

February 9, 2022

Mr. Chris Lagerbloom, City Manager

The following documents have been prepared by the Advisory Group as part of our nearly two (2) year effort to improve the Landscape and Tree Preservation Ordinance ULDR 47-21. Much progress has been made, especially after the P & Z Board recognized more input was needed from outside of the City Staff and licensed Landscape Architects were hired to assist the City Staff with drafting the Ordinance. These efforts are commendable but still flawed as these ongoing internal meeting between City Staff and the hired LA consultants did not include the Advisory Group or other decision makers, Legal and Sustainability Departments, within the City concurrently.

The first document or “Letter to the City Commission” outlines only a few of the areas that still require review and discussion to reach consensus and not all the areas that need review. The second documents is a “Graphic Presentation” of just a few of issues that are more easily explained with pictures, specifically pertinent to Fort Lauderdale.

We understand the need and pressure to revise the Tree Protection Section of the Ordinance, as almost 95% of the stakeholders expressed the need for this change, due to the loss of the City’s tree canopy. All-be-it, the fill requirements on new construction, due to sea level rise, and the recently passed “State Statute 163.045, Tree Pruning, Trimming or Removal on Residential Properties” allowing a homeowner to get a letter to exempt them from City tree removal requirements. Both of which are having the most impact on the loss of the City’s tree canopy.

We have provided three (3) options for the Commission to consider, all better than approving the Ordinance as it stands today, for improving, increasing, and protecting the City’s Tree Canopy. However, knowing the importance of revising the Tree Canopy Trust Fund (TCTF), increasing mitigation cost and creating an Urban Forestry Master Plan, we favor Option 3 with minor edits per our items, 7, 8, 9, and 10. This allows the process to move forward while the balance of the Ordinance is addressed.

Thanks for your consideration.

On behalf of the Advisory Group

cc. Mayor Trantalis
Vice Mayor Moraitis
Commissioner, Glassman
Commissioner, McKinzie
Commissioner, Sorensen

February 9, 2022

**Greetings: Mayor Dean J. Trantalis
Vice Mayor Heather Moraitis
Commissioners: Steven Glassman, Robert L. McKinzie, Ben Sorensen, and City
Manager, Chris Lagerbloom**

The revised Tree Preservation and Landscape Sections of the City's Ordinance that is before you for a vote, is not complete, nor are all the revisions meeting current Green Industry Standards and Best Management Practices. Our Advisory Group has provided professional review and assistance to City staff, and to the contracted Landscape Architects from CGA who assisted with the most recent round of revisions, throughout the revision process that has occurred so far. We ask you not to approve these revisions as written and presented by staff. They are not complete and some may still not meet concurrency with Broward County Ordinance, nor be enforceable in practice considering current Industry Standards.

The decision to contract for design professionals, being Registered Landscape Architects from CGA, was useful as part of this revision process, given that currently no City staff are design professionals with experience planning, designing, drawing, and managing landscape projects. We participated in the revisions that were edited and/or added with the consultants, and agree with them in their statement to the Planning and Zoning Board that these revisions do not contain what was requested by the public stakeholder groups or all their own submitted revisions and recommendations.

Please consider the following Ordinance Sections that we have summarized for revisions that need to be further reviewed and changed prior to the Commission approving them. Our concerns and professional advice being provided as volunteers is focused on updating and upgrading these Ordinance Sections to better preserve tree canopy, meet the goals of sustainable and resilient properties facing climate change and other environmental challenges, and to be using current Green Industry Standards and BMPs in both language and practices.

The following list are some of the more important revisions that our Advisory Group want to have edited, per the advice and reasons stated for each. We have provided the current draft **Ordinance** in **red**, with our edits stated in **green** and green underlined to be deleted. Our reasons and justifications ARE STATED IN ALL CAPS AND UNDERLINED. We are also providing, as an addendum to this letter, additional back-up explanations with some example photographs of landscapes in Fort Lauderdale to illustrate how landscape would be negatively changed without making the edits we are providing. Additional back-up items noted with asterisks (***)

1. **Page 32. Sec. 47-21.8. G.** *add seven (7) words*

~~G.E.~~ Fifty percent (50%) of all plants, ~~vegetation,~~ excluding living lawn/turf or sod ~~all turfgrass,~~ required to be installed ~~planted~~ by this section shall be either ~~vegetation~~ native and/or naturalized vegetation to Florida or consistent with Florida-Friendly Landscaping principles that will thrive in South Florida.

COMMISSION- HAVING A MINIMUM PERCENTAGE OF ALL LANDSCAPE PLANTS OF ALL SIZE CATEGORIES TO BE NATIVE SPECIES LIMITS DESIGN PROFESSIONALS FROM APPLYING A MORE VARIED PLANT PALETTE TO DEVELOPMENT PROJECTS. AS AN ALTERATE, CONSIDER "ALL PLANTS EXISTING OR ADDED TO PLAN LANDSCAPE AREAS SHALL BE SPECIES CONSIDERED NATIVE OR NATURALIZED IN SOUTH FLORIDA. NO SPECIES THAT IS LISTED AS CATEGORY 1 INVASIVE PER THE FLORIDA EXOTIC PEST PLANT COUNCIL SHALL BE ALLOWED. USE OF ONLY NATIVE, NATURALIZED AND OR EXOTIC SPECIES THAT MEET FLORIDA-FRIENDLY LANDSCAPE PRINCIPLES AND GROW IN SOUTH FLORIDA CLIMATE ZONES SHALL BE PERMITTED.(***)

2. Page 33. Sec. 47-21.8. J. add two (2) words

J. ~~Palms if palms are used, they shall constitute no more than twenty percent (20%) of the total tree requirements for any provision herein and shall have a minimum of eight (8) six (6) feet of clear trunk/gray wood at installation when installed, except Coc cothrinax, Thrinax, Leucothrinax spp., and Phoenix roebellini palms which shall have a minimum of three (3) feet of wood when planted. Palms listed as Large Palms in the City's Tree Classification List can count as one (1) large, required tree towards meeting tree requirements for any provision herein. Palms listed as Small Palms in the City's Tree Classification List may be grouped together such that three (3) Small Palms shall count for one (1) large, required tree towards meeting tree requirements for any provision herein.~~

COMMISSION- WE HAVE ADDED SOME CLARIFICATION FOR THE SIZE CATEGORIES THAT A LARGE OR SMALL PALM CAN COUNT TOWARDS CANOPY ZONING AND REPLACEMENT REQUIREMENTS.

2a. Page 34. Sec.47-21.8.0. discourage use of structural soil, except in the RAC

O. ~~Tree root barriers shall be installed at the sidewalk edge in those circumstances where the tree roots are causing, or may potentially cause, a trip hazard because of lifting of some portions of a public sidewalk. Where Large or Medium Trees are to be planted within six (6) feet of any proposed sidewalk, hardscape, or utility, then a modular SD suspended pavement system shall be installed (in conjunction with root barriers when adjacent to utilities, if needed) under the paved area which has a H-20 or HS-20 loading grating in accordance from the AASHTO Standard Specifications for Highway Bridges. A sub-grade soil medium (or structural soil) may be installed to connect open soil space areas (such as underneath a sidewalk connecting a swale and turf area to allow for future tree root growth) or in locations where use of a suspended soil system is not feasible, such as when a high water table is present. Cost considerations shall not be considered a sufficient sole reason for use of structural soils, to apply only in the RAC.~~

COMMISSION- THIS SECTION REQUIRES THE INSTALLATION OF A SUB-GRADE SOIL MEDIUM/OR A MODULAR SUSPENDED PAVEMENT SYSTEMS. THE USE OF STRUCTURAL SOIL SHOULD BE DISCOURAGED IN ALL ZONING DISTRICTS OTHER THAN IN THE RAC WHERE BUILDING SETBACKS CANNOT PROVIDE APPROPRIATE AREA FOR TREE INSTALLATION.(***)

3. **Page 40. Sec. 47-21.9.L. 1. 2. and 3.** delete minimum soil volume requirements from the Ordinance NOTE: These changes also occur on Page 65 and 66, Sec. 47-21.14. A. 1. c. i., ii., iii and replace with Broward County standard for cut out size

L. Minimum soil volume requirements for trees shall be:

1. Twelve-hundred cubic feet (1200 ft3) with a minimum of three feet (3') depth from the grade for tree species listed as Large Trees in the City's Tree Classification List.
2. Six hundred cubic feet (600 ft3) with a minimum of three feet (3') depth from the grade for tree species listed as Medium Trees in the City's Tree Classification List.
3. Three hundred cubic feet (300 ft3) with a minimum depth of three feet (3') from the grade for tree species listed as Small Tree in the City's Tree Classification List.

Broward County Code of Ordinance Article VIII Landscaping for protection of water quality and quantity. Sec 39-87 Minimum landscape requirements for Multifamily and nonresidential uses. (10) Parking island size shall meet the soil volume necessary for the tree species selected to be planted in said island. The following sized islands shall serve as a guide for the selected trees or palms:

1. 135 square foot island size (9' x 15') for small trees or palms;
2. 225 square foot island size (15' x 15') for medium trees or palms;
3. 324 square foot island size (18' x 18') for large trees or palms;
4. 378 square foot island size (21' x 18') for large trees or groups of trees or palms; and
5. 486 square foot island size (27' x 18') or larger for larger groups of trees or palms.

COMMISSION- WE DO NOT AGREE WITH USING SOIL VOLUME AS AN ALTERNATE TO SOIL SURFACE AREA (WIDTH AND LENGTH OF LANDSCAPE AREAS). IT IS INDUSTRY RESEARCH HAS PROVEN THAT PLANT ROOTS, INCLUDING TREES, ARE MAINLY WITHIN THE TOP 6" to 18" OF SOIL DEPTH. SOIL AREA IS THE USUAL MEASUREMENT USED TO DETERMINE WHAT SIZE CATEGORY OF TREE OR PLANT CAN BE CONTAINED (AND SUSTAINED) IN A LANDSCAPE AREA. WE REQUEST CITY STAFF TO FOLLOW THE BROWARD COUNTY CODE SECTION FOR MINIMUM PLANTING SPACE AS STATED ABOVE.(***)

4. **Page 42. Sec. 47-21. 9. Q. 2. and 3.** delete seven (7) words, not located in the front yard area

Q. Synthetic turf shall comply with all the following design standards and shall:

2. Be of a type known as “cut pile with infill” with pile fibers of a minimum height of 1.75 inches and a maximum height of 2.5 inches. Synthetic turf installed solely for the purpose of a putting green and not located in the front yard area shall be exempt from this requirement.

3. Have a minimum face weight of 75 ounces per square yard. Synthetic turf installed solely for the purpose of a putting green and not located in the front yard area shall be exempt from this requirement.

COMMISSION- SYNTHETIC TURF SHOULD BE ENCOURAGED IN LOCATIONS WHERE EXPECTED SHADE OR OTHER SITE ENVIRONMENTAL CONDITIONS WOULD NOT SUPPORT LIVE TURFGRASS SPECIES. REQUIRING THE SPECIFICATIONS OF SYNTHETIC TURF TO MIMIC THE HEIGHT RANGES OF MOWED TURFGRASS LAWNS IS COMMENDABLE AS WELL AS ALLOWING RESIDENTS TO INSTALL SYNTHETIC TURF PUTTING GREENS, BUT TO EXCLUDE THEM FROM A FRONT YARD.

5. **Page 59. Sec. 47-21.13. B.10. i.** *Delete “shall constitute no more than twenty percent (20%) of the total trees provided and”*

i. Large and Small palm species shall constitute no more than twenty percent (20%) of the total trees provided and must have a minimum of eight (8) feet of clear trunk at installation.

COMMISSION- REPLACING TREES REMOVED AND PLANTING A MINIMUM NUMBER OF CODE REQUIRED TREES IN DEVELOPMENT PROJECTS DOES ASSIST WITH MAINTAINING AND INCREASING THE TREE CANOPY COVERAGE IN FORT LAUDERDALE. NOT EVERY SITE HAS GREENSPACE OR LANDSCAPE AREAS LARGE ENOUGH TO CONTAIN LARGE GROWING CANOPY TREES. DELETE THE PERCENTAGE LIMIT IN THIS SECTION.

THE USE OF PALMS FOR CANOPY TREE PLANTING SHALL BE SECONDARY TO CANOPY TREE CHOICES, BASED ON ANALYSIS FOR AVAILABLE CANOPY AND ROOT GROWTH AREAS NOT MEETING REQUIREMENTS FOR CANOPY TREE SIZE CATEGORIES.

5a. **Page 56. Sec. 47-21.13. B.1. a. i and ii.** Do not change existing code for Net Lot Area (NLA), Vehicular Use Area (VUA) and Street Trees

A. Landscape requirements.

1. ~~Yards and other~~ Portions of a parcel of land not utilized for structures, required walks, vehicular use area including VUA required landscaping, decking, pool, and other impervious areas, ~~shall be covered with a lawn or ground cover and~~ shall comply with the following:

a. For other than a single family dwelling as defined in Section 47-35:

i. One (1) tree is required for each one thousand (1,000) square feet of net lot area or portion thereof. This tree planting requirement is in addition to the VUA landscaping requirements; and

- ii. Fifty percent (50%) of the trees shall be Large Trees, twenty-five percent (25%) and Medium trees, and twenty-five percent 25% fifty percent 50% a combination of Small Trees, Large or Small Palms, flowering trees, and fruit trees. A group of three(3) individual Small Palms, planted a minimum of three (3) feet and a maximum of six (6) feet apart, may equal one (1) required tree. Clustering, or multi-stem species of palms, may be considered as counting towards one(1) required tree, as determined by the Department.

COMMISSION- THE CODE AS PROPOSED INCREASES THE TREES REQUIRED IN THE NLA FROM 20% TO 75%. IT INCREASES THE REQUIRED LARGE AND MEDIUM TREES IN THE VUA AREAS FROM 50% TO 75% AND THE ALSO THE STREET TREES FROM 50% TO 75%. THESE INCREASES ARE PHYSICALLY UNREALISTIC, NOT GOOD FOR THE HEALTH OF THE VEGETATION AND THE NET EFFECT WILL NOT INCREASE THE TREE CANOPY. DO NOT MAKE CHANGES IN THESE PERCENTAGES IN ORDINANCE (***)

5b. Page 56. Sec.47-21.13.B.1.b.i. spacing between large, medium, and small trees has been added which was needed, but needs clarification to allow for understory and clustering and most single-family sites are over prescribed with trees per the proposed code

- iii. Four (4) trees are required and shall be installed such that: if an adequate area for tree (s) exist

- 1) Three (3) trees shall be in the front yard with one (1) being a Large or Medium Tree; and
- 2) One (1) tree shall be in the back yard; and
- 3) A group of three (3) individual Small Palms, planted a minimum of three (3) feet and a maximum of six (6) feet apart, may equal one (1) required tree. Clustering, or multi-stem, species of palms may be considered as counting towards one (1) required tree, as determined by the Department.

COMMISSION- THIS SECTION OF THE CODE, IS TOO RESTRICTIVE AND DOES NOT ALLOW FOR FLEXIBILITY IN THE DESIGN AND PLACEMENT OF VEGETATION. PLEASE REFER TO DETAILED BACK- UP IN ADDENDUM. DO NOT MAKE CHANGES TO THE NUMBER OF TREES REQUIRED (***)

6. Page 61. Sec. 47-21.13. B. 16. b. *Do not change the minimum percentage of required street tree (LARGE and or MEDIUM) from 50% to 75%*

- b. A minimum of seventy-five ~~fifty~~ percent (75) ~~(50%)~~ of the required street trees shall be ~~shade~~ trees listed as Large Trees or Medium Trees in the City's Tree Classification List, and the remaining twenty-five percent (25%), ~~fifty percent (50%)~~ of the required street trees may be ~~provided as flowering or palm trees~~ a combination of SmallTrees, flowering trees, fruiting trees, and/or Large palm species.

COMMISSION- MODIFYING THE PERCENTAGE REQUIREMENT FROM 50% TO 75% IS ANOTHER EXAMPLE OF REQUIREMENTS BEING INCREASED WHEN THE ACTUAL GREENSPACE, OR LANDSCAPE AREAS, REQUIRED IN ZONING CANNOT CONTAIN THESE TREE SIZE CATEGORIES IN MOST SITE PLANS AND LANDSCAPE PLANS. PLANTING LARGE SPECIES TREES WOULD REQUIRE REDUCING BUILDABLE AREAS OF LOTS/PARCELS, WHICH WOULD REQUIRE CHANGES TO ZONING, WHICH IS BEYOND THE REVISIONS CONTEMPLATED AT THIS TIME. THIS SECTION SHOULD REMAIN AT 50% FOR LARGE/MEDIUM TREES, AND SHOULD ALLOW FOR UP TO 50% TO BE PALMS OR SMALL SIZE TREES.

FRUIT TREES ARE NOT RECOMMENDED FOR STREET TREES, DUE TO LIABILITIES OF FRUIT DROP AS TRIP AND FALL HAZARDS, POTENTIAL FOR RESIDENTS AND/OR VISITORS TO ATTEMPT TO CLIMB AND PICK FRUIT ALONG STREET SIDES, AND GROWTH CHARACTERISTICS OF FRUIT TREES NEEDING MORE OFTEN CLEARANCE AND CANOPY PRUNING THAN OTHER SPECIES AVAILABLE. FRUIT TREES SHOULD BE PLANNED FOR AREAS DESIGNATED AS PUBLIC ORCHARDS OR URBAN FARMS, NOT AS STREET TREES. (***)

7. **Page 84. Sec. 47-21.15. G. 9. b. ii.** *Clarification, Add, NOTE: Updates to occur no more than once every five (5) years*

ii. Development, publishing, and updates for an Urban Forestry Master Plan to protect, preserve, and enhance the City's urban tree canopy. Cumulatively, the cost expenditures for this item shall not exceed fifteen percent (15%) of the Fund's balance in any given fiscal year. The cumulative expenditures from subsection i. and ii. shall not exceed 25% of the total fund balance in any fiscal year. NOTE: Updates to occur no more than once every five (5) years

COMMISSION- IF YOU ARE GOING TO ALLOW THE USE OF TREE CANOPY TRUST FUNDS FOR OTHER THAN PLANTING OF TREES, RESTRICTING THE PERCENT OF ANNUAL FUNDS FOR THOSE USES, AND HOW OFTEN MANAGEMENT OR MAINTENANCE PLANNING CAN BE PARTIALLY FUNDED THROUGH TCTF MONIES ARE NECESSARY. THESE FUNDS ARE OBTAINED VIA VALUING UNPLANTED REPLACEMENT TREES FOR DEVELOPMENT PROJECTS AND IS MEANT TO BE USED TO PLAN AND PLANT REPLACEMENT TREES IN LOCATIONS THAT ARE AVAILABLE ELSEWHERE WITHIN FORT LAUDERDALE ON A REGULAR BASIS.

8. **Page 85. Sec. 47-21.15. G. 10. d.** *Clarification Add, "community leaders" to include an Advisory Panel comprised of at least 5 members, no more than 7 members, which shall include local Registered Landscape Architects and ASCA Registered Consulting Arborists and SAF Certified Foresters*

d. provide goals using a blueprint for the engagement and purposeful action of community leaders, neighbors, and organizations to sustain the City's tree and palm canopy, including local Registered Landscape Architects and ASCA Registered Consulting Arborists and SAF Certified Foresters, and ...

COMMISSION, IF WE ARE GOING TO ADD AN URBAN FORESTRY MASTER PLAN, AS PART OF THE MANAGEMENT PLAN FOR THE CITY, WE NEED TO MAKE SURE IT IS OVERSEEN BY QUALIFIED PROFESSIONALS

9. Page 85. Sec 47-21.15. G. 10. e. *Clarification,*

e. provide a current record of resources being managed and its value [resources being trees that need to be inventoried and mapped for needed management data, not funded from the TCTF

COMMISSION- DURING OUR REVIEW SESSIONS IT WAS AGREED THAT A TREE INVENTORY IS BEST FUNDED DIRECTLY WITHIN DEPARTMENT OPERATIONS BUDGET, NOT FUNDED OUT OF THE TCTF. THIS CRITICAL TASK SHOULD BE PART OF DEPARTMENT OPERATIONS, BEING A USUAL AND CUSTOMARY TASK FOR MANAGING URBAN FOREST ASSETS IN MUNICIPALITIES. ASSET INVENTORIES SHOULD NOT BE CONSIDERED TASKS THAT ARE OUTSIDE OF OPERATIONAL BUDGETS.

10. Page 85. Sec. 47-21.15 G. 10. i. *Add new section (i) requiring tree credits to be part of Urban Forestry Master Plan (UFMP)*

i. A new section addressing Tree Credits for existing trees is to be included within the UFMP

COMMISSION- THROUGHOUT THE REVIEW PROCESS IT HAS BEEN STATED BY STAFF, THAT THEY DID NOT HAVE TIME TO DEVELOP A TREE CREDIT TABLE IN THESE REVISIONS BUT WOULD LOOK TO INCLUDE IT AS PART OF UPCOMING URBAN FOREST MASTER PLAN (UFMP) AT A LATER DATE. WE WANT TO ASSURE CREDITS FOR PRESERVING EXISTING TREES AND PALMS IN DEVELOPMENT PROJECTS IS INCLUDED IN THE FUTURE UFMP.

In conclusion, our request is for you to direct staff to revise the current draft Ordinance using the information and guidance we have provided. These are needed edits, at a minimum, to meet the public stakeholder's main concerns for loss of trees and tree canopy in Fort Lauderdale, and to meet the current Green Industry Standards and BMPs for Landscape Design, Landscape Installation, and Tree Preservation. We respectfully request you consider the following option (s):

(1) Approve the Ordinance with these 10 revisions as recommended:

(2) Refer the full Ordinance back to City staff for another round of additional review and revisions with public stakeholders:

(3) Approve only two (2) sections of the Ordinance, SECTION 2. (47-21.2) Definitions and SECTION 15. (47-21.14) Tree Preservation, and require edits per our Items 7, 8, 9, and 10 above. Direct staff to again review and revise the balance of the Tree Preservation and Landscape Ordinance within a set period of time, TBD, so the balance of the Ordinance can be properly reviewed outside of the COVID-19 protocols. Note: This allows

for the revisions to the Tree Canopy Trust Fund uses and increased mitigation fees to move forward.

Thank you for considering our professional advice and recommendations for improving and upgrading the regulations that govern trees and landscapes in our City of Fort Lauderdale. We continue to be available to the Commission and City staff for finishing these important revisions that will produce more climate change resilient, and more valuable, tree canopy and landscaping for residents, businesses, and visitors to Fort Lauderdale Florida. Note: This group has over 200 years of combined experience.

The Advisory Group,

Mr. Alex Fenech, RLA, ASLA, Practicing Landscape Architect for 11 years, graduate of Michigan State University BLA-2010, Vice President at EDSA, Immediate Past President for the Florida of the American Society of Landscape Architects.

Ms. Natalia Barranco, RLA, Practicing Landscape Architect for 15 years, graduate of University of Florida, BLA - 2006, business owner Barranco rla, inc.

Mr. John A. Harris, Landscape Economist, MS, MBA, BS, AAS: John is an Urban Forester and Consulting Arborist for over 35 years, graduate of SUNY College of Environmental Science and Forestry and Syracuse University, and is currently the President of Earth Advisors Inc, and Principal of Landscape Economics LLC.

Ms. Emily O'Mahoney, FASLA, RLA, LEED & AP, BD&C, Practicing Landscape Architect for 40 years, graduate of University of Florida, Fellow in the American Society of Landscape Architects, Class of 2017, partner in the firm 2GHO, Inc. Landscape Architects, Planners, Environmental Consultants (Jupiter Florida) and current President Elect of the American Society of Landscape Architects and its 15,000 members.

Mr. C. Douglas Coolman, FASLA, RLA, Practicing Landscape Architect for 53-years, graduate of Michigan State University, BLA -1968, Fellow in the American Society of Landscape Architects, Class of 2002, semi-retired from EDSA in 2010 after 42 years, and currently President of DKNR Trading Company LLC, Land Planners and Landscape Architects, and a current member of Broward Workshop and Vice-Chair of the Broward County Independent Surtax Oversight Board.

Mr. Fred Stresau, FASLA, RLA, Practicing Landscape Architect for 55 years, graduate of N.C. State School of Design, Fellow in the American Society of Landscape Architects, Class of 2013 retired owner/president Fredrich Stresau & Associates, and former member of City Boards for 56 years, including the Community Appearance Committee, Board of Adjustments, Utility Advisory Committee, Infrastructure Task Force. Awarded in 2009 the City of Fort Lauderdale Distinguished Citizen of the Year.

**GRAPHIC PRESENTATION
of the
LANDSCAPE & TREE PRESERVATION**

Prepared by THE ADVISORY GROUP

 **CITY OF FORT LAUDERDALE
UNIFIED LAND DEVELOPMENT REGULATIONS (ULDR)
SECTION 47-21 LANDSCAPE & TREE PRESERVATION**



Response Deadline Extended!

The City of Fort Lauderdale has extended the ordinance feedback deadline to allow more time for input.

Submit your feedback on or before October 22, 2020 via email at sustainability@fortlauderdale.gov.



SUMMARY

The proposed revisions to the Unified Land Development Regulation (ULDR) Section 47-21 are intended to strengthen and clarify the landscape and tree preservation requirements. The ordinances are in the process of being revised to better align with City Commission priorities and the City's Press Play Strategic Plan.

The City of Fort Lauderdale seeks your input on proposed changes to its landscape and tree protection ordinances. Please submit written comments and suggestions to sustainability@fortlauderdale.gov on or before October 22, 2020. Your feedback matters!

Visit Webpage for Information and Document Downloads
www.fortlauderdale.gov/departments/sustainability/landscape-and-tree-preservation-ordinance

(Invitation Sent 6/29/2020 by Department of Sustainability)

Interesting to note: The photo chosen by the City to exemplify our landscape would not be possible through the proposed ordinance without the edits by the volunteer Advisory Group. Not one native, Coconuts are not on Florida Friendly list and only one tree amongst the canopy of Palms.

#1. Florida Friendly Landscape.

Draft Code: Section 47-21.8.G.

Requires: 50% of all vegetation to be native to Florida and consistent with Florida Friendly Landscape and Landscaping Principals.

AG comments:

Many of the residences, City medians, Beach plantings, the new Las Olas Beach Park, and Street Trees installations would not be possible under the Drafts proposed wording.

AG Recommendation:

Add additional wording that would include:

G. Fifty percent (50%) of all plants, excluding living lawn/turf or sod, required to be installed by this section shall be either native or naturalized vegetation to Florida or consistent with Florida-Friendly Landscaping principles that will thrive in South Florida.



The initial A1A Coconut palm installation in the center median in 2005 would not have been possible if the proposed code is adopted. Silver buttonwoods were added later to pacify the State Department of Beaches and Shores.



Center median installation at Bayview and Sunrise Boulevard, typical of the many City installations, contain NO Native vegetation.



Las Olas Oceanside Park could not have been constructed with the Palm theme if the Draft ordinance is approved. By Definition, there is NO Native vegetation nor does this installation meet requirements for Sections 47-21.13.B.1-75% Large/Medium Trees, B.10-Species Diversity, B.16-Street Trees and B.17- Additional Landscape Requirements.

#2. The Use of Sub-Grade Soil Medium. Sec. 4721.8.O - Page 34

Draft Code:

Requires the installation of a sub-grade soil medium and/or a modular suspended pavement system where trees are to be planted when soil volume cannot be provided or within six (6) feet of any proposed sidewalk, hardscape, or utility to permit or control root growth.

AG comments:

- Analysis of Structural Soil requires a long list of amendments that once installed under paved surfaces further amendments cannot be provided.
- The existing code requires new soil for Plant Installation to be “similar to the existing soil in pH, texture and permeability”. Structural Soil does not meet those requirements.
- Correspondence from noted Horticultural consultant, Lynn Griffith, indicates the use of Structural Soil makes no horticultural, agronomical or economic sense.
- Where landscape soil volumes cannot be provided, Structural/modular paving systems will add estimated costs of a minimum of \$5,000 dollars per tree.
- Where New soil volumes based on 36” soil depths are required, reduced volumes should be considered based on 24” soil depth.

AG Recommendations:

- **The use of Structural Soil should be discouraged in all zoning districts other than in the RAC where building setbacks cannot provide appropriate area for tree installation.**
- Based on South Florida shallow tree roots, reduce soil depth for calculation of new volumes which will limit the use of Structural Soil and MPS.
- Encourage the plant selection of the Right Tree-Right Place to eliminate the requirement for large soil volumes.

Comment # 3 Minimum soil volume requirements

Draft Code: Section 47-21.9.L.1. Establishes requirements for Minimum Soil Volumes.

AG comments:

- Current code sets minimum areas and dimensions: Large/Medium/Small trees which based on the code required excavation of 24" deep and the shallow root system of the South Florida trees seems unreasonable..
- The current code sets requirements for new soil to be similar in pH.Texture, to existing soils.
- Where minimum soil volumes cannot be provided most landscape areas will require the use of Structural soil, modular pavement systems or root barriers which is anticipated to cost development of each landscape area approximately \$5,000 to \$8,000 per Large/Medium tree.

AG Recommendation:

Delete minimum soil volume requirements from the Ordinance. Consider the following:

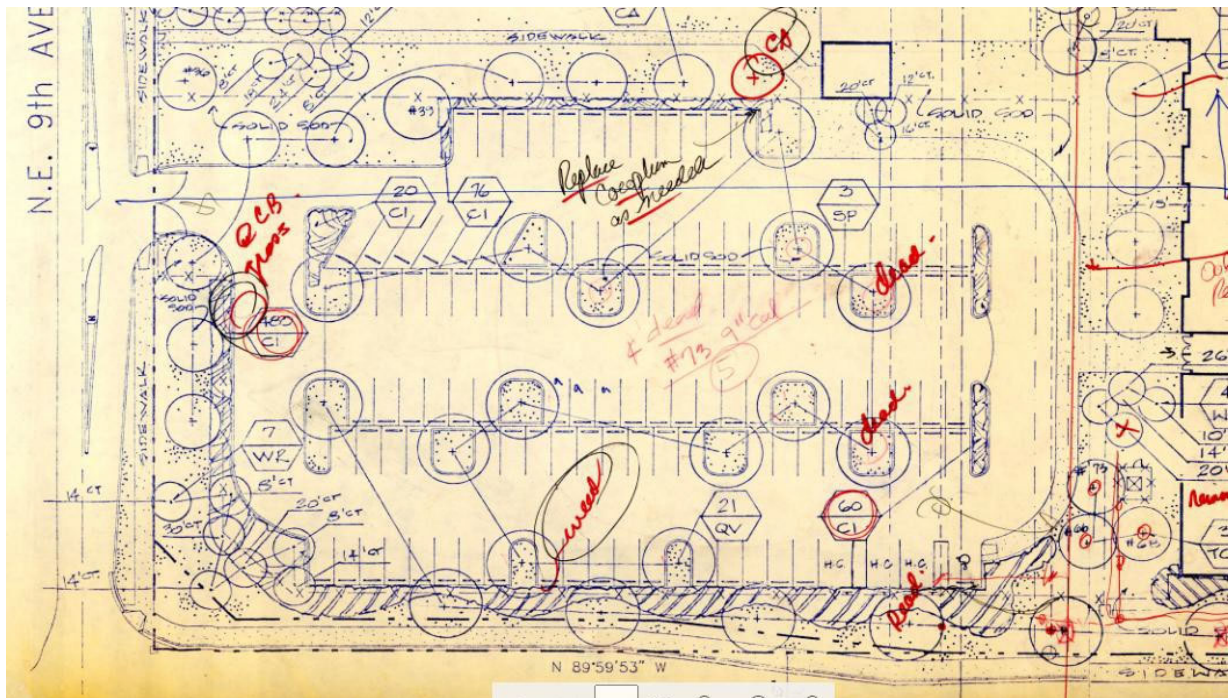
- Increase the dimensions of all landscape areas where large/Medium trees are to be installed.
- Increase the interior (VUA) landscape area for each Interior space.
- Decrease the soil volumes based on depth of soil required for South Florida Tree roots.



Sunrise Middle School - 1982



VUA Interior Landscape islands contain approximately 550 cf of soil



Virginia S. Young Elementary School - 1984

#5a. Landscape requirements for Other than a single family.

Section 47-21.13.B.1.a.i./ ii. page 56

Proposed Draft adds new requirements to the following: Net Lot Area, Vehicular Use Area and Street trees.

Draft Code:

Net Lot Area Requirements - NLA.

- Increases tree requirements from 20% to 75% of required trees.

AG Comments:

- The increase in percentages of Shade Trees is almost a fourfold increase in Large/Medium Trees.
- The increase will result in little or no Open Space remaining once maturity is achieved. see calculations/photo for canopy coverage for Kennedy Homes.
- New Spacing requirements between trees will eliminate the use of Small trees and Palms once the Shade tree locations are established. Sec. 47-21.9.I page-38

AG Recommendation:

Do not revise the tree requirements for NLA from the current code.

Draft Code:

Vehicular Use Area Requirements - VUA.

- Requires 75% of the required trees to be Large/Medium Trees.

AG Comments:

- The requirements for Large Trees have been increased twofold or doubled from 25% to 50%.
- Increased percentage for Large/Medium Trees diminishes the usage of Palms and most Flowering Trees.
- The increase in large tree requirements and their required location (new) of (peninsular and island areas -Sec. 47-21.A.5.d.) page 49 - will require the use of Structural Soil and Modular paving systems or root barriers for every tree unless the new landscape areas are approved rather than soil volumes.

- AG Recommendation:

The existing percentages in the existing code should remain.

Draft Code:

Street Tree Requirements -

- Increases the required Shade Trees from 50% to 75%

AG Comments:

- The percentage of required Large/Medium Trees has been increased by twofold.
- The use of large Palms has been all but eliminated.
- The use of the Sabal palm which is recommended for many RAC Street installations has been eliminated from the code.
- The installation of Large/Medium trees in narrow planting swales will jeopardize the sidewalks and adjacent infrastructure.
- The installation of Large/Medium trees in narrow swales will impact vertical clearances for large and emergency vehicles.
- The increased percentage of Street Trees will be in conflict with adjacent VUA Perimeter trees. Distance separations now added to the Draft will prevent the use of Small Trees in the Perimeter VUA landscape area.

AG Recommendation:

The current percentages of Large/Medium trees in the existing code should remain.

#5a. Landscape requirements: Net Lot Area Requirements - NLA.

- The fourfold increase in percentages of Shade Trees will result in little or no Open Space remaining when trees are required to fill in the spaces between the buildings.
- Site area calculations for Net Lot Area, enclosed, indicate that the canopy coverage for the tree increase exceeds the available landscape area.



Kennedy Homes - Broward Boulevard.

Owner: City of Fort Lauderdale Housing Authority.

ASLA State design award Best Multi-family project -2013

#5a. Landscape requirements: Street Tree Requirements -



The twofold increased percentage from 50% to 75% of required Large/Medium Trees will nearly eliminate the use of large Palms as a major design element.



The use of the Sabal palm which is recommended for many RAC Street installations has been nearly eliminated from the c

#5b. Landscape Requirements for all Zoning Districts-
Sec. 47-21.13. - Landscape requirements for **single family districts.**

The current code requires the site to provide Four (4) trees. Page 56.

- Three (3) trees shall be in the front yard with one being a Large or Medium Tree;
- One (1) tree shall be in the back yard;

The proposed code **does not make any revisions to the number of required trees but there are several other requirements added that will change design alternatives.**

- Spacing requirements between trees to structures has been added.
 - o Large Trees and Large Palms shall be located a minimum of twenty (20) feet away from structures;
- Spacing requirements between trees to other trees has been added.
 - o Trees and palms shall meet the following: Large Trees and Large Palms shall be spaced a minimum of twenty-five (25) feet from another tree or palm;
 - o Medium Trees shall be spaced a minimum of twenty (20) feet from another tree or palm;
 - o When two trees or palms of different size categories are planted near each other, the larger of the minimum spacing distances shall take precedence.
 - o Where a conflict in spacing or canopy spread occurs between required trees and existing offsite or onsite trees, or offsite structures, and the minimum tree spacing requirements of this section cannot be met, the spacing or size of required trees maybe adjusted by the Department.

Advisory Group Comment:

- No clear indication which requirement, Site or Street Trees are the City's priority. page 38.
- The addition of spacing of trees to structures may be too restrictive. This new requirement does not take into account a spreading Large or Medium Tree can spread over the adjacent one story structure. See photo.
- Small Trees and Small Palms shall be spaced a minimum of fifteen (15) feet from another tree or palm has no relevance as the spacing is unrealistic. see photo
- If Street trees are a priority, then the installation of other "on Site" trees will be compromised. "Right Tree Right Place" should take priority to prevent Root destruction of driveway/sidewalk.

Advisory Group recommendation #5b

- *The spacing between the structure and the Large Trees should recognize a one story structure and the branches ability to spread over the roof.*
- *Spacing between trees such as Large or Medium trees to small Trees should be allowed by revising the wording by eliminating the wording “the larger of the minimum spacing distances shall take precedence”.*
- *Wording concerning the priority of Street Trees to Site Trees should not be designated to the Department Director.*



Spacing of the minimum twenty (20) feet separation of Large Trees, Large Palms from adjacent structures should vary depending on the height of the adjacent structure such as a one story - 12-14' building.



In the initial planning of the site driveway design, lack of front yard or site pervious area and the size/location of the existing Street Trees would have precluded adding Large or Medium tree(s) in the front yard as required by the code if the use of the “Right Place/the Right Tree “ was applied between the structure and adjacent driveway .



Spacing requirements between Large or Medium trees to small Trees should be revised by modifying the wording, “larger of the minimum spacing distances shall take precedence”.

#6. Minimum Percentage of Required Street Trees Draft Code: Section 47-21.13.B.16.

Requires: 75% of the required Street Trees to be Shade trees with the remaining 25% to be Small trees, flowering trees, fruiting trees and/or Large Palm species.

AG comments:

- The location and the increase of Shade Trees in the requirements will jeopardize the sidewalks and adjacent infrastructure with or without the use of Structural Soil or root barriers.
- The revision minimizes the use of the Sabal palm which is the State Tree.
- Shade Trees when installed in narrow swales require pruning to avoid conflicts with vehicular clearances.
- Fruit Trees are not acceptable for the street tree use. Rotting fruit has no place in the public streets or sidewalks.
- The proposed ordinance increases the percentage of Shade Trees more than twofold then including flowering trees in the category of Medium Trees.

Advisory Group recommendation.

Do not increase the percentage of required Street Trees.



City Public Works hard at work saving the street and infrastructure from root invasion. Cost to remove and repair water mains- \$105,000.



The required location for Street Trees within 12' of the street edge cannot be accomplished where the swale is 6' in width or less.



Estimated cost to remove the tree stump, roots and repair the sidewalk, curbing, water main and street = \$85,000



But we never learn from our mistakes - B.C. Library 2020



Kennedy Homes/City Housing on Broward Boulevard - 2013 blends 50-50% Tree/Palm requirement for an entire block



The Kennedy Homes Landscape Plan for the streetscape along Broward Boulevard meets the current 50-50% Tree/Palm requirement



BCC/FAU Tower on Las Olas - 1995 blends Tree/Palm requirement but would not meet the 75% Increase in Shade Tree Percentages.



Federal Courthouse of Broward Boulevard - 1981- would not meet the proposed 75% Increase in Shade Tree Percentages.



The Draft revision eliminates the use of the Sabal Palm which is currently recommended for many of the streets in the RAC



The Draft revision will not permit homeowners to install only Palms and would not meet the proposed 75% Increase in Shade Tree Percentages.



Shade Trees when installed require pruning to avoid conflicts with vehicular clearances.



Unintended consequences.
More trees are not necessarily the answer.
Selecting the Right Tree in the Rightplace is a better option.



The location of the increase of Shade Trees in the requirements will jeopardize the sidewalks and adjacent infrastructure with or without the use of Structural Soil or root barriers.



Many times, trees are planted in the wrong place or are the selection of an inappropriate species which leads to.....Costly Repairs.

Plant the Right Tree in the Right Place!