Agenda Item #: 34/0

### PALM BEACH COUNTY BOARD OF COUNTY COMMISSIONERS

### AGENDA ITEM SUMMARY

Meeting Date: Department	September 9, 2008	<ul><li>(X) Consent</li><li>( ) Ordinance</li></ul>	<ul><li>( ) Regular</li><li>( ) Public Hearing</li></ul>
Submitted By Submitted Fo	· · · · · · · · · · · · · · · · · · ·	l Resources Management l Resources Management	

### **I. EXECUTIVE BRIEF**

**Motion and Title: Staff recommends motion to adopt:** a Resolution requesting that the Florida Department of Environmental Protection (FDEP) review a funding application and support funding for shoreline protection projects within its Fiscal Year 2009/2010 Beach Erosion Control Assistance Program.

**Summary:** The County is requesting that the State appropriate \$1,863,000 for the Jupiter/Carlin Shore Protection Project, \$550,000 for the Jupiter Beach Erosion Control/Dune Restoration Project, \$625,000 for the Juno Beach Shore Protection Project, \$4,014,400 for the Singer Island Shore Protection Project, \$4,625,000 for the South Palm Beach Shore Protection Project, \$43,500 for the South Lake Worth Inlet Management Plan, \$114,500 for the Ocean Ridge Shore Protection Project, and \$80,670 for all permit-required monitoring associated with eligible projects. If the State Legislature approves funding for all of the projects, the County's matching share would be \$14,291,830. Districts 1, 4 (SF)

**Background and Justification:** The FDEP is accepting project funding applications for FY 2009/2010. If the projects are found to be eligible, the FDEP will include them as part of its submittal to the Governor and Cabinet for approval and then forward it as part of the FDEP's Fixed Capital Outlay Budget Request to the State Legislature.

### Attachments:

1. Resolution

2. Applications, including Location Maps

epartment Director

Recommended by:

Date

Approved by:

**County Administrator** 

Date

### **II. FISCAL IMPACT ANALYSIS**

#### A. **Five Year Summary of Fiscal Impact:**

Fiscal Years	2009	201	0	2011	20	12	2013
Capital Expenditures					_		
<b>Operating Costs</b>							
<b>External Revenues</b>							
<b>Program Income (County)</b>					_		
In-Kind Match (County)							
NET FISCAL IMPACT	(See belo	w)					
<b># ADDITIONAL FTE</b>							
POSITIONS (Cumulative)							
Is Item Included in Curren	t Budget?		Yes		No		
<b>Budget Account No.:</b>	Fur	ıd	Departm			Object	
	Pro	gram _	- <b>-</b>				

#### В. **Recommended Sources of Funds/Summary of Fiscal Impact**

There is no fiscal impact until State funding is appropriated and a project agreement is executed. Potential fiscal impact to the County is \$14,291,830. The State and Federal share of each project's costs would be allocated to the County on a reimbursement basis. If State funds were to be appropriated for the projects and County funding is found to be insufficient to match the State-funded project, other funding sources could be considered, such as short-term borrowing, securing bonds, or delaying the design and construction of other projects already funded.

- С. **Department Fiscal Review**
- А. **OFMB** Fiscal and /or Contract Administrator Comments:

8.25.00 00 **OFMB** 

ontract Administrator

B. Legal Sufficiency:

Assistant County Attorney

С. **Other Department Review:** 

**Department Director** 

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	Attachment 1
1 2	RESOLUTION NO. 2008
3 4 5 6 7 8 9 10 11	A RESOLUTION OF THE BOARD OF COUNTY COMMISSIONERS OF PALM BEACH COUNTY, FLORIDA, REQUESTING THE STATE OF FLORIDA DEPARTMENT OF ENVIRONMENTAL PROTECTION TO SUPPORT APPROPRIATION OF FUNDS WITHIN THE BEACH EROSION CONTROL ASSISTANCE PROGRAM FOR FISCAL YEAR 2009-10.
12	WHEREAS the Decide of County Commissioners of Poles Decide County Florida is
13	WHEREAS, the Board of County Commissioners of Palm Beach County, Florida, is
14	committed to a program of coastal restoration and preservation; and
15	WHEREAS, Palm Beach County wishes to effectively address beach erosion by
16	construction of shore protection projects and restoration of its dunes; and
17	WHEREAS, Palm Beach County has a need to perform engineering design,
18	environmental studies and monitoring of shore protection projects; and
19	WHEREAS, Palm Beach County has developed and funded a Shore Protection
20	Program to act as the local sponsor for coastal projects; and
21	WHEREAS, the projects listed below are consistent with the coastal element of the
22	Palm Beach County's Comprehensive Plan; and
23	WHEREAS, the Bureau of Beaches and Coastal Systems is preparing their Beach
24	Erosion Control Long-Range Budget Plan to develop the Fiscal Year 2009-10 prioritized list
25	of beach erosion control projects; and
26	WHEREAS, the public work projects listed below are eligible within the State of
27	Florida's Beach Erosion Control Assistance Program under the provisions of Section
28	161.101, Florida Statutes
29	NOW, THEREFORE, BE IT RESOLVED BY THE BOARD OF COUNTY
30	COMMISSIONERS OF PALM BEACH COUNTY, FLORIDA, THAT:
31	Section 1: Palm Beach County is requesting that the State appropriate \$1,863,000
32	for the Jupiter/Carlin Shore Protection Project, \$550,000 for the Jupiter Beach Erosion
33	Control/Dune Restoration Project, \$625,000 for the Juno Beach Shore Protection Project,
34	\$4,014,400 for the Singer Island Shore Protection Project, \$4,625,000 for the South Palm
35	Beach Shore Protection Project, \$43,500 for implementation of the South Lake Worth Inlet
36	Management Plan, \$114,500 for the Ocean Ridge Shore Protection Project, and \$80,670 for

all permit-required monitoring associated with eligible projects.
Section 2:
The foregoing Resolution was offered by Commissioner, who
moved its adoption. The motion was seconded by Commissioner,
and upon being put to a vote, the vote was as follows:
Commissioner Addie L. Greene, Chairperson
Commissioner John F. Koons, Vice Chair
Commissioner Karen T. Marcus
Commissioner Robert J. Kanjian
Commissioner Mary McCarty
Commissioner Burt Aaronson
Commissioner Jess R. Santamaria
The Chairperson thereupon declared the Resolution duly passed and adopted this
day of, 20
APPROVED AS TO FORM AND LEGAL SUFFICIENCY PALM BEACH COUNTY, FLORIDA BY ITS BOARD OF COUNTY COMMISSIONERS
Sharon R. Bock, Clerk & Comptroller
By By Assistant County Attorney Deputy Clerk
Deputy Clotk

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# Attachment 2

# FY 09-10 BUDGET PLAN UPDATE LEGISLATIVE BUDGET REQUEST FOR PALM BEACH COUNTY

TOTAL COSTS										· .	
PROJECT	TASK										
	aerials	surveys	performance		reef/SAV	feasibility	construction	design	construction/	mitigation	total
				lighting mon.	mon.		fill	permitting	structures		<b>\$</b> 0.440.0
upiter Carlin SPP	\$3,000	\$14,000	\$25,000	\$75,000	\$25,000	<b>AAAAAAAAAAAAA</b>	\$8,000,000	\$0	\$0		\$8,142,0
upiter ECS/dune	A7 500	<b>.</b>		<b>*</b> 1 <b>*</b> 2 2 2 2		\$200,000	\$500,000	\$400,000	 ¢o	¢4 000 000	\$1,100,0
uno Beach	\$7,500	\$18,000	••• •• •• ••	\$150,000	\$100,000		¢4.000.000		\$0	\$1,000,000	e e d'ante e se de
inger Island	\$6,000	\$14,000		\$100,000	\$100,000		\$1,200,000		\$9,000,000		\$10,420,0
	<b>PO 000</b>	\$14,000		\$12,000	\$75,000	· · · · · · ·			¢160.000		\$126,0
Cean Ridge	\$9,000 \$3,000	\$14,000 \$12,000	\$25,000	\$100,000	\$50,000		\$500,000	\$700,000	\$160,000 \$8,000,000		\$358,0 \$9,265,0
outh Paim Beach	\$3,000	\$12,000		¢ 427 000	\$50,000	\$200.000	\$10,200,000			\$1,000,000	\$9,203,0
	\$28,500	\$86,000	\$100,000	\$437,000	\$400,000	<b>\$2</b> 00,000	\$10,200,000	<b>a</b> 1,100,000	\$17,160,000	ttl	\$30,711,
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	aerials	surveys	performance	· · · · · · · · · · · · · · · · · · ·	reef/SAV	feasibility		design permitting	Suuciares	mangation	monitoring
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upiter Carlin SPP	\$690	<b>\$3,22</b> 0	\$5,750	\$17,250	\$5,750	\$100,000	\$1,840,000	\$200,000	\$0 \$0	- ·	\$550,0
upiter ECS/dune uno Beach	\$3,750	\$9,000	\$12,500	\$75,000	\$50,000	\$100,000	\$250,000	\$200,000	φ <b>υ</b>	\$500,000	\$625,0
	\$3,684	\$9,000	• • • • • • • • • • • • •	\$75,000	\$50,000		\$736,800	\$0 \$0	\$5,526,000	\$300,000	\$6,385,6
Singer Island SLWI	\$3,004	\$7,000			\$37,500		\$750,000	ψŪ	\$0,520,000 \$0		\$43,5
	\$2,070	\$3,220	+		\$11,500				\$80,000	<b>\$</b> 0	\$114,5
		\$J,ZZU	\$3,730	φ23,000			\$250,000	\$350,000	\$4,000,000	ΨΟ	\$4,625,0
		\$6,000			\$25 000						
South Palm Beach	\$1,500 \$11,694 Total costs (loc	\$6,000 \$37,036 cal share) fo	\$36,500	\$182,650 monitoring:	\$25,000 \$191,150 \$85,230	\$100,000	\$3,076,800	\$550,000	\$9,606,000	\$500,000	\$14,206,6
outh Palm Beach	<b>\$1,500</b> <b>\$11,694</b>	\$37,036	\$36,500		\$191,150	\$100,000				\$500,000	\$14,206,6
outh Palm Beach	\$1,500 \$11,694 Total costs (loo	\$37,036	\$36,500	monitoring:	\$191,150	\$100,000 feasibility				\$500,000 mitigation	\$14,206,6 \$14,291,8
South Palm Beach	\$1,500 \$11,694 Total costs (loc TASK	\$37,036 cal share) fo	\$36,500 r Countywide performance	monitoring:	\$191,150 \$85,230	·	\$3,076,800	\$550,000	<b>\$</b> 9,606,000		\$14,206,6 \$14,291,8 total (- re
South Palm Beach	\$1,500 \$11,694 Total costs (loc TASK	\$37,036 cal share) fo	\$36,500 r Countywide performance report	turtle/scarp/ lighting mon.	\$191,150 \$85,230 reef/SAV	·	\$3,076,800	\$550,000 design permitting \$0	\$9,606,000 structures	mitigation	\$14,206,6 \$14,291,8 total (- re monitorin \$1,863,0
South Palm Beach	\$1,500 \$11,694 Total costs (loc TASK aerials	\$37,036 cal share) fo surveys	\$36,500 r Countywide performance report	turtle/scarp/ lighting mon.	\$191,150 \$85,230 reef/SAV mon.	feasibility	\$3,076,800 fill	\$550,000 design permitting	\$9,606,000 structures	mitigation	\$14,206,6 \$14,291,8 total (- re monitorin \$1,863,0
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South Palm Beach	\$1,500 \$11,694 Total costs (loc TASK aerials \$690 \$3,750 \$2,316 \$2,070 \$1,500 \$10,326	\$37,036 cal share) fo surveys \$3,220 \$9,000 \$5,404 \$7,000 \$3,220 \$6,000 \$33,844	\$36,500 r Countywide i performance report \$5,750 \$12,500 \$12,500 \$12,500 \$36,500	turtle/scarp/ lighting mon. \$17,250 \$75,000 \$38,600 \$6,000 \$23,000 \$159,850	\$191,150 \$85,230 reef/SAV mon. \$5,750 \$50,000 \$38,600 \$37,500 \$11,500 \$11,500 \$168,350	feasibility \$0 \$100,000	\$3,076,800 fill \$1,840,000 \$250,000 \$463,200 \$250,000	\$550,000 design permitting \$0 \$200,000 \$0 \$350,000	\$9,606,000 structures \$0 \$0 \$3,474,000 \$0 \$80,000 \$4,000,000	mitigation \$500,000 \$0	\$14,206,6 \$14,291,8 total (- re monitorin \$1,863,0 \$550,0 \$625,0 \$4,014,4 \$43,5
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South Palm Beach	\$1,500 \$11,694 Total costs (loc <b>TASK</b> aerials \$690 \$3,750 \$2,316 \$2,070 \$1,500 \$10,326 Total costs (state) <b>TASK</b> aerials	\$37,036 cal share) fo surveys \$3,220 \$9,000 \$5,404 \$7,000 \$3,220 \$6,000 \$33,844 ate share) fo	\$36,500 r Countywide i performance report \$5,750 \$12,500 \$12,500 \$36,500 or Countywide performance	monitoring: turtle/scarp/ lighting mon. \$17,250 \$75,000 \$38,600 \$6,000 \$23,000 \$159,850 monitoring:	\$191,150 \$85,230 reef/SAV mon. \$5,750 \$50,000 \$38,600 \$37,500 \$11,500 \$11,500 \$25,000 \$168,350 \$80,670	feasibility \$0 \$100,000 \$100,000	\$3,076,800 fill \$1,840,000 \$250,000 \$463,200 \$255,000 \$2,553,200	\$550,000 design permitting \$00 \$200,000 \$0 \$0 \$350,000 \$550,000	\$9,606,000 structures \$0 \$0 \$3,474,000 \$0 \$80,000 \$4,000,000 \$7,554,000	mitigation \$500,000 \$0 \$500,000	\$14,206,6 \$14,291,8 total (- remonitorin \$1,863,( \$550,( \$4,014,4 \$43,5 \$114,5 \$111,835,4 \$111,835,4 \$111,835,4
South Palm Beach	\$1,500 \$11,694 Total costs (loc TASK aerials \$690 \$3,750 \$2,316 \$2,070 \$1,500 \$10,326 Total costs (state) TASK	\$37,036 cal share) fo surveys \$3,220 \$9,000 \$5,404 \$7,000 \$3,220 \$6,000 \$33,844 ate share) fo surveys \$7,560	\$36,500 r Countywide / performance report \$5,750 \$12,500 \$12,500 \$36,500 or Countywide performance report \$13,500	turtle/scarp/ lighting mon. \$17,250 \$75,000 \$38,600 \$6,000 \$23,000 \$159,850 monitoring: turtle/scarp/ lighting mon. \$40,500	\$191,150 \$85,230 reef/SAV mon. \$5,750 \$50,000 \$38,600 \$37,500 \$11,500 \$25,000 \$168,350 \$80,670 reef/SAV mon. \$13,500	feasibility \$0 \$100,000 \$100,000	\$3,076,800 fill \$1,840,000 \$250,000 \$463,200 \$255,000 \$2,553,200	\$550,000 design permitting \$0 \$200,000 \$0 \$0 \$350,000 \$550,000 \$550,000	\$9,606,000 structures \$0 \$0 \$3,474,000 \$0 \$80,000 \$4,000,000 \$7,554,000	mitigation \$500,000 \$0 \$500,000	\$14,206,6 \$14,291,3 total (- re monitorin \$1,863,0 \$550,0 \$625,0 \$4,014,0 \$43,3 \$114,1 \$4,625,0 \$11,835,0 \$11,855,0 \$11,855,0
South Palm Beach	\$1,500 \$11,694 Total costs (loc <b>TASK</b> aerials \$690 \$3,750 \$2,316 \$2,070 \$1,500 \$10,326 Total costs (state) <b>TASK</b> aerials	\$37,036 cal share) fo surveys \$3,220 \$9,000 \$5,404 \$7,000 \$3,220 \$6,000 \$33,844 ate share) fo surveys	\$36,500 r Countywide / performance report \$5,750 \$12,500 \$12,500 \$12,500 \$36,500 or Countywide performance report \$13,500 \$13,500	turtle/scarp/ lighting mon. \$17,250 \$75,000 \$38,600 \$6,000 \$23,000 \$159,850 monitoring: turtle/scarp/ lighting mon. \$40,500 \$54,000	\$191,150 \$85,230 reef/SAV mon. \$5,750 \$50,000 \$38,600 \$37,500 \$11,500 \$25,000 \$168,350 \$80,670 reef/SAV mon.	feasibility \$0 \$100,000 \$100,000	\$3,076,800 fill \$1,840,000 \$250,000 \$463,200 \$250,000 \$2,553,200 fill	\$550,000 design permitting \$0 \$200,000 \$0 \$0 \$350,000 \$550,000 \$550,000	\$9,606,000 structures \$0 \$0 \$3,474,000 \$0 \$80,000 \$4,000,000 \$7,554,000	mitigation \$500,000 \$0 \$500,000 mitigation	\$14,206,6 \$14,291,4 total (- re monitorin \$1,863,0 \$550,0 \$625,0 \$4,014,0 \$4,625,0 \$114,1 \$4,625,0 \$11,835,0

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construct	6050.000		5405 000	6405 000	6000.000		6400.000	#400.000	6450.000											
monitor	\$250,000		\$125,000	\$125,000	\$200,000		\$100,000	\$100,000	\$150,000		\$75,000	\$75,000	\$150,000		\$75,000	\$75,000	\$120,000		\$60,000	\$60,000
mitigation	\$1,000,000.		\$500,000	\$500,000		····· · · · · · · · · · · · · · · · ·			i					i						
Singer Island	1 1 1	-																		
design/permit		į					1. A.						-							
structures	\$9,000,000		\$3,474,000																I	
duлe fill	\$1,200,000		\$463,200	\$736,800			\$463,200	\$736,800			\$463,200	\$736,800	\$1,200,000		\$463,200	\$736,800	\$1,200,000		\$463,200	\$736,800
monitor	\$200,000	-	\$77,200	\$122,800	\$200,000		\$77,200	\$122,800	\$150,000		\$57,900	\$92,100	\$150,000		\$57,900	\$92,100	\$120,000		\$46,320,	\$73,680
SLWI					l									dia mandri di						
construct														1						
monitor	\$87,000		\$43,500	\$43,500	\$65,000		\$32,500	\$32,500	\$65,000		\$32,500	\$32,500	\$65,000	1	\$32,500	\$32,500	\$65,000		\$32,500	\$32,500
Ocean Ridge						!			1											
design/permit													\$150,000	\$87,450	\$34,650	\$34,650				
construct	\$160,000		\$80,000	\$80,000						-							\$6,000,000	\$3,498,000	\$1,386,000	\$1,386,000
monitor	\$150,000	\$81,000	\$34,500	\$34,500	\$200,000	\$116,600	\$46,200	\$46,200	\$100,000	\$58,300	\$23,100	\$23,100	\$100,000	\$58,300	\$23,100	\$23,100	\$100,000	\$58,300	\$23,100	\$23,100
South Palm Beach																•10,100	• • • • • • • • • •		020,100	<b><i>Q</i>L0,100</b>
design/permit	\$700,000		\$350,000	\$350,000						· · ·	· · · · ·				· · ·		· · · ·			
structures	\$8,000,000		\$4,000,000	1 A A A A A A A A A A A A A A A A A A A							4						· ' !			
dune fill	\$500,000		\$250,000	\$250,000	\$300,000		\$150,000	\$150,000	\$300,000		\$150,000	\$150,000	\$300,000		\$150,000	\$150,000				
monitor	\$50,000		\$25,000	\$25,000	\$80,000		\$40,000	\$40,000	\$80,000		\$40,000	\$40,000	\$80,000		\$40,000	\$40,000	\$80,000		\$40,000	£40.000
CountyWide Monitoring	\$214,500	\$48,600	\$80,670	\$85,230	\$780,000	\$170,600	\$286,400	\$332,000	\$600,000	\$123,100	\$223,600	\$257,800	\$600,000	\$123,100	\$223,600	\$257,800	\$540,000	E400 400		\$40,000
Southywhee Monitoring	3214,000	\$40,000;	\$00,070	\$00,230	\$700,000;	\$170,000	\$200,400	\$332,000	\$000,000	\$123,100	\$223,000	\$237,000	\$000,000	\$123,100	\$223,000	\$257,600	\$540,000	\$123,100	\$197,020	\$224,380
	FY 2014-15				FY 2015-16				FY 2016-17				FY 2017-20	10			FY 2018-20	10		
PROJECT	ttl	federal	state	local	ttl	federal	state	local	ttl	federal	state	local	ttl	federal	state	local	r 2010-20			
		letteral	State	iocal		recerar	State	IUCAI	- tu	leuerai	Sidle	IUCAI		legeral	State	iocai	<u>u</u>	federal	state	local
Jupiter Carlin SPP							1		CE 000 000	<b>** **</b>	a						·			
design/permit									\$5,000,000	\$2,700,000	\$1,150,000	\$1,150,000								
constuct													a marka sa ka ka ka		\$2,070,000		1.1.1.1.1.1			
monitor	\$120,000	\$64,800	\$27,600	\$27,600	\$120,000	\$64,800	\$27,600	\$27,600	\$120,000	\$64,800	\$27,600	\$27,600	\$120,000	\$64,800	\$27,600	\$27,600	\$130,000	\$70,200	\$29,900	\$29,900
Jupiter ECS/dune*																	· · · ·			
feasibility	1. E		1							1	;									
design/permit	1																			
and the second					î.		· .													-
construct											· · ·		 							
and the second second second	\$150,000		\$75,000	\$75,000	\$150,000		\$75,000	\$75,000	\$150,000		\$75,000	\$75,000	\$150,000		\$75,000	\$75,000	\$150,000		\$75,000	\$75,000
construct monitor	\$150,000		\$75,000	\$75,000	\$150,000		\$75,000	\$75,000	\$150,000		\$75,000	\$75,000	\$150,000	· · · ·	\$75,000	\$75,000	\$150,000		\$75,000	\$75,000
construct monitor dune fill	\$150,000		\$75,000	\$75,000	\$150,000		\$75,000	\$75,000	\$150,000		\$75,000	\$75,000	\$150,000		\$75,000	\$75,000	\$150,000		\$75,000	\$75,000
construct monitor dune fill	\$150,000 \$400,000	··· •	\$75,000 \$200,000	\$75,000 \$200,000	\$150,000		\$75,000	\$75,000	\$150,000		\$75,000	\$75,000	\$150,000	· · · · ·	<b>\$</b> 75,000	\$75,000	\$150,000		\$75,000	\$75,000
construct monitor dune fill Juno Beach					\$150,000 \$13,000,000		\$75,000 \$6,500,000		\$150,000	- - - -	\$75,000	\$75,000	\$150,000	· · · · · · · · · · · · · · · · · · ·	\$75,000	\$75,000	\$150,000		\$75,000	\$75,000
construct monitor dune fill Juno Beach design/permit		1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1							\$150,000 \$150,000		\$75,000 \$75,000	\$75,000 \$75,000	\$150,000 \$120,000		\$75,000 \$60,000	\$75,000 \$60,000	\$150,000	· · ·	\$75,000 \$60,000	\$75,000
construct monitor dune fill Juno Beach design/permit construct	\$400,000		\$200,000	\$200,000	\$13,000,000		\$6,500,000	\$6,500,000			-		· · · · · · · · · · · · · · · · · · ·	· · · · · · · · · · · · · · · · · · ·						
construct monitor dune fill Juno Beach design/permit construct monitor Singer Island	\$400,000		\$200,000	\$200,000	\$13,000,000		\$6,500,000	\$6,500,000		· · · · · · · · · · · · · · · · · · ·	-		· · · · · · · · · · · · · · · · · · ·					· · · · · · · · · · · · · · · · · · ·		
construct monitor dune fill Juno Beach design/permit construct monitor Singer Island design/permit	\$400,000		\$200,000	\$200,000	\$13,000,000		\$6,500,000	\$6,500,000			-		· · · · · · · · · · · · · · · · · · ·					· · · ·		
construct monitor dune fill Juno Beach design/permit construct monitor Singer Island design/permit construct	\$400,000 \$200,000		\$200,000 \$100,000	\$200,000 \$100,000	\$13,000,000 \$150,000		\$6,500,000 \$75,000	\$6,500,000 \$75,000	\$150,000		\$75,000	\$75,000	\$120,000		\$60,000	\$60,000	\$120,000	· · ·	\$60,000	\$60,000
construct monitor dune fill Juno Beach design/permit construct monitor Singer Island design/permit constuct monitor	\$400,000		\$200,000	\$200,000	\$13,000,000 \$150,000		\$6,500,000	\$6,500,000			-		· · · · · · · · · · · · · · · · · · ·							
construct monitor dune fill Juno Beach design/permit construct monitor Singer Island design/permit constuct monitor SLWI	\$400,000 \$200,000 \$200,000		\$200,000 \$100,000 \$77,200	\$200,000 \$100,000 \$122,800	\$13,000,000 \$150,000		\$6,500,000 \$75,000	\$6,500,000 \$75,000	\$150,000		\$75,000	\$75,000	\$120,000		\$60,000	\$60,000	\$120,000		\$60,000	\$60,000
construct monitor dune fill Juno Beach design/permit construct monitor Singer Island design/permit construct monitor SLWI construction	\$400,000 \$200,000 \$200,000 \$1,500,000		\$200,000 \$100,000 \$77,200 \$750,000	\$200,000 \$100,000 \$122,800 \$750,000	\$13,000,000 \$150,000 \$150,000		\$6,500,000 \$75,000 \$57,900	\$6,500,000 \$75,000 \$92,100	\$150,000 \$92,000		\$75,000 <sup>°</sup> \$35,512	\$75,000 \$56,488	\$120,000 \$92,000		\$60,000 \$35,512	\$60,000 \$56,488	\$120,000 \$92,000		\$60,000 \$35,512	\$60,000 \$56,488
construct monitor dune fill Juno Beach design/permit construct monitor Singer Island design/permit construct monitor SLWI construction monitor	\$400,000 \$200,000 \$200,000		\$200,000 \$100,000 \$77,200	\$200,000 \$100,000 \$122,800	\$13,000,000 \$150,000		\$6,500,000 \$75,000	\$6,500,000 \$75,000	\$150,000		\$75,000	\$75,000	\$120,000		\$60,000	\$60,000	\$120,000		\$60,000	\$60,000
construct monitor dune fill Juno Beach design/permit construct monitor Singer Island design/permit constuct monitor SLWI construction monitor	\$400,000 \$200,000 \$200,000 \$1,500,000		\$200,000 \$100,000 \$77,200 \$750,000	\$200,000 \$100,000 \$122,800 \$750,000	\$13,000,000 \$150,000 \$150,000		\$6,500,000 \$75,000 \$57,900	\$6,500,000 \$75,000 \$92,100	\$150,000 \$92,000		\$75,000 <sup>°</sup> \$35,512	\$75,000 \$56,488	\$120,000 \$92,000		\$60,000 \$35,512	\$60,000 \$56,488	\$120,000 \$92,000		\$60,000 \$35,512	\$60,000 \$56,488
construct monitor dune fill Juno Beach design/permit construct monitor Singer Island design/permit construct monitor SLWI construction monitor Ceean Ridge design/permit	\$400,000 \$200,000 \$200,000 \$1,500,000		\$200,000 \$100,000 \$77,200 \$750,000	\$200,000 \$100,000 \$122,800 \$750,000	\$13,000,000 \$150,000 \$150,000		\$6,500,000 \$75,000 \$57,900	\$6,500,000 \$75,000 \$92,100	\$150,000 \$92,000		\$75,000 <sup>°</sup> \$35,512	\$75,000 \$56,488	\$120,000 \$92,000		\$60,000 \$35,512	\$60,000 \$56,488	\$120,000 \$92,000		\$60,000 \$35,512	\$60,000 \$56,488
construct monitor dune fill <b>Juno Beach</b> design/permit construct monitor <b>Singer Island</b> design/permit construct monitor <b>SLWI</b> construction monitor <b>Scean Ridge</b> design/permit construct	\$400,000 \$200,000 \$200,000 \$1,500,000 \$65,000		\$200,000 \$100,000 \$77,200 \$750,000 \$32,500	\$200,000 \$100,000 \$122,800 \$750,000 \$32,500	\$13,000,000 \$150,000 \$150,000 \$65,000		\$6,500,000 \$75,000 \$57,900 \$32,500	\$6,500,000 \$75,000 \$92,100 \$32,500	\$150,000 \$92,000 \$65,000		\$75,000 \$35,512 \$32,500	\$75,000 \$56,488 \$32,500	\$120,000 \$92,000 \$65,000		\$60,000 \$35,512 \$32,500	\$60,000 \$56,488 \$32,500	\$120,000 \$92,000 \$65,000		\$60,000 \$35,512 \$32,500	\$60,000 \$56,488 \$32,500
construct monitor dune fill uno Eeach design/permit construct monitor Singer Island design/permit construct monitor SLWI construction monitor Deaa Ridge design/permit construct monitor	\$400,000 \$200,000 \$200,000 \$1,500,000 \$65,000 \$100,000	\$58,300	\$200,000 \$100,000 \$77,200 \$750,000	\$200,000 \$100,000 \$122,800 \$750,000	\$13,000,000 \$150,000 \$150,000 \$65,000	\$58,300	\$6,500,000 \$75,000 \$57,900	\$6,500,000 \$75,000 \$92,100	\$150,000 \$92,000	\$58,300	\$75,000 <sup>°</sup> \$35,512	\$75,000 \$56,488	\$120,000 \$92,000	\$58,300	\$60,000 \$35,512	\$60,000 \$56,488	\$120,000 \$92,000	\$58,300	\$60,000 \$35,512 \$32,500	\$60,000 \$56,488
construct monitor dune fill Juno Beach design/permit construct monitor Singer Island design/permit construct monitor SLWI construction monitor Cean Ridge design/permit construct monitor	\$400,000 \$200,000 \$200,000 \$1,500,000 \$65,000 \$100,000	\$58,300	\$200,000 \$100,000 \$77,200 \$750,000 \$32,500	\$200,000 \$100,000 \$122,800 \$750,000 \$32,500	\$13,000,000 \$150,000 \$150,000 \$65,000	\$58,300	\$6,500,000 \$75,000 \$57,900 \$32,500	\$6,500,000 \$75,000 \$92,100 \$32,500	\$150,000 \$92,000 \$65,000	\$58,300	\$75,000 \$35,512 \$32,500	\$75,000 \$56,488 \$32,500	\$120,000 \$92,000 \$65,000	\$58,300	\$60,000 \$35,512 \$32,500	\$60,000 \$56,488 \$32,500	\$120,000 \$92,000 \$65,000	\$58,300	\$60,000 \$35,512 \$32,500	\$60,000 \$56,488 \$32,500
construct monitor dune fill uno Beach design/permit construct monitor Singer Island design/permit construct monitor LWI construction monitor Decean Ridge design/permit construct monitor Docean Ridge design/permit construct monitor Docean Ridge	\$400,000 \$200,000 \$200,000 \$1,500,000 \$65,000	\$58,300	\$200,000 \$100,000 \$77,200 \$750,000 \$32,500	\$200,000 \$100,000 \$122,800 \$750,000 \$32,500	\$13,000,000 \$150,000 \$150,000 \$65,000	\$58,300	\$6,500,000 \$75,000 \$57,900 \$32,500	\$6,500,000 \$75,000 \$92,100 \$32,500	\$150,000 \$92,000 \$65,000	\$58,300	\$75,000 \$35,512 \$32,500	\$75,000 \$56,488 \$32,500	\$120,000 \$92,000 \$65,000	\$58,300	\$60,000 \$35,512 \$32,500	\$60,000 \$56,488 \$32,500	\$120,000 \$92,000 \$65,000	\$58,300	\$60,000 \$35,512 \$32,500	\$60,000 \$56,488 \$32,500
construct monitor dune fill uno Beach design/permit construct monitor Singer Island design/permit construct monitor SLWI construction monitor Decan Ridge design/permit construct monitor Scent Ridge design/permit construct monitor construct monitor construct monitor construct monitor construct	\$400,000 \$200,000 \$200,000 \$1,500,000 \$65,000 \$100,000	\$58,300	\$200,000 \$100,000 \$77,200 \$750,000 \$32,500 \$23,100	\$200,000 \$100,000 \$122,800 \$750,000 \$32,500 \$23,100	\$13,000,000 \$150,000 \$150,000 \$65,000 \$100,000	\$58,300	\$6,500,000 \$75,000 \$57,900 \$32,500 \$23,100	\$6,500,000 \$75,000 \$92,100 \$32,500 \$23,100	\$150,000 \$92,000 \$65,000 \$100,000	\$58,300	\$75,000 \$35,512 \$32,500 \$23,100	\$75,000 \$56,488 \$32,500 \$23,100	\$120,000 \$92,000 \$65,000 \$100,000	\$58,300	\$60,000 \$35,512 \$32,500 \$23,100	\$60,000 \$56,488 \$32,500 \$23,100	\$120,000 \$92,000 \$65,000 \$100,000	\$58,300	\$60,000 \$35,512 \$32,500 \$23,100	\$60,000 \$56,488 \$32,500 \$23,100
construct monitor dune fill Juno Beach design/permit construct monitor Singer Island design/permit construct monitor SLWI construction monitor Decean Ridge design/permit construct monitor South Palm Beach design/permit	\$400,000 \$200,000 \$200,000 \$1,500,000 \$65,000 \$100,000	\$58,300	\$200,000 \$100,000 \$77,200 \$750,000 \$32,500	\$200,000 \$100,000 \$122,800 \$750,000 \$32,500	\$13,000,000 \$150,000 \$150,000 \$65,000 \$100,000	\$58,300	\$6,500,000 \$75,000 \$57,900 \$32,500	\$6,500,000 \$75,000 \$92,100 \$32,500	\$150,000 \$92,000 \$65,000 \$100,000	\$58,300	\$75,000 \$35,512 \$32,500	\$75,000 \$56,488 \$32,500	\$120,000 \$92,000 \$65,000	\$58,300	\$60,000 \$35,512 \$32,500	\$60,000 \$56,488 \$32,500	\$120,000 \$92,000 \$65,000	\$58,300	\$60,000 \$35,512 \$32,500	\$60,000 \$56,488 \$32,500

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feasibility					1								:							
design/permit				- 4	1															
construct	\$8,000,000	\$4,320,000	\$1,840,000	\$1,840,000	2														4	
monitor	\$100,000.	\$54,000	\$23,000	\$23,000	\$100,000	\$54,000	\$23,000	\$23,000	\$120,000	\$64,800	\$27,600	\$27,600	\$120,000	\$64,800	\$27,600	\$27,600	\$120,000	\$64,800	\$27,600	\$27,600
Jupiter ECS/dune*																				
feasibility	\$200,000		\$100,000	\$100,000	)					i i									1	
design/permit	\$400,000		\$200,000	\$200,000																
construct					\$5,000,000		\$2,500,000	\$2,500,000		-				1						
monitor					\$150,000	,	\$75,000	\$75,000	\$150,000		\$75,000	\$75,000	\$150,000		\$75,000	\$75,000	\$150,000		\$75,000	\$75,000
dune fill	\$500,000		\$250,000	\$250,000	\$250,000		\$125,000	\$125,000	\$200,000		\$100,000	\$100,000							· •	
Juno Beach														1						
design/permit		•				-														
construct							1													
monitor	\$250,000	1	\$125,000	\$125,000	\$200,000		\$100,000	\$100,000	\$150,000		\$75,000	\$75,000	\$150,000		\$75,000	\$75,000	\$120,000		\$60,000	\$60,000
mitigation	\$1,000,000.		\$500,000	\$500,000																
Singer Island														··· ···						
design/permit																				
structures	\$9,000,000	-	\$3,474,000	\$5,526,000						:	11	İ			:					
dune fill	\$1,200,000		\$463,200	\$736,800	\$1,200,000	:	\$463,200	\$736,800	\$1,200,000		\$463,200	\$736,800	\$1,200,000		\$463,200	\$736,800	\$1,200,000		\$463,200	\$736,800
monitor	\$200,000		\$77,200	\$122,800	\$200,000		\$77,200	\$122,800	\$150,000		\$57,900	\$92,100	\$150,000		\$57,900	\$92,100	\$120,000		\$46,320	\$73,680
SLWI	:																1			, , , ,
construct																				
monitor	\$87,000		\$43,500	\$43,500	\$65,000		\$32,500	\$32,500	\$65,000	-	\$32,500	\$32,500	\$65,000	1	\$32,500	\$32,500	\$65,000	·	\$32,500	\$32,500
Ocean Ridge															T. T. T.					
design/permit													\$150,000	\$87,450	\$34,650	\$34,650	1			
construct	\$160,000		\$80,000	\$80,000													\$6,000,000	\$3,498,000	\$1,386,000	\$1,386,000
monitor	\$150,000	\$81,000	\$34,500	\$34,500	\$200,000	\$116,600	\$46,200	\$46,200	\$100,000	\$58,300	\$23,100	\$23,100	\$100,000	\$58,300	\$23,100	\$23,100	\$100,000	\$58,300	\$23,100	\$23,100
South Palm Beach																	1	1		
design/permit	\$700,000		\$350,000	\$350,000																
structures	\$8,000,000		\$4,000,000	\$4,000,000							4		1		1					
dune fill	\$500,000		\$250,000	\$250,000	\$300,000		\$150,000	\$150,000	\$300,000		\$150,000	\$150,000	\$300,000		\$150,000	\$150,000				
monitor	\$50,000		\$25,000	\$25,000	\$80,000		\$40,000	\$40,000	\$80,000		\$40,000	\$40,000	\$80,000		\$40,000	\$40,000	\$80,000		\$40,000	\$40,000
CountyWide Monitoring	\$214,500	\$48,600	\$80,670	\$85,230	\$780,000	\$170,600	\$286,400	\$332,000	\$600,000	\$123,100	\$223,600	\$257,800	\$600,000	\$123,100	\$223,600	\$257,800	\$540,000	\$123,100	\$197,020	\$224,380

FY 2011-2012

federal

state

local

tti

FY 2012-2013

federal

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FY 2013-2014

federal

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local

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FY 09-10 LONG RANGE BUDGET PLAN UPDATE

FY 2009-10

ttl

PROJECT

Jupiter Carlin SPP\*

LEGISLATIVE BUDGET REQUEST FOR PALM BEACH COUNTY

federal state

FY 2010-2011

tti

federal

state

local

local

### JUPITER/CARLIN SHORE PROTECTION PROJECT

### **Project Description**

Shoreline protection for 1.08 miles of beach adjacent to the Jupiter Inlet in Palm Beach County. The beach was first nourished in 1995 and renourished in 2002. A primary dune was reestablished along the project area. Permit-required post-construction monitoring is ongoing. A second renourishment is planned for winter 2009/2010. Design and permitting work for this renourishment is underway.

### Location

Between DEP range monuments R13.5 and R19 in Palm Beach County (location map attached).

## **Project Evaluation**

<u>Severity of Erosion</u>: Over 30% of the project area includes habitable structures, including one hotel and one condominium. Another 65% of the project area is developed public park area. There is currently no shoreline armoring present in the project area.

The historic erosion rate along the project shoreline was computed to be 1.9 ft/yr (Aug 1996 GDM). However, subsequent studies, which take into effect the periodic influx of sand from inlet bypassing and ICWW dredging projects, combined with the 2004 and 2005 storm seasons, calculated the actual erosion rate in the project area from 2001-2006 to be a much higher -32.15 cy/ft/yr (Taylor Engineering, Jupiter Carlin Shore Protection 48-month monitoring report, May 2008)

<u>Benefits:</u> The project is designed to provide long-term storm protection, retain sand within the coastal system, aesthetically enhance the area, and provide habitat for endangered plant and animal species. The beach is publicly accessible in an area heavily utilized by both the local population and visitors. Approximately 70% of the project area lies within two county parks. The Jupiter Beach Resort, with 159 guest rooms, fronts 8% of the project length. Hurricane evacuation routes in the project area include Route A1A which runs N-S along the entire project area and is less than 20' from the dune crest in some sections, and Indiantown Road which runs E-W and is centrally located within the project area. Threatened and endangered marine turtles utilize the entire project area for nesting, however this beach is not a designated marine turtle refuge. The dune in Carlin Park provides habitat for one of the few remaining colonies of endangered Beach Jacquemontia (*Jacquemontia reclinata*) in Palm Beach County. The attached map identifies public beach access points with associated parking spaces, as well as the location of the Beach Jacquemontia colony.

<u>Federal Funding</u>: The project was authorized in 1962, WRDA 1986 & WRDA 1996. A PCA for nourishment was signed on March 15, 1995. The project currently has a Federal cost share of 54%. The sponsor is seeking approval for federal participation in design & construction of the next scheduled renourishment (currently winter 2009/2010), and a Section 934 report is being prepared to this effect.

<u>State Commitment:</u> Both phases of the project and the emergency dune restoration were funded by the state. The project is recommended in the Department's Strategic Beach Management Plan and is located in an area designated as critically eroded in this Plan. This project has been determined to be 100% eligible for State funding. DEP grant agreement #09PB1 currently provides funding for Design and Permitting on the renourishment project for this project.

Local Commitment & Capability: The project is consistent with the local government comprehensive plan and the local sponsor supports the Department's beach management activities as set forth under Part 1, Chapter 161, Florida Statutes. A long-range budget plan and dedicated funding sources are in place. The degree of local funding proposed is detailed in the attached financial schedule. Palm Beach County will use staff for project management of beach renourishment. The County has retained the services of a professional coastal engineering firm to assist in design, permitting, and other project related activities. The administrative capability of the local sponsor has been demonstrated by the successful completion of the initial phases of this project as well as many others.

Project Performance: The original project design was based on the GDM & EIS. The project provides for greater than 15 year return interval storm protection. The dune within the project limits is stabilized with vegetation and walkovers and provides enhanced shore protection consistent with the natural system. The extreme north end of the project (R-13 through R-15) experienced a near total loss of berm and dune in May 2007 due to wind and waves associated with Sub-Tropical Storm Andrea. Portions of this beach have not recovered fully from the hurricanes of 2004 and 2005 (Taylor Engineering, Jupiter Carlin Shore Protection 24-month monitoring report, August 2006), and additional solutions are being sought for this beach.

#### Jupiter/Carlin Shore Protection Project

#### Page 2 of 2

<u>Innovative Applications:</u> The original project was constructed using conventional beach fill methods and design. It is anticipated that the upcoming renourishment will utilize similar technology; however, the planned structures will provide options to extend the required nourishment intervals. Extending the nourishment interval will minimize the environmental impacts from maintaining the beach, especially in an area of high sea turtle nesting densities.

# **Use of Program Funds**

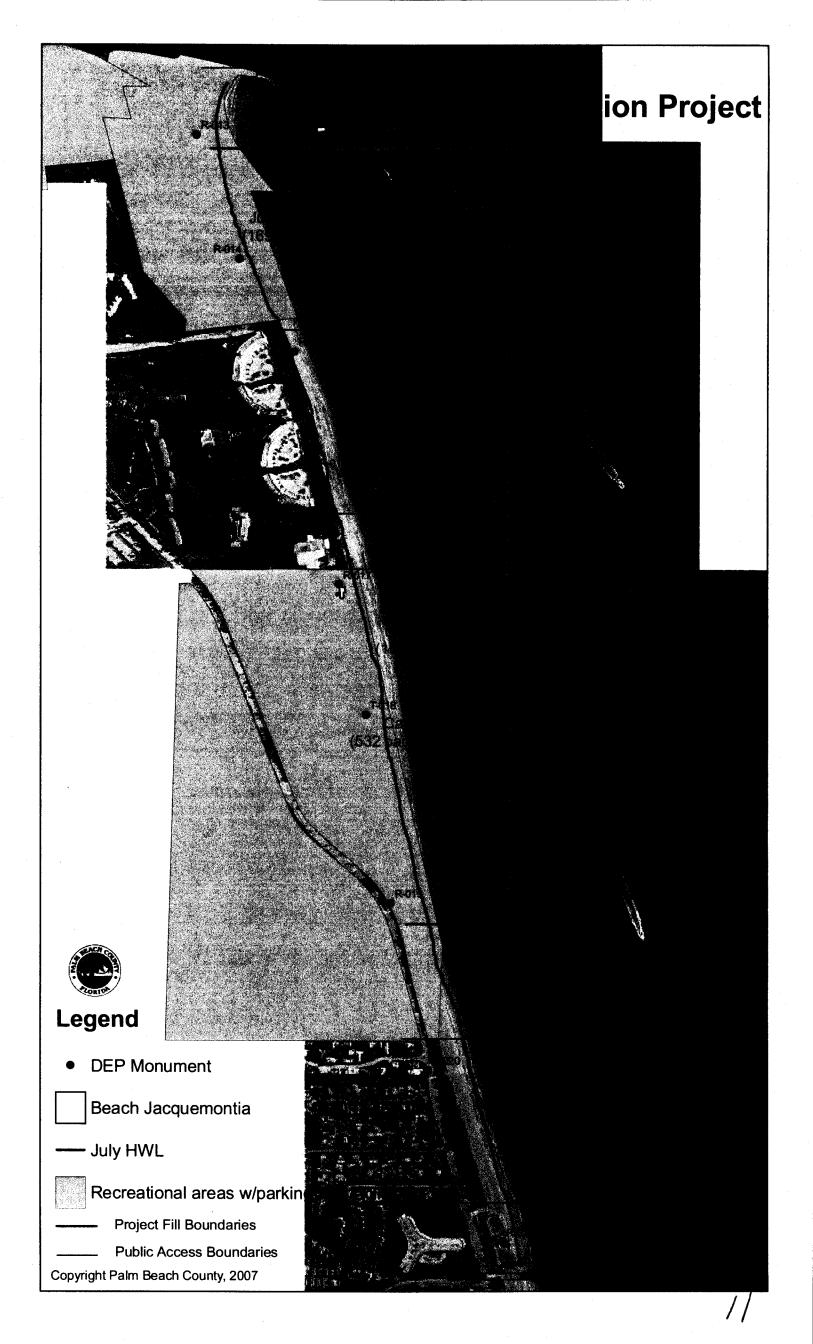
The requested funding for FY 2009-10 for this area is sought for the design, permitting, and construction of the next scheduled renourishment (currently winter 2009/2010), and to support project-specific monitoring required by permit (sea turtle, shorebird, and nearshore reef). It is the opinion of the Sponsor that detailed, project-specific monitoring is best funded through individual project-specific funding agreements.

Aerial surveys and regional (profiles and hydrographic) monitoring will be funded through the Countywide Monitoring Agreement (#06PB3).

Attachments: Project map, MPP timeline

D	Task Name	Duration	Start	Finish	Predecessors	Resource Nam	ies
1	uniter/Carlin 2nd Boach Depowichment	AADE dawa 3		F-: 0/4/40			
2	Jupiter/Carlin 2nd Beach Renourishment	1485 days?	Mon 6/25/07	Fri 3/1/13			
and the providence	Engineering & Design Consultant Services	262 days?	Mon 6/25/07	Tue 6/24/08			
3	Request for Draft SOW	1 day	Mon 6/25/07	Mon 6/25/07			
4	1st DRAFT SOW received	40 days	Mon 6/25/07	Fri 8/17/07			
5	ERM review	30 days?	Fri 8/17/07	Thu 9/27/07			
6	2nd DRAFT SOW received	29 days?	Thu 9/27/07	Tue 11/6/07			
7	ERM review	113 days?	Tue 11/6/07	Thu 4/10/08			
з 💽	3rd DRAFT SOW received	10 days	Thu 4/10/08	Wed 4/23/08			
	DRAFT sent FDEP for review & comment	-					
		1 day?	Thu 5/1/08	Thu 5/1/08			
0	ERM Review	11 days?	Thu 5/1/08	Thu 5/15/08			
1	DEP Approval Received	25 days?	Thu 5/1/08	Wed 6/4/08			
2	FINAL SOW received	10 days?	Wed 6/11/08	Tue 6/24/08			
3	Federal FUNDING Coordination	241 days?	Tue 9/4/07	Tue 8/5/08			
4 🖸 🔶	Letter sent to ACOE requesting PCA updating	1 day?	Tue 9/4/07	Tue 9/4/07			
5	ACOE informs County that GRR is required	1 day?	Thu 3/13/08	Thu 3/13/08			
3	County sends letter to the ACOE requesting that	-	Thu 5/22/08	Thu 5/22/08			
	the GRR be reconsidered	( uay :	Thu 5/22/00	110 3/22/00			
E E	ACOE sends confirmation that a Section 934	22 days?	Mon 5/26/08	Tue 6/24/08			
1600ar	Report can be completed	22 0dy5:	1001 5/20/00	100 0/24/00			
3	County & ACOE conference call to dicuss	1 day?	Wed 7/2/08	Wed 7/2/08			
	Section 934 Report	i uay:	Wed //2/00	Wed //2/00			
)	County provides project timeline & SHPO	1 day?	Thu 7/3/08	Thu 7/3/08			
	documents to ACOE Jacksonville Office	, uay:					
)	County & ACOE conference call	1 day?	Tue 7/22/08	Tue 7/22/08			
	,	, day :			20		
	EDED EUNDING Constitution		Nor Maria	T 01510-	20		
2	FDEP FUNDING Coordination	37 days?	Mon 6/16/08	Tue 8/5/08			
3 5	Request new FDEP Funding Agreement	1 day?	Mon 6/16/08	Mon 6/16/08			
			•• ·	<b>T</b>			
	Receive & review draft funding agreement	9 days?	Mon 7/21/08	Thu 7/31/08			
5	Signed FINAL Agreement Received	1 day?	Tue 8/5/08	Tue 8/5/08			
3	Engineering & Design Task Order Preparation	47 days?	Mon 6/16/08	Tue 8/19/08			
× •	Prepare Task Order & Board Item	30 days?	Mon 6/16/08	Fri 7/25/08			
3	BCC Approval	1 day?	Tue 8/19/08	Tue 8/19/08			
)	Verbal NTP		Tue 8/19/08	Tue 8/19/08			
		1 day?					
)	Engineering & Design SOW Deliverables	262 days?	Tue 8/19/08	Wed 8/19/09			
1	Task 1 Collect, Assemble, and Review Data;	47 days?	Tue 8/19/08	Wed			
	FDEP Meeting			10/22/08			
2	Report with Summary	47 days?	Tue 8/19/08	Wed 10/22/08			
3	Task 2: Engineering Design of Beach	69 days?	Tue 8/19/08	Fri 11/21/08			
	Restoration						
4 🛅	Part of permit application	69 days?	Tue 8/19/08	Fri 11/21/08			
5	Task 3: Borrow Area Design	70 days?	Tue 8/19/08	Mon 11/24/08			
5 a.	Appendix to permit application	70 days?	Tue 8/19/08	Mon 11/24/08			
7	Task 4: Permit Drawings	94 days?	Tue 8/19/08	Fri 12/26/08			
B 🔤	1 cover sheet/location map showing project	94 days?	Tue 8/19/08	Fri 12/26/08			
· 🗂	location, sponsor, date, project name and	54 days:	100 0/15/00	111 12/20/00			
	other pertinent information						
9	1 borrow area plan view sheet showing	94 days?	Tue 8/19/08	Fri 12/26/08			
	existing bathymetry, core boring locations,						
	territorial sea limits, and specific area of the						
	proposed dredge area						
	20 borrow area sheets showing core boring	94 days?	Tue 8/19/08	Fri 12/26/08			
	logs and sediment grain size distributions for	•					
	the proposed borrow area						
	4 borrow area sheets showing cross section	94 days?	Tue 8/19/08	Fri 12/26/08			
	views of the proposed dredging area		<b>.</b>	<b>_</b>			
	4 plan view sheets showing existing beach	94 days?	Tue 8/19/08	Fri 12/26/08			
	conditions (2008)						
	4 plan view sheets showing project beach conditions including construction and	94 days?	Tue 8/19/08	Fri 12/26/08			
	conditions including construction and equilibrium fills and the landward limits of						
	hardbottom						
	8 sheets showing beach fill cross-section	94 days?	Tue 8/19/08	Fri 12/26/08			
÷	o sneets showing beach hill cross-section views of construction and equilibrium profile:		108 0/19/08	111 12/20/08			
	2 detail sheets		Tue 8/19/08	Fri 12/26/08			
		94 days?					
	6 contingency sheets	94 days?	Tue 8/19/08	Fri 12/26/08			
·	Task 5 Natural Resources Narrative	94 days?	Tue 8/19/08	Fri 12/26/08			
	Narrative	94 days?	Tue 8/19/08	Fri 12/26/08			
•	Task 6: FDEP Permit Request	123 days?	Tue 8/19/08	Thu 2/5/09			
	Permit Application (4 hardcopies)	123 days?	Tue 8/19/08	Thu 2/5/09			
	Task 7: Response to FDEP RAI	66 days?	Mon 3/2/09	Mon 6/1/09			
	Hardcopy and digital documents	66 days?	Mon 3/2/09	Mon 6/1/09			
•	Task 8: Department of Army Permit Application Revision	205 days?	Tue 8/19/08	Mon 6/1/09			
		205 d2	Tuo 8/40/00	Mon 6/1/09			
	Hardcopy and digital documents	205 days?	Tue 8/19/08				
5	Task 9: Project Coordination	262 days?	Tue 8/19/08	Wed 8/19/09			
5 <b>-</b>	County meetings	262 days?	Tue 8/19/08	Wed 8/19/09			
7	Section 934 Report SOW	241 days?	Wed 7/2/08	Wed 6/3/09			
3	Request Section 934 SOW from consultant	1 day?	Wed 7/2/08	Wed 7/2/08			
)	DRAFT Section 934 SOW received	23 days?	Thu 7/3/08	Mon 8/4/08	58		
	Task	Milestone			External Tasks		
							~
	_Carlin_sp2 /08 Split	Summary			External Milestone	12	
ect: Jupiter e: Tue 8/12		Summary Project Sun			External Milestone Deadline	80 12	$\mathcal{O}$

	Task Name	Duration	Start	Finish	Predecessors	Resource	Names	
0	ERM review of DRAFT Section 934 SOW	5 days	Tue 8/5/08	Mon 8/11/08	59			
	FINAL Section 934 SOW received	5 days	Tue 8/12/08	Mon 8/18/08				
	BCC approval & verbal NTP				60			
3	DRAFT Section 934 received	1 day?	Tue 9/23/08	Tue 9/23/08	<u>.</u>			
	County & ACOE review of DRAFT report	130 days?	Wed 9/24/08	Tue 3/24/09				
	FINAL Section 934 Report Received	30 days?	Wed 3/25/09	Tue 5/5/09			·	
	FINAL Section 334 Report Received	20 days	Wed 5/6/09	Tue 6/2/09				
					65			
					65			
21								
					74			
					74			
	Plans & Specs	79 days?	Wed 4/1/00		75			
	DRAFT Plans & Specs	•	Wed 4/1/09	Mon 7/20/09				
	DEP Review & Approval	44 days?	Wed 4/1/09	Mon 6/1/09	70			
	Final Plans & Specs	30 days	Tue 6/2/09	Mon 7/13/09 Mon 7/20/09				
1	Construction Contractor Selection	5 days	Tue 7/14/09		13			
	Prepare IFB	1146 days?	Fri 10/10/08	Fri 3/1/13				
		20 days	Mon 7/20/09	Fri 8/14/09	00			
کتا .	Pre Bid Site Visit	1 day	Mon 8/17/09	Mon 8/17/09				
	Pre Bid Meeting	1 day?	Tue 8/18/09	Tue 8/18/09				
	Advertise for Bids	30 days	Wed 8/19/09	Tue 9/29/09				
	IFB Quality Assurance	5 days	Wed 9/30/09	Tue 10/6/09				
	Bid Opening	1 day	Thu 10/8/09	Thu 10/8/09				
	Bid Evaluation	10 days	Fri 10/9/09	Thu 10/22/09				
	Intent Notice to Award & Send Contract	1 day?	Fri 10/23/09	Fri 10/23/09				
	Bid Posting	6 days	Mon 10/26/09	Mon 11/2/09				
	Contractor Sign/ Insurance/ Bond	5 days	Tue 11/3/09	Mon 11/9/09				
	Review Contract/ Insurance/ Bond	10 days	Tue 11/10/09	Mon 11/23/09				
	Sign Contract	5 days	Tue 11/24/09	Mon 11/30/09	92			
	Notice to Proceed	1 day	Tue 12/1/09	Tue 12/1/09				
	Pre Construction Meeting	1 day?	Wed 12/2/09	Wed 12/2/09	94			
	Construction	61 days	Thu 12/3/09	Thu 2/25/10				
	Mobilization	5 days	Thu 12/3/09	Wed 12/9/09	95			
	Construction&Demobilization	56 days	Thu 12/10/09	Thu 2/25/10	97			
	Pre & Post Construction Monitoring	786 days?	Fri 2/26/10	Fri 3/1/13				
	Sand Compaction/Tilling	2 days	Fri 2/26/10	Mon 3/1/10	98			
	Post Construction Engineering Report 12 mo	262 days?	Fri 2/26/10	Mon 2/28/11	98			
37 <b>-</b>	Post Construction Engineering Report 24 mo	261 days?	Tue 3/1/11	Tue 2/28/12	101			
	Post Construction Engineering Report 36 mo	263 days?	Wed 2/29/12	Fri 3/1/13	102			
	Quarterly Reports	265 days?	Fri 10/10/08	Thu 10/15/09				
2.	Q3 2008	7 days?	Fri 10/10/08	Mon 10/20/08				
10 <b>-</b>	Q4 2008	11 days?	Thu 1/1/09	Thu 1/15/09				
	Q1 2009	11 days?	Wed 4/1/09	Wed 4/15/09				
	Q2 2009	11 days?	Wed 7/1/09	Wed 7/15/09				
< •	Q3 2009	11 days?	Thu 10/1/09	Thu 10/15/09				
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	Task	] Milestone		E	xternal Tasks			
ct: Jupiter_C Tue 8/12/08	Carlin_sp2					e []	11	) }
t: Jupiter_C Tue 8/12/08	Carlin_sp2	<ul> <li>Milestone</li> <li>Summary</li> <li>Project Sumi</li> </ul>		E	External Tasks External Mileston Deadline	e []	10	)



### JUPITER BEACH EROSION CONTROL/DUNE RESTORATION PROJECT

### **Project Description**

Dune restoration and maintenance for 0.6 miles of beach adjacent to the Jupiter Inlet in Palm Beach County. A primary dune was reestablished along the project area as part of the first beach nourishment project in 1995. The dune remained stable until it was almost completely eroded during sub-Tropical Storm Andrea (May, 2007) and restored during the winter 2007/2008. An additional dune restoration is expected to be required until a more permanent structural solution can be built. A feasibility study to further define the best erosion control solution for this hot spot is underway. The dunes will be restored during the winter of 2009/2010 to protect upland structures and sea turtle nesting habitat.

### Location

Between DEP range monuments R13 and R16.5 in Palm Beach County (location map attached).

#### **Project Evaluation**

<u>Severity of Erosion</u>: Half of the project area includes habitable structures, including one hotel and one condominium. The remaining half of the project area is developed public park area. There is currently no shoreline armoring present in the project area, however a steel sheet pile wall is planned to be constructed in November 2008 to protect the public bathroom building and associated lift station, which have been closed since May 2007.

Wind driven waves associated with sub-tropical Storm Andrea (May, 2007) resulted in a total loss of dune and berm throughout the area, destroyed a parks maintenance structure and threatened the bathroom building in Jupiter Beach Park. Emergency permits were issued (PB-899 E M1) and approximately 25,000 yd<sup>3</sup> of beach-quality fill was be used to reconstruct the dune throughout the area after November 1, 2007. This emergency fill was included for funding under DEP agreement 07PB2. Recent post-construction surveys, which take into effect the periodic influx of sand from inlet bypassing and ICWW dredging projects, combined with the effects of the 2004 and 2005 storm seasons calculated the erosion rate on the project area from the top of dune out to -30 ft-NGVD (R13 –

seasons, calculated the erosion rate on the project area from the toe of dune out to -30 ft-NGVD (R13 – R16). From 2001 through 2006, these surveys show the volume loss in the project area is approximately 57.6 cy/ft/yr (Taylor Engineering, Jupiter Carlin Shore Protection 48-month monitoring report, May 2008).

<u>Benefits:</u> The project is designed to provide long-term storm protection, retain sand within the coastal system, aesthetically enhance the area, and provide habitat for endangered plant and animal species. The beach is publicly accessible in an area heavily utilized by both the local population and visitors. Approximately 50% of the project area lies within a county park. The Jupiter Beach Resort, with 159 guest rooms, fronts 8% of the project length. Hurricane evacuation routes in the project area include Route A1A which runs N-S along the entire project, and Indiantown Road which runs E-W and is centrally located within the project area. Threatened and endangered marine turtles utilize the entire project area for nesting, however this beach is not a designated marine turtle refuge. The attached map identifies public beach access points with associated parking spaces.

<u>Federal Funding</u>: Currently there is no Federal participation authorized for the erosion control structural alternative or the dune reconstruction and maintenance in the project area.

<u>State Commitment:</u> The emergency dune restoration was approved and funded by the state. The project is located in an area designated as critically eroded in this Plan. This project has been determined to be 100% eligible for State funding. DEP grant agreement #07PB4 currently provides funding for the feasibility study.

Local Commitment & Capability: The project is consistent with the local government comprehensive plan and the local sponsor supports the Department's beach management activities as set forth under Part 1, Chapter 161, Florida Statutes. A long-range budget plan and dedicated funding sources are in place. The degree of local funding proposed is detailed in the attached financial schedule. Palm Beach County will use staff for project management of all phases of beach work. The County has retained the services of a professional coastal engineering firm to assist in feasibility, design, permitting, and other project related activities. The administrative capability of the local sponsor has been demonstrated by the successful completion of the initial phase of this project as well as many others.

<u>Project Performance</u>: The dune within the project limits (Jupiter Beach Park) was stabilized with vegetation and walkovers and provided enhanced shore protection consistent with the natural system since first built in 1995. The extreme north end of the project (R-13 through R-15) experienced a near total loss of berm and dune in May 2007 due to wind and waves associated with Sub-Tropical Storm Andrea. Portions of this beach have not recovered fully from the hurricanes of 2004 and 2005 (Taylor

Jupiter erosion control and dune restoration project

#### Page 2 of 2

Engineering, Jupiter Carlin Shore Protection 48-month monitoring report, May 2008), and additional solutions are being sought for this beach. The emergency dune project will provide immediate protection to upland structures and habitat and a feasibility study is underway to address the erosional hot spot in the north end of the project area.

<u>Innovative Applications:</u> The planned structures will provide options to extend the required nourishment intervals. Extending the nourishment interval will minimize the environmental impacts from maintaining the beach, especially in an area of high sea turtle nesting densities. The use of structures in this area will also reduce impact to nearshore reefs which exist within the vicinity of the project.

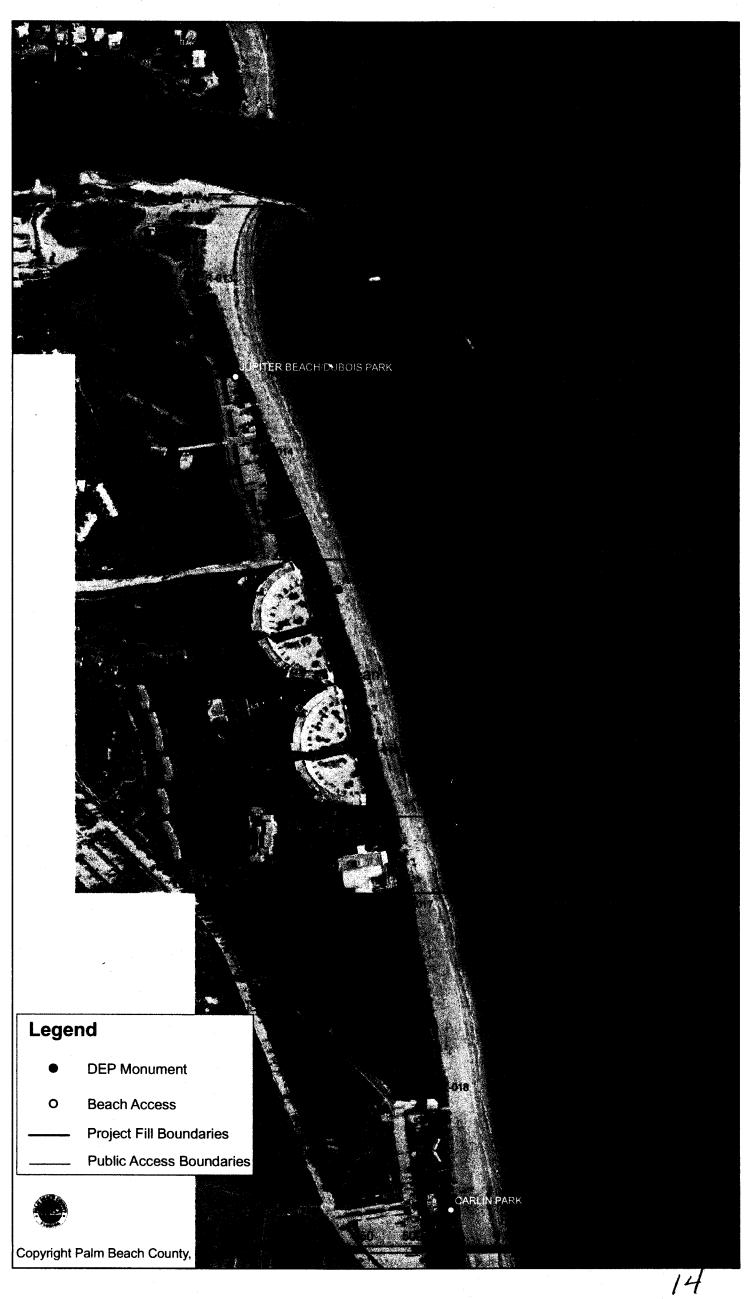
Dune construction templates are based on previous designs and are not expected to change. Restoring a dune structure on a high density nesting beach has provided the Sponsor with unique challenges, however. We continue to work closely with FFWCC to ensure sea turtle safety and protection throughout the new dune area. Special consideration was taken to prevent turtles from accessing the parking lot and road immediately west of the dune.

### **Use of Program Funds**

The requested funding for FY 2009-10 for this area will be used for any dune restoration necessary to protect upland structures and for the pre-construction environmental monitoring, feasibility study, and construction of structures for this area. Funding for the design/permitting of structures was authorized in the 2006/2007 funding cycle. Additional study is necessary to account for the severe erosion this area is experiencing.

Aerial surveys and regional (profiles and hydrographic) monitoring will be funded through the Countywide Monitoring Agreement (#06PB3).

Attachments: Project map, MPP timeline



ID	0	Task Name	Duration	Start	Finish	Physical %
1	<u> </u>	Jupiter-Carlin Structures Project	389 days?	Mon 5/1/06	Thu 10/25/07	Complete 0°
2	$\checkmark$	1st Draft proposal submitted to ERM	38 days	Mon 5/1/06	Wed 6/21/06	100
3	V	ERM Review	8 days	Thu 6/22/06	Mon 7/3/06	100
4	$\overline{\mathbf{v}}$	2nd draft proposal submitted to ERM	39 days	Tue 7/4/06	Fri 8/25/06	100
5	<b>₩</b>	ERM Review	2 days	Fri 8/25/06	Mon 8/28/06	100
6		3rd draft proposal submitted to ERM	69 days	Mon 8/28/06	Thu 11/30/06	100
7		ERM review	21 days	Fri 12/1/06	Fri 12/29/06	100
8		4th draft proposal submitted to ERM	18 days?	Mon 1/1/07	Wed 1/24/07	100
9		FDEP comments received	30 days?	Wed 12/20/06	Tue 1/30/07	100
10		ERM Review	54 days?	Thu 1/25/07	Tue 4/10/07	100
11		5th draft proposal submitted to ERM	79 days?	Tue 4/10/07	Fri 7/27/07	100
12		FDEP Approval Received	123 days?	Tue 3/6/07	Thu 8/23/07	100
13		Task Order	262 days?	Mon 10/16/06	Tue 10/16/07	0'
	<b>√</b>			Mon 8/20/07	Thu 9/13/07	100
14	<ul> <li>✓</li> </ul>	Prepare Task Order & Board Item	19 days?			
15	$\checkmark$	BCC Approval	1 day?	Mon 10/16/06	Mon 10/16/06	100
16	$\checkmark$	Verbal NTP	1 day?	Tue 10/16/07	Tue 10/16/07	100
17	$\checkmark$	State Funding	49 days	Mon 8/20/07	Thu 10/25/07	0
18	$\checkmark$	Grant agreement received from DEP	31 days	Mon 8/20/07	Mon 10/1/07	100
19	$\checkmark$	BCC approval	1 day	Tue 10/16/07	Tue 10/16/07	100
20	$\checkmark$	Signed agreement returned to DEP	8 days	Tue 10/16/07	Thu 10/25/07	100
21	1	Feasibility Study	867 days?	Wed 6/21/06	Thu 10/15/09	0
22	1	Task 1: Evaluate Historic Beach Performance	83 days?	Wed 6/21/06	Fri 10/13/06	97
00	300000		73 days?	Thu 11/1/07	Mon 2/11/08	100
23		Task 1 DRAFT Report Review				95
24		Task 2: Evaluate Changes in beach Behavior	89 days?	Wed 6/21/06	Mon 10/23/06	90
25		Task 2 DRAFT Report Review	90 days?	Mon 1/7/08	Fri 5/9/08	100
26		Task 3: Determine Beach Performance	71 days?	Wed 6/21/06	Wed 9/27/06	75
		Improvement Targets and Modeling Scenarios				
27		Task 3 DRAFT Report Review	91 days?	Fri 2/1/08	Fri 6/6/08	100
28		Task 4: Data Collection	128 days?	Mon 1/7/08	Wed 7/2/08	45
29		Receive FDEP approval of data collection plan	24 days?	Tue 1/22/08	Fri 2/22/08	100
30		Deployment #1 (winter)	30 days	Fri 3/28/08	Thu 5/8/08	100
				Thu 8/14/08	Wed 9/24/08	00
31		Deployment #2 (summer)	30 days			30
32	0	Task 5: Model Setup, Calibration & validation	162 days?	Fri 2/1/08	Mon 9/15/08	. J
33		Setup	22 days .	Fri 2/1/08	Mon 3/3/08	100
34		Calibration	67 days?	Mon 3/17/08	Tue 6/17/08	50
35		Validation	33 days?	Mon 9/1/08	Wed 10/15/08	C
36		Task 6: Evaulate Design Alternatives	43 days?	Wed 10/1/08	Fri 11/28/08	1
37		Task 7: FDEP Reports	215 days?	Mon 2/4/08	Fri 11/28/08	(
38		First Report	40 days?	Fri 6/6/08	Thu 7/31/08	
39		Second Report	31 days?	Wed 10/1/08	Wed 11/12/08	(
40		Third Report	30 days?	Mon 12/22/08	Fri 1/30/09	(
40		Task 8: Environmental Charaacterization & EA	296 days?	Wed 10/17/07	Wed 12/3/08	20
<del>,</del> 1		Preparation				1
42		Feasibility study draft	296 days	Wed 10/17/07	Wed 12/3/08	(
43		ERM review	23 days	Thu 12/4/08	Mon 1/5/09	(
44		Feasibility study approved by DEP	30 days	Wed 12/3/08	Tue 1/13/09	(
45		Task 9: State & Federal Permitting	111 days?	Mon 1/5/09	Mon 6/8/09	(
46		Application Submitted	30 days	Mon 1/5/09	Fri 2/13/09	(
47		DEP/ACOE 1st RAI/Response	49 days	Mon 2/23/09	Thu 4/30/09	(
48		DEP/ACOE 2nd RAI/Response	30 days	Fri 5/1/09	Thu 6/11/09	(
49		Receipt of DEP permit	90 days	Fri 6/12/09	Thu 10/15/09	(
50		Receipt of USACE permit	90 days	Fri 6/12/09	Thu 10/15/09	(
51		Plans & Specs	66 days?	Fri 10/16/09	Fri 1/15/10	(
52		Prepare Plans & Specs	66 days?	Fri 10/16/09	Fri 1/15/10	(
53		Construction Contractor Selection	195 days?	Mon 1/18/10	Fri 10/15/10	(
53		Prepare IFB	20 days	Mon 1/18/10	Fri 2/12/10	
			20 0030			
		Task	Project	Summary		
		Split	Externa	l Tasks		
roject	t: structu	res timeline	1 1 1 1 1 1 1 1			
	Tue 8/12/		Externa	I Milestone		
				-		
		Milestone	Deadlin	e		

Page 1

ID	0	Task Name	Duration	Start	Finish	Physical % Complete
55		Pre Bid Site Visit	1 day?	Mon 2/22/10	Mon 2/22/10	0%
56		Pre Bid Meeting	1 day?	Thu 3/25/10	Thu 3/25/10	0%
57		Advertise for Bids	30 days	Fri 3/26/10	Thu 5/6/10	0°
58		IFB Quality Assurance	5 days	Fri 5/7/10	Thu 5/13/10	00
59		Bid Opening	1 day?	Fri 5/14/10	Fri 5/14/10	0
60		Bid Evaluation	10 days	Mon 5/17/10	Fri 5/28/10	0
61		Intent Notice to Award & Send Contract	1 day?	Mon 5/31/10	Mon 5/31/10	0
62		Bid Posting	6 days	Tue 6/1/10	Tue 6/8/10	0
63	-	Contractor Sign/ Insurance/ Bond	5 days	Wed 6/9/10	Tue 6/15/10	0
64		Review Contract/ Insurance/ Bond	10 days	Wed 6/16/10	Tue 6/29/10	0
65		Sign Contract	5 days	Wed 6/30/10	Tue 7/6/10	0
66	-	Notice to Proceed	1 day?	Wed 7/7/10	Wed 7/7/10	0
67		Pre Construction Meeting	1 day?	Thu 7/8/10	Thu 7/8/10	0
68	-	Construct Rock Structures	66 days	Fri 7/9/10	Fri 10/8/10	0
69	0	Mobilization	5 days	Fri 7/9/10	Thu 7/15/10	0
70	5	Construction	56 days	Fri 7/16/10	Fri 10/1/10	C
71	+	Demobilization	5 days	Mon 10/4/10	Fri 10/8/10	C
72		Post-construction Monitoring	5 days	Mon 10/11/10	Fri 10/15/10	0
73	-	Biological monitoring	5 days	Mon 10/11/10	Fri 10/15/10	0
74	1	Physical monitoring	5 days	Mon 10/11/10	Fri 10/15/10	0
75		Quarterly Reports	194 days?	Mon 4/21/08	Thu 1/15/09	0
76	17 m	Q1 Report 2008	6 days?	Mon 4/21/08	Mon 4/28/08	100
77		Q2 Report 2008	7 days?	Mon 7/14/08	Tue 7/22/08	90
78		Q3 Report 2008	1 day?	Wed 10/15/08	Wed 10/15/08	0
79		Q4 Report 2008	1 day?	Thu 1/15/09	Thu 1/15/09	· C

	Task	i Solatindi, Balada din	Project Summary
	Split		External Tasks
Project: structures timeline Date: Tue 8/12/08	Progress		External Milestone
	Milestone	•	Deadline
	Summary		16
	· · · ·	Page 2	

### JUNO BEACH SHORE PROTECTION PROJECT

#### **Project Description**

Renourishment of approximately 2.4 miles of critically eroding shoreline beginning 2.2 miles downdrift of Jupiter Inlet. The original project was completed in 2001 and impacted by the hurricanes of 2004 and 2005. Renourishment is on schedule to be completed during winter 2008/2009.

### Location

Palm Beach County, R-26 - R-38 (fill area), map attached.

### **Project Evaluation**

<u>Severity of Erosion</u>: The area is designated critically eroded by the Florida State Department of Environmental Protection. The hurricanes of 2004 caused the loss of 251,000 cubic yards of material from the beach profile. Between 1990 and 1996, the beach and dune system out to -18 ft NGVD eroded 860,000 yds<sup>3</sup>, which is equivalent to an average erosion rate of -9.3 cy/ft/yr. Most recently, pre-construction engineering surveys have revealed that the erosional rate in the project area from 2001 - 2005 averages -10.75 cy/ft/yr.

<u>Benefits</u>: The project is designed to provide long-term storm protection, retain sand within the coastal system, aesthetically enhance the area, and provide habitat for endangered plant and animal species. A total of 100% of the shoreline is available for public recreational use. Approximately 60% of the project area (7,820 ft) is publicly owned land, parks, and public beach access ways (Diamondhead/Radnor, Ocean Cay, Juno Beach Park, Juno Dunes, and Loggerhead Park). Juno Beach is one of the highest nesting density beaches for threatened and endangered sea turtles in the United States. Shorebirds (including piping plovers) utilize this beach extensively for foraging purposes and a pair of nesting killdeer has fledged chicks on this beach each summer since 2005.

A total of 100% of the project area consists of either habitable dwellings or hurricane evacuation routes. Shoreline development within the area of fill (R-26 through R-38) is approximately 40 % (5,250 ft) multifamily/commercial structures. Hurricane evacuation routes in the project area include Route A1A which runs N-S along the entire project area and is less than 20' from the dune crest in some sections, and Donald Ross Road which runs E-W and is centrally located within the project area.

The attached map identifies public beach access points with associated parking spaces.

<u>Federal Funding:</u> The Juno Beach project has not been federally authorized, however a one-time allotment of \$1.9 million has been awarded to repair damages to the beach as a result of the 2004 hurricanes. This money, authorized by FEMA, will be used towards design and construction costs of the renourishment currently scheduled to begin construction in the fall of 2008.

Local Commitment: The project is consistent with the local government comprehensive plan and the local sponsor supports the Department's beach management activities as set forth under Part 1, Chapter 161, Florida Statutes. A long-range budget plan and dedicated funding sources are in place. The degree of local funding proposed is detailed in the attached financial schedule. Palm Beach County will use staff for project management of all phases of beach work and required monitoring. The County has retained the services of a professional coastal engineering firm to assist in feasibility, design, permitting, and other project related activities. The administrative capability of the local sponsor has been demonstrated by the successful completion of the initial phase of this project as well as many others.

<u>State Commitment</u>: The project is recommended in the Department's Strategic Beach Management Plan and is located in an area designated as critically eroded in this Plan. This project has been determined to be 100% eligible for State funding.

The original grant for this project (98PB2) expired on September 30, 2006. Additional funds for the construction of this project were awarded in the 2007/2008 funding cycle, however a grant agreement to encumber these funds has not yet been executed.

Performance of the Project: The project design was based on the GDM & EIS and provides for greater than 15 year return interval storm protection. The dune within the project limits is stabilized with vegetation and walkovers and provides enhanced shore protection consistent with the natural system. Hot spot erosion areas at R-26 through R-29 and R-30 through R-33 are included in the area of fill. The project area is 2.2 miles downdrift of Jupiter Inlet. Jupiter Inlet is estimated to have a volumetric impact on downdrift beaches of 1.65 million cy/yr (Bodge, 1994) and, based on beach profile surveys, this volume of cumulative total sediment loss affects the Juno Beach project area and well south of it as specified in the 1998 Feasibility Study. The fill is //

### Juno Beach Shore Protection Project

#### Page 2 of 2

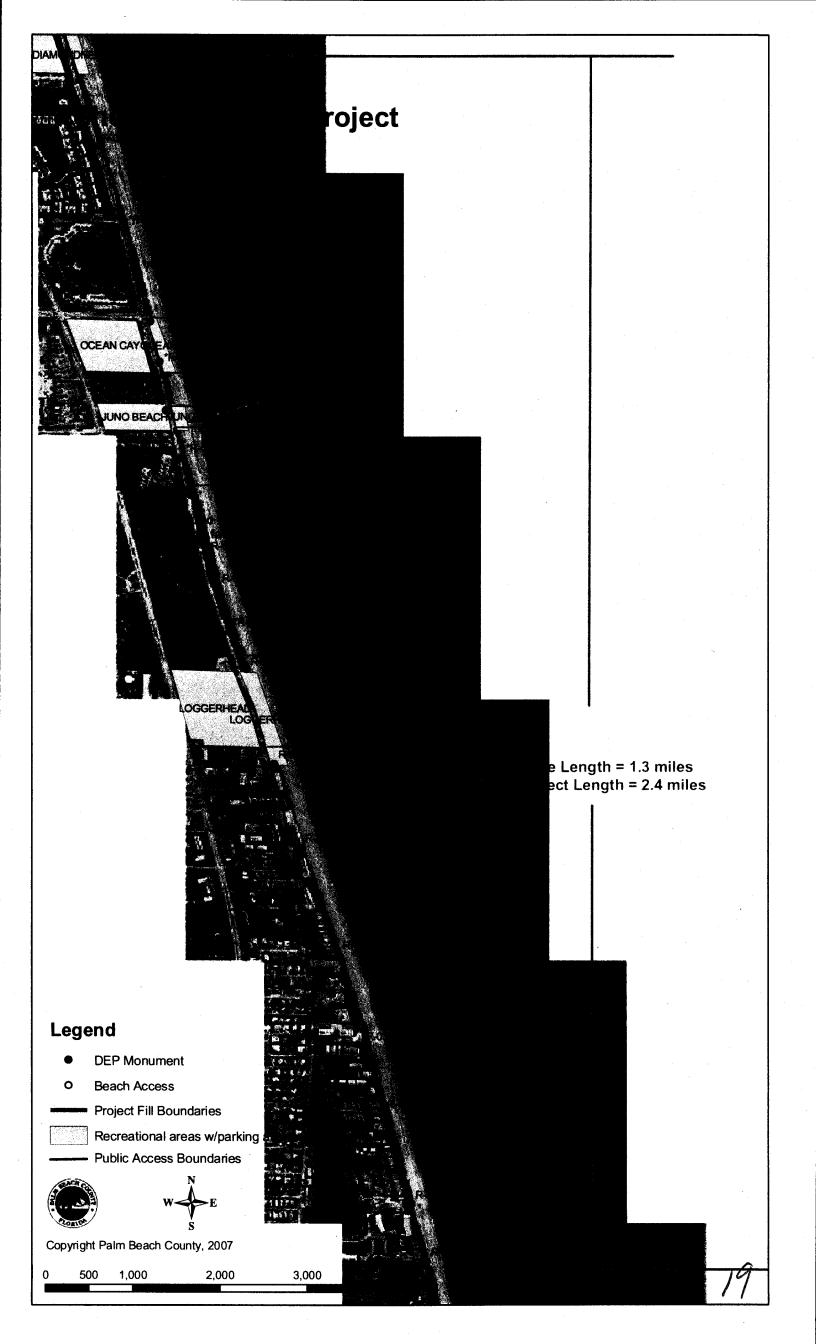
expected to provide 100% of the sand needed to maintain the downdrift beaches without impacting the local nearshore habitat.

<u>Use of Innovative Technology</u>: The original project was constructed using conventional beach fill methods and design. It is anticipated that the upcoming renourishment will utilize similar technology; however, the County continues to work with the DEP to modify the fill profile design with the intent of reducing the impact of this renourishment event on sea turtle nesting. It is the County's opinion that size of the fill and comparison areas and the fact that detailed sea turtle nesting and reproductive data is available for the past 10 years make this fill project the ideal location for an experimental fill template design.

#### **Use of Program Funds**

Funds requested for FY2009 - 10 will be used to support project-specific monitoring required by permit (currently sea turtle, shorebird, and nearshore reef). It is the opinion of the Sponsor that detailed, project-specific monitoring is best funded through individual project-specific funding agreements. Aerial surveys and regional (profiles and hydrographic) monitoring will continue to be funded through the Countywide Monitoring Agreement (#06PB3).

Attachments: Project Map, MPP timeline



0	Task Name	Duration	Start	Finish	Predecessor
	Juno Beach Renourishment	1086 days?	Tue 8/30/05	Tue 10/27/09	
	Renourishment Planning Engineering and Design	852 days	Tue 8/30/05	Wed 12/3/08	
	Engineering Services Scope of Work	852 days	Tue 8/30/05	Wed 12/3/08	
	Develop Scope of Work	561 days	Tue 8/30/05	Tue 10/23/07	
	Initial Nourishment Performance Evaluation	264 days	Mon 1/1/07	Thu 1/3/08	
	Beach Fill Design	287 days	Mon 1/1/07	Tue 2/5/08	
	Establish Specific Borrow Area Cut Configuration	278 days	Mon 1/1/07	Wed 1/23/08	
	Side Scan Sonar and Magnetometer Surveys of Candidate Are	219 days	Thu 2/1/07	Tue 12/4/07	
	Coordination of Borrow Area Authorization with SHPO	167 days	Mon 4/2/07	Tue 11/20/07	
	Borrow Area Easement	17 days	Sun 7/1/07	Tue 7/24/07	
		-	Thu 3/15/07	Mon 4/14/08	
	Borrow Area QA/QC Plan	283 days			
	Project Permitting	503 days	Mon 1/1/07	Wed 12/3/08	
	JCP Permit Application Preparation	90 days	Mon 1/1/07	Fri 5/4/07	
	Draft Permit Application	65 days	Mon 1/1/07	Fri 3/30/07	
	Final Draft Permit Application	21 days	Mon 4/2/07	Mon 4/30/07	
	Final Permit Application	4 days	Tue 5/1/07	Fri 5/4/07	
	<b>Respond to FDEP Requests for Additional Information</b>	392 days	Tue 6/5/07	Wed 12/3/08	
	1st Response to FDEP Requests for Additional Informati	30 days	Tue 6/5/07	Mon 7/16/07	
	2nd Response to FDEP Requests For Additional Information	6.15 mons	Mon 8/13/07	Wed 1/30/08	63
	FDEP Review	30 edays	Mon 1/28/08	Wed 2/27/08	64
	3rd Response to FDEP Requests for Additional Informati	75 days	Mon 3/3/08	Fri 6/13/08	65
	FDEP Review	31 edays	Fri 6/13/08	Mon 7/14/08	66
	4th Response to FDEP RAI -	4 days	Tue 7/15/08	Fri 7/18/08	
	DEP publishes intent To Issue	31 edays	Fri 7/18/08	Mon 8/18/08	
		30 edays	Mon 8/18/08	Wed 9/17/08	
	Receive draft DEP permit	-		Thu 10/16/08	
· ·	DEP issues Permit	90 edays	Fri 7/18/08		
	DEP issues Notice to Proceed	10 edays	Sun 11/23/08	Wed 12/3/08	11,18,11
·	COE Coordination + NEPA permitting	407 days	Mon 5/7/07	Tue 11/25/08	
	JCP permit application to COE	1 day	Mon 5/7/07	Mon 5/7/07	61
	Respond to Federal Agency Comments	88 days	Thu 2/21/08	Fri 7/11/08	
	Federal Agency Comment Period	95 days	Fri 7/11/08	Sun 11/23/08	
	NMFS response (concurrence letter)	135 edays	Fri 7/11/08	Sun 11/23/08	75
	FWS B.O.	135 edays	Fri 7/11/08	Sun 11/23/08	75
1 e 10 e 1	COE issues Draft Permit	2 days	Thu 9/18/08	Fri 9/19/08	70
wi i	COE issues Permit	2 days	Mon 11/24/08	Tue 11/25/08	78
	Meetings and Consultations	1 day	Thu 9/13/07	Thu 9/13/07	
	Nearshore Hardbottom Assessment	334 days	Thu 2/1/07	Tue 5/13/08	
_	Construction	213 days	Mon 6/2/08	Wed 3/25/09	
•		-	Mon 6/2/08	Fri 9/5/08	
	Plans and Specs	70 days		Fri 8/1/08	
č:∎	Draft Plans and specs	45 days	Mon 6/2/08		0.0
	DEP Authorization of Plans and Specs	30 edays	Fri 8/1/08	Sun 8/31/08	
	Final Plans and Specs	5 days	Mon 9/1/08	Fri 9/5/08	99
	Construction Contract	53 days	Mon 9/22/08	Wed 12/3/08	
	Prepare IFB	1 day	Mon 9/22/08	Mon 9/22/08	
	Palm Beach Post Receives IFB Ad	0 days	Wed 9/24/08	Wed 9/24/08	102FS+1 d
ы.	IFB Advertised in Newspaper	0 days	Sun 9/28/08	Sun 9/28/08	103FS+1 d
193	Manage Sale of Bid Documents & Addenda	22 days	Mon 9/29/08	Tue 10/28/08	104
	Pre-bid Meeting	1 day	Tue 10/7/08	Tue 10/7/08	104FS+6 (
	Pre-bid Site Visit	1 day	Wed 10/8/08	Wed 10/8/08	104FS+6 d
·	Open Bid	2 hrs	Tue 10/28/08	Tue 10/28/08	104FS+29
	Send Bid to OSBA for Approval	1 day	Tue 10/28/08	Wed 10/29/08	
ø	Evaluate Bids	2 days	Tue 10/28/08	Thu 10/30/08	
11 A		2 days 0 days	Fri 10/31/08	Fri 10/31/08	
	Receive OSBA Approval	0 days 1 hr	Fri 10/31/08	Fri 10/31/08	
	Post Intent of Notice to Award & Send Contract				
<b>6</b>	Prepare Agenda Item	1 day	Fri 10/31/08	Mon 11/3/08	
1 (B)	Receive Signed Contract/Insurance/Bond	0 days	Fri 11/7/08		112FS+7
	Review Contract/Insurance/Bond	1 day	Fri 11/7/08	Mon 11/10/08	
	Send contract Downtown	1 day	Mon 11/10/08	Tue 11/11/08	
	Admin Reviews Agenda Item	1 day	Mon 11/3/08	Tue 11/4/08	113
	Send Agenda Item Downtown	1 day	Tue 11/4/08	Wed 11/5/08	117
	BCC Meeting - Contract Approved	1 day	Tue 12/2/08	Tue 12/2/08	118FS+20
	Pre Construction Meeting	1 day	Wed 12/3/08	Wed 12/3/08	119
	Active Construction	80 days	Thu 12/4/08	Wed 3/25/09	
	Notice To Proceed	1 day	Thu 12/4/08	Thu 12/4/08	
47	Mobilization	7 edays	Thu 12/4/08	Thu 12/11/08	
			Thu 12/11/08	Thu 2/19/09	
	Construction	70 edays		Thu 2/19/09	
	Demobilization	7 edays	Thu 2/19/09		
	Substantial Completion	1 day	Fri 2/27/09	Fri 2/27/09	
	Contract Closeout	18 days	Mon 3/2/09	Wed 3/25/09	
<b>I</b>	Prepare Closeout Paperwork	10 days	Mon 3/2/09	Fri 3/13/09	
	CRC Meeting - Contract Closeout	1 day	Wed 3/25/09	Wed 3/25/09	128FS+1 (
	Monitoring	766 days?	Tue 11/21/06	Tue 10/27/09	
			· · · · · · · · · · · · · · · · · · ·		
 	Task Milestone		External	Tasks	
	timelinedb Cummon			Tasks Milestone 🚺	

D	Task Name	Duration	Start	Finish	Predecessors
0					
161	Funding	991 days?	Wed 3/1/06	Wed 12/16/09	
162	DEP	991 days	Wed 3/1/06	Wed 12/16/09	
163	DEP Quarterly reports	991 days	Wed 3/1/06	Wed 12/16/09	
164	2006	405 days	Wed 3/1/06	Tue 9/18/07	
169	2007	209 days	Thu 3/1/07	Tue 12/18/07	
174	2008	207 days	Mon 3/3/08	Tue 12/16/08	
175	Quarter 1 report	12 days	Mon 3/3/08	Tue 3/18/08	
176 📑	Quarter 2 report	12 days	Mon 6/2/08	Tue 6/17/08	
177 💽	Quarter 3 report	12 days	Mon 9/1/08	Tue 9/16/08	
178 📑	Quarter 4 report	12 days	Mon 12/1/08	Tue 12/16/08	
179	2009	208 days	Mon 3/2/09	Wed 12/16/09	
184	FEMA	1 day?	Thu 9/13/07	Thu 9/13/07	
185	Project Updates	30 days	Thu 9/13/07	Wed 10/24/07	

Project: revisedtimelinedb Date: Tue 8/12/08	Task	Milestone	External Tasks		
	Split	Summary	External Milesto	ne 🚺	
	Progress	Project Summary	Deadline	u	

### SINGER ISLAND SHORE PROTECTION PROJECT

#### **Project Description**

This project consists of design, permitting, construction, and monitoring associated with the restoration of 1.8 miles of coastline on Singer Island. The restored dune will reduce the impact of storms, add a reservoir of sand and help dissipate wave energy. Structures will be used to stabilize the beach. Permitting for this project is well underway and current schedules indicate a mid-2009 construction start.

#### Location

Palm Beach County, R-60.5 to R-68 (See attached location map.)

### **Project Evaluation**

<u>Severity of Erosion</u>: Rapid fluctuations in shoreline position threaten developed property along 76% of the project area. The project area is located within an area of critical erosion as designated by the Department; since 2001, erosion rates have been calculated up to -15 ft/yr. Recent hurricanes and storm activity have accelerated the beach erosion throughout the area. Dune restoration and plantings have been necessary each year to protect upland properties since 2004. The hurricanes of 2004 and 2005 destroyed the restored dunes and lowered the berm height. The beach has not recovered, and continues to be impacted by wind and waves due to winter storms and tropical activity, most recently Sub-Tropical Storm Andrea and Tropical Storm Noel.

<u>Benefits:</u> Shoreline development within the project area consists of multifamily/hotel structures and public park land, 80% of which lies within  $\frac{1}{2}$  mile of the Riviera Beach Municipal Park, Ocean Reef Park or MacArthur State Park. Public beach access, as shown on the attached map, allows for public and tourism use throughout the project area. Hurricane evacuation routes in the project area include Route A1A which runs N-S along the entire project area.

Threatened and endangered marine turtles utilize the entire project area for nesting purposes and protected plant species are located in the dunes.

<u>State Commitment:</u> The feasibility studies for the project were funded by the state (01PB1) and the project is included in the Strategic Beach Management Plan. The initial phase of dune restoration was funded by the state (01PB1), as were subsequent restorations (H5PB1) and design and initial permitting of erosion control structures (05PB2 and 06PB2). Most recently, this area was included under emergency funding grant 07PB2 for dune restoration.

Local Commitment & Capability: The project is consistent with the local government comprehensive plan and the local sponsor supports the Department's beach management activities as set forth under Part 1, Chapter 161, Florida Statutes. A long-range budget plan and dedicated funding sources are in place. Funds for the local share of the project costs are budgeted through tourism bed tax and ad valorem funding. The degree of local funding proposed is detailed in the attached financial schedule. Palm Beach County will use staff for project management of all phases of beach work, including dune replenishment and the erosion control structures. The County has retained the services of a professional coastal engineering firm to assist in feasibility, design, permitting, and other project related activities.

The administrative capability of the local sponsor has been demonstrated by the successful completion of the initial phase of this project as well as many others.

<u>Project Performance:</u> The project design is based on an updated feasibility study. The project is designed to enhance shore protection by the restoration of the native dunes and stabilization of the berm in an area where extensive near shore environmental resources would be impacted by beach nourishment. The structures will provide long term stabilization (>25 years) to the project area. The dune component of the project utilizes local sand resources to minimize cost. The proposed structures are based on the least-cost alternative suggested in the feasibility study and are designed to provide long-term stability.

<u>Innovative Applications:</u> The structural components are based on the use of innovative modeling technology to minimize the extent of construction necessary for shoreline stabilization. The combination of dune restoration and structural stabilization instead of conventional beach

# Singer Island Shore Protection Project

#### Page 2 of 2

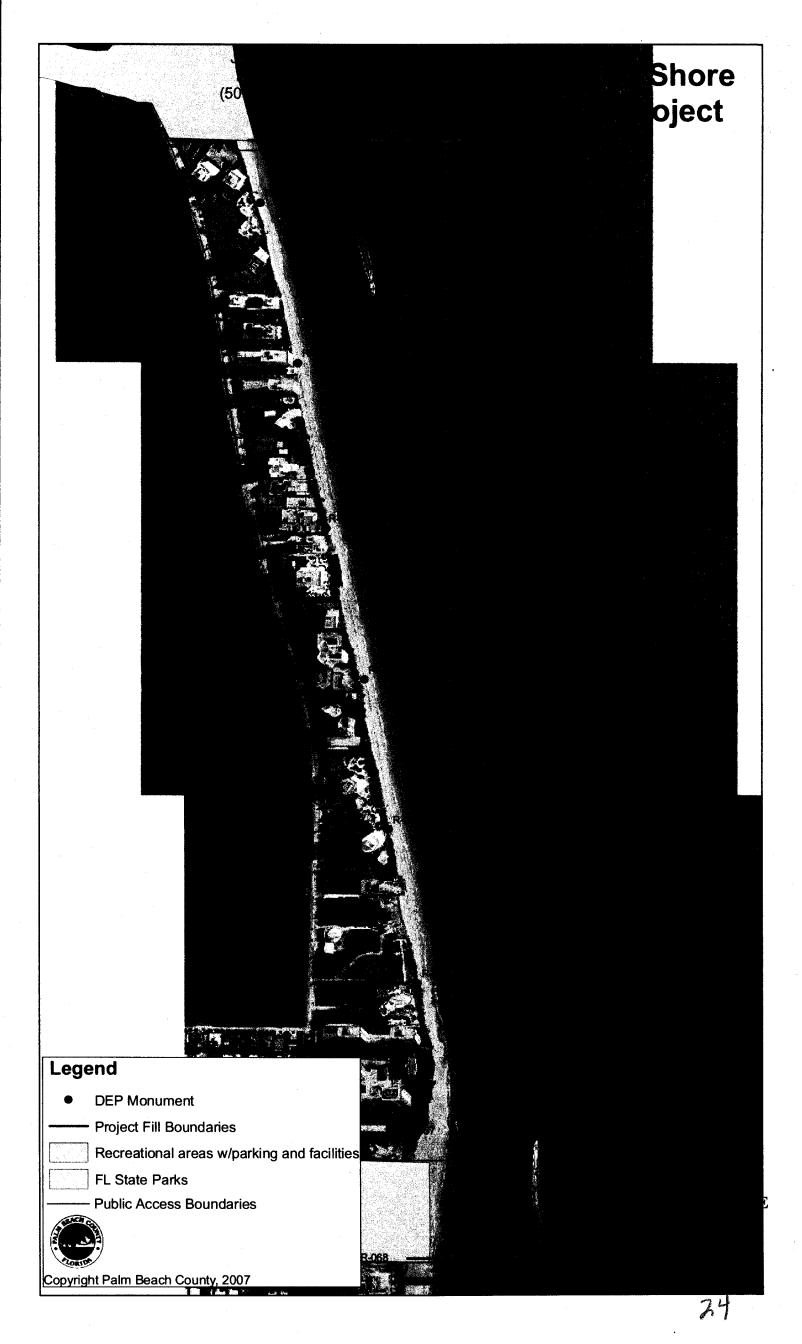
nourishment minimizes the potential impacts to nearshore hardbottom. Design changes are underway to further reduce impacts to nearshore reef, while still providing a measure of protection for the beach.

### **Use of Program Funds**

The requested funding for FY 2009-10 for this area will be used for the construction of structures and associated environmental monitoring for this area. The requested funding will be used supplement monies already appropriated for construction of the erosion control structures, as construction estimates have shown that actual costs are likely be close to \$30 million, and the money appropriated in previous funding years is not sufficient to meet this expense. Funds are also requested to be appropriated for periodic dune restoration as necessary to protect upland structures.

Project specific environmental monitoring to be funded includes sea turtle nesting and reproductive success, shorebird populations, and near shore reef monitoring. Due to the project-specific nature, and the high costs of this monitoring the Sponsor requests that these funds be encumbered into the project grant. Aerial surveys and regional (profiles and hydrographic) monitoring will continue to be funded through the Countywide Monitoring Agreement (#06PB3).

Attachments: Project map, MPP timeline



# SCHEDULE FOR SINGER ISLAND UPDATED: JULY 2008 EROSION CONTROL PROJECT HUMISTON & MOORE ENGINEERS

ID Ta	ask Name		Duration	Start	Finish	% Complete	Predecessors	February
1 Ta	ask 1 Data Collection & Baselin	ne Establishment		Mon 5/2/05	Tue 6/6/06	100%	39	- condary
2	<b>Review Existing Studies</b>		30 days	Mon 5/2/05	Fri 6/10/05	100%		
3	Review Previous Studies	S	25 days	Mon 5/2/05	Fri 6/3/05	100%		
			25 days	Mon 5/2/05	Fri 6/3/05	100%		
	Review Hydrographic D							
	Review Topographic Dat	ta	25 days	Mon 5/2/05	Fri 6/3/05	100%		
	Compile Data		5 days	Mon 6/6/05	Fri 6/10/05	100%	3,4,5	
	Determine need for addi	tional data	5 days	Mon 6/6/05	Fri 6/10/05	100%	3,4,5	
	Geotechnical Data		42 days	Mon 5/2/05	Tue 6/28/05	100%		
	Existing Hardbottom a	nd Bedrock Data	40 days	Mon 5/2/05	Fri 6/24/05	100%		
-	Review Existing Da		25 days	Mon 5/2/05	Fri 6/3/05	100%		
	-	1(0						
	Prepare Base Maps		35 days	Mon 5/2/05	Fri 6/17/05	100%		
	Determine Additiona	al Data Needed	5 days	Mon 6/20/05	Fri 6/24/05	100%	10,11	
	Existing Borrow Area I	Data	20 days	Wed 6/1/05	Tue 6/28/05	100%		
<b>–</b> ۲	Review Existing Of	ffshore Data	10 days	Wed 6/1/05	Tue 6/14/05	100%		
	Perform Analysis		10 days	Wed 6/15/05	Tue 6/28/05	100%	14	
		land Data			Tue 6/14/05	100%		
	Review Existing Up	Diano Data	10 days	Wed 6/1/05			10	
	Perform Analysis		10 days	Wed 6/15/05	Tue 6/28/05	100%	16	
	Project Development Meeti	ng	1 day	Wed 6/29/05	Wed 6/29/05	100%		
-	Meeting		1 day	Wed 6/29/05	Wed 6/29/05	100%	15,17	
<u></u>	Data Collection		244 days	Thu 6/30/05	Tue 6/6/06	100%	19	
_		k Dhana 4			Tue 4/4/06	100%	12	
	Hardbottom and Bedroc		15 days	Wed 3/15/06				
	Hardbottom and Bedroc		15 days	Wed 4/5/06	Tue 4/25/06	100%	21	
	Hardbottom and Bedroc	k Phase 3	15 days	Wed 4/26/06	Tue 5/16/06	100%	22	
	Hardbottom and Bedroc	k Phase 4	20 days	Wed 5/10/06	Tue 6/6/06	100%		
	Wave and Current		30 days	Thu 6/30/05	Wed 8/10/05	100%		
			-	Wed 3/15/06	Tue 5/2/06	100%		
	Wave and Current		35 days					
	ask 2 Project Design		170 days	Wed 3/30/05	Tue 11/22/05	100%		
3	Develop Design Criteria		170 days	Wed 3/30/05	Tue 11/22/05	100%		
	Determine Erosional Str	ess	80 days	Wed 3/30/05	Tue 7/19/05	100%		
	Perform Modeling		90 days	Wed 7/20/05	Tue 11/22/05	100%	29	
-	Preliminary Design		100 days	Wed 3/30/05	Tue 8/16/05	100%		
	• •	A	-			100%		
<u> </u>	Erosion Control Struc	tures	100 days	Wed 3/30/05	Tue 8/16/05			*
	Prepare Site Plan		90 days	Wed 3/30/05	Tue 8/2/05	100%		
	Estimate Cost		10 days	Wed 8/3/05	Tue 8/16/05	100%	33	1
5	Nearshore Reef		95 days	Wed 3/30/05	Tue 8/9/05	100%		
5	Prepare Site Plan		90 days	Wed 3/30/05	Tue 8/2/05	100%		
	•		5 days	Wed 8/3/05	Tue 8/9/05	100%	36	
	Estimate Cost							
	Beach Fill		90 days	Wed 3/30/05	Tue 8/2/05	100%		
•	Prepare Site Plan		90 days	Wed 3/30/05	Tue 8/2/05	100%		
5	Estimate Cost		5 days	Wed 3/30/05	Tue 4/5/05	100%		
ΠT	ask 3 FDEP Permit		950 days	Wed 3/30/05	Tue 11/18/08	61%		
2			229 days	Wed 3/30/05	Mon 2/13/06	100%		
	Pre-Application Meetings		-		Tue 5/10/05	100%		
<u> </u>	Coordinate Meetings		30 days	Wed 3/30/05				
<u> </u>	COE Meeting		1 day	Mon 1/16/06	Mon 1/16/06	100%	43	
5	DEP Meeting	+	1 day	Tue 2/7/06	Tue 2/7/06	100%	44	
5	Prepare Summary of Me	eetinas	4 days	Wed 2/8/06	Mon 2/13/06	100%	45	
<del>,</del>	JCP Application		950 days	Wed 3/30/05	Tue 11/18/08	60%		
_	••	Fracian Control		Wed 3/30/05	Wed 5/25/05	100%		
<u> </u>	Prepare Final Design - I		41 days					
•	Prepare Final Design - 1		41 days	Wed 3/30/05	Wed 5/25/05	100%		
	Prepare Final Design - I	Beach Fill	41 days	Wed 3/30/05	Wed 5/25/05	100%		
	Prepare JCP Application	n	25 days	Thu 5/26/05	Wed 6/29/05	100%	48,49,50	]
2	County Review op appl		309.06 days	Wed 6/29/05	Fri 7/7/06	100%	51	1
3	Responses to RAI's	÷	20 mons	Wed 8/2/06	Wed 10/22/08		52	1
					Tue 11/18/08		53	
<u>+</u>	DEP issues Permit		1 mon	Wed 10/22/08				
5	Develop EA		12 mons	Fri 9/28/07	Fri 8/29/08		50	
3	COE issues Permit		1 mon	Fri 8/29/08	Thu 9/25/08	0%	55	
7 0	Construction		345.81 days	Thu 9/25/08	Fri 1/22/10	0%		
B	Prepare Technical Specificat	ions	3 wks	Thu 9/25/08	Tue 10/14/08	0%	56	1
9	Construction Contract		148 days	Tue 10/14/08	Fri 5/8/09			
0			•	Tue 10/14/08	Tue 10/28/08		58	
	ENG Prep IFB		10 days				3	1
1	ERM Respond to ENG		3 days	Tue 10/28/08	Fri 10/31/08		60	1
2	ENG Clarify IFB with E	RM	2 days	Fri 10/31/08	Tue 11/4/08	0%	61	1
3	Advertise for Bids		29 days	Tue 11/4/08	Mon 12/15/08	0%	62	1
4	Pre-bid Site Visit		2 days	Fri 11/21/08	Tue 11/25/08	0%	63FS-16 days	
5	Pre-bid Meeting		1 day	Fri 11/21/08	Tue 11/25/08		63FS-16 days	
	-	A d d a a d a . 0	-				-	
6	ERM Respond to ENG	Addenda ?s	2 days	Tue 11/25/08	Thu 11/27/08			
7	IFB Quality Assurance		2 days	Thu 11/27/08	Mon 12/1/08	0%	66	<u>L</u>
		Task		] Rolled Up F	Progress		•	
		Progress		<ul> <li>Split</li> </ul>				
	Singer	Milestone		External Ta	isks	· · · ·		
•	Singer	Minostorio	-	CAUTION TO			-	
ate: 14	ue 8/12/08	Summary		Project Sur	nmary		1 1 1	
				_			-	
		D - N - 1 1						
		Rolled Up Task		Group By S	Summary			

Page 1

# SCHEDULE FOR SINGER ISLAND UPDATED: JULY 2008 EROSION CONTROL PROJECT HUMISTON & MOORE ENGINEERS

ID	Task Name	Duration	Start	Finish	% Complete	Predecessors	
							February
68	Bid Opening	1 day	Fri 12/12/08	Mon 12/15/08	0%	63FF	
69	ENG Bid Evaluation	5 days	Mon 12/15/08	Mon 12/22/08	0%	68	
70	ERM Bid Evaluation	10 days	Mon 12/22/08	Mon 1/5/09	0%	69	
71	OSBA Bid Evaluation	15 days	Mon 12/22/08	Mon 1/12/09	0%	69	
72	ENG Intent Notice to Award & Send Contract	10 days	Mon 1/5/09	Mon 1/19/09	0%	70	
73	Bid Posting by ENG	5 days	Fri 1/16/09	Fri 1/23/09	0%	72FS-1 day	
74	Contractor Sign/Insurance/Bond	14 days	Mon 1/19/09	Fri 2/6/09	0%	. 72	
75	ENG Review Contract/Insurance/Bond	6 days	Fri 2/6/09	Mon 2/16/09	0%	74	
76	ERM Submit Contract Board Item	14 days	Mon 2/16/09	Fri 3/6/09	0%	75	
77	Sign Contract (ERM to BCC)	35 days	Fri 3/6/09	Fri 4/24/09	0%	76	•
78	Pre-Construction Meeting	1 day	Fri 4/24/09	Mon 4/27/09	0%	77	
79	Notice To Proceed	10 days	Fri 4/24/09	Fri 5/8/09	0%	77	
80	Construction	185 days	Fri 5/8/09	Fri 1/22/10	0%		
81	mobilize staging site	1 wk	Fri 5/8/09	Fri 5/15/09	0%	79	
82	place rock	9 mons	Fri 5/15/09	Fri 1/22/10	0%	81	

	Task		Rolled Up Progress				
•	Progress		Split				
Project: Singer	Milestone		External Tasks	· · · · · · · · · · · · · · · · · · ·			
Date: Tue 8/12/08	Summary		Project Summary				
	Rolled Up Task		Group By Summary				
	Rolled Up Milestone		Deadline	53			
Page 2							

26

## SOUTH LAKE WORTH INLET MANAGEMENT

### **Project Description**

The project consists of design, permitting, construction, and monitoring associated with the implementation of the South Lake Worth Inlet Management Plan. Activities occurring under this project include the periodic dredging of the sand trap and navigational channel located inside the inlet and the reconstruction of the sand transfer plant. The reconstruction of the plant is currently in the final design and permitting stages.

#### Location

Palm Beach County, R-152 (monitoring from R137-R164)

### **Project Evaluation**

<u>Severity of Erosion</u>: Interruption of the natural sand transport threatens developed property along 77% of the project area. The historic erosion rate along the project shoreline was computed to be 5 cy/ft/yr (Aug 1996 GDM). Over the anticipated six year renourishment schedule, the erosion rate is anticipated to average 7.44 cy/yr/lf (including end losses).

This area is located within an area of critical erosion as designated by the Department.

#### Benefits:

Shoreline development within the project area consists of developed property and public park land, 100% of which lies within  $\frac{1}{2}$  mile of adequate public access facilities. Public beach access allows for public and tourism use throughout the project area. Threatened and endangered marine turtles utilize the entire project area for nesting purposes and protected plant species are located in the dunes.

<u>Federal Commitment:</u> This project has not been federally authorized, however a one-time allotment has been awarded to repair damages to the sand transfer plant and to the inlet jetty as a result of the 2004 hurricanes. This money, authorized by FEMA, will be used to offset construction costs.

<u>State Commitment:</u> The management plan for the project and annual monitoring was funded by the state and the project is included in the Strategic Beach Management Plan. The initial phase of sand trap development & restoration of the sand transfer plant was funded by the state. The funding appropriation for the SLWI jetty restoration was confirmed by the legislature on July 17, 2007. The original grant for this project (99PB1) has been extended several times and expired on February 28, 2008.

Local Commitment & Capability: The project is consistent with the local government comprehensive plan and the local sponsor supports the Department's beach management activities as set forth under Part 1, Chapter 161, Florida Statutes. A long-range budget plan and dedicated funding sources are in place. The degree of local funding proposed is detailed in the attached financial schedule. The County has retained the services of a professional coastal engineering firm to assist in feasibility, design, permitting, and other project related activities. The administrative capability of the local sponsor has been demonstrated by the successful completion of the initial phase of this project as well as many others.

<u>Project Performance:</u> The project mitigates for adverse impacts associated with the inlet, providing 100% of the bypass quantity required by the approved management plan. The project area acts as a feeder beach to maintain down drift areas which contain nearshore hardbottom habitat. The transfer plant continues to provide a cost effective and environmentally sound method of bypassing sand over an extended time period. The latest data show the sand transfer plant bypasses approximately 60,000 CY annually to down drift beaches. Sand trap and navigational channel dredging maximize the use of sediment sources in maintaining the beach. The performance of sand bypass into the groin field is such that the area maintained its width throughout the project interval and did not require any fill during the most recent downdrift beach nourishment (Ocean Ridge shore protection project, completed Dec 2005), resulting in a cost savings through the reduction in the amount of fill necessary.

<u>Innovative Applications:</u> The plant is a component of an innovative approach to maintain the downdrift beaches using inlet sand bypass discharge into a groin field. The bypassed sand is native beach material, with color, fine fraction and compaction characteristics which has been shown to not impact sea turtle nesting success. The steady rate of transfer eliminates the need for advanced fill

27

South Lake Worth Inlet Management

and the related impacts to nearshore hardbottom.

### **Use of Program Funds**

The requested funding will be used for monitoring associated with the implementation of the South Lake Worth Inlet Management Plan. Construction of the new sand transfer plant has been combined with the Inlet jetty repair and the construction of the Bird Island Bulkhead, and will be bid out as one project. Construction is scheduled to begin in the spring of 2009.

Attachments: MPP timeline (see Ocean Ridge attachment for map of project area)

- 1	Task Name		Duration	Start	Finish	2008	Qtr 3, 2008	
0	Funding		513 days	Tue 1/15/08	Thu 12/31/09	5	Mar Apr May	Jun
		nend 5 of Grant 99PB1 Approved	1 day	Tue 1/15/08	Tue 1/15/08			
	99PB1 Grant Expi		0 days	Thu 12/31/09	Thu 12/31/09	1		
	-	endment for Extension	5 days	Mon 10/5/09	Fri 10/9/09	1		
	Receive Executed	Amendment from DEP	0 days	Sun 11/8/09	Sun 11/8/09	ļ		1
	Prepare Agenda I	tem for Amendment	5 days	Mon 11/9/09	Fri 11/13/09			
	ERM Admin Appr		5 days	Mon 11/16/09	Fri 11/20/09			
R.		nend 6? of Grant 99PB1 Approved	1 day	Tue 12/22/09	Tue 12/22/09			
الش <b>نگا</b> :	Design		215 days	Tue 3/4/08	Mon 12/29/08	:		
	Consultant Task	Order	215 days	Tue 3/4/08	Mon 12/29/08			
	Prepare/Neg	otiate Task Order	30 days	Tue 3/4/08	Mon 4/14/08	00%		
		- Task Order Approved	0 days	Tue 4/15/08	Tue 4/15/08		4/15	
	Plans and S		80 days	Mon 5/5/08	Fri 8/22/08			
		30% Design Plans	0 days	Mon 5/5/08	Mon 5/5/08		5/5 5/5	5
		ad & Bridge Review	8 days	Tue 5/6/08	Thu 5/15/08		100% 📕	
		65% Design Plans + Draft Specifications	0 days	Tue 7/15/08	Tue 7/15/08			
1		B/CID Review	10 days	Wed 7/16/08	Tue 7/29/08			0
		Final Design Plans & Specifications	0 days	Tue 8/12/08	Tue 8/12/08			
		partmental Review	8 days	Wed 8/13/08	Fri 8/22/08			
		Specs Complete	0 days	Fri 8/22/08	Fri 8/22/08			
0	Plans & PZ&B Build		90 days	Mon 8/25/08	Mon 12/29/08			
9		ant Submits Permit Application to PZ&B	0 days	Mon 8/25/08	Mon 8/25/08			
		Approved	0 days 0 days	Mon 12/29/08	Mon 12/29/08			
	Permits	(pproved	801 days?	Wed 8/1/07	Wed 8/25/10	-		
	Sand Transfer P	lant	281 days	Wed 7/29/09	Wed 8/25/10			
			64 days	Wed 7/29/09	Mon 10/26/09			
	DEP Permit		0 days	Mon 10/26/09	Mon 10/26/09			
		rmit Expiration	-	Wed 7/29/09	Tue 8/4/09			
<b>1</b>		Application for Permit Extension	5 days	Thu 9/3/09	Thu 9/3/09			
		Renewal Approved	0 days		Wed 8/25/10			
	USACE Per		64 days	Fri 5/28/10	Wed 8/25/10 Wed 8/25/10			
		Permit Expiration	0 days	Wed 8/25/10	Thu 6/3/10			
<b>9</b>		Application for Permit Extension	5 days	Fri 5/28/10 Sat 7/3/10	Sat 7/3/10			
		Renewal Approved	0 days 276 days?	Wed 8/1/07	Wed 8/20/08			
	Jetty		276 days : 276 days	Wed 8/1/07	Wed 8/20/08			
·	DEP Permit			Wed 8/1/07	Fri 8/17/07			
- 1		mpile and send info for DEP evaluation	13 days	Wed 9/19/07	Wed 9/19/07			
		from DEP	0 days	Thu 9/20/07	Mon 3/3/08		<b></b>	
		esponse to RAI #1	118 days		Fri 4/4/08		4/4	
		from DEP	0 days	Fri 4/4/08	Thu 7/3/08		100%	<del></del>
		esponse to RAI #2	64 days	Mon 4/7/08	Sat 8/2/08			
		from DEP	0 days	Sat 8/2/08 Mon 8/4/08	Wed 8/13/08			
		esponse to RAI #3	8 days		Wed 8/13/08 Wed 8/20/08			
<b>773</b>		mit or Exemption Issued	0 days	Wed 8/20/08	Tue 2/12/08			
1 <b>6</b> 2	USACE	Devenit Application	52 days?	Mon 12/3/07	Fri 12/14/07	_		
		Permit Application	10 days?	Mon 12/3/07	Tue 2/12/08	*	2/12	
		Permit Issued	0 days	Tue 2/12/08	Tue 2/12/08			
	Seawall		47 days? 47 days?	Mon 12/3/07 Mon 12/3/07	Tue 2/5/08	_		
8 <b>8</b>	USACE		4/ U2/5 (	mon iziaivi	100 210/00			
		Task	Rolled Up Mile	estone				
		Task Progress	Rolled Up Pro	gress				
		-	Split	· <u> </u>				
		Critical Task						
	STP & jetty & seawall	Critical Task Progress	External Task	S				
te: Tue 8/1:	2/08	Milestone	Project Summ	ary 🖬 🖓				
		Summary	Group By Sur	nmary				
			Deadline					
		Rolled Up Task	Deadline	1.3				
		Rolled Up Critical Task						

<u>Project Performance</u>: The project design was based on the GDM (NED included) & EIS. It has performed as designed and is optimized with the addition of sand dredged from the ICW, the inlet sand trap, the boat club channel and the sand bypass plant. The project mitigates for adverse impacts of the inlet by providing 100% of the bypass quantity proposed in the inlet management plan. The fill provides 100% of the sand needed to maintain the downdrift beaches in Gulfstream without impacting the local nearshore habitat. The project is designed to improve cost effectiveness by using groins, a bypass plant, and periodic dredging of areas within Lake Worth Lagoon.

29

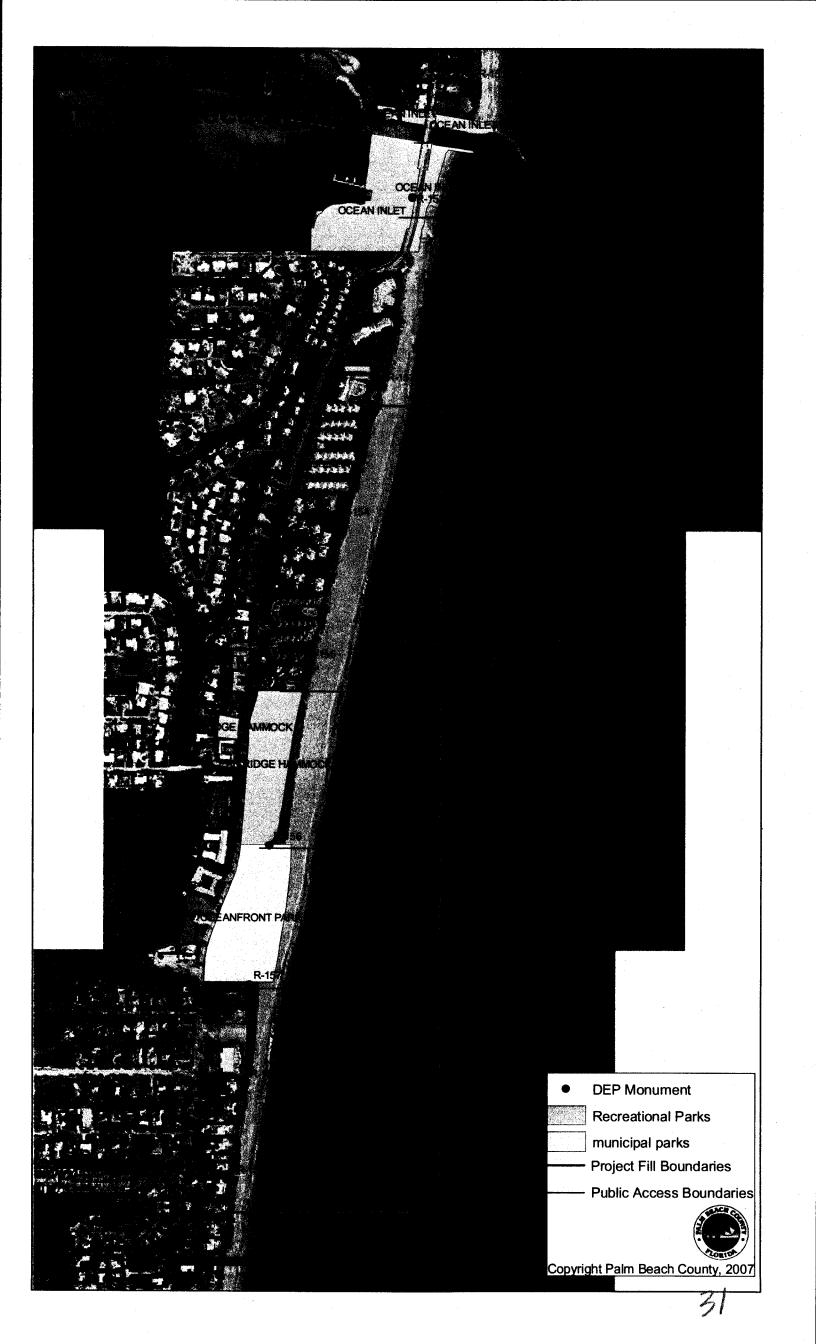
#### Ocean Ridge Shore Protection

<u>Innovative Applications:</u> The project demonstrates the combined successful use of periodic nourishment, groins and a sand transfer plant.

### **Use of Program Funds**

The requested funding will be used for project-specific monitoring required by DEP permit (currently sea turtle, shorebird, and near shore reef). Additional funding is requested to modify the groin structures placed with the 1998 project to mitigate for downdrift erosion occurring immediately south of the Southernmost groin. Aerial surveys and regional (profiles and hydrographic) monitoring will continue to be funded through the Countywide Monitoring Agreement (#06PB3).

Attachments: Project map,



### SOUTH PALM BEACH SHORE PROTECTION PROJECT

#### **Project Description**

Restoration of approximately 0.7 miles of critically eroding shoreline along the entire length of the municipality and the public beach in Lantana. A feasibility study for the project is complete and has been accepted by the Bureau. Design and Permitting work is underway. Recent communication from the local USACE office has indicated that an Environmental Impact Statement for the project will be required as part of the permitting process. The most updated timeline for this project indicates construction beginning in the summer of 2010.

Persistent dunes within the project area are restored on an as-needed basis, since the near total loss of dune resulting from sub-tropical Storm Andrea (May 2007), this has occurred at least annually. Sand lost from the berm during the 2004 and 2005 hurricanes has not been restored however; staff works to maintain the current level of the beach with dune stabilizing plantings.

#### Location

Palm Beach County, R-134 - R-137.5 (fill area), map attached.

#### **Project Evaluation**

<u>Severity of Erosion</u>: The entire project area is designated critically eroded by the Florida State Department of Environmental Protection. The hurricanes of 2004 and 2005 destroyed the restored dunes and lowered the berm height. The beach has not recovered, and continues to be impacted by wind and waves due to winter storms and tropical activity. Dune restoration occurs at least annually however the most recent project (completed in January 2008) has completely eroded. Plans are underway for another restoration during the winter of 2008/2009.

<u>Benefits</u>: The project is designed to provide long-term storm protection, retain sand within the coastal system, aesthetically enhance the area, and provide habitat for endangered plant and animal species. A total of 96% of the project area shoreline is available for public recreational use (within ½ mile of Lantana Public Beach). Approximately 22% of the project area is publicly owned parks and beach access ways. A total of 78% of the project area consists of a hotel and multifamily structures. Hurricane evacuation routes in the project area include Route A1A which runs N-S along the entire project area.

Threatened and endangered marine turtles utilize the entire project area for nesting purposes and protected plant species are located in the dunes.

<u>State Commitment</u>: Grant funding was provided for the dune work and feasibility study. The project is included in the Florida DEP Beach Restoration Management Plan. Funding provided in the 2006/2007 fiscal year has been exhausted on the feasibility study and dune fill projects. Most recently, this area was included under emergency funding grant 07PB2 for dune restoration. Currently there is no available State funding for this project, however The County's understanding is that slippage funds may be available from 2007/2008.

Local Commitment: The project is consistent with the local government comprehensive plan and the local sponsor supports the Department's beach management activities as set forth under Part 1, Chapter 161, Florida Statutes. A long-range budget plan and dedicated funding sources are in place. The degree of local funding proposed is detailed in the attached financial schedule. Most recently, an interlocal agreement has been signed by the Town of South Palm Beach to provide a share of the local cost for the design, permitting, and construction of erosion control structures. An amendment to this agreement to provide funding for dune restoration is forthcoming. The administrative capability of the local sponsor has been demonstrated by the successful completion of the initial phase of this project as well as many others. County staff will provide administrative, contract development, legal, permitting, environmental monitoring and construction management services.

<u>Innovative Applications:</u> Innovative modeling technology is being used to minimize the extent of construction necessary for shoreline stabilization. Preliminary results show that a combination of dune restoration and structural stabilization instead of conventional beach nourishment will minimize the potential impacts to extensive nearshore hardbottom resources in the vicinity.

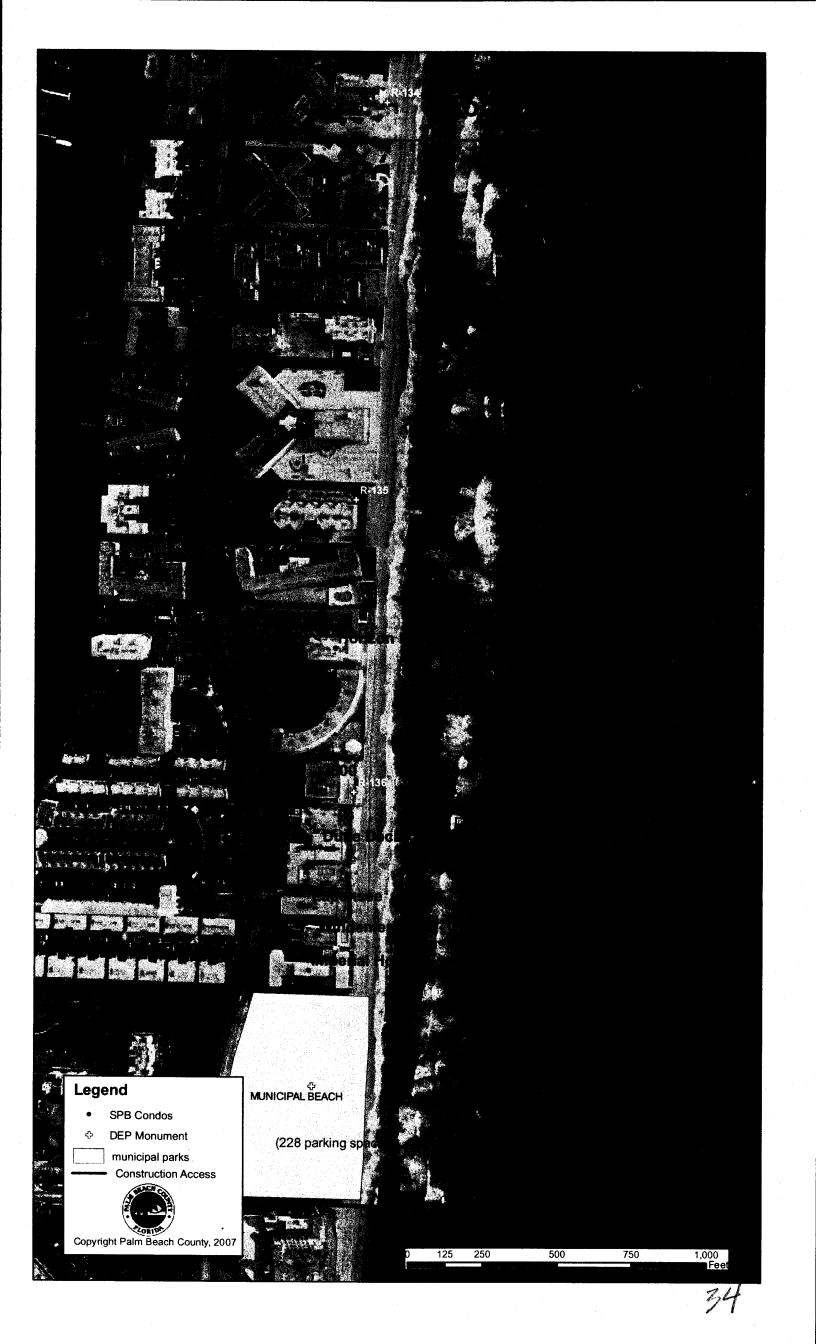
### **Use of Program Funds**

Funds requested for FY 2009-10 will be used to complete project design and permitting,

currently underway, as well as construction of erosion control structures. Additional funds have been requested to restore the dune in the project area on an as-needed basis until a permanent solution is completed. Aerial surveys and regional (profiles and hydrographic) monitoring will be funded through the Countywide Monitoring Agreement (#06PB3).

Attachments: Project map, MPP timeline

33



	Southpalmbeach_erosi	on control alternative					
	ask Name	Duration	Start	Finish	% Complete Predece		
0	outh Palm Beach Erosion Control Engineering Alternative Development	1385 days?	Tue 4/18/06	Mon 8/8/11	17%	SN	A T W T
2	Erosion Control Study DRAFT received	211 days?	Tue 4/18/06	Tue 2/6/07	100%		
3	After review of DRAFT. ERM staff supports development of an Environmental Impact	12 days	Tue 2/6/07	Wed 2/21/07	100%		
	Statement (EIS) for erosion control Attend Town of South Palm Beach Town Council Meeting to present study results &	1 day	Wed 2/28/07	Wed 2/28/07	100%		
4	Attend Town of South Paim Beach Town Council Meeting to present study results & request financial participation of 20% for an erosion control project	1 day	weu 2/26/07	weg 2/28/07	100%		
5	BCC approves Interlocal Agreement w/ South Palm Beach for financial participation of	1 day	Tue 5/15/07	Tue 5/15/07	100%		
6	20% County feasibility study comments sent to CPE	1 day	Fri 5/18/07	Fri 5/18/07	100%		
7	Emergency dune restoration due to Subtropical Storm Andrea (7,000 CY placed)	10 days?	Tue 5/29/07	Mon 6/11/07	100%		
8	FINAL copies of the Feasibility Study Received	1 day	Thu 7/5/07	Thu 7/5/07	100%		
9	All consultant qualifcation packages received by the ACOE local office	40 days?	Fri 5/18/07	Thu 7/12/07	100%		
10	ERM staff attends meeting w/ ACOE to discuss project & EIS	1 day	Tue 9/4/07	Tue 9/4/07	100%		
11	Engineering & Design SOW	380 days?	Wed 4/18/07	Tue 9/30/08	85%		
12		275 days?	Wed 9/12/07	Tue 9/30/08	100%		
13	CPE & County Meeting	1 day?	Tue 12/18/07	Tue 12/18/07	100%		
14	CPE submits first ADP SOW	1 day?	Wed 1/16/08 Wed 2/6/08	Wed 1/16/08 Wed 2/6/08	100% 100%		
15	1st DRAFT Engineering & Design SOW Received CPE submits second ADP SOW	1 day?	Mon 2/25/08	Mon 2/25/08	100%		
17	FDEP approves ADP SOW	1 day?	Tue 2/26/08	Tue 2/26/08	100%		
18	CPE & County Meeting	1 day?	Wed 4/18/07	Wed 4/18/07	100%		
19	2nd DRAFT Engineering & Design SOW Received	1.06 days	Tue 5/20/08	Wed 5/21/08	100%		
20	County submits Engineering & Design SOW to FDEP	1 day		Wed 5/28/08	100%	ź	
21	FDEP comments received	1 day?	Tue 6/24/08	Tue 6/24/08 Wed 7/16/08	100% 100%		
22	3rd DRAFT Engineering & Design SOW Received County submits responses to FDEP comments	1 day? 17,13 days?	Wed 7/16/08 Tue 6/24/08	Wed 7/16/08 Wed 7/23/08	100%		
23 💽 24 💽	ERM submits comments to CPE regarding 3rd DRAFT	1 day?	The 7/31/08	Thu 7/31/08	0% 23		
<b>لاسا</b> 25					24		
26					25		
27		-			26		
28	FDEP FUNDING	2 days?	Wed 7/2/08	Thu 7/3/08	50% 100%		
29 <b>1</b> 30 <b>1</b>	ERM requests FDEP cost sharing for EA	1 day? 1 day?	Wed 7/2/08 Thu 7/3/08	Wed 7/2/08 Thu 7/3/08	100% 0% 29		
30 <b>LE</b> 31	Task Order PREP	17 days?	Mon 8/18/08	Tue 9/9/08	39%		
32					50%		
33					0%		
34 🖸					0%		
35 36 <b>11</b>	SOW Engineering & Permitting Deliverables Review of SI Material	129 days? 129 days	Wed 9/10/08 Wed 9/10/08	Mon 3/9/09 Mon 3/9/09	0% 0% 34		
36 <b>[</b> ] 37							
8	Environmental Impacts & Benefits Assessment	129 days	Wed 9/10/08	Mon 3/9/09	0% 34		
9	Nearshore/Offshore Edge Relief Measurements	129 days?	Wed 9/10/08	Mon 3/9/09	0% 34		
41							
42 43	Engineering Design & Documentation	129 days	Wed 9/10/08	Mon 3/9/09	0% 34		
44	Numerical Modeling of Beach Morphology	129 days	Wed 9/10/08	Mon 3/9/09	0% 34		
45		1 day?	Wed 9/10/08	Wed 9/10/08	0% 34		
47		1 day :			014 04		
48 💽	Predesign Satkeholder Identification Meeting w/ Regulatory Agencies	1 day	Thu 12/18/08	Thu 12/18/08	0% 34		
50	Stakeholder Meeting to Review Design	1 day	Fri 1/16/09	Fri 1/16/09	0% 34		
51							
52	Beach Profile Survey	129 days	Wed 9/10/08	Mon 3/9/09	0% 34		
54		129 days?	Wed 9/10/08	Mon 3/9/09	0% 34		
55	JCP Permit Application	41 days?	Wed 9/24/08	Wed 11/19/08	0%		
57						-	
58 59	Meetings with County Staff	1 day?	Wed 9/10/08	Wed 9/10/08	0% 34		
60	Nearshore Seismic Reflection Subbottom Profile Survey	129 days?	Wed 9/10/08	Mon 3/9/09	0% 34	•	
51		· · ·					
52 53 <b>TEL</b>	**						
i4							
5	·						
6 <b>3</b>							
8							
9							
0							
1							
3							
	PERMITS Received	1 day?	Tue 2/9/10	Tue 2/9/10			
5	FDEP Permit ACOE Permit	1 day? 1 day?	Tue 2/9/10 Tue 2/9/10	Tue 2/9/10 Tue 2/9/10			
'5 '6		97 days?		Thu 6/24/10			
'5 '6 '7	CONSTRUCTION CONTRACTOR SELECTION	20 days	Wed 2/10/10	Tue 3/9/10	0% 77		
5 6 (7	CONSTRUCTION CONTRACTOR SELECTION Prepare IFB			Wed 3/10/10			
74 75 76 77 78 79 80	Prepare IFB Pre Bid Site Visit	1 day?	*** ******	Thu 3/11/10	0% 80		
75 76 77 78 79 80 81	Prepare IFB Pre Bid Site Visit Pre Bid Meeting	1 day?		Th. 400000	00/ 01		
75 76 77 78 79 30 31 31	Prepare IFB Pre Bid Site Visit Pre Bid Meeting Advertise for Bids	1 day? 30 days	Fri 3/12/10	Thu 4/22/10 Thu 4/29/10			
75 76 77 78 30 31 32 33	Prepare IFB Pre Bid Site Visit Pre Bid Meeting	1 day?	Fri 3/12/10 Fri 4/23/10	Thu 4/22/10 Thu 4/29/10 Fri 4/30/10	0% 82		
75 76 77 78 79 90 81 81 82 83 84	Prepare IFB Pre Bid Site Visit Pre Bid Meeting Advertise for Bids IFB Quality Assurance	1 day? 30 days 5 days	Fri 3/12/10 Fri 4/23/10 Fri 4/30/10	Thu 4/29/10	0% 82 0% 83	-	
75 76 77 78 79 30 31 32 33 34	Prepare IFB Pre Bid Site Visit Pre Bid Meeting Advertise for Bids IFB Quality Assurance Bid Opening Bid Evaluation	1 day? 30 days 5 days 1 day?	Fri 3/12/10 Fri 4/23/10 Fri 4/30/10 Mon 5/3/10	Thu 4/29/10 Fri 4/30/10 Fri 5/14/10	0% 82 0% 83		
75 76 77 78 80 81 82 83 84 85 55	Prepare IFB Pre Bid Site Visit Pre Bid Meeting Advertise for Bids IFB Quality Assurance Bid Opening Bid Evaluation Task Milestone	1 day? 30 days 5 days 1 day?	Fri 3/12/10 Fri 4/23/10 Fri 4/30/10 Mon 5/3/10 External Tasks	Thu 4/29/10 Fri 4/30/10 Fri 5/14/10	0% 82 0% 83	- - 	
75 76 77 78 79	Prepare IFB Pre Bid Site Visit Pre Bid Meeting Advertise for Bids IFB Quality Assurance Bid Opening Bid Evaluation Task Split Summary	1 day? 30 days 5 days 1 day? 10 days	Fri 3/12/10 Fri 4/23/10 Fri 4/30/10 Mon 5/3/10 External Tasks External Milest	Thu 4/29/10 Fri 4/30/10 Fri 5/14/10	0% 82 0% 83		
5 6 7 8 9 9 9 9 9 9 9 9 9 9 9 9 9 9 9 9 9 9	Prepare IFB Pre Bid Site Visit Pre Bid Meeting Advertise for Bids IFB Quality Assurance Bid Opening Bid Evaluation Task Milestone	1 day? 30 days 5 days 1 day?	Fri 3/12/10 Fri 4/23/10 Fri 4/30/10 Mon 5/3/10 External Tasks	Thu 4/29/10 Fri 4/30/10 Fri 5/14/10	0% 82 0% 83	-	

	Southpalmbeach_e	rosion control alternative				
D O	Task Name	Duration	Start	Finish	% Complete Predecessors	Apr 16, 106
6	Intent Notice to Award & Send Contract	1 day?	Mon 5/17/10	Mon 5/17/10	0% 85	
17	Bid Posting	6 days	Tue 5/18/10	Tue 5/25/10	0% 86	
8	Contractor Sign/ Insurance/ Bond	5 days	Wed 5/26/10	Tue 6/1/10	0% 87	
19	Review Contract/ Insurance/ Bond	10 days	Wed 6/2/10	Tue 6/15/10	0% 88	
0	Sign Contract	5 days	Wed 6/16/10	Tue 6/22/10	0% 89	
91	Notice to Proceed	1 day?	Wed 6/23/10	Wed 6/23/10	0% 90	
92	Pre Construction Meeting	1 day?	Thu 6/24/10	Thu 6/24/10	0% 91.	
3	Construct Engineering Alternative	69 days?	Mon 5/2/11	Thu 8/4/11	0%	
4	Mobilization	3 days	Mon 5/2/11	Wed 5/4/11	0%	
5	Construction	90 edays?	Wed 5/4/11	Tue 8/2/11	0% 94	
6	Demobilization	2 days	Wed 8/3/11	Thu 8/4/11	0% 95	
7	Pre & Post Construction Monitoring	2 days	Fri 8/5/11	Mon 8/8/11	0%	
8 🖪	Biological monioring (TBD)	2 days	Fri 8/5/11	Mon 8/8/11	0% 96	
9	Physical Monitoring (TBD)	2 days	Fri 8/5/11	Mon 8/8/11	0% 96	
)) )	Quarterly Reports	262 days?	Thu 1/15/09	Fri 1/15/10	0%	
01	Q4 2008	5 days	Thu 1/15/09	Wed 1/21/09	0%	
02	Q1 2009	1 day?	Wed 4/15/09	Wed 4/15/09	0% 101	
3	Q2 2009	1 day?	Wed 7/15/09	Wed 7/15/09	0% 102	
04	Q3 2009	1 day?	Thu 10/15/09	Thu 10/15/09	0% 103	
)5	Q4 2009	1 day?	Fri 1/15/10	Fri 1/15/10	0% 104	

	Task		Milestone		External Tasks			
Project: spbd 2 Date: Tue 8/12/08	Split		Summary	<b></b>	External Milestone			
	Progress		Project Summary		Deadline	LL		
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# PALM BEACH COUNTYWIDE MONITORING

### **Project Description**

This project consists of regional monitoring activities associated with eligible beach projects.

### Location

Palm Beach County, R-001 to R-204 (Excluding all of the Town of Palm Beach). See attached project maps for detailed location information.

### Eligible Projects to be Funded

- Ocean Ridge Shore Protection
  - $\circ$  The first renourishment of this project was completed in December of 2005.
  - Permit required post-construction monitoring is ongoing and will continue through 2009.
- Juno Beach Shore Protection Project
  - Required pre-construction monitoring will be completed prior to the issuance of a Notice to Proceed for this project.
  - Construction on this project is scheduled to begin in November of 2008 and will be complete before March 1, 2009.
  - Post-construction monitoring will begin upon project completion.
- South Palm Beach Shore Protection Project
  - Design and permitting of this project is underway.
- Singer Island Shore Protection Project
  - Permitting is ongoing and construction of the breakwaters for this project is expected to commence at the end of the 2008/2009 fiscal year
- Jupiter Carlin Shore Protection Project
  - $\circ~$  The feasibility study for the proposed structures associated with this project is underway.
  - The design and permitting of the second renourishment will begin in 2008.
- South Lake Worth Inlet Management
  - Monitoring associated with the implementation of the South Lake Worth Inlet Management Plan is ongoing.

### **Use of Program Funds**

Activities to be funded under this include monitoring required by permit. Physical monitoring which will be funded under this grant includes, but is not limited to: topographic/bathymetric surveys, and aerial photography. Biological monitoring which includes, but is not limited to: nearshore reefs, shorebird populations, and sea turtle nesting and reproductive success, is project specific and will not be funded under this grant in the 2009-2010 cycle, but under individual project grants.