Todd Prager & Associates LLC

Davis-Meeker Oak Treatment Plan

Pruning Specifications

Revised 10/2026

Date: October 21, 2026

Site Address: 7525 Old Highway 99E
Tumwater, Washington 98501

Archaeological Site: 45TN568

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Introduction

REVISED October 19, 2026 – This report provides a revision[1] to the pruning specifications for the Davis-Meeker Oak, a historical 66-inch DSH (trunk diameter at standard height, 4.5 feet above ground level) Garry oak (*Quercus garryana*) located adjacent to Old Highway 99 in Tumwater, WA. On September 25, 2026, two large-diameter branches from the southwest stem failed during a high wind event. The tree's structure significantly changed because of the branch failures and a Level 2 visual tree risk assessment was performed several days later.

Ten (10) defects of concern were identified and assessed for risk, five of which resulted in a high risk rating. Three risk mitigation options were presented, and Option 1 was selected. There are five treatments proposed within Option 1:

1. Target management
2. **Reduction pruning**
3. Supplemental support system
4. Root zone management
5. Monitoring

This treatment plan only addresses reduction pruning. The specifications provided in this pruning prescription align with the ANSI A300 Tree Care Standards.[2] The following companion publications to the ANSI A300 Tree Care Standards by the International Society of Arboriculture (ISA) were consulted during the preparation of this report:

- Best Management Practices – Pruning, Third Edition (2019)

The specifications provided in the report may be implemented by the City of Tumwater based on their risk tolerance level, available budget, and other relevant factors. The ultimate decision whether to implement the specifications in this report rest with the tree owner or manager. Our firm's role is to provide professional advice to inform the tree owner or manager's decision making. Note that the tree's historical status necessitates engagement with the Washington State Department of Archaeology and Historic Preservation (DAHP) prior to any treatment. Any tree work described in this report shall be completed by a qualified ISA Certified Arborist® with coordination, oversight, and onsite documentation by our firm. Daily reports summarizing work will be prepared to by our firm in an effort to maintain transparency.

Assumptions

The pruning specifications outlined in this report are based on a visual assessment of the tree on September 29, 2026. To the best of my knowledge, there are no serious pests or pathogens in the crown. If serious pests or pathogens are discovered in the crown during pruning, work may need to be delayed or stopped and the treatment plan revisited. The proposed scope of work assumes unrestricted access to the entire crown, including over Old Highway 99.

[1] See the Davis-Meeker Oak Treatment Plan dated 11/12/2025 for the first treatment plan based on Option B of the Level 3 advanced tree risk assessment conducted by Todd Prager & Associates, LLC from August 2024 through February 2025.

[2] American National Standards Institute. (2023). *ANSI A300: Parts 1 – 10. Pruning standards (Section 5, p. 12-19),* Manchester, NH: Tree Care Industry Association.

Proposed Treatment Schedule[3,4]

YEAR	TREATMENT	DATE	STATUS	COMMENT
1 8/2025 to 7/2026	DAHP Application Submitted – Amendment 1	11/2025	✓	
	DAHP Permit Issued Archaeological Monitoring Permit: 2024-71-Amendment 1 Fieldwork may begin 12/20/2025 and shall end 12/20/2026 (Attachment 3)	12/20/2025	✓	Permit open until 12/20/2026
	~~Root zone management: Grade and drainage improvements Preferred dates 3/1/2026 – 5/31/2026~~	~~12/20/2025 to 12/20/2026~~	~~Open~~	4/28/2026 Root zone enhancement was delayed for 6 months in response to unseasonably dry and warm weather.
2 8/2026 to 7/2027	Archaeological Monitoring Permit: 2024-71-Amendment 1 Period of analysis	12/20/2026 to 12/20/2027	Open	
	Root zone management: Grade and drainage improvements, vertical mulching, and arborist wood chip application	11/2/2026 to 11/6/2026	Scheduled	
	REVISION 10/2026 Submit DAHP Application Amendment 2 (Pruning)	10/2026	Open	
	Pruning Treatment	11/2026 to 12/20/2026	Open	
	Supplemental Support System	Year 2	Open	Tree will be inspected for cabling and bracing locations during pruning
	Fencing	Year 2	Open	Temporary fencing has been installed
3 8/2027 to 7/2028	Native Planting	Year 3	Open	
			Open	
	Archaeological Monitoring Permit: 2024-71-Amendment 1 Final report due	12/20/2027	Open	

[3] This schedule was revised on 10/20/2026.
[4] This proposed schedule is subject to change based on DAHP permit requirements, tree condition at the time of proposed work, site conditions at the time of proposed work, and available budget, and unforeseeable severe weather events.

Year 2: August 2026 to June 2027

(Pruning window October 2026 to December 20, 2026)

PRUNING

Description

Reduction pruning mitigates the likelihood of branch failure by reducing the load on defective parts through modest reductions in branch length and weight. The two large-diameter branches that failed on September 25, 2026, previously sheltered east-oriented branches from prevailing south and southwest winds. As a result, these branches are now exposed to dynamic wind forces that they have not developed to withstand. Reducing branch length and end weight through targeted pruning will decrease both loading and wind resistance, thereby partially compensating for this increased exposure.

Goals and Objectives

The goals and objectives of reduction pruning are:

1. Goal: Reduce the likelihood of failure.
    1.1. Objective: Reduce the load on horizontal and bowed branches extending over Old Highway 99.
    1.2. Objective: Reduce the load above the decay column (kestrel cavity) on the central stem.
    1.3. Objective: Reduce the load on the remaining bowed branch on the southwest stem.
    1.4. Objective: Prune to improve branch architecture and reduce end weight.
    1.5. Objective: Remove dead branches 2-inches in diameter and larger throughout crown to reduce unnecessary load on branches with defective parts. This is of particular concern when branches are wet, frozen, or covered in ice.

Treatment: Pruning

YEAR 2: Pruning Specifications	
Method/System	Natural pruning system
Time	1 to 2 Days
Site Preparation	1. Coordinate with City of Tumwater and their contract archaeologist for permitting. 2. Coordinate with Port of Olympia to potentially reserve and restrict parking. 3. Possible need for road or lane closure, coordinate with City of Tumwater if a road or lane closure is needed.
Onsite Communication	1. Prior to the start of work, the tree care company, City's Urban Forester, and consulting arborist shall meet and review the pruning prescription onsite. 2. Climbing arborists performing the pruning work should work in tandem with the City's Urban Forester and consulting arborist. Communication between the canopy and ground may occur through phone calls or radios. 3. A laser pointer will be used to facilitate pruning discussions between climbing arborists and people on the ground.
Procedure See Attachment 1 for Photographs Depicting Defects of Concern and Pruning Areas See Attachment 2 for Approximate Crown Dimensions with Pruning	Climbing spurs shall not be used. All pruning is required to be consistent with ANSI A300-2023 Pruning Standards. Clean, sharp, wood-cutting blades shall be used on all cuts. ***Whole Tree:*** 1. If possible, use an aerial/boom lift parked on impervious surfaces to access the canopy. Aerial lifts with outriggers, such as a spider lift, may operate within the dripline if operating on top of a steel plate or ½-inch thick plywood. 2. Make proper pruning cuts outside of the branch collar. Do not leave stubs or make flush cuts (Figures 1 and 2). 3. When utilizing a reduction cut, select a live lateral branch that is at least 1/3 the diameter of the branch that is removed (Figure 3). 4. Do not remove interior foliage unless necessary. 5. Employ heading cuts under 2-inches in diameter to growth nodes as needed. For storm damaged limbs, larger heading cuts may be appropriate to allow for crown regeneration and limit decay into main stems. 6. Do not remove crossing/self-bracing branches without addressing risk of subsequent failure. Retain crossing branches as needed. 7. Prune to maintain the natural branch architecture of the tree. Avoid sharp angled directional cuts (i.e. "dog-legs"). 8. If diseased branches are found, notify the project arborist, document the location, and remove the defective material. 9. Climbing arborists performing the pruning work should reassess their work area approximately every 30 minutes to both prevent over-pruning and ensure the scope is being followed.

	<u>The following pruning specifications are listed in priority order. Area 1 mitigates defects with high risk. Area 2 mitigates a defect with moderate to low risk. Area 3 mitigations a defect with low risk. Monitor the percent of live crown loss as pruning progresses.</u> ***Area 1***: Branches over Old Highway 99 - emphasize load reduction on horizontal and bowed branches (Defects C-ii, C-iii, D-I, D-ii, D-iii). 1. Target 1-inch to 3-inch diameter cuts with a maximum cut of 6-inches in diameter. Focus on end weight reduction, branch length reduction, and distributing the load evenly over the length of the branch. The 40 to 42-foot crown radius over Old Highway 99 should be reduced to ~ 34 to 36 feet. 2. Target the removal of dead branches 2-inches in diameter and larger. 3. Limit live foliage removal to less than 15 to 20 percent of Area 1. ***Area 2:*** Central stem - emphasize load reduction on central stem (Defects C-i, E). 1. Target 1-inch to 2-inch reduction cuts with a maximum cut size of 4-inches. 2. Target the removal of dead branches 2-inches in diameter and larger. 3. Limit live foliage removal to less than 10 percent of Area 2. ***Area 3:*** Southwest stem - emphasize load reduction on remaining bowed branch (Defect F). 1. Target 1-inch to 2-inch reduction cuts. The 35-foot crown radius should be reduced to approximately 32 to 30 feet. 2. Target the removal of dead branches 2-inches in diameter and larger. 3. Limit live foliage removal to less than 10 percent of any individual branch system.
Inspection for future supplemental support	This work should also inspect potential points of attachment for future cabling. Information collected during reduction pruning should include: 1. Stem/branch diameters of defective parts. 2. Stem/branch lengths of defective parts. 3. Visual signs of decay on defective parts. 4. Identification of potential attachment points. 5. Photographs or videos of branch and stem conditions. 6. Possible temporary markings with flagging for potential attachment points.
Wood processing	Check with stakeholders on wood removal guidelines.

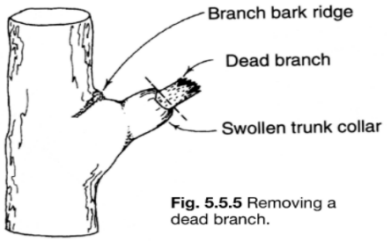


Figure 1 Illustration of proper removal of a dead branch or stem. The final cut should be made just beyond living tissue. Source: ANSI A300 Tree Care Standards, p.15.

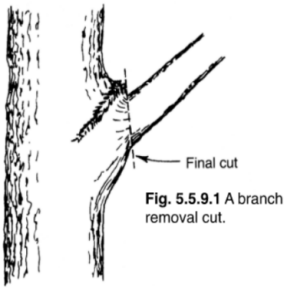


Figure 2 Illustration of proper branch removal cut. The cut should be made without cutting into the branch bark ridge, branch collar, or leave a stub. Source: ANSI A300 Tree Care Standards, p. 16.

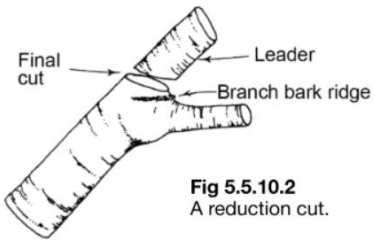
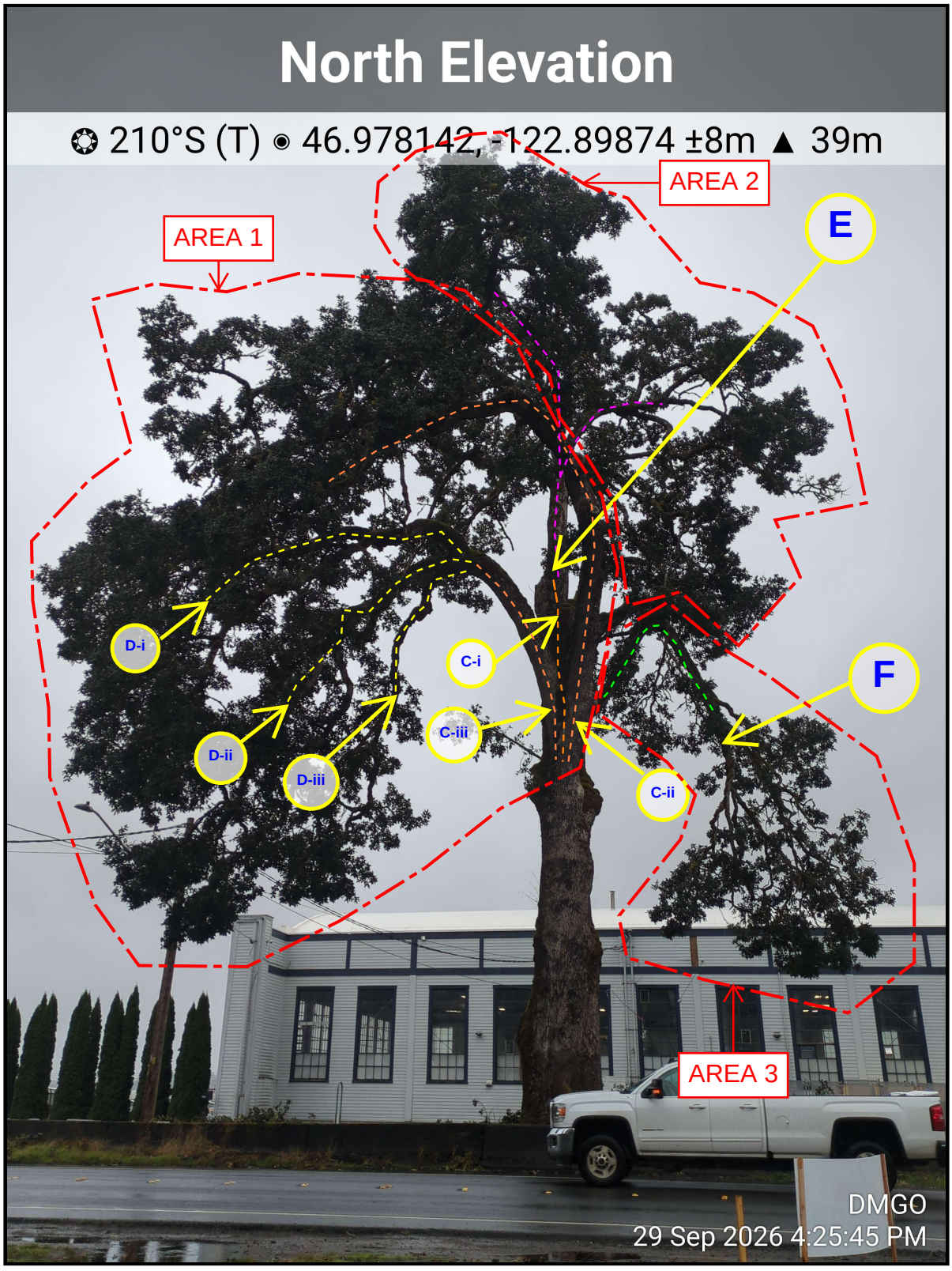


Figure 3 Illustration of proper reduction cut. The remaining lateral branch should typically be at least one-third the diameter of the stem or branch being removed. Source: ANSI A300 Tree Care Standards, p. 16.

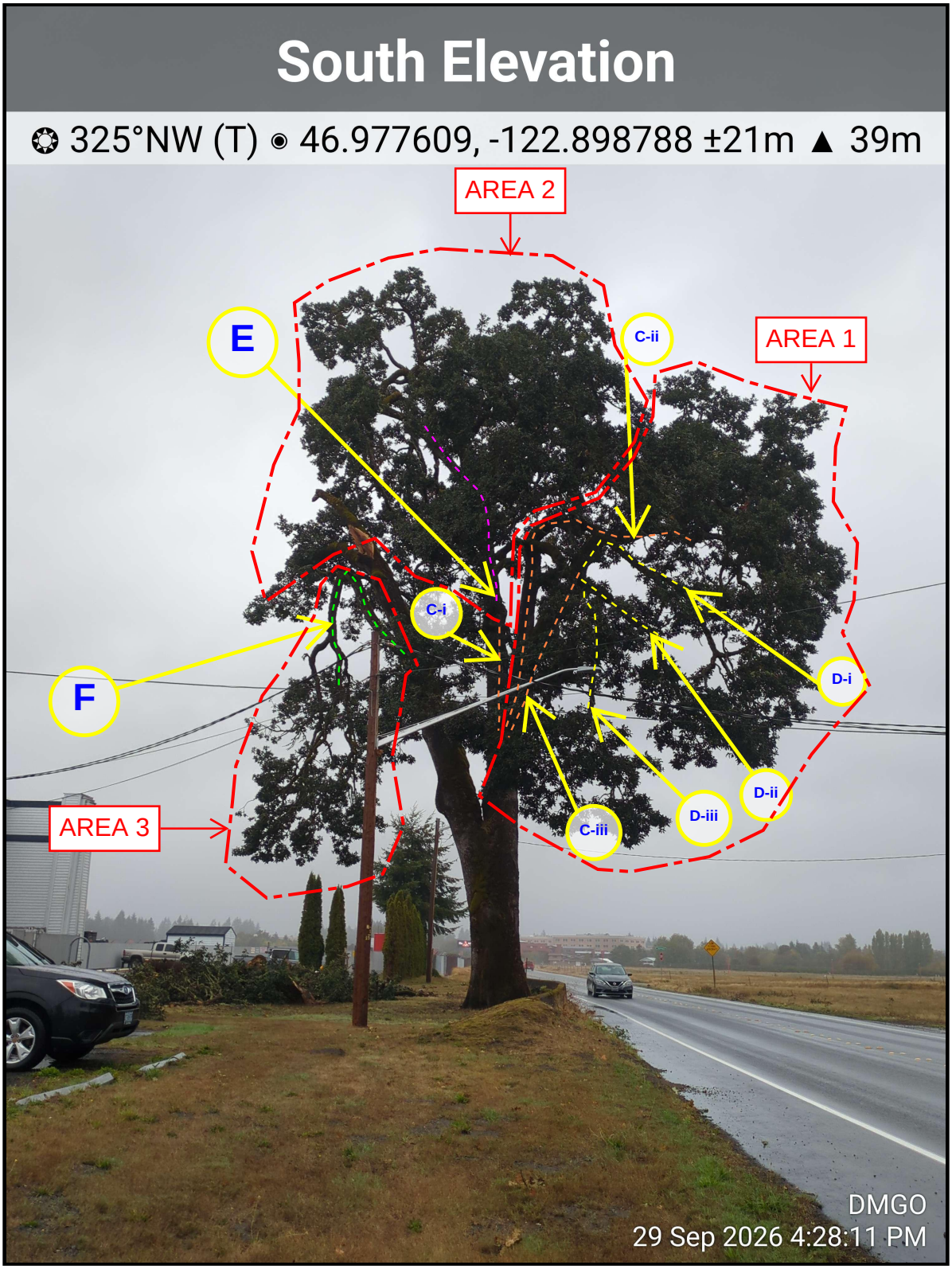
Attachment 1 – Photographs Depicting Defects of Concern and Pruning Areas

Photographs are for illustrative purposes only. Markups are not to scale. Angles of the photographs limit the ability to fully and accurately depict proposed work.



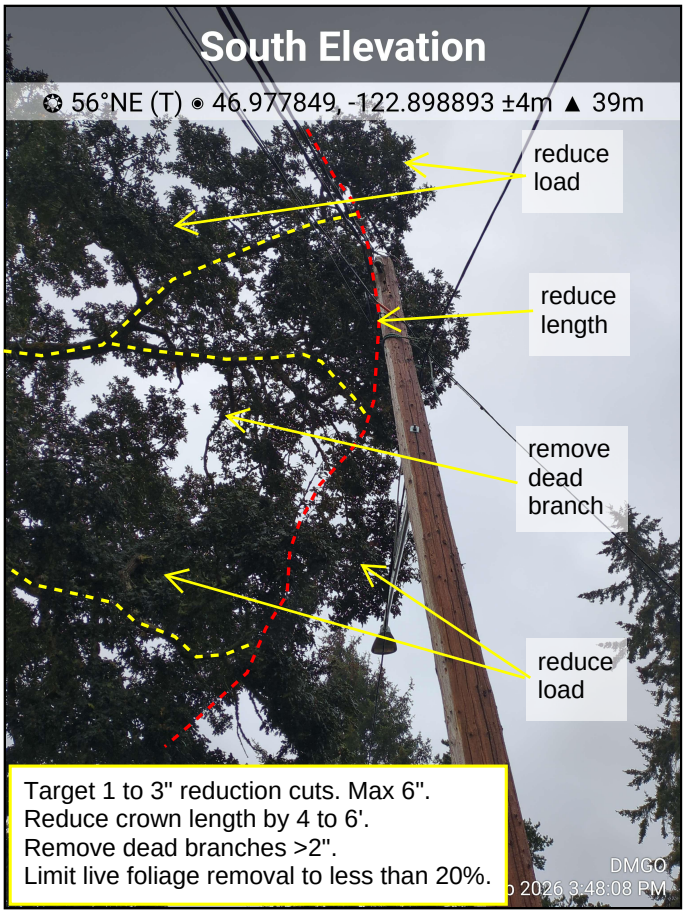
View from South

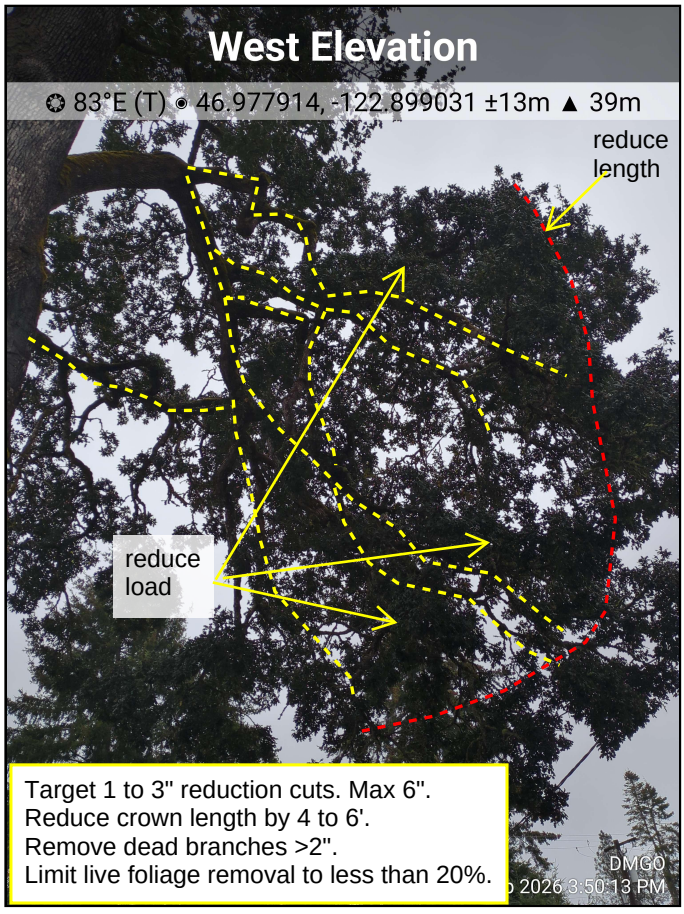
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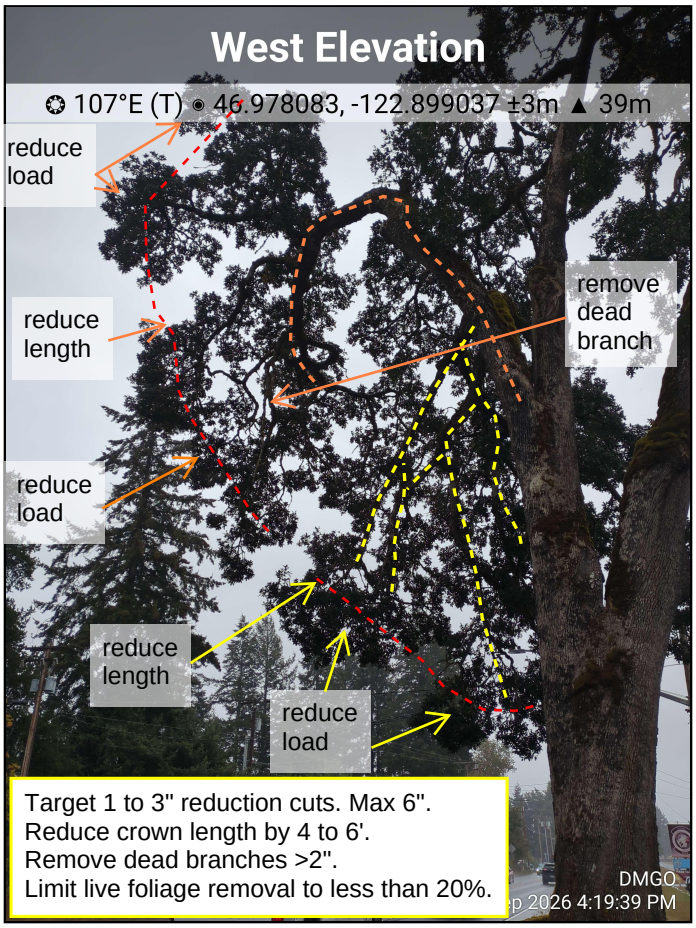


Area 1 - Branches Over Highway 99

Photographs are for illustrative purposes only. Markups are not to scale. Angles of the photographs limit the ability to fully and accurately depict proposed work.

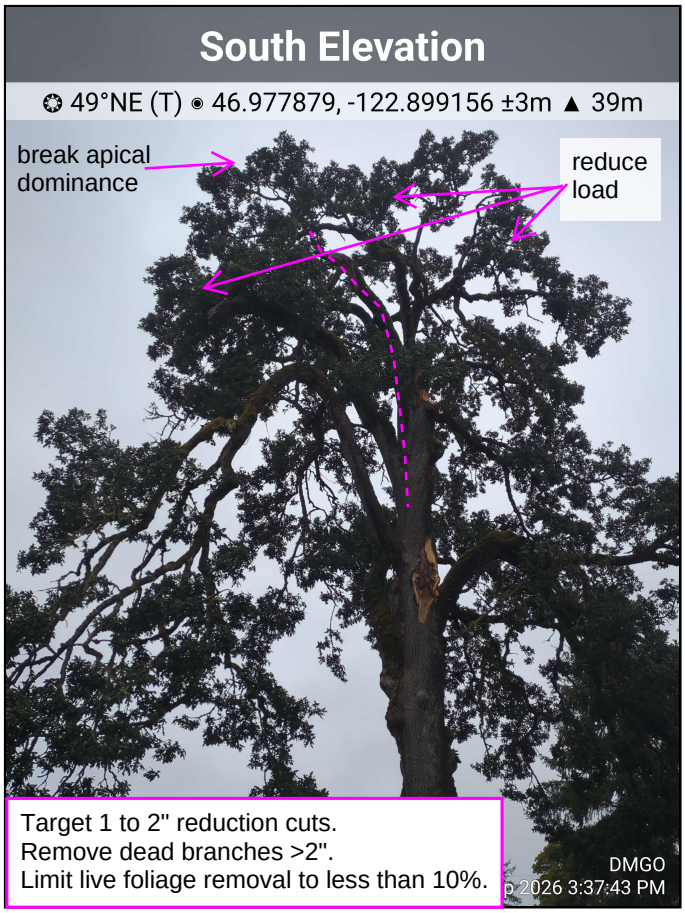


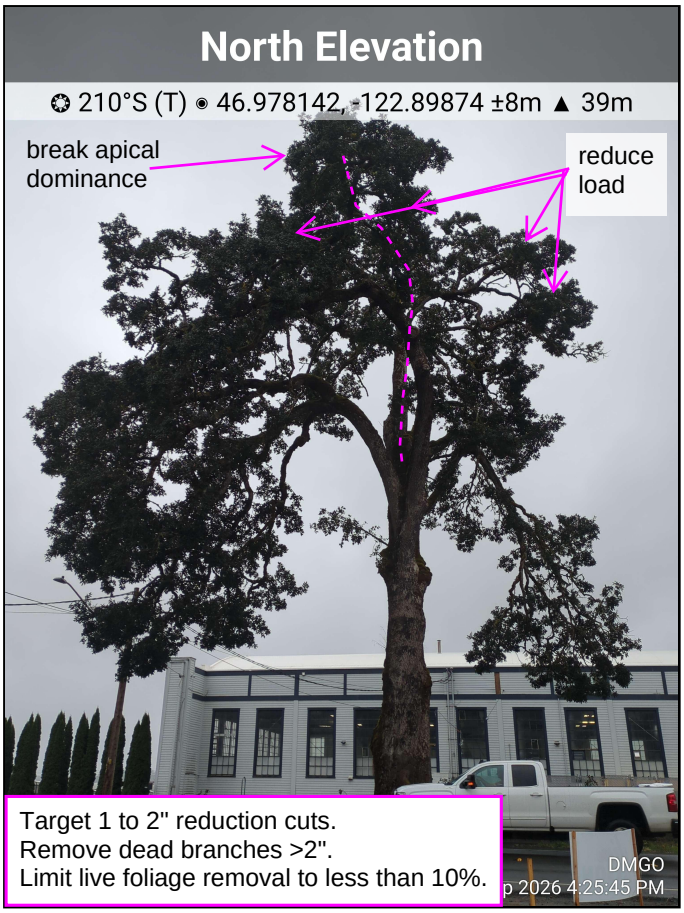




Area 2 - Central Stem

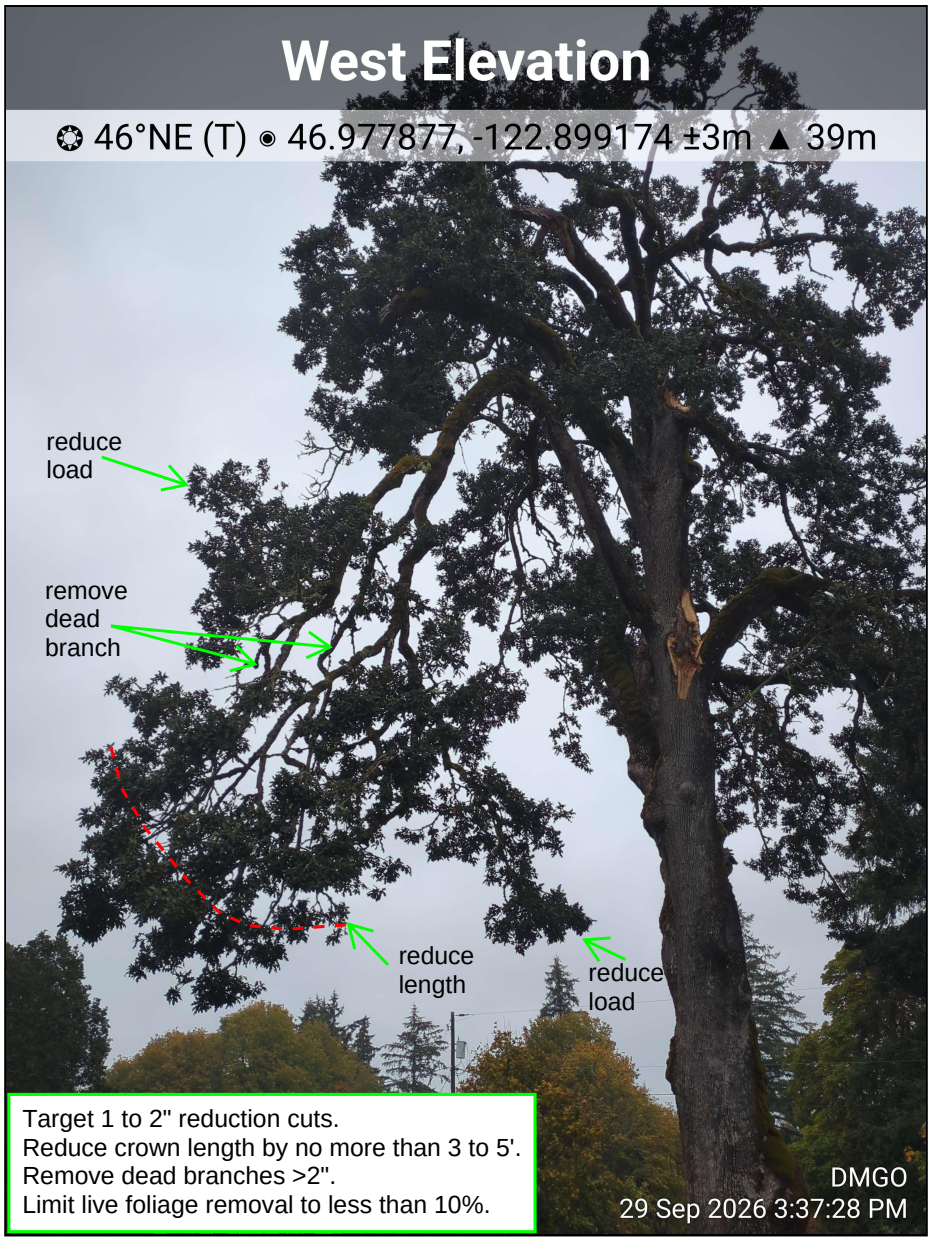
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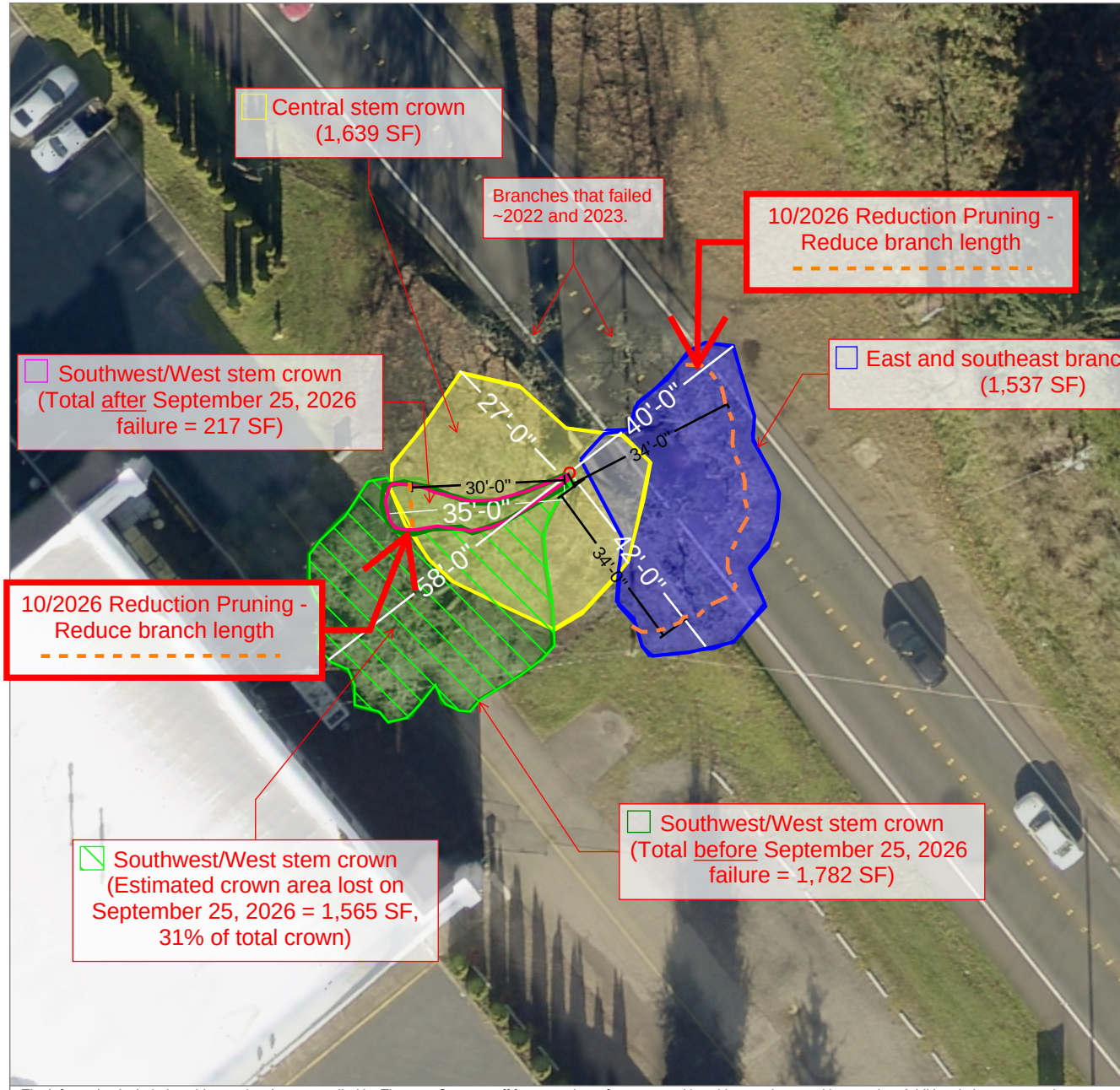


Area 3 - Southwest Stem

Photographs are for illustrative purposes only. Markups are not to scale. Angles of the photographs limit the ability to fully and accurately depict proposed work.



Attachment 2 – Approximate Crown Dimensions with Pruning



Davis-Meeker Oak (2020)

Legend

Scale 1: 557

0 25 50
Feet

Map Created Using GeoData Public Website

Published: 10/16/2024

Note:
The 2020 aerial map was used to be consistent with the 2/7/2025 Level 3 tree risk assessment.

THURSTON COUNTY
WASHINGTON
SINCE 1852

Thurston County GeoData Center

The information included on this map has been compiled by Thurston County staff from a variety of sources and is subject to change without notice. Additional elements may be present in reality that are not represented on the map. Ortho-photos and other data may not align. The boundaries depicted by these datasets are approximate. This document is not intended for use as a survey product. ALL DATA IS EXPRESSLY PROVIDED 'AS IS' AND 'WITH ALL FAULTS'. Thurston County makes no representations or warranties, express or implied, as to accuracy, completeness, timeliness, or rights to the use of such information. In no event shall Thurston County be liable for direct, indirect, incidental, consequential, special, or tort damages of any kind, including, but not limited to, lost revenues or lost profits, real or anticipated, resulting from the use, misuse or reliance of the information contained on this map. If any portion of this map or disclaimer is missing or altered, Thurston County removes itself from all responsibility from the map and the data contained within. The burden for determining fitness for use lies entirely with the user and the user is solely responsible for understanding the accuracy limitation of the information contained in this map. Authorized for 3rd Party reproduction for personal use only.

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Attachment 3 – Archaeological Monitoring Permit: 2024-71-Amendment 1

Allyson Brooks Ph.D., Director
State Historic Preservation Officer

ARCHAEOLOGICAL MONITORING PERMIT #: 2024-71 AMENDMENT 1

Archaeological sites:	45TN568
Individual Responsible for carrying out the terms and conditions of the permit:	Lisa Parks City of Tumwater 555 Isreal Rd, SW, Tumwater, WA 98501
Individual responsible for field investigations:	Beth Mathews Antiquity Consulting
Nature of work:	Monitoring of tree inspection
Repository in which collected records and data shall be deposited:	No collection
Date fieldwork may begin:	December 20, 2025
Date fieldwork shall end:	December 20, 2026
Period of analysis:	December 20, 2027
Date final report due:	December 20, 2027

Special Conditions:

1. Follow protocols in permit application.
2. Notify Interested Tribes and DAHP 72 hours in advance of field work.
3. Allow for on-site visits from DAHP and Tribal representatives.
4. Send notification to DAHP, affected tribes, and consulted parties when field work is occurring.
5. Provide pdf copy of draft and final reports and updated site form to consulted parties, Tribes, & DAHP.
6. Report must meet DAHP's Survey & Inventory Standards; include catalog and DAHP permit number.
7. If human remains are encountered, stop work, secure the area, notify the county medical examiner, police, DAHP, & affected Tribes per RCW 27.44.055.
8. **Any proposed branch pruning in the future shall require an additional amendment to this permit with more specific information about the scope and location of the pruning.**

Issued this 16th day of December 2025.

JBH Macrae; Assistant State Archaeologist

Allyson Brooks Ph.D., Director
State Historic Preservation Officer

December 16, 2025

Beth Mathews
Antiquity Consulting
4800 Capital Blvd SE, Suite A

Dear Beth,

I have reviewed the application you submitted for archaeological monitoring of arborist inspection and evaluation of the archaeological Davis Meeker Oak Tree (45TN568) in Tumwater, WA. It is my intention to grant the permit application 2024-71 AMENDMENT 1. Please take note of the Special Conditions on the permit.

If you feel aggrieved by this decision you may request an administrative hearing within twenty-one days after receipt of this notice. Your request should be sent to the address listed below. Director Department of Archaeology and Historic Preservation PO Box 48343 Olympia, WA 98504-8343.

Sincerely,

James Macrae
Assistant State Archaeologist
Email: james.macrae@dahp.wa.gov

Enclosure