SECTION 66.32 CRITERIA MANUAL Tree Ordinance 2019.1.28.B City OF Piney Point, Texas

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APPENDIX B: WARNING SIGN FOR TREE PROTECTION FENCES <u>IMPORTANT NOTICE</u>

This manual is to be used and interpreted in accordance with the City's Ordinance on urban forest preservation and enhancement. Unless the context indicates that another meaning is intended, terms used in this manual have the same meanings as in said Ordinance.

SECTION 66.40: ON SITE TREE SURVEY STANDARDS REQUIRED DATA FOR TREE SURVEY

The Tree Disposition Plan must be prepared and signed by an Independent Degreed Forester.

Required Tree Data for a Tree Disposition Plan must be obtained from an on-the- ground survey. The Tree Disposition Plan must include tree locations, trunk diameters, types (species), and crown area (Critical Root Zone), as explained below:

*******Only trees species **3**" or greater named in the Quality Tree List may be counted in the required minimum density of trees (RMD) for the square footage of the property.

1. Location

A. Tree Surveys must be accurate to comply with the City Tree Ordinance, Drainage, and other Construction Specifications.

B. Trees on City easements adjoining the site must included in the tree survey.

C. Trees on adjoining properties located within 10 feet and/or 30% of the tree root zone impacted must be included in the tree survey.

2. Tree Identification on Site

Trees must be taped & numbered on site. Orange plastic tape placed around the trunk for removal. Green plastic tape placed around the trunk for protection.

Each tree identified must have the same number on the tree survey, site plan, drainage plan, & Independent Forester's Report.

Tree identification & tree numbers must be maintained throughout construction.

3. Diameter Measurements

Diameter measurement shall be the distance around the perimeter of the tree trunk as measured four and one-half feet (4.5') above the ground using an ordinary measuring tape, if a diameter tape is not available. For multiple-trunk trees, the trunk diameter is deemed to be equal to the diameter of the largest trunk plus half the diameter of each additional trunk. Measurements should be accurate to the nearest 2 inches. For conversion from circumference to diameter can be divided by 3.142.

4. Tree Type (Species)

Tree types should be accurate to the species level be listed by both common names and botanical names (e.g. Post Oak or *Quercus stellata*.)

5. Critical Root Zone; Crown

The Critical Root Zone (CRZ) means, for any given tree, the area within a circle centered on the trunk location. The CRZ is calculated in feet to the number of inches of the tree trunk diameter measured at DBH.

Example: A 20" diameter tree would have a 20 foot Critical Root Zone.

The Critical Root Zone and crown information is useful in assessing the impact of projected construction.

6. Condition

The degreed Forester hired to do the survey and tree disposition plan must detail the condition of the trees surveyed in the report submitted. The ratings noted as "good", "fair, and "poor". <u>Trees rated as poor do not count in the RMD.</u>

SECTION 66-45: SPECIFICATIONS FOR TREE DISPOSITION PLAN REPORT REQUIRMENTS FOR TREE DISPOSITION PLAN REPORT

The standard tree graphics discussed below are important to provide consistent information in the most useful format for an efficient plan review.

1. Trunk Location

A. The trunk location on the plan must represent the center of the tree trunk at ground level.

B. The tree located on the site plan must be numbered as same tree number on site.

2. Critical Root Zone (CRZ); Crown; Retained Trees

A. Trunk locations of trees proposed to remain are to be represented by solid circle or green dots, while trees proposed to be removed are to be represented by "x" or orange dots.

B. The critical root zone should be indicated by a circle centered on the trunk.

3. Tree Sizes and Species Identification

A. Tree diameters and species must also be shown in the plan. For sites with a large number of trees, this data should be shown in a legend or excel format referenced by a tree number adjacent to each trunk location. Legends can be useful because they allow for the presentation of other data such as species, size, crown configuration & condition, etc.

4. Tree Protection Fencing

A. Tree Protection Fencing must be drawn on the site plan and /or survey submitted with the tree disposition plan.

B. Approved Tree Protection Sign must be posted on the Tree Protection Fence.

C. A copy of the Tree Protection Sign is found in Appendix B.

SECTION 66-47: TREE REPLACEMENT SPECIFICATIONS A. TREE REPLACEMENT REQUIREMENTS

1. Required Minimum Density (RMD) specifications:

One (1) tree equal or greater than 3"DBH (Diameter at Breast Height) per 2000 Square Feet of lot area.

2. Required 25% rule. 25% of the RMD trees must be located 20

feet or more from the perimeter of the property.

3. Replacement Tree is a 3" caliper tree from the Quality Tree List

(Appendix A), measured 6" from ground level.

4. Liability for replacement trees to be counted in RMD will transfer with change in ownership of the property.

5. Replacement tree(s) must be planted before Certificate of Occupancy is issued.

6. Replacement tree(s) must survive for one year starting from Certificate of Occupancy.

SECTION 66-48: PROTECTION OF REMAINING TREES

A. SPECIFICATION FOR TREE PROTECTION

1. The Tree Protection Fencing must be <u>chain link</u> at least 4 feet high with posts (metal or wood) no more than 6 feet apart.

2. The Tree Protection fence should encompass as much of the drip-line as possible.

3. Two signs must be posted on site on the tree protection fencing – generally one sign in the front and one sign in the back. (Appendix C)

4. Mulch – at least 6 inches of organic wood chip covered by $\frac{3}{4}$ " plywood where soil compaction could occur in the critical root zone that can not be protected by fencing. 5. Trunk Protection – Areas where fencing can not be placed-tree trunks may be

protected by wood slats (at least 8 ' high) loosely wrapped with wire. (no nails) 6. Construction Pruning – Branches low over construction sight may be pruned in accordance to National Association of Arborists Standards.

7. Watering is mandatory during and after construction – Supplemental watering during

drought, low rainfall, high temperatures.

8. Design Constraints – minimum encroachment in to critical root zone of tree.

a. Drainage Plans: Change in Grade procedures

(1) No cut or fill of the ambient grade greater than 2" and covers no more than one-half the radius of the critical root zone (CRZ)

(2) Construction activity causes standing water or wet soil conditions detrimental to the protected tree on lot or adjacent lot.

b. If Trenching is the only option the following procedures must be adhered:

(1) Root Prune at least two weeks prior to any trenching

(a) Root Prune means to clean cut the tree roots and not leave them shredded.

(b) The Trench should be back filled within 24 hours after it is dug.

(c) Irrigation systems: Designs should avoid digging inside critical root

zones. "Hand Dig" means to cut no roots larger than one inch. All irrigation systems should be installed in tree root zones using the "Hand Dig" method.

(d) Paving & Impervious Materials: A maximum of 25% of the Critical Root Zone of a Protected Tree may be covered with impenetrable material, such as but not limited to concrete, tar, & asphalt. The following procedures must be adhered to:

(2) Root Prune shall be done 6" to 1' from the proposed construction and shall take place at least 2 weeks prior to the cut.

(3) A plastic vapor barrier of construction grade shall be installed between the roots and the impervious material to inhibit leaching of lime into the soil.

(4) A root remediation schedule shall be included in the Tree Disposition Plan.

B. PROHIBITED ACTIVITIES

1. Material Storage. No construction or waste materials shall be placed within the limits of the Critical Root Zones of any Protected Tree.

2. Equipment cleaning/liquid disposal. No equipment shall be cleaned or liquids deposited within the Critical Root Zone of a Protected Tree. This includes but is not limited to: paint, oil, solvents, asphalt, concrete, lime, mortar, & other materials.

3. Tree Attachments. No signs, wires, nails, shall be attached to Protected Trees, unless approved in the Tree Disposition Plan.

4. Vehicular Traffic. No vehicle or any construction equipment may be stored or parked in the Critical Root Zone of a Protected Tree unless specified in the Tree Disposition Plan.

5. Trash. Throwing trash inside the Tree Protection Fencing area is prohibited.

6. Removal of Tree Protection Fences. No Tree Protection Fencing may be altered or removed without permission from the City of Piney Point Village.

7. Tree Protection Fences must be removed if there is no construction activity after six (6) months from the issuance of the Building Permit.

C. DEVIATIONS FROM THE CRITERIA MANUAL:

These criteria represent minimum standards for determining whether or not a tree is "preserved." Greater impacts may be allowed, provided that all design alternatives have been proven unfeasible and that some acceptable form of mitigation such as a remedial care program is negotiated. Conversely, some cases may require that a larger area of root area be preserved to increase the survival potential of particularly valuable trees.

These design criteria are enforced in the field as well as on the plan. Plan adjustments made during construction must be reviewed and approved by the City's Urban Forester prior to the adjustments being made.

APPENDIX A: QUALIFIED TREE LIST

REPLACEMENT TREES:

Minimum Criteria for Replacement Trees

Caliper of at least three (3) inches measured six (6) inches above grade

Section 66-33 Qualified Trees

Large Trees

Ash, Green Ash, White Cedar, Eastern Red Cypress, Bald Cypress, Montezuma Elm, Cedar Elm, Lacebark Elm, Winged Hickory Magnolia Maple, Drummond Red Maple, Japanese Maple, Trident Gingko, male Oak, Bur Oak, Chinkapin Oak, Laurel Oak, Live Oak, Nuttall Oak, Mexican White Oak, Post Oak, Overcup Oak, Shumard Oak, Swamp Chestnut Oak, Water Oak, White

Pecan Pine, Loblolly Sycamore Walnut, Black

Small Trees

Birch, River Buckeye, Mexican Holly, Eagleston Holly, East Palatka Holly, Savannah Fringe Tree Laurel, Cherry Laurel, Texas Mountain Pistache, Chinese Plum, Mexican Redbud, Eastern Yew, Japanese (single stem)

APPENDIX B

WARNING SIGN REQUIRED FOR TREE PROTECTION FENCING

SIGN SIZE 12" X 18"

TREE PROTECTION FENCING

Required by the Code of Ordinances of the City of Piney Point Village

DO NOT REMOVE FENCE OR SIGN!

FINE UP TO \$500. JOB MAY BE SHUT DOWN

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CERCAS PARA PROTECCIÓN DE ARBOLES

Requerido por el Código de Ordenanzas de la Ciudad de Piney Point Village

NO QUITAR LA CERCA O EL ROTULO!

MULTA DE HASTA \$500. EL TRABAJO PUEDE SER CLAUSURADO