Genesee Valley Park West

Master Plan

04

EXISTING PARK CONDITIONS

2015

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New York State Department of State

City of Rochester

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04

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EXISTING PARK CONDITIONS

This document was prepared for the New York State Department of State, Division of Coastal Resources, with funds provided under Title 11 of the Environmental Protection Fund.

EXISTING RECREATIONAL FACILITIES

The Rochester Department of Recreation and Youth Services and the Bureau of Recreation offer an array of programmed sports and recreation opportunities at GVPW.

Park Facilities & Recreational Use

The Rochester Department of Recreation and Youth Services (DRYS) and the Bureau of Recreation offer an array of programmed sports and recreation opportunities at GVPW. The park is dominated by five distinctive recreation features: (1) Genesee Valley Sports Complex (which includes a 50m outdoor swimming pool and an indoor ice rink/sport court “arena”); (2) Genesee Waterways Center facility and docks (a non-profit organization that promotes rowing, paddling, and related activities); (3) Ballfields and a multi-purpose field (including 2 baseball fields, 4 softball or little league fields and 1 multipurpose field); (4) Tennis Courts (includes 8 tennis courts and an associated parking lot); and, (5) Trails (approximately 2.3 miles of multi-use trail along the river, and an additional 0.65 miles of internal circulation paths).

The park is used year-round although programmed winter use is solely related to the Sports Complex Ice Rink. The summer months see use of both the pool and fields, with city-run Sports Camp, swim lessons and other permit-uses such as YMCA Tennis Love-15 Tennis program. The Bureau of Recreation’s Sports Camp is an extended summer camp that uses several GVPW facilities, running 9 am to 5 pm each weekday from July to August. All facilities have some level of open-use time, whether it be open-skate or swim at the Sports Complex or rental of particular fields or park facilities for private events. Competition from nearby facilities, specifically the University of Rochester’s renovated athletics facilities have impacted the amount of field use at GVPW. Three league teams moved their field use to the U of R in 2012.

The Genesee Waterways Center (GWC) begins their outdoor rowing season in April and may extend it to November as weather allows. Beyond their own programs, the GWC also administers public kayak and canoe rentals as a municipal service from approximately June to September. Several local high schools utilize the park facilities, including the GWC’s boat storage areas, for their own sports and rowing programs.

GVPW is also home to several large community and sports tourism events that have helped sustain the park’s image as a recreation destination. The Head of the Genesee regatta is typically held at the park’s waterfront in October. The regatta is a 2-day US Rowing sanctioned event that draws rowers from around the country and includes Masters, collegiate, scholastic and corporate crews. The Rochester Flower City Challenge is a duathalon, paddle triathlon, 5k and marathon event (the marathon and 5k event is not held in GVPW). In September, the Rochester River Challenge is held and includes a Wounded Warrior Disabled Sports event at the GWC, celebrating the sport of outrigger canoeing.

Passive recreational use is also an important element of recreation in the park. The park’s trails not only serve to link statewide and regional trail systems to the City of Rochester, but they support passive biking, running and walking for the nearby population. The park’s pastoral character also allows it to serve as a community park for socializing, picnics, private events. The Genesee Valley Field House is used as the Sports Camp headquarters and can be rented for private events.

Attendance Data

Attendance data is gathered for the Sport Complex, which includes ice rink, sport court and pool users. Attendance for 2012 totaled 64,853. Approximately 42,000 of those users were in winter months, either using the ice rink or attending events at the ice rink. The remaining 23,000 were a combination of sports court and outdoor pool users – with attendance spiking in July primarily due to pool use. This data does not include tennis or other park use, which is unavailable from the City.

DRYS reports that demand is high for all facilities and separate dedicated sports court and ice rink would ease demand significantly. While demand is generally high for these GVPW facilities, a comparative analysis of attendance at facilities in similar climates varied heavily based on the types and condition of the facilities. A similar Sioux City (SD) pool open during the same period reported attendance of more than 30,000 for the same 90-day period - despite having approximately 60,000 less in population than Rochester. For contrast, another pool in Sioux City which also contains a water spray facility had attendance of more than 85,000 for the 90 day open season.

Some of the demand pressure is due to the twice-yearly operation of converting the ice rink to a sport court and

The Existing Park

Genesee Valley Park West

04

1 Former South Plymouth Avenue access, no longer accessible except through hotel parking lot
2 Ball fields #5 and #6, little league
3 Genesee Riverway Trail, asphalt
4 Planted embankment (bridge approach)
5 Wooded area (along former railroad corridor)
6 Bus loop / drop-off
7 Genesee Valley Sports Complex, (lockers, ice rink)
8 Outdoor pool
9 Baseball Field #4
10 Genesee Waterways Center (GWC) and associated boat houses / storage
11 Docks (hand-carry)
12 GWC Truning Circle / Boat Drop-off
13 Wooded Picnic Grove, Significant Trees
14 Ball field #1
15 Multi-use field (soccer, football)
16 Ball field #2
17 Ball field #3
18 Tennis courts
19 Field House
20 Playground
21 Erie Canalway Trail (segment uses Riverway Trail)
22 Former NY&Penn Railroad bridge (abandoned)
23 Historic pedestrian bridge (Olmsted Brothers designed)
24 Interstate I-390 overpass
25 Wooded area (naturalized)
26 Police/Fire Training Facility
27 Genesee Greenway Trail

back again, which takes approximately 2 to 3 weeks each time. This effectively shuts the ice-rink and sport court down completely for a period of 4 to 6 weeks each year. The other factor likely contributing to lower use is the facility conditions and visual appeal, which due to budget constraints, have not been substantially renovated since their opening in the late 1970s and early 1980s.

Outdoor Recreation Facilities

Baseball/Softball Fields

There are 6 ball fields located throughout the open park areas. All of the fields include backstops, limited benches or seating, however none of the fields include dugouts, training or warm-up areas, pitching/batting cages or other ball field infrastructure.

Ball Field #1

Field #1 is most commonly used field for high school baseball due to the size, grass infield, and it is in good shape. It is used by the Central School District (CSD) often. The high schools reserve the field early in the year (March) hoping for prospect of good weather. However, the field is not generally usable so early in the year due to snow and water.

Ball field #2

Field #2 is used heavily by school district for softball (soil infield) and some Little League play. Similar use level as field #1, including DRYS recommendation for artificial turf.

Ball field #3

Field #3 is not generally used for programmed activities, as it does not meet the standards for schools and organizations. Some minimal unprogrammed family or pick-up type use is expected. Use permit records show no field reservations for ball field #3 in 2012. This field shows some minor drainage issues at the infield but it is also affected by broader drainage issues surrounding the backstop and spectator area. The nearby trail is sometimes

PARK ATTENDANCE AND USE

Chart showing attendance and recreational useage throughout a typical year. Data from 2012. Attendance numbers represent users at the Genesee Valley Sports Complex (Ice Rink (Winter), Pool (Summer) and Sport Court (summer).

	JAN	FEB	MAR	APR	MAY	JUN	JULY	AUG	SEP	OCT	NOV	DEC
Attendance * (2012) (limited to Genesee Valley Sports Complex and Swimming pool)	**9,757**	**9,011**	**3,917**	481	548	**4,952**	**12,034**	**5,188**	1,646	**4,952**	**6,399**	**6,038**

River / Pool

ROWING
Head of the Genesee Regatta

CANOE / KAYAK (RENTALS)
Rochester River Challenge / Outrigger Canoe water sports event in Sept.

*** OUTDOOR SWIMMING**
Open 7 days per week. Rochester Rapids swim team to Aug. (then to Adams St. indoor pool for winter)

TRIATHLON
Kids Triathlon and Flower City Challenge in Apr.
Sports camp in July and Aug.

Arena Sports

*** ICE HOCKEY**
U of R, High Schools (Gates-Chili, Brighton) home rinks, Youth, Adult Leagues (M-Th), U of R M/W game nights (Fri / Sat)
River Romance events in Oct. School hockey and hockey leagues begin in Oct.

*** ICE SKATE**
Sectionals in Feb, Mar. Adult / kids open skate
*Rink facility is shut down for 2-3 weeks in early April for transition to sport court floor.
Family skate
Rink opens up in Sept.
NYS Special Olympics / State Winter Games (Figure and Speed skating)

*** ROLLER DERBY**
*** FLOOR HOCKEY**
*** LACROSSE**
*** WRESTLING**
Adult league
Sports camp in July and Aug.

Field Sports

BASEBALL / SOFTBALL
Sports camp (HQ@Field House) in July and Aug.

TENNIS
Sports camp (HQ@Field House) in July and Aug.
Love-15 Tennis Program (YMCA) in July and Aug.

SOCCER
Sports camp (HQ@Field House) in July and Aug.

FOOTBALL
Sports camp (HQ@Field House) in July and Aug.

LACROSSE
Sports court rental times available in May.

Trail

BIKING / RUNNING / WALKING

TRIATHLON / DUATHON
Kids Triathlon and Flower City Challenge in Apr.
Sports camp in July and Aug.

RECREATION FIELDS & AMENITIES

Recreation fields are dispersed throughout the park. Red indicated outdoor recreation field, black indicates recreational building.


A


B


C


D

A.

Ball field #1 is heavily used for high school baseball due to its size and condition. There are a lack of player or spectator amenities such as dug-outs or nearby rest rooms.

B.

Ball field #2 is used by the Central School district for softball and some limited little league play.

C.

Field #3 is not generally used for programmed activities, as it does not meet the standards for schools and organizations. The field also suffers from drainage issues that limit use. The photo shows standing water behind the backstop.

D.

Ball field #4 is the park's only full sized baseball field and is lighted. It receives extensive league play but lacks necessary amenities such as dugouts, shade structures for players and spectators or pitching cages. The field also suffers damage and requires frequent repair due to over-use and unintended use due to group rentals and event parking. As the only lighted turf area it is in high demand on summer evenings.

inaccessible due to wet swales and standing water / poorly drained areas cause stagnant smell in the spectator and infield area – limiting enjoyment and use.

Ball field #4

Field #4 is a lighted baseball field (turf infield) and has been used for extensive League play in the past. It is also used for general use reservations, this includes Ultimate Frisbee leagues or other activities that desire lighted playing field. The dominant baseball league has moved to the University of Rochester's facility and the field will potentially be much less used than in previous years. The field is also often used for other park needs such as trailer parking and event tents that cause damage and field maintenance issues. This is due to its location between the GWC and the ice rink arena and its proximity to the riverfront and events areas.

Ball field #5 & #6

Fields 5 and 6 are north of Elmwood Avenue and are primarily used for Little League play or general use permits. The fields have inadequate drainage and are often unusable. The fields are much less used for programmed recreation than the fields south of Elmwood Avenue, partly because of drainage issues and partly because of demand. However, there is increased interest and reorganization of the local Little League and if the fields were improved they would potentially be used more. Neighborhood representatives have expressed strong desire for these fields to be improved.

Multi-use Field

The multi-use field is located between ball fields #1 and 2 and is primarily used for Central School District soccer and football from August through October of each year.

Tennis Courts

Eight lighted tennis courts are used throughout the year by several different groups from June to September. An approximately 60-car parking lot is adjacent to the courts. The courts can be used on an open basis and are utilized for the summer Sports Camp as well as the YMCA's free "Love-15" instructional youth tennis program. The YMCA program is very popular and has been operating in Rochester for more than 20 years. It serves 300 to 400 children for a 6 week period during July and August and uses courts throughout the city, including GVPW.

The tennis courts show severe cracking and settlement in court surfaces. Repairs to the courts are continuous and ongoing. The courts have an unknown structural profile and were built in phases likely beginning in the 1960s with several resurfacings and court additions since that time. The cracking and settlement are through to be a combination of high water table and inadequate base drainage. The courts are surrounded by drainage swales and basins and this area of the park exhibits general drainage problems. New tennis courts are anticipated in 2016.

Playground

An existing playground is located to the south of the Field House. The playground is located between a series of pathways and provides good shade and access to the neighborhood. It features climbing and slide structures, swings and benches. The playground equipment is worn in appearance and the safety surfacing is warping and does not meet current surfacing best practice guidelines. The equipment is smaller and less stimulating than some more fully featured playgrounds and appropriate for only the youngest children. The manufacturer rates the equipment style for approximately ages 5 to 12, but it would only likely be stimulating for ages 3 to 5.

Picnic Areas and other Amenities

GVPW also includes more passive recreational elements such as trails and picnic areas. The major programmed picnic area is located within the wooded grove and includes tables and grills. This picnic area is heavily used on summer weekends when weather is accommodating and many families use the grills. There is no vehicular access to the picnic area, which results in several cars using pedestrian trails to drive into the wooded grove and park on the grass. Site visits recorded widespread and abundant litter and garbage in the grass areas after picnics. This appears to be an extensive problem throughout the

parks field areas, the wooded grove and under bleachers near ball fields.

Bathrooms

Bathrooms are made seasonally available in the form of temporary port-o-potties placed at various locations throughout the park. The Genesee Waterways Center has bathroom facilities that are made publicly available, though their use is limited as it is not explicitly clear that these are for public use. Furthermore, the GWC's sanitary pump station has been deficient for several years which results in frequent sewage backups and limits use.

Fishing / Overlook Piers

Fishing and viewing piers exist along the river edge in three areas. These steel frame wooden decks were constructed beginning in the late 1970s. The piers do not appear to be heavily used by fishing, but some leisure walkers occasionally stop to take in river views. The wooden components of the piers and associated benches are generally worn and should be rehabilitated. The NYS Canal Corporation utilizes the southernmost overlook (near the foot of the pedestrian bridge over the canal) as a dock for their dredging equipment.

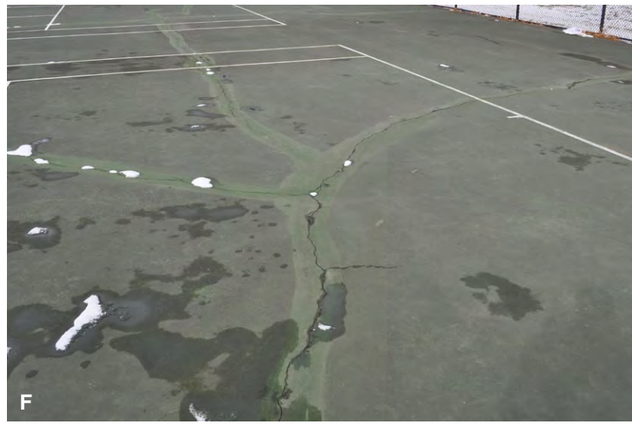

A


B


C


D


E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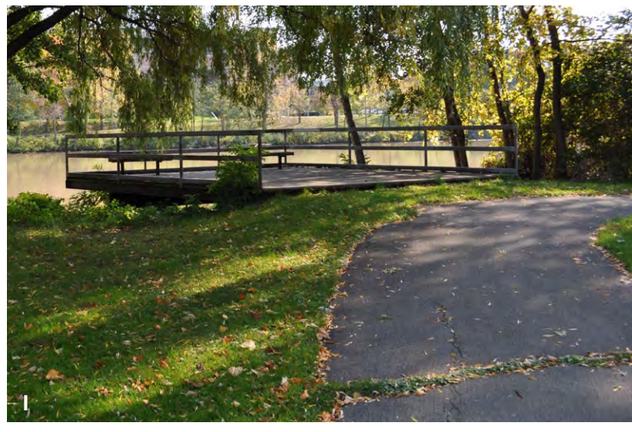
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A.

Ball Field #4's extensive lighting system is visible from the east side of GVP.

B.

Fields #5 and #6 are located north of Elmwood Avenue. They have been used for Little League play intermittently over the past years. The Rochester little league and neighborhood groups have requested that these fields be repaired.

C.

The fields (#5 and #6) are in need of repair and exhibit poor drainage. The Brooks Landing Phase 2 project is currently reviewing possible repair options.

D.

The park's only "multi-use" field doubles as ball Field #1's outfield. This limits its concurrent use. No dedicated multi-use, soccer or football fields exist within the park.

E.

The tennis courts are accessible from nearby Genesee Street, near an independent parking area. The courts are well used throughout the season despite damage to the court surfacing.

F.

The tennis court area has extensive surfacing failure throughout nearly all courts and increasingly limits or discourages play. The exact cause of the failures are unknown but appear to be due to high ground water, inadequate base preparation and poor drainage.

G.

The playground has good access to the neighborhood and is well shaded, however, equipment is worn and the safety surfacing is warping and does not meet current guidelines. The equipment does not attract children older than five and limits the play experience.

H.

Several picnic areas with grills are located within the park's wooded grove. However, vehicles commonly drive over the lawn to get to the picnic areas as parking is some distance away. Trash is also commonly left throughout the picnic areas.

I.

Fishing and viewing piers exist along the river edge in three areas. These steel frame wooden decks were constructed beginning in the late 1970s.

A


B


C


D


E


F

A. View of outdoor pool from primary parking lot for Sports Complex.

B. Entry area to Sports Complex from bus/exit loop drop-off.

C. Turf area between parking lot and fenced pool area functions as spectator seating for swim events. There is no formal exterior family seating area within the pool space.

D. View from entry to Sports Complex to bus loop.

E. View of building exterior (ice rink) from Genesee Riverway Trail and Genesee River.

F. Island in parking lot is not conducive to tree growth.

The Genesee Valley Sports Complex (Pool & Ice Rink)

The GVP Pool and Ice Rink Building is owned and operated by the City of Rochester. The building and associated elements are known as the Genesee Valley Park Sports Complex and house a roofed ice skating area, outdoor Olympic-sized (50 meter) swimming pool and associated auxiliary infrastructure such as locker rooms and a concessions area. The indoor ice rink is converted to a sport court surface from April to August each year.

The building is divided into two main areas. The original service portion, including the outdoor swimming pool, opened in July of 1977 and is a single story masonry structure. It currently houses administrative offices, food service vendor infrastructure (not currently in use), skate rental, locker rooms, toilet facilities, and mechanical equipment for the pool and ice rink. The ice rink located on the east side of the service building was constructed in 1980 and was originally an outdoor facility. The ice rink enclosure was added in 1986. This enclosure is a single story (high bay) steel framed structure with masonry walls. Both sections of the building have slab on grade foundation and floor systems. Many recent repairs and maintenance renovations over the past several years have left portions of the sports complex in good structural and mechanical condition. These maintenance renovations include pool mechanical equipment replacement, building mechanical upgrades, ice rink compressor replacement and building roof replacement (service building). Although in overall good structural condition, many of the finishes are in fair to poor condition and the building exhibits and overall uninviting appearance on the exterior and interior, including no relationship to the park's historic Period of Significance. There are many interior repairs and upgrades that are necessary in the near future which the City of Rochester is currently in the process of either capital budgeting or soliciting proposals. These improvements include interior lighting, acoustical tile and ceiling, flooring, doors and door frames, exterior concrete painting, landscaping and drainage improvements. The enclosed ice rink is currently undergoing complete slab replacement (2013).

Site / Exterior

The Sports Complex is located within the park on the south side of Elmwood Avenue, near the Elmwood Avenue bridge and Genesee River. The site is well maintained but exhibits an overall unappealing visual character with no windows, awkward circulation, and a poor overall contextual relationship to adjacent park facilities and features such as the riverfront, trails, parking, Genesee Waterways Center and other park amenities.

There is an access driveway off Elmwood Avenue and parking associated with the building; however the spatial relationship of the building entry, exterior pool area, and parking is poor. The building entry is well served by public transit (RGRTA). However, the drop-off serves as a transfer / waiting area where buses are cleaned and contributes to extremely poor vehicular and pedestrian circulation at the Elmwood entry.

The exterior pool area is sited between the main service building and the parking lot. The visual quality and user-experience of the pool area is impacted by the immediate adjacency of asphalt parking. The pool area deck is concrete and the overall limited size of the fenced pool area does not allow sitting or gathering space for families or pool event spectators. Event spectators are currently sitting in a narrow sloped strip of grass between the pool, a drainage swale and the parking lot. A small bleacher is located in this grass area. The condition of the pool deck and pool foundation bulkhead is poor, with the deck exhibiting significant structural cracking and rusting of the lifeguard station mounting brackets.

The overall site and parking areas appear to be in poor condition with severe asphalt deterioration, tree-planted landscaped islands paved with asphalt (undermining tree health), unclear parking delineation, poor separation of vehicular and pedestrian paved areas (limited curbed areas). The parking lot does appear to have adequate drainage and lighting. The amount of parking adjacent tot the Sports Complex appears to successfully serve current typical needs outside of large events. The western-most parking area is leased to the University of Rochester during the school year for faculty and staff parking.

Sidewalks around the Sports Complex are also in poor condition. Concrete walks near the main building entry show extensive cracking and some surface spalling. Spalling is located particularly at the building entry where poor roof drainage likely necessitates extensive deicing

during winter, further contributing to concrete deterioration. Significant segments of the walks are asphalt paved, with no appropriately clear distinction between the parking area and the pedestrian walks and exhibit similar condition as the asphalt parking with cracking and heaving. Bicycle parking is provided near the vehicular parking area and bus loop. The service building is handicap accessible from the main entry and drop-off loop, however the pool is not currently handicapped accessible.

Exterior Building Observations

The building's walls are constructed mainly of decorative split-face concrete masonry units at the exterior side with traditional CMU exposed to the interior side, both of which appear to be in good structural condition. The main structure for the ice rink building is a steel frame. The roofs of each section are gabled structures framed in steel with standing seam metal panels which also appear to be in good condition. Roofing work / replacement was most recently completed in 2009. City of Rochester staff was not aware of any known roof leaks when asked during the site visit. Exterior windows and doors are in good to fair condition.

Building / Interior

The interior space of the Sports Complex is generally in fair to good condition structurally and generally functions for current use / needs. The interior finishes are dated, many in poor condition and can be characterized as visually unpleasant, especially the service portion of the building that includes offices, locker rooms, restrooms, concessions, skate rental , etc. The interior of the ice rink building could be characterized as slightly more appealing, however this is primarily due to the cavernous nature of the space and that it appears more characteristic to the use. City of Rochester staff has confirmed that interior deficiencies at the restrooms, showers, food service area, and worn finishes are currently being evaluated for an upcoming interior renovation.

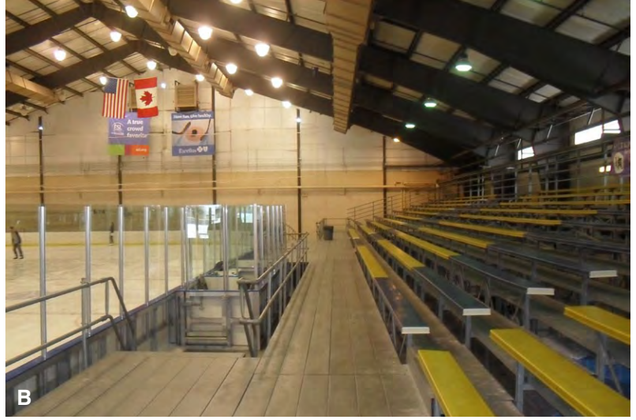
The mechanical, electrical, and plumbing (MEP) systems, including pool and ice rink equipment were not investigated during our field observances, but all appear to be in good operating condition. City records indicate that the building HVAC, ice rink chiller and pool systems systems have recently (2009-2011) been replaced or upgraded and are good working order.

General Analysis

The associated site and exterior of the Genesee Valley Park Sports Complex are in overall fair condition. The interior space of the pool and ice rink service building is structurally in good condition, but does not function entirely as desired in public service areas and many of the finishes are worn, outdated, and in poor condition. The structural exterior of the building is in good condition but lacks contextual relationship to the park or adjacent park features. It is architecturally foreboding, lacking windows, and does not exhibit a pleasing and clean architectural appearance as expected of highly used municipal facilities. The build also negatively affects the park's historic integrity, with no relationship to the park's Period of Significance. The site exterior is also in poor condition does not function well. The building exterior requires significant improvements to parking, pool facilities, and general pedestrian and vehicular circulation.

With recent mechanical upgrades completed and additional upgrades slated for future capital improvement budgets, it's feasible that the existing building may continue to serve existing programming for the next 10 to 20 years. However, the architectural character of the building is intimidating and future expansions to programming may not be feasible or desirable within the current facilities. This building evaluation appears to be substantially consistent with the City of Rochester's most recent building survey, which rated the overall building condition as "Fair" in a possible range of "Excellent, Good, Fair and Poor."


A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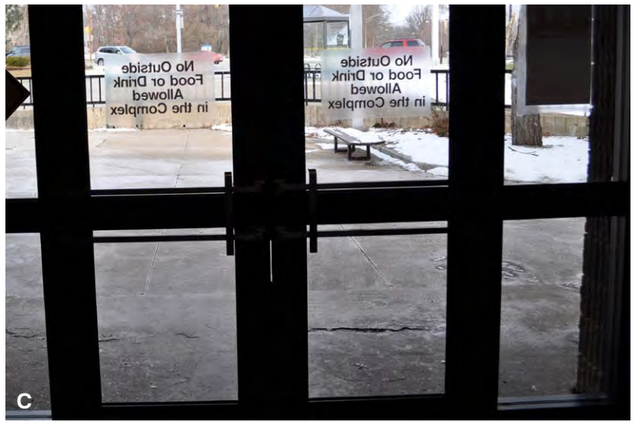


C

D


E


F

A.

Interior locker rooms include undesirable "gang" style shower facilities.

B.

Interior of ice rink functions well but exhibits general worn and outdated appearance.

C.

Paving at exterior exit shows severe concrete spalling and wear, likely from salt use.

D.

Interior main corridor from building entry to locker rooms and ice rink access. Space is narrow and finishes are unattractive.

E.

Exterior sidewalks along main parking lot show severe wear, cracking and are in need of repair.

F.

Interior ice rink area functions well though lacks natural light and finishes are worn. Significant mechanical upgrades to rink slab are currently underway.

A


B


C


D


E

A.

Main entry to the Genesee Valley Field House. The entry fronts Genesee Street and includes a sidewalk from the public right-of-way to the door.

B.

The south side of the Field House exterior included plywood over former windows.

C.

The exterior facade facing the park formerly included access to bathrooms. The bathrooms are no longer accessible from the outside.

D.

The kitchen within the field house is simple and in fair condition, however the finishes, structure and appliances appear structurally weak and may not withstand prolonged public use.

E.

View of southwest exterior of Field House. The gravel area adjacent to the field house is used for exterior events. There is not formal parking area associated with the Field House. Parking often occurs on the turf adjacent the structure.

The Field House

The GVP Field House is located at 1316 Genesee Street, Rochester, N.Y., and is owned and operated by the City of Rochester. The structure was completed in 1964 and has a maximum occupancy of 46. The City of Rochester Department of Parks, Recreation, and Human Services currently rent's this space out to the public to facilitate social gatherings and picnic type functions. It's a single story building, constructed of a masonry structure, with a slab on grade foundation and floor system in fair to poor condition. The most recent park master plan (Kotz & Schnieder) in 1973 anticipated the structure's useful life to be approximately 30 years.

While the Field House is in structurally in good condition and currently serves neighborhood and park as a rentable lodge and intermittent headquarters for selected recreation programs, the building is underutilized and nearing its useful life. Upgrades to features such as window frames and other items have extended the buildings life, but the long range adaptability may depend on the buildings context to adjacent park facilities. The Field House remotely sited away from the majority of high-activity areas of the park and does not include dedicated parking, further limiting its potential use.

Site / Exterior

The Field House is located near ball field #1. There is no vehicle access driveway or off-street parking directly associated with the building. There is a walkway and ramp (installed in 2008) from Genesee Street sidewalk to the main entry of the building and provides a handicapped accessible entry. The perimeter grade adjacent to the Field House has a positive slope away from the building and has some limited evergreen shrubs, turf and a small area of perennials plantings . The landscape is in fair-to-poor condition, with shrubs being in poor condition and significant bare turf areas adjacent to and connecting formal paths, which represent circulation design deficiencies. The south east corner of the building includes an exterior entry to a bathroom that is not currently utilized and includes a step from exterior grade making it inaccessible and not in compliance with ADA accessibility guidelines. Pavement areas show differential settlement where the building walk contacts the existing sidewalk, but are otherwise in fair-to-good condition.

The walls are constructed of CMU (exposed to the interior) with exposed brick veneer at the exterior and are in good condition. Evidence of graffiti removal is visible on at least one exterior wall, including patterned variations in brick color due to cleaning or abrasives. The roof is a low-sloped gabled structure that appears to be in good condition. The fascia appears to be bent or showing minor damaged in several places but otherwise appears to be in fair condition. City of Rochester staff was not aware of any known roof leaks when asked during the site visit. Exterior windows are aluminum framed and appeared to be recently replaced and are also in good condition. Former wood-framed building fenestrations on the south wall appear to have been boarded over on both the interior and exterior. These exterior wood covers show significant wear and appear deteriorated. Exterior hollow metal type doors and frames are in poor condition and exhibit rusting on both the doors and frames.

Building / Interior

The interior space of the Field House consists primarily of an open space used for gathering and cooking for social events and picnics. Within the primary open space, there is a designated kitchen area. Located off of the primary space are toilet rooms, a changing area, and a storage space. The walls are painted CMU and the ceiling is painted plaster. The floor in the primary space is what appears to be asbestos containing floor tile (ACT) in fair condition. The toilet room floors are ceramic mosaic tiles in fair condition, however the wall and floor appear to show signs of separation in places. The exterior restroom (closed at time of visit) is reported to have cracks in the tile floor and is in poor condition. The kitchen counter and appliances are in good to fair condition, but the counters appear to be structurally weak or not constructed of a commercial-grade able to withstand the use and wear expected in a public facility. The toilet room plumbing fixtures and toilet partitions are in fair to poor condition. Restroom finishes are in poor condition and overall the restrooms appear visually unpleasant.

The mechanical, electrical, and plumbing (MEP) systems all appear to be in good working condition. The heating system is a newer horizontal wall mounted unit. There is no air conditioning in this building, however a high wall-

mounted air exhaust fan is located on the east wall. It's operability is unknown. Interior lighting consists of wall mounted fluorescent tubes and appears to be adequate. There is both hot and cold water supply to the sinks.

General Fieldhouse Analysis

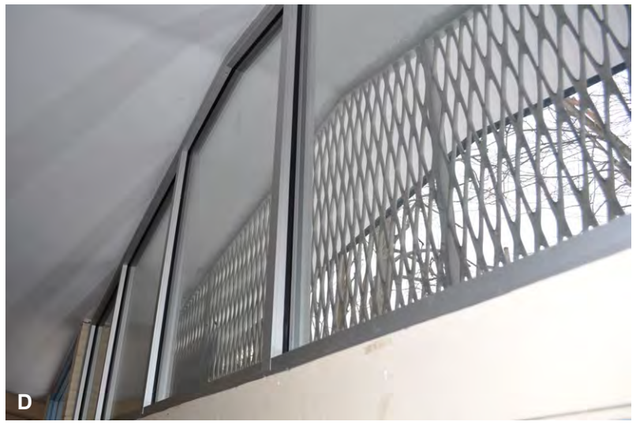
The associated site and exterior of the Field House are in overall fair to poor condition. The interior space of the Field House is structurally in good condition, but selected building elements and the overall building finishes are in poor condition. The building currently serves limited needs of the community for a rentable gathering space as well as limited park recreation programming; however it generally exhibits a worn appearance and will continue to need maintenance upgrades and replacements to extend its useful life. It does not provide clean modern amenities preferred by the community and generally detracts from the visual character of the park. The building's architectural character does not relate to styles found during the park's period of significance. While remotely located relative to the main activity areas of the park, the Field House does relate well to nearby ball fields which it could potentially better serve.

This building evaluation appears to be substantially consistent with the City of Rochester's most recent building survey, which rated the overall building condition as "Poor" in a possible range of "Excellent, Good, Fair and Poor." Improvements made to the windows of the building have slightly extended the buildings useful life since the City's most recent building survey was performed.

A


B


C


D


E

A.

Interior main gathering area with emergency exit towards park.

B.

Restroom finishes are worn in appearance and appear visually unpleasant.

C.

Some interior door frames exhibit rust deterioration.

D.

Windows within the Field House were recently replaced with aluminum frames and are in good condition.

E.

Interior storage area includes storage, fridge and municipal garbage can in the same space.

A

B

C

D

E

F

A.

Entry / drop-off vehicular loop at the Genesee Waterways Center. The main boat house and administrative offices have no clear entry from the parking lot. Exterior storage units places at entry for use by various user groups.

B.

Pedestrian / hand-carry boat access between main boat house (left) and “little” boat house (right). The drop off loop can be seen in the background.

C.

River-side view of the main boat house and GWC administrative offices. The park’s most recent improvements include trail upgrades along the GWC waterfront.

D.

The “little” boat house (left) and the McQuaid boat house as seen from the river edge.

E.

View from Genesee Riverway Trail of the fenced exterior storage area located on the west side of the main boat house.

F.

Vehicular access drive to the exterior storage area includes handicapped parking stalls.

04

The Genesee Waterways Center

The GVP Waterways Center is located at 149 Elmwood Avenue, Rochester, N.Y., and is owned by the City of Rochester. The existing buildings were constructed in multiple phases beginning in 1978, with the most recent addition being less than 10 years old. The facility is leased from the City and operated by the Genesee Waterways Center, a non-profit group that promotes rowing and other water sports. The GWC is managed by an Executive Director and volunteer Board of Directors. The facility consists of three main buildings and site features, referred to as follows:

The Marina/Maintenance Building (Big Boat House)
The Small Boat House
The McQuaid Boat House
Small prefabricated storage sheds (3 total)
Dock facilities (permanent and seasonal)
Outdoor storage yard (fenced)

The Genesee Waterways Center has maintained and adapted their programs to function within their existing facilities since 1996. However, due to the increasing popularity and accessibility of water sports in the Greater Rochester area, the GWC has outgrown its existing facilities, which is hindering the potential growth of existing and future programs. The proposed program increase would not only allow for the necessary training and storage space, but would also promote and encourage more use of the Genesee Valley Park.

The GWC currently has nine rowing programs using their facilities. Each of these programs ranges from about 14 to over 200 people, and continue to grow and increase the need for boat/equipment storage. As they grow, these programs are getting more competitive in both local and national competition, and the training becomes year-round. What was once just needed as a facility for boat storage, GWC is now experiencing the need and demand to evolve into an entire rowing training facility.

Site / Exterior

This facility is located within the park along the Genesee River at the south end of the parking bays, which extend from the vehicular entry on Elmwood Avenue. There is an access driveway and parking directly associated with the facility, which includes a looped drop off with a flush curb that facilitates unloading and loading of a limited number of boat trailers. The overall site and parking areas appear to be in generally fair condition with adequate drainage and lighting, and fairly limited pavement failure areas, however several circulation conflicts exist between the parking areas, pedestrian walks, handicapped parking, river trail, boat house bay doors and dock facilities.

The facility includes a drop off loop on the north side of the building which is paved in asphalt. The loop is predominantly curbed with granite, however flush curb provides temporary vehicular and trailer access to the riverfront dock facilities between the main boat house (administrative office) and the little boat house. Paved pedestrian areas are asphalt and no clear distinction is made between vehicular and pedestrian circulation near the building’s main pedestrian entry door. The main door entryway consists of a accessible ramp that ends at an asphalt space that is periodically occupied by cars or trailers.

Exterior storage exists at the west end of the facility, with garage door access to the main boat house and PVC coated chain-link gate access to both the river front trail/docks (south side) and the vehicular parking/drive areas (north side). The exterior storage area is well maintained by the GWC, however the fenced-in area is visually prominent along the river trail and east side of Genesee Valley Park and detracts from the riverfront experience. Three additional small prefabricated storage sheds exist on the north side of the main building which used by various rowing groups.

Accessible parking exists on the north side of the main building; however there is no dedicated pedestrian walk from accessible parking stalls to the main building entry. The accessible parking area is also in conflict with a vehicular access drive leading to the exterior storage yard which likely supports extended parking for vehicles and trailers loading/unloading and conflicts with the use of the accessible parking area.

Genesee River Trail improvements adjacent to the GWC were completed within the last ten years by the City with support from the NYS Environmental Protection Fund. These include landscaping, railings, docks, limited lighting,

and textured paving (stamped asphalt) likely meant to alert trail users of potential conflicts with boat activities.

Dock facilities extend along the river across the majority of the building frontages. The dock conditions range from good to poor, with several styles and types sprawling along the river front. Pedestrian conflicts have been an ongoing concern between the GWC facility and the docks, as the Genesee River Trail (leading to all points north and south) runs along the river's edge. Actual conflicts between trail users and rowers are reportedly rare; however, the potential is there and is severely increased during the handful of yearly high-attendance events.

Lighting in the site appears to be adequate but the numerous "cobra-head" style light poles visually detract from the park's river front and trail experience. A limited number of historically appropriate post-top fixtures were installed as part of the Environmental Protection Fund improvements, but these are limited to one area along the river trail near the exterior storage yard.

Extensive turf damage and maintenance issues exist due to vehicles and trailers parking in grass areas along the river and near the outfield of Ball Diamond #4. This has been mitigated somewhat by provisioning gravel / stone dust along the vehicular access areas adjacent to the McQuaid boathouse, however the site is clearly not designed to handle the vehicle, trailer and access needs of rowers and other water sports groups.

Ornamental landscaping at the GWC is well maintained and shows the highest concentration of ornamental shrubs, grasses and perennial/annual gardens within the park. A small boat-themed garden exists on the interior of the turning circle and is well maintained.

The Marina / Maintenance Building (Big Boat House)

This is a one story slab on grade building with exterior walls constructed mainly of split fluted masonry block with some upper portions framed in wood with wood siding. The roof is wood framed with gable and shed type structures. Windows are a combination of what appears to be original wood windows and vinyl replacement windows. The structure itself is in good condition, but many of the exterior components are in fair to poor condition. City of Rochester and GWC staff state that there are roof leaks. Remaining wood windows are in poor condition, and exposed wood elements including siding, trim, fascia, and soffits need to be repainted.

The interior of the marina / maintenance building is divided into two primary spaces,including a high bay garage and an administrative space.

The garage space is used for boat storage, equipment storage, and maintenance of boats and equipment. The floor is exposed concrete in good condition. The walls are painted exposed CMU in good to fair condition, with several areas that appear to need repointing near the floor. The ceiling is painted gypsum board in poor condition mainly due to exposure to roof leaks. There are two types of overhead doors including sectional and coiling ranging from good to fair condition. Exterior hollow metal doors and frames are in poor condition. The garage space was originally used for City vehicle storage and is part of the original building construction phase begun in 1978. The space functions as boat storage for the GWC, although its storage capacity has reached its limit to the extent that boats and kayaks are being stored outdoors. Since the garage was never designed for boat storage and rowing purposes, the arrangement and relationship of the bay doors to both the river and to parking / trailer areas is poor and awkward. This space does not function properly for equipment storage and general maintenance space. The space currently unheated and is too large to efficiently and effectively heat, thus requiring specialized boat repair to be performed off site, only in the warm season, or within a temporarily constructed and heated tarp space.

The administrative space has offices for Genesee Waterways Center staff, a meeting room, and men's and women's toilet rooms. The facility meeting room also serves as a fitness area and indoor training room / classroom. The walls are painted CMU and the ceilings are painted gypsum board both in generally good structural condition. The floors throughout this space are either exposed concrete in good condition or carpeting in fair to poor condition. The toilet rooms appear to be in good working condition but features, fixtures and finishes are in fair to poor condition and are generally outdated and do not serve the needs of the users. The building has no formal locker rooms or shower facilities which is requisite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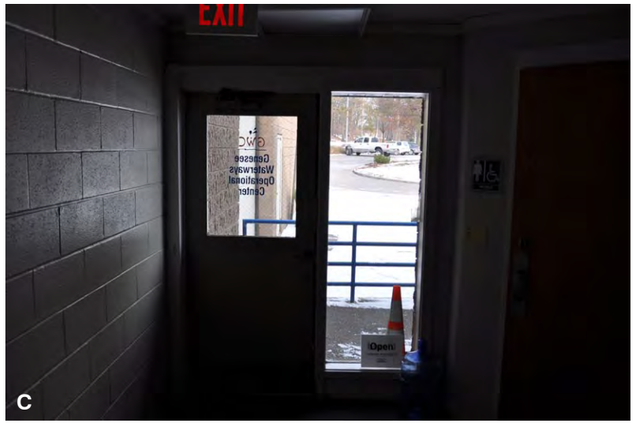

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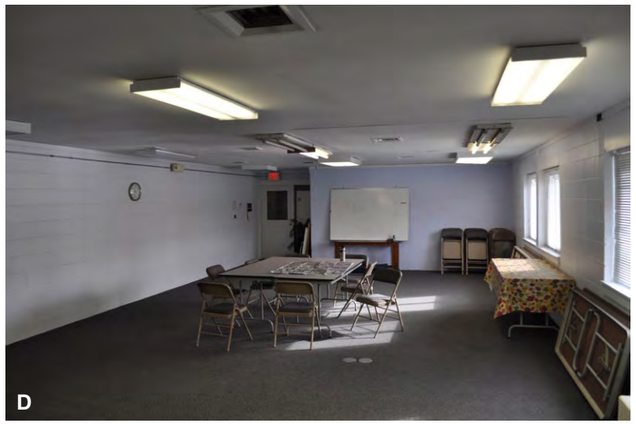
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F

A.

Ad-hoc vehicular access way from parking lot / drop-off loop to bay doors of McQuaid boat house (far side of building). Access way skirts outfield fence of Ball Field #4. Trailer parking is often accommodated along this access drive in the lawn as no formal trailer parking exists in the park.

B.

Exterior storage area in winter. No additional indoor storage exists as the GWC has outgrown the facility.

C.

Main entry to the GWC. The building was originally designed as small park maintenance and marina facility.

D.

Meeting room in the GWC. This is the largest room in the facility and accommodates both organizational meetings, classes, exercise / fitness rowing equipment,and general community use.

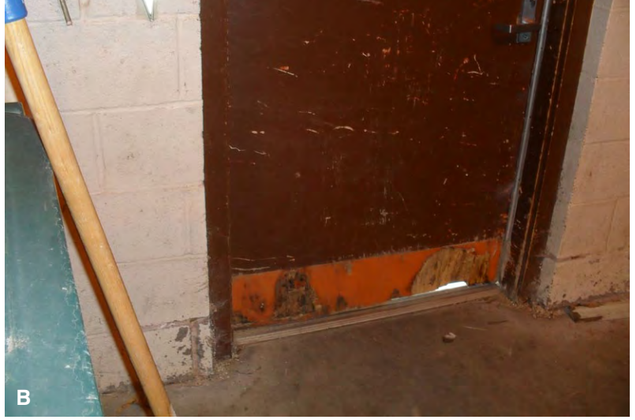
E.

Restroom shows its age and unintended use as a sports facility - the restrooms have no showers or other locker room amenities that typically serve a rowing center.

F.

Main storage bay in the main ("big") boat house. The GWC fills every available storage space. Additional boat bays are needed, including a heated bay for repairs.


A


B


C


D


E

A.

Rower “locker” spaces within the main storage bay of the big boat house. No other traditional locker facilities exist on site for rowers.

B.

Many of the finishes within the facility are worn, in need of repair or otherwise can be categorized as being in poor conditions.

C.

River-side view of the main boat house and GWC administrative offices. The park’s most recent improvements include trail upgrades along the GWC waterfront.

D.

The McQuaid Boat House is a one story slab on grade metal building. The structure was built with private funds and was designed to be purely utilitarian in nature, to serve as additional boat storage for expanding programs.

E.

View of GWC from the east side of Genesee Valley Park. The GWc is well used and is functioning at capacity of current facilities, however, the architecture style is not compatable with that of the overall historic Olmsted-designed park.

for the rowing groups and recreation users. Overall, the administrative space is in fair to poor condition. It is well maintained within a small budget by the GWC, but the potential usage is restricted due to the overall lack of square footage, lack of modern rowing and boat house amenities, efficient HVAC systems, locker rooms, showers and dedicated fitness areas.

The mechanical, electrical, and plumbing (MEP) systems were not investigated. Based on the City’s most current building survey (dated 5/26/2010) and brief discussions with City of Rochester and GWC staff, it’s determined that the heating system in the garage space was removed and never replaced, and the HVAC system in the administrative space is an oil burning forced air system in good working condition. Lighting throughout both spaces appeared to be in fair to poor condition.

The Small Boat House

The auxiliary boat storage building, known as the “Small Boat House,” is a one story slab on grade garage-type structure with exterior walls constructed mainly of split fluted masonry block with some upper portions framed in wood with wood siding. The roof is a wood gable truss structure with the trusses exposed to the inside. The structure itself is in good condition. The interior space is in good condition. This building is used for boat and general storage and functions as it should, however the space is fully utilized and has reached it’s current capacity. It does not allow for future expansion of programs or users at the GWC. Also, similar to the larger boat house garage, the building’s bay doors have a poor relationship to both the river and trailer loading areas. The mechanical, electrical, and plumbing (MEP) systems were not investigated during this review.

The McQuaid Boat House

The McQuaid Boat House is a privately-owned one story slab on grade metal building serving the organization known as the Friends of Scholastic Crew. The structure is a permitted temporary structure, built on public park land, built in 2006 with private funds. It was designed to be utilitarian in nature, to serve as additional boat storage for expanding programs. The entire building is in good condition, but has a poor visual and atheistic relationship to the park’s waterfront context and is not compatible with the park’s historic period of significance. Bay doors are remotely located away from existing paved vehicular circulation areas and contribute to the overall poor circulation and parking trailer loading/unloading conflicts of the site. This building is used for boat and general storage and functions as it should, only more space is currently needed to expand GWC programs. The mechanical, electrical, and plumbing (MEP) systems were not investigated during this review.

General Analysis

The overall condition of the marina and maintenance buildings (Genesee Waterways Center) can be categorized as being in poor condition. The main administrative building and associated garage (Big Boat House) was originally designed as a parks and maintenance office and for truck storage. The facility has also historically served as a boat livery for municipal canoe rentals, which continue to this day, but it was never intended to serve as a full-service rowing and water sports center as the GWC currently operates. The GWC and local rowing community has successfully maintained the building and adapted it to suit their needs as the growth of both private clubs and academic rowing programs has significantly increased over the years. However, the building and associated space has been outgrown in many aspects and does not function as necessary. Both the interior and exterior of the building prohibit expanded growth of the rowing programs due to inadequate facilities and the buildings do not architecturally compliment the historic parkland or public waterfront. The structures also include no architectural references or visual links to the park’s historic period of significance.

This building evaluation appears to be substantially consistent with the City of Rochester’s most recent building survey, which rated the overall building condition as “Poor” in a possible range of “Excellent, Good, Fair and Poor.” The City’s most recent building survey does not appear to include the privately owned metal-sided boat house / garage referred to as the McQuaid Boat House.

Waterfront Dock Facilities

Several docks comprise the riverfront facilities at Genesee Waterways Center at Genesee Valley Park West. These facilities are intended to fulfill the needs of Waterways Center patrons and serve as a hand-carry launch for public rowers and paddlers. It is understood that occasionally motorized recreational craft will use the docks while the operators are attending functions in the park.

Facility descriptions are generally provided in an upstream to downstream (south to north) manner. Descriptions are general in nature, and are not intended to supplement or replace detailed physical inspections that would characterize deficiencies and/or suitability for their intended use.

The walk-through site visit with GWC staff occurred on February 7, 2013. At this time, only a portion of docks were found to be in place; as is customary practice, a portion of the dock systems had been removed and stored in an upland location as a means of winterization. However, in addition to the anecdotal information obtained during the site visit, aerial photographic images and other site visits have provided sufficient information to inventory and describe the existing facilities.

Riverfront Shoreline

The riverfront shoreline in the vicinity of the site, upstream and downstream of the dock areas, was generally found to be heavily vegetated with low scrub-type brush, with near shore moderate to large mostly native tree species, including Cottonwood and Sycamore. A cursory review of shoreline conditions showed neither discernible areas of installed bank stabilization (rip rap) nor any significant areas of undercut or scour. In this regard, it appears that the natural riverbank both upstream and downstream of the docks is generally stable in its present form.

Much of the area along the shoreline immediately landward of the dock systems show evidence of sediment accretion, vegetative debris and trash collection, and the establishment of Typha (cattail, bulrush) plant material. The establishment of shallow, slow moving water, near shore plant material is indicative that the natural river flow patterns have been disrupted in the vicinity of the docks; the resulting sediment accretion may result in long-term maintenance issues associated with providing sufficient water depth to maintain the dock system in a floating condition.

Unless displaced by natural processes (scour due to abnormally high river velocities) sediment may continue to accrete until the floating docks ground out. To restore the docks to a floating condition, maintenance dredging (underwater excavation and disposal of sediment material) would need to occur. Dredging can be costly, and also requires review and concurrence from involved regulatory agencies (e.g. Corps of Engineers, NYSDEC, NYSDOS, NYSOPRHP, others).

Paddler Docks

The southernmost (upstream) docks are intended for use as courtesy launch/embark/disembark facilities for paddlers. The existing dock system is approximately 195 feet in length, 8 feet in width, has low freeboard (approximately 6 to 8 inches) and consists of proprietary modular interlocking high density polyethylene (HDPE) floatation units. It appears that the docks are anchored in place with incrementally located small steel pipe driven into the river bottom; these pipes are located on the landward side of the docks.

The downstream end of the existing docks is provided with a transitional landward extension of the HDPE units; this approximate 6-foot wide by 20-foot long HDPE modular unit area transitions from a 20-foot long, 16 foot wide floating timber dock/platform to the alongshore oriented dock. The floating timber platform is accessed by way of an approximate 15-foot wide, 20-foot long aluminum framed, timber decked gangway.

The existing HDPE modular interlocking dock manufacturer is VersaDock:
http://www.versadock.com/index.htm
Other similar manufactured products intended specifically for low freeboard rower and paddler facilities are available; two of these manufacturers are Accudock and Connect-A-Dock:
http://www.accudock.com/
http://www.connectadock.com/index.htm

A.

Aerial photo of Genesee Waterways Center existing dock facilities. Inventory and analysis of facilities generally described from upstream to downstream, as shown.

B.

Upstream paddler docks provided for open access to hand-carry boaters, kayak and canoe rentals, view looking southwest.

C.

Ramps and Floating Timber Platform for Upstream Paddler Dock Access

D.

View of paddler dock ramp from trail along river.

A.

Rower Docks, looking North

B.

Rower Docks, looking South

C.

“Strong-Arm” Dock Mooring System

D.

Steel Pipe Piles with Roller Guides

E.

Accessible Gangway to rower docks

F.

Rower Access Gangway; note uneven toe, and lack of hinge plate (tripping hazards)

Interlocking HPDE flotation units are frequently used for paddler and rowing facilities, since they provide the low freeboard desired, are relatively inexpensive, and can be easily disassembled and reassembled for removal and reinstallation. Their modular nature also allows for the replacement of individual elements, should damage occur. However, HDPE flotation units and dock systems have several disadvantages. Due to their flexible, interlocking connections and light weight they tend to move underfoot more than other types of dock systems. This movement can give the perception of instability, and cause unease on the part of the user. HDPE is also subject to impact damage, and is less durable than other types of docks. HDPE requires UV stabilizers, and can break down in sunlight over a long period of time. Finally, since the units are modular, there can be slight variations in the walking surface, and there is some risk of tripping hazard.

Rowing Docks

The middle set of docks is intended primarily for use as launch/embark/disembark facilities for rowers. The existing dock system is approximately 240 feet in length, 8 feet in width, has moderate freeboard (approximately 14 to 18 inches) and consists of proprietary aluminum framing and aluminum decking; the flotation system is assumed to be polyethylene encapsulated expanded polystyrene foam. The primary dock system is provided with three landward-projecting integral platforms, one at each end and one centrally located. The upstream and middle platforms receive brow and gangway systems; the upstream (southerly) platform is approximately 58 feet long by 8 feet wide and accommodates an accessible gangway, complete with intermediate landing. The middle platform is approximately 30 feet long by 8 feet wide, and accommodates the primary launch and load gangway for the racing shells. The downstream platform is approximately 12 feet long by 8 feet wide, and is currently unoccupied.

The rowing docks are anchored in place with the use of a triangulated “strong-arm” system that cantilevers from the dock to a system of concrete foundations installed within the riverbank. Strong-arm systems are designed to articulate to allow upward and downward motion of the docks to accommodate fluctuations in water surface elevations, while maintaining relative position of the docks. In addition, a series of steel pipe piles with roller guides is provided at the upstream platform area.

The dock manufacturer of the existing aluminum rowing dock is T.A. Dock Systems, Inc. A website for the existing dock manufacturer was not identified; it is not known if the manufacturer went out of business, or was acquired by another manufacturer.

The accessible gangway is approximately 65-feet long, is articulated, and is provided with an intermediate landing approximately 5-feet long. The accessible gangway is oriented approximately parallel with the shoreline. A fixed, caisson-supported steel framed platform with a timber deck provides landward access to the gangway.

The primary race shell / rower gangway is approximately 22 feet long, 16 feet wide. It is configured as a timber-decked gangway, with raised timber ribs. It was noted that the toe of the gangway is uneven, and a portion projects above the platform on which it lands. Similarly, it was noted that a hinge plate at the toe of the gangway was absent, which represents a potential tripping hazard.

It is understood that during certain periods, supplemental docks are placed on the river side of the aluminum framed floating dock system. These supplemental docks include both HDPE segments and timber framed floating platform systems. These are provided to afford easier access for the rowers, due to the excessive freeboard that the aluminum system provides. Excessive freeboard is the single largest detriment that is attributed to the aluminum dock system; 6 to 8 inches of freeboard would be desirable, whereas the system currently affords 2 to 3 times that much. The excessive freeboard leads to difficulty in launching and retrieving the shells, rower access, and rower disembarkation.

The northernmost docks, those located furthest downstream, are reportedly privately-owned and maintained. The primary docks are approximately 82 feet in length, 6 feet in width, with supplemental and adjacent platforms and dock systems. The primary docks appear to be interlocking HDPE units (Connect-A-Dock, or similar) while the platform and adjacent docks appear to be

aluminum framed, aluminum decked, conventional floating dock systems. The dock is accessed with an aluminum framed gangway. The dock restraint system appears to be moderate diameter steel pipe driven into the riverbed; when observed, the piling was inclined from the vertical, and one was loosely chained to a stake in the shoreline for additional support.

Dock Facility Observations

From the site inventory, anecdotal discussions with the operators and users of the facilities, and general principles regarding the planning and design of recreational facilities for use by rowers, paddlers, and the general boating public, the following observations on existing waterfront dock features were made:

Insufficient Dockage: During times of peak demand, insufficient dockage exists to accommodate the needs of the users.

Excessive Freeboard: The aluminum framed docks intended for the rowers provides freeboard that exceeds recommended parameters for rowing and paddling facilities.

Sediment: Sediment accrual along some shoreline areas is high due to the generally high turbidity of the Genesee River. Some areas along the shoreline receive less sediment accrual due to the hydrological characteristics.

Unstable Docks: The existing dock systems consisting of modular HDPE cells are unstable and less durable than low freeboard concrete or aluminum framed systems.

Lack of Boat Launch: There is no dedicated launch and retrieval ramp for small motorized aluminum chase boats.

No Beach-Entry Facilities: Mechanical docking system does not provide comfortable water entry-/exit solution to novice kayak paddlers, who prefer shallow grade beach-entry scenarios.

Vehicular Circulation: Vehicular circulation and accessibility areas for car-top launch and retrieval is not convenient for park users and does not provide dedicated trailer parking.

Safety Issues: Several minor safety issues were noted, Including tripping hazards near docks, no obvious life-ring or rescue rope stanchion, no emergency call boxes, and anchoring pin-piles are missing safety caps.

Pin & Pile System Insufficient: Pin and pile dock anchoring installations appear to provide insufficient capacity for the quantity and/or size of the anchored docks and show signs of undesirable movement. Periods of high velocity river current may undermine pilings or pull docks from anchoring.

Debris: Docks are not adequately protected from vegetation and other large floating debris, such as logs and ice floe (for docks that remain in water during winter).


A


B


C


D


E

A.

Privately Owned Rower Docks

B.

Privately Owned Rower Docks, during seasonal removal

C.

Ramp from riverway trail to privately owned boat docks

D.

View looking southwest (upstream) from privately owned rower docks.

E.

View from rower docks looking across river towards Genesee Valley Park (east bank).

Visual Disruptions Along the River

Current visual disruptions that can be seen along the river from the eastern side of the park inlcude:

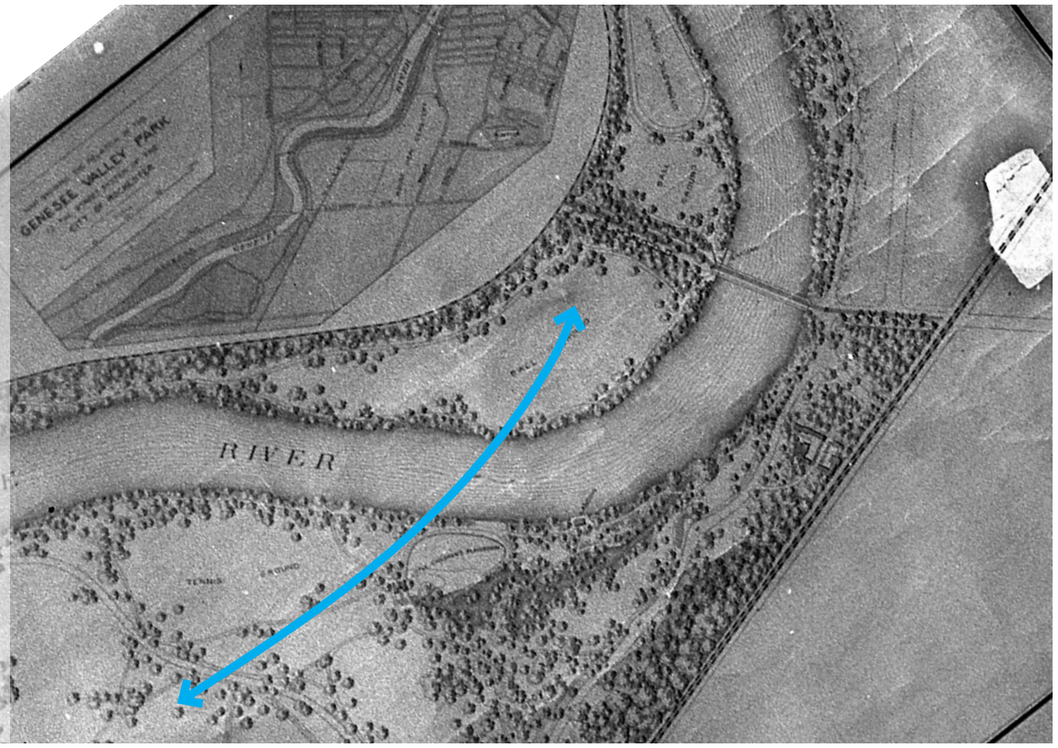
1. Ice Rink / Sports Complex
2. Ball Field #4 (fencing, lights, backstop)
3. Genesee Waterways Center
4. Docking Infrastructure

Olmsted's River Plain

Olmsted's original decision to select this land for what was to become the whole of Genesee Valley Park, was to preserve unspoiled views of the river and the floodplain landscape for the enjoyment of park users. Olmsted repeatedly advised that buildings should be moved *north* of Elmwood Avenue.

However, pressure from private groups wanting their buildings to be set within Olmsted's river plain - and thereby to experience this park's views - ultimately prevailed. This set a precedent of constructing highly visible infrastructure along the western river bank that that continues to this day.

Beyond recreational structures fronting the west bank of the river, subsequent Olmsted plans struggles to visually and experientially tie the park back together after Canal construction severed the park. Much later, Interstate 390 did the same thing.



The Park's Visual Quality

Genesee Valley Park & the River

The park's beginnings are deeply rooted in preserving the visual character of the wide river plain. It is valuable to understand the history behind the park's original plan to understand the importance of present day visual character. When the city's Parks Commission selected Olmsted to design the Rochester park system he repeatedly advised city officials to obtain as much land as possible along the river. Olmsted favored working along the river due to the innate beauty of the city's most significant natural asset.

By being located, at what was in 1888, quite far outside the city, the site for GVP was unspoiled by industry and the hurried and often dirty landscape of urban life. GVP was to be a place where Olmsted could apply one of his signature design styles to the landscape: the pastoral style. His pastoral designs featured vast rolling expanses of green among water bodies and groves of trees, intended to provide soothing and restorative feelings. Genesee Valley Park, as a whole, was to be the peaceful compliment to the more rugged landscape of Seneca Park to the north.

Consequently, the most significant role of GVPW's visual character was to preserve unspoiled views from the larger river plain and meadows on the east side. The visual quality of GVPW is inextricably linked to the larger eastern portion of Genesee Valley Park by the basin-like topography and the recurrent framed views of sinuous river bank. This was the case when Olmsted prepared the park's first Master Plan in 1890 and it is still the case today despite the myriad of visual and physical disruptions that segment park's landscape.

Olmsted repeatedly advised city officials that the park's allied landscape views of the east and west sides of the river, below Elmwood Avenue, should be preserved at all costs. The iterative and Park's Commission-inclusive process of developing the original master plan placed great emphasis on this concept: That the views between the east and west sides of the river below Elmwood Avenue should be unspoiled by structures in order for park users to fully experience restorative powers of the landscape. While Olmsted's design provisioned space for active recreation on the west side of the river, the Master Plan called for all structures and intensive recreational uses to be placed north of Elmwood Avenue, closer to the city and the nearby "hamlet" once known as Castletown (present day Brooks Landing).

Too Attractive to Resist?

In some respects, Olmsted's grand vision for Genesee Valley Park proved too successful. The magnificent views of rolling topography, river plain and meadows on the east side of the river proved too irresistible. Shortly after Olmsted's master plan was complete, the Parks Commission, against Olmsted's objections, yielded to lobbying from the Rochester Athletic Club to build a private clubhouse on the western side of the river. It would have luxurious unspoiled views of parkland on the east side of the river.

The desire to erect structures that would take advantage of the park's powerful restorative views was too appealing to resist, and in doing so, the Olmsted vision had been compromised. Though described by Olmsted scholar Charles Beveridge as one of the world's "six great examples of pastoral park landscapes" designed by Frederick Law Olmsted – the design was heavily dependent on preserving views and it was never fully realized. Views from the entirety of Genesee Valley Park south of Elmwood, from both the east and west banks of the river, would share their wide river bank panoramas, the meadows, rolling hills and wooded groves – with structures.

The visual character is an important part of the historic integrity of the park – which has a direct impact on likely future historic status that may apply to GVP – that being the National Register of Historic Places and a National Historic Landmark. These historic designations significantly expand the possible funding sources for park improvements but each intervention in the park needs to be thoughtfully planned within the parks historic context.

The Park's Visual Conundrum

The overall visual and spatial challenge for the future of both sides of Genesee Valley Park, then, is how to enhance and preserve the visual character while at the same time providing the recreational services the community desires.

General Visual Analysis & Issues

Views Across the River: Views of the river plain from Genesee Valley Park (east) are negatively affected by the various marina / storage buildings, docks, fenced storage yards, sports complex buildings (ice rink).

Spectator Viewing: Spectator viewing areas along the river bank include moveable bleachers (both sides of the river) that clutter the visual character of the river edge. Many spectators line the river edge and fill bleachers during events and a smaller number of viewers use the bleachers for passive use or for general daily watersports viewing.

Baseball field #4: Baseball field #4 is a full size field and includes tall lights, yellow safety fencing and other baseball related infrastructure. The nearby river trail and outfield perimeter are also used for GWC trailer parking, which negatively affects views along the river.

Olmsted Bridge: The "Olmsted bridge" over the Erie Canal in GVPW is a beloved iconic structure in the city. Photographs of this bridge are used in innumerable promotional and marketing materials for the region and it has become a symbol of Rochester's historic parks system and Erie Canal legacy. The bridge itself facilitates the most magnificent views of Genesee Valley Park, where one is able to see the confluence of river and canal waters, the line of reoccurring bridges on the eastern side, and the wooded and grassy promontory of the eastern park's meadow. One of the most magnificent views of the bridge is from a wooded glade at the river's edge.

Canal/River-side Glade: Just at the foot of the Olmstead bridge on the canal's northern bank, where the canal and Genesee River meet, is a low depression allows for perhaps the most spectacular view of the bridge. A natural allee of white oaks frame the bridge and turn it into a magnificent focal point. The glade is a unique visual feature due to bowl-shaped landforming, the mature white oaks and clear views to the water. However, the land is owned by the State of New York's Canal Corporation and the glade is used for employee parking and docking of canal Corporation boats and dredges.

Railroad Bridge: The railroad bridge is currently closed off to pedestrian access but is a historic asset to the park and a unique industrial relic of the former land use history. Though not as widely independently photographed as the Olmsted bridges, the railroad bridge had become a landmark of the park's visual experience.

Riverfront Vegetation: Vegetation is thick and screens the majority of riverfront. Areas of substantial clearing are managed for practical access and high-use considerations, such as the Genesee Waterways Center. Thus, buildings or higher visbility recreational infrastructure dominates most of the views into the park from the river and from the east.

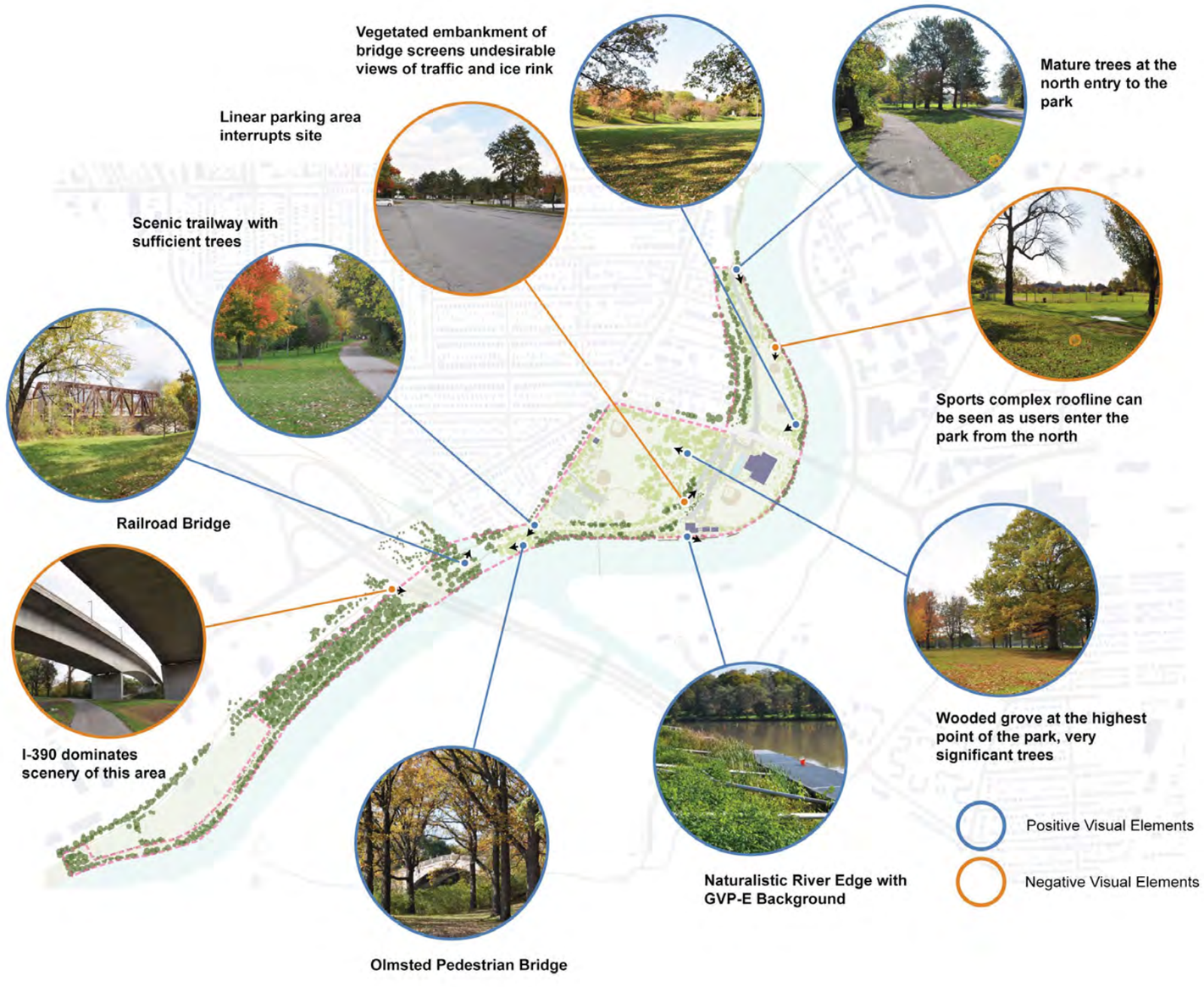
Industrial Land Uses: Adjacent land uses south of I-390 include former and active industrial uses, which negatively affect the visual experience along the wooded "natural" trails in the south end of the park.

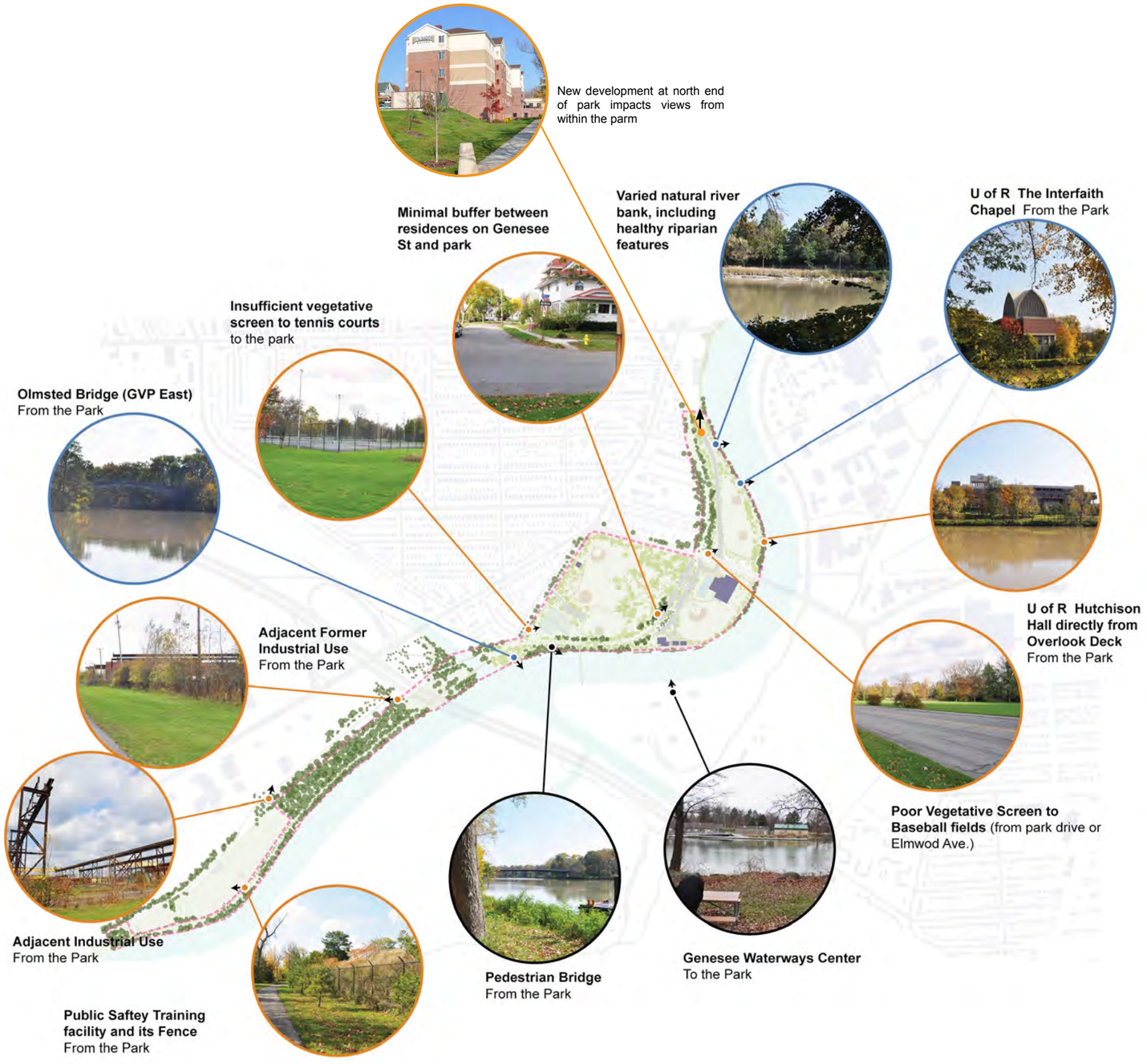
Public Safety Training Facility: The Monroe County Police / Fire training facility includes non-park or incompatible uses (parkland alienation) uses. The incompatible with the wooded trails and river front of the southern portion of the park. The facility has an entirely secure and fenced perimeter, with some berming (generally for safety) and evergreen tree screening.

I-390 Overpass: The I-390 overpass dominates the visual experience in a large area south of the Erie Canal. The overpass is high above the trail, but the limited screening, low grass vegetation (or inability to grow grass under the overpass), maintenance access, and large expanses of concrete have a negative affect on the visual character south of the canal. Noise is also a common concern for trail users as vehicles above travel at high speeds.

Southern River Bank: The southern wooded section of the park includes particularly limited opportunities to view the river or eastern bank. Views of the eastern bank of the river along this section of GVPW are also dominated by an intense vegetation buffer between the river and the GVP golf course.

Pedestrian Bridge: Views from the pedestrian bridge connecting the east and west sides of the park are well loved by the community and visitors. Many bikers and walkers stop along the bridge to take photos, the bridge is both an excellent vantage point to watch watersports





events and to see the Olmsted bridge over the canal in GVPW.

Ball Field #5 and #6 Views: Views from Elmwood Avenue to the northern ball fields are very broad and excessively wide without consideration to framing views or screening the intersection for park users. Views of the entire northern parcel of the park from are unframed and broad.

Elmwood Avenue Entrance: The park entrance at Elmwood Avenue is visually impacted by several negative factors, which include the expanse of pavement and miss-aligned driveways, the lack of screening or framing of views, views of the uninviting and out-of-context architecture of the sports complex, and views of the chain-link surrounded pool deck. The entry includes some small screening vegetation but overall does not visually signify that it is an entry to a grand historic riverfront park.

Vegetated / Emergent River Edge: Views of naturally colonized emergent vegetation along sedimentation deposit areas near the river bank and outside the navigation channel are attractive and should be preserved or enhanced through selective clearing.

Hutchinson Hall (UR): The University of Rochester's Hutchinson Hall dominates views from the park towards the east bank of the river, north of Elmwood Avenue. The existing overlook deck along GVPW's riverway trail focus views to this large building façade.

Interfaith Chapel (UR): Views across the river to the University of Rochester's Interfaith Chapel are more pleasing than other University buildings along the eastern bank of the river. This is due to the architectural style and the buildings focus on and relationship the river – an apparent design characteristic of the building itself.

Wooded Grove: The wooded grove is sited on the highest elevation of GVPW and features a substantial number of historically significant trees. Beyond the size and age of many of the trees, much of the grove's uniqueness and appeal involves the clustering and irregular patterns of the trees, and the ratio and orientation of trees to grassy openings.

Linear Parking: The linear parking associated with the sports complex and marina area dominates the internal landscape of the lower riverfront portion of the park. The long parking interrupts the site and fragments use and the visual character of nearby elements, such as the wooded grove.

Northern Entry to Park: New commercial development at the park's northern end has impacted views form the park toward the north. The new hotel adjacent to the park was built high upon a topographic rise and can be seen from the park. Additionally, a new housing structure (high rise) is being erected that will be visible from the park. Mature trees help screen the lower ball fields and river front area from the hotel's façade and parking, but the entire development is very prominent when looking northward along the old Genesee Valley Canal / railroad corridor.

Genesee Street: The intersection of Elmwood Ave / Scottsville Rd / Genesee St is the very periphery of the park and the park's publicly viewed "front porch" to the neighborhood. This point of the park extends the furthest into the intact residential street grid and is a highly visual public face of the park. The corner is dominated by the chainlink backstop of a ball field #1. It does feature a park sign, but lacks a clear visual pedestrian entry to the park and the view does little else to signify the magnitude and experience of the park.

UR Pedestrian Bridge: Views from the pedestrian bridge linking the University to the Brooks Landing area are unique in that they feature impressive panoramas of sedimentation and naturalistic ecological areas along the river below. These are somewhat uncharacteristic of the river as it flows closer to the city center and become increasingly channelized. Views from the bridge southward also align directly with GVPW's northern ball fields, north of Elmwood Avenue – however the dense vegetation limits the viewshed to the river's banks.

Site Photos

A.

The architectural massing and style of the Ice Rink structure is inconsistent with the character expected of an historic Olmsted-designed park. It's highly visible from many areas witin both the east and west sides of Genesee Valley Park.

B.

While the cluster of colorful Amure Maple trees along the Elmwood bridge embankment provides visual interest and some building screening, the Ice Rink structure's roof line is very prominent in the landscape.

C.

View of Ice Rink structure from the Genesee Riverway Trail. The blank facade is screened by some trees, however the building itself has no relationship to the landscape, the river or the park's historic period of significance.

D.

The existing Riverway Trail seen heading south near Ball Diamond #4. The wiggling back and forth of the trail is uncharacteristic of an Olmsted designed pathway, where the arcs are much broader and smoother.

E.

The Genesee Waterways Center enjoys increasing popularity among users, and relatively recent trail improvements have introduced plantings, however the structure's riverfront facade consists primarily of blank walls contributed to both a negative user expedience and impacts views from GVP-East.

F.

The Ice Rink structure can be seen from many areas of the park, including the Genesee Waterways Center drop off. Beyond and concealed by the building is the Elmwood bridge embankment which includes a vegetated slope.

G.

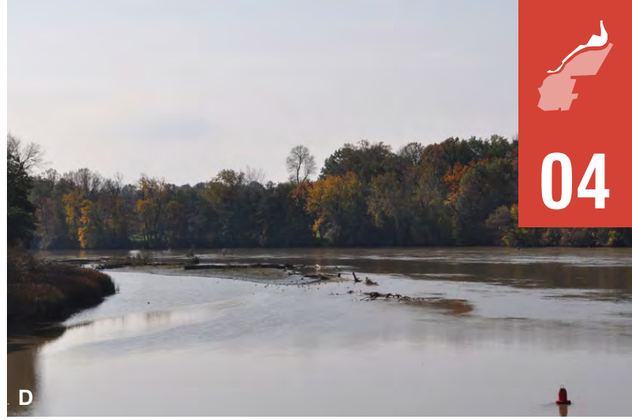
The Genesee Riverway Trail heading south towards the GWC's McQuaid Boat House. Note trailer parking in lawn areas along the river which heavily impact the visual character of the park. Parking in lawn areas occurs regularly, even outside of Sports Tourism events.

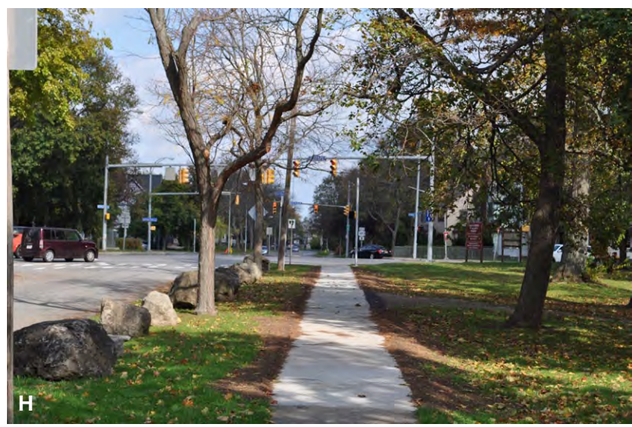
H.

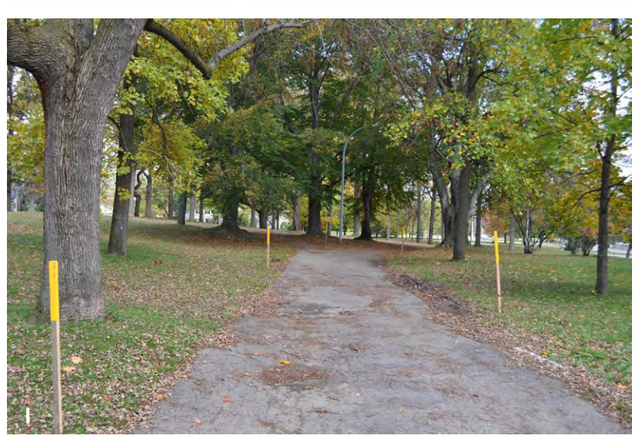
Outfield fencing and field lights are both highly visible from both sides of the riverfront. Infrastructure-heavy recreational amenities have a place in GVPW but distract from the otherwise beautiful meandering river that Olmsted attempted to protect.

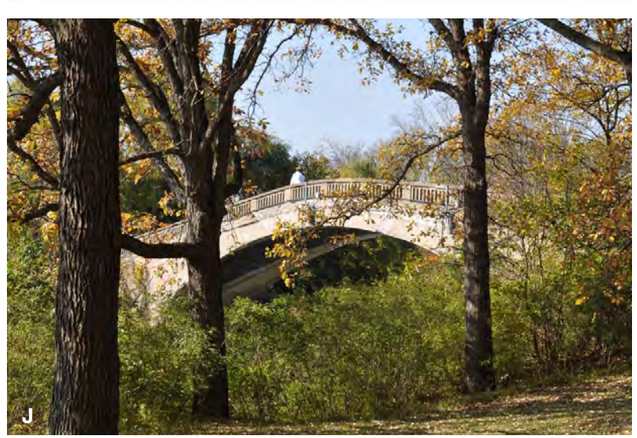
I.

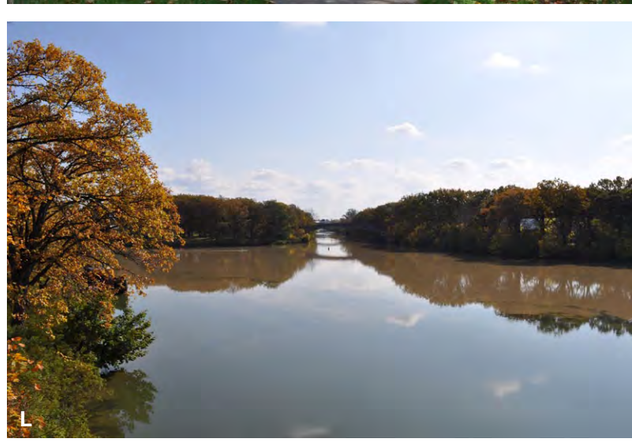
Existing dock materials at the Waterways Center are varied and inconsistent. This is partially a result of a rowing program heavily-dependent on donations and surplus materials.











A.

The recently constructed hotel and planned residential tower at the north end of what was formerly park land has reduced the Riverway Trail to a narrow path along the river edge. While the redevelopment has brought some economic stability it negatively impacts the entry experience and “gateway” to the park from the City to the north.

B.

The vehicular connection form the hotel’s parking lot to the former Plymouth Avenue within the park’s northern area appears to be an afterthought in the development process. The Brooks Landing Phase II improvements propose to limit vehicle access and construct enhancements this connection.

C.

The northern terminus of the Riverway Trail within the historic park ends with views directly towards a parking lot and a blank building facade. Screening and redirection of the trail should limit these negative views as users exit the park.

D.

Views from the pedestrian bridge just north of Brooks Avenue (to the U of R) can be majestic and reveal the ecological variations of the riparian system. However, the understory vegetation blocks views in and out of the park.

E.

As Riverway Trail users approach the Elmwood Avenue bridge they are confronted with a series of confusing and visually unappealing retaining walls, abutments, fences and overgrown vegetation that also provide a sense of danger.

F.

The park’s entry / edge located at the corner of Genesee St and Vixette St is undefined and suffers damage from vehicle use. Damage is likely attributable to State Canal Corporation employees driving their vehicles over lawn and trails to the nearby canal barge mooring site.

G.

The park’s most visible street-bounded corner also serves as the strongest visual and potential pedestrian connection to the surrounding urban fabric. However, very little exists in the way of “gateway” or park entry features. The corner primarily serves as the backstop behind ball field #1.

H.

The frontage along Genesee Street has accumulated boulders over time, with the intention of limiting vehicular traffic into turf areas of the park. Vehicles on turf areas is an ongoing problem however, and needs to be addressed in a more comprehensive manner.

I.

Various pathways exist through the wooded grove, which are conglomerations of both modern constructions and remnants of older pathways that served buildings no longer existing.

J.

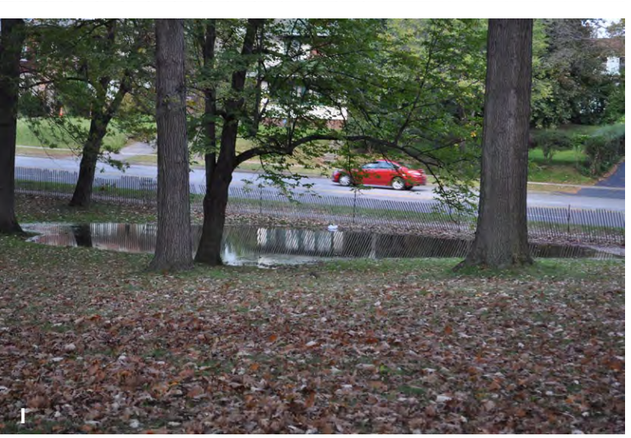
As one of four historically significant Olmsted firm designed bridges within Genesee Valley Park, and arguably one of the most visually prominent, the pedestrian bridge over the Erie Canal is an icon of Rochester’s park system.

K.

The entry to the pedestrian bridge over the Erie Canal. The bridge is in poor shape, both structurally and visually. The canal authority owns the bridge and the land around it, however their prioritization of bridge project does not account for historical value.

L.

Views from the Olmsted firm designed pedestrian bridge are some of the most unique along the Genesee River, allowing trail users to see the four-way confluence of the Genesee and the Erie Canal.



A.

Just south of the canal, the Riverway Trail passes under the I-390 overpass. This structure dominates the landscape south of the canal and also serves as a auditory nuisance for park users.

B.

One of three fishing piers / pedestrian overlooks on the Genesee River within the park. This pier sits within a low glade of White oak trees, all planted around 1920. The pier offers immense visual landscape value as an overlook, provided by the backdrop of pedestrian bridges and mature park trees.

C.

The overlook also serves as a year-round mooring area for State Canal Authority dredging equipment. While interesting and unique on it's own right, the equipment negatively impacts the historic park land and the Olmsted Brothers early 20th century attempts to heal the parks landscape after the canal was cut through.

D.

The woodland to the south of the Erie Canal is largely cut off from vehicular access and currently provides a unique wooded landscape in contrast to the pastoral meadows north of the canal. The area is popular with walkers and birders and includes the only non-riparian wetlands within the park.

E.

Extensive ramping provides ADA access to the rowing ramps at the GWC. The dock's varied styles, materials and condition detracts from the visual aesthetics of the waterfront.

F.

Pristine views of Genesee valley Park (east) from the GVPW riverbanks are one of the reasons so many found it attractive to build structures along the river. The thinned vegetation along the eastern bank allows views into the pastoral meadows.

G.

Views to the western bank of the river (GVPW) from the east side of Genesee Valley park are heavily screened by trees and vegetation in areas. New park infrastructure should utilize this screening where possible. Some areas should also be opened up to allow views to penetrate the park interior.

H.

The riverfront features along the Waterways Center received trail enhancements within the last decade. However, the modifications and materials, such as the blue railing, exist nowhere else within the park. New features added to the park should be vetted as being consistent and historically appropriate.

I.

The park's border along Elmwood Avenue is largely unused, however, it offers spectacular views of significant historic trees. Among these trees is a depression that is consistently inundated and has poor drainage. Research suggests the area is a depression left over from an old street car turn around within the park.

J.

A "fishing access" trail continues under the pedestrian bridge linking the east and west sides of Genesee Valley Park. The bridge abutment is a continual graffiti problem and without proper clearing or sight lines, will continue to be vandalized. The vandalism gives the impression that the fishing trail is unsafe for users.

K.

The park's lighting is visually inconsistent. Various lighting fixture styles exist within the park, including "cobra-head" davit poles, post top Riverway trail lighting and left over fixtures from other improvement periods.

L.

Several trees located in prominent places along the Riverway Trail (behind the ice rink) still have planting stakes despite being upwards of 20 years old. Many of the stakes have grown into the trees and irreversibly damaged the tree's structure and health.

04

Olmsted's Advice

What would the park look like today had the City Parks Commission taken Olmsted advice and followed Genesee Valley Park's original 1890 Master Plan?

Boat Houses and Water Sports Infrastructure would have been constructed closer to downtown, in the park area north of Elmwood, preserving the river views.

Lighting for baseball in the park would not have been anticipated in 1890, however the more visually significant infrastructure would have been placed further away from the river and screened.

Sports facilities and buildings would have been constructed north of Elmwood Avenue, or clustered tight to the Elmwood bridge. The Ice rink is as close to the Bridge as possible, but the architectural style detracts from the parks historic character. A more pleasing facade would have been designed.

The Elmwood bridge and approach ramps would have been heavily screened, and functioned like a landscaped park boulevard. The modern need for large right-of-ways, traffic signals and pedestrian safety would not have been anticipated here in 1890. How can the two park halves be reintegrated?

The brutalism of the University of Rochester's Hutchison Hall would have been unanticipated. Even the prior use as the site of Oak Hill Country Club was well after the park was acquired and designed. During the 1890 master plan this ares was still a mix of farm fields and steep wooded glacial deposits.

Rochester's Olmsted Legacy

What would the park look like today had the City Parks Commission taken Olmsted advice and followed Genesee Valley Park's original 1890 Master Plan?

New construction along the park's river edge continues unchecked, once again against the vision of the park's original designer - Frederick Law Olmsted. The park's waterfront will continue to receive great amenity development pressure.

The I-390 overpass severed the park in the 1970s, similar to the canal realignment in the early 20th century. However, this time the Olmsted firm was not around to reconnect the park and make it whole again.

As one of the last municipal project ever competed for the City by the Olmsted firm (Olmsted Brothers), these bridges are a cherished visual icon of the City's park system. Their current condition necessitates quick and careful rehabilitation but funding has not been made available not is their historic value a priority of the State (owner).

The wonderful wooded glade at the foot of the "Olmsted bridge", full of mature white oaks, was planted upon the completion of the canal realignment through the park in 1920. The entire scene of the confluence of the Genesee River and the Erie Canal is a heavily photographed and a symbolizes the historic and sometimes unusual nature of the City's park system. The area should be protected from uncharacteristic features, such as dredge equipment mooring and State employee parking.

The heavy screening offered by trees and understory vegetation can be useful in screening views of recreational infrastructure from the broader park experience. Likewise, after efforts to relocate the former railroad failed, Olmsted Sr. designed landscape screenings along this corridor in 1893 to specifically remove "man-made" objects from view. The planting were designed to partially screen at first, then mature over time and result in a thick wooded wall blocking out all unnatural constructions visible from the park.

Circulation

The Dividing Line

GVPW's pedestrian and vehicular circulation is a direct design result of working within the constraints of features that no longer exist within the park. Over the years, as facilities and features were added or removed, or new parkland was acquired, linkages were made to connect those features and retrofit circulation. Often this resulted in parking areas or pedestrian routes that no longer serve a particular need or that do not relate well to the broader park.

For example, the existing main parking area near the pool and ice rink has served as some form of vehicular access road or parking area since the early part of the 20th century. The circulation and layouts were constrained by the adjacent active railroad corridor. This was reinforced in the 1950s when the area served as parking and access for new improvements, still constrained by the railroad. Master planning efforts, site design and improvements all developed in the 1970s recognized the railroad was nearing the end of its use, suggested acquisition of the rail parcels, but continued to design park facilities and circulation within the intense constraints of the rail line. Once the rail line was officially abandoned and acquired as parkland in the late 1970s, improvements were in place and the land was partially used for parking expansion – further cementing the now superfluous divide between the riverfront area and the western recreation fields.

More recently, the City has successfully used the former rail corridor for important trail connections in other areas of the park – but the fact remains that circulation and facilities layout within the park have been motivated by the railroad corridor since the park's beginnings and has continued well after the rail line was removed. Moreover, as the historic research shows, Frederick Law Olmsted and the City Parks Commission considered this issue a priority in the 1880s, preparing several unsuccessful alternative scenarios to move railroad to the west in order to increase the contiguous park area.

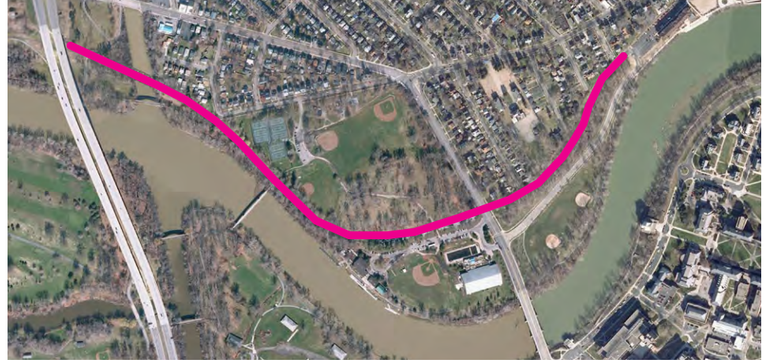
Pedestrian and Bicycle Circulation

Internal pedestrian circulation suffers from a similar historic circumstance – that being that most routes are vestiges of former uses or links developed between park features built at varying times throughout history. This causes a general wayfinding confusion within the park, especially for intermittent users such as new University student or those participating in league sports. For example, the pedestrian paths through the wooded grove were based on connections to former swimming pools that were removed in the 1970s, but the route has remained the same and has been connected to adjacent parking lots.

The highlight of pedestrian and bicycle circulation throughout the park stems from the fact that it is the site of one of New York State's most important multi-use trail crossroads, linking the 400-mile Erie Canalway Trail, the 90-mile Genesee Valley Greenway and the City of Rochester's approximately 23-mile Genesee Riverway Trail. These trails intersect within GVPW near the pedestrian bridge to the east side of Genesee Valley Park and the tennis courts at Vixette Street / Genesee Street.

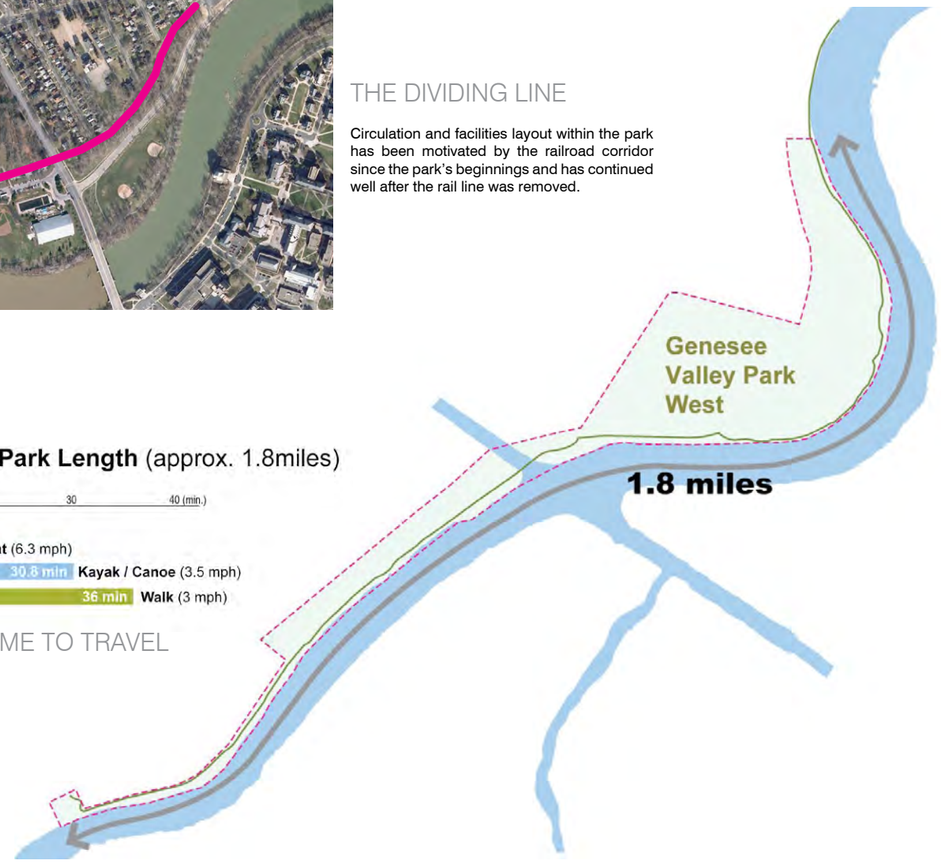
The Erie Canalway Trail is a major east-west multi-use corridor and recent counts at GVP show the estimated annual traffic to be nearly 102,000. The summer months see the highest traffic, averaging approximately 16,000 per month. 75% of Canalway Trail users rode bikes, and there is average jogger use – however very little of the Canalway Trail traffic at GVPW was leisure walkers. This can be attributed to the adjacent land uses, indicative of the lack of neighborhoods and overall connectivity surrounding the park. Leisure walking use along the Canalway Trail is more than 2x in adjacent Brighton and more than 4x GVPW's rate in Fairport and Pittsford.

Trail counts performed by the University of Rochester Medical Center along the Genesee Riverway Trail (GRT) reveal that the trail segments and intersections in GVPW show the highest use along the entire trail. The counts and user surveys were conducted at the east and west sides intersections with the Waldo Nielson pedestrian bridge. (see page 26) and average 58 users per hour on the west side and 90 per hour on the east. Much of the traffic can be attributed to recreational users and neighborhood access from the 19th ward to the east side of the river and bike and pedestrian commuters heading to nearby employment centers (UR, Strong hospital).

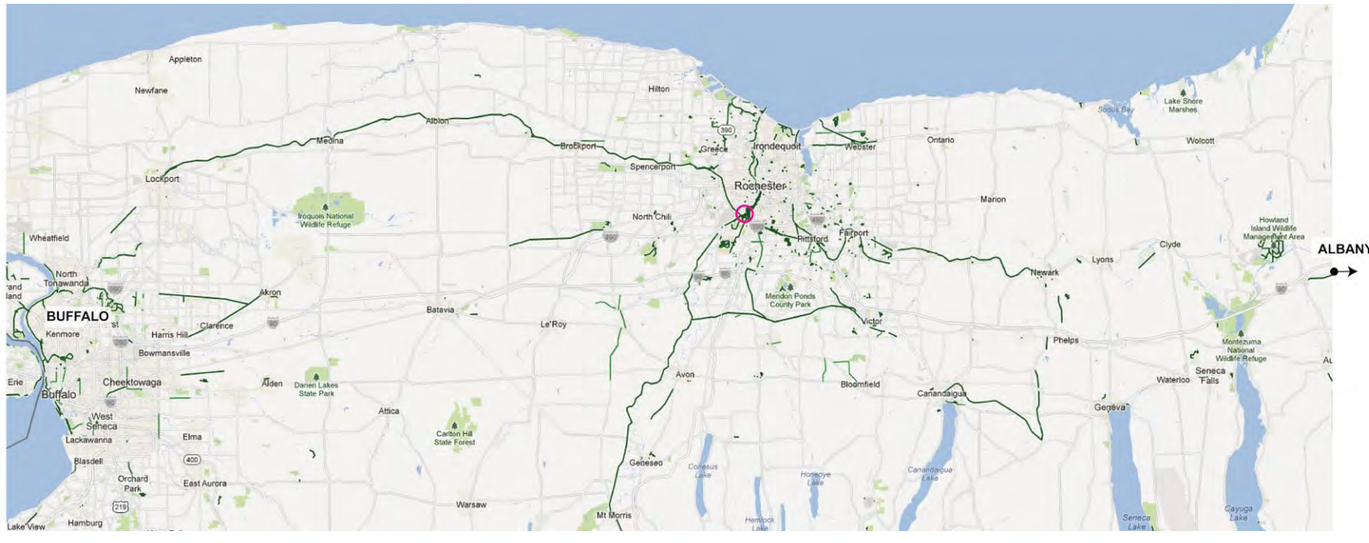


THE DIVIDING LINE

Circulation and facilities layout within the park has been motivated by the railroad corridor since the park's beginnings and has continued well after the rail line was removed.



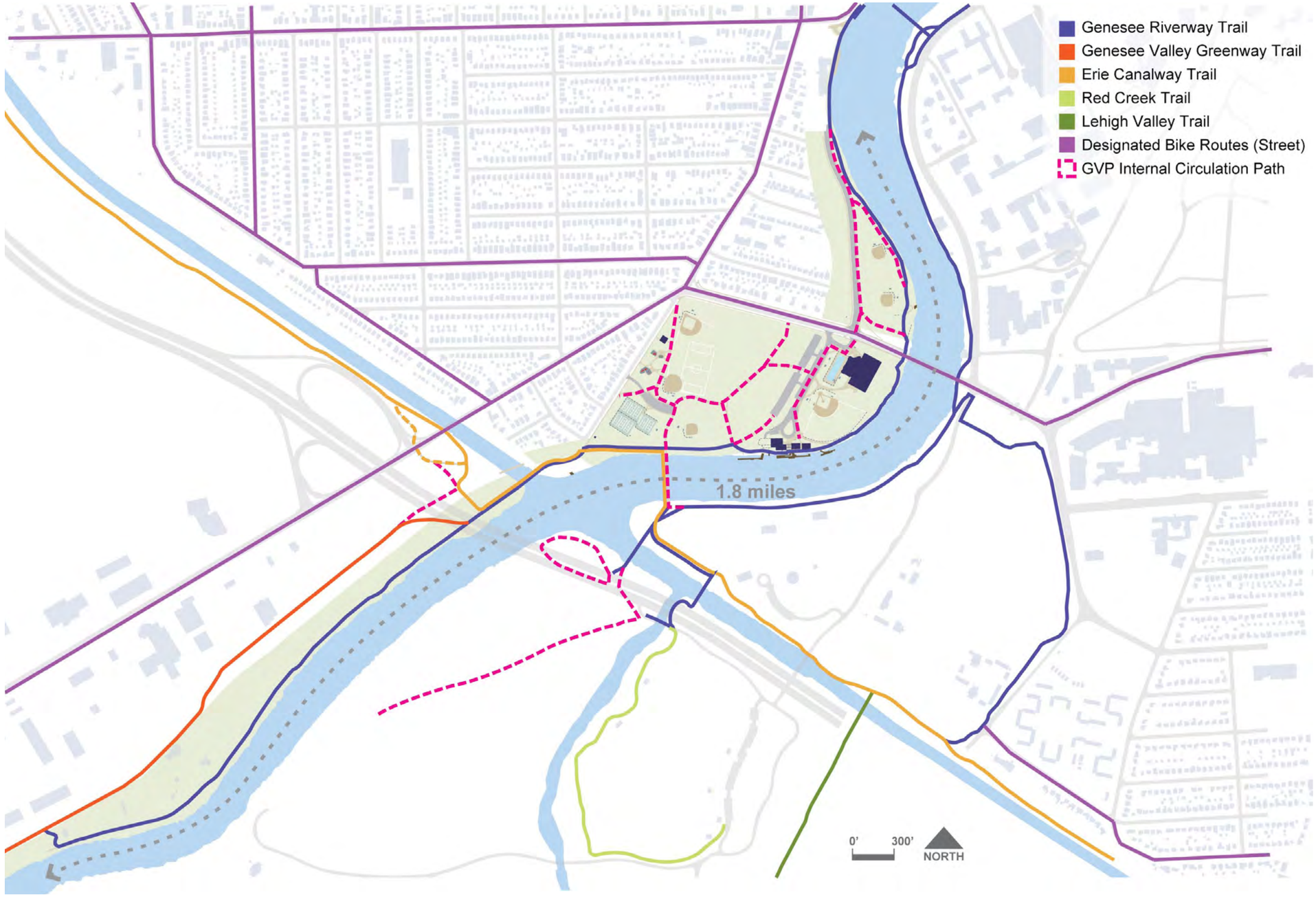
TIME TO TRAVEL



BIKE, TRAIL & PADDLE HUB

The park is uniquely located at the crossroads of several regional trails and blueways. It's potential to serve as the hub of the region's bike, trail and paddle network is unsurpassed. Circulation planning should focus on serving these user groups.

TRAILS IN GVPW

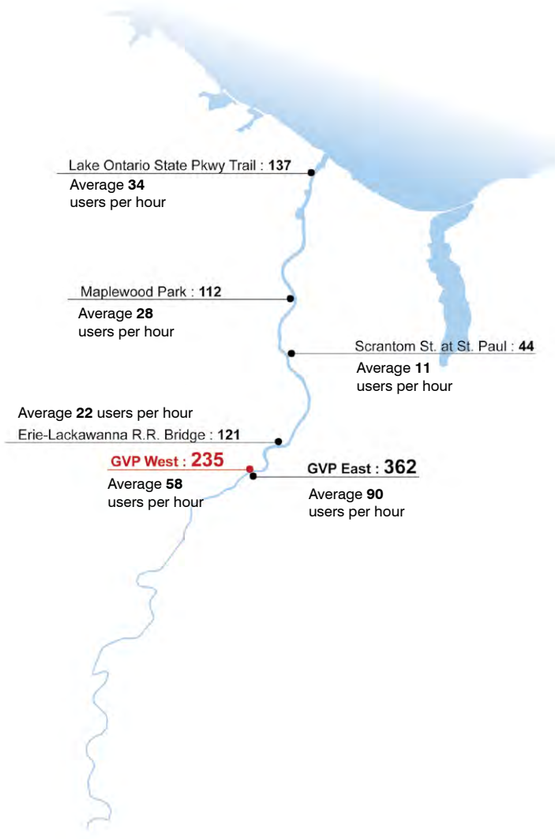


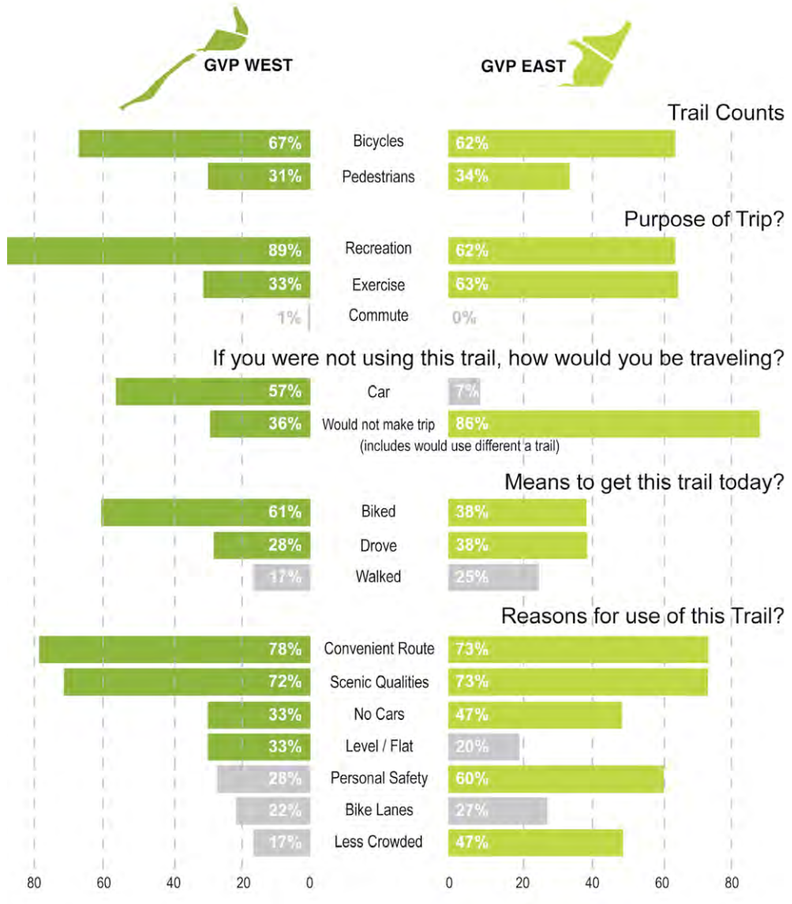
New York State counts of Genesee Valley Greenway users in 2008 revealed that use is much lower in and around Rochester than it is along GVG segments south of Monroe County. (Erie Canalway User Counts, 2008 Parks & Trails NY) This is partially due to the very high recreation use of the trail near Letchworth State Park and environs, and that the GVG's northern terminus is at GVPW. However, there is a much more problematic circulation issue with the Genesee Valley Greenway that disrupts continuous access to all points south from GVPW. The GVG is effectively cut-off at Scottsville Road, approximately 1-mile south of the park, and the next 1.6 miles of GVG is along high traffic and high speed Scottsville Road and Ballantyne Road. This on-road segment of the GVG has no markings and is a dangerous and cruel experience for all users. The segment is traveled by only the most experienced or determined bike riders, or those recreation users caught unaware by the missing trail segment.

The GVG is also one of the final legs of the proposed "Triple Divide" conservation and recreation trail system, linking the more than 230-miles, including the entire length of the Genesee River, from the shore of Lake Ontario to the Susquehanna River in Williamsport, Pennsylvania, with multi-use trials and blueways (canoe and kayak routes). The trail is a vitally important link, not only to points south in Monroe County (Rochester Institute of Technology, Scottsville, the Lehigh Valley Trail) but to some of New York's most important recreation destinations (Letchworth State Park, the Southern Tier) and the broader planned Triple Divide trail system. Both NYS Parks and the NYSDOT have made attempts to solve this issue for many years but complications with active rail lines and at-grade rail crossings have stalled efforts.

TRAIL USER CHARACTERISTICS

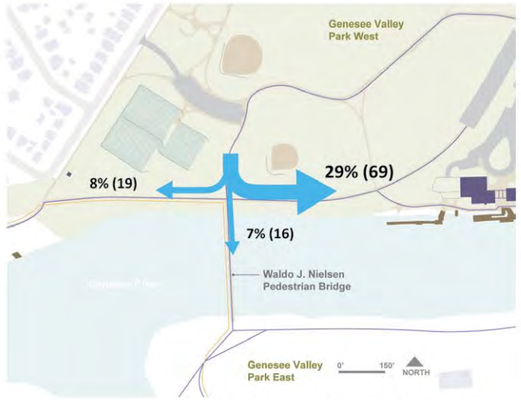
The University of Rochester Medical Center conducted a comprehensive trail user survey in 2012. Data was collected at nearly a dozen sites along the Genesee Riverway Trail. The user count at the survey's Genesee Valley Park locations were the highest of the Riverway Trail. This validates the fact that GVPW acts as a local and regional crossroads for trails and blueways.



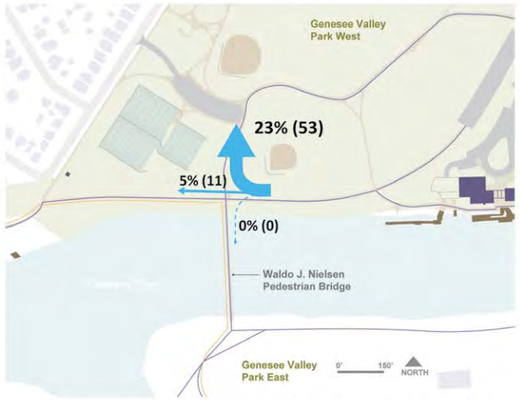


TRAIL CIRCULATION PATTERNS

Analysis of the URMC's trail user survey reveals that a significant number of trail users appear to be accessing the riverway trail northbound and, to a lesser extent, points south and east (across the pedestrian bridge). Direct connectivity to the neighborhoods surrounding the park is not obvious to users - but it does appear that traffic from the neighborhood is high and GVPW acts as a heavily-used "jumping-on" point to the City's Rvierway Trail.

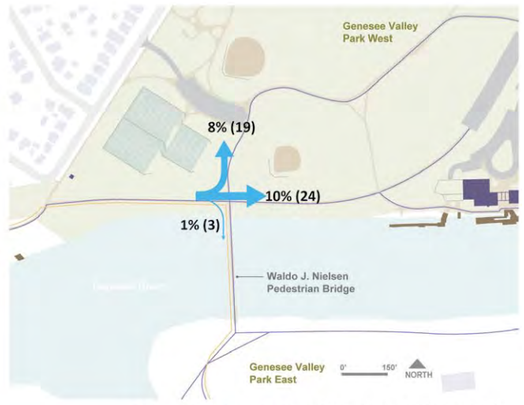


From North (Parking and SW Rochester)

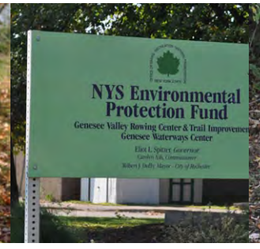


From East (Waterways Center and City)

From South (GVP-East and SE Rochester)



From West (South part of Park and Outside of City)

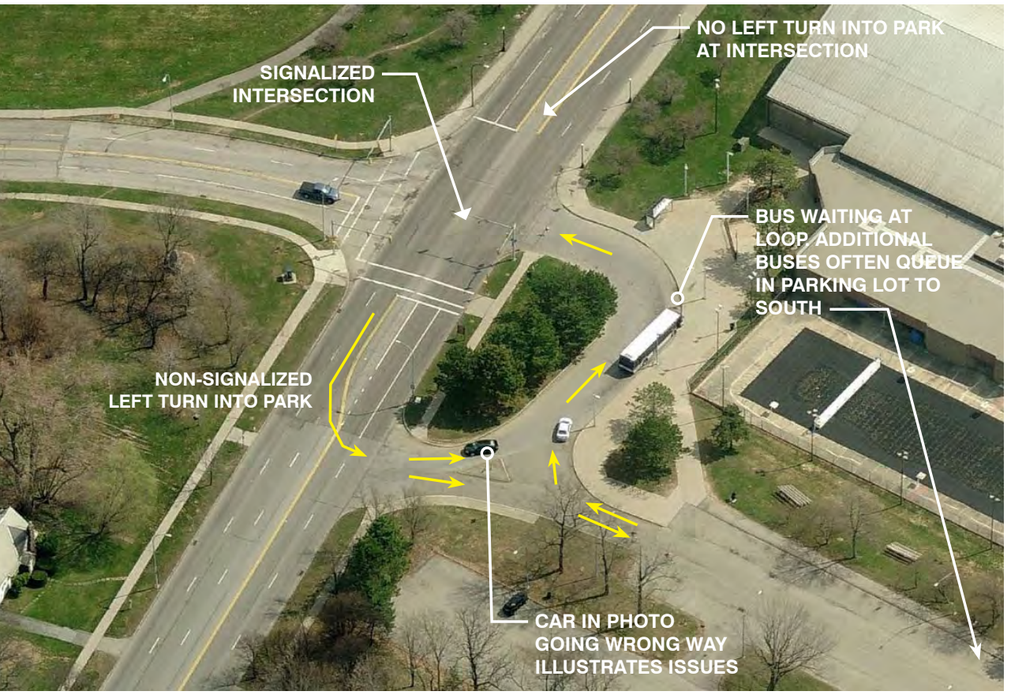


WAYFINDING / SIGNAGE

GVPW includes a profusion of various signs and sign styles. While wayfinding for canal trail users is particularly confusing and must be improved, the overall overabundance of signage and inconsistent stylings heavily contributes to visual clutter of the park.

VEHICULAR CIRCULATION

GVPW includes three isolated vehicular circulation areas. There is limited cross-connectivity throughout the park.



ELMWOOD ENTRY LOOP

Annotated aerial image showing traffic circulation at the Elmwood park entry.

Vehicular Circulation

While the park must capitalize on being a hub of regional trails, it must also serve as a vehicular destination. As discussed previously, the simultaneous excess of institutional land uses surrounding the park severely restrain its accessibility. By being cut off from residential neighborhoods on nearly all sides, the park is isolated from the city and it results in increased reliance on auto trips for park users. The park has the size and amenities of a citywide recreation park, but the adjacent land uses make GVPW function like a neighborhood park. In order to help make events and programming successful vehicular circulation and parking need to better relate to the park's features. Some park features such as the GWC and boat docks have increased vehicular dependence over most traditional recreation amenities. The GWC in particular requires boat/rowing shell loading areas, broad open access to boat bays, trailer parking, and vehicular access to outside storage yards.

While some minor or isolated vehicular circulation improvements have been developed alongside specific park facilities improvements (parking lot near the tennis courts), the overall vehicular circulation within the park is generally based on vestiges of former park uses, linked together ad-hoc over time to form the current vehicular circulation patterns. Much of the park's circulation design is driven by the former railroad corridor that bisects the east and west sides of GVPW. This rail corridor was minimally active at the time of the last park master plan (late 1970s) and while efforts were made to incorporate its intended abandonment and removal into the overall plan, all major facilities improvements that currently exist were either already constructed or planned at the time. It is for this reason that the park has very little vehicular connectivity

The park's major activity areas are individually isolated from one another and are either not accessible (south of canal) or have independent access from the surrounding street network. The park's western boundary includes one entry/exit drive from the surrounding street network (Genesee St.), linking to an isolated parking lot. However, access is limited due to Genesee Street being both one-way southbound and functionally a small residential street with no direct or signalized access to nearby collector or arterial routes. Park patrons existing the tennis court area must traverse residential streets that include no signalized intersections onto the nearby collector/arterial network.

Prior to the Brooks Landing project, parkland north of Elmwood Avenue included an extension of Plymouth Avenue through the park. This has been closed off to direct traffic, though it is currently still accessible from a hotel parking. The City's Brooks Landing Phase II project ultimately plans to shut this access down and provide a turn-around and additional parking in generally the current right-of-way within the park. (see Brooks Landing Phse II Improvements, next page)

Elmwood Entrance

The entrance and exit to the park at Elmwood Avenue includes a loop that is used as a bus stop and loading / unloading area for the Genesee Valley Park Sports Complex (pool and ice rink). The loop's exit is part of a signalized intersection with Elmwood Avenue and the former Plymouth Avenue, while the entrance is an un-signalized driveway approximately 100 feet to the west. The loop operates with one-way travel in the eastbound direction.

Vehicular circulation at the Elmwood Avenue park entrance / exit is a primary concern due to the presence of the bus loop. The unsignalized loop entrance is very close to the signalized intersection with old Plymouth Ave and the loop exit. There is a left turn lane for Elmwood Avenue eastbound traffic turning onto old Plymouth Ave, but no left turn lane for westbound traffic turning into the park. As a result, vehicles turning left into the park may be stopped in a travel lane waiting for a gap in oncoming traffic. There is also potential for eastbound vehicles on Elmwood Avenue to block the entrance driveway while stopped at the traffic signal. Another concern is that vehicles entering and leaving the parking area must share the loop with buses and vehicles utilizing the Sports Complex drop-off (with associated pedestrians) that are frequently using the loop.

The loop entrance to the park is also historically incompatible to the park's period of significance, with large amounts of parking visible from the entry, views dominated by unsympathetic building facades, and the public transit maintenance and queuing at the drop-off loop being a private non-park use of park land (alientation).

Parking

City DRYS noted that there is sufficient parking for current facilities and attendance. The exception to this is larger scheduled events, where parking is often constrained. These events include hockey games or winter Holiday skating at the ice rink, and summer/fall sport-tourism events such as the Head of the Genesee Regatta or the Flower City triathalon/duathon.

The main parking area for park recreation facilities includes two aisles separated by a treed median. The eastern aisle is designated as Genesee Valley Park Lot A and includes approximately 80 parking spaces, with several reserved for handicapped use and City of Rochester staff. The western aisle is designated as University of Rochester (U of R) Lot 29 and includes approximately 128 parking spaces that are restricted to U of R usage during weekdays in the school year. The University leases the parking lot from City of Rochester for a yearly fee. The two parking aisles both operate with two-way traffic and are connected at two locations. The Genesee Waterways Center uses a parking area just south of Lot A that includes 24 spaces. A small handicapped accessible lot is located behind the GWC building and exterior storage area and includes 5 spaces.

An isolated parking area with approximately 55 spaces is located near the southwest corner of main park area, near the tennis courts. This parking area is only accessibly from Genesee Street and does not connect to other facilities within the park. The parking is primarily utilized for tennis courts, playground access, or ball fields #1, #2 and #3.

Sufficient quantities of parking for general daily park use does not translate to adequately designed parking, which due to limited connectivity between park areas, has been an ongoing issue for park staff and neighbors. Despite parking availability, several areas of off–road parking occur commonly throughout the park which suggests an overall lack of connectivity, or ad-hoc linking of old park facilities and structures uses that lacks comprehensive planning for modern vehicular use within the park.

“REQUIRED” PARKING FOR EXISTING FACILITIES

	Min. Recommended Parking	
Pool	100	Based on Rochester code, 1 space per 4 user capacity
Ice Rink / Sport Court	90	Based on Rochester code, 1 space per 5 user capacity
Genesee Waterways Center	30	Based on existing dock capacity of 3 (8-person) boats and, no formal requirements
Tennis Courts	24	Based on Rochester code, 3 spaces per court
Recreation Fields	60	Based on minimum of 5 to 10 spaces per acre of active recreation field (Illinois DNR)
*Total Spaces Recommended**	*304*	**Note: The “recommended” parking spaces are based on existing City code and typical standards and may not reflect actual parking demand for the park. The City often employs parking analysis study to allow shared use of parking or other reductions in required quantity.*

EXISTING PARKING

	Parking Spaces	
Ice Rink East (“Lot A”)	80	*Only full during events*
Ice Rink West (U of R Lot 29)	130	*Leased to University of Rochester*
Genesee Waterways Center	29	*Does not include trailer parking*
Tennis Lot	55	*Not accessible from main park entrance*
Total Spaces in Park	*294*	

BIKE PARKING

A general ratio of suitable bike parking is 10% to 15% of Vehicular Spaces. Recommended bike parking for existing GVPW facilities should accommodate 30 to 45 bikes.

The existing bike racks at the park provides space for a maximum of 18 bikes. This includes accommodations for 8 bikes near the entry to the Sport Complex building and an additional 10 near the Field House. There is a bike repair station near the building entry.

On any given summer weekend, numerous vehicles can be seen parked on the lawn within the wooded grove. Cars are commonly parking in the grove to ease transport of cooler and other picnic amenities and to utilize picnic tables and grills. This results in compacted soils and damage to the historic trees. Park staff has attempted to limit access from the main parking area through placement of barriers, but vehicles often find access from the tennis court parking or from any lawn area with mountable curb adjacent to the street network. Beyond tree damage, park patrons also leave significant quantities of trash behind within the grove.

Off-road parking also occurs at the Field House, along Genesee Street. The street is one-way southbound with street parking designated for the west side of the street – which is opposite the park and Field House. Parking by the public who rent or attend private events at Field House is a common occurrence in the lawn around the structure. The wide sidewalk at the entry is often used to load and unload equipment and supplies or for parking in general.

Off-road parking also occurs at the very south end of the recreation area of the park, in the wooded glade at the foot of the Olmsted pedestrian bridge, near the intersection of the Genesee River and Canal. While functioning as parkland, the land at the river-canal intersection is owned by the Canal Corporation (New York State) and vehicles parking within the wooded area along the river are likely exclusively NYS canal employees. (See parcel ownership map, Chapter 1: Background & Context.) The adjacent river bank is a parking area for NYS Canal barge and dredging equipment. Despite potential damage to significant white oak trees within the glen this is an intermittent but ongoing parking issue.

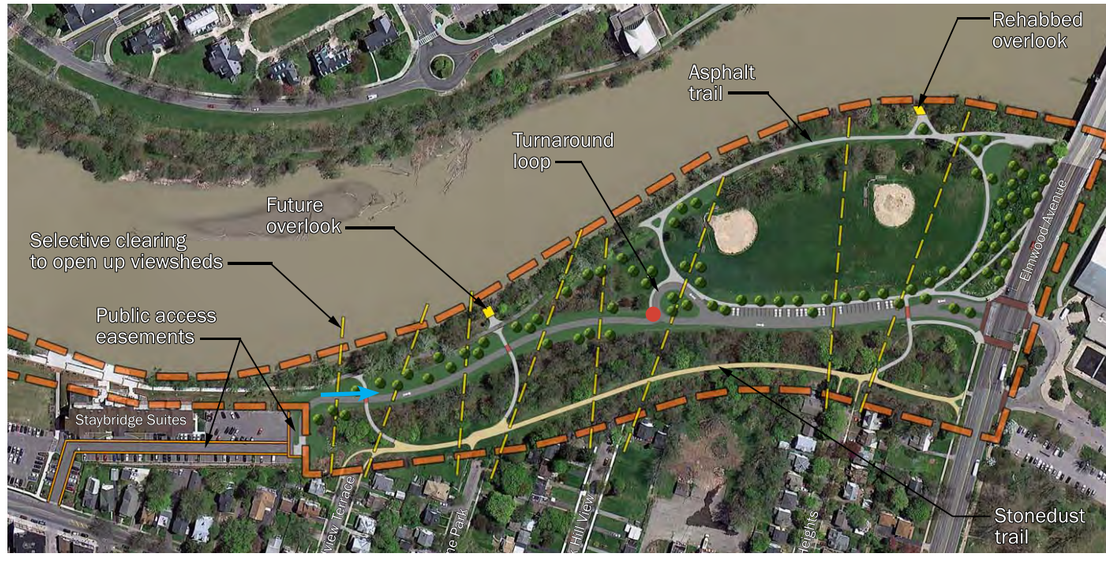
An additional area of parking deficiency occurs at the Genesee Waterways Center where there are no space provisions for boat trailer parking. See the existing conditions assessment of the GWC for more information on boat-specific circulation needs.

In general, parking within GVPW is heavily used by non-park patrons. Foremost is the questionable use of public parkland for University parking. The University does lease the UofR designated parking within the park for a fee, but this brings a host of related issues and may not be compatible with the future of the park. There is increased pressure and demand for parking at the University and the potential for future lease-based removal or alienation of parkland for this purpose exists, which is counter to the City’s Memorandum of Understanding with the National Park Service (through prior development with Brooks Landing) explicitly prohibiting future parkland alienation. The University’s parking facilities have stretched well past GVPW and include a large parking area south of GVPW along Scottsville Road. While shared parking is an important and efficient means of using urban land, the use of public park lands for private parking both has the potential to encourage additional unneeded pavement area within the park and causes disruption to regular park uses. The park functions as a park and ride area beginning as early as 5:00 AM during the school year and additional buses (both RTS and UR private shuttle buses) use the

BROOKS LANDING PHASE II IMPROVEMENTS

Illustration shows improvements proposed for GVPW areas north of Elmwood Avenue. The former Plymouth Avenue public street is proposed to be modified to a one-way south bound (see blue arrow) from the nearby hotel parking lot to the vehicular loop (red dot). The improvements propose to add 90-degree parking along the two-way portion of the park drive.

Graphic: TY LIN International



A.

The western-most parking lot at the park’s Sports Complex is signed as parking for the University of Rochester only, under lease from the City.

B.

NYS Canal Authority employees park vehicles within the white oaks at the foot of the “Olmsted” pedestrian bridge. The land is owned by the State but functions as park land. The Canal Authority also parks dredging equipment at the site. This equipment significantly impacts the scenic quality of the river and overall Genesee Valley Park.

C.

Genesee Waterways Center users park trailers within the lawn area / outfield of Ball field #4. The field is also used for sports tourism event parking, which causes damage to the playing surface.

D.

Presumably due to University of Rochester employees or students parking in the park (outside of designated areas) many temporary signs are used to notify vehicles.

ELMWOOD AVE ENTRANCE

The Elmwood Avenue exit functions as the primary entry and visual “facade” of the park. It clues potential users onto the quality of the experience that the park may offer and directly influences potential use. The park’s potential historic character and recreational opportunities are poorly representable at the entry from Elmwood Avenue.

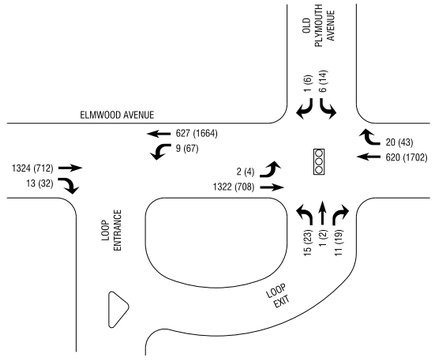
Buses queue at the Elmwood Avenue entry/exit loop at the park. More than 100 buses per day use the turning loop and often queue further to the south near the waterways center due to inadequate bus area and a poorly design park entry.

ELMWOOD AVENUE TRAFFIC IN 2035

	2011 Traffic (vehicles/hour)	2035 Forcast Traffic (vehicles/hour)
PM Peak Traffic, Westbound No Kendrick Interchange	1664	1920
PM Peak Traffic, Eastbound With Kendrick Interchange	708	1685

TRAFFIC VOLUME

The 2011 traffic volume analysis for the intersection of Elmwood Avenue and the park entry shows that relatively minimal traffic moves into and out of the park. However, the study’s primary purpose was to show that the existing transportation network could handle the additional traffic generated by the new Brooks Landing Mixed Use development and it does not investigate the performance of the entry to Genesee Valley Park West as it serves the park or park users - which is poor.



EXISTING (YEAR 2011) TRAFFIC VOLUMES
AM & PM PEAK HOUR

XX (XX) = AM (PM)
AM PEAK HOUR: 7:30-8:30 AM
PM PEAK HOUR: 4:30-5:30 PM

park for frequent queuing and shuttle service. Additionally, while the lot is not used for UR staff or students in the summer, a significant number of construction workers use the lot when working on university projects during the school’s summer closure.

Bus/Transit Use

The park’s service area includes a relatively high population of low-vehicle ownership households, which includes both young university students and low-income families, and to a lesser extent, an elderly population. Just as important as providing comprehensible circulation through the park – maintaining meaningful access to and from the park is especially important for the service population. Even during recorded peak use times a significant number of park attendees are either dropped off by private vehicle or utilize the Regional Transit Service or University of Rochester shuttle bus systems.

There are nearly a dozen public RTS routes that serve the park and adjacent street network, directly resulting in more than 100 buses per day utilizing the park’s bus loop and queuing area. The current bus loop is inadequate for this level of bus traffic and results in buses utilizing the turning loop internal to the park, near the Genesee Waterways Center, for a turn around and queuing. If a bus is currently waiting at the Elmwood bus loop, additional buses will wait in the parking lot and proceed to the Elmwood loop when it becomes available. The loop is also poorly designed to integrate with general park pedestrian and vehicular traffic, resulting in the potential for vehicle / pedestrian conflicts, buses obstructing the views of drivers, and increased delays for vehicles waiting behind or maneuvering around buses.

Compounding conflicts with the Elmwood vehicular entry and bus loop congestion are the approximately 70 additional University of Rochester “Scottsville Rd”-route UR shuttle stops potentially made at the park per day. Not all Scottsville Rd shuttles stop in the park and presumably they serve Lot 29 (leased ice rink lot within the park) on an as-needed basis. However, the shuttles are an additional conflict within an already underperforming system.

Though numerous RTS routes serve the park and utilize the parking lot for queuing, the only designated bus stop is at the Elmwood entry loop. RGRTA uses the loop for driver-maintenance (cleaning) and bus queuing. This serves the existing entrance to the Sports Complex but does not address accessibility to the Field House, the Genesee Waterways Center, or the majority of recreation fields – which are all some distance from the entry loop (nearly a ¼ mile or more in some cases). Future circulation designs should address the range of park amenities and their need for ease of transit access.

Traffic Volume

Elmwood Avenue receives an Average Annual Daily Traffic (AADT) volume of nearly 19,000 vehicles per day at the park entry. This includes both eastbound and westbound traffic, which average 9300 and 9700 AADT, respectively (NYSDOT). The high traffic volume along Elmwood Avenue results in lowering the mobility of potential park users - reducing access and separating the park from the 19th Ward and PLEX neighborhoods.

While traffic volume on Elmwod Avenue idoes not support meaningful access between the neighborhood and the park, the proposed Kenderick Road interchange along I-390 (east of park) will reduce the traffic demand on Elmwood Avenue in the future, particularly westbound PM peak traffic. The Genesee Transportation Council’s (GTC) traffic modeling to the year 2035 shows that PM peak traffic would increase 15% above current levels without the interchange. The GTC’s modeling shows the Kendrick on-ramp influences Elmwood Avenue by keeping Elmwood traffic volume nearly unchanged by 2035.

The signalized intersection of Elmwood Ave / Old Plymouth Ave / Loop Exit was analyzed in May 2011 by SRF & Associates (consultant to a private developer) as part of a mixed-use development at the Brooks Landing site. A level of service (LOS) analysis was completed to assess the operation of the intersection under existing conditions and also with the projected traffic volumes from the Brooks Landing project. LOS is a measure of vehicular delay and ranges from “A” to “F”, where a LOS “A” indicates minimal delay and “F” indicates significant congestion. Generally, a LOS of “D” or better is considered acceptable. The analysis indicated that the Elmwood Ave / Old Plymouth Avenue intersection operated at an LOS “A” for east-west bound traffic flow, but a “D” and “E” for turning movements into the park. The analysis projected no change to the LOS with the additional traffic from the Brooks Landing mixed use project and therefore no improvements to the signalized intersection were recommended. For additional information regarding the traffic analysis, refer to Traffic Impact Study for the Proposed Brooks Landing, SRF & Associates, May 2011.

Traffic counts were taken at the loop entrance and exit during the morning and evening peak hours as part of the Brooks Landing traffic analysis. The counts indicated relatively low traffic volumes entering and leaving the site. It is acknowledged that increased traffic volumes are likely experienced during the summer months (peak usage of Genesee Valley Park) or when events are held at the ice rink / recreational building. Although events at the ice rink could result in a large volume of vehicles entering or leaving – theoretically as many as 230 vehicles, which is the approximate number of parking spaces – these events are not likely to coincide with the morning or evening commuter peaks, and any associated increase in traffic delays would be relatively short in duration.

It should be noted, however, that measured LOS delays and traffic counts for the park entry serve only to categorize the amount of time users typically wait at an intersection relative to what is satisfactory in traffic engineering practice. It does not measure the relative safety of the intersection for cars or pedestrians, nor does it measure the performance of the traffic design and layout relative to the users and the public recreational facilities that it serves.

The purpose of the 2011 traffic study was to measure potential traffic volume impacts of increased development at Brooks Avenue. It’s primary purpose was to show that the existing transportation network could handle the additional traffic generated by the new development and does not investigate the performance of the entry to Genesee Valley Park West as it serves the park or park users. An LOS investigation for the Elmwood Avenue intersection at the entry to Genesee Valley Park West would not have considered the extensive queuing of RTS and UR buses further south in the park’s parking lot, nor would it have quantified relative safety of vehicles entering and existing the park among buses and an inadequate turning lane from Elmwood Avenue. Any significant future improvements to the park’s recreational infrastructure should include alteration of the park’s entry to a condition that is safe for vehicles and pedestrians and better serves park facility and transit needs.

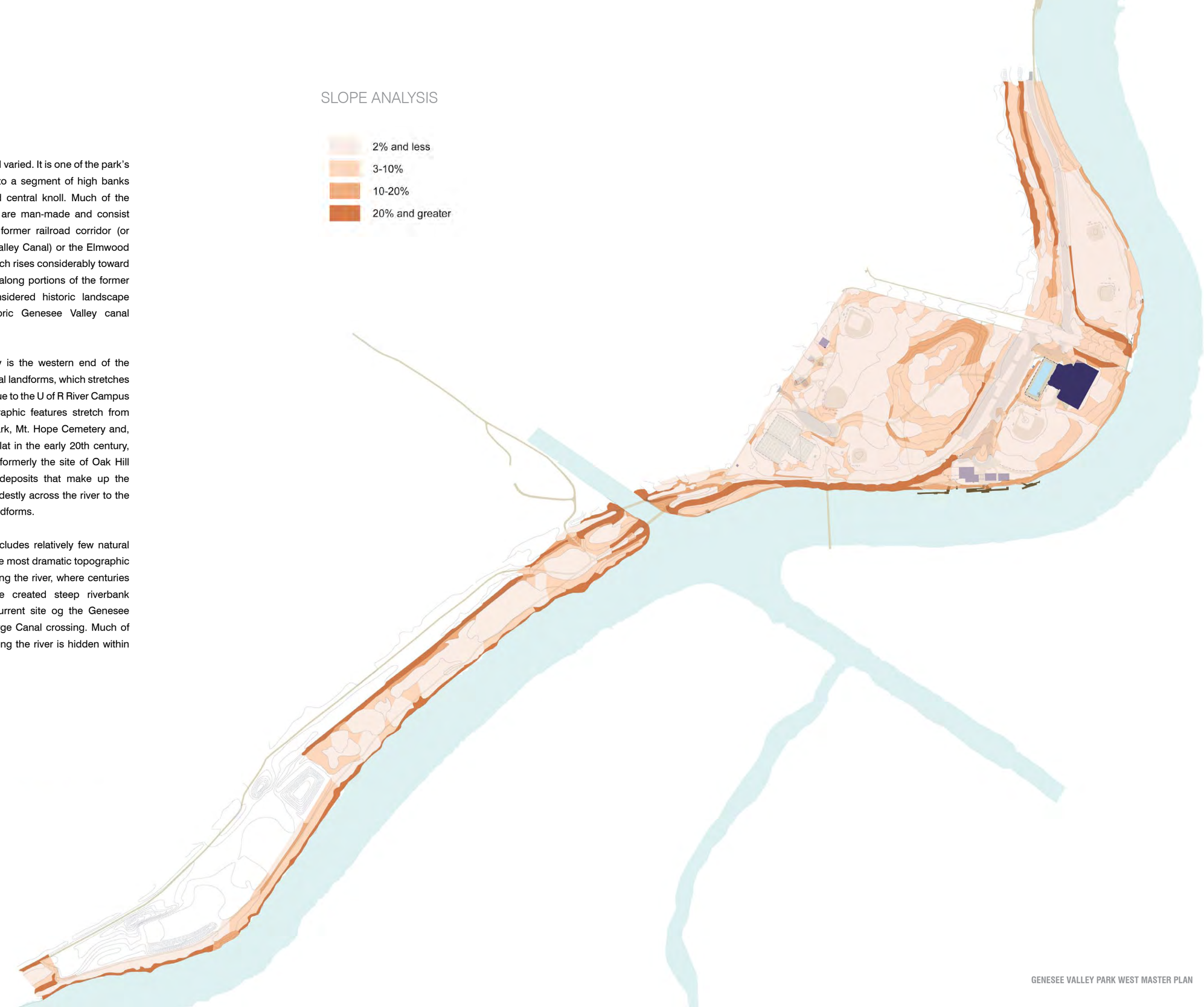
Topography

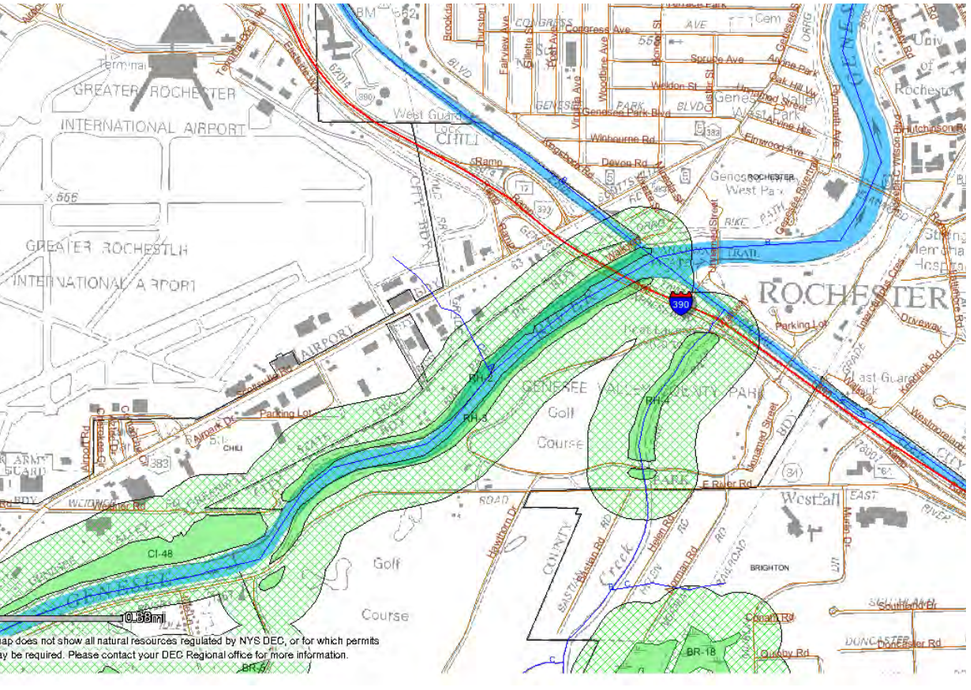
Park topography is rolling and varied. It is one of the park's most significant assets due to a segment of high banks above the river and wooded central knoll. Much of the steepest slopes in the park are man-made and consist of embankments along the former railroad corridor (or its precursor: the Genesee Valley Canal) or the Elmwood Avenue bridge approach, which rises considerably toward the river. The embankments along portions of the former canal corridor may be considered historic landscape features due to their historic Genesee Valley canal significance.

Geologically, the topography is the western end of the Pinnacle Range of small glacial landforms, which stretches roughly along Highland Avenue to the U of R River Campus across the river. The topographic features stretch from Cobbs Hill Park, Highland Park, Mt. Hope Cemetery and, prior to being graded more flat in the early 20th century, the University of Rochester (formerly the site of Oak Hill Country Club). The glacial deposits that make up the Pinnacle Range continue modestly across the river to the park and contribute to the landforms.

As a river basin, the park includes relatively few natural steep slopes, which occur The most dramatic topographic features are the bank cut along the river, where centuries of scour and erosion have created steep riverbank extending south from the current site og the Genesee Waterways Center to the Barge Canal crossing. Much of this topographic variation along the river is hidden within the wooded understory.

SLOPE ANALYSIS





SOILS

Most of the soils are classified by the USDA / County Soil Survey as “Urban” which translates to not having accurate data about the soil types. However, recent soil borings and classification information from adjacent soils reveal the following soil types:

Colonie loamy fine sand
Eel silt loam
Galen very fine sandy loam
Genesee silt loam
Niagara silt loam
Schoharie silt loam

The depth to water tables varies based on surface topographic conditions and season, with the most low lying areas in the 100 year flood plain, north of Elmwood Avenue, experiencing a depth to water table of approximately 38 inches. Drainage and soil percolation is heavily varied, with some soil types classified as well drained, while others and moderately drained. Recent soil percolation tests within the park note “poor to moderately well drained” percolation rates.

FEDERAL & STATE WETLANDS

Map shows mapped NYS DEC wetland, which are limited to area along the river south of the Erie Canal confluence. A significant check zone applies around all designated State wetlands.

No Federal wetlands are mapped within the park.

Designated NY State Wetland (NYSDEC)

Designated NY State Wetland Check Zone

Hydrology & The River

Flood Zones

The entire width of the Genesee River, and certain areas landward of the shoreline interface, are considered part of the floodway. The floodway is the channel area of a waterway (stream or river) plus any adjacent floodway areas that must be kept free of encroachment so that the 1% annual chance flood (100-year flood) can be carried without substantial increases in the flood height.

Furthermore, as shown in the mapping, additional areas adjacent to the floodway are depicted as Special Flood Hazard Areas Subject to Inundation by the 1% Annual Chance Flood (100-year flood), designated Zone AE. The 1% Annual Flood is the base flood that has a 1% chance of being exceeded in any given year.

The National Flood Insurance Program’s Flood Insurance Rate Map (FIRM) identifies the base flood elevation (100-year) as Elevation 517.0, NAVD 88.

North (inland) of Zone AE is an additional area identified as Zone X. Zone X is described as areas of 0.2% annual chance of flood (500-year flood); areas of 1% annual chance of flood with average depths of less than 1-foot or drainage areas of less than 1 square mile; and areas protected by levees from the 1% annual chance of flood.

River Water Levels

The Genesee River water levels and discharge volumes in the vicinity of Genesee Valley Park West (the project site) are highly regulated. During potentially extreme precipitation and runoff events, the Mount Morris Dam regulates the amount of water entering the lower Genesee Valley. Additional regulation of inflow is provided by control structures at Rushford Lake, Conesus Lake, and other contributing water bodies.

The Court Street Dam, located in downtown Rochester, regulates the water surface elevations in the vicinity of the project site through controlled discharge. Court Street Dam regulates water elevations for the Erie (Barge) Canal (which crosses the river just upstream from the project site); water elevations are also regulated for the power plant(s) that operate on the river.

By way of Court Street Dam, the Erie (Barge) Canal diverts water from Lake Erie to the river from the west; the river diverts a smaller amount of water into the canal to the east. Through regulated water intake and discharge, the Genesee River water levels have far less fluctuation than would be otherwise expected in an open river system. Unanticipated and/or intense rainfall events can cause a significant rise in the river level; this was particularly true during Hurricane Agnes (1972) when additional releases from Mount Morris Dam were required to prevent dam overtopping.

Similarly, there are seasonal variations in the river water levels, as the river basin water intake and discharge are balanced. Periods of protracted rainfall can cause river level rise, as can runoff generated from snowpack melt that accompanies rapidly rising temperatures. Generally, the river level tends to be higher than average during the late winter and early spring seasons (months of February through May), likely due to snowmelt runoff and precipitation conditions; the river level tends to be lower during the hot, dry seasons of summer and early fall (June through September). Mean historic high river level usually occurs around early April, while mean historic low river level occurs around the end of August.

To assess the potential variability in river water levels, historic river elevations and river discharge values were obtained from two United States Geological Service (USGS) gage stations in the vicinity of the project site. These are:

- Genesee River at Ballantyne Bridge, near Mortimer, NY
- Genesee River at Ford Street Bridge, Rochester, NY

The Ballantyne Bridge gage station is located approximately 3.4 river miles upstream of the project site and records daily river elevation (stage); the period of record for the Ballantyne gage is generally from October 1973 to present.

Extreme high and low gage readings for the period of record are 20.57 feet (January 10, 1998) and 8.20 feet (November 9, 1979), respectively. Gage datum is 500 feet above National Geodetic Vertical Datum 1929 (NGVD

1929). It may be possible that ice damming caused the extreme high gage reading for the period of record; likewise, extreme regulation could also result in other extreme high and low water conditions.

The Ford Street Bridge gage station is located approximately 2.1 river miles downstream of the project site and records daily discharge (flow); the period of record for the Ford Street gage is generally from 1904 to present.

River Current

Generally, the river currents in the primary months of riverfront use are relatively low and very compatible with rowing and paddling facilities. From the months of May to October, average currents are estimated in the 0.5 to 1.5 feet-per-second (fps) range. Maximum discharge values represent extraordinarily high currents, occasionally over 7.0 fps. It is envisioned that during high flow events that rowing and paddling facilities would be closed, or otherwise not be used.

River current velocities are a function of discharge (flow volume) and the cross sectional area of the watercourse. As discharge varies, so does the river current. River current velocities for the site were estimated by dividing the measured discharge values by an estimated flow area. Generally, the river currents for the project site in the primary months of riverfront use are relatively low and very compatible with rowing and paddling facilities. From the months of May to October, average currents are estimated in the 0.5 to 1.5 feet-per-second (fps) range. Maximum discharge values represent extraordinarily high currents, occasionally over 7.0 fps.

The slow current and minimal fluctuation of this portion of the Genesee River make it exceptionally suitable for paddle sports and very desireable for rowing clubs. For a majority of the watersports season (May to October) water volumes drop and remain generally stable at or below 1,000 CFS. River flows during the season only rarely exceed levels unsuitable for novice rowers. More often it is high winds that limit rowing on the river. Genesee Waterways Center rowers will often use the canal if winds are high as it is relativley protected.

Sedimentation and Scour

The Genesee River basin is a complex watershed with varying conditions of hydrology, soils, land use, and management practices. The basin is largely rural, with the majority of land area comprised of agricultural and forested lands. Soil erosion and sedimentation issues in the lower Genesee River area include river channel migration, stream bank instability, agricultural erosion, and general sedimentation runoff as a result of development, roadside ditching, and wetland displacement.

The degree to which sedimentation and scour might occur at the project site are a function of a combination of sediment load in the river, properties of the suspended and out-of suspension soil materials, hydraulic conditions (e.g. depth, velocity, flow patterns) , geometric configuration of the facilities, armoring and vegetative cover, and numerous other influencing factors.

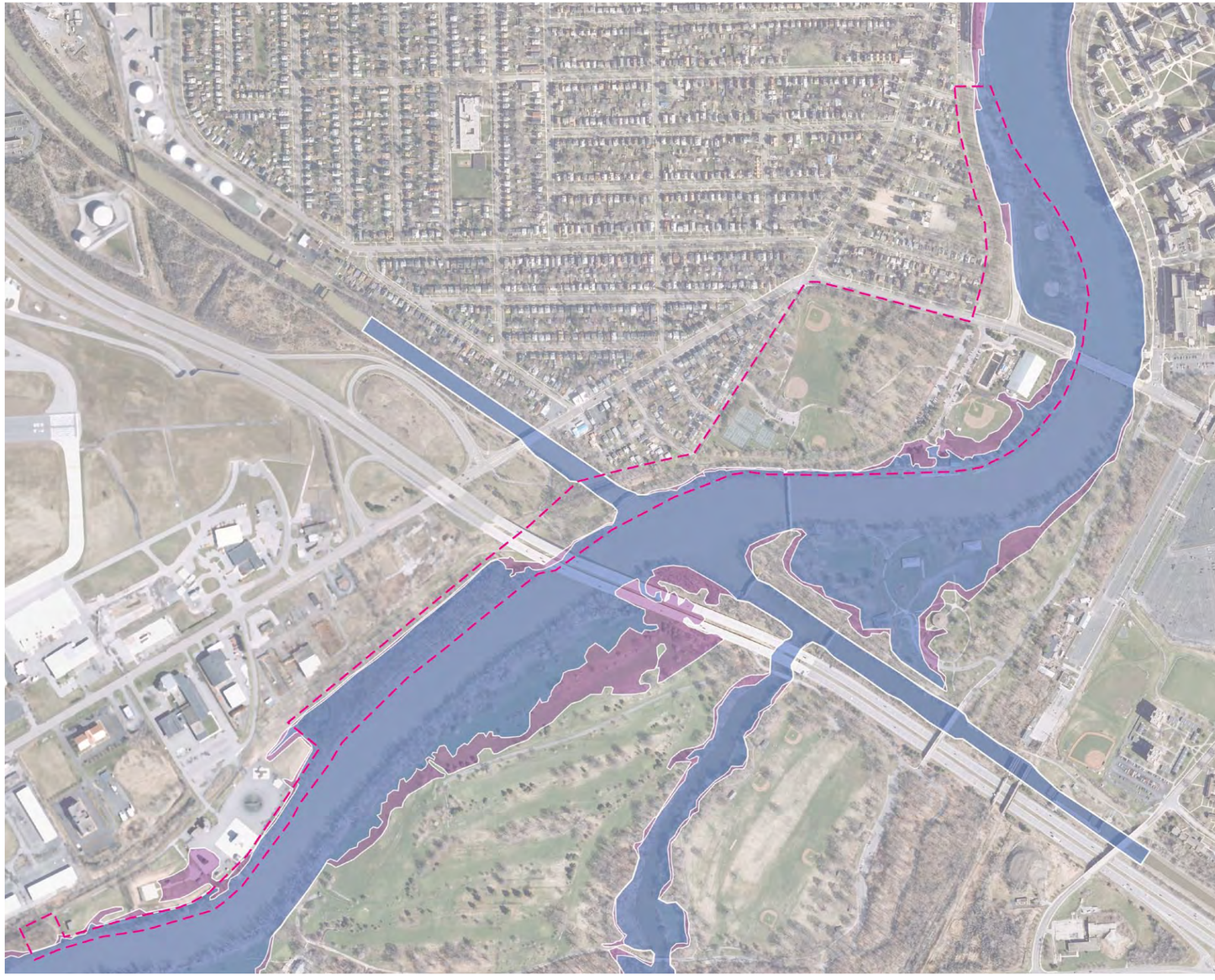
The Genesee River is a meandering water body, consisting of straight courses, and gentle to sharp bends. The existing Genesee Waterways Center site is located near the end of a gently sweeping bend to the right, just before a much sharper bent to the left. Since water velocities tend to be higher at the outside of a bend, the site is in a transitional area where stream velocities might be expected to be slowing somewhat. In addition, it is generally expected that vegetated near shore and near bottom water velocities tend to be lower; these natural occurrences also tends to release sediment particles from suspension. Similarly, man-made facilities (docks, platforms, ramps, pilings) tend to break or redirect flow, causing localized areas of minor scour and deposition.

The existing Genesee Waterways Center site would generally tend to accrete sediment; periodic conditions of high flow (as may occur during a spring runoff) may temporarily reverse this process.

THE FLOODPLAIN

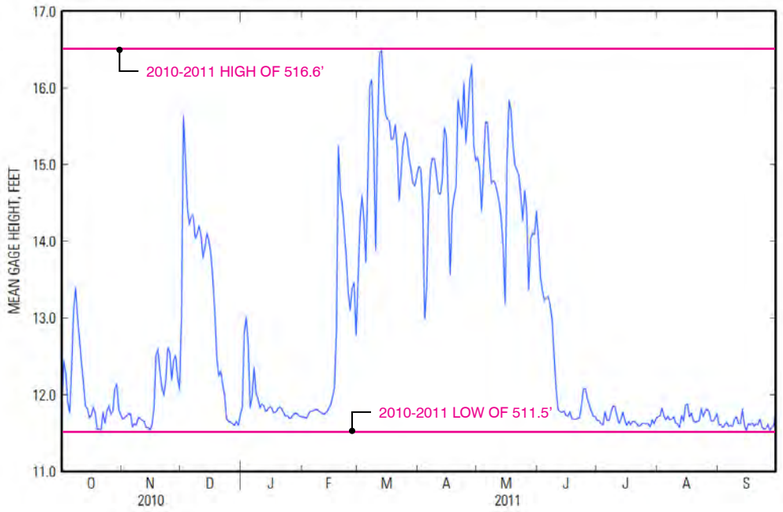
ZONE AE: 100-year flood zone (1% yearly probability)

ZONE X: 500-year flood zone (0.2% yearly probability)



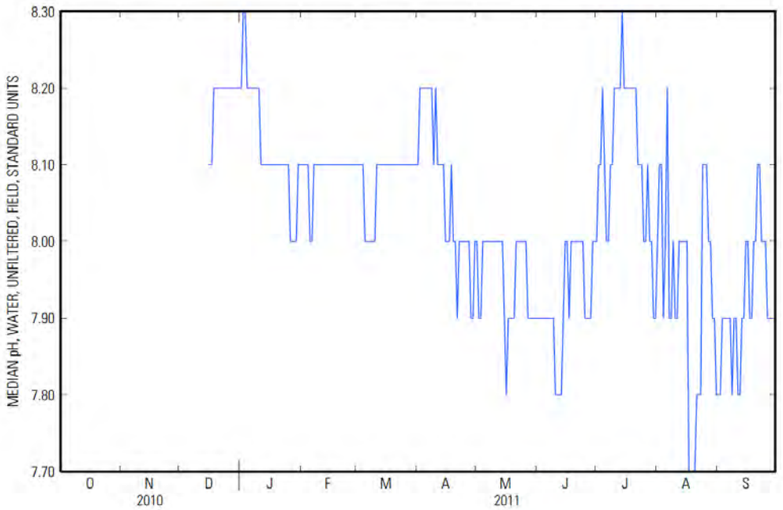
RIVER WATER LEVEL

Data from USGS Ballantyne Rd Bridge gauge.
The guage datum is 500 and water levels shown are 5XX feet above sea level.



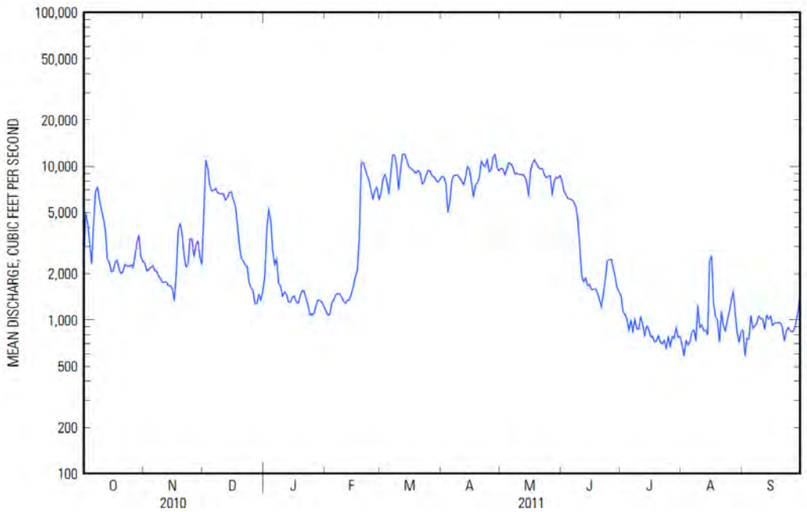
WATER pH

Water Quality data from USGS gauge at Ford St Bridge.



RIVER WATER VOLUME

Water Volume data from USGS gauge at Ford St Bridge.



Other potential development locations, both within and beyond Genesee Valley Park West, would need to be evaluated on a case-by-case basis with respect to sedimentation, scour, and other site considerations.

GVPW shorline areas immediately upstream or downstream of the Elmwood Avenue Bridge are on a full inside river bend, resulting in heightened sedimentation and debris accumulation. Site observations reveal logs and sediment building up around the west bridge pier.

The introduction of docks, bank stabilization, and other manmade features can significantly impact the hydraulic characteristics of a particular site. This is particularly evident at the existing Genesee Waterways Center site, where the dock placement and general waterfront facilities configuration may be causing sediment to accrete to a degree greater than what might be expected otherwise. Hence, it is best to avoid generalizations regarding site suitability from a hydraulics standpoint; it is advised to consider site specific characteristics, and proposed modifications or adaptations when assessing alternate sites and their configurations.

While there are many contributing factors to sedimentation and scour, the outside radii of river bends tend to provide faster flowing water; this tends to keep sediments in suspension and provide a lower level of sediment accretion. Conversely, the inside radii of river bends tend to provide slower water velocities, resulting in a somewhat greater level of sediment accretion. Straight river segments are generally preferred for sedimentation and scour issues.

Wind and Waves

The Genesee River is low-lying, meandering, tree-lined, and is therefore generally well protected from the influence of wind-generated waves. The size of wind-generated wave expected for the design of any riverfront facility would be less than one-foot in height.

Since the Genesee River is navigable, there exists the possibility of vessel-generated waves at the site. The potential for vessel-generated waves is mitigated to some degree by speed limits imposed on the canal; the Genesee River (Erie, Barge Canal) is posted as having a 10 MPH speed limit. In practice, most of the larger vessels that routinely travel this portion of the river (Mary Jemison, Sam Patch) travel somewhat slower than the posted limit, while smaller recreation craft tend to travel somewhat above the limit. Overall, it is expected that a 1-foot vessel wake wave would be a suitable design parameter for near shore structures.

Drift and Debris

Much of the Genesee River is tree-lined and, through erosive forces and natural processes, routinely accumulates and transports a moderate quantity of trees, branches, and other vegetative debris. It also tends to accumulate trash and other man-made debris, either through storm water run-off, wind, or intentional placement in the river.

Floating logs, branches, sticks, and trash tend to accumulate in near shore areas; this process is amplified when manmade elements, such as docks, platforms, and similar structures obstruct natural flow patterns and the progression of drift and debris downstream.

Drift and debris can cause several issues for riverfront structures. Large logs traveling at stream velocity can cause damage to lightly framed structures. Excessive collection of drift and debris on the upstream side can obstruct the waterway, and can transmit increase current load on the structure. Debris can also wrap around the front of the structure, and cause difficulty for the boaters, rowers, and paddlers using the facilities. Excessive accumulation of trash and debris is unsightly, requires periodic clean-up, and is generally a nuisance. Sites that typically experience accumulation of drift and debris can be provided with guard piles, debris booms, and similar barriers to help prevent potential damage and the accumulation of unwanted materials.

Water Quality

A number of studies have been performed to assess water quality in the Genesee River. The potential adverse

impacts of recreational boating and paddler facilities on water quality can be mitigated through Best Management Practices. These can include:

- Provision of appropriate sediment and erosion control devices (e.g. sediment traps, silt fence, turbidity curtains) to minimize short-term construction phase impacts on water quality
- Prohibiting water discharge of sanitary holding tanks by recreational boats that may berth at the site; if recreational boats will be routinely accommodated, then a sanitary pump-out system might be considered.
- Proper control of fuels and oils used for motorized boats, including control of re-fueling locations, motor maintenance locations, and the availability of absorbent pads and other appropriate materials for spill control.
- Proper control of gray water that might be generated from washing of docks, boats, shells, and other related items.

Ice

Due to variable temperature and precipitation conditions, the thickness of ice build-up differs from year-to-year. In addition to localized static ice development, the river also carries floe ice, which is carried downstream with the river current during spring thaw conditions. Hence, ice formation and ice floe conditions must be considered when evaluating riverfront facilities. Ice on the Genesee River is typically a conglomeration of borken ice rubble and floes refrozen into a solid mass. Ice near shorlines and structures can be 30% to 50% thicker than typical ice formation on ths river.

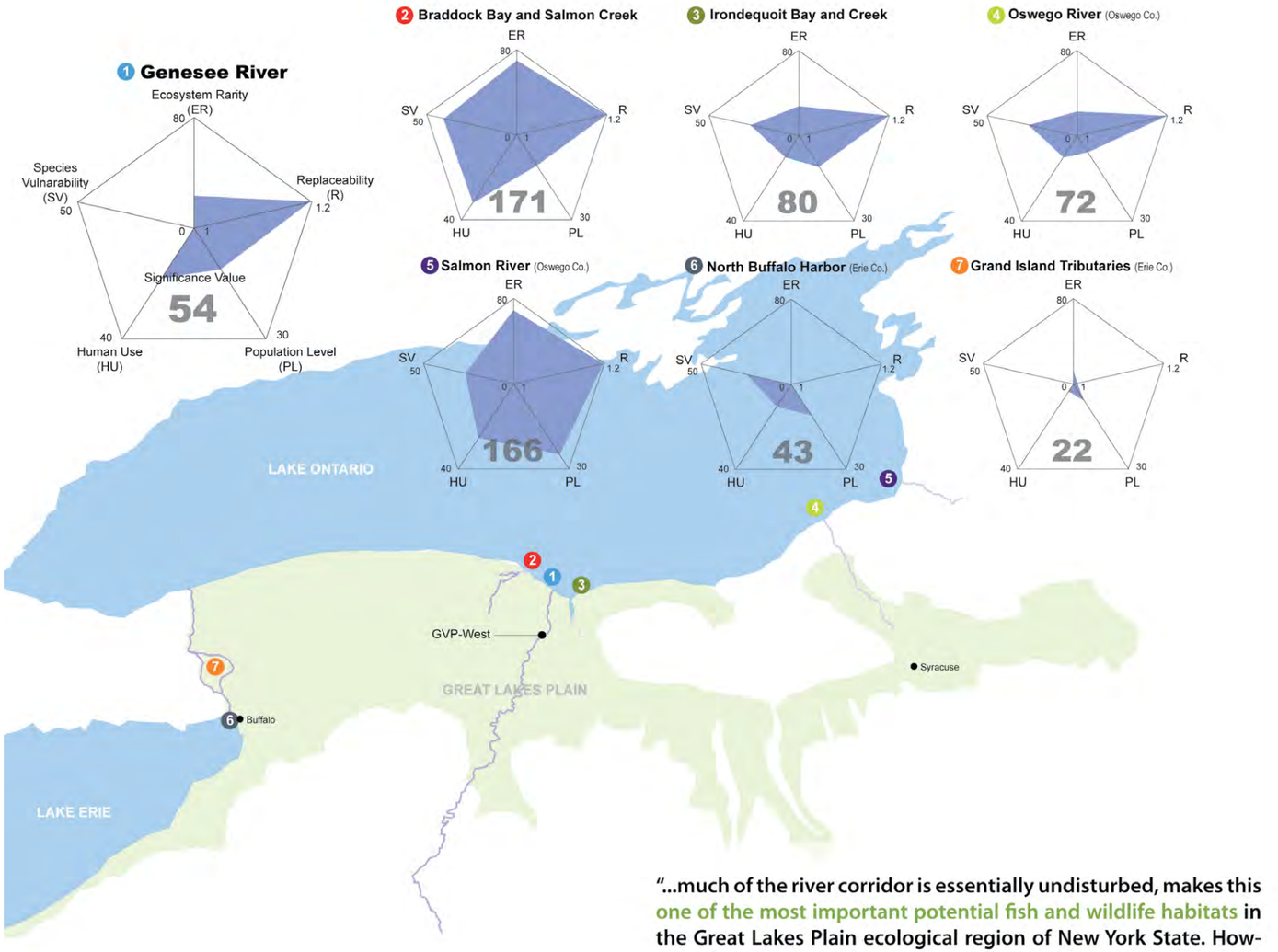
The ice can exerts great force on waterfront structures. Specific design criteria of docks and structures must take into account horizontal anbd vertical forces related to ice if they remain in the water. Compressive thermal forces on floating pontoons left in place during the winter also require special consideration. Generally, floating docks may remain in place provided that the following conditions are met:

- Pontoons are fully filled with foam
- Foam encasement has a minimum wall thickness of not less than ¼ inch
- Docks are free to move laterally and longitudinally
- Docks are not restrained by connection to shore

RELATIVE ENVIRONMENTAL QUALITY OF THE GENESEE RIVER

Comparative research data from the NYS Department of State indicated that, while the Genesee River is potentially one of the most significant fish and wildlife habitats in the region, the poor condition had reduced it's ability to support diverse species.

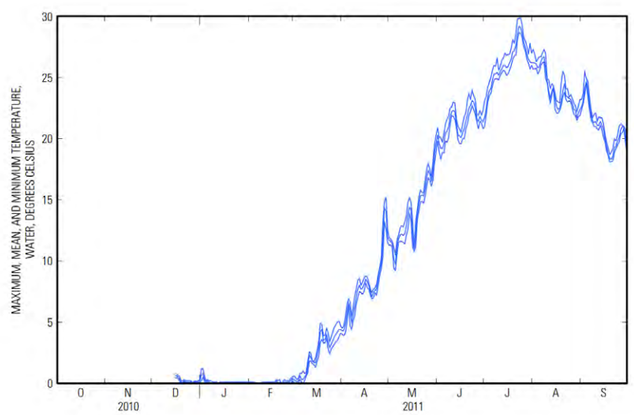
Data and scoring from the NYS Department of State, Office of Communities and Waterfronts



"...much of the river corridor is essentially undisturbed, makes this **one of the most important potential fish and wildlife habitats** in the Great Lakes Plain ecological region of New York State. However, **water pollution**, and extensive alteration of the lower river channel, **have reduced the environmental quality** of this area."
(NYS Department of State, Office of Communities and Waterfronts)

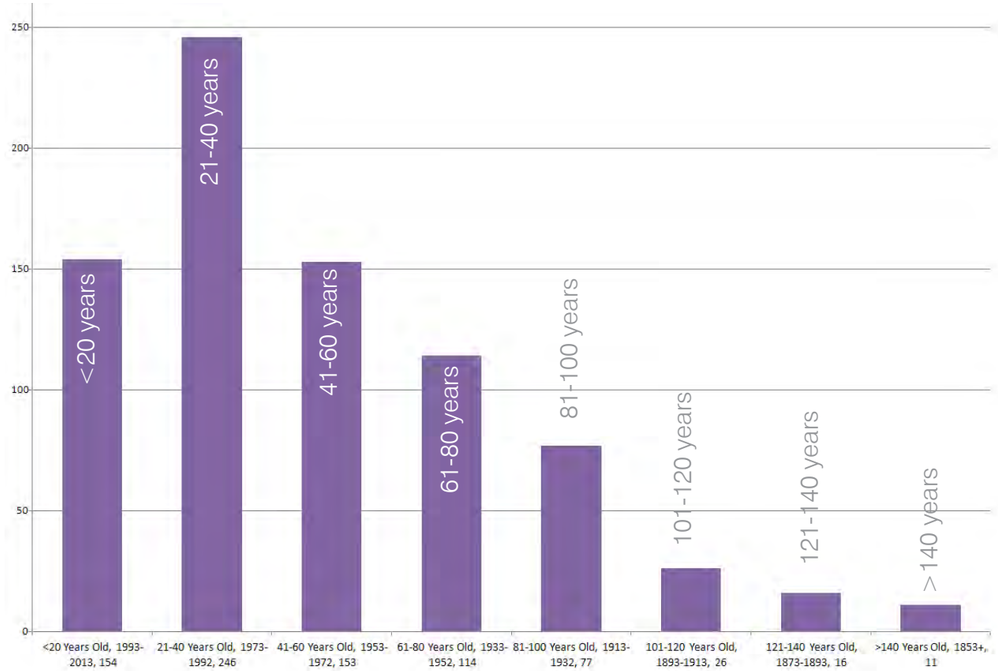
RIVER WATER TEMPERATURE

Ford St Bridge



TREE AGE DISTRIBUTION

Estimated age determined by US Forest Service individual species growth factors, and modified for park landscape context. Calculated ages were generally modified (reduced) by 30% to account for park context with much less nutrient and light competition vs. a forest context.



Trees & Vegetation

In December of 2010 the City of Rochester's forestry department completed a survey of trees of GVPW. More than 800 trees were included in the survey, which consisted of all trees in relatively open or lawn areas of the park north of the canal. Many trees along the river edge or in a few thick wooded stands were not surveyed due to the concentrated understory vegetation. Trees south of the canal were not surveyed.

Species Diversity

The park is dominated by oak and maples, many of which are assumed to be planted or pre-existing prior to the 1890 creation of the public park. There is substantial diversity in surveyed tree species, with more than 40 genus types and more than 70 individual species represented. There are a relatively limited number of Norway maples (invasive) compared to what one would expect from a public park and grounds with most of the current infrastructure built in the 1970s. Invasive Norway Maples comprise 3.8% of surveyed trees. The percentage may be higher in non-surveyed wooded areas – often found in clusters – due to aggressive seedling germination that can expand if unmanaged.

Diversity plays an important role in the long-term stability of an ecosystem. When an area has a high diversity of tree species, it is less likely to suffer catastrophic loss from diseases or pests.

PARK VEGETATION (ALL TREES + UNDERSTORY)

All trees and understory vegetation within the park are highlighted.

WOODED AREAS (TREES + UNDERSTORY)

Areas highlighted represent significantly thick wooded areas with more or less unmanaged vegetated understory.

OPEN-AREA SURVEYED TREES (TREES >2" DBH)

Trees in open areas larger than 2" dbh were surveyed by the City of Rochester in 2010. Surveys trees are highlighted.

The riverbank is dominated by a combination of wooded understory and large shade trees. Many of the younger trees appear naturalized, but many of the older trees along the riverbank match those from the park's original Olmsted firm planting palettes.

Significant / Historic Trees

Many of the trees in GVPW are significant in both size and age. Significant trees in the park include trees that were planted as the land was initially developed beginning in 1888, as well as trees that likely preexisted on site prior to 1888. The approximate age of all surveyed trees was estimated using US Forest Service "growth factors" for individual species. Using growth factors to estimate age is an inexact method, however aside from invasive procedures such as tree coring, growth factors serve as a reasonably accurate way to estimate tree age in a forest setting. To compensate for trees in a landscape setting, which generally grow faster due to less competition for nutrients and sunlight, the resulting estimated ages were further reduced to a conservative (so as not to overestimate tree age) 70% of the original age estimate.

Historic and significant trees have been mapped relative to the park's historic periods of significance (see the Historic and Cultural Landscape section of this report). The oldest group of trees is noted as those estimated at more than 125 years old – or those planted or pre-existing prior to the creation of the park in 1888. There are at approximately 24 of these trees existing within the park. The most significant concentration of historic trees in located in the wooded knoll and picnic area, just west of the existing parking lots.

The second group of significant trees are those estimated to have been planted between 1889 and 1913, which would include trees associated with the original Olmsted park planting plans and trees that may be left from the Frost parcel's period as a municipal tree nursery. There are at least 32 of these trees, mostly clustered within the wooded picnic grove.

The third age grouping of significant trees are those estimated to have been planted between 1914 and 1933, the period ending just prior to the construction of the Elmwood Avenue bridge. From purely a calculated growth-rate data standpoint, there are at least 78 of these trees within the park. However, the actual number of trees planted in this period is likely much higher as the estimates have based on species and trunk diameter alone. As stated, the estimates are an imprecise method of determining age and the inconsistencies can be seen in the variation of White Oak ages in the wooded glade near the north bank of the Erie Canal confluence. It is known from historic photographs that these White Oaks were planted around 1922 along with the park and landscape restoration after than canal severed the park. That being known, the historic tree mapping shows that not all of these White Oaks were correctly calculated as being planted prior to 1933. Variations in soils nutrients, access to light, or other factors contributed to many of the White Oak trees being much smaller or larger than their peers, despite being planted at the same time.

A significant number of trees south of Elmwood along the river bank were removed in the mid-1930s as the former Durand Boat House was removed and the area south of the Elmwood Avenue Bridge was used for construction staging. Many of these trees were massive American Elms clearly recognizable in historic photographs.

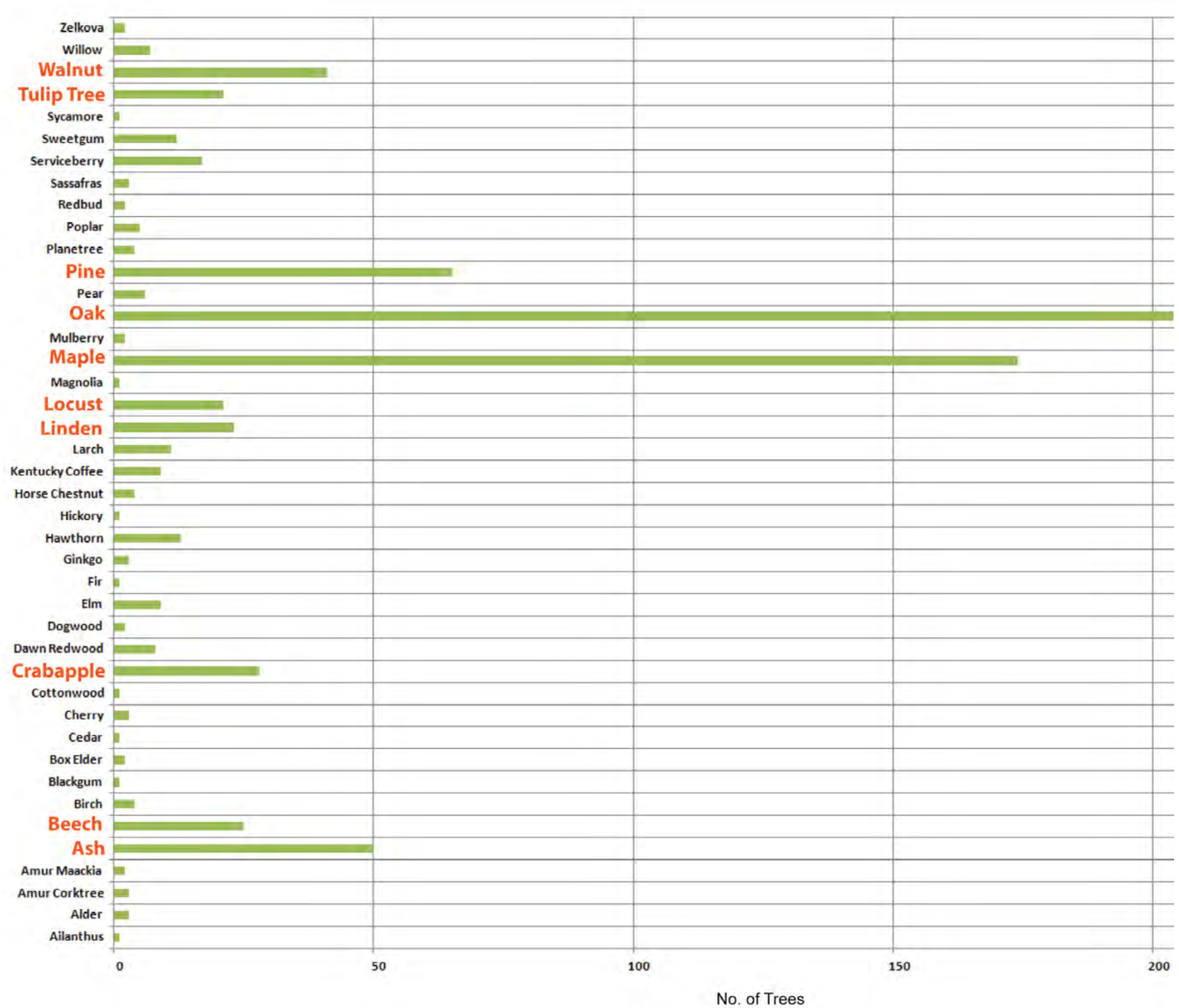
Succession and Unplanned Planting

Many of oldest and most significant trees will reach their life expectancy in the next 50 years . Though many trees can live for much longer if managed appropriately, an estimated average life expectancy for the deciduous shade trees is approximately 200 years.

One potential issue in the overall tree management within the park is the over-planting of trees. While succession of aging trees should be a priority, a management plan relative to the park's future master plan should be developed. As they age, trees define the visual structure of a park and planting new trees in any available open lawn areas without a comprehensive planting plan limits the ability for the park to serve its users – they become trees that have no connection to the overall use and design of the park experience. Trees planted without respect to an overall management plan also create maintenance burdens for parks and forestry staff. One example of this is the large numbers of trees planted in the early 1990s. A large-scale reforestation effort was conducted after the area's 1991 Ice Storm. More than 10,000 trees were lost to the storm in the City of Rochester alone. The City replanted more than 12,000 new trees in the succeeding years. The

TREE SPECIES DIVERSITY (SURVEYED TREES)

The park is dominated by oak and maples, many of which were planted or pre-existing prior to the 1890 creation of the public park. There is substantial diversity in surveyed tree species, with more than 40 genus types and more than 70 individual species represented.



One of several significant European Beech trees within the wooded picnic grove.

American White Birch located along the river edge, north of Ballfield #6. Betula papyracea is one of several tree species planted along the river in the Olmsted firm planting lists. However, very few White Birches appear to remain along the river - long since crowded out by understory brush and more aggressive tree species.

SIGNIFICANT / HISTORIC TREES

Historic and significant trees have been mapped relative to the park's historic periods of significance (see the Historic and Cultural Landscape section of this report). The oldest group of trees is noted as those estimated at more than 125 years old – or those planted or pre-existing prior to the creation of the park in 1888.

White oaks planted around 1920 in glade near the canal confluence. Pedestrian bridge in background.

corresponding peak noted in the Tree Age distribution chart (21-40 years) is the result of this additional post-storm planting. Due to the large numbers of new plantings, many of these post-storm trees have received very little care of maintenance since planting. In fact, many of the trees around the park's Ice Rink that appear to have been planted post-1991 still have planting stakes – which have been impacted into the tree trunks over the last two decades. These trees are damaged and their health and longevity have been severely compromised.

Vegetation & the Park's Period of Significance

The historic nature of the park necessitates review of planting species to evaluate their appropriateness for the park's historic Period of Significance. (See Section 03 for more information on the park's Period of Significance.) This is particularly important relative to the park's Olmsted-design origins.

LIST OF TREES >1888

Tree ID corresponds to the the area and individual tree number assigned by the City of Rochester Forestry Department.

DBH = Diameter at Breast Height as measured in 2010

Est. Age = Estimated Landscape Setting Age, which is reduced by 30% to account for quicker growth in a less competitive setting, [(Species Growth Rate x dbh) x 0.70]

ID #	Type	DBH (inches)	Est. Age (years)
09-117	European Beech	70	196
10-023	American Linden	78	195
09-119	Sugar Maple	44	169
09-104	European Beech	54	151
06-008	Silver Maple	70	147
09-015	White Oak	42	147
10-070	White Oak	42	147
10-098	White Oak	42	147
07-049	Red Oak	52	146
10-025	American Linden	57	143
03-009	White Oak	40	140
10-091	White Oak	40	140
12-059	European Beech	48	134
10-091	White Oak	38	133
12-072	Norway Maple	42	132
07-017	Black Walnut	40	126
12-023	Shingle Oak	30	126
13-013	Shingle Oak	30	126
03-022	Tulip Tree	60	126
10-033	White Oak	36	126
02-032	Black Locust	50	125
10-094	European Beech	44	123
10-097	European Beech	44	123
12-066	European Beech	44	123

Of the 24 significant trees (survey trees only) estimated to be as old or older than the park's founding (1888), 21 (88%) are species that Olmsted included in the planting plan for the GVPW area. The three existing park trees not associated with the Olmsted plant list are Norway Maple, Black Locust and Black Willow.

When looking at the 60 surveyed trees estimated as planted within the park's Olmsted-specific Period of Significance (1888-1915), 49 (82%) are matches to the 1888 planting list. The 1888-1915 trees not associated with the list are dominated by Black Walnut. Looking more broadly at the park's extended Period of Significance (1888-1950) the surveyed tree count reaches 245, of which 206 (84%) are listed on the Olmsted planting list. The 1888-1950 trees not associated with the list are dominated by Black Walnut and Norway Maple. For comparison, of the remaining 553 surveyed trees that are estimated to have been planted after 1950, only 241 (43%) are species listed on the park's original landscape plan. Of the tree species not associated with the list, Amur Maple, Austrian Pine, Black Walnut and Norway Maple dominate. The overall percentage of total surveyed trees that match the original planting list is 42%.

These results show the relative lack of attention to the park's historic plant palette over that last 60 years. While many of the introductions are responsible for increasing diversity, they may not be compatible with the park's period of significance. Many of the introduced species are either small ornamental flowering trees or evergreens - neither of which were used in abundance within Olmsted's pastoral planting schemes.

The following tree species were utilized by Olmsted to design the landscape at GVPW. See Section 03 (The Historic landscape) for analysis of the park's original 1893 planting plan.

Olmsted's Individually Sited Trees

Ulmus americana (American Elm)
Acer rubrum (Red Maple)
Acer saccharum (Sugar Maple)
Betula nigra (River Birch)
Betula lenta (Sweet Birch)
Fagus ferruginea (grandiflora) (American Beech)
Quercus palustris (Pin Oak)

Olmsted's Border Plantation Trees

Fagus sylvatica (European Beech)
Fagus ferruginea (grandiflora) (American Beech)
Quercus (mix of oak species)
Betula papyracea (papyrifera) (White Birch) (1)
Gleditsia tricanthos (Honey Locust)
Liquidambar styraciflua (American Sweetgum)
Tilia americana (American Linden)
Magnolia acuminate (Cucumbertree Magnolia)
Liriodendron tulipifera (Tuliptree, Tulip Poplar)
Acer negundo (Box Elder) (2)
Morus alba (White Mulberry) (3)
Acer saccharum (Sugar Maple)
Sassafrass officinalis (albidum) (Sassafrass)
Populus monilifera (deltoides) (Eastern Cottonwood)
Carya alba (tomentosa) (Mockernut Hickory)
Fraxinus viridis (pennsylvanica) (Green Ash)(4)
(Prunus) Cerasus serotina (Black Cherry)
Fraxinus americana (White Ash) (4)
Catalpa speciosa (Northern Catalpa)
Acer dasycarpeium (saccharinum) (Silver Maple)
Acer rubrum (Red Maple)

(1) *Betula papyrifera* is highly susceptible to Bronze Birch Borer (insect)
(2) *Acer negundo* suffers from weak wood and is potentially invasive
(3) *Morus alba* is potentially invasive
(4) *Fraxinus* species are susceptible to Emerald Ash Border (insect/pest)

Vegetation Cover

Vegetation / Turf cover in the park generally includes four basic types:

Open Mown Lawn Area: Consisting of both open passive lawn and active recreation fields. Nominal areas of ball field interior (soil) are included.

Trees With Mown Lawn: Consisting of tree canopy area (shade, ornamental and evergreen) with mown lawn on the ground plane.

Trees With Wooded Understory: Consisting of wooded areas and understory vegetation that is more or less inaccessible other than possible dirt trails or minor clearings.

Impervious: Consisting of paved trails, sidewalks, roads, parking areas and building footprints that contribute to storm water runoff.

For comparison, vegetation cover analysis was divided into three park areas, including lands north of Elmwood Avenue, lands between Elmwood Avenue and the Canal, and lands south of the Canal. Results show that the park includes a total of approximately 43 acres of mown lawn, in the form of both passive and active turf areas, totaling 51% of the total park area. The park's active recreation turf field areas make

VEGETATION COVER

	AREA: SF (ACRES)	% OF TOTAL PARK LAND
OPEN MOWN LAWN	1,145,000 (26.28)	31%
TREES W/ MOWN LAWN	760,000 (17.45)	20%
TREES W/ WOODED UNDERSTORY	1,290,000 (29.61)	34%
IMPERVIOUS	560,000 (12.86)	15%
+/- TOTAL PARK AREA	3,755,000 (86)	100%

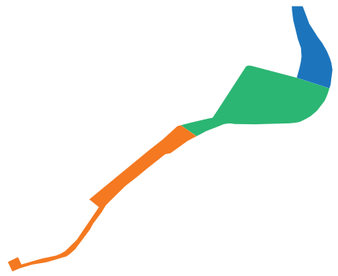
51% lawn

44% (510,000 SF) of this open lawn area consists of recreation fields (ball fields 1-6 & shared multi-purpose field).

TOTAL LAWN AREA:
43 acres (51% of land area)

TOTAL ACTIVE RECREATION FIELDS LAWN AREA:
+/-11.7 acres (14% of land area)

TOTAL LAWN AREA NOT ASSOCIATED WITH ACTIVE RECREATION FIELDS:
31 acres (36% of land area)



NORTH OF ELMWOOD

	AREA (SF)	% COVER IN THIS AREA
OPEN MOWN LAWN	235,000	33%
TREES W/ MOWN LAWN	80,000	11%
TREES W/ WOODED UNDERSTORY	320,000	44%
IMPERVIOUS	85,000	12%
TOTAL AREA NORTH OF ELMWOOD	720,000	

44% lawn

ELMWOOD TO CANAL

OPEN MOWN LAWN	690,000	37%
TREES W/ MOWN LAWN	560,000	30%
TREES W/ WOODED UNDERSTORY	210,000	11%
IMPERVIOUS	400,000	22%
TOTAL AREA ELMWOOD TO CANAL	1,860,000	

67% lawn

SOUTH OF CANAL

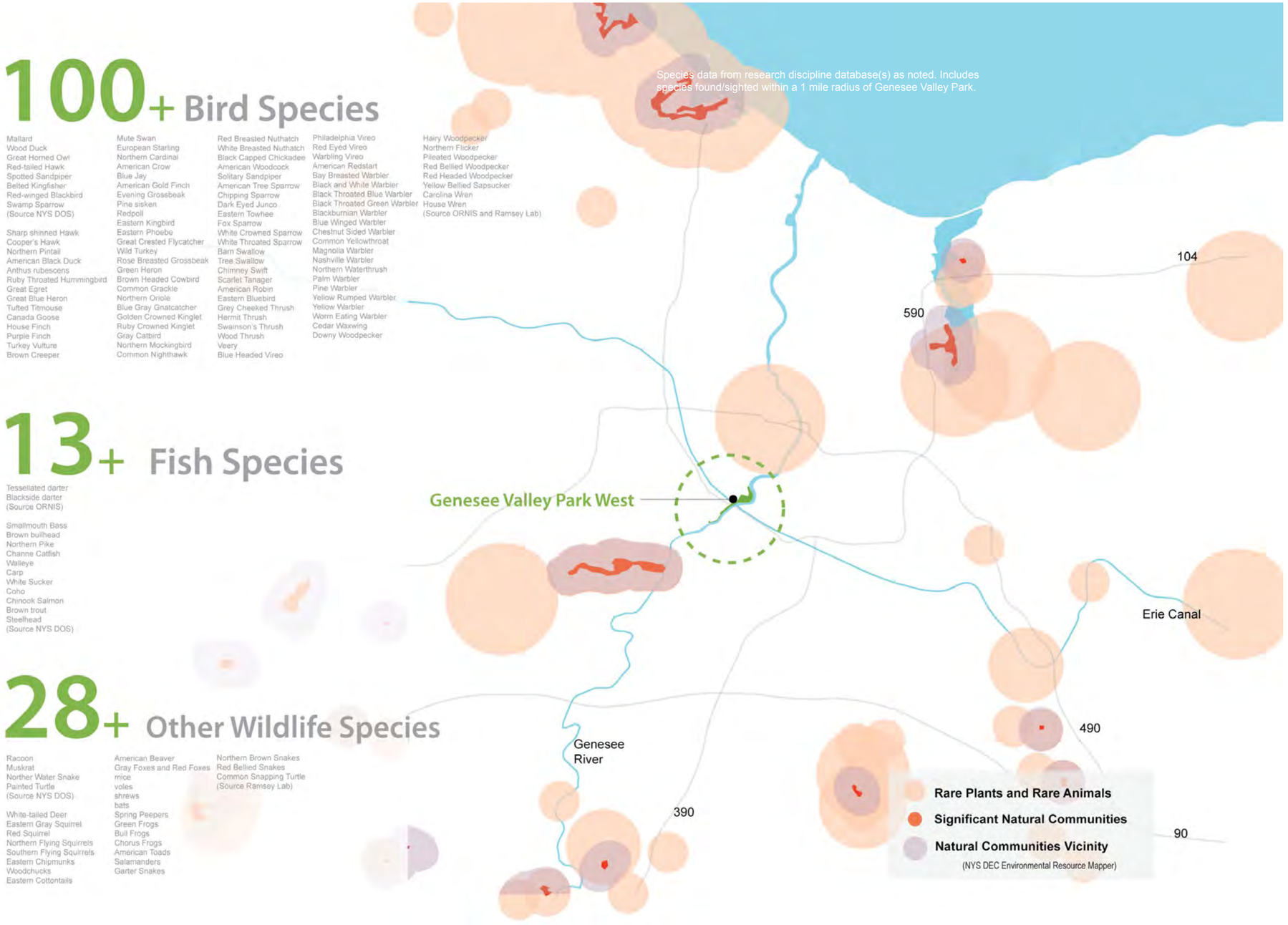
OPEN MOWN LAWN	220,000	19%
TREES W/ MOWN LAWN	120,000	10%
TREES W/ WOODED UNDERSTORY	760,000	65%
IMPERVIOUS	75,000	6%
TOTAL AREA SOUTH OF CANAL	1,175,000	

29% lawn

TURF MAINTENANCE COST IMPLICATIONS

	EXISTING TURF 28 MOWS PER YEAR	EXISTING TURF 14 MOWS PER YEAR	LOW-GROW ("NO-MOW") TURF (1 MOW PER YEAR)	WILDFLOWER MEADOW (MOW 1 PER 3 YEARS)
ESTIMATED ANNUAL COST PER ACRE	$2,080 / ACRE	$1,120 / ACRE	$160 / ACRE	$620 / ACRE
	$80/acre 48-58" mower	$80/acre, 48-58" mower, adjustable deck	$160/acre, 48-58" mower, dethatch, adjustable deck	$1,850/acre, annual mow of 1/3 of acreage, brush mower
TOTAL ESTIMATED ANNUAL PARK COST (31 ACRES)	$64,480	$34,720	$4,960	$19,220

Estimates via RS Means Costworks. Assumes existing turf maintenance includes no fertilization or weed control. Fertilization or weed control treatments will add approximately $250 per acre / per treatment. Costs are operational / maintenance costs only. Mowing cycles assume post-establishment.



up approximately 12 of those acres. The remaining 31 acres of parkland (36% of the park area) constitute open or tree-canopied lawn area that requires mowing maintenance but does not support active recreation programming.

The highest concentration of lawn area is located between Elmwood Avenue and the Erie Canal, with nearly 70% of the land area devoted to turf. The lowest concentration of lawn is south of the Canal, where just 30% of land area is devoted to lawn. Much of the mown lawn area south of the Canal is in the form of varied turf shoulders along linear trails.

The cost implications of maintaining significant areas of mown lawn can be excessive for strained parks budgets. For analysis, the cost to mow the park's passive turf acres (31) have been compared to costs of equivalent alternative vegetation treatments, including reduced mowing, specialty no-mow seed mixes, and wildflower meadow. The estimated annual costs of mowing the park's existing passive turf acreage are $64,480. Reducing mowing or utilizing a specialty seed mix requiring only 1 mowing per year results in significant cost savings.

Much of the apprehension by residents and municipalities over no-mow, wildflower meadow, or other reduced mowing scenarios stems from the misunderstanding and miscommunication of the purpose behind the un-kept appearance of lower maintenance turf applications. When residents are notified with the cost savings and park users are reminded of the purpose of meadow-like appearance by on-site notification or other measures, public sentiment if generally positive for well-designed low maintenance turf alternatives. One of the most successful strategies is to provide access control measures, which may include small fencing, posts, signage or other items meant to identify the meadow area as part of a broader ecological strategy.

Natural Communities

Natural wildlife communities within the park are varied despite the park's nearby industrial land uses and the poor water quality from the watershed's agricultural uses. The diversity is primarily due to the significant unmanaged wooded areas and the presense of an extensive riparian shorline. The park is also adjacent to nearby universities which play a role in quantifying and cataloging individual species sightings.

The species diversity as noted and mapped to the left represents the total species sightings within 1 mile of the park as noted by Biology and ORNIS databases.

Utilities

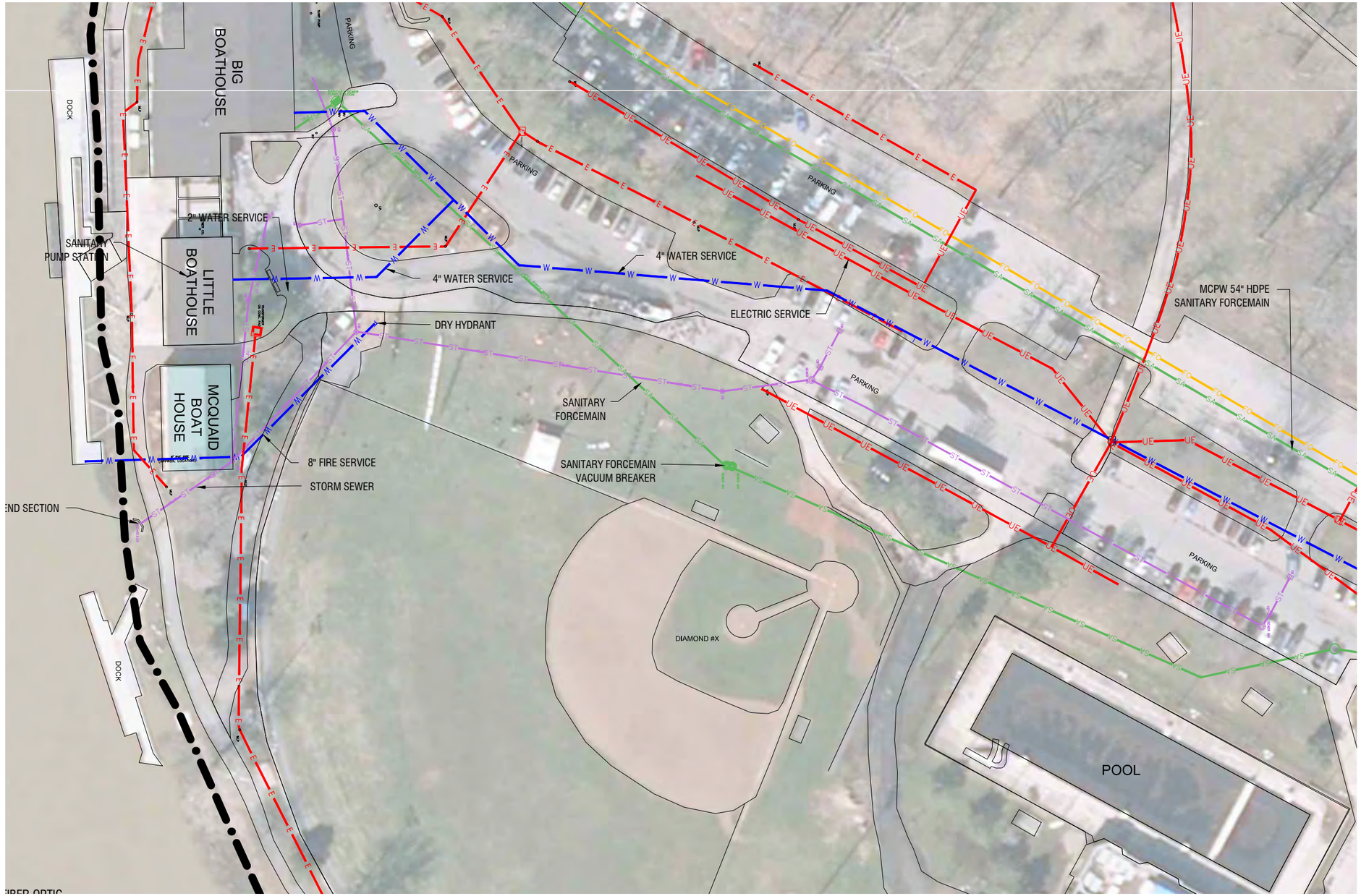
Elmwood Avenue is a major thoroughfare with large diameter sanitary sewer, and water mains running underneath it. Elmwood Avenue also serves as a route for underground telecommunications, multiple high voltage electrical duct banks, sanitary sewer, water, and gas mains. The majority of the public utilities are on the north side of Elmwood Avenue. A fiber optic line runs along the south side of Elmwood Avenue, along with electrical services to street lights and park facilities. Water and gas lines run along the south side of Elmwood and cross over to the north side near the Sports Complex. The former Genesee Valley Canal and rail line that runs north-south through the park includes utility easements for a 54" HDPE sanitary forcemain and fiber optic / telecom service. Portions of this report include information previously studied by LaBella Associated and presented to the City of Rochester in November of 2011.

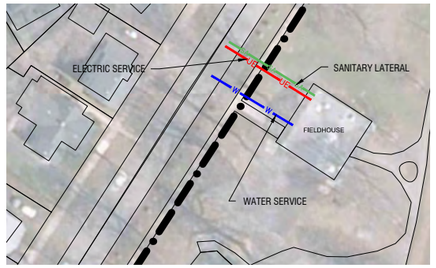
Water: An existing 4-inch domestic service provides water to the Sports Complex and the Genesee Waterways Center. A 2-inch service extends to the Large Boat House. Records drawings indicate that a 4-inch service runs to the Small Boat House but personnel at the Genesee Waterways Center believe there is only a 1-inch line in that building. There is a dry hydrant located adjacent to the cul-de-sac at the Genesee Waterways Center that is plumbed to the river for fire protection.

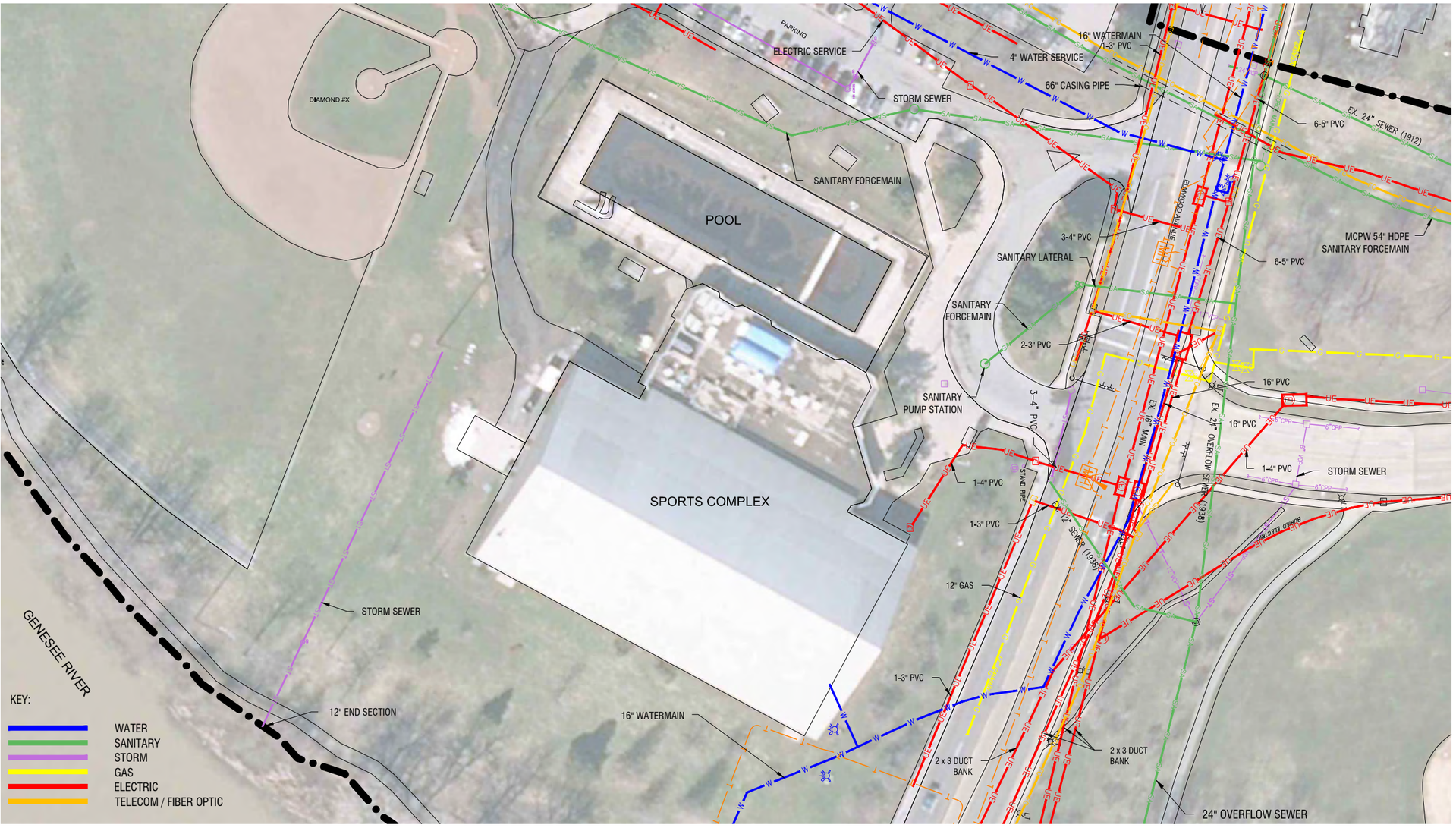
Pool: The outdoor pool is located immediately west of the Sports Complex. A 1.5-inch water service is used to fill the pool. The pool is drained through an 8 inch pipe plumbed to a pump station serving the Sports Complex.

Storm: There are no catch basins in the western parking lot near the Sports Complex and stormwater appears to sheet flow toward the eastern parking lot where there are four catch basins. The stormwater from this parking lot is conveyed to the Genesee River. The roof of the Sports Complex is connected to the site's storm system.

Electrical: The Sports Complex and Genesee Waterways Center, have individual services from Elmwood Avenue. Both services enter the site underground, and the service to the Genesee Waterways Center transitions to an overhead service approximately halfway between the buildings. The baseball field south of the Sports Complex includes lighting which is supplied and controlled by a panel located adjacent







to the field. Site lighting is also provided for the parking lots and the Genesee Waterways Center.

Sanitary: The Sports Complex is connected to the sanitary sewer along Elmwood Avenue via a forcemain and lateral of unknown size. The pump station is located on the north end of the Sports Complex building. The Genesee Waterways Center has a separate sanitary pump station located adjacent to the Large Boathouse. This station has had a history of problems as illustrated in the 2011 Genesee Valley Park – Marina and Boathouse Report. The report states:

The existing sewage lift station serving the marina and boathouse is comprised of a 6' diameter by 12' deep concrete basin, (2) 3 HP submersible pumps and associated controls. The lift station receives sanitary waste from the marina and boathouse and pumps this sanitary waste approximately 900' to a gravity sewer on Elmwood Avenue. The existing lift station system control panel is located inside the adjacent boathouse and is supplied with power from the nearby electrical service panel.

At the time of investigation, the western pump isolation breaker is in the off position. Genesee Waterways has stated that the isolation breaker tripped off continuously on overload. The remaining eastern pump is currently the only pump in operation and was found to be working when manually started. A (4) inch gravity inlet pipe currently discharges into the sump basin. A constant flow of clean water from the inlet pipe was noted on numerous occasions. This is consistent with ground water infiltration or a water leak in the building. The recommendation from the 2011 investigation was to replace the existing lift station with appropriately sized equipment.

Telecomm: The site is served by underground telephone and cable lines from Elmwood Avenue. Both the Sports Complex and Genesee Waterways Center have individual services.

Field House Utilities: The Field House has separate water, electric, and sanitary sewer services, these services are connected to public utilities that run along Genesee Street.