

**CHAPTER 62-302**  
**SURFACE WATER QUALITY STANDARDS**

**62-302.200 Definitions.**

(1) "Acute Toxicity" shall mean a concentration greater than one-third (1/3) of the amount lethal to 50% of the test organisms in 96 hours (96 hr LC<sub>50</sub>) for a species protective of the indigenous aquatic community for a substance not identified in paragraph 62-302.500(1)(c), F.A.C., or for mixtures of substances, including effluents.

(2) "Annual Average Flow" is the long-term harmonic mean flow of the receiving water, or an equivalent flow based on generally accepted scientific procedures in waters for which such a mean cannot be calculated. For waters for which flow records have been kept for at least the last three years, "long-term" shall mean the period of record. For all other waters, "long-term" shall mean three years (unless the Department finds the data from that period not representative of present flow conditions, based on evidence of land use or other changes affecting the flow) or the period of records sufficient to show a variation of flow of at least three orders of magnitude, whichever period is less. For nontidal portions of rivers and streams, the harmonic mean (Q<sub>hm</sub>) shall be calculated as

$$Q_{hm} = \frac{n}{\frac{1}{Q_1} + \frac{1}{Q_2} + \frac{1}{Q_3} + \frac{1}{Q_4} + \dots + \frac{1}{Q_n}},$$

in which each Q is an individual flow record and n is the total number of records. In lakes and reservoirs, the annual average flow shall be based on the hydraulic residence time, which shall be calculated according to generally accepted scientific procedures, using the harmonic mean flows for the inflow sources. In tidal estuaries and coastal systems or tidal portions of rivers and streams, the annual average flow shall be determined using methods described in EPA publication no. 600/6-85/002b pages 142 - 227, incorporated by reference in 62-4.246(9)(k), or by other generally accepted scientific procedures, using the harmonic mean flow for any freshwater inflow. If there are insufficient data to determine the harmonic mean then the harmonic mean shall be estimated by methods as set forth in the EPA publication Technical Support Document for Water Quality-Based Toxics Control (March 1991), incorporated by reference in 62-4.246(9)(d), or other generally accepted scientific procedures. In situations with seasonably variable effluent discharge rates, hold-and-release treatment systems, and effluent-dominated sites, annual average flow shall mean modeling techniques that calculate long-term average daily concentrations from long-term individual daily flows and concentrations in accordance with generally accepted scientific procedures.

(3) "Background" shall mean the condition of waters in the absence of the activity or discharge under consideration, based on the best scientific information available to the Department.

(4) "Biological Health Assessment" shall mean an aquatic community-based biological evaluation consisting of one of the following procedures: Stream Condition Index, BioRecon, Lake Vegetation Index, or Shannon-Weaver Diversity Index.

(5) "BioRecon" shall mean a biological health assessment that measures stream health in predominantly fresh waters using benthic macroinvertebrates sampled via four sweeps of a D-frame dipnet and identification of the collected organisms to the lowest practical taxonomic level, performed and calculated using the methodologies, dated - -08, in DEP-SOP-001/01 LT 7100, DEP-SOP-001/01 LQ 7400 and DEP-SOP-001/01 FS 7410, which are incorporated by reference herein.

(6) (4) "Chronic Toxicity"

(a) For a substance without an aquatic life-based criterion in Rule 62-302.530, F.A.C., and where chronic toxicity studies evaluating the toxicity of the substance are available, or for mixtures of substances, including effluents, chronic toxicity shall mean the concentration that equals or exceeds the IC<sub>25</sub> on species protective of the indigenous aquatic community; or

(b) For a substance without an aquatic life-based criterion in Rule 62-302.530, F.A.C., and where chronic toxicity studies evaluating the toxicity of the substance on species protective of the indigenous aquatic community are not available, the chronic toxicity of a substance shall be established as a concentration greater than one-twentieth (1/20) of the amount lethal to 50% of the test organisms in 96 hours (96 hr LC<sub>50</sub>) for a species protective of the indigenous aquatic community.

(7) (5) "Commission" shall mean the Environmental Regulation Commission.

(8) (6) "Compensation Point for Photosynthetic Activity for Phytoplankton" shall mean the depth within the water column at which one percent of the light intensity at the surface Photosynthetically Active Radiation remains unabsorbed. The light intensities at the surface and subsurface shall be measured simultaneously by irradiance meters that measure the total irradiance of light between 400 and 700 nm, such as a Li-Cor Underwater Quantum Sensor (Model No. LI 192), the Kahlsico Underwater Irradiometer (Model No. 268 WA 310), or other device having a comparable spectral response that captures downwelling light.

(9) (7) "Department" shall mean the Department of Environmental Protection.

(10) (8) "Designated Use" shall mean the present and future most beneficial use of a body of water as designated by the Environmental Regulation Commission by means of the classification system contained in this Chapter.

(11) (9) "Dissolved Metal" shall mean the metal fraction that passes through a 0.45 micron filter.

(12) (10) "Effluent Limitation" shall mean any restriction established by the Department on quantities, rates or concentrations of chemical, physical, biological or other constituents which are discharged from sources into waters of the State.

(13) (11) "Exceptional Ecological Significance" shall mean that a water body is a part of an ecosystem of unusual value. The exceptional significance may be in unusual species, productivity, diversity, ecological relationships, ambient water quality, scientific or educational interest, or in other aspects of the ecosystem's setting or processes.

(14) (12) "Exceptional Recreational Significance" shall mean unusual value as a resource for outdoor recreation activities. Outdoor recreation activities include, but are not limited to, fishing, boating, canoeing, water skiing, swimming, scuba diving, or nature observation. The exceptional significance may be in the intensity of present recreational usage, in an unusual quality of recreational experience, or in the potential for unusual future recreational use or experience.

~~(15)~~ ~~(13)~~ "Existing Uses" shall mean any actual beneficial use of the water body on or after November 28, 1975.

~~(16)~~ ~~(14)~~ "IC<sub>25</sub>" or "Inhibition Concentration 25%" shall mean the concentration of toxicant that causes a 25% reduction in a biological response such as biomass, growth, fecundity, or reproduction in the test population when compared to the control population response.

~~(17)~~ "Lake Vegetation Index (LVI)" shall mean a biological health assessment that measures lake (> 2 acres of open water) health in predominantly fresh waters using aquatic plants identified to the lowest practical taxonomic level, performed and calculated using the methodologies, dated - -08, in DEP-SOP-001/01 LT 7500, DEP-SOP-001/01 LQ 7300 and DEP-SOP-001/01 FS 7310, which are incorporated by reference herein.

~~(18)~~ ~~(15)~~ "Man-induced conditions which cannot be controlled or abated" shall mean conditions that have been influenced by human activities, and

(a) would remain after removal of all point sources,

(b) would remain after imposition of best management practices for non-point sources, and

(c) cannot be restored or abated by physical alteration of the water body, or there is no reasonable relationship between the economic, social and environmental costs and the benefits of restoration or physical alteration.

~~(19)~~ ~~(16)~~ "Natural Background" shall mean the condition of waters in the absence of man-induced alterations based on the best scientific information available to the Department. The establishment of natural background for an altered waterbody may be based upon a similar unaltered waterbody or on historical pre-alteration data.

~~(20)~~ ~~(17)~~ "Nuisance Species" shall mean species of flora or fauna whose noxious characteristics or presence in sufficient number, biomass, or areal extent may reasonably be expected to prevent, or unreasonably interfere with, a designated use of those waters.

~~(21)~~ ~~(18)~~ "Nursery Area of Indigenous Aquatic Life" shall mean any bed of the following aquatic plants, either in monoculture or mixed: Halodule wrightii, Halophila spp., Potamogeton spp. (pondweed), Ruppia maritima (widgeon-grass), Sagittaria spp. (arrowhead), Syringodium filiforme (manatee-grass), Thalassia testudinum (turtle grass), or Vallisneria spp. (eel-grass), or any area used by the early-life stages, larvae and post-larvae, of aquatic life during the period of rapid growth and development into the juvenile states.

~~(22)~~ ~~(19)~~ "Outstanding Florida Waters" shall mean waters designated by the Environmental Regulation Commission as worthy of special protection because of their natural attributes.

~~(23)~~ ~~(20)~~ "Outstanding National Resource Waters" shall mean waters designated by the Environmental Regulation Commission that are of such exceptional recreational or ecological significance that water quality should be maintained and protected under all circumstances, other than temporary lowering and the lowering allowed under Section 316 of the Federal Clean Water Act.

~~(24)~~ "Photosynthetically Active Radiation (PAR)" shall mean the wavelengths of light between 400 and 700 nm used by plants in the process of photosynthesis. The light intensities at the surface and subsurface shall be measured simultaneously using a

Li-Cor Underwater Quantum Sensor (Model No. LI 192), Kahlsico Underwater Irradiameter (Model No. 268 WA 310), or other device having a comparable spectral response that captures downwelling light.

(25) (24) "Pollution" shall mean the presence in the outdoor atmosphere or waters of the state of any substances, contaminants, noise, or man-made or man-induced alteration of the chemical, physical, biological or radiological integrity of air or water in quantities or levels which are or may be potentially harmful or injurious to human health or welfare, animal or plant life, or property, including outdoor recreation.

(26) (22) "Predominantly Fresh Waters" shall mean surface waters in which the chloride concentration at the surface is less than 1,500 milligrams per liter or specific conductance is less than 4580  $\mu$ mho/cm. Measurements for making this determination shall be taken within the bottom half of the water column.

(27) (23) "Predominantly Marine Waters" shall mean surface waters in which the chloride concentration at the surface is greater than or equal to 1,500 milligrams per liter or specific conductance is greater than or equal to 4580  $\mu$ mho/cm. Measurements for making this determination shall be taken within the bottom half of the water column.

(28) (24) "Propagation" shall mean reproduction sufficient to maintain the species' role in its respective ecological community.

(29) (25) "Secretary" shall mean the Secretary of the Department of Environmental Protection.

(30) (26) "Shannon-Weaver Diversity Index" shall mean: negative summation (from  $i=1$  to  $s$ ) of  $(n_i/N) \log_2 (n_i/N)$  where  $s$  is the number of species in a sample,  $N$  is the total number of individuals in a sample, and  $n_i$  is the total number of individuals in species  $i$ .

(31) "South Florida Coastal Plain Ecoregion" shall mean that portion of the Florida Peninsula included within Ecoregion 76 as depicted in Griffith, G.E., Omernik, J.M, Rohm, C.W., and Pierson, S.M. 1994. Florida Regionalization Project. United States Environmental Protection Agency, National Health and Environmental Effects Laboratory, Corvallis, OR. EPA/600/Q-95/002.

(32) (27) "Special Waters" shall mean water bodies designated in accordance with Section 62-302.700, F.A.C., by the Environmental Regulation Commission for inclusion in the Special Waters Category of Outstanding Florida Waters, as contained in Section 62-302.700, F.A.C. A Special Water may include all or part of any water body.

(33) "Stream Condition Index (SCI)" shall mean a biological health assessment that measures stream health in predominantly fresh waters using benthic macroinvertebrates sampled via 20 sweeps of a D-frame dipnet and identification of the collected organisms to the lowest practical taxonomic level, performed and calculated using the methodologies, dated - -08, in DEP-SOP-001/01 LT 7200, DEP-SOP-001/01 LQ 7400 and DEP-SOP-001/01 FS 7420, which are incorporated by reference herein.

(34) (28) "Surface Water" means water upon the surface of the earth, whether contained in bounds created naturally or artificially or diffused. Water from natural springs shall be classified as surface water when it exits from the spring onto the earth's surface.

(35) (29) "Total Recoverable Metal" shall mean the concentration of metal in an unfiltered sample following treatment with hot dilute mineral acid.

~~(36)~~ ~~(30)~~ "Water quality criteria" shall mean elements of State water quality standards, expressed as constituent concentrations, levels, or narrative statements, representing a quality of water that supports the present and future most beneficial uses.

~~(37)~~ ~~(34)~~ "Water quality standards" shall mean standards composed of designated present and future most beneficial uses (classification of waters), the numerical and narrative criteria applied to the specific water uses or classification, the Florida antidegradation policy, and the moderating provisions contained in this Rule and in F.A.C. Rule 62-4, adopted pursuant to Chapter 403, F.S.

~~(38)~~ ~~(32)~~ "Waters" shall be as defined in Section 403.031(13), Florida Statutes.

~~(39)~~ ~~(33)~~ "Zone of Mixing" or "Mixing Zone" shall mean a volume of surface water containing the point or area of discharge and within which an opportunity for the mixture of wastes with receiving surface waters has been afforded.

Specific Authority 403.061, 403.062, 403.087, 403.504, 403.704, 403.804, 403.805 FS. Law Implemented 403.021, 403.031, 403.061, 403.085, 403.086, 403.087, 403.088, 403.502, 403.802 FS. History - New 05-29-90, Amended 2-13-92, Formerly 17-302.200, Amended 1-23-95, 5-15-02, 4-2-08, ~~- -08~~.

#### **62-302.400 Classification of Surface Waters, Usage, Reclassification, Classified Waters.**

(1) All surface waters of the State have been classified according to designated uses as follows:

- CLASS I Potable Water Supplies
- CLASS II Shellfish Propagation or Harvesting
- CLASS III Recreation, Propagation and Maintenance of a Healthy, Well-Balanced Population of Fish and Wildlife
- CLASS IV Agricultural Water Supplies
- CLASS V Navigation, Utility and Industrial Use

(2) Classification of a water body according to a particular designated use or uses does not preclude use of the water for other purposes.

(3) The specific water quality criteria corresponding to each surface water classification are listed in Rules 62-302.500 and 62-302.530, F.A.C.

(4) Water quality classifications are arranged in order of the degree of protection required, with Class I water having generally the most stringent water quality criteria and Class V the least. However, Class I, II, and III surface waters share water quality criteria established to protect recreation and the propagation and maintenance of a healthy, well-balanced population of fish and wildlife.

(5) Criteria applicable to a classification are designed to maintain the minimum conditions necessary to assure the suitability of water for the designated use of the classification. In addition, applicable criteria are generally adequate to maintain minimum conditions required for the designated uses of less stringently regulated classifications. Therefore, unless clearly inconsistent with the criteria applicable, the designated uses of less stringently regulated classifications shall be deemed to be included within the designated uses of more stringently regulated classifications.

(6) Any person regulated by the Department or having a substantial interest in this Chapter may seek reclassification of waters of the State by filing a petition with the Secretary in the form required by **Chapter 120 Section 120.57**, F.S.

(7) A petition for reclassification shall reference and be accompanied by the information necessary to support the affirmative finding required in this Section to support the proposed reclassification.

(8) All reclassifications of waters of the State shall be adopted, after public notice and public hearing, only upon an affirmative finding by the Environmental Regulation Commission that:

(a) The proposed reclassification will establish the present and future most beneficial use of the waters; and

(b) Such a reclassification is clearly in the public interest.

(9) Reclassification of waters of the State which establishes more stringent criteria than presently established by this Chapter shall be adopted, only upon additional affirmative finding by the Environmental Regulation Commission that the proposed designated use is attainable, upon consideration of environmental, technological, social, economic, and institutional factors.

(10) The surface waters of the State of Florida are classified as Class III - Recreation, Propagation and Maintenance of a Healthy, Well-Balanced Population of Fish and Wildlife, except for certain waters which are described in this Rule 62-302.400(12). A water body may be designated as an Outstanding Florida Water or an Outstanding National Resource Water in addition to being classified as Class I, Class II, or Class III. A water body may also have special standards applied to it. Outstanding Florida Waters and Outstanding National Resource Waters are listed in Rule 62-302.700, F.A.C.

(11) Unless otherwise specified, the following shall apply:

(a) The landward extent of a classification shall coincide with the landward extent of waters of the state, as defined in Rule 62-340.600, F.A.C.

(b) Water quality classifications shall be interpreted to include associated water bodies such as tidal creeks, coves, bays and bayous.

**(c) The boundaries of Class II waters shall be limited to "Predominantly Marine Waters" as defined in subsection 62-302.200(27), F.A.C.**

(12) Exceptions to Class III:

(a) All secondary and tertiary canals wholly within agricultural areas are classified as Class IV and are not individually listed as exceptions to Class III.

"Secondary and tertiary canals" shall mean any wholly artificial canal or ditch which is behind a control structure and which is part of a water control system that is connected to the works (set forth in Section 373.086, F.S.) of a water management district created under Section 373.069, F.S., and that is permitted by such water management district pursuant to Section 373.103, Section 373.413, or Section 373.416, F.S. Agricultural areas shall generally include lands actively used solely for the production of food and fiber which are zoned for agricultural use where county zoning is in effect. Agricultural areas exclude lands which are platted and subdivided or in a transition phase to residential use;

(b) The following listed water bodies are classified as Class I, Class II, or Class V:

1. through 67. No change.

Specific Authority 403.061, 403.062, 403.087, 403.088, 403.504, 403.704, 403.804 FS. Law Implemented 403.021, 403.061, 403.087, 403.088, 403.141, 403.161, 403.182, 403.502, 403.504, 403.702, 403.708 FS. History - Formerly 28-5.06, 17-3.06, Amended and Renumbered 3-1-79, Amended 1-1-83, 2-1-83, Formerly 17-3.081, Amended 4-25-93, Formerly 17-302.400, Amended 12-26-96, 8-24-00, 12-7-06, ~~- -08~~.

**62-302.500 Surface Waters: Minimum Criteria, General Criteria, Biological Health.**

(1) Minimum Criteria.

All surface waters of the State shall at all places and at all times be free from:

(a) Domestic, industrial, agricultural, or other man-induced non-thermal components of discharges which, alone or in combination with other substances or in combination with other components of discharges (whether thermal or non-thermal):

1. Settle to form putrescent deposits or otherwise create a nuisance; or
2. Float as debris, scum, oil, or other matter in such amounts as to form nuisances; or
3. Produce color, odor, taste, turbidity, or other conditions in such degree as to create a nuisance; or
4. Are acutely toxic; or
5. Are present in concentrations which are carcinogenic, mutagenic, or teratogenic to human beings or to significant, locally occurring, wildlife or aquatic species, unless specific standards are established for such components in Rules 62-302.500(2) or 62-302.530; or
6. Pose a serious danger to the public health, safety, or welfare.

(b) Thermal components of discharges which, alone, or in combination with other discharges or components of discharges (whether thermal or non-thermal):

1. Produce conditions so as to create a nuisance; or
2. Do not comply with applicable provisions of Rule 62-302.520, F.A.C.

(c) Silver in concentrations above 2.3 micrograms/liter in predominately marine waters.

(2) General Criteria.

(a) The criteria of surface water quality provided in Rules 62-302.500(2) and 62-302.530 shall apply to all surface waters outside zones of mixing except:

1. Where inconsistent with the limitations of Section 403.061(7), F.S.; or,
2. Where relief from such criteria has been granted pursuant to other applicable rules of the Department.

(b) The Department may establish a Technical Advisory Committee on request or on its own initiative, to review and advise the Department about the sufficiency and validity of data or methodologies and the need for revision of numerical surface water quality criteria established in this rule chapter. The committee shall be appointed by the Secretary and consist of professionals knowledgeable about the specific criteria to be reviewed. The committee shall be chaired by a representative of the Department and shall meet at the call of the chair. Any findings, conclusions, or

recommendations of the committee shall be conveyed to the Secretary and to the chair of the Commission but shall not bind the Department.

(c) Effluent limits may be established for pollutants for which analytical detection limits are higher than the established water quality criteria based upon computation of concentrations in the receiving waters. Effluent limits will be established on site-specific conditions in the context of a Department permit. Monitoring reports and permit applications shall specify the detection limits and indicate non-detectable results in such cases. Unless otherwise specified, such non-detectable results shall be accepted as demonstrating compliance for that pollutant as long as specified effluent limits are met.

(d) Criteria for metals in Rules 62-302.530 and 62-302.500(1)(c), F.A.C., are measured as total recoverable metal. However, cadmium, chromium, copper, lead, nickel, silver, and zinc may be applied as dissolved metals when, as part of a permit application, a dissolved metals translator has been established according to the procedures described in the document, "Guidance for Establishing a Metals Translator", Florida Department of Environmental Protection December 17, 2001.

(e) A violation of any surface water quality criterion as set forth in this chapter constitutes pollution. For certain pollutants, numeric criteria have been established to protect human health from an unacceptable risk of additional cancer caused by the consumption of water or aquatic organisms. These numeric criteria are based on annual average flow conditions. However, this allowable annual average does not relieve any activity from complying with Rules 62-302.500(1), 62-302.530, or any other provision of water quality standards.

(f) Notwithstanding the specific numerical criteria applicable to individual classes of water, dissolved oxygen levels that are attributable to natural background conditions or man-induced conditions which cannot be controlled or abated may be established as alternative dissolved oxygen criteria for a water body or portion of a water body. Alternative dissolved oxygen criteria may be established by the Secretary or a Director of District Management in conjunction with the issuance of a permit or other Department action only after public notice and opportunity for public hearing. The determination of alternative criteria shall be based on consideration of the factors described in Rule 62-302.800(1)(a)1.-4., F.A.C. Alternative criteria shall not result in a lowering of dissolved oxygen levels in the water body, water body segment or any adjacent waters, and shall not violate the minimum criteria specified in Rule 62-302.500(1), F.A.C. Daily and seasonal fluctuations in dissolved oxygen levels shall be maintained.

(g) In order to protect spring systems from nutrient over-enrichment, nitrate-nitrite ( $\text{NO}_3\text{-NO}_2$ ) shall not exceed 0.3 mg/L as a monthly average at the spring vent or boil.

(3) Biological Health.

(a) Biological health assessment categories for BioRecon, Lake Vegetation Index, and Stream Condition Index shall be defined as follows:

	Category I	Category II	Category III
1. BioRecon	$\geq 7$	4-6	$\leq 3$
2. LVI	$\geq 78$	38-77	$\leq 37$
3. SCI	$\geq 68$	35-67	$\leq 34$

(b) To qualify as temporally independent samples, each biological health assessment shall be conducted at least three months apart. Biological health assessments collected at the same location less than three months apart shall be considered to be one sample, with the mean value used to represent the sampling period.

(c) The "historic maximum value" shall be the highest mean of any three consecutive, temporally independent Stream Condition Index (SCI) scores or Lake Vegetation Index (LVI) scores that are collected prior to the two most recent samples being considered for compliance with this provision.

(d) Biological health is not maintained if one or more of the following occurs:

1. Two consecutive, temporally independent biological health assessments score within Category III, as defined in paragraph 62-302.500(3)(a), F.A.C., unless there are two subsequent biological health assessment scores in Categories I or II. If the first failed biological health assessment was a BioRecon, then the second must be a Stream Condition Index.

2. The average of the two most recent temporally independent Stream Condition Index scores is 20 or more points below the historic maximum value, as defined in paragraph 62-302.500(3)(c), F.A.C.

3. The average of the two most recent temporally independent Lake Vegetation Index scores is 20 or more points below the historic maximum value, as defined in paragraph 62-302.500(3)(c), F.A.C.

4. The Shannon-Weaver Diversity Index for benthic macroinvertebrates is reduced to less than 75% of established background levels.

Specific Authority 403.061, 403.062, 403.087, 403.504, 403.704, 403.804 FS. Law Implemented 403.021, 403.061, 403.087, 403.088, 403.141, 403.161, 403.182, 403.502, 403.702, 403.708 FS. History - Formerly 28-5.02, 17-3.02, Amended 10-28-78, Amended and Renumbered 3-1-79, Amended 1-1-83, 10-4-89, Formerly 17-3.051, Amended 4-25-93, Formerly 17-302.500, Amended 1-15-96, 12-26-96, 5-15-02, 12-7-06, - -08.

#### **62-302.530 Table: Surface Water Quality Criteria.**

The following table contains both numeric and narrative surface water quality criteria to be applied except within zones of mixing. The left-hand column of the Table is a list of constituents for which a surface water criterion exists. The headings for the water quality classifications are found at the top of the Table. Applicable criteria lie within the Table. The individual criteria should be read in conjunction with other provisions in water quality standards, including Rule 62-302.500, F.A.C. The criteria contained in Rule 62-302.500, F.A.C., also apply to all waters unless alternative or more stringent criteria are

specified in Rule 62-302.530, F.A.C. Unless otherwise stated, all criteria express the maximum not to be exceeded at any time. In some cases, there are separate or additional limits, which apply independently of the maximum not to be exceeded at any time. For example, annual average (denoted as “annual avg.” in the Table) means the maximum concentration at average annual flow conditions (see subsection 62-302.200(2), F.A.C.). In applying the water quality standards, the Department shall take into account the variability occurring in nature and shall recognize the statistical variability inherent in sampling and testing procedures. The Department’s assessment methodology, set forth in Chapter 62-303, F.A.C., accounts for such natural and statistical variability when used to assess ambient waters pursuant to sections 305(b) and 303(d) of the Federal Clean Water Act.

(( INSERT TABLE ))

Specific Authority 403.061, 403.062, 403.087, 403.504, 403.704, 403.804 FS. Law Implemented 403.021, 403.061, 403.087, 403.088, 403.141, 403.161, 403.182, 403.502, 403.702, 403.708 FS. History—New 1-28-90, Formerly 17-3.065, Amended 2-13-92, 6-17-92, Formerly 17-302.540, 17-302.550, 17-302.560, 17-302.570, 17-302.580, Amended 4-25-93, Formerly 17-302.530, Amended 1-23-95, 1-15-96, 5-15-02, 7-19-04, 12-7-06, - -08.

#### **62-302.800 Site Specific Alternative Criteria.**

(1) Type I Site Specific Alternative Criteria: A water body, or portion thereof, may not meet a particular ambient water quality criterion specified for its classification, due to natural background conditions or man-induced conditions which cannot be controlled or abated. In such circumstances, and upon petition by an affected person or upon the initiation by the Department, the Secretary may establish a site specific alternative water quality criterion when an affirmative demonstration is made that an alternative criterion is more appropriate for a specified portion of waters of the state. Public notice and an opportunity for public hearing shall be provided prior to issuing any order establishing alternative criteria.

(a) The affirmative demonstration required by this section shall mean a documented showing that the proposed alternative criteria would exist due to natural background conditions or man-induced conditions which cannot be controlled or abated. Such demonstration shall be based upon relevant factors which include:

1. A description of the physical nature of the specified water body and the water pollution sources affecting the criterion to be altered.
2. A description of the historical and existing water quality of the parameter of concern including, spatial, seasonal, and diurnal variations, and other parameters or conditions which may affect it. Conditions in similar water bodies may be used for comparison.
3. A description of the historical and existing biology, including variations, which may be affected by the parameter of concern. Conditions in similar water bodies may be used for comparison.
4. A discussion of any impacts of the proposed alternative criteria on the designated use of the waters and adjoining waters.

(b) The Secretary shall specify, by order, the site specific criteria for the parameters which the Secretary determines to have been demonstrated by the preponderance of competent substantial evidence to be more appropriate.

(2) Type II Site Specific Alternative Criteria: In accordance with the procedures set forth below, affected persons may petition the Department to adopt an alternative water quality criterion for a specific water body, or portion thereof, on the basis of site-specific reasons other than those set forth above in subsection 62-302.800(1), F.A.C. The Department shall process any such petition as follows:

(a) No later than 60 days after receipt of a petition, the Department shall review the petition and notify the petitioner of whether the petition is sufficiently complete to enable the Department to evaluate the proposed site-specific alternative criterion under subparagraph (c) below. If the petition is not sufficiently complete, the Department shall request the submittal of additional information. The Department shall review any additional information within 60 days of receipt from the applicant and may then request only that information reasonably needed to clarify or answer new questions directly related to the additional information, unless the Department shows good cause for not having requested the information previously.

(b) Petitions deemed complete by the Department shall be processed under subparagraph (c). For any petition not deemed complete, if the petitioner believes that additional information requested by the Department under subparagraph (a) is not necessary to the Department's evaluation, the Department, at the petitioner's request, shall proceed to process the petition under subparagraph (c) below.

(c) The Department shall initiate rulemaking for the Commission to consider approval of the proposed alternative criterion as a rule if the petitioner meets all the requirements of this subparagraph and its subparts. The petitioner must demonstrate that the proposed criterion would fully maintain and protect human health, existing uses, and the level of water quality necessary to protect human health and existing and designated beneficial uses. If the petition fails to meet any of these requirements (including the required demonstration), the Department shall issue an order denying the petition. In deciding whether to initiate rulemaking or deny the petition, the Department shall evaluate the petition and other relevant information according to the following criteria and procedures:

1. The petition shall include all the information required under subparagraphs (1)(a)1.-4. above.

2. In making the demonstration required by this paragraph (c), the petition shall include an assessment of aquatic toxicity, except on a showing that no such assessment is relevant to the particular criterion. The assessment of aquatic toxicity shall show that physical and chemical conditions at the site alter the toxicity or bioavailability of the compound in question and shall meet the requirements and follow the Indicator Species procedure set forth in *Water Quality Standards Handbook* (December 1983), a publication of the United States Environmental Protection Agency, incorporated here by reference. If, however, the Indicator Species Procedure is not applicable to the proposed site-specific alternative criterion, the petitioner may propose another generally accepted scientific method or procedure to demonstrate with equal assurance that the alternative criterion will protect the aquatic life designated use of the water body.

3. The demonstration shall also include a risk assessment that determines the human exposure and health risk associated with the proposed alternative criterion, except on a showing that no such assessment is relevant to the particular criterion. The risk assessment shall include all factors and follow all procedures required by generally accepted scientific principles for such an assessment, such as analysis of existing water and sediment quality, potential transformation pathways, the chemical form of the compound in question, indigenous species, bioaccumulation and bioconcentration rates, and existing and potential rates of human consumption of fish, shellfish, and water. If the results of the assessments of health risks and aquatic toxicity differ, the more stringent result shall govern.

4. The demonstration shall include information indicating that one or more assumptions used in the risk assessment on which the existing criterion is based are inappropriate at the site in question and that the proposed assumptions are more appropriate or that physical or chemical characteristics of the site alter the toxicity or bioavailability of the compound. Such a variance of assumptions, however, shall not be a ground for a proposed alternative criterion unless the assumptions characterize a factor specific to the site, such as bioaccumulation rates, rather than a generic factor, such as the cancer potency and reference dose of the compound. Man-induced pollution that can be controlled or abated shall not be deemed a ground for a proposed alternative criterion.

5. The petition shall include all information required for the Department to complete its economic impact statement for the proposed criterion.

6. For any alternative criterion more stringent than the existing criterion, the petition shall include an analysis of the attainability of the alternative criterion.

7. No later than 180 days after receipt of a complete petition or after a petitioner requests processing of a petition not found to be complete, the Department shall notify the petitioner of its decision on the petition. The Department shall publish in the Florida Administrative Weekly either a notice of rulemaking for the proposed alternative criterion or a notice of the denial of the petition, as appropriate, within 30 days after notifying the petitioner of the decision. A denial of the petition shall become final within 14 days unless timely challenged under Section 120.57, F.S.

(d) The provisions of this subsection do not apply to criteria contained in Rule 62-302.500, F.A.C., or criteria that apply to:

1. Biological Health (paragraph 62-302.530(10)(a), F.A.C.) Integrity.
2. B.O.D. (subsection 62-302.530(11), F.A.C.).
3. Nutrients (subsection 62-302.530(47), F.A.C.).
4. Odor (subsections 62-302.500(1), 62-302.530(21), 62-302.530(48), 62-302.530(49)(b), and paragraph 62-302.530(52)(a), F.A.C.).
5. Oils and Greases (subsection 62-302.530(49), F.A.C.).
6. Radioactive Substances (subsection 62-302.530(57), F.A.C.).
7. Substances in concentrations that injure, are chronically toxic to, or produce adverse physiological or behavioral response in humans, animals, or plants (subsection 62-302.530(61), F.A.C.).
8. Substances in concentrations that result in the dominance of nuisance species (subsections 62-302.200(20) and 62-302.530(47), F.A.C.).
9. Total Dissolved Gases (subsection 62-302.530(66), F.A.C.).

10. Any criterion or maximum concentration based on or set forth in paragraph 62-4.244(3)(b), F.A.C.

(e) Despite any failure of the Department to meet a deadline set forth in this subsection (2), the grant of an alternative criterion shall not become effective unless approved as a rule by the Commission.

(f) Nothing in this rule shall alter the rights afforded to affected persons by Chapter 120, F.S.

(3) The Department shall modify permits of existing sources affected in a manner consistent with the Secretary's Order.

(4) Additional relief from criteria established by this Chapter may be provided through exemption pursuant to Rule 62-4.243, F.A.C., or variances as provided for by Rule 62-110.104, F.A.C.

(5) Site specific alternative criteria apply to the water bodies, or portions of the water bodies, listed below. For dissolved oxygen site specific alternative criteria, normal daily and seasonal fluctuations above the levels listed in the table below shall be maintained. For site specific alternative criteria with seasonal limits, the default criteria in Rule 62-302.530, F.A.C., apply at other times of the year.

Water Body and Class	Site Specific Alternative Criteria	County(s)
<u>(a) Amelia River segment between the northern mouth of the river and the A1A crossing. Class III.</u>	<u>Dissolved Oxygen of 3.2 mg/L as a minimum during low tide from July 1 through September 30, and not below 4.0 mg/L during all other conditions. The 24-hr. average shall be greater than or equal to 5.0 mg/L.</u>	<u>Nassau</u>
<u>(b) Crystal River Canal System (portions of the Main Channel, East and West Canals). Class III.</u>	<u>Dissolved Oxygen of 0.1 mg/L as a minimum.</u>	<u>Citrus</u>
<u>(c) Everglades Protection Area as defined in Section 373.4592(2)(i), F.S., and includes Water Conservation Areas 1, 2A, 2B, 3A, 3B, the Arthur R. Marshall National Wildlife Refuge, and</u>	<u>Dissolved Oxygen shall be evaluated based on an algorithm that uses sample collection time and water temperature to model the observed natural sinusoidal diel cycle and seasonal variability. This model provides a lower DO limit (DOL) for an individual monitoring station and is described by the equation:</u>  <u><math display="block">DOL_j = [- 3.70 - \{1.50 \cdot \text{sine} (2\pi/1440 \cdot t_j) - (0.30 \cdot \text{sine} [4\pi/1440 \cdot t_j])\} + 1/(0.0683 + 0.00198 \cdot C_j + 5.24 \cdot 10^{-6} \cdot C_j^2)] - 1.1</math></u>	<u>Palm Beach, Broward, Dade, Monroe</u>

Everglades National Park. Class III.	<p>Where:</p> <p><math>DOL_i</math> = lower limit for the <math>i^{th}</math> annual DO measurement in milligrams per liter (mg/L)</p> <p><math>t_i</math> = sample collection time in minutes (Eastern Standard Time) since midnight of the <math>i^{th}</math> annual DO measurement</p> <p><math>C_i</math> = water temperature associated with the <math>i^{th}</math> annual DO measurement in °C</p> <p>Compliance with the SSAC is assessed based on a comparison between the annual average measured DO concentration and the average of the corresponding DO limits specified by the above equation.</p>	
(d) Hillsboro Canal tributary, Belle Glade - canal receiving wastewater discharge from Sugar Cane Growers Cooperative Labor Camp #3 (NW corner Section 11, Range 37 East, Township 44 South, on NE side of Hillsboro Canal). Class IV.	Dissolved Oxygen of 2.6 mg/L annual average with 0.3 mg/L as a minimum.	Palm Beach
(e) Holmes Creek - from the confluence with Little Creek to the SR 277 Creek crossing. Class III.	Dissolved Oxygen of 4.0 mg/L as a minimum from June 1 through September 30.	Jackson, Holmes
(b) Discharge wetlands at the Orange County Eastern Water Reclamation Facility. Class III.	pH of not greater than 8.5 standard units.	Orange
(f) Myrtle Slough (in Sections 19, 29, 30, 31, & 32, Township 40 South, Range 24 East). Class III.	Dissolved Oxygen of 2.5 mg/L as a minimum from June 1 through September 30.	Charlotte

(g) Myrtle Slough between station 1, Township 40 South, Range 24 East, and station 3, Township 39 South, Range 24 East. Class III.	Dissolved Oxygen level at station 2 of 1.5 mg/L annual average with normal daily, seasonal and climatic fluctuations including natural excursions to a minimum of 0.1 mg/L.	Charlotte
(h) Orange County Eastern Water Reclamation Facility discharge wetlands. Class III.	pH of not greater than 8.5 standard units.	Orange
(i) Peace Creek Canal - South from SR 60 to the western section line of Section 15, Township 30 South, Range 27 East. Class III.	Dissolved Oxygen of 3.0 mg/L as a minimum.	Polk
(j) Spring Creek - headwater to River Mile 2.5. Class III.	Dissolved Oxygen of 2.5 mg/L as a minimum.	Taylor
(k) (a) St. Johns River (marine portions of the lower St. Johns River and its tributaries) between Julington Creek and the mouth of the river. Class III.	<p>Dissolved Oxygen not less than a minimum concentration of 4.0 mg/L, and a Total Fractional Exposure not greater than 1.0 over an annual evaluation period as defined by the following equation:</p> $\left( \text{Total Fractional Exposure} \right) = \frac{\text{Days between } 4.0 - < 4.2 \text{ mg/L}}{16 \text{ day Max}} + \frac{\text{Days between } 4.2 - < 4.4 \text{ mg/L}}{21 \text{ day Max}} + \frac{\text{Days between } 4.4 - < 4.6 \text{ mg/L}}{30 \text{ day Max}} + \frac{\text{Days between } 4.6 - < 4.8 \text{ mg/L}}{47 \text{ day Max}} + \frac{\text{Days between } 4.8 - < 5.0 \text{ mg/L}}{55 \text{ day Max}}$ <p>where the number of days in an interval is based on the daily average Dissolved Oxygen concentration.</p>	Duval/Clay/ St. Johns
(l) Turkey Creek – between Station 3, in Section 6 and County Road 121	Dissolved Oxygen of 3.3 mg/L as a minimum from May 1 through September 30.	Baker

<p>in Section 5, Township 3 South, Range 22 East, Macclenny. Class III.</p>		
<p>(m) Withlacoochee River (Northern) (River Mile 19-25). Class III.</p>	<p>Dissolved Oxygen of 4.0 mg/L as a minimum from June 1 through October 30.</p>	<p>Hamilton</p>

Specific Authority 403.061, 403.062, 403.087, 403.504, 403.704, 403.804, 403.805 FS.  
Law Implemented 403.021, 403.061, 403.087, 403.088, 403.141, 403.161, 403.201,  
403.502 FS. History—Formerly 17-3.05(4), Amended 3-1-79, 10-2-80, 2-1-83, Formerly  
17-3.031, Amended 6-17-92, Formerly 17-302.800, Amended 5-15-02, 1-9-06, 6-28-06,  
12-7-06, 8-5-07, - -08.