

ORDINANCE NO. C-16-

AN ORDINANCE AMENDING THE UNIFIED LAND DEVELOPMENT REGULATIONS OF THE CITY OF FORT LAUDERDALE, FLORIDA, AMENDING SECTION 47-19.3, "BOAT SLIPS, DOCKS, BOAT DAVITS, HOISTS AND SIMILAR MOORING STRUCTURES" TO ESTABLISH CONSTRUCTION STANDARDS THAT ENSURE THAT SEAWALL AND SIMILAR STRUCTURES CONTRIBUTE TO COASTAL RESILIENCE AND MITIGATE THE EFFECTS OF TIDAL FLOODING AND SEA LEVEL RISE; PROVIDING FOR SEVERABILITY; REPEAL OF CONFLICTING ORDINANCE PROVISIONS; AND PROVIDING FOR AN EFFECTIVE DATE.

---

WHEREAS, Fort Lauderdale is located between two National Oceanographic and Atmospheric Administration (NOAA) tide gauges; one at Virginia Key and another at Lake Worth; and

WHEREAS, during the fall of 2015, southeast Florida experienced extreme high tides (King Tides) that substantially exceeded the predicted high tides; and

WHEREAS, during the September 2015 King Tide, the peak high tide elevation recorded at the Lake Worth station was 2.615 feet NAVD88 emphasizing the increasing risk of tidal flooding from seasonal high tides; and

WHEREAS, the City's Unified Land Development Regulations (ULDR), prior to adoption of this Ordinance set a maximum elevation limitation for seawalls or similar structures at 5.5 feet NGVD29 which equals 3.9 feet NAVD88; and

WHEREAS, a minimum seawall elevation will support the resilient City vision described in Fast Forward Fort Lauderdale 2035; and

WHEREAS, City staff has recommended that the current maximum allowable seawall elevation of 3.9 feet NAVD88 would provide significant protection from the predicted height of seasonal high tides and address projected sea level rise expected to occur within the 30-50 year lifespan of a seawall constructed after adoption of this Ordinance; and

WHEREAS, seawalls and similar structures contribute to coastal resilience when constructed in a manner that is substantially impermeable and meet a minimum height

CODING: Words, symbols, and letters ~~stricken~~ are deletions; words, symbols, and letters underlined are additions.

Exhibit \_\_

standard that effectively addresses existing tidal flooding and future sea level rise for the expected lifetime of the seawall or structure; and

WHEREAS, seawalls elevation requirements need to be set and the structures constructed in a manner that does not create drainage issues on the adjacent properties; and

WHEREAS, a minimum and maximum elevation standard for seawall construction should be set to reduce the potential for a substantial visual discontinuity with their neighbors; and

WHEREAS, currently, major repairs of the seawall may result in a significant investment without a resulting elevation in height; and

WHEREAS, seawalls with defects need to be repaired in a timely manner to reduce tidal flooding impacts on adjacent properties and public Rights-of-Way; and

WHEREAS, properties with low lying seawalls or lacking seawalls can be the source of tidal waters flooding adjacent properties or public Rights-of-Way; and

NOW, THEREFORE, BE IT ORDAINED BY THE CITY COMMISSION OF THE CITY OF FORT LAUDERDALE, FLORIDA:

SECTION 1. That Section 47-19.3, Boat slips, docks, boat davits, hoists and similar mooring structures, of the Unified Land Development Regulations (hereinafter referred to as "ULDR") of the City of Fort Lauderdale, Florida, to read as follows:

Sec. 47-19.3. - Boat slips, docks, boat davits, hoists and similar mooring structures.

(a) The following words when used in this section shall, for the purposes of this section, have the following meaning:

(1) Mooring device means a subset of mooring structures as defined herein including boat davits, hoists, boat lifts and similar devices that are erected on or adjacent to a seawall or dock and upon which a vessel can be moored. A mooring device does not include docks, slips, seawall or mooring pile.

CODING: Words, symbols, and letters ~~stricken~~ are deletions; words, symbols, and letters underlined are additions.

(2) Mooring structure means a dock, slip, seawall, boat davit, hoist, boat lift, mooring pile or a similar structure attached to land more or less permanently to which a vessel can be moored.

(3) NGVD 29 or the National Geodetic Vertical Datum of 1929 means the vertical control datum established for vertical control surveying in the United States of America by the General Adjustment of 1929. The datum is used to measure elevation or altitude above, and depression or depth below, mean sea level (MSL).

(4) NAVD88 or the North American Vertical Datum means the vertical control datum of orthometric height established for vertical control surveying in the United States of America based upon the General Adjustment of the North American Datum of 1988.

(5) Seawall means vertical or near vertical structures placed between an upland area and a waterway. For the purposes of Section 47-19.3(f), rip rap is not considered a seawall.

(6) Rip rap means a foundation of unconsolidated boulders, stone, concrete or similar materials placed on or near a shoreline to mitigate wave impacts and prevent erosion.

...

(f) The top surface of a boat slip, seawall or dock shall not exceed five and one half (5½) feet above NGVD 29, except when the adjacent property is higher than five and one half (5½) feet above the NGVD 29. When above NGVD 29, the top surface may be of the same elevation as the average grade of the upland property abutting the seawall or dock and properties abutting either side of the upland property. have a minimum elevation of 3.9 feet NAVD88 (see table). The elevation shall not exceed a maximum of the base flood elevation (BFE) as identified in the corresponding FEMA Flood Insurance Rate Map (FIRM) for the property, except as specifically set forth herein. For properties with a BFE of 4.0 feet NAVD88, the minimum seawall elevation shall meet 3.9 feet NAVD88 and the maximum seawall elevation shall be 5.0 feet NAVD88. For waterfront properties with a habitable finished floor elevation of less than 3.9 feet NAVD88, a seawall may be constructed at less than the stated minimum elevation if a waiver is granted by the City Engineer. For properties within an X zone, the minimum seawall elevation shall meet 3.9 feet NAVD88 and the maximum shall meet the definition of grade as determined by Section 47-2.2 (g)(1)(a). Property owners choosing to construct seawalls at less than 5.0 feet NAVD88 are strongly encouraged to have the foundation designed to accommodate a future seawall height extension up to a minimum elevation of 5.0 feet NAVD88.

CODING: Words, symbols, and letters ~~stricken~~ are deletions; words, symbols, and letters underlined are additions.

<u>Property's FEMA Flood Insurance Rate Map Location</u>	<u>Minimum Allowable Seawall Elevation</u>	<u>Maximum Allowable Seawall Elevation</u>
<u>In a floodplain with a base flood elevation greater than or equal to 5.0 feet NAVD88</u>	<u>3.9 feet NAVD88</u>	<u>Base Flood elevation of the property</u>
<u>In a floodplain with a base flood elevation equal to 4.0 feet NAVD88</u>	<u>3.9 feet NAVD88</u>	<u>5 feet NAVD88</u>
<u>In an X zone, not in a floodplain</u>	<u>3.9 feet NAVD88</u>	<u>Meet the definition of grade as determined by Section 47-2.2 (g)(1)(a)</u>

(1) Seawalls must be designed and built in a substantially impermeable manner to prevent tidal waters from flowing through the seawall while still allowing for the release of hydrostatic pressure from the upland direction.

(2) Fixed docks may be constructed at an elevation less than the elevation of the adjacent seawall to which it is attached but shall not be constructed at an elevation more than 10 inches above the adjacent seawall's elevation. Floating docks shall be allowed and must be permitted and permanently attached to a marginal dock, finger pier, mooring pilings, or seawall.

(3) Seawalls improvements constituting substantial repair at the time of permit application shall meet the minimum elevation and consider the design recommendations (see 47-19.3 (f)) of this section for the continuous seawall for the length of the property. For the purposes of this section, substantial repair threshold shall mean any improvement to a structure as defined in Section 47-3.6.B.3.

(4) All property owners must maintain their seawalls in good repair. A seawall is presumed to be in disrepair if it allows for upland erosion, transfer of material through the seawall or allows tidal waters to flow unimpeded through the seawall to adjacent properties or public Right-of-Way. Property owners failing to maintain their seawalls may be cited. The owner of the property on which the seawall is constructed is required to initiate a process, including but not limited to hiring a contractor or submitting a building permit, and be able to demonstrate progress toward repairing the cited defect within 60 days of receiving notice from the City and complete the repair within 365 days of citation. If the required repair meets the substantial

CODING: Words, symbols, and letters ~~stricken~~ are deletions; words, symbols, and letters underlined are additions.

repair threshold, the property owner shall design, permit, and construct the seawall to meet the minimum elevation requirement and design requirement (see 47-19.3 (f)) within 365 days of citation.

(5) Property owners with seawalls below the minimum elevation, or permeable erosion barriers such as rip rap, or a land/water interface of another nature shall not allow tidal waters entering their property to impact adjacent properties or public Rights-of-Way. Property owners failing to prevent tidal waters from flowing overland and leaving their property may be cited. The owner of the property is required to initiate a process, including but not limited to, hiring a contractor or submitting a building permit, and be able to demonstrate progress toward addressing the cited concern within 60 days of receiving notice from the City and complete the proposed remedy within 365 days of citation.

SECTION 2. That if any clause, section or other part of this Ordinance shall be held invalid or unconstitutional by any court of competent jurisdiction, the remainder of this Ordinance shall not be affected thereby, but shall remain in full force and effect.

SECTION 3. That all ordinances or parts of ordinances in conflict herewith, be and the same are hereby repealed.

SECTION 4. That this Ordinance shall be in full force and effect ten days from the date of final passage.

PASSED FIRST READING this the \_\_\_\_\_ day of \_\_\_\_\_, 2016.  
PASSED SECOND READING this the \_\_\_\_\_ day of \_\_\_\_\_, 2016.

\_\_\_\_\_  
Mayor  
JOHN P. "JACK" SEILER

ATTEST:

---

City Clerk  
JEFFREY A. MODARELLI

\\cty-cityatto\docs\Seawall Ordinance - Amending ULDR 47-19.3\ORD\Draft Ordinance (clean copy).docx  
E:\Recovered\rbd\_office\2016\ULDR\Seawall\REVISED Proposed Seawall Ordainnce ULDR 47-19 3 05172016 clean