

AGENDA
GIG HARBOR CITY COUNCIL STUDY SESSION
Thursday, April 16, 2026 - 3:00 PM
Community Rooms

This meeting may also be accessed through Zoom at <https://zoom.us/j/93216056382> or by calling (253) 215-8782 and entering Meeting ID 932 1605 6382.

CALL TO ORDER/ROLL CALL

DISCUSSION ITEMS

- 1. Introduction of Arts Commission Appointees**
- 2. Manganese Feasibility Study and Next Steps**
 - a. Staff Report: Public Works Director Jeff Langhelm, PE
 - b. Clarifying Questions
 - c. Public Comment
 - d. Council Deliberation and Direction
- 3. City-owned Residential Rentals Overview**
 - a. Staff Report: Parks Manager Jennifer Haro
 - b. Clarifying Questions
 - c. Public Comment
 - d. Council Deliberation and Direction

ADJOURN

PUBLIC COMMENT & DECORUM

PUBLIC COMMENT & DECORUM

The city council wants to hear from the public as much as possible. However, the business of the city must proceed in an orderly, timely manner. The primary purpose of council meetings is to conduct the city's business so we have created a variety of ways the community can make their voices heard. Monday city council meetings are just one opportunity. These guidelines are designed to make sure every person who wants to be heard has both the opportunity to be heard and feels welcome to do so.

We receive comments three ways:

1. During council meetings
2. During council study sessions.

3. Email mayorandcouncil@gjgharborwa.gov at any time about any issue. This email goes to the elected officials and leadership at the city.

Public Comment at City Council Study Sessions

We welcome comment at Council study sessions following the staff report and clarifying questions of each discussion item. Comments must be related to the discussion item at hand.

When the mayor calls for public comment, please come forward to the table (or raise your hand on Zoom). When it's your turn, we'll ask you to tell us your name and connection to the issue you want to discuss. You'll then have a maximum of two minutes to speak.

Unfortunately, this isn't a time for dialogue, but a staff person or councilmember may be available to talk with you at a break or after the meeting.

Additional guidelines

- Anyone making "out of order" comments may be subject to removal from the meeting.
- Please address your remarks to the city council as a body and not to any specific individual.
- Please be courteous and not engage in derogatory remarks or insinuations.
- No demonstrations, including clapping, are allowed.

Email

You are welcome to email the mayor and councilmembers about any issue facing the city by writing to the address above. Do remember that council sets the policy direction while city departments execute those decisions. A series of online reporting tools might help you resolve an issue more quickly so check them out too: <https://www.gjgharborwa.gov/146/Submit>

AMERICANS WITH DISABILITIES (ADA) ACCOMMODATIONS

ADA accommodations can be provided upon request. Those requiring special accommodations should contact the city clerk at cityclerk@gjgharborwa.gov or (253) 853-7613 at least 24 hours prior to the meeting.



**City of Gig Harbor
City Council Agenda Bill**

Meeting Date: April 16, 2026

SUBJECT: Manganese Feasibility Study Discussion and Next Steps.

SUBMITTED BY: Jeff Langhelm, PE, Public Works Director

DEPARTMENT: Public Works

PHONE: 253-853-7630

SUGGESTED MOTION: .

BACKGROUND INFORMATION:

The city's water system operates six wells that vary in depth and production volume. These wells produce a concentration of manganese that creates aesthetic operational and water quality issues throughout the water system but is not considered a primary contaminant by the Washington State Department of Health.

At the April 13 council meeting, the city authorized a consultant services contract with DOWL, LLC to complete a manganese feasibility study. This study is intended to help the city prioritize the implementation of manganese treatment systems by well location and provide water treatment system options, conceptual treatment system layouts and conceptual cost estimates for each well location. The results of this study will provide the city with the information needed to make informed budget and strategic decisions on the design and construction of manganese treatment throughout the city's water system.

At the April 16 study session, DOWL will provide details about the study, including the science behind manganese treatment and the schedule to complete the study.

FISCAL CONSIDERATION:

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Expenditure Required: \$	Amount Budgeted: \$	Appropriation Required: \$
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BOARD/COMMISSION/COMMITTEE RECOMMENDATION:

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ATTACHMENTS: .

STRATEGIC PLAN PRIORITY: Ensure sustainable future for public services and facilities



Manganese Removal Feasibility Study



Luke Tipton, PE, WRS
Stephan Bradley, PE

Today's Discussion

- Where we are
- Science of Manganese Removal
- Approach, Outcome, & Deliverables
- How do we make a Recommendation?
- Schedule + Upcoming Events
- Questions & Comments

Where We Are in the Overall Process:

Feasibility &
Pilot Study

Design &
Permitting

Funding
Acquisition

Construction

Commissioning
& Optimization

Looking Ahead



Science behind the “Why?”

IRON (Fe) & MANGANESE (Mn) in DRINKING WATER

IMPACT COMPARISON

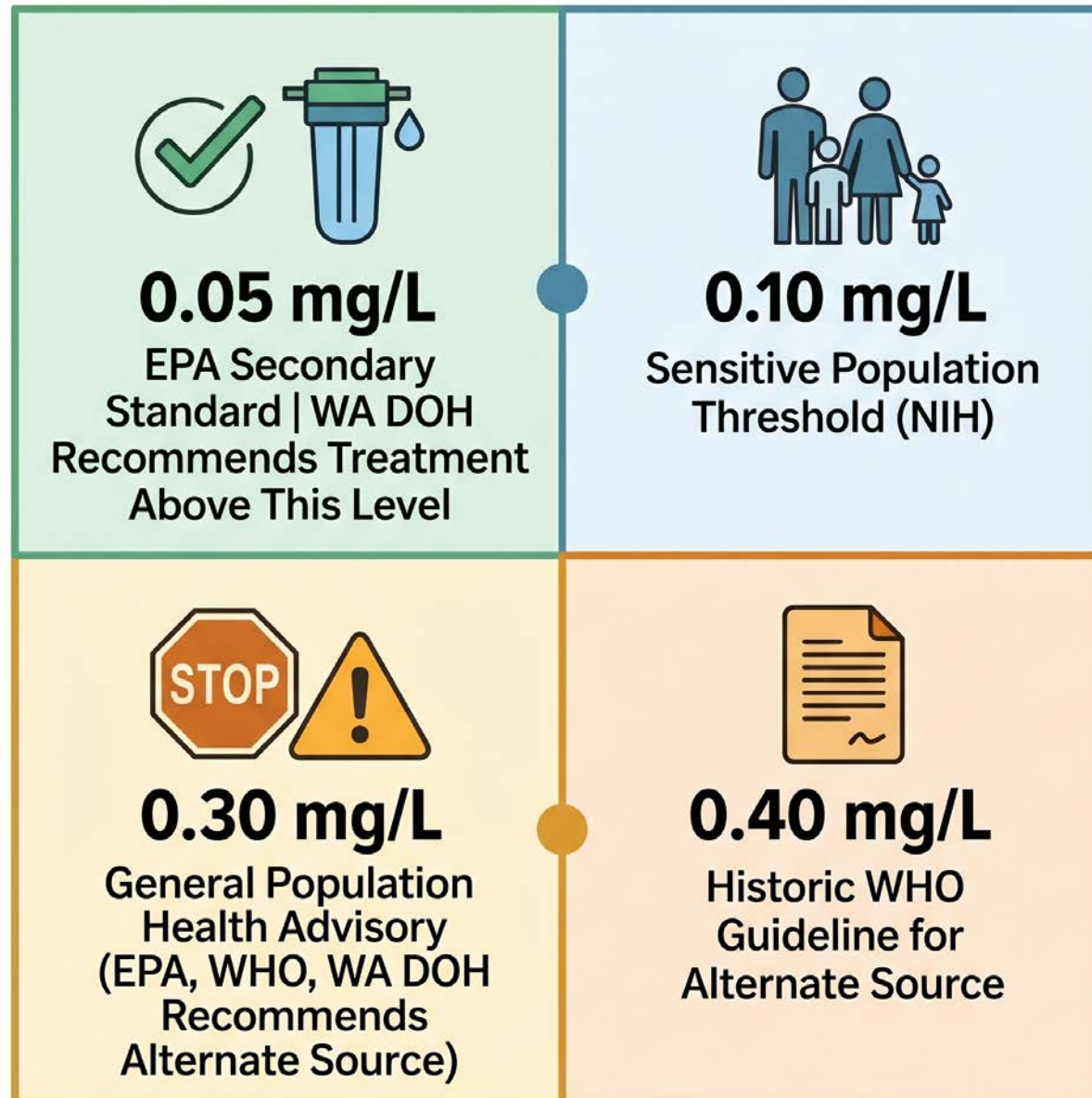


	IRON (Fe)	MANGANESE (Mn)
AESTHETIC ISSUES	<p>'RED WATER' Stains laundry, porcelain fixtures, dishes.</p>	<p>'BLACK WATER' Stains laundry, porcelain fixtures, dishes.</p>
TASTE & ODOR	<p>METALLIC/BITTER TASTE Water becomes unpalatable for drinking/cooking.</p>	<p>METALLIC/BITTER TASTE Water becomes unpalatable for drinking/cooking.</p>
BIOFOULING	<p>Slimy biofilms Clogs pipes Coats sensors Reduces water pressure.</p>	<p>Slimy biofilms Clogs pipes Coats sensors Reduces water pressure.</p> <p>IRON BACTERIA</p>
HEALTH CONCERNS	<p>MOSTLY AESTHETIC ISSUE Low chronic health risk.</p>	<p>NEUROTOXICITY (CHRONIC OVEREXPOSURE)</p> <ul style="list-style-type: none"> Affects brain development in children Mimics Parkinson's symptoms in adults.

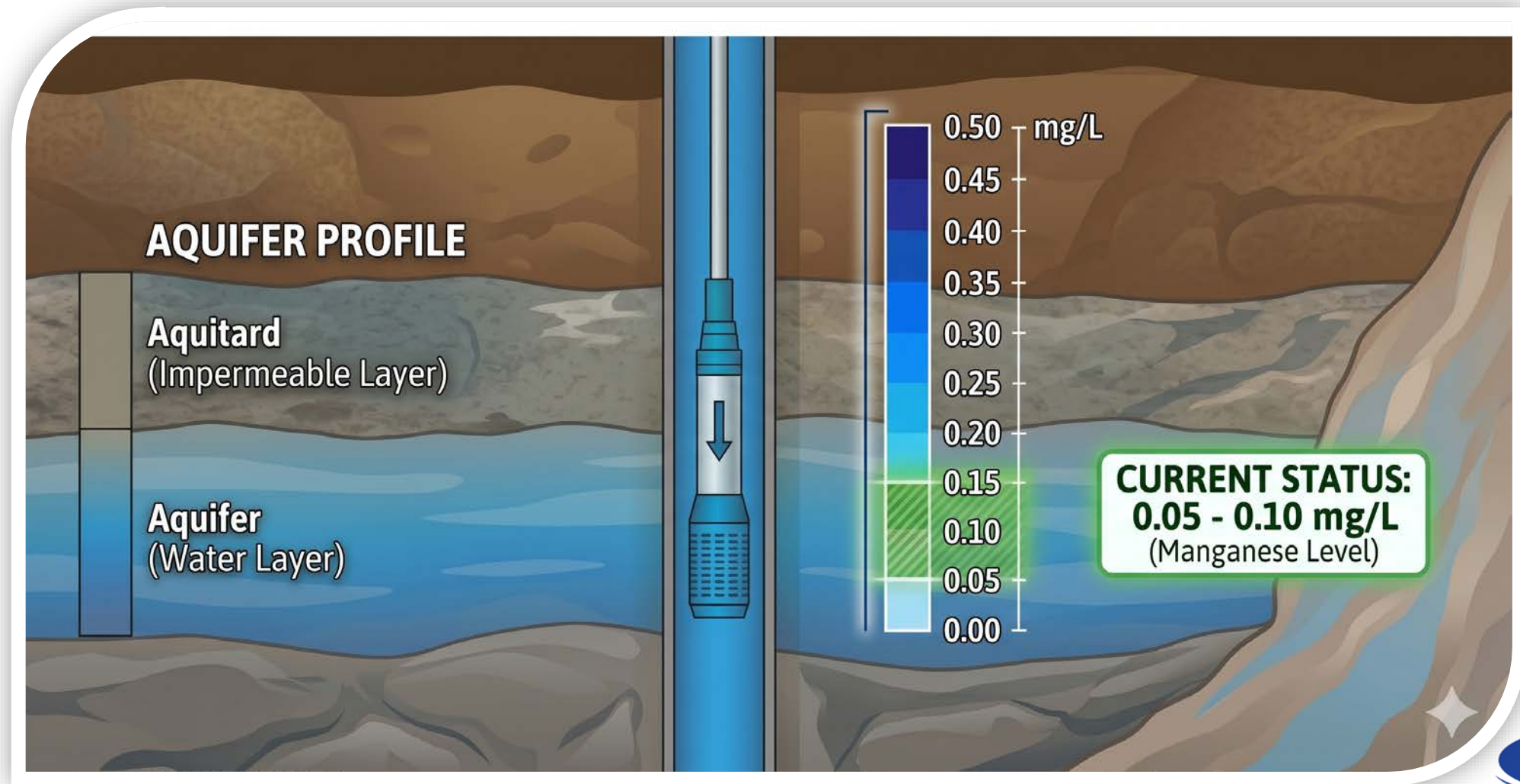
TECHNICAL INTERFERENCE & SAFETY

| Interferes with disinfection (UV, CHLORINATION)
 | Shields bacteria | Reacts with chemicals
REDUCED OVERALL WATER SAFETY

Manganese Recommended Limits



Manganese Concentration Status



IRON (Fe) IN DRINKING WATER: AESTHETIC STANDARD & WASHINGTON RECOMMENDATIONS

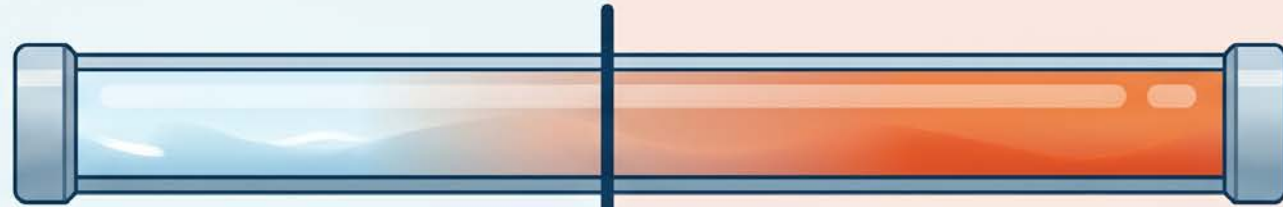
EPA SECONDARY STANDARD

0.3 mg/L. Iron above this level exceeds the non-enforceable Secondary Maximum Contaminant Level (SMCL).



WASHINGTON DEPARTMENT OF HEALTH (DOH) RECOMMENDATION

DOH recommends treatment for drinking water sources with iron concentrations exceeding 0.3 mg/L. High **levels cause noticeable** aesthetic issues.



BELOW 0.3 mg/L

AT OR ABOVE 0.3 mg/L



CLEAR & SAFE
(Aesthetic)

THRESHOLD:
0.3 mg/L
(EPA SMCL /
WA DOH Treatment)

DISCOLORED WATER
(Treatment Recommended)

Consult a water professional for treatment options and detailed testing.

Proposed Project Approach – Data Review



Data
Review &
Baseline
Conditions

Do we
need
additional
sampling?

Regulatory
and Health

Outcome: clear understanding of “must do” vs “should do.”

Proposed Project Approach – Treatment Options

For Each Well:

- Oxidation + Filtration (baseline option per Master Plan)
- Chlorine/KMnO₄ + pyrolusite/greensand
- Pressure vs. gravity filters
- Residuals handling & backwash management

Alternative Technologies

- Sequestration (only viable at lower Mn levels)
- Aeration + filtration
- Ion exchange
- Biological manganese removal
- Centralized vs decentralized treatment models



Proposed Project Approach – Site Level Concepts

Site-Level Treatment Concepts:

Prepare conceptual layouts for **each well site**, including:

- Process flow diagrams
- Space allocation and constructability
- Chemical storage & dosing options
- Electrical/SCADA upgrades needed
- Impacts on headloss, pressures, and reservoir fill cycles
- Backwash waste management options

Optional: evaluate shared treatment for clustered wells



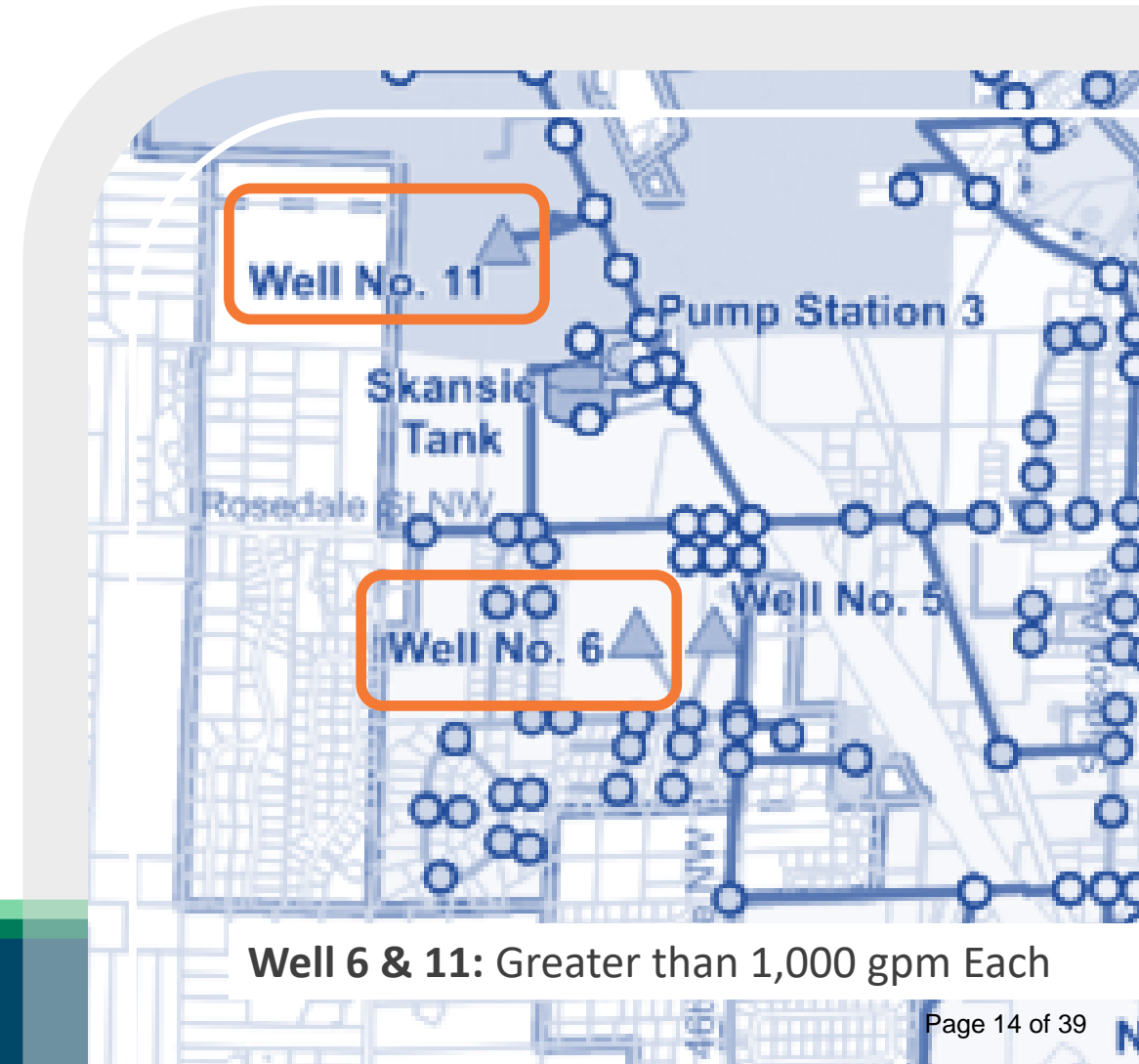
Proposed Project Approach – Path Forward

Prioritization & Phasing Strategy:

Recommend using a weighted approach based on:

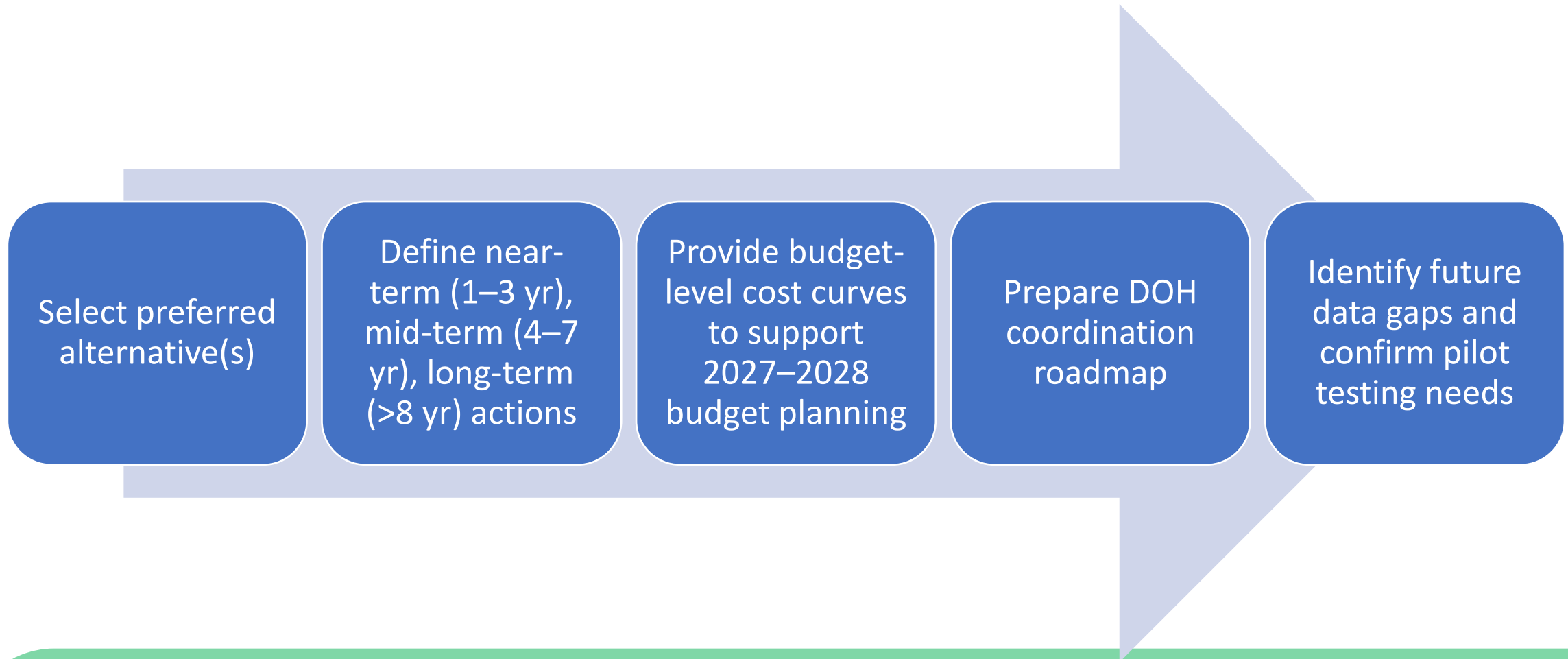
- Manganese exceedances severity
- Production criticality (e.g., Well 6 mandatory first)
- Hydraulic zone impacts
- Site readiness / complexity
- Funding eligibility (PWTF, SRF, local capital)
- Environmental review requirements

Ends with a **multi-year implementation plan** for the City



Well 6 & 11: Greater than 1,000 gpm Each

Proposed Project Approach – Path Forward



Proposed Project Approach – Alternatives Analysis

Quantitative Analysis

+

Qualitative Analysis

- Weighted Criteria
 - Technical
 - Operational
 - Financial
 - Environmental
- Transparent Scoring
- Customizable and Scalable

MULTI CRITERIA DECISION ANALYSIS

Ratings



Criteria	Weight	Current Solution		Alternative 1		Alternative 2	
		Rating	Weighted Score	Rating	Weighted Score	Rating	Weighted Score
	5	1	5	5	25	4	20
	2	3	6	3	6	5	10
Total Score			11		31		30

Project Approach – Alternatives Analysis

Multi Criteria Decision Analysis									
Criteria	Weight	Sub-Criteria	Matrix Weight	No Action		Site 1		Site 2	
				Rank	Score	Rank	Score	Rank	Score
O&M	10	Accessibility	13.3	1	13.3	2	8.9	3	4.4
			13.3		13.3		8.9		4.4
		Flushing Required	6.7	3	2.2	1	6.7	1	6.7
			6.7		2.2		6.7		6.7
		Impact from Repair and Maintenance	3.3	1	3.3	3	1.1	2	2.2
			3.3	2	2.2	1	3.3	3	1.1
			6.7		5.6		4.4		3.3
			26.7		21.1		20.0		14.4

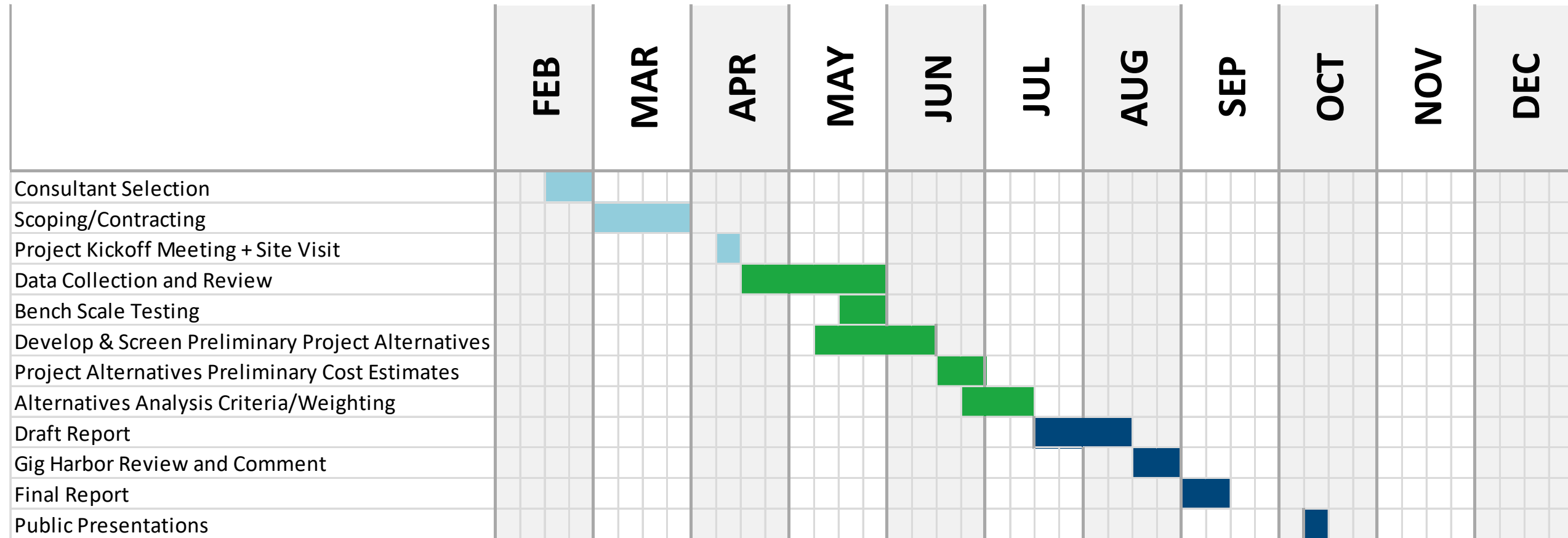
Critical Success Factors

- ✓ Data Accuracy and Availability
- ✓ Alignment with DOH Expectations/Regulations
- ✓ Efficient Alternatives Screening and Prioritization
- ✓ Effective Stakeholder and Public Communication
- ✓ Representative Cost Estimates

Outcome

- Class 4 Cost Estimates (-30% to +50%)
- Qualitative Alternatives Analysis
- Comprehensive Report
- Public Workshop
- October City Council Presentation of Findings

Schedule



Questions?

Luke Tipton, PE
Project Manager
lтиpton@dowl.com





**City of Gig Harbor
City Council Agenda Bill**

Meeting Date: April 16, 2026

SUBJECT: City-owned Residential Rentals Overview

SUBMITTED BY: Parks Manager Jennifer Haro

DEPARTMENT: Public Works

PHONE: 253-853-8253

SUGGESTED MOTION: N/A

BACKGROUND INFORMATION: The city has two residential rental properties on city-owned land; the Wilkinson Farm House at Wilkinson Farm Park and 7601 Soundview Drive. These houses were vacated by the renters at the end of 2025. City staff has assessed the condition of each house and found there to be many costly maintenance items required for each house. Both houses are unique and have different attributes and challenges. Below, and in the attached memos, is a summary of these attributes and challenges for each house.

At the April 16 study session, staff will be presenting to council the condition of each house and will be asking for direction as to whether or not to perform the maintenance and begin renting the houses again.

7601 Soundview Drive

This house was built in approximately 1951. It has a water view, and a very desirable location near downtown, adjacent to the Soundview Forest, which was purchased by the city in the same transaction in 2018. The house is dated, but in excellent condition, with unique architectural features.

The Soundview House has a requirement to stop being used as a residential property, per its purchase and sale agreement from 2018, which states *The Buyer may continue to use that parcel as a single-family rental for a period of up to Ten (10) years from the date of closing (May 21, 2018), but by that date said property's use must be changed or converted to public use (whether the home be repurposed as a public meeting place, education center, or similar, or demolished). At no time may any portion of the property be used for commercial purposes other than those which are directly related to the public use as a park, nature preserve or the like (such allowed uses may be public market, pop up food vendors, weddings, retreats, and the like). The Buyer shall not be allowed to sell or lease the property to a third party (other than a short-term rental for event purposes), except to a non-profit entity or nature conservancy or the like....These restrictions on use are an essential condition of the agreement....In the event the Buyer fails to timely cure the breach, title to the property shall automatically revert for no consideration to Seller and/or its successors in interest.*

More details about the condition of the house are in the attached memo. The main issues with the house are its failing roof and the heating system, which is a boiler, with an underground oil tank, that can be difficult for inexperienced renters to take on.

There is approximately \$31,000 worth of work that must be done in order to rent out the house. If the house was to be converted to a community use, it will require extensive ADA updates, including parking, ramps, a lift or elevator to the basement, in addition to the minimal repairs needed to rent the house out.

Wilkinson Farm House (4118 Rosedale Street)

The Wilkinson Farm House was built in approximately 1920. It is part Wilkinson Farm Park, and is 1605 square feet. An historic structures report was completed on the farm property in 2007. The house is not currently listed as a historic structure on the city’s historic register, but the barn is.

The house is in fair condition. The previous renters reported a lot of rodent activity in the house. The city currently pays for pest control services, but the foundation does not have buried footings, so it is very easy for rodents to gain access to the house. The roof also needs to be replaced, which may require structural engineering work, since there is not currently plywood under the shingles. The historic structures report includes an even longer list of projects than the attached staff memo to restore the house to its original materials and footprint. There is approximately \$96,000 worth of work that must be done to rent out the house.

At the April 16 study session, staff will ask council for direction for these properties and whether to proceed with unbudgeted repairs.

FISCAL CONSIDERATION:

Expenditure Required: \$ 127,000	Amount Budgeted: \$0	Appropriation Required: \$127,000
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ATTACHMENTS:

- 1. Memo - Soundview Rental House_033026
- 2. Memo - Wilkinson Farmhouse 033026
- 3. House Pages from Wilkinson Farm HSR 9.13.07

STRATEGIC PLAN PRIORITY: Ensure sustainable future for public services and facilities

Memorandum

TO: Jeff Langhelm
CC: Jeff Olsen, Kyle Neiman, Peter Frontiero
FROM: Jennifer Haro, Parks Manager
DATE: 3/30/2026
SUBJECT: 7601 Soundview House

The Stewarts, longtime renters at 7601 Soundview, moved out on December 31. A walkthrough was conducted with Randy Stewart, Jeff Olsen, Kyle Nieman and Jennifer Haro on 1/7/2026. Randy and his wife took excellent care of the house.

The house is 2830 square feet, including the finished basement with kitchenette. The house is dated, and is in overall good condition, but there are some concerns:

- The roof is beyond its useful life.
 - A roof estimate from Hanley Roofing in March of 2025 was for \$46,796. A second estimate by Garland gave a range of \$25,000 - \$30,000.
 - There is a spot on the ceiling of the living room where water had infiltrated.
- There is a 675-gallon underground oil tank that heats a boiler.
 - An environmental site assessment was done by prospective buyers in 2015 that found no leaks.
 - Any future tenant would be responsible for monitoring it with a measuring stick and ordering oil.
 - The previous tenant had experience with oil-fueled boilers and kept a spreadsheet of usage.
 - Heating oil currently costs about \$3.79-3.95/gallon plus tax, and the boiler uses about 20-22 gallons/week in the winter, costing the tenant between \$76 and \$80/week during winter, or over \$2,000 over the course of the year, according to the previous renter.
 - The boiler is very old, and there are safety concerns for inexperienced renters. Pipes run through the walls, so no tacks or nails can be used. There is also a persistent smell of oil in the basement.
- We can't find record of a lead/asbestos inspection. There is a lead disclaimer in the previous lease, as is common. Jeff Olsen recommends a hazardous materials inspection.

- The garage door opener is broken and needs to be replaced. Peter received an estimate for \$816 for a new motor last time the repair-person was at the site.
- The large maple tree on the southern property line will be removed as part of the Soundview Forest tree project.

Looking at other houses for rent in the area, I believe we could rent it for \$3,500-\$4,000/month. Assuming a May 1 start date, there are 24 rentable months before the city is required to stop renting it, assuming a steady renter. That could bring in \$84,000 to \$96,000. Subtracting the cost of a new roof and garage door opener, that would bring gross revenue to \$53,000 to \$65,000, not including unforeseen repairs.

A new residential heating system would cost about \$70,000, including the decommissioning of the underground storage tank. Because of the short timeline available to rent on this house, it is not recommended to upgrade.

ITEM	DESCRIPTION	COST	NOTES
Needs:			
Roof	Leaks, spot on ceiling in living room	\$ 30,000	High range from 1/2026 Garland Estimate
Garage door opener	Motor needs to be replaced	\$ 819	
		\$ 30,819	
Wants:			
Asbestos/Lead inpection		\$ 3,500	Not required for residential properties, but would be important if converted to public use Residential system. If repurposed for commerical use, it would cost more.
New Heating system	Currently has oil-fueled boiler	\$ 65,000	
Oil tank decommissioning	Removal option	\$ 5,000	Assumes no contamination is found.
		\$ 73,500	
	TOTAL	\$ 104,319	

At an internal meeting in March 2025, there was consensus that the building should not be rented out again, due to the 2028 deadline and need for a new roof. This house is much nicer than the Wilkinson House, and could be a nice rental for the right people. The city could make a profit from renting it, even for the short two years we are allowed to while we explore long-term plans for the property.

A conversion to community use would require much more extensive work.

Due to the upcoming tree cutting project, the upcoming stormwater park feasibility study, the boiler, the need for new roof, and the relatively short window the house is allowed to be rented, it is my opinion that the house should not be rented, and its future should be determined by public process, that will start with the stormwater park feasibility study.

Memorandum

TO: Jeff Langhelm
CC: Jeff Olsen, Kyle Neiman, Peter Frontiero
FROM: Jennifer Haro, Parks Manager
DATE: 1/28/2025
SUBJECT: Wilkinson Farm House

The renters at the Wilkinson Farmhouse moved out on November 30, 2025. A walkthrough was conducted on December 1.

The house is 1605 square feet, with four bedrooms and one bathroom. The house is not in good shape. More details are below. This house does not have a continuous, buried footing, so there is constant rodent activity, which the previous renters mentioned. The windows are almost all cloudy due to damaged seals, with the main “picture” window in the living area the worst. More detail on the issues is below.

In addition to the condition of the house, the layout is not desirable, as there is only one restroom for a four-bedroom house, and it is on a different floor than the bedrooms. The renters have frequently mentioned invasion of their yard space by park visitors as well, especially those that are doing photo shoots at the Wilkinson Barn.

The previous renters were paying \$1,300/month. If it is rented again, I would recommend \$1,600/month (plus leasehold tax), after new window coverings, plumbing, thermostat, smoke detector and full reroof. The annual revenue for the city would therefore be around \$20,000/yr. The minimum(?) recommended repairs are estimated to cost \$95,620. At that rate, it would take nearly five years to recoup the costs. To do a more full refurbishing of the house, it would cost an estimated \$329,000 (see cost table below), but could be rented at a higher price point.

Without a master plan for Wilkinson Park, the best use of the house at this time is a single-family home. It should be a financial decision based on the city’s budget if it is worth investing \$96,000 into the house until a long-range plan for the space is determined.

A historic structures report was conducted on the buildings at Wilkinson Farm in 2007. That report gave a recommendation on a future plan for the park, to include construction of a new community building and remodeling of the house and barn. It recommended a

lot of work to restore and refurbish the house, including removing additions that were done, restoring siding and adding structural improvements. No cost estimates were provided at the time, but those improvements would far exceed the estimates below.

The most cost-effective option is demolition. The house could be removed to free up space around the Wilkinson Barn for parking, a future permanent restroom, or other future use that compliments the barn. That could cost approximately \$25,000 plus any hazardous materials abatement. We would expect some public opposition for this option.

A table of estimated costs and photos of the December walkthrough are provided below. The needed repairs listed below indicate the minimum recommended repairs necessary to provide a manageable residence.

ITEM	DESCRIPTION	COST	NOTES
Needs:			
Roof	Leaking around chimney Trusses not strong enough for comp	\$ 47,000	Middle of range from 1/2026 Garland Estimate
Kitchen plumbing	Rework sink drain in kitchen	\$ 500	Snk does not drain properly due to angle of
Bathroom plumbing	New pipes	\$ 45,000	Poor drainage/standing water when shower is used
Blinds	New blinds in living room, bedrooms	\$ 1,000	We could not find record of a walkthrough when previous renter moved in, so could not
Thermostat	Needs replacement in N. bedroom	\$ 100	
Smoke detector	Needs to be reinstalled in bedroom	\$ 100	
Rodents	Ongoing issues	\$ 1,920	Yearly cost for pest mgmt services. Rats/mice infiltrate foundation, which is not preventable
		\$ 95,620	
Wants:			
Siding		\$ 15,000	Mildewed, broken in places
Floors	Sloping due to uneven foundation	\$ 150,000	Termite damage, bouncy, spongy in some areas
Windows	New windows	\$ 20,000	Seals have failed, so most are cloudy
Walls		\$ 15,000	Should have lead paint eval, wall paper in stairwell is peeling, should be removed & checked for asbestos in glue, walls in main living area are lath & plaster which is bulging, bubbling. Don't hold nails and anchors. Moist & spongy near fireplace
Ducting	Replacement in places	\$ 5,000	Smashed in places
Kitchen cabinets	Replacement	\$ 14,500	Rough shape, metal cabinets below sink are rusted, bent, difficult to close
Bathroom	Fan replacement, new caulking	\$ 500	Mold on caulking, fan hanging from wall
Outside	concrete pond, possible sewer leak	\$ 13,000	Pond could be an attractice nuisance/liability.
		\$ 233,000	
	TOTAL	\$ 328,620	



1 Termite damage in floor



Rusty sink cabinet



2 Mildewed siding and cloudy picture window

Based upon professional judgement, the best course of action for now is to leave the house vacant, with basic maintenance, until a long-term plan for the park is developed.

THE FARMHOUSE (ca. 1920)

- Overall Dimensions: 38'-11" x 24'-9" with two non-historic additions - a 10'-7" x 8'-8" west addition, and 3'-2" x 10'-6" east bay
- Stories: Two
- Gross Square Footage: 2,160 sf
- Eave Height: 15' at main gable
- Ridge Height: 24'-5" +/-
- Foundation: Formed concrete, with large river stones embedded below, and sometimes exposed where the grade drops away.
- Floor: Carpet covered wood flooring with 2x6 joists at the Main Floor, visible at one small opening in the foundation. Second Floor has wood joists and floors, covered with carpet in most spaces.
- Exterior Walls: Wood frame walls with 5" wide vinyl siding and trim over rigid foam insulation, likely over original wood shakes at upper walls, and lap siding at lower walls. The south porch vestibule is clad with 4" - 4 5/8" clapboard siding. The upper wall has a recessed panel, with shakes visible behind at original exterior face of wall.
- Windows and Doors: Windows are a mix of original painted wood double hung and fixed windows, and aluminum framed fixed and sliders at the east and west additions. The south enclosed porch area contains two fixed 3:2 wood windows flanking an aluminum screen door. Some wood windows are fitted with exterior storm sash, while others have attachment points but no sash.
- Roof: Wood shake roof on 2x4 rafters at 24" o.c. Building paper is visible above the wide board skip sheathing.
- Exterior Features: Gabled roof centered over main north entry (not original; the original was full-width shed roof front porch with wood steps)
Hipped roof over the 8'-6" deep south vestibule entry
Brick chimney near the center / ridge of the main roof (A second chimney for the original kitchen stove has been terminated below the roofline in the attic, thought the brick remains below. The functional chimney is constructed of hollow clay tile to just below the roofline, where it changes to brick)
Exposed rafter tails with notched ends and sloped soffit. Contemporary 5" sheet metal gutters with downspouts are mounted to a vertical fascia board
North and south gable ends each have five 6x6 knee brackets supporting the roof overhang
- Interior Features: South Vestibule with flanking Bath and Laundry Rooms. Remodeled Kitchen with large range and built-in kitchen equipment in the cabinetry.

New or rebuilt large fireplace. Non-original arched openings between Dining Room and Living Room. Remodeled Bath with non-original plumbing fixtures. Four small bedrooms on the Second Floor.

Interior Finishes:

Plaster walls and ceilings with some wall paper. Non-original resilient tile flooring in the Kitchen. Linoleum over slab on grade in the South Vestibule. Non-original carpet in other Main Floor areas, wood, linoleum and carpet at Second Floor. Ceilings on the Main Floor are direct applied acoustic tile and plaster. Second Floor ceilings are plaster.

Comments/Condition:

The original house appears to have been a simple rectangular shape with later additions on the east and west sides, as evidenced by historic photos and changes in the front porch, from a shed roofed, full-width element to a smaller, gable roofed one. Other changes include the foundation material from poured concrete and stone to concrete block at newer portions, replacement of Main Floor windows with aluminum frame, "picture" windows at the East Bay and West Addition, and replacement of the original wood lap and shingle exterior siding with vinyl siding.

Installation of the vinyl cladding required removal of some trim around windows and doors. The dates of the additions have not been exactly determined. However, they appear to date from the 1950s or 1960s based on the window style and room arrangement. (This period is confirmed by a family member.) The roofing was recently replaced with historically accurate wood shakes.

The concrete sidewalk at south (back) entry slopes down toward door. The concrete stoop at the north (front) entry is significantly cracked. Surface mounted propane pipes and electrical conduit on exterior

Character Defining Features of the Farmhouse:

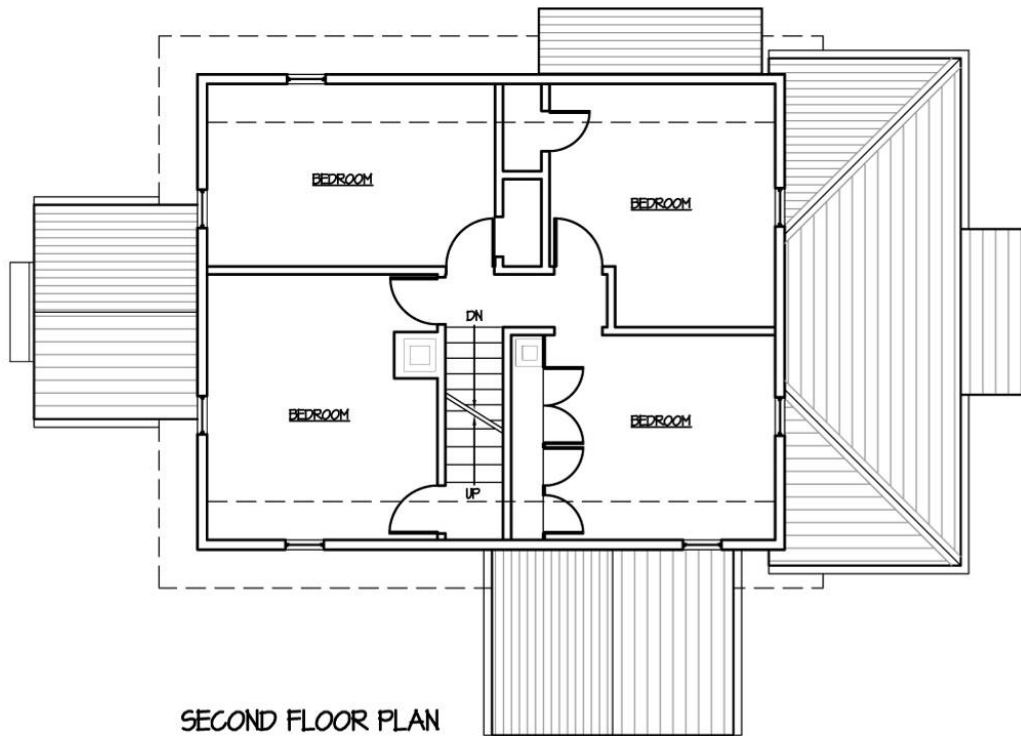
Simple gable roof shaped mass with five brackets on each gable end, symmetrically composed facades with front porch (originally full-width) and screened south vestibule

Wood shingle clad roof, brick masonry chimney, and original painted wood shingle and lap siding (below existing vinyl siding)

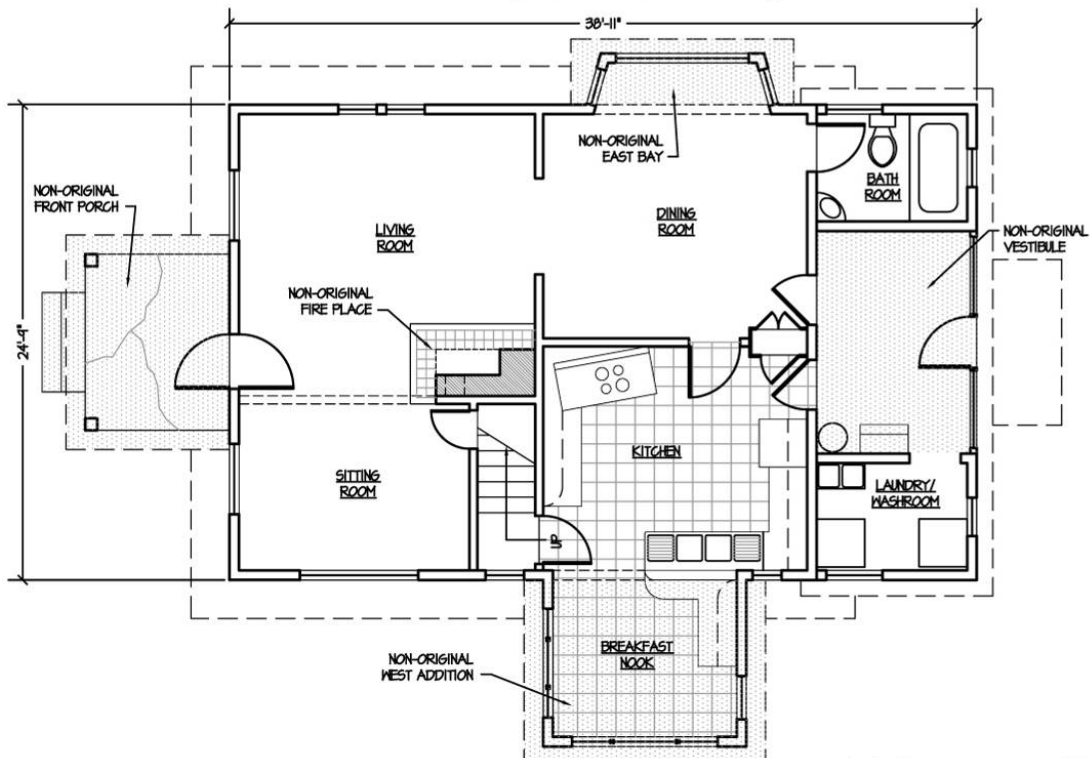
Tall, single and grouped wood windows with double or single hung sash and wood panel type doors, originally with simple wood trim

Discrete interior spaces with single bathroom on Main Floor and small Second Floor bedrooms

Interior plaster, wood flooring, and linoleum finishes



SECOND FLOOR PLAN



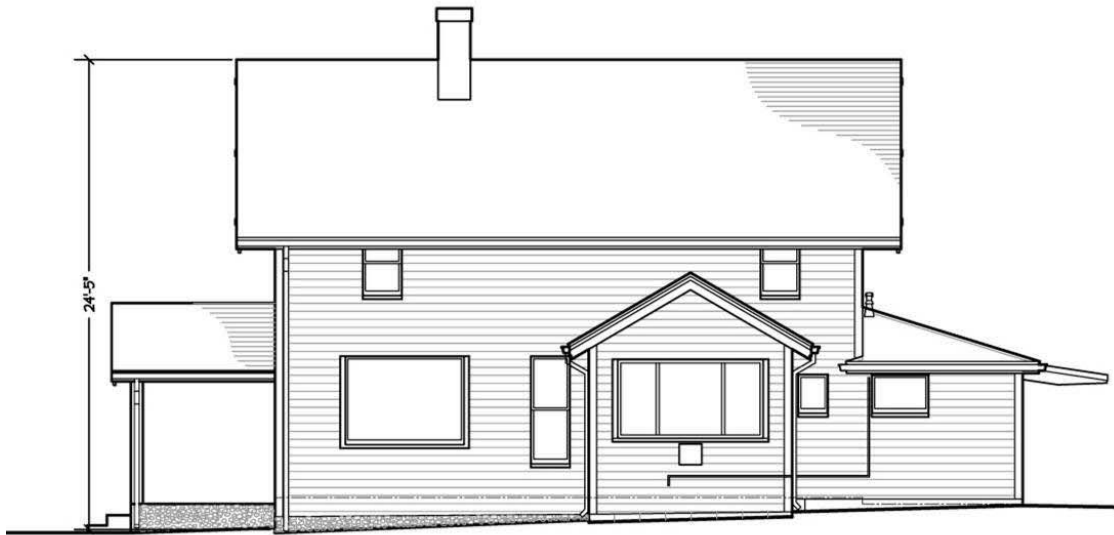
MAIN FLOOR PLAN



Wilkinson Farm
FARMHOUSE PLANS



NORTH



WEST



Wilkinson Farm
FARMHOUSE ELEVATIONS



EAST



SOUTH



Wilkinson Farm
FARMHOUSE ELEVATIONS

Propane Tank and Gas Pump: Remove
Utilities: Provide underground trench and new natural gas line from the road and service to the Farmhouse; provide new expanded water line as necessary for increased plumbing facilities and fire sprinklers

THE FARMHOUSE

Program: Retain use as caretaker/tenant residence. No public access is proposed.

Preservation Approach: Restoration (exterior), Rehabilitation (interior only)

Recommendations: Architectural
Remove existing vinyl siding and insulation, verify integrity / existence of original siding beneath. If extant and feasible, remove and salvage for reinstallation after structural sheathing
Re-clad exterior with wood shingles and lap siding with profile and exposure to match original cladding, and add new trim at windows and doors to match original trim
Paint new exterior cladding to match original multi-tone color scheme
Provide blown-in insulation in exterior wall cavities
Add batt-type insulation at Second Floor ceiling/attic floor
Remove non-original East Bay and West Addition; reframe and clad exterior walls in original locations with new wood windows to match original windows
Install crawlspace vents at east and west sides for cross ventilation
Remove non-original front porch, including cracked concrete landing and steps. Reconstruct full-width porch with wood posts and shingle roofing to match original
Restore existing wood windows, install weatherstripping and storm sash
Remove and replace non-original windows to match original window size, detail and multi-paned pattern
Stabilize chimney, repoint masonry as necessary (Interior fireplace is not original, and may be removed or replaced if non-functional)
Repair and repaint interior plaster at Second Floor ceilings
Regrade perimeter to slope away from building
Retain attic roof and framing
Replace existing wall-mounted propane heaters with new natural gas furnace, located in existing laundry room and ducted to other First and Second Floor Rooms. (Undertake this work with removal and replacement of finishes and new gas line.)
Remove propane tanks and piping to the house (see site recommendations for utilities upgrades)
Remove and replace interior finishes, and plumbing fixtures at Main Floor; replace bathroom and kitchen cabinets and appliances, and washer/dryer; provide new light fixtures and electrical distribution
Upgrade existing electrical panel to serve the Farmhouse and Garage; remove surface-mounted electrical conduit from South Vestibule

Structural

When re-cladding the exterior, install ½" plywood diaphragm at walls for shear resistance (8' per wall)

Retrofit straps and hold downs at ends of new shear walls at first & upper floors

Install plywood roof diaphragm (when roofing requires replacement)

When refinishing the interior, remove Main Floor ceiling plaster and install plywood floor diaphragm at under side of joists

Retrofit foundation anchors at exterior stud walls (4'-0" o. c.)

THE BARN

Program:

Orientation, Exhibits, and Public Assemblies

The Main Floor of the Barn provides an opportunity for public assemblies in an unconditioned space open for historic tool and agricultural exhibits and operational programs, and for events such as educational presentations, gatherings, poetry readings, art classes, family reunions, weddings, etc. Structural conditions limit use to the Main Floor, and no use, including storage, of the Hayloft is recommended. Current access and plumbing codes require an accessible restroom at Main Floor.

Preservation Approach: Preservation, Restoration and Rehabilitation

Recommendations:

Architectural

Clean up the cobwebs and detritus; remove non-interpretive items

Replace broken window pane, and repair window sash as necessary

Replace door hardware for security, egress and ease of operation

Paint exterior walls with solid-body stain, and prep and paint doors/windows with primer and paint

Replace/patch concrete floor slab to level as required for universal access

Clean and whitewash at milking stalls

Construct new accessible Restroom at northwest corner of Main Floor

The Barn will remain an unconditioned space, except at new Public Restroom; provide heating to new room

Replace cedar shingle shed roof at outside manure trough; provide new frame with bug screening

Remove existing metal and shingle roofing, and install new metal roof over new roof diaphragm per structural

Provide gate/barrier at bottom of existing stair to prevent access to Hayloft

Clean biological growth from exterior concrete foundations

Replace missing siding board on bottom course on the west side

Replace Hayloft flooring as necessary for safe access by maintenance personnel (no public access, and no use)

Enlarge existing opening in Hayloft floor to allow visitors to view upper level and roof framing

Retain/upgrade lift mechanism to hold suspended historic artifacts

Retain/clean/refurbish original workshop cabinetry and countertops

Inventory farm artifacts; remove durable elements and non-historic tools to exterior covered storage in the Wood Shed; retain historic tools and equipment on-site for future interpretation, or arrange for storage at the local Historical Museum

PRIORITY 4. OUTBUILDINGS

GARAGE / MILK HOUSE

Replace front person door with glazed panel-type	1 each	\$ 350.00	\$ 350
Replace vehicle door to match original	1 each	\$ 3,500.00	\$ 3,500
Add new electrical distribution, general and exhibit lighting	674 s.f.	\$ 15.00	\$ 10,110
Reconnect dislodged downspout on north side	1 allowance	\$ 100.00	\$ 100
Provide new hose bib and floor drain; restore cooling tub operations	1 allowance	\$ 1,000.00	\$ 1,000
Refinish interior walls	1 allowance	\$ 1,250.00	\$ 1,250
General restoration, including prep and repaint exterior walls	1 allowance	\$ 5,000.00	\$ 5,000
Design, fabricate and install two-dimensional exhibits	NIC		

HOLLY SHED

Demolish (289 s.f.)	1 allowance	\$ 800.00	\$ 800
New concrete foundation and slab on grade	152 s.f.	\$ 10.00	\$ 1,520
New wood frame building to match original construction	152 s.f.	\$ 110.00	\$ 16,720

CHICKEN COOP

Demolish (99 s.f.)	1 allowance	\$ 200.00	\$ 200
New concrete foundation and slab on grade	50 s.f.	\$ 10.00	\$ 500
New wood frame building to match original construction	50 s.f.	\$ 70.00	\$ 3,500

NEW COMMUNITY BUILDING

New wood frame building, including mechanical, electrical, and restroom plumbing, with concrete foundation and slab	592 s.f.	\$ 250.00	\$ 148,000
Extend utility lines	1 allowance	\$ 2,500.00	\$ 2,500
Regrade for amphitheater west of new Community Building	1,000 s.f.	\$ 10.50	\$ 10,500

SUBTOTAL PRIORITY 4 \$ 205,550 \$ 205,550

PRIORITY 5. FARMHOUSE - INTERIOR REHABILITATION

Remove First Floor interior finishes and provide new finishes	1 allowance	\$ 15,000.00	\$ 15,000
Install plywood diaphragm at First Floor ceiling	660 s.f.	\$ 10.00	\$ 6,600
Remove/replace existing Kitchen and Bath fixtures, cabinets & appliances	1 allowance	\$ 25,000.00	\$ 25,000
Remove and replace hot water heater, washer and dryer and laundry sink	1 allowance	\$ 3,500.00	\$ 3,500
Repair & repaint select plaster at Second Floor ceilings (50%)	700 s.f.	\$ 5.00	\$ 3,500
Future: Install plywood roof diaphragm and re-roof, when reroofing is required	1,200 s.f.	\$ 17.50	\$ 21,000

SUBTOTAL PRIORITY 5 \$ 74,600 \$ 74,600

SUMMARY

Priority 1 - Site	14.7%	\$ 111,790
Priority 2 - Barn	37.4%	\$ 284,592
Priority 3 - Farmhouse - Exterior Restoration	11.1%	\$ 84,838
Priority 4 - Outbuildings	27.0%	\$ 205,550
Priority 5 - Farmhouse - Interior Rehabilitation	9.8%	\$ 74,600
		SUBTOTAL \$ 761,370
		Design Contingency, 15% \$ 114,205
		SUBTOTAL \$ 875,575
		General Contractor's General Conditions & Overhead & Profit, 18% \$ 157,603
		SUBTOTAL \$ 1,033,178
Soft Costs (excluding NIC items, special fees, furniture, equipment & exhibits) 40%		\$ 413,271
		TOTAL \$ 1,446,450

ESCALATED TO DATE OF FUTURE CONSTRUCTION, 5%/year

To 2009:	\$ 1,594,711
To 2010:	\$ 1,674,446
To 2011:	\$ 1,758,169
To 2011:	\$ 1,846,077