

## Notice of Proposed Rule

### **WATER MANAGEMENT DISTRICTS**

#### **Southwest Florida Water Management District**

RULE NO.: RULE TITLE:

40D-8.041 Minimum Flows

PURPOSE AND EFFECT: The purpose of this rulemaking is to revise minimum flows pursuant to Section 373.042, F.S., for the Lower Peace River, located in DeSoto and Charlotte Counties. The effect of the rule is to support the District's water supply planning, water use permitting, and environmental resource permitting programs.

SUMMARY: Section 373.042, F.S., requires the District to establish minimum flows and levels for water bodies located within the District's boundaries. This rulemaking is necessary to revise the established minimum flows for the Lower Peace River. The establishment and periodic evaluation of minimum flows is required by statute to ensure that the minimum hydrologic requirements of the water resources and ecology of the river and surrounding area are maintained. The establishment of minimum flows for the Rainbow River System are being developed using previously peer-reviewed, Governing Board adopted methods.

#### **SUMMARY OF STATEMENT OF ESTIMATED REGULATORY COSTS AND LEGISLATIVE RATIFICATION:**

The Agency has determined that this will not have an adverse impact on small business or likely increase directly or indirectly regulatory costs in excess of \$200,000 in the aggregate within one year after the implementation of the rule. A SERC has not been prepared by the Agency.

The Agency has determined that the proposed rule is not expected to require legislative ratification based on the statement of estimated regulatory costs or if no SERC is required, the information expressly relied upon and described herein: The District conducted an economic review of the revisions to the rule and determined that the impact or regulatory cost, if any, of the revisions will not exceed any one of the economic analysis criteria in a SERC as set forth in Section 120.541(2)(a), F.S. The revised minimum level for this river segment is unlikely to constitute an additional significant regulatory constraint on groundwater or surface water withdrawals in the area due to existing resource conditions and regulatory constraints in the basin.

Any person who wishes to provide information regarding a statement of estimated regulatory costs, or provide a proposal for a lower cost regulatory alternative must do so in writing within 21 days of this notice.

RULEMAKING AUTHORITY: 373.044, 373.113, 373.171, FS.

LAW IMPLEMENTED: 373.036, 373.042, 373.0421, FS.

IF REQUESTED WITHIN 21 DAYS OF THE DATE OF THIS NOTICE, A HEARING WILL BE SCHEDULED AND ANNOUNCED IN THE FAR.

THE PERSON TO BE CONTACTED REGARDING THE PROPOSED RULE IS: Doug Leeper, MFL Program Lead, SWFWMD, 2379 Broad Street, Brooksville, FL 34604, (352)796-7211, ext. 4272.

THE FULL TEXT OF THE PROPOSED RULE IS:

40D-8.041 Minimum Flows.

(1) through (7) No change.

(8) Minimum Flows for the lower Peace River.

(a) For purposes of this rule, the lower Peace River in DeSoto County, FL and Charlotte County, FL includes the watercourse from U.S. Geological Survey Peace River at SR 70 at Arcadia, FL Gage #02296750 to Charlotte Harbor. The Minimum Flows are to ensure that the minimum hydrologic requirements of the water resources or ecology of the natural systems associated with the estuarine reach of the lower Peace River are met.

(b) Minimum Flows for ~~the estuarine reach of~~ the lower Peace River are based on the sum of the daily average, combined, adjusted flows of the USGS Peace River near Arcadia, FL Gage ("Gage No. 02296750"), #02296750 plus the flow at the U.S. Geological Survey Joshua Creek at Nocatee, FL Gage ("Gage No. 02297100"), and the U.S. Geological Survey USGS-Horse Creek at SR 72 near Arcadia, FL Gage ("Gage No. 02297310") #02297310, and the USGS Joshua Creek at Nocatee Gage #02297100, as and are set forth in Table 8-20, below. Adjusted flow is defined as flow that would exist in the absence of withdrawal impacts. Minimum Flows for the lower Peace River

are both seasonal and flow dependent, and were developed based on the daily average, combined flow at Gage No. 02296750, Gage No. 02297100 and Gage No. 02297310 adjusted for withdrawals for the period of record from January 1, 1950 through December 31, 2018. There are seven flow dependent Minimum Flows. One standard, the Minimum Low Flow Threshold, is flow based and applied continuously regardless of season. No surface water withdrawals shall be permitted that would cumulatively cause the flow to be reduced below the Minimum Low Flow Threshold of 130 cfs based on the sum of the mean daily flows for the three gages listed above. Permitted Additionally, permitted withdrawals shall cease when the sum of the mean daily flows for the three gages denoted above is are below the Minimum Low Flow Threshold of 130 cfs. Also, the The total permitted maximum withdrawals on any day from the lower Peace River shall not exceed 400 cfs. There are also three seasonally dependent or Block specific Minimum Flows that are based on the sum of the mean daily flows for the three gages denoted above that would occur in the absence of any permitted upstream withdrawals. The Block Minimum Flows are based on potential changes in habitat availability for select salinity ranges within a season.

Table 8-20 Minimum Flow for Lower Peace River Based on the Combined (i.e., summed) Flows from the USGS Peace River at SR 70 at Arcadia, FL, Joshua Creek at Nocatee, FL, and Horse Creek at SR 72, near Arcadia, FL Gages Adjusted for Upstream Withdrawals	
<u>If Adjusted Combined Flow in cubic feet per second (cfs) on the previous Day is:</u>	<u>Minimum Flow is:</u>
<u>≤130 cfs</u>	<u>Combined flow on the previous day</u>
<u>&gt;130 cfs and ≤149 cfs</u>	<u>130 cfs</u>
<u>&gt;149 cfs and ≤ 297 cfs</u>	<u>87% of combined flow on the previous day</u>
<u>&gt; 297 cfs and ≤ 335 cfs</u>	<u>258 cfs</u>
<u>&gt; 335 cfs and ≤ 622 cfs</u>	<u>77% of combined flow on the previous day</u>
<u>&gt; 622 cfs and ≤ 798 cfs</u>	<u>479 cfs</u>
<u>&gt; 798 cfs</u>	<u>60% of combined flow on the previous day</u>

Table 8 20 Minimum Flow for Lower Peace River based on the sum of flows from Horse Creek, Joshua Creek, and the Peace River at Arcadia gages.			
Period	Effective Dates	Where Flow on Previous Day Equals:	Minimum Flow Is
Annually	January 1 through December 31	<div>_____ ≤130 cfs</div> <div>_____ &gt;130 cfs</div>	Actual flow (no surface water withdrawals permitted) Seasonally dependent—see Blocks below
Block 1	April 20 through June 25	<div>_____ ≤130 cfs</div> <div>_____ &gt;130 cfs</div>	Actual flow (no surface water withdrawals permitted) previous day's flow minus 16% but not less than 130 cfs
Block 2	October 28 through April 19	<div>_____ ≤130 cfs</div>	Actual flow (no surface water withdrawals permitted)

		$\frac{\text{Flow} - 130}{625 - 130} > 130 \text{ cfs and } < 625 \text{ cfs}$ $\frac{\text{Flow} - 625}{625 - 130} \geq 625 \text{ cfs}$	previous day's flow minus 16% but not less than 130 cfs previous day's flow minus 29%
Block 3	June 26 through October 27	$\frac{\text{Flow} - 130}{625 - 130} \leq 130 \text{ cfs}$ $\frac{\text{Flow} - 130}{625 - 130} > 130 \text{ cfs and } < 625 \text{ cfs}$ $\frac{\text{Flow} - 625}{625 - 130} \geq 625 \text{ cfs}$	Actual flow (no surface water withdrawals permitted) previous day's flow minus 16% but not less than 130 cfs previous day's flow minus 38%

(c) Status assessments of the Minimum Flows for the lower Peace River will be completed to determine whether the flow is below or projected to fall below the Minimum Flows. Each status assessment is independent from and not a determination of water use permit compliance or environmental resource permit compliance. Permit compliance is a regulatory function that is not within the scope of this subsection. As part of each status assessment, the District will use the following approach:

1. The District will evaluate the Minimum Flow annually to determine the extent to which the flow of the lower Peace River has been reduced due to withdrawals as of the date of each status assessment at Gage No. 02296750, Gage No. 02297100 and Gage No. 02297310. The annual evaluation will be completed through a review of:

- (a) Flow data;
- (b) Water withdrawals;
- (c) Aquifer water levels;
- (d) Rainfall data; and
- (e) Hydrologic modeling.

2. The District will also evaluate the Minimum Flows every five years as part of the regional water supply planning process. This evaluation will include the use of hydrologic modeling.

3. If the Minimum Flows are being met based on the annual evaluation or the evaluation performed as a part of the regional water supply planning process, then no further actions are required beyond continued monitoring.

(c) Minimum five year and ten year moving mean and median flow values are set forth in Table 8-20 as a tool to assess whether flows to the lower Peace River remain above flow rates that are expected to occur with implementation of the Minimum Flow described in Table 8-21 and a daily maximum withdrawal rate of 400 cfs. The means and medians are based on evaluation of daily flow records for the three gages listed above for the period 1951 through 2008. Yearly means and medians were computed for January 1 through December 31 of each year, then moving five year and ten year averages were calculated from these yearly values. Therefore, the five year and ten year means and medians are hydrologic statistics that represent the flows that will be met or exceeded if compliance with the Minimum Flow and the 400 cfs maximum withdrawal rate is maintained during hydrologic conditions similar to the 1951-2008 period. Climatic changes or future structural alterations in the watershed could potentially affect surface water or groundwater flow characteristics within the watershed and flows in the river. Therefore, as additional information relevant to Minimum Flows development becomes available, the District is committed to periodically evaluate whether any declines in these minimum moving average values below that expected with the application of the Minimum Flow are due to factors other than permitted water use.

(d) The Minimum Flows for the lower Peace River will be reevaluated to incorporate additional ecological data for the Lower Peace River within 5 years of adoption of this rule.

Table 8-21 Minimum Five Year and Ten Year Moving Mean and Median flows for the lower Peace River based on the sum of flows from Horse Creek, Joshua Creek, and the Peace River at Arcadia		
Minimum Flow	Hydrologic Statistic	Flow (cfs)
Annual Flow	10 Year Mean	713
	10 Year Median	327
	5 Year Mean	679
	5 Year Median	295

Table 8-21 Minimum Five Year and Ten Year Moving Mean and Median flows for the lower Peace River based on the sum of flows from Horse Creek, Joshua Creek, and the Peace River at Arcadia		
Minimum Flow	Hydrologic Statistic	Flow (cfs)
Block 1	10 Year Mean	284
	10 Year Median	264
	5 Year Mean	204
	5 Year Median	114
Block 2	10 Year Mean	429
	10 Year Median	383
	5 Year Mean	330
	5 Year Median	235
Block 3	10 Year Mean	1260
	10 Year Median	930
	5 Year Mean	980
	5 Year Median	595

(9) through (22), No change.

*Rulemaking Authority 373.044, 373.113, 373.171 FS. Law Implemented 373.036, 373.042, 373.0421 FS. History--New 10-5-74, Amended 12-31-74, Formerly 16J-0.15, 40D-1.601, Amended 10-1-84, 8-7-00, 2-6-06, 4-6-06, 1-1-07, 11-25-07, 2-18-08, 3-2-08, 5-12-08, 5-10-09, 3-23-10, 3-28-10, 7-12-10, 8-2-10 (8), 8-2-10 (15), 10-16-12, 3-20-13(16), 3-20-13(17), 6-20-16, 3-15-18, 6-19-18, 4-15-20, 8-9-20, \_\_\_\_.*

NAME OF PERSON ORIGINATING PROPOSED RULE: Southwest Florida Water Management District

NAME OF AGENCY HEAD WHO APPROVED THE PROPOSED RULE: Southwest Florida Water Management District Governing Board

DATE PROPOSED RULE APPROVED BY AGENCY HEAD: December 15, 2020

DATE NOTICE OF PROPOSED RULE DEVELOPMENT PUBLISHED IN FAR: February 1, 2021