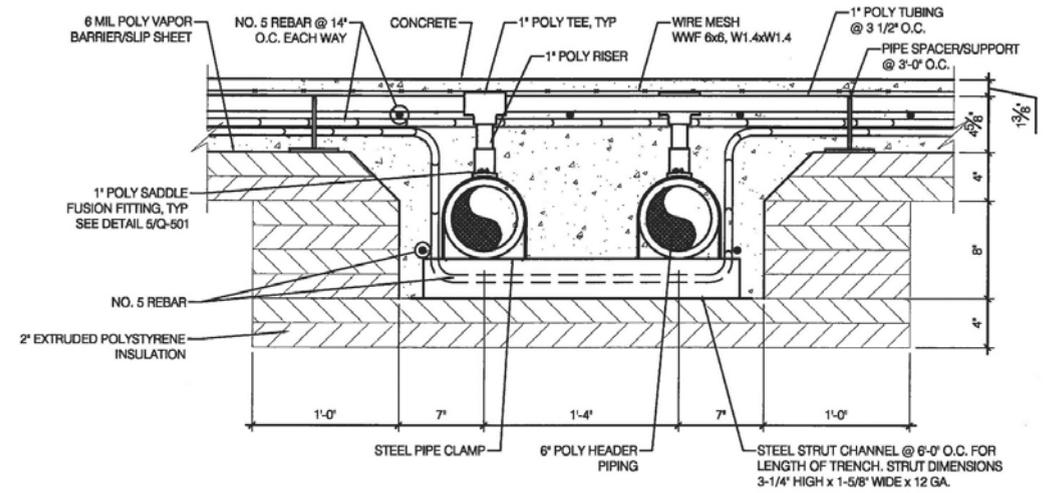
Dasher System / Millenium Park: Chicago, IL



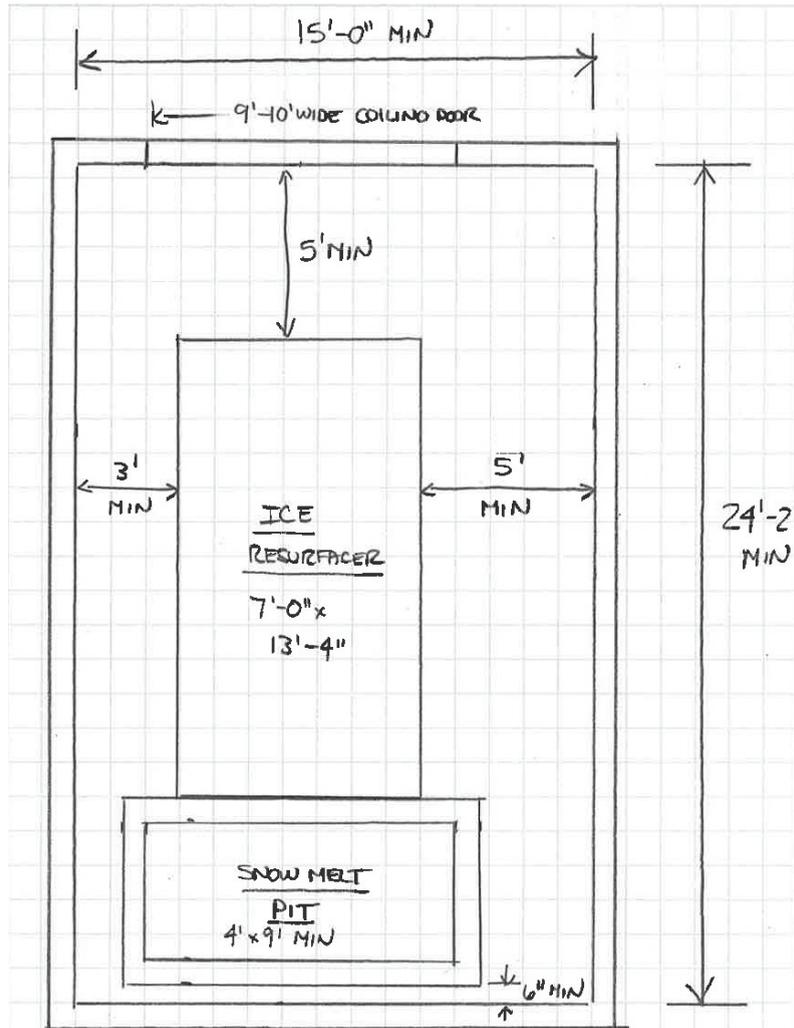
Dasher System / National Gallery of Art: Washington, D.C.



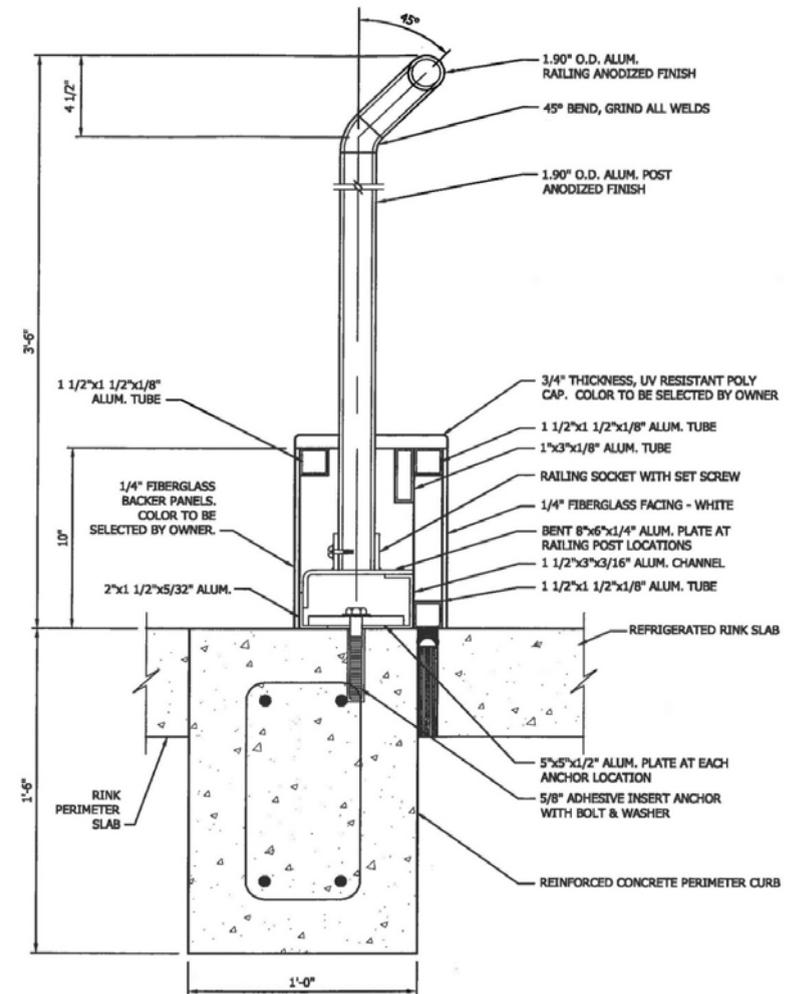
Typical Expansion Joint Detail / NTS



Typical Header Trench Detail / NTS



Typical Zamboni Storage Layout / NTS



Typical Rink Edge & Perimeter Railing System Detail / NTS

JERSEY PLAZA ICE RINK

DESIGN WEATHER DATA (FOR DESIGN OF FUTURE-PHASE REFRIGERATION SYSTEM)

- Wet bulb temperature - Max. design wet bulb TBD
- Dry bulb temperature - Max. Record High TBD (in March), Average High varies TBD
- Prevailing wind - Winter prevailing wind: TBD MPH, from the NW
- Maximum wind speed - TBD

FUTURE-PHASE REFRIGERATION PLANT

Below is criteria for the proposed Future Refrigeration System

General:

- Industrial quality components for energy efficiency and long life. R507 refrigerant is safe and is environmentally friendly.

System Capacity:

- 118 Tons (80 SF of ice per ton of refrigeration).

Primary Refrigerant:

- R-507.

Secondary Refrigerant:

- 1.21 Specific gravity calcium chloride/water solution.

Compressors:

- Industrial quality, recip. style, direct drive, 1,150 RPM.
- 0°F suction, 85°F discharge.
- Two 8 cyl. units, 59 tons each.
- Manufacturer – Vilter, Mycom, Bitzer, or equal.

Chiller:

- Flooded style, steel tubes, two pass.
- 118 Ton capacity at 1,100 GPM.
- Manufacturer - Chil-Con, Nickell, or equal.

Condenser Option 1:

- Evaporative condenser, ground mounted.
- Sized for TBD wet bulb temp., 85°F cond. temp.
- Low noise centrifugal fan, variable speed drive.
- Manufacturer - Baltimore Aircoil, Evapco, or equal

- Indoor water sump and pump.

Condenser Option 2:

- Air cooled condenser, ground or roof mounted.

Secondary Refrig. Pumps:

- Two equal sized rink pumps, each with variable speed drive, 1,100 GPM, 20 HP each. Only one pump runs at a time, 2nd pump for back-up
- Manufacturer – Bell and Gossett, Aurora, or equal.

Piping (Indoor above floor):

- Brine & R-507 piping - steel, Sch. 40 and Sch. 80, welded connections.

Controls:

- Compressors controlled by microprocessors, reading brine temperature in the return main from the rink.
- Condenser controlled by pressure controls, reading R-507 discharge pressure.
- Chiller level controlled by electronic level controller.
- Pumps variable speed drives controlled by brine temperature differential.

Snowmelt:

- 25 Ton shell & tube heat exchanger, using waste compressor heat.
- Circulating fluid - 35% Ethylene glycol/water solution.
- Pump – 72 GPM, 3 HP.
- Backup boiler required for colder days

Resurfacer Water Pre-heat:

- (2) Thermastore heat exchange/storage tanks

Insulation:

- Polystyrene foam insulation with PVC jacket on all cold pipes, vessels, pumps, and accessories.

Accessories:

- R-507 refrigerant leak detector.
- Automatic telephone dialer.
- Emergency shutdown alarms and controls.
- Serpentine snow-melt coil constructed of 2" copper piping.

QUALIFIED ICE RINK AND DASHER/RAILING CONTRACTORS FOR THE NEW PARK PROJECT

ICE RINK CONTRACTORS

Total Mechanical Services - Bruce Pylkas
420 Broadway Avenue
St. Paul Park, MN 55071
651-768-9367
totalmech.com

RinkTec International - Kyle Gillespie
310 East County Rd D
Little Canada, MN 55117
651-481-1190
rinktec.com

Ice Builders - Ron McHargue
4628 Crossroads Park Dr.
Liverpool, NY 13088
800-809-7465
icebuilders.com

DASHER/RAILING CONTRACTORS

Rink Systems – Stacey Overgard
1103 Hershey St.
Albert Lea, MN 56007
800-944-7930
rinksystems.com

Becker Arena Products – Jim Becker
6611 West Hwy 13
Savage, MN 55378
800-234-5522
beckerarena.com

Athletica/Sportsystems – Bob Vohnoutka
17200 Medina Rd, Suite 600
Minneapolis, MN 55447
800-809-7465
sportsystemscorp.com

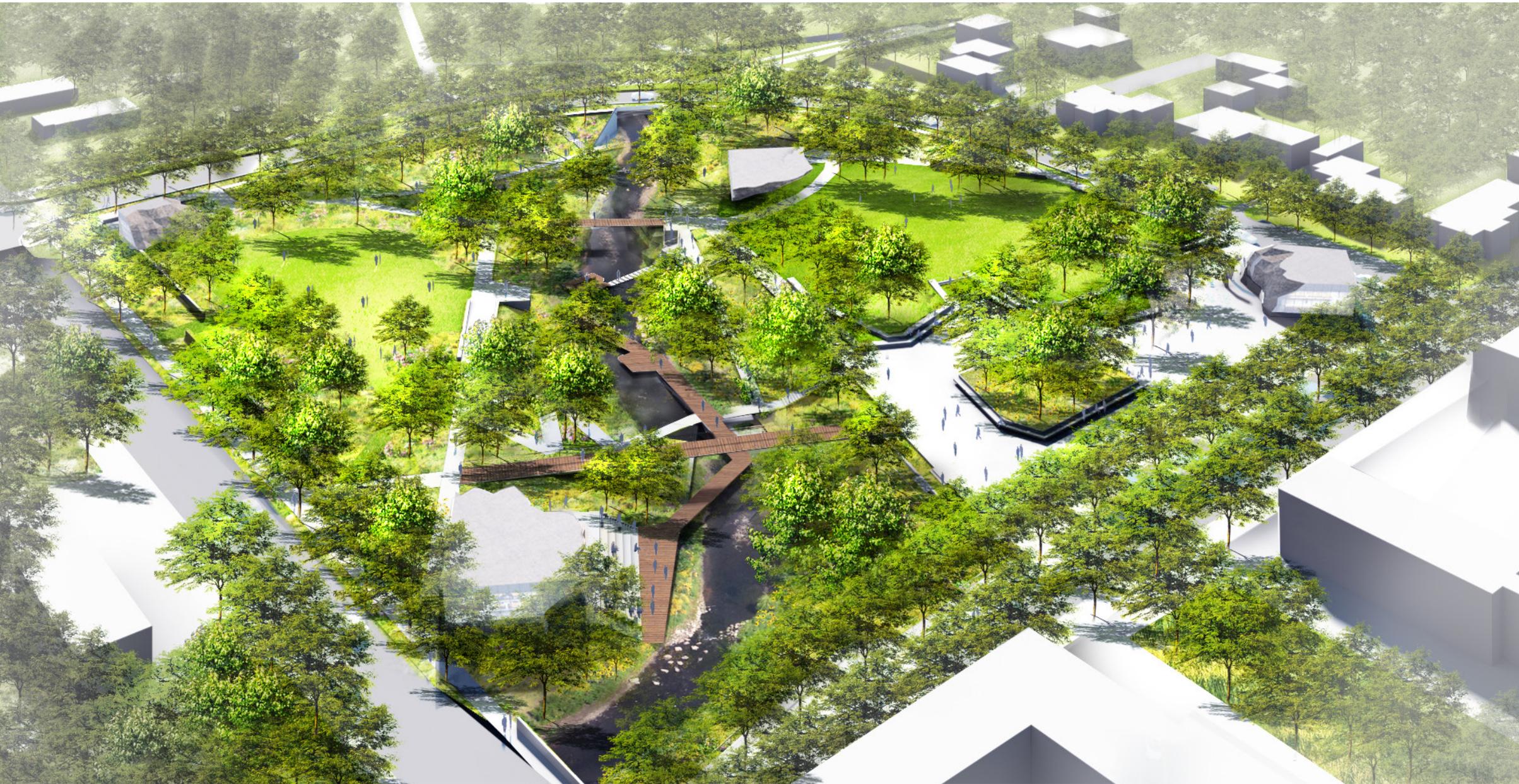


PROGRAM &

OPERATIONS

A PARK FOR ALL SEASONS





PARK PROGRAMMING

OVERVIEW OF PARK PROGRAMMING

A vibrant program of activities may be the most important factor for the long-term success of Grand Junction Plaza. Trees, gardens and lawns are the backbone of the park, but people are its lifeblood. Amenities and features will make the park experience great. People will be drawn to the park because other people are there – Grand Junction Plaza will become a center of community.

Successful programming will ensure that the park meets its primary goal of creating a regional destination and stimulating economic and social activity in Westfield. Programming will celebrate the local community and culture, encourage people to be healthier, provide opportunities for children to learn and experience the outdoors, create lasting memories and connect people through shared experiences.

Programming also:

- Attracts targeted audiences
- Draws visitors at specific times
- Makes news and generates community awareness
- Increases visitors
- Earns revenue

Park visitors make a vital contribution to the park's economic sustainability. Programming provides more reasons for people to visit the park. This is particularly important for Grand Junction Plaza, as it is intended to attract Grand Park users to extend their stays and travel beyond the park and into other parts of Westfield. Visitor traffic becomes a self-fulfilling prophecy. People help to attract other people who might stay away if the park was perceived to be unused and therefore unwelcoming; or too empty and therefore unsafe.

Both large and small events are important. Special events can attract thousands of visitors for a one-time event. Frequent low-impact events will provide continuous attractions for visitors that will strengthen and support the park's overall mission. More importantly, the continuous programs ensure the safety of the park and its neighborhood.

Unlike the construction of physical elements, programming is flexible and can be changed or implemented over a period of time to reflect changing visitors needs. Programs should ideally focus on what's appropriate for the site, both in terms of context and carrying capacity.

To compile an active programming schedule for a public space, a strong infrastructure must be in place. This section addresses the key elements of the infrastructure.

MISSION

Westfield's community can provide a basis for developing an innovative and exciting park programming schedule in which all will take pride. A strong programming mission statement will guide the development of a schedule that provides long-term benefits to the community and to the park. For example, Discovery Green in Houston, Texas is an urban park that serves as a village green, a source of health and happiness for citizens, and a window into the diverse arts and traditions that enrich life in Houston. Discovery Green also help dispute the notion that the downtown is not safe, no one is willing to go into downtown Houston. Now Discovery Green is one of the most heavily used public spaces in downtown Houston.

PARTNERS

Public ownership of the space begins with participation and investment. Grand Junction Plaza has begun engaging the public with the development of the park. Programming partnerships will extend community ownership of the new park. Programming partnerships should be sought with a wide variety of community organizations such as performing and visual arts, education, cultural identity, environmental awareness, literacy and literature, childhood development, senior citizens, fitness and healthy living, hiking and other outdoor activities, wilderness preservation, history, film, tourism and groups that work to study, celebrate, promote and improve Westfield. Many of these organizations can provide or advise on programming at

The new design creates areas for events of varying sizes while eliminating much of the existing asphalt surfaces. Figure 1 & 2 list designated event areas and their estimated carrying capacities.

GREAT LAWN AND STAGE PAVILION - AREA 1

This is the primary event area and can host the most spectators. The Great Lawn is oriented towards Pavilion 3, which will be used as the main stage. Pavilion 3 is expected to be fully equipped with sounds, lighting, and electrical needs. It is suitable for music and performing arts. The lawn area is approximately 40,000 SF and can accommodate 2,000-3,000 spectators.

TERRACED SEATING - AREA 2

The terraced seating faces the riparian corridor. This is the smallest performing area. The setup is to be determined. The terraced seating can accommodate approximately 115 people.

EVENT LAWN - AREA 3

The smaller event lawn area is approximately 10,000 SF. The “stage” area is a concrete pad that’s approximately 125 SF. The setup of the stage area is to be determined. The event lawn area is appropriate for smaller and more intimate events, as the lawn area can accommodate 500 - 750 people.

JERSEY PLAZA - AREA 4

Jersey Plaza, including the street is approximately 8,500 SF. This is the most ideal area for markets and any events (such as Food Truckin’ Thursdays) that will require heavier weight load and can accommodate more foot traffic. The number of tents and vehicles that can be accommodated is to be determined by the layout of the vehicles.

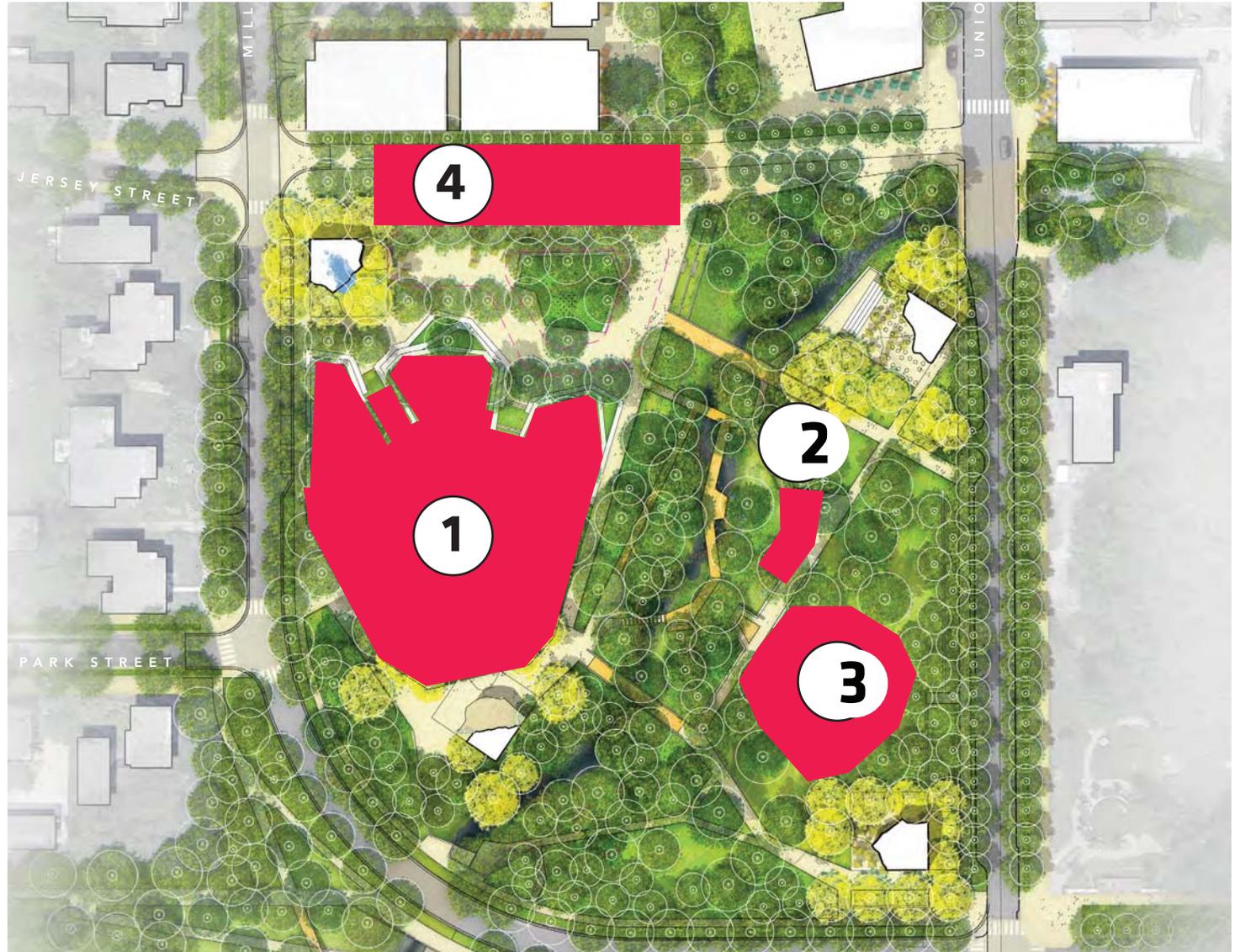


Figure 1: Event Areas

Key	Space	Unit	Available Space (100%)	Loss Space* (25%)	Usable Space (75%)	Capacity -- Standing (@10sf/person)	Capacity -- Seating (@15sf/person)	Recommended Events	Comments
1	Great Lawn	SF	40,000	10,000	30,000	3,000	2,000	Music and performing arts	Fully equipped pavilion with sounds, lighting, and all electrical needs
	Stage Pavilion	SF	500						
2	Event Lawn	SF	10,000	2,500	7,500	750	500	Music and performing arts	
	Concrete Stage	SF	125						
3	Terraced Seating	SF	230 LF				115	Small events	Assuming each person will take up 2LF
4	Jersey Plaza	SF	8,500					Festival/ market uses	May serve some events, food trucks, etc.

Figure 2: Event Areas Capacities

PROGRAMMED EVENTS

PARK SIZE + SPACES

A hierarchy of different spaces throughout the park allow for a myriad of activities. This program ranges from larger events of up to 3,300 people to small performances for local Playhouses. Jersey Plaza and the Lawn serve as the main flex spaces able to adapt to the many programmatic needs of Grand Junction Plaza.

MOVIES IN THE PARK

Movies will be played on a large screen on the Great Lawn. This space allows for comfortable seating, and in the case of concerts, large dense seating.

- Estimated Movie Audience Numbers: 1000-2000

SMALL PLAYHOUSE

Smaller productions and Westfield Playhouse Plays could happen in the smaller portion of the Prairie Meadow

- Estimated Audience Numbers: 500-700 Comfortably

WINTER FESTIVAL

The plaza transforms into both an ice skating rink but also a collection of wintertime vendors

- Estimated Audience Numbers: 1000-2000

FARMERS' MARKET

The Plaza will be set up for tents and other kiosks for local farmers to display and sell their foods and wares.

- Estimated Audience Numbers: 1000-2000

TRUCKIN' ON THURSDAYS

Food truck and local vendors will park on site and display their products in the Plaza

- Estimated Audience Numbers: 1000-2000



MOVIES IN THE PARK
People shown= 2,200 (seated) or 3,300 (standing)
~40,000 SF



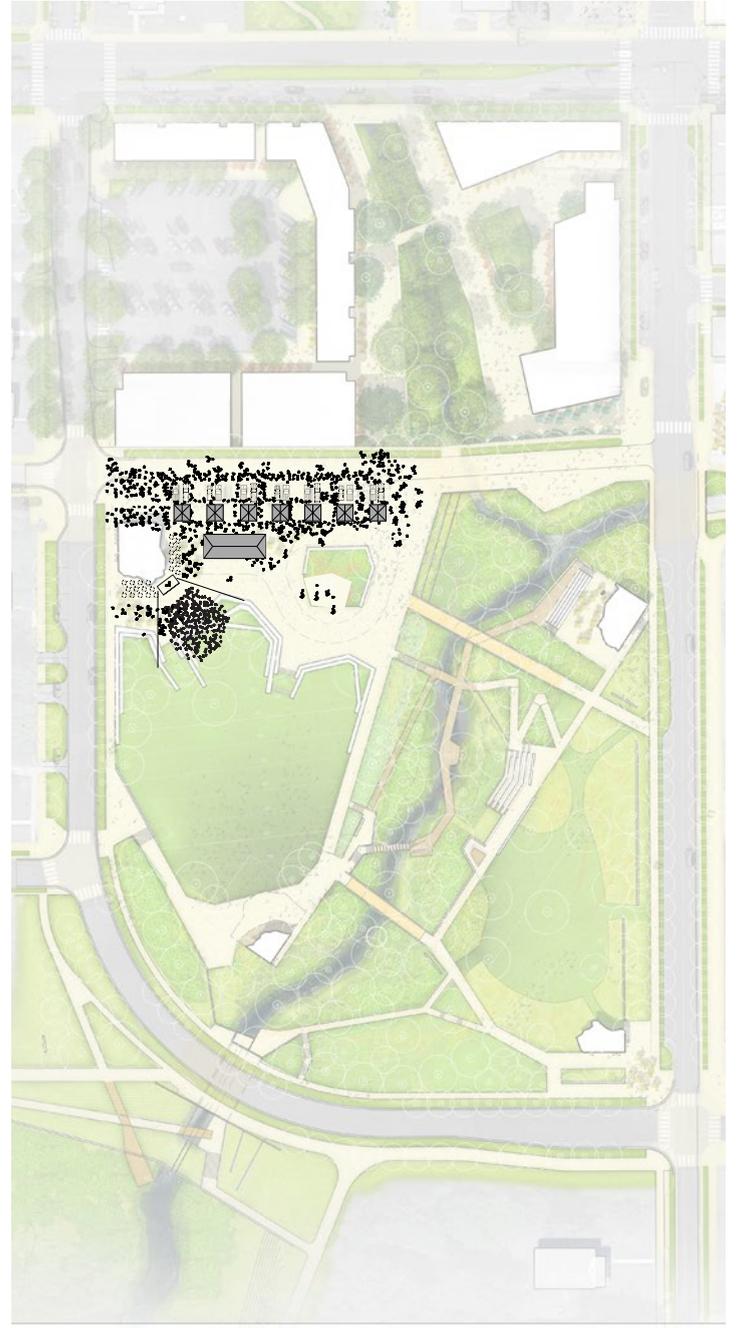
WESTFIELD PLAYHOUSE PLAYS
People = 300 shown
~10,000 SF



WINTER FESTIVAL
People = 900 shown



TRUCKIN' ON THURSDAYS
People = 1,300 shown



FARMER'S MARKET
People = 1,300 Shown

SPECIAL EVENTS GUIDELINES

TYPES OF EVENTS AND ACTIVITIES

Grand Junction Plaza will be active, with a variety of events scheduled and conceived to attract a diverse range of Westfield's citizens and visitors to the Park.

DAILY ACTIVITIES

Daily activities provide varied opportunities for non-sponsored, daily park use. These are baseline activities, where the users are consistently returning to the site and utilize its facilities. Examples of these types of events include:

- Jogging/Walking
- Picnics
- Play
- Cafe
- Chair Rental
- Pick-up field sports
- Bike rental

FREQUENT EVENTS

Frequent events are for adults, seniors, and children. Modest in scale and budget, these events may eventually attract sponsors or underwriters. The frequent events assist in "nudging" visitors who "need a reason" to come back to the Park. Examples are:

- Workshops
- Small-scale music series
- Lectures, classes
- Exercise/ fitness classes: yoga, zumba, pilates, etc.
- Social hours for adults
- Small performances and events, particularly by local schools and after-school groups
- Educational events, such as reading clubs or writing workshops
- Biking/hiking tours
- Exercise Classes
- Crafting in the Park
- Toddler time
- Lunch Lectures
- Big Band Dances
- Jazz Music Series
- Weekend Evening Concerts
- Art Exhibits
- Westfield Playhouse Plays

- Halloween Celebration
- Ice Skating
- Ice Sculpting
- Farmer's Market
- Holiday Market
- Social Sundays
- Truckin on Thursdays
- Happy Hours / Beer Garden

SEASONAL EVENTS

Seasonal events are single or a series of events that will draw significant audiences and require additional resources to produce, either from sponsorship, underwriting or other revenue source. They generally repeat themselves throughout certain months or seasons. Examples include:

- Movies
- Art performances
- Concerts
- Holiday festivals and celebrations such as Halloween Costume contest, Easter Egg Hunt
- Art performances
- Community oriented music festivals
- Cultural events
- Community Festivals
- Fire & Ice Celebration
- Share the Love
- Multicultural Festival
- Bicycle Rodeo / National Trails Day
- Concerts in the Park
- Emily Vott Foundation Fair
- Charitable Walks and Runs
- Fall Plant Sale
- Westfield Rocks the Fourth
- Shakespeare in the Park
- Summer in the Park
- Voices from the Past
- Follow the Drink Gourd
- Grand Junction Derby and Street Festival
- Westfield in Lights

OUTSIDE EVENTS

If so desired, outside event producers could potentially pay fees to license areas of the park for production of

public events. There will be a special event process for permitting of all outside events and published rules that all producers must follow. Examples of these events include:

- Community festivals
- Promotional events
- Large-scale concerts (free or paid admissions for "benefit performances" only)
- Charitable runs and walks

PRIVATE FUNCTIONS

Private Functions that are closed to the public can be held in certain areas of the park. Licensees will be required to pay fees and follow published rules. Examples of these events include:

- Private parties, weddings and other events
- Corporate receptions

SPECIAL EVENTS

Special events are important to a park's activity schedule and attract many visitors and can generate revenue for the park. Although large special events are important, they must be carefully planned, scheduled and operated. Despite the best efforts of park management and staff, special events can do a great deal of damage to the park landscape which must be quickly addressed to maintain the quality of the park.

For the purposes of this report, special events are defined as:

- One-time or annual events whose primary purpose is to entertain
- Primarily use the park as an event venue
- Usually have little or no connection to the park beyond its use as an event venue
- Can severely impact the park landscape

MARKETS

Markets help to generate community and provide opportunities for economic growth. Use of Grand Junction Plaza for farmers, holiday, and arts and crafts markets will be encouraged. Jersey Street is the most suitable location as it is designed to accommodate that particular type of traffic. The markets can be managed either by the city or a market operator can be found through an RFP process.

PROGRAMMING REVENUE

The park will see activity year-round. Designating programming periods of high activity and planning for periods of low activity will provide important benefits to the park and the people who manage it. While ETM recommended a preliminary weekly allowance for events and activities, realistically, it is much harder to program outdoor activities during winter months. Therefore, the budget should be flexible and focus on activity in warmer seasons.

PROGRAMMING RESOURCES

Production of a full programming schedule can be managed by a small park-dedicated staff with the proper equipment and extended team of “shared” city-wide staff, or contracted vendors, providing essential skilled services.

Programming equipment can be used by the park for its self produced events and generate revenue by renting to outside producers. A list of desirable equipment includes:

- Sounding and lighting system that is easily installed
- Film projector, media player and inflatable screen that can be used in multiple events spaces
- Portable or wireless sound system appropriate to amplify small events such as exercise classes and music play
- Chairs and bike rental
- Electrical equipment that allows access to pullboxes and three phase power (to be discussed)
- Marley floor for dance productions

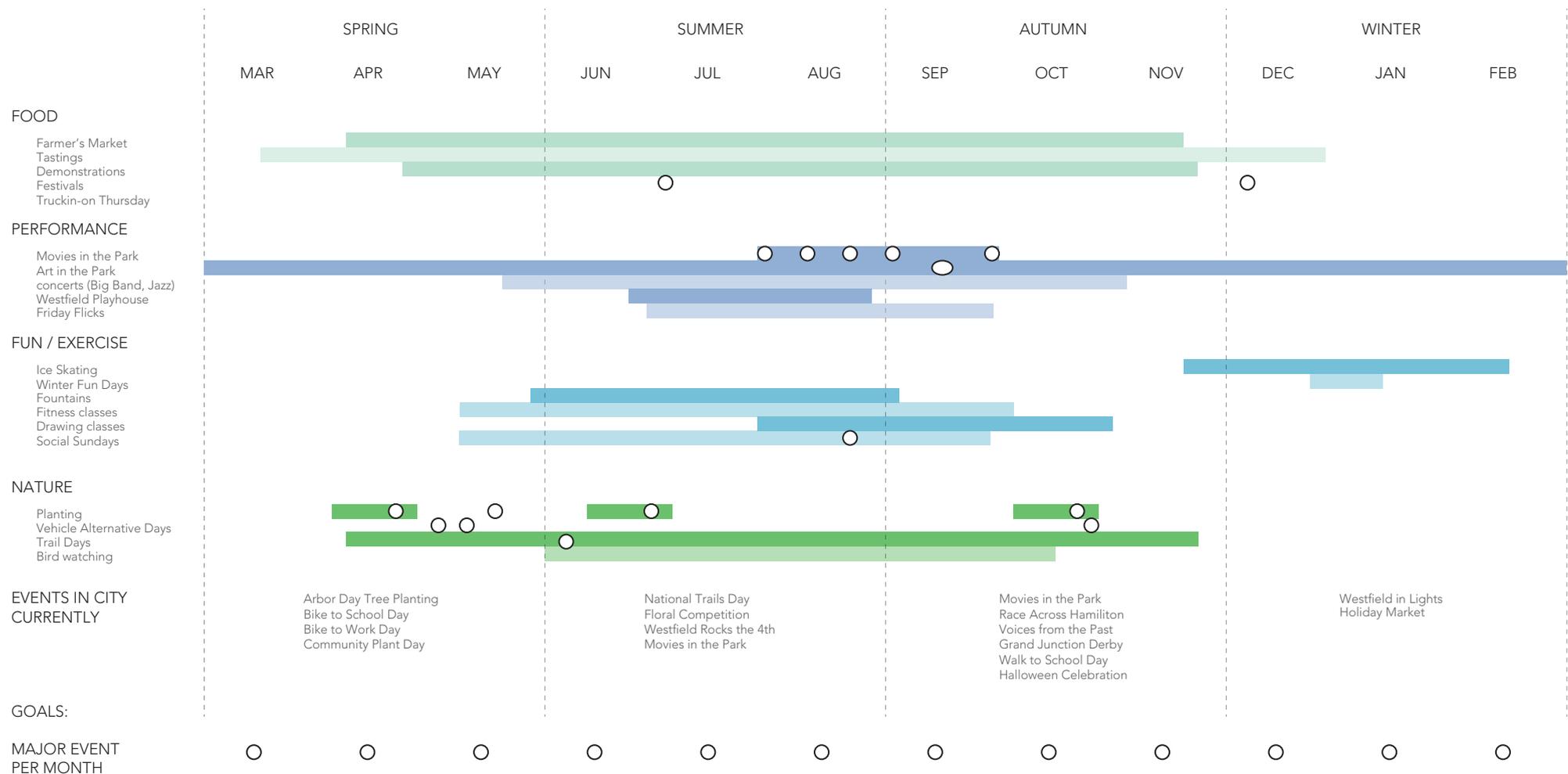
Providing proper, accessible storage in the park is essential. The benefits of owning this equipment can

be negated completely by inadequate storage that requires park staff to spend extra hours in transporting equipment to and from other areas.

STAFFING

The key members of the programming staff and time spent on programming tasks are as follows:

- Community Outreach Manager - City-wide staff
- Event Coordinator - City-wide Staff
- Activities Leader - Grand Junction Plaza dedicated staff
- Program Staff/Ambassador - Grand Junction Plaza dedicated staff



SPECIAL EVENTS GUIDELINES

POTENTIAL IMPACT OF LARGE SCALE OUTSIDE EVENTS ON THE PARK LANDSCAPE

Special event guidelines for Grand Junction Plaza should be developed. These guidelines should address frequency of scheduling, sound levels, vehicle paths and crowd size; these are some of the critical issues to be defined. Of course, the guidelines will be useless unless they are enforced. The Community Outreach Manager and Special Event Coordinator, along with program support staff will be responsible for ensuring that the guidelines are followed, before, during, and after events. Below are some important considerations for Grand Junction Plaza Special Event Guidelines.

Events must be managed carefully to prevent damage to the park. Large-scale outside events scheduled too frequently can negatively affect lawns and landscape areas due to overuse and lack of adequate time for maintenance and regrowth between events. The resulting overuse will result in compacted soil with spotty turf in place of a healthy stand of turf. Soil compaction is one of the first symptoms of overuse. The presence of vehicles on the lawns accelerates soil compaction. Compacted soil prevents the absorption of rainwater, deprives roots of oxygen, and limits root growth. As a result, turf surfaces lose their durability and anchoring capacity, becoming increasingly vulnerable to wear and tear. With continued overuse, the turf surfaces begin to wear thin, exposing the compacted subsoil underneath. Severe runoff can develop as rainwater erodes the exposed topsoil, eliminating any possibility of turf recovery.

Large-scale outside events that are not managed properly or are too large for the park contribute significantly to turf deterioration and increased maintenance costs. Before and after events, park users may spill over inadequate path systems leading to the site, creating compacted areas through the surrounding landscape and trampling adjacent landscape plantings.

Damage also occurs during set-up and clean-up. Tractor-trailers, vans, and other vehicles involved in event set-up and removal of stages, sound systems,

barricades, vendor tents, deliveries and other event support activities frequently drive off paved paths, adding to soil compaction and turf damage. Back-to-back events make it almost impossible to establish an adequate turf restoration plan. Lawns can't be regularly fertilized, irrigated, aerated, over seeded and rested. Park will have to limit the type and size of vehicles that can come onto the site and restrict their accessibility.

The venue license process must be managed carefully to allow adequate rest periods and to provide proper supervision of outside event producers to prevent damage to the park.

TYPE AND SIZE

No event shall be scheduled in an area if there are reasons to expect that the event will attract an audience that will exceed the maximum capacity of that area. All event areas will have capacity based on the landscape and type of event. Figure 2 in this section of the publication shows the potential carrying capacities of designated special event areas. Figure 1 shows the specific park special event areas.

SCHEDULING

Only one multiple day event that draws 2,000 or more people may be held in the same grass area within one calendar month. There should be at least one full week between each event. Spacing of events is required to allow recovery time for the turf. Heavily used lawns may be constructed using a reinforced fibrous additive that helps reduce soil compaction and improves drainage. This will help reduce compaction and permit more scheduled events. However, even reinforced turf lawns must be protected from overuse, particularly when lawns are wet and crowds are large.

Event lawns will be scheduled a maximum of 35 weeks/year with one week off per month, except during the two busiest months (July and August).

TIME LIMITS

All but large special events are limited to 3-5 days, in and out, including setup and cleanup. Large special event load-in and take down will be reviewed and approved by the Event Coordinator.

VEHICLES AND PRODUCTION TRAILERS

Vehicle and production trailer requirements will be reviewed and determined on an event-by-event basis. All vehicles are to remain on paved surfaces unless some type of protection of the lawn is used, such as cribbing or plywood. Vehicles associated with an event must be permitted and will be limited to those directly associated with the event. No personal vehicles will be allowed on the event site except as designated in the Parking Lots.

WEATHER

Wet turf is particularly susceptible to damage and compaction. To prevent damage to lawns, Grand Junction Plaza may close a lawn area to recreation or for special event use in the event the grass is wet. In addition, park lawn areas may be closed for seasonal renovations.

SECURITY + TICKETING

INVISIBLE SECURITY

The lawn and surrounding zones have been graded and shaped in a way that allows operators to effectively shut down this space for ticketed events and security. By simply providing guards at certain areas, the lawn becomes closed off and allows for revenue generation through ticketing.



A PLACE OF CELEBRATION





PRELIMINARY EVENT SCHEDULE

A variety of programs, activities and events will attract a diverse range of park visitors. It is recommended that Grand Junction Plaza create a series of repeating events and activities. The categories ETM recommends are as follow:

- Outside events - produce by outside vendors who wish to use Grand Junction Plaza as a venue space. Park is not responsible for any cost.
- City-Wide - events that take place throughout the city and use parts of Grand Junction Plaza as venues, No cost is assumed on the Grand Junction Plaza.
- Special Event - larger and intensive park program that could either utilize a section or the entire park. Special events do not happen very often, considering the associated cost and the extra manpower required. Special events can be produced by the City or a third party vendor.
- Healthy Living - events that promote fitness, health, exercises, and better living.
- Entertainment series - events with the goal to attract attendees from a wider region and provide fun for all age groups. This includes popular music concerts, films, etc.
- Community - events that target the local communities, families and children; and strengthen their relationship with the park. Community events are free to the public and are produced by local organizations who wish to use the Park as a venue.
- Enrichment - learning opportunities offered to both youth and adults.

Figure 3 shows a list of events that can take place in the park, when they should happen, and the likely audience. The list also includes the “wish list” by Westfield, however, the scales of some of the events will need to be scaled back, or altered in order to fit on site.

Daily Activities	Season	Time	Primary Age	Primary Audience
Jogging/ Walking	All	AM, lunch, PM	All ages	All
Picnics	All	Weekends	Families	Locals
Café	All	AM, lunch, PM	All ages	All
Chair rental	All	AM	All ages	All
Pick-up Field Sports	All	PM, weekends	Teens, adults	Locals
Bike rental	All	AM, Weekend	All ages	All
Frequent Events	Season	Time	Primary Age	Primary Audience
Exercise Classes	SP, SU, F	Weekdays, PM	Families	Locals
Crafting in the Park	All	Weekdays	Families	Locals
Toddler Time - weekly	SP, SU, F	Weekdays, PM	Families	Locals
Lunch Lectures	SP, F	Weekday Lunch	Adults	Nearby workers
Bandstand Music	SP, SU, F	Sunday PM	Families	Families
Outdoor Arts Series: painting, sketching, etc.	SU	Sundown	All ages	Locals
Photography Classes	SP, F	Saturday AM	Adults	Locals
Young Performers Series	F	Saturdays	Families	Locals
Open Mic: Poetry/Literature Readings	SP, F	Saturdays	Adults	Locals
Seasonal Events (Reoccurring)	Season	Time	Primary Age	Primary Audience
Lunchtime Concerts	SP, F	Weekday Lunch	Adults	Nearby workers
Friday Flicks	July-September	Fridays	All	Locals & Residents
Big Band Dances	SP, F	Wednesdays	Adults	Locals & Residents
Jazz Music Series	SP	Thursdays	Adults	Locals & Residents
Weekend Evening Concerts	SP, F	12 per year	Adults	Locals & Residents
Major Art Exhibit/Performance	SP	1 per year	All	Locals & Regional
Westfield Playhouse Plays	June-September	Weekly	All	Locals & Regional
Halloween Celebration	F	1 per year	Families	Locals
Ice Skating	W	3 months	All	Locals & Residents
Winter Ice Sculpting	W	1 per year	All	Locals & Regional
Farmers Market	June-September	Saturdays	All	Locals & Residents
Holiday Market	F, W	Weekly	Families	Locals & Residents
Social Sundays	May-September	Sundays	Families	Locals & Residents
Truckin on Thursday	All	Thursdays	All	Locals & Residents
Adult Happy Hours	SU	Tuesday PM	Adults	Locals & Residents

Figure 3: Program Calendar

Special Events	Season	Time	Primary Age	Primary Audience
Community Festivals	SP, SU, F, W	6 per year	Families	Locals
Fire + Ice Celebration	January, First Saturday	1 per year	All	Locals & Residents
Share the Love	February, First Saturday	1 per year	All	Locals & Residents
Multi-Cultural Festival	May, First Saturday	1 per year	All	Locals & Residents
Bicycle Rodeo/ National Trails Day	SU	1 per year	All	Locals & Residents
Concerts in the Park	June-August	1 per month	All	All
Emily Yott Foundation Fair	September, Third Saturday	1 per year	Families	Locals & Residents
Charitable Walks and Runs	SP, SU, F, W	6 per year	Young Adults	Locals & Residents
Fall Plant Sale	F	1 per year	Adults	Locals & Residents
Westfield Rocks the 4th (one of the venues)	4th July	1 per year	All	Locals & Regional
Shakespeare in the Park	SP	1 per year	All	Locals
Summer in the Park	August, First Saturday	1 per year	All	All
Voices From the Past	September, Second Weekend	1 per year	All	All
Follow the Drink Gourd	June, Second Weekend	1 per year	All	All
Grand Junction Derby and Street Festival	October, First Saturday	1 per year	All	All
Westfield in the Lights	December, First Saturday	1 per year	All	All

Figure 3: Program Calendar continued

PRELIMINARY EVENT SCHEDULE

SAMPLE CALENDARS

While Figure 4 suggests a list of events that can take place throughout the calendar year, it is difficult to understand how many events can actually take place and how far a \$1,000/week budget can go. It is important to understand that many variables can go into the pricing of these events and activities, but here are a few assumptions that were made to put together the sample calendars:

- The \$1,000/week allowance is a general guideline, as some weeks might have fewer activities than others, they will generally balance out at the end of the month. It is assumed that the summer months will be the busiest, whereas the winter months will have the fewest programs, while both spring and fall will have a modest number of events.
- Some special events on the calendars are produced by third party vendors, and therefore, not included in the weekly allowance.
- City-produced special events are estimated as the following: Friday Flicks \$600, small concerts with local artists \$800+
- Healthy Living: each event is approximately \$250
- Entertainment: \$300-500 per event
- Community: \$350 per event
- Enrichment: \$300 per event

The rates are approximately what Discovery Green in Houston has used for estimates. The City of Westfield will need to work with willing vendors and operators to negotiate a contract that will benefit both parties.

With these assumptions in mind, Figure 4 and Figure 5 show a snapshot of what kind of programs and events can take place during June and December.

JUNE / \$1,200 PER WEEK

Sunday	Monday	Tuesday	Wednesday	Thursday	Friday	Saturday
	1	2 HAPPY HOURS (\$400)	3 YOGA (\$250)	4 TRUCKIN ON THURSDAY	5	6 MARKET
7 SOCIAL SUNDAYS (\$500)	8 FAMILY YOGA (\$250)	9	10	11 TRUCKIN ON THURSDAY	12	13 MARKET FOLLOW THE DRINK GOURD
14 SOCIAL SUNDAYS (\$500)	15	16 LUNCHTIME LECTURE (\$350)	17 YOGA (\$250)	18 TRUCKIN ON THURSDAY	19	20 MARKET CONCERTS IN THE PARK
21 SOCIAL SUNDAYS (\$500)	22 FAMILY YOGA (\$250)	23	24	25 TRUCKIN ON THURSDAY	26 FRIDAY FLICKS (\$600)	27 MARKET
28 SOCIAL SUNDAYS (\$500)	29	30 OPEN MIC POETRY READING (\$350)				

OUTSIDE • CITY-WIDE • SPECIAL EVENT • HEALTHY LIVING • ENTERTAINMENT • COMMUNITY • ENRICHMENT

DECEMBER

Sunday	Monday	Tuesday	Wednesday	Thursday	Friday	Saturday
		1 ICE SKATING	2	3 TRUCKIN ON THURSDAY	4	5 HOLIDAY MARKET WESTFIELD IN LIGHTS
6 HOLIDAY MARKET	7 HOLIDAY ORNAMENTS CLASS (\$350)	8 HAPPY HOURS (\$400)	9	10 TRUCKIN ON THURSDAY	11	12 HOLIDAY MARKET
13 HOLIDAY MARKET	14 HOLIDAY ORNAMENTS CLASS (\$350)	15	16	17 TRUCKIN ON THURSDAY	18	19 HOLIDAY MARKET ICE SCULPTING
20 HOLIDAY MARKET ICE SCULPTING	21	22	23	24 TRUCKIN ON THURSDAY	25	26 HOLIDAY MARKET
27 HOLIDAY MARKET	28	29	30	31		

OUTSIDE • CITY-WIDE • SPECIAL EVENT • HEALTHY LIVING • ENTERTAINMENT • COMMUNITY • ENRICHMENT

Figures 4 & 5: Sample Calendars

REVENUE OPPORTUNITIES

PROGRAMMING REVENUE

Ideally, programming should be self-supporting and can ultimately generate funds for the maintenance of the park. Programming generates revenue through sponsorship, underwriting, ticket sales, concession fees and venue license income. A successful program also generates traffic to support commercial rents and connections to the community that support philanthropic giving, both of which are important elements of the long-term economic viability of the park. The strongest programming plan addresses all elements. Revenue opportunities might include the following:

DIRECT INCOME SOURCES

- Venue License Fees – paid by event producers for rental of park venues for events ranging from festivals and corporate events to small family gatherings
- Venue License Services and Rentals – fees paid by licensees for rental of park-owned items or services provided by park personnel
- Concession income – paid by vendors licensed to sell at single or multiple park events
- Ticket revenue – from events or attractions such as concerts, theatrical performances, etc.
- Corporate Sponsorships – marketing dollars paid for associating a brand or product with a park event. To attract corporate sponsorships, it is important to develop strong marketing tools, such as the website, email distribution list, social media, printed collateral, on-site signage, media sponsorship, media relations and advertising. Corporate sponsorship is based on a proven record of accomplishment, so it is important to develop a program fund to seed the first and second season while a track record is being developed
- Underwriting – Support by foundations and individuals for programs and events that demonstrate a value to the community
- Permit fees – fees paid by a wide range of park users for photography, video, and other special uses of the park, this could include commercial permits

INDIRECT INCOME SOURCES

Successful programming connects the park with audiences that will support generations of other revenue such as:

- Earned income from rents paid by long term tenants such as restaurants
- Gala and other fundraising events for the benefit of the park
- Philanthropic support from foundations and individuals
- Naming opportunities beyond the capital phase, such as pavers and plaques (to be discussed)
- Public fund drives to support park projects

However, it should be noted that it would take time until the park is able to reach the point when its programs can be self-supported and even generate funds. The City should consider setting aside a capital operating fund that allows the park to fine-tune its programs and provide opportunities for trials and errors.

EVENT FEES

Some areas within Grand Junction Plaza can be available (on a limited basis) for rental to outside entities for performances, parties, receptions, catered dinners and other special events. City may establish the rental fees within the amenities easement on its own, and these rates are intended to help support ongoing operations within the park. See Figure 6 for these fees. The fee structure is used for illustrative purposes only and is designed to facilitate further discussions in Design Development phase.

The rental fee for the Great Lawn and Pavilion 3 is set at a high level to discourage frequent large events in this space, which will tend to disrupt the entire park and cause some damage to grass areas. The fee is also set high for the parking lot area because the usage of that area will affect the general traffic and circulation.

Figure 6 provides preliminary rental fees for different areas of the park. Please note that higher fees will be required for events that occupy large areas of the

park because of their potential to disrupt daily activity within the park. This strategy is consistent with the management plan's focus on smaller daily activities rather than fewer very large events.

The fees listed below are for venue rental only. There will be additional charges for equipment rental, A-V rental, and event clean-up. In addition, all events of more than fifty participants will likely be required to hire an off-duty police officer (or officers for larger events).

All vendors providing equipment, A-V services, tents, furniture, catering and clean-up must be pre-qualified to work in the park to avoid damage to park features and to ensure safe operations and happy customers. There are exceptions to the fee schedule described in Figure 6:

- Non-profit organizations will receive a discount
- Management may extend discounts to key partners helping to achieve core objectives
- Management will determine license fees for live music events on a case-by-case basis

Key	Space	Preliminary Rental Fee
1	Great Lawn	\$2,000
2	Event Lawn	\$1,000
3	Terraced Seating	\$500
4	Parking Lot	\$2,500

Figure 6: Preliminary Rental Fees for Event Areas

REVENUE OPPORTUNITIES

PROJECTED INCOME AND OPPORTUNITIES

Without a confirmed programming calendar, it is difficult to determine the revenue that can be generated from events. However, there are a number of events and facilities that are proposed on site that will serve as revenue generators.

The estimated monthly rent from the Jersey Plaza Café is based on research and precedents on a number of food and beverage concessions throughout the country. Generally, a concession that will provide alcohol would generate a higher revenue. There are multiple ways for the park to operate its concessions, it can either be done in house, or done through an RFP. The licensing contract can be written in many ways in order to ensure that the City will get its fair share of revenues.

The rates for Food Trucks and Markets were based on the RFP from Philadelphia, PA and Highland Park, NJ.

The estimated Ice Skating revenue is based on research ETM has previously conducted, and numbers provided by Canal Park in Washington DC.

The projections are for illustrative purposes only, and are meant to facilitate further discussions. The numbers are conservative, and depending on how aggressively the City intends to program Grand Junction Plaza, the outcome can vary.

Activities/Events	Estimated Revenue (\$)	Comments
Revenue Opportunities		
Café Revenue	\$60,000	Placeholder, assuming \$5,000 per month for a site down restaurant -- comparable to Park Tavern at Canal Park
Food Trucks	\$27,300	Truckin on Thursdays 52 days @ \$75/day with 7 vendors
Farmers Market	\$5,950	From June-September, 17 days @ \$35/tent with 10 tents
Holiday Market	\$3,500	5 weekends, 10 days @ \$35/tent with 10 tents
Ice Skating	\$220,000	See Ice Skating Assumptions and Revenue Projections
Bike Rental	\$7,500	Placeholder
Chair Rental	\$5,000	Placeholder
Total Estimates	\$329,250	

Figure 7: Estimated Revenue Opportunities

Potential Revenue

Potential Revenue Sources		Assumptions	
Weekday Estimates			
Total # of weekday visitors	8,700		Assumes 10% of visitors are seasonal pass holders
Income from weekday admissions		\$10,875	25% adults
		\$16,965	65% children
Total # of weekday skate rentals	2,175		25% of visitors
Income from weekday rentals		\$21,750	
Weekend Estimates			
Total # of weekend visitors	11,500		Assumes 10% of visitors are seasonal pass holders
Income from weekday admissions		\$17,250	25% adults
		\$22,425	65% children
Total # of weekend day skate rentals	3,450		30% of visitors
Income from weekend rentals		\$34,500	
Other Incomes			
Lock purchases		\$3,030	5% of visitors
Bag Check		\$2,020	5% of visitors
Skate Sharpening		\$4,040	2.5% of visitors
# of seasonal admission pass purchased	50		
Income from admission pass		\$2,250	
# of seasonal rental pass purchased	50		
Income from seasonal rental pass		\$2,500	
# of seasonal admission + rental pass purchased	25		
Income from admission + seasonal rental pass		\$2,000	
# of lessons given	200		5 visitors per class
Income from lessons		\$10,000	
Shops Incomes			
Merchandise purchases		\$4,040	Assuming 10% of visitors will purchase gloves, socks, etc. At \$2 per purchase.
Food and beverages		\$25,250	Assuming 25% of visitors will purchase food items. At \$5 per purchase.
Rental Incomes			
Total # of Small Events	12		
Cost pp for 2-hour package	20		
Income from Small & Medium Events		\$6,000	Assumes an average of 25 participants/event @\$20 pp
Income from Large Events	3	\$12,000	Assumes an average of 40 people/event @ \$100 pp
Total # of Exclusive Event	1	\$15,000	Assumes 1 Exclusive Event @ \$15,000
Sponsorship		\$10,000	Placeholder
Estimated Total Revenue		\$221,895	

ICE RINK ASSUMPTIONS

The accompanying exhibit shows the projected uses and requirements of the ice skating rink equipment, operations, and supporting pavilion. See the chapter “Water and Ice” for additional information on the ice rink.



The Ice Rink at Canal Park: Washington, DC³⁵

Operating Assumptions for Ice Ribbon

Operating Assumptions		Comments
Operating Season		
Ribbon Size	9,800 sf	Based on design
Maximum Capacity of Ribbon	196	Assumed 50sf/person
Operating Season	December-February	13 week operating season
Operating days	Monday-Sunday	
Monday - Friday (Weekday)	noon -8:00 pm	
Saturday and Sunday (Weekend)	10:00 am - 10:00 pm	
Total Operating Weekdays	65	
Total Operating Weekend days	26	
Inclment Weekdays	7	Assumed 10%
Inclment Weekend days	3	Assumed 10%
Net Operating Weekdays	58	
Net Operating Weekend Days	23	
Usership		
Estimated average # of weekday users	150	
Estimated average # of weekend day users	500	
Estimated total weekday users	8,700	
Estimated total weekend users	11,500	
Estimated Total visitors	20,200	
Facilities		
# of skates available for rent	250	
# of Lockers	144	
Bag Check area	125 sf	
Revenue		
Admission	\$5	\$5 per adult, \$3 per child
Skate Rental Fee	\$3	
Lockers	FREE	
Locks	\$3	Lock Purchases
Bag Check	\$2	
Skate Sharpening	\$8	
Lessons (per 1 hour group class)	\$10	
Seasonal admission pass	\$45	For admission
Seasonal rental pass	\$50	For skate rental
Seasonal admission + rental pass	\$80	For admission and skate rental
Events		
Small & Medium Events	12	Birthday parties 15-30 children
Large Events	3	Up to 50 people
Exclusive Event (Ice Ribbon closed to public use)	1	Ice Ribbon closed to public use
Sponsorship		Some sponsorship assumed

Prepared by: ETM ASSOCIATES, LLC

HYDROLOGY

WATERSHEDS

REGIONAL WATERSHEDS

Grassy Branch Creek on the site is a sub watershed of the Cool Creek. Grassy Branch flows down into the Cool Creek Watershed which eventually connects to White River. To maintain water quality and habitat health, the flow of these watersheds were made a design priority, and studied by LAND COLLECTIVE and Flatland Resources.

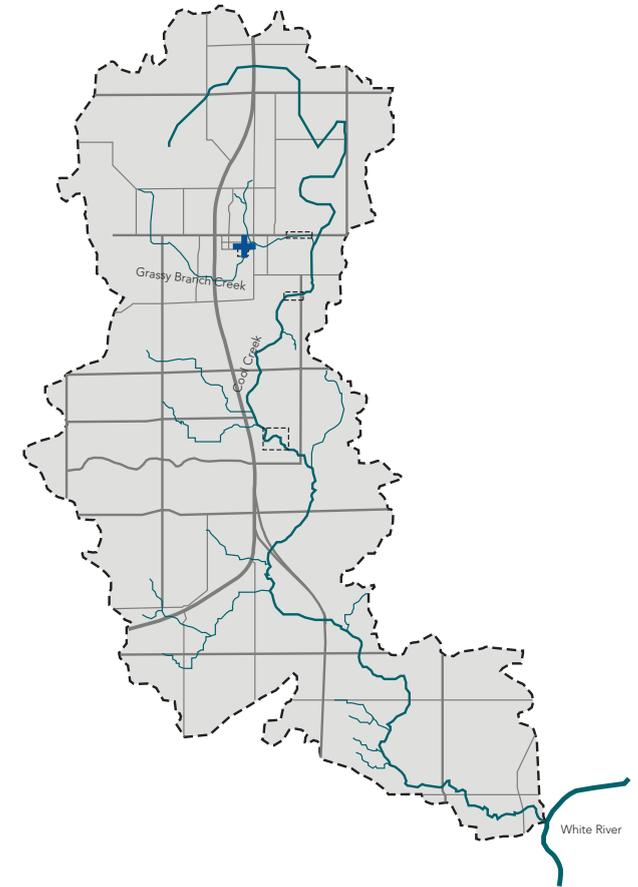
SITE FLOODING

A significant area of the project site is within the 100 year flood elevation. LAND COLLECTIVE's scheme increases a small amount of the flood capacity at the 50 and 100 year flood intervals. The existing culvert (and future retention basin embankment) under the former railroad embankment acts as a constrictor in the flow of Grass Branch. As a result, water levels of the stream channel have a controlled release for rain events approximately 7 year frequencies and less. This will minimize the number of times that the trail goes under water in the park. With rain events greater than 7 year frequencies, the trail in the lower areas will flood. LAND COLLECTIVE's design recognizes these flood frequencies.



- White River Watershed
- Upper White River Watershed
- Cool Creek Watershed

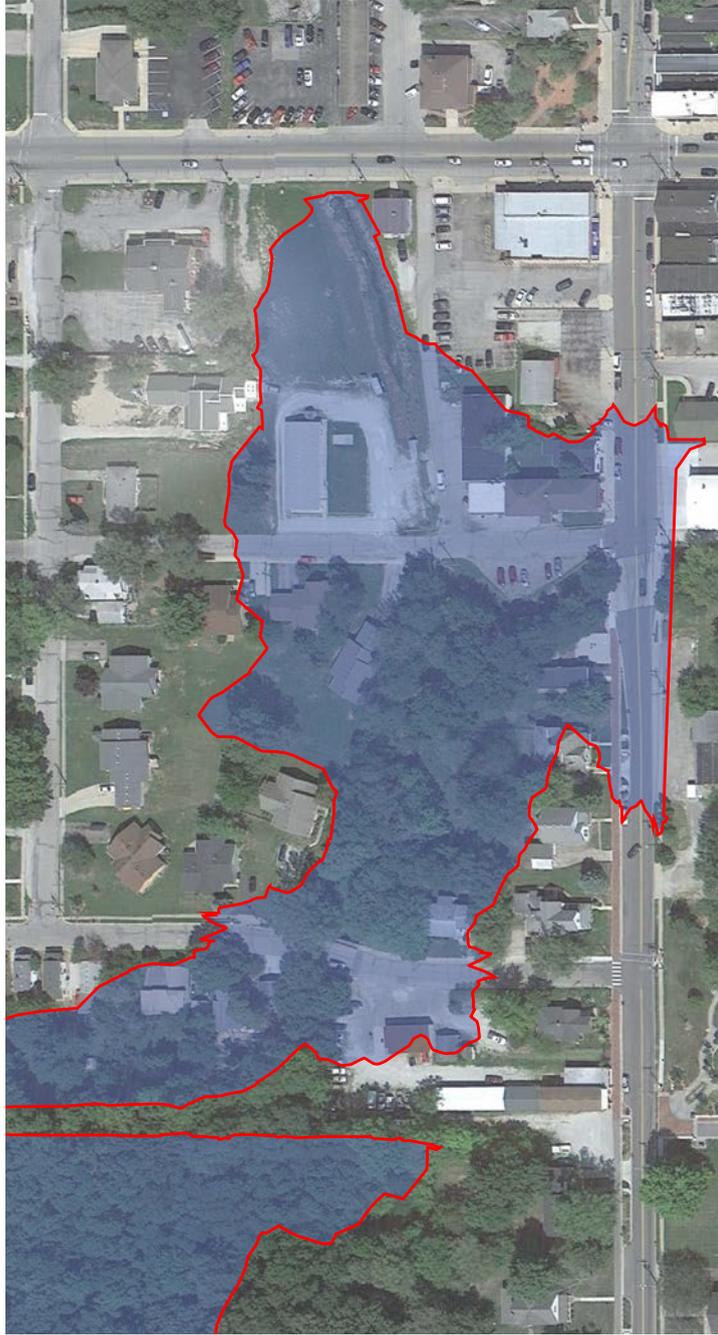
Indiana Watersheds



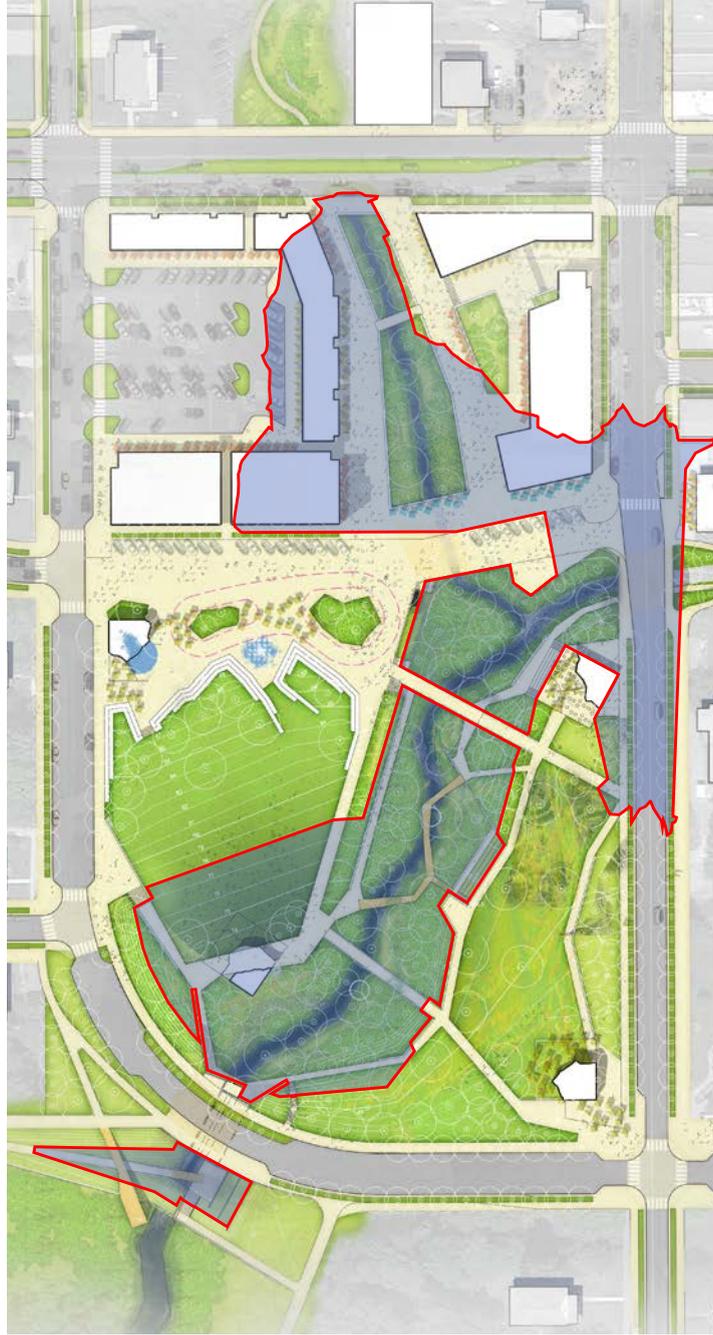
- Creeks, Rivers
- Roadways
- Problem Zones

Cool Creek Watershed

FLOODPLAIN



Current Floodplain - 100 Year Flood Extents



Concept Design Scheme - 100 Year Flood Extents

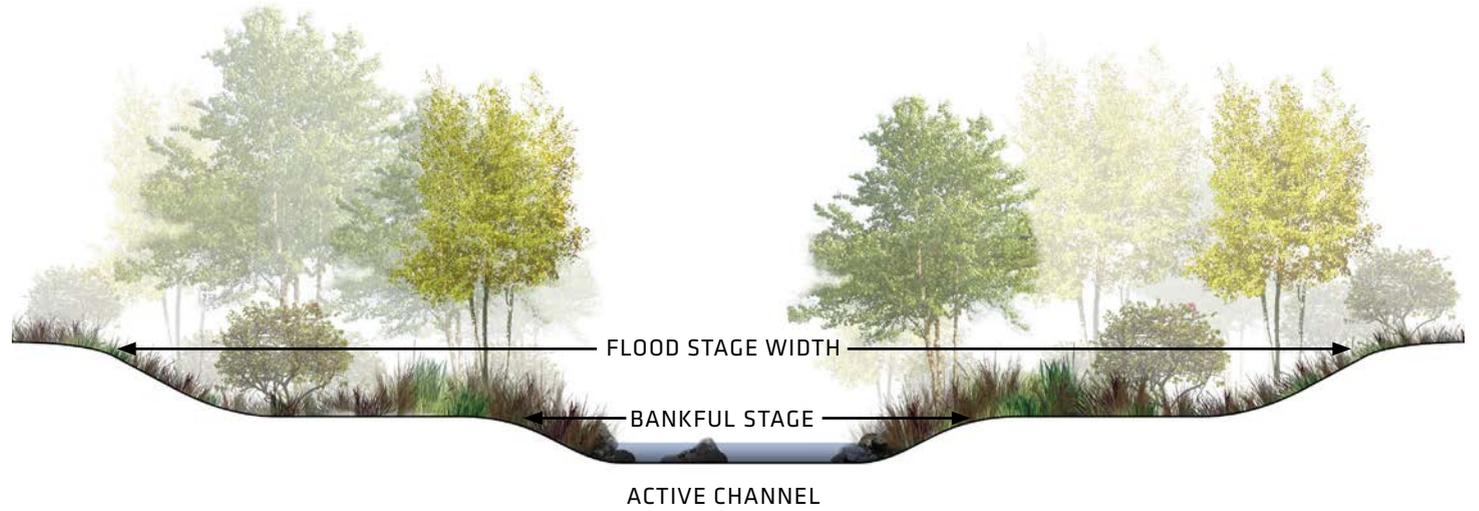


Schematic Design Scheme - 100 Year Flood Extents

RIPARIAN CORRIDOR

CREATING HABITAT THROUGH STREAM TYPE CHANGES

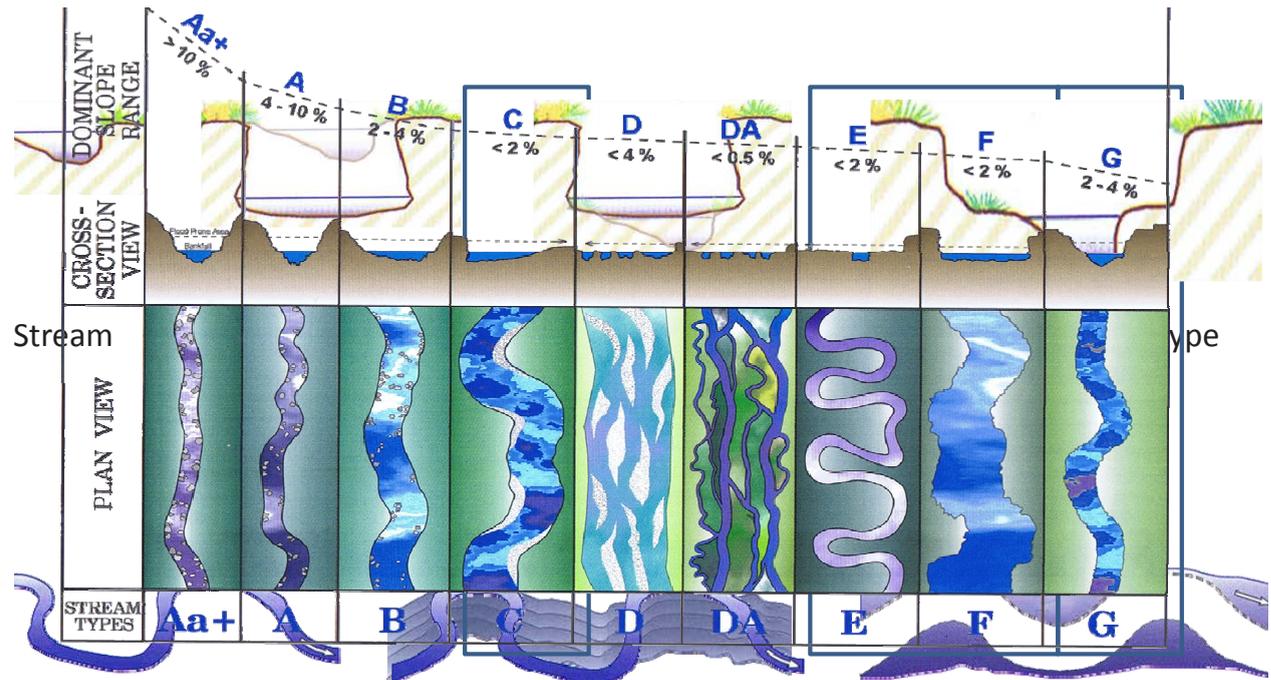
LAND COLLECTIVE's scheme will enhance the "C" type stream. (Based on Rosgen Stream Classification's methodology.) The current channel leans towards being an "F" type stream due to anthropomorphic hydro modifications: "man-made ditching." The floodplain benches of Type "C" streams in nature typically have billabong or depressional wetlands. Returning the stream and the floodplain to its natural "C" channel, will enhance the ecological imprint on the site, and create a place for people to visually and physically access the stream. The creation of depressional wetlands will contribute to the City of Westfield's goal of mitigating storm water runoff at a city-wide level, which is especially important in the face of burgeoning neighborhood development. The wetlands will be designed to treat storm water run-off.



Proposed Cross Section of Type "F" Stream

SINUOSITY

Sinuosity is calculated by the ratio of stream length over valley length. The closer the sinuosity is to 1, the straighter the stream or river is. Grassy Branch is classified as a F4 or Entrenched E4 stream (D. Rosgen), and therefore the sinuosity should range from >1.2 for an "F" stream type and >1.5 for an "E" stream type. The stream type for this site should be a "C". Final adjustment and alignment of the channel at Grand Junction Plaza will reflect a balanced "C" channel and its dimensional relationships: Min/Max meanders and meander belt widths.



Longitudinal, Cross-Section and Plan Views of Major Stream Type





LANDSCAPE

E TYPOLOGIES

THE REGIONAL LANDSCAPE



WOODLAND



RIPARIAN CORRIDOR



PRAIRIE

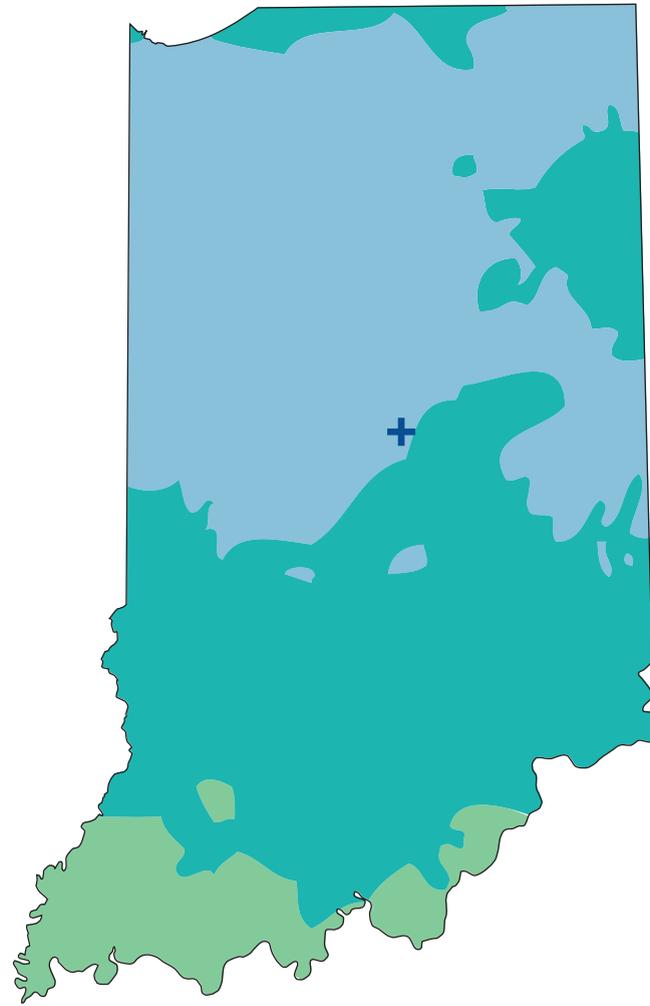


CULTIVATED FIELDS

LANDSCAPE TYPOLOGIES

On the USDA Plant Hardiness Zones delineation, Westfield straddles zones 5b and 6a (the average annual minimum temperature ranges between -15° F and 0° F). Only plants that can tolerate these minimum temperatures should be used in the landscape. However, microclimate variations and the presence of snow/salt can influence the survivability of plants.

The climate of Indiana and the Hardiness zones lead to four generally recognizable regional landscapes: woodland, riparian corridor, prairie, and cultivated fields of the Jeffersonian grid.



USDA PLANT HARDINESS ZONES



LANDSCAPE TYPOLOGIES

Drawing inspiration from regional landscape typologies of Indiana, the park incorporates vital ecologies into the design. The Riparian Corridor becomes the key feature in the center of the park that allows for successional landscapes to develop around it.

WOODLANDS

Historically, native forest types included Beech, Oak Sugar Maple, Elm and Ash Swamp Forests, and White Oak Woodlands.

PLAZA TREE GROVE

The urban edge of Jersey Plaza is where the Park meets the civic realm, and will be comprised largely of street trees in paving.

RIPARIAN CORRIDOR

Dynamic riparian corridors weave through the state, weaving through woodlands, agricultural land and urban areas alike. Healthy riparian corridors are lined with uniquely adapted and non-invasive plant species and provide habitat.

WETLAND

At one time, 25 percent of Indiana was covered by wetlands. Wetlands are areas where water covers the soil, or is present either at or near the surface of the soil for part or all of the year.

PERENNIAL GARDENS

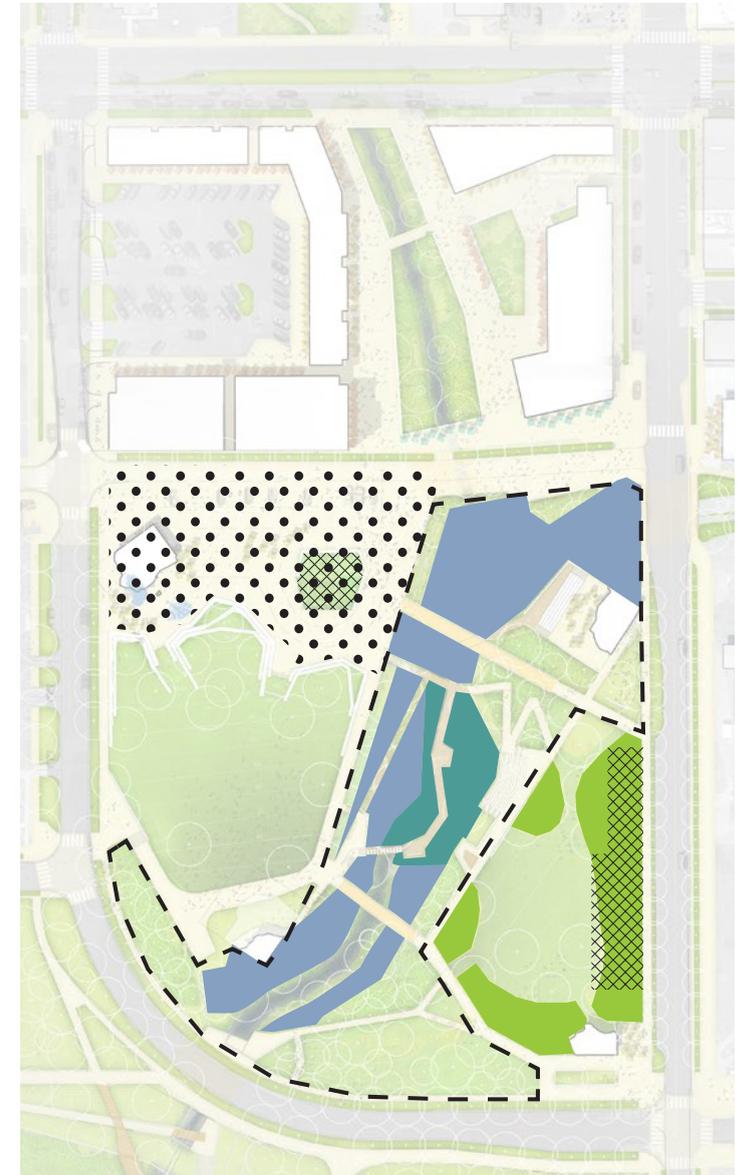
In the context of the park, cultivated groves and gardens will help define the edge between what is more urbane and what is truly park. Perennial borders will showcase seasonal, cultivated planting in broad sweeps for a floriferous effect and a cultivated edge. Agriculture is the largest land use in Indiana; there are 15,000,000 acres of cultivated land, which amounts to approximately 64% of total land area of the state.

PRAIRIE PLANTING

Prairies are endemic to Indiana, mostly in the Western and Northwestern areas of the state. Less than one percent of the original prairies remain, having been converted to cultivated land. Additionally, the suppression of the native fire regimes has led to succession, which has transformed many of these grasslands into forested areas.

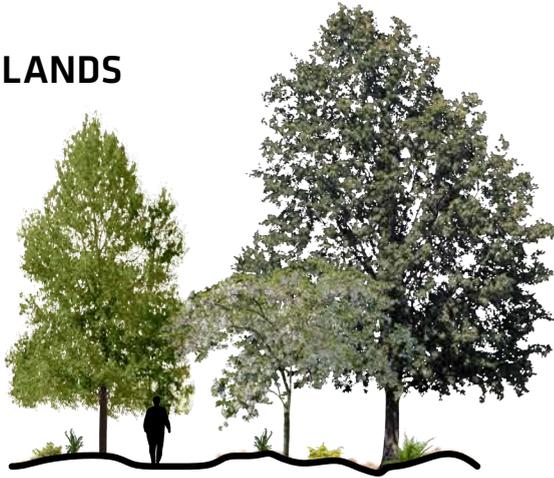
SPECIMEN TREES

Each one of the pavilions features a distinct specimen tree that distinguishes itself throughout the seasons, with fall color and spring blooms



-  Woodlands
-  Plaza Tree Grove
-  Cultivated Landscape
-  Riparian Corridor
-  Wetland
-  Prairie Plantings

WOODLANDS



Podophyllum peltatum | Mayapple



Smilacina racemosa | Solomon's Plume



Spigelia marilandica | Indian Pink



Lindera benzoin | Spicebush



Viburnum dentatum | Arrowwood/Viburnum



Adiantum pedatum | Maidenhair Fern



Osmunda cinnamomea | Cinnamon Fern



Acer saccharum | Sugar Maple



Ulmus americana | American Elm



Quercus alba | White Oak



PLAZA TREE GROVE



Ulmus americana | American Elm



Prunus Subhirtella | Fall Flowering Cherry



Koelerutera paniculata | Golden Rain Tree



Tilia cordata | Little-leaf Linden



Acer rubrum | Red Maple



Liriodendron tulipifera | Tulip Poplar



Aesculus hippocastanum | Horse Chestnut



Cymocladus dioica | Kentucky Coffee Tree



Gleditsia triacanthos | Honey Locust



Quercus alba | White Oak



LANDSCAPE TYPOLOGIES

RIPARIAN CORRIDOR



Lobelia cardinalis | Cardinal Flower



Eupatorium purpureum | Joe-Pye Weed



Asclepias incarnata | Marsh Milkweed



Betula nigra | River Birch



Cercis canadensis | Eastern Redbud



Salix bebbiana | Bebb Willow



Carex aquitilis | Water Sedge



Carex stricata | Tussock sedge



Amelanchier laevis | Serviceberry



Nyssa sylvatica | Black Gum

WETLAND



Iris fulva | Copper Iris



Hibiscus moscheutos | Swamp Rose Mallow



Clethra alnifolia | Summersweet



Carex stricata | Tussock sedge



Cephalanthus occidentalis | Buttonbush



Typha minima | Cattail



Carex aquitilis | Water Sedge



Filipendula rubra | Queen-of-the-Prairie



Veronia altissima | Tall Ironweed



Ilex verticillata | Winterberry Holly



- Woodlands
- Plaza Tree Grove
- Cultivated Landscape
- Riparian Corridor
- Wetland
- Prairie Plantings

PERENNIAL GARDENS



Platycodon grandiflorus | Balloon Flower



Aster macrophyllus | Big Leaf Aster



Echinacea purpurea | Coneflower



Rudbeckia maxima | Large Coneflower



Hamamelis x Intermedia | Witch Hazel



Panicum virgatum 'Shenandoah' | Switchgrass



Baptisia australis | Blue False Indigo



Amsonia hubrichtii | Blue Star



Calamagrostis x acutiflora | Feather Reed



Rhus typhina | Staghorn Sumac



PRAIRIE



Rudbeckia hirta | Black-Eyed Susan



Echinacea purpurea | Coneflower



Platycodon grandiflorus | Balloon Flower



Baptisia australis | Blue False Indigo



Zizia aptera | Golden Alexander



Bouteloua curtipendula | Sideoats Cramma



Andropogon gerardii | Big Bluestem



Amsonia hubrichtii | Blue Star



Panicum virgatum | Switchgrass



Physotegia virginiana | False Dragonhead



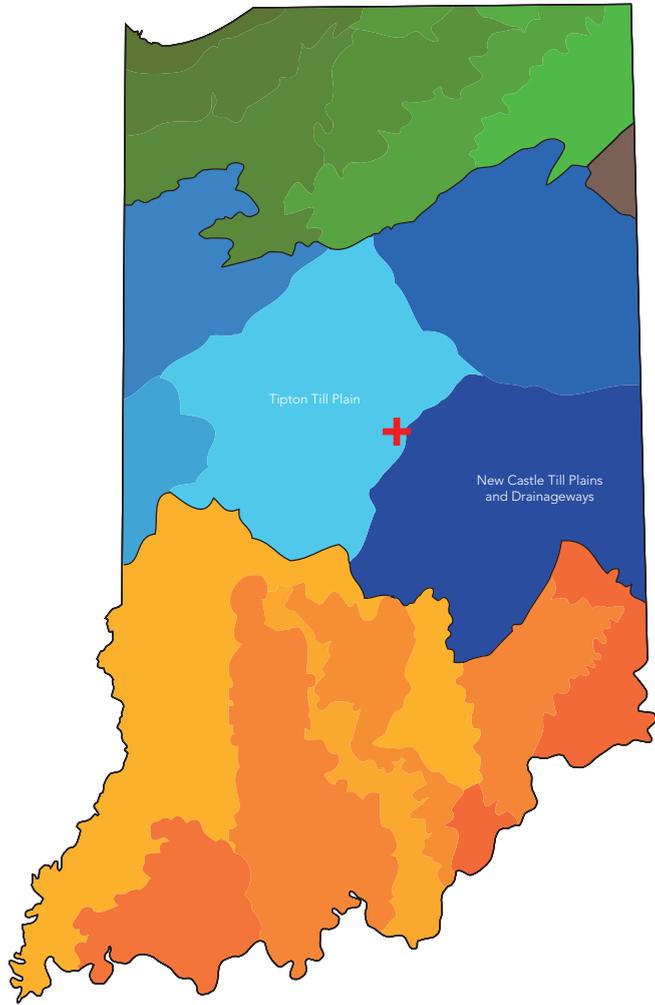
SITE ANALYSIS

PHYSIOGRAPHY & GEOLOGY

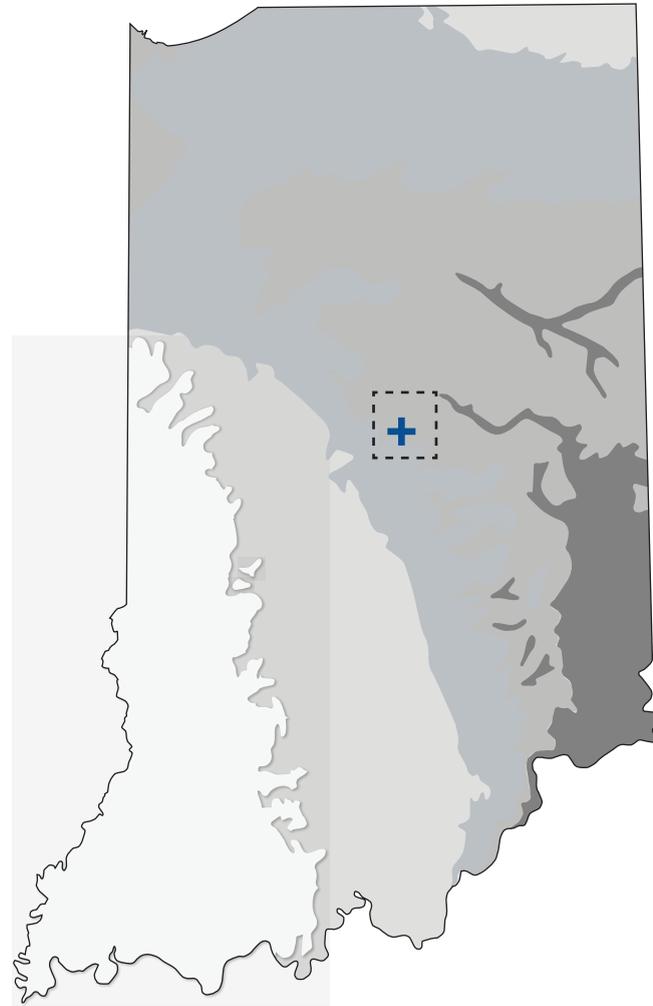
The geomorphology of Indiana is divided into four main regions, with the city of Westfield sitting in the Central Till Plain Region. This region is characterized by gently rolling hills and topography created by the retreating glaciers.

Below the surface, Westfield sits on shale and limestone from both the Devonian Age and the Mississippian age. The bedrock has been buried in most of Indiana by the unconsolidated materials left after the glacier retreat.

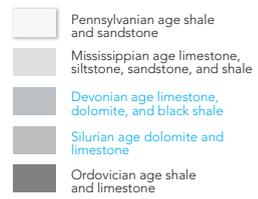




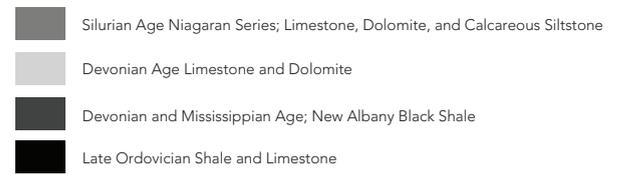
PHYSIOGRAPHY



BEDROCK TYPES



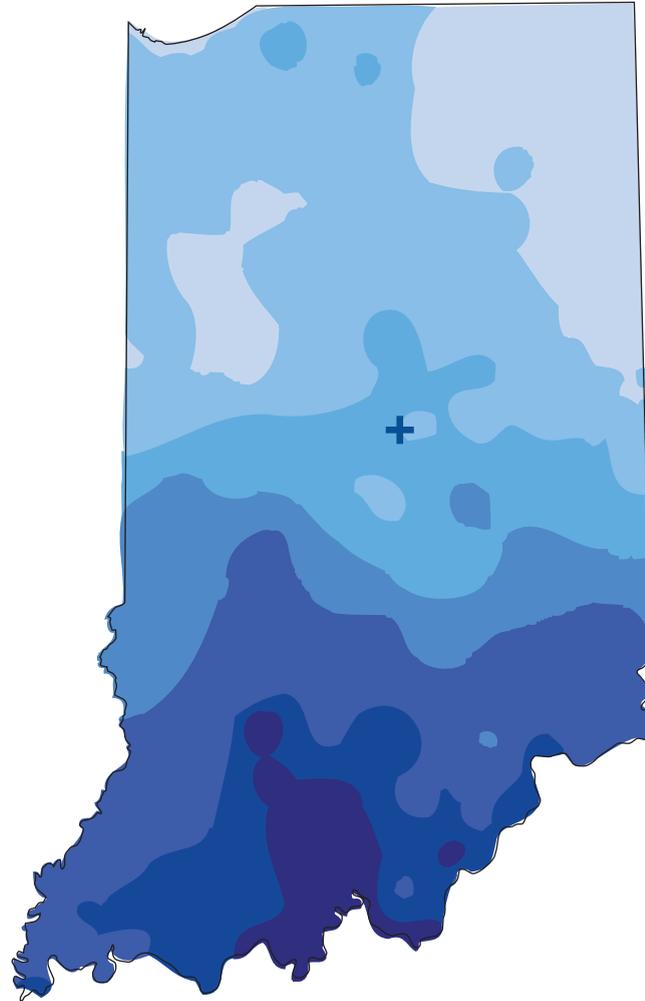
HAMILTON COUNTY BEDROCK TYPES



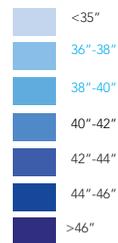
CLIMATE

Indiana has a humid continental climate, with cold winters and warm wet summers. Annual rainfall ranges between 38"-42". The average temperature high in the summer is about 87° F and an average low in winter of about 17.9° F. The winds come from the south and southwest for most of the year.

These conditions allow for four distinct seasons in Indiana. The actual growing season lasts approximately 155 to 180 days. In the winter, there is generally an excess of precipitation, while in the summer a deficit. It is therefore beneficial to capture and store as much water as possible for use on-site to reduce the loss of usable water and the need for importing potable water for non-potable uses, such as irrigation.



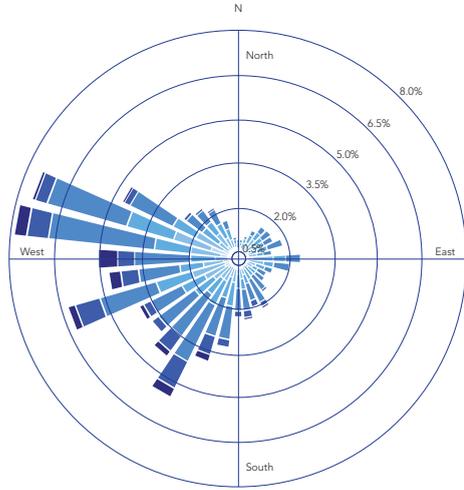
PRECIPITATION AMOUNTS



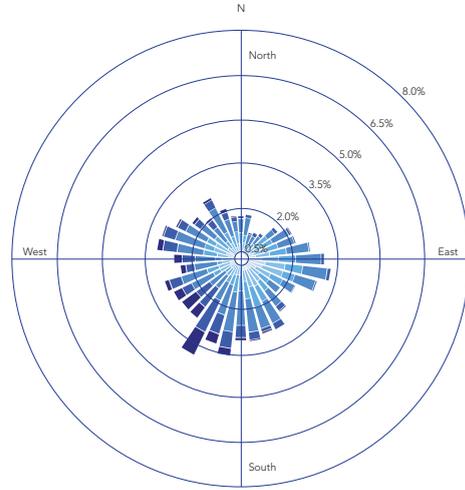
AVERAGE FIRST DAY BELOW 32° FAHRENHEIT OR LOWER



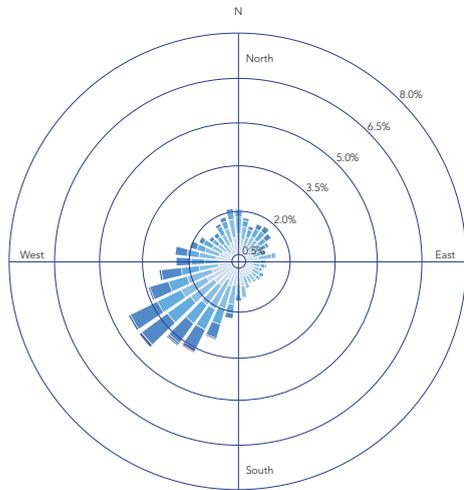
CLIMATE



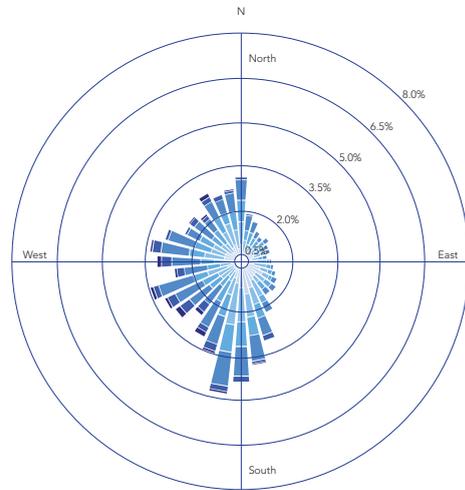
WINTER



SPRING

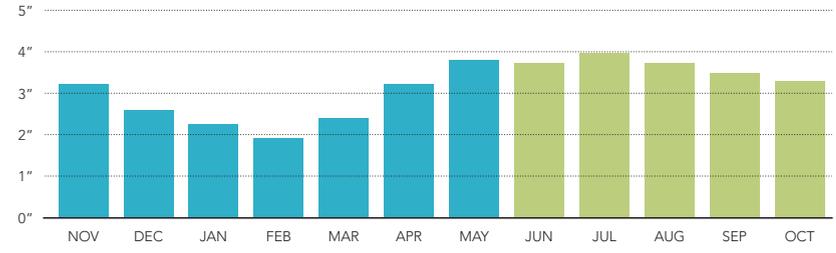


SUMMER



FALL

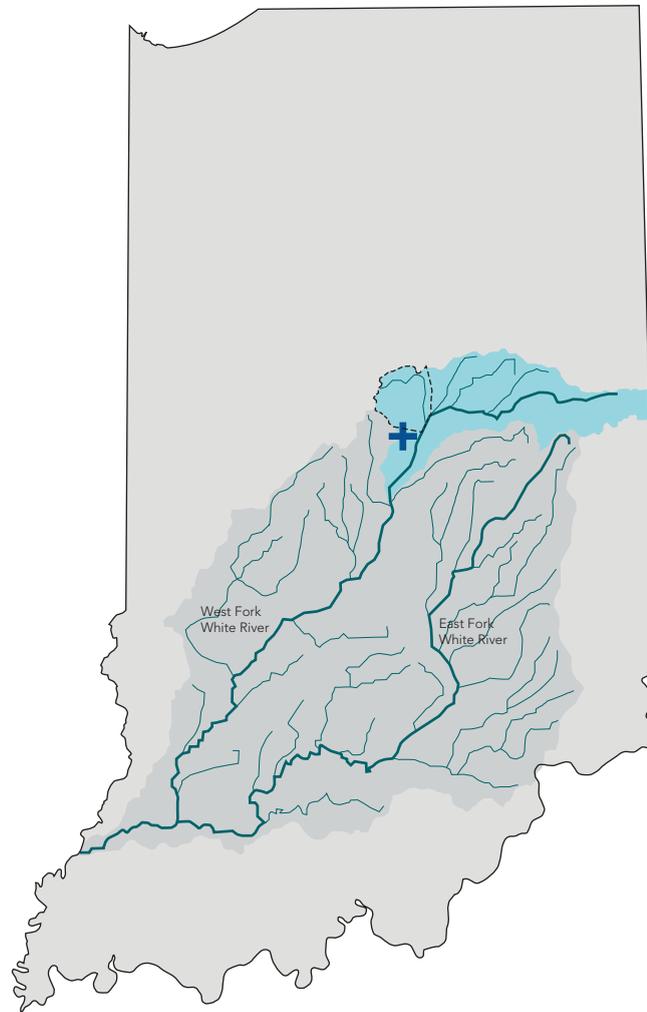
WIND ROSES



WATERSHEDS

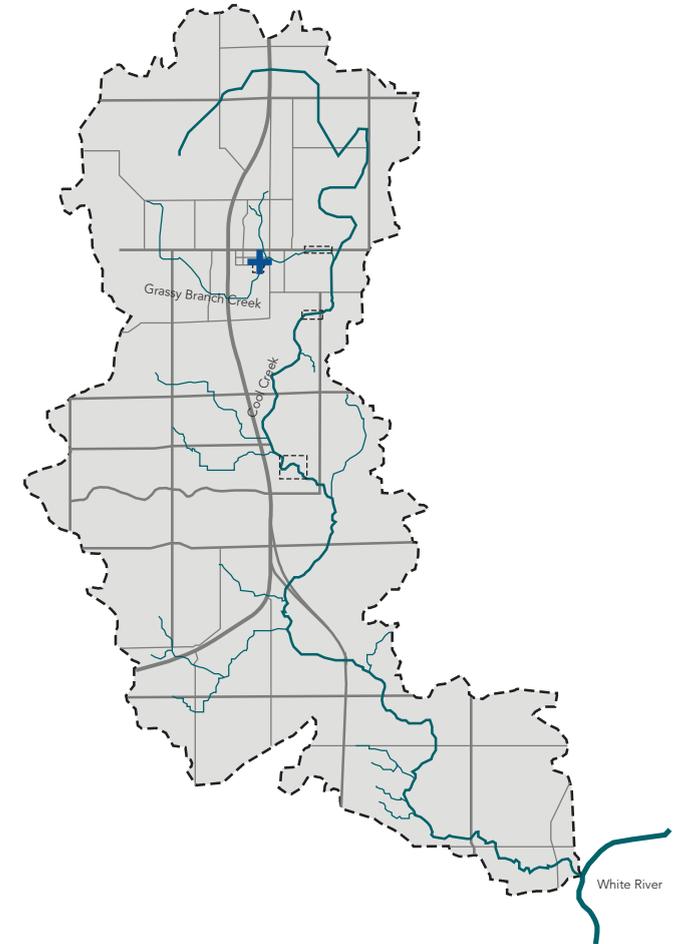
Most of Indiana's water flows down creeks and tributaries into the White River watershed. Eventually, all of this water drains into the Ohio River and then to the Mississippi River.

Westfield is a part of a smaller tributary watershed known as the Cool Creek Watershed. There are known problem areas where flooding and overflows occur. One of these sites is right above the park, and inspired low-impact ecological approach to the design of the stream bed profile.



INDIANA WATERSHEDS

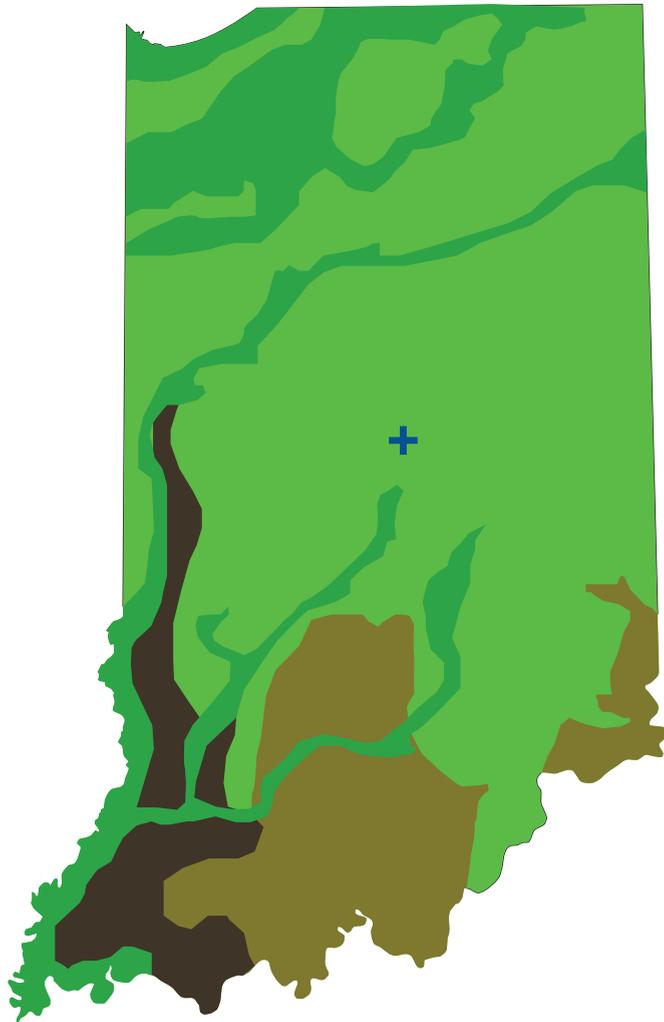
- White River Watershed
- Upper White River Watershed
- Cool Creek Watershed



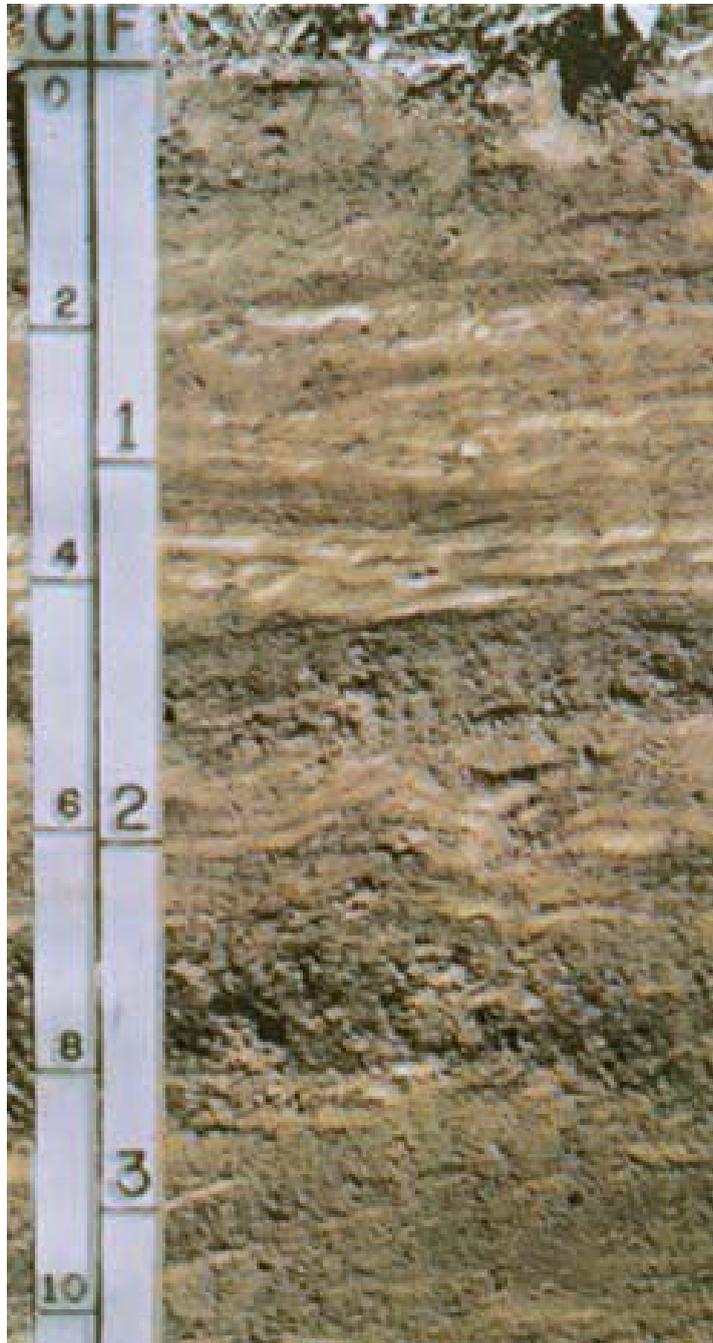
COOL CREEK WATERSHED

- Creeks, Rivers
- Roadways
- Problem Zones

SOILS



INDIANA SOILS



INDIANA SOIL SAMPLE OF GENESSE LOAM³⁶

In Hamilton county the soil profile consists of:

- Brookstone silty clay loam 24.5%
- Crosby silt loam 35.1%
- Miami silt loam 11.6%
- Patton silty clay loam 4.9%
- Shoals silt loam 3.1%
- Oackley silt loam 2.9%
- Other 17.9%

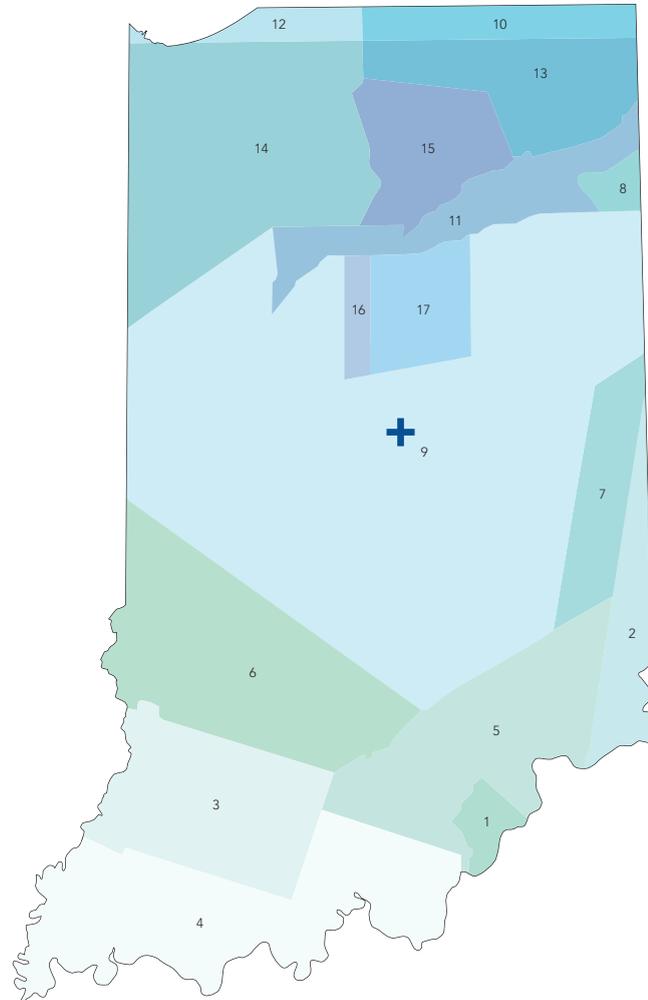
SITE HISTORY

THE CITY OF WESTFIELD

The City of Westfield was founded on May 6th, 1834 by three Quakers from North Carolina: Asa Bales, Ambrose Osborne and Nathan Parker.

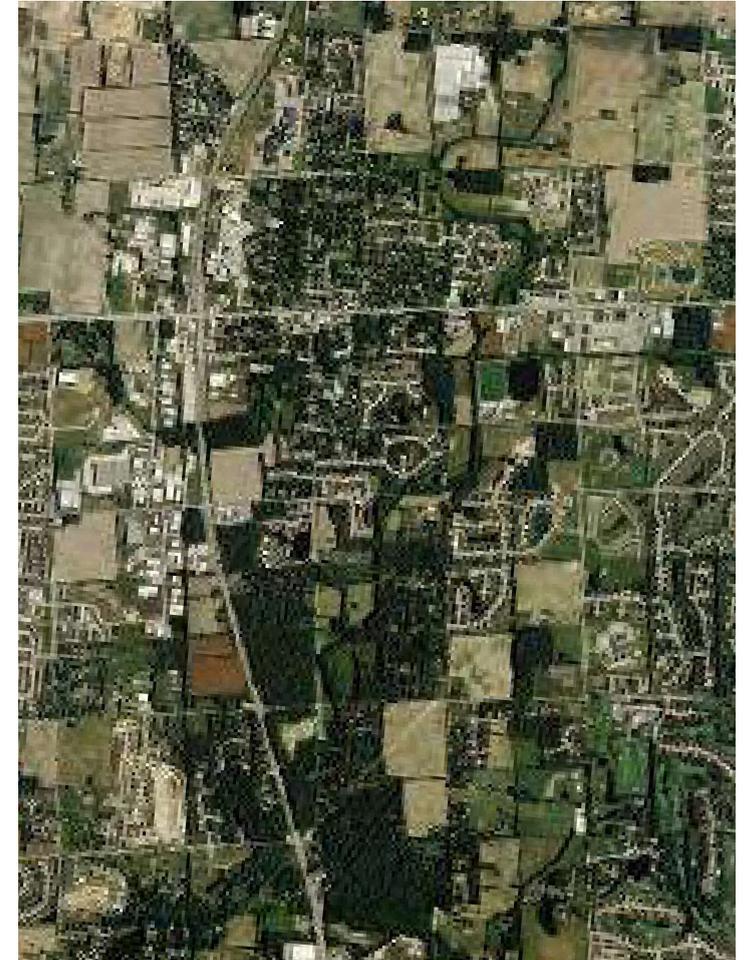
Indiana was originally occupied by Native Americans from the Shawnee and Miami tribes. Through successive treaties, the land became inhabited by farmers and people moving west.

The Jeffersonian Grid is a physical manifestation of the power of equality, where every plot is of the same measure. The powerful grid divided any territory into successively smaller plots. This regimented division of land has had a lasting effect on the present street grid, crop fields and property delineations.



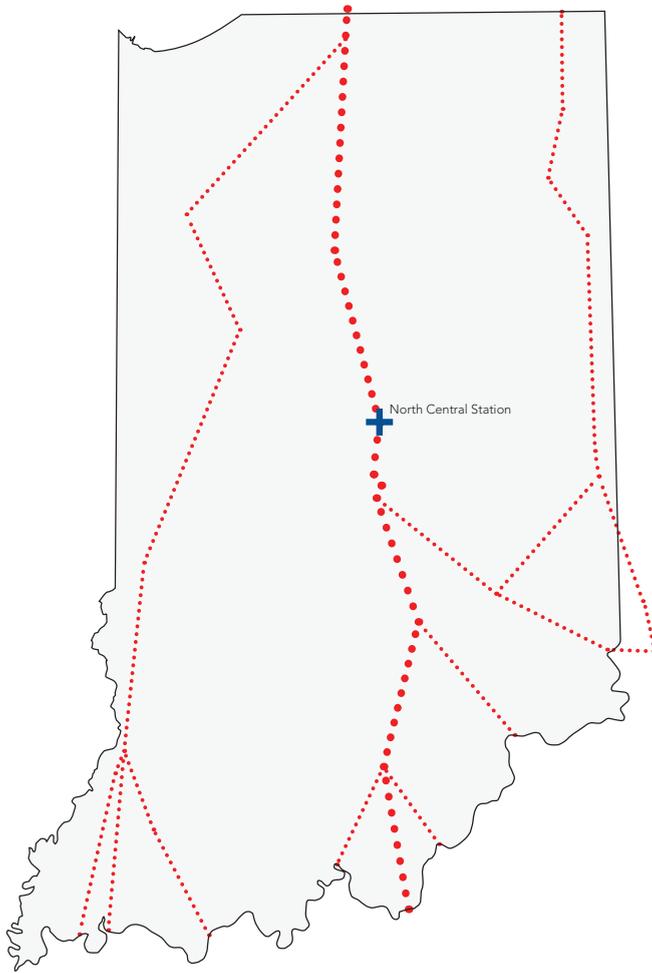
NATIVE AMERICAN TREATIES

1 G. R. Clark's Grant 1783	7 Fort Wayne 1809	13 Carey Mission 1826
2 Greenville 1795	8 Maumee 1817	14 Tippecanoe 1832
3 Fort Wayne 1803	9 New Purchase 1818	15 Tippecanoe 1832
4 Vincennes 1804	10 Chicago 1821	16 Wabash 1834
5 Grouseland 1805	11 Mississinewa 1826	17 Wabash 1840
6 Fort Wayne 1809	12 Mississinewa 1826	



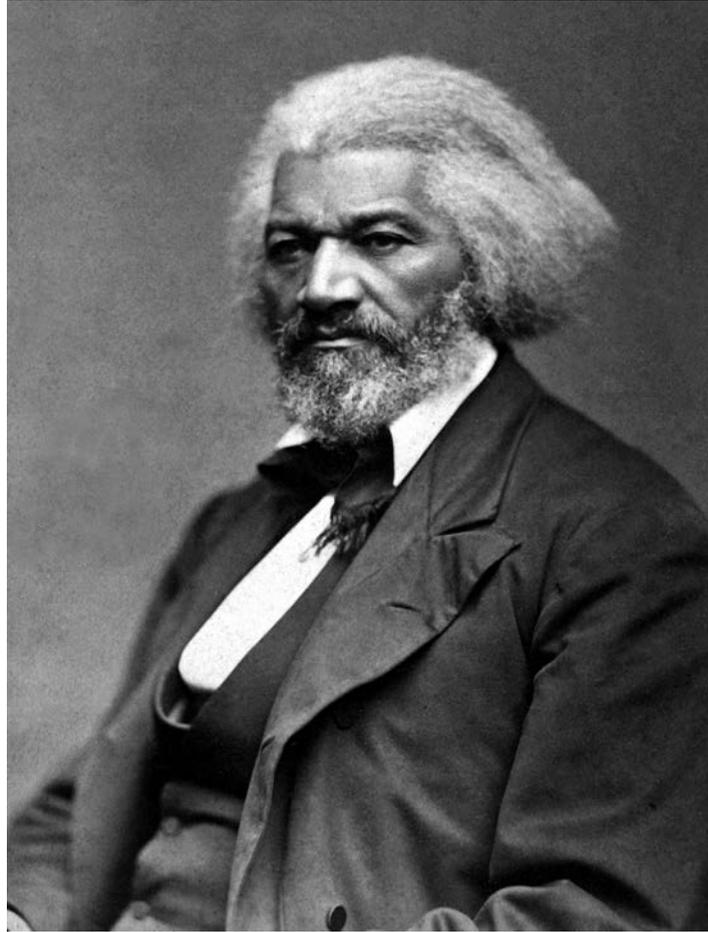
Scene from *Friendly Persuasion* (1956)

UNDERGROUND RAILROAD



INDIANA UNDERGROUND RAILROAD ROUTES

- ● ● Central Route
- Other Routes through Indiana



The Underground Railroad had its beginnings in Indiana as early as 1831. The central route started in Louisville and Madison and made its way through Westfield becoming known as the North Central Station of the Underground Railroad by 1837. This made Westfield, which became known throughout the country as the “last hope” for the slaves, for once a slave reached the city there was little chance of the owner getting him back. The city was responsible for the freedom of more slaves than any other town in northern Indiana. Even the famous Frederick Douglass travelled through Westfield by way of the home of Ephraim Stout.

In one famous story used by Indiana Historical Bureau on historic signs at Asa Bales Park, the bravery of Westfield citizens and abolitionists is captured:

“In 1837, an enslaved family of three escaped from Missouri; settled six miles north of Westfield in 1839 with the name Rhodes. In 1844, Singleton Vaughn arrived at their home to claim them; the family resisted until neighbors arrived. Vaughn agreed to take the family to Noblesville for trial. In route, a crowd stopped Vaughn, demanding the family be taken to Westfield. Urged on by the crowd, the driver of the wagon carrying the family sped to Westfield; the family escaped before the wagon reached the town. Vaughn sued some in the crowd, for interfering with his right to reclaim slaves. In Vaughn v. Williams, 1845, the jury found the defendants not guilty, finding the Rhodes family had been freed when a previous owner moved them to Illinois, a free state.”



INDIANA HISTORICAL BUREAU SIGNAGE³⁷

POPULATION & DEMOGRAPHICS

AT A GLANCE:

POPULATION

30,068

HOUSEHOLDS

9,621

FAMILIES

7,024

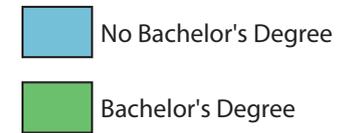
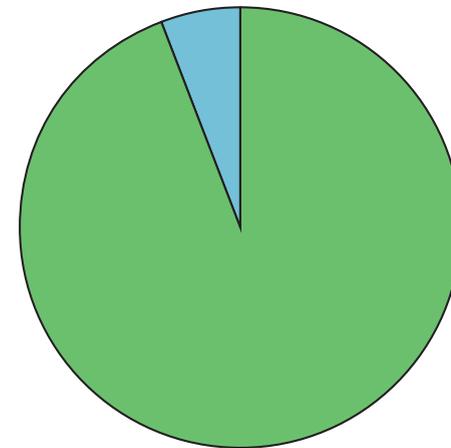
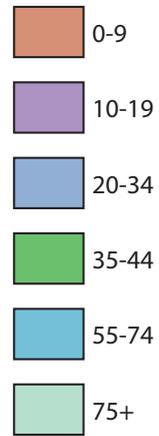
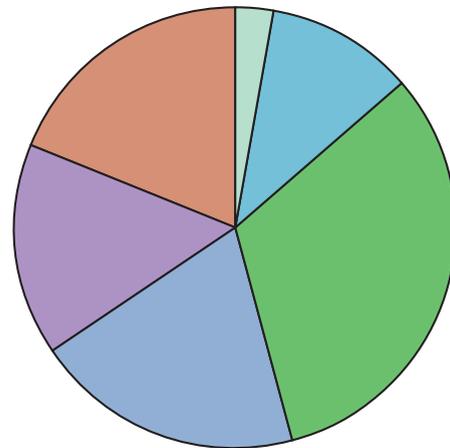
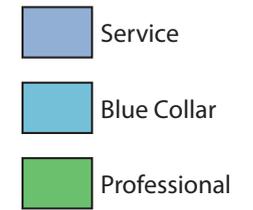
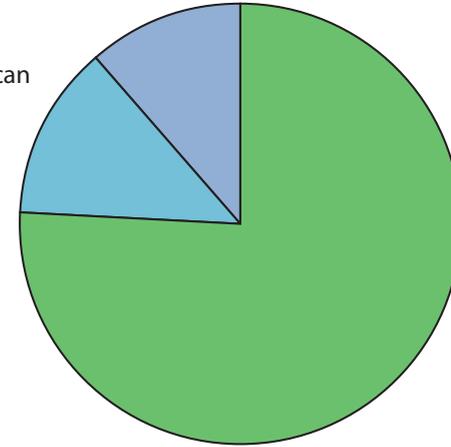
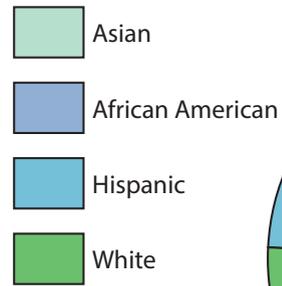
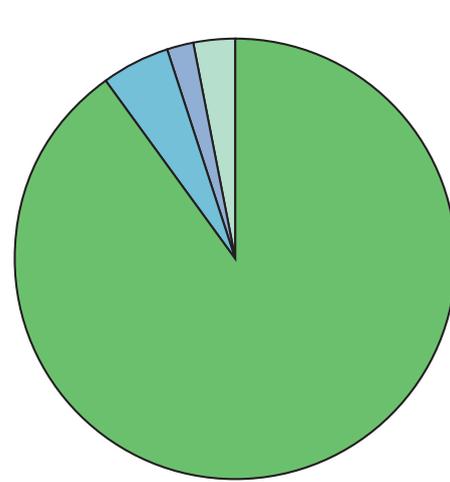
MEDIAN AGE

32.5

AVERAGE HOUSEHOLD INCOME

\$95,102

*Data is according to the 2010 Census



WESTFIELD: CITY OF DESTINATIONS



Westfield is a city of multiple destinations. The many trails across the region and area join in Westfield, including the Monon Trail and Anna Kendall Trail. These trails bring visitors to the sites and parks of the area, including an all-inclusive park on the Freedom Trail Park that was designed with the influence of the Hamilton County Autism Support Group.

With the completion of Grand Park, Westfield will become home to a multitude of competitions and tournaments, bringing people from all over the state and region.

Even as Westfield looks to the future, the Westfield Washington Historical Society and Museum draws people with exhibits describing the Underground Railroad, the founding Quakers, and other important events from the City's rich history.



PUBLIC SPACE IN WESTFIELD



A
Armstrong Park - 15 acres



B
Asa Bales Park - 13 acres



C
Cool Creek Park - 90 acres



D
Freedom Trail Park - 30 acres



E
Grand Park - 360 acres



F
Hadley Park - 0.25 acres



G
Liberty Park - 5 acres



H
Old Friends Cemetery Park - 1 ac



I
Osborne Park - 31 acres



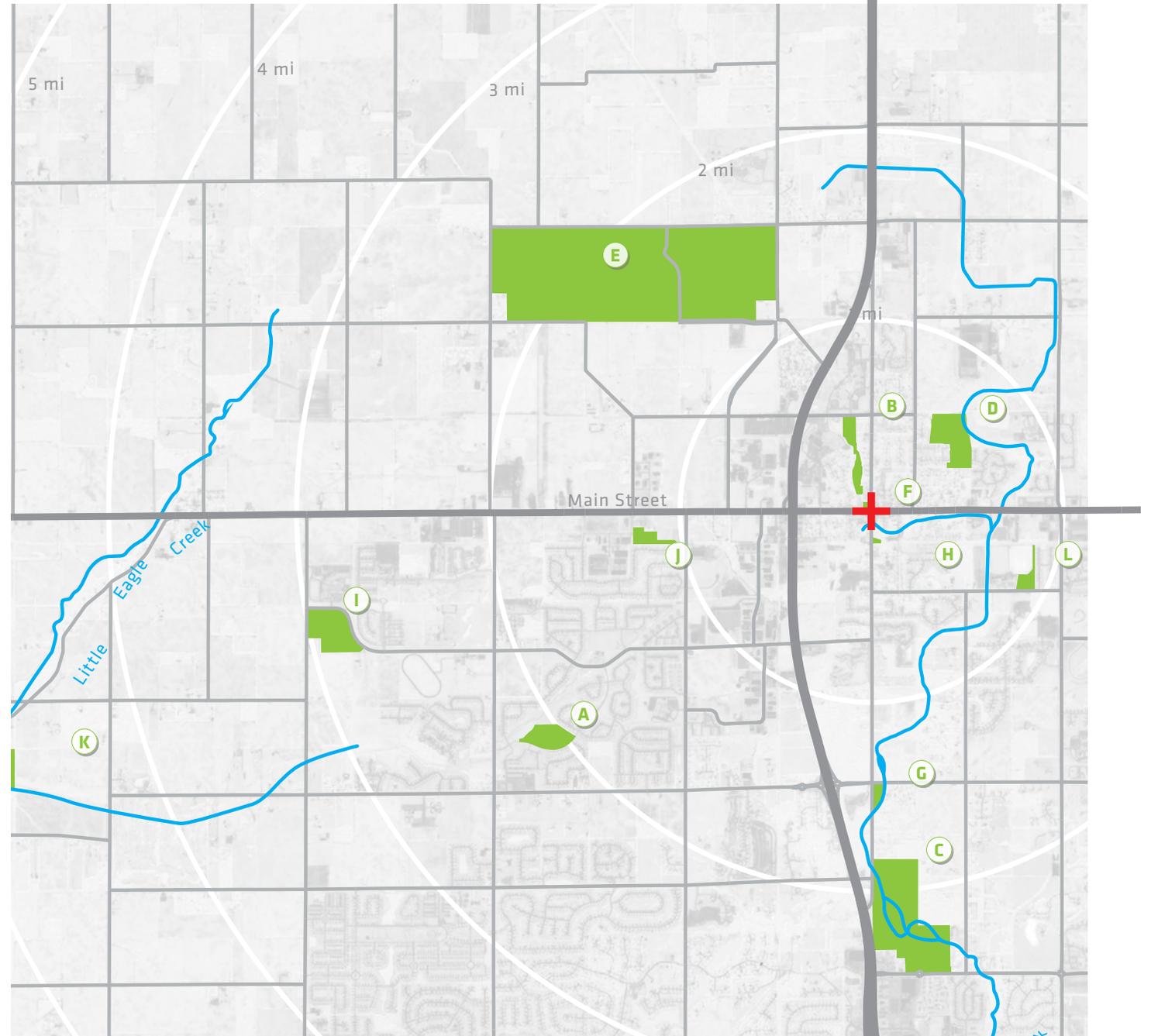
J
Quaker Park - 7 acres



K
Raymond Worth Park - 17 acres

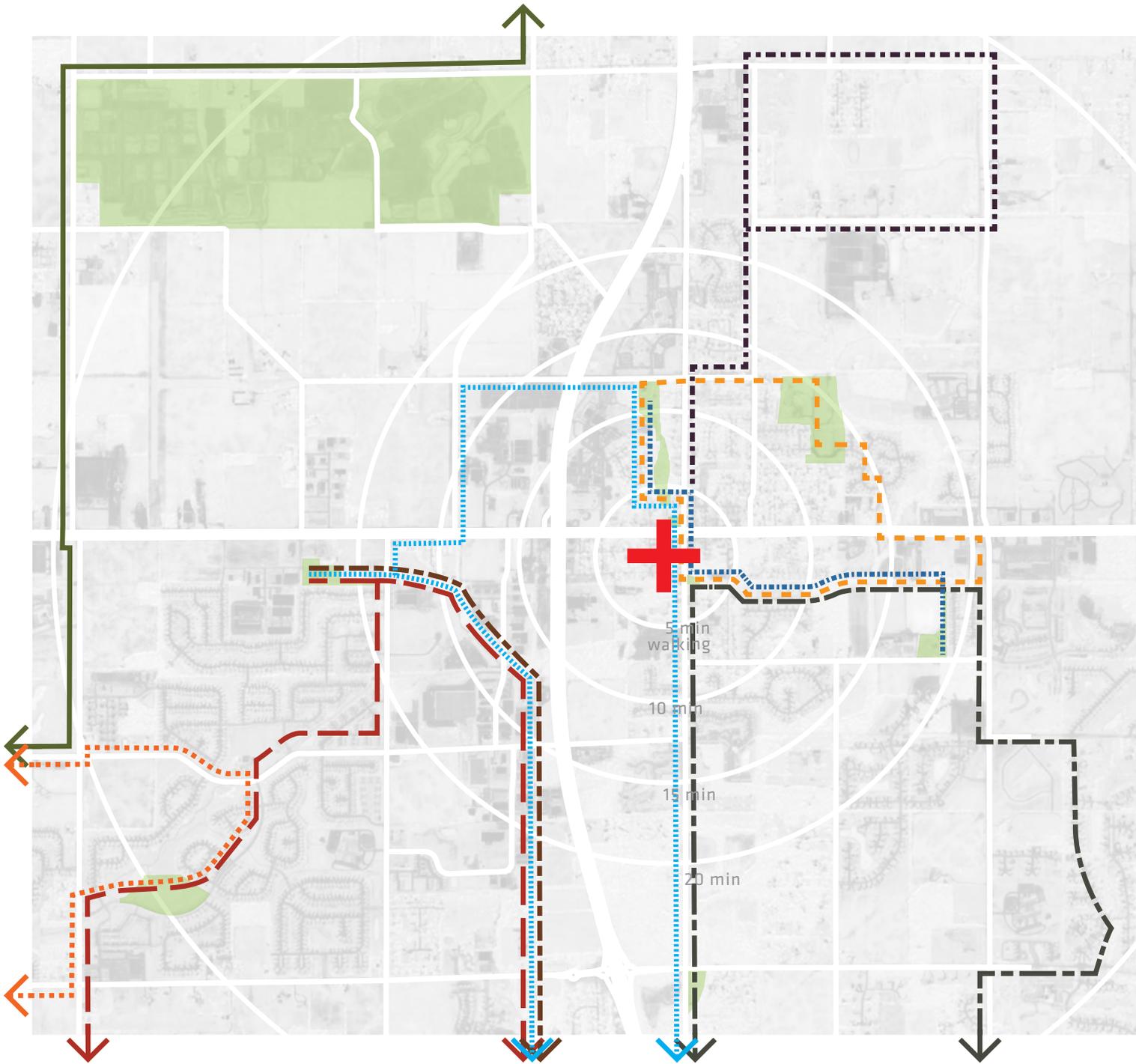


L
Simon Moon Park - 6 acres



- Public Parks
- Water
- Road
- + Grand Junction

TRAIL SYSTEM IN WESTFIELD



- All Roads Loop - 5 miles
- - - - - Asa-Freedom Loop - 3.5
- Asa-Simon Line - 1.85
- Little Eagle Creek Loop - 14.7
- Midland-Cool Creek Loop - 7.75
- - - - - Monon Midland Outer Loop - 7.5
- Monon Midland Inner Loop - 7.4
- Northwest Border Loop - 33.3
- - - - - Quaker-Monon Line - 2.7

EVENTS

Westfield is a city rich in activities and events. From Westfield in Lights, the Derby and Street Festival, to Westfield Rocks the 4th, the City brings community and groups together throughout the year. Grand Junction Plaza looks to build on these traditions.

Grand Junction Plaza will be programmed and operated by the Westfield Parks Department. The park will serve the community with daily events (morning, afternoon, and evening), as well as weekly, monthly, and seasonally appropriate programming. The Grand Junction Plaza will be an event-filled place throughout the year.

Grand Junction Plaza will host a vibrant community in the downtown. Some main groups and users which will influence the park are Downtown Westfield Association (DWA), the Westfield Playhouse, numerous car clubs, downtown restaurants and businesses, and the new visitors from Grand Park.



PUBLIC ART & CULTURAL ATTRACTIONS



The City of Westfield has a burgeoning public arts program, with works including “Passaggio” in Asa Bales Park, the mural on Union Flowers and Gift Shop, and the “Red Man” on Main Street. As the City establishes an Arts Alliance to expand public art, Grand Junction Plaza will have integrated public art elements as part of the park programming.

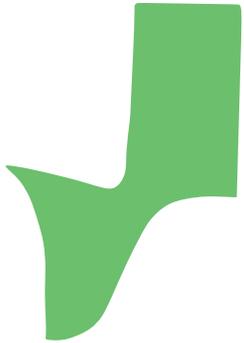
PARK SCALE COMPARISONS



Central Park | New York City, NY



Grand Park | Westfield, IN



White River State Park:
Indianapolis, IN



Monument Circle
Indianapolis, IN



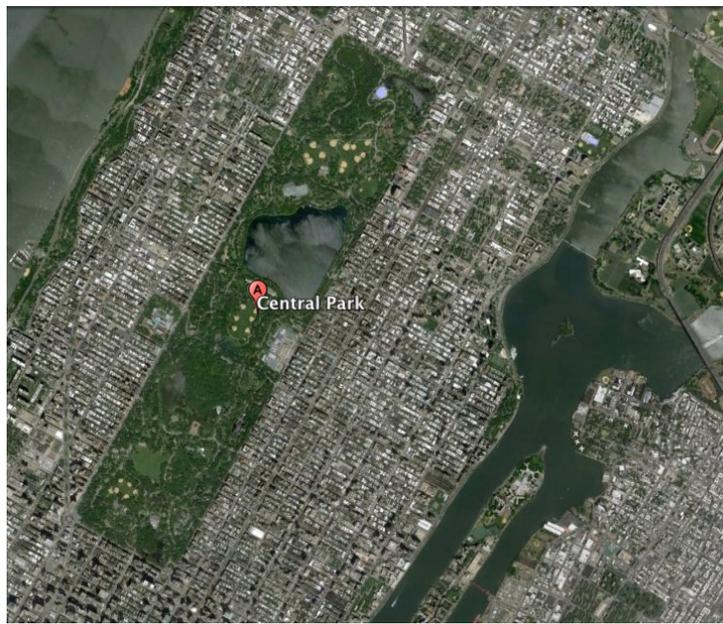
Canal Park
Washington, DC



Grand Junction Plaza
Westfield, IN

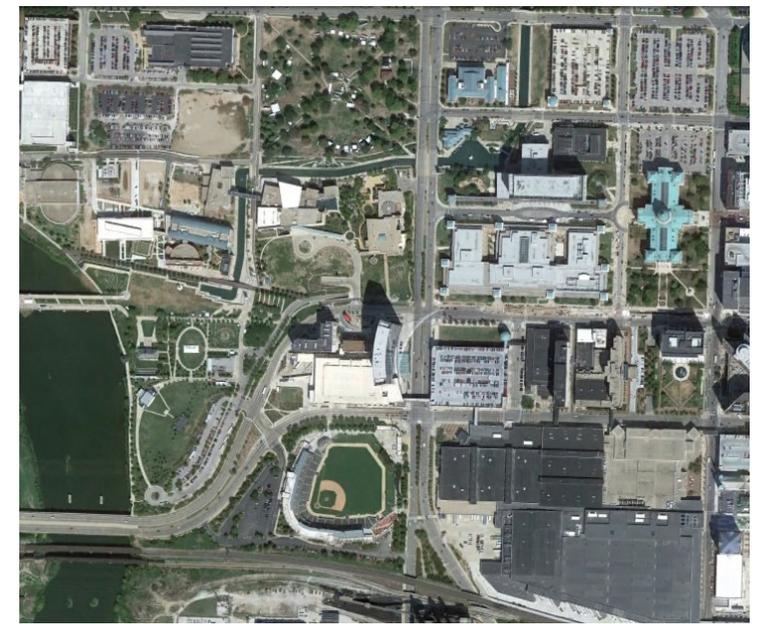
CENTRAL PARK

Location: New York City, NY
Size: 840 acres
Program: Large scale park with sports fields, running paths, reservoirs, zoo and museum.



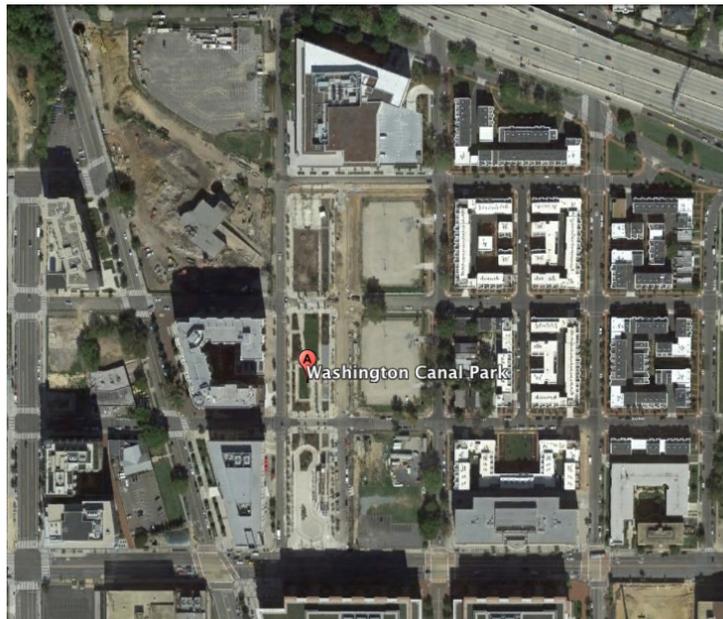
WHITE RIVER STATE PARK

Location: Indianapolis, IN
Size: 94 acres
Program: Large park with amphitheater, riverfront canal, cultural institutions and attractions, and assorted structures.



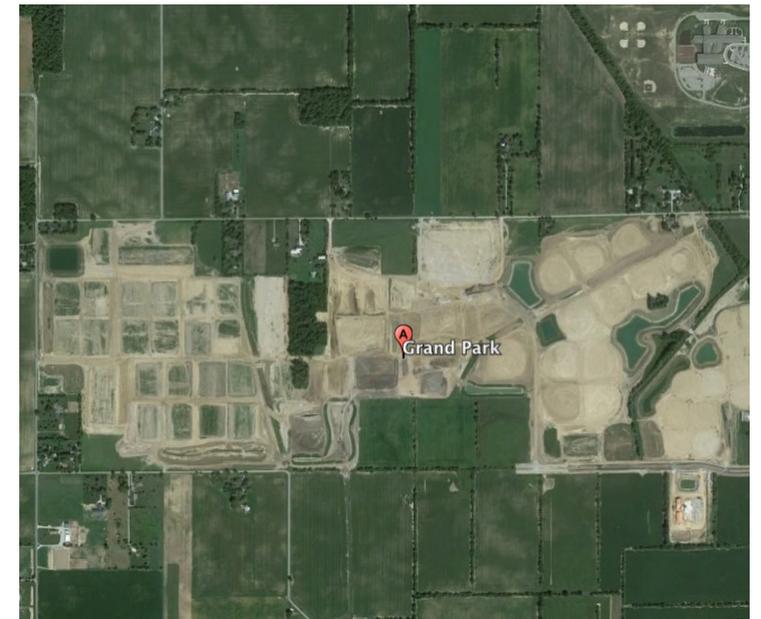
CANAL PARK

Location: Washington, D. C.
Size: 3 acres
Program: Small park with a seasonal ice skating rink, play areas, small pavilions and café, and fountains.



GRAND PARK

Location: Westfield, IN
Size: 400 acres
Program: Large park with soccer and baseball fields.



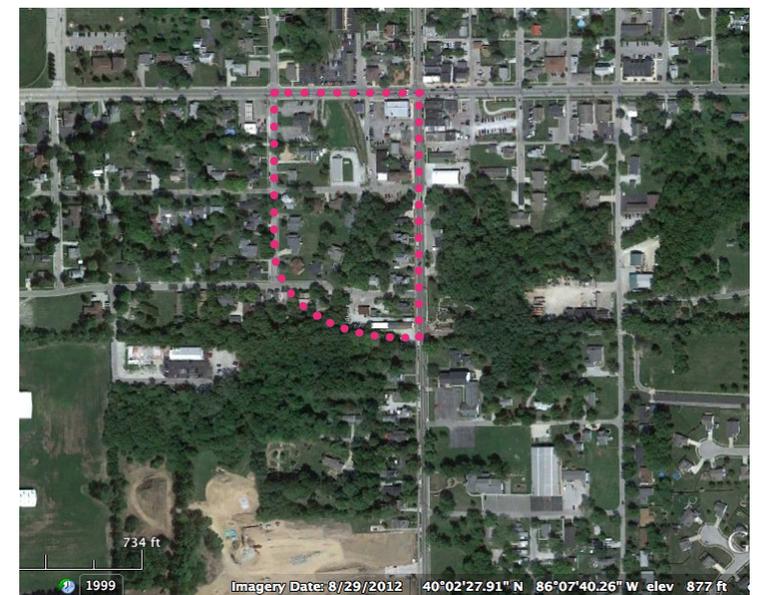
MONUMENT CIRCLE

Location: Indianapolis, IN
Size: 3 acres
Program: Urban plaza with monumental fountain and ceremonial obelisk.



GRAND JUNCTION PLAZA

Location: Westfield, IN
Size: 10.5 acres



ACKNOW

LEDGEMENTS

PROJECT TEAM

The design of Grand Junction Plaza is a true collaboration between the City of Westfield and the design team. Though the dedication of the municipality, and support of organizations such as the Downtown Westfield Alliance, Grand Junction Plaza is moving toward its realization.

During subsequent phases of design, the team will work with agencies such as the Indiana Department of Natural Resources, Army Corps of Engineers and the Hamilton County Drainage Board.

The design team will also engage the community of Westfield, gaining consensus and further input on the aspirations of citizens and stakeholders, helping to define a vision for Grand Junction Plaza.

We would foremost like to thank our collaborators, the City of Westfield and Downtown Westfield Association. This group of individuals are true advocates for their citizenry, and are intrepid in realizing a vision that will enhance the City for decades to come. LAND COLLECTIVE would also like to thank the collaborators within our design team, who inspire us and constantly lend their creativity towards bettering the health of communities through design.

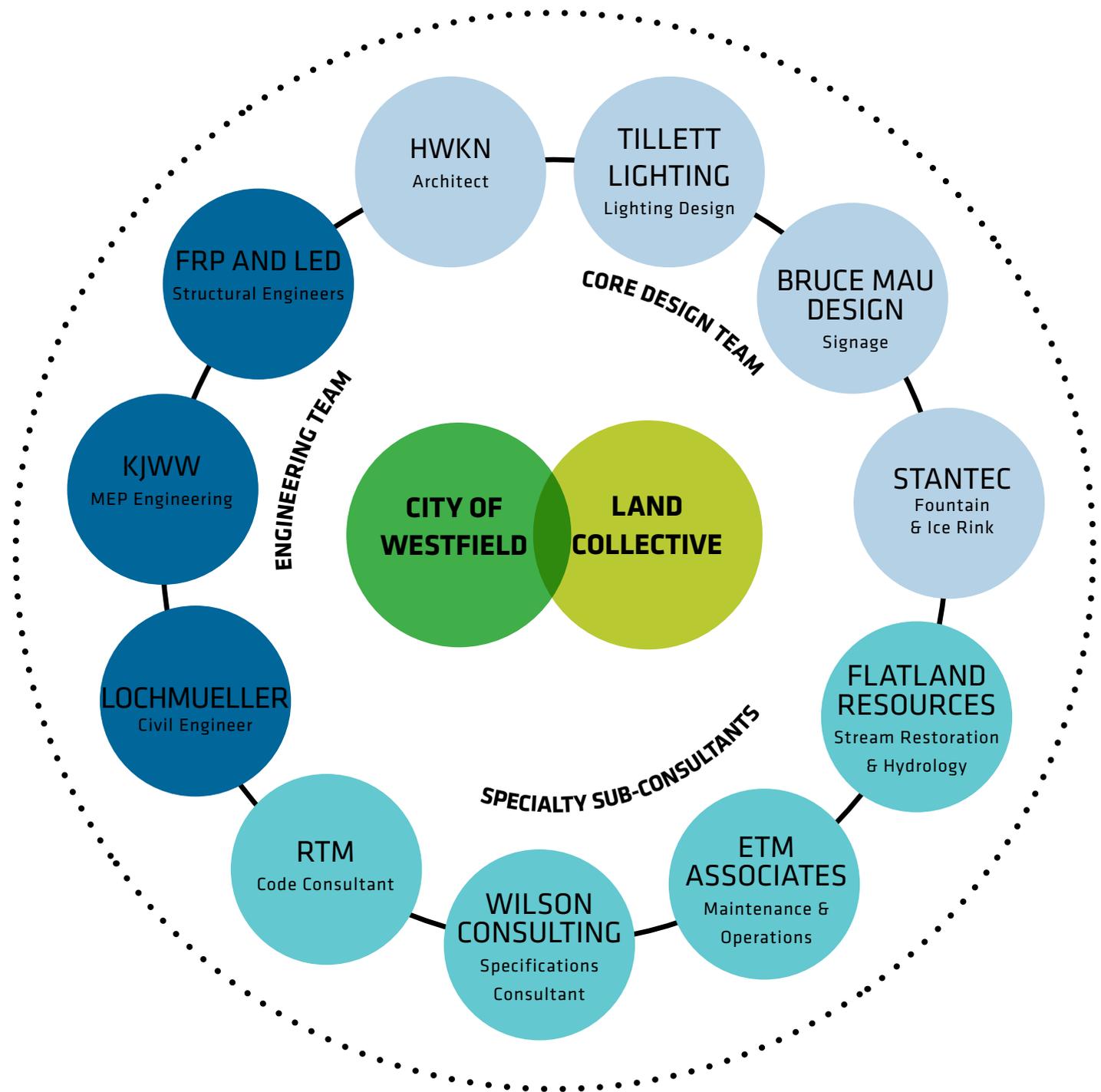


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