

#### **CANNON BEACH COMMUNITY DEVELOPMENT**

163 E. GOWER ST. PO Box 368 CANNON BEACH, OR 97110

#### **MEMORANDUM**

RE: Tree Removal Permit 780 Monica Ct., Taxlot 51020BC00505

March 6, 2024

A tree removal permit authorizing the removal of multiple trees in conjunction with the construction of a new single-family dwelling has been issued to Haggart Homes on behalf of property owner The Victoria Group LLC.

The application was submitted with a tree plan prepared by an ISA Certified Arborist. This plan delineates which trees need to be removed for the placement of the building and access or would be impacted by construction on this or adjacent lots in the Ecola Point Subdivision.

This removal application meets the criteria of CMBC 17.70.020(D) Permit Issuance – Criteria which states:

D. Removal of a tree(s) in order to construct a structure or development approved or allowed pursuant to the Cannon Beach Municipal Code, including required vehicular and utility access, subject to the requirements in Section 17.70.030(B) and (Q).

Section 17.70.030(B) Additional Requirements states:

B. For actions which require the issuance of a building permit, tree removal shall only occur after a building permit has been issued for the structure requiring removal of the tree(s).

A building permit for the construction of a new single family dwelling was issued on March 4, 2024.

Section 17.70.030(Q) Additional Requirements states:

- Q. An application for a tree removal permit under Section 17.70.020(D), submitted under the direction of a certified tree arborist for the removal of a tree(s) to construct a structure or development, must include the following:
  - 1. A site plan showing the location of the tree(s) proposed for removal, the location of the proposed structure or development, and the location of any other trees six-inch DBH or larger on the subject property or off site (in the adjoining right-of-way or on adjacent property) whose root structure might be impacted by excavation associated with the proposed structure, or by soil compaction caused by vehicular traffic or storage of materials.
  - 2. Measures to be taken to avoid damaging trees not proposed for removal, both on the subject property and off site (in the adjoining right-of-way or on adjacent property).
  - The area where a tree's root structure might be impacted by excavation, or where soil compaction caused by vehicular traffic or storage of materials might affect a tree's health, shall be known as a tree protection zone (TPZ).

4. Prior to construction the TPZ shall be delineated by hi-visibility fencing a minimum of three and one-half feet tall, which shall be retained in place until completion of construction. Vehicular traffic, excavation and storage of materials shall be prohibited within the TPZ.

The E-Permitting record for this application may be reviewed here: 164-23-000145-PLNG

The E-Permitting record for the planned residential construction may be reviewed here: 164-22-000206-DWL

This permit may be appealed to the Planning Commission by filing an appeal with the City Manager within 14 days of the date of this decision.

Sincerely,

Robert St. Clair

Planner

#### City of Cannon Beach Tree Removal Application

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Pleas	e fill out this form completely. Please type or print.
Appli	cant Name: Pagget Harres III
Mailin	ng Address: A 120 Sup Illingan of Supp RE, Walnuth Co
Phone	e: (000) 424-100/1 Email: 101/6 honey House Pour
Prope	erty Owner Name: The victoria Curry Held
Mailin	g Address: TU Day 213 Production IVA TXCO
Phone	e: (425) 224 - 261 7 Email:
Prope	erty Location: 2004 2004 2014 Map/Tax Lot Number:
	ity shall issue a tree removal permit if one of the following criteria is met. Please circle the of the criteria that applies.
Arbor A.	e criteria require a Tree Removal Report from an International Society of Arboriculture (ISA) Certified ist:  You are constructing a structure or development approved and allowed by pursuant to Cannon Beach Municipal Code 17.70.030, which involves any form of ground disturbance; including require vehicular and utility access. SEE ATTACHMENT A – Removing Trees Because of Construction Removal of a tree for the health and vigor of surrounding trees.
These C.	e criteria require an ISA Tree Hazard Evaluation Form prepared by an ISA Certified Arborist:  The tree presents a safety hazard, where:  1. The condition or location of the tree presents either a foreseeable danger to public safety, or a foreseeable danger of property damage to an existing structure; and,  2. Such hazard or danger cannot reasonably be alleviated by pruning or treatment of the tree.  The tree was damaged by storm, fire or other injury, which cannot be saved by pruning.
You n E. F.	nust submit a tree removal permit with a reason if:  The tree is dead.  Tree removal is necessary to provide solar access to a solar energy system where pruning will not provide adequate solar access:  1. The city may require documentation that a device qualifies for Oregon Department of Energy Solar Tax Credit, or other incentive for installation of solar devices offered by a utility.
G.	<ol> <li>No tree measuring more than 24 inches in diameter shall be removed for solar access.</li> <li>Tree removal is for landscaping purposes, subject to the following conditions:</li> <li>The tree cannot exceed 10 inches in diameter.</li> <li>A landscape plan for the affected area must be <u>submitted and approved</u> by the City.</li> </ol>

The landscape plan must incorporate replacement trees for the trees removed. The replacement trees must be at least six feet in height or have a two-inch caliper; and, The City shall inspect the property one year after the approval of the permit to insure

The City shall inspect the property one year after the approval of the permit to insure the landscape plan has been implemented.

If your tree presents an immediate danger of collapse and if such potential collapse represents a clear and present hazard to persons or property, please contact the Community Development Director (CDD). If it is determined by the CDD that there is an immediate danger, then a tree removal permit is not required prior to tree removal. However, within seven days after the tree removal, the tree owner shall make application for an after-the-fact permit. Where a tree presents an immediate danger of collapse, a complete ISA Tree Hazard Evaluation Form prepared by a certified arborist is not required. Where a safety hazard exists, as defined by this subsection, the city may require the tree's removal. If the tree has not been removed after forty-eight hours, the city may remove the tree and charge the costs to the owner.

Attach a site plan showing the location and type of all trees on the property, including the trees to be removed. Indicate the location of replacement trees and the type. SEE ATTACHMENT B – Site Plan. Attach photos of the trees to be removed and mark the trees with ribbon.

Explain how the request meets one or more of the applicable criteria. Include the number and type of trees requested for removal. If appropriate, explain why pruning would not accomplish the same goal as tree removal.

	••
Application fee: \$50.00 for 1-4 trees; \$100 for 5 or more trees	
<b>Note:</b> The application fee is a <b>nonrefundable</b> fee that is due upon receipt of application, whether the removal request is approved or denied.	
Applicant SignatureDate:	
If the applicant is other than the owner, the owner hereby grants permission for the applicant to act in their behalf.	)
Property Owner Signature:Date:	_
Please attach the name, address, phone number and signature of any additional property owners.	
I understand, as property owner, that I am responsible if an approved tree removal permit is violated in any way. As property owner, my signature or an authorized applicant's signature, allows any duly authorized employee of the City to enter upon all properties affected by this permit, for the purpose of follow-up inspection, observation or measurement.	
***************************************	**
Date: Fee Paid: \$ Receipt Number: Permit #:	
Application is:	
Approved Denied	
Approved - Tree replacement required per Cannon Beach Municipal Code 17.70.040, Tree Replacement Policy.	
Approved with comments:	
Applicant required to implement tree protection recommendations detailed in the T. Pr report that accompanies this permit.	ager
By: Robert St. Clair, Planner Date: March 6, 2024	

Decisions on the issuance of a tree removal permit may be appealed to the Planning Commission in accordance with Section 17.88.140 a, of the Municipal Code.



#### MEMORANDUM

DATE:

February 11, 2023

TO:

Jeff Haggart (Haggart Homes LLC)

FROM:

Todd Prager, RCA #597, ISA Board Certified Master Arborist

RE:

Tree Plan for Ecola Point Lot 1

#### Summary

This report describes the trees proposed for removal and retention at Lot 1 of the Ecola Point project.

Based on the proposed plot plan and the client's request for 12- to 15-feet of working space surrounding the improvements for construction access, 54 trees over 6-inch diameter (DBH) are proposed for removal and the remaining trees are proposed to be retained.

#### Background

Haggart Homes is constructing single dwelling residential units on vacant lots I through 4 of the Ecola Point Subdivision.

On September 23, 2022, I visited the project site, and tagged and assessed the trees on lots I through 4 in the vicinity of the proposed construction. S&F Land Services then surveyed the tagged tree locations and recorded the corresponding tag numbers.

Attachment 1 is the building plot plan for lot 1 with the existing tree locations. Attachment 2 is the tree inventory data for lot 1 sorted by the trees proposed for removal and retention.

The assignment requested of my firm for this project was to:

- Assess and tag all trees over 6-inch DBH within and directly adjacent to the proposed construction area;
- In coordination with Haggart Homes LLC, identify the trees to be removed and retained; and
- Summarize the tree plan proposal in a brief memorandum.

whether trees are adapting to the new edge conditions and risks are mitigated appropriately with City approval.

Based on the proposed plot plan and the client's request for 12- to 15-feet of working space surrounding improvements for construction access, 54 trees over 6-inch DBH are proposed for removal and the remaining trees are proposed to be retained. The removed trees are noted on the plot plan in Attachment 1 with red Xs and retained trees are highlighted in green. The removed and retained trees are also listed in the tree inventory in Attachment 1. Note that some of the trees are proposed for removal due to construction impacts from adjacent lots.

#### Conclusion

Based on the proposed plot plan and the client's request for 12- to 15-feet of working space surrounding the improvements for construction access, 54 trees over 6-inch DBH are proposed for removal and the remaining trees are proposed to be retained.

Additional tree removal or snag creation may be recommended following site clearing if a risk assessment identifies additional trees that are at significant risk of failure. Any additional tree removal or snag creation will require approval from the City of Cannon Beach.

Please contact me if you have questions, concerns, or need any additional information.

Sincerely,

Todd Prager

ASCA Registered Consulting Arborist #597
ISA Board Certified Master Arborist, WE-6723B
ISA Ovalified Tree Pick Assassor

ISA Qualified Tree Risk Assessor AICP, American Planning Association

Todd Prager

Attachments: Attachment 1 - Plot Plan with Tree Removal and Retention

Attachment 2 - Tree Inventory

Attachment 3 - Additional Tree Protection Recommendations

Attachment 4 - Assumptions and Limiting Conditions



## Todd Prager & Associates

## Attachment 2

41 1	40 7	39 1	38 r	37 1	36 r	35 1	34 1	33 [	32 [	31 1	30 1	29 Sit	28 En	27 1	26 r	25 1	24 Sit	20 1	19 1	18 r	17 「	16 r	15 r	14 1	13 г	12 r	11 n	10 г	9 0	8 7	7 6	6 n	5	4 Sit	
red alder	red alder	red alder	red alder	red alder	red alder	red alder	red alder	red alder	red alder	red alder	red alder	Sitka spruce	English holly	red alder	red alder	red alder	Sitka spruce	red aider	red alder	red alder	red alder	red alder	red alder	red alder	red alder	red alder	red alder	red alder	red alder	red alder	red alder	red alder	red alder	Sitka spruce	
Alnus rubra	Alnus rubra	Alnus rubra	Alnus rubra	Alnus rubra	Alnus rubra	Alnus rubra	Alnus rubra	Alnus rubra	Alnus rubra	Alnus rubra	Alnus rubra	Picea sitchensis	llex aquifolium	Alnus rubra	Alnus rubra	Alnus rubra	Picea sitchensis	Alnus rubra	Alnus rubra	Alnus rubra	Alnus rubro	Alnus rubra	Alnus rubra	Alnus rubra	Alnus rubra	Alnus rubra	Alnus rubro	Alnus rubra	Alnus rubra	Alnus rubra	Alnus rubra	Alnus rubra	Alnus rubra	Picea sitchensis	
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6	8	9	11	9	7	11	15	7	9	15	9	19	7	6	12	10	15	7	7	9	9	9	7	9	12	13	7	10	10	6	11	7	11	16	000
fair	fair	fair	fair	poor	fair	fair	fair	fair	fair	fair	poor	good	fair	fair	good	fair	good	fair	very poor	fair	good	fair	fair	good	fair	fair	good	very poor	very poor	very poor	fair	good	fair	good	
poor	poor	poor	poor	poor	poor	fair	fair	poor	fair	fair	poor	fair	fair	poor	fair	fair	good	fair	very poor	fair	fair	fair	poor	fair	fair	fair	fair	very poor	very poor	very poor	poor	fair	fair	good	
poor trunk taper, 33% Icr	poor trunk taper, 25% icr	poor trunk taper, 33% lcr	poor trunk taper, 25% lcr	smothered by ivy	one sided, poor trunk taper	one sided, significant lean	one sided	poor trunk taper, significant lean	one sided, marginal trunk taper, pressed against tree 31	one sided, bowed trunk	suppressed by tree 29	damaged top	overtopped by adjacent trees	poor trunk taper, 15% icr	one sided, bowed trunk	one sided, overtopped by adjacent trees, marginal trunk taper		marginal trunk taper	7' snag	one sided, marginal trunk taper, branch dieback	one sided, marginal trunk taper	one sided, marginal trunk taper	top dieback	marginal trunk taper	one sided, moderately thin crown	moderately one sided, moderately thin crown	overtopped by adjacent trees, marginal trunk taper	top dieback	extensive dieback	dead	thin crown	marginal trunk taper	one sided, branch dieback		
remove	remove	remove	remove	remove	remove	remove	remove	remove	remove	remove	remove	remove	remove	remove	remove	remove	remove	remove	remove	remove	remove	remove	remove	remove	remove	remove	remove	remove	remove	remove	remove	remove	remove	remove	
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### Attachment 3 Additional Tree Protection Recommendations

#### Before Construction Begins

- 1. Notify all contractors of tree protection procedures. For successful tree protection on a construction site, all contractors must know and understand the goals of tree protection.
  - a. Hold a tree protection meeting with all contractors to explain the goals of tree protection.
  - b. Have all contractors sign memoranda of understanding regarding the goals of tree protection. The memoranda should include a penalty for violating the tree protection plan. The penalty should equal the resulting fines issued by the local jurisdiction plus the appraised value of the tree(s) within the violated tree protection zone per the current Trunk Formula Method as outlined in the current edition of the *Guide for Plant Appraisal* by the Council of Tree & Landscape Appraisers. The penalty should be paid to the owner of the property.

#### 2. Fencing

- a. Trees to remain on site should be protected by installation of tree protection fencing to protect at least the minimum protection zone shown in Figure 1.
- b. Unless otherwise noted, the fencing should be put in place before the ground is cleared to protect the trees and the soil around the trees from disturbances.
- c. Fencing should be established by the project arborist based on the needs of the trees to be protected and to facilitate construction.
- d. Fencing should consist of 6-foot-high steel fencing on concrete blocks or 6-foot metal fencing secured to the ground with 8-foot metal posts to prevent it from being moved by contractors, sagging, or falling down.
- e. Fencing should remain in the position that is established by the project arborist and not be moved without approval from the project arborist.

#### Signage

a. All tree protection fencing should have signage as follows so that all contractors understand the purpose of the fencing:

#### TREE PROTECTION ZONE

## DO NOT REMOVE OR ADJUST THE LOCATION OF THIS TREE PROTECTION FENCING UNAUTHORIZED ENCROACHMENT MAY RESULT IN FINES

Please contact the project arborist if alterations to the location of the tree protection fencing are necessary.

Todd Prager, Project Arborist, Todd Prager & Associates, 971-295-4835

b. Signage should be placed every 75-feet or less.

### Attachment 4 Assumptions and Limiting Conditions

- 1. Any legal description provided to the consultant is assumed to be correct. The site plans and other information provided by Haggart Homes LLC and their consultants was the basis of the information provided in this report.
- 2. It is assumed that this property is not in violation of any codes, statutes, ordinances, or other governmental regulations.
- 3. The consultant is not responsible for information gathered from others involved in various activities pertaining to this project. Care has been taken to obtain information from reliable sources.
- 4. Loss or alteration of any part of this delivered report invalidates the entire report.
- 5. Drawings and information contained in this report may not be to scale and are intended to be used as display points of reference only.
- 6. The consultant's role is only to make recommendations. Inaction on the part of those receiving the report is not the responsibility of the consultant.
- 7. The purpose of this report is to:
  - Assess and tag all trees over 6-inch DBH within and directly adjacent to the proposed construction area;
  - In coordination with Haggart Homes LLC, identify the trees to be removed and retained; and
  - Summarize the tree plan proposal in a brief memorandum.

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- Assess and tag all trees over 6-inch DBH within and directly adjacent to the proposed construction area;
- In coordination with Haggart Homes LLC, identify the trees to be removed and retained; and
- Summarize the tree plan proposal in a brief memorandum.

#### Tree Assessment

On September 23, 2022, I completed the inventory of existing trees over 6-inch DBH within and in the vicinity of the proposed construction.

The complete inventory data for each tree on the lot is provided in Attachment 2 and includes the tree number, common name, scientific name, DBH, structural condition, pertinent comments, and treatment (remove or retain).

The tree numbers in the inventory in Attachment 2 correspond to the tree numbers on the proposed plot plan in Attachment 1. The trees were also tagged with their corresponding numbers in the field.

#### Tree Removal and Retention

I coordinated with Haggart Homes LLC to identify the trees to be removed and retained with construction. Trees within the proposed building, driveway, and utility footprints were proposed for removal. In addition, trees within 12- to 15- feet of improvements are proposed for removal to allow for overexcavation of foundations and paving, placement of forms, working space surrounding the improvements for construciton access, and transistional grading to the adjacent slopes.

Figure 1 is the typical minimum recommended tree protection zone for a tree to be retained. Retained trees should be protected from construction impacts within the typical

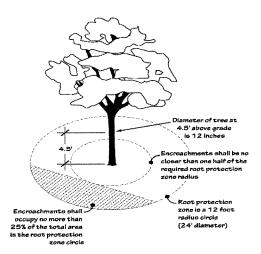


Figure 1: Typical minimum protection zone

minimum protection zone unless otherwise approved by the project arborist. All trees to be removed should be felled away from the trees to be retained and no heavy equipment should be permitted within the protection zones of retained trees during tree removal operations. Also, stumps of removed trees that are within the typical minimum protection zone should be retained in place, or carefully surface ground without disturbing the root systems of adjacent trees to be retained. Attachment 3 includes additional tree protection recommendations for the project.

Note that individual and small groups of trees will be exposed and new forest edges will be created at the site with the removal of existing trees for construction. This will increase the windthrow risk of newly exposed trees. I recommend that the project arborist conduct a tree risk assessment immediately following site clearing to identify trees that pose significant risks. For trees that pose significant risks, mitigation strategies for retaining them such as pruning or snag creation should be explored as recommended by the project arborist. Red alders (*Alnus rubra*) are particularly vulnerable to windthrow and/or health decline with site disturbances but can be good candidates for snag creation. Any recommended tree removal or snag creation will require the review and approval of the City of Cannon Beach. Risk assessments should be conducted periodically throughout construction to document

whether trees are adapting to the new edge conditions and risks are mitigated appropriately with City approval.

Based on the proposed plot plan and the client's request for 12- to 15-feet of working space surrounding improvements for construction access, 54 trees over 6-inch DBH are proposed for removal and the remaining trees are proposed to be retained. The removed trees are noted on the plot plan in Attachment 1 with red Xs and retained trees are highlighted in green. The removed and retained trees are also listed in the tree inventory in Attachment 1. Note that some of the trees are proposed for removal due to construction impacts from adjacent lots.

#### Conclusion

Based on the proposed plot plan and the client's request for 12- to 15-feet of working space surrounding the improvements for construction access, 54 trees over 6-inch DBH are proposed for removal and the remaining trees are proposed to be retained.

Additional tree removal or snag creation may be recommended following site clearing if a risk assessment identifies additional trees that are at significant risk of failure. Any additional tree removal or snag creation will require approval from the City of Cannon Beach.

Please contact me if you have questions, concerns, or need any additional information.

Sincerely,

Todd Prager

ASCA Registered Consulting Arborist #597 ISA Board Certified Master Arborist, WE-6723B

ISA Qualified Tree Risk Assessor AICP, American Planning Association

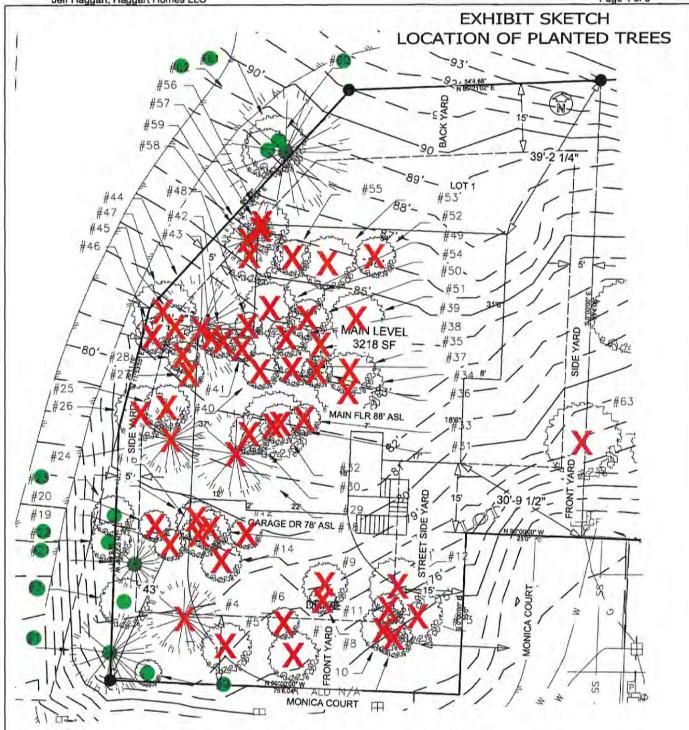
Todd Prager

Attachments: Attachment 1 - Plot Plan with Tree Removal and Retention

Attachment 2 - Tree Inventory

Attachment 3 - Additional Tree Protection Recommendations

Attachment 4 - Assumptions and Limiting Conditions







TREE - CONIFER

TREE - DECIDUOUS



FOUND MONUMENT OF RECORD

Attachment 1

## S&F Land Services

1 INCH = 20 FEET

Date: 11/09/22 Proj No: 21G505-01 1725 N ROOSEVELT DR, STE B, SEASIDE, OR 97138 (503) 738-3425

www.sflands.com info@sflands.com

Attachment 2



## Todd Prager & Associates

#### Tree No. 31 19 8 39 38 37 36 35 34 33 32 30 29 28 27 26 25 24 20 18 17 16 15 14 13 12 H 10 9 4 9 Common Name English holly Sitka spruce Sitka spruce Sitka spruce red alder Scientific Name Picea sitchensis Picea sitchensis Picea sitchensis llex aquifolium Alnus rubra Ainus rubra Ainus rubra Alnus rubra DBH1 16 19 6 12 10 11 11 9 11 0 11 15 15 12 10 15 7 ø 9 7 9 13 × 10 6 00 4 9 9 7 9 on. 4 Single DBH<sup>2</sup> 16 11 11 11 15 19 15 12 13 10 10 11 15 9 12 10 9 9 7 9 9 6 00 9 9 7 9 6 V 7 9 V Condition<sup>3</sup> very poor very poor very poor very poor good good good good good good good good fair poor poor fair fair fair fair fair fair fair fair Tair fair Structure very poor extensive dieback very poor very poor very poor poor good poor good poor poor poor poor poor poor poor poor poor fair dead 7' snag top dieback poor trunk taper, 33% Icr one sided, poor trunk taper one sided, significant lean one sided, marginal trunk taper, pressed against tree 31 one sided, bowed trunk suppressed by tree 29 poor trunk taper, 15% lcr one sided, overtopped by adjacent trees, marginal trunk taper one sided, marginal trunk taper, branch dieback one sided, marginal trunk taper one sided, marginal trunk taper marginal trunk taper one sided, moderately thin crown overtopped by adjacent trees, marginal trunk taper thin crown marginal trunk taper one sided, branch dieback poor trunk taper, 25% lcr poor trunk taper, 33% lcr poor trunk taper, 25% lcr smothered by ivy one sided poor trunk taper, significant lean damaged top overtopped by adjacent trees one sided, bowed trunk marginal trunk taper top dieback moderately one sided, moderately thin crown Comments Treatment remove Lot No. μ 1-3



# Attachment 2

53 red alder 54 red alder 55 red alder 56 red alder 57 western hemlock 58 red alder 59 Sitka spruce 63 red alder 2 red alder 2 red alder 21 Sitka spruce 22 red alder 21 red alder 23 red alder 21 red alder 21 red alder 22 red alder 23 red alder 60 red alder															A		52 red alder	51 red alder	50 red alder	49 red alder	48 red alder	47 red alder	46 red alder	45 red alder	44 Sitka spruce	43 red alder	42 red alder	Tree No. Common Name	
Alnus rubra  Picea sitchensis  Alnus rubra  Alnus rubra  Picea sitchensis  Alnus rubra  Alnus rubra  Alnus rubra  Alnus rubra  Alnus rubra								Alnus rubra		Picea sitchensis	Alnus rubra	Tsuga heterophylla	Alnus rubra	Alnus rubra	Alnus rubra	Alnus rubra	Alnus rubra	Alnus rubra	Alnus rubra	Alnus rubra	Alnus rubra	Alnus rubra	Alpus rubra	Ainus rubra	Picea sitchensis	Alnus rubra	Alnus rubra	ne Scientific Name	
13	2.2	11	9	9	11	11	6	18	14,11	11	13	6	11	00	9	12	9	12	9	12	6	14	00	11	23	6	8	DBH <sup>1</sup>	
13	2	11	9	9	11	11	6	18	17	11	13	6	11	00	9	12	9	12	9	12	6	14	8	11	23	6	8	Single DBH <sup>2</sup>	
	fair	poor	good	good	good	fair	very poor	good	fair	good	fair	fair	fair	fair	very poor	fair	fair	good	fair	fair	very poor	good	good	fair	good	fair	fair	Condition <sup>3</sup>	
	poor	poor	fair	fair	good	poor	very poor	fair	fair	fair	poor	fair	fair	poor	very poor	fair	fair	fair	poor	fair	very poor	fair	fair	poor	good	poor	poor	Structure	
	one sided, poor trunk taper, significant lean over driveway	one sided, poor trunk taper, decay at root crown	bowed trunk, marginal trunk taper	marginal trunk taper		25% live crown ratio (lcr)	dead	multiple leaders at top of crown	bowed lower trunk, codominant at ground level	bowed lower trunk, overtopped by adjacent trees	poor trunk taper	overtopped by adjacent trees, moderately suppressed	poor trunk taper, one sided	poor trunk taper, one sided	15' snag	moderately one sided, decay pocket at lower trunk	significant lean, marginal trunk taper	one sided, marginal trunk taper	poor trunk taper, 33% lcr	marginal trunk taper, narrow crown	dead	one sided, leans toward overhead high voltage lines	one sided, leans toward overhead high voltage lines	poor trunk taper, 25% lcr		poor trunk taper, 10% lcr	poor trunk taper, 20% lcr	Comments	21/1
	retain	retain	retain	retain	retain	retain	retain	retain	remove	remove	remove	remove	remove	remove	remove	remove	remove	remove	remove	remove	remove	remove	remove	remove	remove	remove	remove	Treatment	
	1	1	1	H	1	1	1	1	1	1	1	1	1	1.	1	1	1	1	1	1	1	1	ı	1	1	1	1	Lot No.	1

<sup>\*</sup>DBH is the trunk diameter in inches measured per International Society of Arboriculture (ISA) standards.

each trunk at 4% feet above mean ground level. 2 Single DBH is the trunk diameter of a multi-stem tree converted to a single number according to the following formula: square root of the sum of the squared diameter of

<sup>&</sup>lt;sup>3</sup>Condition and Structure ratings range from very poor, poor, fair, to good.

### Attachment 3 Additional Tree Protection Recommendations

#### Before Construction Begins

- 1. Notify all contractors of tree protection procedures. For successful tree protection on a construction site, all contractors must know and understand the goals of tree protection.
  - a. Hold a tree protection meeting with all contractors to explain the goals of tree protection.
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- b. Unless otherwise noted, the fencing should be put in place before the ground is cleared to protect the trees and the soil around the trees from disturbances.
- c. Fencing should be established by the project arborist based on the needs of the trees to be protected and to facilitate construction.
- d. Fencing should consist of 6-foot-high steel fencing on concrete blocks or 6-foot metal fencing secured to the ground with 8-foot metal posts to prevent it from being moved by contractors, sagging, or falling down.
- e. Fencing should remain in the position that is established by the project arborist and not be moved without approval from the project arborist.

#### 3. Signage

a. All tree protection fencing should have signage as follows so that all contractors understand the purpose of the fencing:

#### TREE PROTECTION ZONE

## DO NOT REMOVE OR ADJUST THE LOCATION OF THIS TREE PROTECTION FENCING UNAUTHORIZED ENCROACHMENT MAY RESULT IN FINES

Please contact the project arborist if alterations to the location of the tree protection fencing are necessary.

Todd Prager, Project Arborist, Todd Prager & Associates, 971-295-4835

b. Signage should be placed every 75-feet or less.

#### **During Construction**

- 1. Protection Guidelines Within the Tree Protection Zones:
  - a. No new buildings; grade change or cut and fill, during or after construction; new impervious surfaces; or utility or drainage field placement should be allowed within the tree protection zones.
  - b. No traffic should be allowed within the tree protection zones. This includes but is not limited to vehicle, heavy equipment, or even repeated foot traffic.
  - c. No storage of materials including but not limiting to soil, construction material, or waste from the site should be permitted within the tree protection zones. Waste includes but is not limited to concrete wash out, gasoline, diesel, paint, cleaner, thinners, etc.
  - d. Construction trailers should not to be parked/placed within the tree protection zones.
  - e. No vehicles should be allowed to park within the tree protection zones.
  - f. No other activities should be allowed that will cause soil compaction within the tree protection zones.
- 2. The trees should be protected from any cutting, skinning or breaking of branches, trunks or woody roots.
- 3. The project arborist should be notified prior to the cutting of woody roots from trees that are to be retained to evaluate and oversee the proper cutting of roots with sharp cutting tools. Cut roots should be immediately covered with soil or mulch to prevent them from drying out.
- 4. Trees that have woody roots cut should be provided supplemental water during the summer months.
- 5. Any necessary passage of utilities through the tree protection zones should be by means of tunneling under woody roots by hand digging or boring with oversight by the project arborist.
- 6. Any deviation from the recommendations in this section should receive prior approval from the project arborist.

#### After Construction

- 1. Carefully landscape the areas within the tree protection zones. Do not allow trenching for irrigation or other utilities within the tree protection zones.
- 2. Carefully plant new plants within the tree protection zones. Avoid cutting the woody roots of trees that are retained.
- 3. Do not install permanent irrigation within the tree protection zones unless it is drip irrigation to support a specific planting or the irrigation is approved by the project arborist.
- 4. Provide adequate drainage within the tree protection zones and do not alter soil hydrology significantly from existing conditions for the trees to be retained.
- 5. Provide for the ongoing inspection and treatment of insect and disease populations that can damage the retained trees and plants.
- 6. The retained trees may need to be fertilized if recommended by the project arborist.
- 7. Any deviation from the recommendations in this section should receive prior approval from the project arborist.

## Attachment 4 Assumptions and Limiting Conditions

- 1. Any legal description provided to the consultant is assumed to be correct. The site plans and other information provided by Haggart Homes LLC and their consultants was the basis of the information provided in this report.
- 2. It is assumed that this property is not in violation of any codes, statutes, ordinances, or other governmental regulations.
- 3. The consultant is not responsible for information gathered from others involved in various activities pertaining to this project. Care has been taken to obtain information from reliable sources.
- 4. Loss or alteration of any part of this delivered report invalidates the entire report.
- 5. Drawings and information contained in this report may not be to scale and are intended to be used as display points of reference only.
- 6. The consultant's role is only to make recommendations. Inaction on the part of those receiving the report is not the responsibility of the consultant.
- 7. The purpose of this report is to:
  - Assess and tag all trees over 6-inch DBH within and directly adjacent to the proposed construction area;
  - In coordination with Haggart Homes LLC, identify the trees to be removed and retained; and
  - Summarize the tree plan proposal in a brief memorandum.