

ALVEY TREE CONSULTING LLC

ALEXIS ALVEY -ISA BOARD CERTIFIED MASTER ARBORIST® #NY-5539B

# Arborist Report 205 E San Marino Drive Miami Beach

2/27/2020



On February 18th, 2020 I visited the property located at 205 E San Marino Drive at the request of Ray Vera. I evaluated the trees on the site in anticipation of new home construction. For each tree, I confirmed species, location, and size (Height, Spread, DBH); evaluated condition (Poor, Fair, Good); determined disposition (Remove, Remain, Relocate); determined the Tree Protection Zone for trees to remain; provided relevant comments about health and disposition; and took photographs. This report shall in no shape or form shall be construed as a tree risk assessment which is beyond the scope of work written in the contractual agreement.

Please feel free to contact me should any questions arise. Thank-you for the opportunity to assist in this manner.

Alexie Alvey

Alexis Alvey ISA Board Certified Master Arborist<sup>®</sup> #NY-5539B

Alvey Tree Consulting LLC 516-728-1366 alveytree@gmail.com alveytree.com

Property Location -205 E San Marino Drive Miami Beach, FL 33139

#### Client -

Ray Vera - Architect V4Studio ray@v4-studio.com 786-578-2929

Common Name -Japanese Privet

Scientific Name -Ligustrum japonicum DBH (in) - 10 Height (ft) - 8 Canopy Spread (ft) - 6

**Condition -**Fair Native? -No

**Disposition -**Remove

Tree #1 is a Japanese Privet located in the front swale along E San Marino Drive. It is multi-trunked. It is in fair condition - the tree has been shaped and one limb is experiencing dieback (circled in red). There is a foliar spot disease on the leaves.

This tree has not been incorporated into the landscape plan and will therefore be removed.

## Tree #2

Common Name -Japanese Privet

Scientific Name -

Ligustrum japonicum



DBH (in) - 3, 3 Height (ft) - 8 Canopy Spread (ft) - 6



Disposition -Remove

Tree #2 is a Japanese Privet located in the front swale along E San Marino Drive. It is double-trunked. It is in fair condition - the tree has been shaped and there is a wound on one of the trunks (circled in red). There is a foliar spot disease on the leaves.

Common Name -Japanese Privet

Scientific Name -Ligustrum japonicum DBH (in) - 10 Height (ft) - 8 Canopy Spread (ft) - 6

DBH (in) - 8

Height (ft) - 8

Canopy Spread (ft) - 6

Condition - Na Fair No

Native? -

Disposition -Remove

Tree #3 is a Japanese Privet located in the front swale along E San Marino Drive. It is multi-trunked. It is in fair condition and the tree has been shaped. There is a foliar spot disease on the leaves.

This tree has not been incorporated into the landscape plan and will therefore be removed.

#### Tree #4

Common Name -Japanese Privet

Scientific Name -Ligustrum japonicum



Condition -	Native? -
Fair	No

Disposition -Remove

Tree #4 is a Japanese Privet located in the front swale along E San Marino Drive. It is multi-trunked. It is in fair condition and the tree has been shaped. There is a foliar spot disease on the leaves.

This tree has not been incorporated into the landscape plan and will therefore be removed.

Common Name -Pygmy Date Palm (double)

Scientific Name -Phoenix roebelenii DBH (in) - 5, 5 Height (ft) - 15 Canopy Spread (ft) - 8

Fair

Condition -Fair

Native? -

#### Disposition -Remove

Tree #5 is a double Pygmy Date Palm located in the front swale along E San Marino Drive. Overhead wires are present. This tree is in fair condition with lower dead fronds and some yellow fronds.

This tree has not been incorporated into the landscape plan and will therefore be removed.

#### Tree #6

Common Name -Royal Palm

Scientific Name -Roystonea regia



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DBH (in) - 22 Height (ft) - 40 Canopy Spread (ft) - 20



Native? -Yes

Disposition -Remain - 10ft radius TPZ

Tree #6 is a Royal Palm located in the front swale along E San Marino Drive. It is in good condition with a full, healthy green canopy.

This tree is to remain, and protective barriers shall be placed at the dripline, in this case, 10ft from the tree trunk. Barriers shall be installed prior to the start of construction and demolition, and shall remain in place until development is completed and until the department authorizes their removal. Barriers shall be a minimum of 4ft high, and shall be constructed of continuous chain link fence with metal posts at 8ft spacing, or of 2x4 posts with three equally spaced 2x4 rails. Posts may be shifted to avoid roots. No materials shall be placed or disposed of within the TPZ. Natural grade shall be maintained within the TPZ.

Common Name -Alexander Palm

Scientific Name -Ptychosperma elegans DBH (in) - 4 Height (ft) - 15 Canopy Spread (ft) - 6 Condition - N Fair

Native? -

Disposition -Remove

Tree #7 is an Alexander Palm located in the front swale along E San Marino Drive. It is in fair condition with chlorotic foliage.

This tree has not been incorporated into the landscape plan and will therefore be removed.



Tree #8

Common Name -Royal Palm

Scientific Name -Roystonea regia



DBH (in) - 19 Height (ft) - 50 Canopy Spread (ft) - 20



Native? -Yes

Disposition -Remain - 10ft radius TPZ

Tree #8 is a Royal Palm located in the front northwest corner of the property. It is in good condition with a full, healthy green canopy.

This tree is to remain, and protective barriers shall be placed at the dripline, in this case, 10ft from the tree trunk. Barriers shall be installed prior to the start of construction and demolition, and shall remain in place until development is completed and until the department authorizes their removal. Barriers shall be a minimum of 4ft high, and shall be constructed of continuous chain link fence with metal posts at 8ft spacing, or of 2x4 posts with three equally spaced 2x4 rails. Posts may be shifted to avoid roots. No materials shall be placed or disposed of within the TPZ. Natural grade shall be maintained within the TPZ.

Common Name -Mahogany

Scientific Name -Swietenia mahagoni **DBH (in) -** 23, 39 **Height (ft) -** 40 **Canopy Spread (ft) -** 50





Condition -Native? -FairYes

**Disposition -**Remain - 25ft radius TPZ

Tree #9 is a large Mahogany located at the front of the property. It is composed of two large trunks and has a wide-spreading canopy. The tree appears to be low in vigor as there are a number of old pruning cuts with little or no woundwood formation and decay has developed at these cut locations. Staghorn ferns on the main limbs and dense vegetation around the base of the tree may be obscuring potential defects. Prune to remove deadwood including two broken limbs hanging in the canopy. Concrete is at the base of the tree on two sides, beginning 4ft and 5ft away from the trunk. Care should be taken to not injure any tree roots when the concrete is removed.

This tree is to remain, and protective barriers shall be placed at the dripline, in this case, 25ft from the tree trunk. Barriers shall be installed prior to the start of construction and demolition, and shall remain in place until development is completed and until the department authorizes their removal. Barriers shall be a minimum of 4ft high, and shall be constructed of continuous chain link fence with metal posts at 8ft spacing, or of 2x4 posts with three equally spaced 2x4 rails. Posts may be shifted to avoid roots. No materials shall be placed or disposed of within the TPZ. Natural grade shall be maintained within the TPZ. This tree should be monitored on a periodic basis for health and structural integrity.

Common Name -Royal Palm

Scientific Name -Roystonea regia

## DBH (in) - 18.5 Height (ft) - 50 Canopy Spread (ft) - 20

Condition - Native? -Good Yes

Disposition -Remove

Tree #10 is a Royal Palm located at the front of the property. It is in good condition with a full, healthy green canopy. Some trunk pencilling is occurring. This tree has not been incorporated into the landscape plan and will therefore be removed.

Tree #11

Common Name -Royal Palm

Scientific Name -Roystonea regia



DBH (in) - 17 Height (ft) - 50 Canopy Spread (ft) - 20



Condition -Good

Native? -Yes

Disposition -Remove

Tree #11 is a Royal Palm located at the front of the property. It is in good condition with a full, healthy green canopy. Some trunk pencilling is occurring. This tree has not been incorporated into the landscape plan and will therefore be removed.

Common Name -Thatch Palm

Scientific Name -Thrinax radiata DBH (in) - 4 Height (ft) - 25 Canopy Spread (ft) - 8 Condition - I Fair

Native? -Yes

Disposition -Remove

Tree #12 is a Thatch Palm located in the front southwest corner of the property. It is in fair condition and is competing with nearby vegetation. This tree has not been incorporated into the landscape plan and will therefore be removed.

Tree #13

Common Name -Thatch Palm

Scientific Name -Thrinax radiata



DBH (in) - 3 Height (ft) - 12 Canopy Spread (ft) - 8 Condition -Native? -FairYes

Disposition -Remove

Tree #13 is a Thatch Palm located in the front southwest corner of the property. It is in fair condition and is competing with nearby vegetation. This tree has not been incorporated into the landscape plan and will therefore be removed.

Common Name -Chinese Fan Palm

Scientific Name -Livistona chinensis DBH (in) - 12 Height (ft) - 20 Canopy Spread (ft) - 12 Condition -Native? -FairNo

Disposition -Remove

Tree #14 is a Chinese Fan Palm located in the front southwest corner of the property. It is in fair condition and is competing with nearby vegetation. This tree has not been incorporated into the landscape plan and will therefore be removed.

Tree #15

Common Name -Chinese Fan Palm (double)

Scientific Name -Livistona chinensis



DBH (in) - 10, 10 Height (ft) - 30 Canopy Spread (ft) - 15 Condition - Native? -Good No

Disposition -Remove

Tree #15 is a double Chinese Fan Palm located in the front southwest corner of the property. It is in good condition with a dense, green canopy.

This tree has not been incorporated into the landscape plan and will therefore be removed.

**Common Name -**Pygmy Date Palm (double)

Scientific Name -Phoenix roebelenii DBH (in) - 4, 5 Height (ft) - 10 Canopy Spread (ft) - 6

**DBH (in) -** 4, 5

Height (ft) - 10

Canopy Spread (ft) - 6

Condition - N Fair

Native? -

Disposition -Remove

Tree #16 is a double Pygmy Date Palm located in the front southwest corner of the property. It is in fair condition with a canopy on the thinner side and lower dead fronds are present.

This tree has not been incorporated into the landscape plan and will therefore be removed.

Tree #17

**Common Name -**Pygmy Date Palm (double)

Scientific Name -Phoenix roebelenii



**Condition - Native? -**Fair No

> Disposition -Remove

Tree #17 is a double Pygmy Date Palm located in the front southwest corner of the property. It is in fair condition with a canopy on the thinner side and lower dead fronds are present.

This tree has not been incorporated into the landscape plan and will therefore be removed.

Common Name -Mango

Scientific Name -Mangifera indica DBH (in) - 12.5 Height (ft) - 25 Canopy Spread (ft) - 20 Condition - I Dead

Native? -

Disposition -Remove

Tree #18 is a Mango located towards the front southern side of the property. It is dead and will need to be removed.



Common Name -Montgomery Palm

Scientific Name -Veitchia arecina



DBH (in) - 8 Height (ft) - 30 Canopy Spread (ft) - 10 Condition - Native? -Good No

Disposition -Remove

Tree #19 is a Montgomery Palm located on the front southern side of the property. It is in good condition with a healthy, green canopy.

This tree has not been incorporated into the landscape plan and will therefore be removed.

Common Name -

Montgomery Palm

Scientific Name -Veitchia arecina DBH (in) - 8 Height (ft) - 25 Canopy Spread (ft) - 10

Condition -Good

Native? -

Disposition -Remove

Tree #20 is a Montgomery Palm located on the front southern side of the property. It is in good condition with a healthy, green canopy.

This tree has not been incorporated into the landscape plan and will therefore be removed.



Common Name -Travelers Palm

**Scientific Name -***Ravenala madagascariensis* 



DBH (in) - cluster Height (ft) - 30 Canopy Spread (ft) - 30



Disposition -Remove

Trees #21 - 33 is a large Travelers Palm cluster located on the south side of the front yard. It is in fair condition with some tattered fronds and lower dead fronds. This tree has not been incorporated into the landscape plan and will therefore be removed.

Common Name -Montgomery Palm

Scientific Name -Veitchia arecina DBH (in) - 7 Height (ft) - 30 Canopy Spread (ft) - 12 Condition - I Good

Native? -No

Disposition -Remove

Tree #34 is a Montgomery Palm located on the south side of the front yard. It is in good condition with a healthy, green canopy.

This tree has not been incorporated into the landscape plan and will therefore be removed.



Common Name -Cabada Palm

Scientific Name -Dypsis cabadae



<b>DBH (in) -</b> cluster	
Height (ft) - 20	
Canopy Spread (ft) - 15	

Condition -	Native? -
Good	No

#### Disposition -Remove

Tree #35 is a Cabada Palm cluster located at the front of the existing house. It is in good condition with some yellowing of the foliage.

Common Name -Princess Palm

Scientific Name -Dictyosperma album DBH (in) - 7 Height (ft) - 30 Canopy Spread (ft) - 15

Condition - Na Good No

Native? -No

Disposition -Remove

Tree #36 is a Princess Palm located at the front of the existing house. It is in good condition with a healthy, green canopy.

This tree has not been incorporated into the landscape plan and will therefore be removed.



**Common Name -**White Bird-of-Paradise

Scientific Name -Strelitzia nicolai



DBH (in) - cluster Height (ft) - 25 Canopy Spread (ft) - 15



Disposition -Remove

Trees #37 - 38 is a White Bird-of-Paradise cluster located at the front of the existing house. It is in fair condition with some tattered fronds and lower dead fronds. This plant has not been incorporated into the landscape plan and will therefore be removed.

Common Name -Areca Palm

Scientific Name -Dypsis lutescens DBH (in) - cluster Height (ft) - 25 Canopy Spread (ft) - 10 Condition - I Poor

Native? -

Disposition -Remove

Tree #39 is an Areca Palm cluster located at the front of the house. It is in poor condition - the canopy is thin and the foliage is necrotic and chlorotic.

This tree has not been incorporated into the landscape plan and will therefore be removed.



Tree #40

Common Name -Sylvester Palm

Scientific Name -Phoenix sylvestris



DBH (in) - N/A Height (ft) - 10 Canopy Spread (ft) - 15



Condition -	Native?
Good	No

#### Disposition -Remove

Tree #40 is a small Sylvester Palm located in the front driveway circle. It is in good condition with healthy, green foliage. It is small and no trunk has formed yet. This tree has not been incorporated into the landscape plan and will therefore be removed.

#### Trees #41 - 45

Common Name -Royal Palms (5)

Scientific Name -Roystonea regia DBH (in) - 16.5, 12.5, 8, 5, 17 Height (ft) - 20 - 50 Canopy Spread (ft) - 12 - 18

Condition -Good Native? -Yes

#### Disposition -Remove

Trees #41 - 45 are five Royal Palms located on the north side of the existing house. Overall, they are in good condition with full, green canopies and no major trunk injuries observed.

This tree has not been incorporated into the landscape plan and will therefore be removed.

Tree #46

Common Name -Royal Palm

Scientific Name -Roystonea regia DBH (in) - 16 Height (ft) - 25 Canopy Spread (ft) - 15

Condition - Native? -Good Yes

#### Disposition -Remove

Tree #46 is a Royal Palm located on the north side of the existing house. It is in good condition with a full, green canopy and no major trunk injuries observed. This tree has not been incorporated into the landscape plan and will therefore be removed.



Common Name -Royal Palm (double)

Scientific Name -Roystonea regia DBH (in) - 7, 14 Height (ft) - 20 Canopy Spread (ft) - 15 Condition - N Good

Native? -Yes

Disposition -Remove

Tree #47 is a double Royal Palm located on the north side of the existing house. It is in good condition with a healthy green canopy and no major trunk injuries observed.

This tree has not been incorporated into the landscape plan and will therefore be removed.

Tree #48

Common Name -Royal Palm

Scientific Name -Roystonea regia



DBH (in) - 7.5 Height (ft) - 20 Canopy Spread (ft) - 12

Condition -	Native? -
Good	Yes

Disposition -Remove

Tree #48 is a Royal Palm located on the north side of the existing house. It is in good condition with a healthy green canopy and no major trunk injuries observed. This tree has not been incorporated into the landscape plan and will therefore be removed.

#### Tree #49 - 51

**Common Name -Royal Palm** 

Scientific Name -Roystonea regia

DBH (in) - 13.5, 11.5, 5.5, 14, 14 Height (ft) - 20 - 25 Canopy Spread (ft) - 15

**Condition** -Good

Native? -Yes

#### **Disposition** -Remove

Trees #49 - 51 are three Royal Palms located on the north side of the existing house. Trees #49 and #51 are double-trunked. These trees are in good condition with healthy green canopies and no major trunk injuries observed.

This tree has not been incorporated into the landscape plan and will therefore be removed.



**Common Name -**Dracaena

Scientific Name -Dracaena spp.



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DBH (in) - 2, 4, 4 Height (ft) - 20 Canopy Spread (ft) - 12



<b>Condition</b> -	Native? -
Poor	No

#### **Disposition** -Remove

Tree #52 is a Dracaena located on the north side of the existing house. This plant is in poor condition with chlorotic foliage.

#### Trees #53 - 55

Common Name -Christmas Palms (3)

Scientific Name -Adonidia merrillii DBH (in) - 5, 5, 5, 6 Height (ft) - 30 Canopy Spread (ft) - 10 Condition -Good Native? -

Disposition -Remove

Trees #53 - 55 are three Christmas Palms located to the north of the existing house. Tree #55 is double-trunked. These trees are in good condition with full, green canopies.

This tree has not been incorporated into the landscape plan and will therefore be removed.

Tree #56

Common Name -Pygmy Date Palm (4)

Scientific Name -Phoenix roebelenii



DBH (in) - 4, 5, 5, 4 Height (ft) - 15 Canopy Spread (ft) - 15 Condition - Native? -Good No

Disposition -Remove

Tree #56 is a cluster of four Pygmy Date Palms located on the north side of the existing house. These trees are in good condition with some lower dead fronds. This tree has not been incorporated into the landscape plan and will therefore be removed.

Common Name -Christmas Palm

Scientific Name -Adonidia merrillii DBH (in) - 6 Height (ft) - 30 Canopy Spread (ft) - 10 Condition -Fair Native? -

**Disposition -**Remove

Tree #57 is a Christmas Palm located on the north side of the backyard. It is in fair condition with some chlorosis. This tree has not been incorporated into the landscape plan and will therefore be removed.



Common Name -Christmas Palm

Scientific Name -Adonidia merrillii



DBH (in) - 5 Height (ft) - 15 Canopy Spread (ft) - 8

Condition -	Native? -
Fair	No

Disposition -Remove

Tree #58 is a Christmas Palm located on the north side of the backyard. It is in fair condition with some chlorosis. This tree has not been incorporated into the landscape plan and will therefore be removed.

Common Name -Alexander Palm

**Scientific Name -***Ptychosperma elegans*  DBH (in) - 3 Height (ft) - 15 Canopy Spread (ft) - 8

Condition -Fair Native? -

Disposition -Remove

Tree #59 is an Alexander Palm located on the north side of the backyard. It is in fair condition with some chlorosis. This tree has not been incorporated into the landscape plan and will therefore be removed.

Tree #60

Common Name -Royal Palm

Scientific Name -Roystonea regia



DBH (in) - 19 Height (ft) - 30 Canopy Spread (ft) - 20 Condition - Native? -Good Yes

Disposition -Remove

Tree #60 is a Royal Palm located at the rear of the backyard. It is in good condition with a full, green canopy and no trunk injuries observed. Some of the foliage is slightly frizzled.

Common Name -Royal Palm

Scientific Name -Roystonea regia DBH (in) - 18.5 Height (ft) - 18 Canopy Spread (ft) - 0

Condition -Dead Native? -Yes

Disposition -Remove

Tree #61 is a dead Royal Palm located at the rear of the property. It is dead and will need to be removed.

Common Name -Royal Palm

Scientific Name -Roystonea regia



DBH (in) - 15.5 Height (ft) - 30 Canopy Spread (ft) - 20



Disposition -Remove

Tree #62 is a Royal Palm located at the rear of the property. It is in fair condition with a trunk that is pencilling and a canopy on the smaller side that has some foliage that is chlorotic and frizzled.

Common Name -Coconut Palm

Scientific Name -Cocos nucifera DBH (in) - 8 Height (ft) - 25 Canopy Spread (ft) - 15 Condition -Fair

Native? -

**Disposition -**Remove

Tree #63 is a Coconut Palm located in the rear southeast corner of the property. It is in fair condition with yellowing on the foliage.

This tree has not been incorporated into the landscape plan and will therefore be removed.



Tree #64

Common Name -Coconut Palm

Scientific Name -Cocos nucifera



DBH (in) - 8 Height (ft) - 35 Canopy Spread (ft) - 15



Condition - Native? -Good No

Disposition -Remove

Tree #64 is a Coconut Palm located in the rear southeast corner of the property. It is in good condition with a healthy, green canopy.

**Common Name -**Coconut Palm

Scientific Name -Cocos nucifera

DBH (in) - 8 Height (ft) - 35 Canopy Spread (ft) - 15

**Condition** -Native? -Good

No

**Disposition** -Remove

Tree #65 is a Coconut Palm located in the rear southeast corner of the property. It is in good condition with a healthy, green canopy.

This tree has not been incorporated into the landscape plan and will therefore be removed.



Tree #66

**Common Name -**Coconut Palm

Scientific Name -Cocos nucifera



DBH (in) - 8 Height (ft) - 30 Canopy Spread (ft) - 15 **Condition** -Native? -Good No

**Disposition** -Remove

Tree #66 is a Coconut Palm located in the rear southeast corner of the property. It is in good condition with a healthy, green canopy.

### Trees #67 - 73

Common Name -Montgomery Palms (7)

Scientific Name -Veitchia arecina DBH (in) - 6, 6, 6, 8, 8, 6, 6 Height (ft) - 35 Canopy Spread (ft) - 15

(ft) - 15

Condition -Good Native? -

Disposition -Remove

Trees #67 - 73 are seven Montgomery Palms located in the rear, southeast corner of the property. Overall, they are in good condition with healthy, green foliage. These trees have not been incorporated into the landscape plan and will therefore be removed.

Tree #74

Common Name -Royal Palm

Scientific Name -Roystonea regia



DBH (in) - 15 Height (ft) - 28 Canopy Spread (ft) - 16

Condition -	Native? -
Good	Yes

**Disposition -**Remove / Remain - 10ft radius TPZ

Tree #74 is a Royal Palm located in the front southwest corner of the property. Overhead wires are above. This tree is in good condition with a healthy, green canopy and no major trunk injuries observed.

If this tree is to remain, protective barriers shall be placed 10ft from the tree trunk. Barriers shall be installed prior to the start of construction and demolition, and shall remain in place until development is completed and until the department authorizes their removal. Barriers shall be a minimum of 4ft high, and shall be constructed of continuous chain link fence with metal posts at 8ft spacing, or of 2x4 posts with three equally spaced 2x4 rails. Posts may be shifted to avoid roots. No materials shall be placed or disposed of within the TPZ. Natural grade shall be maintained within the TPZ.

### Trees #75 - 77

Common Name -Christmas Palms (3)

Scientific Name -Adonidia merrillii DBH (in) - 6, 6, 6 Height (ft) - 16 Canopy Spread (ft) - 8 Condition -NFairN

Native? -

**Disposition -**Remove

Trees #75 - 77 are three Christmas Palms located to the north of the existing house. They are in fair condition with yellow spotting on the foliage. These trees have not been incorporated into the landscape plan and will therefore be removed.



## Notes - TPZ Calculations & Tree and Palm Relocation

#### Tree Protection Zone (TPZ) -

- For trees that are to remain, protective barriers shall be placed at the dripline or 10ft from the trunk, whichever is greater.

#### Tree and Palm Relocation Notes -

1. All phases of transplanting trees and palms to be performed or supervised by Certified Arborist.

2. Trees to be relocated shall be root pruned six to eight weeks prior to transplanting. Landscape Contractor shall maintain transplanted material during construction period by watering, moving, spraying, fertilizing, and pruning.

3. Landscape Contractor is responsible for verifying locations of all underground and overhead utilities and easements prior to commencing work. All utility companies and/or the General Contractor shall be notified to verify locations prior to digging. Utility trenching is to be coordinated with the Landscape Contractor prior to beginning of project. The Owner and Certified Arborist shall not be responsible for damage to utility or irrigation lines.

4. The Landscape Contractor shall comply with all local and state codes and shall be responsible for obtaining all applicable permits.

5. The Landscape Contractor shall regularly inspect the relocated material to ensure compliance with standard horticultural practices.

6. The Landscape Contractor is responsible for guaranteeing the transplanted trees and palms for a period of one year. At the time of the final inspection all transplanted trees and palms that are not in viable condition shall be replaced by the Landscape Contractor.

7. The Landscape Contractor shall take all precautions to minimize shock of root pruning and transplanting in accordance with standard arboriculture practices.

8. The diameter of the root ball to be transplanted shall follow the guidelines set forth in the latest edition of the Florida Grades and Standards for Nursery Plants.

9. Roots shall be cleanly cut with a sharp spade, hand saw, chainsaw, or other approved root-pruning equipment.

10. Trees shall not be pruned at transplanting to compensate for root loss. Any pruning required shall be as per the ANSI A300 Standards.

11. For all palms except Sabal palmetto, only dead fronds shall be removed. Sabal palmetto shall have all fronds cut without damaging the bud. Fronds shall be securely tied around the bud prior to relocation and shall be untied after placement in the new planting hole. The bud shall be protected from damage or injury during relocation.

12. After root pruning trees, backfill roots to original existing grade with existing soil free of any deleterious material to root growth.

13. Provide a layer of 3" mulch over backfill area to prevent weed growth, conserve moisture and prevent evaporation. Keep mulch 6" away from the trunk.

14. Provide tree protection as per Landscape Architect's Tree Protection Detail to ensure that the tree or root system is not damaged during the root-pruning period.

15. After root pruning and prior to relocation, tree(s) shall be watered a minimum of twice weekly.

16. Transplanting shall occur within 24 hours after being dug for relocation. The root ball shall be kept moist.

17. Digging and preparation of the new hole for the transplant shall be done prior to removing the tree from the existing location.

18. The depth of the new hole shall be equal to the depth of the root ball and the width shall be equal to two to three times the width of the root ball.

19. Trees and palms shall be lifted from the ground with heavy equipment designed specifically for tree relocation so that the trunk and crown is not impacted and damaged by the equipment.

20. The slings used to lift the trees and large palms shall be non-binding nylon slings that are wrapped under the root ball to support the weight of tree or palm. Slings shall not be solely wrapped around the trunk of the tree. Padding the sling may be necessary so that the trunk is not damaged.

## Notes - Tree and Palm Relocation (Contd.)

21. Trees and palms shall be planted so that the top of the rootball is flush with the existing grade. Ensure that deep planting does not occur. The tree and palm shall be centrally positioned in the planting hole and set straight, plumb or normal to the growth pattern prior to transplanting.

22. Transplanted trees and palms shall be backfield with a uniform mix of 25% fully decomposed compost and 75% existing site soil cleaned free of weeds and rocks.

23. Trees and palms shall be watered to eliminate air pockets in the backfill mix prior to mulching.

24. A 4" soil berm shall be created around the edge of the planting hole to hold water, or as per the Landscape Architect's Planting Details.

25. Install tree and palm bracing as per the Landscape Architect's Planting Details, to ensure stability of trees and palms. 26. After transplanting trees and palms, the Landscape Contractor shall be responsible for watering to maintain soil moisture during the guarantee period. The following schedule is suggested: First month - Daily; Second month - 3 times per week; Third and Fourth month - 2 times per week; Last Eight months - 1 time per week. For trees over 4" in caliper at the time of planting, the suggested schedule is: First 6 weeks - Daily; from 1.5 months to 6 months - 3 times per week, last 6 months - 1 time per week.

## Notes - Tree and Palm Protection

1. Fences shall be erected to protect trees and palms to be preserved. Fences define a specific protection zone for each tree or group of trees. Fences shall be installed prior to the beginning of construction and are to remain until all site work has been completed. Fences may not be relocated or removed without the written permission of the Arborist. Refer to the Landscape Architect's Tree Protection Detail.

2. Construction trailers, traffic, and storage areas must remain outside fenced areas at all times.

3. All underground utilities and drain or irrigation lines shall be routed outside the tree protection zone. If lines must traverse the protection area, disturbance shall be minimized by using techniques such as tunneling or boring.

4. No materials, equipment, spoil, or waste or washout water may be deposited, stored, or parked within the tree protection zone.

5. Additional tree pruning required for clearance during construction must be approved by the Certified Arborist and shall be performed by trained arborists, not by construction personnel.

6. If injury should occur to any tree during construction, it should be evaluated as soon as possible by the Landscape Contractor and the Certified Arborist should be notified immediately.

7. Any grading, construction, demolition, or other work that is expected to encounter tree roots must be monitored by the Landscape Contractor.

8. All trees shall be irrigated at least two times a week. Each irrigation session shall wet the soil within the tree protection zone to a depth of 30 inches.

9. Before grading, pad preparation, or excavation for foundations, footings, walls, or trenching near trees the trees shall be root pruned at the edge of the tree protection zone by cutting all roots cleanly to a depth of 36 inches. Roots shall be cut manually by digging a trench and cutting exposed roots with a saw, vibrating knife, rock saw, narrow trencher with sharp blades, or other approved root-pruning equipment.

10. Any roots damaged during grading or construction shall be exposed to sound tissue and cut cleanly with a saw.

11. Spoil from trenches, basements, or other excavations shall not be placed within the tree protection zone, either temporarily or permanently.

12. No burn piles or debris pits shall be placed within the tree protection zone. No ashes, debris, or garbage may be dumped or buried within the tree protection zone.

13. Maintain fire-safe areas around the fences. Also, no heat sources, flames, ignition sources, or smoking is allowed near mulch or trees.

14. Protective barriers shall be placed around each tree, cluster of trees, or the edge of the preservation area at the specified distance. Protective barriers shall be a minimum of four feet above ground level and shall be constructed of wood, plastic, or metal, and shall remain in place until development is completed. Protective barriers shall be in place prior to the start of any construction.

15. Understory plants within protective barriers shall be protected.

16. No excess oil, fill, equipment, building materials or building debris shall be placed within the areas surrounded by protective barriers, nor shall there be disposal of any waste material such as paints, oils, solvents, asphalt, concrete, mortar or any other material harmful to trees or understory plants within the areas surrounded by protective barriers.

17. Trees shall not be braced in such a fashion as to scar, penetrate, perforate or otherwise inflict damage to the tree. 18. Natural grade shall be maintained within protective barriers. In the event that the natural grade of the site is changed as a result of site development such that the safety of the tree may be endangered, tree wells or retaining walls are required.

19. Fences and walls shall be constructed to avoid disturbance to any protected tree. Post holes and trenches located close to trees shall be dug by hand and adjusted as necessary, using techniques such as discontinuous footings, to avoid damage to major roots.

Note: Trees inherently pose a certain degree of hazard and risk from breakage, failure or other causes and conditions. Recommendations that are made are intended to minimize or reduce such hazardous conditions. However, there can be no guarantee or warranty that efforts to discover or correct unsafe conditions will prevent future breakage or failure, nor can there be any guarantee that all hazardous conditions have been detected. The client should not infer that a tree is safe either because services have been recommended or done to reduce risk, or because no services have been recommended or done on a specific tree. The client assumes any and all risks associated with pursuing consultant's advice and fully understands that he or she is engaged in securing professional consultation regarding the above-mentioned property.