The Florida Senate

BILL ANALYSIS AND FISCAL IMPACT STATEMENT

(This document is based on the provisions contained in the legislation as of the latest date listed below.)

Prepared By: The Professional Staff of the Committee on Environmental Preservation and Conservation

BILL:	CS/SB 510
INTRODUCER:	Environmental Preservation and Conservation Committee and Senator Garcia
SUBJECT:	Miami-Dade County Lake Belt Area
DATE:	March 25, 2015 REVISED:

	ANALYST	STAFF DIRECTOR	REFERENCE	ACTION
1.	Gudeman	Uchino	EP	**Fav/CS**
2.			CA	
3.			AGG	
4.			AP	

Please see Section IX. for Additional Information:

COMMITTEE SUBSTITUTE - Substantial Changes

I. Summary:

CS/SB 510 specifies that amendments to local zoning and subdivision regulations must be compatible with limestone mining activities. It prohibits amending zoning and subdivision regulations that increase residential density in the vicinity of mining activities. The bill allows the proceeds from mitigation funds to be used for water quality monitoring, incrementally reduces the mitigation fee, and directs proceeds from the mitigation fee to be used for additional mitigation projects instead of seepage mitigation projects. The bill also replaces the water treatment plant upgrade fee with a 5 cent per ton fee to be used for Miami-Dade County environmental programs. The proceeds from this fee are to be used for the water treatment plant upgrade if contamination is detected in the water supply as a result of mining activities. The bill repeals obsolete language, makes conforming changes, and reenacts provisions related to the Lake Belt Mitigation Trust Fund.

II. Present Situation:

The Miami-Dade Lake Belt Area

The Miami-Dade Lake Belt Area (Lake Belt) in northern Miami-Dade County is an 89 square mile site that has been actively mined since 1955. The region provides the largest source of high

quality limestone in Florida, supplying 35 to 40 million tons of rock annually.[1] The limestone mined from the Lake Belt area provides the base material needed for concrete, asphalt, and road construction.[2] The term "Lake Belt" originates from the lakes that are formed in the limestone excavation pits as groundwater fills the void. The mining activities in the Lake Belt area have created approximately 40 quarry lakes encompassing 9,100 acres.[3]

The Lake Belt area is an environmentally sensitive region as the majority of the area consists of wetlands that were once part of the historical Everglades watershed. The area also overlays the Biscayne aquifer, which is designated a sole source aquifer by the Environmental Protection Agency (EPA).[4] The EPA defines a "sole source aquifer" as, "an aquifer which is needed to supply 50 percent or more of the drinking water for a given aquifer service area for which there are no reasonably available alternative sources should the aquifer become contaminated."[5]

The Northwest Wellfield

The Miami-Dade Northwest Wellfield (NWWF) is located along the eastern edge of the Lake Belt area and has been in operation since 1984. The NWWF is comprised of 15 water supply wells that withdraw water from the Biscayne Aquifer and is classified as a public water supply in which the groundwater is not under the influence of surface water.[6] The NWWF is the major source of drinking water for Miami-Dade County, supplying approximately 40 percent of the county's requirements. The NWWF Protection Area, established by the Miami-Dade County Department of Environmental Resource Management (DERM), is the delineated zone of protection around the NWWF and minimizes the potential for contamination of the drinking water supply.[7]

Regulation of Mining Activities Within the Lake Belt Area

In 1978, the U.S. Army Corps of Engineers (Corps) assumed jurisdiction over the limestone mining activities under the Clean Water Act of 1972. In 1979, the Corps issued the first rock mining permits for the region and Miami-Dade County issued zoning approvals for the mining activities.[8]

In 1984, the Legislature passed the Warren S. Henderson Wetlands Act, which was the first law to specifically protect and preserve the ecological functions of wetlands. The law required state

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[1] Northwest Dade County Freshwater Lake Plan Implementation Committee, *Northwest Dade County Freshwater Lake Belt Plan, Making a Whole, Not Just Holes*, 1, 5 (1997), *available at* http://www.sfwmd.gov/portal/page/portal/xrepository/sfwmd_repository_pdf/phs1plan.pdf (last visited Mar. 22, 2015).
[2] Miami-Dade County Lake Belt Plan Implementation Committee, *Phase II Plan*, 7 (2001), *available at* http://www.sfwmd.gov/portal/page/portal/xrepository/sfwmd_repository_pdf/phs2plan.pdf (last visited Mar. 22, 2015).
[3] U.S. Army Corps of Engineers, *Draft Supplemental Environmental Impact Statement on Rock Mining in the Lake Belt Region of Miami-Dade County, FL*, 3–41 (2007) (on file with the Senate Committee on Environmental Preservation and Conservation).
[4] *Id*. at 3–39.
[5] EPA, *Appendix A, Sole Source Aquifer Definitions*, http://www.epa.gov/region02/water/aquifer/petition/app-a.htm (last visited Mar. 22, 2015).
[6] *Supra* note 2, at 5-7.
[7] *Supra* note 3, at 47.
[8] Wallace Roberts and Todd, LLC., *Lake Belt Phase II Plan Companion Documents*, 7 (2001), *available at* http://www.sfwmd.gov/portal/page/portal/xrepository/sfwmd_repository_pdf/comprops.pdf (last visited Mar. 22, 2015).

authorization for dredge and fill activities beyond what was required by the federal government under the Clean Water Act.[9] Although the Legislature recognized the importance of protecting wetlands with the passage of the act, it also recognized the economic significance of the limestone mines and provided an exemption from state permitting for mining activities in the Lake Belt for 10 years.[10] The exemption was subsequently extended to October 1, 1997,[11] then to October 1, 2000.[12]

In 1992, the Legislature created the Northwest Dade County Freshwater Lake Plan Implementation Committee. The committee was responsible for developing a plan to:

- Enhance the water supply for Miami-Dade County and the Everglades;
- Provide appropriate groundwater protection measures;
- Maximize the efficient recovery of limestone while promoting the social and economic welfare of the community and protecting the environment; and
- Educate the public on the benefits of the committee's plan. [13]

In 1997, the Legislature renamed the committee to the Miami-Dade County Lake Belt Plan Implementation Committee and adopted the "Dade County Lake Plan." The committee was tasked with developing a Phase II Plan to further address the compatible land uses, opportunities, and potential conflicts of the Lake Belt area, provide additional NWWF protection, provide protective measures to prevent the reclassification of the NWWF as groundwater under the direct influence of surface water (GWUDI),[14] secure additional funding sources, and consider the need to establish a land use authority.[15]

Section 373.41492, F.S., was created in 1999 to implement a comprehensive mitigation plan to offset the impact of mining activity in the region. The law required a mitigation fee of 5 cents per ton, increasing 2.1 percentage points, plus a cost growth index, each year after January 2001, for limestone and sand extracted and sold from the Lake Belt area. The proceeds from the mitigation fee were used to purchase, enhance, restore, and manage wetlands, as well as purchase mitigation credits from a permitted mitigation bank or to fund structural modifications to the existing drainage systems of the Lake Belt area. Mitigation funds were also authorized to reimburse funds provided from other sources used to purchase lands for mitigation.

In 2006, s. 373.41492, F.S., was amended to incrementally increase the mitigation fee to 12 cents per ton in January 2007, 18 cents per ton in January 2008, and 24 cents per ton in January 2009. A water treatment plant facility upgrade fee of 15 cents per ton, beginning January 2007, was

[9] Chapter 84-79, Laws of Fla.
[10] South Florida Water Management District, *The 1980s-Water Quality and Natural Systems*, https://www.swfwmd.state.fl.us/documents/publications/watermatters/oct-2011/4.html (last visited Mar. 22, 2015).
[11] Chapter 93-213, s. 30, Laws of Fla.
[12] Chapter 97-222, s. 5, Laws of Fla.
[13] Chapter 92-132, s. 21, Laws of Fla.
[14] "GWUDI" is defined in 40 CFR 141.2 as, "any water beneath the surface of the ground with significant occurrence of insects or other macrooganisms, algae, or large-diameter pathogens such as *Giardia lamblia* or *Cryptosporidium*, or significant and relatively rapid shifts in water characteristics such as turbidity, temperatures, conductivity, or pH, which closely correlate to climatological or surface water conditions. Direct influence must be determined for individual sources in accordance with criteria established by the State. The State determination of direct influence may be based on site-specific measurements of water quality and/or documentation of well construction characteristics and geology with field evaluation."
[15] Chapter 97-222, s. 10, Laws of Fla.

also established. The proceeds of the water treatment plant upgrade fee were to be used solely for the purpose of upgrading the water treatment plant that treats water from the NWWF. The law required the water treatment plant upgrade fee to be collected until the total amount necessary to design and construct the upgrade was achieved. Section 373.41492, F.S., was amended again in 2010 to increase the mitigation fee to 45 cents per ton starting in January 2011.

In 2012, s. 373.41492, F.S., was amended to allow proceeds from the water treatment plant upgrade fee to be used for seepage mitigation projects designed to improve wetland habitat. The law required that, beginning July 1, 2012, the proceeds of the water treatment plant upgrade fee be deposited into the Lake Belt Mitigation Trust Fund until it reached $20 million, or pathogen sampling demonstrated that the water in any quarry lake in the vicinity of the NWWF is in need of additional treatment as required by the EPA Long Term 2 Enhanced Surface Water Treatment Rule.[16] Once either of these qualifications is triggered, the proceeds are to be diverted back to Miami-Dade County to be used solely for the purpose of upgrading the water treatment plant that treats water from the NWWF. The law also allows the mitigation fees to be used for modifications to the hydrology of the Everglades watershed.

Northwest Wellfield Water Quality Monitoring

The permits issued by the Corps required a three year water quality monitoring program from 2002 to 2005 to ensure the water quality in the NWWF was not degraded as a result of the mining activities. The water quality monitoring program required by the Corps and the continuous monitoring conducted by DERM have revealed no incidences of contamination as a result of mining activities. Additionally, surface water quality data for the Lake Belt area collected by the EPA and DERM reveal that the water quality in the lakes is not expected to adversely impact water quality in the aquifer and provides suitable conditions for wildlife.[17]

Lake Belt Mitigation Projects

The Pennsuco Mitigation Area

The Pennsuco wetland is a 13,000 acre wetland located immediately west of the Lake Belt area. The South Florida Water Management District (SFWMD) began purchasing parcels in the wetland in 1995 for mitigation purposes. The land was offered by the SFWMD to permit applicants to make mitigation contributions for the acquisition, enhancement, and long-term management of the wetlands.[18] The Lake Belt area Phase I and Phase II plans identified the Pennsuco wetlands as the primary location for off-site mitigation.[19] Land acquisition costs have varied from $8,000 to $13,000 per acre. The cost per mitigation credit is $48,828, which is based on an average land price of $10,000 per acre. The mitigation fee has funded the restoration of

[16] 40 CFR 141-142.
[17] *Supra* note 3, at 68.
[18] SFWMD, *Mitigation Program, Regional Areas, Pennsuco Regional Mitigation Area*, 1, *available at* http://www.sfwmd.gov/portal/page/portal/xrepository/sfwmd_repository_pdf/pennsuco_overview.pdf (last visited Mar. 22, 2015).
[19] *Supra* note 2, at 20.

almost 8,000 acres in the Pennsuco wetland and the remaining available acreage only satisfies a portion of the Lake Belt mitigation requirements.[20]

Everglades National Park Seepage Management

The Everglades National Park (ENP) Seepage Management project is part of the Comprehensive Everglades Restoration Plan. The goal of the project is to restore wetland function in the ENP by reducing levee and groundwater seepage and increasing sheetflow.[21] The construction of phase I of the L-31 Seepage Management Project, which includes a two-mile seepage barrier to reduce groundwater flow out of the ENP, was completed in 2012 and cost $52,000 per mitigation credit. The remaining three miles, scheduled for completion in 2016, will enhance the wetland over a much larger area in the ENP, therefore the mitigation cost per credit was reduced to $22,400.[22]

C-139 Annex Project

The C-139 Annex project is a 15,000-acre project located in Hendry County, in the northern Everglades watershed. The project will restore a citrus grove to a transitional wet prairie, which is the native habitat for the area. The location provides greater ecological enhancement, according to Corps mitigation calculations, than what is required to offset the mining impacts in the Lake Belt area. The scale of the project, the degree of enhancement per acre, and the location of the restoration opportunity reduces the mitigation cost to $15,248 per credit.[23]

Environmentally Endangered Lands Program

Miami-Dade County's Environmentally Endangered Lands (EEL) Program was created in 1990 to protect and conserve endangered lands in Miami-Dade County. The program has purchased more than 20,700 acres of land and manages 2,800 acres of natural areas.[24]

III. Effect of Proposed Changes:

Section 1 amends s. 373.4149, F.S., to require amendments to local zoning and subdivision regulations located within one mile of the Lake Belt area be compatible with limestone mining activities. The bill prohibits amendments to local zoning and subdivision regulations that increase residential density within two miles of active mining. The bill enforces existing provisions that provide Miami-Dade County with the ability to manage growth while considering the impacts of mining activities to surrounding communities.

Section 2 amends s. 373.41492, F.S., to allow the use of proceeds from the mitigation fees to be used for water quality monitoring, which is necessary to ensure water from the NWWF complies with groundwater quality criteria.

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[20] MacVicar Consulting Inc., *Lake Belt Wetland Mitigation Projects* (Mar. 3, 2015) (on file with the Senate Committee on Environmental Preservation and Conservation).
[21] CERP, *Everglades National Park Seepage Management Project* (Mar. 2006), *available at* http://74.223.38.247/docs/fs_enp.pdf (last visited Mar. 22, 2015).
[22] MacVicar Consulting Inc., *Lake Belt Wetland Mitigation Projects* (Mar. 3, 2015) (on file with the Senate Committee on Environmental Preservation and Conservation).
[23] *Id*.
[24] Miami-Dade County, *Regulatory and Economic Resources, Environmentally Endangered Lands Program* http://www.miamidade.gov/environment/endangered-lands.asp (last visited Mar. 22, 2015).

The bill incrementally reduces the mitigation fee from 45 cents per ton to 25 cents per ton beginning January 1, 2016; 15 cents per ton beginning January 1, 2017; and 5 cents per ton beginning January1, 2018, for the duration of mining activities. The fee will be transferred from the seepage mitigation projects, which are nearing completion, to Miami-Dade County and used to reimburse the SFWMD for the C-139 Annex land purchase.[25] Funding at the current level is more than what is needed for the remaining mitigation expenses.[26]

The bill replaces the 15 cents per ton water treatment plant upgrade fee with a 5 cent per ton fee to be used for Miami-Dade County EEL programs. The bill makes conforming changes to replace the water treatment plant upgrade fee with the EEL fee. The bill specifies the EEL fee may only be used for the acquisition, preservation, enhancement, restoration, conservation, and maintenance of wetland and threatened forest communities in Miami-Dade County. The proceeds from this fee must be used for the water treatment plant upgrade if water quality sampling results reveal water from the NWWF needs additional treatment as required by the EPA Long Term 2 Enhanced Surface Water Treatment Rule.

The bill deletes s. 373.41492(8), F.S., which is an outdated provision specifying the mitigation fee must be suspended until revived by the Legislature if the Corps does not issue a permit for mining in the Lake Belt area by September 30, 2000.

Section 3 reenacts s. 373.41495(1), (2), and (3), F.S., relating to the Lake Belt Mitigation Trust Fund, to incorporate the amendments to s. 373.41492, F.S.

Section 4 provides an effective date of July 1, 2015.

IV. Constitutional Issues:

A. Municipality/County Mandates Restrictions:

None.

B. Public Records/Open Meetings Issues:

None.

C. Trust Funds Restrictions:

None.

[25] Lake Belt Mitigation Committee, Meeting Summary, 5 (Nov. 20, 2013), *available at* http://www.sfwmd.gov/portal/page/portal/xrepository/sfwmd_repository_pdf/lbmc_meeting_summary_11_20_13.pdf (last visited Mar. 20, 2015).
[26] DEP, *Senate Bill 510 Agency Analysis*, 5 (Feb. 2015) (on file with the Senate Committee on Environmental Preservation and Conservation).

V. Fiscal Impact Statement:

A. Tax/Fee Issues:

None.

B. Private Sector Impact:

The reduction of the mitigation fee will have a positive fiscal impact on the private sector, including the construction industry and the mining industry.

C. Government Sector Impact:

The reduction of the mitigation fee over the next three years from 45 cents per ton to 5 cents per ton will reduce annual revenues paid to the state from $13.5 million to $1.5 million. The DEP estimates that by 2040, the additional revenue generated from the mitigation fee will be approximately $64.5 million.[27]

The bill removes the water treatment facility upgrade fee, which eliminates approximately $4.5 million per year of proceeds that were paid to Miami-Dade County for the facility upgrade.[28] In the event contamination is detected in the NWWF, these proceeds must first be used for the water treatment plant upgrade.

The creation of the 5 cent per ton EEL fee will have a positive fiscal impact on the EEL program. The Department of Revenue estimates that $1.5 million per year will be transferred to the EEL program.

State and local expenditures on all state roads and construction requiring limestone products from the Lake Belt area will be reduced. Construction costs in South Florida may be reduced by $15 million per year.[29]

VI. Technical Deficiencies:

None.

VII. Related Issues:

The bill references mitigation fees may be used for "threatened forest communities." The DEP states that this is an unclear term when describing the proper uses for Miami-Dade County's EEL fee.[30]

[27] *Id*.
[28] *Id.* at 4.
[29] *Id*.
[30] *Id*. at 6.

VIII. Statutes Affected:

This bill substantially amends the following sections of the Florida Statutes: 373.4149 and 373.41492.

This bill reenacts subsections 373.41495(1), (2), and (3) of the Florida Statutes.

IX. Additional Information:

A. Committee Substitute – Statement of Substantial Changes:
(Summarizing differences between the Committee Substitute and the prior version of the bill.)

CS/SB 510 Environmental Preservation and Conservation on March 24, 2015:
The CS fixes the technical error regarding "water quality monitoring" to ensure the proceeds from the mitigation fee may be used for water quality monitoring. The CS also directs the EEL program fee to be used for the water treatment plant upgrade if quarterly water quality sampling results from the NWWF indicate mining activities directly or indirectly impact water quality. Additional treatment is needed as required by the EPA Long Term 2 Enhanced Surface Water Treatment Rule if the water supply gets contaminated.

B. Amendments:

None.