CITY OF GREEN COVE SPRINGS CITY COUNCIL REGULAR SESSION



321 WALNUT STREET, GREEN COVE SPRINGS, FLORIDA TUESDAY, AUGUST 15, 2023 – 7:00 PM

Anyone wishing to address the city council regarding any topic on this agenda is requested to complete a card available at the city clerk's desk. Speakers are respectfully requested to limit their comments to three (3) minutes.

The city council prohibits the use of cell phones and other electronic devices which emit an audible sound during all meetings with the exception of law enforcement, fire and rescue or health care providers on call. Persons in violation may be requested to leave the meeting

AGENDA

Invocation & Pledge of Allegiance to the Flag - Scott Noel, Springs Chapel

Roll Call

Mayor to call on members of the audience wishing to address the Council on matters not on the Agenda.

AWARDS & RECOGNITION

- 1. Proclamation: Lineman Appreciation Day
- 2. Presentation of a check from the Northeast Florida League of Cities to the Friends of Augusta Savage Arts & Community Center. *Mayor Butler*

PUBLIC HEARINGS

3. First Reading of Ordinance O-23-2023 regarding proposed Landscape Ordinance Revisions. *Michael Daniels*

CONSENT AGENDA

All matters under the consent agenda are considered to be routine by the city council and will be enacted by one motion in the form listed below. There will be no separate discussion on these items. If discussion is desired, that item will be removed from the consent agenda and will be considered separately. Backup documentation and staff recommendations have been previously submitted to the city council on these items.

- 4. City Council approval of the Lineman Appreciation Day Proclamation. *Erin West*
- 5. City Council approval a Purchase Order to AIR-Max Heating & cooling, Inc to replace the AAON unit at the Police Department in the Amount of \$125,657.00. *Steve Thomas*
- 6. City Council approval to surplus old items in the public works yard. Steve Thomas

- 7. City Council approval of Pay Application #11 from EltonAlan, Inc. for construction of the Palmetto Trail Project in the amount of \$76,307.46 from the amended contract amount of \$1,551,660.92, leaving a balance of \$140,934.69 in the contract. *Mike Null*
- 8. City Council approval two task orders to Kimley-Horn in a total not-to-exceed amount of \$14,500 to prepare two FDOT Beautification Grant Applications for landscape improvements on Orange Ave and Walnut St. *Mike Null*

COUNCIL BUSINESS

- 9. City Manager & City Attorney Reports / Correspondence
- 10. City Council Reports / Correspondence

Adjournment

The City Council meets the first and third Tuesday of each month beginning at 7:00 p.m., unless otherwise scheduled. Meetings are held in City Hall at 321 Walnut Street. Video and audio recordings of the meetings are available in the City Clerk's Office upon request.

City may take action on any matter during this meeting, including items that are not set forth within this agenda.

Minutes of the City Council meetings can be obtained from the City Clerk's office. The Meetings are usually recorded, but are not transcribed verbatim for the minutes. Persons requiring a verbatim transcript may make arrangements with the City Clerk to duplicate the recordings, if available, or arrange to have a court reporter present at the meeting. The cost of duplication and/or court reporter will be at the expense of the requesting party.

Persons who wish to appeal any decision made by the City Council with respect to any matter considered at this meeting will need a record of the proceedings, and for such purpose may need to ensure that a verbatim record of the proceedings is made, which record includes the testimony and evidence upon which the appeal is based. The City is not responsible if the in-house recording is incomplete for any reason.

ADA NOTICE

In accordance with Section 286.26, Florida Statutes, persons with disabilities needing special accommodations to participate in this meeting should contact the City Clerk's office no later than 5:00 p.m. on the day prior to the meeting.

PUBLIC PARTICIPATION:

Pursuant to Section 286.0114, Florida Statutes, effective October 1, 2013, the public is invited to speak on any "proposition" before a board, commission, council, or appointed committee takes official action regardless of whether the issue is on the Agenda. Certain exemptions for emergencies, ministerial acts, etc. apply. This public participation does not affect the right of a person to be heard as otherwise provided by law.

EXPARTE COMMUNICATIONS

Oral or written exchanges (sometimes referred to as lobbying or information gathering) between a Council Member and others, including staff, where there is a substantive discussion regarding a quasi-judicial decision by the City Council. The exchanges must be disclosed by the City Council so the public may respond to such exchanges before a vote is taken.



STAFF REPORT

CITY OF GREEN COVE SPRINGS, FLORIDA

TO: City Council MEETING DATE: August 15, 2023

FROM: Michael Daniels, AICP, Development Services Director

SUBJECT: First Reading of Ordinance O-23-2023 regarding proposed Landscape Ordinance Revisions

BACKGROUND

The Citizens Advisory Committee, led by Chris Gay have evaluated the City's current Landscape Ordinance and are recommending changes regarding the following areas:

- 1. Purpose and Intent
- 2. Definitions
- 3. Landscape Design and Materials
- 4. Tree Preservation during development and construction
- 5. Removal of Tree Requirements
- 6. Exceptions and Exemptions
- 7. Conditions for Tree Removal
- 8. Tree Replacement Requirements
- 9. List of Recommended Plants

Mr. Gay made a recommendation to City Council on May 16, 2023, and Council directed to staff to work with Mr. Gay and move forward with proposed revisions. Mr. Gay presented the landscape ordinance changes to the Planning and Zoning Commission at the June meeting.

Included in the packet is:

- 1. The existing landscape ordinance
- 2. Proposed changes to the landscape ordinance
- 3. Ordinance O-23-2023, showing the proposed changes.

The substantive changes to the Landscape Ordinance

- Referencing IFAS (University of Florida Institute of Food and Agricultural Sciences) for tree identification as opposed to provide static tree lists for canopy, understory and nuisance trees.
- Revising and adding tree terms in the definition section.
- Adding provisions for property owners to be able to preserve trees that meet the definition of "protected tree" and "protected area".
- A section was added to address tree canopy roadways where within these designated areas, action taken regarding tree removal application will City Council approval at publicly noticed meetings.
- A section was added regarding buffering requirements adjacent to incompatible uses.
- Organizational changes were made throughout the document.

FISCAL IMPACT

N/A

RECOMMENDATION

Motion to recommend approval of first reading of ordinance O-23-2023 regarding revisions to the Landscape Ordinance for form and legality

ORDINANCE NO. O-23-2023

AN ORDINANCE OF THE CITY OF GREEN COVE SPRINGS, FLORIDA, AMENDING CHAPTER 113, ARTICLE VI AND VII OF THE CITY CODE TO MAKE REVISIONS TO THE CITY LANDSCAPE AND TREE REQUIREMENTS: AMENDING THE PURPOSE AND OF SECTION 113-242 ADDING AND AMENDING INTENT **DEFINITIONS IN SECTION 113-243; ADDING LANDSCAPE BUFFER SECTION** 113-244; REQUIREMENTS IN **AMENDING** THE SUBDIVISION STREET TREE REQUIREMENTS SET FORTH IN SECTION 113-246; AMENDING THE LANDSCAPE DESIGN AND MATERIALS REQUIREMENTS IN SECTION 113-247; AMENDING THE TREE PRESERVATION REQUIREMENTS SET FORTH IN SECTION 113-248; ADDING SEC 113-274 REGARDING PROTECTED TREES: AMENDING THE REMOVAL OF TREE REQUIREMENTS IN SECTION 113-275; AMENDING THE TREE EXCEPTIONS AND **EXEMPTIONS IN SECTION 113-276; AMENDING THE CONDITIONS** FOR TREE REMOVAL IN SECTION 113-278; AMENDING THE TREE REPLAEMENT REQUIREMENTS SET FORTH IN SECTION 113-279 AMENDING THE CITY RECOMMENDED LIST OF PLANTS BY THE CITY IN SECTION 113-280; PROVIDING FOR CONFLICTS, SEVERABILITY AND SETTING AN EFFECTIVE DATE.

WHEREAS, the City Code was adopted to promote the health, safety, morals and general welfare of the community; and

WHEREAS, the City Code should be evaluated on an ongoing basis to determine if the allowable uses are consistent with the Comprehensive Plan; and

WHEREAS, the Citizens Advisory Committee has reviewed the landscape ordinance and proposed changes to upgrade the existing code requirements; and

WHEREAS, the Green Cove Springs City Council has determined that this amendment is consistent with the Comprehensive Plan, is in the best interest of the public, and will promote the the health, safety and welfare of the city.

NOW, THEREFORE BE IT ENACTED BY THE CITY COUNCIL OF GREEN COVESPRINGS, FLORIDA AS FOLLOWS:

SECTION 1. That Chapter 113 Section 113-242 be amended as follows:

Sec. 113-242. Purpose and intent.

- (a) Landscape, landscaped areas, buffers, and tree protection shall be provided and/or accomplished for all premises in the manner set forth in this article. Required landscaped areas shall be located at or above grade unless otherwise prescribed in these land development regulations. The minimum provision of required landscape, landscaped areas, buffers, and trees may be exceeded. Unless otherwise prescribed, the most stringent provision of this schedule shall prevail.
- (b) Landscape, buffer, and tree protection requirements serve many purposes in the built-up environment. Landscape provides visual and climatic relief from buildings, structures, and broad expanses of pavement; landscape buffers pedestrian and vehicular traffic; and trees provide shade, scenic beauty, and natural habitat.
- (c) In general, landscaping and buffers shall be designed to:
 - (1) Enhance the urban development by blending natural and manmade environments.
 - (2) Provide shade for paved surfaces.
 - (3) Separate vehicular and non-vehicular use areas.
 - (4) Define vehicular access ways and access points.
 - (5) Screen vehicular movement, noise, and glare.
 - (6) Provide visual and physical separation of potentially incompatible land uses.
 - (7) Incorporate water conservation features such as drought tolerant landscaping and reclaimed water usage as required herein.
 - (8) Provide a protective buffer to mitigate the impact of climate change and enhance urban biodiversity.
- (d) As recommended by Florida Title XXVIII, Chapter 373, plant selection for development projects withing the city of Green Cove Springs shall be in compliance with Florida Friendly Landscaping as provided for Zip Code 32043 on the Institute of Food and Agricultural Sciences (IFAS), University of Florida web site; https://ffl.ifas.ufl.edu/apps/plants/

SECTION 1I. That Chapter 113 Section 113-243 be amended as follows:

Sec. 113-243. Definitions.

The following words, terms, and phrases, when used in this article, shall have the meanings ascribed to them in this section, except where the context clearly indicates a different meaning:

Berm means manmade earth contoured so as to form a mound above the general elevation of the adjacent ground or surface and designed to provide visual interest, screen undesirable view and/or decrease noise.

Buffer means a combination of physical space and vertical elements such as plants, berms, fences, or walls, whose purpose is to separate and screen incompatible land uses from one another.

Caliper means the diameter of a tree measured at breast height (DBH) which is approximately 4½ feet above the ground.

Canopy or shade tree means any tree grown specifically for its shade. The term "canopy or shade tree" usually applies to large trees with spreading canopies. Canopy trees normally grow to a minimum overall height of 30 feet and an average mature crown spread of 25 feet. Oaks, maples, ashes, lindens, and elms are examples

canopy/shade trees. Canopy trees shall be a minimum of 2.5 inches caliper DBH. Listed in IFAS as "Trees – Large" (ffl.ifas.ufl.edu/plants).

Clear trunk means the distance between the top of the root ball and the point of the trunk where lateral branching begins.

Commercial means all uses in RPO, CBD, GCN, GCC, C-1, and C-2 zoning districts and commercial development in a PUD zoning district.

Common area means that area which will be maintained by a homeowner's association, city service area, or other form of cooperative organization.

Dangerous Tree means any tree of any species which poses an immediate threat to persons or property due to disease, age, or mechanical injury. This can include damage from storms or other environmental factors.

Decorative turf means turf used purely for ornamental purposes having no use other than aesthetics.

Drip line means the vertical line running through the outermost portion of the tree crown projected vertically to the ground.

Florida Friendly Landscaping means quality landscapes that conserve water, protect the environment, are adaptable to local conditions, and are drought tolerant. The principles of such landscaping are the right plant in the right place, efficient watering, appropriate fertilization, mulching, attracting wildlife, responsible management of yard pests, recycling yard waste, reduction of storm runoff, and waterfront protection. Additional components include practices such as landscape planning and design, soil analysis, the appropriate use of solid waste compost, minimizing the use of irrigation, and proper maintenance.

Fully shielded lighting means lighting constructed in such a manner that all light emitted by the fixture, either directly from the lamp or a diffusing element, or indirectly by reflection or refraction from any part of the luminaire, is projected below the horizontal. Such fixtures usually have a flat, horizontally oriented lens and opaque (usually metal) sides. They are often described as shoebox luminaries if the luminaire has a predominantly rectangular form. Fixtures that either have reflecting surfaces or lenses (clear or prismatic) located below the lamp and visible from the side or above and fixtures that can be mounted such that the shielding is ineffective are not considered fully shielded lighting.

Grasses listed in IFAS, ((ffl.ifas.ufl.edu/plants) as "Turfgrasses."

Groundcover means a low-growing plant, including turf grass, that, by the nature of its growth characteristics, completely covers the ground and does not usually exceed two feet in height. Groundcovers are listed in IFAS as "Groundcovers."

Hat racking or topping means pruning a tree in such a way that the majority of limbs are removed and the tree is left with only a trunk and the stumps of a few primary limbs, with little or no foliage or other trimming or pruning that has the effect of preventing a tree from attaining its natural height and/or shape.

Hedge means a row of evenly spaced shrubs planted to form a continuous unbroken visual screen.

Immediate danger of collapse means that the tree may already be leaning, with the; surrounding soil heaving, and/or there is a significant likelihood that the tree will topple or otherwise fail and cause damage before a tree removal permit could be obtained through the non-. emergency process. "Immediate danger of collapse" does not include hazardous conditions that can be alleviated by pruning or treatment.

Industrial means all uses in M-1 and M-2 zoning districts and all industrial uses in a PUD zoning district.

Page 4 of 20

Invasive Species means plants, animals, and other living organisms (e.g., microbes), non-native (or alien) to the ecosystem under consideration and, whose introduction causes or is likely to cause economic or environmental harm or harm to human health.

Landscape means vegetative and inert materials, including, but not limited to, grass, sod, shrubs, vines, hedges, trees, flowers, berms, and complementary structural landscape architectural features such as rocks, fountains, sculpture, decorative walls and tree wells or other hardscape features.

Landscaped area means land area to be provided with landscape.

Landscaped strip or landscaped island means required landscaped areas containing ground cover, shrubs, trees and/or other landscape used to divide parking areas into individual bays.

Large Ornamental listed in IFAS ((ffl.ifas.ufl.edu/plants) as "Palms and Palm Like Plants."

Mitigation means the action used by an individual, company or agency to identify and minimize the risks from a proposed action that will reduce its impacts on people, property, and the environment and will restore and retain the biodiversity of the site.

Moisture sensors which means a device which has the ability to shut off an automatic irrigation controller after receiving a determined amount of rainfall.

Mulch means nonliving organic materials such as wood chips that is customarily placed around the base of trees, shrubs, and groundcovers for the purpose of retaining moisture and retarding weed infestation and soil erosion. Also, mulch is used in pathways and play areas.

Native or naturalizing plant species means plant species native to the region or introduced which once established are capable of sustaining growth and reproduction under local climatic conditions, without supplemental watering and enhance habitat for native wildlife.

Nonresidential means, pursuant to land use category headings reflected in Schedule B, Permitted Uses, in these land development regulations, all commercial, transient lodging and entertainment, automotive, miscellaneous business and services, industrial and public/semi-public uses.

Ornamental Landscape Trees, listed in IFAS (ffl.ifas.ufl.edu/plants) as "Trees - Medium."

Parking area means a paved ground surface area used for the temporary parking and maneuvering of vehicles by employees or customers, either for compensation or to provide an accessory service to a commercial, industrial, institutional or residential use.

Paved ground surface area. See section 101-5.

Poodle cut means stripping off the lower branches of a tree and rounding or shearing the ends of the greenery to create an unnatural shape.

Protected Area means an existing natural area that has been determined by the City of Green Cove Springs, to be of significant aesthetic, environmental, or monetary value or which affords collective protection for the city from extreme weather events, and has been designated as protected by the City Council.

Protected tree means a particularly fine or unusual example of any tree due to its age, size, rarity, environmental or historical value or exceptional aesthetic quality. A tree may also be designated a specimen due to its association with historic events or persons. A specimen tree cannot be of a non-native species that is unacceptable as referenced in list of exempt trees in this Code. is approved or denied. Designation will be annotated on the title to the property. Reversal of this determination will require action by the City Council.

Required landscaped area means any landscaped area required in this Code.

Page 5 of 20

Residential means all uses in R-1, R-2, R-3, and PUD zoning districts; one-family, two-family and multiple-family dwellings.

Shrub means a self-supporting woody species of plant characterized by persistent stems and branches springing from the base. Shrubs and requirements for Visual Screens listed in IFAS (ffl.ifas.ufl.edu/plants as "Shrubs-Large" spaced on center per guidance under "Appearance."

Tree means a self-supporting woody plant of a species that normally grows to a minimum overall height of 15 feet and has an average mature crown spread greater than 15 feet within the city.

Turf means upper layer of soil bound by grass and plant roots into a thick mat.

Understory, sub-canopy trees means trees which normally grow to a maximum overall height of 15 feet and an average mature crown spread of 15 feet. Understory Trees. listed in IFAS ((ffl.ifas.ufl.edu/plants as "Trees – Small"

Vehicular circulation area means streets, rights-of-way, access ways, parking spaces, parking, loading, and unloading, and other similar or related functions.

Viable tree is a tree that is in compliance with Florida Friendly Landscaping as provided for Zip Code 32043 on the Institute of Food and Agricultural Sciences, University of Florida web site, which is capable of growing and developing in its natural form upon completion of development of a site. Trees that are dead, dying, or have their root systems or crowns severely altered during construction or are dangerous because of their growth habits are not a viable tree.

SECTION III. That Chapter 113 Section 113-244 be amended as follows:

Sec. 113-244. Required landscaping.

- (a) Landscape requirements for one-family dwellings and two-family dwellings shall be as follows:
 - (1) At least one canopy tree, 2.5 inches DBH, shall be located in the required front yard of each dwelling unit.
 - (2) The lot shall be sodded, seeded, or appropriate ground cover for erosion control.
- (b) Landscape requirements for nonresidential uses, including multifamily structures with three or more dwelling units, shall be as follows:
 - (1) Perimeter landscaping. At a minimum, each site developed for multifamily, institutional, commercial, or industrial uses will contain one shade or canopy tree for each 50 linear feet of the perimeter of the site.
 - (2) Interior landscaping. There will be one tree per every 1,500 square feet of the first 10,500 square feet of the project site, then one tree for every 4,000 square feet of the remainder of the project site. The trees shall be an equal proportion of shade (canopy) and understory trees. At a minimum, 15 percent of the site shall be landscaped.
- (c) Landscape adjacent to streets and parcels.
 - (1) A landscaped strip shall be provided along all parcel lines and abutting street right-of-way lines.
 - (2) The depth of the required landscaped strip shall be measured and provided parallel to the parcel line or abutting street right-of-way in question.

Page 6 of 20

- (3) Landscaped strips shall be considered to be required landscaped area.
- (4) A landscaped strip may be included in satisfying buffer requirements.
- (d) Landscaped strips shall be provided in the following manner:
 - (1) Ten-foot landscaped strip along all rights-of-way.
 - (2) Alternative design for properties fronting on all roads classified as arterials, including, but not limited to, U.S. 17 (Orange Avenue), S.R. 16 East (Leonard C. Taylor Parkway) and S.R. 16 West (Ferris Street and Idlewild Avenue), shall comply with the following standards: The developer/property owner shall be responsible for providing a landscape buffer in the area abutting the designated roadway right-ofway lines by meeting on of the following conditions:
 - a. The roadway shall be separated from the back of curb by a six-foot landscaped strip, a six-foot pedestrian walkway, then a six-foot landscaped strip.
 - b. Building setback shall be calculated from the back of curb or ten-foot landscaped strip along all rights-of-way.
 - c. Alternative designs. Where natural features or spacing of existing driveways and roadways cause the access requirements of this section affecting placement or planting of landscaped buffers or trees to be physically infeasible, alternate designs may be approved as part of the issuance of the final development order.
 - (3) The landscape buffer area shall be planted in the following manner:
 - a. Canopy trees.
 - 1. One row of canopy trees, 2.5 inches DBH at planting. For 50 percent of the canopy trees, two sub-canopy/understory trees may be substituted for each canopy tree.
 - 2. The trees shall be planted every 50 feet and staggered so as to be midway between each other, and equal distance between each row and right-of-way and/or parcel line. Trees shall be evenly spaced. The tree spacing may be altered with approval of the development services, provided the total number of trees is provided.
 - b. Sub-canopy/understory trees. A minimum of four sub-canopy/understory trees per 100 feet of frontage shall be planted in and about each access point and intersection.
 - c. *Hedges*. When off-street parking, loading, unloading and vehicular circulation areas are to be located adjacent to the street right-of-way, a dense hedge of evergreen-type shrubs shall be provided in the following manner:
 - 1. At initial planting and installation, shrubs shall be at least 24 inches in height and shall be planted at least 36 inches or less on center.
 - 2. The hedge shall be planted four feet or more from the tree trunks.
 - 3. Within two years of initial planting and installation, shrubs shall have attained and be maintained at a minimum height of three feet and shall provide an opaque vegetative screen between the street and the use of the premises.
 - 4. In lieu of a vegetative hedge, the use of vegetated berms or other appropriate landscape materials in a manner that results in the visual separation of street right-of-way can be approved by the development services director.

Page 7 of 20

d. Shrubs.

- 1. Buffer areas, not adjacent to a street right-of-way, shall include nine shrubs for every 100 linear feet of the parcel line
- 2. Shrubs shall be at least 24 inches in height at the time of planting.
- (e) Groundcover. The buffer area shall be planted with groundcover minimum of 18 inches on center or solid grass sod, unless natural area to remain.
- (f) Landscape buffer between incompatible uses.
 - (1) General Requirements. Wherever a higher intensity property adjoins or abuts a lower intensity zoning district, a landscaped buffer area will be required along the total length of that adjoining or abutting property boundary to provide an attractive land use transition and reduce sight, glare, light and noise intrusion excluding properties located in the CRA (Community Redevelopment Area). This landscaped buffer area as set out in this section will be reviewed and approved during the site plan process.
 - (2) Where a business or industrial use is separated by a two-lane street from a residential district, then any plot in such nonresidential district adjacent to the separating street shall be provided with a yard at least 20 feet in depth along such separating street.
 - (3) A heavy industrial use abutting a residential district shall have a 40-foot-deep landscaped *buffer* area or a 25-foot-deep landscaped *buffer* area combined with a 6-foot high brick, stone or concrete block wall. Alternatives to the wall requirement such as wood or vinyl fencing can be approved by the Site Development Committee.
 - (4) A light or medium industrial or general commercial use abutting a less intensive district shall have a 25-foot-deep landscaped *buffer* area or a ten-foot-deep landscaped *buffer* area combined with a brick, stone or concrete block wall. Alternatives to the wall requirement such as wood or vinyl fencing can be approved by the Site Development Committee.
 - (5) A neighborhood business, institutional or office use or district abutting a less intensive use or district shall have a ten-foot-deep landscaped *buffer* area or a four-foot-deep landscaped *buffer* area combined with a stone, brick or concrete block wall. Alternatives to the wall requirement such as wood or vinyl fencing can be approved by the Site Development Committee.
 - (6) Multifamily and mobile home use abutting a less intensive use or district shall have a tenfoot-deep landscaped *buffer* area or a four-foot-deep landscaped area combined with a brick, stone or concrete block wall. Alternatives to the wall requirement such as wood or vinyl fencing can be approved by the Site Development Committee.
 - (7) A six-foot-high landscaped berm can be substituted for the wall requirement. The berm must be constructed as a 3:1 slope or less. The berms shall be landscaped with a combination of ground cover, sod, shrubs and Medium trees (as defined in this section), as provided for in this section. Large Trees can be substituted for ornamental trees, provided that the shade trees can meet the specifications set forth in Sec. 113-244(d)(3)(a).

Page 8 of 20

(8) Landscape Specifications.

- a. Acceptable plant material; irrigation; landscape plan. When a landscaped buffer area is required under this section, continuous hedging and small trees will be required. Hedge material shall reach a height of three feet in two years and six feet in four years, and should be accepted as cold hardy in this planting zone. All open areas in the buffer area shall be sodded. All landscaped areas shall have a properly installed irrigation system to give 100 percent coverage of the landscaped area, or use proper planting, maintenance and water conservation measures such as native or drought-tolerant vegetation to ensure the healthy survival of all sod, ground cover, shrubs and trees. A landscape plan shall be submitted with every site plan showing the irrigation system or the alternate use of native or drought-tolerant vegetation.
- b. Spacing, size and quality of hedge material. Shrub material to be planted shall be a maximum of three feet on center. Plants shall be 18 inches to 24 inches minimum height at the time they are installed, in three-gallon containers.
- c. Spacing size of small trees. Trees shall meet the definition of Ornamental Landscape trees as set forth in Section 113-243. There shall be an average of one tree for every 25 linear feet of buffer area. Trees shall be a minimum of six feet to eight feet in height when installed.
- d. All vegetation shall be Florida Grade No. 1 or better.

SECTION IV. That Chapter 113 Section 113-246 be amended as follows:

Sec. 113-246. Parking area landscaping.

The requirements of this section apply to all development, unless exempted:

- (1) Internal landscape area.
 - a. Minimum required land area for required landscaped areas not in a parking area. Each required landscaped area shall contain a minimum land area of 200 square feet.
 - b. The minimum required internal landscaped area for parking areas shall cover ten percent of the parking area.
 - c. Required landscaped area for rows of parking spaces.
 - 1. A landscaped area shall be provided at each end of all rows of parking.
 - 2. In addition, at least one landscaped area shall be provided between every ten parking spaces.
 - 3. Each required landscaped area shall be five feet wide inside the curb or paving line running the entire length of the parking space.

Page 9 of 20

- 4. At least one canopy tree shall be provided at each island.
- 5. A five-foot turning radius shall be accommodated at the end of parking rows.
- d. Parking space reduction to protect existing trees. The development services director shall have the authority to reduce the required number of off-street parking spaces when such reduction would result in the preservation of existing trees.
 - 1. Trees to be preserved must be a minimum of 12 inches in diameter measured at breast height above the ground.
 - The reduction in the number of required parking spaces shall result in a reduction in an amount of required parking of less than five percent of the total number of required offstreet parking spaces.

(2) Required trees.

- a. At least one canopy tree shall be provided in each required landscaped area.
- b. One canopy trees or two sub canopy trees shall be provided for each required landscaped area for the rows of parking. A minimum of 50 percent of the trees used shall be canopy trees.
- (3) Location of landscaped areas for interior landscaping.
 - a. A landscaped area or buffer shall be provided between all parking areas and principal structures or any sidewalks and street or rights-of-way.
 - b. This landscape area or buffer must contain at least one canopy tree per 50 feet linear perimeter of the parcel.
 - c. Every effort will be made to retain native vegetation and trees.
 - d. Minimum width of the landscape area:
 - 1. Ten feet when abutting a public right-of-way.
 - 2. Five feet when abutting alleys or the rear or side property lines.
 - e. Each landscaped area shall have five shrubs per each tree required.
 - f. All landscaped areas shall be covered in groundcover or turf.
- (4) Maintenance of planted areas.
 - a. Irrigation shall be provided for all new planting. Hose bibs maybe installed as an alternative, one hose bib within 75 feet of all landscaped areas.
 - b. Maintenance shall be the responsibility of the developer and/or landowner.
 - c. Failure to maintain landscaped areas shall be considered a violation of this subpart and subject to code enforcement.
- (5) Street trees for subdivisions.

- a. The developer shall plant, within ten feet of the right-of-way of each street within a residential development meeting the subdivision requirements of this Code, one canopy tree for every 50 linear feet of right-of-way.
- b. Except where property on one side of the right-of-way is not owned by the developer, the trees shall be planted alternately on either side of the street.
- c. Existing trees and native tree species that need less water and maintenance are preferred required.
- d. Coordination with the city utility departments is required prior to planting the street trees.
- e. Street trees planted shall have a minimum overall height of 2.5-inch DBH at time of planting.
- (6) Certain functional uses not permitted. No accessory structures, garbage or trash collection points or receptacles, parking, or any other functional use shall be permitted in the minimum required landscape area and/or buffer zone. Combining of compatible functions such as landscaping and drainage facilities are permitted.
- (7) Concealing and location of dumpsters.
 - a. Dumpsters must be concealed in opaque concrete, brick, or chain-link fence with screening slats of enough height consistent with the size of the container to shield the container from view from all sides.
 - b. The front of screen must be accessible for service of the container.
 - c. The dumpster must be located on a paved surface of asphalt or concrete.
- (8) Clear line of sight. An unobstructed cross visibility shall be required with in a triangle area formed by the intersection of two rights-of-way or access ways, as referenced in section 113-76.

SECTION V. That Chapter 113 Section 113-247 be amended as follows:

Sec. 113-247. Landscape design and materials.

- (a) Design principles. All landscaped areas required shall conform to the following general design principles:
 - (1) Florida Friendly Landscaping principles shall be incorporated into all projects.
 - (2) Landscaping should integrate the proposed development into existing site features through consideration of existing topography, hydrology, soils, and vegetation.
 - (3) The functional elements of the development plan, particularly the drainage systems and internal circulation systems for vehicles and pedestrians, should be integrated into the landscaping plan.
 - (4) Landscaping should be used to minimize potential erosion through the use of ground covers or any other type of landscape material that aids in soil stabilization.
 - (5) Existing native vegetation should be preserved and used to meet landscaping requirements.

Page 11 of 20

- (6) Landscaping should enhance the visual environment through the use of materials that achieve variety with respect to seasonal changes, species of living material selected, textures, colors and size at maturity.
- (7) Landscaping design should consider the aesthetic and functional aspects of vegetation, both when initially installed and when the vegetation has reached maturity. Newly installed plants should be placed at intervals appropriate to the size of the plant at maturity, and the design should use short-term and long-term elements to satisfy the general design principles of this section over time.
- (8) Landscaping should enhance public safety and minimize nuisances.
- (9) All landscaping and plant material shall be planted in a manner which shall not be intrusive or interfere, at or before maturity, with pavement surfaces, power, cable television, or telephone lines, sewer, or water pipes, or any other existing or proposed overhead or underground utility services.
- (10) Landscaping should maximize the shading of streets and vehicle use areas.
- (11) Architectural planters.
 - a. Planters can be are used to meet landscaping requirements.
 - b. Planters shall be a minimum of ten square feet and shall have minimum depth of 15 inches.
 - c. Planters shall be maintained and replanted if necessary.
 - d. Planters cannot be located within the city right-of-way without prior consent from the development services director.
- (b) Installation of required landscape and trees.
 - (1) General. All required trees and landscaping shall be installed according to generally accepted commercial planting procedures. Soil, free of lime rock, rocks, and other construction debris, shall be provided. All landscaped areas shall be protected from pedestrian and vehicular encroachment by raised planting surfaces, depressed walks, curbs, edges, wheel stops and the like.
 - (2) Florida No. 1 quality
 - a. All required plant materials, including, but not limited to, trees and shrubs, shall equal or exceed the standards for Florida No. 1 as established and revised by the state department of agriculture and consumer services in the current Florida Grades and Standards for Nursery Plants.
 - b. Grass sod shall be healthy and reasonably free of weeds, pests and disease.
 - (3) Proper planting and anchoring.
 - a. All plant material shall be mulched to a depth of two inches over the root zone. Do not apply mulch against the trunk.
 - b. Trees shall be installed with anchoring for a period of at least one year, in order to provide sufficient time for their roots to become established.
 - 1. Trees with trunks under four inches in diameter should be staked with one to three stakes.
 - 2. Trees with a diameter of 2.5 inches or more DBH should be guyed with three to four guy wires.
 - (4) Irrigation.
 - a. All landscaped areas shall be watered with an underground irrigation system or a drip irrigation system or hose bibs designed to allow differential operation schedules for high and low water

- requirement areas. To avoid operation of the system during periods of increased rainfall, an operational moisture sensor switch shall be required on all irrigation systems equipped with automatic controls that will override the irrigation cycle of the sprinkler system when adequate rainfall has occurred.
- b. The use of reclaimed water as a water supply source for irrigation shall be required when such source is available or anticipated to be available within 100 feet of an existing or proposed city reclaimed water line. In areas where food is served or consumed, such as outdoor eating areas of restaurants, a dual supply source distribution system shall be installed whereby potable water shall serve as the source for the food serving and/or consumption areas and reclaimed water shall serve as the supply source in all other landscaped areas.
- c. If a landscaped area contains primarily species native to the immediate region, or plants acceptable for xeriscape landscaping, the development services director may waive the requirement for installation of an irrigation system. Consideration of a waiver of the irrigation requirement shall include, in addition to the area covered by native vegetation, such local conditions as sun or shade, use of fill soil, and depth to water table.
- b. The development services director may require or otherwise approve water supply provisions for unusual landscape conditions provided, however, that a readily available water source shall be located within 100 feet of any required landscaping plant material.
- (5) Berm. When a berm is used to form a required visual screen in lieu of, or in conjunction with, a required hedge or wall, such berm shall not exceed a slope of 30 degrees and shall be completely covered with shrubs, trees, or other living ground cover.
- (6) Grass.
 - a. Grass shall be seeded, plugged, or sodded.
 - b. On swales, berms or other areas that are subject to erosion, grass shall be completely sodded.
- (7) Ground cover. Ground cover shall be installed and maintained for all improved parcels, in order to prevent erosion and dust. Ground cover used in lieu of grass shall be planted in such a manner so as to present a finished appearance and reasonably complete coverage within three months after planting.
- (8) Nonliving materials. Mulch shall be a minimum depth of two inches.
- (c) Recommended plant list is available on the IFAS FFL Website at https://ffl.ifas.ufl.edu/plants/ for Zip Code 32043.
- (d) Unacceptable plant species. All invasive species should be removed.
- (e) Maintenance and replacement of landscape plants. All plant material shall be maintained according to the following standards:
 - (1) All required trees, shrubs and landscaped areas shall be maintained in good and healthy condition for as long as the use continues to exist.
 - (2) Maintenance shall consist of mowing, removing of litter and dead plant material, necessary pruning, pest control, water, and fertilizing.
 - (3) Maintenance also includes, but is not limited to, the replacement of plants damaged by insects, disease, vehicular traffic, acts of God and vandalism.

- (4) Necessary replacements shall be made within a time period not to exceed 30 days after notification by the city of the violation.
- (5) In order to increase the tree canopy within the city, give shade to paved surfaces, buffer pedestrian and vehicular traffic and provide scenic beauty and natural habitat, as well as prevent decay, sunburn and hazards to trees, all landscape material shall be pruned to maintain the natural shape of the plant.
- (6) No topping, hat racking, poodle cutting, excess pruning or excess crown reduction shall be performed on trees within the right of way.
- (7) The city shall encourage the standards of the International Society of Arboriculture and the Tree Care Industry Association for tree care operations, plant maintenance and proper pruning methods.

SECTION VI. That Chapter 113 Section 113-248 be amended as follows:

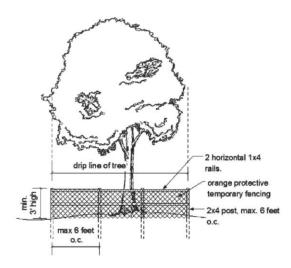
Sec. 113-248. Tree preservation during development and construction.

- (a) Protective barriers.
 - (1) During construction, protective barriers shall be placed, as necessary and/or as directed by the development services director, to prevent the destruction or damaging of trees.
 - (2) Trees destroyed or receiving major damage must be replaced before occupancy or use unless approval for their removal has been granted during the site plan approval process
 - (3) All trees not designated for removal may be required to be protected by barrier zones erected prior to construction of any structures, roads, utility service, or other improvements,
- (b) The protective barrier shall be constructed to the following standards:
 - (1) The protective barrier shall be constructed outside the drip line of the tree, when possible (see Figure A). The protective barrier shall have a minimum of a six-inch radius, plus one inch for each one inch of caliper.
 - (2) The protective barrier shall be a minimum of three feet high.
 - (3) Protective barrier posts shall be two inches by four inches or larger and shall be no more than six feet apart.
 - (4) The barrier shall have two one-by-four-inch horizontal railings affixed securely to the posts.
 - (5) The entire protective zone shall be wrapped in orange safety fencing material, a minimum of three feet in height.
 - (6) The protective barriers shall be inspected by the Development Services Department prior to the commencement of construction.
- (c) No grade changes shall be made within the protective barrier zones without prior approval of the city development services director.
- (d) Where roots greater than one-inch diameter are exposed, they shall be cut cleanly.
- (e) Protective barrier zones shall remain in place and intact until such time as landscape operations begin or construction is complete, whichever occurs first.
- (f) The development services director may conduct periodic inspections of the site before work begins and during clearing, construction, and post-construction phases of development in order to ensure compliance.

Page 14 of 20

- (g) No building materials, machinery or temporary soil deposits shall be placed within protective barrier zones defined above.
- (h) No attachments or wires other than those of a protective or non-damaging nature shall be attached to any tree
- (i) A site survey of existing trees must be completed within two years by the developer and certified as accurate by the Planning Department as part of the submission process, including a mitigation plan, before a building permit is issued.
- (j) Protected areas and protected trees must be preserved unless that designation is changed by vote of the City Council.

Figure A



SECTION VII. That Chapter 113 Section 113-274 be amended as follows:

Sec. 113-274. Protected Trees

- (a) Protected trees as defined in Sec. 113-243 shall be designated pursuant to the following requirements:
 - 1. Submittal Application by the property owner
 - 2. Location and type and size of tree
 - 3. A protected tree cannot be of a non-native species as set forth in Section 113-276 referenced in list of exempt trees in this Code. Status is obtained by submission for protection
 - 4. certification by a certified arborist that the tree complies with the definition of protected tree as set forth in Sec. 113-243.

- 5. Additional relevant historical documentation, if applicable.
- 6. Annotation of the legal description of the property by a certified surveyor,
- 7. Public notice requirements shall include:
 - a. Mail copy of notice by regular mail to property owners within 300 feet no less than ten days before Planning and Zoning Commission Meeting
 - **b**. Post sign on property no less than 10 prior to Planning and Zoning Commission meeting. a hearing shall be held by the Planning and Zoning Commission after which a formal determination is approved or denied.
 - **C.** Formal determination may be appealed to City Council.
- 8. If approved, a lien shall be placed on the property and the lien shall be recorded within 30 days in the official county records at the property owners expense.
- Reversal of this determination shall require action by the Planning and Zoning Commission which can be appealed to City Council.
- (b) ProtectedArea as defined in Sec. 113-243 shall be designated pursuant to the following requirements:
 - 1 Submittal Application by the property owner
 - 2 Location and type and size of tree
 - 3 Relevant information identifying significant aesthetic, environmental, or monetary value or which affords collective protection.
 - 4 Additional relevant historical documentation, if applicable.
 - 5 Annotation of the legal description of the property by a certified surveyor,
 - 6 Public notice requirements shall include:
 - a. Mail copy of notice by regular mail to property owners within 300 feet no less than ten days before the Planning and Zoning Commission meeting.
 - **b** Post sign on property no less than 10 prior to Planning and Zoning Commission meeting, a hearing shall be held by the Planning and Zoning Commission after which a formal determination is approved or denied.
 - c. Formal determination may be appealed to City Council.
 - 7 A lien shall be placed on the property and the lien shall be recorded within 30 days in the official county records at the property owners expense.
 - 8 Reversal of this determination shall require action by the Planning and Zoning Commission which can be appealed to City Council.
- (c) Protection of Canopy Roads
 - (1) In order to provide additional protection of aesthetic resources within the city, the following roadways are hereby designated as canopy roads:
 - a. St Johns Avenue from Forest Street to Clay Street
 - (2) All property within twenty feet of the outside right-of-way line of the roadways designated in subsection (a) of this section shall be known as the canopy tree protection zone.
 - (3) No person or agency shall remove any tree located within the canopy tree protection zone without obtaining a tree removal permit from the Development Services Department.
 - (4) All tree pruning and construction activity shall comply with the ANSI (American National Standards Institute) A300 Standards for the care and maintenance of trees.

Page 16 of 20

(5) The tree removal permit will be reviewed by the Development Services Department and placed on the next available Planning and Zoning Commission agenda for final action pursuant to the public notice requirements set forth in Sec. 113-274 (7). This action may be appealed to the City Council.

SECTION VIII. That Chapter 113 Section 113-275 be amended as follows:

Sec. 113-275. Removal of trees.

- (a) Removal of a tree includes any act which will cause a tree to die, such as damage inflicted upon the root system by heavy machinery, changing the natural grade above the root system or round the trunk, damage, including fire damage, inflicted on the tree permitting infection or pest infestation.
- (b) It shall be unlawful for any person, organization, society, association or corporation or any agent or representative thereof, directly, or indirectly, to cut down, destroy, remove, move, or effectively destroy through damaging any tree located on any property without obtaining a permit.
- (c) No authorization for the removal of a viable tree shall be granted unless the developer demonstrates the reason for removal of the trees.

SECTION IX. That Chapter 113 Section 113-276 be amended as follows:

Sec. 113-276. Exceptions and exemptions.

The following are exempt from the requirements of section 113-275.

- (1) Utility and public works projects undertaken by the city, including in the case of emergencies such as hurricane, windstorm, flood, freeze, or other disasters.
- (2) One- and two-family dwelling units.
- (3) Dangerous trees.
 - a. In the event that any tree endangers health or safety and requires immediate removal, verbal authorization may be given by the development services director.
 - b. The tree may be removed without obtaining a written permit provided a certified arborist has made such a determination. The verbal authorization shall later be confirmed in writing by the development services director.
 - c. In the event of a natural disaster, environmental or other emergency situation where immediate action is required, any recognized civil authority can authorize immediate removal, to include utility crews, Law Enforcement Officers, and Fire and Rescue Crews.
- (4) Exempt trees. Nonnative trees as defined by IFAS, Florida Friendly Landscaping, Zip Code, 32043.

SECTION X. That Chapter 113 Section 113-278 be amended as follows:

Sec. 113-278. Conditions for tree removal.

The development services director shall issue the permit for removal of a tree if one of the following reasons for removal is found to be present:

- (1) The condition of the tree with respect to disease, insect attack, age or other damage creates a danger of falling, or otherwise causes the tree to have an adverse impact on the urban or natural environment as determined by a certified arborist.
- (2) Removal of the tree is necessary to construct proposed improvements in order to make use of the property. Provided the improvements are in compliance with the protected tree requirements set forth in Sec. 113-274.
- (3) To avoid interference with utility services; or
- (4) Removal of a tree in compliance with a state-approved timber management plan.

SECTION X1. That Chapter 113 Section 113-279 be amended as follows:

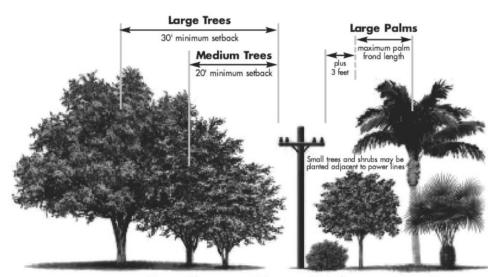
Sec. 113-279. Replacement.

- (a) Generally. In respect to removal of trees to allow construction of improvements on property, and as a condition to the granting of a permit, replacement shall be required.
 - (1) Trees removed.
 - a. Live oaks, Bald Cypress, and Mature Southern Magnolia.
 - 1. All efforts shall be made to maintain all live oak trees, Bald Cypress, and Mature Southern Magnolia on the site.
 - 2. Replacement of live oak trees Bald Cypress, and Mature Southern Magnolia shall be with live oak trees, Bald Cypress, and Southern Magnolia and the total caliper inches of replacement trees shall equal the total caliper inches of live oak trees removed.
 - b. All other trees.
 - 1. Trees removed over 12 inches DBH on the site shall be replaced.
 - 2. The replacement for all trees over 12 inches in caliper at DBH on the site shall equal one-third of the total caliper at DBH of the trees removed.
 - (2) Tree replacement or payment to city. In lieu of replacement of trees on the site, the development services director may approve a plan for replacement of trees offsite or payment to the city tree mitigation fund. The value will be based on the average cost of other municipalities in northeast Florida
- (b) Credit for trees. Trees which are preserved shall receive credit against the landscape requirements according to the following schedule:
 - (1) Trees 12 to 18 inches: Live oaks, Bald Cypress, and Southern Magnolia one-inch credit; all others, 50 percent-inch credit.

- (2) Trees 19 to 30 inches: Live oaks, Bald Cypress, and Southern Magnolia 1.25-inch credit; all others, 75 percent-inch tree credit.
- (3) Trees over 30 inches: Live oaks, Bald Cypress, and Southern Magnolia 1.5-inch credit; all others, 100 percent-inch credit.
- (4) A minimum of one fourth (¼) of the replacement credit shall consist of and same tree species removes and have a minimum caliper diameter of 4 inches per replacement tree.

SECTION XI1. That Chapter 113 Section 113-280 be amended as follows

Sec. 113-280. List of plants recommended for the city can be obtained by the IFAS FFL Website at https://ffl.ifas.ufl.edu/plants/ for Zip Code 32043.



Trees Shown at Mature Height

Figure 2 Large, Medium and Small Trees and Shrubs

Section XII. Conflicts. If any portion of this Ordinance is in conflict with any other ordinance, then the provisions of this Ordinance shall govern.

Section XIV. <u>Severability</u>. If any section, sentence, clause or phrase of this Ordinance is held to be invalid or unconstitutional by any court of competent jurisdiction, then said holding shall in no way affect the validity of the remaining portions of this Ordinance.

Section XV. Effective Date. Upon its adoption by the City Council, this ordinance shall become effective.

Page **19** of **20**

INTRODUCED AND APPROVED AS TO FORM ONLY ON THE FIRST READING BY THE CITY COUNCIL OF THE CITY OF GREEN COVE SPRINGS, FLORIDA, ON THIS 15th DAY OF FEBRUARY 2022.

	CITY OF GREEN COVE SPRINGS, FLORIDA	
	Constance Butler, Mayor	
ATTEST:		
Erin West, City Clerk		
PASSED ON SECOND AND FINAL GREEN COVE SPRINGS, FLORIDA	READING BY THE CITY COUNCIL OF THE CITY OF , THIS 1st DAY OF MARCH 2022.	
	CITY OF GREEN COVE SPRINGS, FLORIDA	
	Constance Butler, Mayor	
ATTEST:		
Erin West, City Clerk		
APPROVED AS TO FORM:		
L. J. Arnold, III, City Attorney		

SUBPART B - LAND DEVELOPMENT CODE Chapter 113 - DEVELOPMENT STANDARDS ARTICLE VI. LANDSCAPING

ARTICLE VI. LANDSCAPING

Sec. 113-242. Purpose and intent.

- (a) Landscape, landscaped areas, buffers and tree protection shall be provided and/or accomplished for all premises in the manner set forth in this article. Required landscaped areas shall be located at or above grade unless otherwise prescribed in these land development regulations. The minimum provision of required landscape, landscaped areas, buffers and trees may be exceeded. Unless otherwise prescribed, the most stringent provision of this schedule shall prevail.
- (b) Landscape, buffer and tree protection requirements serve many purposes in the built-up environment. Landscape provides visual and climatic relief from buildings, structures and broad expanses of pavement; landscape buffers pedestrian and vehicular traffic; and trees provide shade, scenic beauty and natural habitat.
- (c) In general, landscaping and buffers shall be designed to:
 - (1) Enhance the urban development by blending natural and manmade environments.
 - (2) Provide shade for paved surfaces.
 - (3) Separate vehicular and non-vehicular use areas.
 - (4) Define vehicular access ways and access points.
 - (5) Screen vehicular movement, noise and glare.
 - (6) Provide visual and physical separation of potentially incompatible land uses.
 - (7) Incorporate water conservation features such as drought tolerant landscaping and reclaimed water usage as required herein.

(Code 2001, § 98-231; Ord. No. O-08-2011, § 5, 12-6-2011; Ord. No. O-03-2017, exh. A(98-231), 1-24-2017)

Sec. 113-243. Definitions.

The following words, terms and phrases, when used in this article, shall have the meanings ascribed to them in this section, except where the context clearly indicates a different meaning:

Berm means manmade earth contoured so as to form a mound above the general elevation of the adjacent ground or surface and designed to provide visual interest, screen undesirable view and/or decrease noise.

Buffer means a combination of physical space and vertical elements such as plants, berms, fences, or walls, whose purpose is to separate and screen incompatible land uses from one another.

Caliper means the diameter of a tree measured at breast height (DBH) which is approximately 4½ feet above the ground.

Canopy or shade tree means any tree grown specifically for its shade. The term "canopy or shade tree" usually applies to large trees with spreading canopies. Canopy trees normally grow to a minimum overall height of 30 feet and an average mature crown spread of 25 feet. Oaks, maples, ashes, lindens, and elms are examples canopy/shade trees. Canopy trees shall be a minimum of 2.5 inches caliper DBH.

Clear trunk means the distance between the top of the root ball and the point of the trunk where lateral branching begins.

Commercial means all uses in RPO, CBD, GCN, GCC, C-1, and C-2 zoning districts and commercial development in a PUD zoning district.

Common area means that area which will be maintained by a homeowners association, city service area, or other form of cooperative organization.

Decorative turf means turf used purely for ornamental purposes having no use other than aesthetics.

Drip line means the vertical line running through the outermost portion of the tree crown projected vertically to the ground.

Fully shielded lighting means lighting constructed in such a manner that all light emitted by the fixture, either directly from the lamp or a diffusing element, or indirectly by reflection or refraction from any part of the luminaire, is projected below the horizontal. Such fixtures usually have a flat, horizontally oriented lens and opaque (usually metal) sides. They are often described as shoebox luminaries if the luminaire has a predominantly rectangular form. Fixtures that either have reflecting surfaces or lenses (clear or prismatic) located below the lamp and visible from the side or above and fixtures that can be mounted such that the shielding is ineffective are not considered fully shielded lighting.

Groundcover means a low-growing plant, including turf grass, that, by the nature of its growth characteristics, completely covers the ground and does not usually exceed two feet in height.

Hat racking ortopping means pruning a tree in such a way that the majority of limbs are removed and the tree is left with only a trunk and the stumps of a few primary limbs, with little or no foliage or other trimming or pruning that has the effect of preventing a tree from attaining its natural height and/or shape.

Hedge means a row of evenly spaced shrubs planted to form a continuous unbroken visual screen.

Industrial means all uses in M-1 and M-2 zoning districts and all industrial uses in a PUD zoning district.

Landscape means vegetative and inert materials, including, but not limited to, grass, sod, shrubs, vines, hedges, trees, flowers, berms and complementary structural landscape architectural features such as rocks, fountains, sculpture, decorative walls and tree wells or other hardscape features.

Landscaped area means land area to be provided with landscape.

Landscaped strip orlandscaped island means required landscaped areas containing ground cover, shrubs, trees and/or other landscape used to divide parking areas into individual bays.

Moisture sensingswitch means a device which has the ability to shut off an automatic irrigation controller after receiving a determined amount of rainfall.

Mulch means nonliving organic materials such as wood chips that is customarily placed around the base of trees, shrubs and groundcovers for the purpose of retaining moisture and retarding weed infestation and soil erosion. Also, mulch is used in pathways and play areas.

Native or naturalizing plant species means plant species native to the region or introduced which once established are capable of sustaining growth and reproduction under local climatic conditions, without supplemental watering.

Nonresidential means, pursuant to land use category headings reflected in Schedule B, Permitted Uses, in these land development regulations, all commercial, transient lodging and entertainment, automotive, miscellaneous business and services, industrial and public/semi-public uses.

Parking area means a paved ground surface area used for the temporary parking and maneuvering of vehicles by employees or customers, either for compensation or to provide an accessory service to a commercial, industrial, institutional or residential use.

Paved ground surface area. See section 101-5.

Poodle cut means stripping off the lower branches of a tree and rounding or shearing the ends of the greenery to create an unnatural shape.

Required landscaped area means any landscaped area required in this Code.

Residential means all uses in R-1, R-2, R-3 and PUD zoning districts; one-family, two-family and multiple-family dwellings.

Shrub means a self-supporting woody species of plant characterized by persistent stems and branches springing from the base.

Specimen tree means a particularly fine or unusual example of any tree due to its age, size, rarity, environmental value or exceptional aesthetic quality. A tree may also be designated a specimen due to its association with historic events or persons. A specimen tree cannot be of a species that is unacceptable as referenced in list of exempt trees in this Code.

Tree means a self-supporting woody plant of a species that normally grows to a minimum overall height of 15 feet and has an average mature crown spread greater than 15 feet within the city.

Turf means upper layer of soil bound by grass and plant roots into a thick mat.

Understory, sub-canopy trees means trees which normally grow to a maximum overall height of 15 feet and an average mature crown spread of 15 feet.

Vehicular circulation area means streets, rights-of-way, access ways, parking spaces, parking, loading and unloading and other similar or related functions.

(Code 2001, § 98-232; Ord. No. O-08-2011, § 5, 12-6-2011; Ord. No. O-03-2017, exh. A(98-232), 1-24-2017)

Sec. 113-244. Required landscaping.

- (a) Landscape requirements for one-family dwellings and two-family dwellings shall be as follows:
 - (1) At least one canopy tree, 2.5 inches DBH, shall be located in the required front yard of each dwelling unit.
 - (2) The lot shall be sodded, seeded, or appropriate ground cover for erosion control.
- (b) Landscape requirements for nonresidential uses, including multifamily structures with three or more dwelling units, shall be as follows:
 - (1) Perimeter landscaping. At a minimum, each site developed for multifamily, institutional, commercial, or industrial uses will contain one shade or canopy tree for each 50 linear feet of the perimeter of the site.
 - (2) Interior landscaping. There will be one tree per every 1,500 square feet of the first 10,500 square feet of the project site, then one tree for every 4,000 square feet of the remainder of the project site. The trees shall be an equal proportion of shade (canopy) and understory trees. At a minimum, 15 percent of the site shall be landscaped.
- (c) Landscape adjacent to streets and parcels.
 - (1) A landscaped strip shall be provided along all parcel lines and abutting street right-of-way lines.

- (2) The depth of the required landscaped strip shall be measured and provided parallel to the parcel line or abutting street right-of-way in question.
- (3) Landscaped strips shall be considered to be required landscaped area.
- (4) A landscaped strip may be included in satisfying buffer requirements.
- (d) Landscaped strips shall be provided in the following manner:
 - (1) Ten-foot landscaped strip along all rights-of-way.
 - (2) Alternative design for properties fronting on all roads classified as arterials, including, but not limited to, U.S. 17 (Orange Avenue), S.R. 16 East (Leonard C. Taylor Parkway) and S.R. 16 West (Ferris Street and Idlewild Avenue), shall comply with the following standards: The developer/property owner shall be responsible for providing a landscape buffer in the area abutting the designated roadway right-ofway lines by meeting on of the following conditions:
 - a. The roadway shall be separated from the back of curb by a six-foot landscaped strip, a six-foot pedestrian walkway, then a six-foot landscaped strip.
 - b. Building setback shall be calculated from the back of curb or ten-foot landscaped strip along all rights-of-way.
 - c. Alternative designs. Where natural features or spacing of existing driveways and roadways cause the access requirements of this section affecting placement or planting of landscaped buffers or trees to be physically infeasible, alternate designs may be approved as part of the issuance of the final development order.
 - (3) The landscape buffer area shall be planted in the following manner:
 - a. Canopy trees.
 - 1. One row of canopy trees, 2.5 inches DBH at planting. For 50 percent of the canopy trees, two sub-canopy/understory trees may be substituted for each canopy tree.
 - 2. The trees shall be planted every 50 feet and staggered so as to be midway between each other, and equal distance between each row and right-of-way and/or parcel line. Trees shall be evenly spaced. The tree spacing may be altered with approval of the development services, provided the total number of trees is provided.
 - b. *Sub-canopy/understory trees.* A minimum of four sub-canopy/understory trees per 100 feet of frontage shall be planted in and about each access point and intersection.
 - c. Hedges. When off-street parking, loading, unloading and vehicular circulation areas are to be located adjacent to the street right-of-way, a dense hedge of evergreen-type shrubs shall be provided in the following manner:
 - 1. At initial planting and installation, shrubs shall be at least 24 inches in height and shall be planted at least 36 inches or less on center.
 - 2. The hedge shall be planted four feet or more from the tree trunks.
 - Within two years of initial planting and installation, shrubs shall have attained and be maintained at a minimum height of three feet and shall provide an opaque vegetative screen between the street and the use of the premises.
 - 4. In lieu of a vegetative hedge, the use of vegetated berms or other appropriate landscape materials in a manner that results in the visual separation of street right-of-way can be approved by the development services director.

d. Shrubs.

- Buffer areas, not adjacent to a street right-of-way, shall include nine shrubs for every 100 linear feet of the parcel line
- 2. Shrubs shall be at least 24 inches in height at the time of planting.
- (e) Groundcover. The buffer area shall be planted with groundcover minimum of 18 inches on center or solid grass sod, unless natural area to remain.

(Code 2001, § 98-233; Ord. No. O-01-2000, § 6.06.02, 6-6-2000; Ord. No. O-08-2011, § 5, 12-6-2011; Ord. No. O-03-2017, exh. A(98-233), 1-24-2017)

Sec. 113-245. Exemptions and exceptions to landscape requirements.

Interior landscaping for parking garages or other vehicle use areas contained entirely with a roofed and walled structure. Landscaping shall be provided around the perimeter of the structures.

(Code 2001, § 98-234; Ord. No. O-01-2000, § 6.06.01, 6-6-2000; Ord. No. O-08-2011, § 5, 12-6-2011; Ord. No. O-03-2017, exh. A(98-234), 1-24-2017)

Sec. 113-246. Parking area landscaping.

The requirements of this section apply to all development, unless exempted:

- (1) Internal landscape area.
 - a. Minimum required land area for required landscaped areas not in a parking area. Each required landscaped area shall contain a minimum land area of 200 square feet.
 - b. The minimum required internal landscaped area for parking areas shall cover ten percent of the parking area.
 - c. Required landscaped area for rows of parking spaces.
 - 1. A landscaped area shall be provided at each end of all rows of parking.
 - 2. In addition, at least one landscaped area shall be provided between every ten parking spaces.
 - 3. Each required landscaped area shall be five feet wide inside the curb or paving line running the entire length of the parking space.
 - 4. At least one canopy tree shall be provided at each island.
 - 5. A five-foot turning radius shall be accommodated at the end of parking rows.
 - d. Parking space reduction to protect existing trees. The development services director shall have the authority to reduce the required number of off-street parking spaces when such reduction would result in the preservation of existing trees.
 - 1. Trees to be preserved must be a minimum of 12 inches in diameter measured at breast height above the ground.
 - 2. The reduction in the number of required parking spaces shall result in a reduction in an amount of required parking of less than five percent of the total number of required offstreet parking spaces.

(2) Required trees.

- a. At least one canopy tree shall be provided in each required landscaped area.
- b. One canopy trees or two sub canopy trees shall be provided for each required landscaped area for the rows of parking. A minimum of 50 percent of the trees used shall be canopy trees.
- (3) Location of landscaped areas for interior landscaping.
 - a. A landscaped area or buffer shall be provided between all parking areas and principal structures or any sidewalks and street or rights-of-way.
 - b. This landscape area or buffer must contain at least one canopy tree per 50 feet linear perimeter of the parcel.
 - c. Every effort will be made to retain native vegetation and trees.
 - d. Minimum width of the landscape area:
 - 1. Ten feet when abutting a public right-of-way.
 - 2. Five feet when abutting alleys or the rear or side property lines.
 - e. Each landscaped area shall have five shrubs per each tree required.
 - f. All landscaped areas shall be covered in groundcover or turf.
- (4) Maintenance of planted areas.
 - a. Irrigation shall be provided for all new planting. Hose bibs maybe installed as an alternative, one hose bib within 75 feet of all landscaped areas.
 - b. Maintenance shall be the responsibility of the developer and/or landowner.
 - c. Failure to maintain landscaped areas shall be considered a violation of this subpart and subject to code enforcement.
- (5) Buffer zones for incompatible land uses.
 - a. A buffer zone is a five-foot landscaped strip along parcel boundaries that serves as a buffer between incompatible uses and land use districts. This shall not be interpreted to mean that parcels within a planned mixed use development must meet these requirements.
 - b. A buffer zone shall have a visual screen running the entire length of the property with a minimum opacity of 85 percent and a minimum height of six feet.
 - c. The use of existing native vegetation in buffer zones is preferred.
 - d. A five-foot buffer of native vegetation between a conservation designated land use and any other development shall be required. This is not in addition to buffers required by any permitting agency.
- (6) Street trees for subdivisions.
 - a. The developer shall plant, within ten feet of the right-of-way of each street within a residential development meeting the subdivision requirements of this Code, one canopy tree for every 50 linear feet of right-of-way.
 - b. Except where property on one side of the right-of-way is not owned by the developer, the trees shall be planted alternately on either side of the street.
 - c. Existing trees and native tree species that need less water and maintenance are preferred.

- d. Coordination with the city utility departments is required prior to planting the street trees.
- e. Street trees planted shall have a minimum overall height of 2.5-inch DBH at time of planting.
- (7) Certain functional uses not permitted. No accessory structures, garbage or trash collection points or receptacles, parking, or any other functional use shall be permitted in the minimum required landscape area and/or buffer zone. Combining of compatible functions such as landscaping and drainage facilities are permitted.
- (8) Concealing and location of dumpsters.
 - a. Dumpsters must be concealed in opaque concrete, brick or chain-link fence with screening slats of enough height consistent with the size of the container to shield the container from view from all sides.
 - b. The front of screen must be accessible for service of the container.
 - c. The dumpster must be located on a paved surface of asphalt or concrete.
- (9) Clear line of sight. An unobstructed cross visibility shall be required with in a triangle area formed by the intersection of two rights-of-way or access ways, as referenced in section 113-76.

(Code 2001, § 98-235; Ord. No. O-01-2000, § 6.06.03, 6-6-2000; Ord. No. O-08-2011, § 5, 12-6-2011; Ord. No. O-03-2017, exh. A(98-235), 1-24-2017)

Sec. 113-247. Landscape design and materials.

- (a) Design principles. All landscaped areas required shall conform to the following general design principles:
 - (1) Landscaping should integrate the proposed development into existing site features through consideration of existing topography, hydrology, soils and vegetation.
 - (2) The functional elements of the development plan, particularly the drainage systems and internal circulation systems for vehicles and pedestrians, should be integrated into the landscaping plan.
 - (3) Landscaping should be used to minimize potential erosion through the use of ground covers or any other type of landscape material that aids in soil stabilization.
 - (4) Existing native vegetation should be preserved and used to meet landscaping requirements.
 - (5) Landscaping should enhance the visual environment through the use of materials that achieve variety with respect to seasonal changes, species of living material selected, textures, colors and size at maturity.
 - (6) Landscaping design should consider the aesthetic and functional aspects of vegetation, both when initially installed and when the vegetation has reached maturity. Newly installed plants should be placed at intervals appropriate to the size of the plant at maturity, and the design should use short-term and long-term elements to satisfy the general design principles of this section over time.
 - (7) Landscaping should enhance public safety and minimize nuisances.
 - (8) All landscaping and plant material shall be planted in a manner which shall not be intrusive or interfere, at or before maturity, with pavement surfaces, power, cable television, or telephone lines, sewer or water pipes, or any other existing or proposed overhead or underground utility services.
 - (9) Landscaping should maximize the shading of streets and vehicle use areas.
 - (10) Architectural planters.
 - a. Planters can be are used to meet landscaping requirements.

- b. Planters shall be a minimum of ten square feet and shall have minimum depth of 15 inches.
- c. Planters shall be maintained and replanted if necessary.
- d. Planters cannot be located within the city right-of-way without prior consent from the development services director.
- (b) Installation of required landscape and trees.
 - (1) General. All required trees and landscaping shall be installed according to generally accepted commercial planting procedures. Soil, free of limerock, rocks, and other construction debris, shall be provided. All landscaped areas shall be protected from pedestrian and vehicular encroachment by raised planting surfaces, depressed walks, curbs, edges, wheel stops and the like.
 - (2) Florida No. 1 quality.
 - a. All required plant materials, including, but not limited to, trees and shrubs, shall equal or exceed the standards for Florida No. 1 as established and revised by the state department of agriculture and consumer services.
 - b. Grass sod shall be healthy and reasonably free of weeds, pests and disease.
 - (3) Proper planting and anchoring.
 - a. All plant material shall be mulched to a depth of two inches.
 - b. Trees shall be installed with anchoring for a period of at least one year, in order to provide sufficient time for their roots to become established.
 - Trees with trunks under four inches in diameter should be staked with one to three stakes.
 - 2. Trees with a diameter of 2.5 inches or more DBH should be guyed with three to four guy wires.

(4) Irrigation.

- a. All landscaped areas shall be watered with an underground irrigation system or a drip irrigation system or hose bibs designed to allow differential operation schedules for high and low water requirement areas. To avoid operation of the system during periods of increased rainfall, an operational moisture sensor switch shall be required on all irrigation systems equipped with automatic controls that will override the irrigation cycle of the sprinkler system when adequate rainfall has occurred.
- b. The use of reclaimed water as a water supply source for irrigation shall be required when such source is available or anticipated to be available within 100 feet of an existing or proposed city reclaimed water line. In areas where food is served or consumed, such as outdoor eating areas of restaurants, a dual supply source distribution system shall be installed whereby potable water shall serve as the source for the food serving and/or consumption areas and reclaimed water shall serve as the supply source in all other landscaped areas.
- c. If a landscaped area contains primarily species native to the immediate region, or plants acceptable for xeriscape landscaping, the development services director may waive the requirement for installation of an irrigation system. Consideration of a waiver of the irrigation requirement shall include, in addition to the area covered by native vegetation, such local conditions as sun or shade, use of fill soil, and depth to water table.
- b. The development services director may require or otherwise approve water supply provisions for unusual landscape conditions provided, however, that a readily available water source shall be located within 100 feet of any required landscaping plant material.

- (5) Berm. When a berm is used to form a required visual screen in lieu of, or in conjunction with, a required hedge or wall, such berm shall not exceed a slope of 30 degrees and shall be completely covered with shrubs, trees, or other living ground cover.
- (6) Grass.
 - a. Grass shall be seeded, plugged, or sodded.
 - b. On swales, berms or other areas that are subject to erosion, grass shall be completely sodded.
- (7) Ground cover. Ground cover shall be installed and maintained for all improved parcels, in order to prevent erosion and dust. Ground cover used in lieu of grass shall be planted in such a manner so as to present a finished appearance and reasonably complete coverage within three months after planting.
- (8) Nonliving materials. Mulch shall be a minimum depth of two inches.
- (c) Recommended plant list. Below is a list of recommended plants by category:

Understory Trees/Sub-Canopy	
Common Name	Botanical Name
Redbud	Cercis canadensis
Anise	Illicium spp.
Drake/Chinese elm	Ulmus parvifolia
Flowering dogwood	Comus florida
Wax myrtle	Myrica cerifera
Loblolly bay	Gordonia lasianthus
Southern red cedar	Juniperus silicicola
Yaupon holly	Ilex vomitoria
Fringe tree	Chionanthus virginica
Sweet bay magnolia	Magnolia virginana
Chinese fan palm	Livistona chenensis
Windmill palm	Trachycarpus fortunii
Washington palm	Washingtonian robusta
Dahoon holly	Ilex cassine
Savannah holly	Ilex opaca × attenuate & cultivars
River birch	Betula nigra
Palatka holly	Ilex attenuate

Understory	
Common Name	Botanical Name
Crape myrtle	Lagerstroemia × fauriei
Wax myrtle	Myrica cerifera
Loblolly bay	Gordonia lasianthus
Junipers	Juniperus torulosa & spartan
Bottlebrush	Callistemon spp.
Redbud	Cercis canadensis
Rusty pittosporum	Pittosporum ferrugineum
Podocarpus	Podocarpus nagi
Holly	Ilex spp.
Leyland cypress	Cupressocyparis leylandi

Canopy Trees	
Common Name	Botanical Name
American elm	Ulmus americana
Live oak	Quercus virginiana
Chinese elm	Ulmus parvifolia
Red bay	Persea borbonia
American sycamore	Platanus occidentalis
Tulip tree	Lirodendron tulipifera
Southern magnolia	Magnolia grandiflora & cultivar
Laurel oak	Quercus laurifolia
Canary Island palm	Phoenix canariensis
European fan palm	Chamaerops humillis
Pindo palm	Butia capitata
Hornbeam/bluebeech	Carpinus caroliniana
Water ash; pop ash	Fraxinus caroliniana
Florida winged elm	Ulmus alata
Florida elm	Ulmus americana floridana
Red maple	Acer rubrum
American holly	Ilex opaca & cultivars
Loblolly bay	Gordonia lasianthus

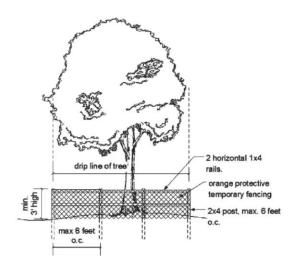
- (d) Unacceptable plant species. All prohibited species shall be allowed to be removed without a permit and prior to the development of the site.
- (e) Maintenance and replacement of landscape plants. All plant material shall be maintained according to the following standards:
 - (1) All required trees, shrubs and landscaped areas shall be maintained in good and healthy condition for as long as the use continues to exist.
 - (2) Maintenance shall consist of mowing, removing of litter and dead plant material, necessary pruning, pest control, water and fertilizing.
 - (3) Maintenance also includes, but is not limited to, the replacement of plants damaged by insects, disease, vehicular traffic, acts of God and vandalism.
 - (4) Necessary replacements shall be made within a time period not to exceed 30 days after notification by the city of the violation.
 - (5) In order to increase the tree canopy within the city, give shade to paved surfaces, buffer pedestrian and vehicular traffic and provide scenic beauty and natural habitat, as well as prevent decay, sunburn and hazards to trees, all landscape material shall be pruned to maintain the natural shape of the plant.
 - (6) No topping, hat racking, poodle cutting, excess pruning or excess crown reduction shall be performed on trees within the right of way.
 - (7) The city shall encourage the standards of the International Society of Arboriculture and the Tree Care Industry Association for tree care operations, plant maintenance and proper pruning methods.

(Code 2001, § 98-236; Ord. No. O-01-2000, § 6.06.04, 6-6-2000; Ord. No. O-08-2011, § 5, 12-6-2011; Ord. No. O-03-2017, exh. A(98-236), 1-24-2017)

Sec. 113-248. Tree preservation during development and construction.

- (a) Protective barriers.
 - (1) During construction, protective barriers shall be placed, as necessary and/or as directed by the development services director, to prevent the destruction or damaging of trees.
 - (2) Trees destroyed or receiving major damage must be replaced before occupancy or use unless approval for their removal has been granted during the site plan approval process
 - (3) All trees not designated for removal may be required to be protected by barrier zones erected prior to construction of any structures, roads, utility service, or other improvements,
- (b) The protective barrier shall be constructed to the following standards:
 - (1) The protective barrier shall be constructed outside the drip line of the tree, when possible (see Figure A). The protective barrier shall have a minimum of a six-inch radius, plus one inch for each one inch of caliper.
 - (2) The protective barrier shall be a minimum of three feet high.
 - (3) Protective barrier posts shall be two inches by four inches or larger and shall be no more than six feet apart.
 - (4) The barrier shall have two one-by-four-inch horizontal railings affixed securely to the posts.
 - (5) The entire protective zone shall be wrapped in orange safety fencing material, a minimum of three feet in height.
 - (6) The protective barriers shall be inspected by the department prior to the commencement of construction.
- (c) No grade changes shall be made within the protective barrier zones without prior approval of the city development services director.
- (d) Where roots greater than one-inch diameter are exposed, they shall be cut cleanly.
- (e) Protective barrier zones shall remain in place and intact until such time as landscape operations begin or construction is complete, whichever occurs first.
- (f) The development services director may conduct periodic inspections of the site before work begins and during clearing, construction and post-construction phases of development in order to ensure compliance.
- (g) No building materials, machinery or temporary soil deposits shall be placed within protective barrier zones defined above.
- (h) No attachments or wires other than those of a protective or non-damaging nature shall be attached to any tree.

Figure A



(Code 2001, § 98-237; Ord. No. O-08-2011, § 5, 12-6-2011; Ord. No. O-03-2017, exh. A(98-237), 1-24-2017)

Secs. 113-249—113-274. Reserved.

ARTICLE VI. LANDSCAPING

Sec. 113-242. Purpose and intent.

- (a) Landscape, landscaped areas, buffers, and tree protection shall be provided and/or accomplished for all premises in the manner set forth in this article. Required landscaped areas shall be located at or above grade unless otherwise prescribed in these land development regulations. The minimum provision of required landscape, landscaped areas, buffers, and trees may be exceeded. Unless otherwise prescribed, the most stringent provision of this schedule shall prevail.
- (b) Landscape, buffer, and tree protection requirements serve many purposes in the built-up environment. Landscape provides visual and climatic relief from buildings, structures, and broad expanses of pavement; landscape buffers pedestrian and vehicular traffic; and trees provide shade, scenic beauty, and natural habitat.
- (c) In general, landscaping and buffers shall be designed to:
 - (1) Enhance the urban development by blending natural and manmade environments.
 - (2) Provide shade for paved surfaces.
 - (3) Separate vehicular and non-vehicular use areas.
 - (4) Define vehicular access ways and access points.
 - (5) Screen vehicular movement, noise, and glare.
 - (6) Provide visual and physical separation of potentially incompatible land uses.
 - (7) Incorporate water conservation features such as drought tolerant landscaping and reclaimed water usage as required herein.
 - (8) Provide a protective buffer to mitigate the impact of climate change and enhance urban biodiversity.
- (d) As recommended by Florida Title XXVIII, Chapter 373, plant selection for development projects withing the city of Green Cove Springs shall be in compliance with Florida Friendly Landscaping as provided for Zip Code 32043 on the Institute of Food and Agricultural Sciences (IFAS), University of Florida web site; https://ffl.ifas.ufl.edu/apps/plants/

(Code 2001, § 98-231; Ord. No. O-08-2011, § 5, 12-6-2011; Ord. No. O-03-2017, exh. A(98-231), 1-24-2017)

Sec. 113-243. Definitions.

The following words, terms, and phrases, when used in this article, shall have the meanings ascribed to them in this section, except where the context clearly indicates a different meaning:

Berm means manmade earth contoured so as to form a mound above the general elevation of the adjacent ground or surface and designed to provide visual interest, screen undesirable view and/or decrease noise.

Buffer means a combination of physical space and vertical elements such as plants, berms, fences, or walls, whose purpose is to separate and screen incompatible land uses from one another.

Caliper means the diameter of a tree measured at breast height (DBH) which is approximately 4½ feet above the ground.

Canopy or shade tree means any tree grown specifically for its shade. The term "canopy or shade tree" usually applies to large trees with spreading canopies. Canopy trees normally grow to a minimum overall height of 30 feet and an average mature crown spread of 25 feet. Oaks, maples, ashes, lindens, and elms are examples canopy/shade trees. Canopy trees shall be a minimum of 2.5 inches caliper DBH. Canopy Trees paced 50 Feet apart Listed in IFAS as "Trees – Large" (ffl.ifas.ufl.edu/plants).

Clear trunk means the distance between the top of the root ball and the point of the trunk where lateral branching begins.

Commercial means all uses in RPO, CBD, GCN, GCC, C-1, and C-2 zoning districts and commercial development in a PUD zoning district.

Common area means that area which will be maintained by a homeowner's association, city service area, or other form of cooperative organization.

Dangerous Tree means any tree of any species which poses an immediate threat to persons or property due to disease, age, or mechanical injury. This can include damage from storms or other environmental factors.

Decorative turf means turf used purely for ornamental purposes having no use other than aesthetics.

Drip line means the vertical line running through the outermost portion of the tree crown projected vertically to the ground.

Florida Friendly Landscaping means quality landscapes that conserve water, protect the environment, are adaptable to local conditions, and are drought tolerant. The principles of such landscaping are the right plant in the right place, efficient watering, appropriate fertilization, mulching, attracting wildlife, responsible management of yard pests, recycling yard waste, reduction of storm runoff, and waterfront protection. Additional components include practices such as landscape planning and design, soil analysis, the appropriate use of solid waste compost, minimizing the use of irrigation, and proper maintenance.

Fully shielded lighting means lighting constructed in such a manner that all light emitted by the fixture, either directly from the lamp or a diffusing element, or indirectly by reflection or refraction from any part of the luminaire, is projected below the horizontal. Such fixtures usually have a flat, horizontally oriented lens and opaque (usually metal) sides. They are often described as shoebox luminaries if the luminaire has a predominantly rectangular form. Fixtures that either have reflecting surfaces or lenses (clear or prismatic) located below the lamp and visible from the side or above and fixtures that can be mounted such that the shielding is ineffective are not considered fully shielded lighting.

Grasses listed in IFAS, ((ffl.ifas.ufl.edu/plants) as "Turfgrasses."

Groundcover means a low-growing plant, including turf grass, that, by the nature of its growth characteristics, completely covers the ground and does not usually exceed two feet in height. Groundcovers are listed in IFAS as "Groundcovers."

Hat racking or topping means pruning a tree in such a way that the majority of limbs are removed and the tree is left with only a trunk and the stumps of a few primary limbs, with little or no foliage or other trimming or pruning that has the effect of preventing a tree from attaining its natural height and/or shape.

Hedge means a row of evenly spaced shrubs planted to form a continuous unbroken visual screen.

Immediate danger of collapse means that the tree may already be leaning, with the; surrounding soil heaving, and/or there is a significant likelihood that the tree will topple or otherwise fail and cause damage before a tree removal permit could be obtained through the non-. emergency process. "Immediate danger of collapse" does not include hazardous conditions that can be alleviated by pruning or treatment.

Industrial means all uses in M-1 and M-2 zoning districts and all industrial uses in a PUD zoning district.

Invasive Species means plants, animals, and other living organisms (e.g., microbes), non-native (or alien) to the ecosystem under consideration and, whose introduction causes or is likely to cause economic or environmental harm or harm to human health.

Landscape means vegetative and inert materials, including, but not limited to, grass, sod, shrubs, vines, hedges, trees, flowers, berms, and complementary structural landscape architectural features such as rocks, fountains, sculpture, decorative walls and tree wells or other hardscape features.

Landscaped area means land area to be provided with landscape.

Landscaped strip or landscaped island means required landscaped areas containing ground cover, shrubs, trees and/or other landscape used to divide parking areas into individual bays.

Large Ornamental listed in IFAS ((ffl.ifas.ufl.edu/plants) as "Palms and Palm Like Plants."

Mitigation means the action used by an individual, company or agency to identify and minimize the risks from a proposed action that will reduce its impacts on people, property, and the environment and will restore and retain the biodiversity of the site.

Moisture sensors which means a device which has the ability to shut off an automatic irrigation controller after receiving a determined amount of rainfall.

Mulch means nonliving organic materials such as wood chips that is customarily placed around the base of trees, shrubs, and groundcovers for the purpose of retaining moisture and retarding weed infestation and soil erosion. Also, mulch is used in pathways and play areas.

Native or naturalizing plant species means plant species native to the region or introduced which once established are capable of sustaining growth and reproduction under local climatic conditions, without supplemental watering and enhance habitat for native wildlife.

Nonresidential means, pursuant to land use category headings reflected in Schedule B, Permitted Uses, in these land development regulations, all commercial, transient lodging and entertainment, automotive, miscellaneous business and services, industrial and public/semi-public uses.

Ornamental Landscape Trees, listed in IFAS (ffl.ifas.ufl.edu/plants) as "Trees - Medium."

Parking area means a paved ground surface area used for the temporary parking and maneuvering of vehicles by employees or customers, either for compensation or to provide an accessory service to a commercial, industrial, institutional or residential use.

Paved ground surface area. See section 101-5.

Poodle cut means stripping off the lower branches of a tree and rounding or shearing the ends of the greenery to create an unnatural shape.

Protected Area means an existing natural area that has been determined by the City of Green Cove Springs, to be of significant aesthetic, environmental, or monetary value or which affords collective protection for the city, and has been designated as protected by the City Council.

Protected Specimen tree means a particularly fine or unusual example of any tree due to its age, size, rarity, environmental or historical value or exceptional aesthetic quality. A tree may also be designated a specimen due to its association with historic events or persons. A specimen tree cannot be of a non-native species that is unacceptable as referenced in list of exempt trees in this Code. is approved or denied. Designation will be annotated on the title to the property. Reversal of this determination will require action by the City Council.

Required landscaped area means any landscaped area required in this Code.

Residential means all uses in R-1, R-2, R-3, and PUD zoning districts; one-family, two-family and multiple-family dwellings.

Shrub means a self-supporting woody species of plant characterized by persistent stems and branches springing from the base. Shrubs and requirements for Visual Screens listed in IFAS (ffl.ifas.ufl.edu/plants as "Shrubs-Large" spaced on center per guidance under "Appearance."

Specimen Tree (REMOVED)

Tree means a self-supporting woody plant of a species that normally grows to a minimum overall height of 15 feet and has an average mature crown spread greater than 15 feet within the city.

Turf means upper layer of soil bound by grass and plant roots into a thick mat.

Understory, sub-canopy trees means trees which normally grow to a maximum overall height of 15 feet and an average mature crown spread of 15 feet. Understory Trees. listed in IFAS ((ffl.ifas.ufl.edu/plants as "Trees – Small"

Vehicular circulation area means streets, rights-of-way, access ways, parking spaces, parking, loading, and unloading, and other similar or related functions.

Viable tree is a tree that is in compliance with Florida Friendly Landscaping as provided for Zip Code 32043 on the Institute of Food and Agricultural Sciences, University of Florida web site, which is capable of growing and developing in its natural form upon completion of development of a site. Trees that are dead, dying, or have their root systems or crowns severely altered during construction or are dangerous because of their growth habits are not a viable tree.

(Code 2001, § 98-232; Ord. No. O-08-2011, § 5, 12-6-2011; Ord. No. O-03-2017, exh. A(98-232), 1-24-2017)

Sec. 113-244. Required landscaping.

- (a) Landscape requirements for one-family dwellings and two-family dwellings shall be as follows:
 - (1) At least one canopy tree, 2.5 inches DBH, shall be located in the required front yard of each dwelling unit.
 - (2) The lot shall be sodded, seeded, or appropriate ground cover for erosion control.
- (b) Landscape requirements for nonresidential uses, including multifamily structures with three or more dwelling units, shall be as follows:
 - (1) Perimeter landscaping. At a minimum, each site developed for multifamily, institutional, commercial, or industrial uses will contain one shade or canopy tree for each 50 linear feet of the perimeter of the site.
 - (2) Interior landscaping. There will be one tree per every 1,500 square feet of the first 10,500 square feet of the project site, then one tree for every 4,000 square feet of the remainder of the project site. The trees shall be an equal proportion of shade (canopy) and understory trees. At a minimum, 15 percent of the site shall be landscaped.
- (c) Landscape adjacent to streets and parcels.
 - (1) A landscaped strip shall be provided along all parcel lines and abutting street right-of-way lines.
 - (2) The depth of the required landscaped strip shall be measured and provided parallel to the parcel line or abutting street right-of-way in question.
 - (3) Landscaped strips shall be considered to be required landscaped area.
 - (4) A landscaped strip may be included in satisfying buffer requirements.
- (d) Landscaped strips shall be provided in the following manner:

- (1) Ten-foot landscaped strip along all rights-of-way.
- (2) Alternative design for properties fronting on all roads classified as arterials, including, but not limited to, U.S. 17 (Orange Avenue), S.R. 16 East (Leonard C. Taylor Parkway) and S.R. 16 West (Ferris Street and Idlewild Avenue), shall comply with the following standards: The developer/property owner shall be responsible for providing a landscape buffer in the area abutting the designated roadway right-ofway lines by meeting one of the following conditions:
 - a. The roadway shall be separated from the back of curb by a six-foot landscaped strip, a six-foot pedestrian walkway, then a six-foot landscaped strip.
 - b. Building setback shall be calculated from the back of curb or ten-foot landscaped strip along all rights-of-way.
 - c. Alternative designs. Where natural features or spacing of existing driveways and roadways cause the access requirements of this section affecting placement or planting of landscaped buffers or trees to be physically infeasible, alternate designs may be approved as part of the issuance of the final development order.
- (3) The landscape buffer area shall be planted in the following manner:
 - a. Canopy trees.
 - 1. One row of canopy trees, 2.5 inches DBH at planting. For 50 percent of the canopy trees, two sub-canopy/understory trees may be substituted for each canopy tree.
 - 2. The trees shall be planted every 50 feet and staggered so as to be midway between each other, and equal distance between each row and right-of-way and/or parcel line. Trees shall be evenly spaced. The tree spacing may be altered with approval of the development services, provided the total number of trees is provided.
 - b. Sub-canopy/understory trees. A minimum of four sub-canopy/understory trees per 100 feet of frontage shall be planted in and about each access point and intersection.
 - c. Hedges. When off-street parking, loading, unloading and vehicular circulation areas are to be located adjacent to the street right-of-way, a dense hedge of evergreen-type shrubs shall be provided in the following manner:
 - 1. At initial planting and installation, shrubs shall be at least 24 inches in height and shall be planted at least 36 inches or less on center.
 - 2. The hedge shall be planted four feet or more from the tree trunks.
 - Within two years of initial planting and installation, shrubs shall have attained and be maintained at a minimum height of three feet and shall provide an opaque vegetative screen between the street and the use of the premises.
 - 4. In lieu of a vegetative hedge, the use of vegetated berms or other appropriate landscape materials in a manner that results in the visual separation of street right-of-way can be approved by the development services director.
 - d. Shrubs.
 - 1. Buffer areas, not adjacent to a street right-of-way, shall include nine shrubs for every 100 linear feet of the parcel line
 - 2. Shrubs shall be at least 24 inches in height at the time of planting.
 - (e) Groundcover. The buffer area shall be planted with groundcover minimum of 18 inches on center or solid grass sod, unless natural area to remain.

- (f) Landscape buffer between incompatible uses.
 - (1) General Requirements. Wherever a higher intensity property adjoins or abuts a lower intensity zoning district, a landscaped buffer area will be required along the total length of that adjoining or abutting property boundary to provide an attractive land use transition and reduce sight, glare, light and noise intrusion excluding properties located in the CRA (Community Redevelopment Area). This landscaped buffer area as set out in this section will be reviewed and approved during the site plan process.
 - (2) Where a business or industrial use is separated by a two-lane street from a residential district, then any plot in such nonresidential district adjacent to the separating street shall be provided with a yard at least 20 feet in depth along such separating street.
 - (3) A heavy industrial use abutting a residential district shall have a 40-foot-deep landscaped buffer area or a 25-foot-deep landscaped buffer area combined with a 6-foot high brick, stone or concrete block wall. Alternatives to the wall requirement such as wood or vinyl fencing can be approved by the Site Development Committee.
 - (4) A light or medium industrial or general commercial use abutting a less intensive district shall have a 25-foot-deep landscaped buffer area or a ten-foot-deep landscaped buffer area combined with a brick, stone or concrete block wall. Alternatives to the wall requirement such as wood or vinyl fencing can be approved by the Site Development Committee.
 - (5) A neighborhood business, institutional or office use or district abutting a less intensive use or district shall have a ten-foot-deep landscaped buffer area or a four-foot-deep landscaped buffer area combined with a stone, brick or concrete block wall. Alternatives to the wall requirement such as wood or vinyl fencing can be approved by the Site Development Committee.
 - (6) Multifamily and mobile home use abutting a less intensive use or district shall have a tenfoot-deep landscaped buffer area or a four-foot-deep landscaped area combined with a brick, stone or concrete block wall. Alternatives to the wall requirement such as wood or vinyl fencing can be approved by the Site Development Committee.
 - (7) A six-foot-high landscaped berm can be substituted for the wall requirement. The berm must be constructed as a 3:1 slope or less. The berms shall be landscaped with a combination of ground cover, sod, shrubs and Medium trees (as defined in this section), as provided for in this section. Large Trees can be substituted for ornamental trees, provided that the shade trees can meet the specifications set forth in Sec. 113-244(d)(3)(a).
 - (8) Landscape Specifications.
 - a. Acceptable plant material; irrigation; landscape plan. When a landscaped buffer area is required under this section, continuous hedging and small trees will be required. Hedge material shall reach a height of three feet in two years and six feet in four years, and should be accepted as cold hardy in this planting zone. All open areas in the buffer area shall be sodded. All landscaped areas shall have a properly installed irrigation system to give 100 percent coverage of the landscaped area, or use proper planting, maintenance and water conservation measures such as native or drought-tolerant vegetation to ensure the healthy survival of all sod, ground cover,

shrubs and trees. A landscape plan shall be submitted with every site plan showing the irrigation system or the alternate use of native or drought-tolerant vegetation.

- b. Spacing, size and quality of hedge material. Shrub material to be planted shall be a maximum of three feet on center. Plants shall be 18 inches to 24 inches minimum height at the time they are installed, in three-gallon containers.
- c. Spacing size of small trees. Trees shall meet the definition of Ornamental Landscape trees as set forth in Section 113-243. There shall be an average of one tree for every 25 linear feet of buffer area. Trees shall be a minimum of six feet to eight feet in height when installed.
- d. All vegetation shall be Florida Grade No. 1 or better.

Sec. 113-245. Exemptions and exceptions to landscape requirements.

Interior landscaping for parking garages or other vehicle use areas contained entirely with a roofed and walled structure. Landscaping shall be provided around the perimeter of the structures.

(Code 2001, § 98-234; Ord. No. O-01-2000, § 6.06.01, 6-6-2000; Ord. No. O-08-2011, § 5, 12-6-2011; Ord. No. O-03-2017, exh. A(98-234), 1-24-2017)

Sec. 113-246. Parking area landscaping.

The requirements of this section apply to all development, unless exempted:

- (1) Internal landscape area.
 - a. Minimum required land area for required landscaped areas not in a parking area. Each required landscaped area shall contain a minimum land area of 200 square feet.
 - b. The minimum required internal landscaped area for parking areas shall cover ten percent of the parking area.
 - c. Required landscaped area for rows of parking spaces.
 - 1. A landscaped area shall be provided at each end of all rows of parking.
 - 2. In addition, at least one landscaped area shall be provided between every ten parking spaces.
 - 3. Each required landscaped area shall be five feet wide inside the curb or paving line running the entire length of the parking space.
 - 4. At least one canopy tree shall be provided at each island.
 - 5. A five-foot turning radius shall be accommodated at the end of parking rows.
 - d. Parking space reduction to protect existing trees. The development services director shall have the authority to reduce the required number of off-street parking spaces when such reduction would result in the preservation of existing trees.
 - 1. Trees to be preserved must be a minimum of 12 inches in diameter measured at breast height above the ground.

- 2. The reduction in the number of required parking spaces shall result in a reduction in an amount of required parking of less than five percent of the total number of required offstreet parking spaces.
- (2) Required trees.
 - a. At least one canopy tree shall be provided in each required landscaped area.
 - b. One canopy tree or two sub canopy trees shall be provided for each required landscaped area for the rows of parking. A minimum of 50 percent of the trees used shall be canopy trees.
- (3) Location of landscaped areas for interior landscaping.
 - a. A landscaped area or buffer shall be provided between all parking areas and principal structures or any sidewalks and street or rights-of-way.
 - b. This landscape area or buffer must contain at least one canopy tree per 50 feet linear perimeter of the parcel.
 - c. Every effort will be made to retain native vegetation and trees.
 - d. Minimum width of the landscape area:
 - 1. Ten feet when abutting a public right-of-way.
 - 2. Five feet when abutting alleys or the rear or side property lines.
 - e. Each landscaped area shall have five shrubs per each tree required.
 - f. All landscaped areas shall be covered in groundcover or turf.
- (4) Maintenance of planted areas.
 - a. Irrigation shall be provided for all new planting. Hose bibs maybe installed as an alternative, one hose bib within 75 feet of all landscaped areas.
 - b. Maintenance shall be the responsibility of the developer and/or landowner.
 - Failure to maintain landscaped areas shall be considered a violation of this subpart and subject to code enforcement.

REMOVED Buffer zones for incompatible land uses

- (5) Street trees for subdivisions.
 - a. The developer shall plant, within ten feet of the right-of-way of each street within a residential development meeting the subdivision requirements of this Code, one canopy tree for every 50 linear feet of right-of-way.
 - b. Except where property on one side of the right-of-way is not owned by the developer, the trees shall be planted alternately on either side of the street.
 - c. Existing trees and native tree species that need less water and maintenance are preferred required.
 - d. Coordination with the city utility departments is required prior to planting the street trees.
 - e. Street trees planted shall have a minimum overall height of 2.5-inch DBH at time of planting.
- (6) Certain functional uses not permitted. No accessory structures, garbage or trash collection points or receptacles, parking, or any other functional use shall be permitted in the minimum required landscape area and/or buffer zone. Combining of compatible functions such as landscaping and drainage facilities are permitted.

- (7) Concealing and location of dumpsters.
 - Dumpsters must be concealed in opaque concrete, brick, or chain-link fence with screening slats
 of enough height consistent with the size of the container to shield the container from view from
 all sides.
 - b. The front of screen must be accessible for service of the container.
 - c. The dumpster must be located on a paved surface of asphalt or concrete.
- (8) Clear line of sight. An unobstructed cross visibility shall be required with in a triangle area formed by the intersection of two rights-of-way or access ways, as referenced in section 113-76.

(Code 2001, § 98-235; Ord. No. O-01-2000, § 6.06.03, 6-6-2000; Ord. No. O-08-2011, § 5, 12-6-2011; Ord. No. O-03-2017, exh. A (98-235), 1-24-2017)

Sec. 113-247. Landscape design and materials.

- (a) Design principles. All landscaped areas required shall conform to the following general design principles:
 - (1) Florida Friendly Landscaping principles shall be incorporated into all projects.
 - (2) Landscaping should integrate the proposed development into existing site features through consideration of existing topography, hydrology, soils, and vegetation.
 - (3) The functional elements of the development plan, particularly the drainage systems and internal circulation systems for vehicles and pedestrians, should be integrated into the landscaping plan.
 - (4) Landscaping should be used to minimize potential erosion through the use of ground covers or any other type of landscape material that aids in soil stabilization.
 - (5) Existing native vegetation should be preserved and used to meet landscaping requirements.
 - (6) Landscaping should enhance the visual environment through the use of materials that achieve variety with respect to seasonal changes, species of living material selected, textures, colors and size at maturity.
 - (7) Landscaping design should consider the aesthetic and functional aspects of vegetation, both when initially installed and when the vegetation has reached maturity. Newly installed plants should be placed at intervals appropriate to the size of the plant at maturity, and the design should use short-term and long-term elements to satisfy the general design principles of this section over time.
 - (8) Landscaping should enhance public safety and minimize nuisances.
 - (9) All landscaping and plant material shall be planted in a manner which shall not be intrusive or interfere, at or before maturity, with pavement surfaces, power, cable television, or telephone lines, sewer, or water pipes, or any other existing or proposed overhead or underground utility services.
 - (10) Landscaping should maximize the shading of streets and vehicle use areas.
 - (11) Architectural planters.
 - a. Planters can be are used to meet landscaping requirements.
 - b. Planters shall be a minimum of ten square feet and shall have minimum depth of 15 inches.
 - c. Planters shall be maintained and replanted if necessary.
 - d. Planters cannot be located within the city right-of-way without prior consent from the development services director.

- (b) Installation of required landscape and trees.
 - (1) General. All required trees and landscaping shall be installed according to generally accepted commercial planting procedures. Soil, free of lime rock, rocks, and other construction debris, shall be provided. All landscaped areas shall be protected from pedestrian and vehicular encroachment by raised planting surfaces, depressed walks, curbs, edges, wheel stops and the like.
 - (2) Florida No. 1 quality
 - a. All required plant materials, including, but not limited to, trees and shrubs, shall equal or exceed the standards for Florida No. 1 as established and revised by the state department of agriculture and consumer services in the current Florida Grades and Standards for Nursery Plants.
 - b. Grass sod shall be healthy and reasonably free of weeds, pests and disease.
 - (3) Proper planting and anchoring.
 - All plant material shall be mulched to a depth of two inches over the root zone. Do not apply mulch against the trunk.
 - b. Trees shall be installed with anchoring for a period of at least one year, in order to provide sufficient time for their roots to become established.
 - 1. Trees with trunks under four inches in diameter should be staked with one to three stakes.
 - Trees with a diameter of 2.5 inches or more DBH should be guyed with three to four guy wires.

(4) Irrigation.

- a. All landscaped areas shall be watered with an underground irrigation system or a drip irrigation system or hose bibs designed to allow differential operation schedules for high and low water requirement areas. To avoid operation of the system during periods of increased rainfall, an operational moisture sensor switch shall be required on all irrigation systems equipped with automatic controls that will override the irrigation cycle of the sprinkler system when adequate rainfall has occurred.
- b. The use of reclaimed water as a water supply source for irrigation shall be required when such source is available or anticipated to be available within 100 feet of an existing or proposed city reclaimed water line. In areas where food is served or consumed, such as outdoor eating areas of restaurants, a dual supply source distribution system shall be installed whereby potable water shall serve as the source for the food serving and/or consumption areas and reclaimed water shall serve as the supply source in all other landscaped areas.
- c. If a landscaped area contains primarily species native to the immediate region, or plants acceptable for xeriscape landscaping, the development services director may waive the requirement for installation of an irrigation system. Consideration of a waiver of the irrigation requirement shall include, in addition to the area covered by native vegetation, such local conditions as sun or shade, use of fill soil, and depth to water table.
- b. The development services director may require or otherwise approve water supply provisions for unusual landscape conditions provided, however, that a readily available water source shall be located within 100 feet of any required landscaping plant material.
- (5) Berm. When a berm is used to form a required visual screen in lieu of, or in conjunction with, a required hedge or wall, such berm shall not exceed a slope of 30 degrees and shall be completely covered with shrubs, trees, or other living ground cover.
- (6) Grass.

- a. Grass shall be seeded, plugged, or sodded.
- b. On swales, berms or other areas that are subject to erosion, grass shall be completely sodded.
- (7) Ground cover. Ground cover shall be installed and maintained for all improved parcels, in order to prevent erosion and dust. Ground cover used in lieu of grass shall be planted in such a manner so as to present a finished appearance and reasonably complete coverage within three months after planting.
- (8) Nonliving materials. Mulch shall be a minimum depth of two inches.
- (c) Recommended plant list is available on the IFAS FFL Website at https://ffl.ifas.ufl.edu/plants/ for Zip Code 32043.

Understory Trees/Sub-Canopy	
Common Name	Botanical Name
Redbud	Cercis canadensis
<mark>Anise</mark>	Illicium spp.
Drake/Chinese elm	Ulmus parvifolia
Flowering dogwood	Comus Florida
Wax myrtle	Myrica cerifera
Loblolly bay	Gordonia lasianthus
Southern red cedar	Juniperus silicicola
Yaupon holly	llex vomitoria
Fringe tree	Chionanthus virginica
Sweet bay magnolia	Magnolia virginiana
Chinese fan palm	Livistona chenensis
<mark>Windmill palm</mark>	Trachycarpus fortunii
Washington palm	Washingtonian robusta
Dahoon holly	llex cassine
Savannah holly	llex opaca × attenuate & cultivars
River birch	Betula nigra
<mark>Palatka holly</mark>	llex attenuate

Understory	
Common Name	Botanical Name
Crape myrtle	Lagerstroemia × fauriei
Wax myrtle	Myrica cerifera
Loblolly bay	Gordonia lasianthus
Junipers	Juniperus torulosa & spartan
Bottlebrush	Callistemon spp.
Redbud	Cercis canadensis
Rusty pittosporum	Pittosporum ferrugineum
Podocarpus	Podocarpus nagi
H olly	llex spp.
Leyland cypress	Cupressocyparis leylandi

	Canopy Trees	
Ī	Common Name	<mark>Botanical Name</mark>
I	<mark>American elm</mark>	Ulmus americana

Live oak	Quercus virginiana
Chinese elm	<mark>Ulmus parvifolia</mark>
Red bay	Persea borbonia
<mark>American sycamore</mark>	Platanus occidentalis
Tulip tree	Lirodendron tulipifera
<mark>Southern magnolia</mark>	Magnolia grandiflora & cultivar
Laurel oak	Quercus laurifolia
Canary Island palm	Phoenix canariensis
<mark>European fan palm</mark>	Chamaerops humillis
<mark>Pindo palm</mark>	Butia capitata
Hornbeam/bluebeech	Carpinus caroliniana
Water ash; pop ash	<mark>Fraxinus caroliniana</mark>
Florida winged elm	<mark>Ulmus alata</mark>
Florida elm	Ulmus americana floridana
Red maple	Acer rubrum
American holly	llex opaca & cultivars
Loblolly bay	Gordonia lasianthus

- (d) Unacceptable plant species. All invasive prohibited species shall should be allowed to be removed. without a permit and prior to the development of the site.
- (e) Maintenance and replacement of landscape plants. All plant material shall be maintained according to the following standards:
 - (1) All required trees, shrubs and landscaped areas shall be maintained in good and healthy condition for as long as the use continues to exist.
 - (2) Maintenance shall consist of mowing, removing of litter and dead plant material, necessary pruning, pest control, water, and fertilizing.
 - (3) Maintenance also includes, but is not limited to, the replacement of plants damaged by insects, disease, vehicular traffic, acts of God and vandalism.
 - (4) Necessary replacements shall be made within a time period not to exceed 30 days after notification by the city of the violation.
 - (5) In order to increase the tree canopy within the city, give shade to paved surfaces, buffer pedestrian and vehicular traffic and provide scenic beauty and natural habitat, as well as prevent decay, sunburn and hazards to trees, all landscape material shall be pruned to maintain the natural shape of the plant.
 - (6) No topping, hat racking, poodle cutting, excess pruning or excess crown reduction shall be performed on trees within the right of way.
 - (7) The city shall encourage the standards of the International Society of Arboriculture and the Tree Care Industry Association for tree care operations, plant maintenance and proper pruning methods.

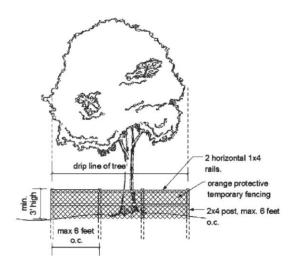
(Code 2001, § 98-236; Ord. No. O-01-2000, § 6.06.04, 6-6-2000; Ord. No. O-08-2011, § 5, 12-6-2011; Ord. No. O-03-2017, exh. A(98-236), 1-24-2017)

Sec. 113-248. Tree preservation during development and construction.

(a) Protective barriers.

- (1) During construction, protective barriers shall be placed, as necessary and/or as directed by the development services director, to prevent the destruction or damaging of trees.
- (2) Trees destroyed or receiving major damage must be replaced before occupancy or use unless approval for their removal has been granted during the site plan approval process
- (3) All trees not designated for removal may be required to be protected by barrier zones erected prior to construction of any structures, roads, utility service, or other improvements,
- (b) The protective barrier shall be constructed to the following standards:
 - (1) The protective barrier shall be constructed outside the drip line of the tree, when possible (see Figure A). The protective barrier shall have a minimum of a six-inch radius, plus one inch for each one inch of caliper.
 - (2) The protective barrier shall be a minimum of three feet high.
 - (3) Protective barrier posts shall be two inches by four inches or larger and shall be no more than six feet apart.
 - (4) The barrier shall have two one-by-four-inch horizontal railings affixed securely to the posts.
 - (5) The entire protective zone shall be wrapped in orange safety fencing material, a minimum of three feet in height.
 - (6) The protective barriers shall be inspected by the Zone and Planning Development Services Department prior to the commencement of construction.
- (c) No grade changes shall be made within the protective barrier zones without prior approval of the city development services director.
- (d) Where roots greater than one-inch diameter are exposed, they shall be cut cleanly.
- (e) Protective barrier zones shall remain in place and intact until such time as landscape operations begin or construction is complete, whichever occurs first.
- (f) The development services director may conduct periodic inspections of the site before work begins and during clearing, construction, and post-construction phases of development in order to ensure compliance.
- (g) No building materials, machinery or temporary soil deposits shall be placed within protective barrier zones defined above.
- (h) No attachments or wires other than those of a protective or non-damaging nature shall be attached to any tree.
- (i) A site survey of existing trees must be completed within two years by the developer and certified as accurate by the Planning Department as part of the submission process, including a mitigation plan, before a building permit is issued.
- (j) Protected areas and protected trees must be preserved unless that designation is changed by vote of the City Council.

Figure A



(Code 2001, § 98-237; Ord. No. O-08-2011, § 5, 12-6-2011; Ord. No. O-03-2017, exh. A(98-237), 1-24-2017)

Secs. 113-249—113-273. Reserved.

ARTICLE VII. TREES

Sec. 113-274. Protected Trees

- (a) Protected trees as defined in Sec. 113-243 shall be designated pursuant to the following requirements:
 - Submittal Application by the property owner
 - Location and type and size of tree
 - 3. A protected tree cannot be of a non-native species as set forth in Section 113-276 referenced in list of exempt trees in this Code. Status is obtained by submission for protection.
 - 4. certification by a certified arborist that the tree complies with the definition of protected tree as set forth in Sec. 113-243.
 - 5. Additional relevant historical documentation, if applicable.
 - 6. Annotation of the legal description of the property by a certified surveyor,
 - 7. Public notice requirements shall include:
 - Mail copy of notice by regular mail to property owners within 300 feet no less than ten days before the Planning and Zoning Commission Meeting.
 - b. Post sign on property no less than 10 prior to the Planning and Zoning Commission meeting. a hearing shall be held by the Planning and Zoning Commission after which a formal determination is approved or denied.
 - c. Formal determination may be appealed to City Council.

- 8. If approved, a lien shall be placed on the property and the lien shall be recorded within 30 days in the official county records at the property owner's expense.
- Reversal of this determination shall require action by the Planning and Zoning Commission which can be appealed to City Council.

(b) Protected Area as defined in Sec. 113-243 shall be designated pursuant to the following requirements:

- 1. Submittal Application by the property owner
- Location and type and size of tree
- Relevant information identifying significant aesthetic, environmental, or monetary value or which affords collective protection.
- 4. Additional relevant historical documentation, if applicable.
- 5. Annotation of the legal description of the property by a certified surveyor,
- 6. Public notice requirements shall include:
 - Mail copy of notice by regular mail to property owners within 300 feet no less than ten days before the Planning and Zoning Commission
 - b. Post sign on property no less than 10 prior to the Planning and Zoning Commission meeting., a hearing shall be held by the Planning and Zoning Commission after which a formal determination is approved or denied.
 - c. Formal determination may be appealed to City Council.
- 7. a lien shall be placed on the property and the lien shall be recorded within 30 days in the official county records at the property owner's expense.
- Reversal of this determination shall require action by the Planning and Zoning Commission which can be appealed to City Council.

(c) Protection of Canopy Roads

- 1. In order to provide additional protection of aesthetic resources within the city, the following roadways are hereby designated as canopy roads:
 - a. St Johns Avenue from Forest Street to Clay Street
- 2. All property within twenty feet of the outside right-of-way line of the roadways designated in subsection (a) of this section shall be known as the canopy tree protection zone.
- 3. No person or agency shall remove any tree located within the canopy tree protection zone without obtaining a tree removal permit from the Development Services Department.
- All tree pruning and construction activity shall comply with the ANSI (American National Standards Institute) A300 Standards for the care and maintenance of trees.
- 5. The tree removal permit will be reviewed by the Development Services Department and placed on the next available Planning and Zoning Commission agenda for final action pursuant to the public notice requirements set forth in Sec. 113-274 (7). This action may be appealed to the City Council.

Sec. 113-275. Removal of trees.

(a) Removal of a tree includes any act which will cause a tree to die, such as damage inflicted upon the root system by heavy machinery, changing the natural grade above the root system or round the trunk, damage, including fire damage, inflicted on the tree permitting infection or pest infestation.

- (b) It shall be unlawful for any person, organization, society, association or corporation or any agent or representative thereof, directly, or indirectly, to cut down, destroy, remove, move, or effectively destroy through damaging any tree located on any property without obtaining a permit.
- (c) No authorization for the removal of a protected viable tree shall be granted unless the developer demonstrates the reason for removal of the trees.

(Code 2001, § 98-261; Ord. No. O-01-2000, § 6.07.01, 6-6-2000; Ord. No. O-08-2011, § 5, 12-6-2011; Ord. No. O-03-2017, exh. B(98-261), 1-24-2017)

Sec. 113-276. Exceptions and exemptions.

The following are exempt from the requirements of section 113-275.

- (1) Utility and public works projects undertaken by the city, including in the case of emergencies such as hurricane, windstorm, flood, freeze, or other disasters.
- (2) One- and two-family dwelling units.
- (3) Dangerous trees.
 - a. In the event that any tree endangers health or safety and requires immediate removal, verbal authorization may be given by the development services director.
 - The tree may be removed without obtaining a written permit provided a certified arborist has made such a determination. The verbal authorization shall later be confirmed in writing by the development services director.
 - c. In the event of a natural disaster, environmental or other emergency situation where immediate action is required, any recognized civil authority can authorize immediate removal, to include utility crews, Law Enforcement Officers, and Fire and Rescue Crews.
- (4) Exempt trees. Nonnative trees as defined by IFAS, Florida Friendly Landscaping, Zip Code, 32043.

Common Name	Botanical Name
American mulberry	Morus rubra
Australian pine	Casuarinas spp.
Black cherry	Prunus serotina
Brazilian pepper	Shinus terebinthifolius
Cajuput tree	Melaleuca leucadendra
Camphor tree	Cinnamomum camphora
Cherry laurel	Prunus laurocerasis
Chinaberry	Meliaa azedarach
Chinese tallow tree	Sapium sebiferumContainerized trees and nursery
	stock trees grown for resale
Ear trees	Enterolobium cyclocarpum
(Enterolobium contortisliquum)	
Eucalyptus robusta	Eucalyptus robusta
Jacaranda	Jacaranda acutifolia
Golden rain tree	Koelreuteria elegans
Orchid tree	Bauhinia
Rosewood	Dalbergia sissoo
All pines	Pinus

Silk oak	Grevillea robusta
Pecan	Carya illinoensis

(Code 2001, § 98-262; Ord. No. O-01-2000, § 6.07.02, 6-6-2000; Ord. No. O-08-2011, § 5, 12-6-2011; Ord. No. O-03-2017, exh. B(98-262), 1-24-2017)

Sec. 113-277. Drought-tolerant plant standards applicable to required landscaping.

Drought-tolerant plants which shall be used in required landscaping are native, noninvasive plants which will survive and flourish with comparatively little supplemental irrigation. Industrial, commercial, civic, and multifamily residential buildings or structures and common areas of single-family or multifamily residential developments shall incorporate drought tolerant trees, shrubs, and groundcovers in landscape plans as a water conservation measure. A list of plants which require minimal water are included in the St. Johns River Water Management District's publication Water Wise, Florida Landscapes. In addition, mulches and drought tolerant groundcovers shall replace narrow turf areas where irrigation is impractical. Interior remodels or minor modifications to the exterior of a structure are not subject to this requirement.

(Code 2001, § 98-263; Ord. No. O-08-2011, § 5, 12-6-2011; Ord. No. O-03-2017, exh. B(98-263), 1-24-2017)

Sec. 113-278. Conditions for tree removal.

The development services director shall issue the permit for removal of a tree if one of the following reasons for removal is found to be present:

- (1) The condition of the tree with respect to disease, insect attack, age or other damage creates a danger of falling, or otherwise causes the tree to have an adverse impact on the urban or natural environment as determined by a certified arborist.
- (2) Removal of the tree is necessary to construct proposed improvements in order to make use of the property. Provided the improvements are in compliance with the protected tree requirements set forth in Article VII Chapter 113 of the City's Land Development Code.
- (3) To avoid interference with utility services; or
- (4) Removal of a tree in compliance with a state-approved timber management plan.

(Code 2001, § 98-264; Ord. No. O-01-2000, § 6.07.03, 6-6-2000; Ord. No. O-08-2011, § 5, 12-6-2011; Ord. No. O-03-2017, exh. B(98-264), 1-24-2017)

Sec. 113-279. Replacement.

- (a) Generally. In respect to removal of trees to allow construction of improvements on property, and as a condition to the granting of a permit, replacement shall be required.
 - Trees removed.
 - a. Live oaks, Bald Cypress, and Mature Southern Magnolia.
 - 1. All efforts shall be made to maintain all live oak trees, Bald Cypress, and Mature Southern Magnolia on the site.
 - 2. Replacement of live oak trees Bald Cypress, and Mature Southern Magnolia shall be with live oak trees, Bald Cypress, and Southern Magnolia and the total caliper inches of replacement trees shall equal the total caliper inches of live oak trees removed.

b. All other trees.

- Trees removed over 12 inches DBH on the site shall be replaced.
- 2. The replacement for all trees over 12 inches in caliper at DBH on the site shall equal one-third of the total caliper at DBH of the trees removed.
- (2) Tree replacement or payment to city. In lieu of replacement of trees on the site, the development services director may approve a plan for replacement of trees offsite or payment to the city tree mitigation fund. The value will be based on the average cost of other municipalities in northeast Florida.
- (b) Credit for trees. Trees which are preserved shall receive credit against the landscape requirements according to the following schedule:
 - (1) Trees 12 to 18 inches: Live oaks, Bald Cypress, and Southern Magnolia one-inch credit; all others, 50 percent-inch credit.
 - (2) Trees 19 to 30 inches: Live oaks, Bald Cypress, and Southern Magnolia 1.25-inch credit; all others, 75 percent-inch tree credit.
 - (3) Trees over 30 inches: Live oaks, Bald Cypress, and Southern Magnolia 1.5-inch credit; all others, 100 percent-inch credit.
 - (4) A minimum of one fourth (¼) of the replacement credit shall consist of and same tree species removes and have a minimum caliper diameter of 4 inches per replacement tree.

(Code 2001, § 98-265; Ord. No. O-01-2000, § 6.07.04, 6-6-2000; Ord. No. O-08-2011, § 5, 12-6-2011; Ord. No. O-03-2017, exh. B(98-265), 1-24-2017)

Sec. 113-280. List of plants recommended for the city can be obtained by the IFAS FFL Webside at https://ffl.ifas.ufl.edu/plants/ for Zip Code 32043.

Understory Trees (Max. Height 15 Feet) <i>listed in IFAS αs "</i>Trees – Small"	
Common Name	Botanical Name
Redbud	Cercis canadensis
<mark>Anise</mark>	Illicium spp.
Drake/Chinese elm	Ulmus parvifolia
Flowering dogwood	Comus florida
Wax myrtle	Myrica cerifera
Loblolly bay	Gordonia lasianthus
Southern red cedar	Juniperus silicicola
Yaupon holly	llex vomitoria
Fringe tree	Chionanthus virginica

Canopy Trees Spaced 50 Feet Apart listed in IFAS as "Trees — Large" spaced per guidance under "Appearance"	
Common Name	Botanical Name
American elm	Ulmus americana
<mark>Live oak</mark>	Quercus virginiana
Sweet bay magnolia	<mark>Magnolia virginiana</mark>

Silver dollar tree	Eucalyptus cinerea
Chinese elm	Ulmus parvifolia
Red bay	Persea borbonia
American sycamore	Platanus occidentalis
Tulip tree	Lirodendron tulipifera
Southern magnolia	Magnolia grandiflora & cultivar
Laurel oak	Quercus laurifolia
Washington palm	Washingtonian robusta
Canary Island palm	Phoenix canariensis
European fan palm	Chamaerops humillis
Sabal palm	Sabal palmetto
Chinese fan palm	Livistona chenensis
Windmill palm	Trachycarpus fortunii
Pindo palm	Butia capitata

Canopy Trees Spaced 30 Feet Apart	
Common Name	Botanical Name
Dahoon holly	llex cassine
Hornbeam/bluebeech	Carpinus caroliniana
Water ash; pop ash	Fraxinus caroliniana
Florida winged elm	Ulmus alata
Florida elm	Ulmus americana floridana
Red maple	Acer rubrum
Savannah holly	llex opaca × attenuate & cultivars
American holly	llex opaca & cultivars
Loblolly bay	Gordonia lasianthus
River birch	<mark>Betula nigra</mark>
Palatka holly	llex attenuate

Ornamental Landscape Trees; Small Trees listed in IFAS as "Trees – Medium"	
Common Name	Botanical Name
Crape myrtle	Lagerstroemia × fauriei
Wax myrtle	Myrica cerifera
Loblolly bay	Gordonia lasianthus
Junipers	Juniperus torulosa & spartan
Bottlebrush	Callistemon spp.
Redbud	Cercis canadensis
Rusty pittosporum	Pittosporum ferrugineum
Podocarpus	Podocarpus nagi
Holly	llex spp.
Leyland cypress	Cupressocyparis leylandi
Jerusalem thorn	Parkinsonia aculeate

<u>Large Ornamental Trees and Palms listed in IFAS as "Palms and Palm Like Plants"</u>	
Common Name	Botanical Name

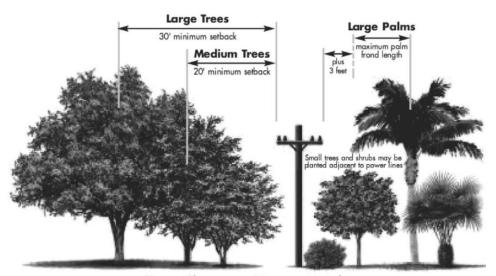
Winged elm	<mark>Ulmus alata</mark>
Washington palm	Washingtonian robusta
Canary Island palm	Phoenix canariensis
European fan palm	Chamaerops humillis
Sabal palm	Sabal palmetto
Heritage river birch	Betula nigra "heritage"
Chinese fan palm	Livistona chenensis
Windmill palm	Trachycarpus fortunii
Pindo palm	Butia capitata

Shrubs and Minimum 2.0 – 4.0 ft)	On-Center (OC)	
Requirements for Visual Screens L	<mark>isted in IFAS as ["]Shrubs-Large" spaced on ce</mark>	<mark>nter per guidance under</mark>
"Appearance"		
Common Name	Botanical Name	On Center
Glossy abelia	A belia spp.	2.0 OC
Allamanda	Cortadenia selloana	4.0 OC
<mark>Pineapple guava</mark>	<mark>Feijoa sellowiana</mark>	3.0 OC
<mark>Anise</mark>	Illicium floridanum	2.5 OC
<mark>Pittosporum</mark>	<mark>Pittosporum tobira</mark>	3.0 OC
Azalea	Rhododendron spp.	3.0 OC
<mark>Plumbago</mark>	Plumbago capensis	2.0 OC
<mark>Banana shrub</mark>	<mark>Michelia fuscata</mark>	3.0 OC
<mark>Primrose jasmine</mark>	Jasiminum mesnyi	3.0 OC
Boxwood	Buxus microphylla	2.0 OC
<mark>Viburnum</mark>	<mark>Viburnum spp.</mark>	3.0 OC
Chinese juniper	Juniperus chinensis	3.0 OC
<mark>Silverthorn</mark>	Elaeagnus philippensis	3.0 OC
Podocarpus	Podocarpus macrophyllus	2.0 OC
<mark>Holly</mark>	llex spp.	2.0—3.0 OC
<mark>Indian hawthorne</mark>	Raphioleps indica	2.5 OC

<u>Groundcovers</u>	
Common Name	Botanical Name
Bugle weed	Ajuga reptans
Asparagus fern	Asparagus sprengeri
<mark>lceplant</mark>	Carpobrotus edulis
False heather	Cuphea hyssopifolia
<mark>Dichondra</mark>	Dichondra carolinensis
Golden creeper	Ernodea littoralis
Trailing fig	Ficus sagittata
Carolina jessamine	Gelsemium sempervirens
Algerian ivy	Hedera canariensis
Beach sunflower	Helianthus debilis
Dwarf yaupon holly	llex vomitoria "Schellings"
Chinese juniper	Juniperus chinensis
Dwarf lantana	Lantana depressa

Lily turf	Liriope spicata
Sword fern	Nephrolepsis exaltata
Oyster plant	Rhoeo spathacea
Erect selaginella	<mark>Selaginella involvens</mark>
Confederate jasmine	Trachelospermum asiaticum
Caltrops	Trilobus terrestris
Society garlic	Tulbaghia violacea
Coontie	Zamia pumila
A loe	A loe spp.
Cast iron plant	Aspidistra elatior
Gopher apple	Locania michauxii
Earth star	Cryptanthus spp.
Miniature agave	Dyckia brevifolia
Creeping fig	<mark>Ficus pumila</mark>
Dwarf gardenia	Gardenia jasminoides
Fig marigold	Glottiphyllum depressum
English ivy	Hedera helix
Daylily	Hemerocallis spp.
Beach elder	lva imbricate
<mark>Shore juniper</mark>	Juniperus conferta
<mark>Trailing lantana</mark>	Lantana montevidensis
Partidge berry	Mitchella repens
Mondo grass	Ophioipogon japonicus
Leatherlef fern	Rumonra adiantiformis
Purple heart	Setcreasea pallida
Star jasmine	Trachelospermum jasminoides
<mark>Wedelia</mark>	Wedelia trilobata
Wandering jew	Zebrina pendula

	Grasses Listed in IFAS as Turfgrasses
Ī	Bahia
	St. Augustine cultivars
	Annual ryegrass



Trees Shown at Mature Height

Figure 2 Large, Medium and Small Trees and Shrubs

(Code 2001, § 98-265; Ord. No. O-08-2011, § 5, 12-6-2011)

Secs. 113-281—113-308. Reserved.

Proclamation

WHEREAS, America is powered by thousands of independently owned and operated electric generating facilities known as power plants that generate electric energy; and

WHEREAS, those power plants are connected to a complex energy system called the electric grid that is comprised of over five million miles of transmission and distribution lines that deliver energy to homes, businesses, churches, hospitals, and schools across the country; and

WHEREAS, the electric grid must be maintained in operation 24 hours a day, 7 days a week, and 365 days a year in rain, cold, hurricanes and tornadoes and must be capable of withstanding any hazards that occur, and

WHEREAS, this system of electric lines is kept in a high state of readiness by over 114,000 dedicated and skilled men and women knows as electric line workers that work for all independently owned and operated utilities across America; and

WHEREAS, electric line workers are a cohesive group that must work as highly effective teams in very hazardous situations under rigorous conditions that respond to disaster areas to restore power to victim's homes and has been ranked as one of the 10 most dangerous jobs in which 30-60 people lose their lives annually; and

WHEREAS, the City of Green Cove Springs line workers are dedicated and hardworking men and women who risk their lives daily working in extremely dangerous situations to ensure the reliable delivery of electric energy to the City of Green Cove Springs homes and businesses; and

WHEREAS, it is most fitting and proper that the City of Green Cove Springs set aside a special day to recognize City of Green Cove Springs hometown heroes, our electrical line workers.

NOW, THEREFORE, BE IT PROCLAIMED BY THE CITY COUNCIL OF THE CITY OF GREEN COVE SPRINGS, FLORIDA, AS FOLLOWS:

- Section 1. August 26, 2023, is proclaimed as "Lineman Appreciation Day".
- **Section 2.** A true copy of this Proclamation shall be spread upon the Official Minutes of the City Council of the City of Green Cove Springs.

DONE AND PROCLAIMED BY THE CITY COUNCIL OF THE CITY OF GREEN COVE SPRINGS, FLORIDA, IN REGULAR SESSION THIS 15TH DAY OF AUGUST 2023.



CITY OF	GREEN	COVE S	PRINGS	, FLORIDA
---------	-------	--------	--------	-----------

Constance W. Butler, Mayor	
ATTEST:	

Erin	West,	City	Clerk
------	-------	------	-------



STAFF REPORT

CITY OF GREEN COVE SPRINGS, FLORIDA

TO: City Council Regular Session MEETING DATE: August 15, 2023

FROM: Steve Thomas, Asst Public Works Director

SUBJECT: Approve a Purchase Order to AIR-Max Heating & cooling, Inc to replace the AAON unit

at the Police Department in the Amount of \$125,657.00. Steve Thomas

BACKGROUND

The unit being replaced is the original unit installed in the building when constructed, which is over 10 years old. This unit runs 24/7 and has become a problem for the police department. This unit cools and removes the humidity from the evidence room and it must stay cool for certain types of evidence stored. We have had multiple calls for this unit to be repaired the last year. This unit is starting to cost the city a lot of money and down time and needs to be replaced.

Air-Max was previously approved by City Council as the sole source provider for air conditioning services as they were consistently the lowest price and provide great customer service. We did ask Air-Max to get competing quotes for this unit as the initial price was over \$130,000 with a 36-week lead time. Failure of this unit could threaten many criminal cases as a result of compromised evidence. Air-Max was able to locate a unit at a cost of \$125,657 with a 5-6 week lead time.

FISCAL IMPACT

001-2021-5004640 \$ 125,657.00

RECOMMENDATION

Approve a Purchase Order to AIR-Max Heating & cooling, Inc to replace the AAON unit at the Police Department in the Amount of \$125,657.00.



August 4, 2023

City of Green Cove Springs
321 Walnut Street
Green Cove Springs, FL 32043
Email: sthomas@greencovesprings.com

Ref: EOC - 1001 Idlewild Ave

We propose to remove and replace (1) existing AAON unit with a roof top mounted CAPTIVE AIRE unit.

*Price includes but is not limited to the following:

The new unit. New controllers, new curb, new duct work to existing duct work, new drain line, all roofing, electrical, and mechanical contactors will be State of Florida licensed contractors.

Delivery time on the new unit is approx. 5-6 weeks.

The warranty will be one-year on labor and functional parts with five-years on the compressor. *All warranties are subject to the manufacturer's specifications.

The price for the above-mentioned work will be \$125,657.00. Payments are to be made 100% upon completion.

This Quote is good for 60 days.

Thank you for the opportunity of submitting this quote.

Acceptance: _____ Date: _____

Thank you,

Michael C. Taylor President/C.E.O.

Item #5.

CASRTU3-E.322-24-20T (#1) RTU-1 Weight: 2532 lbs./104 curb

RTU with Electric Heat and 24" Direct Drive Plenum Fan, 240V 3 phase, 32 KW maximum - 1 modulating stage & 1 On/Off Stages.

SUPPLY MOTOR

Model DTP0054 • 5.000 HP, 3 Phs, 208 V, 60 Hz, 15.0 FLA, ODP, Premium (E-

SUPPLY PERFORMANCE

Supply Air:

2500 CFM

RPM.

937

Return Air:

0 CFM

Outside Air:

2500 CFM

Tip Speed:

5887 ft/min

BHP:

1.8370

Static Pressure:

1.521" w.g.

(1,250" Ext. + 0,271" Opt.)

Altitude:

95 ft

BLOWER

24 Inch Plenum Fan for size 3 RTU, Hub specified to match motor shaft.

TEMPERATURE CONTROL

50-90°F Space Temp Control • Space Sensor Ships Loose • Heating/Cooling Activation Based On Either Intake or Space Set Point • Manual Blower Mode. Use with MUA.

AIRFLOW DIRECTION

• Down Discharge - Air Flow Left -> Right

CURB & SUPPORTS

ROOF CURB - 59.5" Width, 91" Length, 14" Supply Height, Insulated.

SUPPLY INSTALLATION INFORMATION

Unit Voltage:

3 phs 208 V 60Hz

Unit Main Input:

117.7 Amps MCA • 125 Amps MOP • 208 V • 1 AWG Wire Min.

SCCR:

10 kAmp

HEATING SCHEDULE

Altitude:

95 ft

Winter Outdoor Air Dry Bulb Temp:

35°F

Temp Rise:

40°F

kW:

31

Based Off:

kWs Actual Air Density

123.3 Lb/Hr

COOLING SCHEDULE

Moisture Removal Rate:

Outdoor Air Dry Bulb Temperature: 95.0°F Outdoor Air Wet Bulb Temperature: 78.0°F Max Outdoor Air %: 100% Mixed Air Dry Bulb Temperature: 95.0°F

Mixed Air Wet Bulb Temperature: 78.0°F

Mixed Air Dew Point: 71.8°F Leaving Dry Bulb Temperature: 46.3°F

Leaving Wet Bulb Temperature: 42,7°F

Leaving Dew Point: 38.8°F

Total Capacity: 264.0 MBH

Sensible Capacity: 127.7 MBH

Latent Capacity: 136.3 MBH

Reheat Coil Capacity: 129.6 MBH

Reheat Coil Leaving Dry Bulb Temperature: 70.0°F

Reheat Coil Leaving Wet Bulb Temperature: 53.5°F

Reheat Coil Leaving Relative Humidity: 32%

IEER: 18.2

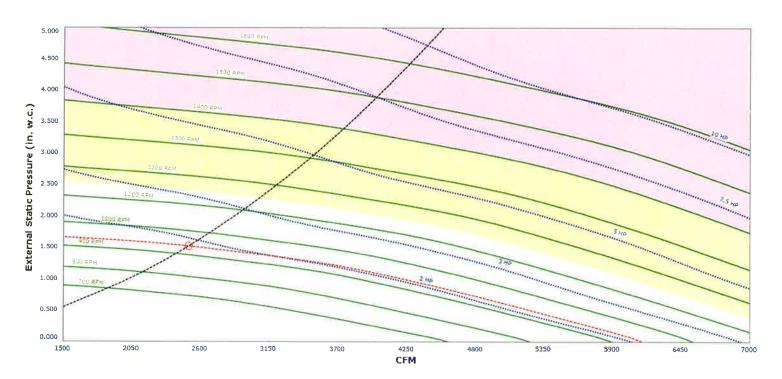
ISMRE: 6.0

- or remove coming for respectively data, the connect fittings.
- CASLink building monitoring system communications module. Requires internet & field wired ethernet connection or 3G cellular service. Includes Rev 3 Comm Module, RJ45 to modbus converter, 3 FT cat5 cable, and 1 FT of shielded twisted pair.
- 2" Merv 8 Filters for Size 3 RTU. QTY 4, 20 x 25 x 2 Merv 8 Filters
- Overheat Stat factory set at 80°F and 10 minutes. Prevents unit from overheating the space when cooling.
- · VFD factory mounted and wired in unit control vestibule.
- RTU Size 3 Down Discharge Electric Heat. Used with 15 60kW Electric Heaters
- Remote Room Sensor Option. Wall Mountable 10k Temp and Humidity Room Sensor Included.
- VAV (Variable-Air-Volume) Wiring Package for Commercial Fans. Manual Speed Control Variable Frequency Drive Included
- Supply Variable Frequency Drive 5 HP Max., 200/240 V, Three Phase, 16.5 A Max., NEMA 1 Enclosure, with 2RJ-45 FOR MODBUS
- Clogged Filter Switch
- Commercial Smoke Detector Interlock (Detector By Others)
- RTU Size 3 Hail Guard for outdoor coil, includes magnets and washers for installation.

- . Inclinate Mart photies monitoring
 - RTU Size 3 No Return
 - RTU Fixed 100% Outdoor Air Intake.
 - 20 Ton Modulating Cooling Option, 208/230V. R410A Refrigerant, Valencer Duty Compressor, ECM Condensing Fan(s).
 - RTU Compressor Oil Sensor Factory Installed. M12 Style Connector.
- 20 Ton Cooling Only Modulating Reheat Option for Space Control
- Occupied Scheduling Defaulted for IBT/RTU.
- Single Point Electric Heat Connection RTU, QNTY 1 750va Transformer used for controls. One primary connection required for RTU with electric heat. If a Non-DCV Prewire controls this unit, the #28, #47, "MA", or "E2" Option Prewire must be selected. Do not provide supply starter in prewire.

Item #5.

- Miami Dade Impact and Wind Load Certification Miami Dade County Product Control Approved, Florida Building Code approval. Curbs up to 20" high must be 18 gauge Aluminized.
- GFCI 15 amp Powered Convenience Outlet For RTU3 Enclosure, Includes receptacle, jbox, cover and transformer.
- Size 3 RTU Curb Duct Hanger Adjustable Duct Hanger Support Brackets installed for both return and discharge duct.
- Indicates that a custom kW electric coil is needed for RTU.
- 24VAC Fire Input



CASRTU3-E.322-24-20T SOUND (937 RPM) AT 5 FT. IN OCTAVES:

1	2	3	4	5	6	7	8
83.4	83.7	81	80.4	80.4	75.6	74.7	73.1
LWA:	84.6	Sones:		21.3	DBA:	73.8	

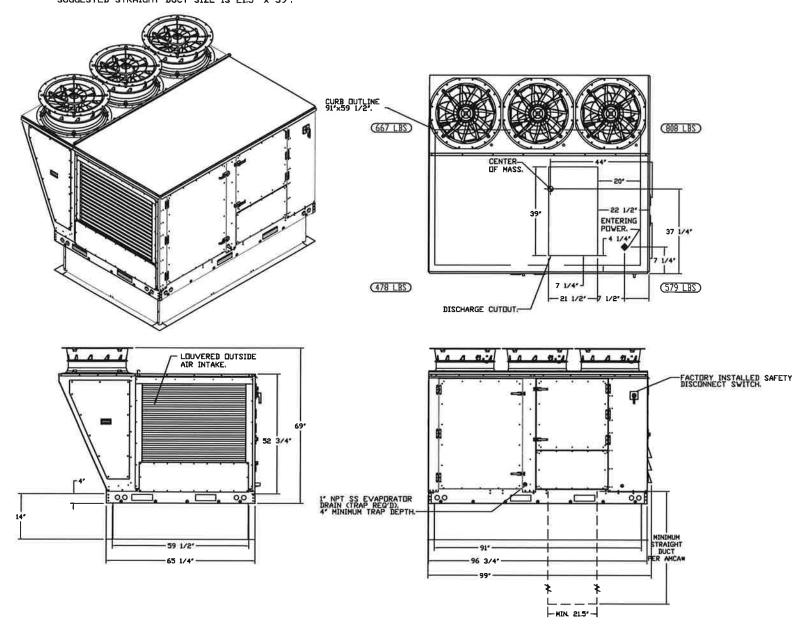
Note: Sound data across operational range. Tested in accordance to AHRI Standard 270/370

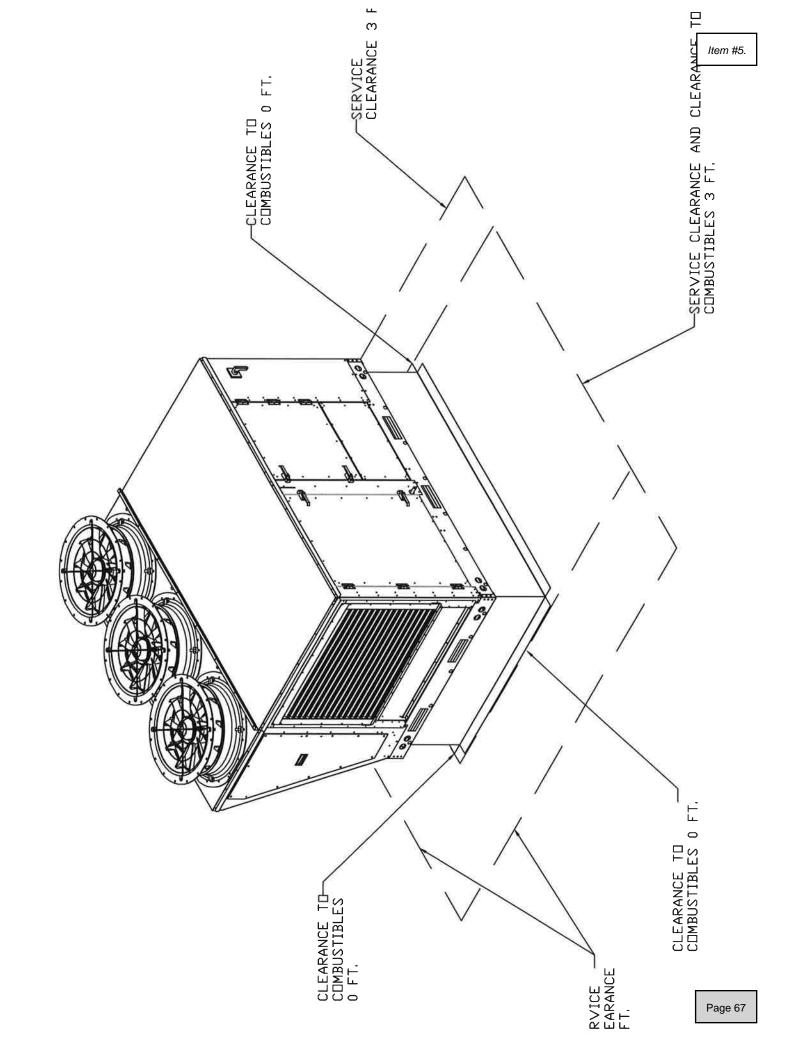
EAN #1 CASRTU3-E.322-24-20T - HEATER (RTU-1)

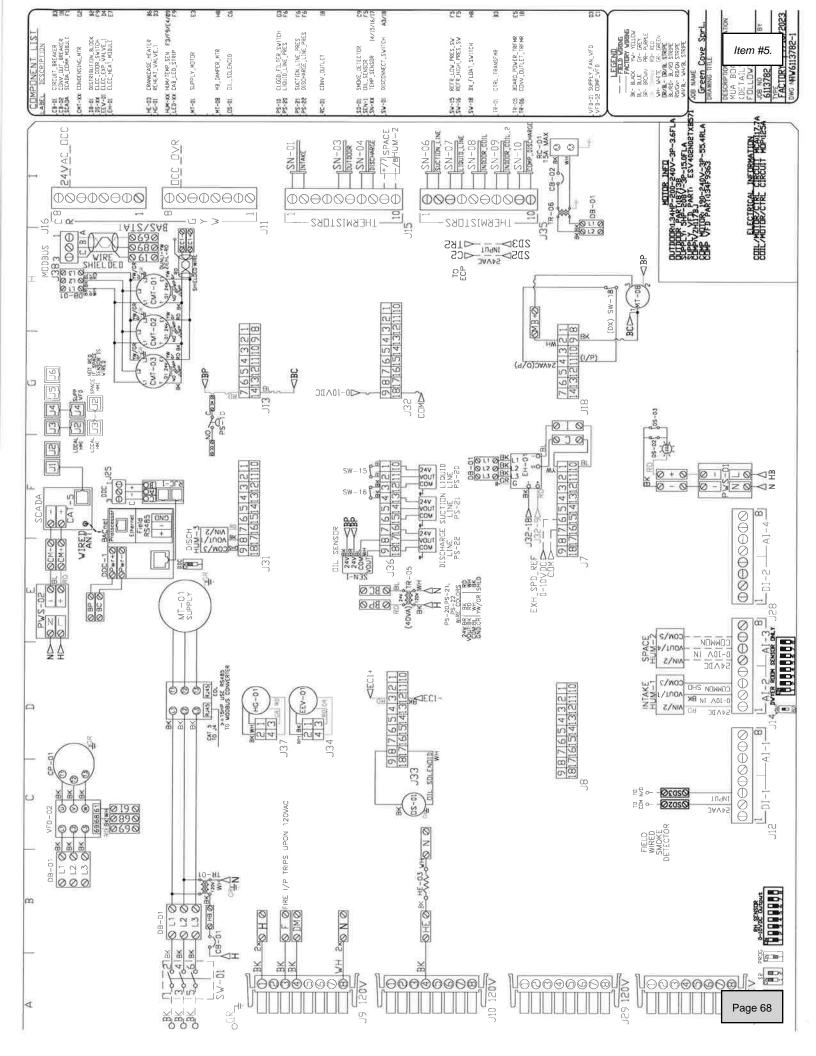
NOTES

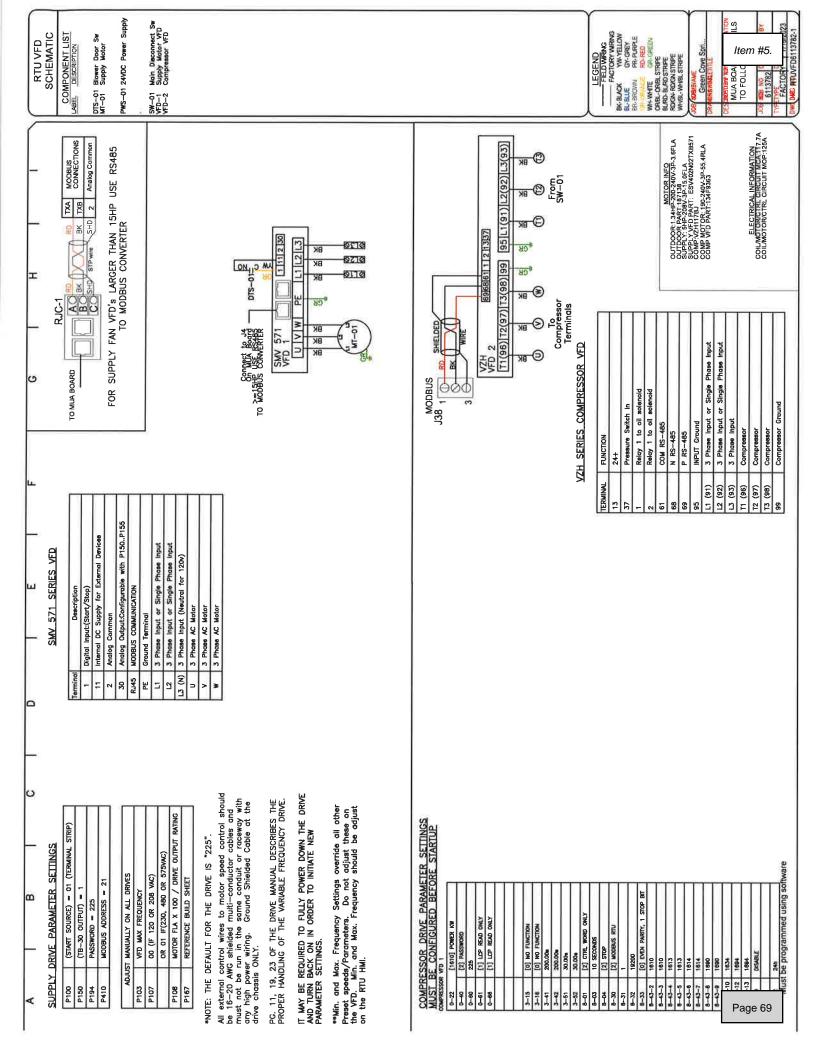
- DO NOT OBSTRUCT OUTSIDE AIR INLET, OUTSIDE AIR COIL 1.
- OR OUTSIDE AIR FAN.
- DENOTES CORNER WEIGHT.
 ROOF OPENING MUST BE 2' SMALLER THAN CURB DIMENSIONS IN BOTH DIRECTIONS.

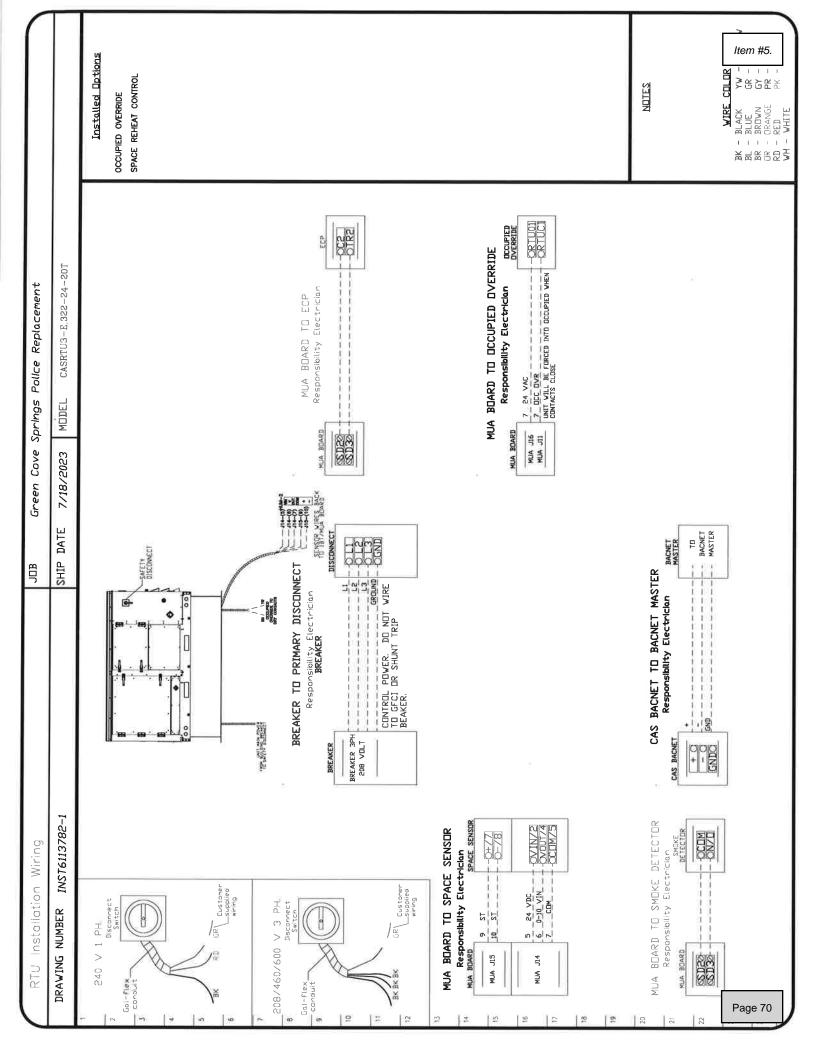
**NOTE: SUPPLY DUCT MUST BE INSTALLED TO MEET SMACNA STANDARDS. A MINIMUM STRAIGHT DUCT LENGTH MUST BE MAINTAINED DOWNSTREAM OF UNIT DISCHARGE AS OUTLINED IN AMCA PUBLICATION 201. WHEN USING RECTANGULAR DUCTWORK, ELBOWS MUST BE RADIUS THROAT, RADIUS BACK WITH TURNING VANES, FLEXIBLE DUCTWORK AND SQUARE THROAT/SQUARE BACK ELBOWS SHOULD NOT BE USED. ANY TRANSITION AND/OR TURNS IN THE DUCTWORK WILL CAUSE SYSTEM EFFECT. SYSTEM EFFECT WILL DRASTICALLY INCREASE STATIC PRESSURE AND REDUCE AIRFLOW. DO NOT RELY ON UNIT TO SUPPORT DUCT IN ANY WAY, FAILURE TO PROPERLY SIZE DUCTWORK MAY CAUSE SYSTEM EFFECTS AND REDUCE PERFORMANCE OF THE EQUIPMENT. SUGGESTED STRAIGHT DUCT SIZE IS 21.5' × 39'.













August 4, 2023

City of Green Cove Springs 321 Walnut Street Green Cove Springs, FL 32043 Email: sthomas@greencovesprings.com

Ref: EOC - 1001 Idlewild Ave

We propose to remove and replace (1) existing AAON unit with a roof top mounted AAON unit.

*Price includes but is not limited to the following:

The new unit. New controllers, new curb, new duct work to existing duct work, new drain line, all roofing, electrical, and mechanical contactors will be State of Florida licensed contractors.

Delivery time on the new unit is approx. 20-30 weeks.

The warranty will be one-year on labor and functional parts with five-years on the compressor. *All warranties are subject to the manufacturer's specifications.

The price for the above-mentioned work will be \$133,157.00. Payments are to be made 100% upon completion.

This Quote is good for 60 days.

Thank you for the opportunity of submitting this quote.

Acceptance: ______ Date: _____

Marian

Thank you,

Michael C. Taylor President/C.E.O.



2425 South Yukon Ave - Tulsa, Oklahoma 74107-2728 - Ph. (918) 583-2266 Fax

RN-016-8-0-HA09-142:M000-U0B-DPP-B0A-0DEBWBF-00-00C0000VB Tag: RTU-1

T .	T /		
JOD	Inf	ormat	uon

Job Name: Job Number: Site Altitude:

Refrigerant

Green Cove Springs Police Replacement Job #2021040855

0 ft R-410A

Static Pressure

External: Evaporator: Filters Clean: Dirt Allowance 1.25 in. wg. 0.07 in. wg. 0.06 in. wg. 0.35 in. wg.

Cooling Section

Total Capacity:
Sensible Capacity:
Latent Capacity:
Mixed Air Temp:
Entering Air Temp:
Lv Air Temp (Coil):
Lv Air Temp (Unit)
Supply Air Fan:
SA Fan RPM / Width:

Net Gross 193.48 190.30 MBH 104.51 101.33 MBH 88.97 MBH 95.00 FDB 78.00 °F WB 95.00 °F DB 78.00 F WB 54.25 °F DB 54.06 F WB 55.41 °F DB 54.54 F WB 1 x 245D60 @ 1.10 BHP 1018 /2.961"

Evaporator Coil: Evaporator Face Velocity: 19.9 ft² /4 Rows /14 FPI

125.9 fpm

Unit Information

Approx. Op./Ship Weights: Supply CFM/ESP: Final Filter FV / Qty: Outside CFM: Ambient Temperature: 2371 /2371 lbs. (±5%) 2500 /1.25 in. wg. 120.00 fpm /6 2500 95 F DB /78 F WB

 Economizer:
 0.00 in. wg.

 Heating:
 0.02 in. wg.

 Cabinet:
 0.01 in. wg.

 Re-Heat Coil:
 0.01 in. wg.

 Total:
 1.77 in. wg.

Heating Section

PreHeat Type: Std (No Preheat) Heating Type: Electric Heat Heating CFM: 2500 Total Capacity: 102.4 MBH 35.0 FDB /30.0 FWB OA Temp: RA Temp: 75.0~FDB /62.0~FWBEntering Air Temp: 35.0 °F DB /30.0 °F WB Leaving Air Temp: 72.9 °F DB /49.7 °F WB Input: 30.0 kWHeater Qty: 4 Electric Heat FLA: 83.3

Re-Heat Coil:

Capacity: LA DB /WB: RH: 43 MBH 70.00 °F /60.14 °F

57%

Rating Information

Listing Model: RN-016-3-0-DAAY-V0-21-000-A

Cooling Capacity (MBH): Cooling EER: Cooling IEER: 182.0 11.5 15.5

Rated in accordance with AHRI 340 B60

Application EER @ Op. Conditions:

11.8

Electrical Data

Rating:	208/3/60
Unit FLA:	91
SCCR:	5 KAIC
	04

Minimum Circuit Amp:	114
Maximum Overcurrent:	125

	Qty	HP	VAC	Phase	RPM	FLA	RLA
Compressor 1:	1		208	3			24
Compressor 2:	1		208	3			26.9
Condenser Fans:	2	1.00	208	1	1110	7.4	
Supply Fan:	1	2.00	208	3	1170	7.5	

Cabinet Sound Power Levels*

Octave Bands:	63	125	250	500	1000	2000	4000	8000
Discharge LW(dB):	85	84	89	89	86	84	77	69
Return LW(dB):	76	74	73	65	64	62	54	45

^{*}Sound power levels are given for informational purposes only. The sound levels are not guaranteed.



24.5" STAR Plenum

2425 South Yukon Ave - Tulsa, Oklahoma 74107-2728 - Ph. (918) 583-2266 Fa AAONEcat32 Ver. 4.335 (SN: 6681840-HRDLEDR4)

JOB INFORMATION:

Job Name: Job Tag: Rep Firm:

Green Cove Springs Police

Replacement

RTU-1

Date:

06/28/2023

WHEEL SPECIFICATION:

Max RPM: 1,800

Diameter x Qty:

Width%: 24.5 in. x 1 90

Tip Speed:

Inertia: 6,530 FPM 10 WR2

OPERATING CONDITIONS:

Air Flow:	2,500 CFM
Static Pressure:	1.77 in. Wg.
Plenum DP:	0.00 in. Wg.
Inlet Grill DP:	0.00 in. Wg.
TSP:	1.77 in. Wg.
Site Altitude:	0.00 Ft
TSP @ Sea Level:	1.77 in. Wg.

MOTOR SELECTION:

Rated HP / Bypass: 2 /No Frame Size: 184T Nominal RPM: 1170 VAC/PH/HZ: 208/3/60 Efficiency Premium /0.875

Enclosure Type: ODP

Max Inertial Load: $72 WR^2$

FAN PERFORMANCE:

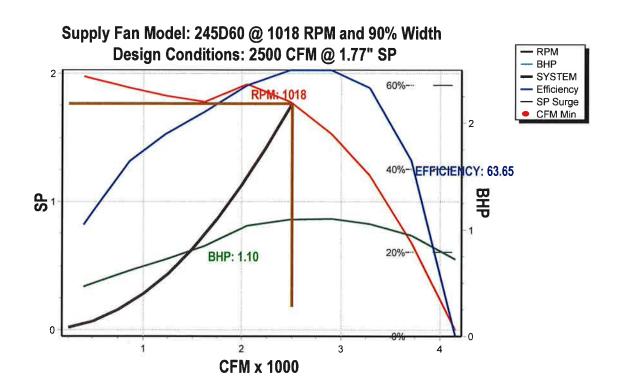
RPM:	1018
BHP:	1.10
Efficiency:	<i>63.6%</i>
In/Out Velocity:	765.842 FPM
Plenum Out Velocity:	42 FPM

FAN SOUND POWER (Inlet/Outlet):

Octave Band:				(Re 10^-12 watts)			
1	2	3	4	5	6	7	8
85	83	83	81	77	<i>76</i>	72	68
85	84	<i>89</i>	91	89	87	80	72
SOUND	POWE	R A-Weig	thted: 8	6 / 92 dB			

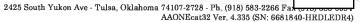
Max Duct SP with Blocked Airway:

1.9 in. Wg. @ 1018 rpm











RN-016-8-0-HA09-142:M000-U0B-DPP-B0A-0DEBWBF-00-00C0000VB Tag: RTU-1

Job Name: Job Number: Green Cove Springs Police Replacement Job #2021040855 Unit Submittal For: Unit Submittal Date:

June 28, 2023

	Base Option	Description	
R	Series	Roof Top Unit	
N	Generation	Ninth Generation	
016	Unit Size	Sixteen	
8	Voltage	208V/3Ø/60Hz	
0	Interior Protection	Standard	
Η	Refrigerant Style	R-410A Variable Capacity Scroll Compressor + Two-Step Compressor - High Efficiency	
A	Unit Configuration	Air-Cooled Cond. + Std Evap. Coil	
0	Coil Coating	Standard	
9	Cooling/Heat Pump Staging	Modulating - 1 VCC + 1 Staged Comp.	
1	Heating Type	Electric Heat	
4	Heating Designation	Heat 4 - 30 kW	
2	Heating Staging	2 Stage	

	Feature Option	Description
M	1A. RA/OA Section	Motorized 100% Outside Air Dampers - No RA Opening
0	1B. RA/EA Blower Configuration	Standard - None
0	1C. RA/EA Blower	Standard - None
0	1D. RA/EA Blower Motor	Standard · None
U	2. OA Control	2 Position Actuator
0	3. Heat Options	Standard
В	4. Maintenance Options	115V Convenience Outlet - Factory Wired
D	5A. SA Blower Configuration	1 Blower + Premium Efficiency Motor + 1 VFD
P	5B. SA Blower	24" Direct Drive Backward Curved Plenum - 60% Width
P	5C. SA Motor	2,0 hp - 1170 rpm
В	6A. Pre Filter Type	Metal Mesh OA Pre Filter
0	6B. Unit Filter Type	2" Pleated - 30% Eff
A	6C. Filter Options	Clogged Filter Switch
0	7. Refrigeration Control	Standard - Adj Comp. Cooling Lock Out Through Unit Controls
D	8. Refrigeration Options	Modulating Hot Gas Reheat
E	9. Refrigeration Accessories	ECM Condenser Fan - Head Pressure Control
В	10. Power Options	Non-fused Disconnect Power Switch - 150 Amps
W	11. Safety Options	Remote Safety Shutdown Terminals + High Condensate Level Switch
В	12. Controls	Phase & Brown Out Protection
F	13. Special Controls	Make Up Air Unit Controller - CV Cool + CV Heat
0	14A. Outside Air Configuration	Standard - None
0	14B. Preheat Sizing	Standard - None
0	15. Glycol Percent	Water or No WSHP
0	16. Interior Cabinet Options	Standard - Double Wall + R-13 Foam Insulation + Stainless Steel Drain Pan
C	17. Exterior Cabinet Options	Cond. Coil Guards
0	18. Electrical Rating	Standard - 5 KAIC
0	19. Code Options	Standard - ETL U.S.A. Listing
0	20. Crating	Standard
0	21. Water-Cooled Cond.	Standard - None
V	22. Control Vendors	VCC-X Controls + Integrated BACnet MSTP
В	23, Type	Standard - Includes AAON Gray Paint



VCCX Components

2425 South Yukon Ave - Tulsa, Oklahoma 74107-2728 - Ph. (918) 583-2266 AAONEcat32 Ver. 4,335 (SN: 6681840-HRDLEDR4)

RN-016-8-0-HA09-142:M000-U0B-DPP-B0A-0DEBWBF-00-00C0000VB

Tag: RTU-1 Job Name:

Green Cove Springs Police

VCCX For:

Job Number:

Replacement Job #2021040855

VCCX Date:

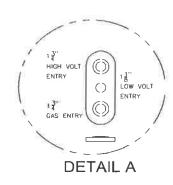
June 28, 2023

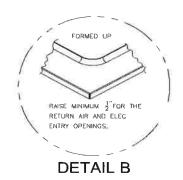
Hardware Included For VCCX Controller

Part#	Included Parts	Assigned Channel	BACnet Point
ASM01698	VCCX2 CONTROLLER		22.2000.2000
ASM01692	OSA Temp/Hum Sensor	EBUS2 communicating sensor	AI:16,AI:17,AI:18,AI:1
R82890	Supply Temp Sensor - Field Installed	VCCX control point AI 3	AI:
	Supply Fan Control Signal 0-10VDC	VCCX control point AO 1	AI:2
	Economizer	VCCX control point AO 2	AI:30
R62330	Proof of Air Flow	VCCX control point BI 1	BI:6, BI:24
R64580	Dirty Filter Sensor	VCCX control point BI 2	BI:2
	Safety Shut Down	VCCX control point BI 8	BI:20
	Supply Fan	Configured Relay Point	BI:4'
	Heat 1	Configured Relay Point	BI:48
	Heat 2	Configured Relay Point	BI:49
ASM02201	DIGITAL REFRIGERATION MODULE		
R57800	Comp Discharge Temp A	RSMD point TEMP1	AI:60
V38391	Suction Pressure Sensor A	RSMD point SP-1	AI:48
V38410	Discharge Pressure Sensor A	RSMD point HP-1	AI:50
V38410	Discharge Pressure Sensor B	RSMD point HP-2	AI:75
R63950	Modulated Condenser Signal B	RSMD point AO2	AI:4'
R63950	Modulated Condenser Signal A	RSMD point AO1	AI:40
	Comp Status Input A	RSMD point BIN1	BI:7'
	Comp Status Input B	RSMD point BIN2	BI:78
	Emergency Shutdown	RSMD point BIN4	BI:83
	Comp Unload Signal A	RSMD point T1	AI:44
	Comp Enable A	RSMD Fixed Relay point	BI:84
	Comp Enable B	RSMD Fixed Relay point	BI:88
ASM01670	MODULATING HOT GAS REHEAT MODULE		
	Reheat HGR Valve	MHGRV-X	AI:42

RN SERIES C - CABINET STANDARD ~ 16-30 TON

CLEARANCES				
• UNIT SIZE • 16 - 30 TON				
48				
48				
6				
60				
UNOBSTRUCTED				





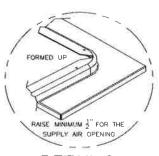
NUMBER OF CONDENSER FANS

16,18 & 20 TON 💿

2 FANS

25 & 30 TON

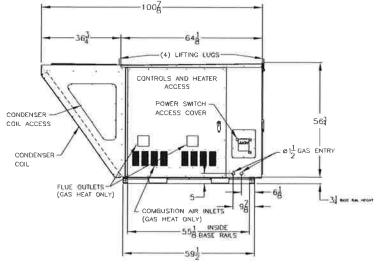
3 FANS



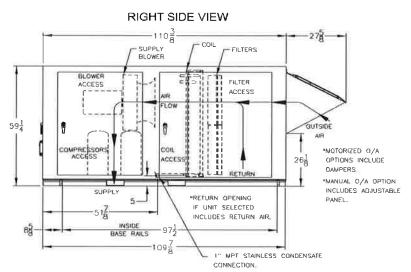
DETAIL C

SEE DETAIL C SEE DETAIL C SEE DETAIL B SEE DETAIL B

FRONT VIEW



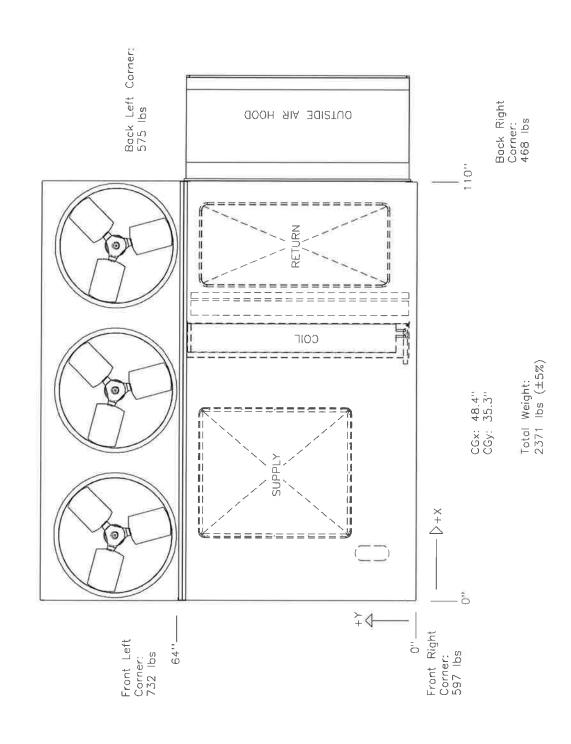
RNC-00001 REV:E 08/20/14 MLW NOTE: ALL DIMENSIONS ARE IN INCHES



AIR COOLED CONDENSING UNIT



RN-016-8-0-HA09-142:M000-U0B-DPP-B0A-0DEBWBF-00-00C0000VB



Disclaimer: This weight estimate does not account for any SPAs.



August 4, 2023

City of Green Cove Springs 321 Walnut Street Green Cove Springs, FL 32043 Email: sthomas@greencovesprings.com

Ref: EOC - 1001 Idlewild Ave

We propose to remove and replace (1) existing AAON unit with a roof top mounted VALENT unit.

*Price includes but is not limited to the following:

The new unit. New controllers, new curb, new duct work to existing duct work, new drain line, all roofing, electrical, and mechanical contactors will be State of Florida licensed contractors.

Delivery time on the new unit is approx. 20-30 weeks.

The warranty will be one-year on labor and functional parts with five-years on the compressor. *All warranties are subject to the manufacturer's specifications.

The price for the above-mentioned work will be \$129,700.00. Payments are to be made 100% upon completion.

This Quote is good for 60 days.

Thank you for the opportunity of submitting this quote.

Acceptance: Date:

Thank you,

Michael C. Taylor President/C.E.O.



Mark: KIU-I

Model: VX-112-15I-1-E1

VX-112-15I-1-E1

Unit Performance

Design Conditions						
Elevation (ft)		mer WB (F)	Winter DB (F)	Supply (CFM)	Outdoor Air (CFM)	Exhaust Air (CFM)
33	95.0	78.0	29.2	2,500	2,500	

Unit S	pecifications				
Qty	Weight (lb)	Cooling Type	Heating Type	Unit Installation	Unit ETL Listing
1	2,305 (+/- 5%)	Packaged DX	Electric	Outdoor	UL\cUL 1995

Configuration			
Outo	loor Air	Exhaus	t Air
Intake	Discharge	Intake	Discharge
End	Bottom	None	10m2

ASHRAE 90.1-2019 Compliance							
ASHRAE 90.1 Min. Efficiency Calculated Efficiency Compliance							
ISMRE	4	8.4	1				

Cooling Specifications								
	Total	Sensible	Lead	Coil (DB/WB)		Reheat		
Туре	Capacity (MBH)	Capacity (MBH)	Compressor Type	EAT (F)	LAT (F)	Capacity (MBH)	LAT (F)	
Packaged DX	205.5	110.1	Inverter Scroll	95.0 / 78.0	55.1 / 55.1	99.4	91.9	

Heating Specifications					
Туре	Capacity (kW)	Full Load Amps (FLA)	Capacity Control	Perfor	mance
Type	Capacity (KW)	Full Load Allips (FLA)	Capacity Control	EAT (F)	LAT (F)
Electric	28.7	79.66	Modulating (SCR)	29.2	65.5

Air Performanc	e								
Туре	Total Volume	External SP Total SP		EDDM	Fan				
туре	(CFM)	(in. wg)	(in. wg)	FRPM	Qty	Туре	Drive-Type		
Supply	2,500	1.25	1.706	1455	1	Plenum	Direct		

Motor Specifications										
Motor	Qty	Operating Power (hp)	Size (hp)	Enclosure	Efficiency	RPM				
Supply	1	1.06	1-1/2	ODP	PE	1170				

Electrical Specifications									
F	Power Supply	Rating (V/C/P)	MCA (A)	MOP (A)	FLA (A)	Fan Power (W/CFM)*			
	Unit	208/60/3	106.0	125.0	84.8	0.315			

^{*}Fan Power (W/CFM) = (Supply BHP + Exhaust BHP) / Supply CFM



Job: Green College #5.

Mark: RIU-I

Model: VX-112-15I-1-E1

Construction Features And Accessories

Unit	
Unit Installation - Outdoor	Sto
Unit Construction - Double Wall	Sto
Insulation - 2 inch 2.4# R13 foam	Sto
Corrosion Resistant Fasteners	Sto
Hinged Access	Sto
Factory Wired Non-Fused Disconnect Switch	X
Direct Drive Plenum Blower & Motor Assemblies	X
Factory Wired VFDs	Sto
Unit Finish - Permatector, Concrete Gray (RAL 7023)	X
Stainless Steel Condensate Drain Pan and Connection	Sto
Condensate Drain Trap	Sto
Short Circuit Current - 5 kA	Sto
Controls	
Unit Controls - Full Control	Sto
Internally Mounted Control Center with 24 VAC control transformer(s) and control circuiting fusing	Sto
BMS Protocol - BACNetMSTP	X
BMS Monitoring Points	-0
Supply Fan Control - Constant Volume-Adj. Setpoint	X
Exhaust Fan Control	
Exhaust Fan Only Power	
Energy Wheel Rotation Sensor	
Web-Based User Interface	Std
Damper Control - Constant Volume-Adj. Setpoint	X
Economizer Control	
Control Accessories	
Remote Display	
Dirty Filter Sensor(s)	
Airflow Monitor	
Room Thermostat	
Phase/Brownout Protection	Std
Economizer Fault Detection Diagnostics	

Accessories	
Recirc Air Damper	
Outdoor Air Damper - Low Leakage	Х
Return Air Damper	
Roof Curb - GKD - 45.9/91.9-G14	Х
Supply Air Filters - 2" Merv 8, 2-20x20x2, 2-20x24x2	Std
Service Outlet	
Piping Vestibule	
Service Lights	
Condensate Overflow Switch	Х
Spare Filters	
Exhaust Discharge Gravity Backdraft Damper	
ElectroFin Coil Coating	
Motor Shaft Grounding	X
UV Lights	
Bipolar Ionization	
Smoke Detector(s)	
Barometric Relief Damper	
Hail Guards	
Warranty Options	
Unit Warranty - 18 Months (Std.)	Std
Compressor Warranty - 5.5 Yrs. (4 Yrs. Extended)	X

Standard Option	Std
Not Included	
Included	Х

Notes

Outdoor Air Damper supplied is low leakage, motorized VCD-23 (leakage rate of 3 CFM / ft^2 @ 1 in. wg), Class 1A



Printed Date: 08/02/2023 Job: Green C Item #5.

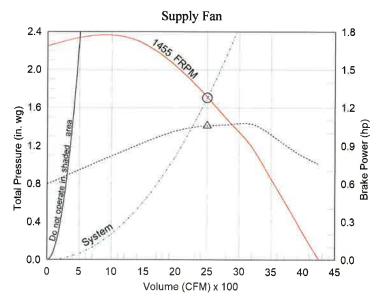
Model: VX-112-15I-1-E1

Supply Fan Charts And Performance

Supply Fan Pe	Supply Fan Performance										
Total Volume	External SP	Total SP		Operating	Motor		Fan				
(CFM)	(in. wg)	(in. wg)	RPM	Power (hp)	Qty	Size (hp)	Qty	Туре	Drive-Type		
2,500	1.25	1.706	1455	1.06	1	1-1/2	1	Plenum	Direct		

Pressure Drop (in. wg)									
Weatherhood	Filter	Damper	Cooling	Heating	External	Total			
0.05	0.081	0.02	0.2	0.084	1.25	1.706			

Sound	Sound Performance in Accordance with AMCA										
		Sound	Power b	y Octav	e Band	Laura	JD4	0			
62.5	125	250	500	1000	2000	4000	8000	Lwa	dBA	Sones	
73	77	82	71	66	62	74	61	78	67	16	



- Operating Bhp point Operating point at Total External TP Fan curve
- - System curve
- ----- Brake horsepower curve

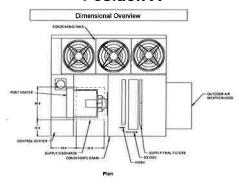


Job: Green Collection #5.

Model: VX-112-15I-1-E1

Radiated Sound

Position A



Position D

Position B

Position C

"E" is the Top Plane

Supply Air Flow Nominal, Largest Tonnage Condensing Section Available, PDX units only

Plane				Octave B	ands (Lw)				Dianaliss	Diame Land
Plane	1	2	3	4	5	6	7	8	Plane Lw	Plane LwA
Α	73	85	78	80	81	73	67	62	88	83
В	71	79	69	78	73	68	64	57	83	78
С	79	77	69	76	75	70	60	59	83	78
D	74	77	72	74	74	67	61	58	82	77
Е	77	84	78	79	77	72	65	61	87	81
Total	83	89	82	85	84	78	71	67	93	87

AMCA 320-07 - Laboratory Methods of Sound Testing of Fans Using Sound Intensity

Tests conducted in accordance with this standard.

Free field measurement plane created 1 foot from unit on all sides and top.

Sound Intensity measured in Watts/m^2.

Sound data converted to Sound Power (Lw) for the chart above.

A-Weighted Sound Power was determined using AMCA Standard 301-90 Clause 9.1.

Plane E sound data was measured above the top plane of the unit.



Printed Date: 08 Job: Green C Item #5.

Mark: RTU-1

Model: VX-112-15I-1-E1

Cooling Performance

Cooling Spe	Cooling Specifications										
Nominal	Entering Air (F)		Leaving Air (F)		Capacity (MBH)		Reheat		Condensing		
Tonnage	DB	WB	DB	WB	Total	Sensible	Capacity (MBH)	LAT (F)	Ambient Temp (F)		
15.0	95.0	78.0	55.1	55.1	205.5	110.1	99.4	91.9	95.0		

Coil Information	× -		w.					
PDX Coil Model	Fins Per Inch	Rows Deep	Face Vel. (ft/min)	Coil PD (in. wg)	Refrigerant	Refrig. Velocity (ft/min)	Face Area (ft2)	Suction Temp (F)
DR516L06S14-45X42.5- LH	14	6	188	0.2	R-410A	1,452	13.3	51.3

Compressor Details						
Lead Compressor Compressor		Compressor	RLA/MRC (A)	Compressor LRA (A)		
Type	Qty	Comp. #1	Comp. #2	Comp. #1	Comp. #2	
Inverter Scroll	1	51.3	•	NA	1	

Unit Details	
Refrigerant charges provided by the factory are approximate and may require adjustment in the field	
Hermetic scroll type compressors	
Compressors mounted on neoprene vibration isolation	
Stainless steel double sloped drain pan	
Moisture-indicating sight glass	
Service/charging valves	
Refrigerant high pressure switch (manual reset)	
Liquid-Line filter drier	
Multiple low sound condensing fans with Lead ECM condensing fan for modulating head pressure control	
Inverter scroll compressor	
Electronic expansion valve	



Job: Green Collection #5.

Model: VX-112-15I-1-E1

Heating Performance

Heating Specifications					
Type	Capacity (kW)	Full Load Amps (FLA)	Capacity Control	Perfor	mance
Турс	Capacity (KVV)	I dii Load Allips (I LA)	Capacity Control	EAT (F)	LAT (F)
Electric	28.7	79.66	Modulating (SCR)	29.2	65.5

Electric	28.7	79.66	Modulating (SCR)	29.2	65.5
Unit Details	7-1				
Open coil heating elements					
High grade Nickel-Chrome	alloy coils		The state of the s	40	
SCR controller					

Unit can run compressors or electric heater independently. Simultaneous operation of heating and cooling cannot occur, and will be locked out. Unit MCA/MOCP will be sized for greater of the compressor or heater load.

Unit controller maximum allowable supply discharge air set point is 100F (37.8C)

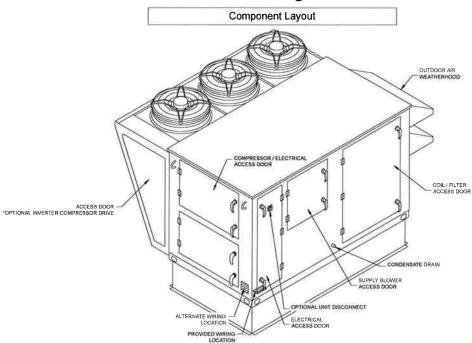
C:\Users\irbkvj\OneDrive - Trane Technologies\Documents\CAPS\Jobs\Green Cove EOC,valj Generated by: Patrick.Gallagher@trane.com



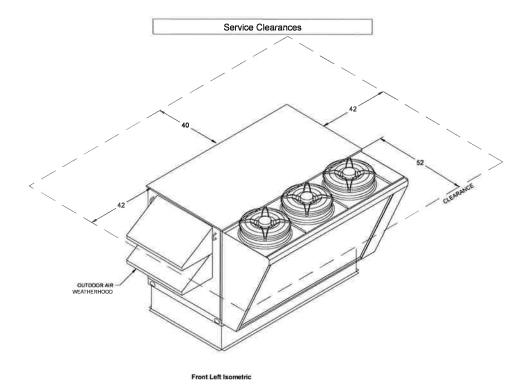
Mark: KTU-

Model: VX-112-15I-1-E1

Isometric Drawings



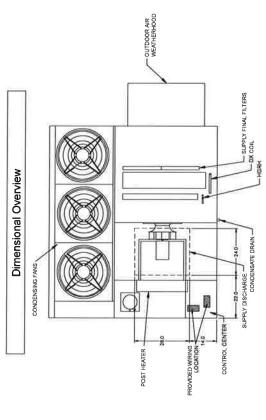
Back Right Isometric



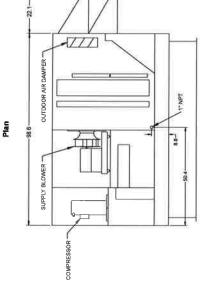
C:\Users\irbkvj\OneDrive - Trane Technologies\Documents\CAPS\Jobs\Green Cove EOC.valj
Generated by: Patrick.Gallagher@trane.com

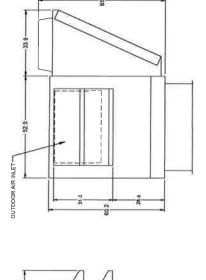
Printed Date: 08/03/2023 Job: Green Cove EOC Mark: RTU-1 Model: VX-112-15I-1-E1

Overview Drawings

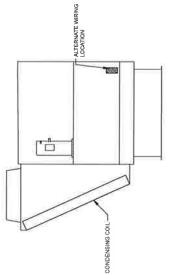


Electrical Connections





Right End



Left End

C:\Users\irbkvj\OneDrive - Trane Technologies\Documents\CAPS\Jobs\Green Cove EOC.valj Generated by: Patrick.Gallagher@trane.com

Item #5.

S 4.41.1100

Page 86



Job: Green Collection #5.

Model: VX-112-15I-1-E1

Unit Corner Weights

783 lb	751 lb
U	nit
394 lb	378 lb

Note

Estimated corner weights are shown looking down on unit and the outside air intake will be on the right. Weights are applied at the base of the unit. Images not drawn to scale.

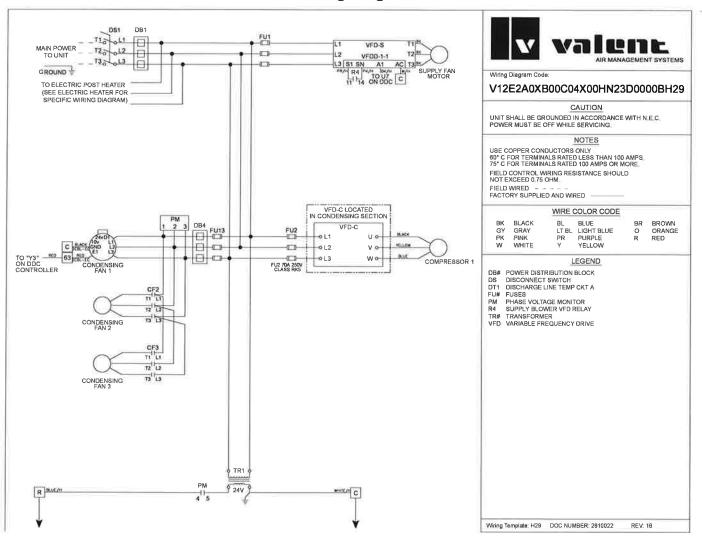


Job: Green Collection #5.

Mark: RTU-T

Model: VX-112-15I-1-E1

Wiring Diagram

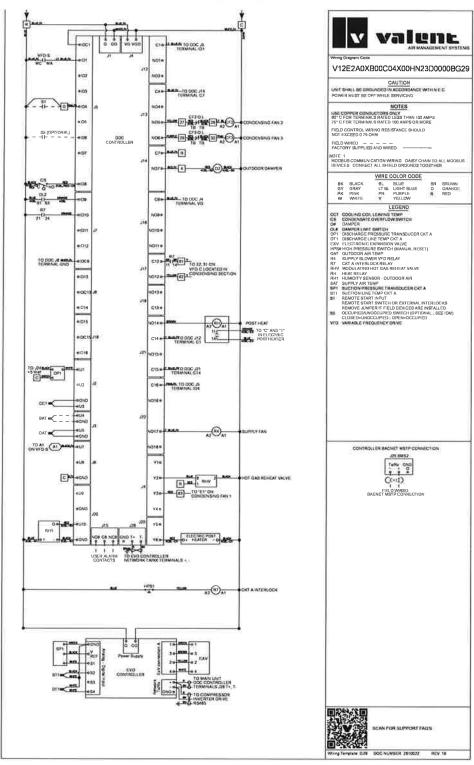




Job: Green Control | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150 | 150

Model: VX-112-15I-1-E1

Wiring Diagram 2

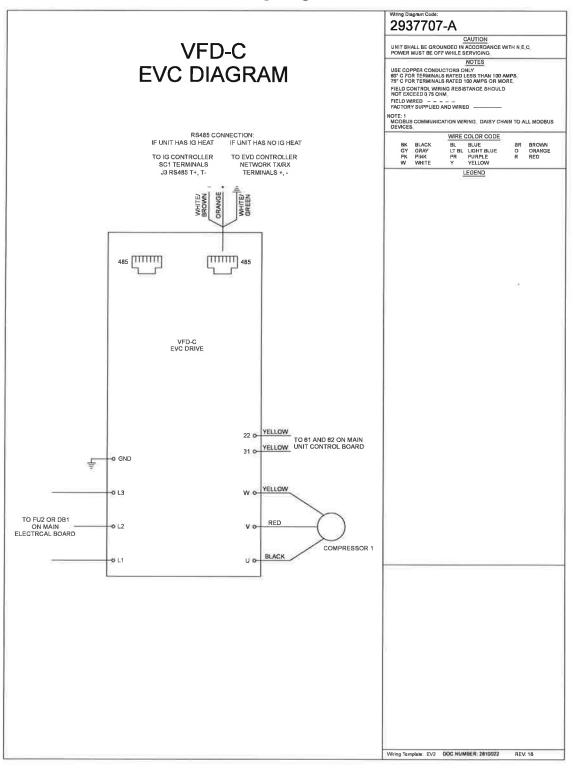




Job: Green Co Item #5.

Model: VX-112-15I-1-E1

Wiring Diagram 3





Job: Green C Item #5.

Mark: KTU-

	Modbus/BACnet Points List	BACnet	ModBus	Read or	Tout on Hold of Pa	1
Variable	Description	Object	Object	Write	Text or Unit of M	Includ
Sansa Toma Apalas Janua	Sansa Tamparahun	01.1	30002		Active Inactive	-
Space_Temp_Analog_Input Supply Temp_Analog_Input	Space Temperature Supply Temperature	AI-1 AI-2	30002	R	°F	
				R		X
Outside_Air_Temp_Analog_Input	Outside Air Temperature	Al-3	30006	R	°F	Х
Mixed_Temp_Analog_Input	Mixed Temperature	Al-4	30008	R	°F	_
Cold_Coil_1_Temp_Analog_Input	Cold Coil 1 Temperature	Al-5	30010	R	°F	X
Return_Temp_Analog_Input	Return Temperature	AI-7	30014	R	°F	
Exhaust_Temp_Analog_Input	Exhaust Temperature	Al-8	30016	R	°F	
Space_RH_Analog_Input	Space % Relative Humidity	AI-9	30018	R	%	
Outside RH Analog Input	Outside % Relative Humidity	AI-10	30020	R	%	1
Return RH Analog Input	Return % Relative Humidity	Al-11	30022	R	%	-
Return_Duct_Static_Pressure_Analog_Input	Return Duct Static Pressure	Al-12	30024	R	"wc	1
Space Static Pressure Analog Input	Space Static Pressure	Al-13	30026	R	'wc	_
	- TANKON CANADA CANADA					-
Supply_Duct_Static_Pressure_Analog_Input	Supply Duct Static Pressure	AI-14	30028	R	"wc	_
Space_CO2_1_Analog_Input	Space 1 CO2 ppm	AI-15	30030	R	ppm	
Return_CO2_Analog_Input	Return CO2 ppm	AI-17	30034	R	ppm	
Circuit_A_Discharge_Temp_Analog_Input	Circuit A Discharge Temperature	Al-20	30040	R	°F.	X
Circuit A Suction Temp Analog Input	Circuit A Suction Temperature	Al-21	30042	R	°F	X
Circuit B Discharge Temp Analog Input	Circuit B Discharge Temperature	AI-22	30044	R	°F	, ×
Circuit B Suction Temp Analog Input	Circuit B Suction Temperature	Al-23	30046	R	°F	×
Circuit A Discharge Pressure Analog Input		AI-23 AI-28	30056	R		
	Circuit A Discharge Pressure				psig)
Circuit_A_Suction_Pressure_Analog_Input	Circuit A Suction Pressure	Ai-29	30058	R	psig	_ >
ircuit_B_Discharge_Pressure_Analog_Input	Circuit B Discharge Pressure	AI-30	30060	R	psig	
Circuit_B_Suction_Pressure_Analog_Input	Circuit B Suction Pressure	AI-31	30062	R	psig)
Aux_In_Customer_1	Customer defined auxiliary input	AI-36	30072	R	selectable	
Aux In Customer 2	Customer defined auxiliary input	AI-37	30074	R	selectable	
Aux_In_Customer_3	Customer defined auxiliary input	AI-38	30076	R	selectable	_
Aux_In_Customer_4	The second description of the second		30078		The state of the s	-
	Customer defined auxiliary input	Al-39		R	selectable	-
Aux_In_Customer_5	Customer defined auxiliary input	AI-40	30080	R	selectable	
Aux_In_Customer_6	Customer defined auxiliary input	AI-41	30082	R	selectable	
Aux_In_Customer_7	Customer defined auxiliary input	AI-42	30084	R	selectable	
Aux_In_Customer_8	Customer defined auxiliary input	AI-43	30086	R	selectable	
Aux In Customer 9	Customer defined auxiliary input	Al-44	30088	R	selectable	
Aux In Customer 10	Customer defined auxiliary input	Al-45	30090	R	selectable	
	Main Temperature Set point Supply, Space, or					1
Temperature_Setpoint	Return target temperature	AV-1	40002	RW	°F	X
	Heat/Cool Spt Deadband when Room or Return					
Temperature_Heat_Cool_Deadband	control is active Clg Spt = Deadband /2 + Temp Spt	AV-2	40004	RW	Delta in °F	
	Htg Spt = Deadband /2 - Temp Spt					
Tamperatura Cotnoint Heasewood	Main Temperature Set point Supply, Space, or	6)//2	40000	DIA	ar.	
Temperature_Setpoint_Unoccupied	Return target temperature	AV-3	40006	RW	°F	
	Heat/Cool Spt Deadband when Room or Return					
perature Heat Cool Deadband Unoccupied	control is active Clg Spt = Deadband /2 + Temp Spt	AV-4	40008	RW	Delta in °F	
h	Htg Spt = Deadband /2 - Temp Spt	/	10000	1	Dona III I	
Cooling_Coil_Setpoint_Min	Cooling Coil Leaving Air Setpoint	AV-5	40010	RW	°F	X
Cooling_Coil_Setpoint_Max	Maximum Coil Leaving Setpoint	AV-6	40012	RW	°F	<u> </u>
Dehumidification_Setpoint	Dehumidification Setpoint %RH for Space or Return	AV-7	40014	RW	%	
	control					
	Outside Dewpoint Dehumidification Trigger	8-VA	40016	RW	°F	, X
Outside_Dewpoint_Setpoint	Catalag Berryalin Serial Manager 11 (1986)				°F	
Outside_Dewpoint_Setpoint Indoor_Dewpoint_Setpoint	Indoor Dewpoint Dehumidification Trigger	AV-9	40018	RW	0.4	
Indoor Dewpoint Setpoint						
THE VECTOR BY CO. THE PROPERTY OF THE PROPERTY	Indoor Dewpoint Dehumidification Trigger	AV-9 AV-10	40018 40020	RW	°F	
Indoor Dewpoint Setpoint	Indoor Dewpoint Dehumidification Trigger Unoccupied Indoor Dewpoint Dehumidification Trigger	AV-10	40020	RW	°F	
Indoor_Dewpoint_Setpoint Unocc_Indoor_Dewpoint_Setpoint Unoccupied_Dehumidification_Setpoint	Indoor Dewpoint Dehumidification Trigger Unoccupied Indoor Dewpoint Dehumidification Trigger Unoccupied Dehumidification %RH Selpoint	AV-10 AV-11	40020 40022	RW RW	°F	
Indoor_Dewpoint_Setpoint Unocc_Indoor_Dewpoint_Setpoint	Indoor Dewpoint Dehumidification Trigger Unoccupied Indoor Dewpoint Dehumidification Trigger Unoccupied Dehumidification %RH Selpoint Economizer Ambient Temp Enable Selpoint Allow	AV-10	40020	RW	°F	
Indoor_Dewpoint_Setpoint Unocc_Indoor_Dewpoint_Setpoint Unoccupied_Dehumidification_Setpoint Economizer_Temp_Enable_Setpoint	Indoor Dewpoint Dehumidification Trigger Unoccupied Indoor Dewpoint Dehumidification Trigger Unoccupied Dehumidification %RH Selpoint Economizer Ambient Temp Enable Selpoint Allow Econ when OAT is less than Selpoint	AV-10 AV-11 AV-12	40020 40022 40024	RW RW RW	°F	
Indoor_Dewpoint_Setpoint Unocc_Indoor_Dewpoint_Setpoint Unoccupied_Dehumidification_Setpoint	Indoor Dewpoint Dehumidification Trigger Unoccupied Indoor Dewpoint Dehumidification Trigger Unoccupied Dehumidification %RH Setpoint Economizer Ambient Temp Enable Setpoint Allow Econ when OAT is less than Setpoint Economizer Enthalpy Enable Setpoint Allow Econ	AV-10 AV-11	40020 40022	RW RW	°F	
Indoor_Dewpoint_Setpoint Unocc_Indoor_Dewpoint_Setpoint Unoccupied_Dehumidification_Setpoint Economizer_Temp_Enable_Setpoint Economizer_Enthalpy_Enable_Setpoint	Indoor Dewpoint Dehumidification Trigger Unoccupied Indoor Dewpoint Dehumidification Trigger Unoccupied Dehumidification %RH Setpoint Economizer Ambient Temp Enable Setpoint Allow Econ when OAT is less than Setpoint Economizer Enthalpy Enable Setpoint Allow Econ when OA Enthalpy is less than Setpoint	AV-10 AV-11 AV-12 AV-13	40020 40022 40024 40026	RW RW RW	°F °F btu/lb	
Indoor_Dewpoint_Setpoint Unocc_Indoor_Dewpoint_Setpoint Unoccupied_Dehumidification_Setpoint Economizer_Temp_Enable_Setpoint Economizer_Enthalpy_Enable_Setpoint Cooling_Lockout_Setpoint	Indoor Dewpoint Dehumidification Trigger Unoccupied Indoor Dewpoint Dehumidification Trigger Unoccupied Dehumidification %RH Selpoint Economizer Ambient Temp Enable Selpoint Allow Econ when OAT is less than Selpoint Economizer Enthalpy Enable Setpoint Allow Econ when OA Enthalpy is less than Selpoint Cooling Ambient Lockout Selpoint	AV-10 AV-11 AV-12 AV-13 AV-17	40020 40022 40024 40026 40034	RW RW RW RW	°F °F btu/lb °F	
Indoor_Dewpoint_Setpoint Unocc_Indoor_Dewpoint_Setpoint Unoccupied_Dehumidification_Setpoint Economizer_Temp_Enable_Setpoint Economizer_Enthalpy_Enable_Setpoint Cooling_Lockout_Setpoint Heating_Lockout_Setpoint	Indoor Dewpoint Dehumidification Trigger Unoccupied Indoor Dewpoint Dehumidification Trigger Unoccupied Dehumidification %RH Setpoint Economizer Ambient Temp Enable Setpoint Allow Econ when OAT is less than Setpoint Economizer Enthalpy Enable Setpoint Allow Econ when OA Enthalpy Enable Setpoint Allow Econ Cooling Ambient Lockout Setpoint Heating Ambient Lockout Setpoint	AV-10 AV-11 AV-12 AV-13 AV-17 AV-18	40020 40022 40024 40026 40034 40036	RW RW RW RW RW	°F °F blu/lb °F °F	
Indoor_Dewpoint_Setpoint Unocc_Indoor_Dewpoint_Setpoint Unoccupied_Dehumidification_Setpoint Economizer_Temp_Enable_Setpoint Economizer_Enthalpy_Enable_Setpoint Cooling_Lockout_Setpoint Heating_Lockout_Setpoint Preheat_Lockout_Setpoint	Indoor Dewpoint Dehumidification Trigger Unoccupied Indoor Dewpoint Dehumidification Trigger Unoccupied Dehumidification %RH Selpoint Economizer Ambient Temp Enable Selpoint Allow Econ when OAT is less than Selpoint Economizer Enthalpy Enable Selpoint Allow Econ when OA Enthalpy Enable Selpoint Allow Econ when OA Enthalpy Enable Selpoint Cooling Ambient Lockout Selpoint Heating Ambient Lockout Selpoint Preheat Ambient Lockout Selpoint	AV-10 AV-11 AV-12 AV-13 AV-17 AV-18 AV-19	40020 40022 40024 40026 40034 40036 40038	RW RW RW RW RW RW	°F °F blu/lb °F °F °F	
Indoor_Dewpoint_Setpoint Unocc_Indoor_Dewpoint_Setpoint Unoccupied_Dehumidification_Setpoint Economizer_Temp_Enable_Setpoint Economizer_Enthalpy_Enable_Setpoint Cooling_Lockout_Setpoint Heating_Lockout_Setpoint	Indoor Dewpoint Dehumidification Trigger Unoccupied Indoor Dewpoint Dehumidification Trigger Unoccupied Dehumidification %RH Setpoint Economizer Ambient Temp Enable Setpoint Allow Econ when OAT is less than Setpoint Economizer Enthalpy Enable Setpoint Allow Econ when OA Enthalpy Enable Setpoint Allow Econ Cooling Ambient Lockout Setpoint Heating Ambient Lockout Setpoint	AV-10 AV-11 AV-12 AV-13 AV-17 AV-18	40020 40022 40024 40026 40034 40036	RW RW RW RW RW	°F °F blu/lb °F °F	
Indoor_Dewpoint_Setpoint Unocc_Indoor_Dewpoint_Setpoint Unoccupied_Dehumidification_Setpoint Economizer_Temp_Enable_Setpoint Economizer_Enthalpy_Enable_Setpoint Cooling_Lockout_Setpoint Heating_Lockout_Setpoint Preheat_Lockout_Setpoint	Indoor Dewpoint Dehumidification Trigger Unoccupied Indoor Dewpoint Dehumidification Trigger Unoccupied Dehumidification %RH Selpoint Economizer Ambient Temp Enable Selpoint Allow Econ when OAT is less than Selpoint Economizer Enthalpy Enable Selpoint Allow Econ when OA Enthalpy Enable Selpoint Allow Econ when OA Enthalpy Enable Selpoint Cooling Ambient Lockout Selpoint Heating Ambient Lockout Selpoint Preheat Ambient Lockout Selpoint	AV-10 AV-11 AV-12 AV-13 AV-17 AV-18 AV-19	40020 40022 40024 40026 40034 40036 40038	RW RW RW RW RW RW	°F blu/lb °F °F °F	
Indoor_Dewpoint_Setpoint Unocc_Indoor_Dewpoint_Setpoint Unoccupied_Dehumidification_Setpoint Economizer_Temp_Enable_Setpoint Economizer_Enthalpy_Enable_Setpoint Cooling_Lockout_Setpoint Heating_Lockout_Setpoint Preheat_Lockout_Setpoint Economizer_Lockout_Setpoint	Indoor Dewpoint Dehumidification Trigger Unoccupied Indoor Dewpoint Dehumidification Trigger Unoccupied Dehumidification %RH Setpoint Economizer Ambient Temp Enable Setpoint Allow Econ when OAT is less than Setpoint Economizer Enthalpy Enable Setpoint Allow Econ when OA Enthalpy is less than Setpoint Cooling Ambient Lockout Setpoint Heating Ambient Lockout Setpoint Preheat Ambient Lockout Setpoint Economizer Ambient Lockout Setpoint Return Duct Static Pressure Setpoint	AV-10 AV-11 AV-12 AV-13 AV-17 AV-18 AV-19 AV-20 AV-21	40020 40022 40024 40026 40034 40036 40038 40040 40042	RW RW RW RW RW RW RW RW	°F °F blu/lb °F °F °F °K	
Indoor_Dewpoint_Setpoint Unocc_Indoor_Dewpoint_Setpoint Unocc_Undoor_Dewpoint_Setpoint Unoccupied_Dehumidification_Setpoint Economizer_Temp_Enable_Setpoint Economizer_Enthalpy_Enable_Setpoint Cooling_Lockout_Setpoint Heating_Lockout_Setpoint Preheat_Lockout_Setpoint Economizer_Lockout_Setpoint Return_Duct_Static_Pressure_Setpoint Space_Static_Pressure_Setpoint	Indoor Dewpoint Dehumidification Trigger Unoccupied Indoor Dewpoint Dehumidification Trigger Unoccupied Dehumidification %RH Selpoint Economizer Ambient Temp Enable Selpoint Allow Econ when OAT is less than Selpoint Economizer Enthalpy Enable Selpoint Allow Econ when OA Enthalpy is less than Selpoint Cooling Ambient Lockout Selpoint Heating Ambient Lockout Selpoint Preheat Ambient Lockout Selpoint Economizer Ambient Lockout Selpoint Return Duct Static Pressure Selpoint Space Static Pressure Selpoint	AV-10 AV-11 AV-12 AV-13 AV-17 AV-18 AV-19 AV-20 AV-21 AV-22	40020 40022 40024 40026 40034 40036 40038 40040 40042 40044	RW	°F °F blu/lb °F °F °F °K 'WC	
Indoor_Dewpoint_Setpoint Unocc_Indoor_Dewpoint_Setpoint Unocc_Indoor_Dewpoint_Setpoint Unoccupied_Dehumidification_Setpoint Economizer_Temp_Enable_Setpoint Economizer_Enthalpy_Enable_Setpoint Cooling_Lockout_Setpoint Heating_Lockout_Setpoint Preheat_Lockout_Setpoint Economizer_Lockout_Setpoint Return_Duct_Static_Pressure_Setpoint Space_Static_Pressure_Setpoint Supply_Duct_Static_Pressure_Setpoint	Indoor Dewpoint Dehumidification Trigger Unoccupied Indoor Dewpoint Dehumidification Trigger Unoccupied Dehumidification %RH Setpoint Economizer Ambient Temp Enable Setpoint Allow Econ when OAT is less than Setpoint Economizer Enthalpy Enable Setpoint Allow Econ when OA Enthalpy Enable Setpoint Allow Econ when OA Enthalpy is less than Setpoint Cooling Ambient Lockout Setpoint Heating Ambient Lockout Setpoint Preheat Ambient Lockout Setpoint Economizer Ambient Lockout Setpoint Return Duct Static Pressure Setpoint Space Static Pressure Setpoint	AV-10 AV-11 AV-12 AV-13 AV-17 AV-18 AV-19 AV-20 AV-21 AV-21 AV-22 AV-23	40020 40022 40024 40026 40034 40036 40038 40040 40042 40044 40046	RW	°F °F blu/lb °F °F °F °F 'Wc 'Wc	
Indoor_Dewpoint_Setpoint Unocc_Indoor_Dewpoint_Setpoint Unocc_Undoor_Dewpoint_Setpoint Unoccupied_Dehumidification_Setpoint Economizer_Temp_Enable_Setpoint Economizer_Enthalpy_Enable_Setpoint Cooling_Lockout_Setpoint Heating_Lockout_Setpoint Preheat_Lockout_Setpoint Economizer_Lockout_Setpoint Return_Duct_Setatic_Pressure_Setpoint Space_Static_Pressure_Setpoint Supply_Duct_Static_Pressure_Setpoint Space_CO2_Setpoint	Indoor Dewpoint Dehumidification Trigger Unoccupied Indoor Dewpoint Dehumidification Trigger Unoccupied Dehumidification %RH Setpoint Economizer Ambient Temp Enable Setpoint Allow Econ when OAT is less than Setpoint Economizer Enthalpy Enable Setpoint Allow Econ when OA Enthalpy Enable Setpoint Allow Econ when OA Enthalpy is less than Setpoint Cooling Ambient Lockout Setpoint Heating Ambient Lockout Setpoint Preheat Ambient Lockout Setpoint Economizer Ambient Lockout Setpoint Return Duct Static Pressure Setpoint Supply Duct Static Pressure Setpoint Supply Duct Static Pressure Setpoint Space_CO2_Setpoint	AV-10 AV-11 AV-12 AV-13 AV-17 AV-18 AV-19 AV-20 AV-21 AV-22 AV-23 AV-24	40020 40022 40024 40026 40034 40036 40038 40040 40042 40044 40046 40048	RW R	°F °F blu/lb °F °F °F "Wc "Wc ppm	
Indoor_Dewpoint_Setpoint Unocc_Indoor_Dewpoint_Setpoint Unocc_Undoor_Dewpoint_Setpoint Unoccupied_Dehumidification_Setpoint Economizer_Temp_Enable_Setpoint Economizer_Enthalpy_Enable_Setpoint Cooling_Lockout_Setpoint Heating_Lockout_Setpoint Preheat_Lockout_Setpoint Economizer_Lockout_Setpoint Return_Duct_Setatic_Pressure_Setpoint Space_Static_Pressure_Setpoint Supply_Duct_Static_Pressure_Setpoint Space_CO2_Setpoint	Indoor Dewpoint Dehumidification Trigger Unoccupied Indoor Dewpoint Dehumidification Trigger Unoccupied Dehumidification %RH Setpoint Economizer Ambient Temp Enable Setpoint Allow Econ when OAT is less than Setpoint Economizer Enthalpy Enable Setpoint Allow Econ when OA Enthalpy Enable Setpoint Allow Econ when OA Enthalpy is less than Setpoint Cooling Ambient Lockout Setpoint Heating Ambient Lockout Setpoint Preheat Ambient Lockout Setpoint Economizer Ambient Lockout Setpoint Return Duct Static Pressure Setpoint Supply Duct Static Pressure Setpoint Supply Duct Static Pressure Setpoint Space_CO2_Setpoint Outside Air Damper Minimum Setpoint	AV-10 AV-11 AV-12 AV-13 AV-17 AV-18 AV-19 AV-20 AV-21 AV-21 AV-22 AV-23	40020 40022 40024 40026 40034 40036 40038 40040 40042 40044 40046	RW	°F °F blu/lb °F °F °F °F 'Wc 'Wc	
Indoo_Dewpoint_Setpoint Unocc_Indoor_Dewpoint_Setpoint Unoccupied_Dehumidification_Setpoint Economizer_Temp_Enable_Setpoint Economizer_Enthalpy_Enable_Setpoint Cooling_Lockout_Setpoint Heating_Lockout_Setpoint Preheat_Lockout_Setpoint Economizer_Lockout_Setpoint Economizer_Lockout_Setpoint Return_Duct_Static_Pressure_Setpoint Space_Static_Pressure_Setpoint Supply_Duct_Static_Pressure_Setpoint Supply_Duct_Static_Pressure_Setpoint	Indoor Dewpoint Dehumidification Trigger Unoccupied Indoor Dewpoint Dehumidification Trigger Unoccupied Dehumidification %RH Selpoint Economizer Ambient Temp Enable Setpoint Allow Econ when OAT is less than Setpoint Economizer Enthalpy Enable Setpoint Allow Econ when OA Enthalpy is less than Setpoint Cooling Ambient Lockout Setpoint Heating Ambient Lockout Setpoint Preheat Ambient Lockout Setpoint Economizer Ambient Lockout Setpoint Return Duct Static Pressure Setpoint Space Static Pressure Setpoint Supply Duct Static Pressure Setpoint Space_CO2_Setpoint Outside Air Damper Minimum Setpoint Outside Air Damper Minimum Setpoint	AV-10 AV-11 AV-12 AV-13 AV-17 AV-18 AV-19 AV-20 AV-21 AV-22 AV-23 AV-24	40020 40022 40024 40026 40034 40036 40038 40040 40042 40044 40046 40048	RW R	°F °F blu/lb °F °F °F "Wc "Wc ppm	×
Indoa_Dewpoint_Setpoint Unocc_Indoar_Dewpoint_Setpoint Unoccupied_Dehumidification_Setpoint Economizer_Temp_Enable_Setpoint Economizer_Enthalpy_Enable_Setpoint Cooling_Lockout_Setpoint Heating_Lockout_Setpoint Preheat_Lockout_Setpoint Economizer_Lockout_Setpoint Economizer_Lockout_Setpoint Space_Static_Pressure_Setpoint Space_Static_Pressure_Setpoint Supply_Duct_Static_Pressure_Setpoint Space_CO2_Setpoint utside_Air_Damper_Minimum_Setpoint_Occ Outside_RH_from_BMS	Indoor Dewpoint Dehumidification Trigger Unoccupied Indoor Dewpoint Dehumidification Trigger Unoccupied Dehumidification %RH Setpoint Economizer Ambient Temp Enable Setpoint Allow Econ when OAT is less than Setpoint Economizer Enthalpy Enable Setpoint Allow Econ when OA Enthalpy is less than Setpoint Cooling Ambient Lockout Setpoint Heating Ambient Lockout Setpoint Preheat Ambient Lockout Setpoint Economizer Ambient Lockout Setpoint Economizer Ambient Lockout Setpoint Space Static Pressure Setpoint Space Static Pressure Setpoint Supply Duct Static Pressure Setpoint Space_CO2_Setpoint Outside Air Damper Minimum Setpoint Outside RH from BMS Used when source selection is set to BMS	AV-10 AV-11 AV-12 AV-13 AV-17 AV-18 AV-19 AV-20 AV-21 AV-21 AV-23 AV-24 AV-24	40020 40022 40024 40026 40034 40036 40038 40040 40042 40044 40046 40048 40048	RW R	°F °F F °F "Wc "Wc "Wc "Wc "Wc	×
Indoor_Dewpoint_Setpoint Unocc_Indoor_Dewpoint_Setpoint Unoccupied_Dehumidification_Setpoint Economizer_Temp_Enable_Setpoint Economizer_Enthalpy_Enable_Setpoint Cooling_Lockout_Setpoint Heating_Lockout_Setpoint Preheat_Lockout_Setpoint Economizer_Lockout_Setpoint Return_Duct_Static_Pressure_Setpoint Space_Static_Pressure_Setpoint Supply_Duct_Static_Pressure_Setpoint Space_CO2_Setpoint utside_Air_Damper_Minimum_Setpoint_Occ	Indoor Dewpoint Dehumidification Trigger Unoccupied Indoor Dewpoint Dehumidification Trigger Unoccupied Dehumidification %RH Setpoint Economizer Ambient Temp Enable Setpoint Allow Econ when OAT is less than Setpoint Economizer Enthalpy Enable Setpoint Allow Econ when OA Enthalpy Enable Setpoint Allow Econ when OA Enthalpy is less than Setpoint Cooling Ambient Lockout Setpoint Heating Ambient Lockout Setpoint Preheat Ambient Lockout Setpoint Economizer Ambient Lockout Setpoint Return Duct Static Pressure Setpoint Space Static Pressure Setpoint Supply Duct Static Pressure Setpoint Space_CO2_Setpoint Outside Air Damper Minimum Setpoint Outside RH from BMS Used when source	AV-10 AV-11 AV-12 AV-13 AV-17 AV-18 AV-19 AV-20 AV-21 AV-21 AV-23 AV-24 AV-24	40020 40022 40024 40026 40034 40036 40038 40040 40042 40044 40046 40048 40048	RW R	°F °F blu/lb °F °F °F °F 'Wc 'Wc ppm %	×
Indoor_Dewpoint_Setpoint Unocc_Indoor_Dewpoint_Setpoint Unocc_Indoor_Dewpoint_Setpoint Unoccupied_Dehumidification_Setpoint Economizer_Temp_Enable_Setpoint Economizer_Enthalpy_Enable_Setpoint Cooling_Lockout_Setpoint Heating_Lockout_Setpoint Preheat_Lockout_Setpoint Economizer_Lockout_Setpoint Economizer_Lockout_Setpoint Return_Duct_Static_Pressure_Setpoint Space_Static_Pressure_Setpoint Space_Static_Pressure_Setpoint Space_CO2_Setpoint utside_Air_Damper_Minimum_Setpoint_Occ Outside_RH_from_BMS Outside_Temp_from_BMS	Indoor Dewpoint Dehumidification Trigger Unoccupied Indoor Dewpoint Dehumidification Trigger Unoccupied Dehumidification %RH Setpoint Economizer Ambient Temp Enable Setpoint Allow Econ when OAT is less than Setpoint Economizer Enthalpy Enable Setpoint Allow Econ when OA Enthalpy Enable Setpoint Allow Econ when OA Enthalpy is less than Setpoint Cooling Ambient Lockout Setpoint Heating Ambient Lockout Setpoint Preheat Ambient Lockout Setpoint Economizer Ambient Lockout Setpoint Return Duct Static Pressure Setpoint Supply Duct Static Pressure Setpoint Supply Duct Static Pressure Setpoint Outside Air Damper Minimum Setpoint Outside RH from BMS Used when source selection is set to BMS Outside Temp from BMS Used when source	AV-10 AV-11 AV-12 AV-13 AV-17 AV-18 AV-19 AV-20 AV-21 AV-23 AV-24 AV-26 AV-27	40020 40022 40024 40026 40034 40036 40038 40040 40042 40044 40046 40048 40050 40052	RW R	°F °F blu/lb °F °F °F °K WC "WC ppm % %	×
Indoor_Dewpoint_Setpoint Unocc_Indoor_Dewpoint_Setpoint Unocc_Indoor_Dewpoint_Setpoint Unoccupied_Dehumidification_Setpoint Economizer_Temp_Enable_Setpoint Economizer_Enthalpy_Enable_Setpoint Cooling_Lockout_Setpoint Heating_Lockout_Setpoint Preheat_Lockout_Setpoint Economizer_Lockout_Setpoint Economizer_Lockout_Setpoint Space_Static_Pressure_Setpoint Supply_Duct_Static_Pressure_Setpoint Supply_Duct_Static_Pressure_Setpoint Space_CO2_Setpoint Iside_Air_Damper_Minimum_Setpoint_Occ Outside_RH_from_BMS	Indoor Dewpoint Dehumidification Trigger Unoccupied Indoor Dewpoint Dehumidification Trigger Unoccupied Dehumidification %RH Setpoint Economizer Ambient Temp Enable Setpoint Allow Econ when OAT is less than Setpoint Economizer Enthalpy Enable Setpoint Allow Econ when OA Enthalpy Enable Setpoint Allow Econ when OA Enthalpy is less than Setpoint Cooling Ambient Lockout Setpoint Heating Ambient Lockout Setpoint Preheat Ambient Lockout Setpoint Economizer Ambient Lockout Setpoint Return Duct Static Pressure Setpoint Space Static Pressure Setpoint Supply Duct Static Pressure Setpoint Space_CO2_Setpoint Outside Air Damper Minimum Setpoint Outside RH from BMS Used when source	AV-10 AV-11 AV-12 AV-13 AV-17 AV-18 AV-19 AV-20 AV-21 AV-22 AV-23 AV-24 AV-24 AV-26	40020 40022 40024 40026 40034 40036 40038 40040 40042 40044 40046 40048 40050 40052	RW R	°F °F F °F "Wc "Wc "Wc "Wc "Wc)



		BACnet	ModBus	Read or	Tout and	Init of 14	
Variable	Description	Object	Object	Write	Active	Unit of M Inactive	Inc
Space_1_CO2_from_BMS	Space 1 CO2 from BMS Used when source selection is set to BMS	AV-30	40060	RW		om	T
Relurn_CO2_from_BMS	Return CO2 from BMS Used when source selection is set to BMS	AV-32	40062	RW	PI	om	T
Space_RH_from_BMS	Space RH from BMS Used when source selection is set to BMS	AV-33	40066	RW		%	T
Space_Static_from_BMS	Space Static from BMS Used when source selection is set to BMS	AV-34	40068	RW	/ in	wc	T
Space_Temp_from_BMS	Space Temp from BMS Used when source selection is set to BMS	AV-35	40070	RW		F	H
SF Control Signal BMS	BMS to control signal for supply fan speed	AV-36	40072	RW		%	┰
EF_Control_Signal_BMS	BMS to control signal for exhaust fan speed	AV-37	40074	RW		%	T
OAD_Control_Signal_BMS	Allows the BMS to control OAD position	AV-38	40076	RW		%	
Aux_BMS_Analog_Output_1	BMS Commanded auxilary analog output	AV-39	40078	RW	selec	ctable	
Unit_Status_Mode	Unit Status Mode - See Table	AV-40	30092	R	Re	eal	
upply_Temperature_Calculated_Setpoint	Active Supply Temperature Setpoint	AV-41	30094	R		F	1
Cooling_1_Ramp_Capacity	Cooling Ramp 1 Status Value	AV-42	30096	R	-	/6	T
Defrost_Ramp	Defrost Ramp	AV-44	30100	R	0	%	-
Economizer_Ramp	Economizer Ramp	AV-45	30102	R	9	%	
lead_Pressure_Control_Ramp_1_Ramp	Head Pressure Control Ramp 1	AV-46	30104	R	0	6	T
lead_Pressure_Control_Ramp_2_Ramp	Head Pressure Control Ramp 2	AV-47	30106	R	.0	%	
HP_Ramp_Capacity	Heat Pump Heating Ramp	AV-50	30112	R	0	%	П
Heating_Capacity	Heating Ramp	AV-51	30114	R		6	
Case_Heat_Control_Ramp	Case Heat Ramp	AV-52	30116	R	9	6	
Hot_Gas_Reheat_Ramp	Hot Gas Reheat Ramp	AV-53	30118	R	9	6	
Outside_Dewpoint	Outside Dewpoint	AV-54	30120	R		F	
Outside_Enthalpy	Outside Enthalpy	AV-55	30122	R	btu	ı/lb	
Return_Dewpoint	Return Dewpoint	AV-56	30124	R		F	
Return_Enthalpy	Return Enthalpy	AV-57	30126	R	btu	ı/lb	
Space_Dewpoint	Space Dewpoint	AV-58	30128	R		F	
Space_Enthalpy	Space Enthalpy	AV-59	30130	R	btu	ı/lb	
Circuit_A_Superheat	Circuit A Superheat	AV-60	30132	R		F	
Circuit_B_Superheat	Circuit B Superheat	AV-61	30134	R	8	F	
Total_Exhaust_Fan_CFM_BMS	Total Exhaust Fan CFM	AV-64	30140	R	CF	M	
Total_Supply_Fan_CFM_BMS	Total Supply Fan CFM	AV-65	30142	R	CI	M	
OAD_CFM_BMS	OAD CFM	AV-66	30144	R	CF	М	
Active_Temperature_Selpoint	Active_Temperature_Setpoint	AV-67	30146	R		F	
Chilled_Water_1_Valve_Analog_Output	Chilled Water 1 Valve Analog Output	AV-68	30148	R	9	6	
Electric_Heater_1_Analog_Output	Electric Heater 1 Analog Output	AV-70	30152	R	9	6	
Energy_Recovery_Analog_Output	Energy Recovery Analog Output	AV-72	30156	R	9	6	
Exhaust_Fan_Speed_Analog_Output	Exhaust Fan Speed Analog Output	AV-73	30158	R	9	6	
Hot_Water_Valve_1_Analog_Output	Hot Water Valve 1 Analog Output	AV-74	30160	R	9	6	
Mod_Gas_Furnace_1_Analog_Output	Mod Gas Furnace 1 Analog Output	AV-76	30164	R	9	6	г
Outside_Air_Damper_Analog_Output	Outside Air Damper Analog Output	AV-78	30168	R	9	6	
Supply_Fan_Speed_Analog_Output	Supply Fan Speed Analog Output	AV-79	30170	R	9	6	
lulating_Compressor_Analog_Output_BMS	First Modulating Compressor Analog Output - BMS	AV-80	30172	R	9	6	
Circuit_A_Sat_Discharge_Temperature	Circuit A Saturated Discharge Temperature	AV-82	30176	R	6	F	
Circuit_B_Sat_Discharge_Temperature	Circuit B Saturated Discharge Temperature	AV-83	30178	R	0	F	-
Circuit_A_Sat_Suction_Temperature	Circuit A Saturated Suciton Temperature	AV-86	30184	R	0	F.	\vdash
Circuit_B_Sat_Suction_Temperature	Circuit B Saturated Suciton Temperature	AV-87	30186	R		F	П
Coil_Temperature_Calculated_Setpoint	Calculated Coil Leaving Set point	AV-90	30192	R	ā	F	$\overline{}$
Unoccupied_Cooling_Setpoint	Active Cooling Setpoint - Unoccupied	AV-91	30194	R		-	$\overline{}$
Unoccupied_Heating_Setpoint	Active Heating Setpoint - Unoccupied	AV-92	30196	R	0	F	
Temperature_Reset_Mode	Occupied Reset Type Setpoint 1-No Reset(Supply Temp Control) 2-Space 3-Return 4-Outside	IV-1	40080	RW	Inte	ger	
[emperature_Reset_Mode_Unoccupied	Unoccupied Reset Type Setpoint 1-No Reset(Supply Temp Control) 2-Space 3-Return 4-Outside	IV-2	40082	RW	Inle	ger	
Active_Temperature_Reset_Mode	Active Occupied Reset Type Setpoint 1-No Reset(Supply Temp Control) 2-Space 3-Return 4- Outside	IV-3	30198	R	Inte	ger	
ctive_Temperature_Reset_Mode_Unocc	Active Unoccupied Reset Type Setpoint 1-No Reset(Supply Temp Control) 2-Space 3-Return 4- Outside	IV-4	30200	R	Inte	ger	
LatestAlm	Most recent alarm - See Alarm Table	IV-5	30202	R	inte		
Device_Enable_DO_Word	Device Enable DO Word - See Table	īV-6	30206	Ř	Bit F	ack	
Ref_Ckt_PressTemp_Alarm_Word	Refrigeration Circuit Word - See Table	IV-7	30210	R	Bit F	ack	
Device_Offline_Word	Device Offline Word - See Table	IV-8	30214	R	Bit F	ack	
Device_Alarm_Word	Device Alarm Word - See Table	IV-9	30218	R	Bit P	ack	
System_Word	System Word - See Table	IV-10	30222	R	Bit F	ack	
Unit_Status_Word	Unit Status Word - See Table	IV-11	30226	Ř	Bit F	ack	
Exhaust_Fan_1_Status_Digital_Inpu	Exhaust Fan Status	Bi-1	10009	R	Active	Inactive	П
	Supply Fan Status	B-2	10010				



Printed Date: 08 /00 /0003 Job: Green C /tem #5.

Mark. кто-1 Model: VX-112-15I-1-Е1

Variable	Description	BACnet Object	ModBus Object	Read or Write	Text or	Unit of M	Include
					Active	Inactive	1
Exhaust_Fan_1_Status_Digital_Input	Exhaust Fan Status	BI-1	10009	R	Active	Inactive	Х
Supply_Fan_1_Status_Digital_Input	Supply Fan Status	B-2	10010	R	Active	Inactive	х
BMS_Watchdog	BMS Watchdog command Used to determine BMS comm status Must heartbeat within the watch dog timeout delay to detect comm status	BV-1	2	RW	Active	Inactive	х
System_Enable	Master system enable/disable point	BV-2	3	RW	Enable	Disable	х
BMS_Occupancy_Command	Occupancy Command	BV-3	4	RW	Unoccupied	Occupied	Х
Reset_All_Alarms	Alarm Reset Command	BV-4	5	RW	Reset	Normal	Х
Exhaust_Only_Mode_BMS_Cmd	Emergancy Exhaust Mode Command	BV-5	6	RW	Enable	Disable	
Pressurization_Only_Mode_BMS_Cmd	Emergancy Pressurization Mode Command	BV-6	7	RW	Enable	Disable	
Outside_RH_Source_BMS	Outside RH Source Selection	BV-7	8	RW	BMS	Local	х
Outside_Temp_Source_BMS	Outside Temp Source Selection	BV-8	9	RW	BMS	Local	х
Return_RH_Source_BMS	Return RH Source Selection	BV-9	10	RW	BMS	Local	х
Return_Temp_Source_BMS	Return Temp Source Selection	BV-10	11	RW	BMS	Local	х
Space_1_CO2_Source_BMS	Space 1 CO2 Source Selection	BV-11	12	RW	BMS	Local	х
Space_2_CO2_Source_BMS	Space 2 CO2 Source Selection	BV-12	13	RW	BMS	Local	х
Return_CO2_Source_BMS	Return CO2 Source Selection	BV-13	14	RW	BMS	Local	х
Space_RH_Source_BMS	Space RH Source Selection	BV-14	15	RW	BMS	Local	х
Space_Static_Source_BMS	Space Static Source Selection	BV-15	16	RW	BMS	Local	
Space_Temp_Source_BMS	Space Temp Source Selection	BV-16	17	RW	BMS	Local	×
SF_Control_Source_BMS	Allows the BMS to control supply fan speed	BV-17	18	RW	BMS	Local	х
EF_Control_Source_BMS	Allows the BMS to control exhaust fan speed	BV-18	19	RW	BMS	Local	
OAD_Control_Source_BMS	Allows the BMS to control OAD position	BV-19	20	RW	BMS	Local	
Aux_BMS_Digital_Output_1	BMS Commanded auxilary digital output	BV-20	21	RW	Active	Inactive	
Aux_BMS_Digital_Output_2	BMS Commanded auxilary digital output	BV-21	22	RW	Active	Inactive	
Occupied	Occupancy	BV-22	10002	R	Occupied	Unoccupied	Х
Global_Alarm	General alarm point Optionally set to indicate any alarm is active, or a shutdown alarm is active	BV-23	10003	R	Alarm	Normal	х
BMS_Watchdog_Active	Status of the BMS watchdog heartbeat	BV-24	10004	R	Active	Inactive	Х
OAD_Feedback_Error_Not_Economizing Active	Feedback indicates OAD is not opening during economizer	BV-25	10005	R	Alarm	Normal	
OAD_Feedback_Error_Economizing Active	Feedback indicates OAD is open	BV-26	10006	R	Alarm	Normal	
AD_Feedback_Error_OAD_Not_Modulating.Active	Feedback indicates the OAD is not modulating	BV-27	10007	R	Alarm	Normal	
OAD_Feedback_Error_Excess_OA Active	Feedback indicates the OAD is not closing	BV-28	10008	R	Alarm	Normal	



Printed Date: 08 // // // Job: Green C // // // // // Mark: KIU-

	System Word Table (IV-10)
Bit	System_Word
0	Heat Wheel Enable
1	Preheat Enable
2	Reversing Valve (Cooling (0)/Heating(1))
3	
4	
5	
5	Supply Temp Low Limit Alarm
7	Supply Temp High Limit Alarm
8	Supply High Duct Static Alarm Active
9	Supply Fan 1 Alarm
10	Exhaust Fan 1 Alarm
11	Drain Pan Alarm
12:	Freeze Stat Alarm
13:	Filter Alarm
101	Space High Static Alarm
18	Return Low Static Alarm
10	Shutdown Input Alarm
76	Energy Recovery Wheel High Diff Pressure
19	Energy Recovery Wheel Rotation Alarm
19:	
20	Heat Pump Heating Lock Out Alarm
84	Permanent Memory - Too Many Writes
22	BMS Offline Alarm
28	
24	
26	
26	
2.7	
28	Heat-Cool Only - Dehumidification Request Active
29	Heat-Cool Only - Heating Request Active
(1)	Heat-Cool Only - Coil Setpoint Alarm Active
	Heat-Cool Only - Supply Setpoint Alarm Active

	Device Enable DO Word Table (IV-6)
Bit	Device_Enable_DO_Word
0	Compressor 1 Start
e8 1/1	Compressor 2 Start
2	Compressor 3 Start
3	Compressor 4 Start
4	
40	
- 5	
7	
8	Condenser Fan Ramp 1 Stage 1 Start
9	Condenser Fan Ramp 1 Stage 2 Start
10	Condenser Fan Ramp 1 Stage 3 Start
901	
12	Condenser Fan Ramp 2 Stage 1 Start
13	Condenser Fan Ramp 2 Stage 2 Start
THE STATE OF	Condenser Fan Ramp 2 Stage 3 Start
15	
18	Furnace 1 Start (External Furnace Controller Only)
17	Furnace 2 Start (External Furnace Controller Only)
18	
1(2)	
20	Supply Fan Start
21	Exhaust Fan Start
22	
23	
24	
25	
26	
27	
28	
28	
30	
31	

	Unit Status Word Table (IV-11)	
Bit	Unit_Status_Word	
Hall	Off/Slandby	-
	Unoccupied Start	_
2	Occupied Start	_
3	Opening Dampers	_
4	Dampers Open	_
5	Fan Start Delay	_
341	Exhaust Fan On	_
7.	Supply Fan On	_
8	System On	_
19	Soft Shutdown	_
10	System Disabled	_
01	Remote Off	_
12	System Shutdown Alarm	_
13	Supply Fan Only	_
14	Exhaust Fan Only	_
15	Purge Mode (Supply and Exhaust Only)	
惟	Case Heat Active	_
11/10/2017	Fans Only	_
16	Economizing	_
18	Energy Recovery Active	_
20	Cooling	Ξ
21	Heating	_
22	Dehumidifying	_
23	Hot Gas Reheat Active	_
24	HGRH Purging	_
25	Dehum w/Heat	_
26	Energy Recovery Defrost Active	
27	Heat Pump Defrost Active	
28	Morning Warm Up/Cool Down Active	Ξ
29	Winter Ramp Active	Ξ
30		_
8)1	Overrides Active	_

	Unit Status Word Table (IV-11)
Bit	Ref_Ckt_PressTemp_Alarm_Word
0	Circuit A Discharge Pressure Sensor Alarm
	Circuit A Discharge Temp Sensor Alarm
2	Circuit A Suction Pressure Sensor Alarm
3	Circuit A Suction Temp Sensor Alarm
	Circuit B Discharge Pressure Sensor Alarm
5	Circuit B Discharge Temp Sensor Alarm
6	Circuit B Suction Pressure Sensor Alarm
7	Circuit B Suction Temp Sensor Alarm
8	Circuit A High Pressure Switch Alarm
9	Circuit A Low Pressure Switch Alarm
10	Circuit B High Pressure Switch Alarm
100	Circuit B Low Pressure Switch Alarm
12	Circuit A High Sat Discharge Temp Alarm
18	Circuit B High Sat Discharge Temp Alarm
14	
15	
16	
1/4	
18	
19	
2,0	
21	
320	
28	
241	
25	
26	
100	
28	
29	
30	
250	



Job: Green C Item #5.

	Device Alarm Word Table (IV-9)
Bit	Device Alarm Word -Ext
0	Cold Coil Temperature Sensor Alarm
1	
2	Mixed Temperature Sensor Alarm
3	Supply Duct Static Pressure Sensor Alarm
4-	Supply Fan AFMS Alarm
5	Supply Air Temp Sensor Alarm
6	Exhaust Fan AFMS Alarm
70	Exhaust Temperature Sensor Alarm
8	Outside Air Temp Sensor Alarm
9	Outside RH Sensor Alarm
-(1)	OAD AMD Alarm
11	Greentrol OAD AFMS Alarm
12	Return CO2 Sensor Alarm
13	Return Duct Static Pressure Sensor Alarm
14	Return Temperature Sensor Alarm
15	Return RH Sensor Alarm
16	Space CO2 Sensor Alarm
17	Space RH Sensor Alarm
18	Space Static Pressure Sensor Alarm
19	Space Temperature Sensor Alarm
20	IG Furnace Alarm
21	
22	Inverter Scroll 1 Alarm
23	
24	EVD Valve A Alarm
25	
26	SF VFD Alarm
27	
28	
29	
30	

	Device Offline Word Table (IV-8)
Bit	Device_Offline_Word - Ext
0	Space TStat 1 Offline
W 189 H 11	Space TStat 2 Offline
2	Space TStat 3 Offline
3	Space TStat 4 Offline
4	VFD Offline Supply Fan
5 - 1	
6	
7/	
8	Expansion Board 1 Alarm
0	Expansion Board 2 Alarm
10	Expansion Board 3 Alarm
11000	Expansion Board 4 Alarm
12	
13	
14	
15	
16	
177	
18	
19	
20	
21	
22	
23	
24	
25	
26	
27	Master Unit Offline Alarm
28	Slave Unit 1 Offline Alarm
29	Slave Unit 2 Offline Alarm
30	Slave Unit 3 Offline Alarm
31	Slave Unit 4 Offline Alarm

UNIT STATUS MODE TABLE (AV-40)							
0	Off/Standby	17:	Fans Only Purge				
	Unoccupied Start	18	Case Heat Active				
2	Occupied Start	19	Fans Only				
3	Opening Dampers	20	Economizing				
5	Dampers Open	AL I	Cooling				
Ğ .	Fan Start Delay	22	Heating				
7	Exhaust Fan Start	23	Dehumidifying				
8	Supply Fan Start	25	HGRH Purging				
1	Startup Delay	26	Energy Recovery Defrost Active				
10	System On	29	Dehumifying w/Heat				
- 61	Soft Shuldown	30	Overrides				
12	System Disabled	31	Expansion Offline				
13.	Remote Off	33	Energy Recovery Active				
1.4	System Shutdown Alarm	34	Hot Gas Reheat Active				
15	Pressuization Only	35	Morning Warm Up/Cool Down Active (Sequence)				
16	Exhaust Only	36	Heat Pump Defrost				



			Alarm Table (Latest Alarm IV-5)		
	No Active Alarms	63	Supply Air Temperature - Low Limit Shutdown		High SDT Lockout - Circuit A
TIME!	Supply Fan 1 Run - Status Not Proven	64	Heat Wheel Rotation - Not Detected	118	High SDT Lockout - Circuit B
獨	Freeze Protection - Thermostat Tripped	65	Slave Unit 1 Offline -	121	Inverter 1 Alarm -
V 10	High Supply Duct - Static Pressure	65	Slave Unit 2 Offline -	123	Inverter 1 Lockout - Cycle Power to Unit
	Low Return Duct - Static Pressure	67	Slave Unit 3 Offline -	125	High SDT Lockout - Circuit A
SIL.	Outside Air Temp - Sensor Value Not Valid	- 63	Slave Unit 4 Offline -	1123	Inverter 1 Foldback - Input Current
	Supply Air Temperature - Sensor Value Not Valid	SEE 251 MILE	Master Unit Offline -	127	Inverter 1 Foldback - Inverter Temp
	Cold Coil 1 Temp - Sensor Value Not Valid	7/0	Heat Pump Defrost - Mode is Active	GKE I	Inverter 1 Comms Lost - Compressor Offline
100	Exhaust Air Temp - Sensor Value Not Valid	国政企业	Multi Devices per Ch - Contact Tech Support	1888	Space Thermostat 1 - Sensor Offline
	Mixed Air Temperature - Sensor Value Not Valid	76	Shutdown Contact - In Alarm Position	NUMBER OF STREET	Space Thermostat 2 - Sensor Offline
	Return Air Temperature - Sensor Value Not Valid	7/6	Comp Maint Alarm - Run Hours Spt Reached		Space Thermostat 3 - Sensor Offline
300	Space Temperature - Sensor Value Not Valid	16	Supply Air Temperature - High Limit Shuldown	1000	Space Thermostat 4 - Sensor Offline
	Return Air RH - Sensor Value Not Valid	77	Space High Static Pres - Shutdown	127	IG Furnace 1. No flame - after 3 tries
	Space RH - Sensor Value Not Valid	7/3	Internal Board Temp - Exceeds -40F or 158F	13.5	IG Fumace 1 Large - no flame after 3 tries
2	Outside RH - Sensor Value Not Valid	76	BMS Offline - Watchdog is FALSE	109	IG Furnace 1 combust - fan high pressure sw
	Low Pressure Switch - Circuit A	80	Clg Coil Setpt Input - Value is not valid	140	IG Furnace 1 Ignition - controller alarm
100	Low Pressure Switch - Circuit B	31	Sup Air Setpt Input - Value is not valid	100 55 1111	IG Furnace 1 pressure - switch fault alarm
180	High Pressure Switch - Circuit A	82	BACnet License - Not Installed	169	High SDT Lockout - Circuit B
	High Pressure Switch - Circuit B	138	Low Suction SH ExV A - EVD 1 Alarm	100	IG Furnace 1 - Max retrys
	Damper End Switch Fail - Dampers are not open	8.4	Low Suction SH ExV B - EVD 1 Alarm	100,000	IG Furnace 1 - High Limit Trip
	Exhaust Fan 1 Run - Status Not Proven	100	LOP A EVD 1 - Low Operating Pressure	100 K 100	IG Furnace - pCOe 1 Offline
	Filters are Dirty - Replace Filters	1977	MOP A EVD 1 - Max Operating Pressure	1,40	IG Furnace 1 IC fault - Check Furnace Wiring
	Cond Drain Pan Full - Check Drain	99	EEV A EVD 1 - Motor Alarm	10 EV	IG Furnace 2 No flame - after 3 tries
500	Exp Board 1 Status - Board is Offline	91	LowSuct A EVD 1 - Refrigerant Temp	144	IG Furnace 2 Large - no flame after 3 tries
	Exp Board 2 Status - Board is Offline	0.3	High Condensing Temp - EVD 1	DOKE	IG Furnace 2 combust - fan high pressure sw
	Exp Board 4 Status - Board is Offline	970	Sens S1 EVD 1 - Sensor Value Not Valid	1.9	IG Furnace 2 Ignition - controller alarm
	Non-Volatile Memory Er - Contact Tech Support		Sens S2 EVD 1 - Sensor Value Not Valid	13	IG Furnace 2 pressure - switch fault alarm
	Space 1 CO2 - Sensor Value Not Valid		Sens S3 EVD 1 - Sensor Value Not Valid	15.00	IG Furnace 2 combust - fan proving alarm
	Space Static Pressure - Sensor Value Not Valid	47	Sens S4 EVD 1 - Sensor Value Not Valid	156 11	IG Furnace 2 - Max retrys
	Supply Duct Stat Press - Sensor Value Not Valid		EVD 1 EEPROM Damaged - Call Tech Support	15/4	IG Furnace 2 - High Limit Trip
	Return Duct Stat Press - Sensor Value Not Valid	18	Incomplete Closing - EVD 1	100	IG Furnace - pCOe 2 Offline
	Sup Fan AFMS - Sensor Value Not Valid	101	Emergency Closing - EVD 1	155	IG Furnace 2 IC fault - Check Furnace Wiring
	Exh Fan AFMS - Sensor Value Not Valid	150131	EVD 1 Battery -	IN LYSE	Outside Air Greentrol - Offline or Flow Error
	Outside Damper AFMS - Sensor Value Not Valid	E/32.20	FW Incompatibility - EVD 1	-	Exhaust Air Greentrol - Offline or Flow Error
	Space Selpt Adj Slider - Sensor Value Not Valid	DEC. 17 190	EVD 1 Config Error -	10.00	Supply Air Greentrol - Offline or Flow Error
	Return CO2 - Sensor Value Not Valid	150/10	High Discharge Temp - First Inverter	TEXT .	
	Discharge Press Ckt A - Sensor Value Not Valid	108	Low Discharge Pressure - First Inverter	170	OA Damper Fault - Not Econ and should be OA Damper Fault - Econ and shouldn't be
	Discharge Press Ckt A - Sensor Value Not Valid	10.5	Low Discharge Pressure - First Inverter	70.70	
	Discharge Press Ckt B - Sensor Value Not Valid	E-F07/E	High Suction Pressure - First Inverter	10.76	OA Damper Fault - Econ and shouldn't be
	Suction Press Ckt A - Sensor Value Not Valid	DE DE		= 1728	OAD Fault - Damper not Modulating
	Suction Press Ckt A - Sensor Value Not Valid Suction Press Ckt B - Sensor Value Not Valid	(6/5)	Low Suction Pressure - First Inverter	17.2	OAD Fault - Excess Outdoor Air
			High Current - First Inverter	277.00	IG Furnace 1 - Combustion Fan Alarm
	Discharge Temp Ckt A - Sensor Value Not Valid	110	High Pressure Ratio - First Inverte	39.77-27	IG Furnace 2 - Combustion Fan Alarm
	Discharge Temp Ckt B - Sensor Value Not Valid		Low Pressure Ratio - First Inverter	178	Supply Fan - VFD Offline
	Suction Temp Ckt A - Sensor Value Not Valid	III IPIN	Low Delta P - First Inverter	577	OA Damper Fault - Not Econ and should be
	Suction Temp Ckt B - Sensor Value Not Valid	18	High Discharge Press - First Inverter	1773	Return Fan - VFD Offline
	Ckt A High Saturated - Discharge Temperature	100	Compressor Staging - Order Skipped	10.174	Energy Recovery - VFD Offline
	Ckt B High Saturated - Discharge Temperature	15	Heat Pump Heating - Locked Out	180	Embedded EVD Error
100		16	EVD 1 Error - Unexpected Position	1:1	SF VFD Alarm - Check VFD



Job: Green C Item #5.

Model: VX-112-15I-1-E1

Factory Controller Sequence of Operation

FACTORY CONTROLLER: Controller shall be provided with required sensors and programming for rooftop unit. Controller shall be factory programmed, mounted and tested. Controller shall have a LCD readout for changing set points and monitoring unit operation.

UNIT START COMMAND (Unit will be enabled to start once a jumper is placed between R to G):

- · Factory mounted and wired outdoor air damper actuator is powered
- · Supply fan starts after after a (adj.) delay.
- · Tempering options to function as described below.

UNIT STOP COMMAND (OR DE-ENERGIZED):

- Supply fan, exhaust fan and tempering options de-energized.
- Outdoor air damper actuator is spring return close.

OCCUPIED/UNOCCUPIED MODES: Shall be based on a 7-day time clock internal to the controller. The schedule shall be set by the end user. When a user initiates an override input, the controller will switch from unoccupied to occupied mode. The controller will return to the scheduled occupied/unoccupied mode after the override time has expired. If internal time clock is disabled, a remote contact or a BMS can control the occupied/unoccupied mode.

Occupied Mode:

- · Damper control per below.
- Supply fan ON.
- Heating per below.
- Cooling per below.

Unoccupied Mode (Unit Off): Unit remains off when in unoccupied mode.

- · Supply fan OFF
- Tempering OFF
- Outdoor air damper closed.

MORNING WARMUP/COOL DOWN: Prior to occupancy, the unit will run using the warmup or cool down sequence until the occupied set point is achieved. The heating or cooling mode must not be locked out and the space temperature is below or above set point by the unoccupied hysteresis (adj.) (This Sequence must be field configured.)

SUPPLY BLOWER SEQUENCE: The supply blower is provided with a factory mounted variable frequency drive. The supply blower speed will be controlled with the following sequence. Minimum supply fan turndown is 50% of the design maximum operation.

Constant Volume-Adj. Setpoint: The supply blower will operate at a constant speed set point (adj.) during operation.

OUTDOOR AIR DAMPER CONTROL:The outdoor air damper is factory mounted and wired with a non-modulating actuator. When the unit is enabled/occupied the outdoor air damper will open to 100%

COOLING SEQUENCE: The cooling is controlled to maintain the supply temperature set point. The mechanical cooling will be locked out when the outside air is < 55 F (adj.).

Packaged DX Cooling (Inverter Scroll): The controller will provide a modulating signal for cooling. From 0-100%, the inverter scroll will be controlled to maintain discharge temperature. The electronic expansion valve will modulate to maintain 8 of superheat.



Printed Date: 08/02/2022 Job: Green Collem #5.

Model: VX-112-15I-1-E1

Modulating Hot Gas Reheat Sequence: During dehumidification the modulating HGRH is controlled to maintain the supply temperature set point.

Modulating Head Pressure Control: Lead condenser fan will have an EC motor and will modulate to maintain a head pressure set point.

DEHUMIDIFICATION CONTROL SEQUENCE: Dehumidification to be enabled and once enabled the cooling coil will be controlled based on the following sequences. The mechanical cooling will be locked out when the outside air is < 55 F (adj.)

Cold Coil Set Point Control: When in dehumidification mode the controller will control the cooling to maintain a constant cold coil set point. The active set point will be set to local control (55 F, adj.) from the factory and can be field adjusted locally or by the BMS.

Dehumidification Enable: Dehumidification mode to be enabled based on the outside air dew point condition. When the outside air dew point is greater than the desired set point (adj.), the unit will operate in dehumidification mode.

REHEAT SEQUENCE: While the unit is in dehumidification mode the outdoor air will be reheated via Modulating Hot Gas Reheat for space neutral applications.

Modulating Hot Gas Reheat: The controller will modulate the hot gas reheat reheat valve with a 0-10 V signal to maintain the supply temperature set point (adj.).

HEATING SEQUENCE: The heating is controlled to maintain the supply temperature set point. The heating will be locked out when the outside air is > 80 F (adj.).

Electric Heater: The controller will modulate an electric heater to maintain the supply temperature set point (adj.).

TEMPERATURE CONTROL SEQUENCE: The unit will maintain the supply air discharge setpoint per the following. Adjustable locally or by BMS.

Supply Discharge Temperature Control: The supply setpoint will be a constant temperature setpoint from the controller (adj.). Adjustable locally or by BMS.

BUILDING FREEZE PROTECTION: If the supply air temperature drops below 35 F (adj.) for 300s (adj.), the controller will de-energize the unit and activate the alarm output.

ALARMS INDICATION: The controller will display alarms and have one digital output for remote indication of an alarm condition. Possible alarms include:

Building Management System: The controller will send all alarms to the BMS.

Supply Air Alarm: The controller monitors the proving switch on supply blower and sends an alarm in the case of the blower proving switch not engaging for 30s (adj.).

DX Alarm: The controller monitors the refrigerant pressure. In the case of low refrigerant pressure the compressors will shut down until refrigerant pressure returns to normal values and the controller will send an alarm. In the case of high refrigerant pressure the compressors will shut down, requiring a manual reset and the controller will send a alarm.

Temperature Sensor Alarm: The controller sends an alarm in the case of a failed air temperature sensor.



Job: Green C | tem #5.

Model: VX-112-15I-1-E1

ACCESSORIES: The following accessories will be included with the unit to expand the functionality or usability of the controller.

BMS Interfacing: A BMS port or serial card is provided with the controller for field interfacing with a building management system. Each card is sent out with the default parameters, and the controls contractor must change the appropriate addresses to match the BMS settings.

Phase and Brownout Protection: Factory mounted and wired component which monitors the main power coming into the unit. If a phase drops out, or if the incoming voltage exceeds the acceptable range, the component will turn off the unit to help protect the electrical systems.

Condensate Overflow Unit Shutdown: Factory mounted condensate overflow switch wired to the unit controller. The controller monitors the condensate overflow switch. If the water level in the drain pan reaches a certain level, the unit will shutdown and send an alarm.

Damper End Switch: Damper end switched will be provided to ensure the supply and exhaust fans do not enable until the dampers are proven open.



Job: Green C tem #5.

Mark. 🖂 😈 -

Model: VX-112-15I-1-E1

Warranty Statement for Dedicated Outdoor Air Systems (DOAS)

Unit Warranty

Valent warrants the equipment to be free from defects in material and workmanship for a period of 18 months from ship date. Initial startup must be completed within six months of the shipment date, and a startup report must be submitted to Valent.

Compressor Extended Warranty

Valent warrants the refrigerant compressor(s) to be free from defects in material and workmanship for a period of 5.5 years from the shipment date.

Warranty Notes

Any component which proves defective during the warranty period will be repaired or replaced at Valent's sole option when returned to our factory, transportation prepaid. All warranties do not include labor costs associated with troubleshooting, removal, or installation. Valent will not be liable for any consequential, punitive, or incidental damages resulting from use, repair, or operation of any Valent product. These warranties are exclusive and are in lieu of all other warranties, whether written, oral, or implied, including the warranty of merchantability and the warranty of fitness for a particular purpose. No person (including any agent or salesperson) has authority to expand Seller's obligation beyond the terms of this warranty, or to state that the performance of the product is other than that published by Seller.

As a result of our commitment to continuous improvement, Valent reserves the right to change specifications without notice.



Printed Date: 08 102 12022 Job: Green C 1tem #5.

Mark. KTO-1 Model: GKD

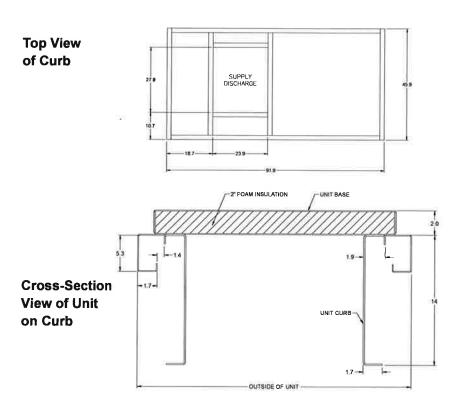
GKD Roof Curb

Model: GKD-45.9/91.9-G14

Curb Height (in.)	Curb Length (in.)	Curb Width (in.)	Material	Finish Type	Duct Adapter	Curb Weight (lb)
14	91.9	45.9	Galvanized	Galvanized	Yes	159

Standard Construction Features: All dimensions shown are actual and in units of in.'s If unit is selected with side or end discharge/return, there will not be bottom connections supplied with the curb. 14 gauge galvanized steel (perimeter channels). 14 gauge galvanized steel (interior channels). Ships knocked down for field assembly. Curb insulation to be provided by others.







STAFF REPORT

CITY OF GREEN COVE SPRINGS, FLORIDA

TO: City Council Regular Session. **MEETING DATE:** Month DD,2020

FROM: Steve Thomas Asst Public Works Director. **SUBJECT:** Surplus of old items in the public works yard.

BACKGROUND

Staff has a lot of old signs, pipe, tires, and other debris that has come from jobs and projects that can't be reused or out of regulations at this point. we need to get the yard cleaned up and back in operational order for more productivity.

FISCAL IMPACT

No impact on budget.

RECOMMENDATION

City Council approval to surplus items that are old or no value to the city.



STAFF REPORT

CITY OF GREEN COVE SPRINGS, FLORIDA

TO: City Council MEETING DATE: August 15, 2023

FROM: Mike Null, Assistant City Manager

SUBJECT: Approval of Pay Application #11 from EltonAlan, Inc. for construction of the Palmetto

Trail Project in the amount of \$76,307.46 from the amended contract amount of \$1,551,660.92, leaving a balance of \$140,934.69 in the contract. *Mike Null*

BACKGROUND

At the July 5, 2022, Council awarded Bid # 2022-02, construction of the Palmetto Trail Project to EltonAlan, Inc. in the award amount of \$1,544,374.81. This is a Local Area Project (LAP) project funded through an agreement with FDOT for the construction phase of project 43677-1-38-02, to construct a trail along Palmetto Ave from Oak St to Harbor Road and along MLK Jr. Blvd from Palmetto Ave to Vera Francis Hall Park. The FDOT construction budget is \$1,611,250.00. Staff will be managing the project and FDOT will be funding the pay requests on a reimbursable basis.

At the October 17, 2022 Council Meeting, Council approved Pay App #1 in the amount of \$80,705.77.

At the November 15, 2022 Council Meeting, Council approved Pay App #2 in the amount of \$154,242.74.

At the December 13, 2022 Council Meeting, Council approved Pay App #3 in the amount of \$123,474.08.

At the January 17, 2023 Council Meeting, Council approved Pay App #4 in the amount of \$135,711.04.

At the February 21, 2023 Council Meeting, Council approved Pay App #5 in the amount of \$132,315.18.

At the March 21, 2023 Council Meeting, Council approved Pay App #6 in the amount of \$114,181.80.

At the April 18, 2023 Council Meeting, Council approved Pay App #7 in the amount of \$143,735.47.

At the May 16, 2023 Council Meeting, Council approved Pay App #8 in the amount of \$145,355.76.

At the June 20, 2023 Council Meeting, Council approved Pay App #9 in the amount of \$140,318.89.

At the July 11, 2023 Council Meeting, Council approved Pay App #10 in the amount of \$164,378.04.

Attached for payment is Pay App #11 in the amount of \$76,307.46. The application has been approved by the contractor, the project engineer and City staff and found to be reasonable for the work completed to date.

FISCAL IMPACT

This project is funded by a FDOT LAP agreement on a reimbursable basis.

RECOMMENDATION

Approve Pay Application #11 from EltonAlan, Inc. for construction of the Palmetto Trail Project in the amount of \$76,307.46 from the amended contract amount of \$1,551,660.92, leaving a balance of \$140,934.69 in the contract.



4140 NW 27 Lane, Suite G Gainesville, FL 32606 Telephone: (352) 226-8447

MONTHLY INVOICE TRANSMITTAL No. 11:

Description: Palmetto Avenue, Green Cove Springs

Financial ID: 435677-1-58-01 Federal Aid No.: D221-019-B Contract No.: G2390

Attached, please find the following items included in the Monthly Invoice Submittal Package for your review/further processing:

> Transmittal Letter

> Application and Certificate for Payment with Schedule

- Certification of Previous Payment to Subcontractor
- Construction Compliance with Specifications and Plans
- Channelizing Device Supplier Certification

Cone Letter – N/A

Contract Time & Money Status Report

Begin Time: 9/1/22

Invoice Period: 7/1/23 to 7/31/23

Invoice No.: 11

MONEY		TIME	
Original Contract Amount:	\$1,544,374.81	Substantial Completion Duration	266
Change Order No. 1-4	\$7,286.11	Days Added by Change Order	7
Adjusted Amount:	\$1,551,660.92	Days Added by Weather/Holidays	37
Amount Due This Period:	\$80,323.64	Days Allowed	310
Less Retainage (5%)	\$4,016.18	Days Used	310
Amount Paid this Period:	\$76,307.46	Days Remaining	0
Amount Previously Paid	\$1,334,418.77	% Days Used	100%
Total Paid to Date:	\$1,410,726.23	Final Completion Duration	30
Balance of Contract Amount:	\$140,934.69	Days Used	24
% Paid:	91%	Days Remaining	6
		% Days Used	80%

Retainage Held	Amount
Invoice 1	\$4,247.67
Invoice 2	\$8,118.04
Invoice 3	\$6,498.64
Invoice 4	\$7,142.69
Invoice 5	\$6,963.96
Invoice 6	\$6,009.57
Invoice 7	\$7,565.03
Invoice 8	\$7,650.30
Invoice 9	\$7,385.20
Invoice 10	\$8,651.48
Invoice 11	\$4,016.18
Total	\$74,248.76

INVOICE



Project: Palmetto Avenue / Green

Cove Springs

Green Cove Springs Contract No.: 2022-02 Financial Project No.: 435677-1-58-01

LAP Contract No.: G2390
Federal Aid Project No: D221-019-B
Attn: Kevin Wagner

1440 NW 27th Ln Suite G Gainesville, FL 32606

Invoice Period: July-2023

Invoice Date: 7/31/2023 EltonAlan Project Number: 32-0090 Invoice Number: 202202 - 11

Original Contract Amount: \$1,544,374.81
Change Order Amount: \$7,286.11
Adjusted Contract Amount: \$1,551,660.92
Amount Due This Period \$80,323.64
Less Retainage (5%): \$(4,016.18)

Amount Paid This Period: \$76,307.46

Amount Previously Paid: \$1,334,418.77
Amount Paid to Date: \$1,410,726.23
Contract Amount Remaining: \$140,934.69

% Paid: 91.35%

		Current	Total Quantity	Previously	Quantity Invoiced				
Contract Item	Unit	Contract Quantity	Invoiced to Date	Invoiced Quantity	This Period	Į	Jnit Cost	Amo	ount Due This Period
0101 1 - MOBILIZATION	LS	1.0	1.0	1.0	0.0	\$	115,376.00	\$	-
0102 1 - MAINTENANCE OF TRAFFIC	LS	1.0	1.0	1.0	0.0	\$	98,177.00	\$	-
0104 10 3 - SEDIMENT BARRIER	LF	2,598.0	909.0	909.0	0.0	\$	1.26	\$	-
0104 18 - INLET PROTECTION SYSTEM	EA	47.0	5.0	5.0	0.0	\$	132.26	\$	-
0110 1 1 - CLEARING & GRUBBING (AC = 2.91)	LS	1.0	1.0	1.0	0.0	\$	124,701.00	\$	4,988.04
0110 4 10 - REMOVAL OF EXISTING CONCRETE	SY	6,345.6	6,345.6	6,345.6	0.0	\$	12.82	\$	-
0110 7 1 - MAILBOX, F&I SINGLE	EA	11.0	11.0	11.0	0.0	\$	315.64	\$	-
0120 1 - REGULAR EXCAVATION	CY	1,014.9	1,014.9	874.5	140.4	\$	23.08	\$	3,240.43
0120 6 - EMBANKMENT	CY	558.7	558.7	558.7	0.0	\$	40.75	\$	-
0285 704 - OPTIONAL BASE, BASE GROUP 04	SY	198.0	198.0	198.0	0.0	\$	66.13	\$	-
0334 1 13 - SUPERPAVE ASPHALTIC CONC, TRAFFIC C	TN	32.6	32.6	32.6	0.0	\$	165.31	\$	-
0339 1 - SUMMARY OF MISCELLANEOUS ASPHALT PAVEMENT	TN	2.4	0.0	0.0	0.0	\$	165.42	\$	-
0425 1201 - INLETS, CURB, TYPE 9, <10'	EA	1	1	1	0	\$	5,923.00	\$	-
0425 1421 - INLETS, CURB, TYPE J-2, <10'	EA	1	0	0	0	\$	7,091.00	\$	-
0425 1521 - INLETS, DT BOT, TYPE C,<10'	EA	4	4	3	1	\$	5,377.50	\$	5,377.50
0425 1543 - INLETS, DT BOT, TYPE D, J BOT, <10'	EA	1	1	0	1	\$	6,554.00	\$	6,554.00
0425 1711 - INLETS, GUTTER, TYPE V, <10'	EA	2	2	2	0	\$	6,290.50	\$	-
0425 2 41 - MANHOLES, P-7, <10'	EA	1	1	1	0	\$	6,618.00	\$	-
0425 2 63 - MANHOLES, P-8, PARTIAL	EA	1	1	1	0	\$	4,863.00	\$	-
0425 2 71 - MANHOLES, J-7, <10'	EA	1	1	1	0	\$	7,997.00	\$	-
0425 5 - MANHOLE, ADJUST	EA	4	4	4	0	\$	901.00	\$	-
0425 5 1 - MANHOLE, ADJUST, UTILITIES	EA	1	1	1	0	\$	902.00	\$	-
0425 6 - VALVE BOXES, ADJUST	EA	44	44	44	0	\$	363.84	\$	-
430175118 - PIPE CULVERT,OPTIONAL MATERIAL,ROUND, 18"S/CD	LF	17	17	17	0	\$	120.24	\$	-
430175215 - PIPE CULVERT,OPTIONAL MATERIAL,OTHER-ELIP/ARCH, 15"S/CD	LF	238	146	0	146	\$	132.46	\$	1
430175218 - PIPE CULVERT,OPTIONAL MATERIAL,OTHER-ELIP/ARCH, 18"S/CD	LF	173	173	173	0	\$	146.29	\$	Page 1

			Total		Overtitus				Item :
Contract Item	Unit	Current Contract Quantity	Total Quantity Invoiced to Date	Previously Invoiced Quantity	Quantity Invoiced This Period	ί	Jnit Cost	Am	ount Due This Period
0515 1 1 - PIPE HANDRAIL - GUIDERAIL, STEEL	LF	12	0	0	0	\$	164.75	\$	-
0520 1 10 - CONCRETE CURB & GUTTER, TYPE F	LF	1643.0	1517.0	1468.0	49.0	\$	31.64	\$	1,550.36
0520 1 12 - CONCRETE CURB & GUTTER, TYPE F WITH SPECIAL GUTTER PROFILE	LF	42.0	42.0	42.0	0.0	\$	41.07	\$	-
0520 2 2 - CONCRETE CURB, TYPE B	LF	1053.0	1053.0	1053.0	0.0	\$	38.44	\$	-
0520 2 4 - CONCRETE CURB, TYPE D	LF	332.0	332.0	332.0	0.0	\$	37.65	\$	-
0520 6 - SHOULDER GUTTER- CONCRETE	LF	71.0	71.0	71.2	-0.2	\$	35.64	\$	(7.13)
0522 1 - CONCRETE SIDEWALK AND DRIVEWAYS, 4" THICK	SY	9,133.7	9,076.7	9,018.7	58.0	\$	45.56	\$	2,642.48
0522 2 - CONCRETE SIDEWALK AND DRIVEWAYS, 6" THICK	SY	2,480.5	2,480.5	2,480.5	0.0	\$	59.19	\$	-
0527 2 - DETECTABLE WARNINGS	SF	1,322.0	1,292.0	1,192.0	100.0	\$	26.40	\$	2,640.00
0570 1 2 - PERFORMANCE TURF, SOD	SY	8,191.0	8,091.0	7,991.0	100.0	\$	9.48	\$	948.00
1080 21500 - UTILITY FIXTURE, VALVE/METER BOX, ADJUST	EA	36	0	0	0	\$	365.50	\$	-
1644 800 - FIRE HYDRANT, (RELOCATE)	EA	8	0	0	0	\$	1,983.75	\$	-
700 1 11 - SINGLE POST SIGN, F&I GROUND MOUNT, UP TO 12 SF	AS	34	34	23	11	\$	919.15	\$	10,110.65
700 1 12 - SINGLE POST SIGN, F&I GROUND MOUNT, 12-20 SF	AS	13	13	10	3	\$	1,124.15	\$	3,372.45
700 1 50 - SINGLE POST SIGN, RELOCATE	AS	8	8	3	5	\$	287.63	\$	1,438.15
700 1 60 - SINGLE POST SIGN, REMOVE	AS	34	34	34	0	\$	77.94	\$	-
700 3 601 - SINGLE POST SIGN, REMOVE	EA	7	7	0	7	\$	72.14	\$	504.98
706 1 1 - RAISED PAVEMENT MARKER, TYPE B WITHOUT FINAL SURFACE MARKINGS	EA	21	21	0	21	\$	9.93	\$	208.53
710 1 123 - PAINTED PAVEMENT MARKINGS, STANDARD, WHITE, SOLID FOR CROSSWALK, 12"	LF	91	91	0	91	\$	1.56	\$	141.96
710 11 125 - PAINTED PAVEMENT MARKINGS, STANDARD, WHITE, SOLID FOR STOP LINE OR CROSSWALK, 24"	LF	13	13	0	13	\$	4.51	\$	58.63
710 11 201 - PAINTED PAVEMENT MARKINGS, STANDARD, YELLOW, SOLID, 6"	GM	0.0050	0.0050	0.0000	0.0050	\$	3,070.00	\$	15.35
711 11 123 - THERMOPLASTIC, STD, WHITE, SOLID, 12" FOR CROSSWALK	LF	1,998	1,998	905	1,093	\$	4.51	\$	4,929.43
711 11 125 - THERMOPLASTIC, STD, WHITE, SOLID, 24" FOR STOP LINE	LF	1,928	1,928	694	1,234	\$	9.02	\$	11,130.68
711 16 201 - THERMOPLASTIC, STANDARD-OTHER SURFACES, YELLOW, SOLID, 6"	GM	0.0050	0.0050	0.0000	0.0050	\$	12,030.00	\$	60.15
711 17 1 - THERMOPLASTIC, REMOVE EXISTING THERMOPLASTIC PAVEMENT MARKINGS- SURFACE TO REMAIN	SF	1,065	1,065	793	272	\$	3.97	\$	1,079.84
- Concrete Cutting	LS	1	1	1	0	\$	1,375.00	\$	-
- Flowable Fill	CY	12	12	12	0	\$	163.40	\$	-
				A	MOUNT DUE	E TH	IS PERIOD	\$	80,323.64

For questions regarding this invoice, please contact:
Mike Holcomb @ 904.891.0360 or email:

Please remit payment of this invoice to: 4463 Hyarbour North Court | Jacksonville, FL 32225

STATE OF FLORIDA DEPARTMENT OF TRANSPORTATION

CONSTRUCTION COMPLIANCE WITH SPECIFICATIONS AND PLANS

Item #7.
04/14
Page 1 of 3

FIN PROJECT I.D.(s) <u>435677-1-58-01</u>	DATE: <u>7/31/2023</u>
Palmetto Ave / Green Cove Springs Sidewalk	CONTRACT NO: <u>G23909</u>
	Monthly:
	Final:
	Tilleli.
EltonAlan, Incorporated	Drimo Contractor for the
above referenced contract, hereby verifies based on personal belief, all Quality Control functions and Quality Control sampling contract specification requirements and the approved Quality Cresults into the Department's LIMS database within 24 hours between 7/1/2023 and requirements are listed below. 1.) Item No.:	ng and testing results are in substantial compliance with the Control Plan for this project. This includes the input of the soft results being received. This represents work do do not be
Exception:	
2.) Item No.:	
Exception:	
3.) Item No.:	
Exception:	
4.) Item No.:Exception:	
•	

STATE OF FLORIDA DEPARTMENT OF TRANSPORTATION

Item #7. 01/11/14 Page 2 of 3

CONSTRUCTION COMPLIANCE WITH SPECIFICATIONS AND PLANS

5.) Item No.:Exception:	•
6.) Item No.:Exception:	
A false statement or omission made in connection with this certification denial of qualification to bid, and a determination of non-responsibility, the false statement to any and all civil and criminal penalties available	and may subject the person and/or entity making
State of Florida County of	Rachel Lewis Quality Control Manager By
Paul Doherty MY Commission Expires Personally Known or Produced Expires: July 2, 2027 Type of Identification Produced	EltonAlan, Incorporated Company
State of Florida County of	EltonAlan, Inc. Contractor By CEO
Commission Expires PAUL DOHERTY	Title

MY COMMISSION # HH 374620

Personally Known

Type of Identification Produce

STATE OF FLORIDA DEPARTMENT OF TRANSPORTATION

Item #7.

CERTIFICATION

DISBURSEMENT OF PREVIOUS PERIODIC PAYMENT TO SUBCONTRACTORS (As required by Florida Transportation Code, Section 337.11, Subsection (11), F.S.)

	DATE <u>7/31/2023</u>
435677-1-58-01	Tradition to be a state of the
	CONTRACT NO. <u>G23909</u>
	TO RELEASE MONTHLY PAYMENT FOR July 2023
renced contract, hereby certifies that all se received their pro rata share of all previous equipment furnished under the contracturnishing materials, services or equipment partial payment has been made by the Decontractors have not been paid and a contractors have not been paid and a contractors have not been paid and a contractors.	prime contractor subcontractors, except for those noted below, having interest in the purpose of the periodic payments made to date by the Department for all ext. The term "subcontractor", as used herein, shall also include in the transported into the work or stockpiled in the vicinity of the epartment and work done under equipment-rental agreements.
Subcontractor name	Subcontractor name
Street Address	Street Address
City State Zip	City State Zip
PAUL DOHERTY MY COMMISSION # HH EXPIRES: July 2, 20	applicable Federal and State Law. EltonAlan, Inc. Gontractor
	orated renced contract, hereby certifies that all so received their pro rata share of all previous and equipment furnished under the contracturnishing materials, services or equipment partial payment has been made by the Decontractors have not been paid and a contractor have not been paid and a contractor name Subcontractor name Street Address City State Zip PAUL DOHERTOM MY COMMISSION # HH

Instructions:

- 1. Attach copy of the notification good cause sent to each applicable subcontractor.
- 2. List the subcontractors which <u>have not been</u> paid the proportionate share of payments received by the contractor and the date listed as exception.
- 3. A separate certification is required for each contract.
- 4. To be signed by an officer or director of the Contractor with the authority to bind the Contractor and notarized.
- 5. To avoid delay in payment, certification must be submitted to the Project Engineer no later than the Friday before the monthly estimate cutoff date (generally the 3rd Sunday of the month).



BOB'S BARRICADES, INC. 921 Shotgun Road, Sunrise, FL 33326 Tel. No. 954-423-2627 Fax No. 954-473-8737

STATE OF FLORIDA, DEPARTMENT OF TRANSPORTATION MONTHLY CERTIFICATION OF MAINTENANCE OF CHANNELIZING DEVICES

CONTRACTOR ELTO	N ALAN, INC.				
CERTIFICATION NO.				STATE ROAD NO.	PALMETTO AVE
FINANCIAL ID NUMBER:	: 435677-1-58-01	CONTRACT NO.	G2390	MONTH OF:	JULY, 2023
	e have provided and maintained LCD Evaluation Guice and the Aatures.	_			
Contractor's Auth	orized Agent (Print Name & Co.):				
Contractor's Auth	orized Agent (Signature):	_			



STAFF REPORT

CITY OF GREEN COVE SPRINGS, FLORIDA

TO: City Council Regular Session MEETING DATE: August 15, 2023

FROM: Mike Null, Asst. City Manager

SUBJECT: Approve two task orders to Kimley-Horn in a total not-to-exceed amount of \$14,500 to

prepare two FDOT Beautification Grant Applications for landscape improvements on

Orange Ave and Walnut St. Mike Null

BACKGROUND

Heather Glisson with Kimley-Horn approached the City on July 21 to notify us that FDOT had advertised a grant application cycle for their Beautification program. The draft applications are due August 14, 2023 and the final applications are due October 2, 2023. The only required match is construction management and ongoing maintenance of the project once constructed.

In short order, City staff and Heather, in coordination with FDOT personnel from District 4 and District 2, were able to identify two potential projects. The Walnut Street project would allow for landscaping and irrigation costs related to the Walnut Street project from Palmetto to Magnolia to be funded. The Orange Ave project would allow for landscaping of the medians immediately north and south of Harbor Road, as planned with the US 17 Corridor Study. Each project carries a construction budget cost of \$100,000.

Heather formerly worked for the City and her writing and planning skills were very-well evidenced by her critical participation in both the City's Comprehensive Plan Update language and the CRA Needs Assessment documents. Heather is also very familiar with the City and brings tremendous insight to the table regarding these proposed projects. For these reasons as well as the quick turn-around time to prepare the grants, City staff approved the task orders to be completed. Staff is bringing this to the City Council for ratification since, while it is within the City Manager's authorization amount, it requires an exception to the "three written quotes" policy in our purchasing policies manual. Kimley-Horn is also not one of our continuing services engineers. Additionally, City staff did not want to pass up this funding opportunity as it has historically has not been extremely competitive and the timeliness to provide additional funding to the over-budget Walnut Street Project and the public demand for beautification of the US 17 corridor is opportune.

FISCAL IMPACT

The cost is not to exceed \$14,500 for both grant applications for an opportunity to obtain \$200,000 in grant funds with no direct match costs.

RECOMMENDATION

Approve two task orders to Kimley-Horn in a total not-to-exceed amount of \$14,500 to prepare two FDOT Beautification Grant Applications for landscape improvements on Orange Ave and Walnut St.



August 9, 2023

Mr. Mike Null City of Green Cove Springs 321 Walnut Street Green Cove Springs, FL 32043

Re: Letter Agreement for Professional Services for Grant Application Preparation

US 17/Harbor Road Beautification Project

Medians North and South of US 17 near the Harbor Road

Dear Mr. Null:

Kimley-Horn and Associates, Inc. ("Kimley-Horn" or "Consultant") is pleased to submit this Letter Agreement (the "Agreement") to City of Green Cove Springs (the "City") for providing grant application preparation services for the Florida Department of Transportation (FDOT) Beautification Grant for two beautification projects (the "Project") in the City of Green Cove Springs, Florida.

Project Understanding

The City would like to apply to the FDOT Beautification Grant Program, which funds the installation of landscaping within or adjacent to FDOT rights-of-way. The City is interested in applying for funding to landscape the medians north and south of Harbor Road on US 17. Kimley-Horn will work with the City to develop cost estimates and a project description to provide the basis for the grant application. Kimley-Horn will prepare one application for this Project.

Scope of Services

The Consultant will provide the services specifically set forth below.

Task 1 - Grant Application Preparation

- A. Kimley-Horn will develop application responses in collaboration with the City to complete the Beautification Grant Application Part 1 (Form Number 650-050-10A) and Beautification Grant Application Part II (Form Number 650-050-10B) individually for each identified project described above. The Consultant will rely upon Client information to identify the locations and dates of previous Beautification grants received within the past ten (10) years. The following is an outline of the application components:
 - Illustrative Plan Proposal (11x17): The Illustrative Plan Proposal may include existing site
 photos, sketches or renderings, and will include labels that accurately describe the project.
 This document will not exceed one 11x17 page.
 - 2) Form 650-050-10, Application Form, Part I
 - 3) Form 650-050-10, Application Form, Part II
 - 4) Resolution



- Letter of Authorization from FDOT
- 6) Letters of Support (optional)
- B. The Consultant will prepare items 1 through 4 above and will provide up to three draft Letters of Support for the City to have signed after the City identifies supporters. These Letters of Support will be provided as Word Documents. The Consultant may prepare basic sketches or renderings for the Illustrative Plan Proposal, upon mutual agreement between the Consultant and City.
- C. The Consultant will work with the City to develop cost estimates and a project description to provide the basis for the grant application.
- D. Meetings: The City and Consultant will meet to collaborate on the pre- and final-application development. Up to two (2) 30-minute virtual meetings are included as part of this Scope of Services.

Additional Services

Any services not specifically provided for in the above scope will be billed as additional services and performed at our then current hourly rates. Additional services we can provide include, but are not limited to, the following: detailed landscape renderings, landscape construction plans, and grant administration.

Information Provided by Client

Kimley-Horn shall be entitled to rely on the completeness and accuracy of all information provided by the Client or the City's consultants or representatives. The City shall provide all information requested by Kimley-Horn during the project, including but not limited to the following:

- 1. Previous beautification grants,
- 2. Project-related graphics, if available.

Responsibilities of Client

In addition to other responsibilities set out in this Agreement, the City has reviewed and will agree to the following assurances as part of the application:

- All existing agreements between the applicant and FDOT are in good standing
- The applicant's governing body (local government entity) must have passed a resolution or resolutions approving the grant application and authorizing the individual who signs the grant application for the applicant to execute agreements and documents associated with the grant and maintenance of the landscape project. A copy of such resolution must be included with the application.
- 3. Applicant has reviewed the State of Florida Beautification Grant Standard Agreement, form 650-050-010, part 3, language.
- 4. The Project will meet all the FDOT requirements, pursuant to Rule 14-40.003.

Schedule

Kimley-Horn will provide the Scope of Services as expeditiously as practicable with the goal of meeting a mutually agreeable schedule.



Fee and Expenses

Kimley-Horn will perform the services in Task 1 on a labor fee plus expense basis with the maximum labor fee of \$10,500.00. Kimley-Horn will not exceed the total maximum labor fee shown without authorization from the Client.

Labor fee will be billed on an hourly basis according to our then-current rates. As to these tasks, direct reimbursable expenses such as express delivery services, fees, air travel, and other direct expenses will be billed at 1.15 times cost. A percentage of labor fee will be added to each invoice to cover certain other expenses as to these tasks such as telecommunications, in-house reproduction, postage, supplies, project related computer time, and local mileage. Administrative time related to hourly tasks may be billed hourly.

All permitting, application, and similar project fees will be paid directly by the Client. Should the Client request Kimley-Horn to advance any such project fees on the Client's behalf, an invoice for such fees, with a fifteen percent (15%) markup, will be immediately issued to and paid by the Client.

Payment will be due within 25 days of your receipt of the invoice and should include the invoice number and Kimley-Horn project number.



CLOSURE

In addition to the matters set forth herein, our Agreement shall include and be subject to, and only to, the attached Standard Provisions, which are incorporated by reference. As used in the Standard Provisions, "Kimley-Horn" shall refer to Kimley-Horn and Associates, Inc., and "Client" shall refer to **CITY OF GREEN COVE SPRINGS**.

To expedite invoices and reduce paper waste, so provided via USPS mail upon request. Please pro-	ubmits invoices via email in a PDF. A paper copy can be ovide the following information:
Please email all invoices to	
Please copy	
·	thorized person sign this Agreement below and return to ve received a fully executed agreement. Fees and times ays after the date of this letter.
	omplete and return with the signed copy of this Agreement upply this information could result in delay in starting work
We appreciate the opportunity to provide these se	ervices. Please contact me if you have any questions.
Sincerely, KIMLEY-HORN AND ASSOCIATES, INC. By: Chris Towne, P.E Associate	Heather Glisson Project Manager
Attachments: Request for Information; Standard I	, ,
CITY OF GREEN COVE SPRINGS	
(Signature)	
(Name)	
(Title)	
(Date)	
(Email)	

K:\GVL_MISC\New Business\Public Sector\Green Cove Springs\FDOT Beautification\Agreement_Green Cove Springs_FDOT Beautification Grant.docx



Kimley » Horn

REQUEST FOR INFORMATION

Please return this information with your signed contract; failure to provide this information could result in delay in starting your project

Client Identification		,		0,	,				
Full, Legal Name of C	lient								
Mailing Address for In	voices								
Contact for Billing Inqu	uiries								
Contact's Phone and									
Client is (check one)		Owner	ner Agent for Owner		Unrelated Owner		to		
Property Identification	1								
	Parcel 1	Р	arcel	2	Parcel 3		Parcel 4		
Street Address									
County in which Property is Located									
Tax Assessor's Number(s)									
Property Owner Identi	ification								
	Owner 1	0	wner	2	Owner 3		Owner 4		
Owner(s) Name									
Owner(s) Mailing Address									
Owner's Phone No.									
Owner of Which Parcel #?									
Project Funding Ident	ification –	List Fundin	ıg So	urces for	the Project				

Attach additional sheets if there are more than 4 parcels or more than 4 owners

KIMLEY-HORN AND ASSOCIATES, INC. STANDARD PROVISIONS

- Kimley-Horn's Scope of Services and Additional Services. Kimley-Horn will perform only the services specifically described in this Agreement. If requested by the Client and agreed to by Kimley-Horn, Kimley-Horn will perform Additional Services, which shall be governed by these provisions. Unless otherwise agreed to in writing, the Client shall pay Kimley-Horn for any Additional Services an amount based upon Kimley-Horn's then-current hourly rates plus an amount to cover certain direct expenses including telecommunications, in-house reproduction, postage, supplies, project related computer time, and local mileage. Other direct expenses will be billed at 1.15 times cost.
- 2) Client's Responsibilities. In addition to other responsibilities herein or imposed by law, the Client shall:
 - a. Designate in writing a person to act as its representative, such person having complete authority to transmit instructions, receive information, and make or interpret the Client's decisions.
 - b. Provide all information and criteria as to the Client's requirements, objectives, and expectations for the project and all standards of development, design, or construction.
 - c. Provide Kimley-Horn all available studies, plans, or other documents pertaining to the project, such as surveys, engineering data, environmental information, etc., all of which Kimley-Horn may rely upon.
 - d. Arrange for access to the site and other property as required for Kimley-Horn to provide its services.
 - e. Review all documents or reports presented by Kimley-Horn and communicate decisions pertaining thereto within a reasonable time so as not to delay Kimley-Horn.
 - f. Furnish approvals and permits from governmental authorities having jurisdiction over the project and approvals and consents from other parties as may be necessary.
 - g. Obtain any independent accounting, legal, insurance, cost estimating, and feasibility services required by Client.
 - h. Give prompt written notice to Kimley-Horn whenever the Client becomes aware of any development that affects Kimley-Horn's services or any defect or noncompliance in any aspect of the project.
- 3) Period of Services. Unless otherwise stated herein, Kimley-Horn will begin work after receipt of a properly executed copy of this Agreement. This Agreement assumes conditions permitting continuous and orderly progress through completion of the services. Times for performance shall be extended as necessary for delays or suspensions due to circumstances that Kimley-Horn does not control. If such delay or suspension extends for more than six months, Kimley-Horn's compensation shall be renegotiated.
- 4) **Method of Payment.** Client shall pay Kimley-Horn as follows:
 - a. Invoices will be submitted periodically for services performed and expenses incurred. Payment of each invoice will be due within 25 days of receipt. The Client shall also pay any applicable sales tax. All retainers will be held by Kimley-Horn and applied against the final invoice. Interest will be added to accounts not paid within 25 days at the maximum rate allowed by law. If the Client fails to make any payment due under this or any other agreement within 30 days after Kimley-Horn's transmittal of its invoice, Kimley-Horn may, after giving notice to the Client, suspend services and withhold deliverables until all amounts due are paid.
 - b. If the Client relies on payment or proceeds from a third party to pay Kimley-Horn and Client does not pay Kimley-Horn's invoice within 60 days of receipt, Kimley-Horn may communicate directly with such third party to secure payment.
 - c. If the Client objects to an invoice, it must advise Kimley-Horn in writing giving its reasons within 14 days of receipt of the invoice or the Client's objections will be waived, and the invoice shall conclusively be deemed due and owing. If the Client objects to only a portion of the invoice, payment for all other portions remains due.
 - d. If Kimley-Horn initiates legal proceedings to collect payment, it may recover, in addition to all amounts due, its reasonable attorneys' fees, reasonable experts' fees, and other expenses related to the proceedings. Such expenses shall include the cost, at Kimley-Horn's normal hourly billing rates, of the time devoted to such proceedings by its employees.
 - e. The Client agrees that the payment to Kimley-Horn is not subject to any contingency or condition. Kimley-Horn may negotiate payment of any check tendered by the Client, even if the words "in full satisfaction" or words intended to have similar effect appear on the check without such negotiation being an accord and satisfaction of any disputed debt and without prejudicing any right of Kimley-Horn to collect additional amounts from the Client.
- 5) Use of Documents. All documents and data prepared by Kimley-Horn are related exclusively to the services described in this Agreement and may be used only if the Client has satisfied all of its obligations under this

Agreement. They are not intended or represented to be suitable for use or reuse by the Client or others on extensions of this project or on any other project. Any modifications by the Client to any of Kimley-Horn's documents, or any reuse of the documents without written authorization by Kimley-Horn will be at the Client's sole risk and without liability to Kimley-Horn, and the Client shall indemnify, defend and hold Kimley-Horn harmless from all claims, damages, losses and expenses, including but not limited to attorneys' fees, resulting therefrom. Kimley-Horn's electronic files and source code remain the property of Kimley-Horn and shall be provided to the Client only if expressly provided for in this Agreement. Any electronic files not containing an electronic seal are provided only for the convenience of the Client and use of them is at the Client's sole risk. In the case of any defects in the electronic files or any discrepancies between them and the hardcopy of the documents prepared by Kimley-Horn, the hardcopy shall govern.

- 6) Intellectual Property. Kimley-Horn may use or develop its proprietary software, patents, copyrights, trademarks, trade secrets, and other intellectual property owned by Kimley-Horn or its affiliates ("Intellectual Property") in the performance of this Agreement. Unless explicitly agreed to in writing by both parties to the contrary, Kimley-Horn maintains all interest in and ownership of its Intellectual Property and conveys no interest, ownership, license to use, or any other rights in the Intellectual Property to Client. Any enhancements of Intellectual Property made during the performance of this Agreement are solely owned by Kimley-Horn and its affiliates. If Kimley-Horn's services include providing Client with access to or a license for Kimley-Horn's (or its affiliates') proprietary software or technology, Client agrees to the terms of the Software License Agreement set forth at https://www.kimley-horn.com/khts-software-license-agreement ("the License Agreement") which terms are incorporated herein by reference.
- Opinions of Cost. Because Kimley-Horn does not control the cost of labor, materials, equipment or services furnished by others, methods of determining prices, or competitive bidding or market conditions, any opinions rendered as to costs, including but not limited to the costs of construction and materials, are made solely based on its judgment as a professional familiar with the industry. Kimley-Horn cannot and does not guarantee that proposals, bids, or actual costs will not vary from its opinions of cost. If the Client wishes greater assurance as to the amount of any cost, it shall employ an independent cost estimator. Kimley-Horn's services required to bring costs within any limitation established by the Client will be paid for as Additional Services.
- 8) **Termination.** The obligation to provide further services under this Agreement may be terminated by either party upon seven days' written notice in the event of substantial failure by the other party to perform in accordance with the terms hereof, or upon thirty days' written notice for the convenience of the terminating party. Kimley-Horn shall be paid for all services rendered and expenses incurred to the effective date of termination, and other reasonable expenses incurred by Kimley-Horn as a result of such termination.
- 9) Standard of Care. The standard of care applicable to Kimley-Horn's services will be the degree of care and skill ordinarily exercised by consultants performing the same or similar services in the same locality at the time the services are provided. No warranty, express or implied, is made or intended by Kimley-Horn's performance of services, and it is agreed that Kimley-Horn is not a fiduciary with respect to the Client.
- Limitation of Liability. In recognition of the relative risks and benefits of the Project to the Client and Kimley-Horn, the risks are allocated such that, to the fullest extent allowed by law, and notwithstanding any other provisions of this Agreement or the existence of applicable insurance coverage, that the total liability, in the aggregate, of Kimley-Horn and Kimley-Horn's officers, directors, employees, agents, and subconsultants to the Client or to anyone claiming by, through or under the Client, for any and all claims, losses, costs or damages whatsoever arising out of or in any way related to the services under this Agreement from any causes, including but not limited to, the negligence, professional errors or omissions, strict liability or breach of contract or any warranty, express or implied, of Kimley-Horn or Kimley-Horn's officers, directors, employees, agents, and subconsultants, shall not exceed twice the total compensation received by Kimley-Horn under this Agreement or \$50,000, whichever is greater. Higher limits of liability may be negotiated for additional fee. This Section is intended solely to limit the remedies available to the Client or those claiming by or through the Client, and nothing in this Section shall require the Client to indemnify Kimley-Horn.
- 11) **Mutual Waiver of Consequential Damages.** In no event shall either party be liable to the other for any consequential, incidental, punitive, or indirect damages including but not limited to loss of income or loss of profits.
- 12) Construction Costs. Under no circumstances shall Kimley-Horn be liable for extra costs or other consequences due to unknown conditions or related to the failure of contractors to perform work in accordance with the plans and specifications. Kimley-Horn shall have no liability whatsoever for any costs arising out of the Client's decision to

- obtain bids or proceed with construction before Kimley-Horn has issued final, fully approved plans and specifications. The Client acknowledges that all preliminary plans are subject to substantial revision until plans are fully approved and all permits obtained.
- Certifications. All requests for Kimley-Horn to execute certificates, lender consents, or other third-party reliance letters must be submitted to Kimley-Horn at least 14 days prior to the requested date of execution. Kimley-Horn shall not be required to execute certificates, consents, or third-party reliance letters that are inaccurate, that relate to facts of which Kimley-Horn does not have actual knowledge, or that would cause Kimley-Horn to violate applicable rules of professional responsibility.
- 14) **Dispute Resolution.** All claims arising out of this Agreement or its breach shall be submitted first to mediation in accordance with the American Arbitration Association as a condition precedent to litigation.
- 15) Hazardous Substances and Conditions. Kimley-Horn shall not be a custodian, transporter, handler, arranger, contractor, or remediator with respect to hazardous substances and conditions. Kimley-Horn's services will be limited to analysis, recommendations, and reporting, including, when agreed to, plans and specifications for isolation, removal, or remediation. Kimley-Horn will notify the Client of unanticipated hazardous substances or conditions of which Kimley-Horn actually becomes aware. Kimley-Horn may stop affected portions of its services until the hazardous substance or condition is eliminated.

16) Construction Phase Services.

- a. If Kimley-Horn prepares construction documents and Kimley-Horn is not retained to make periodic site visits, the Client assumes all responsibility for interpretation of the documents and for construction observation, and the Client waives any claims against Kimley-Horn in any way connected thereto.
- b. Kimley-Horn shall have no responsibility for any contractor's means, methods, techniques, equipment choice and usage, equipment maintenance and inspection, sequence, schedule, safety programs, or safety practices, nor shall Kimley-Horn have any authority or responsibility to stop or direct the work of any contractor. Kimley-Horn's visits will be for the purpose of endeavoring to provide the Client a greater degree of confidence that the completed work of its contractors will generally conform to the construction documents prepared by Kimley-Horn. Kimley-Horn neither guarantees the performance of contractors, nor assumes responsibility for any contractor's failure to perform its work in accordance with the contract documents.
- c. Kimley-Horn is not responsible for any duties assigned to it in the construction contract that are not expressly provided for in this Agreement. The Client agrees that each contract with any contractor shall state that the contractor shall be solely responsible for job site safety and its means and methods; that the contractor shall indemnify the Client and Kimley-Horn for all claims and liability arising out of job site accidents; and that the Client and Kimley-Horn shall be made additional insureds under the contractor's general liability insurance policy.
- No Third-Party Beneficiaries; Assignment and Subcontracting. This Agreement gives no rights or benefits to anyone other than the Client and Kimley-Horn, and all duties and responsibilities undertaken pursuant to this Agreement will be for the sole benefit of the Client and Kimley-Horn. The Client shall not assign or transfer any rights under or interest in this Agreement, or any claim arising out of the performance of services by Kimley-Horn, without the written consent of Kimley-Horn. Kimley-Horn reserves the right to augment its staff with subconsultants as it deems appropriate due to project logistics, schedules, or market conditions. If Kimley-Horn exercises this right, Kimley-Horn will maintain the agreed-upon billing rates for services identified in the contract, regardless of whether the services are provided by in-house employees, contract employees, or independent subconsultants.
- 18) **Confidentiality.** The Client consents to the use and dissemination by Kimley-Horn of photographs of the project and to the use by Kimley-Horn of facts, data and information obtained by Kimley-Horn in the performance of its services. If, however, any facts, data or information are specifically identified in writing by the Client as confidential, Kimley-Horn shall use reasonable care to maintain the confidentiality of that material.
- 19) **Miscellaneous Provisions.** This Agreement is to be governed by the law of the State of Florida. This Agreement contains the entire and fully integrated agreement between the parties and supersedes all prior and contemporaneous negotiations, representations, agreements, or understandings, whether written or oral. Except as provided in Section 1, this Agreement can be supplemented or amended only by a written document executed by both parties. Any conflicting or additional terms on any purchase order issued by the Client shall be void and are hereby expressly rejected by Kimley-Horn. If Client requires Kimley-Horn to register with or use an online vendor portal for payment or any other purpose, any terms included in the registration or use of the online vendor portal that are inconsistent or in addition to these terms shall be void and shall have no effect on Kimley-Horn or

this Agreement. Any provision in this Agreement that is unenforceable shall be ineffective to the extent of such unenforceability without invalidating the remaining provisions. The non-enforcement of any provision by either party shall not constitute a waiver of that provision nor shall it affect the enforceability of that provision or of the remainder of this Agreement.

20) PURSUANT TO FS 558.0035, EMPLOYEES OF KIMLEY-HORN MAY NOT BE HELD INDIVIDUALLY LIABLE FOR DAMAGES RESULTING FROM NEGLIGENCE UNDER THIS AGREEMENT.



August 9, 2023

Mr. Mike Null
City of Green Cove Springs
321 Walnut Street
Green Cove Springs, FL 32043

Re: Letter Agreement for Professional Services for Grant Application Preparation

Walnut Street Beautification Project

Walnut Street between Palmetto Avenue and Magnolia Avenue

Dear Mr. Null:

Kimley-Horn and Associates, Inc. ("Kimley-Horn" or "Consultant") is pleased to submit this Letter Agreement (the "Agreement") to City of Green Cove Springs (the "City") for providing grant application preparation services for the Florida Department of Transportation (FDOT) Beautification Grant for two beautification projects (the "Project") in the City of Green Cove Springs, Florida.

Project Understanding

The City would like to apply to the FDOT Beautification Grant Program, which funds the installation of landscaping within or adjacent to FDOT rights-of-way. The City is interested in applying for funding to landscape Walnut Street, between Palmetto Avenue and Magnolia Avenue, adjacent to US 17. The City has previously developed plans that have gone out to bid for this project, which will provide the basis for the grant application. Kimley-Horn will prepare one grant application for this Project.

Scope of Services

The Consultant will provide the services specifically set forth below.

Task 1 - Grant Application Preparation

- A. Kimley-Horn will develop application responses in collaboration with the City to complete the Beautification Grant Application Part 1 (Form Number 650-050-10A) and Beautification Grant Application Part II (Form Number 650-050-10B) individually for each identified project described above. The Consultant will rely upon Client information to identify the locations and dates of previous Beautification grants received within the past ten (10) years. The following is an outline of the application components:
 - Illustrative Plan Proposal (11x17): The Illustrative Plan Proposal may include existing site
 photos, sketches or renderings, and will include labels that accurately describe the project.
 This document will not exceed one 11x17 page.
 - 2) Form 650-050-10, Application Form, Part I
 - 3) Form 650-050-10, Application Form, Part II
 - 4) Resolution



- 5) Letter of Authorization from FDOT
- 6) Letters of Support (optional)
- B. The Consultant will prepare items 1 through 4 above and will provide up to three draft Letters of Support for the City to have signed after the Client identifies supporters. These Letters of Support will be provided as Word Documents. The Consultant may prepare basic sketches or renderings for the Illustrative Plan Proposal, upon mutual agreement between the Consultant and Client.
- C. Meetings: The Client and Consultant will meet to collaborate on the pre- and final-application development. Up to two (2) 30-minute virtual meetings are included as part of this Scope of Services.

Additional Services

Any services not specifically provided for in the above scope will be billed as additional services and performed at our then current hourly rates. Additional services we can provide include, but are not limited to, the following: detailed landscape renderings, landscape construction plans, and grant administration.

Information Provided by Client

Kimley-Horn shall be entitled to rely on the completeness and accuracy of all information provided by the Client or the City's consultants or representatives. The City shall provide all information requested by Kimley-Horn during the project, including but not limited to the following:

- 1. Previous beautification grants,
- 2. Project descriptions,
- Cost estimates,
- 4. Project-related graphics, if available.

Responsibilities of Client

In addition to other responsibilities set out in this Agreement, the City has reviewed and will agree to the following assurances as part of the application:

- 1. All existing agreements between the applicant and FDOT are in good standing
- The applicant's governing body (local government entity) must have passed a resolution or resolutions approving the grant application and authorizing the individual who signs the grant application for the applicant to execute agreements and documents associated with the grant and maintenance of the landscape project. A copy of such resolution must be included with the application.
- 3. Applicant has reviewed the State of Florida Beautification Grant Standard Agreement, form 650-050-010, part 3, language.
- 4. The Project will meet all the FDOT requirements, pursuant to Rule 14-40.003.



Schedule

Kimley-Horn will provide the Scope of Services as expeditiously as practicable with the goal of meeting a mutually agreeable schedule.

Fee and Expenses

Kimley-Horn will perform the services in Task 1 on a labor fee plus expense basis with the maximum labor fee of \$4,000.00. Kimley-Horn will not exceed the total maximum labor fee shown without authorization from the Client.

Labor fee will be billed on an hourly basis according to our then-current rates. As to these tasks, direct reimbursable expenses such as express delivery services, fees, air travel, and other direct expenses will be billed at 1.15 times cost. A percentage of labor fee will be added to each invoice to cover certain other expenses as to these tasks such as telecommunications, in-house reproduction, postage, supplies, project related computer time, and local mileage. Administrative time related to hourly tasks may be billed hourly.

All permitting, application, and similar project fees will be paid directly by the Client. Should the Client request Kimley-Horn to advance any such project fees on the Client's behalf, an invoice for such fees, with a fifteen percent (15%) markup, will be immediately issued to and paid by the Client.

Payment will be due within 25 days of your receipt of the invoice and should include the invoice number and Kimley-Horn project number.



CLOSURE

In addition to the matters set forth herein, our Agreement shall include and be subject to, and only to, the attached Standard Provisions, which are incorporated by reference. As used in the Standard Provisions, "Kimley-Horn" shall refer to Kimley-Horn and Associates, Inc., and "Client" shall refer to **CITY OF GREEN COVE SPRINGS**.

To expedite invoices and reduce paper waste, su provided via USPS mail upon request. Please pro	ubmits invoices via email in a PDF. A paper copy can be ovide the following information:
Please email all invoices to	
Please copy	
·	thorized person sign this Agreement below and return to ve received a fully executed agreement. Fees and times ays after the date of this letter.
	omplete and return with the signed copy of this Agreement upply this information could result in delay in starting work
We appreciate the opportunity to provide these so	ervices. Please contact me if you have any questions.
Sincerely, KIMLEY-HORN AND ASSOCIATES, INC.	Heather
By: Chris Towne, P.E Associate	Heather Glisson Project Manager
Attachments: Request for Information; Standard I	Provisions
CITY OF GREEN COVE SPRINGS	
(Signature)	
(Name)	
(Title)	
(Date)	
(Email)	

K:\GVL_MISC\New Business\Public Sector\Green Cove Springs\FDOT Beautification\Agreement_Green Cove Springs_FDOT Beautification Grant.docx



REQUEST FOR INFORMATION

Please return this information with your signed contract; failure to provide this information could result in delay in starting your project

		delay	iii Stai	ung your p	nojeci		
Client Identification		T					
Full, Legal Name of C	lient						
Mailing Address for In	voices						
Mailing Address for In	voices						
Contact for Billing Inqu	uiries						
Contact's Phone and							
Client is (check one)		Owner		Agent fo	r Owner	Jnrelated Owner	to
Dronovis, Idoniii ootios							
Property Identification	Parcel 1		Parce	12	Parcel 3	Parcel 4	
Street Address	1 41001 1	<u>'</u>	aroc		1 410010	1 41001 4	
County in which							
Property is Located							
Tax Assessor's							
Number(s)							
Property Owner Ident	fication Owner 1	-	Owne	r 2	Owner 3	Owner 4	
Owner(s) Name							
Owner(s) Mailing Address							
Owner's Phone No.							
Owner of Which Parcel #?							
Project Funding Ident	ification –	List Fundi	ing So	ources for	the Project	•	

Attach additional sheets if there are more than 4 parcels or more than 4 owners

Kimley»Horn

KIMLEY-HORN AND ASSOCIATES, INC. STANDARD PROVISIONS

- Kimley-Horn's Scope of Services and Additional Services. Kimley-Horn will perform only the services specifically described in this Agreement. If requested by the Client and agreed to by Kimley-Horn, Kimley-Horn will perform Additional Services, which shall be governed by these provisions. Unless otherwise agreed to in writing, the Client shall pay Kimley-Horn for any Additional Services an amount based upon Kimley-Horn's then-current hourly rates plus an amount to cover certain direct expenses including telecommunications, in-house reproduction, postage, supplies, project related computer time, and local mileage. Other direct expenses will be billed at 1.15 times cost.
- 2) Client's Responsibilities. In addition to other responsibilities herein or imposed by law, the Client shall:
 - a. Designate in writing a person to act as its representative, such person having complete authority to transmit instructions, receive information, and make or interpret the Client's decisions.
 - b. Provide all information and criteria as to the Client's requirements, objectives, and expectations for the project and all standards of development, design, or construction.
 - c. Provide Kimley-Horn all available studies, plans, or other documents pertaining to the project, such as surveys, engineering data, environmental information, etc., all of which Kimley-Horn may rely upon.
 - d. Arrange for access to the site and other property as required for Kimley-Horn to provide its services.
 - e. Review all documents or reports presented by Kimley-Horn and communicate decisions pertaining thereto within a reasonable time so as not to delay Kimley-Horn.
 - f. Furnish approvals and permits from governmental authorities having jurisdiction over the project and approvals and consents from other parties as may be necessary.
 - g. Obtain any independent accounting, legal, insurance, cost estimating, and feasibility services required by Client.
 - h. Give prompt written notice to Kimley-Horn whenever the Client becomes aware of any development that affects Kimley-Horn's services or any defect or noncompliance in any aspect of the project.
- 3) Period of Services. Unless otherwise stated herein, Kimley-Horn will begin work after receipt of a properly executed copy of this Agreement. This Agreement assumes conditions permitting continuous and orderly progress through completion of the services. Times for performance shall be extended as necessary for delays or suspensions due to circumstances that Kimley-Horn does not control. If such delay or suspension extends for more than six months, Kimley-Horn's compensation shall be renegotiated.
- 4) Method of Payment. Client shall pay Kimley-Horn as follows:
 - a. Invoices will be submitted periodically for services performed and expenses incurred. Payment of each invoice will be due within 25 days of receipt. The Client shall also pay any applicable sales tax. All retainers will be held by Kimley-Horn and applied against the final invoice. Interest will be added to accounts not paid within 25 days at the maximum rate allowed by law. If the Client fails to make any payment due under this or any other agreement within 30 days after Kimley-Horn's transmittal of its invoice, Kimley-Horn may, after giving notice to the Client, suspend services and withhold deliverables until all amounts due are paid.
 - b. If the Client relies on payment or proceeds from a third party to pay Kimley-Horn and Client does not pay Kimley-Horn's invoice within 60 days of receipt, Kimley-Horn may communicate directly with such third party to secure payment.
 - c. If the Client objects to an invoice, it must advise Kimley-Horn in writing giving its reasons within 14 days of receipt of the invoice or the Client's objections will be waived, and the invoice shall conclusively be deemed due and owing. If the Client objects to only a portion of the invoice, payment for all other portions remains due.
 - d. If Kimley-Horn initiates legal proceedings to collect payment, it may recover, in addition to all amounts due, its reasonable attorneys' fees, reasonable experts' fees, and other expenses related to the proceedings. Such expenses shall include the cost, at Kimley-Horn's normal hourly billing rates, of the time devoted to such proceedings by its employees.
 - e. The Client agrees that the payment to Kimley-Horn is not subject to any contingency or condition. Kimley-Horn may negotiate payment of any check tendered by the Client, even if the words "in full satisfaction" or words intended to have similar effect appear on the check without such negotiation being an accord and satisfaction of any disputed debt and without prejudicing any right of Kimley-Horn to collect additional amounts from the Client.
- 5) Use of Documents. All documents and data prepared by Kimley-Horn are related exclusively to the services described in this Agreement and may be used only if the Client has satisfied all of its obligations under this

Agreement. They are not intended or represented to be suitable for use or reuse by the Client or others on extensions of this project or on any other project. Any modifications by the Client to any of Kimley-Horn's documents, or any reuse of the documents without written authorization by Kimley-Horn will be at the Client's sole risk and without liability to Kimley-Horn, and the Client shall indemnify, defend and hold Kimley-Horn harmless from all claims, damages, losses and expenses, including but not limited to attorneys' fees, resulting therefrom. Kimley-Horn's electronic files and source code remain the property of Kimley-Horn and shall be provided to the Client only if expressly provided for in this Agreement. Any electronic files not containing an electronic seal are provided only for the convenience of the Client and use of them is at the Client's sole risk. In the case of any defects in the electronic files or any discrepancies between them and the hardcopy of the documents prepared by Kimley-Horn, the hardcopy shall govern.

- 6) Intellectual Property. Kimley-Horn may use or develop its proprietary software, patents, copyrights, trademarks, trade secrets, and other intellectual property owned by Kimley-Horn or its affiliates ("Intellectual Property") in the performance of this Agreement. Unless explicitly agreed to in writing by both parties to the contrary, Kimley-Horn maintains all interest in and ownership of its Intellectual Property and conveys no interest, ownership, license to use, or any other rights in the Intellectual Property to Client. Any enhancements of Intellectual Property made during the performance of this Agreement are solely owned by Kimley-Horn and its affiliates. If Kimley-Horn's services include providing Client with access to or a license for Kimley-Horn's (or its affiliates') proprietary software or technology, Client agrees to the terms of the Software License Agreement set forth at https://www.kimley-horn.com/khts-software-license-agreement ("the License Agreement") which terms are incorporated herein by reference.
- Opinions of Cost. Because Kimley-Horn does not control the cost of labor, materials, equipment or services furnished by others, methods of determining prices, or competitive bidding or market conditions, any opinions rendered as to costs, including but not limited to the costs of construction and materials, are made solely based on its judgment as a professional familiar with the industry. Kimley-Horn cannot and does not guarantee that proposals, bids, or actual costs will not vary from its opinions of cost. If the Client wishes greater assurance as to the amount of any cost, it shall employ an independent cost estimator. Kimley-Horn's services required to bring costs within any limitation established by the Client will be paid for as Additional Services.
- 8) **Termination.** The obligation to provide further services under this Agreement may be terminated by either party upon seven days' written notice in the event of substantial failure by the other party to perform in accordance with the terms hereof, or upon thirty days' written notice for the convenience of the terminating party. Kimley-Horn shall be paid for all services rendered and expenses incurred to the effective date of termination, and other reasonable expenses incurred by Kimley-Horn as a result of such termination.
- 9) Standard of Care. The standard of care applicable to Kimley-Horn's services will be the degree of care and skill ordinarily exercised by consultants performing the same or similar services in the same locality at the time the services are provided. No warranty, express or implied, is made or intended by Kimley-Horn's performance of services, and it is agreed that Kimley-Horn is not a fiduciary with respect to the Client.
- Limitation of Liability. In recognition of the relative risks and benefits of the Project to the Client and Kimley-Horn, the risks are allocated such that, to the fullest extent allowed by law, and notwithstanding any other provisions of this Agreement or the existence of applicable insurance coverage, that the total liability, in the aggregate, of Kimley-Horn and Kimley-Horn's officers, directors, employees, agents, and subconsultants to the Client or to anyone claiming by, through or under the Client, for any and all claims, losses, costs or damages whatsoever arising out of or in any way related to the services under this Agreement from any causes, including but not limited to, the negligence, professional errors or omissions, strict liability or breach of contract or any warranty, express or implied, of Kimley-Horn or Kimley-Horn's officers, directors, employees, agents, and subconsultants, shall not exceed twice the total compensation received by Kimley-Horn under this Agreement or \$50,000, whichever is greater. Higher limits of liability may be negotiated for additional fee. This Section is intended solely to limit the remedies available to the Client or those claiming by or through the Client, and nothing in this Section shall require the Client to indemnify Kimley-Horn.
- 11) **Mutual Waiver of Consequential Damages.** In no event shall either party be liable to the other for any consequential, incidental, punitive, or indirect damages including but not limited to loss of income or loss of profits.
- 12) Construction Costs. Under no circumstances shall Kimley-Horn be liable for extra costs or other consequences due to unknown conditions or related to the failure of contractors to perform work in accordance with the plans and specifications. Kimley-Horn shall have no liability whatsoever for any costs arising out of the Client's decision to

- obtain bids or proceed with construction before Kimley-Horn has issued final, fully approved plans and specifications. The Client acknowledges that all preliminary plans are subject to substantial revision until plans are fully approved and all permits obtained.
- Certifications. All requests for Kimley-Horn to execute certificates, lender consents, or other third-party reliance letters must be submitted to Kimley-Horn at least 14 days prior to the requested date of execution. Kimley-Horn shall not be required to execute certificates, consents, or third-party reliance letters that are inaccurate, that relate to facts of which Kimley-Horn does not have actual knowledge, or that would cause Kimley-Horn to violate applicable rules of professional responsibility.
- 14) **Dispute Resolution.** All claims arising out of this Agreement or its breach shall be submitted first to mediation in accordance with the American Arbitration Association as a condition precedent to litigation.
- 15) Hazardous Substances and Conditions. Kimley-Horn shall not be a custodian, transporter, handler, arranger, contractor, or remediator with respect to hazardous substances and conditions. Kimley-Horn's services will be limited to analysis, recommendations, and reporting, including, when agreed to, plans and specifications for isolation, removal, or remediation. Kimley-Horn will notify the Client of unanticipated hazardous substances or conditions of which Kimley-Horn actually becomes aware. Kimley-Horn may stop affected portions of its services until the hazardous substance or condition is eliminated.

16) Construction Phase Services.

- a. If Kimley-Horn prepares construction documents and Kimley-Horn is not retained to make periodic site visits, the Client assumes all responsibility for interpretation of the documents and for construction observation, and the Client waives any claims against Kimley-Horn in any way connected thereto.
- b. Kimley-Horn shall have no responsibility for any contractor's means, methods, techniques, equipment choice and usage, equipment maintenance and inspection, sequence, schedule, safety programs, or safety practices, nor shall Kimley-Horn have any authority or responsibility to stop or direct the work of any contractor. Kimley-Horn's visits will be for the purpose of endeavoring to provide the Client a greater degree of confidence that the completed work of its contractors will generally conform to the construction documents prepared by Kimley-Horn. Kimley-Horn neither guarantees the performance of contractors, nor assumes responsibility for any contractor's failure to perform its work in accordance with the contract documents.
- c. Kimley-Horn is not responsible for any duties assigned to it in the construction contract that are not expressly provided for in this Agreement. The Client agrees that each contract with any contractor shall state that the contractor shall be solely responsible for job site safety and its means and methods; that the contractor shall indemnify the Client and Kimley-Horn for all claims and liability arising out of job site accidents; and that the Client and Kimley-Horn shall be made additional insureds under the contractor's general liability insurance policy.
- No Third-Party Beneficiaries; Assignment and Subcontracting. This Agreement gives no rights or benefits to anyone other than the Client and Kimley-Horn, and all duties and responsibilities undertaken pursuant to this Agreement will be for the sole benefit of the Client and Kimley-Horn. The Client shall not assign or transfer any rights under or interest in this Agreement, or any claim arising out of the performance of services by Kimley-Horn, without the written consent of Kimley-Horn. Kimley-Horn reserves the right to augment its staff with subconsultants as it deems appropriate due to project logistics, schedules, or market conditions. If Kimley-Horn exercises this right, Kimley-Horn will maintain the agreed-upon billing rates for services identified in the contract, regardless of whether the services are provided by in-house employees, contract employees, or independent subconsultants.
- 18) **Confidentiality.** The Client consents to the use and dissemination by Kimley-Horn of photographs of the project and to the use by Kimley-Horn of facts, data and information obtained by Kimley-Horn in the performance of its services. If, however, any facts, data or information are specifically identified in writing by the Client as confidential, Kimley-Horn shall use reasonable care to maintain the confidentiality of that material.
- 19) **Miscellaneous Provisions.** This Agreement is to be governed by the law of the State of Florida. This Agreement contains the entire and fully integrated agreement between the parties and supersedes all prior and contemporaneous negotiations, representations, agreements, or understandings, whether written or oral. Except as provided in Section 1, this Agreement can be supplemented or amended only by a written document executed by both parties. Any conflicting or additional terms on any purchase order issued by the Client shall be void and are hereby expressly rejected by Kimley-Horn. If Client requires Kimley-Horn to register with or use an online vendor portal for payment or any other purpose, any terms included in the registration or use of the online vendor portal that are inconsistent or in addition to these terms shall be void and shall have no effect on Kimley-Horn or

this Agreement. Any provision in this Agreement that is unenforceable shall be ineffective to the extent of such unenforceability without invalidating the remaining provisions. The non-enforcement of any provision by either party shall not constitute a waiver of that provision nor shall it affect the enforceability of that provision or of the remainder of this Agreement.

20) PURSUANT TO FS 558.0035, EMPLOYEES OF KIMLEY-HORN MAY NOT BE HELD INDIVIDUALLY LIABLE FOR DAMAGES RESULTING FROM NEGLIGENCE UNDER THIS AGREEMENT.



CITY OF GREEN COVE SPRINGS POLICE DEPARTMENT



Chief E.J. Guzman • 1001 Idlewild Avenue • Green Cove Springs, FL 32043 • Main (904) 297-7300 • Fax (904) 284-1436 • www.gcspd.com

The following is the official summary of activity conducted by members of the Green Cove Springs Police Department for the month of June 2023:

Total # Calls for Service: 1086

Total # Arrests: 28 (-3)

Total # Traffic Stops: 293 (-14) Total # Citations: 127 (-19) % Citations to stops: 43%

Total # Building and business security checks: 1,584 (-4)

Total # Police Related Services: 3,797 (-67)

Response Times: Priority 1: 4M 37sec Priority 2: 1M 28 sec Priority 3: 6M 29sec

Dispatch Phone Communication: 911 calls: 384 Non-Emergency calls:414 Walk-In: 34

Marine Enforcement:

6/1/23: Hines/Milliken: Boater Skip Day

Red Light Camera Program:

Video Review:

Ofc. Gann reviewed 1,360 violations, approved 1,224 and rejected 136

Sgt. Vineyard reviewed 0 violations, approved 0 and rejected 0

Total violations reviewed for the month: 1,360 Approval Rating: 90.00%

Total hours reviewing video: 10.69

Off Duty/Security Details:

GCSPD Officers worked 18 security and off duty details in April in addition to normal duties.

2 School BD Officers worked details that GCSPD could not cover.

Traffic complaints received/completed:

Location	Issue	# Officer	Traffic	Traffic	Traffic	Parking	Issue
		# Times	Stops	Citations	Warnings	Citations	Y/N
Mag West Comm	Veh not stopping for school bus	24	6	2	4	0	Y

^{**}When evaluating traffic complaints, low numbers of stops/citations are a good indication that the issue may not be as prevalent as the citizen believes.17

GCSPD FORM A-18, REV 1/2021

Item #9.

Notable Arrests:

2023001499	Resisting without violence/Possession of Marijuana
2023001479	FTA warrant
2023001433	No Valid Driver's License
2023001353	Violation of Probation
2023001457	Aggravated Assault
2023001500	Battery on person 65 and older
2023002567	Sale/ Delivery of cocaine within 1000 ft
2023001576	Out-of-county warrant
2023001430	Possession of Marijuana more than 20g
2023001462	Domestic Battery by Strangulation
2023001361	VOP on 1st degree murder
2023001398	FTA on Reckless driving
2023001424	Possession Meth

Notable Community Involvement Initiatives:

- Ofc. Rulon assisted patrons at Spring Park along with helping individuals with a child with behavioral issues.
- Sgt. Graham handed out the Police Department's coloring books to kids at 840 Cooks Lane while on a call for service.
- Sgt. Graham attended Judge Forbess investiture.
- Sgt Hess assisted a couple from out of town change a tire on their vehicle.
- Ofc. Milliken and Van Hof participated in the Green Cove Springs Coffee with a Cop.
- Ofc. Van Hof worked at the Market in the Park and assisted citizens with parking and directions.
- Ofc. Milliken and Ofc. Van Hof assisted with a local car show and let children tour her patrol vehicle.
- Ofc. Morando enjoys showing the youth of our city his patrol vehicle and answering questions about the job.

Notable Problem Oriented Policing Initiatives:

- Sgt. Hess noticed that the restrooms in the center of the park by the playground were not labeled men and women. The makings that were previously there were gone. He contacted Public Works in reference to the issue.
- Sgt. Milliken continues to work diligently notifying CSX and public works of any track related issues.
- Sgt. Vineyard, Ofc. Lee, Ofc. Arnold and Det. Patterson attended Sgt Michael Kunovich's Funeral and procession representing the department by assisting with honor guard duties.
- Ofc. Morando notified Public Works of missing street signs in the area of N Highland Ave.
- Sgt. Vineyard discovered at night the American Flag is not lit and our Fleet building. She contacted Public works on the matter.

Operation Night Watch: Officers worked a special operation targeting traffic offenses and narcotics activity. Statistics for the operation were as follows:

- 81 Traffic stops
- 5 Arrests
- 23 Citations issued
- 39 Written Warnings
- 14 Verbal Warnings

Notable Criminal Investigations Activity:

Item #9.

Open Cases: Cases Cleared by Arrest: Called out: 2 Background completed: 0

Significant Case Developments:

2023001237 Detective Camp and Det. Patterson were called out in reference to a sexual battery. A suspect was

found in the bedroom of the victim by patrol. Obtained a full confession from the suspect. Still awaiting

on forensics to return.

2023001348 Working in conjunction with DCF in reference to elderly abuse taking place at the residence.

Notable K-9 Activity:

Apprehensions: 0 Training Sessions: 1 Total Time Training: 8 Hrs

K9 Searches: 3 #Finds: 1 #No Finds: 2

Mutual Aid Calls: 2

CCSO S CR 16A/ CR 16W CCSO 800 N ORANGE AV

Narcotics Finds: 1

2023-001408 Cocaine

Officer Babcock had to work patrol shifts without his partner for the majority of this month due to manpower shortages.

Notable SRO Activity:

N/A. Summer Break

Training:

Ofc. Milliken attended Single Officer Response Training

G.C.S.P.D. COMBINED MONTHLY REPORT

Supervisor	Luedtke	
Officer: Lee	Month: JULY	Year: 2023

Felony Arrests	Misd Arrests	DUI Arrests	Reports	Supp Reports	Quality Life	Sig 4	F.I.	City Ord		Parking Total Cites/Warn Wor		
0	0	0	0	0	0	0	0	0	0		16	50
										Wrng/ Xray		
	term in	vestigation loca	entified need to of an issue. (tion, and their	Officers mu	st identify		_					
	Project Loc											
	olem or Con taken to		<u> </u>									
	Arrests		Primary Char	ge only (No	names, m	ultiple	charg	es etc)				
Com	munity Pol	icing	Officers are eduties. Meet junior badges community c	ing with bu s, calendars	ısinesses o	r citize	ns and	d hand	ing out [Dept mat	terials,	such as

Community Resource Officer

Community Events	Description
National Night Out	Planning for the event by getting sponsors, venue, and vendors
Backpack Giveaway	School supply handout at Charles E. Bennett
# Citizen Surveys Comp	0
# Social Media Posts	Approximately 40
# PIO Callouts	1 (Gas Leak)
# Recruitment Events	2 (Gateway and Santa Fe Colleges
Homeless Interactions	Name, DOB, Residing, Open to services Y/N, Needs
	0

Training	0
# Hours Accreditation	0
# Patrol Shifts	

MONTHLY INSPECTIONS OF UNIFORMS, FIREARMS, ELECTRONIC CONTROL DEVICES

Name Josh Lee	Lee			Date	5/1/2023			
Duty Weapon Handgun								
Make	Glock	Glock			22	Serial Nu	mber	PRH262
Cleanliness	GOOD	GOOD		on	GOOD	Damage		NONE
Duty Weapon Rifle								
Make	BUSH	BUSHMASTER			.223	Serial Number		BFI656717
Cleanliness	GOOD		Functio	on	GOOD	Damage		NONE
Electronic control Device								
Make	Taser		Model		X26P	Serial Nu	mber	X1200D2VH
ECD Cartridge Number C410969DE								
ECD Cartridge N	ECD Cartridge Number C410969DW							
Cleanliness	GOOD	GOOD Fur		on GOOD		Damage		NONE
Uniforms								
SS Shirts Cond	ond GOOD I		LS Shirts Cond		N/A	Outer Vest		GOOD
						Cond		
BDU Pants Cond		GOOD						
Nylon Duty Gear	Nylon Duty Gear Cond GOOD							

Comments
Uniform ratings categories condition: Good/Worn/NR (Needs Replacement)
Cleanliness: Clean/ NTBC (Needs to be Cleaned) (Needs to be cleaned-verbal warning 1 st offense then written documentation if within the same year)

Amended 2/2	2/2/	ZU.	23
-------------	------	-----	----

Supervisor or designee conducting inspection



ELECTRIC DEPARTMENT

Significant activities for the month of June 2023

- 19 Streetlights repaired
- 1 Barn light installed
- 1 Street light inspected
- 16 Poles removed
- 6 Voltage check
- 1 Service removed

In addition to the activities listed above, the Electric Department also:

- Conducted daily morning safety meetings.
- Conducted daily truck inspections.
- Trimmed limbs and vines from power lines and poles.
- Unloaded transformers and supplies when they came in.
- Inspect/locate ROW permits.
- Conduct warehouse inventory/order supplies.
- 885 Bulkhead Rd. replaced CTs, meter-cans and wires.
- Green Cove Ave. & Manthei Rd., south of right of way, removed 4 multi-helix anchors.
- 1729 Verdad St., moved secondary service to riser pole.
- 908 St Johns Ave., palm branch burning in primary lines was cleared.
- Green Cove Ave., & Vermont Ave., replaced flashed insulators.
- 1108 Walnut St., replaced service going across street to 1/0 triplex.
- 413 Robert Circle, installed triplex from transformer to clearance pole.
- 1318 North St., helped Water Dept., to hold a pole while they repaired a pipe.
- 965 Leonard C. Taylor Parkway, set 23 KV 500 KVA 3 phase pad mount transformer and pulled in 3 phase URD.
- 1099 N Orange Ave., inspected pole hit by a truck.
- 403 Harrison St., responded to a house fire.
- 3285 CR 209, installed 1 span of 1/0 triplex and ran new URD service up the pole.

During the month of June, the Electric Department responded the following outages:

06/10/2023 – Between 3:30 p.m. – 4:30 p.m.,1361 River Rd., blown transformer fuse by lightning, replaced fuse, 6 customers affected.

06/16-17/2023 – Between 6:30 p.m. – 2:00 a.m., 1254 Governors Creek .,tree came down and knocked pole down, 500 customers affected.

06/19/2023 – Between 7:00 p.m. – 9:30 p.m., 485 Olive Circle., during bad weather a branch fell and broke service, 1 customer affected.

06/19/2023 – Between 7:00 p.m. – 11:00 p.m., 1126 Reynolds Park., during lightning storm a fuse blew inside UG transformer, 30 customers affected.

06/20/2023 – Between 8:00 a.m. – 11:00 a.m., 4135 Hwy 17 ., replaced damaged transformer , 4 customers affected.

06/20/2023 – Between 4:00 a.m. – 7:00 a.m., Reynolds Park., transformer fuse blown, 30 customers affected.

06/22/2023 – Between 8:12 a.m. – 10:15 a.m., 501 St Johns Ave., replaced bad lightning arrester, 4 customer affected.

06/24/2023 – Between 2:30 a.m. – 4:45 p.m., 426 St Johns Ave., transformer fuse blown, 4 customers affected.

06/27/2023 – Between 8:00 a.m. – 9:30 a.m., 151 West St., removed broken tree from primary lateral, 50 customers affected.

06/27/2023 – Between 8:00 p.m. – 11:30 p.m., Idlewild St & Robert St., tree came down on service cable, 4 customers affected.

06/28/2023 – Between 7:00 a.m. – 4:45 p.m., 1434 Rosecrans Ln., tree came down on service cables, 2 customers affected.

06/30/2023 – Between 11:45 a.m. – 2:30 p.m., 2 Robert St., branch felt on service cable, 1 customer affected.

Electric Utility Top Consumption Customers (kwh/meter) for June:

NAME	SERVICE ADDRESS	KWH	AMOUNT
Clay County Jail	901 N. Orange Ave.	314,800	\$ 33,340.20
Winn Dixie Stores, Inc	3260 Hwy. 17 N.	260,000	\$ 26,634.00
St. Johns Landing	1408 N. Orange Ave.	219,710	\$ 25,975.78
BD Of County Commissioner	825 N. Orange Ave.	186,400	\$ 20,242.40
Kindred Health	801 Oak St.	170,000	\$ 18,087.00
Clay County Court House	825 N. Orange Ave.	143,680	\$ 14,906.48
Permabase Building Products	1767 Wildwood Rd	135,840	\$ 14,560.24
Tamko Roofing Products	914 Hall Park Rd.	129,760	\$ 15,638.96
BD Of Public Instruction	2025 State Road 16	114,000	\$ 14,725.00
City of Green Cove Springs	1277 Harbor Road	114,000	\$ 11,280.80
Coral Ridge Foods, Gc	1165 N Orange AVE	81,840	\$ 8,558.24
Governors Creek #436	803 Oak St.	80,000	\$ 8,996.00
Wen South LLC/Wendy's FL.	3266 Highway 17	76,720	\$ 8,643.12
VAC-CON	954 Hall Park Rd.	74,800	\$ 8,114.80
City of Green Cove Springs	Set Street Lights	66,392	\$ 8,045.43
Pegasus Technologies	932 Pilot Dr Hanger 3 & 4	64,920	\$ 7,202.12
Duval Asphalt Products, Inc.	1921 Jersey Ave	63,000	\$ 10,526.00
Direct TV/ AT&T Services, Inc.	512 Center St	61,760	\$ 6,431.76
BD Of County Commissioner	477 Houston St (dmv)	57,920	\$ 6,843.92
BD Of Public Instruction	801 Center St	53,920	\$ 6,357.52
BD Of Public Instruction	1 N Oakridge Ave	53,280	\$ 7,081.28
Race Trac Petroleum, Inc.	3106 Highway 17	51,120	\$ 5,388.72
Ammcon Corp.	1503 County Road 315 Ste 20	1 48,000	\$ 6,101.00
BD Of Public Instruction	Clay High School	46,800	\$ 6,185.60 _[

Electric Utility Department Capital Projects:

Pole top switch replacement

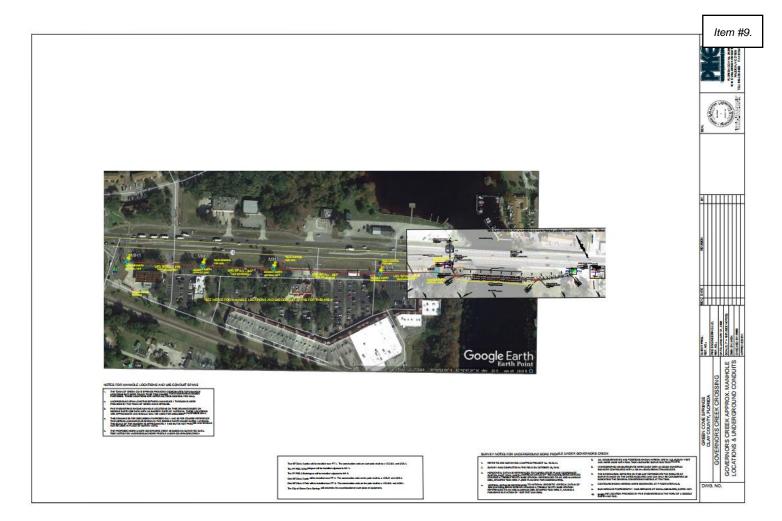
This project began 09-18-2019 with the installation of switches at Governors Creek for restoration plan if isolation of north feeder across Governors Creek Bridge during extreme emergencies. Project is now in the inspection and evaluation process involving Chapman 2 extension to Harbor Rd and load transfer of Chapman 1 to Chapman 2.

13kV to 23kv Conversion – US17 from Harbor Road to CR 315

Planning for this project has begun. This project will continue the Chapman 1 and Chapman 2 circuits north of Harbor Road to provide capacity and reliability for existing and future customers north of Governors Creek. Materials for this project are being funded by a DEO Grant. Materials have started arriving and we are installing the material as it arrives.

Governors Creek Hardening Project

This project will allow the overhead conductor crossing Governors Creek to be placed underground from Grove Street to Harbor Road. This project has been split into two phases: (1) design and permitting and (2) construction. It is being 75% funded by a FEMA HMGP grant. Phase 1 is complete. The project is now being evaluated by FDEM and FEMA funding for the construction phase. Once funding is in place and a contract is executed, bidding and construction should take approximately 9 months. This project will also support to extension of Chapman 1 and Chapman 2 circuits north of Governors Creek to provide additional capacity and reliability for all customers north of Governors Creek.



North and South Substation Improvements

North and South substation sub-station upgrades have begun with directional bore designs completed to install URD 23KV feeds to substation transformers eliminating the possibility of catastrophic failure in the event of lightning or material failure which could cause conductor to fall into existing bus work.



ELECTRIC DEPARTMENT

Significant activities for the month of July 2023

- 10 Streetlights repaired
- 6 Poles removed
- 13 Poles installed
- 2 Poles replaced
- 12 Voltage checked
- 1 Service removed
- 3 Permanent meters installed
- 1 Temporary meter installed
- 2 Meter Inspections
- 8 Replaced CT wires

In addition to the activities listed above, the Electric Department also:

- Conducted daily morning safety meetings.
- Conducted daily truck inspections.
- Trimmed limbs and vines from power lines and poles.
- Unloaded transformers and supplies when they came in.
- Inspect/locate ROW permits.
- Conduct warehouse inventory/order supplies.
- 3075 US 17 N., installed fault indicators on 23 KV circuit.
- 1408 N Orange Ave., re-set targets on reclosures.
- Reynolds Park, hook switch on fire, de-energized circuit and made repairs.
- 1513 CR 315, change out 3 bad CTs on service.
- 932 Pilot Dr., excavated in 3 phase URD.
- 110 Yacht Club Pt., made up parallel services in UG service box.
- 1305 Idlewild Ave., converted 3 phase laterals to single phase and re-insulated.
- 3511 Oglebay Dr., made up service in UG service box.
- 1219 Clear Hall Ln., removed line guards of 3 phase line.
- 403 Ferris St., change out 3 bad CTs on service pole.
- 300 S Oakridge Ave., truck hit power pole and damaged guy wire.
- 1614 Julia St., car hit pole and broke it, changed out pole.

During the month of July, the Electric Department responded the following outages:

07/1/2023 – Between 8:45 a.m. – 10:30 a.m., Lemon St., & Martin L. King Jr. Blvd., broken tree limb took out power line, 34 customers affected.

07/1/2023 – Between 12:00 p.m. – 1:00 p.m., 3383 CR 209, blown transformer fuse by squirrel, replaced fuse, 1 customer affected.

07/4/2023 – Between 11:30 a.m. – 2:00 a.m., 938 Hall Park Rd., blown transformer fuse by bird, 5 customers affected.

07/8/2023 – Between 2:00 p.m. – 5:00 p.m., 604 S. West St., blown transformer fuse, 8 customers affected.

07/9/2023 – Between 6:00 p.m. – 9:00 p.m., 1600 Elsie St., tree felt on service, 1 customer affected.

07/10/2023 – Between 8:00 a.m. – 2:00 p.m., 477 Houston St., bad transformer replaced, 1 customer affected.

07/11/2023 – Between 7:00 p.m. – 11:00 p.m., 1063 Bulkhead Rd., blown fuse by lightning, 1 customer affected.

07/13/2023 – Between 7:49 a.m. – 2:00 p.m., 4190 Hwy 17, replaced damaged transformer, 1 customer affected.

07/16/2023 – Between 5:00 p.m. – 5:35 p.m., 1361 River Rd., blown transformer fuse because of tree limb on wire, 15 customers affected.

07/22/2023 – Between 4:00 p.m. – 8:00 p.m., SE City of Green Cove Springs, tree on the lines and reclosers gone bad, 1500 customers affected.

07/27/2023 – Between 10:45 p.m. – 12:45 a.m., 227 Pringle Circle, tree on the line, 2 customers affected.

07/31/2023 – Between 8:00 a.m. – 9:30 a.m., 1112 Forbes St., tree came down on service, 1 customer affected.

Electric Utility Top Consumption Customers (kwh/meter) for July:

NAME	SERVICE ADDRESS	KWH	AMOUNT
St. Johns Landing	1408 N. Orange Ave.	443,230	\$ 47,918.84
Winn Dixie Stores, Inc	3260 Hwy. 17 N.	205,000	\$ 19,579.00
Kindred Health	801 Oak St.	180,000	\$ 16,891.00
Permabase Building Products	1767 Wildwood Rd	162,880	\$ 13,243.28
Tamko Roofing Products	914 Hall Park Rd.	153,920	\$ 12,517.52
BD Of County Commissioner	825 N. Orange Ave.	144,600	\$ 15,230.60
Clay County Court House	825 N. Orange Ave.	143,680	\$ 13,469.68
Clay County Jail	901 N. Orange Ave.	131,080	\$ 14,678.48
Garber Realty/GMC	3340 Highway 17	116,960	\$ 11,033.36
Governors Creek #436	803 Oak St.	104,800	\$ 10,544.80
Wen South LLC/Wendy's FL.	3266 Highway 17	98,960	\$ 9,677.36
City of Green Cove Springs	1277 Harbor Road	87,360	\$ 7,982.80
BD Of Public Instruction	2025 State Road 16	86,800	\$ 7,080.80
BD Of Public Instruction	801 Center St	81,280	\$ 8,034.48
Duval Asphalt Products, Inc.	1921 Jersey Ave	77,700	\$ 10,653.20
BD Of Public Instruction	1 N Oakridge Ave	71,760	\$ 7,494.56
City of Green Cove Springs	Set Street Lights	66,392	\$ 7,381.51
BD Of County Commissioner	477 Houston St (dmv)	52,640	\$ 5,837.04
VAC-CON	954 Hall Park Rd.	52,000	\$ 5,520.00
BD Of Public Instruction	608 Mill St	50,960	\$ 5,476.56
Race Trac Petroleum, Inc.	3106 Highway 17	50,000	\$ 4,786.80
Ammcon Corp.	1503 County Road 315 Ste 203	1 49,800	\$ 5,690.30
Coral Ridge Foods, Gc	1165 N Orange AVE	49,680	\$ 5,155.28
Direct TV/ AT&T Services, Inc.	512 Center St	48,480	\$ 4,779.28

Electric Utility Department Capital Projects:

Pole top switch replacement

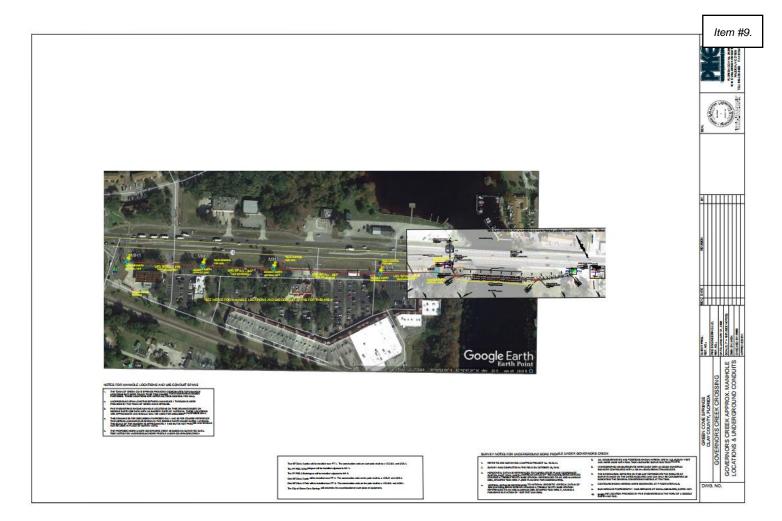
This project began 09-18-2019 with the installation of switches at Governors Creek for restoration plan if isolation of north feeder across Governors Creek Bridge during extreme emergencies. Project is now in the inspection and evaluation process involving Chapman 2 extension to Harbor Rd and load transfer of Chapman 1 to Chapman 2.

13kV to 23kv Conversion – US17 from Harbor Road to CR 315

Planning for this project has begun. This project will continue the Chapman 1 and Chapman 2 circuits north of Harbor Road to provide capacity and reliability for existing and future customers north of Governors Creek. Materials for this project are being funded by a DEO Grant. Materials have started arriving and we are installing the material as it arrives.

Governors Creek Hardening Project

This project will allow the overhead conductor crossing Governors Creek to be placed underground from Grove Street to Harbor Road. This project has been split into two phases: (1) design and permitting and (2) construction. It is being 75% funded by a FEMA HMGP grant. Phase 1 is complete. The project is now being evaluated by FDEM and FEMA funding for the construction phase. Once funding is in place and a contract is executed, bidding and construction should take approximately 9 months. This project will also support to extension of Chapman 1 and Chapman 2 circuits north of Governors Creek to provide additional capacity and reliability for all customers north of Governors Creek.



North and South Substation Improvements

North and South substation sub-station upgrades have begun with directional bore designs completed to install URD 23KV feeds to substation transformers eliminating the possibility of catastrophic failure in the event of lightning or material failure which could cause conductor to fall into existing bus work.



(904) 297-7500 FL 32043 Florida Relay – Dial 7-1-1 www.greencovesprings.com 321 Walnut Street

Green Cove Springs,

M E M O R A N D U M

To: Steve Kennedy, City Manager

From: Development Services Department

Date: August 15, 2023

Subject: Monthly Planning, Code Enforcement and Building Report for July, 2023

PLANNING

In July, one new business license was issued, and one was renewed:

1. Mystic Tanning Inc.

Total Business Tax Revenue for July was \$150.00.

During the month of July:

- Began or continued reviewing the following site development plans:
 - Knight Center Office Building on Orange Avenue
 - **Energy Cove Warehouse** on Energy Cove Avenue
 - Rookery Amenity Center
- Landscape Ordinance Revisions (ongoing)
- Completed 16 lien search requests, and 1 permit application.
- Approved 2 special events applications.
- Revenues for Planning related fees for July were \$4,197.00.

CODE ENFORCEMENT

In July, there were forty new enforcement complaints filed. Voluntary compliance was achieved for three of the cases resulting in case closure. For Fiscal Year 2022-2023, Code Enforcement has collected \$10,686.49 in Code Enforcement fines.

Month of July courtesy notice of violation/notice of violation.

- 3 of 40 courtesy notices of violation/notice of violation complied which led to 8% compliance.
- 1 of 22 notices of violation voluntary compliance was achieved resulting in case closure.

- 12 notices of violation from previous months compliance was achieved resulting in case closure
- 14 courtesy notices of violation from previous months compliance was achieved resulting in closure.
- Lien filed against property at 725 Cypress Ave. in the amount of 5,525.

BUILDING

Building permit activity decreased from June to July. The total number of building permits issued in June was 48 compared to 67 in June. Permit activity for July 2023 decreased by 30.43% from July 2022.

Revenues for Building related fees for July was \$7,570.90.

July 2023 PERMIT SUMMARY		
RESIDENTIAL NEW	0	
COMMERCIAL NEW	0	
RESIDENTIAL ADDITION	2	
COMMERCIAL ADDITION	1	
RESIDENTIAL REMODEL / IMPROVEMENT	3	
COMMERCIAL REMODEL / IMPROVEMENT	0	
DEMOLITION	0	
SIGNS	0	
POOLS	1	
RE-ROOFING	9	
FENCES	1	
MECHANICAL / ELECTRICAL / PLUMBING	26	
OTHER PERMITS	5	
TOTAL PERMITS ISSUED	48	

