

40D-80.075 Regulatory Portion of Recovery Strategy for the Dover/Plant City Water Use Caution Area.

(1) Background. From January 3-13, 2010, for the first time during the period that records have been kept, temperatures in eastern Hillsborough County and western Polk County dropped below 34 degrees for 11 consecutive days. As a result, area farmers pumped large quantities of groundwater to protect their crops. This combined pumping dropped the aquifer level 60 feet, contributed to the large number of sinkhole occurrences, and caused more than 750 neighboring groundwater wells to be damaged or to temporarily go dry. Although pumping groundwater for frost/freeze protection of crops is authorized by their water use permits, permittees are responsible for reversing the impacts to wells in their mitigation areas. The District developed a multi-faceted approach to address these issues that included a series of work sessions for invited guests and technical experts to review public input received and to provide feedback to assist District staff in developing recommended solutions. Additional staff efforts included the coordination of a multi-governmental task force to secure state and federal funding for sinkhole and other repairs, and development of recommendations for modifications to well construction, pump depth and pressure valve cutoff devices criteria and inspections. Staff, after considerable discussions and public input, developed a more equitable approach for assigning well mitigation responsibility for frost/freeze related events. In doing so the staff made further recommendations for limitations on additional groundwater use for frost/freeze protection, developing means to significantly increase the percentage of frost/freeze protection in the area accomplished by methods other than groundwater, enhancing communications with the public and permittees during a frost/freeze event, and expansion of permit and hydrologic data collection.

(2) Objectives of Recovery Strategy. The objective of the District's Recovery Strategy is to reduce groundwater withdrawals used for frost/freeze protection by 20% from January 2010 withdrawal quantities by January 2020. This reduction is intended to lessen the potential that drawdown during a future frost/freeze event would lower the aquifer level at District Well DV-1 Suwannee below 10 feet NGVD (1929).

(3) Recovery Strategy Mechanisms.

(a) The non-regulatory mechanisms include assistance in offsetting groundwater withdrawals for frost/freeze protection through the Facilitating Agricultural Resource Management Systems program, providing enhanced data for irrigation system management, and other means.

(b) The water use permitting rules in Chapter 40D-2, F.A.C., and the WUP Applicant's Handbook Part B, incorporated by reference in Rule 40D-2.091, F.A.C., in particular section 7.4, address groundwater withdrawal impacts, alternative water supplies, frost/freeze protection methods, and resource recovery. In combination, these rules along with the non-regulatory mechanisms are intended to result in recovery to the Minimum Aquifer Level.

(4) Periodic Review of Recovery Strategy. Progress toward achieving the Minimum Aquifer Level will be continuously evaluated, with a comprehensive assessment in 2015. This evaluation will include an assessment of the reduction in groundwater withdrawals used for frost/freeze protection in the Dover/Plant City WUCA and the resulting reduced impact on the Minimum Aquifer Level. If by January 2015 a 10% reduction in groundwater withdrawals for frost/freeze protection from January 2010 quantities has not been achieved, the Recovery Strategy will be reassessed. If by January 2020 a 20% reduction in groundwater withdrawals used for frost/freeze protection has not been achieved or if the Minimum Aquifer Level has not been achieved, the Recovery Strategy will be reassessed. Evaluation of these reduction goals will include the frost/freeze design event specified in the WUP Applicant's Handbook Part B, Section 3.9.4.2.2.

(5) The provisions of subsections 40D-80.075(1)-(4), F.A.C., are intended to provide an overview of resource conditions related to the water bodies for which a Minimum Aquifer Level has been established and the components of the Recovery Strategy. The provisions of the permitting rules in Chapter 40D-2 F.A.C., and the WUP Applicant's Handbook Part B shall control in the event of any conflict or inconsistency with the provisions of subsections 40D-80.075(1)-(4), F.A.C.

Rulemaking Authority 120.54, 373.0421, 373.044, 373.113, 373.171 FS. Law Implemented 373.016, 373.023, 373.036, 373.042, 373.0421, 373.171 FS. History—New 6-16-11, Amended 5-19-14.