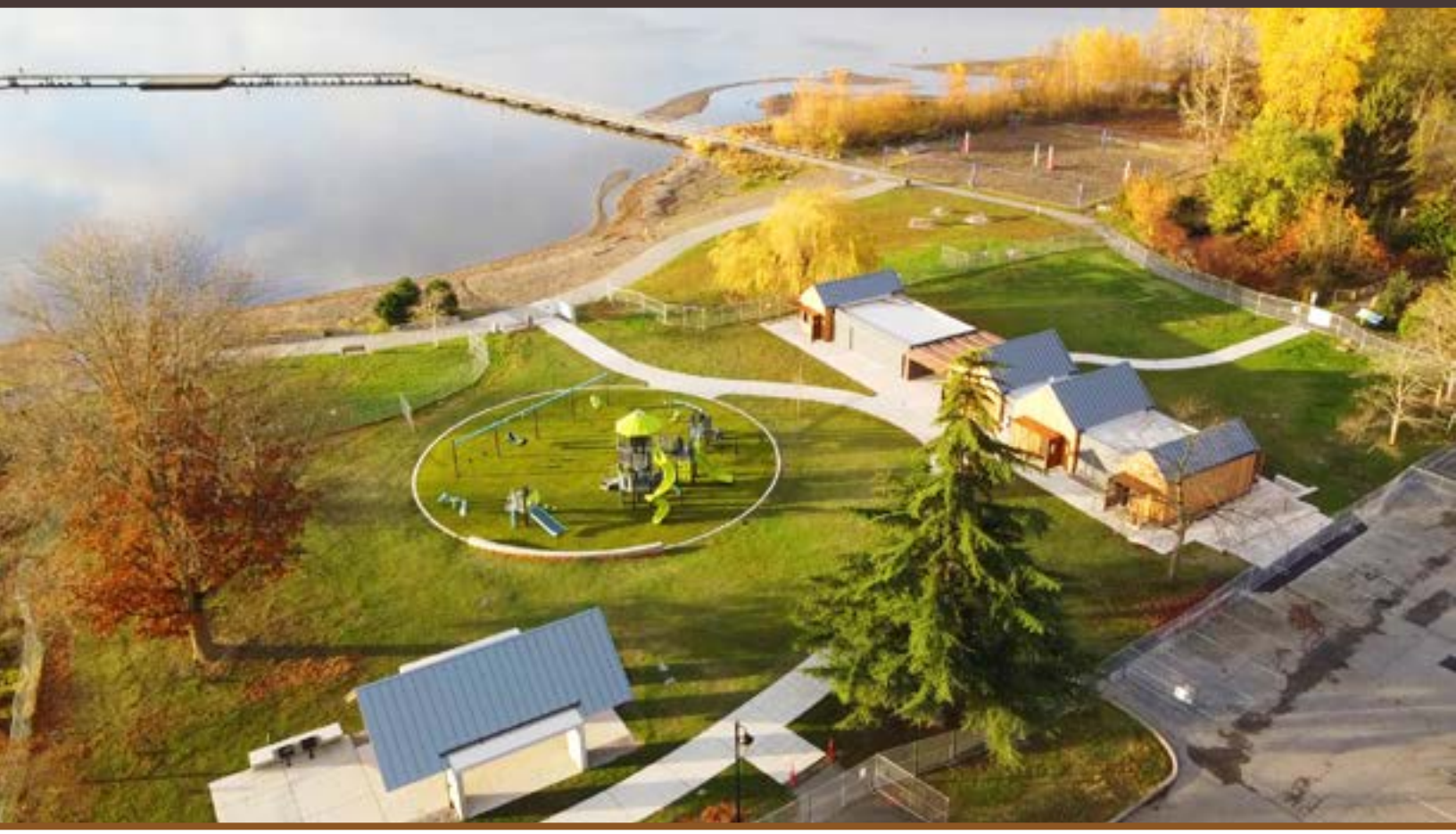
CITY COMPLETES PROJECT SAFELY DURING PANDEMIC

CITY OF Kirkland

AN APPLICATION FOR APWA'S PROJECT OF THE YEAR



JUANITA BEACH BATHHOUSE

PROTECTING

STREAMS & WETLANDS

ARCHITECTURE

OF JUANITA BEACH PARK

With the completion of a road from Seattle through what is now the City of Kenmore to the area we now refer to as "The Eastside," Juanita Beach became a popular destination for Seattle residents. The resort featured a plank walkway along the waterfront, a swimming dock with a waterslide, cabins, and a 5,000 square-foot dance pavilion with a 25-cent admission fee. **Below**: The Montlake Cut resulted in a lowering of Lake Washington's water level.

From Duwamish land to Forbes resort

Native American History of the Site

The City recognizes the long history of Juanita Beach Park's location. The Duwamish Nation, on whose traditional territory Juanita Beach Park is located, had three longhouses across Juanita Bay and used this area and Juanita Creek until the opening of the Montlake Cut lowered the water level of Lake Washington in 1916, which drastically changed the nature of the site.

Western History of the Site

Juanita Beach Park occupies land settled in the 1870s by the Forbes Family, pioneers in the area that became Kirkland. The Forbes family established a saw mill at the mouth of Juanita Creek. When the Montlake Cut became operational on Aug. 26, 1916, the lake level dropped by 8.8 feet, exposing a sandy beach at the site of the Forbes burned-down sawmill. Four years later, the Forbes family capitalized on the popularity of the new beach by opening to the public Juanita Beach.

The resort featured a plank walkway along the waterfront, a swimming dock with a waterslide, cabins, and a 5,000 square-foot dance pavilion. Price of admission: 25 cents.

The Forbes family opened a larger public bathhouse in 1928. From there, it rented swimsuits and beach towels. Other amenities included dressing rooms, showers, and a boathouse for renting canoes. In the 1930s, the owners added overnight cabins to rent. It is the rooflines of these cabins that inspired the design of Juanita Beach Park's new bathhouse and pavilions.

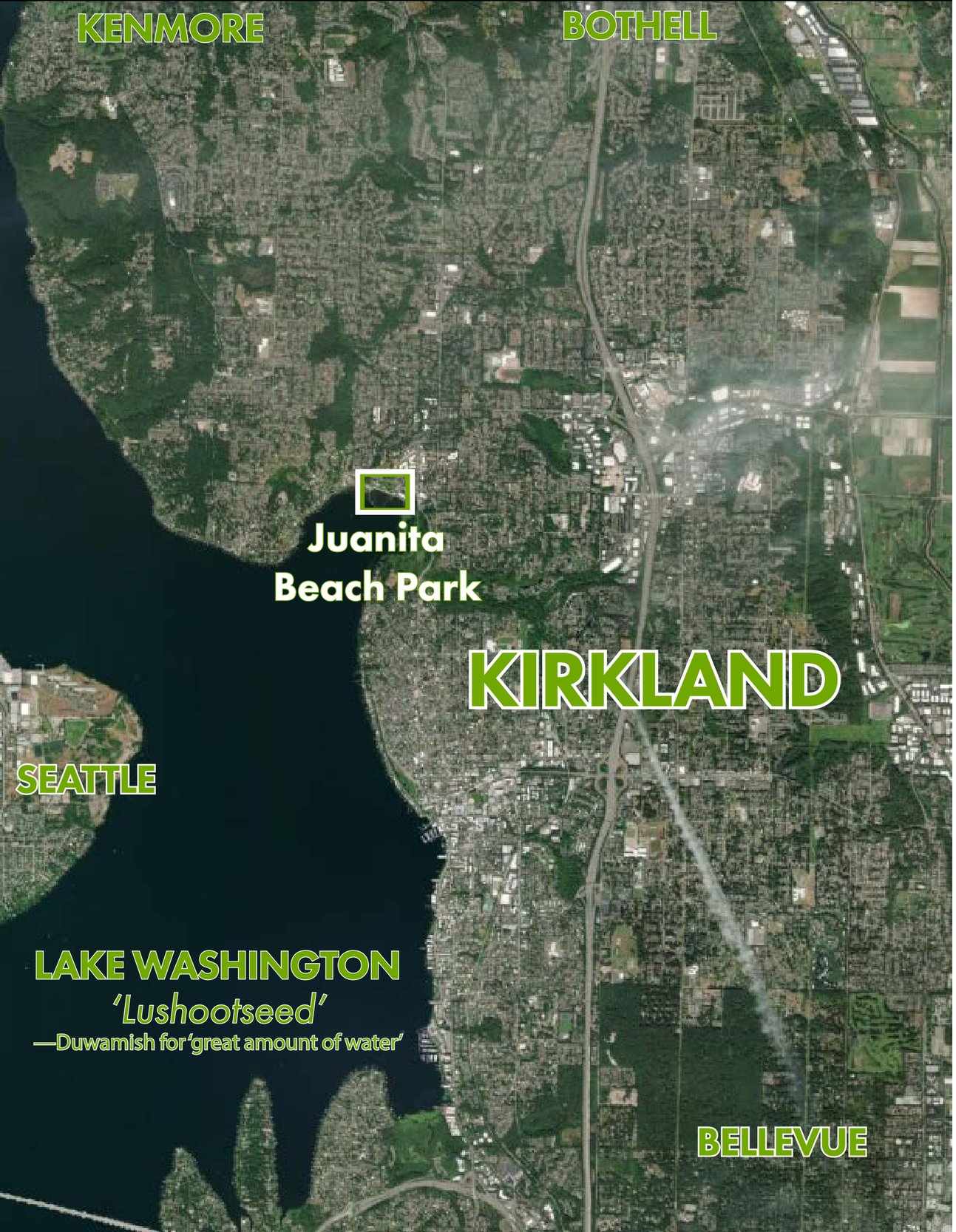
Kirkland acquires Juanita Beach Park

King County purchased the property in 1956 from the Forbes family. But in the early 2000s, budget constraints forced the County to divest scores of its park facilities to cities within King County. This is how the City of Kirkland acquired Juanita Beach Park.

One hundred years after its original grand opening, Kirkland has re-invested in Juanita Beach Park, its most visited park, adding new facilities and replacing others with a design that connects the renovated park to its 100-year history. Once again, the park provides dressing rooms, showers, a lifeguard station, and space for a boat rental concessionaire.

A 15-year legacy of community engagement

The completion of Juanita Beach Park in November 2020 resulted from 15 years of a collaboration between Kirkland's community and Kirkland's city hall. That



process began in 2006 with the development of a master plan that would guide the park's new design.

"Buildings are developed with a craftsmen style architectural character that strongly ties to the parks natural landscape, open lawn character and the historic recreational use of the site," the 2006 master plan said. "In addition to the new bathhouse building, this project includes relocation and replacement of the park's former childrens' playground and a grouping of new picnic shelters."

In 2012, Kirkland's voters invested in the vision for Juanita Beach Park when they approved a parks levy that would fund the renovation of Juanita Beach, as well as other parks throughout the city.

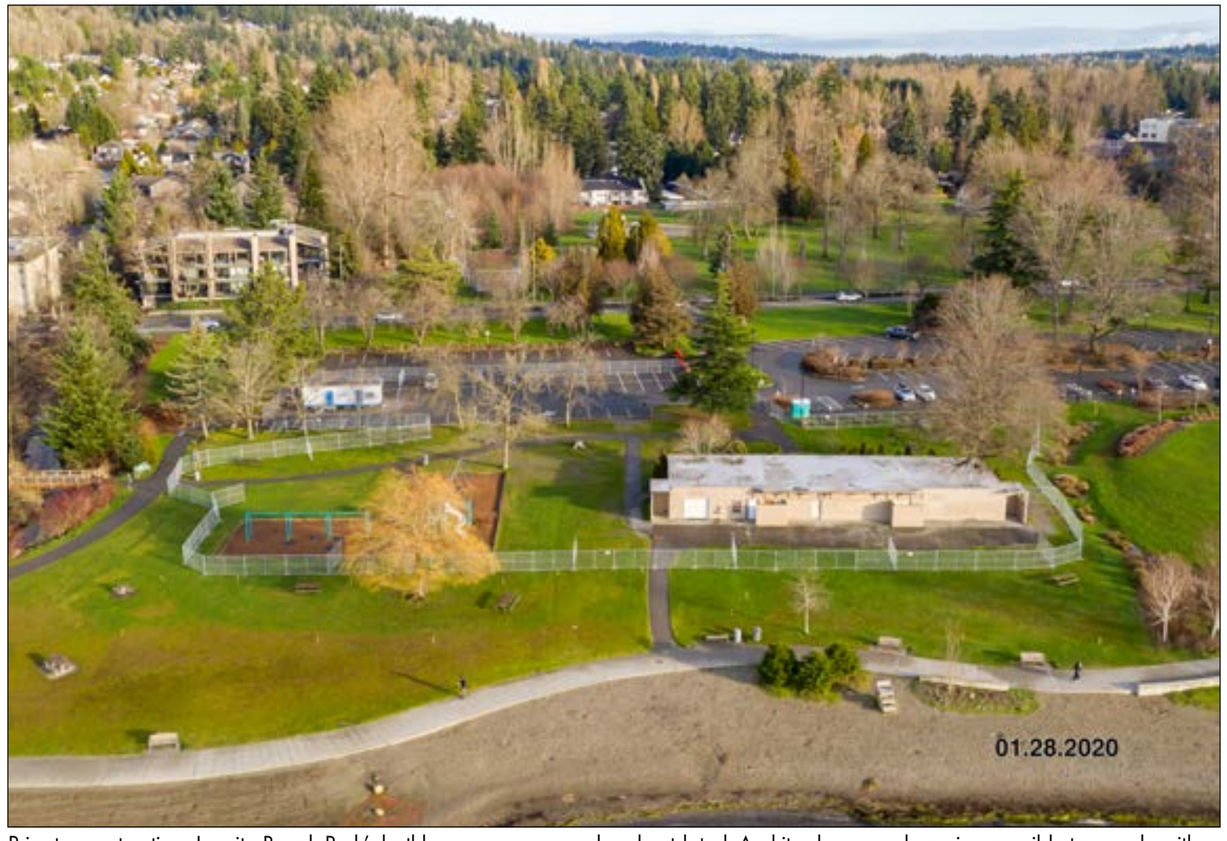
The City of Kirkland partnered with the community again in 2015 by including two members of the park board on its team to interview and hire a design consultant.

Throughout the next six years of design and construction, Kirkland's project team provided regular progress updates to the community, through the park board and City Council.

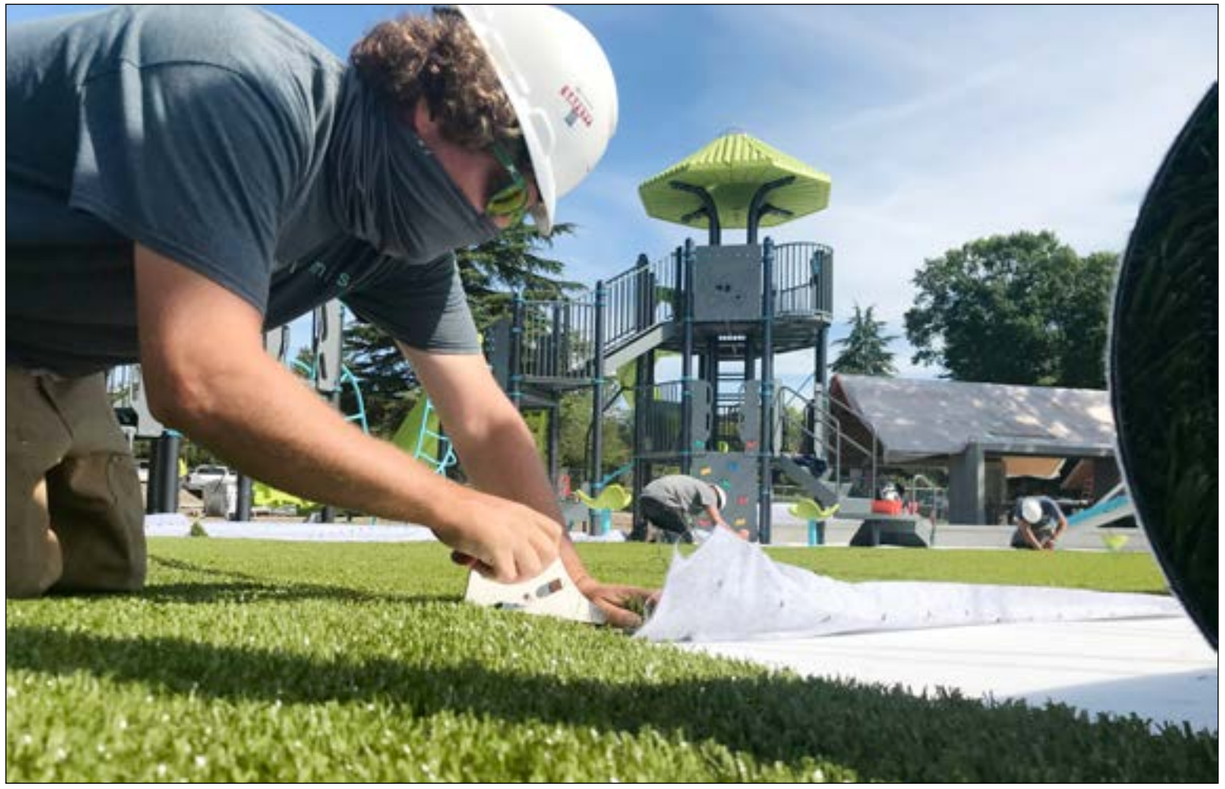
Environmental challenges

Those updates included reports in 2016 on how a changing landscape—specifically a previously unidentified wetland and stream buffer—constricted the amount of space available for development.

The solution for these new regulations was involved, time-consuming, and strained the budget. It allowed the City to place a small section of the bathhouse inside the stream buffer. In exchange, however, the City had to enhance the environmental health of nearby Juanita Bay Park. Despite challenging site constraints, and an unexpected hearing examiner ruling, the City broke ground on the project one month before the pandemic changed everything.



Prior to construction, Juanita Beach Park's bathhouse was cramped and outdated. And its playground was inaccessible to people with mobility challenges.



The City established guidelines to protect workers, who made progress on the park during COVID-19. Those guidelines included a COVID-19 safety inspector, face masks and closing the jobsite's trailer to everyone, except the project's two leads.

City establishes guidelines to protect workers

Item 1: Use of good construction management techniques and completion of the project on schedule.

The City used robust project management guidelines and procedures for capital projects, including Juanita Beach Bathhouse. These procedures were followed, and the project was completed well under the $4.4 million project budget.

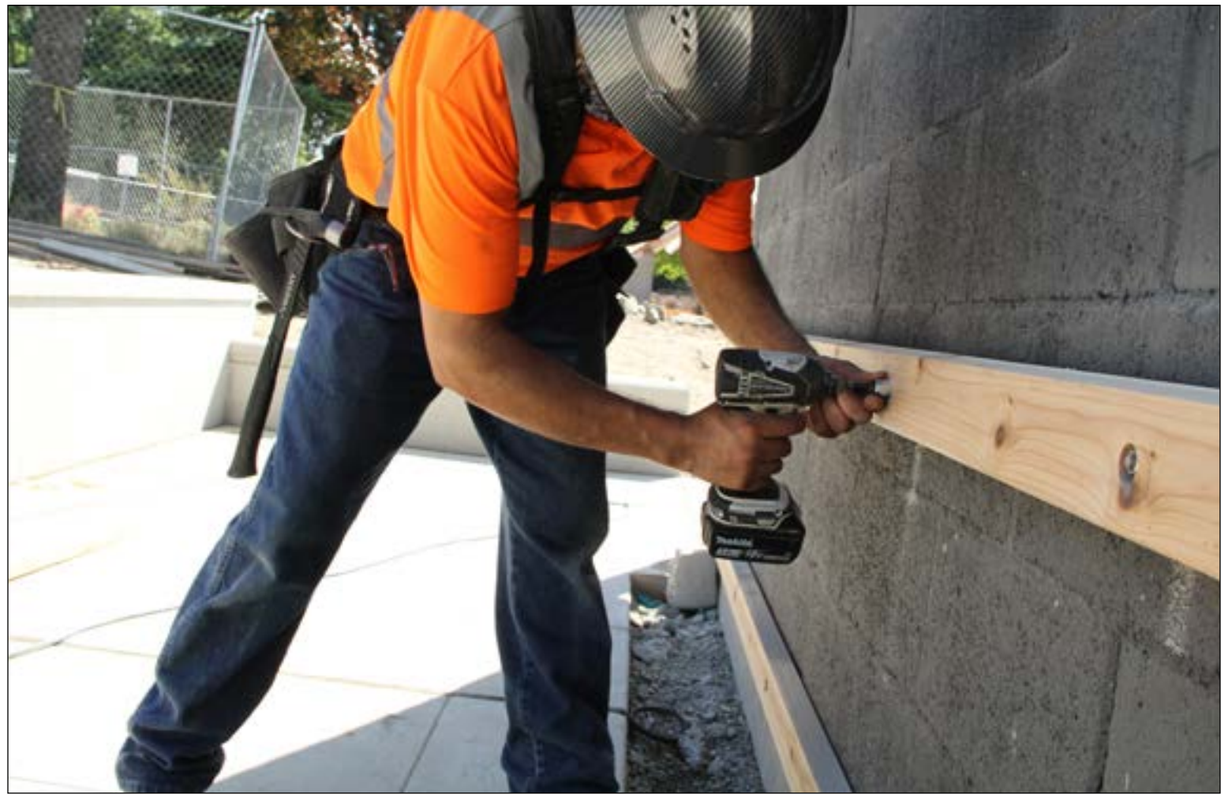
In addition to following robust project management procedures, an additional collaboration meeting between the project manager and Public Works management, who executed the construction contract, and the Parks and Community Services management, who now manages the facility, met weekly during the construction phase of the project.

This served multiple purposes, allowing quick communication, providing progress updates, troubleshooting construction issues, and enabling efficient decision making.

The City issued a notice to proceed January 14, 2020 to the contractor. However, progress faltered almost immediately with a COVID-19-induced three-month delay.

The City worked with it's selected contractor, Synergy Inc., to navigate this unprecedented time. The force majeure condition was covered within City contracts and allowed the project to continue smoothly.

The City and Synergy Inc. resumed the project in accordance with the Governor's restrictions, despite the many unique challenges of the ever-changing global pandemic including material supply delays and contractor labor shortages due to illness and childcare responsibilities.



Kirkland's safety guidelines helped prevent a few positive COVID tests from morphing into an outbreak that would have shut the project down.

Item 2: Safety performance and demonstrated awareness of the need for a good overall safety program for workers and the public during and after construction, where applicable.

Kirkland's contractor began construction in January 2020 and had to quickly adopt new safety protocols as a result of the pandemic. This included implementing many additional site safety procedures. As the contractor and the City learned how to continue making progress, these additional precautions included:

- Posting the CDC Guidelines, and updating them as they changed.
- Hiring a full-time safety inspector.
- Socially distancing site workers by adjusting the work schedule to allow each company to work in different sections of the jobsite.
- Increasing sanitation of jobsite bathrooms, trailers, and entrances and maintaining a sanitation log.
- Ensuring hand sanitizer and hand washing stations are readily available.
- Providing N95 masks, as needed.
- Soliciting input from subcontractors and staff for additional safety suggestions.
- Issuing a safety mandate from Synergy's Vice President.
- Closing the jobsite trailer to all workers, except two project leads.
- Relying on phone and electronic communication, rather than face-to-face communication.
- Requiring that all face-to-face interaction occur outside with safe distances between the parties.

Although a few workers did test positive for COVID-19, the project's safety precautions helped prevent the transmission of the disease to others on the jobsite.

Item 3: Community relations as evidenced by efforts to minimize public inconvenience due to construction, safety precautions to protect public lives and property, provisions of observation areas, guided tours, and other means of improving relations between agency and the public.

Kirkland has a robust process for community involvement, and it used all of its outreach methods for this project. That includes: development of a master plan, design open houses, project update mailers to residents, input from and continual updates to the Kirkland Park Board, which, in turn disseminated those updates at neighborhood meetings and community events.

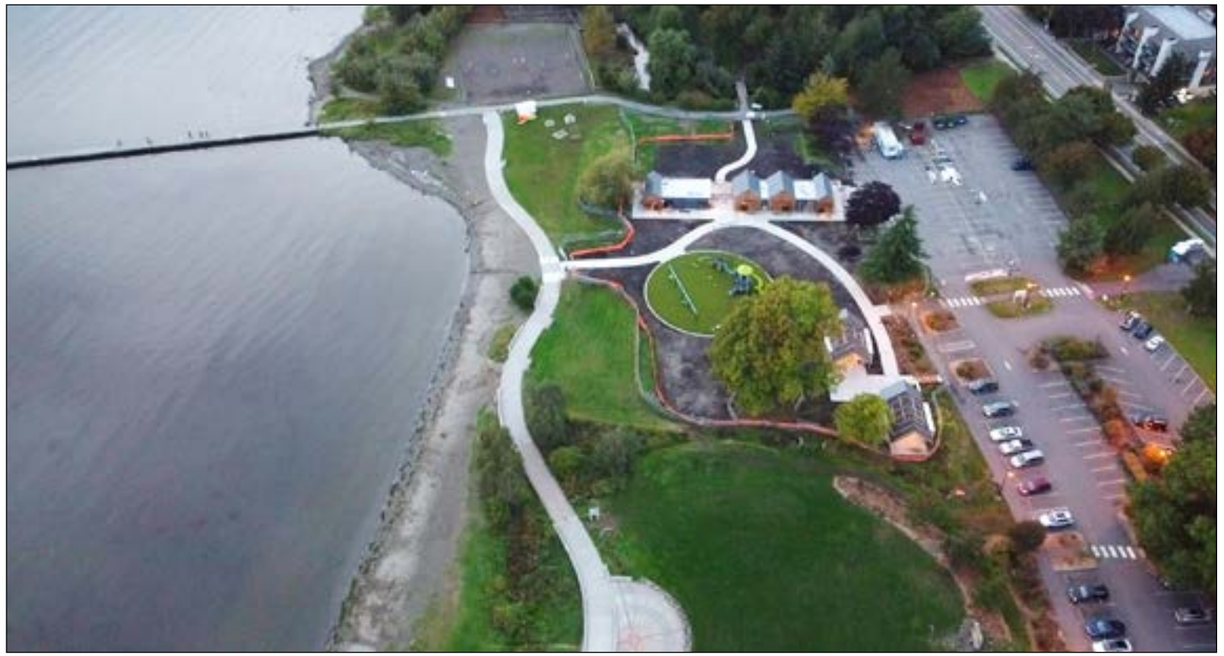
Juanita Beach is Kirkland's most visited park, attracting diverse visitors from inside and outside the city limits. To provide the public with opportunities exercise outside with social distance, Kirkland maintained access to all walking trails. The summertime Friday Night Farmers Market, though delayed in opening because of the Governors restrictions did provide a sense of normalcy for those who ventured out under the new guidelines.

Many community members are vested in the successful outcomes of this park. Community members engaged with the City to request that an all-ages, all-abilities playground be a part of the project. To help, a group of residents provided concepts and schematics and began fundraising for the structure. The City began working with the playground manufacturer to build Kirkland's first all-ages, all-abilities playground. The inclusive play environment enables all children to develop physically, socially and emotionally.

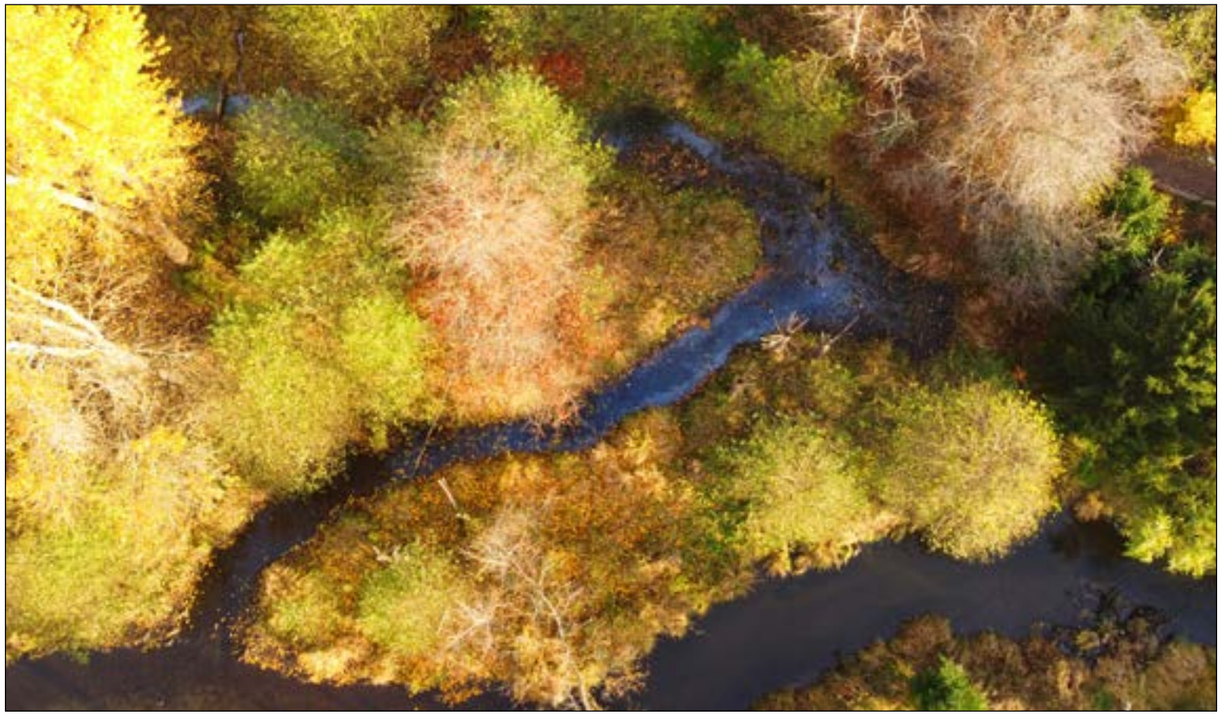
An inclusive playground provides the just-right level of challenge, addresses all levels of ability, and goes beyond minimum accessibility to create play experiences that meet a variety of needs and interests

As suggested by the Juanita Neighborhood Association, the City moved the playground equipment that had been at the Juanita Beach park to a neighborhood open space in North Juanita. By listening to the concerns and suggestions of the community, the City was able to respond appropriately for the betterment of its residents.

Kirkland also collaborated with its arts commission and its park board on the design of art for the park, which depicts the area's history. This is keeping with the City's commitment to devote one percent of capital construction of facilities budgets to artwork for the project, which will join a long tradition of public art around Kirkland.



Construction forced the City to close part of Juanita Beach Park to the public. However, it kept open many of the park's other features, including its walkways, its beach, volleyball courts and its grassy lawns.



The Juanita Beach Park project team relocated the pavilions, bathhouse and playground to protect Juanita Creek, pictured here.

Kirkland protects Juanita Creek, wetlands

Item 4: Demonstrated awareness for the need to protect the environment during the project. This includes any special considerations given to particular environmental concerns raised during the course of the project, as well as climate change and/or resiliency components for long-term community benefit.

One of the project's biggest challenges was to balance the duty of the City to develop and improve public recreation facilities and provide access to the shoreline to all segments of the population, while also protecting and preserving publicly owned natural resources.

Juanita Beach Park is home to natural areas, wetlands, Juanita Creek, and associated buffers. These areas are preserved by limiting public interaction to walking trails. The City prides itself on the protection and enhancement of these areas.

It was the focus of the project team to constrain the new facilities to the already developed and high-use areas of the Park and to utilize the project resources to further preserve the natural areas of the Park. This included adding native vegetation in areas of lawn and bare ground within the buffers of Juanita Creek and its associated wetlands. This additional vegetation reduces erosion and removes carbon dioxide from the air, serves as a carbon sink, and releases oxygen. It also provides more shade to the stream, keeping the temperature of the stream healthy for fish, and provides habitat for native wildlife, including insects, birds, amphibians, and mammals.

Item 5: Unusual accomplishments under adverse conditions including, but not limited to age or condition of the facility, adverse weather, soil or other site conditions over which there is no control.

The site conditions presented a unique challenge to the project team's planners and engineers. Kirkland's staff and consulting engineers had to solve challenges presented by a high water table, a heavy load of iron bacteria, and an evolving wetland. This evolving wetland forced the design team to relocate the bathhouse, pavilions and playground.

Community lauds project's design, materials

Item 6: Additional conditions deemed of importance to the public works agency, such as exceptional efforts to maintain quality control and, if value engineering is used, construction innovations as evidenced by the time and/or money saving techniques developed and/or successfully utilized.

The community's request for the City to expand views, not diminish them, placed exceptional scrutiny on the buildings' layout, not just their design. As such, the City tucked the bathhouse as far behind Juanita Creek's existing vegetation as possible, orienting it north-to-south. This placement helped preserve neighboring residents' views of the lake. The two picnic shelters' open design fulfills a similar function. The community also asked the City to protect two trees of significant value from demolition. And the City obliged, preserving the oak and willow.

> "This will only bring happiness to me (and my family) every time I visit the park.
>
> **Peik Li Pang,**
> *commenting on the architecture employed at Juanita Beach Park*

Item 7: Use of alternative materials, practices or funding that demonstrates a commitment to sustainability, climate change/resiliency, and/or use of sustainable infrastructure rating or the equivalent.

By listening to community input, the architects designed park improvements that are durable, sustainable, and that respect the site's history. The buildings have a northwest, natural aesthetic, articulated in the 2006 master plan and inspired by the beach resort that the Forbes family operated there in the early 1900s. The project's designers used sustainable and durable materials.

The bathhouse walls' structural component are glazed concrete masonry unit (CMU), the substrate of the roof is cross-laminated timber (CLT) and the weathering steel elements are both functional and aesthetically pleasing. The glazed CMUs of the interior of the bathrooms and lifeguard station allow the structural component of the building to also serve as the interior finish- which is functional, practical, and attractive.

Likewise, the cross-laminated timber served as the structural roof component for both picnic pavilions. CLT is a prefabricated engineered panel consisting of large-scale, solid engineered wood panels. Lightweight yet very strong, with superior acoustic, fire, seismic, and thermal performance. CLT is fast and easy to install, generating little onsite waste.

Members of Kirkland's community noticed these decisions. One of them, Peik Li Pang, a Bellevue architect living in the Finn Hill neighborhood, said she could tell from glances out her car window that the City of Kirkland was in the middle of an 'atypical' challenge. The City's use of CLT and its embrace of simple, powerful architectural design impressed her. And then, on Jan. 18, 2021, she visited the park.

"Today we finally drop[ped] by," Pang wrote. "As expected, every bit is well-detailed and executed. Good architecture always make me happy! Truly happy! And this will only bring happiness to me (and my family) every time I visit the park."

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